



Full wwPDB EM Validation Report ⓘ

Mar 22, 2026 – 10:20 PM UTC

PDB ID : 7ANE / pdb_00007ane
EMDB ID : EMD-11829
Title : Leishmania Major mitochondrial ribosome
Authors : Soufari, H.; Waltz, F.; Parrot, C.; Bochler, A.; Hashem, Y.
Deposited on : 2020-10-11
Resolution : 3.90 Å(reported)

This is a Full wwPDB EM Validation Report for a publicly released PDB entry.

We welcome your comments at validation@mail.wwpdb.org

A user guide is available at

<https://www.wwpdb.org/validation/2017/EMValidationReportHelp>

with specific help available everywhere you see the ⓘ symbol.

The types of validation reports are described at

<http://www.wwpdb.org/validation/2017/FAQs#types>.

The following versions of software and data (see [references ⓘ](#)) were used in the production of this report:

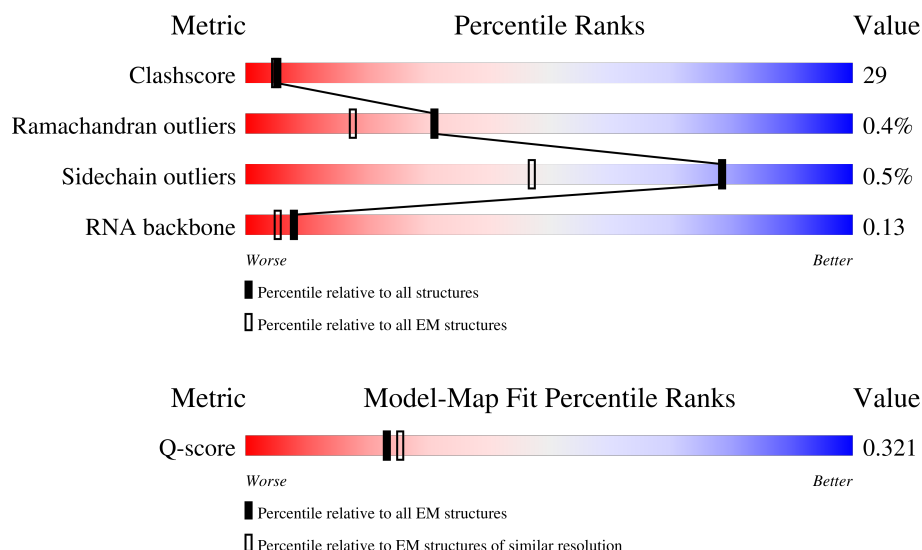
EMDB validation analysis : 0.0.1.dev132
Mogul : 2022.3.0, CSD as543be (2022)
MolProbity : 4-5-2 with Phenix2.0
Buster-report : wwPDB partial adaption of 1.1.7 (2018)
Percentile statistics : 20250101.v01 (using entries in the PDB archive January 1st 2025)
EM percentile statistics : 202505.v01 (Using data in the EMDB archive up until May 2025)
MapQ : 1.9.13
Ideal geometry (proteins) : Engh & Huber (2001)
Ideal geometry (DNA, RNA) : Parkinson et al. (1996)
Validation Pipeline (wwPDB-VP) : 2.49

1 Overall quality at a glance

The following experimental techniques were used to determine the structure:
ELECTRON MICROSCOPY

The reported resolution of this entry is 3.90 Å.

Percentile scores (ranging between 0-100) for global validation metrics of the entry are shown in the following graphic. The table shows the number of entries on which the scores are based.



Metric	Whole archive (#Entries)	EM structures (#Entries)	Similar EM resolution (#Entries, resolution range(Å))
Clashscore	229148	23984	-
Ramachandran outliers	224038	23583	-
Sidechain outliers	223484	23102	-
RNA backbone	8273	3508	-
Q-score	-	25397	8855 (3.40 - 4.40)

The table below summarises the geometric issues observed across the polymeric chains and their fit to the map. The red, orange, yellow and green segments of the bar indicate the fraction of residues that contain outliers for ≥ 3 , 2, 1 and 0 types of geometric quality criteria respectively. A grey segment represents the fraction of residues that are not modelled. The numeric value for each fraction is indicated below the corresponding segment, with a dot representing fractions $\leq 5\%$. The upper red bar (where present) indicates the fraction of residues that have poor fit to the EM map (all-atom inclusion $< 40\%$). The numeric value is given above the bar.

Mol	Chain	Length	Quality of chain
1	1	18998	 94%
1	2	18998	 97%
2	h	166	 16% 43% 51% 5%

Continued on next page...

Continued from previous page...

Mol	Chain	Length	Quality of chain
3	aw	139	
4	m	325	
5	f	371	
6	s	179	
7	au	247	
8	am	313	
9	n	171	
10	ae	655	
11	ay	169	
12	ag	564	
13	aj	397	
14	e	822	
15	d	351	
16	az	163	
17	ax	184	
18	r	467	
19	af	835	
20	u	890	
21	aa	1813	
22	ab	1177	
23	ak	325	
24	ac	1267	
25	ad	811	
26	an	302	
27	ao	291	

Continued on next page...

Continued from previous page...

Mol	Chain	Length	Quality of chain
28	ap	245	
29	aq	295	
30	as	270	
31	at	397	
32	y	485	
33	w	190	
34	v	214	
35	t	267	
36	p	321	
37	j	189	
38	l	677	
39	ar	282	
40	av	236	
41	ai	379	
42	x	268	
43	i	429	
44	g	192	
45	o	604	
46	c	311	
47	k	312	
48	q	425	
49	b	159	
50	a	431	
51	ba	94	
52	z	1169	

Continued on next page...

Continued from previous page...

Mol	Chain	Length	Quality of chain
53	bd	89	
54	A	466	
55	B	435	
56	C	261	
57	D	204	
58	E	345	
59	F	171	
60	G	373	
61	H	167	
62	I	304	
63	J	143	
64	K	193	
65	L	185	
66	M	278	
67	N	251	
68	O	475	
69	P	184	
70	Q	233	
71	R	479	
72	S	408	
73	T	82	
74	U	117	
75	V	150	
76	W	185	
77	X	512	

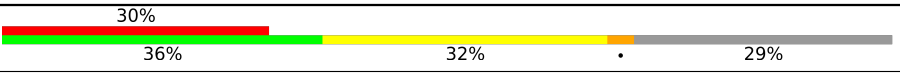
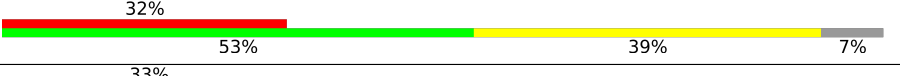
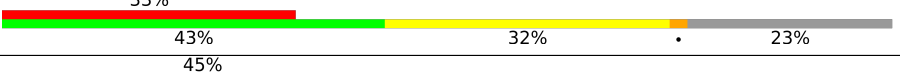
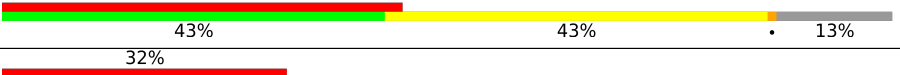
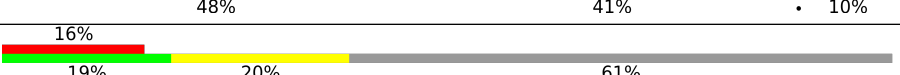
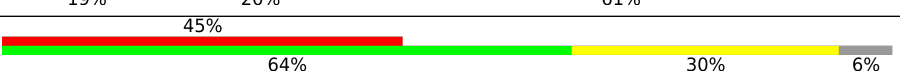
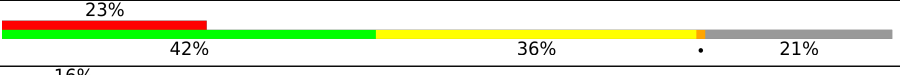
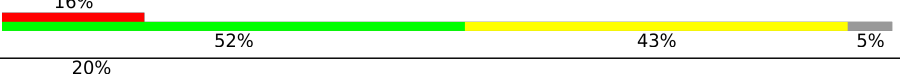
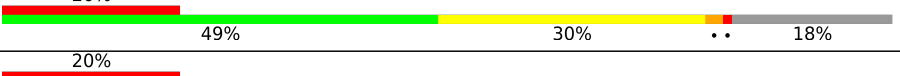
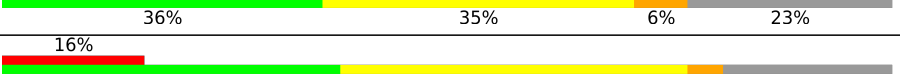
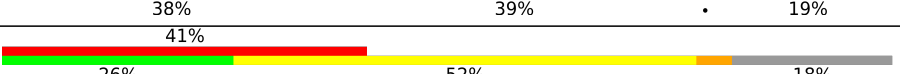
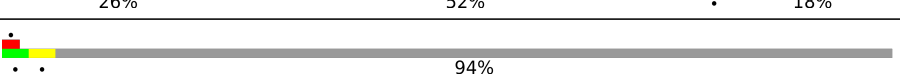
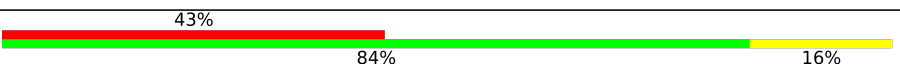
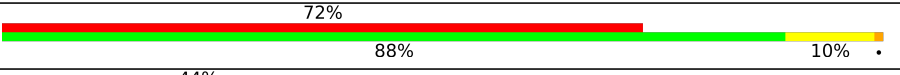
Continued on next page...

Continued from previous page...

Mol	Chain	Length	Quality of chain
78	Y	292	
79	Z	197	
80	BA	167	
81	UA	203	
82	BB	156	
83	Aw	187	
84	Bj	185	
85	An	331	
86	Al	346	
87	BI	266	
88	Az	152	
89	At	183	
90	BC	147	
91	Ab	262	
92	Ai	479	
93	Ap	240	
94	Au	186	
95	Aa	195	
96	Ao	284	
97	BM	457	
98	Ar	205	
99	Aj	503	
100	BH	229	
101	Am	340	
102	Aq	341	

Continued on next page...

Continued from previous page...

Mol	Chain	Length	Quality of chain
103	BE	118	
104	Ak	323	
105	BP	254	
106	Ad	237	
107	BF	109	
108	Av	192	
109	Af	155	
110	As	249	
111	Ae	311	
112	Ac	291	
113	Ah	570	
114	BD	102	
115	Ay	174	
116	Ag	244	
117	Ax	216	
118	BL	380	
119	BO	190	
120	BG	1347	
121	UB	67	
122	UC	144	
123	UD	95	

The following table lists non-polymeric compounds, carbohydrate monomers and non-standard residues in protein, DNA, RNA chains that are outliers for geometric or electron-density-fit criteria:

Mol	Type	Chain	Res	Chirality	Geometry	Clashes	Electron density
124	ZN	BG	1401	-	-	X	-
124	ZN	T	101	-	-	X	-

2 Entry composition

There are 126 unique types of molecules in this entry. The entry contains 303111 atoms, of which 0 are hydrogens and 0 are deuteriums.

In the tables below, the AltConf column contains the number of residues with at least one atom in alternate conformation and the Trace column contains the number of residues modelled with at most 2 atoms.

- Molecule 1 is a RNA chain called Large ribosomal RNA.

Mol	Chain	Residues	Atoms					AltConf	Trace
1	2	604	Total	C	N	O	P	0	0
			12723	5725	2119	4275	604		
1	1	1084	Total	C	N	O	P	0	0
			22858	10292	3832	7650	1084		

There are 6 discrepancies between the modelled and reference sequences:

Chain	Residue	Modelled	Actual	Comment	Reference
2	612	U	A	conflict	GB 1756572068
2	613	U	A	conflict	GB 1756572068
2	615	U	G	conflict	GB 1756572068
1	1840	U	A	conflict	GB 1756572068
1	1841	U	A	conflict	GB 1756572068
1	1843	U	G	conflict	GB 1756572068

- Molecule 2 is a protein called uS14m.

Mol	Chain	Residues	Atoms					AltConf	Trace
2	h	157	Total	C	N	O	S	0	0
			1311	831	248	224	8		

- Molecule 3 is a protein called mS69.

Mol	Chain	Residues	Atoms					AltConf	Trace
3	aw	139	Total	C	N	O	S	0	0
			1144	723	209	204	8		

- Molecule 4 is a protein called bS18m.

Mol	Chain	Residues	Atoms					AltConf	Trace
4	m	288	Total	C	N	O	S	0	0
			2368	1495	435	427	11		

- Molecule 5 is a protein called uS11m.

Mol	Chain	Residues	Atoms					AltConf	Trace
5	f	148	Total	C	N	O	S	0	0
			1213	764	231	216	2		

- Molecule 6 is a protein called mS33.

Mol	Chain	Residues	Atoms					AltConf	Trace
6	s	165	Total	C	N	O	S	0	0
			1349	852	251	239	7		

- Molecule 7 is a protein called Rhodanese domain-containing protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
7	au	239	Total	C	N	O	S	0	0
			2066	1322	366	368	10		

- Molecule 8 is a protein called mS59.

Mol	Chain	Residues	Atoms					AltConf	Trace
8	am	272	Total	C	N	O	S	0	0
			2198	1398	404	386	10		

- Molecule 9 is a protein called uS19m.

Mol	Chain	Residues	Atoms					AltConf	Trace
9	n	142	Total	C	N	O	S	0	0
			1176	760	210	201	5		

- Molecule 10 is a protein called mS53.

Mol	Chain	Residues	Atoms					AltConf	Trace
10	ae	584	Total	C	N	O	S	0	0
			4593	2888	856	830	19		

- Molecule 11 is a protein called mS71.

Mol	Chain	Residues	Atoms					AltConf	Trace
11	ay	141	Total	C	N	O	S	0	0
			1187	756	222	204	5		

- Molecule 12 is a protein called mS55.

Mol	Chain	Residues	Atoms					AltConf	Trace
12	ag	557	Total	C	N	O	S	0	0
			4521	2827	849	821	24		

- Molecule 13 is a protein called mS57.

Mol	Chain	Residues	Atoms					AltConf	Trace
13	aj	316	Total	C	N	O	S	0	0
			2560	1643	449	453	15		

- Molecule 14 is a protein called uS10m.

Mol	Chain	Residues	Atoms					AltConf	Trace
14	e	809	Total	C	N	O	S	0	0
			6413	4040	1128	1218	27		

- Molecule 15 is a protein called uS9m.

Mol	Chain	Residues	Atoms					AltConf	Trace
15	d	343	Total	C	N	O	S	0	0
			2715	1716	474	511	14		

- Molecule 16 is a protein called mS72.

Mol	Chain	Residues	Atoms					AltConf	Trace
16	az	154	Total	C	N	O	S	0	0
			1301	834	246	214	7		

- Molecule 17 is a protein called mS70.

Mol	Chain	Residues	Atoms					AltConf	Trace
17	ax	161	Total	C	N	O	S	0	0
			1356	864	261	224	7		

- Molecule 18 is a protein called mS29.

Mol	Chain	Residues	Atoms					AltConf	Trace
18	r	451	Total	C	N	O	S	0	0
			3703	2380	646	660	17		

- Molecule 19 is a protein called Excreted/secreted protein 15.

Mol	Chain	Residues	Atoms					AltConf	Trace
19	af	585	Total	C	N	O	S	0	0
			4698	2963	853	857	25		

- Molecule 20 is a protein called mS35.

Mol	Chain	Residues	Atoms					AltConf	Trace
20	u	706	Total	C	N	O	S	0	0
			5564	3497	1017	1025	25		

- Molecule 21 is a protein called mS48.

Mol	Chain	Residues	Atoms					AltConf	Trace
21	aa	1514	Total	C	N	O	S	0	0
			12070	7616	2166	2249	39		

- Molecule 22 is a protein called mS49.

Mol	Chain	Residues	Atoms					AltConf	Trace
22	ab	1151	Total	C	N	O	S	0	0
			9209	5726	1711	1744	28		

- Molecule 23 is a protein called mS58.

Mol	Chain	Residues	Atoms					AltConf	Trace
23	ak	268	Total	C	N	O	S	0	0
			2141	1337	403	394	7		

- Molecule 24 is a protein called mS50.

Mol	Chain	Residues	Atoms					AltConf	Trace
24	ac	1116	Total	C	N	O	S	0	0
			8700	5454	1568	1644	34		

- Molecule 25 is a protein called mS51.

Mol	Chain	Residues	Atoms					AltConf	Trace
25	ad	694	Total	C	N	O	S	0	0
			5676	3607	1012	1023	34		

- Molecule 26 is a protein called mS60.

Mol	Chain	Residues	Atoms					AltConf	Trace
26	an	302	Total	C	N	O	S	0	0
			2480	1560	484	427	9		

- Molecule 27 is a protein called mS61.

Mol	Chain	Residues	Atoms					AltConf	Trace
27	ao	191	Total	C	N	O	S	0	0
			1535	980	271	274	10		

- Molecule 28 is a protein called mS62.

Mol	Chain	Residues	Atoms					AltConf	Trace
28	ap	240	Total	C	N	O	S	0	0
			1893	1180	341	360	12		

- Molecule 29 is a protein called mS63.

Mol	Chain	Residues	Atoms					AltConf	Trace
29	aq	212	Total	C	N	O	S	0	0
			1794	1147	318	320	9		

- Molecule 30 is a protein called mS65.

Mol	Chain	Residues	Atoms					AltConf	Trace
30	as	247	Total	C	N	O	S	0	0
			1954	1246	352	348	8		

- Molecule 31 is a protein called mS66.

Mol	Chain	Residues	Atoms					AltConf	Trace
31	at	204	Total	C	N	O	S	0	0
			1631	1008	313	300	10		

- Molecule 32 is a protein called mS43.

Mol	Chain	Residues	Atoms					AltConf	Trace
32	y	283	Total	C	N	O	S	0	0
			2152	1345	395	398	14		

- Molecule 33 is a protein called Protein FYV4, mitochondrial.

Mol	Chain	Residues	Atoms					AltConf	Trace
33	w	155	Total	C	N	O	S	0	0
			1279	815	227	233	4		

- Molecule 34 is a protein called mS37.

Mol	Chain	Residues	Atoms					AltConf	Trace
34	v	63	Total	C	N	O	S	0	0
			486	294	89	97	6		

- Molecule 35 is a protein called mS34.

Mol	Chain	Residues	Atoms					AltConf	Trace
35	t	226	Total	C	N	O	S	0	0
			1776	1128	308	336	4		

- Molecule 36 is a protein called mS23.

Mol	Chain	Residues	Atoms					AltConf	Trace
36	p	236	Total	C	N	O	S	0	0
			1954	1241	346	360	7		

- Molecule 37 is a protein called bS16m.

Mol	Chain	Residues	Atoms					AltConf	Trace
37	j	180	Total	C	N	O	S	0	0
			1506	963	280	254	9		

- Molecule 38 is a protein called mS52.

Mol	Chain	Residues	Atoms					AltConf	Trace
38	l	545	Total	C	N	O	S	0	0
			4438	2809	821	796	12		

- Molecule 39 is a protein called AKAP7_NLS domain-containing protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
39	ar	252	Total	C	N	O	S	0	0
			1993	1249	376	356	12		

- Molecule 40 is a protein called Ubiquitin-like domain-containing protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
40	av	150	Total	C	N	O	S	0	0
			1237	777	219	236	5		

- Molecule 41 is a protein called mS56.

Mol	Chain	Residues	Atoms					AltConf	Trace
41	ai	379	Total	C	N	O	S	0	0
			3068	1957	534	565	12		

- Molecule 42 is a protein called Putative superoxide dismutase.

Mol	Chain	Residues	Atoms					AltConf	Trace
42	x	255	Total	C	N	O	S	0	0
			2034	1299	351	375	9		

- Molecule 43 is a protein called uS15m.

Mol	Chain	Residues	Atoms					AltConf	Trace
43	i	267	Total	C	N	O	S	0	0
			2221	1406	403	402	10		

- Molecule 44 is a protein called bS21m.

Mol	Chain	Residues	Atoms					AltConf	Trace
44	g	99	Total	C	N	O	S	0	0
			818	513	161	141	3		

- Molecule 45 is a protein called mS22.

Mol	Chain	Residues	Atoms					AltConf	Trace
45	o	438	Total	C	N	O	S	0	0
			3736	2395	658	664	19		

- Molecule 46 is a protein called uS8m.

Mol	Chain	Residues	Atoms					AltConf	Trace
46	c	251	Total	C	N	O	S	0	0
			2038	1279	379	370	10		

- Molecule 47 is a protein called 30S Ribosomal protein S17-like protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
47	k	116	Total	C	N	O	S	0	0
			951	614	169	163	5		

- Molecule 48 is a protein called mS26.

Mol	Chain	Residues	Atoms					AltConf	Trace
48	q	196	Total	C	N	O	S	0	0
			1699	1077	317	297	8		

- Molecule 49 is a protein called bS6m.

Mol	Chain	Residues	Atoms					AltConf	Trace
49	b	155	Total	C	N	O	S	0	0
			1290	816	232	238	4		

- Molecule 50 is a protein called Ribosomal_S5_C domain-containing protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
50	a	408	Total	C	N	O	S	0	0
			3298	2084	610	587	17		

- Molecule 51 is a protein called mS73.

Mol	Chain	Residues	Atoms					AltConf	Trace
51	ba	26	Total	C	N	O	S	0	0
			223	147	36	39	1		

- Molecule 52 is a protein called mS47.

Mol	Chain	Residues	Atoms					AltConf	Trace
52	z	971	Total	C	N	O	S	0	0
			7713	4847	1378	1454	34		

- Molecule 53 is a protein called uS3m.

Mol	Chain	Residues	Atoms				AltConf	Trace
53	bd	41	Total	C	N	O	0	0
			350	245	52	53		

- Molecule 54 is a protein called Ribosomal protein L3-like protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
54	A	368	Total	C	N	O	S	0	0
			2996	1929	496	556	15		

- Molecule 55 is a protein called uL4m.

Mol	Chain	Residues	Atoms					AltConf	Trace
55	B	435	Total	C	N	O	S	0	0
			3513	2237	615	642	19		

- Molecule 56 is a protein called RIBOSOMAL_L9 domain-containing protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
56	C	212	Total	C	N	O	S	0	0
			1772	1144	303	321	4		

- Molecule 57 is a protein called uL10m.

Mol	Chain	Residues	Atoms					AltConf	Trace
57	D	128	Total	C	N	O	S	0	0
			1036	656	198	177	5		

- Molecule 58 is a protein called Putative ribosomal protein L11.

Mol	Chain	Residues	Atoms					AltConf	Trace
58	E	326	Total	C	N	O	S	0	0
			2668	1704	480	470	14		

- Molecule 59 is a protein called 50S ribosomal protein L13-like protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
59	F	170	Total	C	N	O	S	0	0
			1435	919	261	243	12		

- Molecule 60 is a protein called Ribosomal_L18e/L15P domain-containing protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
60	G	365	Total	C	N	O	S	0	0
			3012	1917	555	531	9		

- Molecule 61 is a protein called Ribosomal_L16 domain-containing protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
61	H	162	Total	C	N	O	S	0	0
			1305	836	239	226	4		

- Molecule 62 is a protein called Putative 50S ribosomal protein L17.

Mol	Chain	Residues	Atoms					AltConf	Trace
62	I	257	Total	C	N	O	S	0	0
			2153	1362	406	372	13		

- Molecule 63 is a protein called bL19m.

Mol	Chain	Residues	Atoms					AltConf	Trace
63	J	141	Total	C	N	O	S	0	0
			1146	727	211	202	6		

- Molecule 64 is a protein called bL20m.

Mol	Chain	Residues	Atoms					AltConf	Trace
64	K	179	Total	C	N	O	S	0	0
			1467	910	289	258	10		

- Molecule 65 is a protein called bL21m.

Mol	Chain	Residues	Atoms					AltConf	Trace
65	L	178	Total	C	N	O	S	0	0
			1419	907	257	250	5		

- Molecule 66 is a protein called uL22m.

Mol	Chain	Residues	Atoms					AltConf	Trace
66	M	259	Total	C	N	O	S	0	0
			2116	1345	385	371	15		

- Molecule 67 is a protein called uL23m.

Mol	Chain	Residues	Atoms					AltConf	Trace
67	N	189	Total	C	N	O	S	0	0
			1599	1031	296	269	3		

- Molecule 68 is a protein called uL24m.

Mol	Chain	Residues	Atoms					AltConf	Trace
68	O	307	Total	C	N	O	S	0	0
			2537	1600	455	475	7		

- Molecule 69 is a protein called bL27m.

Mol	Chain	Residues	Atoms					AltConf	Trace
69	P	165	Total	C	N	O	S	0	0
			1367	856	266	238	7		

- Molecule 70 is a protein called bL28m.

Mol	Chain	Residues	Atoms					AltConf	Trace
70	Q	217	Total	C	N	O	S	0	0
			1785	1127	331	316	11		

- Molecule 71 is a protein called uL29m.

Mol	Chain	Residues	Atoms					AltConf	Trace
71	R	472	Total	C	N	O	S	0	0
			3755	2377	662	704	12		

- Molecule 72 is a protein called uL30m.

Mol	Chain	Residues	Atoms					AltConf	Trace
72	S	150	Total	C	N	O	S	0	0
			1244	782	247	207	8		

- Molecule 73 is a protein called bL32m.

Mol	Chain	Residues	Atoms					AltConf	Trace
73	T	55	Total	C	N	O	S	0	0
			487	311	93	78	5		

- Molecule 74 is a protein called bL33m.

Mol	Chain	Residues	Atoms					AltConf	Trace
74	U	92	Total	C	N	O	S	0	0
			744	472	142	125	5		

- Molecule 75 is a protein called bL35m.

Mol	Chain	Residues	Atoms					AltConf	Trace
75	V	141	Total	C	N	O	S	0	0
			1202	755	242	197	8		

- Molecule 76 is a protein called bL36m.

Mol	Chain	Residues	Atoms					AltConf	Trace
76	W	54	Total	C	N	O	S	0	0
			465	299	89	74	3		

- Molecule 77 is a protein called mL38.

Mol	Chain	Residues	Atoms					AltConf	Trace
77	X	468	Total	C	N	O	S	0	0
			3733	2365	657	694	17		

- Molecule 78 is a protein called mL40.

Mol	Chain	Residues	Atoms					AltConf	Trace
78	Y	255	Total	C	N	O	S	0	0
			2067	1287	373	402	5		

- Molecule 79 is a protein called mL41.

Mol	Chain	Residues	Atoms					AltConf	Trace
79	Z	150	Total	C	N	O	S	0	0
			1223	784	224	211	4		

- Molecule 80 is a protein called mL94.

Mol	Chain	Residues	Atoms					AltConf	Trace
80	BA	138	Total	C	N	O	S	0	0
			1038	648	188	197	5		

- Molecule 81 is a protein called UA.

Mol	Chain	Residues	Atoms				AltConf	Trace
81	UA	203	Total	C	N	O	0	0
			1015	609	203	203		

- Molecule 82 is a protein called mL95.

Mol	Chain	Residues	Atoms				AltConf	Trace
82	BB	122	Total	C	N	O		
			1028	663	189	176	0	0

- Molecule 83 is a protein called mL89.

Mol	Chain	Residues	Atoms					AltConf	Trace
83	Aw	185	Total	C	N	O	S		
			1509	949	289	268	3	0	0

- Molecule 84 is a protein called bL31m.

Mol	Chain	Residues	Atoms					AltConf	Trace
84	Bj	168	Total	C	N	O	S		
			1358	865	255	231	7	0	0

- Molecule 85 is a protein called mL76.

Mol	Chain	Residues	Atoms					AltConf	Trace
85	An	314	Total	C	N	O	S		
			2605	1643	487	470	5	0	0

- Molecule 86 is a protein called mL74.

Mol	Chain	Residues	Atoms					AltConf	Trace
86	Al	264	Total	C	N	O	S		
			2152	1371	374	399	8	0	0

- Molecule 87 is a protein called Peptidyl-prolyl cis-trans isomerase.

Mol	Chain	Residues	Atoms					AltConf	Trace
87	BI	186	Total	C	N	O	S		
			1409	895	242	264	8	0	0

- Molecule 88 is a protein called mL93.

Mol	Chain	Residues	Atoms					AltConf	Trace
88	Az	138	Total	C	N	O	S		
			1215	782	216	211	6	0	0

- Molecule 89 is a protein called mL86.

Mol	Chain	Residues	Atoms					AltConf	Trace
89	At	165	Total	C	N	O	S	0	0
			1346	824	260	254	8		

- Molecule 90 is a protein called mL96.

Mol	Chain	Residues	Atoms					AltConf	Trace
90	BC	140	Total	C	N	O	S	0	0
			1114	693	205	207	9		

- Molecule 91 is a protein called L51_S25_CI-B8 domain-containing protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
91	Ab	260	Total	C	N	O	S	0	0
			2185	1365	416	397	7		

- Molecule 92 is a protein called mL69.

Mol	Chain	Residues	Atoms					AltConf	Trace
92	Ai	476	Total	C	N	O	S	0	0
			3789	2419	654	694	22		

- Molecule 93 is a protein called mL80.

Mol	Chain	Residues	Atoms					AltConf	Trace
93	Ap	214	Total	C	N	O	S	0	0
			1775	1111	327	328	9		

- Molecule 94 is a protein called mL87.

Mol	Chain	Residues	Atoms					AltConf	Trace
94	Au	176	Total	C	N	O	S	0	0
			1490	945	292	245	8		

- Molecule 95 is a protein called mL42.

Mol	Chain	Residues	Atoms					AltConf	Trace
95	Aa	178	Total	C	N	O	S	0	0
			1417	884	270	256	7		

- Molecule 96 is a protein called mL79.

Mol	Chain	Residues	Atoms					AltConf	Trace
96	Ao	275	Total	C	N	O	S	0	0
			2276	1433	429	402	12		

- Molecule 97 is a protein called mL70.

Mol	Chain	Residues	Atoms					AltConf	Trace
97	BM	389	Total	C	N	O	S	0	0
			3069	1954	548	551	16		

- Molecule 98 is a protein called mL84.

Mol	Chain	Residues	Atoms					AltConf	Trace
98	Ar	195	Total	C	N	O	S	0	0
			1644	1054	295	288	7		

- Molecule 99 is a protein called mL72.

Mol	Chain	Residues	Atoms					AltConf	Trace
99	Aj	341	Total	C	N	O	S	0	0
			2766	1756	508	491	11		

- Molecule 100 is a protein called Peptidyl-prolyl cis-trans isomerase.

Mol	Chain	Residues	Atoms					AltConf	Trace
100	BH	214	Total	C	N	O	S	0	0
			1659	1050	290	310	9		

- Molecule 101 is a protein called mL75.

Mol	Chain	Residues	Atoms					AltConf	Trace
101	Am	330	Total	C	N	O	S	0	0
			2708	1727	491	474	16		

- Molecule 102 is a protein called mL82.

Mol	Chain	Residues	Atoms					AltConf	Trace
102	Aq	258	Total	C	N	O	S	0	0
			2074	1296	406	360	12		

- Molecule 103 is a protein called mL98.

Mol	Chain	Residues	Atoms				AltConf	Trace
103	BE	84	Total	C	N	O	0	0
			700	447	125	128		

- Molecule 104 is a protein called mL73.

Mol	Chain	Residues	Atoms					AltConf	Trace
104	Ak	300	Total	C	N	O	S	0	0
			2352	1489	421	429	13		

- Molecule 105 is a protein called mL52.

Mol	Chain	Residues	Atoms					AltConf	Trace
105	BP	195	Total	C	N	O	S	0	0
			1593	1014	288	288	3		

- Molecule 106 is a protein called mL49.

Mol	Chain	Residues	Atoms					AltConf	Trace
106	Ad	207	Total	C	N	O	S	0	0
			1632	1049	289	286	8		

- Molecule 107 is a protein called mL99.

Mol	Chain	Residues	Atoms					AltConf	Trace
107	BF	101	Total	C	N	O	S	0	0
			851	530	165	154	2		

- Molecule 108 is a protein called mL88.

Mol	Chain	Residues	Atoms					AltConf	Trace
108	Av	155	Total	C	N	O	S	0	0
			1300	828	230	234	8		

- Molecule 109 is a protein called mL63.

Mol	Chain	Residues	Atoms					AltConf	Trace
109	Af	139	Total	C	N	O	S	0	0
			1132	709	215	207	1		

- Molecule 110 is a protein called mL85.

Mol	Chain	Residues	Atoms					AltConf	Trace
110	As	97	Total	C	N	O	S	0	0
			787	495	139	148	5		

- Molecule 111 is a protein called mL53.

Mol	Chain	Residues	Atoms					AltConf	Trace
111	Ae	291	Total	C	N	O	S	0	0
			2359	1526	418	404	11		

- Molecule 112 is a protein called MRP-L46 domain-containing protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
112	Ac	268	Total	C	N	O	S	0	0
			2174	1375	389	405	5		

- Molecule 113 is a protein called mL68.

Mol	Chain	Residues	Atoms					AltConf	Trace
113	Ah	452	Total	C	N	O	S	0	0
			3686	2338	651	679	18		

- Molecule 114 is a protein called mL97.

Mol	Chain	Residues	Atoms					AltConf	Trace
114	BD	97	Total	C	N	O	S	0	0
			807	499	160	140	8		

- Molecule 115 is a protein called C2H2-type domain-containing protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
115	Ay	142	Total	C	N	O	S	0	0
			1226	774	228	217	7		

- Molecule 116 is a protein called mL59/64.

Mol	Chain	Residues	Atoms					AltConf	Trace
116	Ag	231	Total	C	N	O	S	0	0
			1916	1211	356	340	9		

- Molecule 117 is a protein called LIM zinc-binding domain-containing protein.

Mol	Chain	Residues	Atoms					AltConf	Trace
117	Ax	167	Total	C	N	O	S	0	0
			1388	876	268	233	11		

- Molecule 118 is a protein called Putative ribosomal protein L2.

Mol	Chain	Residues	Atoms					AltConf	Trace
118	BL	309	Total	C	N	O	S	0	0
			2497	1594	464	427	12		

- Molecule 119 is a protein called Putative ribosomal protein L14.

Mol	Chain	Residues	Atoms					AltConf	Trace
119	BO	155	Total	C	N	O	S	0	0
			1239	772	253	205	9		

- Molecule 120 is a protein called mL100.

Mol	Chain	Residues	Atoms					AltConf	Trace
120	BG	85	Total	C	N	O	S	0	0
			643	400	122	115	6		

- Molecule 121 is a protein called UB.

Mol	Chain	Residues	Atoms				AltConf	Trace
121	UB	67	Total	C	N	O	0	0
			335	201	67	67		

- Molecule 122 is a protein called UC.

Mol	Chain	Residues	Atoms				AltConf	Trace
122	UC	144	Total	C	N	O	0	0
			720	432	144	144		

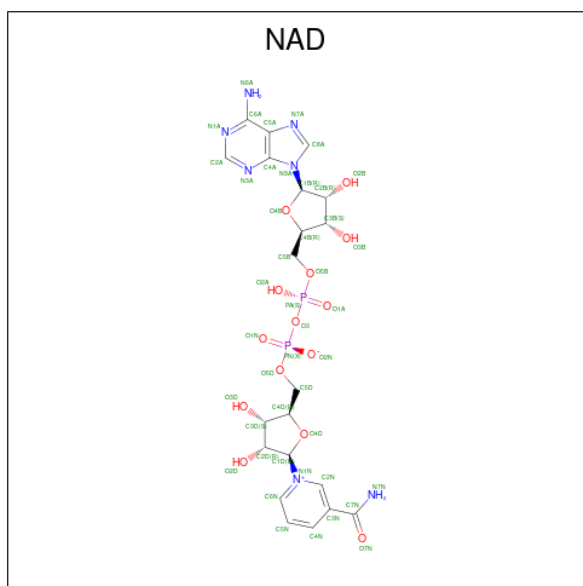
- Molecule 123 is a protein called UD.

Mol	Chain	Residues	Atoms				AltConf	Trace
123	UD	95	Total	C	N	O	0	0
			475	285	95	95		

- Molecule 124 is ZINC ION (CCD ID: ZN) (formula: Zn).

Mol	Chain	Residues	Atoms		AltConf
124	T	1	Total	Zn	0
			1	1	
124	W	1	Total	Zn	0
			1	1	
124	BD	1	Total	Zn	0
			1	1	
124	Ax	2	Total	Zn	0
			2	2	
124	BG	1	Total	Zn	0
			1	1	

- Molecule 125 is NICOTINAMIDE-ADENINE-DINUCLEOTIDE (CCD ID: NAD) (formula: $C_{21}H_{27}N_7O_{14}P_2$).



Mol	Chain	Residues	Atoms					AltConf
125	Ag	1	Total	C	N	O	P	0
			44	21	7	14	2	

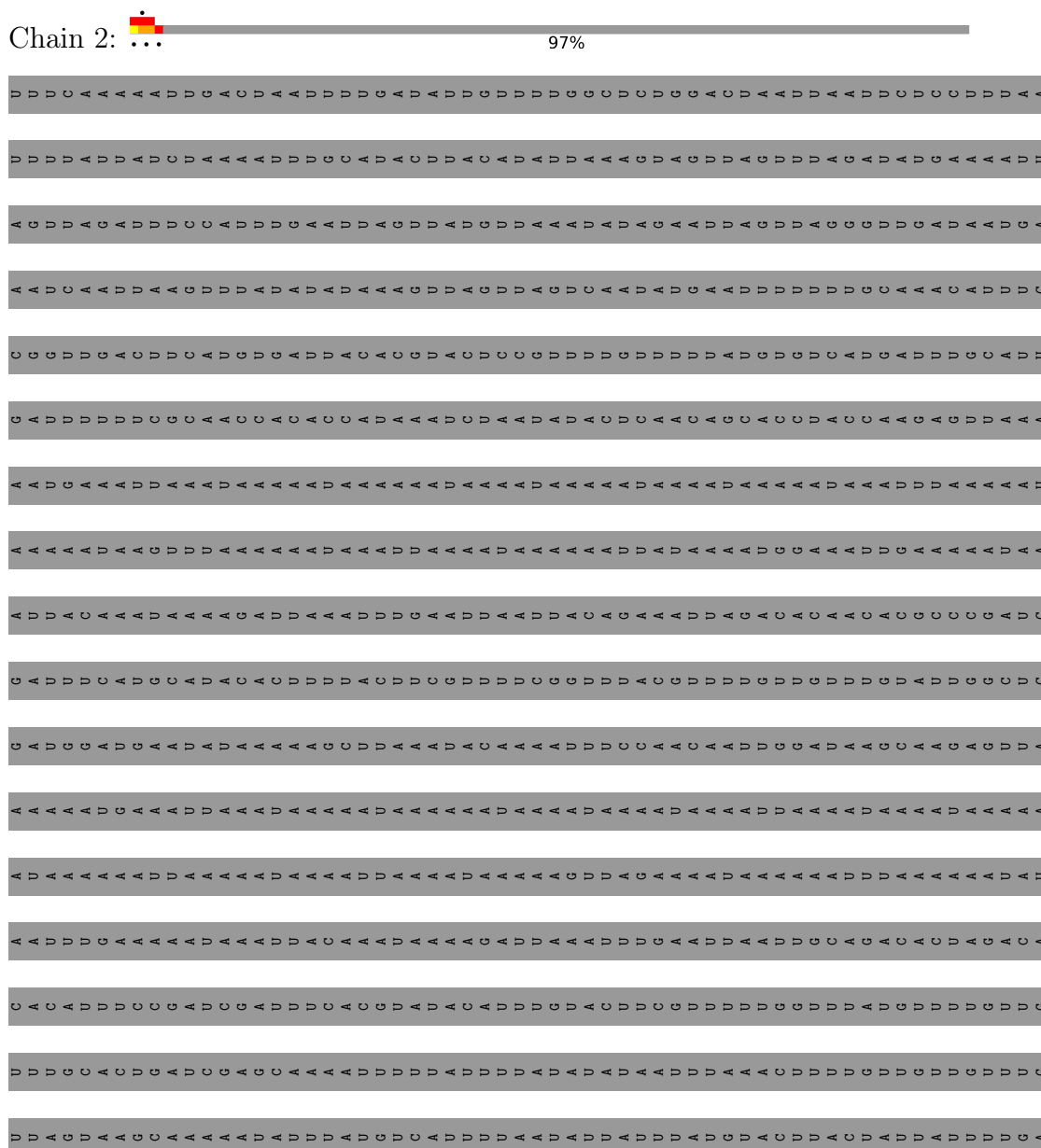
- Molecule 126 is MAGNESIUM ION (CCD ID: MG) (formula: Mg).

Mol	Chain	Residues	Atoms		AltConf
126	1	2	Total	Mg	0
			2	2	

3 Residue-property plots

These plots are drawn for all protein, RNA, DNA and oligosaccharide chains in the entry. The first graphic for a chain summarises the proportions of the various outlier classes displayed in the second graphic. The second graphic shows the sequence view annotated by issues in geometry and atom inclusion in map density. Residues are color-coded according to the number of geometric quality criteria for which they contain at least one outlier: green = 0, yellow = 1, orange = 2 and red = 3 or more. A red diamond above a residue indicates a poor fit to the EM map for this residue (all-atom inclusion < 40%). Stretches of 2 or more consecutive residues without any outlier are shown as a green connector. Residues present in the sample, but not in the model, are shown in grey.

- Molecule 1: Large ribosomal RNA







G U A G C U U C C C A A A C U U C C U C C U U C C A A U C C A A U C C C A A C G G U U C U U C C C C C A U C A A U C C U C A A G

A U G U C C U U U C C C C C C A A A A A A A U C C A A A U C C C A A G U U C A U C C U C C G C C U C C C C U C C

A A U U U C C U U U A A A A A A A C U C C G C C U U C C A A A A C C U U A A A C C C G U U C U C U C C C U C U A

A A U C U U U A U C U C C U C C C C U C C A A A A U C C C C U C A A A A C U C U C C U C C U C C A A A C U D

U A A U C U U U U A A A A A A A A A A A A U U G G U A A U U A

U U A U U U A A A A A A A A U U A A G A A A A A A A U A U U

A A U C A A U U U A A G A A U U C C C G U U U A A A A A A U U G A A A A U U A A A A A A A A A A A A A A A A U U

A A G U U A U U A

A G U U U A U U

A U G A U U A U G

U A A A G U U U U A

U A U C U U U C U G G A U

A C A G A

U G U G A G G

U U G U C U U G C U U G C U U A U

C A A U U G A C U U U C U U U G U G C C C U U U A A U G G U U A A U G G A A U A A A A A A A A A A A A A A A A A A A U

U U G A U C C G U U U U G A G

A A U G C A U U U A A G A U

A G A U U U U U U A U

U U U U A U

U G A U U U A

U G U U U A G

U U A A U U A U

A C U U C A U

U G A U U U A U

A U G U U U C A G









U C U A U C C A U U U U A A U U U C U U A U U U U U G G C A U U U A U U A U U U U A A U U U U U A A U U U U U U G U U C G

U A U U U U A U U U U G U C U A U U U U U A A U U U U U A U A A U U U U U G U U U U U A U A U U U U U U G U U U

A U U C G A U G U U U U A U U U A A A A U A G U U U U A U G A A U U U U U G U U U U U A A U U U U U G A U A A U U U U A

U C A U U U U A A A A U G G U G A U U U A A U G U U G U A U U C G A U U U U U A U U U U U U U U G U U U U U U U U

G G U U U U A A U A U U U U C A U U U U U A U A U U U U G G C C U U U U U U U G U U U A U U U U U U U A A A U U A U G U U

U U U U U A G U A U U U A U U U U U G U U C U U U U U G G C U U U A U U U U G G U U U A U U U U U A U U U U U A A U G G U

A U U U U A A U A A U U U U U A U U U A A A U U U U U G A U U U U U U U C G U U U A U A A U A A U C G U U C A U G U

U U U A C A U U A G U G C A A U C G G U A A A U U U U A A U U U A A U U U U A A C U U U U G A U G U U U U U U U U

A U A U U U A A U A A U U U U U A U U U U U G U U A A U U U U U G U

U U U U U A U U U U U G A A A U U U U U U U U G A A U U A A G U U A A G U U A U G U A A U G U A A A U G U A A U

A A U U U A U U G U G C A A U U U U A A A A U U A A U U C A A U U U G U U U U U A C U U C A A U U A U U C U A U U

U A U A U G U A A A A A A A U U U A

C A C A A U U U A A A A A A A C A A G G U U A U

A A A A C C A U U U A G

A A A A A G U U U A A A C A U

A A A A C A A A A A A A A A A A G C U U U U G C U A A A U U A U

A A A A A U G A C C A A A A A A G A C

A U U G G A A A A A A A C C A A U A G

A A A A A U A A A A A A U C U U A U

C C A A C A

U G U A A C A A U A

A A C A

A U A A A C U U A U

A C U C C A C A A A A A A U G C A A U G C A U

C A C C A A A A A A C C U A G

A A C A A C A U





A U U G G U U U U U G U U U U A A A G U U U U U U A U G C A U U C U A U U A U A U G U A U U U U G A U G U A A U G U U A

G C C C G U U U U U U C C A U A A U U U U G A U G A U U U U G U G U A U U U U G U A U U U U U U U U G U C G

U A U G A C C U U U U U A A C A G C U U A U U U G U G G U U U G C A A G U U G U U A G G U U U A U U U U C A U U U U U U U G

A U A U C A U A U U U U G A A U A A G A U U U U A U G C G A U A A A A U U G C U U U A A A G C U U U U U U C A U U

A G U A A A U A G G C G A U G U U U G C U A U A U U U A G C A A U U U A C A A U U U U A A U A A U G G C

U A U U G U G U G A A U U U A C A U U U U A U U U U U A U G C G U U U A U G U G A U U A A G U U U A U U U G

U U U A A A U A A U U A U U U A U U A U U G U G U G G U U U A C U A A G U U C U A C C A A U U U G G U U A C A U

A U U U G A C U G C C A A G A U G C A A U G G A A G G A C C C A A U C C C A G U U G U C U G C A C U U A U U C C A U G C C A

A C A U U A G U U G U A A G U G G G U A U U G A A U U G G U U A A G U U U U A U U U U G A U G U U U U G A

U U U U G U U A U U U U U A U G G U U A U G G U U G A G C U U G A U U U A G U U U A G U U U A G U U U A

U G U G U U U U A A U U U G A U U U U A A A A A G G U A U G U U U G C A U U U U A G U U A C U A A U U A U G C C A A U U A

A G U U U U C U A A U G U U U U G U G U U U U A U G U C U A A G A U U G U A A G U U U A U U U U U G U U

U A U C A A U G U U U A U A A A A C G C A A C U U U A U U U U U U G U G U C U A G G U U C A A U U U U U U U

U U U G G A U U G C A A A A A A C G C U U U G U U A U U U U U U A C A U U U U U G U G G U U U U A G C C A

C G U A A U U A A U G A U A A U U U G C U U U U G U U A A A C U C A A U G U U C A A A U G A U U U U G U G G A U U U

U A U U G A A A G A U C U U C U U U A U G U A U G U U A A U G U U A A C U U C A U U U U U A U U A G A G

U U U U G U G U G U U G U A A U U U U U U A U U U U A U U U U A U G U U U A A U U U U U G U U A

U U U U U U G U U G U G U U U G U A A A A U U U A A U U U U A U G C U U U A A U U U A U U U U U

G A U U U U G A A U U G C U G U C U U U G U A U A A U U G U U A C A U U U G U U A U A A C U A U U U

U U U U U G U U U U A A U U U U A U A A U U G U U U U A U U U U U C A A A G U U A U U U G A U C C U

U U U U A U U A A U U A A A G U C U U U U U U U G U A A U U G G A U U A A U U U G A A U U U

U C A U U A A G U U U U G U A U A A U U G U U U A A U U U U A U U U U A U U U U A U U U U

A U G U U U U U G A C G A A A A U U U U U U G U U U A A A C U G U C G A U U U U U A U U U U A A U U U C G

G U A U G A A U U U U A U U U U A U A U A U U A U U A U U U A U G U U U U G U G U A A U U U C U A

U A U U U A G A A U U A A U U U A A G U U U U A U U U U U U G U A U U U A A A A A C A U U U

U A G U A A G C A A A U U U A A A U U U U G U U U A A A U U U C A G U U C U A U U U U A U U U

U A G A A A U U U A A A U U A U C U U U U A A C U C C A A A G U U U U A A G U U A A G U U U G C U U A U U U U G U

U A G A A A U U U A A A U U G U A A A A A U A C A A A A A U U U A A U C U A A A A U U A A A A G U A A C U U A

A G A C A A A A A A A A G C U U A U A A A A A A A G U U A

U A U U A A U G C A A A G C A

G C C C A A U G A U U U G U A U G A A A C A A A A U U U U G U A A U A

C A A A A U U U U G C A C G C C A

U G A A A C G A A G U U U C A C G U A A U G C C A A C A

U U U A A U G A A A C G A A G U U U U U U G U A A U G C C A

U U A A U G A A A C G A A A A A U C U U G U A C

A A A A U U A A U G A A A A A G U U U C U G U A

C A A C A A A A U U U A A A A A G A C

A A C A A A A U U U A A A A A A C G A G

C C A C A A A C A G

U A U G C C C A A C A

A U G C C C A C A

C U G U A A U G A C A G

A G U U U C U G U U A G

A A C G A A G U U U C A U

U A U G A A A C G A A G A

U U A U

A U A U

A U A C

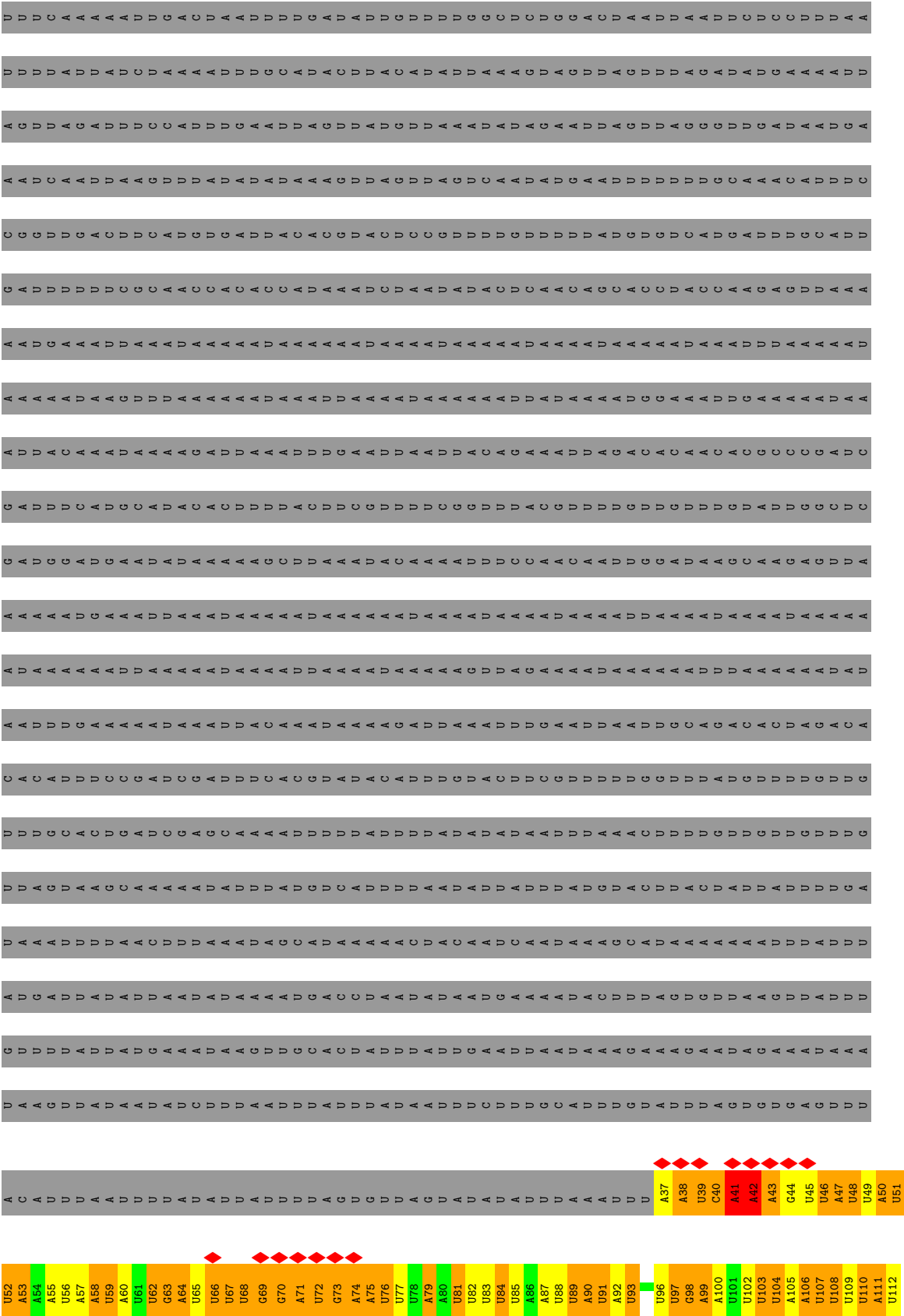
A U U A

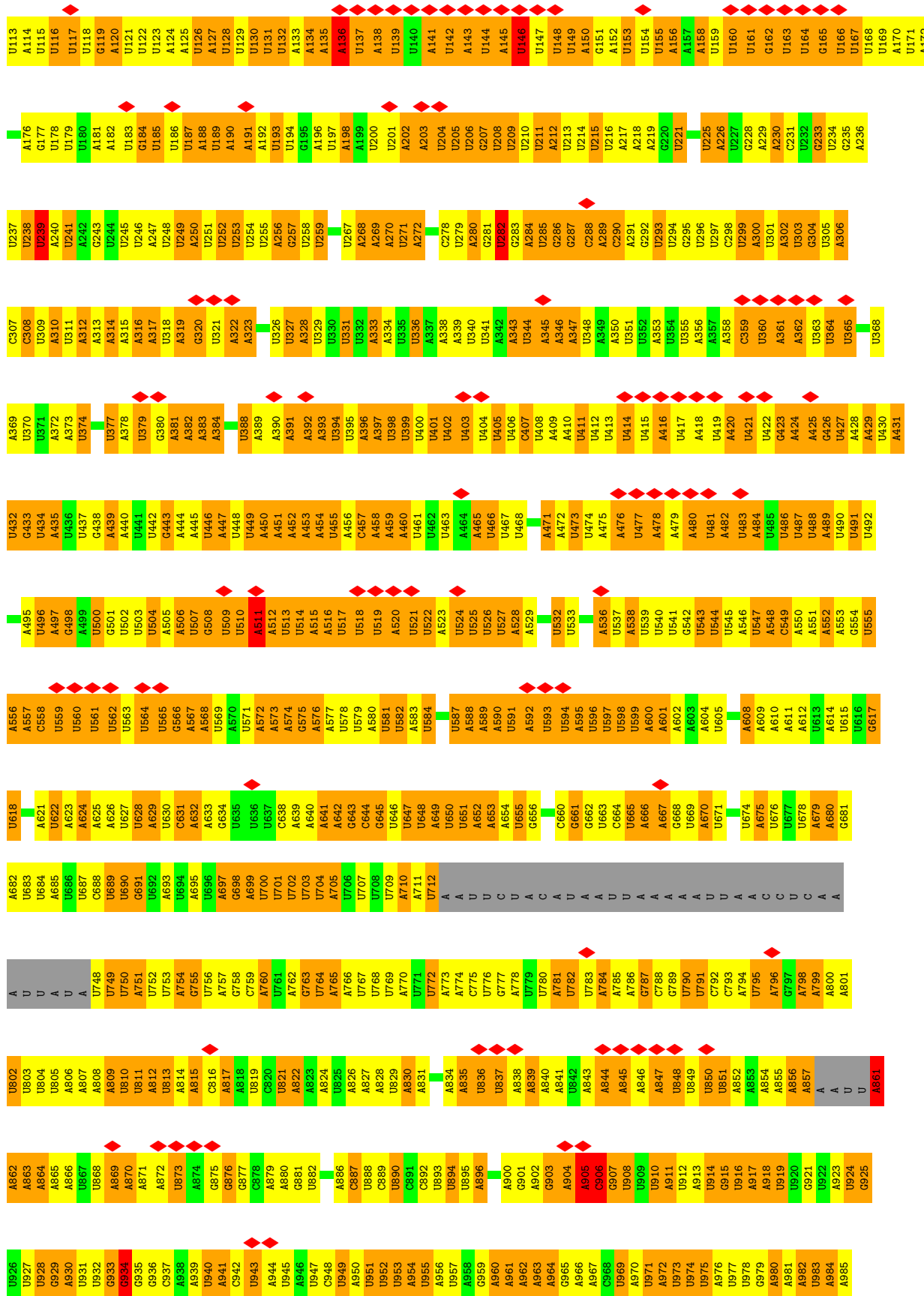
C U A U G U U U U U U U C U A A A C A A A A A A A C U C C U A

- Molecule 1: Large ribosomal RNA

Chain 1: 

94%







U C A U U C C G C C U C C U C U C U C C C C C U U C A A A U U U C C C U U A A A A C U C G C C U U C C U A A C C U U A A C C G G A A

A A C C C C G C C U C C U C C U U C C C C U A A A U C U U U A U C U C C C C U C C A A U C C A A U C C U

C U C C U C C U C C U C C C G A A A C U U U A A A U C U U U U U A U A A A A A A A U U U G G U U A A A A A A

U A U U A

A A

A U U G U A A U U A A A C A

A U U G U A A A U U A

A A U A C A

G A

U G G C G U U U A

A A U U G G U A

U U U A C C G A

G U U U U C A G U A

U G U G U G A A G U U U A

U A G G A A A C A U U U G U C G C C G A

U U G A A U U U G G U G U G G G U U G A

A U G A U U U U G G U U U G G G G U U A

U U U A G A U U A

G G U U A G C A U U U U U U G A

G A U C G U U G G G U A

U A G U U U U U A

U U U U G A U A

U C U U U G G A U U U U U G G U G G U U A

U U A G U U A

A A C A A U C C U A

U A C G U A A A C G U U G G A



A U U A U U U U A A U G A G U U C A A G A U G G U U U U G U G A U C G A A U U U G C A A U U U A U U G C G A A A C G U U U A U
G U U U U U G U A A U G G A U U U U A U U A U C G A G A A U A U G U U U U G G C U U U U U G A A U U A A U U U U G
U A A U U U A U U U U A A U U U U A A U A A A A A U U U G A A A U U U C A U G A A G A A A U C U U G A A G U U A U A G
U U G A U A C A A A A A A A C A A C A U C U G A A A A G A U A U C U U C C U G A G U G A A U U U U A U U U U A U U U A U U U G
G U U U U U A A A A G C U G U A C C A G A A A A A A U U U A C U G G U U A U U A A U G G U U A U U U A U U A U
U U C C C U A U U U U U G U U U A U A A A A A A U U G C A U U A A U G A U U U U U A A G U A A A G U U C A U
U G U U G U G A U U U A C A U U A A U C A A U U A A G U U U A A U A U U A A U U G A G U U U U A G U U U A G
C A C U G U A U G U U A A U U A U U A G C A A U A A U C C U A A U A A A A U G A A U U A A A U U U G A G U G U U U
U G U U U A U G U A A A G U U G U A A A G A A A A A A A A A A A U U A A U U U U A A U U A A A G C G U U A
A U A A A A U U U A
A G A A A G G G A U U C U U A A A A A A G G A
A G A U U C G U G U U A A U U A A A A U U U U A A U U G A A U U A A U G C A A U U A A A A A A A A A A A A A A A A
G U C U A A U U U U A A U U U U A A U U U U G U A A U U U A A U U U A A U U U G U U U U U U U U U U U U G C
A U U U U A U U A G A A A U U U A
U U U U U U A C G A U A C C A A U U A A U G C U U A A U U U G A A U U U G A A U U U U U U A A A A A A A A A A A
U C U A C U U U A C G A A A U G U U U U U G U A A C C U U U G U C U U C G A A U U U U U U U U U U U U U U U U
U G U G A U U U G U A A U A U U U U U U U U A A U U U U U U U U A A U U G U U G U U A A U A A U A A U U U U
U A U U U A G A U U U U C A
G C A U U A G A U U U G C A A G G A A A U U A C A
U U A A A C A U G G A A U U U A
A G U U A A U U A
A A A A C C A A G U A
A G A U G U A
A G A
A A A A C C A
U A





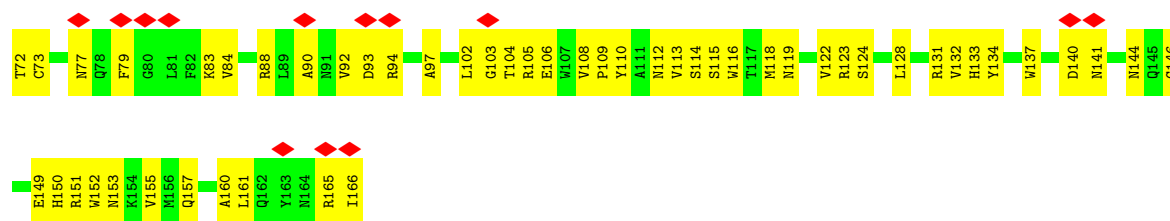
A U U U U G U U U U U A A U U U U U U G U U U A A U U C G A A U G U U U A A A U A G U U U A A G A A U U U U U
U U U U A A U U U U G A U A U A A U A U U U A U C A U U U U A A U G U U G A U A A U G U U A U C C G A U U A U A U
A U G U U U U U U A A U U G A A A A A A U U U G G U U U U U A A U U U U A A U U U A A U U A G G C G U U U U U U G U U U
U A A A U U U G U U U A A A A U G U U U U U U A A A U U U A A U U U U G U U U U U U U U G U
G U U U U A U U U U U A U C C A A U A U G G U A U U U A A A U U U A U A U U A U U U U G A U A U A U U
C G U U U A A U A A A G U C G U U A C A U G U U U A A U A A G U G C A A U C G G U A A U U U A A A U U
U U A A A C U U U U G A U G U U U U A U U A U U A A U U A A U U G U U A A U U A U U G U U U
U U U U G U U U U C U U U U A A A A G A U U U A A U U U U U U U G A A U A U G U U A U U G U
A U U A A A A G U U A A G A A A U G G A A A A A U U A A A A A U C A A U U U C A A C C A A G U U U G
U G U U A C U C A A A A U U G U C C U A A U U U A A A A U G U A A A A A U U G U C C A A A A A U U A
U A U A A A A A A C A A A G C A A A A C A A A A A A A C A A G G U A A C U U A A C U U A A A A C G C
A A A G U C A A C U A A A A A A U U A A A C C A A A A A A A G G U U A A C A G G A A A A A A
A A A G C A G U A A G C U G G A A U A
A A A C C A C A A C A A G U U A
G A G C A A A G A A A U G A A C U U U C C A
U G C A U A C A U A U C C U A A A A C U A A U G G C A A U U G G A A A A A A A A A A A A G C C U
A C U A A A A A A G U A A A C C A A U U C A
G U G A A A A A U C C U G C A A A U C C A A C A A C A G U G
A C C G A C U A C A A A A A G U A U A G
C C U G U A C C A A G A A C C A
U G U A A U A A A A U A U C C A
G G U A A G C A A A A A A G A A C C A A C C A C
U A C C A A A A A G U G C G A A C C A
A U A A A C A A A C C G A A C U G A
G A U A A A C A U U G A A C C G A
C A G G U G U A A A A A A G A A U C A A C C A



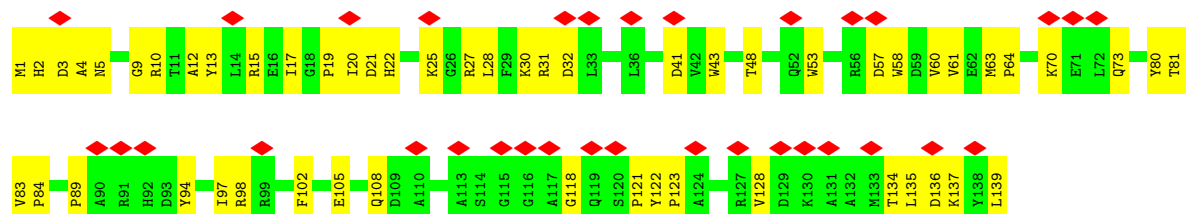
A C C A A U C C A A U G U A U G A U U A C C A A G A A A U G C A U G U A A G U C A A U A C U G A A U U A A G U G U U
G U U A G C A A G U G U U G U G U U A A A A A U A G G U U U U U C G G U C U U U A A A A U U U A A U U U U G A A G
U U U U A A U C A A A C U U U C G G U U A U G G U U U U U A G G U U U U G U G G A U U U U A A G U U G A U G U U U U
G A C A U U U U U G G C U A U U U A A G U U U A A U U U U G A U U A A A A A A A A U C G C A A A U U U G
G U C U G U U A A A C A U A C G G G U A U A A G C C U U A A A U U U A U U G U G A C A A A C G A U A A U U U G U U U
A G G U U U A U U G A U U U U G U A A U U U A A U C A C A A U A A A G U U C U G C A U U U A A U U A A U
G G U C G A A U A A U U G U A A A U U A A U G G U A A U U C G A A A U U A U G U G U C U U U U U
U G G U A U U A G U U U G G A G U U C A U U A U U U A G G A A U U U U A A U U A A G A A U U C C C
A U U U A A C C U G U A U U U U A U G U U A A U U G A A A U U U U A A U U U G C U A A U U C A A U U
U G U A A U A A U U G U U G U U U A A A A A A U U A A G C A A U A A U U C A A U C A U A A U
A U A A A U A U G C U U A A G U U U U A U U C U U U A A U A G A A A A U A C G U U U A G A U U U
A A C A A A A U G A U A U U U A U C U A A U U U G U A U A A A G C G U G A A U G U U A A U U U A
U U A A A U U U G U U A A U U U A A U U U U A U U A A C A C U A U U U U U U U U C C G U U C C A A U C C U
U U A A C A A A C C A U U U C U C C C C C C U U U C C C C C U U U U U U A A A C C C U U U A A A G U C C
C C U U C U G C G A A C U U C U A A U G U C C U C C C U U G U U C U G U C C C C U U G C C C C U U G C C U U
U C C C U C U U U C C A A A C U A A U C C U U A U U G A C C U U U A A A A A A C G U U A A A A C G U U U U
G A G U G A U U U A U U U A G G A A A A G C C A A A C C A A G C C A A G C C A A C C G A C G G
A A U U G C A A A G A A A A A A A A U U U G A A U U U U G G G A A G U U C C A A G C C A A G A A A U U U G
G G G G A A G A G C C A A G A A A A A A G A A U U U C C A A A G C C U U A A A U U A A A A U U U
U A A U U A A A G U A U U U A A U U A U U C G A C U U U A A U U U A U A A A A A A A A A A A U U A U
G U U U U A U G U U U C A A U U U G U U U G A U U U G U G U A A A U U U U U U G U G A A A G
G C A U A U G U U A A A G U U U U A A A A A A G U U U A G U U U A U U A U C U G U A C C U
A U U A G U U U U G U A U U U G U U A U U G U A A U A U G G U A C U U U U A A U U U G U U U
A A U U U A A C U U U G U U U U G U U A A U U A A C U U U U U G U A A U U U U A U A U
A U U U A A A A U G U A A A A U G U A A A A U U U U A A G C C A U U G U U U C A U U U A

U A U G G A A U U U U U U U A U U U U U G U C G G U A A U G A C U U U U U A A C A G C U U U U G U G G U U G A G A A U U G U U
A G G U U U A U U U U U C A U U U U U U U U G A A U C A A U A U U U U G A U A U A G A U U U U A U G C G U U A A A A U U
U G C U U U U A A A A G C U U U U U U U C A U U A A A A U A G G C G A A U G U U U U G C U U A U U A A G C A U U A A C
A A U A A C A U U U U U A A A A A A U G G C U A A U G U U G A A U A A A U U U U A U U U U A U C G G U U U U U A U A G
U G U G G A U U A A U G U U U A A U U G U U A A A A U U A A U U U A U U U U G U G G G G U U U U A C U A A
G U C U A C U C A A A U U U G G U U U A C A A A A U U U G A C U U G C C A A G A A U U G C C A A U C C A G G U
G U C U G C A C U U A A U U C A A U G C U G C A A A C A U U A A G U U G U A A U U G G U U A A U U G U U A U
U U U U U G A U G U U U U G A A U U U U G A U U U U U G U U U A U U U U U U U G G U U U G G U U U G U A G U U U
G A U U U U A G U A A A A U G A U G A A G U U U A A A A U U U G U A A A A A A G G U U A A A U U G U C
A U U U A G U A C A A A A U G C C A A A A A A G U U U U U C U A U G U U U U G U A A U U G U C U A A
U G U A G G U U U U A A U U U U U G U U U A U C A U U A A A G C A A C U U U U A U U U A U G U C U
A G G U U G U U U G A A U U C A A U U U U U U U G G A U U G C A A A A A A C G U U U U U A C A A U A
U U U U U G U G U A U U U U U A A A A A A A C C A C G U U U G U U A A U U U U U A A C A A U U C
U U U U U G U G U A U U U U U G C A A U U U U C C A A G U U A A A C U U G U U U C
A U U A U G A U U U U U G U U G U A A U U G U A A A A U U G U U A A A U U G U U A A A C
A U C A A U U U A A U U A A A A U U A A G U U U U U G U G U G U A A A U U U U A C U G U
G U U A A U A A U U U U U G U U U U U U U U U U U G U G U U U U A A A U U A A U U G U U A A U
U G A U A C A C U U U U U U A A A U U U U U G A A U U G C U U U G U U A A A U U U U G U U U
A U A U A G U U U A U A A C U U U U A A U U U U U G U A A U U U U A U U U U U U C
A A G U U U A U U G C U U U U U A A U U U U A U C U U U U U U U G U U U U G A U
A U U A C U A A A A U U U G A A A A U U U U U U U G U A A U U U U A U U U U U A
U U U U U A A U U G U A A U U U U U G A A U U U U U G U A A A A C U G U C G G
A U U U U A U U U A U U C G G U A A U U G A A U U U U A U U U U U A U U U U U
G U U U G U A A U U U A U U U A A U U U U A A A A U U U A A A G U U U U U U U G
U A U G U A U U A A U U A A U U U U C A A U U U U A A U U U U A A A U U C A
G U C U A C A G A G G A U A A U U U U A A A A A U U A A C C U C A A G U U U U U A A
G U A G U G U U U U G C U A U U U U U U G U U A A A U U G U A A A U U A A U U A

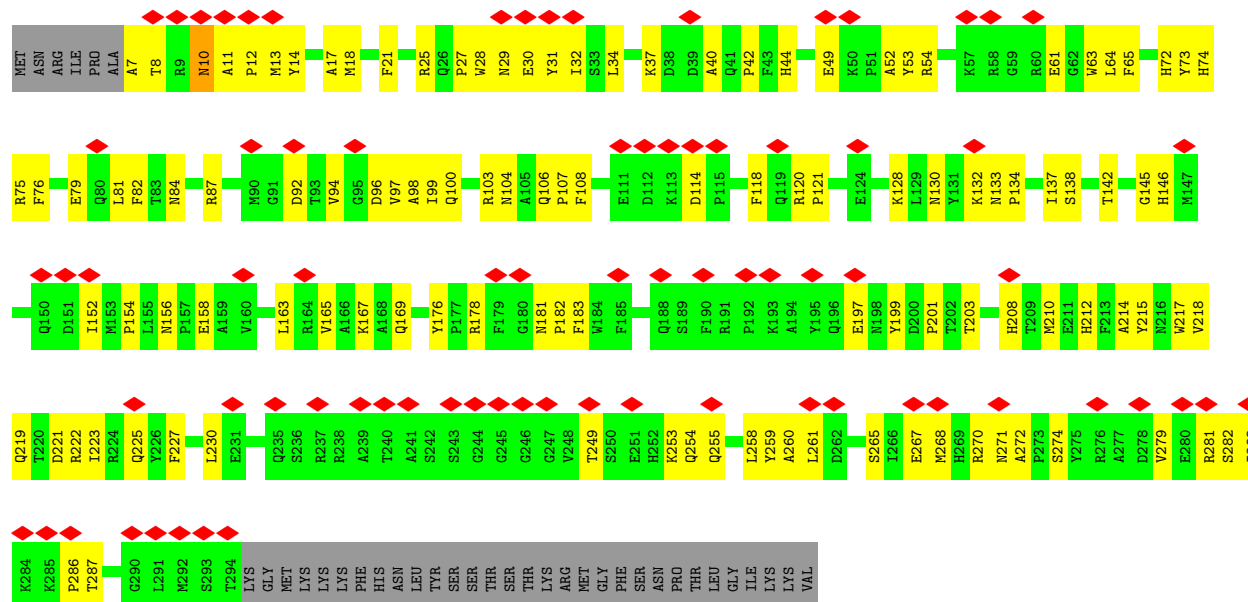




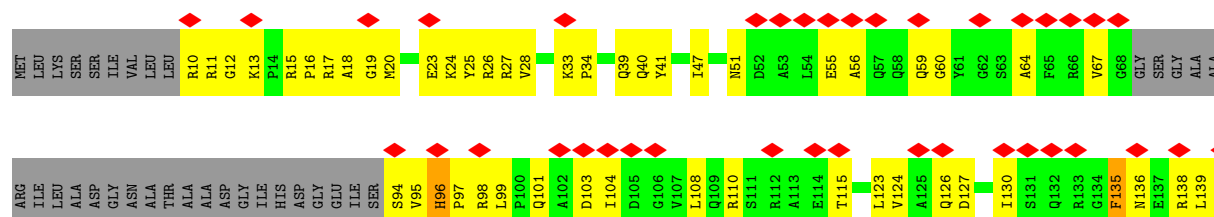
• Molecule 3: mS69

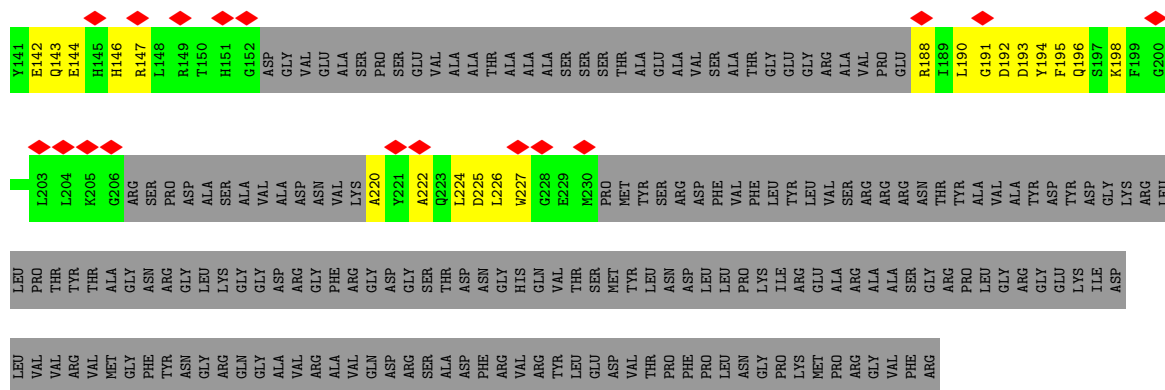


• Molecule 4: bS18m

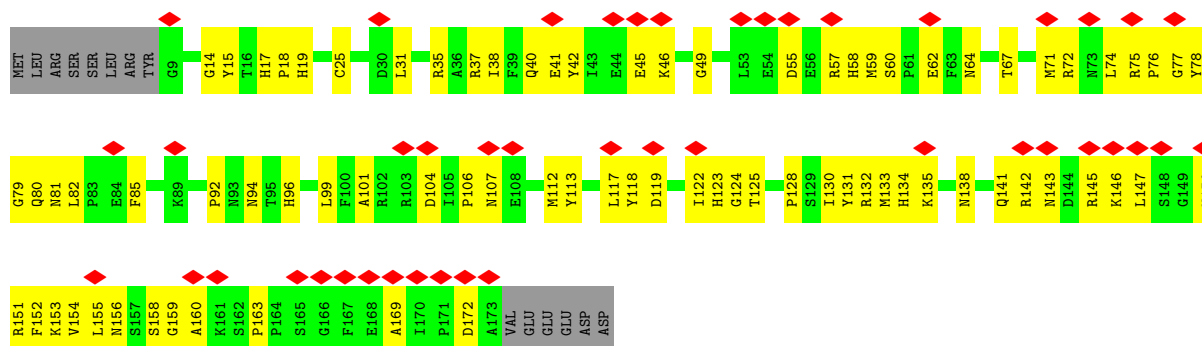


• Molecule 5: uS11m

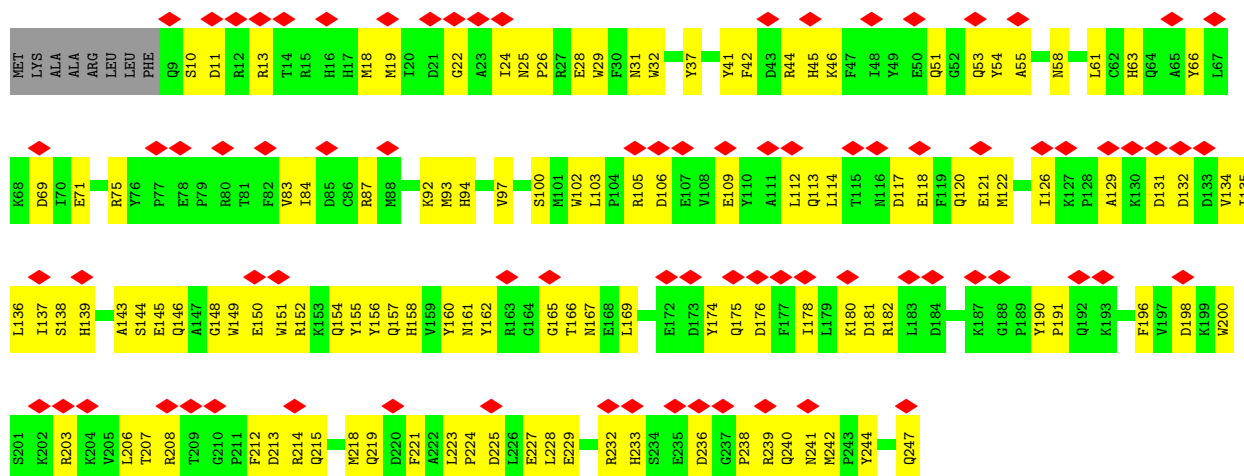




• Molecule 6: mS33

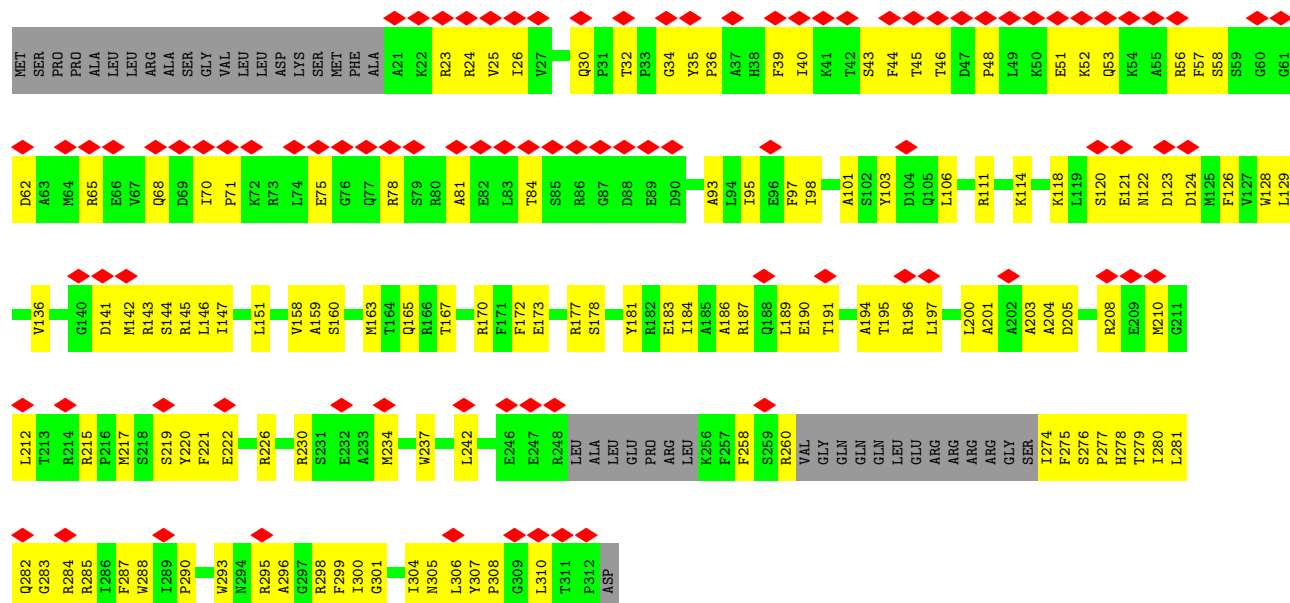


• Molecule 7: Rhodanese domain-containing protein

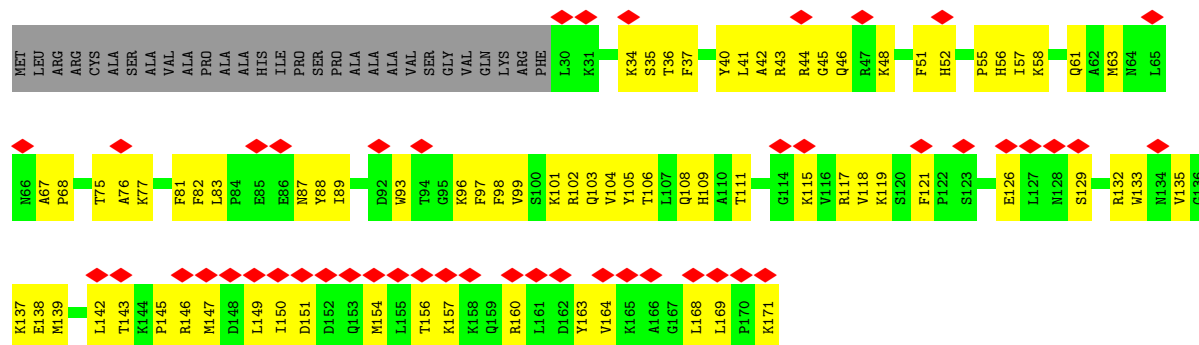


• Molecule 8: mS59

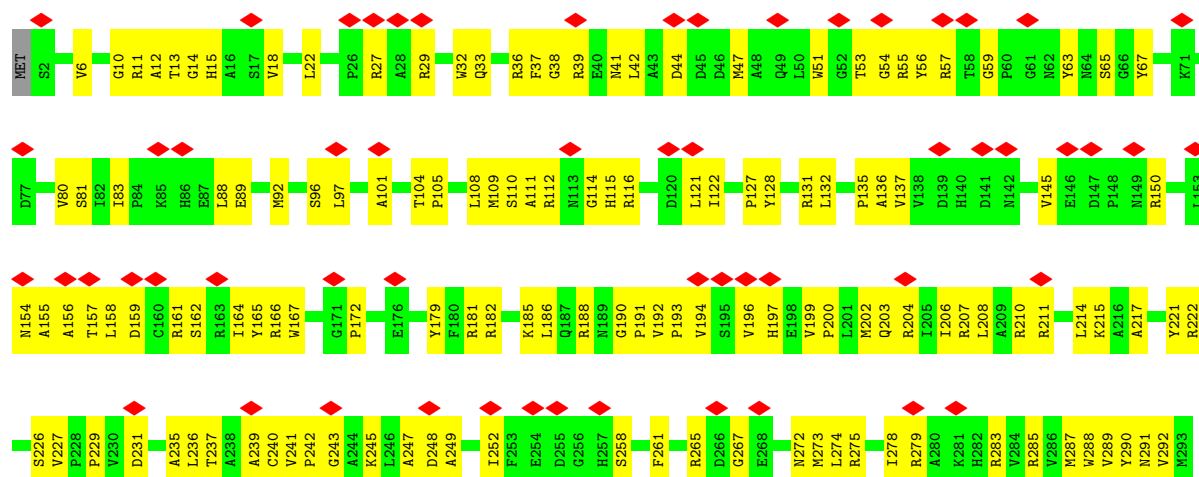


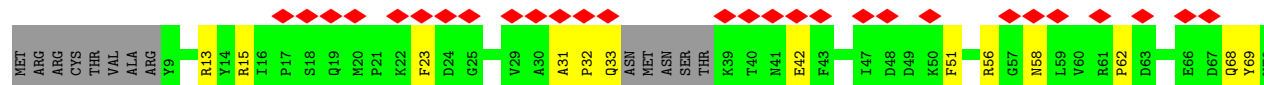


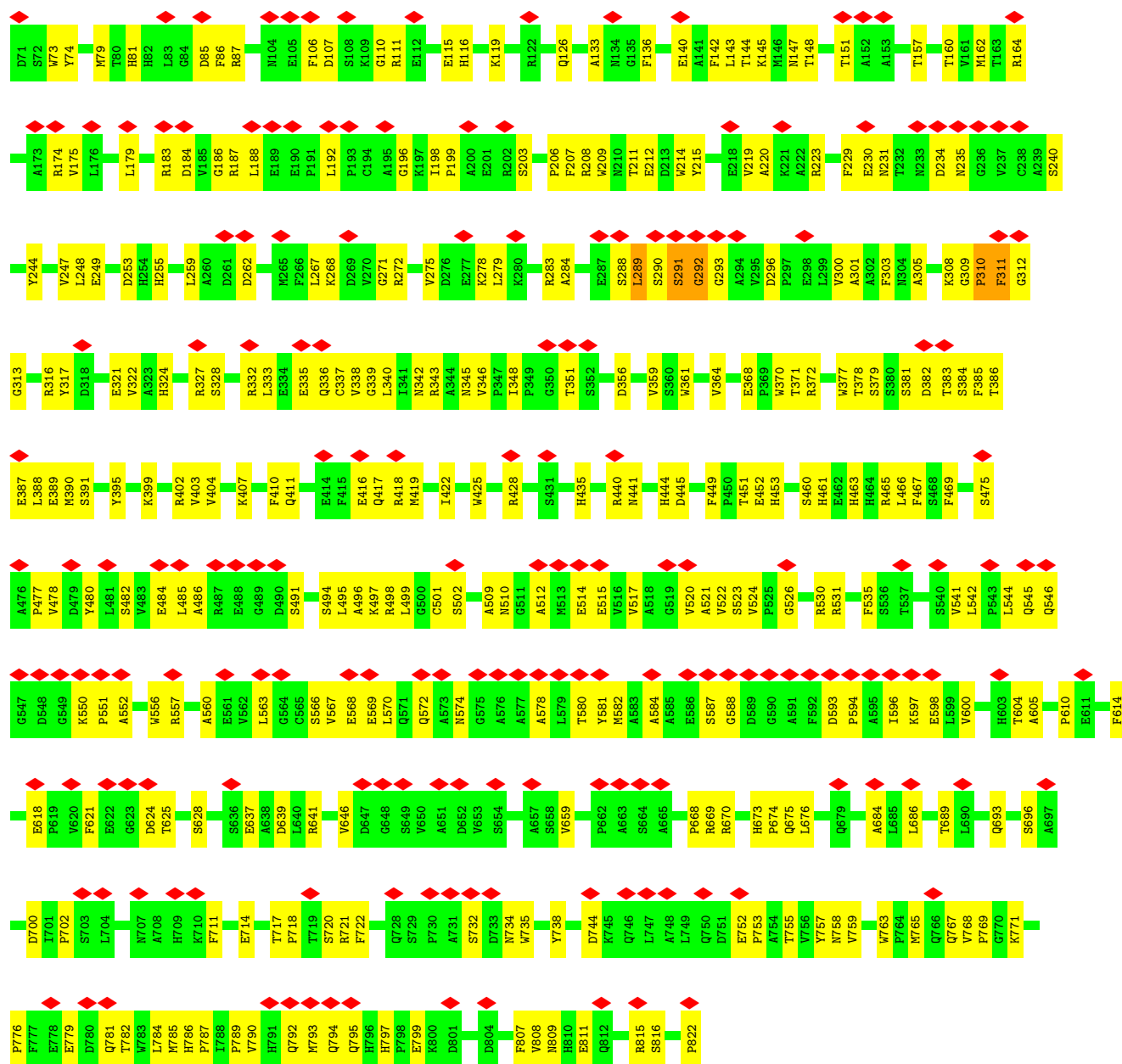
• Molecule 9: uS19m



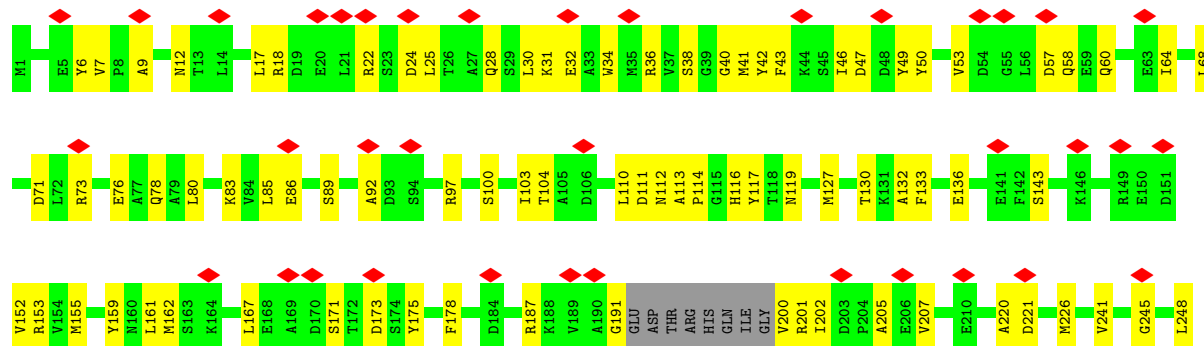
• Molecule 10: mS53

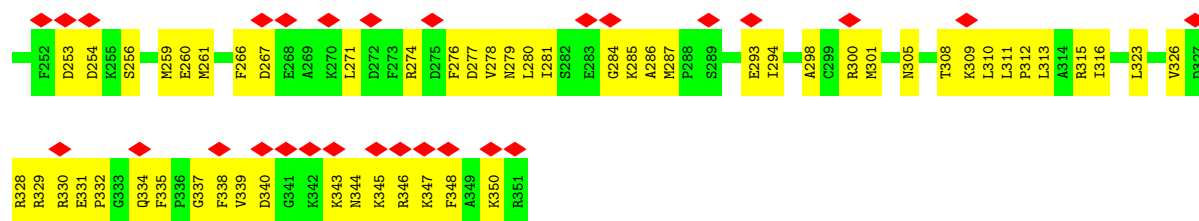




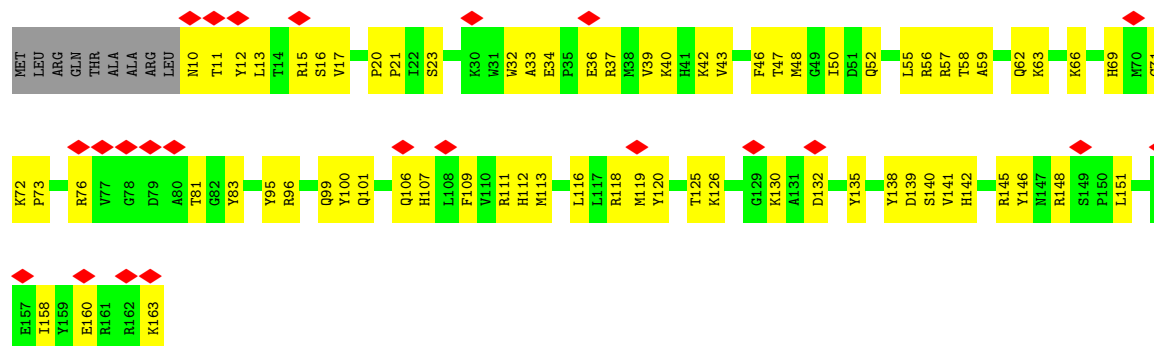


• Molecule 15: uS9m

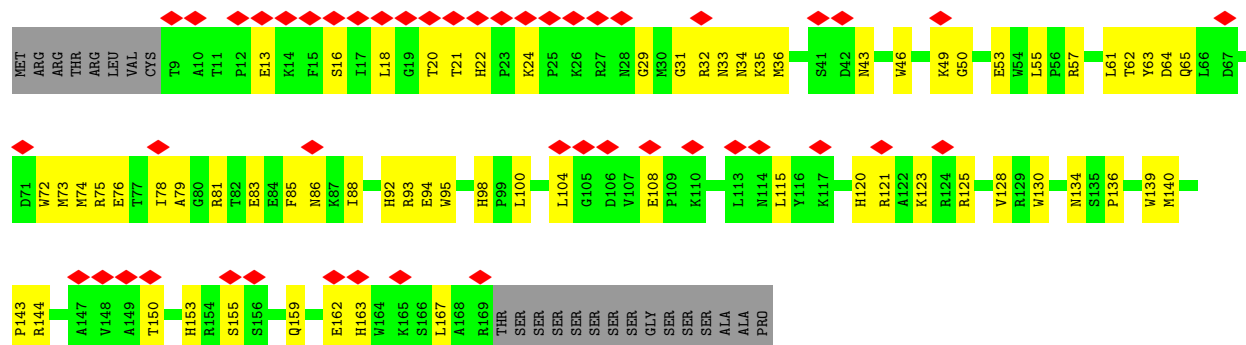




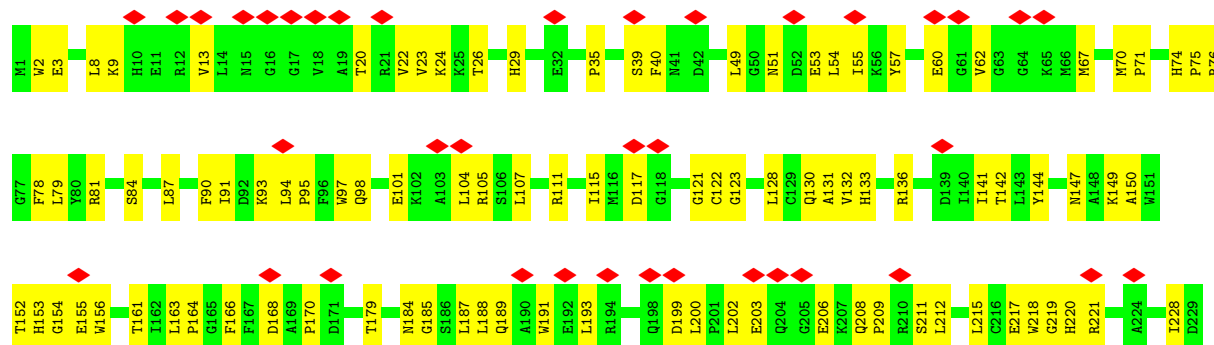
• Molecule 16: mS72

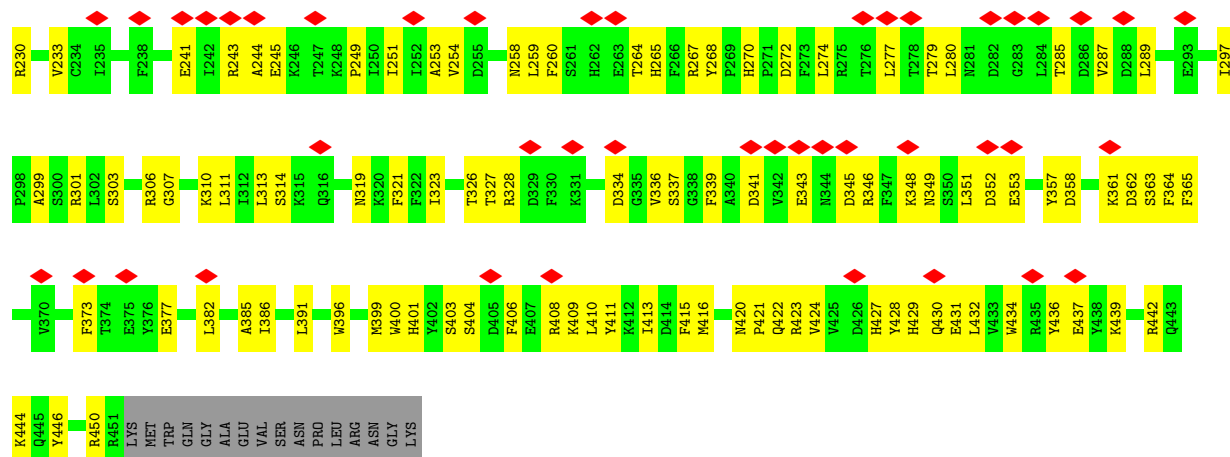


• Molecule 17: mS70

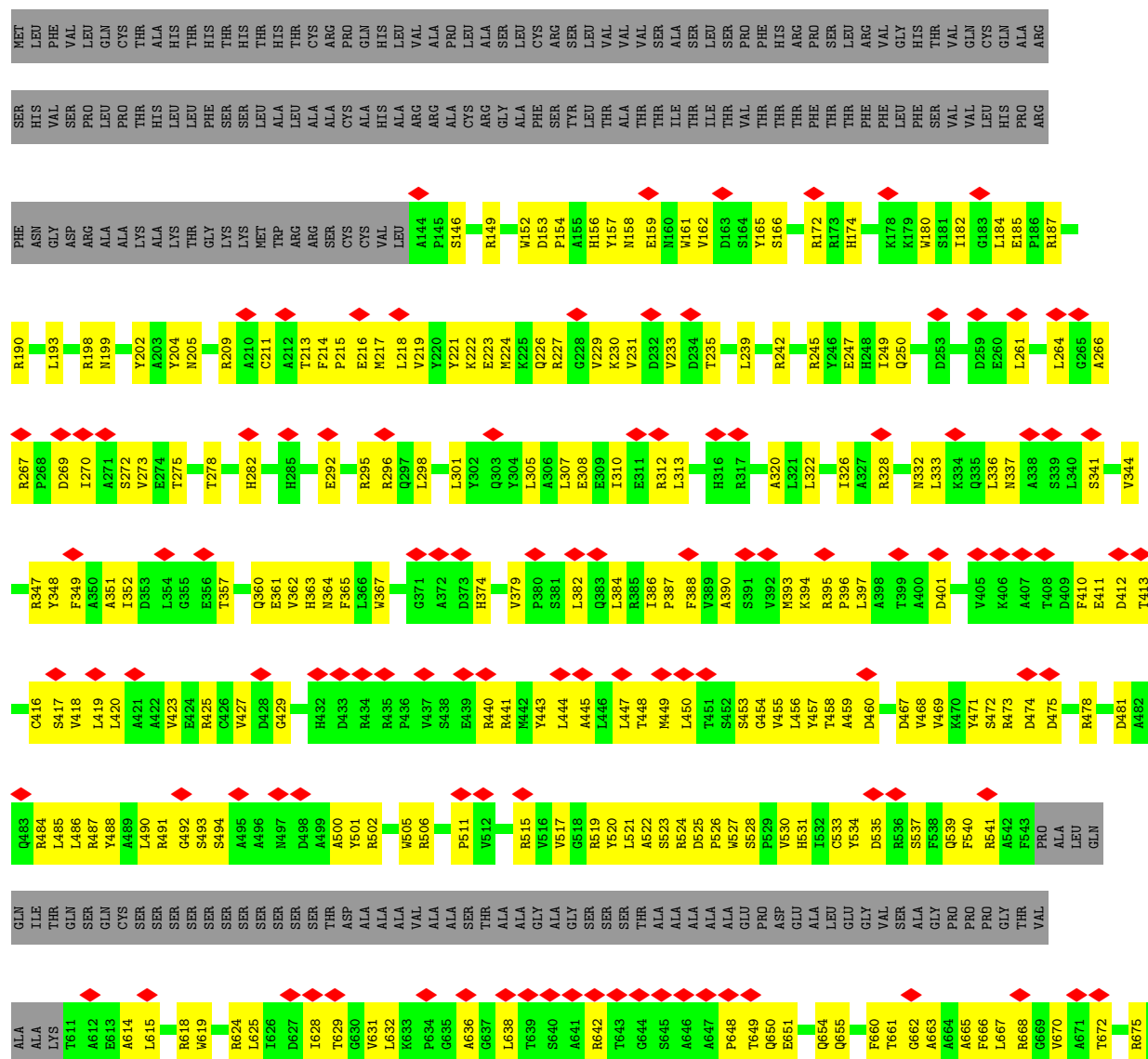


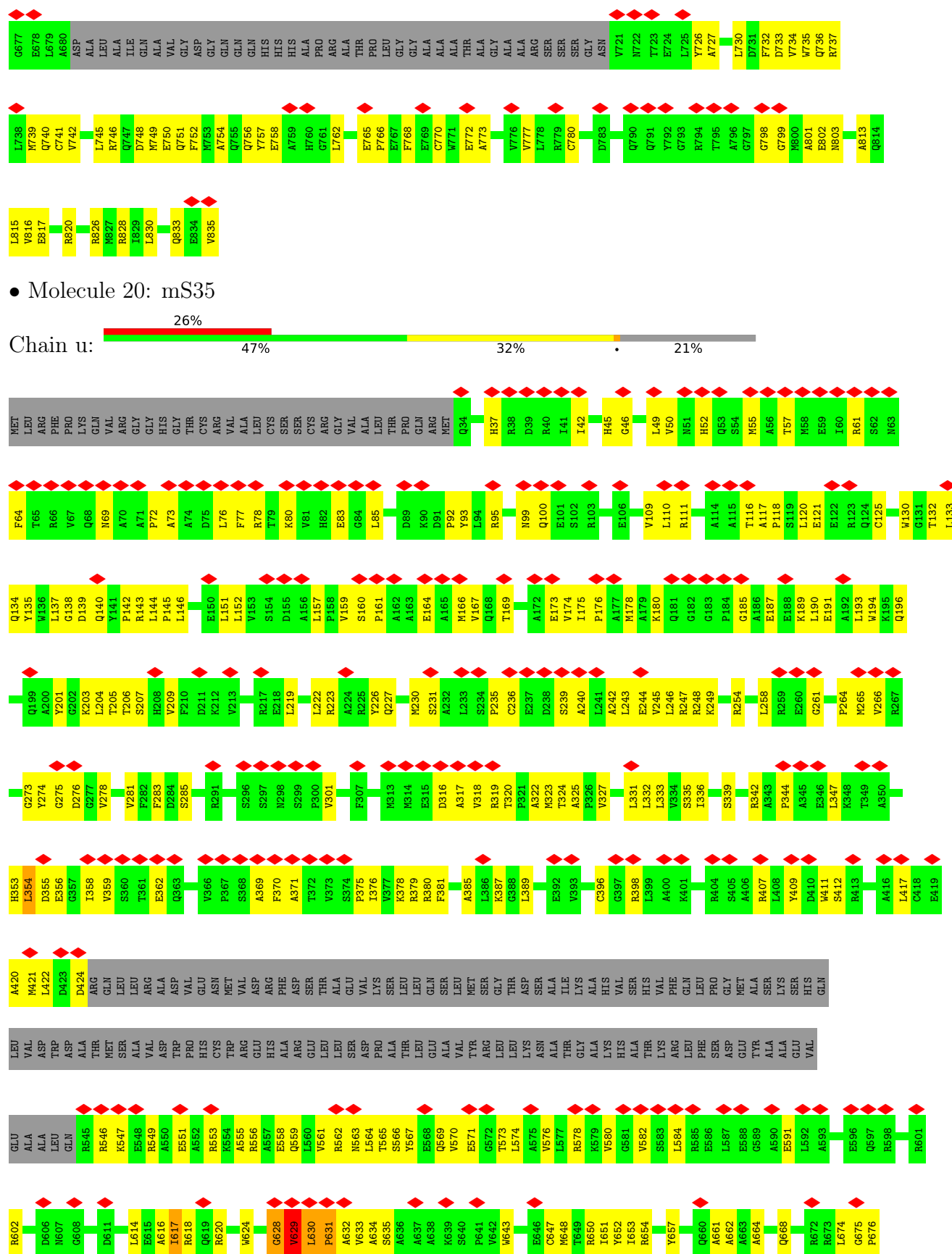
• Molecule 18: mS29

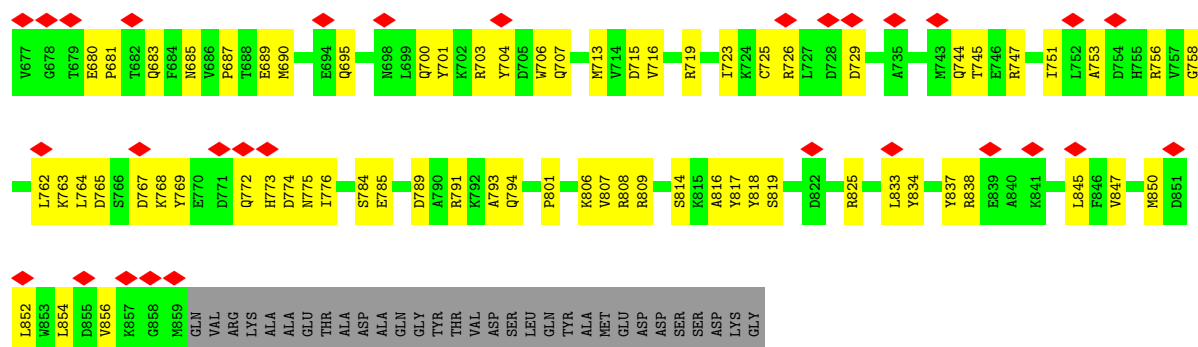




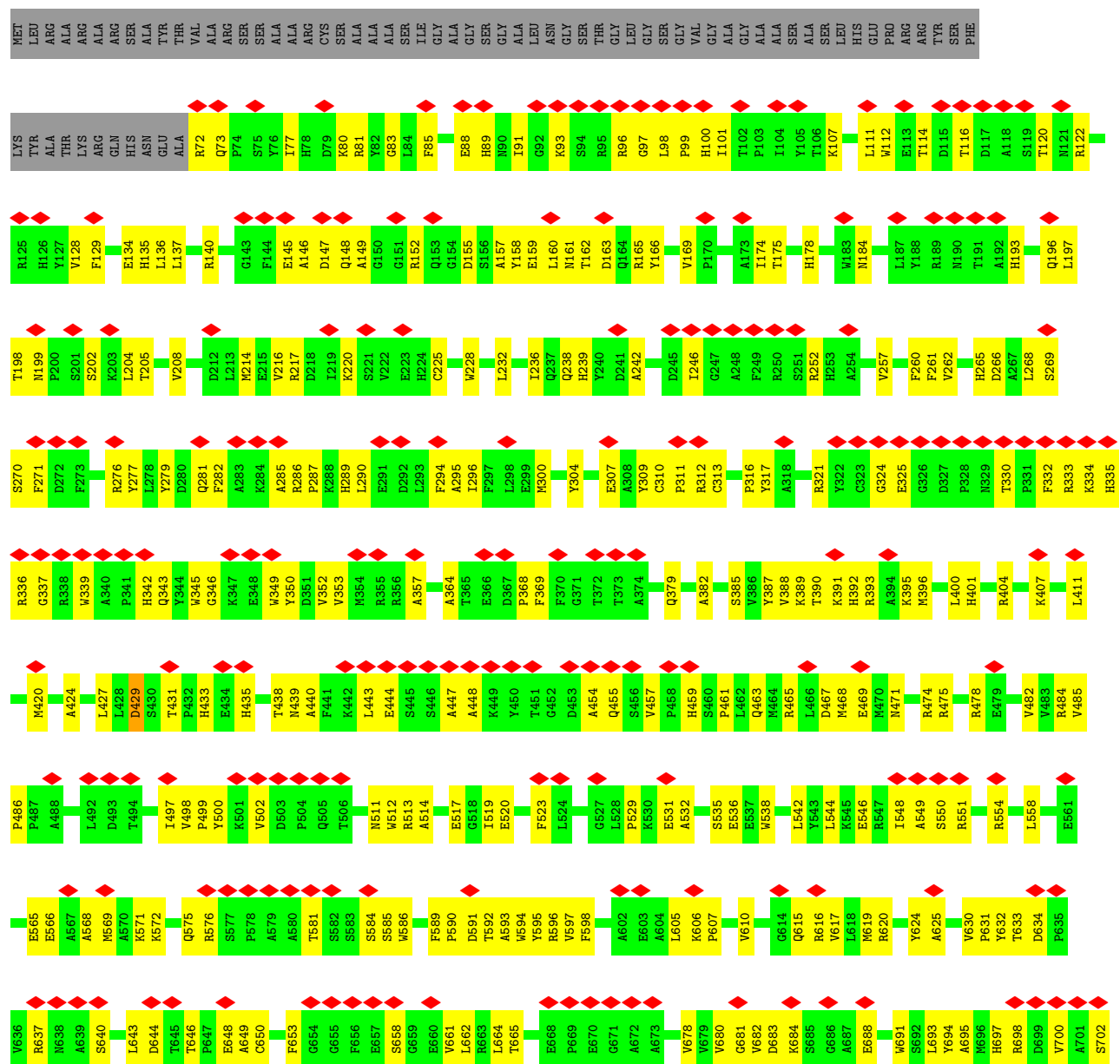
• Molecule 19: Excreted/secreted protein 15





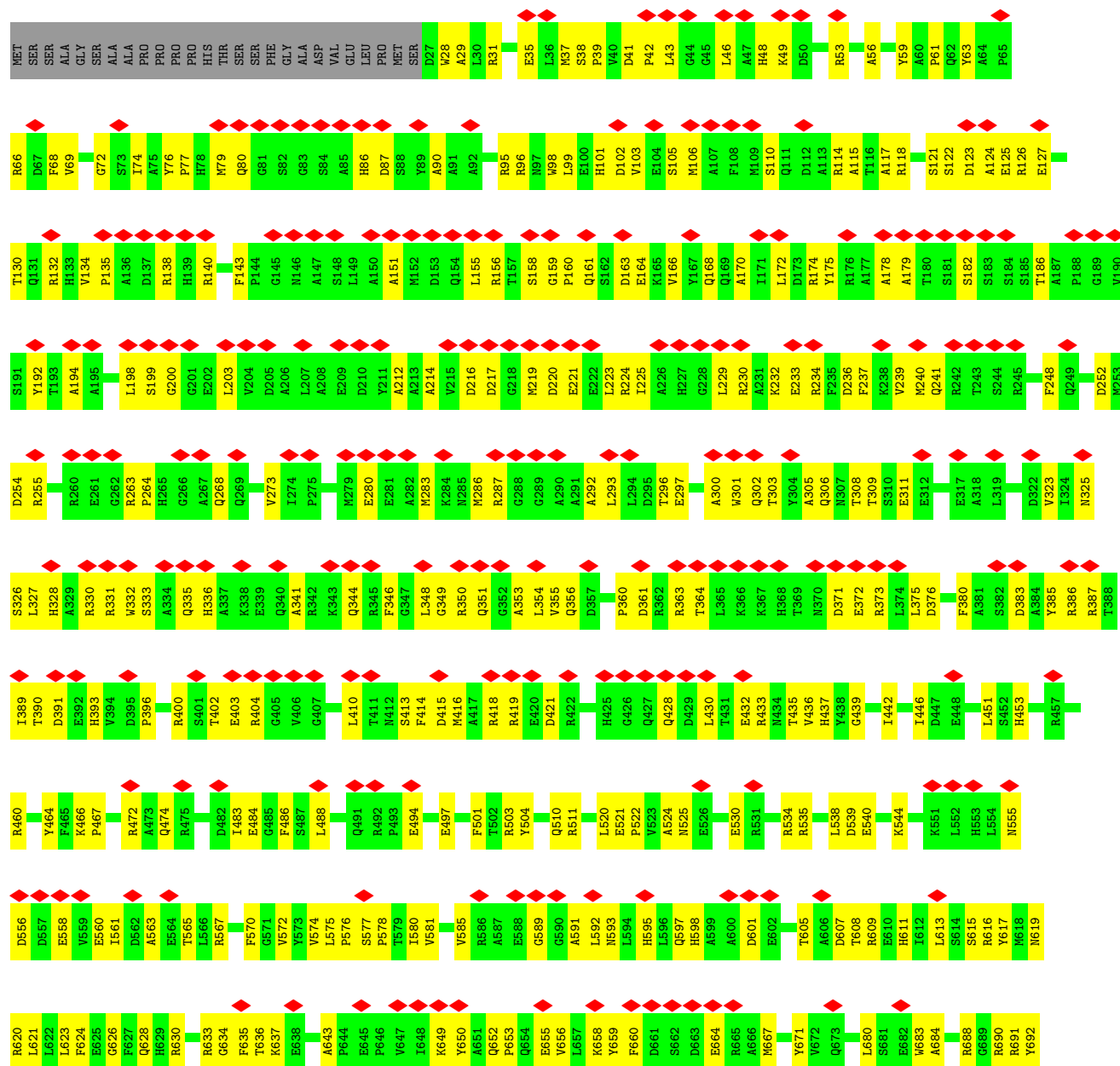


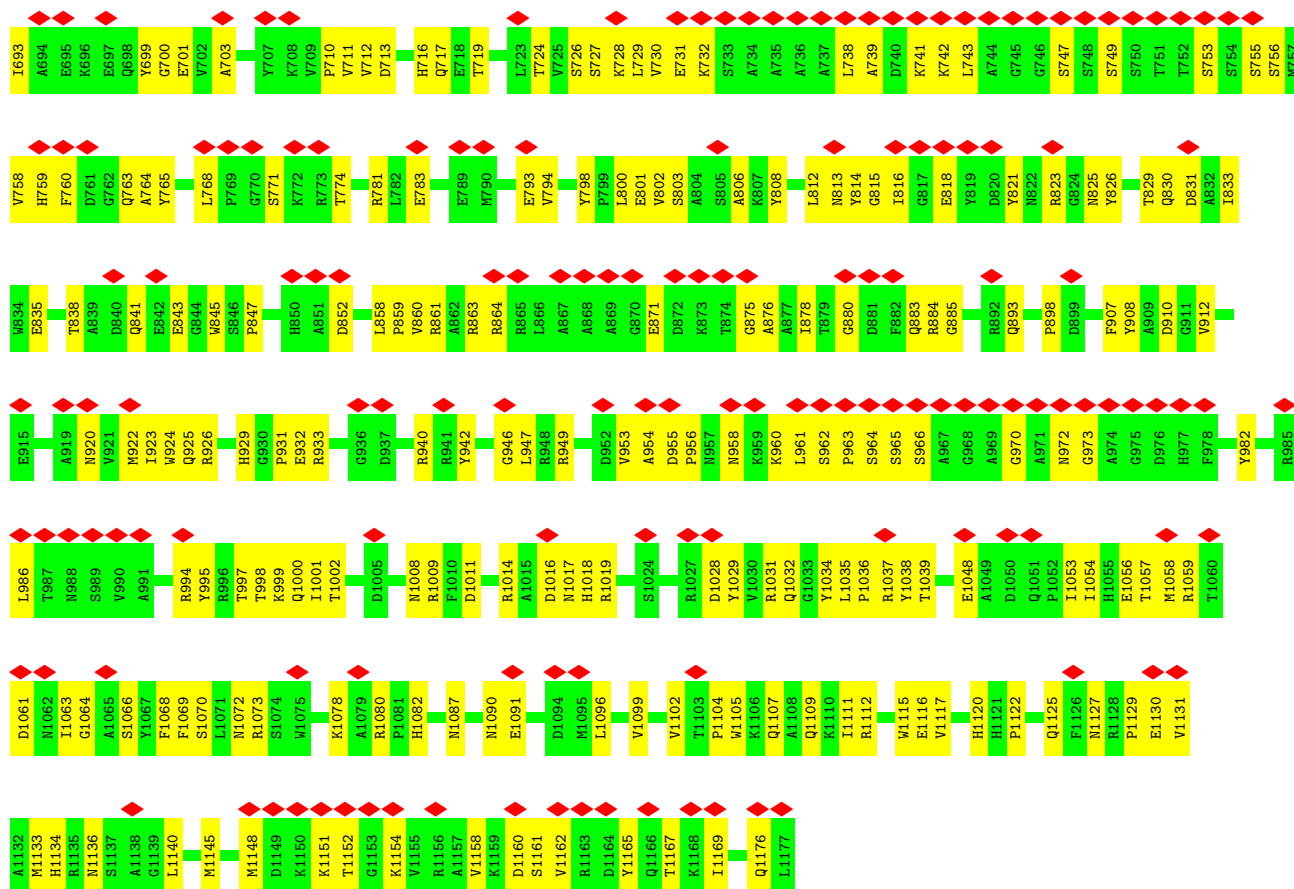
• Molecule 21: mS48



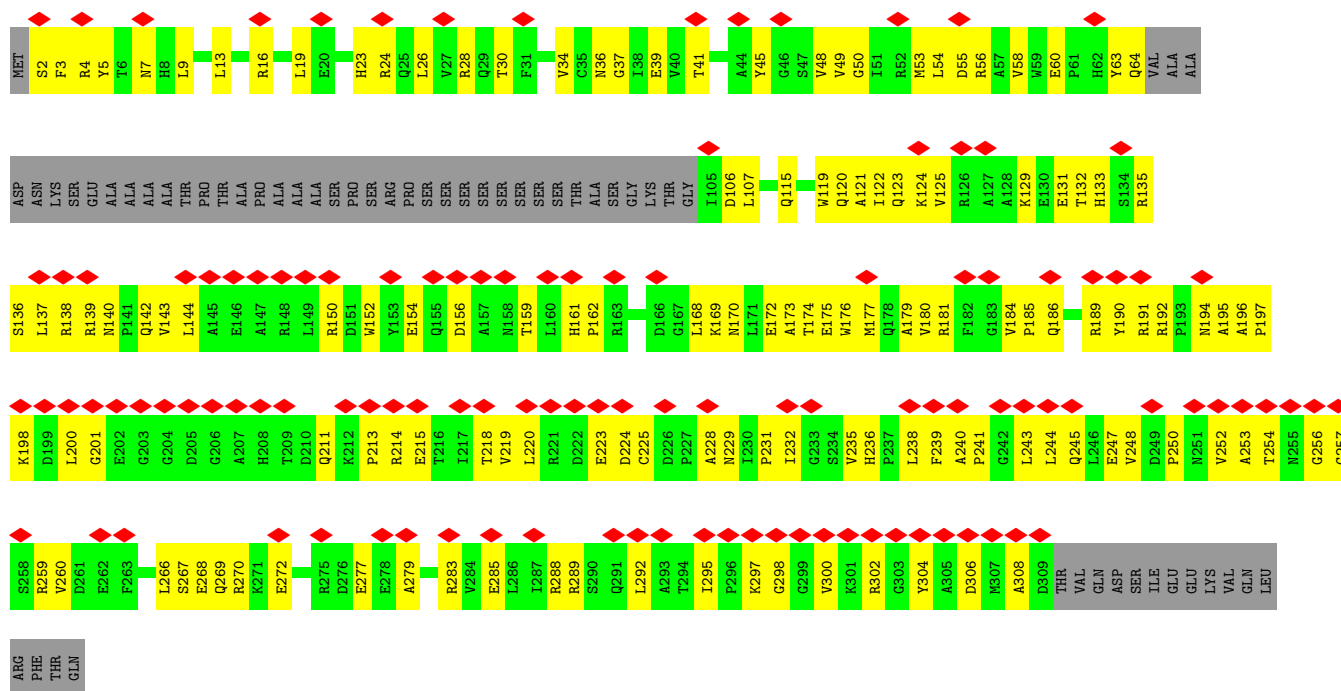


- Molecule 22: mS49



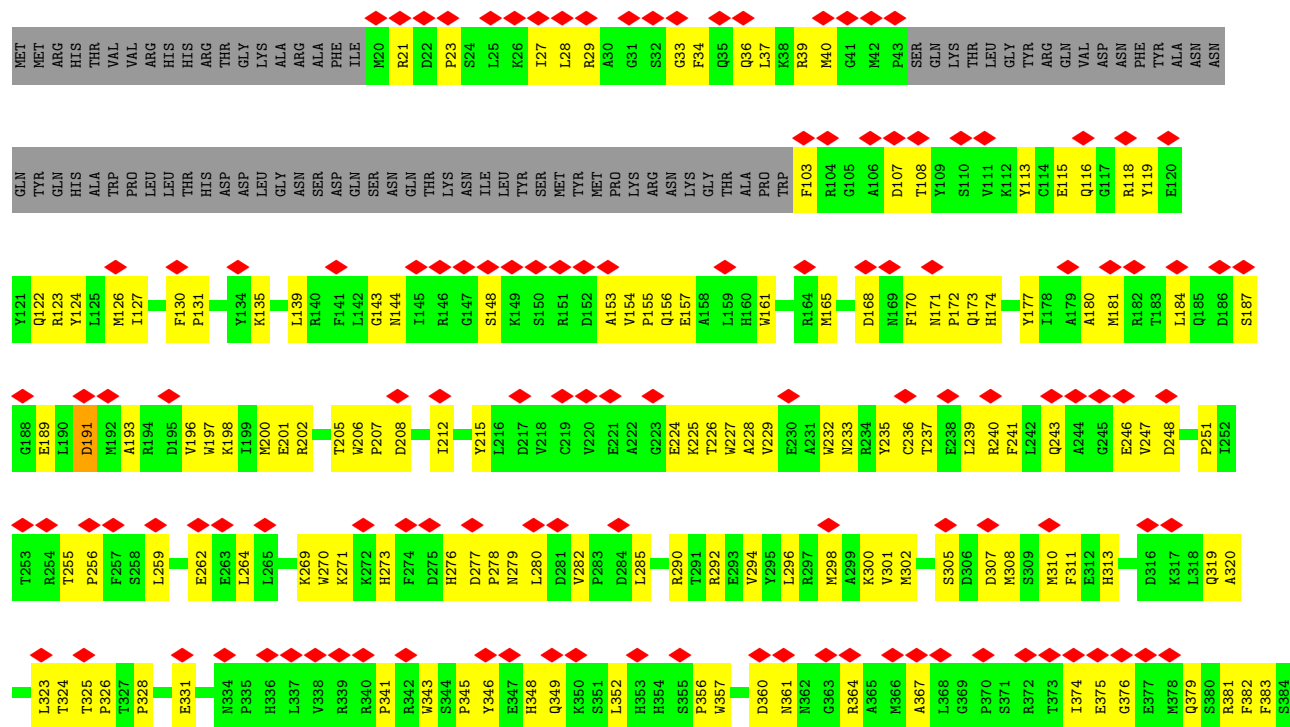


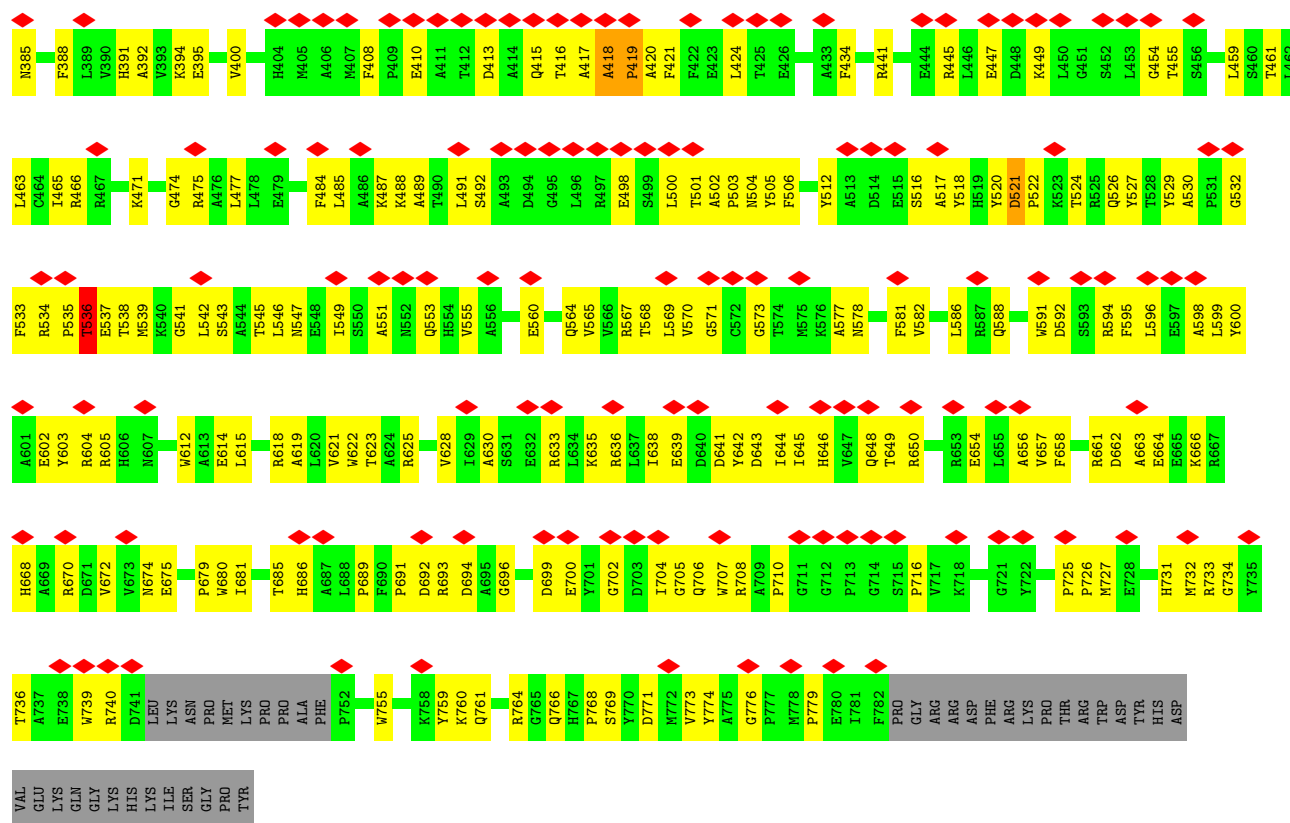
• Molecule 23: mS58



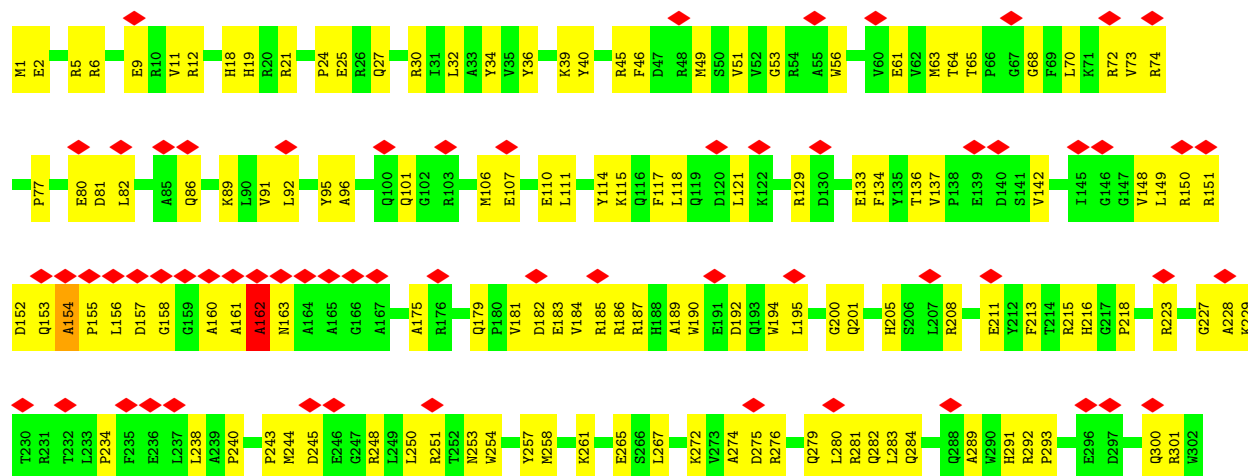
Chain ac: 32% 47% 40% 12%



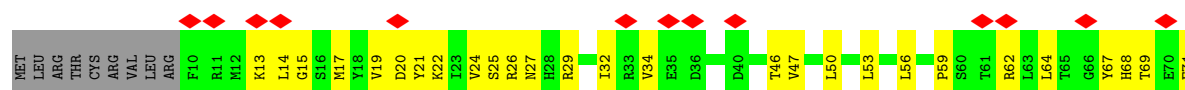


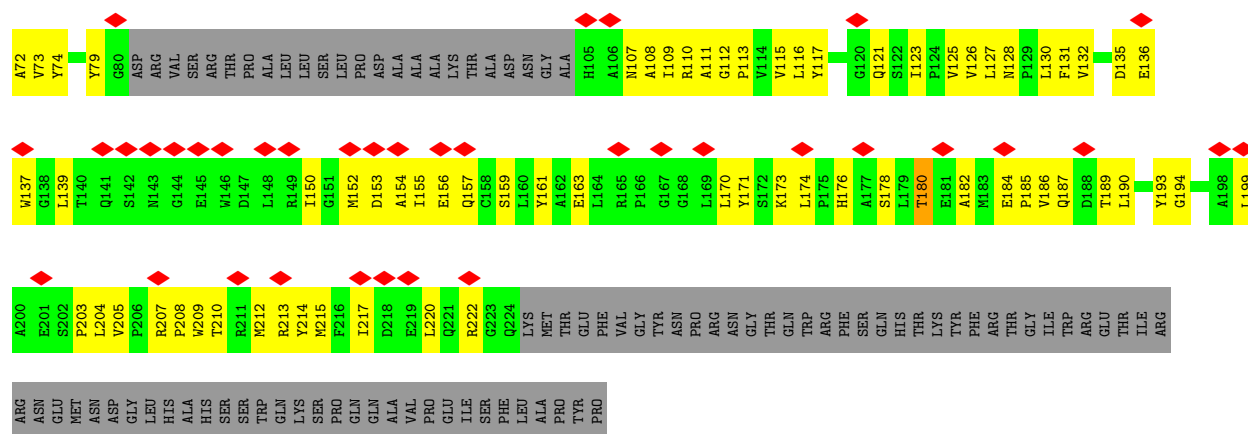


• Molecule 26: mS60

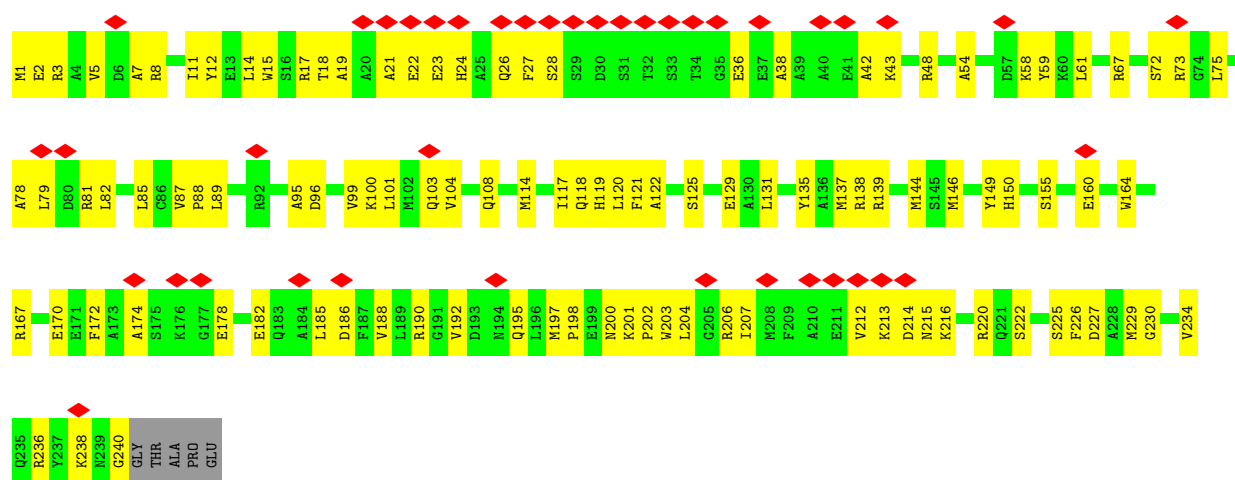


• Molecule 27: mS61

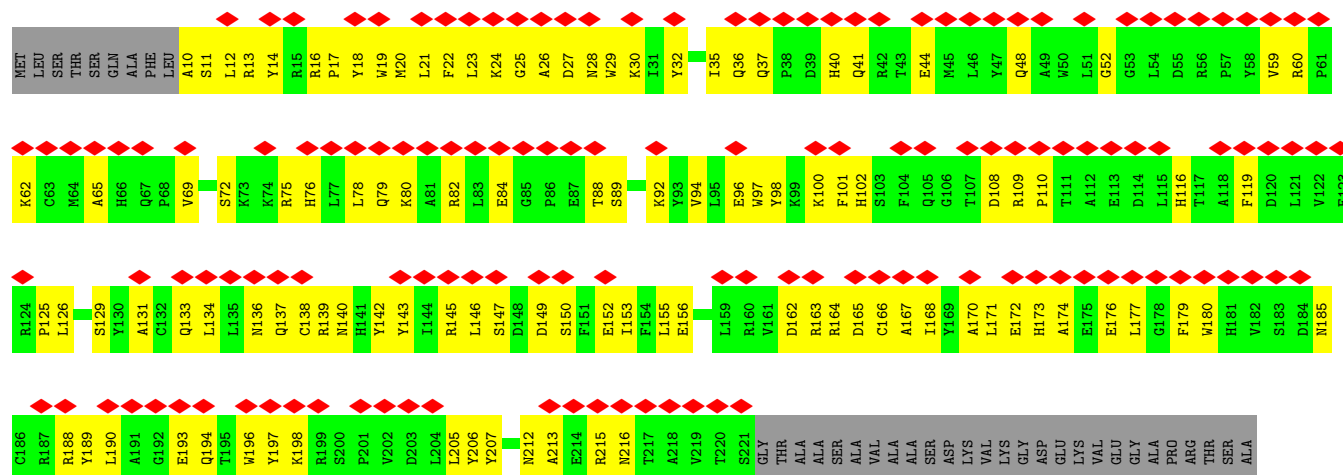




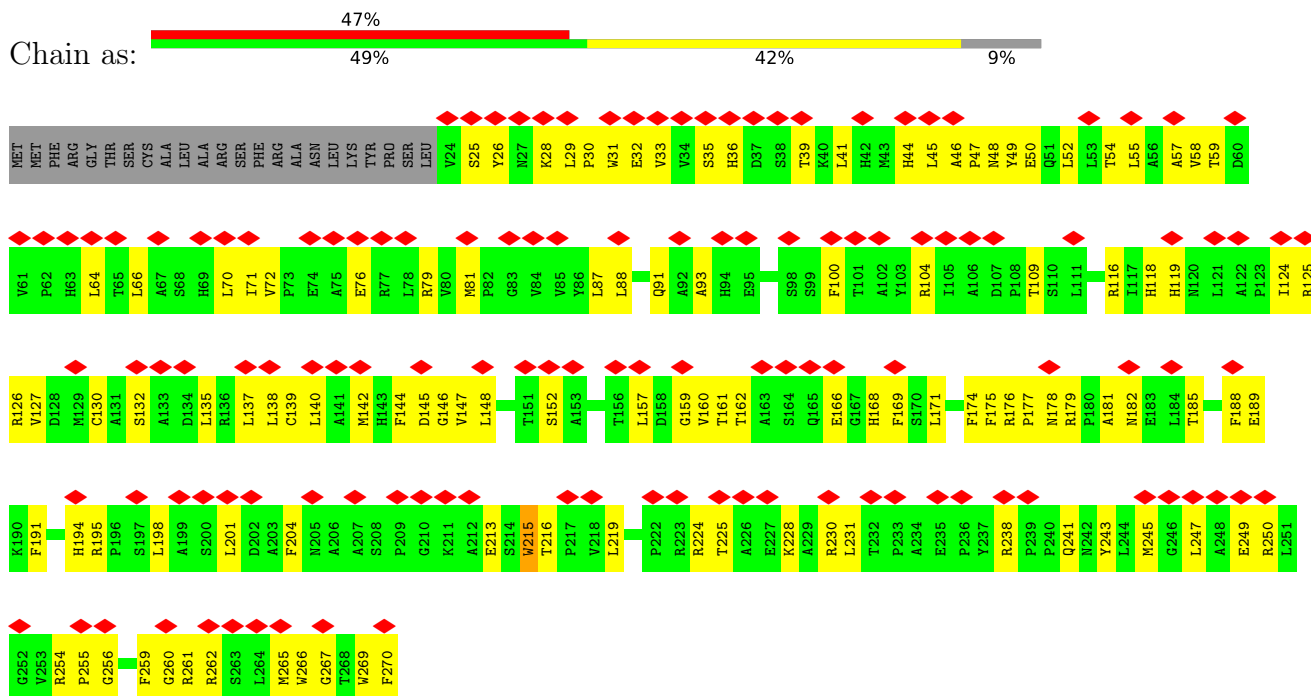
• Molecule 28: mS62



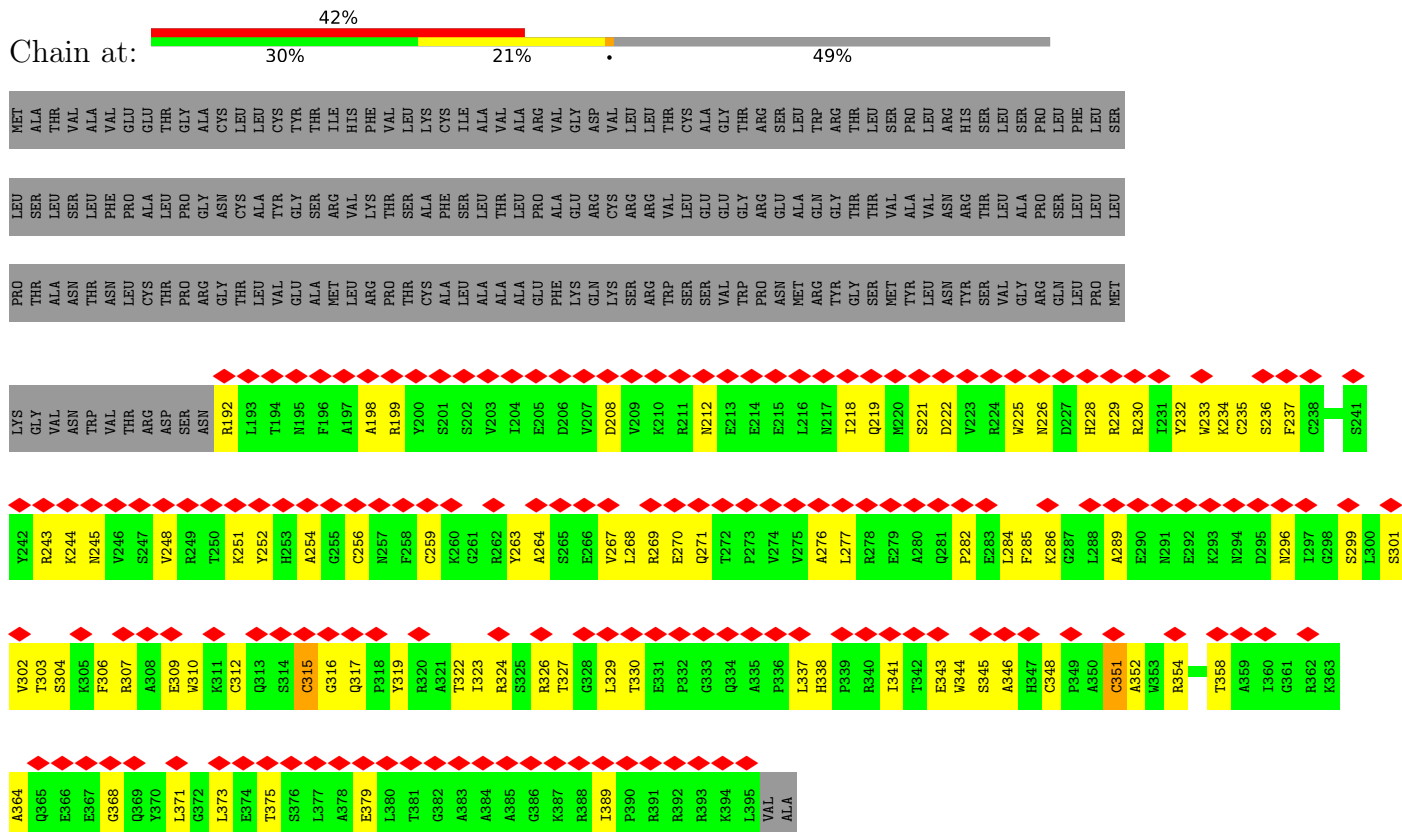
• Molecule 29: mS63



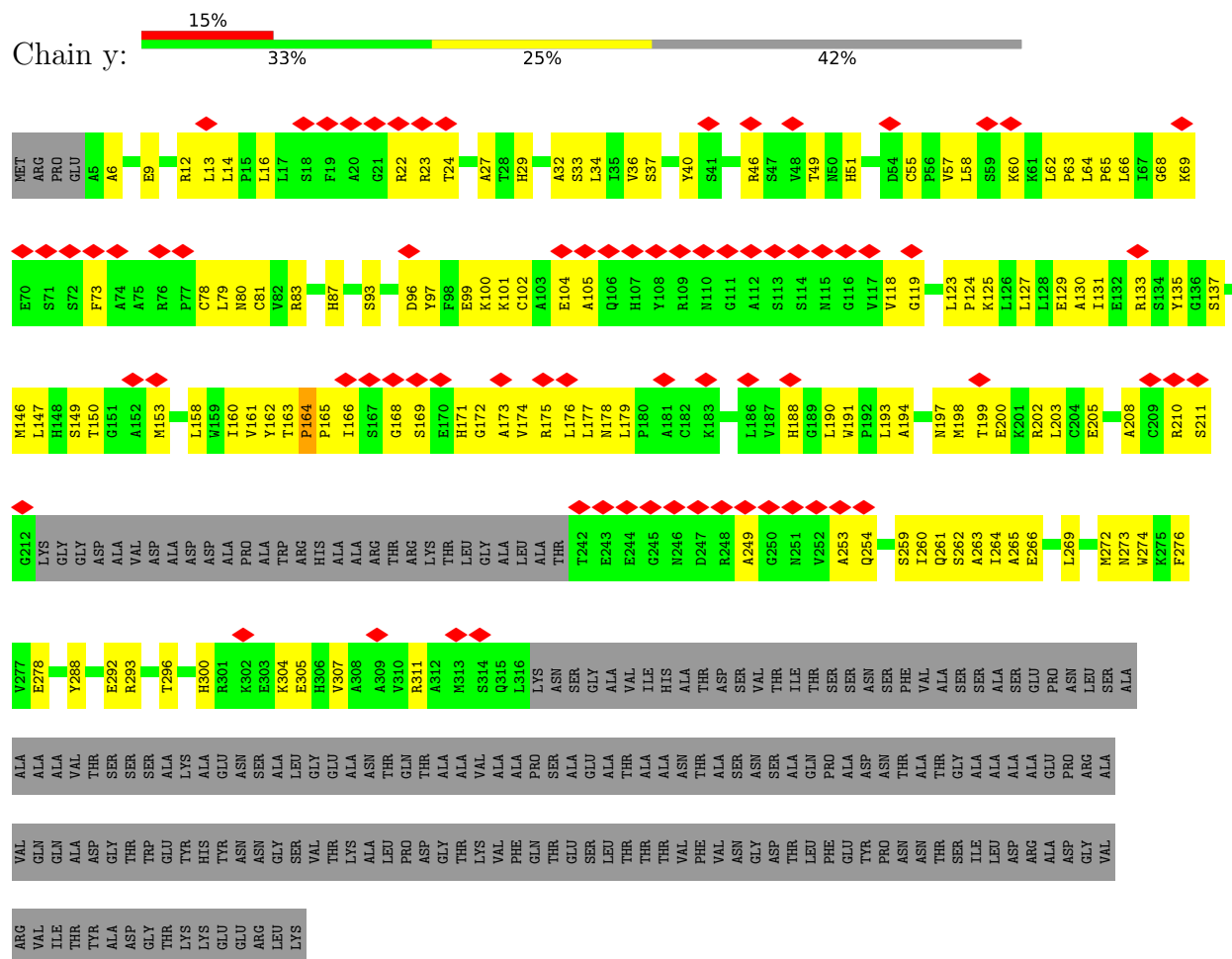
Chain as:



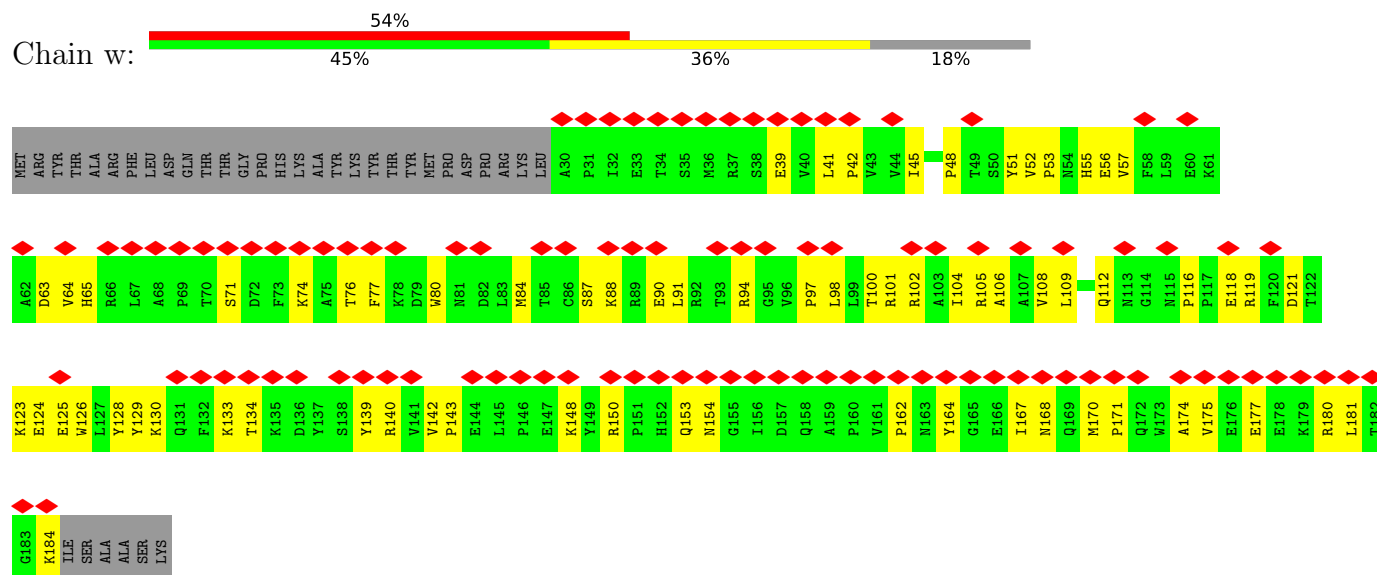
Chain at:



- Molecule 32: mS43



- Molecule 33: Protein FYV4, mitochondrial



- Molecule 34: mS37



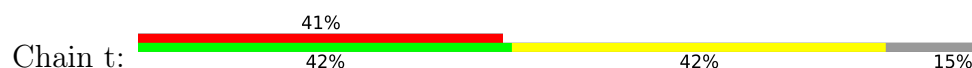
MET LYS SER SER ASP ILE PHE HIS CYS LYS TYR THR PRO ILE LEU LEU LYS SER ARG THR ASP ASP SER GLY VAL ASN GLN TYR GLY LEU ARG PRO VAL ASN VAL SER SER TYR ASP TYR LEU ASN PRO THR ASN LEU VAL ASN PHE GLY ARG GLY THR ALA PHE ASP ASN LEU GLY VAL ARG

ARG SER GLU GLY GLN ILE ASP SER PRO SER LEU GLY GLY SER PRO VAL PHE THR GLN ALA LYS LEU LEU GLY LEU SER GLY D90 D91 Q92 L93 R94 L95 C96 E97 A98 E99 Q102 L103 R104 M105 C106 M107 A108 K109 G110 G111 S112 A113 E114 E115 R116 L119 L120 L121 D122

A123 C124 L125 S126 K127 V128 G129 H130 L131 R132 T135 S136 S140 E141 F142 M143 D144 V145 F146 M149 V150 S151 D152 ASN HIS THR LYS PRO PHE GLN HIS ARG PRO HIS ASP TRP ARG HIS TYR TYR ALA GLN LEU VAL ARG GLU LYS GLN ASN GLY HIS ALA TYR GLY

ARG ARG PRO LYS GLU PHE SER PHE GLY ARG TYR VAL LYS THR GLY TYR GLY LYS ARG PRO ARG LEU PRO TYR ASN LYS

• Molecule 35: mS34



MET ARG GLY ARG THR THR LEU A10 R11 D12 A13 L14 M15 S16 G17 S18 S19 M20 T21 L22 K25 G26 M27 R28 P29 S30 P31 E32 A33 H34 R35 R36 R37 M38 P39 W40 T41 A42 A43 A44 E45 Y46 G49 V50 V51 L52 M53 S54 K55 E56 K57 L58 V59 L60 D61 G62

T63 Q64 L65 V66 E67 L68 D69 H70 I71 D72 R73 A74 S75 S76 V77 D78 P79 L80 E81 V82 L83 K84 A85 S86 M87 V87 A88 T89 R90 A91 Y92 N93 T94 S95 T96 G97 F98 N99 I100 F101 Q102 L103 A104 S105 Q106 T107 R108 F109 H110 G111 R112 G113 Q114 R118 E119 E120 W121 R122 Q123 G124

T125 Y126 K128 Y129 A133 D136 F137 D138 R139 E140 G141 S142 K143 Y147 G148 Y149 T150 T151 F152 H153 G154 E155 S156 T157 T158 R159 P160 V161 E162 I163 M164 Y165 T168 P169 G170 W171 Q172 M173 E174 Y175 D176 E177 A178 A179 A180 P182 F183 D184 A185 V187 P188 P189 P190

I193 G194 T195 E196 V197 P198 V199 D200 P201 S202 T203 Y204 R205 L206 K207 A208 Y209 P210 F211 D213 A214 P215 F220 L224 L225 K226 D227 R228 G229 V230 L231 L232 D233 L234 P235 MET ASP ALA SER PRO ALA ALA ALA ALA ALA ASP GLY ALA VAL ASP

GLY SER HIS HIS TYR GLU SER LYS GLY VAL

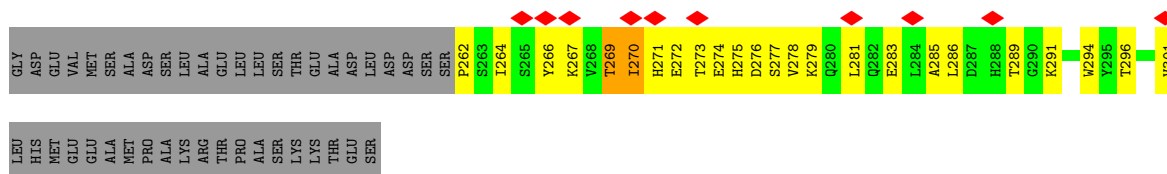
• Molecule 36: mS23



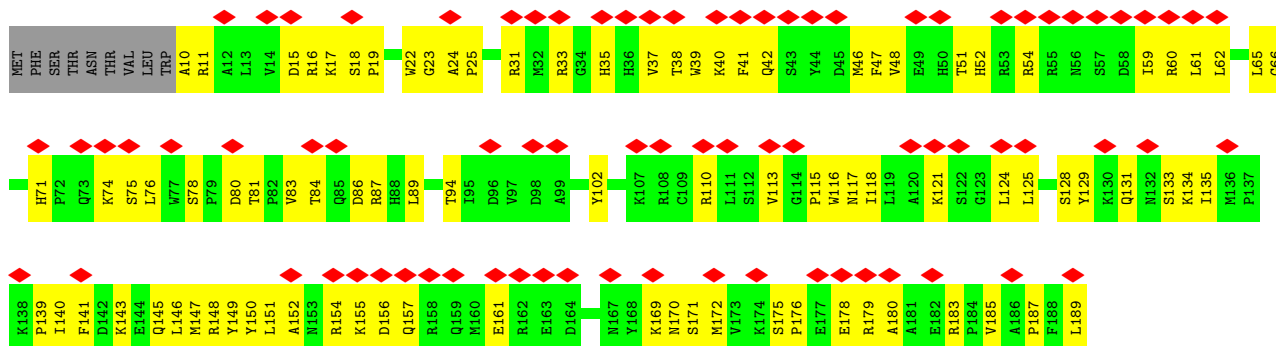
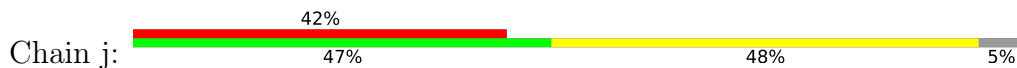
MET ARG ARG SER SER CYS LEU TYR LYS ILE PRO LYS ASN THR GLY VAL ALA ARG F21 D22 T23 W24 N25 E26 E29 P30 V31 R36 M37 G38 R39 L40 Y46 M57 F58 M64 Q66 Q67 E68 P73 H74 N75 W76 S77 E78 Q81 D82 T84 D85

Y86 L87 E90 R91 I92 D96 S102 R103 L104 L105 A106 S107 E108 G109 M110 R111 Y112 Y113 M114 V115 F116 W117 I118 R119 K120 P121 L122 D123 R124 M125 E126 R127 E131 R134 K135 G136 V137 Y146 M149 F150 Y151 D152 E153 L154 T155 V156 K157 K158 R159 E166 D167 A168

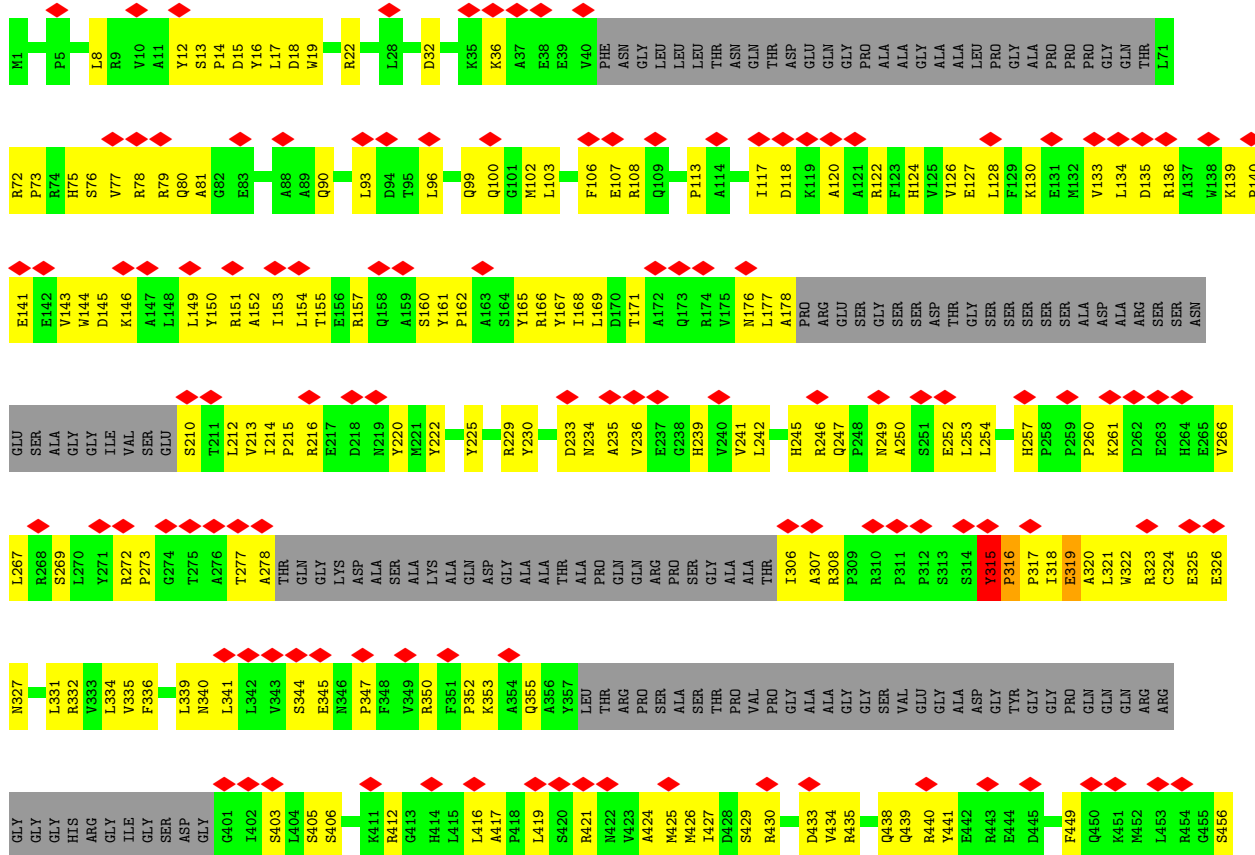
K169 R173 Y174 I175 R178 E179 A180 T181 L182 L183 M184 G185 L186 L187 L188 Q189 L190 Q191 Q192 E193 L195 T196 P197 H198 Q199 V200 T201 R205 K210 A211 Q212 E215 A216 PHE ALA ALA THR VAL GLU ARG SER THR GLU THR VAL ASP ALA ALA LYS ASP ALA GLU

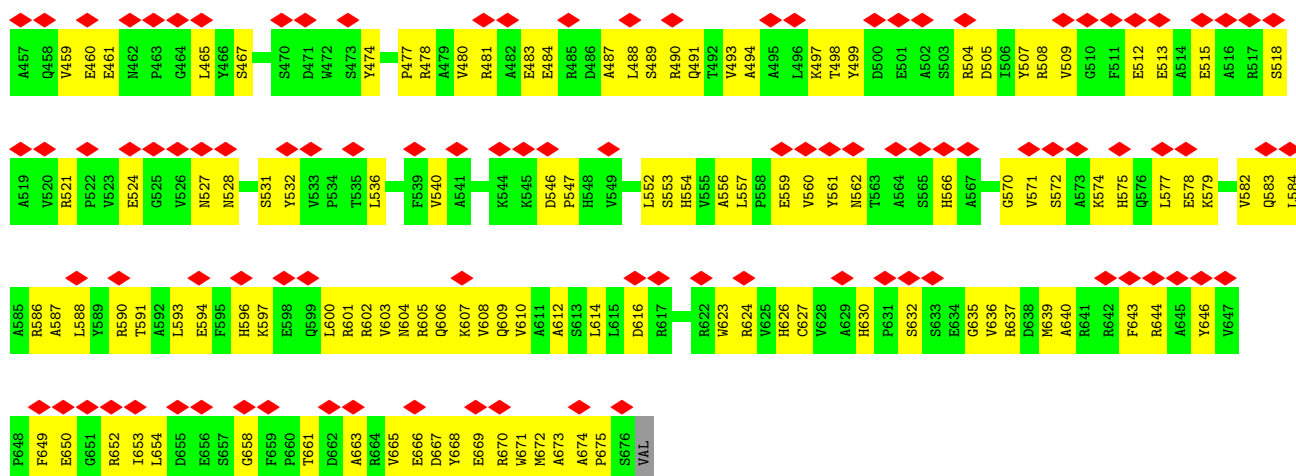


• Molecule 37: bS16m

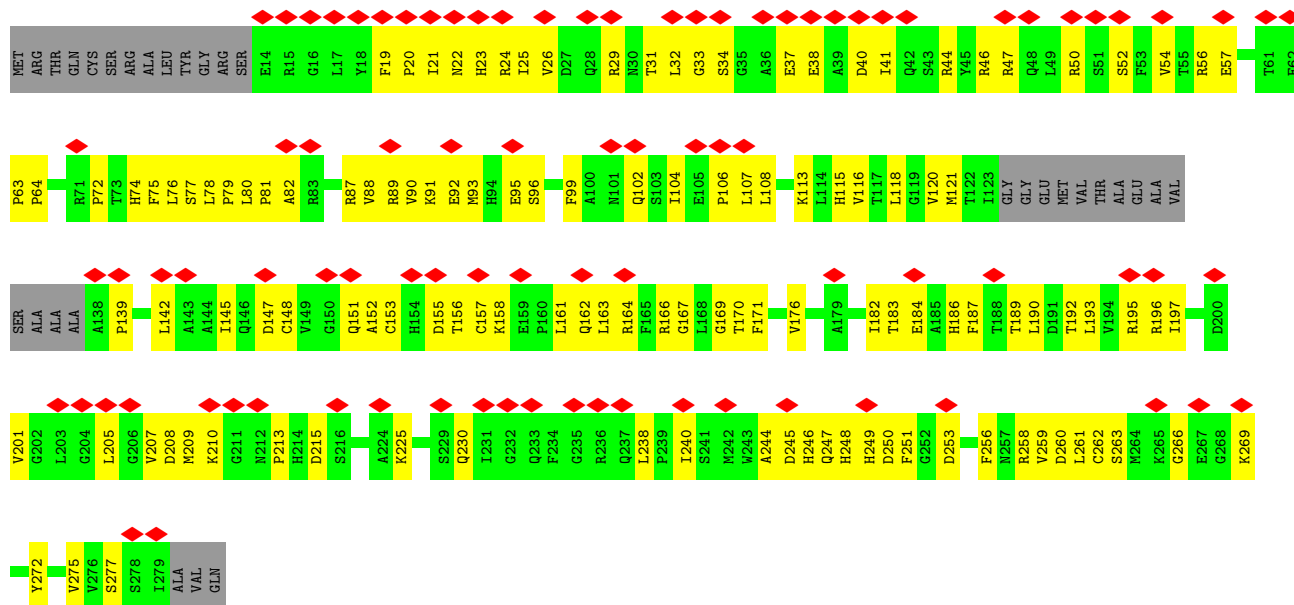


• Molecule 38: mS52

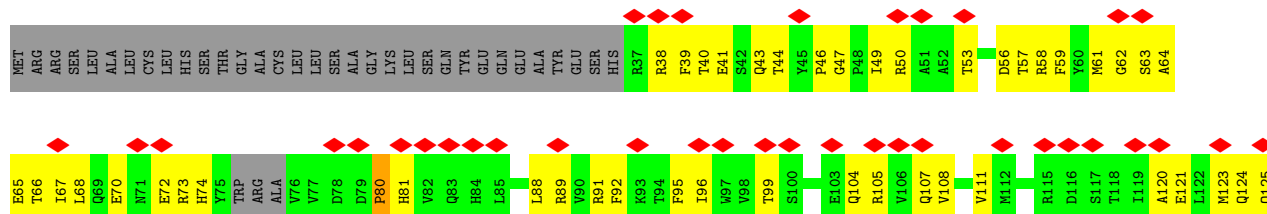


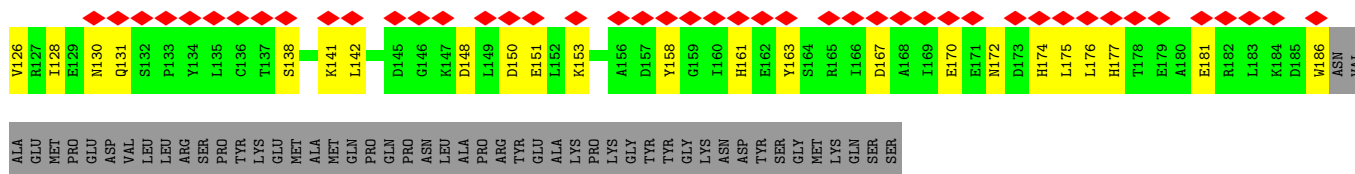


• Molecule 39: AKAP7_NLS domain-containing protein

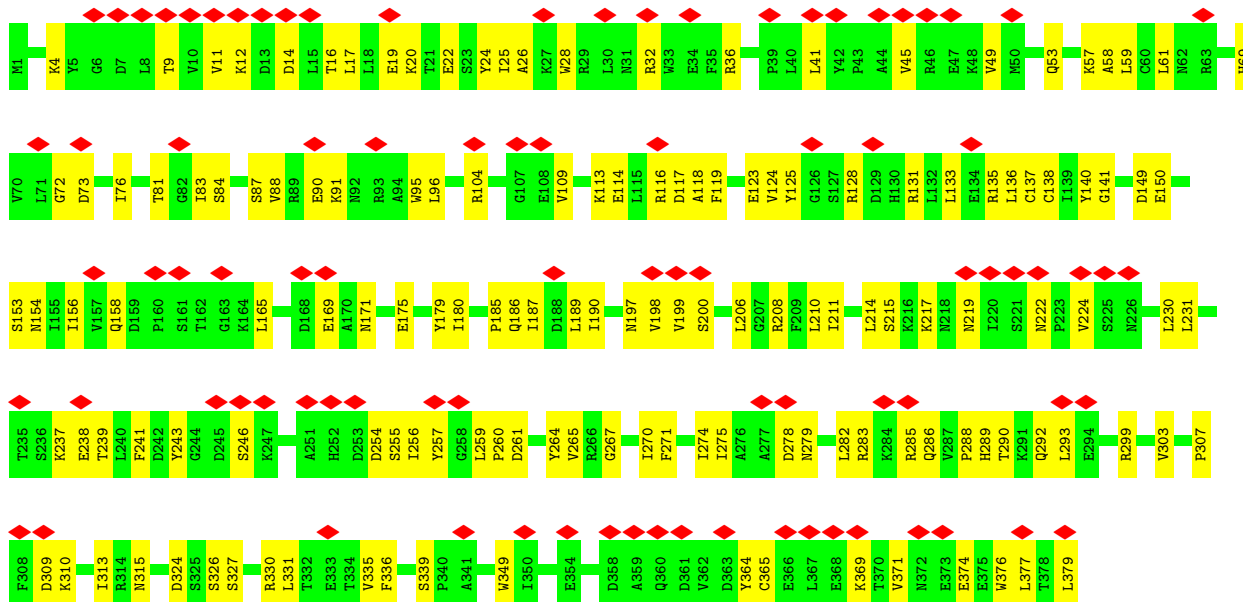


• Molecule 40: Ubiquitin-like domain-containing protein

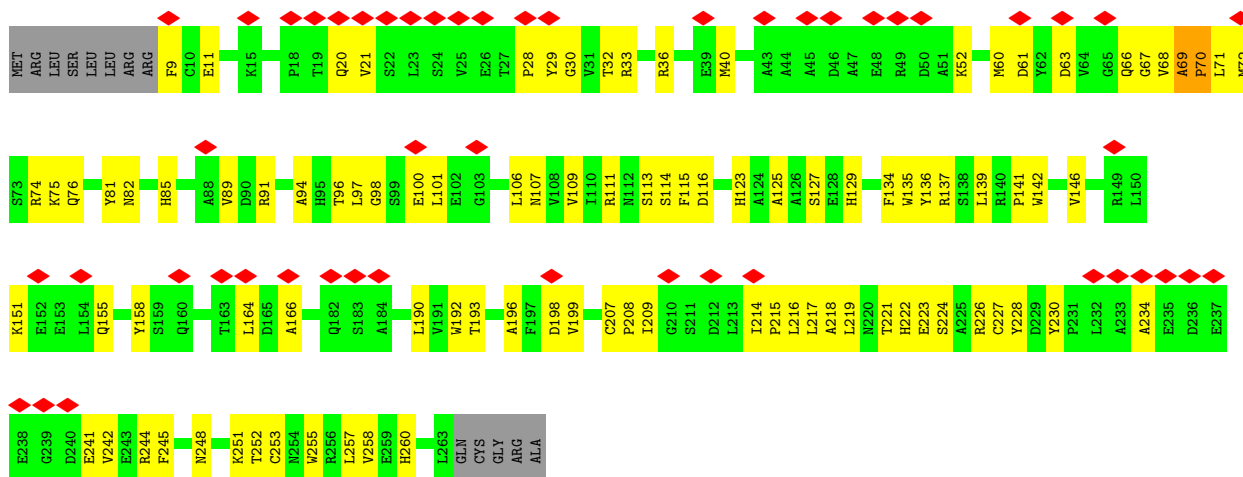




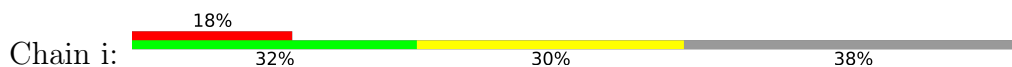
• Molecule 41: mS56

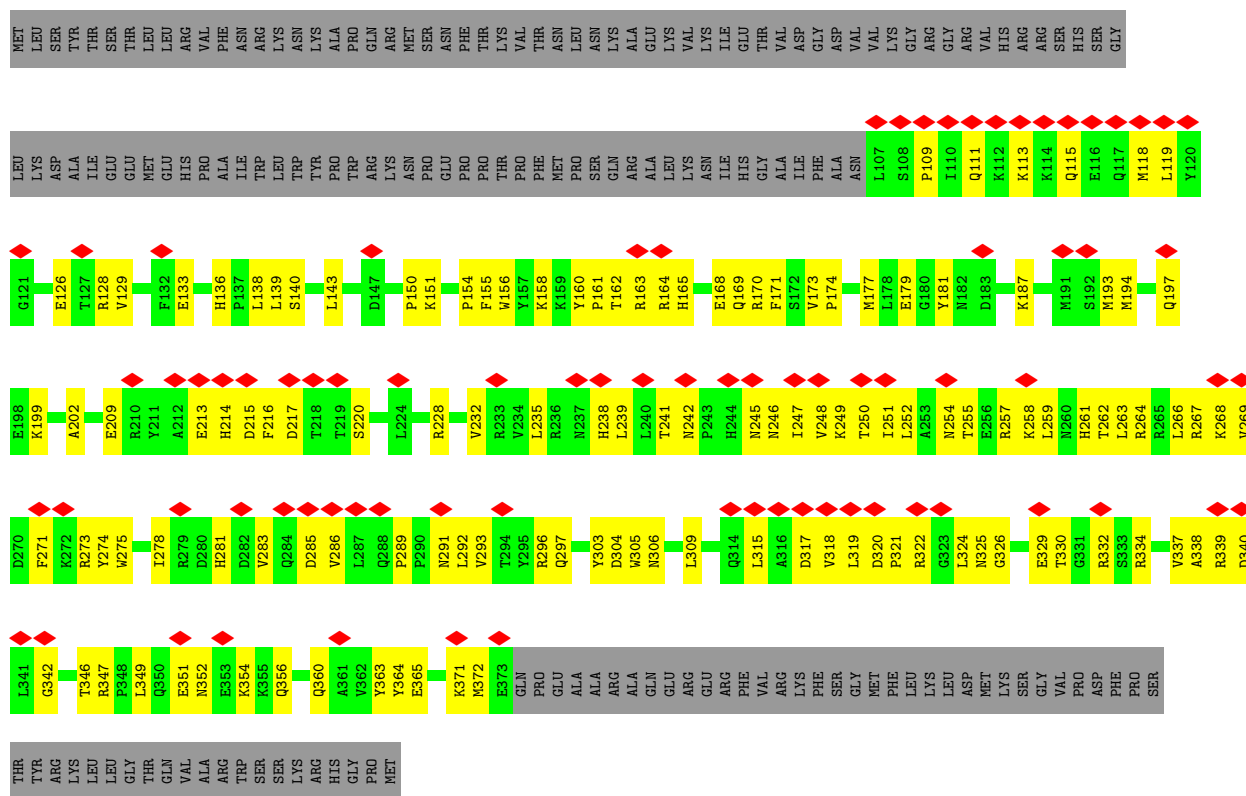


• Molecule 42: Putative superoxide dismutase

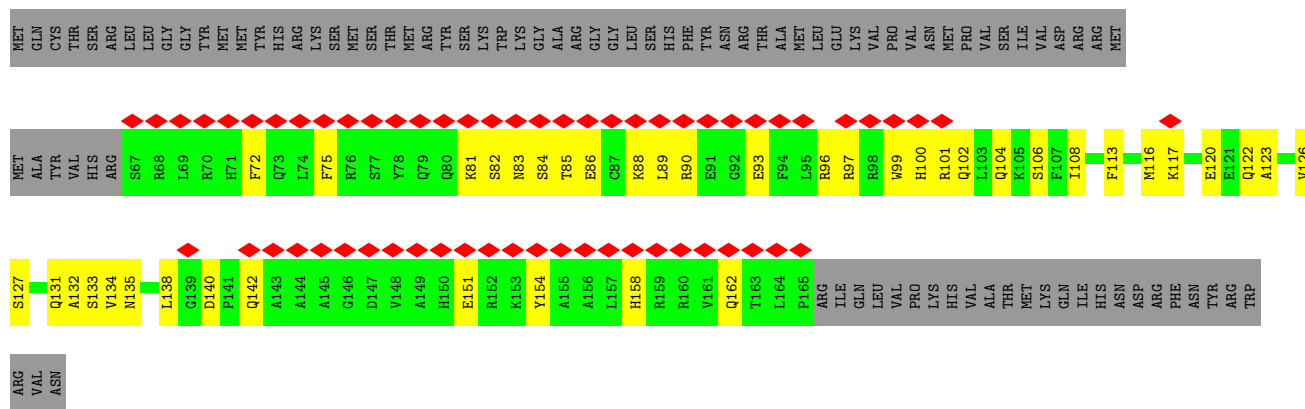
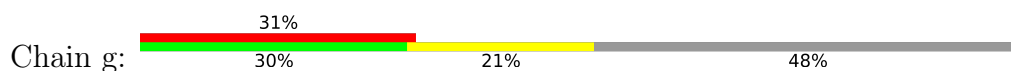


• Molecule 43: uS15m

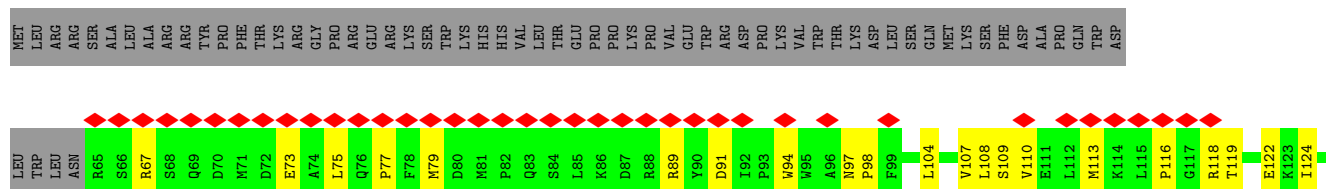


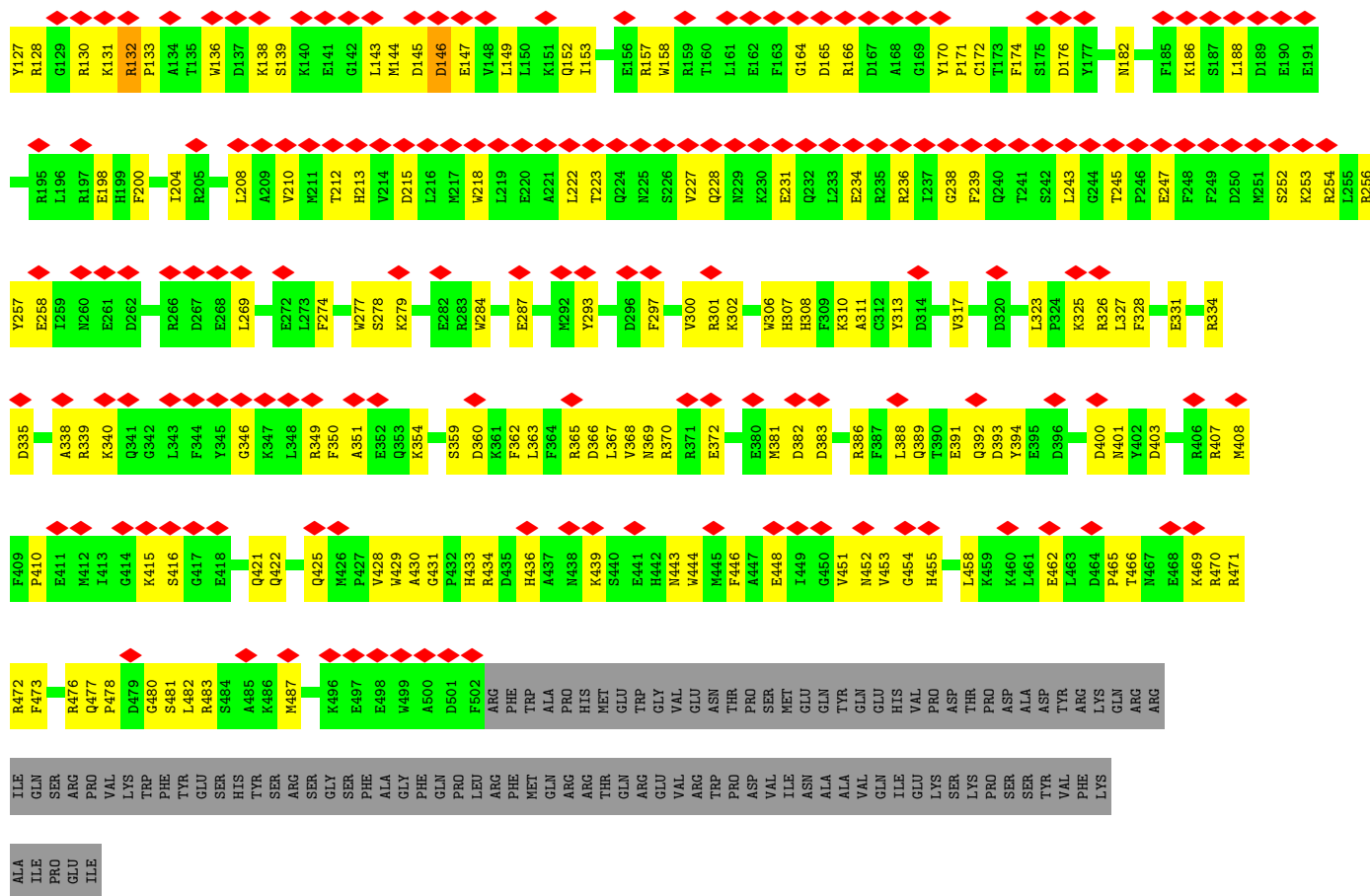


• Molecule 44: bS21m

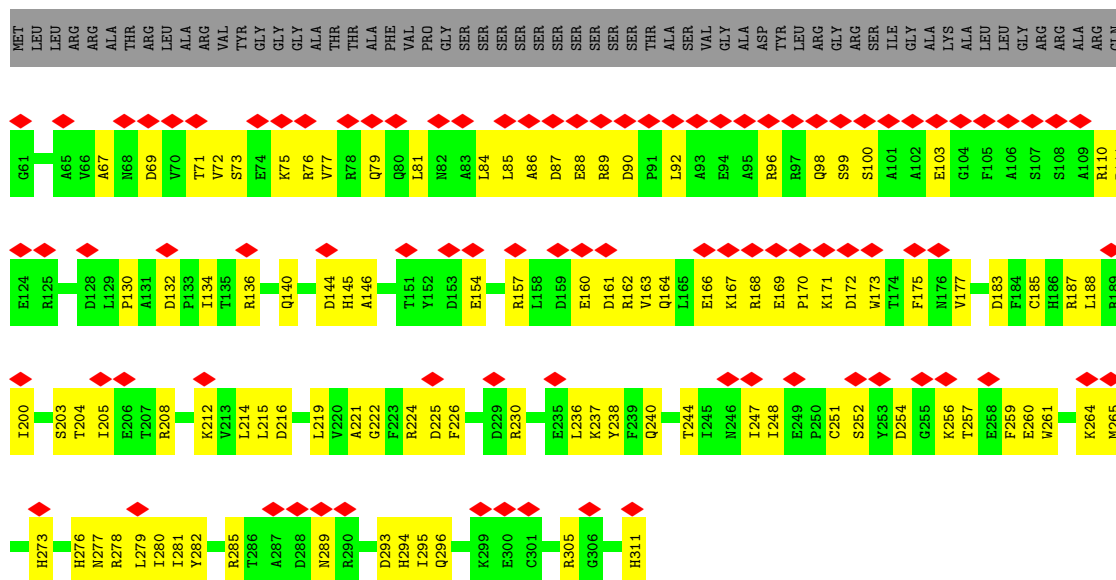
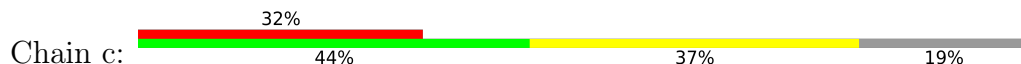


• Molecule 45: mS22

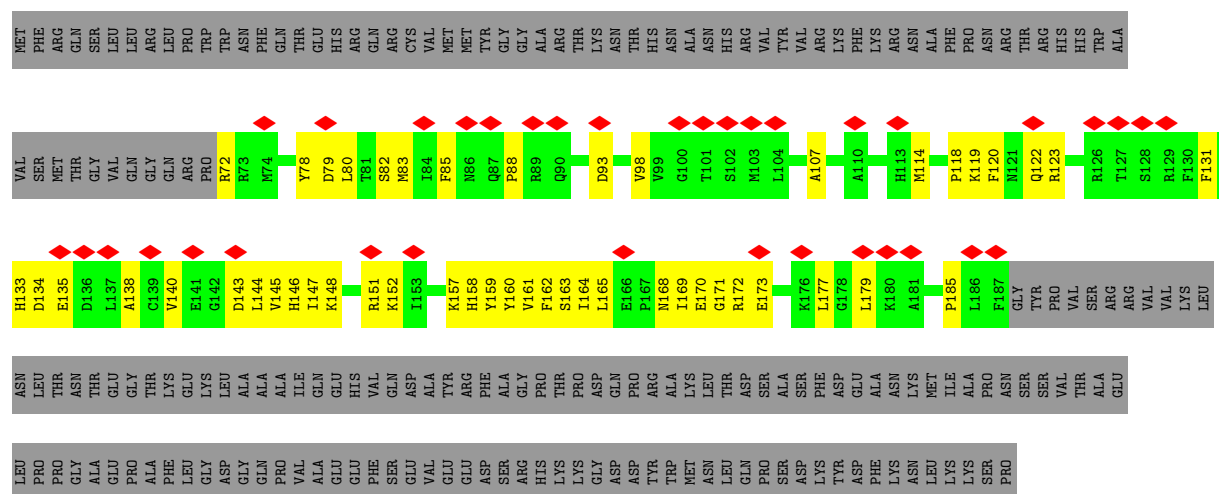




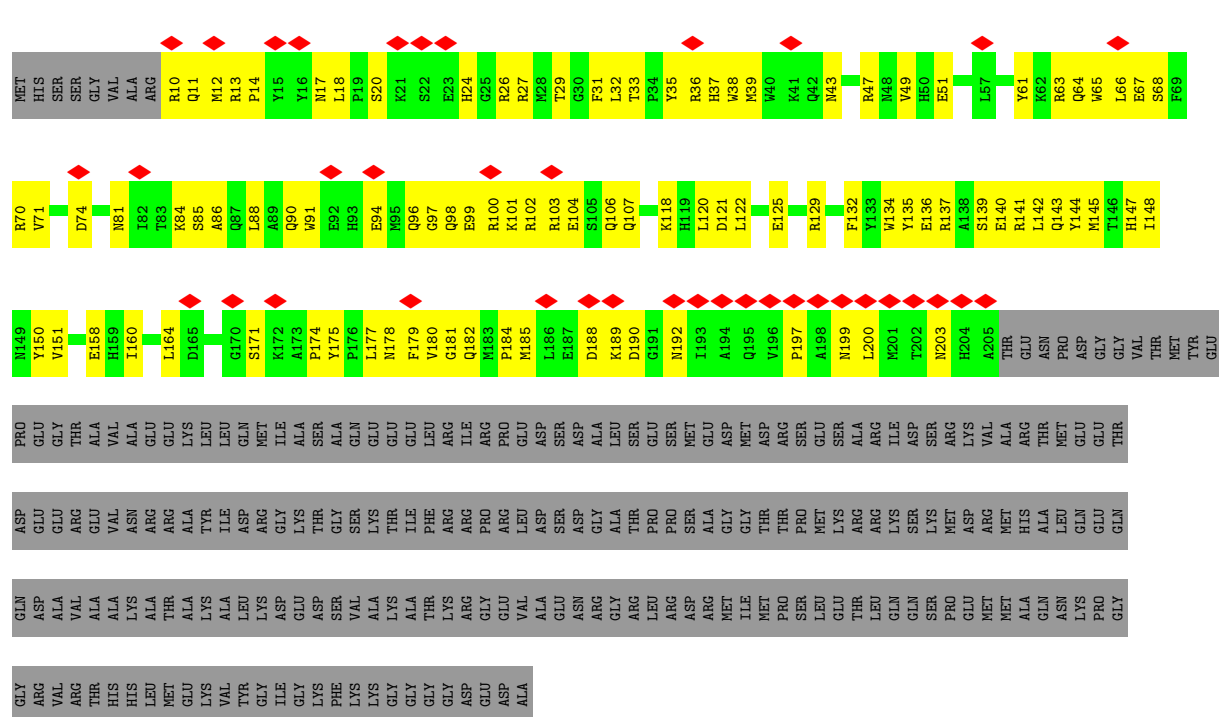
• Molecule 46: uS8m



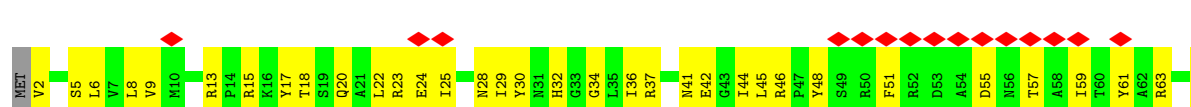
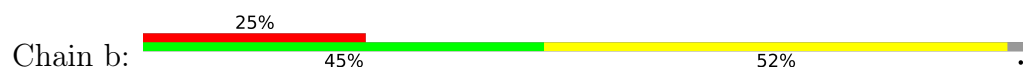
• Molecule 47: 30S Ribosomal protein S17-like protein

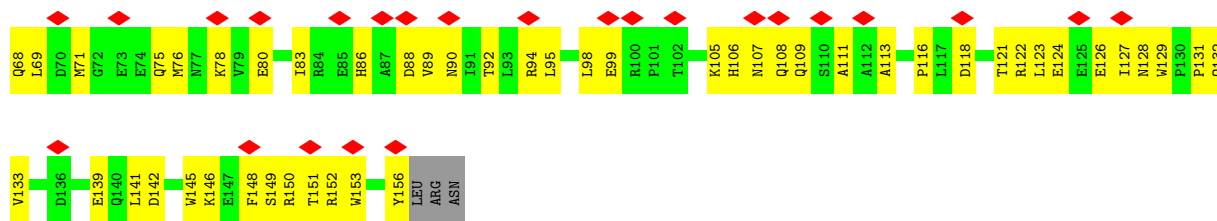


• Molecule 48: mS26

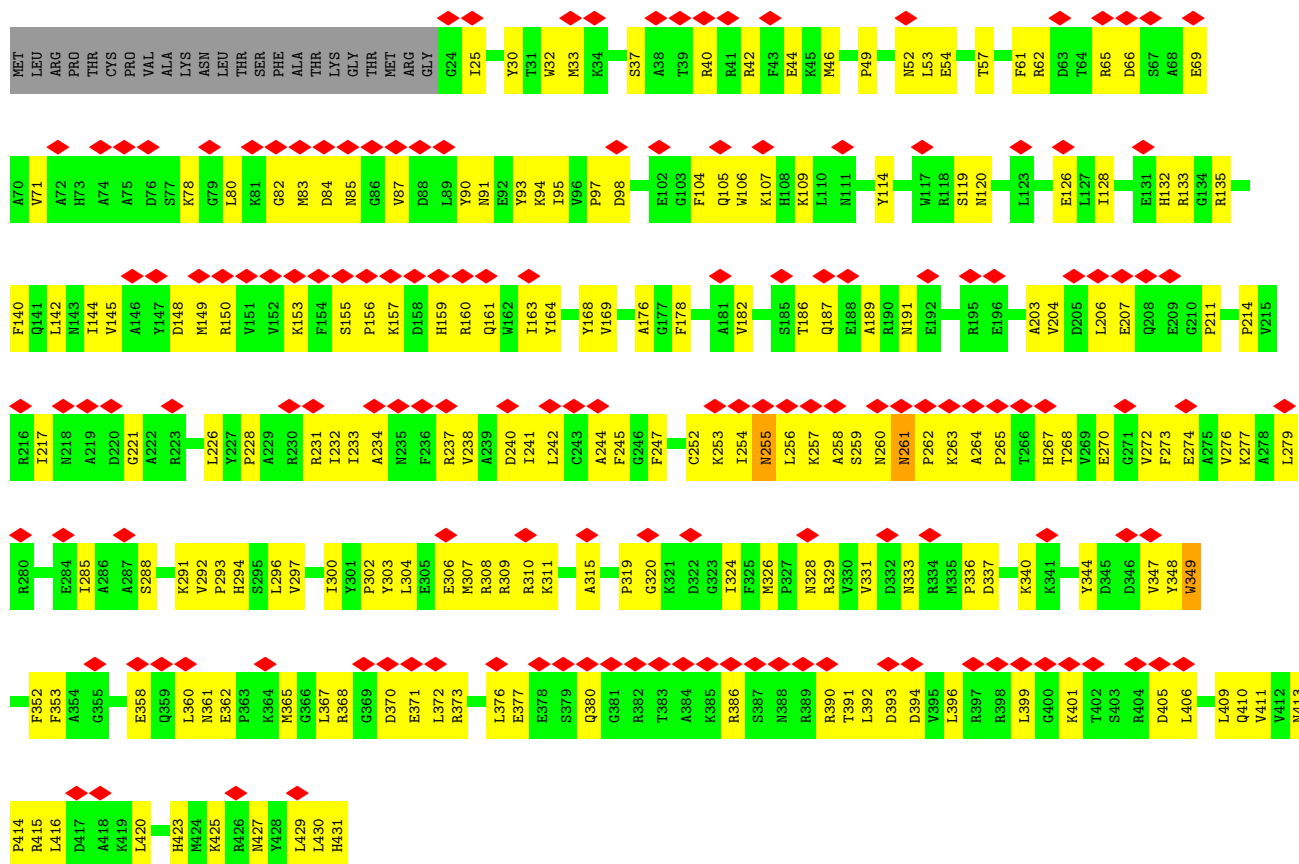


• Molecule 49: bS6m

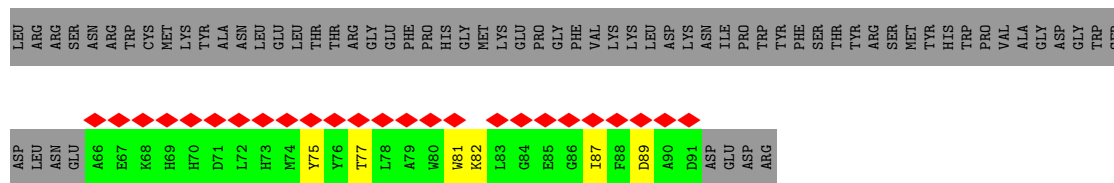




• Molecule 50: Ribosomal_S5_C domain-containing protein



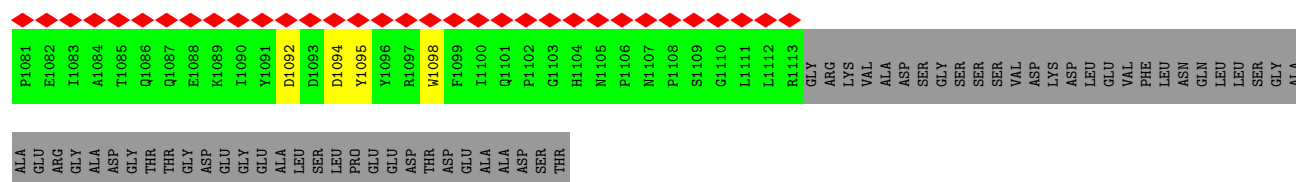
• Molecule 51: mS73



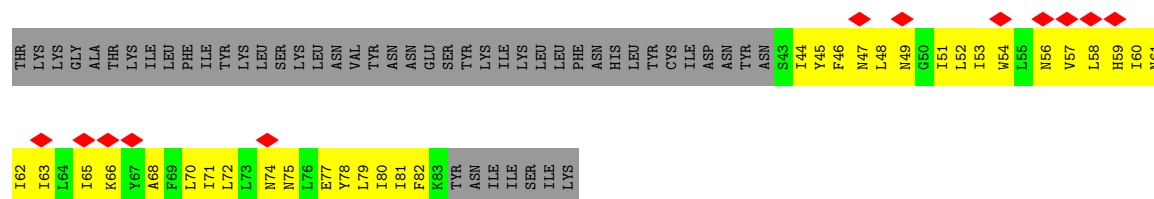
• Molecule 52: mS47



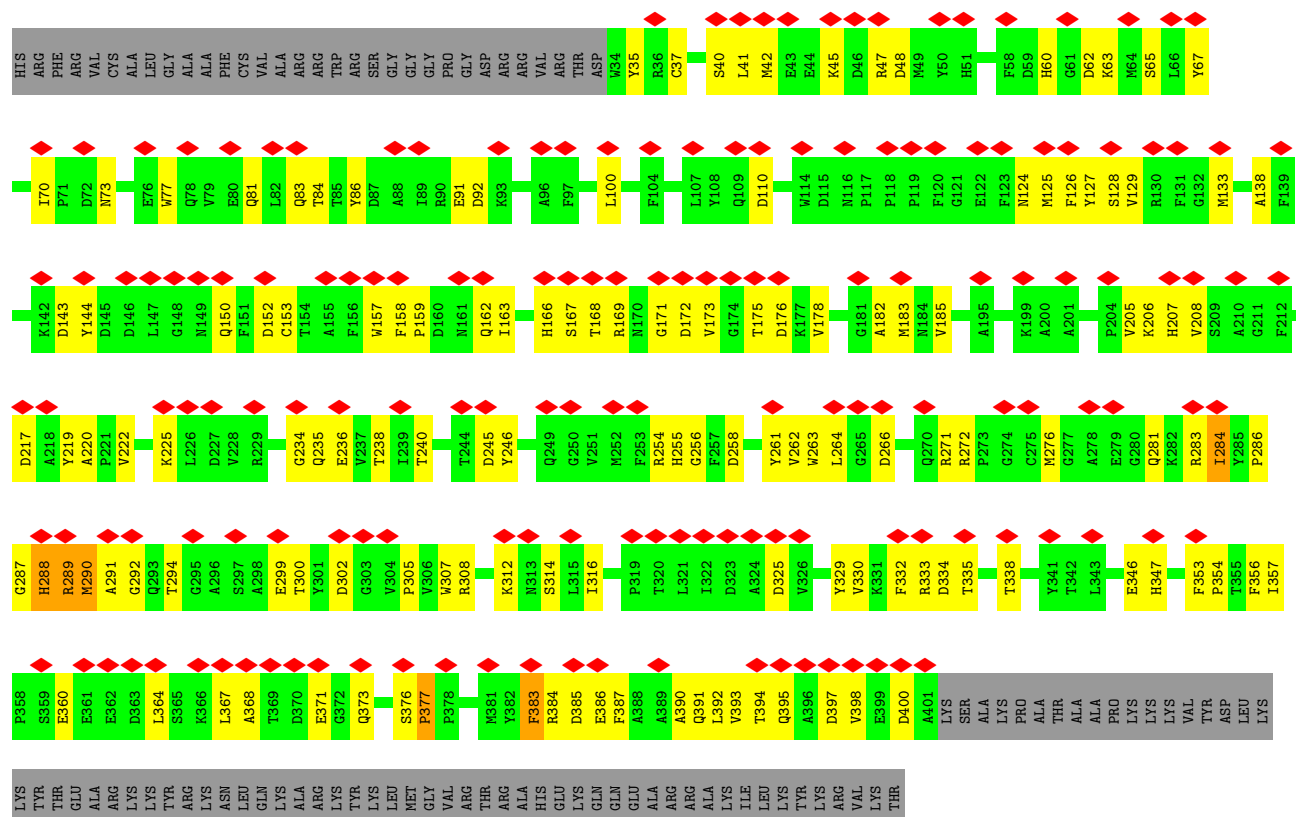




• Molecule 53: uS3m

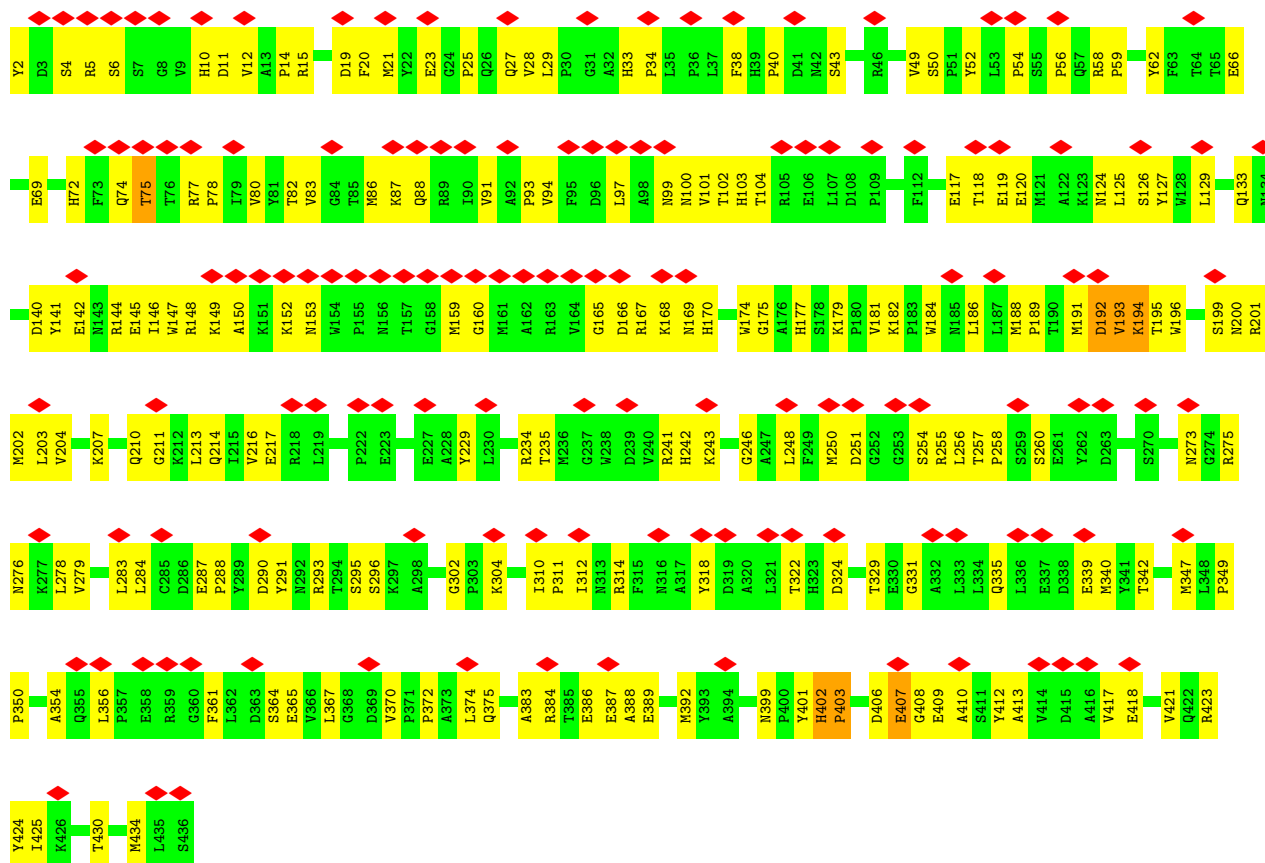


• Molecule 54: Ribosomal protein L3-like protein

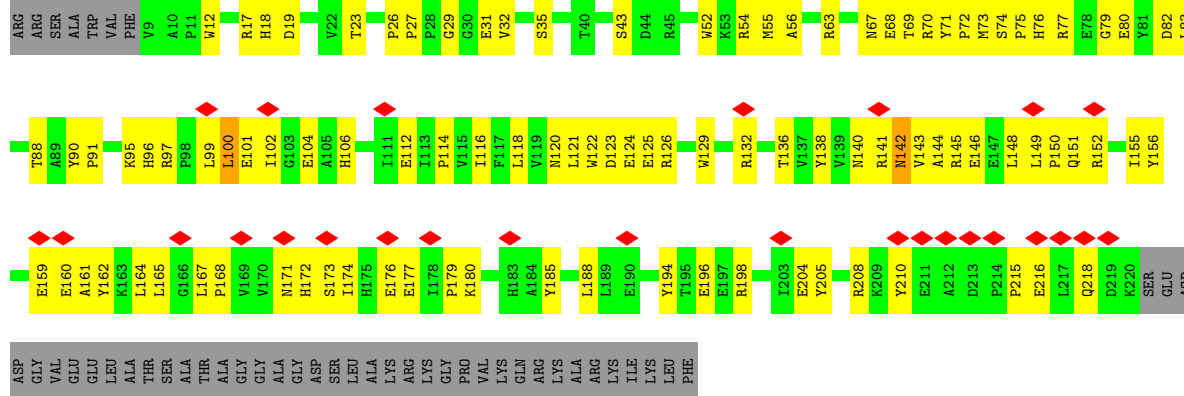
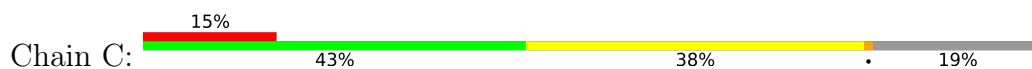


• Molecule 55: uL4m

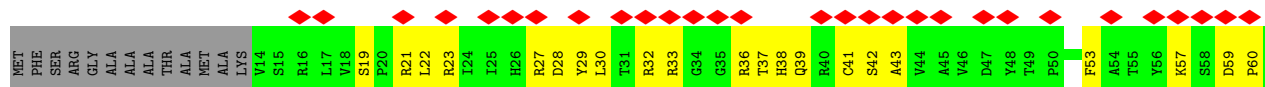


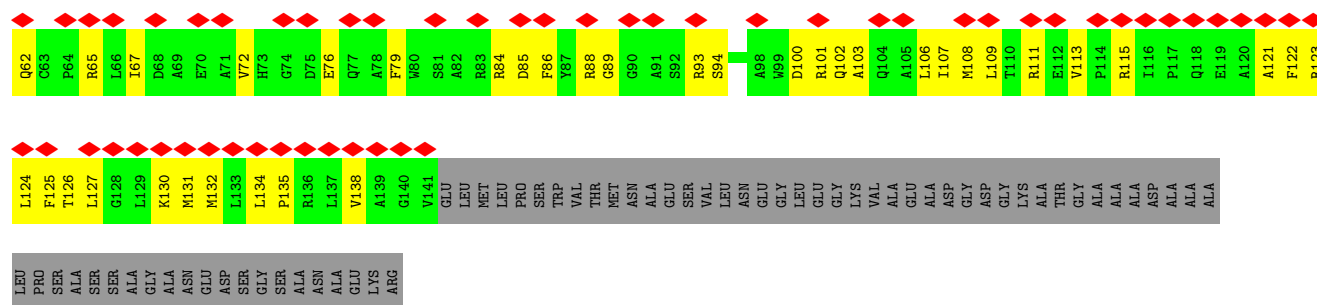


• Molecule 56: RIBOSOMAL_L9 domain-containing protein



• Molecule 57: uL10m

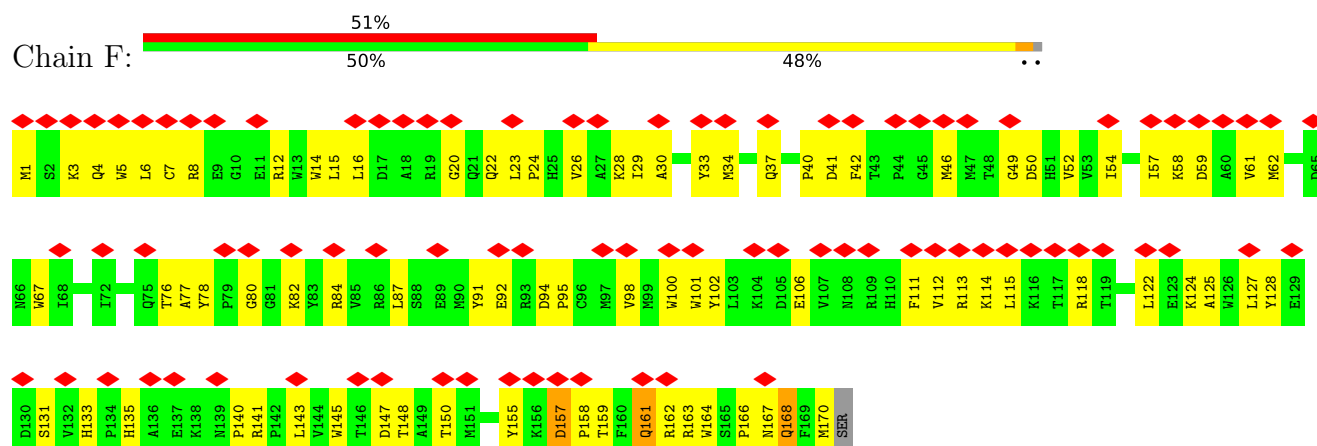




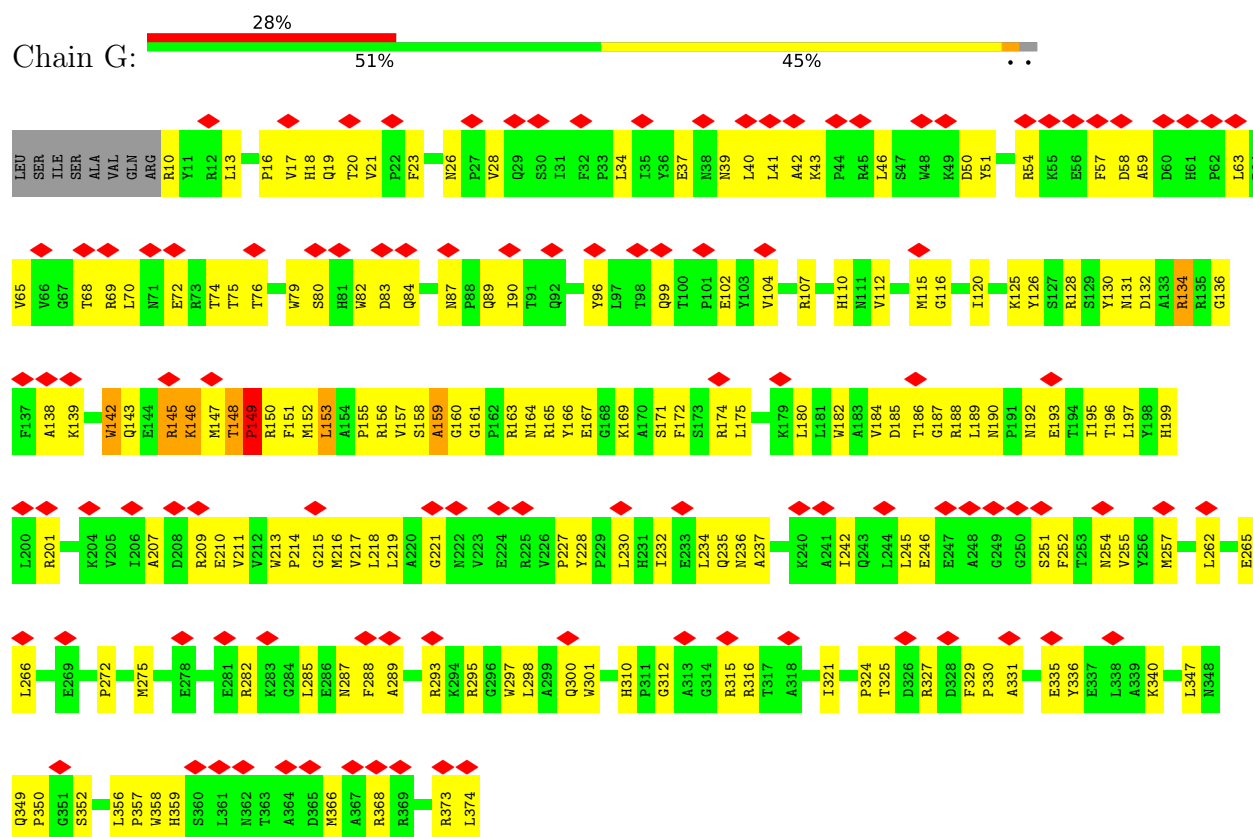
• Molecule 58: Putative ribosomal protein L11



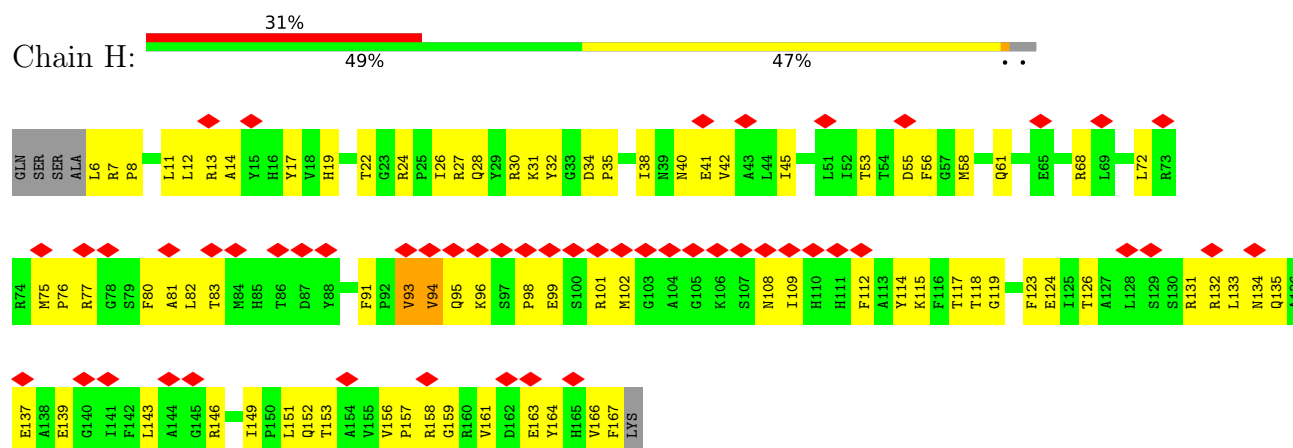
• Molecule 59: 50S ribosomal protein L13-like protein



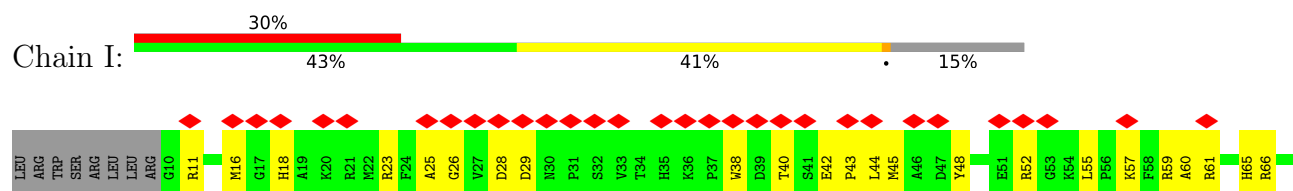
• Molecule 60: Ribosomal_L18e/L15P domain-containing protein

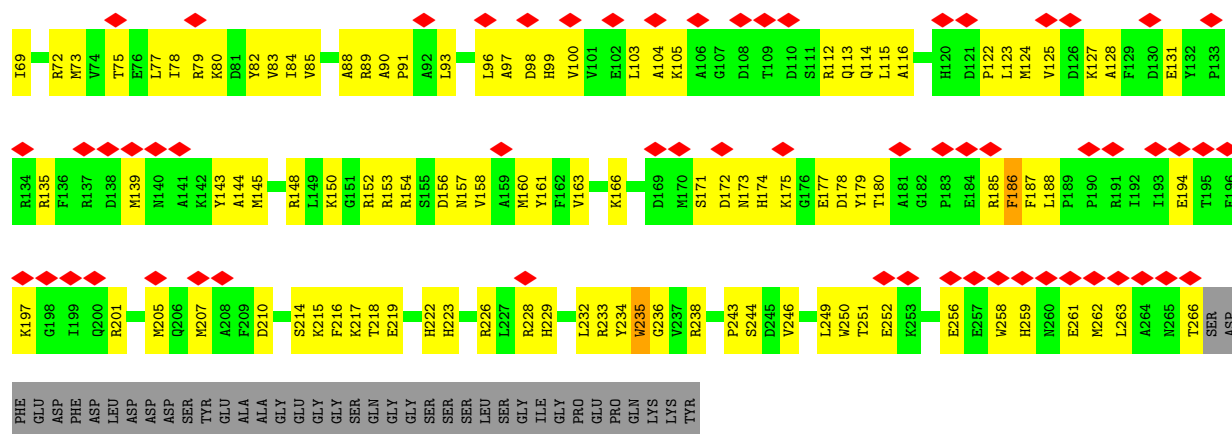


• Molecule 61: Ribosomal_L16 domain-containing protein

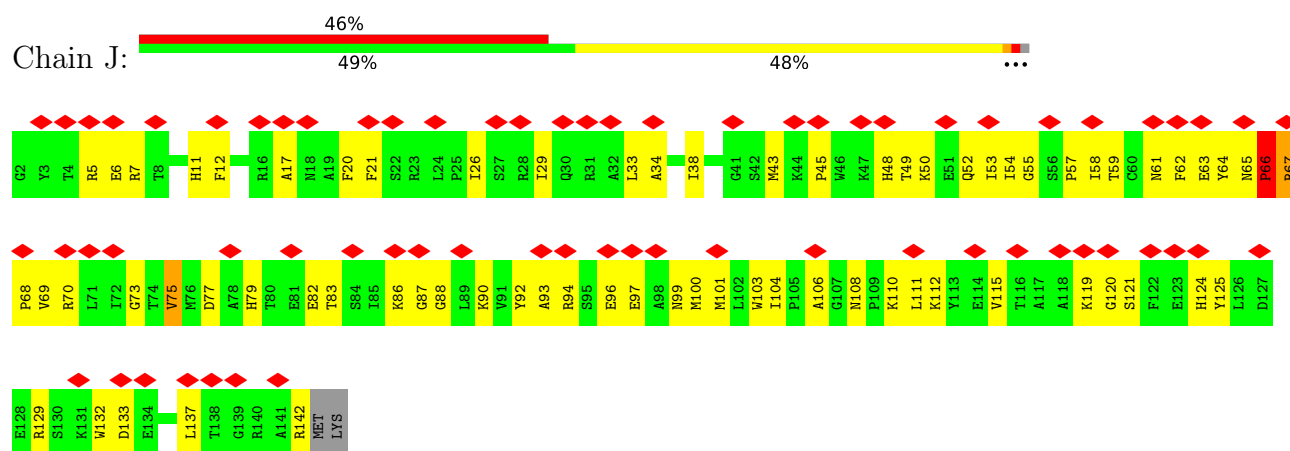


• Molecule 62: Putative 50S ribosomal protein L17

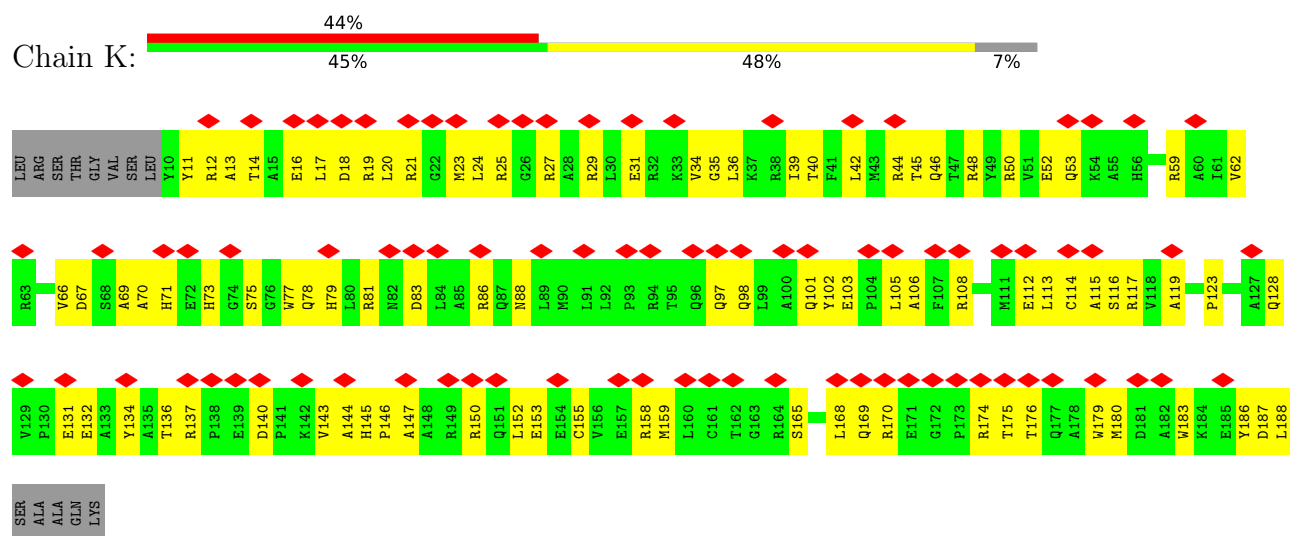




• Molecule 63: bL19m

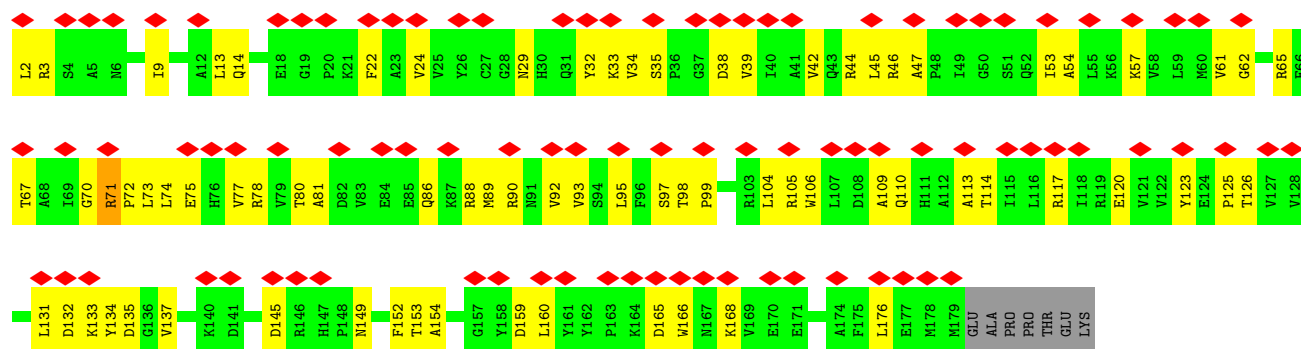


• Molecule 64: bL20m

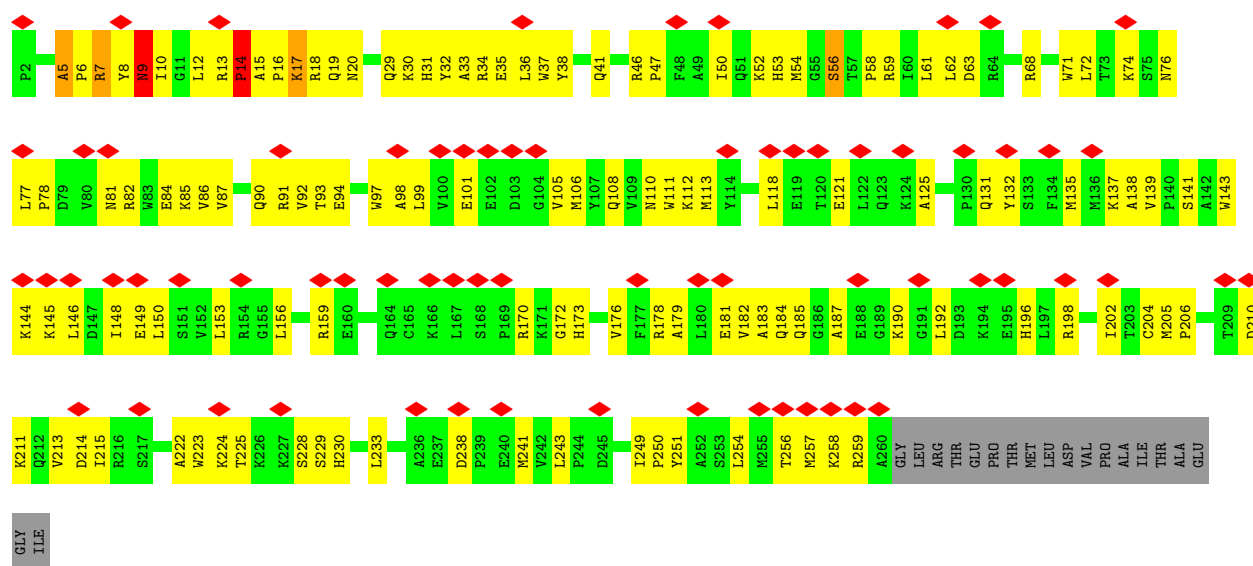


• Molecule 65: bL21m

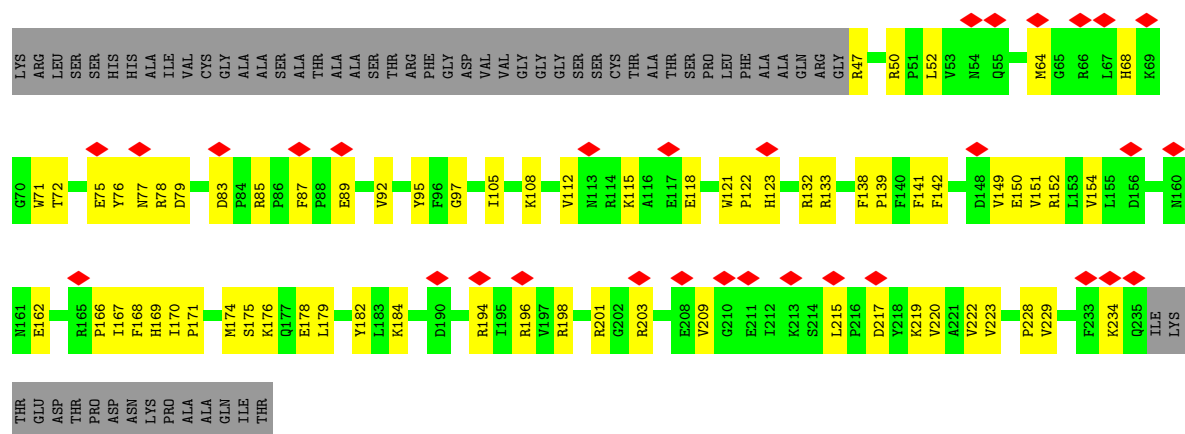




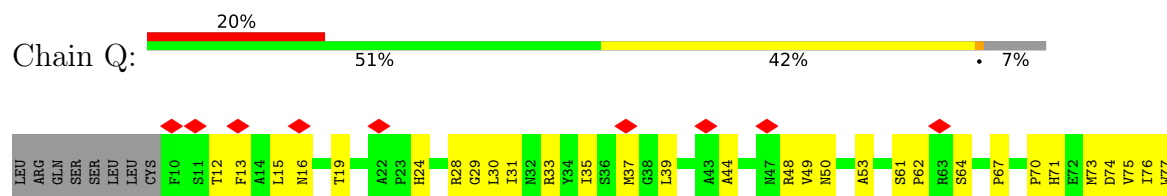
• Molecule 66: uL22m



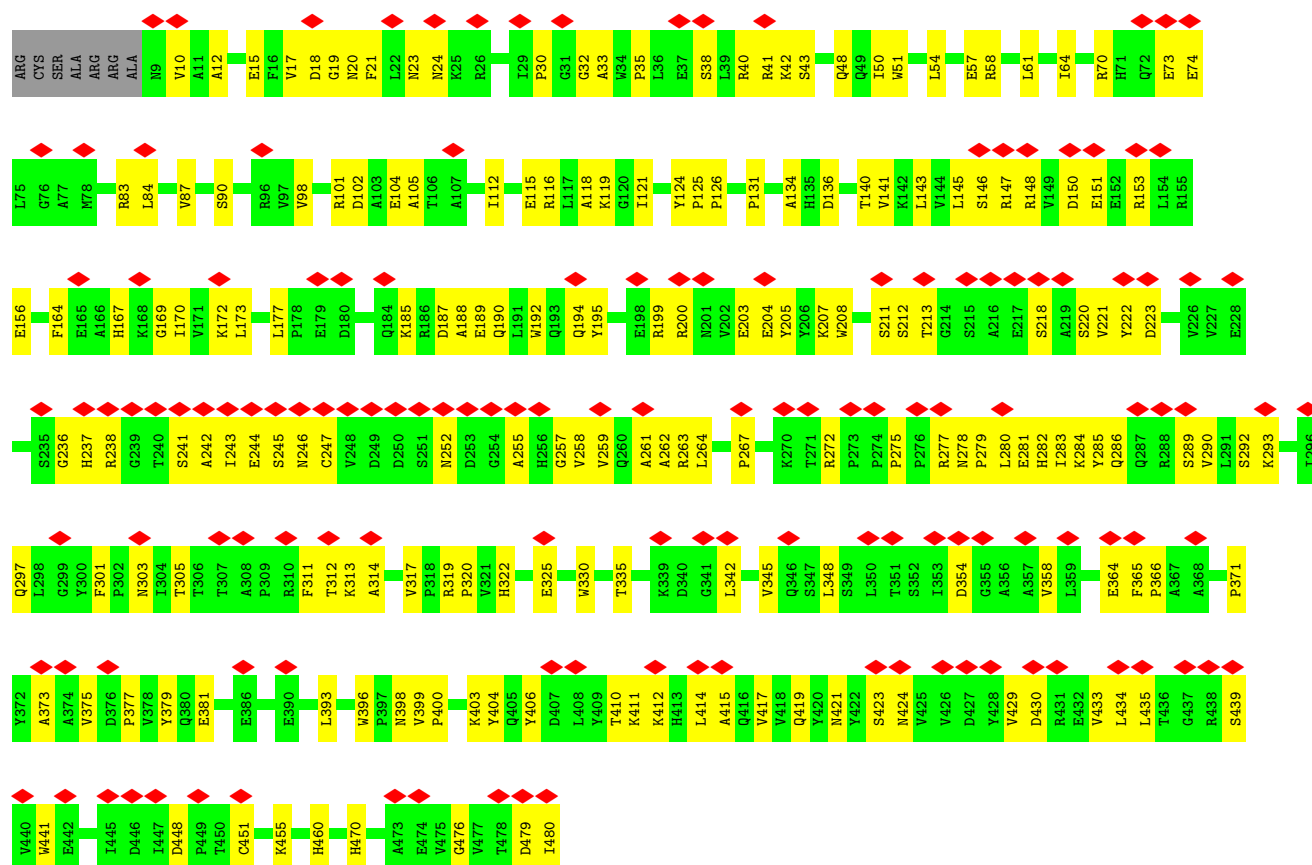
• Molecule 67: uL23m



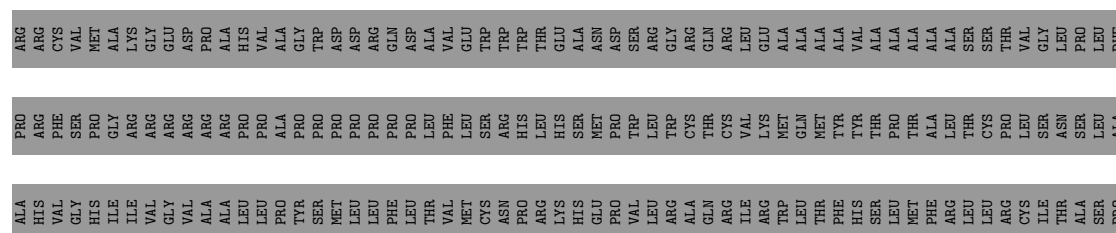
• Molecule 68: uL24m

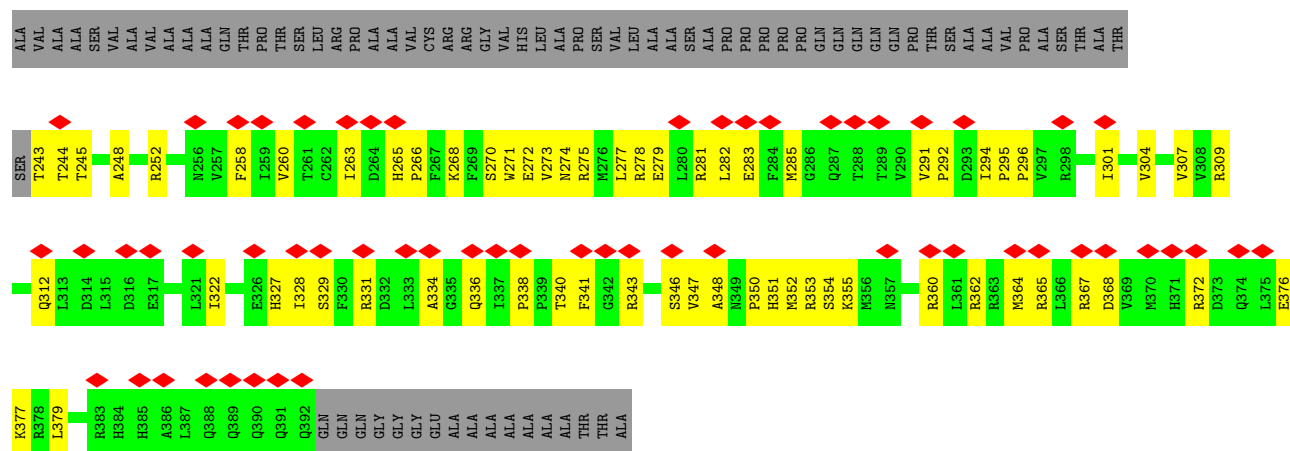


- Molecule 71: uL29m

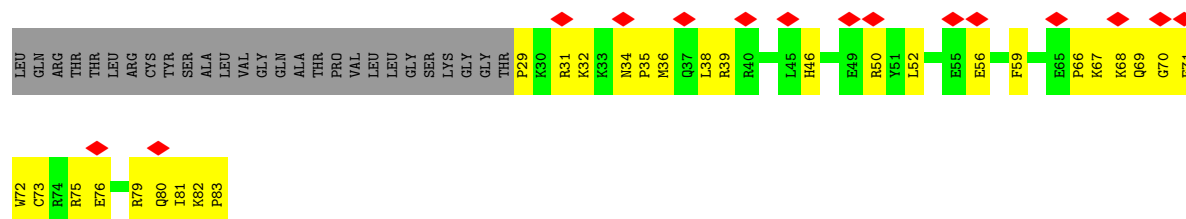


- Molecule 72: uL30m

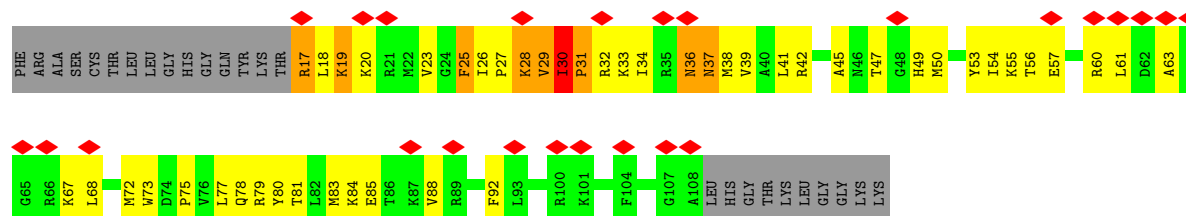




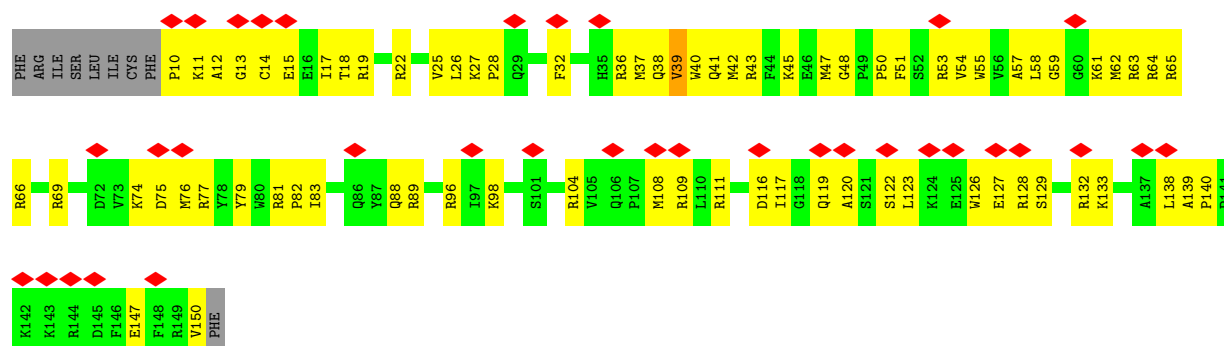
• Molecule 73: bL32m



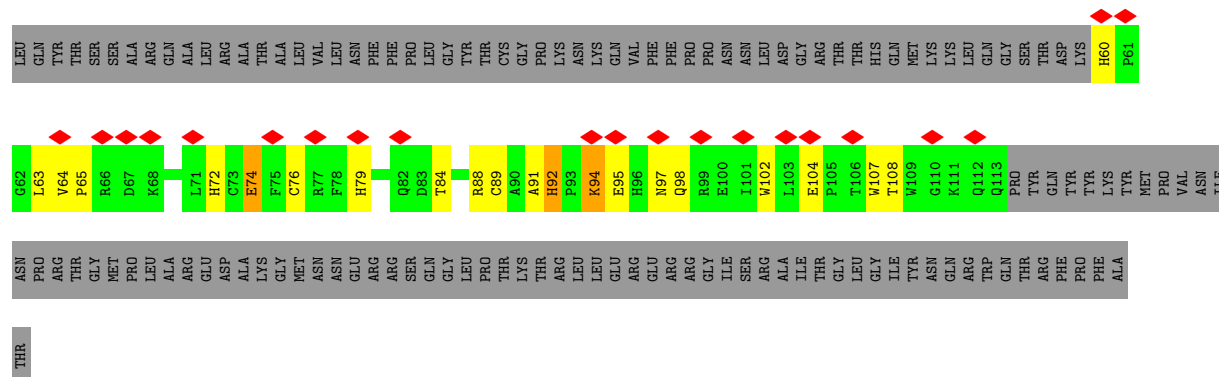
• Molecule 74: bL33m



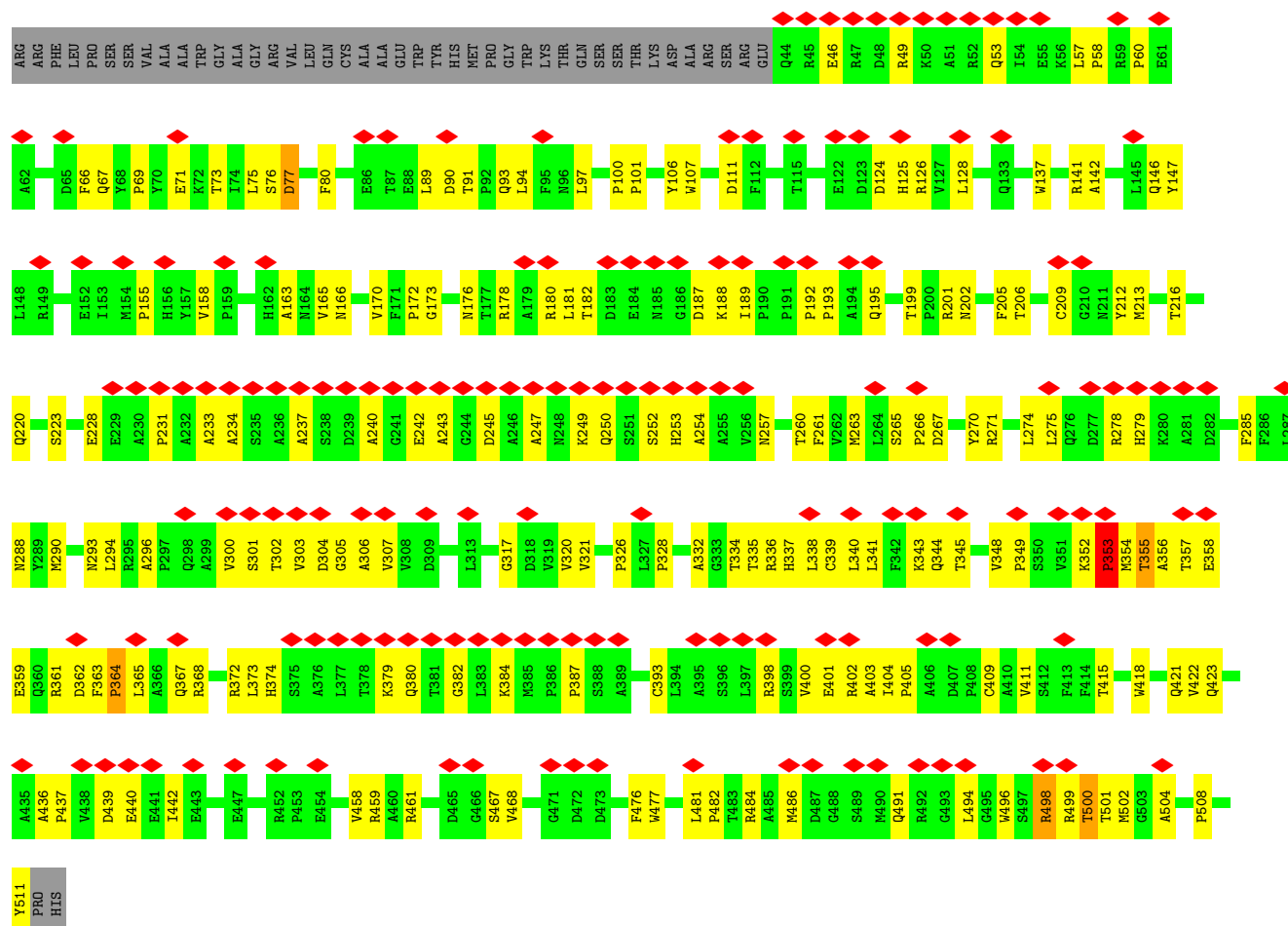
• Molecule 75: bL35m



● Molecule 76: bL36m

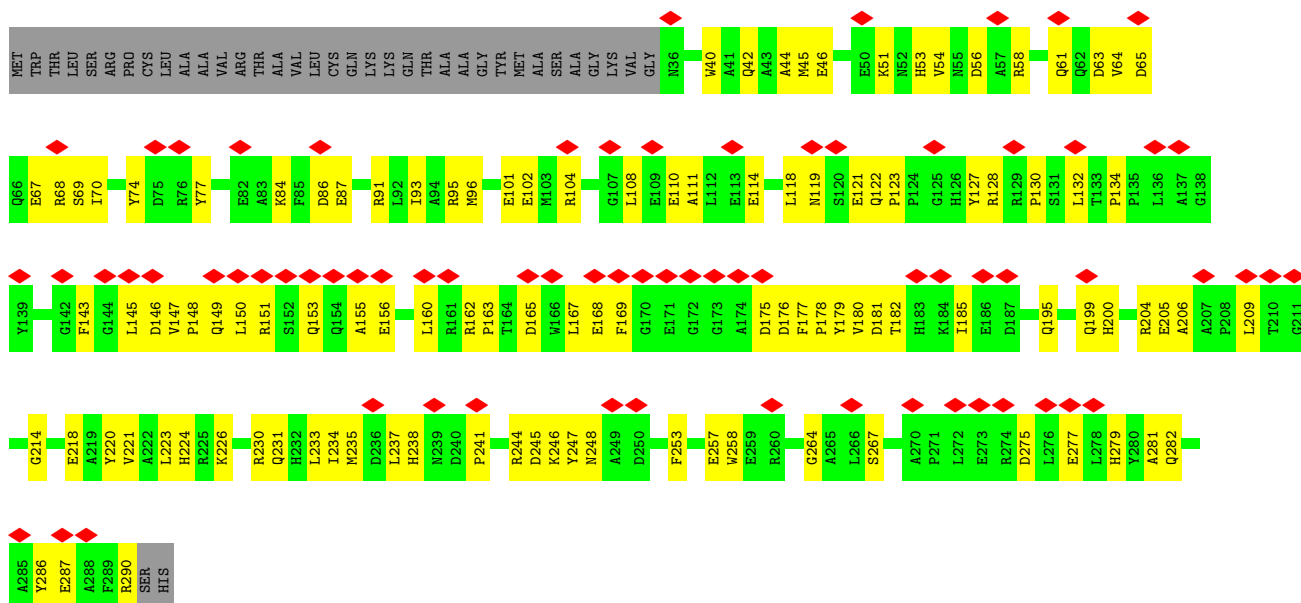
Chain W: 

● Molecule 77: mL38

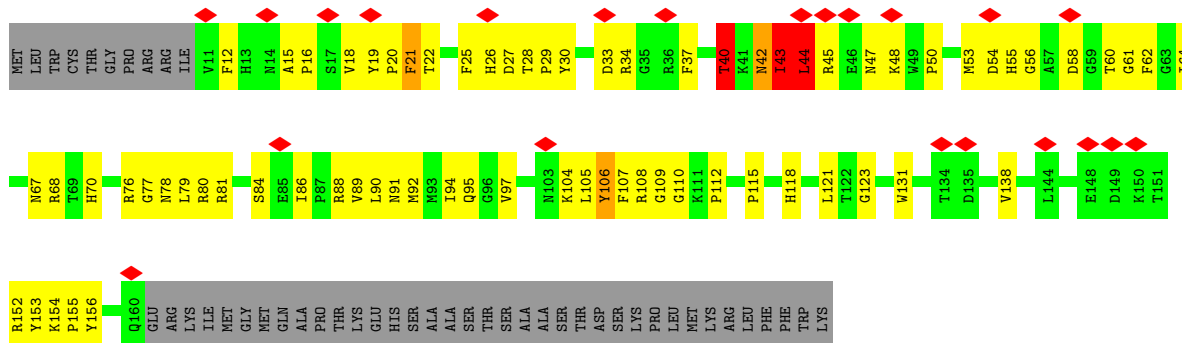
Chain X: 

● Molecule 78: mL40

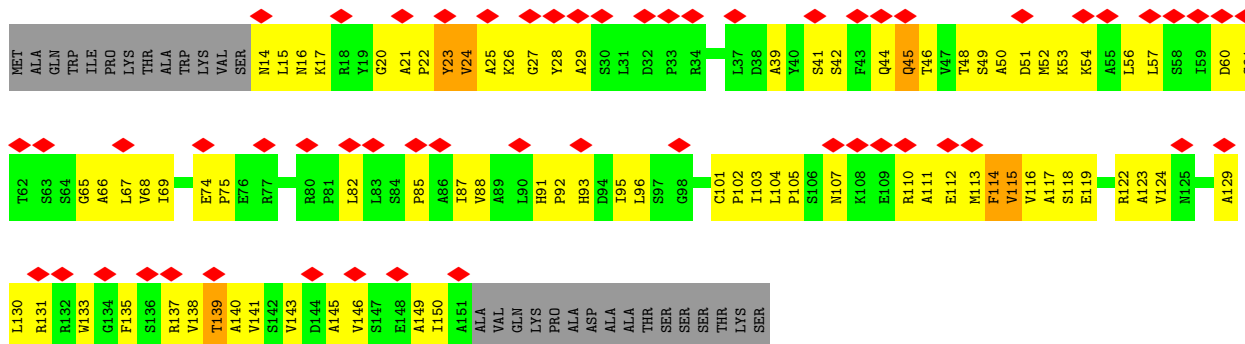
Chain Y: 



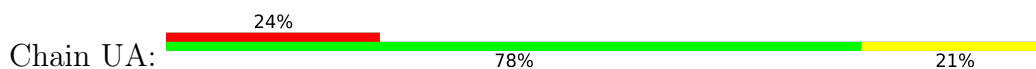
• Molecule 79: mL41

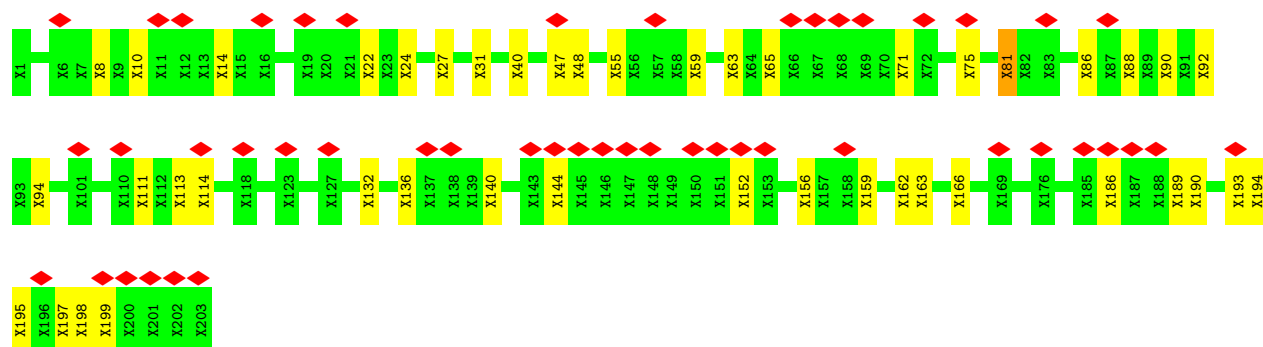


• Molecule 80: mL94

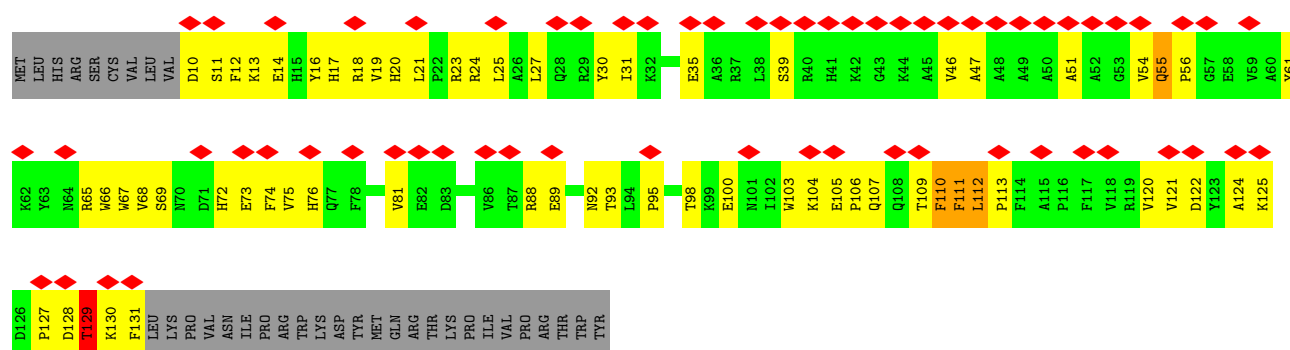
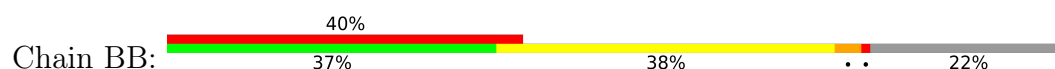


• Molecule 81: UA

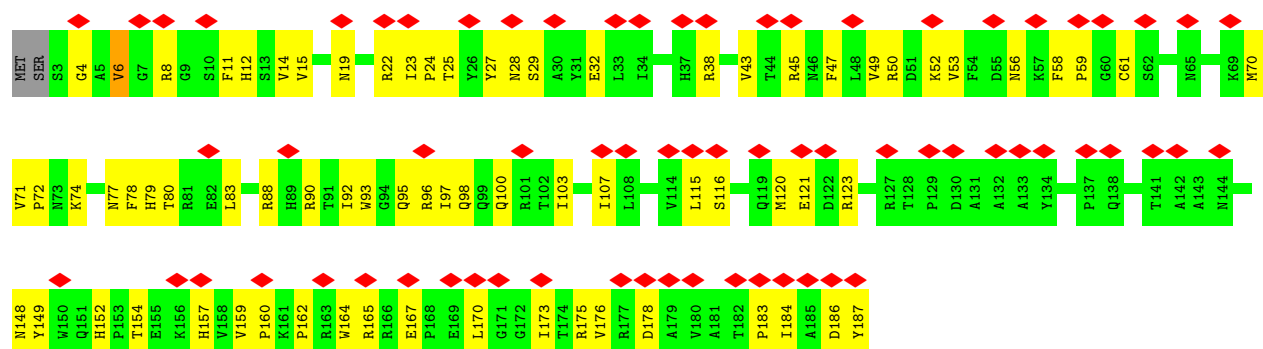
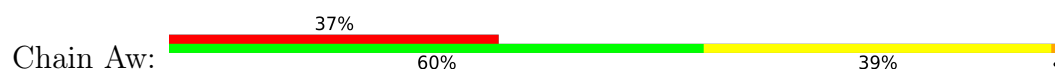




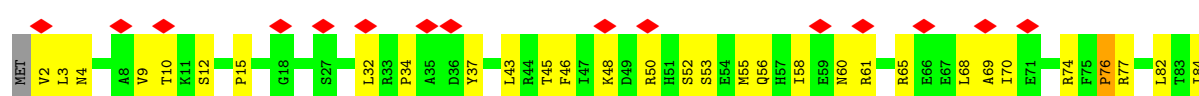
• Molecule 82: mL95

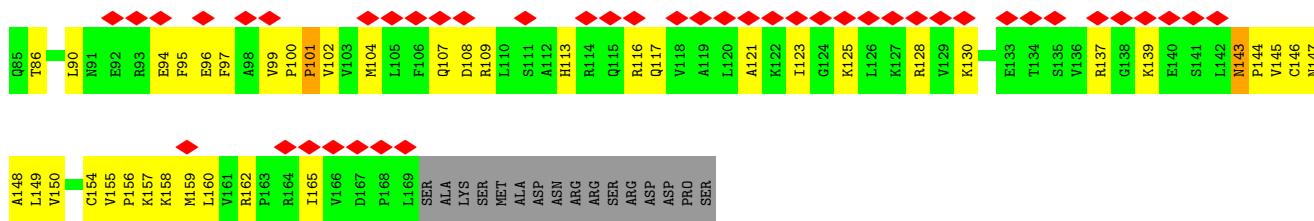


• Molecule 83: mL89

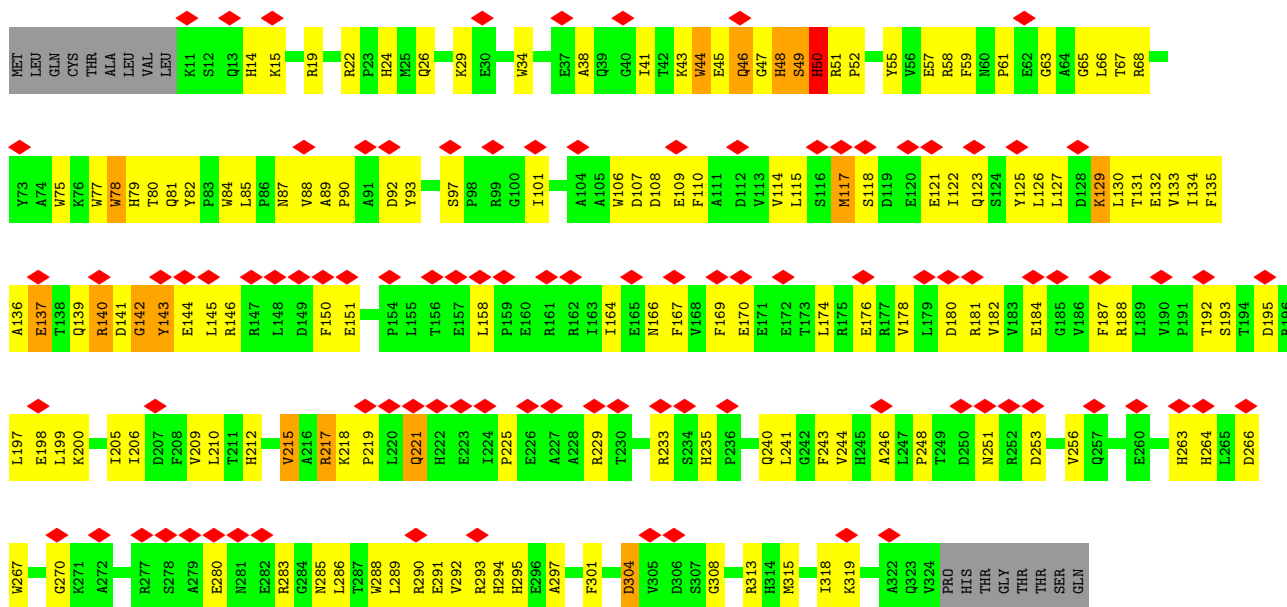


• Molecule 84: bL31m

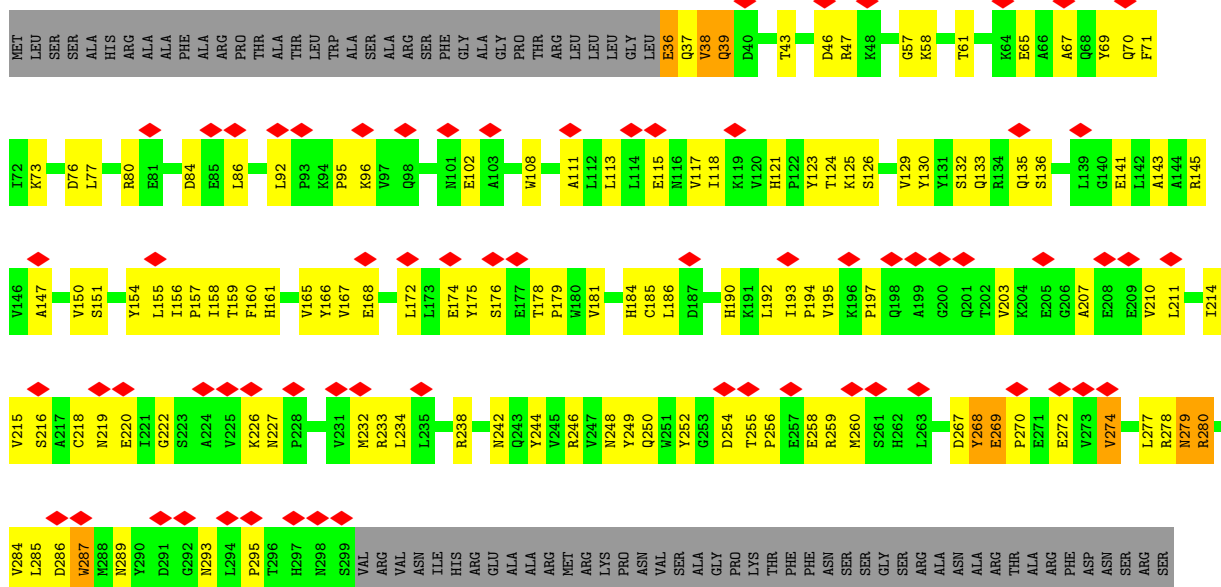




• Molecule 85: mL76

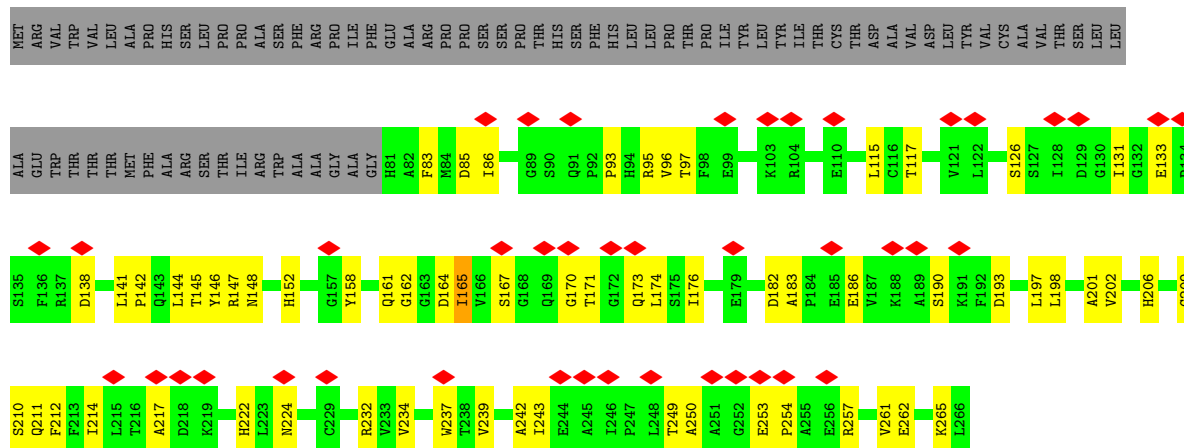


• Molecule 86: mL74

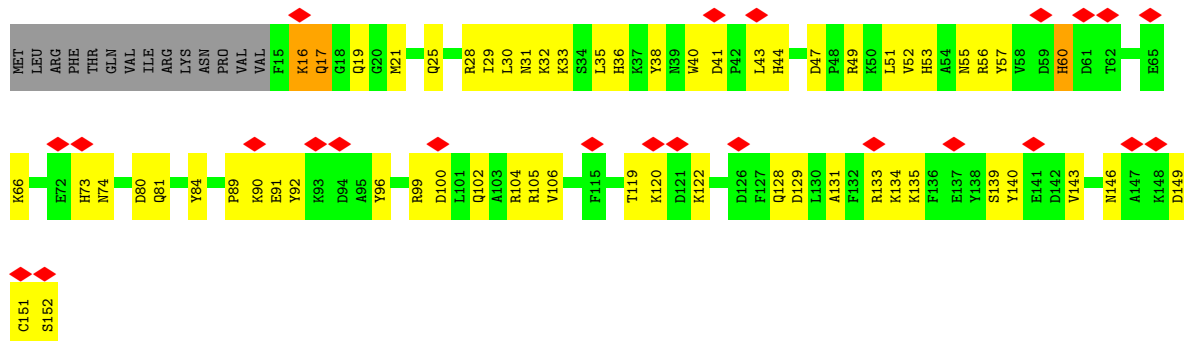


SER
GLN
SER

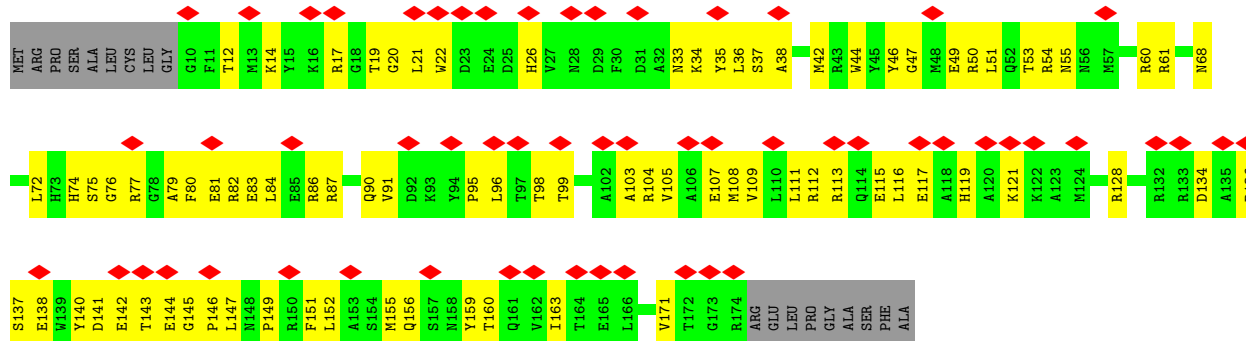
• Molecule 87: Peptidyl-prolyl cis-trans isomerase



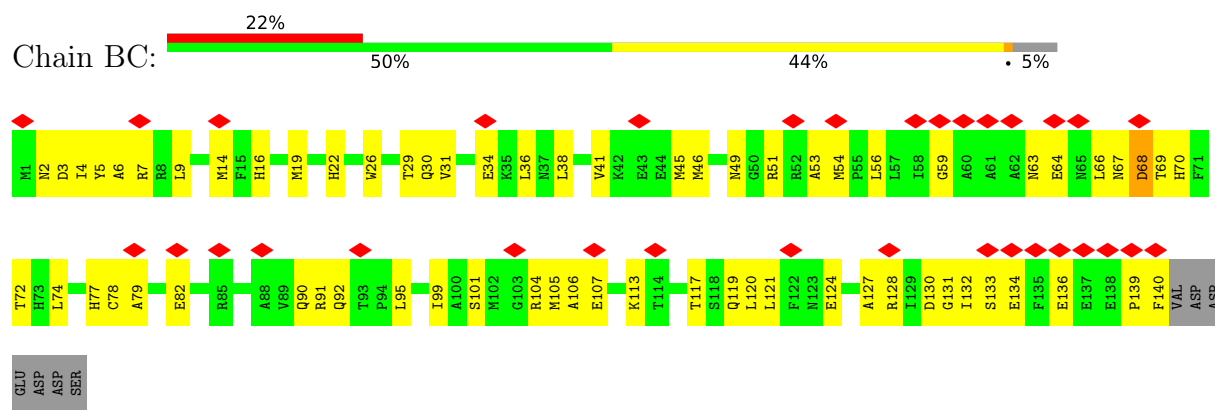
• Molecule 88: mL93



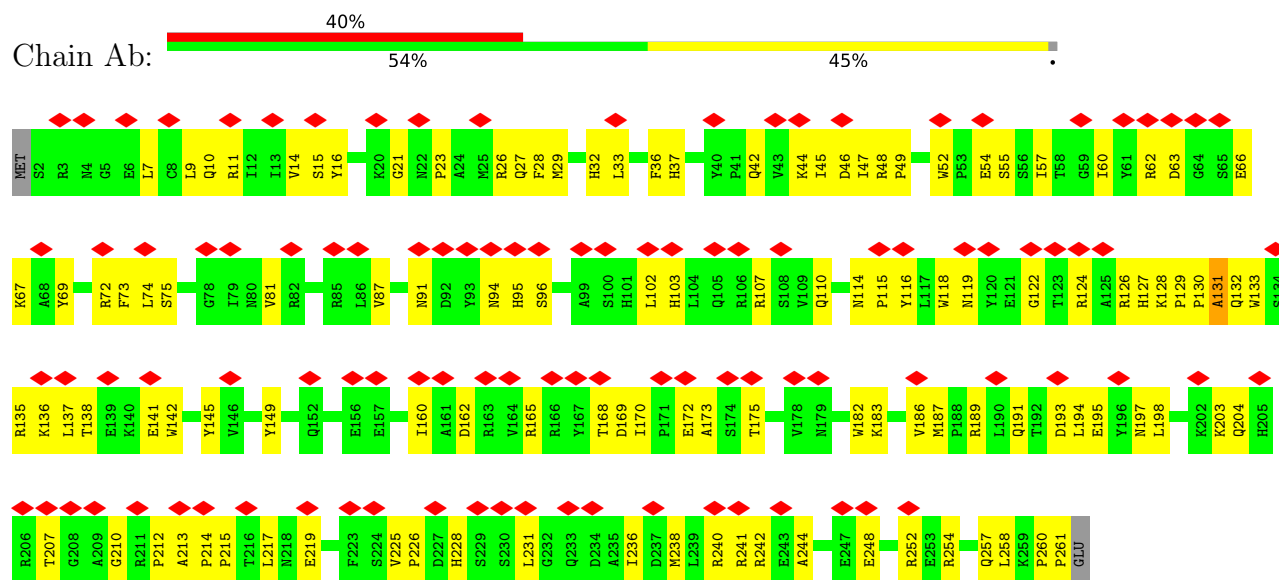
• Molecule 89: mL86



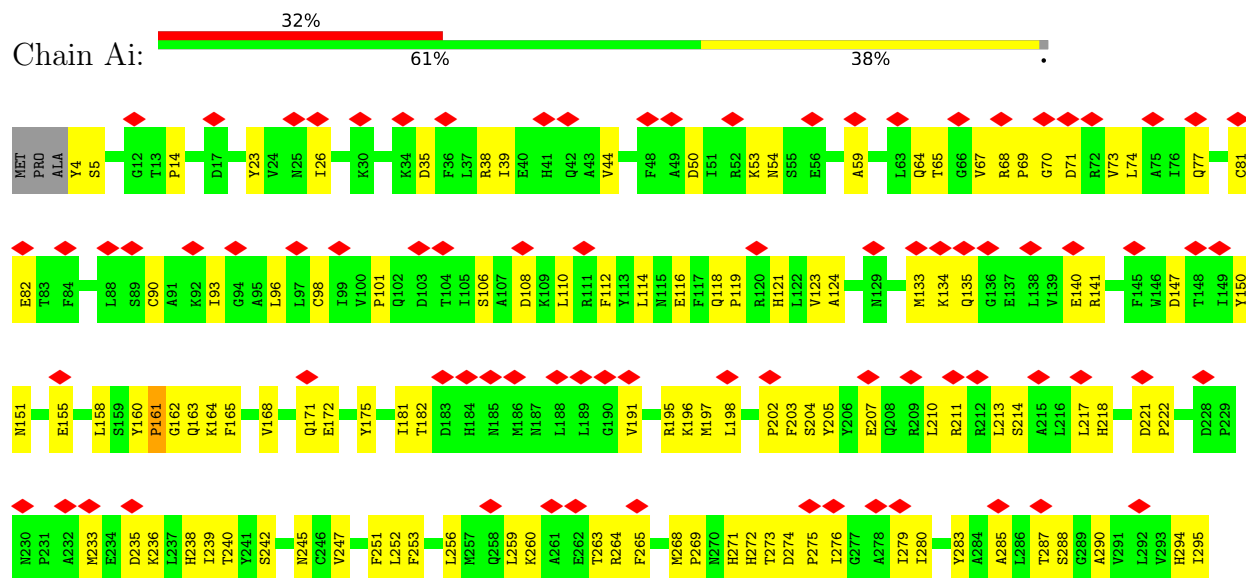
• Molecule 90: mL96

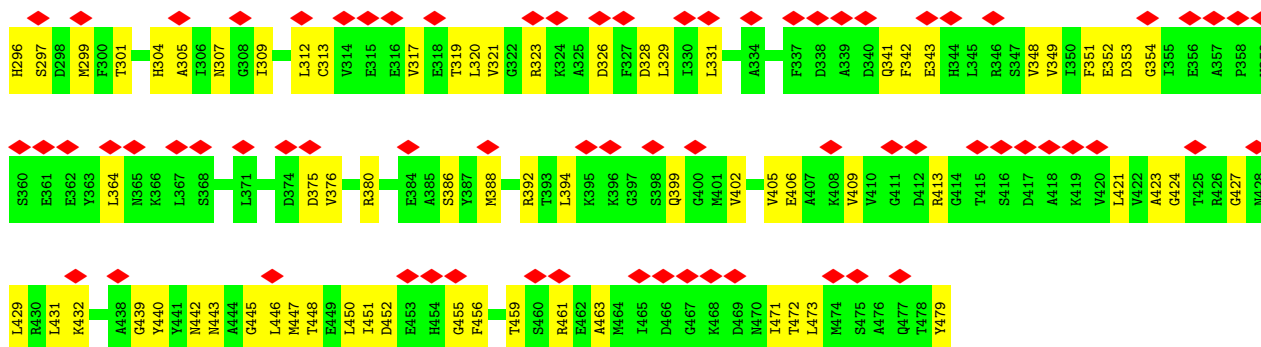


• Molecule 91: L51_S25_CI-B8 domain-containing protein

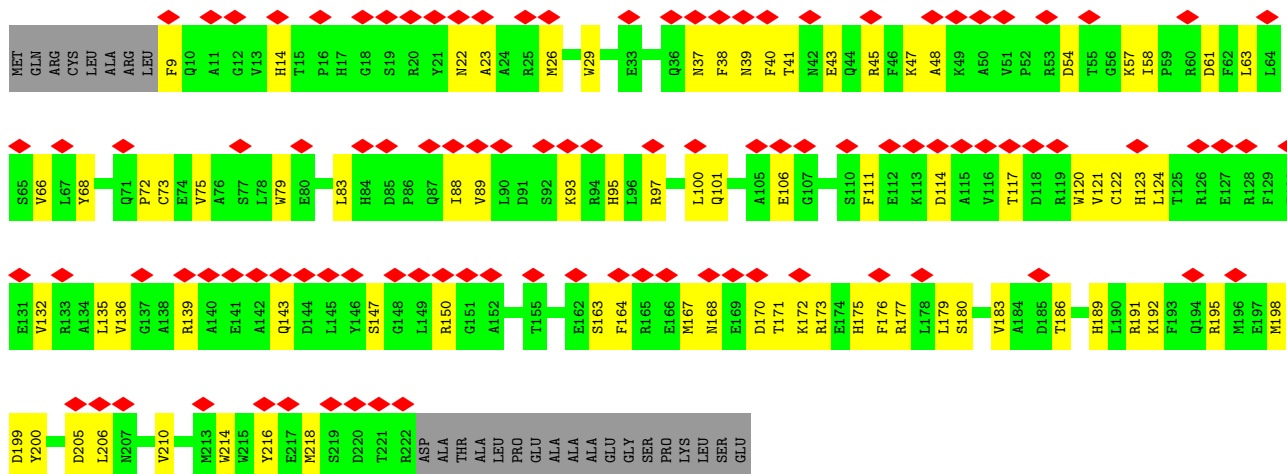
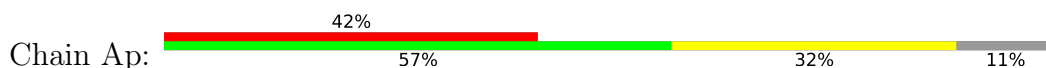


• Molecule 92: mL69

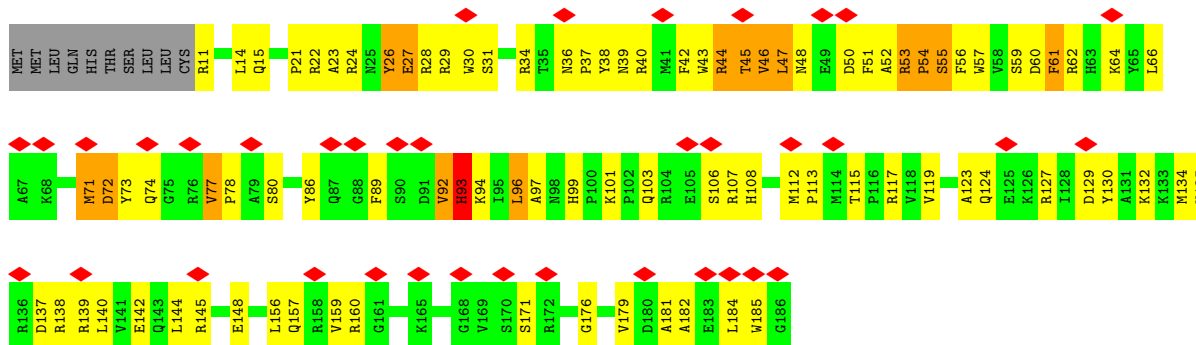




• Molecule 93: mL80

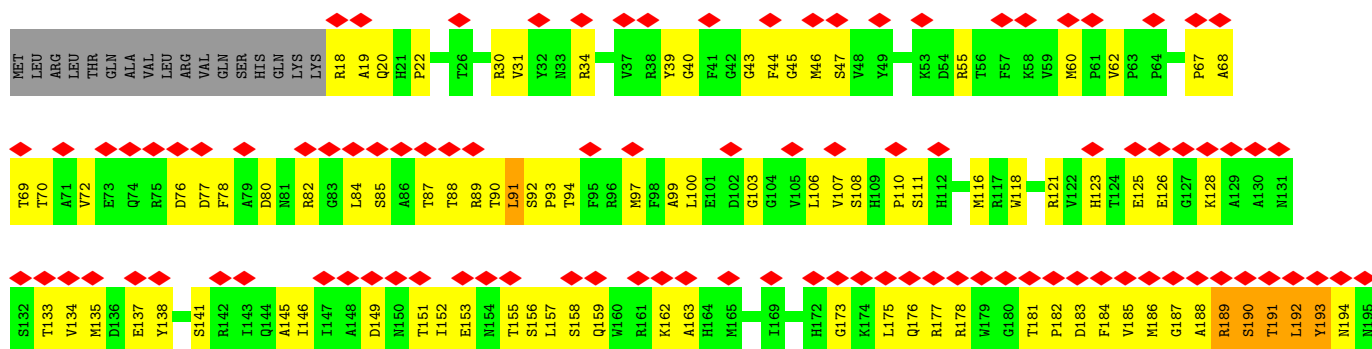


• Molecule 94: mL87

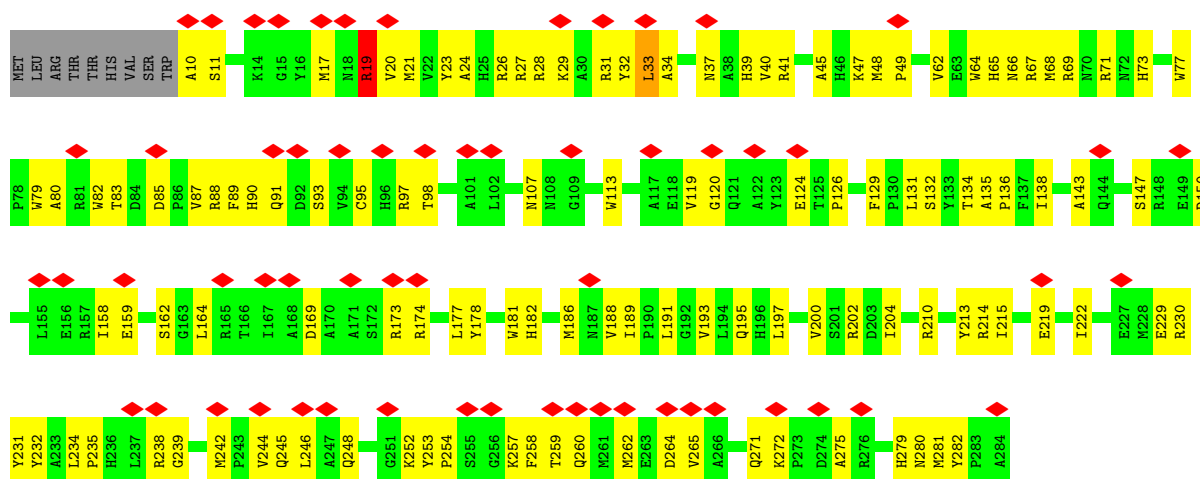


• Molecule 95: mL42

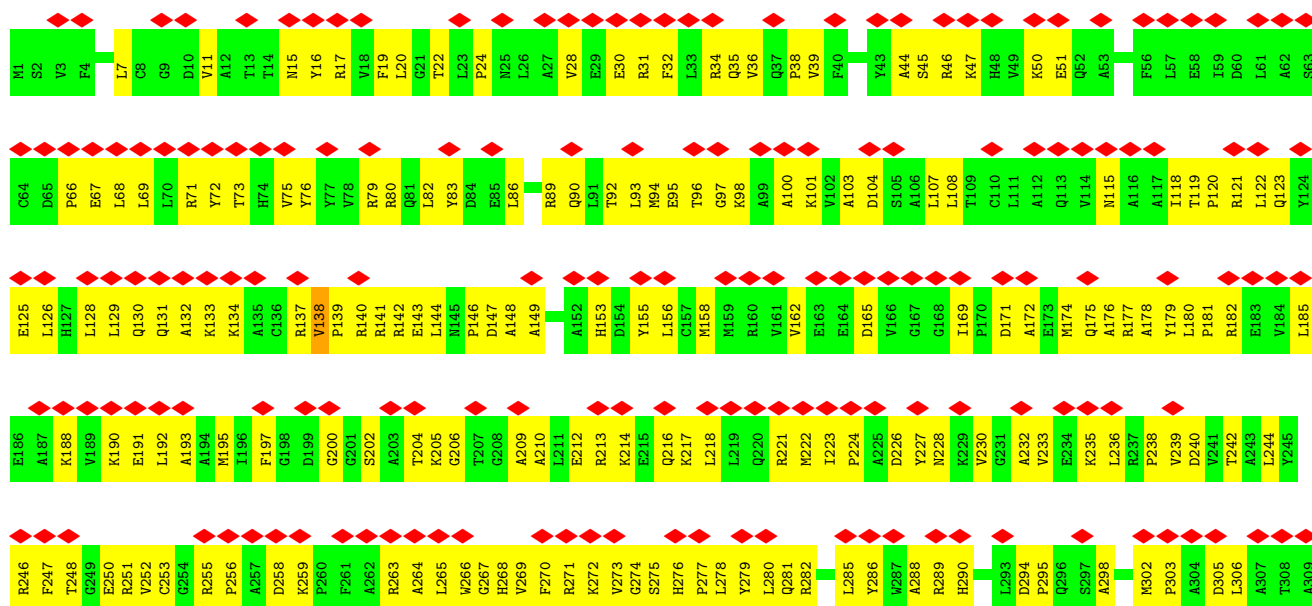


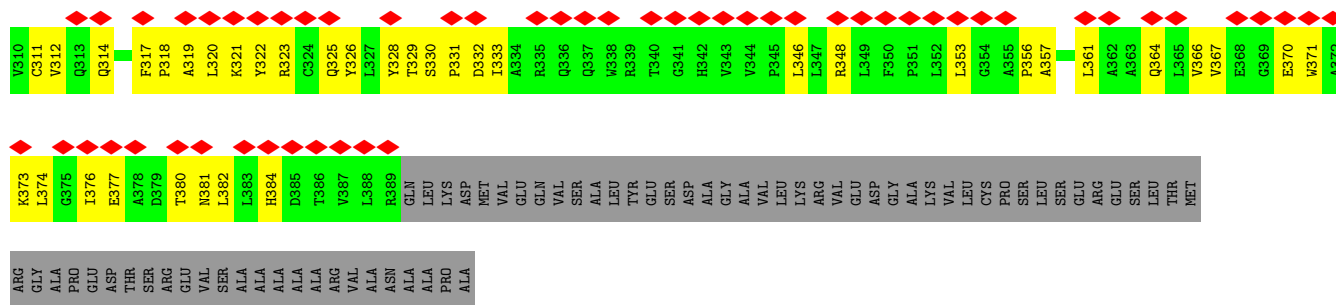


• Molecule 96: mL79

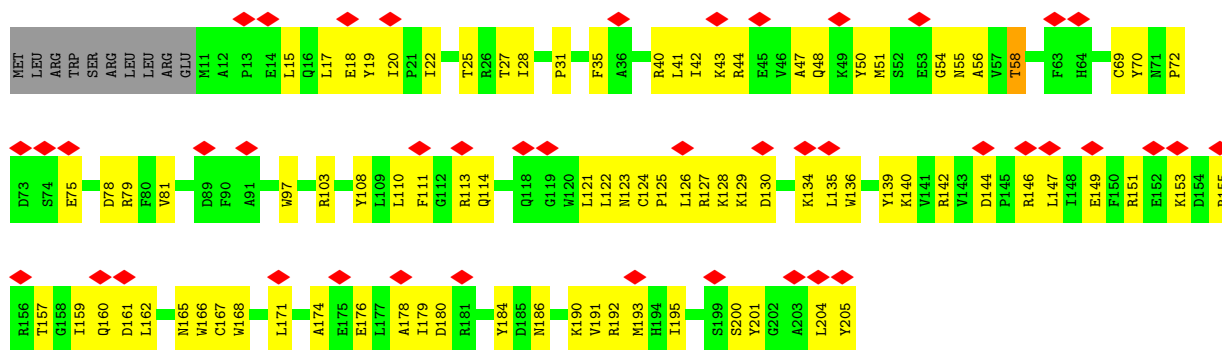


• Molecule 97: mL70

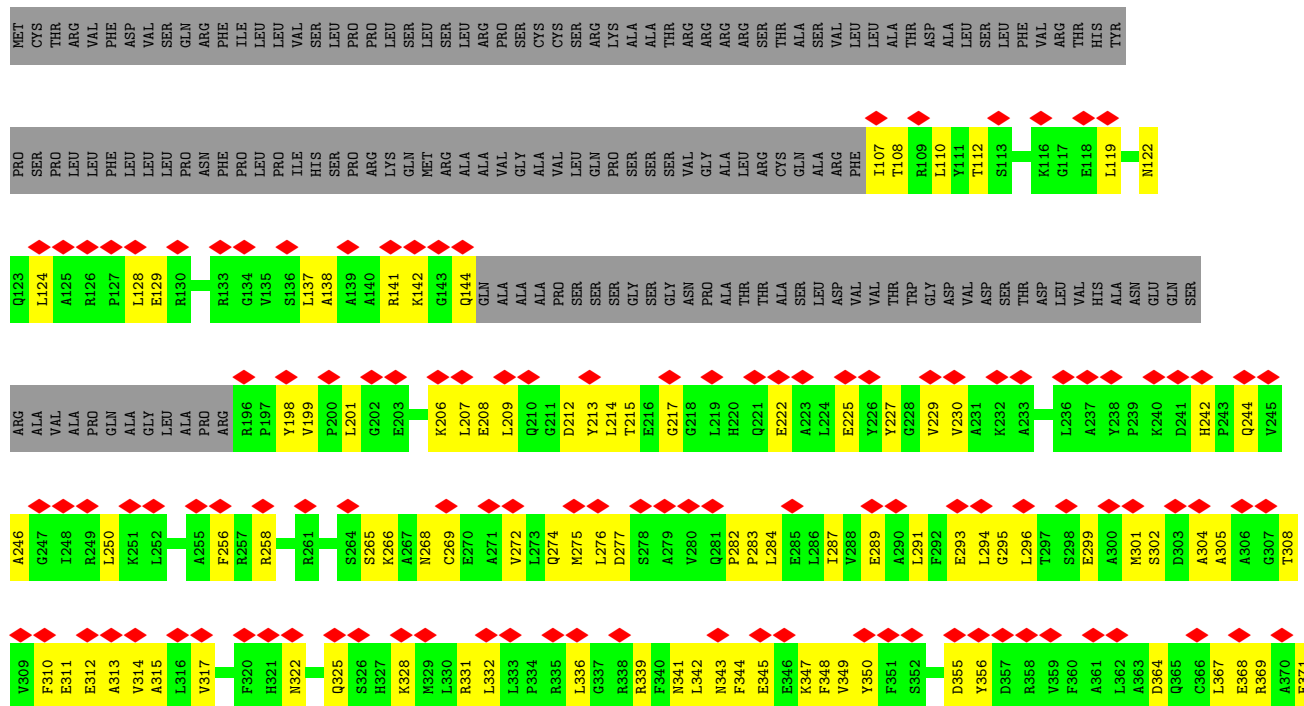


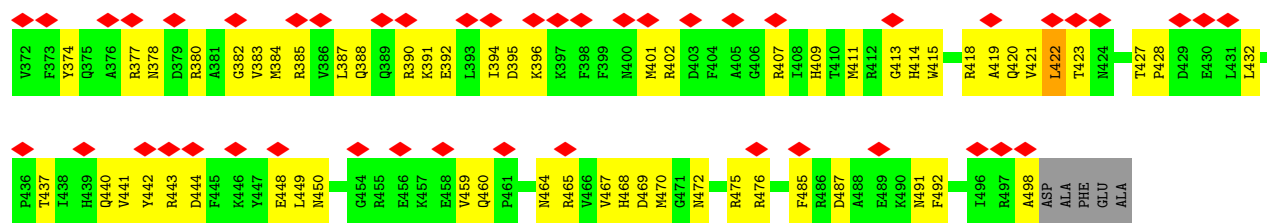


• Molecule 98: mL84

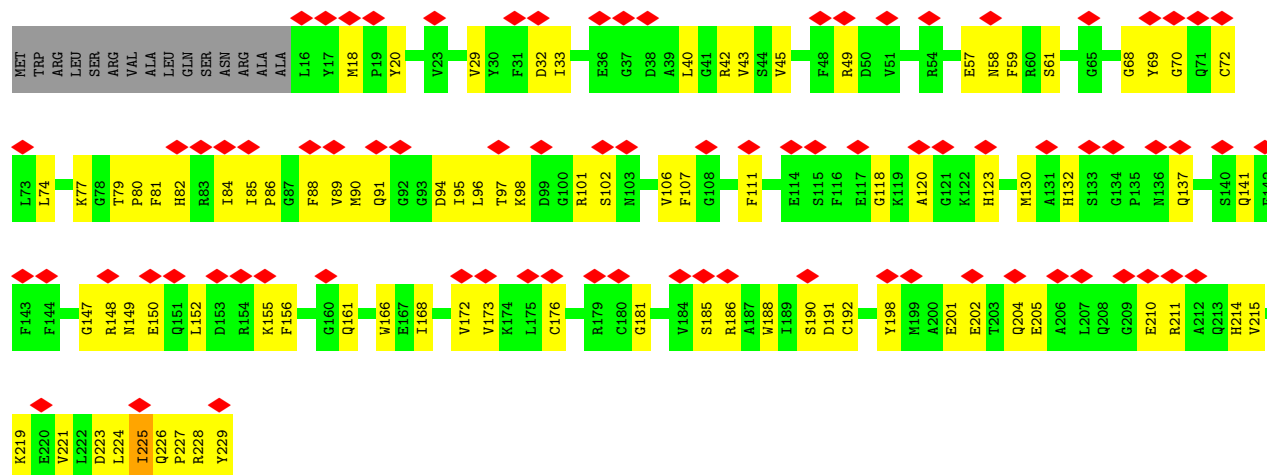


• Molecule 99: mL72

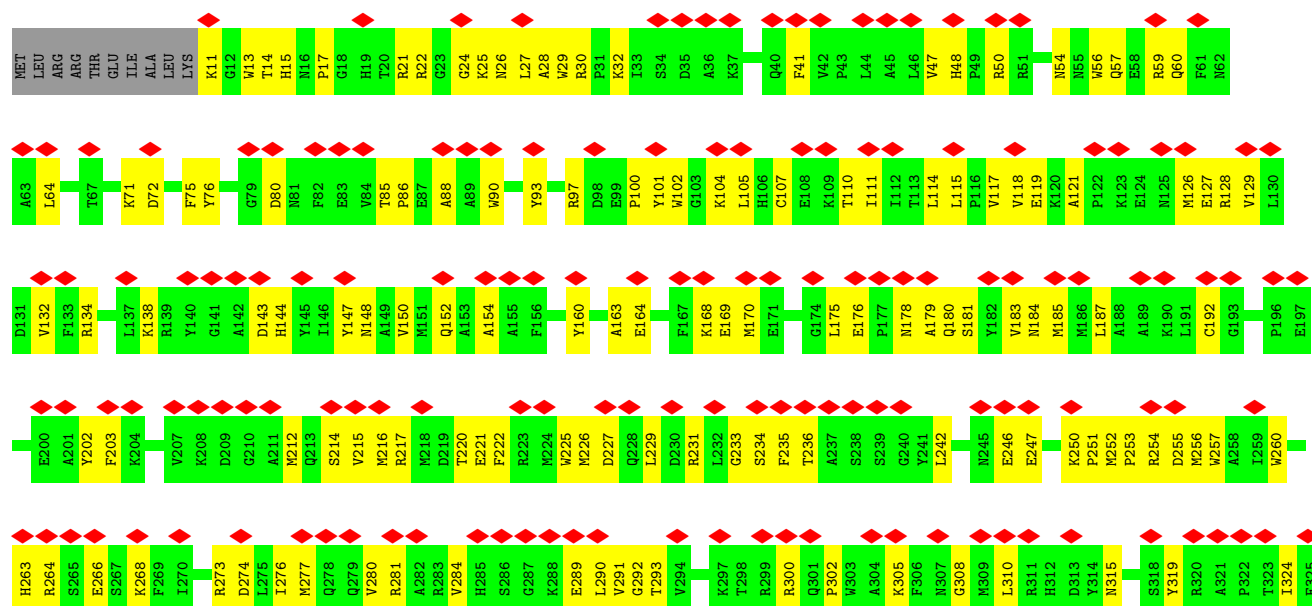


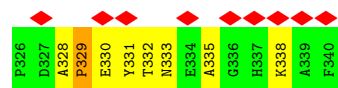


• Molecule 100: Peptidyl-prolyl cis-trans isomerase

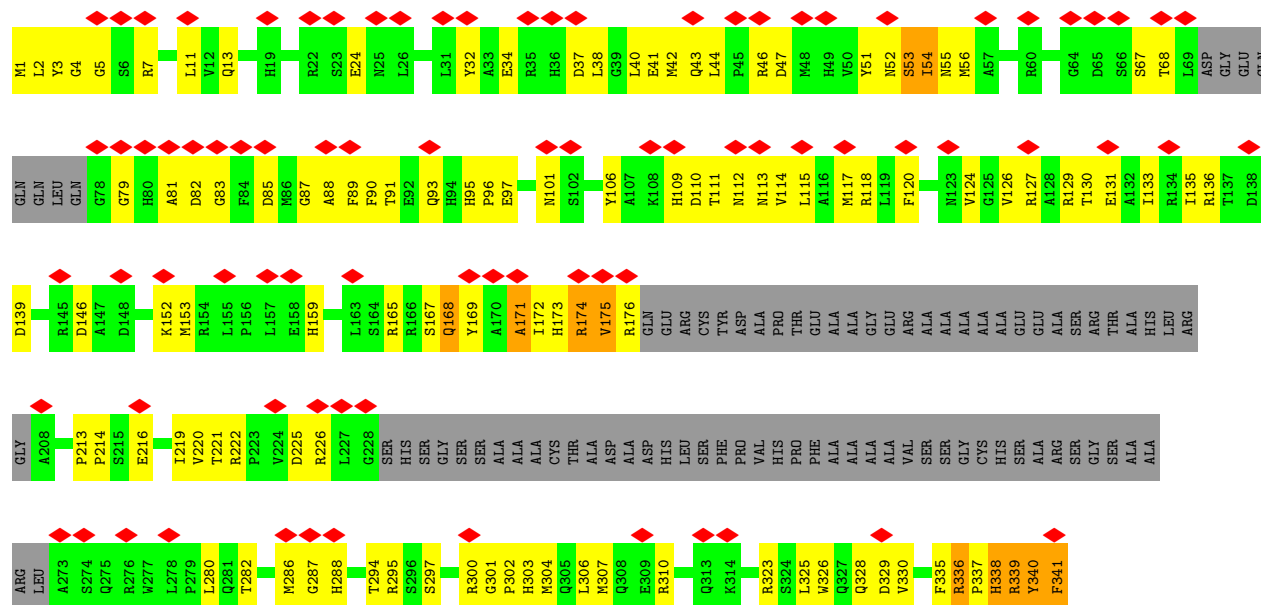
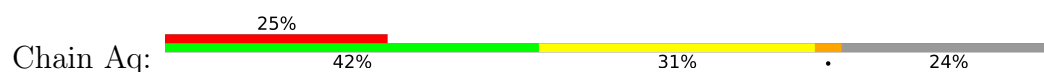


• Molecule 101: mL75

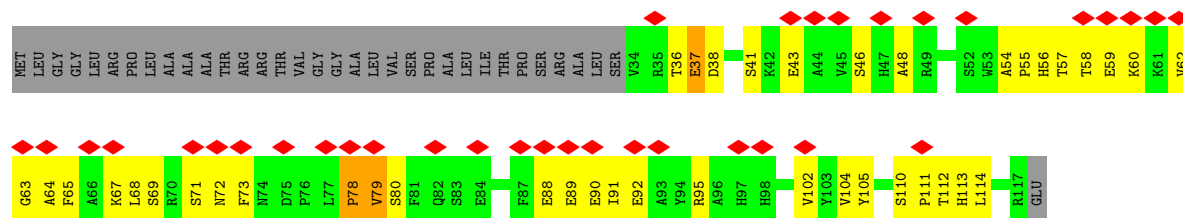




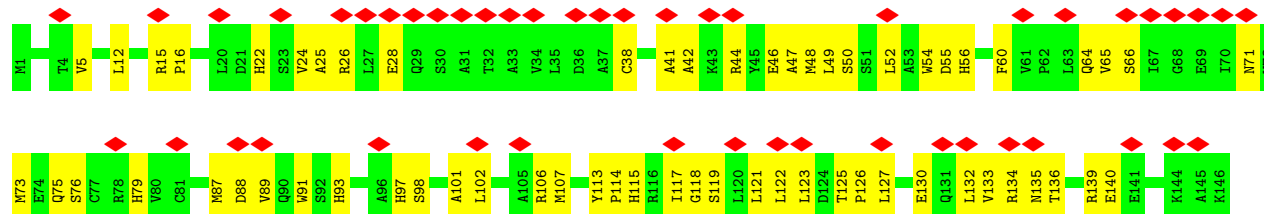
• Molecule 102: mL82

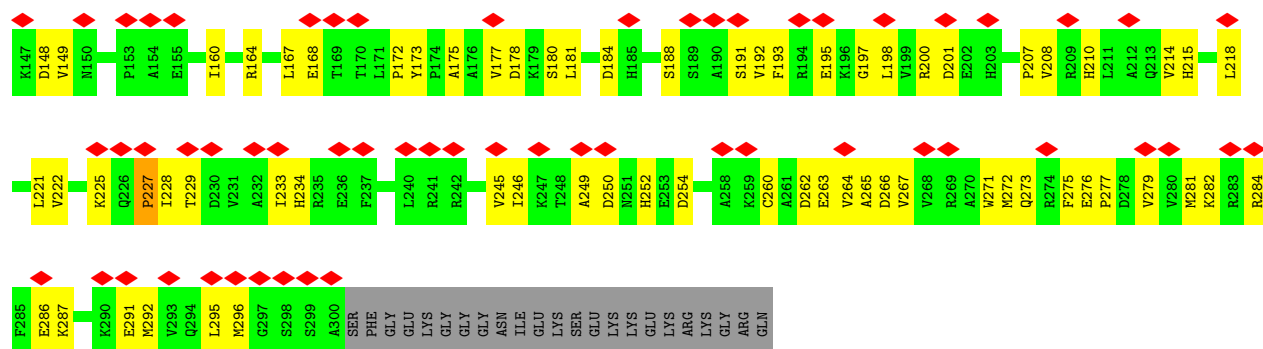


• Molecule 103: mL98



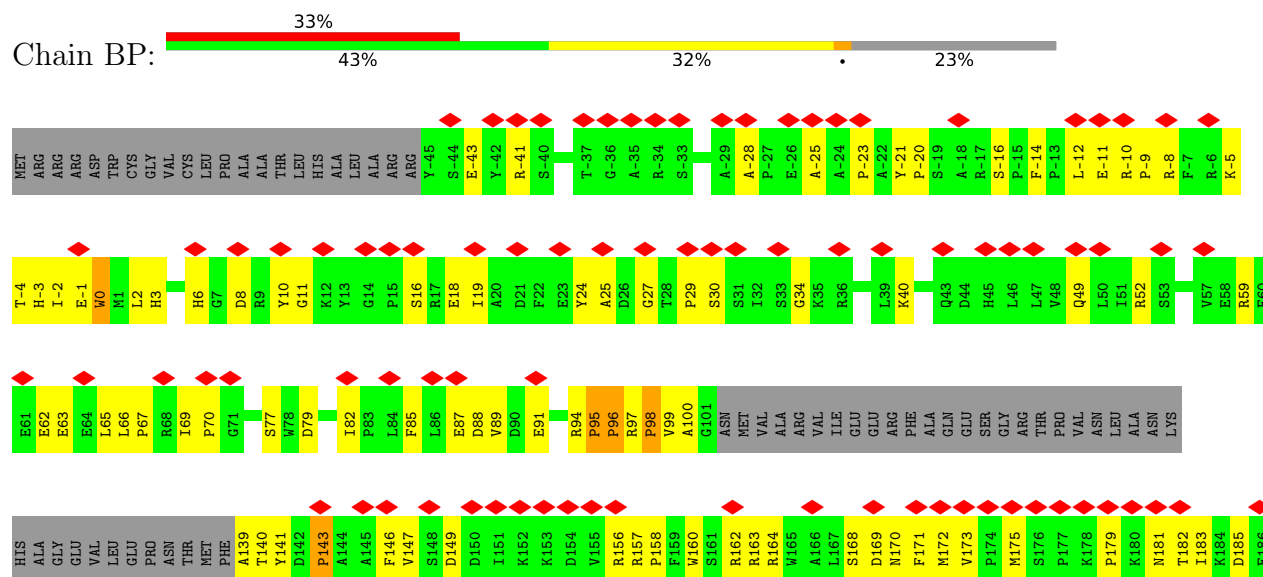
• Molecule 104: mL73





• Molecule 105: mL52

Chain BP:



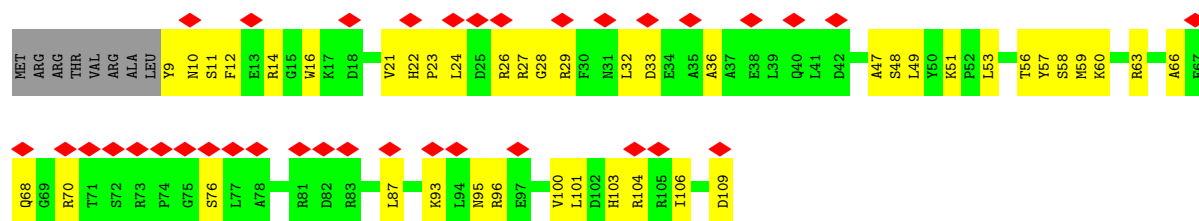
• Molecule 106: mL49

Chain Ad:

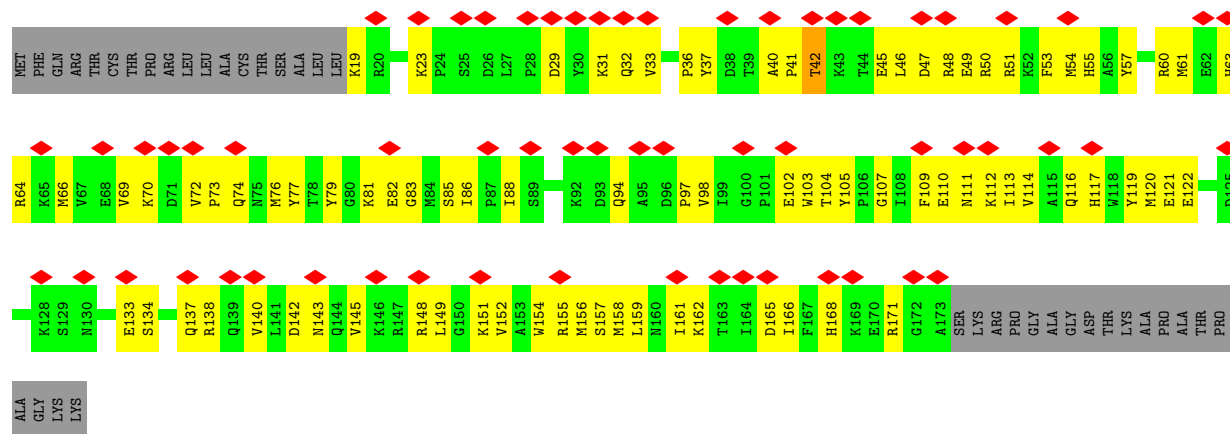


• Molecule 107: mL99

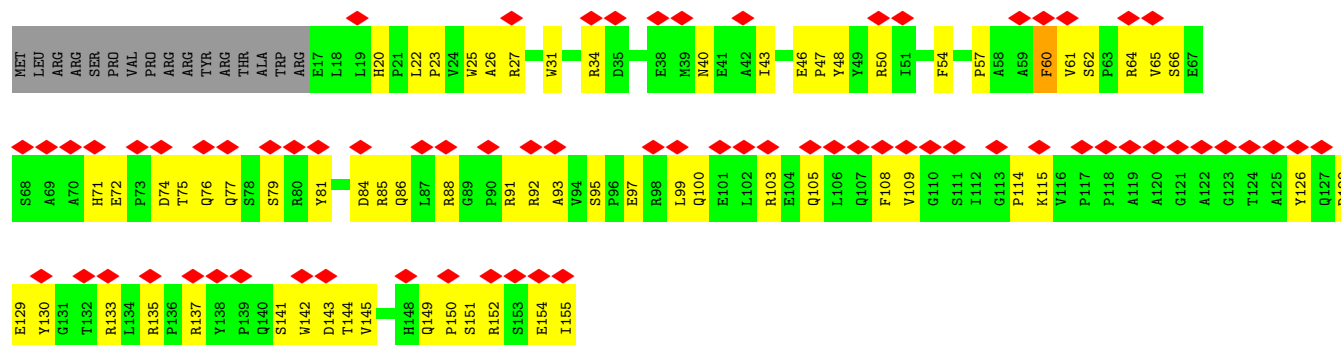
Chain BF:



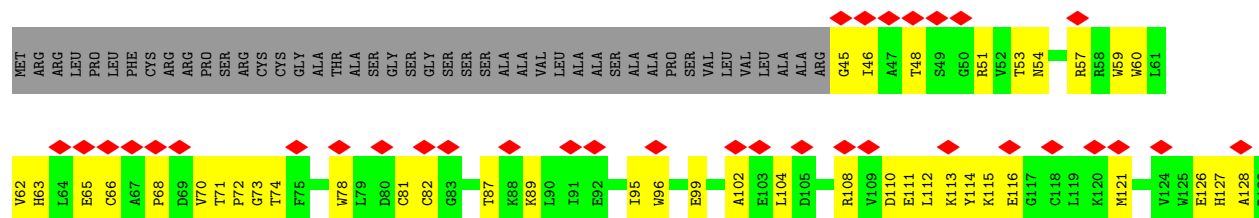
• Molecule 108: mL88

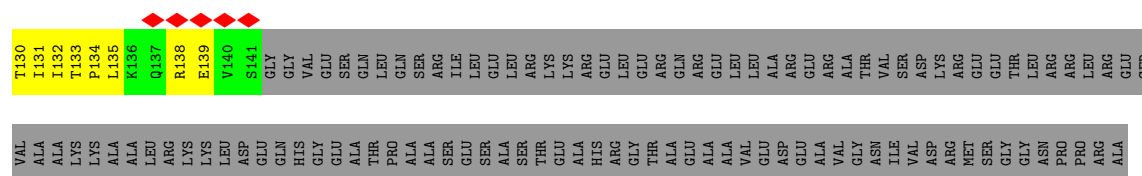


• Molecule 109: mL63

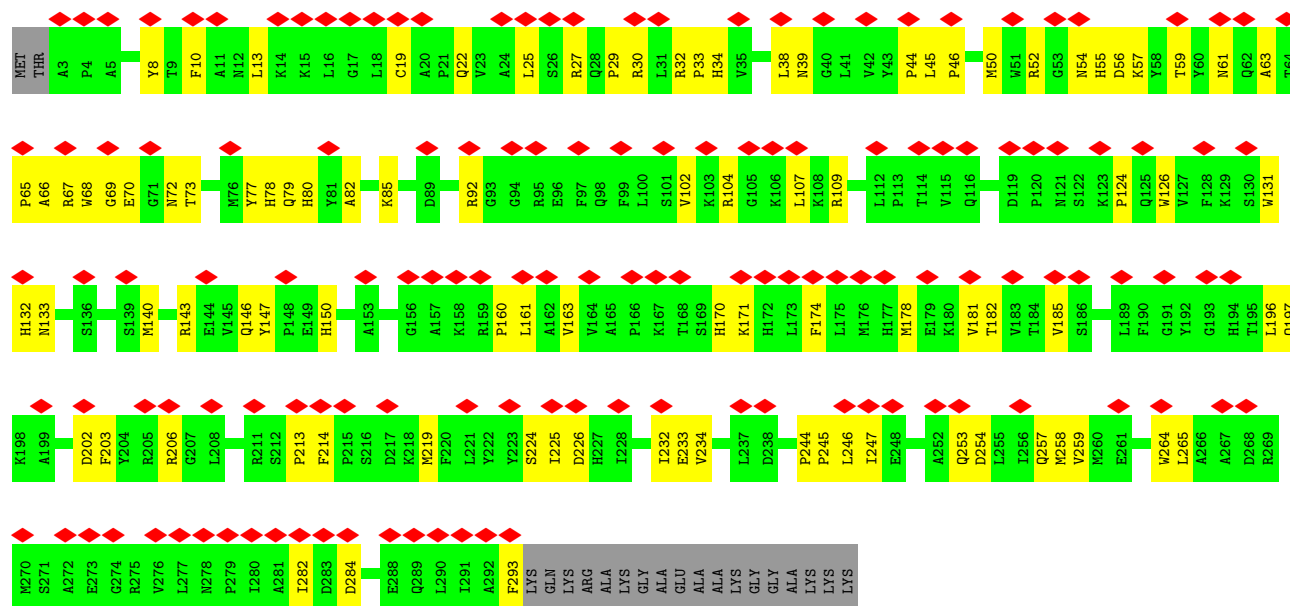


• Molecule 110: mL85

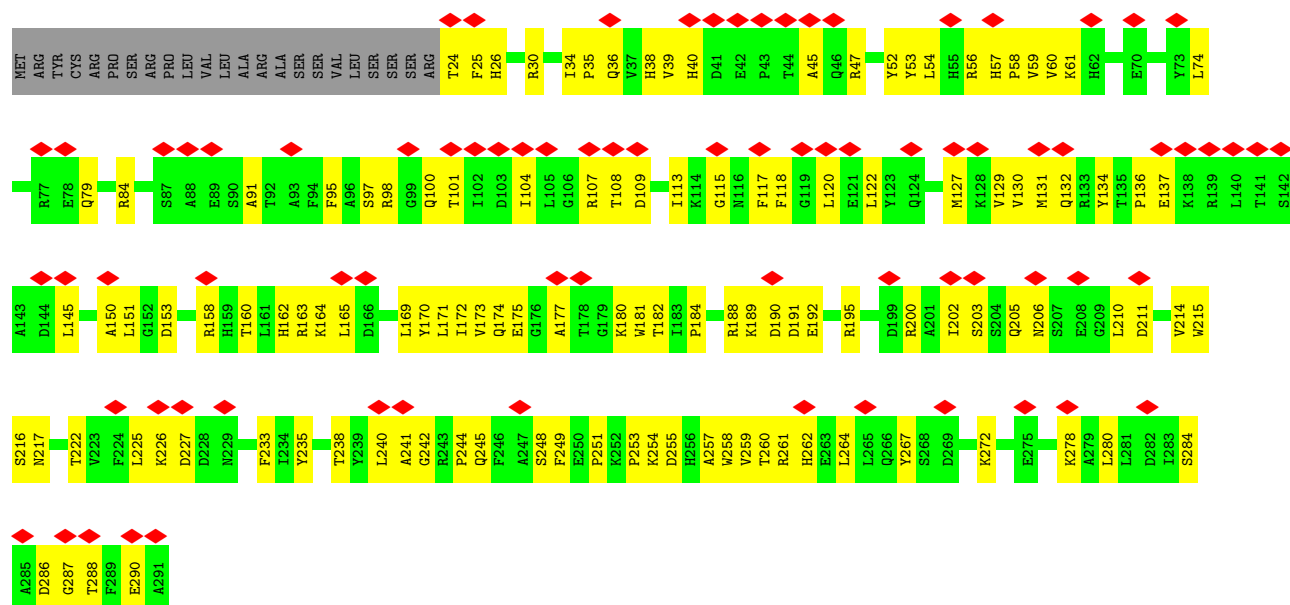


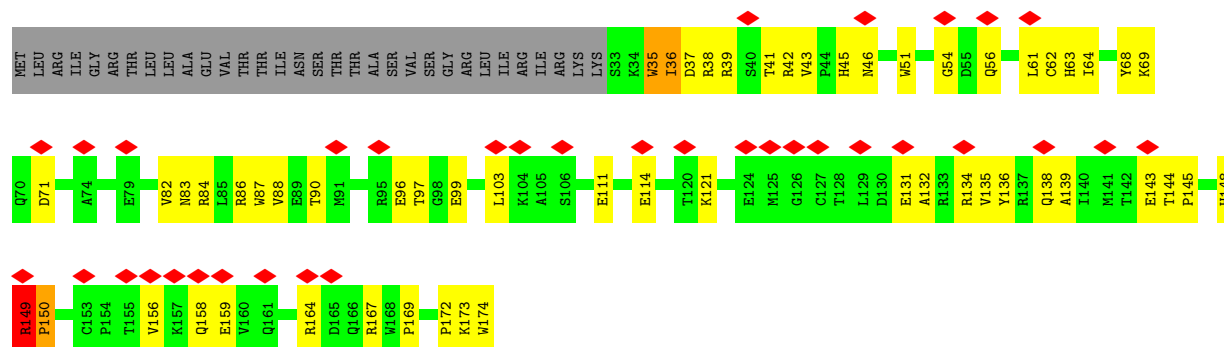


• Molecule 111: mL53

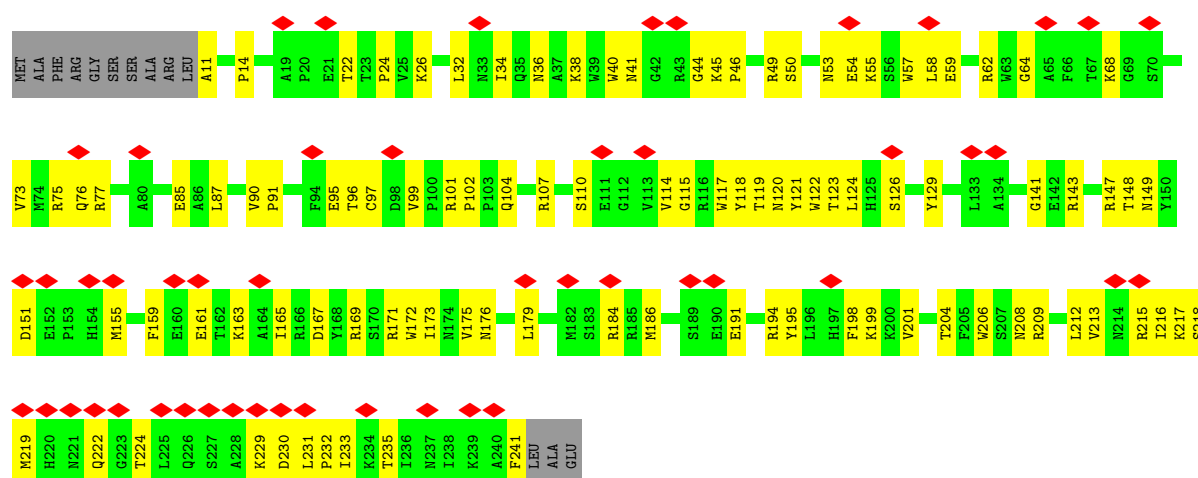


• Molecule 112: MRP-L46 domain-containing protein

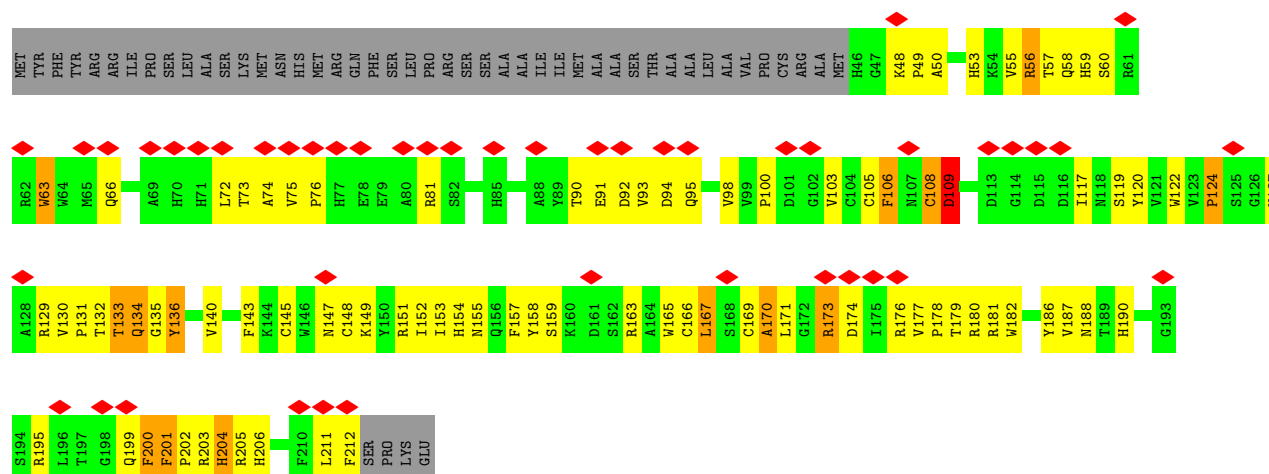




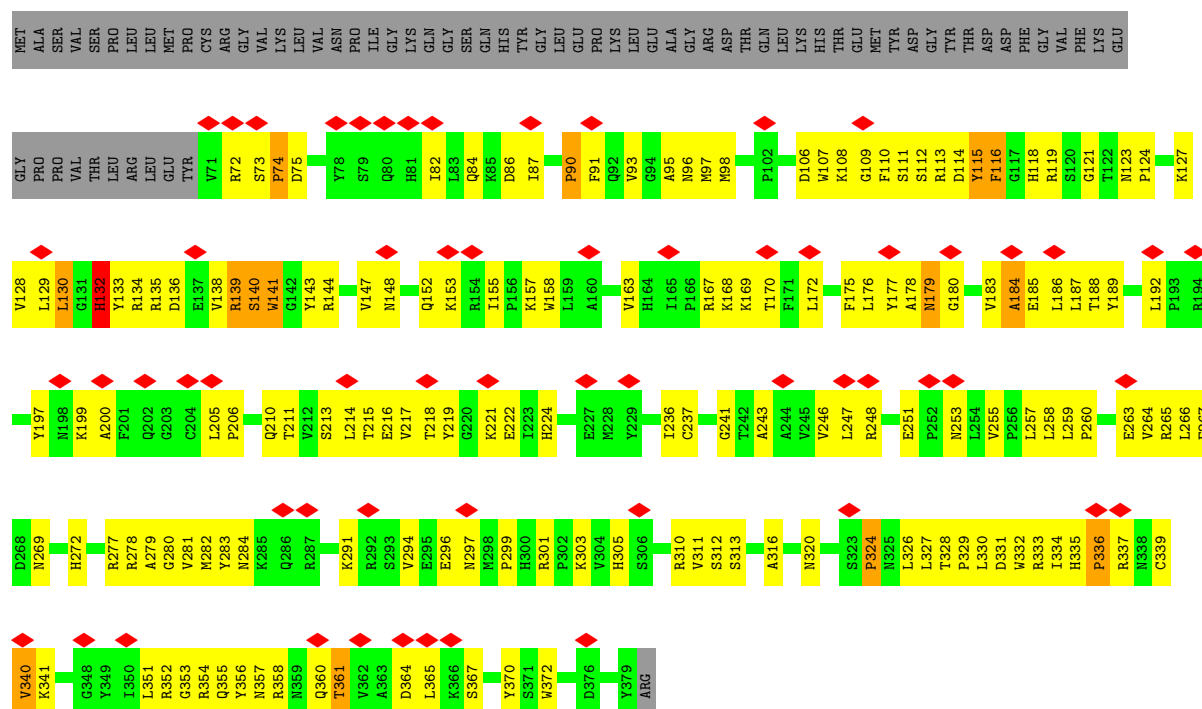
• Molecule 116: mL59/64



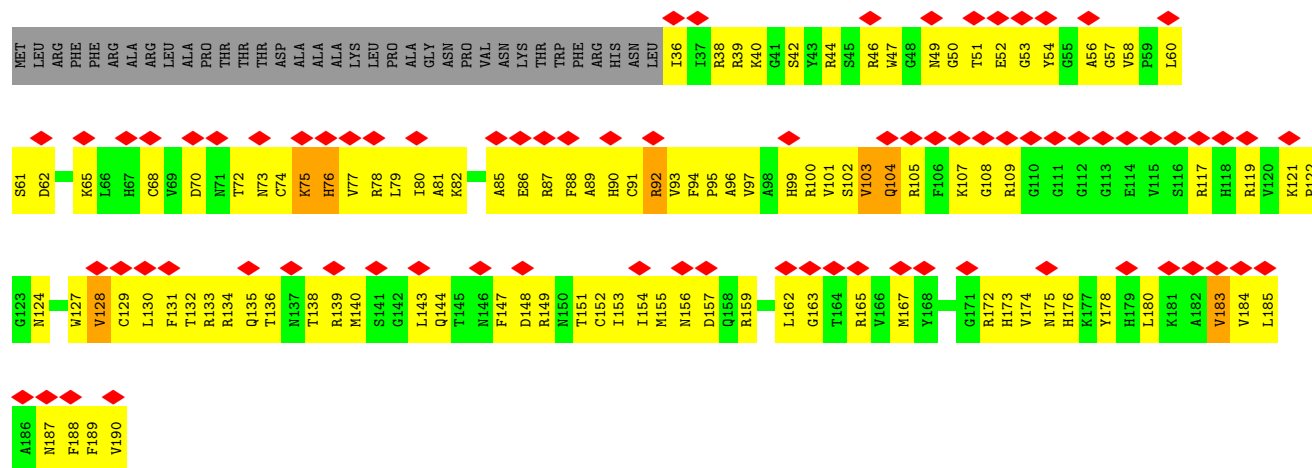
• Molecule 117: LIM zinc-binding domain-containing protein



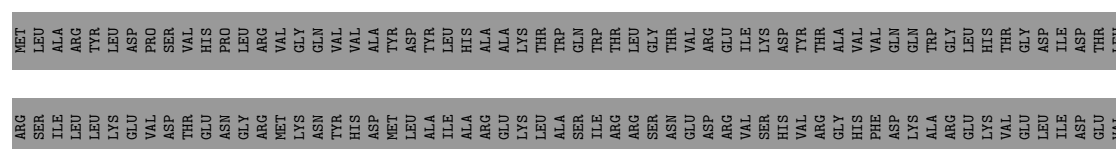
• Molecule 118: Putative ribosomal protein L2



• Molecule 119: Putative ribosomal protein L14



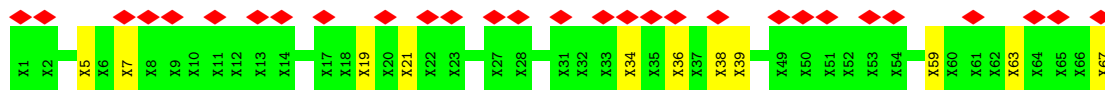
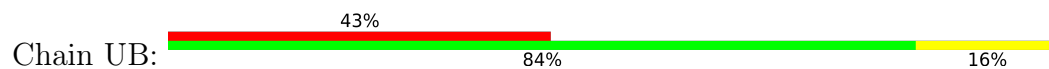
• Molecule 120: mL100



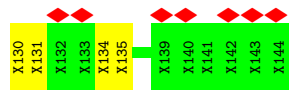
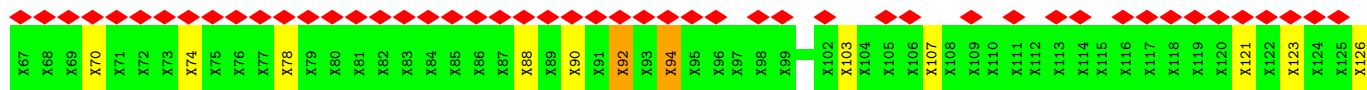
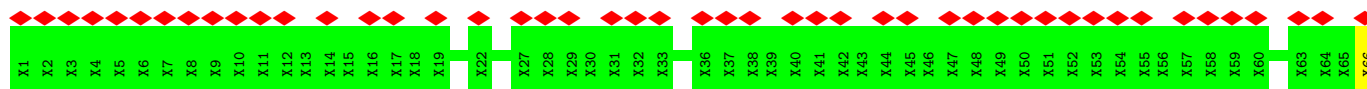
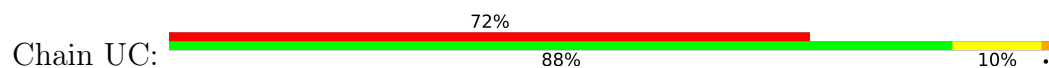




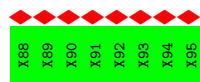
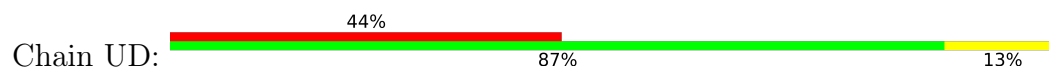
● Molecule 121: UB



● Molecule 122: UC



● Molecule 123: UD



4 Experimental information

Property	Value	Source
EM reconstruction method	SINGLE PARTICLE	Depositor
Imposed symmetry	POINT, Not provided	
Number of particles used	82060	Depositor
Resolution determination method	FSC 0.143 CUT-OFF	Depositor
CTF correction method	PHASE FLIPPING AND AMPLITUDE CORRECTION	Depositor
Microscope	FEI TALOS ARCTICA	Depositor
Voltage (kV)	200	Depositor
Electron dose ($e^-/\text{\AA}^2$)	60	Depositor
Minimum defocus (nm)	Not provided	
Maximum defocus (nm)	Not provided	
Magnification	Not provided	
Image detector	FEI FALCON III (4k x 4k)	Depositor
Maximum map value	0.195	Depositor
Minimum map value	-0.108	Depositor
Average map value	-0.000	Depositor
Map value standard deviation	0.014	Depositor
Recommended contour level	0.045	Depositor
Map size (Å)	476.00003, 476.00003, 476.00003	wwPDB
Map dimensions	400, 400, 400	wwPDB
Map angles (°)	90.0, 90.0, 90.0	wwPDB
Pixel spacing (Å)	1.19, 1.19, 1.19	Depositor

5 Model quality ⓘ

5.1 Standard geometry ⓘ

Bond lengths and bond angles in the following residue types are not validated in this section: NAD, MG, ZN

The Z score for a bond length (or angle) is the number of standard deviations the observed value is removed from the expected value. A bond length (or angle) with $|Z| > 5$ is considered an outlier worth inspection. RMSZ is the root-mean-square of all Z scores of the bond lengths (or angles).

Mol	Chain	Bond lengths		Bond angles	
		RMSZ	# $ Z > 5$	RMSZ	# $ Z > 5$
1	1	0.45	0/25559	0.60	21/39736 (0.1%)
1	2	0.78	54/14217 (0.4%)	1.18	154/22099 (0.7%)
2	h	0.23	0/1347	0.42	0/1819
3	aw	0.24	0/1172	0.47	0/1578
4	m	0.22	0/2437	0.48	0/3300
5	f	0.21	0/1239	0.52	0/1660
6	s	0.22	0/1389	0.44	0/1877
7	au	0.20	0/2140	0.41	0/2899
8	am	0.23	0/2252	0.47	0/3035
9	n	0.20	0/1209	0.45	0/1625
10	ae	0.20	0/4698	0.48	0/6385
11	ay	0.21	0/1223	0.44	0/1653
12	ag	0.21	0/4627	0.46	0/6260
13	aj	0.19	0/2641	0.44	0/3591
14	e	0.24	0/6598	0.47	1/8991 (0.0%)
15	d	0.22	0/2771	0.44	0/3733
16	az	0.24	0/1343	0.46	0/1815
17	ax	0.21	0/1405	0.42	0/1906
18	r	0.21	0/3818	0.44	0/5177
19	af	0.19	0/4802	0.44	0/6515
20	u	0.21	0/5673	0.48	1/7675 (0.0%)
21	aa	0.19	0/12362	0.44	0/16747
22	ab	0.21	0/9432	0.45	0/12775
23	ak	0.21	0/2187	0.47	0/2963
24	ac	0.19	0/8897	0.49	2/12093 (0.0%)
25	ad	0.72	2/5837 (0.0%)	0.52	5/7913 (0.1%)
26	an	0.23	0/2545	0.49	0/3443
27	ao	0.22	0/1574	0.50	0/2141
28	ap	0.21	0/1927	0.49	1/2593 (0.0%)
29	aq	0.17	0/1847	0.47	0/2506
30	as	1.50	6/2013 (0.3%)	0.58	3/2745 (0.1%)
31	at	0.18	0/1664	0.53	1/2243 (0.0%)

Mol	Chain	Bond lengths		Bond angles	
		RMSZ	# Z >5	RMSZ	# Z >5
32	y	0.20	0/2191	0.50	0/2965
33	w	0.18	0/1315	0.45	0/1787
34	v	0.18	0/490	0.49	0/656
35	t	0.18	0/1826	0.48	1/2488 (0.0%)
36	p	0.22	0/2002	0.47	1/2704 (0.0%)
37	j	0.20	0/1553	0.47	0/2098
38	l	0.20	0/4544	0.51	1/6158 (0.0%)
39	ar	0.19	0/2038	0.45	0/2758
40	av	0.20	0/1265	0.54	0/1716
41	ai	0.21	0/3133	0.49	0/4241
42	x	0.23	0/2091	0.47	0/2844
43	i	0.20	0/2271	0.43	0/3065
44	g	0.18	0/834	0.49	0/1115
45	o	1.04	1/3847 (0.0%)	0.48	2/5196 (0.0%)
46	c	0.24	0/2084	0.47	0/2815
47	k	0.22	0/977	0.42	0/1319
48	q	0.22	0/1748	0.48	0/2354
49	b	0.25	0/1319	0.52	0/1787
50	a	0.62	6/3377 (0.2%)	0.51	0/4558
51	ba	0.16	0/232	0.46	0/314
52	z	0.22	0/7898	0.47	0/10712
53	bd	0.33	0/358	0.68	0/487
54	A	0.50	0/3098	0.63	3/4217 (0.1%)
55	B	0.47	0/3623	0.59	3/4931 (0.1%)
56	C	0.43	0/1831	0.54	0/2498
57	D	0.34	0/1062	0.52	0/1438
58	E	0.34	0/2734	0.48	0/3687
59	F	0.47	0/1485	0.64	1/2019 (0.0%)
60	G	0.48	0/3110	0.65	4/4223 (0.1%)
61	H	0.40	0/1338	0.59	0/1808
62	I	0.45	0/2220	0.62	0/2998
63	J	0.48	0/1175	0.76	1/1582 (0.1%)
64	K	0.42	0/1499	0.52	0/2026
65	L	0.44	0/1452	0.53	0/1970
66	M	0.49	0/2168	0.74	9/2928 (0.3%)
67	N	0.46	0/1650	0.52	0/2242
68	O	0.38	0/2591	0.64	4/3507 (0.1%)
69	P	0.45	0/1402	0.60	0/1892
70	Q	0.45	0/1827	0.55	0/2463
71	R	0.35	0/3852	0.50	0/5243
72	S	0.44	0/1271	0.52	0/1712
73	T	0.42	0/501	0.49	0/665
74	U	0.59	0/756	0.95	3/1011 (0.3%)

Mol	Chain	Bond lengths		Bond angles	
		RMSZ	# Z >5	RMSZ	# Z >5
75	V	0.50	0/1231	0.65	0/1645
76	W	0.64	0/483	1.00	1/657 (0.2%)
77	X	0.44	0/3846	0.64	3/5250 (0.1%)
78	Y	0.32	0/2116	0.47	0/2866
79	Z	0.49	0/1268	0.82	5/1725 (0.3%)
80	BA	0.36	0/1056	0.68	0/1435
82	BB	0.52	1/1061 (0.1%)	0.76	2/1438 (0.1%)
83	Aw	0.44	0/1552	0.57	0/2107
84	Bj	0.37	0/1389	0.51	0/1878
85	An	0.50	0/2677	0.84	3/3633 (0.1%)
86	Al	0.46	0/2212	0.67	3/3013 (0.1%)
87	BI	0.35	0/1440	0.48	0/1953
88	Az	0.50	0/1259	0.56	0/1700
89	At	0.41	0/1373	0.53	0/1848
90	BC	0.36	0/1135	0.48	0/1532
91	Ab	0.42	0/2249	0.51	1/3044 (0.0%)
92	Ai	0.42	0/3879	0.49	0/5258
93	Ap	0.33	0/1819	0.48	0/2458
94	Au	0.53	0/1542	0.85	3/2082 (0.1%)
95	Aa	0.59	1/1454 (0.1%)	0.74	3/1968 (0.2%)
96	Ao	0.47	0/2351	0.69	0/3196
97	BM	0.23	0/3136	0.55	0/4259
98	Ar	0.46	0/1689	0.53	0/2280
99	Aj	0.40	0/2826	0.50	0/3807
100	BH	0.42	0/1700	0.54	0/2301
101	Am	0.41	0/2791	0.55	2/3775 (0.1%)
102	Aq	0.42	0/2128	0.72	2/2876 (0.1%)
103	BE	0.38	0/723	0.75	0/981
104	Ak	0.31	0/2403	0.50	0/3265
105	BP	0.46	0/1648	0.72	5/2238 (0.2%)
106	Ad	0.48	0/1682	0.70	0/2283
107	BF	0.38	0/871	0.61	0/1170
108	Av	0.34	0/1335	0.49	0/1797
109	Af	0.40	0/1165	0.61	0/1585
110	As	0.37	0/804	0.48	0/1093
111	Ae	0.41	0/2441	0.51	0/3324
112	Ac	0.33	0/2236	0.48	0/3038
113	Ah	0.38	0/3780	0.62	3/5125 (0.1%)
114	BD	0.41	0/826	0.47	0/1109
115	Ay	0.42	0/1269	0.58	0/1724
116	Ag	0.44	0/1968	0.51	0/2661
117	Ax	0.62	0/1439	1.03	12/1952 (0.6%)
118	BL	0.52	0/2572	0.83	6/3482 (0.2%)

Mol	Chain	Bond lengths		Bond angles	
		RMSZ	# Z >5	RMSZ	# Z >5
119	BO	0.48	0/1266	0.82	0/1702
120	BG	0.46	0/657	0.94	4/888 (0.5%)
All	All	0.42	71/311630 (0.0%)	0.60	280/430089 (0.1%)

Chiral center outliers are detected by calculating the chiral volume of a chiral center and verifying if the center is modelled as a planar moiety or with the opposite hand. A planarity outlier is detected by checking planarity of atoms in a peptide group, atoms in a mainchain group or atoms of a sidechain that are expected to be planar.

Mol	Chain	#Chirality outliers	#Planarity outliers
1	1	2	0
1	2	1	1
4	m	0	1
10	ae	0	1
12	ag	0	1
14	e	0	1
20	u	0	2
24	ac	0	6
25	ad	0	3
26	an	0	3
27	ao	0	1
28	ap	0	1
32	y	0	1
36	p	0	1
38	l	0	1
42	x	0	1
49	b	0	1
50	a	0	1
52	z	0	2
53	bd	0	1
54	A	0	1
56	C	0	1
59	F	0	1
62	I	0	1
65	L	0	1
71	R	0	2
79	Z	0	1
80	BA	0	2
81	UA	0	2
82	BB	0	2
84	Bj	0	1
85	An	0	2

Continued on next page...

Continued from previous page...

Mol	Chain	#Chirality outliers	#Planarity outliers
94	Au	0	3
96	Ao	0	1
101	Am	0	1
102	Aq	0	2
103	BE	0	3
104	Ak	0	1
106	Ad	0	1
109	Af	0	1
115	Ay	0	1
118	BL	0	3
119	BO	0	5
122	UC	0	2
123	UD	0	1
All	All	3	72

All (71) bond length outliers are listed below:

Mol	Chain	Res	Type	Atoms	Z	Observed(Å)	Ideal(Å)
45	o	132	ARG	CB-CG	63.20	3.42	1.52
25	ad	536	THR	CA-C	52.56	2.01	1.52
30	as	215	TRP	CE3-CZ3	40.74	2.60	1.38
30	as	215	TRP	CZ3-CH2	29.25	2.13	1.40
30	as	215	TRP	CE2-CZ2	26.41	1.95	1.39
30	as	215	TRP	CZ2-CH2	21.28	1.77	1.37
30	as	215	TRP	CD2-CE2	21.03	1.77	1.41
30	as	215	TRP	CD2-CE3	19.07	1.70	1.40
50	a	349	TRP	CE3-CZ3	18.39	1.93	1.38
95	Aa	193	TYR	N-CA	15.66	1.66	1.46
50	a	349	TRP	CE2-CZ2	14.61	1.70	1.39
50	a	349	TRP	CZ3-CH2	14.03	1.75	1.40
50	a	349	TRP	CD2-CE2	11.44	1.60	1.41
50	a	349	TRP	CZ2-CH2	11.29	1.58	1.37
50	a	349	TRP	CD2-CE3	10.20	1.56	1.40
1	2	144	C	O3'-P	-8.99	1.47	1.61
1	2	369	G	C1'-N9	-7.71	1.36	1.48
1	2	536	A	O3'-P	-7.26	1.50	1.61
1	2	90	A	C1'-N9	-6.94	1.37	1.48
1	2	166	G	C1'-N9	-6.87	1.36	1.47
1	2	168	G	C1'-N9	-6.83	1.36	1.47
1	2	63	G	C1'-N9	-6.78	1.36	1.47
1	2	201	A	C1'-N9	-6.71	1.37	1.48
1	2	164	A	C1'-N9	-6.53	1.38	1.48

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type	Atoms	Z	Observed(Å)	Ideal(Å)
1	2	382	A	C1'-N9	-6.50	1.38	1.48
1	2	438	G	O3'-P	6.39	1.70	1.61
1	2	147	U	O3'-P	-6.36	1.51	1.61
82	BB	14	GLU	CA-C	-6.27	1.44	1.52
1	2	4	A	C1'-N9	-6.19	1.38	1.48
1	2	89	U	C1'-N1	6.14	1.57	1.48
1	2	322	A	C1'-N9	-6.13	1.38	1.48
1	2	447	A	C1'-N9	-6.13	1.38	1.48
1	2	82	A	C1'-N9	-6.12	1.38	1.48
1	2	42	U	C1'-N1	6.12	1.56	1.47
1	2	68	A	C1'-N9	-6.10	1.38	1.48
1	2	363	A	C1'-N9	-6.07	1.38	1.48
1	2	320	U	C1'-N1	6.02	1.56	1.47
1	2	319	A	C1'-N9	-5.96	1.39	1.48
1	2	207	A	C1'-N9	-5.94	1.39	1.48
1	2	189	A	C1'-N9	-5.91	1.39	1.48
1	2	89	U	O3'-P	-5.89	1.52	1.61
1	2	180	A	C1'-N9	-5.86	1.38	1.47
1	2	199	A	C1'-N9	-5.79	1.38	1.47
1	2	95	G	O3'-P	-5.77	1.52	1.61
1	2	84	U	C1'-N1	5.73	1.56	1.47
1	2	204	A	C1'-N9	-5.68	1.38	1.47
1	2	292	A	C1'-N9	-5.68	1.38	1.47
1	2	381	U	C1'-N1	5.57	1.55	1.47
25	ad	536	THR	CA-CB	5.57	1.62	1.53
1	2	209	U	C1'-N1	5.51	1.56	1.48
1	2	294	A	C1'-N9	-5.51	1.39	1.48
1	2	460	A	C1'-N9	-5.43	1.38	1.47
1	2	183	U	C1'-N1	5.43	1.55	1.47
1	2	169	U	C1'-N1	5.42	1.56	1.48
1	2	105	A	O3'-P	-5.39	1.53	1.61
1	2	480	A	O3'-P	-5.36	1.53	1.61
1	2	323	U	C1'-N1	5.33	1.56	1.48
1	2	321	U	C1'-N1	5.32	1.56	1.48
1	2	69	A	C1'-N9	-5.31	1.39	1.47
1	2	50	U	O3'-P	5.31	1.69	1.61
1	2	83	A	C1'-N9	-5.30	1.40	1.48
1	2	582	A	O3'-P	-5.25	1.53	1.61
1	2	149	A	C1'-N9	-5.25	1.39	1.47
1	2	131	U	C1'-N1	5.19	1.56	1.48
1	2	308	U	C1'-N1	5.18	1.55	1.47
1	2	314	U	C1'-N1	5.14	1.56	1.48

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type	Atoms	Z	Observed(Å)	Ideal(Å)
1	2	276	U	C1'-N1	5.11	1.56	1.48
1	2	108	A	O3'-P	-5.10	1.53	1.61
1	2	442	A	C1'-N9	-5.07	1.39	1.47
1	2	297	U	C1'-N1	5.03	1.55	1.48
1	2	317	U	C1'-N1	5.03	1.55	1.48

All (280) bond angle outliers are listed below:

Mol	Chain	Res	Type	Atoms	Z	Observed(°)	Ideal(°)
1	1	136	A	C2'-C3'-O3'	-27.81	71.99	113.70
1	2	438	G	C4'-C3'-O3'	16.53	137.80	113.00
1	2	438	G	N9-C1'-C2'	-13.62	91.57	112.00
1	2	325	U	C2'-C3'-O3'	-13.09	94.07	113.70
25	ad	536	THR	O-C-N	-12.69	107.11	121.95
1	2	529	A	C3'-C2'-O2'	12.09	132.73	114.60
1	2	529	A	C1'-C2'-O2'	-11.66	94.31	111.80
1	2	438	G	C2'-C3'-O3'	-11.45	96.52	113.70
59	F	158	PRO	N-CA-C	-11.03	93.84	111.38
1	2	218	A	C2'-C3'-O3'	-10.88	97.38	113.70
1	1	42	A	C4'-C3'-O3'	10.69	129.03	113.00
25	ad	536	THR	CB-CA-C	10.51	128.70	111.26
1	2	163	A	C1'-C2'-O2'	-10.10	96.64	111.80
1	2	477	A	C2'-C3'-O3'	-10.03	98.66	113.70
1	1	282	U	C4'-C3'-O3'	-9.92	94.52	109.40
1	2	450	A	C4'-C3'-O3'	9.89	127.84	113.00
1	2	165	A	C4'-C3'-O3'	-9.89	94.56	109.40
1	2	529	A	N9-C1'-C2'	9.81	128.72	114.00
1	2	136	U	C2'-C3'-O3'	-9.71	99.14	113.70
1	2	164	A	C3'-C2'-O2'	-9.58	96.33	110.70
1	2	144	C	C1'-C2'-O2'	-9.57	94.05	108.40
1	2	88	U	C1'-C2'-O2'	9.42	122.53	108.40
30	as	215	TRP	CE3-CZ3-CH2	-9.36	108.94	121.10
1	2	245	U	C2'-C3'-O3'	-9.35	99.67	113.70
1	2	390	U	C2'-C3'-O3'	9.32	123.48	109.50
1	2	308	U	C2'-C3'-O3'	-9.30	95.55	109.50
1	2	529	A	C4'-C3'-O3'	-9.29	95.46	109.40
1	2	69	A	C1'-C2'-O2'	-9.14	98.08	111.80
1	2	106	U	C2'-C3'-O3'	9.10	127.34	113.70
101	Am	324	ILE	CA-C-N	8.99	138.01	120.94
101	Am	324	ILE	C-N-CA	8.99	138.01	120.94
1	1	146	U	N1-C1'-C2'	-8.96	98.56	112.00
24	ac	685	LEU	N-CA-C	8.87	129.69	110.80

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type	Atoms	Z	Observed(°)	Ideal(°)
1	2	82	A	C4'-C3'-O3'	8.72	126.07	113.00
1	2	166	G	C2'-C3'-O3'	8.61	122.41	109.50
120	BG	1261	ALA	CA-C-N	-8.59	111.34	121.64
120	BG	1261	ALA	C-N-CA	-8.59	111.34	121.64
1	2	121	C	C3'-C2'-O2'	-8.49	101.87	114.60
1	2	386	A	C1'-C2'-O2'	-8.48	99.08	111.80
77	X	353	PRO	CB-CA-C	8.45	125.50	111.56
45	o	132	ARG	CB-CG-CD	8.42	130.66	111.30
95	Aa	192	LEU	CA-C-N	8.32	137.43	121.54
95	Aa	192	LEU	C-N-CA	8.32	137.43	121.54
1	1	934	G	C1'-C2'-O2'	-8.26	96.01	108.40
66	M	14	PRO	N-CA-CB	-8.25	94.59	103.25
1	1	136	A	C4'-C3'-O3'	8.09	125.14	113.00
105	BP	95	PRO	O-C-N	8.09	125.03	121.31
45	o	132	ARG	CA-CB-CG	8.08	130.26	114.10
68	O	26	MET	N-CA-C	-8.05	98.56	110.23
1	2	523	A	C1'-C2'-O2'	-8.04	99.74	111.80
1	2	243	A	C2'-C3'-O3'	-7.99	97.51	109.50
1	1	906	C	C4'-C3'-O3'	-7.92	97.52	109.40
117	Ax	201	PHE	CB-CA-C	-7.84	98.18	112.76
74	U	25	PHE	CB-CA-C	-7.68	100.99	111.89
1	2	528	A	C2'-C3'-O3'	-7.66	102.22	113.70
94	Au	53	ARG	CA-C-N	7.66	129.41	119.84
94	Au	53	ARG	C-N-CA	7.66	129.41	119.84
1	2	160	G	C2'-C3'-O3'	-7.61	102.28	113.70
25	ad	536	THR	N-CA-CB	-7.59	95.90	110.63
1	2	106	U	C4'-C3'-O3'	-7.54	101.69	113.00
77	X	353	PRO	N-CA-CB	-7.53	95.34	103.25
60	G	149	PRO	N-CA-CB	-7.49	95.39	103.25
1	2	559	U	C2'-C3'-O3'	7.48	124.92	113.70
1	1	511	A	C2'-C3'-O3'	7.39	120.59	109.50
1	2	164	A	C2'-C3'-O3'	-7.37	102.65	113.70
63	J	66	PRO	N-CA-CB	-7.36	95.52	103.25
1	2	457	U	C4'-C3'-O3'	7.35	120.43	109.40
77	X	353	PRO	CA-N-CD	-7.33	101.74	112.00
1	2	165	A	C2'-C3'-O3'	7.21	120.32	109.50
1	2	499	A	C3'-C2'-O2'	7.18	125.37	114.60
1	2	268	C	C1'-C2'-O2'	-7.16	97.66	108.40
1	2	443	C	C2'-C3'-O3'	-7.12	103.02	113.70
1	2	255	U	C2'-C3'-O3'	7.11	124.36	113.70
1	2	192	A	C4'-C3'-O3'	-7.08	102.39	113.00
79	Z	42	ASN	N-CA-C	-7.05	103.52	111.14

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type	Atoms	Z	Observed(°)	Ideal(°)
1	2	197	A	C1'-C2'-O2'	-7.05	101.22	111.80
1	1	511	A	C4'-C3'-O3'	-7.05	98.83	109.40
68	O	27	TYR	CB-CA-C	6.96	122.51	110.68
25	ad	536	THR	N-CA-C	6.96	121.44	112.12
1	2	308	U	C3'-C2'-O2'	-6.94	104.20	114.60
1	2	214	A	C4'-C3'-O3'	-6.93	102.60	113.00
1	2	87	A	C3'-C2'-O2'	-6.93	100.31	110.70
55	B	402	HIS	CA-C-N	6.92	127.34	119.93
55	B	402	HIS	C-N-CA	6.92	127.34	119.93
79	Z	43	ILE	N-CA-C	-6.89	99.71	109.63
1	2	612	U	C2'-C3'-O3'	-6.89	103.37	113.70
94	Au	44	ARG	N-CA-C	-6.88	101.45	110.53
1	2	184	A	C1'-C2'-O2'	-6.87	98.09	108.40
105	BP	95	PRO	CA-C-N	6.82	128.36	119.84
105	BP	95	PRO	C-N-CA	6.82	128.36	119.84
86	Al	280	ARG	CB-CA-C	-6.80	101.71	112.05
1	2	195	A	C4'-C3'-O3'	-6.75	102.87	113.00
1	2	479	A	C2'-C3'-O3'	-6.75	99.37	109.50
1	2	370	A	C3'-C2'-O2'	6.75	120.83	110.70
1	2	442	A	C3'-C2'-O2'	-6.74	104.49	114.60
76	W	92	HIS	CB-CA-C	6.73	116.86	111.00
1	2	93	U	P-O3'-C3'	-6.72	110.12	120.20
1	2	520	A	C4'-C3'-O3'	6.72	123.08	113.00
1	2	471	A	C4'-C3'-O3'	-6.72	102.92	113.00
68	O	23	GLN	N-CA-C	-6.71	105.53	113.38
1	2	524	C	C4'-C3'-O3'	-6.70	99.36	109.40
1	2	92	U	C2'-C3'-O3'	-6.68	103.68	113.70
1	2	479	A	C1'-C2'-O2'	-6.67	101.79	111.80
1	2	391	A	C2'-C3'-O3'	6.64	119.46	109.50
1	2	102	U	C2'-C3'-O3'	-6.64	103.74	113.70
102	Aq	340	TYR	CB-CA-C	6.63	121.47	111.80
1	1	136	A	C5'-C4'-O4'	-6.62	99.88	109.80
1	2	607	U	C2'-C3'-O3'	6.61	119.42	109.50
117	Ax	133	THR	N-CA-C	-6.57	104.12	111.28
1	2	550	C	C2'-C3'-O3'	-6.55	103.87	113.70
118	BL	90	PRO	N-CA-C	-6.54	100.80	111.21
1	1	41	A	C2'-C3'-O3'	-6.54	103.89	113.70
1	2	499	A	C4'-C3'-O3'	-6.53	99.60	109.40
1	2	491	U	C4'-C3'-O3'	6.52	122.78	113.00
1	2	485	A	C4'-C3'-O3'	6.50	119.15	109.40
1	2	220	A	C2'-C3'-O3'	-6.50	103.95	113.70
66	M	5	ALA	CA-C-N	6.49	127.96	119.84

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type	Atoms	Z	Observed(°)	Ideal(°)
66	M	5	ALA	C-N-CA	6.49	127.96	119.84
1	1	861	A	C4'-C3'-O3'	6.44	122.66	113.00
54	A	376	SER	CA-C-N	6.41	126.98	120.38
54	A	376	SER	C-N-CA	6.41	126.98	120.38
1	2	157	G	C4'-C3'-O3'	-6.41	103.39	113.00
1	1	146	U	C4'-C3'-O3'	-6.39	103.42	113.00
1	2	354	A	C3'-C2'-O2'	6.38	120.28	110.70
31	at	315	CYS	CA-CB-SG	6.38	129.07	114.40
66	M	7	ARG	N-CA-C	-6.37	104.43	111.82
117	Ax	170	ALA	N-CA-C	-6.33	105.41	113.01
30	as	215	TRP	CD2-CE2-CZ2	6.33	128.73	122.40
74	U	37	ASN	CB-CA-C	6.32	121.59	110.85
1	2	490	A	C4'-C3'-O3'	6.31	122.46	113.00
1	2	144	C	P-O3'-C3'	-6.27	110.80	120.20
60	G	134	ARG	N-CA-C	-6.27	105.95	113.97
1	2	332	G	C1'-C2'-O2'	-6.25	102.42	111.80
1	2	582	A	C4'-C3'-O3'	-6.24	103.65	113.00
1	2	513	U	C4'-C3'-O3'	6.22	118.73	109.40
1	2	234	C	C2'-C3'-O3'	-6.20	104.39	113.70
1	2	206	A	C4'-C3'-O3'	-6.19	103.72	113.00
1	2	119	U	C1'-C2'-O2'	-6.17	99.15	108.40
1	2	526	A	C2'-C3'-O3'	-6.16	104.46	113.70
35	t	71	ILE	N-CA-C	-6.15	107.87	113.71
1	2	325	U	C3'-C2'-O2'	-6.15	101.48	110.70
1	2	258	A	C3'-C2'-O2'	-6.15	105.38	114.60
1	2	138	U	C1'-C2'-O2'	-6.14	99.19	108.40
1	2	354	A	C4'-C3'-O3'	-6.12	103.83	113.00
1	2	220	A	C1'-C2'-O2'	-6.10	99.25	108.40
82	BB	112	LEU	CA-C-N	6.07	126.04	120.03
82	BB	112	LEU	C-N-CA	6.07	126.04	120.03
1	2	245	U	C3'-C2'-O2'	-6.07	101.60	110.70
1	2	442	A	C4'-C3'-O3'	6.05	118.47	109.40
1	2	544	G	C3'-C2'-O2'	6.03	119.75	110.70
1	2	342	A	O4'-C1'-C2'	-6.01	101.58	107.60
117	Ax	109	ASP	CB-CA-C	6.01	118.71	110.06
1	2	242	U	C4'-C3'-O3'	-6.00	100.40	109.40
1	2	581	U	C3'-C2'-O2'	5.93	119.60	110.70
1	2	437	U	C4'-C3'-O3'	5.91	121.86	113.00
1	2	104	A	C1'-C2'-O2'	-5.89	99.56	108.40
1	2	150	A	C2'-C3'-O3'	-5.88	100.67	109.50
1	2	167	U	N1-C1'-C2'	5.88	122.83	114.00
1	2	258	A	C2'-C3'-O3'	-5.88	100.68	109.50

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type	Atoms	Z	Observed(°)	Ideal(°)
117	Ax	106	PHE	CB-CA-C	-5.87	101.63	110.90
1	2	116	U	C4'-C3'-O3'	-5.86	100.61	109.40
74	U	31	PRO	CB-CA-C	-5.86	102.95	112.62
1	2	529	A	C3'-C2'-C1'	5.86	107.36	101.50
1	2	87	A	C2'-C3'-O3'	-5.85	104.92	113.70
85	An	137	GLU	N-CA-C	-5.84	104.91	111.28
91	Ab	131	ALA	N-CA-C	-5.84	106.49	113.21
1	2	236	U	C4'-C3'-O3'	-5.84	104.24	113.00
1	2	500	U	C4'-C3'-O3'	-5.84	100.64	109.40
1	2	444	A	C2'-C3'-O3'	-5.83	104.95	113.70
38	l	315	TYR	CB-CA-C	5.83	116.64	110.17
20	u	629	VAL	N-CA-CB	-5.82	101.62	111.23
1	2	70	A	C4'-C3'-O3'	-5.82	104.28	113.00
117	Ax	124	PRO	N-CA-C	-5.76	100.61	112.47
117	Ax	170	ALA	CA-C-N	-5.74	112.33	122.26
117	Ax	170	ALA	C-N-CA	-5.74	112.33	122.26
1	2	143	G	C2'-C3'-O3'	-5.74	105.10	113.70
79	Z	43	ILE	CA-C-O	-5.73	115.05	121.36
1	2	96	G	C3'-C2'-O2'	-5.72	106.02	114.60
1	2	193	A	C4'-C3'-O3'	-5.71	100.84	109.40
118	BL	130	LEU	N-CA-C	-5.71	99.07	108.49
120	BG	1265	PRO	N-CA-CB	5.71	109.24	103.25
66	M	9	ASN	CA-C-N	-5.69	115.68	123.14
66	M	9	ASN	C-N-CA	-5.69	115.68	123.14
105	BP	98	PRO	CB-CA-C	-5.69	104.12	111.46
1	2	255	U	C3'-C2'-O2'	5.69	119.23	110.70
105	BP	143	PRO	N-CA-C	-5.69	106.44	113.84
1	2	193	A	C1'-C2'-O2'	-5.69	103.27	111.80
1	2	84	U	C2'-C3'-O3'	-5.67	101.00	109.50
66	M	9	ASN	CB-CA-C	-5.65	103.54	111.85
1	1	239	U	C4'-C3'-O3'	5.65	117.87	109.40
14	e	311	PHE	N-CA-C	5.64	118.58	109.83
1	2	251	U	C2'-C3'-O3'	-5.63	105.25	113.70
1	2	516	A	C4'-C3'-O3'	5.62	121.43	113.00
60	G	136	GLY	CA-C-O	-5.61	118.28	122.37
120	BG	1262	CYS	N-CA-C	5.61	117.73	108.48
117	Ax	108	CYS	CB-CA-C	5.58	119.00	109.24
85	An	48	HIS	CA-C-N	5.58	132.19	121.54
85	An	48	HIS	C-N-CA	5.58	132.19	121.54
118	BL	139	ARG	N-CA-C	5.57	117.44	111.36
1	2	586	A	C3'-C2'-O2'	5.55	119.02	110.70
68	O	27	TYR	CA-C-O	-5.55	114.64	120.63

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type	Atoms	Z	Observed(°)	Ideal(°)
113	Ah	66	LYS	N-CA-C	-5.53	100.66	109.23
24	ac	685	LEU	CB-CA-C	-5.51	99.45	110.42
1	2	499	A	C2'-C3'-O3'	5.49	117.74	109.50
1	2	247	U	C2'-C3'-O3'	-5.49	105.47	113.70
1	1	906	C	C2'-C3'-O3'	-5.48	101.28	109.50
117	Ax	200	PHE	CB-CA-C	5.48	125.72	113.33
1	2	308	U	C4'-C3'-O3'	5.47	117.61	109.40
1	2	599	A	C2'-C3'-O3'	-5.46	105.52	113.70
25	ad	736	THR	N-CA-C	-5.46	106.54	114.12
1	2	195	A	C2'-C3'-O3'	-5.45	105.53	113.70
86	Al	287	TRP	N-CA-C	-5.44	105.78	112.90
1	2	356	G	C1'-C2'-O2'	-5.43	103.65	111.80
117	Ax	169	CYS	CB-CA-C	-5.43	101.61	110.85
66	M	17	LYS	CA-C-N	5.43	131.91	121.54
66	M	17	LYS	C-N-CA	5.43	131.91	121.54
1	2	428	U	C4'-C3'-O3'	5.42	117.53	109.40
30	as	215	TRP	CH2-CZ2-CE2	5.42	124.54	117.50
1	2	449	A	O4'-C4'-C3'	-5.42	98.58	104.00
1	2	613	U	C3'-C2'-O2'	5.40	118.81	110.70
1	2	438	G	O5'-C5'-C4'	-5.40	103.40	111.50
1	2	422	U	C4'-C3'-O3'	-5.39	101.31	109.40
1	2	83	A	C2'-C3'-O3'	5.38	121.77	113.70
54	A	383	PHE	N-CA-C	-5.37	102.34	110.24
1	2	577	G	C2'-C3'-O3'	-5.37	105.65	113.70
1	2	327	U	C2'-C3'-O3'	5.35	117.53	109.50
1	2	244	A	C3'-C2'-O2'	-5.35	106.58	114.60
28	ap	212	VAL	N-CA-C	-5.35	107.15	111.91
1	2	70	A	C2'-C3'-O3'	5.34	121.71	113.70
1	2	553	C	C2'-C3'-O3'	-5.33	105.70	113.70
1	2	297	U	C2'-C3'-O3'	-5.33	105.71	113.70
1	1	146	U	C2'-C3'-O3'	-5.31	105.74	113.70
1	1	42	A	C2'-C3'-O3'	-5.29	105.77	113.70
1	2	572	A	C4'-C3'-O3'	5.28	117.31	109.40
1	2	92	U	C1'-C2'-O2'	5.25	116.28	108.40
113	Ah	55	TYR	CA-C-O	-5.23	113.03	120.51
1	1	905	A	C2'-C3'-O3'	5.23	117.35	109.50
1	2	146	A	O4'-C1'-C2'	-5.22	102.38	107.60
118	BL	184	ALA	CA-C-N	-5.22	114.13	122.17
118	BL	184	ALA	C-N-CA	-5.22	114.13	122.17
1	2	269	A	C4'-C3'-O3'	-5.22	105.17	113.00
1	1	146	U	C3'-C2'-O2'	5.22	118.53	110.70
79	Z	45	ARG	N-CA-C	-5.21	106.02	112.38

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type	Atoms	Z	Observed(°)	Ideal(°)
55	B	407	GLU	N-CA-C	-5.21	106.99	113.19
113	Ah	66	LYS	CA-C-O	-5.21	115.01	121.06
1	2	132	U	C1'-C2'-O2'	-5.20	104.00	111.80
1	2	140	A	C2'-C3'-O3'	-5.20	105.91	113.70
102	Aq	79	GLY	N-CA-C	-5.20	108.51	115.32
1	2	121	C	C1'-C2'-O2'	-5.19	104.02	111.80
1	2	236	U	C3'-C2'-O2'	-5.16	102.96	110.70
1	2	139	U	C2'-C3'-O3'	-5.16	105.97	113.70
1	2	519	U	C4'-C3'-O3'	-5.16	105.27	113.00
1	2	484	A	C2'-C3'-O3'	-5.15	105.97	113.70
1	2	472	A	C1'-C2'-O2'	-5.14	104.08	111.80
79	Z	40	THR	N-CA-C	-5.14	107.37	113.38
1	2	175	U	C3'-C2'-O2'	-5.13	106.90	114.60
1	2	83	A	O4'-C1'-C2'	-5.13	102.47	107.60
1	2	166	G	O4'-C4'-C3'	-5.12	100.98	106.10
1	2	418	A	N9-C1'-C2'	5.12	121.69	114.00
1	2	281	A	C4'-C3'-O3'	-5.12	105.32	113.00
1	2	334	U	C3'-C2'-O2'	-5.12	106.92	114.60
36	p	285	ALA	N-CA-C	-5.12	106.86	114.64
1	2	294	A	C4'-C3'-O3'	-5.10	105.35	113.00
1	2	361	U	C4'-C3'-O3'	-5.10	105.35	113.00
95	Aa	190	SER	N-CA-C	-5.10	104.39	111.28
1	2	227	U	C1'-C2'-O2'	5.10	116.05	108.40
1	2	436	U	C1'-C2'-O2'	-5.10	100.75	108.40
86	Al	38	VAL	N-CA-C	-5.10	107.33	112.17
1	2	162	A	C3'-C2'-O2'	-5.08	106.98	114.60
118	BL	132	HIS	CB-CA-C	-5.08	102.91	110.88
1	1	282	U	C2'-C3'-O3'	5.07	117.11	109.50
1	2	131	U	C1'-C2'-O2'	5.07	116.00	108.40
1	2	485	A	C2'-C3'-O3'	5.06	117.10	109.50
1	2	570	A	C2'-C3'-O3'	-5.04	106.14	113.70
1	2	537	A	C1'-C2'-O2'	-5.04	104.24	111.80
1	2	313	C	C3'-C2'-O2'	-5.04	103.14	110.70
1	2	181	U	C2'-C3'-O3'	-5.04	106.15	113.70
117	Ax	149	LYS	CB-CA-C	5.04	120.58	111.06
60	G	151	PHE	CA-CB-CG	5.03	118.83	113.80
1	1	41	A	N9-C1'-C2'	-5.01	104.49	112.00

All (3) chirality outliers are listed below:

Mol	Chain	Res	Type	Atom
1	2	529	A	C2'

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type	Atom
1	1	136	A	C3',C4'

All (72) planarity outliers are listed below:

Mol	Chain	Res	Type	Group
1	2	438	G	Sidechain
54	A	288	HIS	Peptide
106	Ad	36	ASP	Peptide
109	Af	60	PHE	Peptide
104	Ak	227	PRO	Peptide
101	Am	329	PRO	Peptide
85	An	49	SER	Peptide
85	An	50	HIS	Peptide
96	Ao	19	ARG	Peptide
102	Aq	171	ALA	Peptide
102	Aq	174	ARG	Peptide
94	Au	26	TYR	Peptide
94	Au	55	SER	Peptide
94	Au	61	PHE	Peptide
115	Ay	149	ARG	Peptide
80	BA	139	THR	Peptide
80	BA	141	VAL	Peptide
82	BB	129	THR	Peptide
82	BB	55	GLN	Peptide
103	BE	69	SER	Peptide
103	BE	78	PRO	Peptide
103	BE	79	VAL	Peptide
118	BL	178	ALA	Peptide
118	BL	179	ASN	Peptide
118	BL	336	PRO	Peptide
119	BO	103	VAL	Peptide
119	BO	104	GLN	Peptide
119	BO	183	VAL	Peptide
119	BO	75	LYS	Peptide
119	BO	76	HIS	Peptide
84	Bj	101	PRO	Peptide
56	C	142	ASN	Peptide
59	F	166	PRO	Peptide
62	I	235	TRP	Peptide
65	L	71	ARG	Peptide
71	R	125	PRO	Peptide
71	R	136	ASP	Peptide

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type	Group
81	UA	47	UNK	Peptide
81	UA	81	UNK	Peptide
122	UC	92	UNK	Peptide
122	UC	94	UNK	Peptide
123	UD	67	UNK	Peptide
79	Z	21	PHE	Peptide
50	a	261	ASN	Peptide
24	ac	1082	TYR	Peptide
24	ac	1086	PRO	Peptide
24	ac	1208	GLN	Peptide
24	ac	450	SER	Peptide
24	ac	514	LYS	Peptide
24	ac	515	ALA	Peptide
25	ad	413	ASP	Peptide
25	ad	418	ALA	Peptide
25	ad	521	ASP	Peptide
10	ae	425	ASP	Peptide
12	ag	257	VAL	Peptide
26	an	154	ALA	Peptide
26	an	160	ALA	Peptide
26	an	162	ALA	Peptide
27	ao	180	THR	Peptide
28	ap	21	ALA	Peptide
49	b	108	GLN	Peptide
53	bd	68	ALA	Peptide
14	e	291	SER	Peptide
38	l	315	TYR	Peptide
4	m	10	ASN	Peptide
36	p	269	THR	Peptide
20	u	628	GLY	Peptide
20	u	629	VAL	Peptide
42	x	69	ALA	Peptide
32	y	164	PRO	Peptide
52	z	673	ASP	Peptide
52	z	926	VAL	Peptide

5.2 Too-close contacts

In the following table, the Non-H and H(model) columns list the number of non-hydrogen atoms and hydrogen atoms in the chain respectively. The H(added) column lists the number of hydrogen atoms added and optimized by MolProbity. The Clashes column lists the number of clashes within the asymmetric unit, whereas Symm-Clashes lists symmetry-related clashes.

Mol	Chain	Non-H	H(model)	H(added)	Clashes	Symm-Clashes
1	1	22858	0	11435	1308	0
1	2	12723	0	6326	3541	0
2	h	1311	0	1280	200	0
3	aw	1144	0	1134	233	0
4	m	2368	0	2289	152	0
5	f	1213	0	1174	120	0
6	s	1349	0	1313	231	0
7	au	2066	0	1931	122	0
8	am	2198	0	2181	234	0
9	n	1176	0	1183	165	0
10	ae	4593	0	4568	386	0
11	ay	1187	0	1172	85	0
12	ag	4521	0	4448	278	0
13	aj	2560	0	2500	258	0
14	e	6413	0	6117	380	0
15	d	2715	0	2689	241	0
16	az	1301	0	1302	176	0
17	ax	1356	0	1341	86	0
18	r	3703	0	3597	173	0
19	af	4698	0	4613	225	0
20	u	5564	0	5606	290	0
21	aa	12070	0	11779	567	0
22	ab	9209	0	8848	451	0
23	ak	2141	0	2110	145	0
24	ac	8700	0	8511	468	0
25	ad	5676	0	5503	396	0
26	an	2480	0	2457	152	0
27	ao	1535	0	1538	85	0
28	ap	1893	0	1853	105	0
29	aq	1794	0	1723	206	0
30	as	1954	0	1919	148	0
31	at	1631	0	1603	82	0
32	y	2152	0	2180	107	0
33	w	1279	0	1251	181	0
34	v	486	0	469	31	0
35	t	1776	0	1723	158	0
36	p	1954	0	1923	121	0
37	j	1506	0	1504	186	0
38	l	4438	0	4408	316	0
39	ar	1993	0	1984	125	0
40	av	1237	0	1195	74	0
41	ai	3068	0	3089	130	0
42	x	2034	0	1938	102	0

Continued on next page...

Continued from previous page...

Mol	Chain	Non-H	H(model)	H(added)	Clashes	Symm-Clashes
43	i	2221	0	2221	209	0
44	g	818	0	818	92	0
45	o	3736	0	3614	221	0
46	c	2038	0	2000	120	0
47	k	951	0	959	64	0
48	q	1699	0	1637	194	0
49	b	1290	0	1271	131	0
50	a	3298	0	3283	267	0
51	ba	223	0	198	12	0
52	z	7713	0	7521	349	0
53	bd	350	0	380	48	0
54	A	2996	0	2807	148	0
55	B	3513	0	3413	192	0
56	C	1772	0	1734	103	0
57	D	1036	0	1038	54	0
58	E	2668	0	2697	137	0
59	F	1435	0	1396	88	0
60	G	3012	0	2917	190	0
61	H	1305	0	1315	96	0
62	I	2153	0	2089	146	0
63	J	1146	0	1145	91	0
64	K	1467	0	1469	101	0
65	L	1419	0	1443	82	0
66	M	2116	0	2150	138	0
67	N	1599	0	1591	81	0
68	O	2537	0	2530	149	0
69	P	1367	0	1374	102	0
70	Q	1785	0	1784	109	0
71	R	3755	0	3722	184	0
72	S	1244	0	1272	63	0
73	T	487	0	496	28	0
74	U	744	0	798	78	0
75	V	1202	0	1224	94	0
76	W	465	0	446	17	0
77	X	3733	0	3604	196	0
78	Y	2067	0	1955	116	0
79	Z	1223	0	1192	89	0
80	BA	1038	0	1052	79	0
81	UA	1015	0	213	33	0
82	BB	1028	0	1003	82	0
83	Aw	1509	0	1470	83	0
84	Bj	1358	0	1422	85	0

Continued on next page...

Continued from previous page...

Mol	Chain	Non-H	H(model)	H(added)	Clashes	Symm-Clashes
85	An	2605	0	2536	221	0
86	Al	2152	0	2112	132	0
87	BI	1409	0	1400	49	0
88	Az	1215	0	1144	71	0
89	At	1346	0	1299	92	0
90	BC	1114	0	1096	70	0
91	Ab	2185	0	2095	144	0
92	Ai	3789	0	3752	157	0
93	Ap	1775	0	1699	66	0
94	Au	1490	0	1450	130	0
95	Aa	1417	0	1377	126	0
96	Ao	2276	0	2176	124	0
97	BM	3069	0	3105	214	0
98	Ar	1644	0	1608	102	0
99	Aj	2766	0	2765	149	0
100	BH	1659	0	1607	73	0
101	Am	2708	0	2634	132	0
102	Aq	2074	0	2050	142	0
103	BE	700	0	665	43	0
104	Ak	2352	0	2369	109	0
105	BP	1593	0	1529	105	0
106	Ad	1632	0	1607	120	0
107	BF	851	0	831	49	0
108	Av	1300	0	1284	90	0
109	Af	1132	0	1108	63	0
110	As	787	0	777	47	0
111	Ae	2359	0	2328	97	0
112	Ac	2174	0	2096	120	0
113	Ah	3686	0	3572	212	0
114	BD	807	0	772	37	0
115	Ay	1226	0	1157	69	0
116	Ag	1916	0	1888	107	0
117	Ax	1388	0	1308	116	0
118	BL	2497	0	2489	183	0
119	BO	1239	0	1246	155	0
120	BG	643	0	617	38	0
121	UB	335	0	73	8	0
122	UC	720	0	150	10	0
123	UD	475	0	105	11	0
124	Ax	2	0	0	0	0
124	BD	1	0	0	0	0
124	BG	1	0	0	2	0

Continued on next page...

Continued from previous page...

Mol	Chain	Non-H	H(model)	H(added)	Clashes	Symm-Clashes
124	T	1	0	0	2	0
124	W	1	0	0	0	0
125	Ag	44	0	26	10	0
126	1	2	0	0	0	0
All	All	303111	0	278272	16534	0

The all-atom clashscore is defined as the number of clashes found per 1000 atoms (including hydrogen atoms). The all-atom clashscore for this structure is 29.

All (16534) close contacts within the same asymmetric unit are listed below, sorted by their clash magnitude.

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:502:A:C8	14:e:789:PRO:HG3	1.26	1.64
30:as:215:TRP:CZ2	30:as:215:TRP:CH2	1.77	1.64
1:2:497:A:C6	3:aw:17:ILE:HG21	1.30	1.63
1:2:175:U:C5'	48:q:11:GLN:CG	1.78	1.62
50:a:349:TRP:CZ3	50:a:349:TRP:CH2	1.75	1.62
1:2:86:C:C2'	47:k:152:LYS:HG3	1.20	1.61
1:2:453:A:C5'	8:am:277:PRO:HG3	1.30	1.60
1:2:456:A:C2	8:am:284:ARG:HG2	1.36	1.58
1:2:480:A:C4	2:h:21:HIS:CE1	1.91	1.58
1:2:4:A:C6	25:ad:27:ILE:HD11	1.31	1.57
1:2:499:A:C2	11:ay:132:THR:HB	1.38	1.57
1:2:122:U:H5	43:i:293:VAL:CG1	1.13	1.57
1:2:172:A:H61	37:j:17:LYS:CD	1.16	1.56
50:a:349:TRP:CZ3	50:a:349:TRP:CE3	1.93	1.56
1:2:107:A:H5''	43:i:363:TYR:CE2	1.41	1.56
25:ad:536:THR:HA	30:as:215:TRP:CD2	1.41	1.55
1:2:486:A:C5	9:n:121:PHE:CE2	1.94	1.54
1:2:497:A:C5'	3:aw:4:ALA:HB2	1.09	1.54
30:as:215:TRP:CZ2	30:as:215:TRP:CE2	1.95	1.53
1:2:172:A:C6	37:j:17:LYS:HA	1.39	1.53
1:2:453:A:H5''	8:am:277:PRO:CG	1.34	1.53
1:2:516:A:C8	17:ax:36:MET:HG2	1.41	1.53
1:2:412:G:C6	10:ae:53:THR:CB	1.93	1.51
1:2:122:U:C5	43:i:293:VAL:CG1	1.92	1.50
1:2:569:G:H2'	1:2:570:A:C5'	1.35	1.50
1:2:86:C:C1'	47:k:152:LYS:HG3	1.39	1.50
1:2:363:A:C2	1:2:365:A:N6	1.76	1.50
1:2:437:U:C2	6:s:151:ARG:O	1.64	1.49
1:2:175:U:H3'	48:q:11:GLN:CA	1.23	1.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:282:A:C4'	43:i:247:ILE:CD1	1.90	1.48
1:2:440:C:H41	1:2:443:C:N4	1.11	1.48
1:2:39:U:C5	33:w:139:TYR:O	1.67	1.47
1:2:282:A:C4'	43:i:247:ILE:HD11	1.40	1.47
1:2:417:C:H2'	10:ae:128:TYR:CZ	1.48	1.47
1:2:122:U:C5	43:i:293:VAL:HG13	1.47	1.47
1:2:158:U:C5'	29:aq:18:TYR:HB3	1.44	1.47
1:2:495:U:O3'	3:aw:2:HIS:CD2	1.64	1.47
1:2:39:U:C4	33:w:139:TYR:O	1.65	1.47
1:2:526:A:C5	15:d:294:ILE:HG22	1.48	1.47
1:2:172:A:N6	37:j:17:LYS:CA	1.77	1.46
1:2:436:U:C1'	6:s:154:VAL:HG22	1.40	1.46
1:2:437:U:C5'	6:s:153:LYS:HB2	1.44	1.46
1:2:529:A:C2	16:az:72:LYS:CE	1.96	1.46
1:2:39:U:C2	29:aq:10:ALA:HB3	1.47	1.46
1:2:460:A:N1	8:am:300:ILE:HG22	1.30	1.46
1:2:497:A:C5'	3:aw:4:ALA:CB	1.93	1.46
1:2:419:A:H2'	10:ae:181:ARG:CG	1.43	1.46
1:2:495:U:C6	3:aw:30:LYS:HB3	1.50	1.45
1:2:529:A:C2	16:az:72:LYS:HE3	1.50	1.45
30:as:215:TRP:CD2	30:as:215:TRP:CE2	1.77	1.44
1:2:459:A:H3'	8:am:284:ARG:NH1	1.22	1.44
1:2:501:U:C5	3:aw:27:ARG:NH2	1.84	1.44
1:2:425:A:H4'	13:aj:235:GLU:CB	1.42	1.44
1:2:456:A:C2	8:am:284:ARG:CG	2.00	1.44
1:2:516:A:H8	17:ax:36:MET:CG	1.29	1.44
1:2:158:U:C3'	29:aq:18:TYR:HB2	1.32	1.43
1:2:486:A:C6	9:n:121:PHE:CE2	2.06	1.43
1:2:459:A:C3'	8:am:284:ARG:HH12	1.32	1.43
1:2:431:U:C2	13:aj:280:HIS:NE2	1.84	1.43
1:2:172:A:N6	37:j:17:LYS:HD3	1.26	1.43
8:am:142:MET:CE	8:am:147:ILE:HG21	1.49	1.43
1:2:437:U:C5	6:s:151:ARG:N	1.85	1.42
1:2:2:U:H3'	25:ad:706:GLN:NE2	1.26	1.42
1:2:107:A:H5''	43:i:363:TYR:CZ	1.54	1.42
1:2:122:U:N3	43:i:297:GLN:HG3	1.10	1.42
1:2:424:U:O4	13:aj:197:ASP:CB	1.64	1.41
1:2:525:A:H3'	15:d:331:GLU:N	1.30	1.41
49:b:23:ARG:CD	85:An:150:PHE:CE1	2.02	1.41
1:2:434:U:C5	10:ae:11:ARG:N	1.87	1.41
1:2:440:C:N4	1:2:443:C:H41	1.13	1.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:158:U:H4'	29:aq:18:TYR:N	1.32	1.41
1:2:280:A:N6	46:c:171:LYS:HD3	1.29	1.41
1:2:45:U:H4'	29:aq:22:PHE:CA	1.02	1.40
1:2:497:A:C4'	3:aw:4:ALA:HB2	1.51	1.40
1:2:45:U:C4'	29:aq:22:PHE:HA	1.27	1.40
1:2:170:U:C5	37:j:17:LYS:CB	1.95	1.39
1:2:417:C:H2'	10:ae:128:TYR:CE2	1.56	1.39
1:2:526:A:N7	15:d:294:ILE:CG2	1.84	1.39
1:2:497:A:C6	3:aw:17:ILE:CG2	2.03	1.39
1:2:503:A:N1	14:e:718:PRO:HA	1.30	1.39
1:2:47:U:OP2	29:aq:13:ARG:HB2	1.21	1.38
1:2:50:U:H5''	37:j:11:ARG:NH2	1.38	1.38
1:2:282:A:N6	43:i:251:ILE:HG12	1.09	1.38
1:2:495:U:H5''	3:aw:1:MET:CE	1.49	1.38
1:2:502:A:C2	6:s:75:ARG:NH2	1.91	1.38
1:2:313:C:O2'	4:m:165:VAL:CG1	1.70	1.38
1:2:497:A:C4	3:aw:17:ILE:HD13	1.59	1.38
1:2:513:U:H5'	16:az:145:ARG:NH2	1.29	1.38
1:2:422:U:H3	13:aj:52:TYR:CB	1.38	1.37
1:2:481:U:C2	2:h:90:ALA:HB1	1.57	1.37
25:ad:536:THR:C	30:as:215:TRP:CZ3	2.03	1.37
30:as:215:TRP:CH2	30:as:215:TRP:CZ3	2.13	1.37
1:2:68:A:C5'	37:j:22:TRP:CG	2.06	1.37
1:2:417:C:C2	10:ae:128:TYR:CE1	2.13	1.37
1:2:4:A:C6	25:ad:27:ILE:CD1	2.07	1.36
1:2:4:A:N6	25:ad:27:ILE:HD11	1.38	1.36
1:2:480:A:C8	2:h:21:HIS:ND1	1.93	1.36
1:2:39:U:N3	29:aq:10:ALA:HB3	1.07	1.35
1:2:68:A:H5''	37:j:22:TRP:CD1	1.59	1.35
1:2:177:U:C1'	33:w:64:VAL:HG21	1.56	1.35
1:2:421:A:H4'	10:ae:298:TYR:CE2	1.42	1.35
1:2:39:U:C2	29:aq:10:ALA:CB	2.05	1.35
1:2:86:C:C2'	47:k:152:LYS:CG	1.89	1.35
1:2:480:A:C5	2:h:21:HIS:CG	2.14	1.34
1:2:177:U:H1'	33:w:64:VAL:CG2	1.56	1.34
1:2:460:A:N1	8:am:300:ILE:CG2	1.90	1.34
1:2:419:A:O2'	10:ae:181:ARG:HD2	1.22	1.34
1:2:499:A:H2	11:ay:132:THR:CB	1.39	1.34
1:2:456:A:N1	8:am:284:ARG:HG2	1.37	1.34
25:ad:537:GLU:N	30:as:215:TRP:CZ3	1.96	1.34
1:2:501:U:C5	3:aw:27:ARG:CZ	2.10	1.33

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:615:U:C6	44:g:101:ARG:HD2	1.62	1.33
1:2:10:U:O3'	50:a:263:LYS:CG	1.73	1.33
1:2:521:A:OP1	5:f:10:ARG:CA	1.74	1.33
1:2:175:U:C5'	48:q:11:GLN:HG3	1.46	1.33
1:2:432:G:C2	10:ae:22:LEU:CD2	2.11	1.33
1:2:158:U:C4'	29:aq:18:TYR:CB	2.04	1.33
25:ad:536:THR:C	30:as:215:TRP:CE3	2.06	1.33
1:2:228:G:H2'	1:2:242:U:C5	1.63	1.32
1:2:478:U:O3'	2:h:20:ARG:NH1	1.57	1.32
1:2:172:A:N6	37:j:17:LYS:HA	1.02	1.32
1:2:175:U:C3'	48:q:11:GLN:HA	1.16	1.32
1:2:408:U:H4'	9:n:56:HIS:CD2	1.63	1.32
25:ad:536:THR:C	25:ad:536:THR:CA	2.01	1.32
1:2:158:U:C4'	29:aq:18:TYR:HB2	1.59	1.32
1:2:436:U:O2	6:s:152:PHE:HA	1.15	1.31
1:2:68:A:H5''	37:j:22:TRP:CG	1.61	1.31
1:2:65:U:O3'	35:t:36:ARG:HG2	1.31	1.31
1:2:225:G:N1	1:2:248:C:N3	1.72	1.31
1:2:431:U:N3	13:aj:280:HIS:NE2	1.76	1.31
1:2:481:U:C2	2:h:90:ALA:CB	2.13	1.31
1:2:397:U:OP2	5:f:19:GLY:HA3	1.24	1.31
1:2:434:U:C4	10:ae:10:GLY:O	1.84	1.31
1:2:66:U:H4'	35:t:35:ARG:CD	1.28	1.30
1:2:282:A:H62	43:i:251:ILE:CG1	1.42	1.30
1:2:482:C:C2	10:ae:56:TYR:CG	2.19	1.30
1:2:122:U:C4	43:i:297:GLN:HG3	1.64	1.30
1:2:569:G:C2'	1:2:570:A:H5'	1.62	1.30
1:2:434:U:C5	10:ae:10:GLY:C	2.10	1.30
1:2:436:U:O4'	6:s:154:VAL:CG2	1.76	1.30
1:2:446:G:O6	12:ag:19:ARG:NH2	1.65	1.30
1:2:495:U:H6	3:aw:30:LYS:CB	1.43	1.30
1:2:491:U:O4	14:e:383:THR:HB	1.23	1.30
1:2:36:G:O4'	33:w:130:LYS:HD3	1.12	1.29
1:2:526:A:N6	15:d:293:GLU:HG2	1.45	1.29
1:2:39:U:N3	29:aq:10:ALA:CB	1.94	1.29
1:2:301:U:C2	1:2:302:A:C8	2.20	1.29
1:2:27:U:O4	1:2:260:A:N6	1.62	1.29
1:2:503:A:N1	14:e:718:PRO:CA	1.94	1.29
1:2:16:U:C5	1:2:17:C:C5	2.20	1.29
1:2:416:A:OP2	10:ae:162:SER:CB	1.79	1.29
1:2:463:G:OP1	8:am:298:ARG:N	1.64	1.29

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:499:A:C2	11:ay:132:THR:CB	2.11	1.29
1:2:177:U:H4'	33:w:119:ARG:CD	1.60	1.28
1:2:525:A:O4'	15:d:329:ARG:HB3	1.24	1.28
1:2:569:G:C2'	1:2:570:A:C5'	2.10	1.28
1:2:446:G:C6	12:ag:19:ARG:NH2	2.00	1.28
1:2:38:U:P	33:w:139:TYR:CE1	2.26	1.27
1:2:480:A:N9	2:h:21:HIS:CE1	2.02	1.27
1:2:175:U:H5'	48:q:11:GLN:CG	0.82	1.27
1:2:49:A:H8	37:j:10:ALA:C	1.41	1.27
1:2:49:A:C8	37:j:10:ALA:C	2.12	1.27
1:2:499:A:N1	11:ay:132:THR:HB	1.46	1.27
1:2:282:A:O4'	43:i:247:ILE:CG1	1.82	1.27
1:2:434:U:H5	10:ae:11:ARG:CA	1.47	1.27
1:2:436:U:O4	7:au:10:SER:HB2	1.32	1.27
1:2:454:U:H5''	8:am:276:SER:OG	1.19	1.27
1:2:469:C:O2'	2:h:19:ARG:NH2	1.66	1.27
1:2:181:U:O5'	33:w:101:ARG:O	1.52	1.27
1:2:516:A:C8	17:ax:36:MET:CG	2.05	1.26
1:2:532:U:C4	16:az:76:ARG:CZ	2.16	1.26
1:2:49:A:C8	37:j:10:ALA:O	1.87	1.26
1:2:44:A:OP1	29:aq:26:ALA:O	1.53	1.26
1:2:521:A:OP1	5:f:10:ARG:HA	1.08	1.26
1:2:434:U:C5	10:ae:11:ARG:CA	2.17	1.26
1:2:175:U:N1	48:q:12:MET:O	1.68	1.26
1:2:228:G:H2'	1:2:242:U:C6	1.71	1.26
1:2:408:U:OP1	9:n:58:LYS:NZ	1.67	1.26
1:2:491:U:OP1	9:n:46:GLN:NE2	1.67	1.26
1:2:497:A:N6	3:aw:17:ILE:CG2	1.95	1.26
1:2:529:A:O2'	16:az:72:LYS:HA	1.31	1.26
1:2:282:A:H4'	43:i:247:ILE:CD1	1.50	1.25
1:2:510:A:N7	3:aw:21:ASP:HB2	1.50	1.25
1:2:522:A:P	15:d:345:LYS:HG3	1.75	1.25
1:2:412:G:O6	10:ae:53:THR:CB	1.80	1.25
1:2:420:U:H4'	13:aj:59:VAL:CG1	1.49	1.25
1:2:436:U:C1'	6:s:154:VAL:CG2	2.12	1.25
1:2:499:A:H2	11:ay:132:THR:CG2	1.49	1.25
25:ad:536:THR:HA	30:as:215:TRP:CE2	1.69	1.25
1:2:158:U:H5''	29:aq:18:TYR:CB	1.64	1.25
1:2:174:U:O2'	35:t:27:MET:CE	1.83	1.25
1:2:412:G:C6	10:ae:53:THR:HB	1.02	1.25
1:2:419:A:C2'	10:ae:181:ARG:HG3	1.65	1.25

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:38:U:O5'	33:w:139:TYR:CE1	1.90	1.25
1:2:527:U:H1'	16:az:69:HIS:NE2	1.49	1.25
1:2:47:U:OP2	29:aq:13:ARG:CB	1.84	1.25
1:2:2:U:C3'	25:ad:706:GLN:NE2	2.00	1.24
1:2:510:A:C6	3:aw:21:ASP:HA	1.72	1.24
1:2:454:U:C5'	8:am:276:SER:OG	1.85	1.24
1:2:528:A:OP1	16:az:69:HIS:CB	1.84	1.24
1:2:604:U:C5'	44:g:82:SER:CB	2.16	1.24
1:2:434:U:C4	10:ae:10:GLY:C	2.16	1.24
1:2:525:A:H3'	15:d:330:ARG:C	1.61	1.24
1:2:532:U:C2	16:az:76:ARG:NH1	2.05	1.24
1:2:432:G:N2	10:ae:22:LEU:HD23	1.51	1.24
1:2:615:U:C5	44:g:101:ARG:HD2	1.72	1.24
1:2:413:U:C4	2:h:23:HIS:ND1	2.04	1.23
1:2:414:C:N4	2:h:13:ILE:HG22	1.53	1.23
1:2:415:A:C1'	10:ae:36:ARG:HH12	1.50	1.23
1:2:495:U:C6	3:aw:30:LYS:CB	2.20	1.23
1:2:502:A:C8	14:e:789:PRO:CG	2.21	1.23
1:2:615:U:N1	44:g:101:ARG:NH1	1.84	1.23
1:2:453:A:C5'	8:am:277:PRO:CG	1.95	1.23
1:2:604:U:H5'	44:g:82:SER:CB	1.64	1.23
1:2:66:U:C4'	35:t:35:ARG:CD	2.01	1.23
1:2:108:A:C8	39:ar:22:ASN:ND2	2.04	1.23
1:2:491:U:OP1	9:n:46:GLN:CG	1.87	1.23
1:2:313:C:O2'	4:m:165:VAL:HG12	1.05	1.22
1:2:418:A:C6	13:aj:54:PRO:HB3	1.71	1.22
102:Aq:68:THR:HG21	106:Ad:30:GLU:OE1	1.38	1.22
1:2:39:U:O2	29:aq:10:ALA:N	1.70	1.22
1:2:107:A:C5'	43:i:363:TYR:CZ	2.23	1.22
1:2:418:A:N1	13:aj:52:TYR:OH	1.73	1.22
1:2:50:U:C5'	37:j:11:ARG:NH2	2.02	1.22
1:2:82:A:C4'	39:ar:32:LEU:HD13	1.42	1.22
1:2:158:U:C4'	29:aq:18:TYR:H	1.52	1.22
1:2:437:U:C5'	6:s:153:LYS:CB	2.17	1.22
1:2:436:U:C4'	6:s:154:VAL:HA	1.70	1.21
1:2:491:U:OP1	9:n:46:GLN:HG3	1.39	1.21
1:2:35:A:H62	37:j:16:ARG:NH2	1.35	1.21
1:2:85:U:O2'	39:ar:24:ARG:NH1	1.71	1.21
1:2:282:A:C3'	43:i:247:ILE:HD11	1.70	1.21
1:2:414:C:N4	2:h:13:ILE:CG2	2.01	1.21
1:2:427:U:O4	13:aj:236:ALA:HB2	1.36	1.21

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:4:A:N6	25:ad:27:ILE:CD1	1.98	1.21
1:2:408:U:H4'	9:n:56:HIS:CG	1.75	1.21
1:2:512:G:O2'	16:az:141:VAL:HG21	1.38	1.21
1:2:507:A:N3	9:n:61:GLN:HB3	1.55	1.21
1:2:529:A:C5'	4:m:270:ARG:NH2	2.03	1.21
25:ad:536:THR:CA	30:as:215:TRP:CE3	2.24	1.21
1:2:70:A:H4'	35:t:13:ALA:CB	1.69	1.20
1:2:527:U:C1'	16:az:69:HIS:NE2	2.04	1.20
25:ad:536:THR:CA	30:as:215:TRP:CZ3	2.25	1.20
1:2:397:U:OP2	5:f:19:GLY:CA	1.88	1.20
1:2:495:U:C3'	3:aw:2:HIS:HD2	1.54	1.20
1:2:436:U:O5'	6:s:154:VAL:HG13	1.41	1.20
1:2:532:U:C4	16:az:76:ARG:NH1	2.10	1.20
49:b:23:ARG:C	85:An:150:PHE:HZ	1.47	1.20
1:2:2:U:P	25:ad:707:TRP:HA	1.81	1.20
1:2:10:U:O3'	50:a:263:LYS:CD	1.90	1.20
1:2:437:U:C6	6:s:151:ARG:N	2.00	1.20
1:2:513:U:C5'	16:az:145:ARG:HH21	1.54	1.20
1:2:529:A:H2'	16:az:73:PRO:CD	1.70	1.20
1:2:36:G:O4'	33:w:130:LYS:CD	1.89	1.19
1:2:67:A:O2'	37:j:22:TRP:CB	1.89	1.19
1:2:108:A:C2	40:av:131:GLN:HB3	1.75	1.19
1:2:243:A:N1	8:am:25:VAL:HG21	1.57	1.19
1:2:50:U:H4'	37:j:11:ARG:NH2	1.56	1.19
1:2:526:A:OP1	15:d:331:GLU:HA	1.02	1.19
1:2:528:A:OP1	16:az:69:HIS:HB2	1.33	1.19
1:2:413:U:C5	2:h:23:HIS:ND1	2.09	1.19
1:2:419:A:C2'	10:ae:181:ARG:CG	2.19	1.19
25:ad:536:THR:C	30:as:215:TRP:CH2	2.21	1.19
1:2:122:U:N3	43:i:297:GLN:CG	2.05	1.19
1:2:415:A:N1	10:ae:38:GLY:HA3	1.58	1.19
1:2:495:U:H4'	3:aw:2:HIS:NE2	1.55	1.19
1:2:502:A:N1	14:e:721:ARG:HA	1.56	1.19
1:2:532:U:C6	16:az:76:ARG:NH1	2.10	1.18
25:ad:537:GLU:N	30:as:215:TRP:CH2	2.11	1.18
1:2:282:A:N6	43:i:251:ILE:CG1	2.00	1.18
25:ad:536:THR:C	30:as:215:TRP:CZ2	2.22	1.18
1:2:463:G:P	8:am:298:ARG:H	1.67	1.18
1:2:495:U:H4'	3:aw:2:HIS:CD2	1.77	1.18
1:2:55:G:H5''	1:2:152:G:H22	1.08	1.18
1:2:68:A:C5'	37:j:22:TRP:CD2	2.27	1.18

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:172:A:N6	37:j:17:LYS:CD	1.85	1.18
1:2:408:U:C4'	9:n:56:HIS:CG	2.27	1.17
1:2:507:A:N3	9:n:61:GLN:HG2	1.58	1.17
1:2:529:A:C2	16:az:72:LYS:HE2	1.69	1.17
49:b:23:ARG:CD	85:An:150:PHE:CD1	2.26	1.17
1:2:38:U:O2'	48:q:26:ARG:NH1	1.77	1.17
1:2:419:A:C3'	10:ae:181:ARG:HG3	1.74	1.17
1:2:49:A:H8	37:j:11:ARG:N	1.40	1.17
1:2:434:U:H5	10:ae:11:ARG:C	1.50	1.17
1:2:458:A:O2'	19:af:190:ARG:NH1	1.76	1.17
1:2:68:A:H5'	37:j:22:TRP:CG	1.75	1.17
1:2:491:U:O2'	14:e:386:THR:HG22	1.40	1.17
1:2:49:A:N7	37:j:10:ALA:O	1.77	1.17
1:2:65:U:C3'	35:t:36:ARG:HG2	1.74	1.17
1:2:107:A:H4'	43:i:363:TYR:CZ	1.80	1.17
1:2:526:A:OP1	15:d:331:GLU:CA	1.91	1.17
25:ad:536:THR:C	30:as:215:TRP:CE2	2.23	1.17
1:2:408:U:C4'	9:n:56:HIS:CD2	2.26	1.16
1:2:532:U:C5	16:az:76:ARG:NH1	2.13	1.16
1:2:497:A:C5	3:aw:17:ILE:HD13	1.79	1.16
1:2:432:G:C2	10:ae:22:LEU:HD23	1.76	1.16
1:2:497:A:N1	3:aw:17:ILE:HG21	1.60	1.16
1:2:525:A:P	15:d:329:ARG:HA	1.85	1.16
1:2:526:A:N7	15:d:294:ILE:HG22	1.49	1.16
1:2:16:U:H5	1:2:17:C:C5	1.60	1.16
1:2:47:U:OP1	29:aq:13:ARG:CD	1.94	1.16
1:2:415:A:C2	10:ae:38:GLY:HA3	1.80	1.16
1:2:525:A:C8	15:d:329:ARG:O	1.97	1.16
1:2:42:U:O2'	29:aq:24:LYS:HB2	1.43	1.16
1:2:397:U:N3	5:f:16:PRO:O	1.78	1.15
1:2:425:A:C4'	13:aj:235:GLU:CB	2.23	1.15
1:2:495:U:O3'	3:aw:2:HIS:HD2	0.80	1.15
1:2:507:A:C8	3:aw:28:LEU:HG	1.79	1.15
1:2:170:U:H5	37:j:17:LYS:HB2	1.04	1.15
1:2:180:A:C5'	33:w:105:ARG:HG2	1.76	1.15
1:2:412:G:H3'	10:ae:156:ALA:HB1	1.29	1.15
1:2:427:U:O4	13:aj:236:ALA:CB	1.94	1.15
1:2:506:U:OP1	9:n:77:LYS:NZ	1.79	1.15
1:2:512:G:C1'	16:az:141:VAL:HG23	1.74	1.15
1:2:174:U:O2'	35:t:27:MET:HE3	0.98	1.15
1:2:224:G:H2'	1:2:225:G:H5'	1.27	1.15

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:501:U:OP1	14:e:790:VAL:HG13	1.46	1.15
1:2:501:U:C4	3:aw:27:ARG:CZ	2.28	1.15
1:2:383:A:C2'	50:a:153:LYS:HB2	1.76	1.15
1:2:408:U:C5'	9:n:56:HIS:CD2	2.29	1.15
1:2:412:G:O6	10:ae:53:THR:HB	1.41	1.15
1:2:417:C:C2'	10:ae:128:TYR:CZ	2.30	1.15
1:2:511:U:C4	11:ay:156:PHE:HB3	1.80	1.15
25:ad:536:THR:CA	30:as:215:TRP:CD2	2.30	1.15
1:2:45:U:OP1	29:aq:23:LEU:HB3	1.44	1.14
1:2:107:A:C5'	43:i:363:TYR:CE2	2.30	1.14
1:2:510:A:N6	3:aw:21:ASP:HA	1.61	1.14
1:2:67:A:O2'	37:j:22:TRP:CA	1.95	1.14
1:2:420:U:C4'	13:aj:59:VAL:CG1	2.11	1.14
1:2:496:U:OP1	3:aw:1:MET:HB3	1.48	1.14
25:ad:536:THR:O	30:as:215:TRP:CD2	2.01	1.14
1:2:421:A:C4'	10:ae:298:TYR:CE2	2.14	1.14
1:2:437:U:H5	6:s:150:ASN:HA	1.10	1.14
1:2:436:U:O2	6:s:152:PHE:CA	1.94	1.14
1:2:413:U:O4	2:h:23:HIS:HB2	1.46	1.14
1:2:418:A:N7	13:aj:55:HIS:N	1.95	1.14
1:2:432:G:C2	10:ae:22:LEU:HD21	1.77	1.14
1:2:437:U:N1	6:s:151:ARG:O	1.80	1.14
1:2:499:A:O2'	14:e:784:LEU:HD11	1.47	1.14
1:2:615:U:C2	44:g:101:ARG:NH1	2.16	1.14
1:2:47:U:OP1	29:aq:13:ARG:HD2	1.46	1.13
1:2:177:U:O2'	33:w:119:ARG:NH1	1.78	1.13
96:Ao:238:ARG:HG2	105:BP:98:PRO:HG3	1.27	1.13
1:2:50:U:H5''	37:j:11:ARG:CZ	1.77	1.13
1:2:280:A:C6	46:c:171:LYS:HD3	1.61	1.13
1:2:397:U:C4	5:f:16:PRO:C	2.25	1.13
1:2:503:A:H2	14:e:718:PRO:HG3	0.97	1.13
1:2:526:A:C5	15:d:294:ILE:CG2	2.28	1.13
45:o:132:ARG:CG	50:a:349:TRP:CZ3	2.32	1.13
1:2:40:U:O2'	1:2:41:U:H5	1.29	1.13
1:2:51:A:C6	1:2:52:U:O4	2.00	1.13
1:2:86:C:O2	47:k:152:LYS:HG2	1.48	1.13
1:2:142:U:H5'	25:ad:34:PHE:CE1	1.83	1.13
1:2:182:A:OP1	33:w:101:ARG:NE	1.81	1.13
1:2:482:C:C2	10:ae:56:TYR:CD1	2.30	1.13
1:2:499:A:C2	11:ay:132:THR:CG2	2.31	1.13
1:2:446:G:C5	12:ag:19:ARG:NH2	2.17	1.12

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:482:C:C6	10:ae:56:TYR:CD2	2.22	1.12
1:2:497:A:C4'	3:aw:4:ALA:CB	2.23	1.13
1:2:172:A:C6	37:j:17:LYS:CA	2.22	1.12
1:2:418:A:N1	13:aj:52:TYR:CZ	2.16	1.12
1:2:512:G:O2'	16:az:141:VAL:CG2	1.97	1.12
25:ad:536:THR:C	30:as:215:TRP:CD2	2.27	1.13
49:b:23:ARG:HD3	85:An:150:PHE:CD1	1.82	1.13
1:2:108:A:H8	39:ar:22:ASN:ND2	1.39	1.12
1:2:419:A:OP2	13:aj:56:HIS:CE1	2.02	1.12
1:2:482:C:H2'	10:ae:56:TYR:CD2	1.84	1.12
1:2:524:C:O3'	5:f:27:ARG:CZ	1.81	1.12
1:2:67:A:O2'	37:j:22:TRP:HB3	1.48	1.12
1:2:416:A:OP2	10:ae:162:SER:HB2	0.98	1.12
1:2:419:A:H2'	10:ae:181:ARG:CB	1.79	1.12
1:2:420:U:C4'	13:aj:59:VAL:HG11	1.69	1.12
25:ad:536:THR:CA	30:as:215:TRP:CE2	2.31	1.12
1:2:172:A:H62	37:j:17:LYS:CA	1.47	1.12
1:2:426:U:OP1	13:aj:236:ALA:N	1.83	1.12
1:2:532:U:N3	16:az:76:ARG:NH1	1.98	1.12
1:2:130:U:H2'	1:2:131:U:H5'	1.19	1.12
1:2:408:U:H5''	9:n:56:HIS:CD2	1.85	1.12
1:2:422:U:H3	13:aj:52:TYR:HB3	1.13	1.12
1:2:480:A:C5	2:h:21:HIS:ND1	2.17	1.12
1:2:282:A:C6	43:i:251:ILE:HG21	1.85	1.11
1:2:423:C:H42	12:ag:51:GLN:NE2	1.48	1.11
1:2:503:A:H2	14:e:718:PRO:CG	1.62	1.11
1:2:511:U:C5	11:ay:156:PHE:HB3	1.85	1.11
1:2:170:U:C5	37:j:17:LYS:HB3	1.71	1.11
1:2:496:U:O5'	3:aw:2:HIS:HB2	1.50	1.11
1:2:158:U:H4'	29:aq:18:TYR:CA	1.80	1.11
1:2:180:A:H3'	33:w:105:ARG:HB2	1.21	1.11
1:2:302:A:C2	1:2:303:G:N1	2.18	1.11
1:2:425:A:O4'	13:aj:235:GLU:HA	1.45	1.11
1:2:464:U:O4	8:am:295:ARG:NH1	1.83	1.11
1:2:529:A:C3'	16:az:73:PRO:HD3	1.79	1.11
1:2:82:A:H4'	39:ar:32:LEU:HD13	1.23	1.11
1:2:502:A:H2	6:s:75:ARG:NH2	1.36	1.11
1:2:256:U:H4'	1:2:257:U:H5'	1.28	1.11
1:2:460:A:N6	8:am:301:GLY:O	1.81	1.11
1:2:613:U:C5'	44:g:96:ARG:NH2	2.05	1.11
1:2:282:A:O4'	43:i:247:ILE:HG13	1.49	1.10

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:313:C:O2'	4:m:165:VAL:CB	1.99	1.10
1:2:425:A:C5'	13:aj:235:GLU:HB3	1.80	1.10
1:2:476:U:H6	1:2:476:U:H5''	1.15	1.10
1:2:172:A:N6	37:j:17:LYS:CB	2.14	1.10
1:2:502:A:H8	14:e:789:PRO:CG	1.59	1.10
1:2:55:G:H5''	1:2:152:G:N2	1.67	1.10
1:2:107:A:C4'	43:i:363:TYR:CZ	2.34	1.10
1:2:460:A:N7	8:am:301:GLY:O	1.85	1.10
1:2:486:A:N7	9:n:121:PHE:HE2	1.50	1.10
45:o:132:ARG:CB	50:a:349:TRP:CE2	2.34	1.10
1:2:437:U:H5''	6:s:153:LYS:CB	1.80	1.10
74:U:25:PHE:HD1	1:1:933:G:N2	1.46	1.10
82:BB:11:SER:HA	1:1:857:A:H5'	1.30	1.10
1:2:480:A:N7	2:h:21:HIS:CG	2.19	1.10
1:2:522:A:H1'	15:d:343:LYS:HE2	1.31	1.10
1:2:172:A:C5	37:j:17:LYS:HA	1.87	1.09
1:2:225:G:OP1	6:s:146:LYS:HG2	1.51	1.09
1:2:435:U:OP1	6:s:159:GLY:CA	2.01	1.09
1:2:486:A:C5	9:n:121:PHE:HE2	1.44	1.09
45:o:132:ARG:CB	50:a:349:TRP:CD2	2.35	1.09
1:2:509:C:C6	11:ay:166:TYR:OH	1.77	1.09
1:2:514:U:H3'	16:az:17:VAL:HG22	1.32	1.09
1:2:180:A:H5''	33:w:105:ARG:CG	1.82	1.09
1:2:321:U:H1'	46:c:169:GLU:OE2	1.53	1.09
1:2:460:A:C2	8:am:300:ILE:HG22	1.86	1.09
1:2:480:A:C6	2:h:21:HIS:CD2	2.41	1.09
1:2:525:A:O4'	15:d:329:ARG:CB	2.00	1.09
1:2:529:A:C2'	16:az:73:PRO:HD3	1.82	1.09
49:b:23:ARG:HD3	85:An:150:PHE:CE1	1.77	1.09
74:U:25:PHE:HB3	1:1:972:A:H61	1.09	1.09
1:2:42:U:OP1	48:q:24:HIS:NE2	1.84	1.09
1:2:106:U:H5''	1:2:106:U:H6	1.14	1.09
1:2:280:A:N6	46:c:171:LYS:CD	2.15	1.09
1:2:507:A:N3	9:n:61:GLN:CB	2.15	1.09
1:2:532:U:C5	16:az:76:ARG:CZ	2.34	1.09
1:2:604:U:H5'	44:g:82:SER:HB3	1.09	1.09
49:b:23:ARG:C	85:An:150:PHE:CZ	2.30	1.09
1:2:92:U:H5'	1:2:92:U:H6	1.14	1.08
1:2:283:U:C6	43:i:247:ILE:HD13	1.72	1.08
1:2:497:A:H5''	3:aw:4:ALA:CB	1.78	1.08
1:2:418:A:C2	13:aj:52:TYR:OH	2.00	1.08

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:503:A:C2	14:e:718:PRO:HA	1.88	1.08
1:2:507:A:N3	9:n:61:GLN:CG	2.15	1.08
1:2:526:A:N6	15:d:293:GLU:CG	2.16	1.08
1:2:171:A:H8	1:2:171:A:H5'	1.18	1.08
1:2:413:U:C4	2:h:23:HIS:HB2	1.88	1.08
49:b:23:ARG:CG	85:a:n:150:PHE:CE1	2.35	1.08
1:2:122:U:H5	43:i:293:VAL:HG11	1.11	1.08
1:2:283:U:C6	43:i:247:ILE:CD1	2.29	1.08
1:2:302:A:C2	1:2:303:G:C6	2.42	1.08
45:o:132:ARG:CG	50:a:349:TRP:CE3	2.37	1.08
1:2:68:A:H5'	37:j:22:TRP:CD2	1.87	1.08
1:2:166:G:H2'	1:2:167:U:H1'	1.28	1.08
45:o:132:ARG:CB	50:a:349:TRP:CE3	2.37	1.08
1:2:16:U:OP2	50:a:257:LYS:NZ	1.86	1.07
1:2:49:A:C8	37:j:11:ARG:HA	1.88	1.07
1:2:50:U:C4'	37:j:11:ARG:NH2	2.15	1.07
1:2:177:U:H4'	33:w:119:ARG:HD2	1.26	1.07
1:2:280:A:H2	43:i:257:ARG:NH1	1.52	1.07
1:2:499:A:C8	3:aw:10:ARG:HG3	1.88	1.07
1:2:512:G:H1'	16:az:141:VAL:CG2	1.83	1.07
1:2:605:A:H2'	1:2:606:U:C5'	1.82	1.07
1:2:70:A:H4'	35:t:13:ALA:HB2	1.10	1.07
1:2:122:U:C4	43:i:297:GLN:CG	2.36	1.07
1:2:282:A:O4'	43:i:247:ILE:CD1	1.98	1.07
1:2:158:U:C5'	29:aq:18:TYR:CB	2.17	1.07
1:2:460:A:H5''	8:am:306:LEU:H	1.20	1.07
1:2:491:U:C4	14:e:383:THR:HB	1.89	1.07
1:2:503:A:C2	14:e:718:PRO:HG3	1.88	1.07
8:am:142:MET:HE1	8:am:147:ILE:HG21	1.28	1.07
1:2:107:A:H5''	43:i:363:TYR:CD2	1.89	1.06
1:2:86:C:O2'	47:k:152:LYS:CG	2.00	1.06
1:2:177:U:C4'	33:w:119:ARG:HD2	1.85	1.06
1:2:301:U:C4	1:2:302:A:N7	2.23	1.06
1:2:422:U:N3	13:aj:52:TYR:CB	2.16	1.06
1:2:480:A:N7	2:h:21:HIS:ND1	2.01	1.06
1:2:414:C:O2	10:ae:33:GLN:NE2	1.87	1.06
1:2:499:A:O2'	14:e:784:LEU:CD1	2.02	1.06
1:2:155:G:H8	1:2:155:G:H5''	1.15	1.06
1:2:182:A:H5'	33:w:98:LEU:HD11	1.36	1.06
1:2:456:A:C2	8:am:284:ARG:HG3	1.90	1.06
1:2:491:U:OP1	9:n:46:GLN:CD	1.97	1.06

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:529:A:H2'	16:az:73:PRO:HD3	1.10	1.06
1:2:497:A:C4	3:aw:17:ILE:CD1	2.38	1.05
1:2:529:A:O2'	16:az:71:CYS:O	1.74	1.05
117:Ax:129:ARG:HH21	117:Ax:134:GLN:NE2	1.50	1.05
1:2:107:A:H4'	43:i:363:TYR:OH	1.57	1.05
1:2:425:A:H4'	13:aj:235:GLU:HB2	1.09	1.05
1:2:436:U:O4'	6:s:154:VAL:HG22	0.89	1.05
45:o:132:ARG:CG	50:a:349:TRP:CH2	2.39	1.05
1:2:33:A:H61	1:2:169:U:H2'	1.14	1.05
1:2:158:U:H4'	29:aq:18:TYR:CB	1.77	1.05
1:2:280:A:N6	1:2:323:U:P	2.29	1.05
1:2:424:U:C4	13:aj:197:ASP:HB2	1.91	1.05
1:2:447:A:C2	1:2:471:A:N7	2.25	1.05
1:2:175:U:C2	48:q:12:MET:O	2.10	1.05
1:2:417:C:C2'	10:ae:128:TYR:CE2	2.39	1.05
1:2:613:U:H5'	44:g:96:ARG:NH2	1.58	1.05
1:2:486:A:C5	9:n:121:PHE:CD2	2.45	1.05
1:2:503:A:C2	14:e:718:PRO:CA	2.39	1.05
1:2:555:U:H3'	1:2:556:U:H5''	1.32	1.05
25:ad:536:THR:O	30:as:215:TRP:CE2	2.08	1.05
1:2:431:U:C4	13:aj:280:HIS:CD2	2.44	1.04
1:2:48:U:O5'	37:j:10:ALA:N	1.90	1.04
1:2:70:A:C4'	35:t:13:ALA:HB2	1.86	1.04
1:2:171:A:H5'	1:2:171:A:C8	1.92	1.04
1:2:456:A:N1	8:am:284:ARG:CG	2.13	1.04
1:2:528:A:OP1	16:az:69:HIS:O	1.74	1.04
1:2:529:A:H5'	4:m:270:ARG:NH2	1.33	1.04
1:2:22:U:O4	1:2:265:A:N6	1.90	1.04
1:2:33:A:N6	1:2:169:U:H2'	1.72	1.04
1:2:38:U:O2'	1:2:39:U:O4'	1.75	1.04
1:2:301:U:N3	1:2:302:A:C8	2.26	1.04
1:2:439:A:H8	6:s:131:TYR:OH	1.40	1.04
1:2:26:U:H2'	1:2:27:U:C5	1.93	1.04
1:2:280:A:H61	1:2:323:U:P	1.81	1.04
1:2:437:U:H5''	6:s:153:LYS:HB3	1.40	1.04
1:2:437:U:H5'	6:s:153:LYS:HB2	1.11	1.04
1:2:281:A:C6	43:i:251:ILE:HA	1.93	1.04
1:2:437:U:H5	6:s:150:ASN:CA	1.69	1.04
1:2:453:A:H5'	8:am:277:PRO:HG2	1.34	1.04
1:2:495:U:C5'	3:aw:1:MET:HE2	1.87	1.04
102:Aq:336:ARG:HH11	102:Aq:336:ARG:HG2	1.16	1.04

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:35:A:N6	37:j:16:ARG:NH2	2.05	1.03
1:2:166:G:H2'	1:2:167:U:C1'	1.87	1.03
1:2:525:A:H8	15:d:329:ARG:O	1.33	1.03
22:ab:212:ALA:HA	22:ab:216:ASP:HB3	1.38	1.03
1:2:10:U:O3'	50:a:263:LYS:HD3	1.58	1.03
1:2:480:A:C5	2:h:21:HIS:CD2	2.45	1.03
1:2:526:A:N7	15:d:294:ILE:HG21	1.73	1.03
1:2:39:U:C6	33:w:139:TYR:HB3	1.93	1.03
1:2:269:A:C2'	1:2:270:U:H5'	1.89	1.03
1:2:313:C:C5	4:m:169:GLN:NE2	2.26	1.03
1:2:482:C:C2'	10:ae:56:TYR:CD2	2.39	1.03
49:b:23:ARG:HD2	85:An:150:PHE:CE1	1.85	1.03
74:U:39:VAL:HG21	74:U:85:GLU:HB2	1.36	1.03
1:2:181:U:P	33:w:101:ARG:O	2.16	1.03
1:2:480:A:C4	2:h:21:HIS:ND1	2.27	1.03
1:2:506:U:OP2	9:n:77:LYS:HE2	1.57	1.03
1:2:4:A:N1	25:ad:27:ILE:HD11	1.74	1.02
1:2:82:A:H4'	39:ar:32:LEU:CD1	1.86	1.02
1:2:419:A:C2'	10:ae:181:ARG:CD	2.37	1.02
1:2:506:U:P	9:n:77:LYS:HE2	1.99	1.02
1:2:569:G:C2'	1:2:570:A:H5''	1.88	1.02
1:2:577:G:C2'	1:2:578:C:H5'	1.89	1.02
1:2:175:U:C3'	48:q:11:GLN:CA	1.95	1.02
1:2:282:A:H4'	43:i:247:ILE:HD12	1.05	1.02
1:2:486:A:H5'	9:n:145:PRO:HB3	1.41	1.02
102:Aq:339:ARG:HH11	102:Aq:339:ARG:HG2	1.22	1.02
1:2:82:A:C4'	39:ar:32:LEU:CD1	2.27	1.02
1:2:413:U:O4	2:h:23:HIS:CB	2.07	1.02
1:2:435:U:H4'	6:s:154:VAL:HG11	1.03	1.02
1:2:482:C:N1	10:ae:56:TYR:CD2	2.27	1.02
1:2:170:U:H5	37:j:17:LYS:CB	1.51	1.02
1:2:350:G:H3'	1:2:351:U:H6	1.25	1.02
1:2:419:A:H3'	10:ae:181:ARG:HG3	1.37	1.02
1:2:431:U:C2	13:aj:280:HIS:CE1	2.47	1.02
1:2:459:A:H3'	8:am:284:ARG:CZ	1.90	1.02
1:2:491:U:O4	14:e:383:THR:CB	2.07	1.02
45:o:132:ARG:CG	50:a:349:TRP:CE2	2.41	1.02
63:J:67:ARG:HG2	63:J:68:PRO:HD2	1.38	1.02
1:2:439:A:O2'	2:h:18:PRO:O	1.76	1.02
1:2:499:A:P	3:aw:12:ALA:HB2	2.00	1.02
1:2:532:U:N1	16:az:76:ARG:NH1	2.07	1.02

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:557:C:C2'	1:2:558:U:H5'	1.90	1.02
49:b:23:ARG:HG2	85:An:150:PHE:CE1	1.93	1.02
1:2:199:A:H2'	21:aa:336:ARG:HH12	1.20	1.01
1:2:526:A:H61	15:d:293:GLU:CG	1.72	1.01
1:2:588:U:C2'	1:2:589:G:H5'	1.90	1.01
45:o:132:ARG:CG	50:a:349:TRP:CD2	2.43	1.01
1:2:170:U:C6	37:j:17:LYS:HB3	1.94	1.01
1:2:436:U:H1'	6:s:154:VAL:CG2	1.90	1.01
1:2:529:A:O2'	16:az:72:LYS:CA	2.08	1.01
49:b:23:ARG:HD2	85:An:150:PHE:CD1	1.89	1.01
1:2:172:A:H61	37:j:17:LYS:HD2	1.24	1.01
1:2:210:U:C6	1:2:210:U:H5''	1.94	1.01
1:2:290:C:OP1	4:m:178:ARG:HD2	1.60	1.01
1:2:415:A:C4	10:ae:36:ARG:NH1	2.28	1.01
1:2:415:A:N9	10:ae:36:ARG:NH1	2.08	1.01
1:2:418:A:C8	13:aj:55:HIS:N	2.29	1.01
1:2:484:A:C4	9:n:102:ARG:HD3	1.95	1.01
1:2:486:A:N6	9:n:121:PHE:CZ	2.28	1.01
1:2:495:U:C5'	3:aw:1:MET:CE	2.37	1.01
1:2:497:A:H5'	3:aw:15:ARG:NH1	1.75	1.01
1:2:507:A:C4	9:n:61:GLN:HG2	1.93	1.01
45:o:132:ARG:CB	50:a:349:TRP:CZ3	2.43	1.01
63:J:67:ARG:CG	63:J:68:PRO:HD2	1.90	1.01
1:2:16:U:C5	1:2:17:C:H5	1.69	1.01
1:2:170:U:C5	37:j:17:LYS:HB2	1.79	1.01
1:2:172:A:N6	37:j:17:LYS:CG	2.23	1.01
1:2:521:A:O3'	15:d:345:LYS:HG3	1.58	1.01
1:2:525:A:C3'	15:d:331:GLU:N	2.23	1.01
1:2:361:U:H2'	1:2:362:A:H5'	1.43	1.01
1:2:415:A:C1'	10:ae:36:ARG:NH1	2.22	1.01
1:2:419:A:O2'	10:ae:181:ARG:CD	2.09	1.01
1:2:431:U:C5	13:aj:280:HIS:CD2	2.49	1.01
95:Aa:186:MET:HE1	95:Aa:189:ARG:HD2	1.37	1.01
1:2:419:A:H2'	10:ae:181:ARG:HG3	1.19	1.00
1:2:424:U:O4	13:aj:197:ASP:HB2	0.83	1.00
1:2:434:U:C5	10:ae:11:ARG:C	2.38	1.00
55:B:194:LYS:HE2	55:B:194:LYS:C	1.86	1.00
1:2:86:C:H1'	47:k:152:LYS:HG3	1.36	1.00
1:2:137:G:C2'	1:2:138:U:H5'	1.89	1.00
1:2:440:C:OP1	2:h:20:ARG:N	1.93	1.00
1:2:526:A:O2'	15:d:329:ARG:NH1	1.93	1.00

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
45:o:132:ARG:CG	50:a:349:TRP:CZ2	2.44	1.00
55:B:124:ASN:HB2	55:B:199:SER:HB3	1.38	1.00
1:2:36:G:C1'	33:w:130:LYS:HD3	1.91	1.00
1:2:66:U:H4'	35:t:35:ARG:HD3	1.04	1.00
1:2:452:G:H4'	8:am:278:HIS:NE2	1.76	1.00
1:2:460:A:C5	8:am:301:GLY:O	2.14	1.00
1:2:482:C:C2'	10:ae:56:TYR:HD2	1.74	1.00
1:2:514:U:H3'	16:az:17:VAL:CG2	1.91	1.00
117:Ax:129:ARG:NH2	117:Ax:134:GLN:NE2	2.10	1.00
1:2:48:U:OP1	29:aq:14:TYR:OH	1.77	1.00
1:2:422:U:H3	13:aj:52:TYR:HB2	1.27	1.00
1:2:486:A:C6	9:n:121:PHE:CZ	2.48	1.00
1:2:180:A:C2	33:w:87:SER:HA	1.97	1.00
1:2:234:C:O2'	1:2:236:U:OP2	1.80	1.00
1:2:335:U:H5'	1:2:335:U:H6	1.24	1.00
1:2:412:G:O6	10:ae:53:THR:CA	2.10	1.00
1:2:429:A:H4'	10:ae:135:PRO:HG2	1.43	1.00
1:2:280:A:C6	46:c:171:LYS:CD	2.38	0.99
1:2:426:U:P	13:aj:235:GLU:HB2	2.01	0.99
1:2:497:A:H5''	3:aw:4:ALA:H	1.26	0.99
1:2:516:A:C8	17:ax:36:MET:HG3	1.96	0.99
1:2:283:U:O2	43:i:247:ILE:HG23	1.58	0.99
1:2:408:U:O4'	9:n:56:HIS:HB2	1.61	0.99
1:2:495:U:C4'	3:aw:2:HIS:CD2	2.45	0.99
74:U:25:PHE:CD1	1:1:933:G:N2	2.26	0.99
1:2:434:U:O4	10:ae:11:ARG:HA	1.62	0.99
1:2:2:U:H5'	25:ad:707:TRP:CD1	1.98	0.99
1:2:66:U:OP2	35:t:35:ARG:HB3	1.61	0.99
1:2:414:C:H41	2:h:13:ILE:HG21	1.25	0.99
1:2:588:U:H2'	1:2:589:G:H5'	1.40	0.99
1:2:45:U:O3'	29:aq:22:PHE:N	1.95	0.99
1:2:269:A:H2'	1:2:270:U:H5'	1.44	0.99
1:2:454:U:H5''	8:am:276:SER:CB	1.92	0.99
1:2:282:A:O4'	43:i:247:ILE:HD11	1.56	0.99
1:2:302:A:H2	1:2:303:G:N1	1.57	0.99
1:2:439:A:C8	6:s:131:TYR:OH	2.14	0.99
25:ad:536:THR:CA	30:as:215:TRP:CH2	2.45	0.99
1:2:279:U:N3	1:2:328:A:N1	2.11	0.99
1:2:522:A:OP1	15:d:345:LYS:HG3	1.62	0.98
1:2:480:A:C5	2:h:21:HIS:CE1	2.50	0.98
96:Ao:238:ARG:HG2	105:BP:98:PRO:CG	1.93	0.98

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:283:U:H6	43:i:247:ILE:CD1	1.68	0.98
1:2:49:A:C8	37:j:11:ARG:CA	2.45	0.98
1:2:446:G:N7	12:ag:19:ARG:NH2	2.11	0.98
1:2:560:U:C6	1:2:560:U:H5''	1.97	0.98
1:2:605:A:H2'	1:2:606:U:H5'	1.43	0.98
1:2:181:U:OP2	33:w:101:ARG:HG2	1.64	0.98
1:2:280:A:OP2	43:i:257:ARG:NH2	1.95	0.98
1:2:507:A:C2	9:n:61:GLN:CG	2.47	0.98
1:2:555:U:H6	1:2:555:U:H5''	1.28	0.98
1:2:16:U:O4	1:2:367:A:OP2	1.81	0.98
1:2:102:U:H5'	1:2:102:U:H6	1.28	0.98
1:2:175:U:H5'	48:q:11:GLN:CD	1.88	0.98
1:2:418:A:C6	13:aj:54:PRO:CB	2.46	0.98
1:2:65:U:H1'	1:2:66:U:C5'	1.94	0.98
1:2:86:C:O2'	47:k:152:LYS:HB3	1.64	0.98
1:2:436:U:H4'	6:s:154:VAL:HA	0.99	0.98
1:2:437:U:C5	6:s:150:ASN:C	2.41	0.98
1:2:491:U:H2'	14:e:384:SER:HA	1.45	0.98
1:2:528:A:OP1	16:az:69:HIS:C	2.07	0.98
1:2:529:A:N3	16:az:72:LYS:CE	2.26	0.98
1:2:44:A:C4'	29:aq:24:LYS:CA	2.37	0.98
1:2:513:U:H1'	16:az:146:TYR:CE1	1.99	0.98
1:2:481:U:C2	2:h:90:ALA:HB2	1.96	0.98
1:2:130:U:C2'	1:2:131:U:H5'	1.93	0.97
1:2:557:C:H2'	1:2:558:U:H5'	1.43	0.97
25:ad:536:THR:N	30:as:215:TRP:CH2	2.33	0.97
85:An:139:GLN:HG3	85:An:145:LEU:HD12	1.46	0.97
1:2:175:U:H6	48:q:11:GLN:CG	1.78	0.97
1:2:323:U:OP1	46:c:171:LYS:HB2	1.64	0.97
1:2:498:U:OP1	3:aw:4:ALA:HB3	1.63	0.97
1:2:605:A:C2'	1:2:606:U:C5'	2.42	0.97
86:Al:274:VAL:HG23	86:Al:274:VAL:O	1.63	0.97
1:2:413:U:C4	2:h:23:HIS:CG	2.52	0.97
1:2:45:U:OP1	29:aq:16:ARG:NH1	1.75	0.97
1:2:419:A:C2'	10:ae:181:ARG:HD2	1.93	0.97
1:2:44:A:C4'	29:aq:24:LYS:HA	1.66	0.97
1:2:49:A:H8	37:j:11:ARG:CA	1.77	0.97
1:2:369:G:C2'	1:2:370:A:H5'	1.94	0.97
1:2:342:A:H5'	1:2:342:A:H8	1.27	0.97
1:2:363:A:H2	1:2:365:A:N6	1.63	0.97
1:2:412:G:C6	10:ae:54:GLY:N	2.31	0.97

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
45:o:132:ARG:CB	50:a:349:TRP:CZ2	2.48	0.97
1:2:37:U:H5	33:w:134:THR:OG1	1.48	0.97
1:2:42:U:O2'	29:aq:24:LYS:CB	2.11	0.97
1:2:503:A:C2	14:e:718:PRO:CG	2.46	0.97
1:2:487:C:C4	9:n:146:ARG:NH2	2.33	0.96
1:2:615:U:C6	44:g:101:ARG:NH1	2.31	0.96
8:am:142:MET:CE	8:am:147:ILE:CG2	2.42	0.96
77:X:498:ARG:HH11	77:X:498:ARG:HG2	1.30	0.96
1:2:51:A:C5	1:2:52:U:O4	2.17	0.96
1:2:518:A:OP2	17:ax:120:HIS:CE1	2.17	0.96
1:2:605:A:OP1	44:g:84:SER:N	1.98	0.96
25:ad:536:THR:CA	30:as:215:TRP:CZ2	2.47	0.96
1:2:67:A:HO2'	37:j:22:TRP:CB	1.74	0.96
1:2:250:A:H2'	1:2:251:U:C6	2.00	0.96
1:2:425:A:C4'	13:aj:235:GLU:HA	1.96	0.96
1:2:555:U:H5''	1:2:555:U:C6	1.98	0.96
1:2:304:U:C6	1:2:304:U:H5'	2.00	0.96
1:2:435:U:P	6:s:159:GLY:H	1.88	0.96
1:2:497:A:H5'	3:aw:4:ALA:HB2	0.99	0.96
1:2:38:U:P	33:w:139:TYR:HE1	1.79	0.96
1:2:87:A:C8	1:2:87:A:H5''	1.99	0.96
1:2:142:U:C5'	25:ad:34:PHE:HE1	1.77	0.96
1:2:348:U:H2'	1:2:349:G:C8	1.98	0.96
1:2:480:A:C4	2:h:21:HIS:NE2	2.32	0.96
1:2:482:C:N1	10:ae:56:TYR:CG	2.34	0.96
1:2:499:A:OP2	3:aw:9:GLY:O	1.82	0.96
74:U:31:PRO:HB3	74:U:60:ARG:NH1	1.80	0.96
1:2:49:A:OP2	37:j:11:ARG:C	2.03	0.96
1:2:26:U:H3'	1:2:27:U:C5'	1.96	0.96
1:2:36:G:C4	33:w:130:LYS:HB2	2.01	0.96
1:2:436:U:H4'	6:s:154:VAL:CA	1.93	0.96
1:2:45:U:C4'	29:aq:22:PHE:N	2.29	0.95
1:2:55:G:N2	1:2:131:U:OP2	1.97	0.95
1:2:116:U:O2'	1:2:117:A:OP2	1.84	0.95
1:2:316:A:H3'	1:2:317:U:C5'	1.96	0.95
1:2:479:A:P	2:h:20:ARG:HH11	1.88	0.95
1:2:510:A:N7	3:aw:21:ASP:CB	2.28	0.95
25:ad:536:THR:HA	30:as:215:TRP:CE3	1.95	0.95
1:2:175:U:C1'	48:q:12:MET:O	2.13	0.95
1:2:208:C:C5	1:2:209:U:C6	2.54	0.95
1:2:321:U:H3	46:c:167:LYS:HZ1	0.96	0.95

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:503:A:N1	14:e:718:PRO:N	2.14	0.95
1:2:605:A:C3'	1:2:606:U:C5'	2.45	0.95
1:2:6:U:O2'	50:a:253:LYS:HE3	1.65	0.95
1:2:526:A:H62	15:d:294:ILE:HG23	1.31	0.95
102:Aq:339:ARG:HH11	102:Aq:339:ARG:CG	1.78	0.95
1:2:543:U:OP2	50:a:159:HIS:NE2	2.00	0.95
73:T:73:CYS:HG	124:T:101:ZN:ZN	0.73	0.95
1:2:175:U:C4'	48:q:11:GLN:HA	1.97	0.95
1:2:481:U:C5	2:h:24:PHE:CE2	2.54	0.95
1:2:504:A:C5'	6:s:81:ASN:HD22	1.80	0.95
1:1:924:U:HO2'	1:1:925:G:H8	0.96	0.95
1:2:280:A:N6	1:2:323:U:OP1	2.00	0.95
1:2:436:U:OP2	6:s:154:VAL:CG2	2.15	0.95
1:2:437:U:H5'	6:s:153:LYS:CB	1.90	0.95
1:2:440:C:N4	1:2:443:C:N4	1.84	0.95
1:2:607:U:O2'	1:2:608:U:OP2	1.85	0.95
1:2:613:U:H5'	44:g:96:ARG:HH22	1.14	0.95
1:2:146:A:H5''	1:2:146:A:H8	1.27	0.95
1:2:188:A:O2'	1:2:189:A:OP1	1.85	0.95
1:2:413:U:C4	2:h:23:HIS:CB	2.50	0.95
1:2:86:C:O2'	47:k:152:LYS:CB	2.15	0.95
1:2:108:A:C2	40:av:131:GLN:NE2	2.35	0.95
1:2:348:U:H3'	1:2:349:G:H5''	1.47	0.95
1:2:460:A:N1	8:am:300:ILE:HG23	1.82	0.95
1:2:525:A:O2'	15:d:221:ASP:HA	1.66	0.95
1:2:26:U:H3'	1:2:27:U:H5''	1.49	0.94
1:2:397:U:C2	5:f:16:PRO:O	2.19	0.94
1:2:106:U:H5''	1:2:106:U:C6	2.02	0.94
1:2:313:C:HO2'	4:m:165:VAL:CG1	1.62	0.94
1:2:497:A:C2	3:aw:17:ILE:CD1	2.49	0.94
64:K:46:GLN:HE22	95:Aa:192:LEU:HA	1.32	0.94
1:2:228:G:C2'	1:2:242:U:C6	2.50	0.94
1:2:390:U:O2'	1:2:391:A:OP1	1.85	0.94
25:ad:536:THR:N	30:as:215:TRP:CZ2	2.35	0.94
49:b:23:ARG:NH1	85:An:151:GLU:CG	2.31	0.94
1:2:39:U:C2	29:aq:10:ALA:HB2	2.02	0.94
1:2:279:U:O4	1:2:328:A:N6	1.99	0.94
1:2:293:U:H2'	1:2:294:A:C4'	1.97	0.94
77:X:320:VAL:HG13	77:X:393:CYS:HB3	1.49	0.94
1:2:39:U:OP1	33:w:125:GLU:OE2	1.61	0.94
1:2:182:A:C5'	33:w:98:LEU:CD1	2.46	0.94

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:472:A:N3	12:ag:15:TYR:CD2	2.36	0.94
1:2:497:A:H4'	3:aw:4:ALA:HB2	1.47	0.94
1:2:507:A:H8	3:aw:28:LEU:HG	1.17	0.94
1:2:55:G:H5'	1:2:152:G:H1	1.31	0.94
1:2:142:U:C5'	25:ad:34:PHE:CE1	2.51	0.94
1:2:437:U:C5	6:s:150:ASN:HA	2.02	0.94
1:2:497:A:N3	3:aw:17:ILE:CD1	2.31	0.94
1:2:501:U:P	3:aw:13:TYR:CE2	2.58	0.94
1:2:412:G:N2	1:2:412:G:OP2	2.00	0.94
1:2:443:C:C2'	1:2:444:A:H5'	1.96	0.94
1:2:503:A:C6	14:e:718:PRO:HA	2.02	0.94
1:2:525:A:C3'	15:d:330:ARG:C	2.39	0.94
1:2:49:A:C8	37:j:11:ARG:N	2.32	0.94
1:2:49:A:P	37:j:11:ARG:O	2.25	0.94
1:2:83:A:O2'	1:2:84:U:OP1	1.85	0.94
1:2:89:U:O4	1:2:90:A:N6	2.01	0.94
1:2:166:G:O2'	1:2:167:U:OP1	1.84	0.94
1:2:501:U:C4	3:aw:27:ARG:NH1	2.35	0.94
1:2:506:U:O4	9:n:52:HIS:CE1	2.15	0.94
62:I:175:LYS:H	62:I:201:ARG:HH12	1.14	0.94
63:J:67:ARG:CG	63:J:68:PRO:CD	2.46	0.94
1:2:28:U:O2'	1:2:29:U:OP1	1.85	0.94
1:2:478:U:H1'	2:h:20:ARG:HH22	1.32	0.94
1:2:418:A:C5	13:aj:54:PRO:CB	2.51	0.93
1:2:37:U:O2'	1:2:173:A:N1	2.00	0.93
1:2:38:U:O5'	33:w:139:TYR:CD1	2.20	0.93
1:2:227:U:O2'	1:2:228:G:O5'	1.87	0.93
1:2:250:A:O2'	1:2:251:U:O4'	1.87	0.93
24:ac:688:GLU:H	38:l:319:GLU:H	1.16	0.93
1:2:39:U:O4'	48:q:26:ARG:NH1	1.79	0.93
1:2:414:C:N4	2:h:13:ILE:HG21	1.78	0.93
1:2:589:G:H1	1:2:604:U:H3	0.94	0.93
74:U:25:PHE:CB	1:1:972:A:H61	1.81	0.93
117:Ax:148:CYS:SG	117:Ax:176:ARG:HD3	2.09	0.93
1:2:22:U:N3	1:2:265:A:N1	2.16	0.93
1:2:605:A:C2'	1:2:606:U:H5''	1.98	0.93
1:2:282:A:C1'	43:i:247:ILE:HD11	1.98	0.93
1:2:418:A:H62	13:aj:54:PRO:HA	1.32	0.93
1:2:419:A:H2'	10:ae:181:ARG:CD	1.96	0.93
1:2:482:C:O2	10:ae:56:TYR:HB2	1.69	0.93
1:2:491:U:C2	14:e:384:SER:HB3	2.03	0.93

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:67:A:O2'	37:j:22:TRP:C	2.10	0.93
1:2:174:U:OP1	48:q:10:ARG:NH1	2.02	0.93
1:2:417:C:C2	10:ae:128:TYR:HE1	1.79	0.93
1:2:526:A:C6	15:d:294:ILE:HG22	2.03	0.93
1:2:577:G:H2'	1:2:578:C:H5'	1.49	0.93
1:2:87:A:H5''	1:2:87:A:H8	1.32	0.93
1:2:224:G:H5''	6:s:145:ARG:HD2	1.49	0.93
1:2:420:U:H4'	13:aj:59:VAL:HG12	1.51	0.93
1:2:501:U:H5	3:aw:27:ARG:NH2	1.51	0.93
45:o:132:ARG:CB	50:a:349:TRP:CH2	2.52	0.93
1:2:50:U:H4'	37:j:11:ARG:HH22	1.19	0.93
1:2:308:U:HO2'	1:2:309:A:H8	1.03	0.93
1:2:368:U:H2'	1:2:369:G:H5'	1.50	0.93
1:2:415:A:C2	10:ae:38:GLY:CA	2.50	0.93
1:2:434:U:C4	10:ae:11:ARG:HA	2.04	0.93
1:2:504:A:H5'	6:s:81:ASN:HD22	1.32	0.93
1:2:48:U:C5	29:aq:11:SER:O	2.22	0.92
1:2:96:G:N1	1:2:123:G:O2'	1.90	0.92
1:2:615:U:C6	44:g:101:ARG:CD	2.52	0.92
1:1:863:A:N1	1:1:1105:G:N2	2.17	0.92
1:2:39:U:C5	33:w:139:TYR:HB3	2.04	0.92
1:2:108:A:H2	40:av:131:GLN:HB3	1.11	0.92
1:2:177:U:C4'	33:w:119:ARG:CD	2.46	0.92
1:2:361:U:C2'	1:2:362:A:H5'	1.98	0.92
1:2:435:U:C4	6:s:160:ALA:HA	2.04	0.92
45:o:132:ARG:HG2	50:a:349:TRP:CH2	2.05	0.92
102:Aq:338:HIS:HB3	102:Aq:341:PHE:CD2	2.04	0.92
1:2:45:U:C4'	29:aq:22:PHE:CA	1.85	0.92
1:2:497:A:H5''	3:aw:4:ALA:N	1.84	0.92
82:BB:111:PHE:CE1	82:BB:112:LEU:O	2.23	0.92
1:2:2:U:C5'	25:ad:707:TRP:CD1	2.52	0.92
1:2:290:C:OP1	4:m:178:ARG:CD	2.16	0.92
1:2:507:A:C2	9:n:61:GLN:HG2	2.05	0.92
63:J:67:ARG:HG3	63:J:68:PRO:CD	1.99	0.92
1:2:108:A:N7	39:ar:22:ASN:HB2	1.85	0.92
1:2:383:A:H2'	50:a:153:LYS:HB2	1.49	0.92
1:2:460:A:C6	8:am:301:GLY:O	2.20	0.92
1:2:180:A:OP1	33:w:109:LEU:HD11	1.68	0.92
1:2:243:A:N7	1:2:473:U:O4'	2.03	0.92
1:2:434:U:O4	10:ae:10:GLY:O	1.87	0.92
1:2:476:U:H5''	1:2:476:U:C6	2.04	0.92

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:510:A:N3	3:aw:19:PRO:O	2.02	0.92
52:z:718:ARG:HH22	52:z:768:ARG:HB2	1.35	0.92
1:2:181:U:H5'	33:w:101:ARG:HB3	1.51	0.92
1:2:301:U:C2	1:2:302:A:H8	1.76	0.92
1:2:384:U:O4'	50:a:153:LYS:HB3	1.69	0.92
1:2:408:U:H4'	9:n:56:HIS:NE2	1.85	0.92
1:2:436:U:C2	6:s:152:PHE:HA	2.04	0.92
1:2:53:U:O2'	1:2:54:A:OP1	1.86	0.92
1:2:291:U:O2'	1:2:292:A:OP1	1.85	0.92
1:2:495:U:H5''	3:aw:1:MET:HE2	0.93	0.92
14:e:311:PHE:HZ	20:u:653:ILE:HB	1.34	0.92
49:b:24:GLU:N	85:An:150:PHE:CZ	2.38	0.92
1:2:425:A:H4'	13:aj:235:GLU:CA	1.99	0.91
1:2:86:C:C1'	47:k:152:LYS:CG	2.35	0.91
1:2:280:A:N6	1:2:323:U:OP2	2.02	0.91
1:2:434:U:H2'	1:2:434:U:O2	1.67	0.91
1:2:486:A:N7	9:n:121:PHE:CE2	2.30	0.91
1:2:495:U:C5	3:aw:30:LYS:HB2	2.05	0.91
1:2:529:A:H2	16:az:72:LYS:HE2	1.15	0.91
1:2:558:U:H2'	1:2:559:U:H6	1.34	0.91
59:F:161:GLN:HA	59:F:161:GLN:HE21	1.35	0.91
1:2:16:U:H5	1:2:17:C:H5	0.97	0.91
1:2:282:A:H1'	1:2:283:U:C6	2.04	0.91
1:2:507:A:N7	3:aw:28:LEU:HD11	1.86	0.91
1:2:166:G:OP1	1:2:166:G:H4'	1.70	0.91
1:2:280:A:H62	46:c:171:LYS:HD3	1.30	0.91
1:2:283:U:O4	1:2:316:A:C6	2.22	0.91
1:2:342:A:C2'	1:2:343:C:H5'	2.00	0.91
1:2:425:A:C4'	13:aj:235:GLU:CA	2.48	0.91
1:2:509:C:H6	11:ay:166:TYR:OH	1.50	0.91
77:X:352:LYS:HB3	77:X:353:PRO:HD2	1.50	0.91
1:2:2:U:H5''	25:ad:706:GLN:HB3	1.53	0.91
1:2:507:A:C8	3:aw:28:LEU:CG	2.52	0.91
20:u:76:LEU:HA	38:l:671:TRP:HE1	1.35	0.91
68:O:65:LYS:HE2	1:1:135:A:H62	1.34	0.91
105:BP:97:ARG:N	105:BP:98:PRO:HD2	1.83	0.91
119:BO:172:ARG:HH21	119:BO:172:ARG:HA	1.34	0.91
1:2:615:U:O4'	44:g:101:ARG:CZ	2.19	0.91
1:2:435:U:P	6:s:159:GLY:N	2.43	0.91
1:2:436:U:OP2	6:s:154:VAL:HG21	1.71	0.91
1:2:526:A:N6	15:d:294:ILE:N	2.19	0.91

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
77:X:499:ARG:HD2	100:BH:202:GLU:HG3	1.50	0.91
1:2:585:U:O2'	1:2:586:A:O5'	1.86	0.91
1:2:50:U:H5''	37:j:11:ARG:HH21	1.30	0.91
1:2:56:U:O2	1:2:59:A:H2	1.52	0.91
1:2:86:C:O2	47:k:152:LYS:CG	2.18	0.91
1:2:122:U:H3	43:i:297:GLN:HG3	1.11	0.91
1:2:171:A:O2'	1:2:172:A:OP1	1.89	0.91
1:2:229:C:H5''	1:2:230:C:C6	2.05	0.91
1:2:533:U:O5'	5:f:17:ARG:NH1	2.03	0.91
1:2:182:A:C5'	33:w:98:LEU:HD13	2.01	0.91
1:2:332:G:H1	44:g:83:ASN:ND2	1.69	0.91
1:2:495:U:C3'	3:aw:2:HIS:CD2	2.39	0.91
102:Aq:336:ARG:HH11	102:Aq:336:ARG:CG	1.82	0.90
1:2:35:A:H62	37:j:16:ARG:HH22	0.97	0.90
1:2:39:U:H3	29:aq:10:ALA:HB3	1.09	0.90
45:o:132:ARG:NE	50:a:349:TRP:O	2.03	0.90
54:A:287:GLY:O	101:Am:22:ARG:NH2	2.04	0.90
97:BM:31:ARG:HH22	97:BM:47:LYS:HG3	1.34	0.90
117:Ax:73:THR:HG21	117:Ax:200:PHE:HB2	1.50	0.90
1:2:281:A:C5	43:i:254:ASN:ND2	2.39	0.90
1:2:437:U:C4'	6:s:153:LYS:HB2	2.00	0.90
1:2:480:A:N9	2:h:21:HIS:ND1	2.11	0.90
1:2:497:A:H5'	3:aw:4:ALA:CB	1.72	0.90
8:am:142:MET:HE1	8:am:147:ILE:CG2	2.00	0.90
1:1:55:A:H61	1:1:122:U:H3	1.17	0.90
1:2:47:U:OP1	29:aq:13:ARG:HD3	1.69	0.90
1:2:182:A:H5'	33:w:98:LEU:CD1	2.01	0.90
1:2:301:U:C5	1:2:302:A:N7	2.39	0.90
1:2:425:A:C2	13:aj:232:ASP:O	2.24	0.90
1:2:479:A:P	2:h:20:ARG:NH1	2.45	0.90
1:2:417:C:C2	10:ae:128:TYR:CD1	2.60	0.90
1:2:486:A:OP1	1:2:486:A:H8	1.53	0.90
1:2:528:A:OP1	16:az:69:HIS:CA	2.18	0.90
14:e:311:PHE:HB3	20:u:633:VAL:HB	1.51	0.90
1:2:94:A:C6	1:2:372:A:C8	2.58	0.90
1:2:172:A:C5	37:j:17:LYS:CA	2.51	0.90
1:2:488:U:P	9:n:34:LYS:HZ3	1.95	0.90
107:BF:96:ARG:NH2	1:1:563:U:O2'	2.04	0.90
1:2:45:U:C3'	29:aq:22:PHE:H	1.85	0.90
1:2:342:A:H2'	1:2:343:C:H5'	1.54	0.90
1:2:421:A:O3'	10:ae:298:TYR:CE2	2.24	0.90

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:435:U:C4'	6:s:154:VAL:HG11	1.99	0.90
1:2:521:A:OP1	5:f:10:ARG:CB	2.18	0.90
1:2:50:U:C5'	37:j:11:ARG:HH21	1.77	0.90
1:2:132:U:O2'	21:aa:100:HIS:CE1	2.25	0.90
1:2:324:U:OP1	43:i:303:TYR:HE1	1.55	0.90
1:2:432:G:N3	10:ae:22:LEU:CD2	2.33	0.90
1:2:397:U:O5'	5:f:19:GLY:N	2.03	0.90
1:2:414:C:C6	6:s:155:LEU:HD22	2.07	0.90
1:2:436:U:H1'	6:s:154:VAL:HG23	1.51	0.90
1:2:44:A:O4'	29:aq:25:GLY:N	2.05	0.90
1:2:86:C:H2'	47:k:152:LYS:CG	1.59	0.90
1:2:419:A:H2'	10:ae:181:ARG:HB3	1.53	0.90
1:2:453:A:C5'	8:am:277:PRO:HG2	1.90	0.90
1:2:524:C:O3'	5:f:27:ARG:NH1	2.04	0.90
1:2:614:U:O3'	44:g:104:GLN:NE2	1.90	0.90
21:aa:1173:HIS:HB3	21:aa:1176:GLN:HE21	1.35	0.90
30:as:215:TRP:CZ3	30:as:215:TRP:CE3	2.60	0.90
63:J:67:ARG:NH2	63:J:67:ARG:HB2	1.87	0.90
117:Ax:145:CYS:SG	117:Ax:166:CYS:CB	2.60	0.90
22:ab:301:TRP:HZ2	38:l:459:VAL:HG13	1.35	0.89
1:2:459:A:C3'	8:am:284:ARG:NH1	2.07	0.89
1:2:497:A:C5'	3:aw:15:ARG:CZ	2.50	0.89
1:2:604:U:C5'	44:g:82:SER:HB3	1.88	0.89
1:2:37:U:O3'	33:w:126:TRP:NE1	2.02	0.89
1:2:176:U:C3'	48:q:10:ARG:O	2.20	0.89
1:2:280:A:H62	46:c:171:LYS:CD	1.82	0.89
1:2:415:A:H5''	10:ae:159:ASP:OD1	1.71	0.89
1:2:525:A:C4'	15:d:329:ARG:HB3	2.02	0.89
118:BL:114:ASP:HB3	118:BL:130:LEU:HD13	1.55	0.89
1:2:407:U:H4'	9:n:58:LYS:HZ2	1.37	0.89
61:H:27:ARG:HH22	61:H:96:LYS:HG2	1.37	0.89
118:BL:119:ARG:HH11	118:BL:132:HIS:C	1.81	0.89
1:2:313:C:H5	4:m:169:GLN:HE21	0.89	0.89
1:2:455:U:OP1	8:am:276:SER:OG	1.88	0.89
1:2:418:A:H62	13:aj:54:PRO:CA	1.84	0.89
1:2:514:U:C3'	16:az:17:VAL:CG2	2.50	0.89
8:am:142:MET:HE2	8:am:147:ILE:HG21	1.54	0.89
25:ad:536:THR:CB	30:as:215:TRP:CZ3	2.56	0.89
117:Ax:129:ARG:O	117:Ax:132:THR:O	1.91	0.89
1:2:176:U:H3'	48:q:10:ARG:O	1.73	0.89
1:2:412:G:O6	10:ae:53:THR:CG2	2.20	0.89

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
26:an:56:TRP:HE1	52:z:916:GLU:HB3	1.36	0.89
1:2:36:G:C8	33:w:130:LYS:HG2	2.07	0.89
1:2:172:A:H61	37:j:17:LYS:HD3	0.90	0.89
1:2:225:G:O6	1:2:248:C:N4	2.06	0.89
45:o:132:ARG:HB3	50:a:349:TRP:CE2	2.04	0.89
69:P:42:PRO:HD2	102:Aq:52:ASN:HA	1.53	0.89
1:2:438:G:N3	1:2:474:U:H1'	1.87	0.88
1:2:257:U:O2'	1:2:258:A:OP2	1.90	0.88
1:2:305:C:H2'	1:2:306:A:H5'	1.56	0.88
1:2:324:U:OP1	43:i:303:TYR:CE1	2.25	0.88
1:2:481:U:O2	2:h:90:ALA:CB	2.21	0.88
1:2:506:U:P	9:n:77:LYS:CE	2.60	0.88
1:2:143:G:OP2	25:ad:34:PHE:CE1	2.27	0.88
1:2:155:G:H5''	1:2:155:G:C8	2.06	0.88
1:2:280:A:H2	43:i:257:ARG:HH11	1.22	0.88
1:2:397:U:O2	1:2:399:U:O4	1.92	0.88
1:2:417:C:H2'	10:ae:128:TYR:CE1	2.08	0.88
1:2:425:A:N1	13:aj:266:LYS:HB2	1.87	0.88
1:2:229:C:H5	1:2:241:G:O5'	1.55	0.88
1:2:313:C:H5	4:m:169:GLN:NE2	1.69	0.88
8:am:142:MET:SD	8:am:147:ILE:HG21	2.11	0.88
1:2:280:A:C8	1:2:322:A:OP2	2.27	0.88
79:Z:25:PHE:O	79:Z:27:ASP:N	2.07	0.88
1:2:52:U:O2	1:2:149:A:H2	1.54	0.88
1:2:426:U:OP2	13:aj:235:GLU:HB2	1.71	0.88
1:2:460:A:C6	8:am:300:ILE:HG23	2.08	0.88
1:2:471:A:H4'	12:ag:18:ILE:HD11	1.55	0.88
1:2:532:U:C4	16:az:76:ARG:NH2	2.42	0.88
85:An:229:ARG:O	85:An:229:ARG:NH2	2.07	0.88
1:1:861:A:H2'	1:1:861:A:N3	1.87	0.88
1:2:107:A:C4'	43:i:363:TYR:OH	2.22	0.88
82:BB:105:GLU:CD	82:BB:106:PRO:HD2	1.98	0.88
1:2:408:U:H4'	9:n:56:HIS:CE1	2.09	0.88
1:2:421:A:O3'	10:ae:298:TYR:CD2	2.27	0.88
1:2:507:A:N7	3:aw:28:LEU:HD21	1.88	0.88
95:Aa:90:THR:O	95:Aa:92:SER:N	2.06	0.88
1:2:481:U:N3	2:h:90:ALA:HB1	1.89	0.88
1:2:605:A:C2'	1:2:606:U:H5'	2.02	0.88
1:2:604:U:H5''	44:g:82:SER:CB	2.04	0.88
49:b:24:GLU:CA	85:An:150:PHE:CE2	2.57	0.88
58:E:121:THR:N	1:1:433:G:OP1	2.07	0.88

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:412:G:C6	10:ae:53:THR:CA	2.56	0.87
1:2:413:U:C5'	2:h:10:MET:HB3	2.04	0.87
1:2:497:A:H5'	3:aw:15:ARG:CZ	2.04	0.87
49:b:23:ARG:O	85:An:150:PHE:HZ	1.56	0.87
1:2:2:U:H5'	25:ad:707:TRP:NE1	1.89	0.87
1:2:92:U:H5'	1:2:92:U:C6	2.05	0.87
1:2:177:U:H4'	33:w:119:ARG:NE	1.51	0.87
22:ab:126:ARG:HH12	38:l:139:LYS:HD2	1.36	0.87
32:y:40:TYR:HH	32:y:188:HIS:HD1	1.21	0.87
1:2:180:A:OP1	33:w:109:LEU:CD1	2.21	0.87
1:2:229:C:O2'	1:2:241:G:C2	2.26	0.87
1:2:412:G:C3'	10:ae:156:ALA:HB1	2.04	0.87
1:2:38:U:OP2	33:w:139:TYR:HE1	1.56	0.87
1:2:45:U:C5'	29:aq:22:PHE:N	2.32	0.87
1:2:47:U:P	29:aq:13:ARG:HD2	2.15	0.87
1:2:414:C:H41	2:h:13:ILE:CG2	1.78	0.87
1:2:497:A:H4'	3:aw:4:ALA:CB	2.02	0.87
1:2:172:A:O4'	37:j:19:PRO:O	1.93	0.87
1:2:497:A:C2	3:aw:17:ILE:HD12	2.09	0.87
1:2:567:A:H2'	1:2:568:A:H5'	1.57	0.87
45:o:132:ARG:HB2	50:a:349:TRP:CE3	2.09	0.87
67:N:50:ARG:HH11	75:V:27:LYS:HG2	1.37	0.87
1:2:283:U:O4	1:2:316:A:N6	2.08	0.87
74:U:17:ARG:HD3	74:U:17:ARG:N	1.88	0.87
1:2:45:U:H5''	29:aq:22:PHE:N	1.71	0.87
1:2:70:A:OP2	35:t:30:SER:OG	1.91	0.87
1:2:281:A:C6	43:i:254:ASN:ND2	2.40	0.87
1:2:437:U:C6	6:s:151:ARG:CA	2.57	0.87
1:2:516:A:N6	17:ax:33:ASN:HB2	1.89	0.87
14:e:312:GLY:H	20:u:630:LEU:C	1.83	0.87
86:Al:274:VAL:O	86:Al:274:VAL:CG2	2.23	0.87
1:2:107:A:H5''	43:i:363:TYR:CE1	2.10	0.87
1:2:408:U:O4'	9:n:56:HIS:CB	2.23	0.87
1:2:436:U:O3'	6:s:153:LYS:O	1.84	0.87
1:2:145:U:O4	47:k:72:ARG:NH2	2.08	0.86
1:2:414:C:C4	6:s:155:LEU:HB2	2.10	0.86
85:An:139:GLN:OE1	85:An:139:GLN:HA	1.73	0.86
1:2:335:U:H5'	1:2:335:U:C6	2.10	0.86
1:2:480:A:C6	2:h:21:HIS:CG	2.62	0.86
1:2:486:A:C4	9:n:121:PHE:CD2	2.62	0.86
15:d:34:TRP:NE1	15:d:41:MET:O	2.06	0.86

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
63:J:67:ARG:HG3	63:J:68:PRO:HD3	1.55	0.86
1:2:137:G:H2'	1:2:138:U:H5'	1.58	0.86
1:2:412:G:O6	10:ae:53:THR:HA	1.75	0.86
10:ae:384:VAL:O	10:ae:427:ASN:ND2	2.08	0.86
1:2:172:A:C4'	37:j:19:PRO:O	2.23	0.86
1:2:280:A:C2	43:i:257:ARG:NH1	2.42	0.86
1:2:440:C:P	2:h:20:ARG:H	1.98	0.86
1:2:513:U:H1'	16:az:146:TYR:HE1	1.36	0.86
1:2:529:A:C2'	16:az:72:LYS:HA	2.05	0.86
77:X:275:LEU:HD11	106:Ad:32:ARG:HH21	1.39	0.86
86:Al:256:PRO:HD3	115:Ay:158:GLN:HE22	1.39	0.86
1:2:32:A:O2'	1:2:33:A:H5'	1.75	0.86
1:2:55:G:H5'	1:2:152:G:N1	1.91	0.86
1:2:456:A:C6	8:am:284:ARG:HG2	2.09	0.86
1:2:486:A:N6	9:n:121:PHE:CE2	2.42	0.86
59:F:40:PRO:HB3	64:K:69:ALA:HB2	1.55	0.86
93:Ap:168:ASN:HA	93:Ap:172:LYS:HB3	1.57	0.86
1:2:437:U:C5	6:s:150:ASN:CA	2.57	0.86
19:af:491:ARG:HG2	19:af:502:ARG:HE	1.40	0.86
68:O:23:GLN:HA	68:O:23:GLN:NE2	1.90	0.86
1:2:67:A:HO2'	37:j:22:TRP:CA	1.81	0.86
1:2:350:G:H3'	1:2:351:U:C6	2.10	0.86
1:2:510:A:N1	3:aw:20:ILE:O	2.07	0.86
1:2:530:A:H8	1:2:530:A:OP2	1.59	0.86
105:BP:40:LYS:HG3	109:Af:145:VAL:HG11	1.55	0.86
1:2:175:U:C5'	48:q:11:GLN:CD	2.47	0.86
1:2:227:U:H2'	1:2:228:G:C8	2.11	0.86
77:X:358:GLU:HG2	77:X:364:PRO:HG2	1.57	0.86
1:2:172:A:C5	37:j:17:LYS:C	2.54	0.86
1:2:502:A:N9	14:e:722:PHE:CE2	2.33	0.86
1:2:142:U:O2'	47:k:119:LYS:HA	1.75	0.86
1:2:147:U:O2'	1:2:148:U:OP1	1.93	0.86
1:2:502:A:N1	14:e:721:ARG:CA	2.38	0.86
1:2:513:U:H5	16:az:148:ARG:HH12	1.19	0.86
70:Q:108:ILE:HB	1:1:905:A:H62	1.39	0.86
1:2:48:U:C5'	37:j:10:ALA:N	2.39	0.85
1:2:193:A:H61	1:2:259:A:H5''	1.38	0.85
1:2:497:A:N6	3:aw:17:ILE:HG22	1.91	0.85
1:2:497:A:N3	3:aw:17:ILE:HD13	1.89	0.85
1:2:549:C:O2'	1:2:550:C:H5'	1.75	0.85
23:ak:190:TYR:HA	23:ak:250:PRO:HA	1.58	0.85

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:156:GLN:HE21	48:q:70:ARG:HD3	1.39	0.85
49:b:24:GLU:HA	85:An:150:PHE:CE2	2.10	0.85
70:Q:108:ILE:O	70:Q:108:ILE:HG23	1.76	0.85
1:1:925:G:H1	1:1:931:U:H3	1.24	0.85
1:2:418:A:N7	13:aj:54:PRO:CA	2.38	0.85
1:2:418:A:H8	13:aj:55:HIS:ND1	1.72	0.85
1:2:430:C:H1'	13:aj:272:ILE:HG21	1.57	0.85
1:2:543:U:OP2	50:a:159:HIS:CE1	2.29	0.85
60:G:163:ARG:NH2	1:1:193:U:OP2	2.10	0.85
1:1:53:A:H61	1:1:124:A:H62	1.23	0.85
1:2:47:U:OP2	29:aq:13:ARG:HB3	1.76	0.85
1:2:68:A:N1	1:2:69:A:N6	2.25	0.85
69:P:108:GLN:HG2	96:Ao:85:ASP:HB3	1.57	0.85
115:Ay:64:ILE:HD12	1:1:697:A:H5''	1.56	0.85
1:2:174:U:HO2'	35:t:27:MET:HE3	1.40	0.85
1:2:175:U:N3	48:q:14:PRO:HD2	1.91	0.85
1:2:431:U:C4	13:aj:280:HIS:NE2	2.42	0.85
1:2:510:A:C5	3:aw:21:ASP:HA	2.11	0.85
1:2:615:U:C5	44:g:101:ARG:CD	2.58	0.85
22:ab:1151:LYS:HE2	90:BC:140:PHE:CE1	2.11	0.85
92:Ai:39:ILE:HG22	92:Ai:294:HIS:HB2	1.57	0.85
1:2:122:U:C2	43:i:297:GLN:HG3	2.11	0.85
1:2:156:U:C5	29:aq:62:LYS:HG2	2.11	0.85
1:2:201:A:OP2	31:at:228:HIS:HB3	1.76	0.85
1:2:422:U:N3	13:aj:52:TYR:HB3	1.84	0.85
1:2:471:A:N3	12:ag:19:ARG:HG2	1.90	0.85
1:2:122:U:C5	43:i:293:VAL:HG12	2.11	0.85
1:2:421:A:C3'	10:ae:298:TYR:CE2	2.60	0.85
1:2:436:U:C2	6:s:152:PHE:CG	2.63	0.85
1:2:449:A:P	2:h:123:ARG:HH22	1.98	0.85
64:K:59:ARG:NH2	1:1:410:A:OP2	2.09	0.85
1:2:180:A:H3'	33:w:105:ARG:CB	2.05	0.85
1:2:180:A:H5''	33:w:105:ARG:HG2	0.90	0.85
1:2:363:A:O2'	1:2:364:A:H5'	1.76	0.85
1:2:499:A:C2'	14:e:784:LEU:HD11	2.02	0.85
1:1:508:G:N2	1:1:518:U:OP1	2.08	0.85
1:2:65:U:H4'	35:t:36:ARG:CG	2.06	0.85
1:2:383:A:H2'	50:a:153:LYS:CB	2.06	0.85
1:2:511:U:C4	11:ay:156:PHE:CB	2.60	0.85
1:2:514:U:C2'	16:az:17:VAL:HG21	2.06	0.85
22:ab:961:LEU:HD13	22:ab:973:GLY:H	1.41	0.85

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
75:V:76:MET:O	75:V:81:ARG:NH2	2.10	0.85
85:An:135:PHE:HA	85:An:139:GLN:HB2	1.58	0.85
1:2:210:U:O2'	1:2:211:A:H5''	1.77	0.85
12:ag:212:LYS:HB3	38:l:644:ARG:HH22	1.40	0.85
74:U:25:PHE:HB3	1:1:972:A:N6	1.90	0.85
1:2:413:U:H5''	2:h:10:MET:HB3	1.58	0.85
1:2:418:A:N7	13:aj:54:PRO:HA	1.92	0.85
1:2:425:A:C4'	13:aj:235:GLU:HB3	1.94	0.85
69:P:48:GLU:HA	69:P:78:THR:HG22	1.58	0.85
1:2:342:A:H5'	1:2:342:A:C8	2.12	0.84
1:2:423:C:H42	12:ag:51:GLN:HE22	1.18	0.84
1:2:514:U:H2'	16:az:17:VAL:HG21	1.57	0.84
71:R:281:GLU:HA	71:R:284:LYS:HG2	1.58	0.84
1:1:923:A:O2'	1:1:980:A:OP2	1.95	0.84
1:2:1:G:O4'	25:ad:705:GLY:O	1.94	0.84
1:2:314:U:H3'	1:2:314:U:OP2	1.76	0.84
45:o:164:GLY:HA3	45:o:170:TYR:HD2	1.42	0.84
118:BL:93:VAL:HG11	118:BL:163:VAL:HG22	1.58	0.84
1:1:887:C:N3	1:1:979:G:N2	2.26	0.84
1:2:181:U:C5'	33:w:101:ARG:HB3	2.07	0.84
1:2:501:U:C6	3:aw:27:ARG:NH2	2.45	0.84
1:2:513:U:H5'	16:az:145:ARG:CZ	2.06	0.84
85:An:45:GLU:O	85:An:47:GLY:N	2.10	0.84
1:2:282:A:O3'	43:i:247:ILE:HD11	1.76	0.84
1:2:437:U:N3	6:s:151:ARG:O	2.09	0.84
1:2:498:U:O2	11:ay:132:THR:O	1.94	0.84
1:2:499:A:C8	3:aw:10:ARG:CG	2.60	0.84
12:ag:375:ARG:HG3	22:ab:1056:GLU:HG3	1.59	0.84
64:K:23:MET:SD	1:1:146:U:C4	2.70	0.84
1:2:2:U:C2'	25:ad:706:GLN:NE2	2.41	0.84
1:2:94:A:C6	1:2:372:A:N7	2.46	0.84
1:2:175:U:C4'	48:q:11:GLN:HG3	2.08	0.84
1:2:332:G:C4'	1:2:354:A:H2	1.90	0.84
1:2:418:A:N6	13:aj:54:PRO:CA	2.41	0.84
4:m:18:MET:HE3	52:z:783:GLN:HB2	1.59	0.84
118:BL:310:ARG:HH11	1:1:297:U:H3	1.21	0.84
1:2:68:A:C6	1:2:69:A:C6	2.66	0.84
1:2:158:U:C4'	29:aq:18:TYR:HB3	1.90	0.84
1:2:434:U:O2'	6:s:158:SER:OG	1.94	0.84
1:2:485:A:C8	9:n:57:ILE:HB	2.11	0.84
1:2:521:A:O2'	15:d:344:ASN:HA	1.76	0.84

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
21:aa:906:ARG:HE	27:ao:157:GLN:HA	1.40	0.84
82:BB:111:PHE:C	82:BB:111:PHE:CD1	2.55	0.84
101:Am:315:ASN:ND2	1:1:417:U:O2'	2.10	0.84
1:1:40:C:H1'	1:1:41:A:N7	1.93	0.84
1:2:418:A:N6	13:aj:54:PRO:HB3	1.93	0.84
1:2:422:U:N3	13:aj:52:TYR:CG	2.46	0.84
1:2:435:U:C5	6:s:160:ALA:HA	2.12	0.84
1:2:456:A:N1	8:am:284:ARG:NH1	2.24	0.84
1:2:2:U:P	25:ad:707:TRP:CA	2.63	0.84
1:2:408:U:H5''	9:n:56:HIS:HD2	1.39	0.84
1:2:422:U:H5'	10:ae:298:TYR:CE1	2.13	0.84
1:2:495:U:H5''	3:aw:1:MET:HE1	1.54	0.84
35:t:211:PHE:O	37:j:143:LYS:NZ	2.11	0.84
60:G:209:ARG:NH1	1:1:190:A:N3	2.25	0.84
1:2:435:U:OP1	7:au:244:TYR:CE1	2.31	0.84
1:2:493:U:O2	15:d:339:VAL:CG1	2.26	0.84
41:ai:376:TRP:NE1	52:z:206:CYS:O	2.10	0.84
55:B:243:LYS:HZ3	99:Aj:450:ASN:HB3	1.41	0.84
1:2:511:U:H5'	3:aw:19:PRO:HD2	1.57	0.83
29:aq:84:GLU:O	33:w:168:ASN:ND2	2.11	0.83
29:aq:174:ALA:HB1	29:aq:179:PHE:HB2	1.60	0.83
77:X:367:GLN:HG2	77:X:384:LYS:HG3	1.60	0.83
83:Aw:173:ILE:HG23	99:Aj:440:GLN:HB2	1.59	0.83
96:Ao:238:ARG:CG	105:BP:98:PRO:HG3	2.07	0.83
1:2:2:U:H3'	25:ad:706:GLN:HE21	1.40	0.83
1:2:508:G:O6	11:ay:166:TYR:N	2.10	0.83
55:B:291:TYR:OH	1:1:111:A:N6	2.11	0.83
71:R:212:SER:HA	89:At:108:MET:HE3	1.60	0.83
86:Al:47:ARG:NH2	1:1:900:A:OP1	2.11	0.83
1:2:38:U:C5'	33:w:139:TYR:CE1	2.49	0.83
1:2:283:U:O2'	43:i:247:ILE:N	1.97	0.83
1:2:434:U:H3'	7:au:244:TYR:HE1	1.42	0.83
1:2:501:U:C5	3:aw:27:ARG:NH1	2.45	0.83
8:am:142:MET:SD	8:am:147:ILE:CG2	2.65	0.83
1:2:2:U:C3'	25:ad:706:GLN:HE22	1.91	0.83
1:2:176:U:H5'	1:2:176:U:H6	1.43	0.83
1:2:316:A:H3'	1:2:317:U:C4'	2.08	0.83
1:2:322:A:OP1	46:c:171:LYS:HE2	1.76	0.83
1:2:431:U:C5	13:aj:280:HIS:HD2	1.96	0.83
1:2:434:U:C4	10:ae:11:ARG:CA	2.62	0.83
1:2:435:U:H4'	6:s:154:VAL:CG1	1.99	0.83

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:512:G:H1'	16:az:141:VAL:HG23	0.90	0.83
25:ad:536:THR:CB	30:as:215:TRP:CE3	2.60	0.83
94:Au:94:LYS:HD3	1:1:239:U:H5	1.41	0.83
112:Ac:45:ALA:HB2	112:Ac:188:ARG:HH11	1.42	0.83
104:Ak:52:LEU:HB2	104:Ak:265:ALA:HB1	1.61	0.83
1:2:462:G:OP2	2:h:134:TYR:HE1	1.62	0.83
1:2:555:U:H3'	1:2:556:U:C5'	2.09	0.83
97:BM:45:SER:HA	97:BM:118:ILE:HG21	1.60	0.83
1:2:208:C:C5	1:2:209:U:H6	1.94	0.83
1:2:362:A:OP2	1:2:362:A:H2'	1.78	0.83
1:2:525:A:H5'	15:d:330:ARG:O	1.71	0.83
1:2:347:U:O3'	1:2:348:U:O4'	1.96	0.83
1:2:408:U:O4'	9:n:56:HIS:CG	2.31	0.83
1:2:460:A:H5''	8:am:306:LEU:N	1.93	0.83
56:C:55:MET:SD	56:C:63:ARG:NH1	2.52	0.83
66:M:74:LYS:NZ	1:1:50:A:OP1	2.12	0.83
1:2:16:U:C4	1:2:367:A:OP2	2.31	0.83
1:2:45:U:H2'	1:2:46:U:H5''	1.58	0.83
1:2:516:A:H62	17:ax:33:ASN:HB2	1.43	0.83
31:at:312:CYS:HB3	31:at:315:CYS:H	1.44	0.83
102:Aq:68:THR:CG2	106:Ad:30:GLU:OE1	2.25	0.83
117:Ax:145:CYS:SG	117:Ax:166:CYS:HB2	2.17	0.83
1:2:2:U:H5''	25:ad:706:GLN:CB	2.09	0.82
1:2:177:U:C4'	33:w:119:ARG:NE	2.35	0.82
25:ad:776:GLY:O	45:o:334:ARG:NH2	2.12	0.82
71:R:30:PRO:HD3	71:R:83:ARG:HG2	1.59	0.82
83:Aw:24:PRO:O	106:Ad:131:ALA:N	2.10	0.82
102:Aq:171:ALA:O	102:Aq:173:HIS:N	2.10	0.82
1:2:38:U:OP2	33:w:139:TYR:CE1	2.28	0.82
1:2:39:U:O4	33:w:139:TYR:O	1.96	0.82
1:2:179:G:H4'	1:2:180:A:H5''	1.61	0.82
1:2:322:A:OP1	46:c:171:LYS:CE	2.27	0.82
56:C:142:ASN:ND2	1:1:904:A:OP1	2.13	0.82
56:C:205:TYR:O	56:C:208:ARG:NH1	2.12	0.82
117:Ax:136:TYR:H	117:Ax:136:TYR:HD1	1.25	0.82
1:1:955:U:H5	1:1:970:A:H61	1.26	0.82
1:2:55:G:C5'	1:2:152:G:H1	1.93	0.82
1:2:256:U:H4'	1:2:257:U:C5'	2.07	0.82
15:d:254:ASP:HB2	18:r:346:ARG:HH22	1.44	0.82
1:2:46:U:OP1	29:aq:21:LEU:HA	1.80	0.82
1:2:65:U:H1'	1:2:66:U:H5'	1.59	0.82

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:435:U:OP2	6:s:159:GLY:N	2.11	0.82
1:2:443:C:H2'	1:2:444:A:H5'	1.60	0.82
1:2:497:A:C5'	3:aw:4:ALA:CA	2.58	0.82
1:2:521:A:P	5:f:10:ARG:HA	2.19	0.82
52:z:913:LEU:HB2	52:z:922:GLU:HG3	1.59	0.82
1:1:975:U:H2'	1:1:975:U:O2	1.79	0.82
1:2:431:U:C6	13:aj:280:HIS:CD2	2.67	0.82
1:2:479:A:OP1	2:h:12:HIS:NE2	2.11	0.82
1:2:525:A:C2'	15:d:221:ASP:HA	2.10	0.82
1:2:483:A:N6	2:h:83:LYS:O	2.12	0.82
1:2:513:U:C5'	16:az:145:ARG:NH2	2.26	0.82
1:2:532:U:C6	16:az:76:ARG:HD3	2.14	0.82
1:2:461:U:O4	8:am:275:PHE:CZ	2.30	0.82
10:ae:456:SER:HB2	14:e:512:ALA:HA	1.61	0.82
1:2:203:U:HO2'	1:2:205:U:H5	1.28	0.82
1:2:332:G:H1	44:g:83:ASN:HD21	0.85	0.82
1:2:480:A:N3	2:h:21:HIS:CE1	2.47	0.82
1:2:574:C:O2'	1:2:575:G:H5'	1.79	0.82
68:O:28:ALA:HB1	68:O:29:ARG:HE	1.44	0.82
84:Bj:84:ILE:HD12	84:Bj:104:MET:HE1	1.62	0.82
96:Ao:48:MET:HG2	96:Ao:49:PRO:HD2	1.61	0.82
99:Aj:420:GLN:NE2	1:1:506:A:OP1	2.12	0.82
1:1:221:U:O2'	1:1:882:U:O2'	1.97	0.82
1:2:49:A:OP2	37:j:11:ARG:O	1.97	0.82
1:2:189:A:C2'	1:2:190:A:H2'	2.09	0.82
1:2:224:G:H2'	1:2:225:G:C5'	2.07	0.82
1:2:491:U:O2	14:e:384:SER:HB3	1.78	0.82
1:2:496:U:OP1	3:aw:1:MET:CB	2.28	0.82
1:2:507:A:C2	9:n:61:GLN:HB3	2.15	0.82
1:2:522:A:OP1	15:d:345:LYS:CG	2.28	0.82
63:J:45:PRO:HB2	110:As:66:CYS:SG	2.20	0.82
117:Ax:73:THR:HG22	117:Ax:200:PHE:H	1.44	0.82
1:2:433:U:OP2	10:ae:14:GLY:O	1.97	0.82
57:D:37:THR:HG22	101:Am:260:TRP:HH2	1.45	0.82
85:An:139:GLN:HG3	85:An:145:LEU:CD1	2.09	0.82
1:2:424:U:P	13:aj:233:ARG:HD3	2.19	0.81
1:2:497:A:C2	3:aw:17:ILE:HD13	2.12	0.81
1:2:617:U:N3	4:m:208:HIS:HE1	1.77	0.81
117:Ax:151:ARG:NH2	1:1:241:U:OP2	2.12	0.81
1:2:66:U:C4'	35:t:35:ARG:HD3	1.89	0.81
1:2:94:A:N6	1:2:372:A:C8	2.48	0.81

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:189:A:HO2'	1:2:190:A:H8	1.28	0.81
1:2:353:U:O2'	1:2:354:A:OP2	1.97	0.81
1:2:487:C:N3	9:n:146:ARG:NH2	2.28	0.81
1:2:497:A:C6	3:aw:17:ILE:HG23	2.12	0.81
1:2:497:A:N6	3:aw:17:ILE:HG23	1.95	0.81
71:R:212:SER:HB3	89:At:105:VAL:HA	1.62	0.81
93:Ap:170:ASP:O	93:Ap:173:ARG:NH2	2.13	0.81
1:2:48:U:OP1	29:aq:14:TYR:CZ	2.27	0.81
1:2:482:C:C2	10:ae:56:TYR:CB	2.64	0.81
1:2:482:C:H2'	10:ae:56:TYR:HD2	1.26	0.81
1:2:502:A:N3	6:s:75:ARG:NH2	2.26	0.81
1:2:528:A:P	16:az:69:HIS:HB2	2.19	0.81
77:X:302:THR:O	77:X:306:ALA:N	2.10	0.81
1:2:530:A:OP2	1:2:530:A:C8	2.33	0.81
12:ag:449:LEU:HD12	12:ag:452:LEU:HD13	1.60	0.81
39:ar:82:ALA:HA	39:ar:87:ARG:HH22	1.44	0.81
74:U:29:VAL:HG23	74:U:30:ILE:H	1.45	0.81
1:2:175:U:H5'	48:q:11:GLN:HG3	0.81	0.81
1:2:231:A:C2	1:2:247:U:O2	2.33	0.81
1:2:425:A:H5''	13:aj:235:GLU:HB3	1.63	0.81
1:2:438:G:N7	1:2:439:A:N7	2.27	0.81
68:O:29:ARG:HD2	68:O:29:ARG:H	1.46	0.81
1:2:46:U:H3'	29:aq:11:SER:OG	1.80	0.81
1:2:428:U:O4	13:aj:237:ARG:NH2	2.14	0.81
1:2:447:A:H2	1:2:471:A:N7	1.77	0.81
1:2:464:U:C4	8:am:295:ARG:NH1	2.48	0.81
1:2:495:U:C5	3:aw:30:LYS:CB	2.62	0.81
1:2:496:U:OP1	3:aw:2:HIS:N	2.11	0.81
1:2:497:A:C5'	3:aw:15:ARG:NH1	2.43	0.81
1:2:529:A:N3	16:az:72:LYS:HD3	1.95	0.81
21:aa:634:ASP:HB3	21:aa:637:ARG:HB2	1.63	0.81
67:N:76:TYR:OH	1:1:316:A:OP2	1.98	0.81
92:Ai:96:LEU:HD13	92:Ai:222:PRO:HB2	1.61	0.81
97:BM:128:LEU:HD12	97:BM:278:LEU:HB3	1.63	0.81
119:BO:86:GLU:OE2	119:BO:99:HIS:NE2	2.12	0.81
1:2:605:A:C3'	1:2:606:U:H5'	2.10	0.81
19:af:295:ARG:NH1	19:af:336:LEU:O	2.14	0.81
20:u:558:GLU:HB3	20:u:562:ARG:HH22	1.46	0.81
119:BO:103:VAL:HG11	119:BO:122:PRO:HA	1.63	0.81
22:ab:37:MET:O	22:ab:114:ARG:NH1	2.14	0.81
24:ac:412:ARG:HG2	24:ac:420:PRO:HD2	1.61	0.81

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
45:o:132:ARG:HG3	50:a:349:TRP:CZ3	2.16	0.81
67:N:95:TYR:OH	1:1:556:A:OP1	1.99	0.81
94:Au:46:VAL:HG12	94:Au:47:LEU:HD13	1.63	0.81
1:2:131:U:O4	1:2:149:A:H5'	1.81	0.81
1:2:446:G:O6	12:ag:19:ARG:CZ	2.27	0.81
55:B:365:GLU:HG2	55:B:372:PRO:HA	1.61	0.81
113:Ah:347:ASN:HD21	113:Ah:458:LEU:HB3	1.45	0.81
1:2:293:U:H2'	1:2:294:A:O4'	1.80	0.81
1:2:426:U:O2	13:aj:237:ARG:NH1	2.13	0.81
49:b:24:GLU:N	85:An:150:PHE:CE2	2.49	0.81
62:I:259:HIS:HA	62:I:262:MET:HE2	1.63	0.81
117:Ax:129:ARG:NH2	117:Ax:134:GLN:HE22	1.74	0.81
1:2:52:U:O3'	1:2:53:U:O4'	1.99	0.80
1:2:417:C:O2	10:ae:128:TYR:CE1	2.34	0.80
1:2:510:A:C6	3:aw:21:ASP:CA	2.60	0.80
1:2:569:G:O2'	1:2:570:A:H5''	1.79	0.80
1:1:933:G:H2'	1:1:934:G:C8	2.16	0.80
1:2:2:U:OP2	46:c:264:LYS:HE2	1.81	0.80
1:2:52:U:O2	1:2:149:A:C2	2.34	0.80
1:2:175:U:H6	48:q:11:GLN:HG3	1.46	0.80
48:q:164:LEU:HA	49:b:41:ASN:HD22	1.46	0.80
55:B:201:ARG:NH2	1:1:186:U:O4	2.13	0.80
79:Z:76:ARG:NH1	1:1:70:G:O3'	2.12	0.80
120:BG:1319:SER:HB2	120:BG:1322:THR:HG22	1.64	0.80
1:2:459:A:C4'	8:am:284:ARG:HH12	1.93	0.80
1:2:510:A:C5	3:aw:21:ASP:CA	2.64	0.80
1:2:526:A:H61	15:d:293:GLU:HG2	1.27	0.80
21:aa:910:LEU:HD13	45:o:278:SER:HB2	1.63	0.80
60:G:10:ARG:NH1	1:1:486:U:OP1	2.15	0.80
65:L:29:ASN:ND2	105:BP:10:TYR:OH	2.09	0.80
1:2:222:A:OP1	1:2:222:A:H4'	1.80	0.80
1:2:397:U:O2	1:2:399:U:C4	2.34	0.80
1:2:435:U:P	6:s:159:GLY:CA	2.70	0.80
1:2:436:U:O4	7:au:10:SER:CB	2.25	0.80
1:2:522:A:O5'	15:d:343:LYS:O	2.00	0.80
55:B:43:SER:HB3	99:Aj:440:GLN:HE22	1.47	0.80
66:M:61:LEU:O	99:Aj:475:ARG:NH2	2.14	0.80
70:Q:31:ILE:HD12	114:BD:32:PRO:HB3	1.63	0.80
97:BM:192:LEU:HD11	97:BM:252:VAL:HG22	1.63	0.80
1:2:170:U:H2'	1:2:172:A:C2	2.16	0.80
1:2:471:A:OP1	13:aj:11:GLY:HA3	1.81	0.80

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:605:A:H3'	1:2:606:U:H5'	1.64	0.80
2:h:51:VAL:O	2:h:68:GLN:NE2	2.14	0.80
19:af:661:THR:HG22	19:af:770:CYS:HB2	1.63	0.80
74:U:39:VAL:CG2	74:U:85:GLU:HB2	2.11	0.80
1:2:109:U:O2'	1:2:110:A:O4'	2.00	0.80
1:2:435:U:OP1	6:s:159:GLY:HA2	1.80	0.80
1:2:499:A:H2	11:ay:132:THR:HG22	1.42	0.80
1:2:533:U:C5'	5:f:17:ARG:HH12	1.95	0.80
97:BM:377:GLU:HG2	97:BM:381:ASN:HD21	1.47	0.80
1:2:156:U:C6	29:aq:62:LYS:HG2	2.17	0.80
1:2:481:U:C1'	2:h:90:ALA:HB2	2.11	0.80
1:2:16:U:P	50:a:257:LYS:NZ	2.54	0.80
1:2:158:U:H5''	29:aq:18:TYR:HB3	0.80	0.80
1:2:475:U:O4	6:s:142:ARG:NE	2.15	0.80
70:Q:108:ILE:HD11	113:Ah:58:VAL:HG13	1.62	0.80
74:U:25:PHE:CB	1:1:933:G:H21	1.95	0.80
1:2:2:U:OP2	25:ad:707:TRP:HA	1.78	0.80
1:2:18:A:N3	1:2:235:G:O2'	2.14	0.80
1:2:367:A:N3	1:2:367:A:H2'	1.94	0.80
1:2:421:A:C3'	10:ae:298:TYR:CZ	2.65	0.80
1:2:436:U:O2'	6:s:153:LYS:N	2.14	0.80
72:S:343:ARG:NH2	1:1:368:U:OP2	2.15	0.80
94:AU:92:VAL:O	94:AU:94:LYS:N	2.13	0.80
1:2:175:U:C6	48:q:12:MET:O	2.34	0.80
1:2:363:A:C2	1:2:365:A:C6	2.68	0.80
1:2:428:U:C4	13:aj:237:ARG:NH2	2.49	0.80
1:2:513:U:C2	16:az:146:TYR:CE1	2.70	0.80
28:ap:15:TRP:NE1	28:ap:227:ASP:OD2	2.15	0.80
47:k:145:VAL:HG12	47:k:164:ILE:HG22	1.63	0.80
48:q:141:ARG:HH12	49:b:122:ARG:HH21	1.30	0.80
52:z:254:PHE:HB3	52:z:293:ALA:HB2	1.62	0.80
55:B:148:ARG:O	67:N:85:ARG:NH1	2.15	0.80
80:BA:69:ILE:HG22	80:BA:88:VAL:HB	1.64	0.80
1:2:499:A:OP1	3:aw:12:ALA:HB2	1.82	0.79
13:aj:244:ASN:ND2	13:aj:290:LYS:O	2.13	0.79
24:ac:516:ARG:HB3	24:ac:525:LYS:HB2	1.65	0.79
71:R:167:HIS:HD2	71:R:169:GLY:H	1.30	0.79
1:2:247:U:H5'	1:2:247:U:H6	1.46	0.79
1:2:513:U:C1'	16:az:146:TYR:HE1	1.95	0.79
1:2:526:A:C6	15:d:294:ILE:CG2	2.64	0.79
19:af:515:ARG:HB2	19:af:655:GLN:HE21	1.44	0.79

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
21:aa:840:SER:O	52:z:1043:ASN:ND2	2.15	0.79
24:ac:685:LEU:HA	38:l:318:ILE:HB	1.64	0.79
1:2:2:U:H3'	25:ad:706:GLN:HE22	1.47	0.79
1:2:282:A:C4'	43:i:247:ILE:CG1	2.56	0.79
1:2:491:U:O2'	14:e:386:THR:CG2	2.28	0.79
1:2:496:U:P	3:aw:2:HIS:HB2	2.22	0.79
1:2:497:A:C6	3:aw:17:ILE:HD13	2.16	0.79
1:2:513:U:C5	16:az:145:ARG:O	2.34	0.79
19:af:231:VAL:HG22	19:af:264:LEU:HD22	1.64	0.79
113:Ah:266:PRO:O	113:Ah:272:GLN:NE2	2.15	0.79
1:2:32:A:C2'	1:2:33:A:H5'	2.12	0.79
1:2:66:U:O5'	35:t:35:ARG:HG2	1.81	0.79
1:2:122:U:H5	43:i:293:VAL:HG12	1.39	0.79
1:2:147:U:O2'	1:2:148:U:H5'	1.83	0.79
1:2:321:U:H3	46:c:167:LYS:NZ	1.80	0.79
1:2:516:A:H2'	1:2:517:G:C8	2.17	0.79
49:b:23:ARG:HG2	85:An:150:PHE:HE1	1.46	0.79
68:O:111:GLU:O	68:O:115:LYS:N	2.13	0.79
1:2:222:A:N3	1:2:252:G:C2	2.50	0.79
1:2:463:G:P	8:am:298:ARG:N	2.47	0.79
1:2:484:A:C4	9:n:102:ARG:CD	2.65	0.79
1:2:526:A:N6	15:d:294:ILE:HG23	1.97	0.79
1:2:526:A:H62	15:d:293:GLU:HG2	1.41	0.79
6:s:145:ARG:HH22	6:s:146:LYS:HE3	1.46	0.79
38:l:144:TRP:HZ2	38:l:318:ILE:HG21	1.48	0.79
1:2:243:A:C2	8:am:25:VAL:HG21	2.16	0.79
1:2:247:U:H6	1:2:247:U:C5'	1.96	0.79
13:aj:39:GLU:OE1	14:e:428:ARG:NH2	2.16	0.79
74:U:57:GLU:HA	74:U:60:ARG:HB2	1.62	0.79
113:Ah:459:VAL:O	113:Ah:462:HIS:ND1	2.16	0.79
119:BO:87:ARG:HB3	119:BO:90:HIS:HB3	1.63	0.79
1:2:172:A:C6	37:j:17:LYS:C	2.60	0.79
1:2:498:U:H2'	3:aw:9:GLY:HA3	1.62	0.79
1:2:507:A:N7	3:aw:28:LEU:CG	2.46	0.79
22:ab:143:PHE:HZ	22:ab:172:LEU:HB2	1.46	0.79
52:z:277:ASP:HB2	52:z:369:ARG:HD3	1.65	0.79
102:Aq:338:HIS:HB3	102:Aq:341:PHE:CG	2.17	0.79
119:BO:86:GLU:HA	119:BO:92:ARG:HH12	1.46	0.79
1:2:189:A:O2'	1:2:190:A:H2'	1.82	0.79
1:2:414:C:H5''	10:ae:158:LEU:HB2	1.64	0.79
1:2:437:U:C4'	6:s:153:LYS:HD3	2.12	0.79

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:504:A:O5'	6:s:80:GLN:NE2	2.16	0.79
23:ak:197:PRO:O	23:ak:201:GLY:N	2.14	0.79
50:a:431:HIS:HD2	52:z:1027:TYR:HB3	1.45	0.79
52:z:976:ASN:HB3	52:z:979:GLU:HG2	1.65	0.79
117:Ax:173:ARG:HH11	117:Ax:173:ARG:HG2	1.48	0.79
119:BO:91:CYS:HB3	119:BO:93:VAL:HG22	1.65	0.79
1:2:67:A:HO2'	37:j:22:TRP:CG	2.00	0.79
1:2:225:G:H2'	1:2:226:A:O4'	1.82	0.79
1:2:522:A:O2'	15:d:343:LYS:CE	2.31	0.79
2:h:157:GLN:HA	2:h:161:LEU:HB2	1.62	0.79
14:e:311:PHE:N	20:u:630:LEU:H	1.80	0.79
48:q:97:GLY:HA2	48:q:100:ARG:HE	1.46	0.79
49:b:24:GLU:CA	85:An:150:PHE:HE2	1.95	0.79
60:G:196:THR:HG21	83:Aw:4:GLY:HA3	1.64	0.79
62:I:89:ARG:NH2	1:1:599:U:OP1	2.16	0.79
74:U:37:ASN:ND2	74:U:60:ARG:HG2	1.97	0.79
85:An:132:GLU:O	85:An:136:ALA:HB2	1.81	0.79
1:2:126:U:H2'	1:2:127:A:H5'	1.63	0.79
14:e:311:PHE:H	20:u:630:LEU:H	1.30	0.79
23:ak:140:ASN:HB2	23:ak:143:VAL:HG12	1.65	0.79
24:ac:561:ALA:HB1	24:ac:566:VAL:HB	1.64	0.79
41:ai:59:LEU:HD23	41:ai:138:CYS:HB2	1.65	0.79
82:BB:111:PHE:C	82:BB:111:PHE:HD1	1.90	0.79
102:Aq:341:PHE:H	102:Aq:341:PHE:HD1	1.26	0.79
117:Ax:148:CYS:SG	117:Ax:176:ARG:CD	2.70	0.79
1:1:158:A:N6	1:1:166:U:OP1	2.15	0.79
1:2:126:U:C2'	1:2:127:A:H5'	2.12	0.78
1:2:283:U:O2	43:i:247:ILE:CG2	2.29	0.78
1:2:418:A:C8	13:aj:55:HIS:ND1	2.48	0.78
1:2:613:U:H6	44:g:99:TRP:CZ3	1.99	0.78
5:f:225:ASP:O	48:q:199:ASN:ND2	2.15	0.78
22:ab:186:THR:HA	38:l:536:LEU:HD22	1.64	0.78
50:a:423:HIS:O	50:a:427:ASN:ND2	2.16	0.78
117:Ax:203:ARG:O	117:Ax:204:HIS:CD2	2.37	0.78
1:2:2:U:H3'	25:ad:706:GLN:CD	2.06	0.78
1:2:2:U:H2'	25:ad:706:GLN:HE21	1.49	0.78
1:2:315:A:H3'	1:2:316:A:C8	2.18	0.78
1:2:332:G:C4'	1:2:354:A:C2	2.65	0.78
1:2:503:A:C2	14:e:718:PRO:CB	2.65	0.78
1:2:510:A:O2'	3:aw:19:PRO:O	2.00	0.78
1:2:527:U:H1'	16:az:69:HIS:CE1	2.16	0.78

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
22:ab:728:LYS:HA	22:ab:731:GLU:HG2	1.65	0.78
23:ak:185:PRO:HG2	23:ak:224:ASP:HB3	1.64	0.78
45:o:443:ASN:HB3	45:o:478:PRO:HD3	1.65	0.78
1:2:92:U:O2'	1:2:93:U:O5'	2.01	0.78
1:2:280:A:H62	46:c:171:LYS:HB2	1.47	0.78
1:2:396:A:N7	1:2:529:A:H1'	1.97	0.78
1:2:555:U:H6	1:2:555:U:C5'	1.96	0.78
1:2:617:U:C4	4:m:208:HIS:HE1	2.01	0.78
12:ag:550:ARG:O	38:l:234:ASN:ND2	2.16	0.78
13:aj:236:ALA:HB1	13:aj:273:THR:HG21	1.65	0.78
28:ap:200:ASN:HD21	41:ai:256:ILE:HA	1.48	0.78
62:I:223:HIS:HE1	107:BF:87:LEU:H	1.29	0.78
85:An:253:ASP:HB3	85:An:256:VAL:HG12	1.66	0.78
100:BH:102:SER:O	100:BH:141:GLN:NE2	2.17	0.78
1:2:6:U:O2'	50:a:253:LYS:CE	2.31	0.78
1:2:142:U:H5''	25:ad:34:PHE:HE1	1.46	0.78
1:2:180:A:N3	33:w:87:SER:HA	1.98	0.78
1:2:224:G:N1	1:2:249:U:O2	2.12	0.78
1:2:315:A:H2'	1:2:316:A:C8	2.19	0.78
1:2:437:U:C1'	6:s:151:ARG:HB2	2.12	0.78
1:2:614:U:H2'	1:2:615:U:H5''	1.65	0.78
10:ae:565:THR:HG22	20:u:120:LEU:HD22	1.63	0.78
17:ax:130:TRP:O	17:ax:134:ASN:ND2	2.17	0.78
1:1:959:G:O6	1:1:967:A:N6	2.16	0.78
1:2:44:A:H5'	29:aq:26:ALA:HB3	1.65	0.78
1:2:82:A:C4'	39:ar:32:LEU:HD22	2.13	0.78
1:2:286:G:N2	1:2:286:G:OP2	2.15	0.78
14:e:284:ALA:O	14:e:290:SER:OG	2.00	0.78
61:H:7:ARG:HB3	61:H:8:PRO:HD2	1.64	0.78
61:H:143:LEU:HD13	105:BP:171:PHE:HB3	1.64	0.78
90:BC:119:GLN:HE21	112:Ac:104:ILE:HG13	1.48	0.78
97:BM:73:THR:OG1	97:BM:323:ARG:NH2	2.17	0.78
112:Ac:189:LYS:HG3	112:Ac:200:ARG:HH22	1.49	0.78
1:2:26:U:H2'	1:2:27:U:H5	1.49	0.78
1:2:36:G:C8	33:w:130:LYS:CG	2.66	0.78
1:2:38:U:HO2'	48:q:26:ARG:HH11	1.32	0.78
1:2:46:U:C5'	1:2:46:U:H6	1.96	0.78
1:2:108:A:N3	40:av:131:GLN:NE2	2.30	0.78
1:2:179:G:H4'	1:2:180:A:C5'	2.14	0.78
1:2:231:A:H2	1:2:247:U:O2	1.65	0.78
1:2:236:U:H2'	1:2:237:U:C6	2.17	0.78

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:493:U:O2	15:d:339:VAL:HG11	1.83	0.78
1:2:506:U:P	9:n:77:LYS:NZ	2.57	0.78
65:L:33:LYS:NZ	91:Ab:107:ARG:O	2.16	0.78
1:2:13:U:H3'	50:a:261:ASN:C	2.08	0.78
1:2:228:G:C2'	1:2:242:U:C5	2.59	0.78
21:aa:228:TRP:HA	37:j:83:VAL:HG11	1.65	0.78
21:aa:770:SER:HB3	26:an:215:ARG:HA	1.65	0.78
22:ab:346:PHE:HB3	22:ab:375:LEU:HD11	1.64	0.78
50:a:84:ASP:HB3	50:a:87:VAL:HB	1.65	0.78
52:z:1038:THR:HB	52:z:1041:GLU:HB2	1.65	0.78
55:B:192:ASP:OD1	55:B:192:ASP:N	2.17	0.78
1:2:107:A:C5'	43:i:363:TYR:CE1	2.66	0.78
1:2:109:U:H5'	1:2:109:U:C6	2.18	0.78
1:2:529:A:C5'	4:m:270:ARG:HH21	1.97	0.78
1:2:529:A:H5'	4:m:270:ARG:HH21	1.45	0.78
10:ae:55:ARG:HH21	10:ae:121:LEU:HD21	1.49	0.78
21:aa:964:ASN:HD21	45:o:139:SER:HB2	1.49	0.78
1:2:369:G:O2'	1:2:370:A:H5'	1.84	0.78
1:2:424:U:O4	13:aj:197:ASP:CG	2.26	0.78
1:2:525:A:H2'	15:d:330:ARG:HA	1.64	0.78
65:L:2:LEU:N	65:L:14:GLN:OE1	2.17	0.78
125:Ag:301:NAD:O1A	125:Ag:301:NAD:H3B	1.84	0.78
1:1:772:U:O2	1:1:1051:A:O2'	2.00	0.78
1:2:315:A:H2'	1:2:316:A:O4'	1.84	0.78
1:2:415:A:H2	10:ae:38:GLY:CA	1.93	0.78
1:2:436:U:C4'	6:s:154:VAL:CA	2.56	0.78
1:2:526:A:N3	15:d:329:ARG:NH2	2.32	0.78
1:2:549:C:O2	1:2:579:A:N1	2.17	0.78
46:c:261:TRP:HA	46:c:265:MET:HE3	1.66	0.78
61:H:101:ARG:HH11	61:H:108:ASN:HD21	1.30	0.78
62:I:112:ARG:NH2	94:Au:171:SER:OG	2.17	0.78
77:X:57:LEU:HD21	116:Ag:219:MET:HE1	1.65	0.78
82:BB:19:VAL:HG12	82:BB:20:HIS:HD2	1.48	0.78
103:BE:56:HIS:HD2	103:BE:57:THR:H	1.28	0.78
1:2:579:A:O2'	1:2:599:A:H5'	1.84	0.77
85:An:137:GLU:HA	85:An:140:ARG:HH21	1.47	0.77
118:BL:175:PHE:HB2	118:BL:184:ALA:HB3	1.66	0.77
1:2:39:U:O4	33:w:140:ARG:HA	1.84	0.77
1:2:558:U:H2'	1:2:559:U:C6	2.18	0.77
20:u:674:LEU:HD11	22:ab:1061:ASP:H	1.48	0.77
70:Q:114:LEU:HD12	85:An:267:TRP:HZ3	1.49	0.77

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
83:Aw:52:LYS:NZ	89:At:20:GLY:O	2.16	0.77
1:1:163:U:HO2'	1:1:846:A:HO2'	1.31	0.77
1:2:499:A:C2	11:ay:132:THR:HG22	2.18	0.77
1:2:573:A:H2'	1:2:574:C:C6	2.19	0.77
25:ad:536:THR:HB	30:as:215:TRP:CE3	2.18	0.77
37:j:23:GLY:O	37:j:52:HIS:NE2	2.17	0.77
70:Q:108:ILE:HD11	113:Ah:58:VAL:CG1	2.13	0.77
1:1:916:U:H4'	1:1:917:A:H5''	1.66	0.77
1:1:1041:U:O4	1:1:1049:A:N6	2.17	0.77
1:2:45:U:C3'	29:aq:22:PHE:HA	2.13	0.77
1:2:282:A:N6	43:i:251:ILE:HG21	1.99	0.77
1:2:475:U:H4'	1:2:476:U:OP1	1.84	0.77
1:2:521:A:O3'	15:d:345:LYS:N	2.15	0.77
2:h:73:CYS:SG	2:h:77:ASN:ND2	2.57	0.77
15:d:153:ARG:HH22	19:af:184:LEU:HB3	1.50	0.77
18:r:93:LYS:NZ	19:af:835:VAL:O	2.18	0.77
23:ak:186:GLN:HB3	24:ac:129:ARG:HH12	1.48	0.77
25:ad:536:THR:HA	25:ad:536:THR:C	2.04	0.77
77:X:498:ARG:HG2	77:X:498:ARG:NH1	1.93	0.77
92:Ai:392:ARG:HB3	92:Ai:399:GLN:HB3	1.64	0.77
114:BD:49:ARG:NH1	114:BD:57:MET:SD	2.58	0.77
1:1:812:A:H3'	1:1:813:U:H5'	1.67	0.77
1:2:38:U:HO2'	48:q:26:ARG:NH1	1.82	0.77
1:2:113:U:C2'	1:2:114:U:H5'	2.13	0.77
1:2:514:U:C3'	16:az:17:VAL:HG21	2.14	0.77
1:2:615:U:O4'	44:g:101:ARG:NH2	2.16	0.77
9:n:83:LEU:HD22	9:n:104:VAL:HG11	1.66	0.77
22:ab:860:VAL:HG22	22:ab:923:ILE:HG22	1.66	0.77
38:l:668:TYR:HA	38:l:671:TRP:HE3	1.49	0.77
49:b:51:PHE:HB2	49:b:59:ILE:HD12	1.64	0.77
50:a:221:GLY:HA2	50:a:260:ASN:HB2	1.66	0.77
58:E:148:TYR:OH	108:Av:53:PHE:O	2.01	0.77
72:S:265:HIS:HB2	72:S:268:LYS:HE3	1.67	0.77
84:Bj:82:LEU:HB2	84:Bj:102:VAL:HG22	1.65	0.77
101:Am:264:ARG:HH22	101:Am:308:GLY:H	1.33	0.77
1:1:217:A:H62	1:1:323:A:H61	1.32	0.77
1:2:4:A:C6	25:ad:27:ILE:HD13	2.14	0.77
1:2:42:U:OP1	48:q:24:HIS:CE1	2.37	0.77
1:2:225:G:C6	1:2:248:C:N3	2.52	0.77
1:2:437:U:H1'	6:s:151:ARG:HB2	1.65	0.77
1:2:499:A:C8	3:aw:10:ARG:N	2.53	0.77

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
39:ar:99:PHE:HZ	81:UA:132:UNK:CB	1.98	0.77
84:Bj:139:LYS:NZ	112:Ac:38:HIS:O	2.18	0.77
1:2:224:G:C2'	1:2:225:G:H5'	2.11	0.77
1:2:418:A:H8	13:aj:55:HIS:HD1	1.25	0.77
1:2:419:A:C8	10:ae:181:ARG:HB3	2.20	0.77
1:2:460:A:O2'	8:am:282:GLN:HB3	1.84	0.77
1:2:527:U:H5''	5:f:25:TYR:CE1	2.18	0.77
1:2:615:U:H5'	44:g:101:ARG:NH2	1.99	0.77
19:af:492:GLY:HA2	19:af:511:PRO:HG2	1.65	0.77
25:ad:536:THR:O	30:as:215:TRP:CE3	2.35	0.77
68:O:29:ARG:H	68:O:29:ARG:CD	1.94	0.77
1:2:12:U:O2'	50:a:262:PRO:HG3	1.77	0.77
1:2:107:A:H4'	43:i:363:TYR:CE1	2.19	0.77
1:2:283:U:H6	43:i:247:ILE:HD11	1.50	0.77
1:2:472:A:N3	12:ag:15:TYR:HD2	1.81	0.77
1:2:480:A:N7	2:h:21:HIS:HB2	1.99	0.77
1:2:521:A:H5''	15:d:345:LYS:HB2	1.65	0.77
62:I:61:ARG:H	62:I:65:HIS:HD2	1.33	0.77
66:M:97:TRP:CE3	66:M:97:TRP:O	2.38	0.77
79:Z:15:ALA:HB2	79:Z:33:ASP:HB3	1.66	0.77
97:BM:223:ILE:HA	97:BM:228:ASN:HD21	1.50	0.77
1:2:40:U:O2	1:2:45:U:N3	2.18	0.77
1:2:65:U:O3'	35:t:36:ARG:CG	2.23	0.77
1:2:108:A:N7	39:ar:22:ASN:CB	2.47	0.77
1:2:417:C:C4	10:ae:128:TYR:HD1	2.03	0.77
1:2:424:U:O5'	13:aj:233:ARG:HD3	1.85	0.77
12:ag:36:TYR:OH	13:aj:46:ARG:NH2	2.17	0.77
62:I:78:ILE:O	62:I:127:LYS:NZ	2.16	0.77
1:2:290:C:O2'	1:2:309:A:O2'	2.02	0.77
1:2:412:G:N1	10:ae:54:GLY:N	2.32	0.77
7:au:155:TYR:HB3	22:ab:380:PHE:HB2	1.67	0.77
22:ab:413:SER:HA	22:ab:416:MET:HE2	1.67	0.77
23:ak:36:ASN:HD21	38:l:635:GLY:HA3	1.50	0.77
38:l:151:ARG:NH1	38:l:220:TYR:OH	2.18	0.77
118:BL:236:ILE:HG21	118:BL:259:LEU:HD22	1.67	0.77
1:2:33:A:N6	1:2:169:U:C2'	2.48	0.76
1:2:166:G:C2'	1:2:167:U:H4'	2.15	0.76
1:2:175:U:C6	48:q:11:GLN:HG3	2.20	0.76
1:2:181:U:H3'	1:2:181:U:O2	1.84	0.76
1:2:282:A:H61	43:i:251:ILE:HG12	1.43	0.76
1:2:414:C:H42	2:h:13:ILE:HG22	1.47	0.76

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:418:A:N6	13:aj:54:PRO:HA	1.98	0.76
28:ap:48:ARG:NH2	28:ap:88:PRO:O	2.17	0.76
29:aq:188:ARG:HB2	29:aq:194:GLN:HG3	1.67	0.76
52:z:551:ASP:HB3	52:z:554:ASN:HB2	1.68	0.76
59:F:113:ARG:HH11	1:1:151:G:H5'	1.49	0.76
1:1:861:A:N7	1:1:1108:A:H2	1.83	0.76
1:2:65:U:C4'	35:t:36:ARG:HG2	2.13	0.76
1:2:92:U:H6	1:2:92:U:C5'	1.97	0.76
1:2:514:U:H5'	16:az:17:VAL:HG23	1.66	0.76
1:2:529:A:N3	16:az:72:LYS:CD	2.48	0.76
1:2:605:A:H3'	1:2:606:U:C5'	2.14	0.76
14:e:186:GLY:HA2	19:af:233:VAL:HG23	1.67	0.76
23:ak:254:THR:HG22	23:ak:256:GLY:H	1.50	0.76
24:ac:988:ASP:OD1	24:ac:991:ARG:NH1	2.17	0.76
42:x:76:GLN:NE2	42:x:224:SER:O	2.16	0.76
45:o:132:ARG:HG3	50:a:349:TRP:CE3	2.20	0.76
60:G:107:ARG:NH1	1:1:182:A:OP2	2.19	0.76
101:Am:115:LEU:HA	101:Am:118:VAL:HG12	1.67	0.76
1:1:887:C:O2'	1:1:1083:C:O2	2.02	0.76
1:2:142:U:H5'	25:ad:34:PHE:CD1	2.20	0.76
1:2:189:A:H2'	1:2:190:A:H2'	1.66	0.76
1:2:397:U:O2	1:2:399:U:C5	2.38	0.76
1:2:423:C:N4	12:ag:51:GLN:HE22	1.82	0.76
54:A:271:ARG:NH2	1:1:815:A:OP2	2.18	0.76
82:BB:122:ASP:OD1	103:BE:56:HIS:ND1	2.19	0.76
1:1:149:U:O2'	1:1:150:A:O5'	2.01	0.76
1:2:64:U:C5	1:2:84:U:O4	2.39	0.76
1:2:431:U:H3	13:aj:280:HIS:HE2	1.23	0.76
1:2:492:U:O5'	14:e:385:PHE:HD2	1.67	0.76
2:h:140:ASP:O	2:h:144:ASN:ND2	2.19	0.76
6:s:14:GLY:O	14:e:758:ASN:ND2	2.18	0.76
20:u:411:TRP:HE1	20:u:563:ASN:HB3	1.49	0.76
24:ac:688:GLU:N	38:l:319:GLU:H	1.82	0.76
30:as:44:HIS:O	30:as:48:ASN:ND2	2.18	0.76
63:J:77:ASP:HB2	63:J:90:LYS:HB3	1.66	0.76
1:2:341:C:H2'	1:2:342:A:H5''	1.67	0.76
1:2:417:C:H2'	10:ae:128:TYR:CD2	2.19	0.76
1:2:495:U:O2	1:2:495:U:H2'	1.84	0.76
1:2:510:A:C8	3:aw:21:ASP:HB2	2.20	0.76
22:ab:1152:THR:HG23	22:ab:1154:LYS:H	1.49	0.76
24:ac:688:GLU:H	38:l:319:GLU:N	1.83	0.76

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
52:z:211:GLY:O	52:z:217:ASN:ND2	2.18	0.76
54:A:383:PHE:CE2	54:A:385:ASP:HB3	2.20	0.76
94:au:56:PHE:O	94:au:60:ASP:N	2.18	0.76
102:Aq:175:VAL:O	102:Aq:176:ARG:NE	2.17	0.76
106:Ad:14:THR:O	106:Ad:16:GLN:N	2.19	0.76
1:2:67:A:HO2'	37:j:22:TRP:HA	1.49	0.76
1:2:507:A:C2	9:n:61:GLN:CB	2.69	0.76
28:ap:118:GLN:HE22	28:ap:214:ASP:HA	1.50	0.76
55:B:229:TYR:OH	55:B:276:ASN:ND2	2.19	0.76
66:M:110:ASN:HD22	66:M:113:MET:HE3	1.51	0.76
1:2:44:A:P	29:aq:26:ALA:O	2.42	0.76
1:2:193:A:N6	1:2:259:A:H5''	2.00	0.76
1:2:573:A:O2'	1:2:574:C:O5'	2.02	0.76
9:n:163:TYR:HB3	9:n:169:LEU:HB2	1.66	0.76
55:B:29:LEU:HD13	91:Ab:29:MET:HE3	1.67	0.76
96:Ao:29:LYS:HG2	96:Ao:29:LYS:O	1.84	0.76
105:BP:59:ARG:NH2	1:1:365:U:OP1	2.18	0.76
1:2:180:A:C3'	33:w:105:ARG:HB2	2.09	0.76
1:2:293:U:H2'	1:2:294:A:H4'	1.66	0.76
1:2:303:G:C8	1:2:303:G:H5''	2.21	0.76
1:2:498:U:P	3:aw:4:ALA:HB3	2.26	0.76
23:ak:169:LYS:HB2	23:ak:181:ARG:HH22	1.48	0.76
36:p:289:THR:HG23	36:p:291:LYS:H	1.51	0.76
45:o:132:ARG:HH21	50:a:352:PHE:HB2	1.50	0.76
1:1:190:A:N6	1:1:207:G:H2'	2.01	0.76
1:1:928:U:O2'	1:1:929:G:OP1	2.01	0.76
1:2:105:A:C2	1:2:114:U:O2	2.39	0.76
1:2:137:G:O2'	1:2:138:U:H5'	1.85	0.76
1:2:146:A:H5''	1:2:146:A:C8	2.16	0.76
1:2:456:A:H2	8:am:284:ARG:HG3	1.51	0.76
1:2:497:A:C3'	3:aw:4:ALA:HB3	2.15	0.76
77:X:293:ASN:HD21	77:X:348:VAL:HG22	1.50	0.76
117:Ax:190:HIS:ND1	117:Ax:190:HIS:O	2.18	0.76
1:2:68:A:H5'	37:j:22:TRP:CB	2.14	0.76
1:2:158:U:C4'	29:aq:18:TYR:N	2.22	0.76
1:2:280:A:N7	1:2:322:A:OP1	2.19	0.76
1:2:413:U:N3	2:h:23:HIS:HB2	2.01	0.76
1:2:491:U:P	9:n:43:ARG:HH22	2.08	0.76
24:ac:685:LEU:O	38:l:144:TRP:NE1	2.19	0.76
48:q:143:GLN:NE2	49:b:156:TYR:O	2.18	0.76
54:A:258:ASP:HB2	1:1:1023:A:H5''	1.68	0.76

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
71:R:455:LYS:HG3	1:1:66:U:H3	1.51	0.76
78:Y:146:ASP:HB3	78:Y:151:ARG:HH22	1.50	0.76
1:2:49:A:H4'	37:j:11:ARG:NE	2.01	0.75
1:2:65:U:C3'	35:t:36:ARG:CG	2.62	0.75
1:2:313:C:O2'	4:m:165:VAL:CA	2.33	0.75
1:2:342:A:H8	1:2:342:A:C5'	1.99	0.75
1:2:436:U:H1'	6:s:153:LYS:C	2.11	0.75
1:2:452:G:H4'	8:am:278:HIS:CD2	2.20	0.75
1:2:510:A:C2	3:aw:20:ILE:O	2.39	0.75
21:aa:429:ASP:HB3	21:aa:439:ASN:HB3	1.67	0.75
31:at:264:ALA:HA	31:at:304:SER:HA	1.67	0.75
45:o:477:GLN:NE2	45:o:481:SER:OG	2.19	0.75
66:M:34:ARG:HH22	1:1:127:A:P	2.09	0.75
66:M:94:GLU:HG2	99:Aj:465:ARG:HG2	1.67	0.75
67:N:85:ARG:HB2	1:1:313:A:H5''	1.67	0.75
85:An:131:THR:HG22	85:An:164:ILE:HG13	1.68	0.75
102:Aq:220:VAL:O	102:Aq:226:ARG:NH1	2.19	0.75
1:2:447:A:N1	1:2:471:A:N7	2.35	0.75
1:2:480:A:N7	2:h:21:HIS:CB	2.48	0.75
26:an:91:VAL:HG11	52:z:939:ILE:HD11	1.68	0.75
66:M:205:MET:HE3	1:1:134:A:H5''	1.68	0.75
66:M:251:TYR:OH	123:UD:71:UNK:O	2.02	0.75
78:Y:247:TYR:OH	78:Y:258:TRP:NE1	2.15	0.75
97:BM:322:TYR:O	97:BM:326:TYR:N	2.19	0.75
1:1:148:U:O2	1:1:149:U:N3	2.18	0.75
1:2:106:U:H5'	1:2:107:A:OP2	1.85	0.75
1:2:147:U:O2'	1:2:148:U:P	2.44	0.75
1:2:497:A:H5''	3:aw:4:ALA:CA	2.16	0.75
1:2:525:A:H3'	15:d:331:GLU:CA	2.16	0.75
102:Aq:88:ALA:H	102:Aq:91:THR:HB	1.51	0.75
1:2:420:U:O4'	13:aj:59:VAL:HG11	1.85	0.75
1:2:425:A:H2	13:aj:266:LYS:CG	1.57	0.75
72:S:346:SER:HA	72:S:353:ARG:HH21	1.50	0.75
80:BA:85:PRO:HG2	80:BA:87:ILE:HG23	1.67	0.75
106:Ad:32:ARG:O	106:Ad:32:ARG:NH2	2.20	0.75
1:2:295:U:H4'	1:2:295:U:OP1	1.85	0.75
1:2:295:U:H6	1:2:295:U:H3'	1.51	0.75
1:2:368:U:C2'	1:2:369:G:H5'	2.16	0.75
1:2:495:U:C4'	3:aw:2:HIS:NE2	2.46	0.75
2:h:166:ILE:HD12	20:u:764:LEU:HB3	1.68	0.75
85:An:79:HIS:O	113:Ah:78:ARG:NH2	2.19	0.75

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
102:Aq:341:PHE:HB2	1:1:98:G:C2	2.21	0.75
1:1:131:U:O2'	1:1:132:U:O5'	2.05	0.75
1:1:384:A:N6	1:1:398:U:O2	2.19	0.75
1:2:70:A:H3'	35:t:10:ALA:N	2.01	0.75
1:2:102:U:H5'	1:2:102:U:C6	2.18	0.75
1:2:485:A:N7	9:n:57:ILE:HB	2.02	0.75
1:2:521:A:H5'	15:d:346:ARG:O	1.87	0.75
10:ae:290:TYR:HH	12:ag:355:HIS:HE2	0.76	0.75
1:2:82:A:H4'	39:ar:32:LEU:HD22	1.69	0.75
1:2:86:C:H1'	47:k:152:LYS:CG	2.09	0.75
1:2:229:C:O2'	1:2:241:G:N2	2.20	0.75
1:2:501:U:P	3:aw:13:TYR:HE2	2.10	0.75
1:2:524:C:C5	15:d:332:PRO:HG3	2.20	0.75
21:aa:938:GLN:O	50:a:329:ARG:NH2	2.17	0.75
74:U:31:PRO:HB3	74:U:60:ARG:HH11	1.50	0.75
88:Az:55:ASN:ND2	88:Az:91:GLU:OE2	2.19	0.75
102:Aq:339:ARG:HG2	102:Aq:339:ARG:NH1	1.99	0.75
1:2:421:A:H4'	10:ae:298:TYR:HE2	0.91	0.75
1:2:493:U:OP2	15:d:346:ARG:NH2	2.19	0.75
1:2:499:A:P	3:aw:12:ALA:CB	2.74	0.75
1:2:605:A:OP1	44:g:83:ASN:C	2.28	0.75
25:ad:374:ILE:HG22	25:ad:376:GLY:H	1.50	0.75
30:as:137:LEU:HD11	30:as:174:PHE:HB3	1.69	0.75
93:Ap:9:PHE:N	94:Au:181:ALA:O	2.20	0.75
108:Av:73:PRO:HG2	108:Av:76:MET:HE2	1.67	0.75
116:Ag:45:LYS:HD2	116:Ag:46:PRO:HD2	1.68	0.75
119:BO:139:ARG:HH11	119:BO:143:LEU:HD23	1.51	0.75
1:2:227:U:O2'	1:2:228:G:O4'	2.05	0.75
1:2:507:A:N7	3:aw:28:LEU:CD1	2.50	0.75
3:aw:139:LEU:HD21	19:af:820:ARG:HG3	1.66	0.75
29:aq:116:HIS:HE2	29:aq:147:SER:HG	1.32	0.75
1:2:209:U:H2'	1:2:210:U:O4'	1.86	0.74
1:2:436:U:O4'	6:s:154:VAL:CB	2.35	0.74
1:2:497:A:H5'	3:aw:4:ALA:CA	2.15	0.74
20:u:561:VAL:O	20:u:565:THR:N	2.19	0.74
25:ad:233:ASN:HD21	41:ai:156:ILE:H	1.33	0.74
32:y:166:ILE:HB	32:y:171:HIS:HB2	1.68	0.74
60:G:172:PHE:HE1	60:G:214:PRO:HG2	1.51	0.74
1:1:642:A:N7	1:1:643:G:N2	2.35	0.74
1:2:40:U:O2'	1:2:41:U:C5	2.16	0.74
1:2:48:U:H5	29:aq:11:SER:O	1.67	0.74

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:435:U:P	6:s:159:GLY:HA3	2.26	0.74
6:s:169:ALA:HB1	7:au:11:ASP:HB3	1.69	0.74
12:ag:156:ASP:HB3	23:ak:135:ARG:HG2	1.69	0.74
45:o:252:SER:OG	51:ba:89:ASP:OD1	2.05	0.74
1:2:2:U:OP2	25:ad:707:TRP:CA	2.26	0.74
1:2:4:A:N6	25:ad:27:ILE:HD12	2.01	0.74
1:2:54:A:O2'	1:2:55:G:O5'	2.04	0.74
24:ac:687:GLU:H	38:l:317:PRO:HA	1.49	0.74
74:U:32:ARG:HB3	75:V:65:ARG:NH2	2.01	0.74
1:1:699:A:O2'	1:1:700:U:O5'	2.05	0.74
1:1:936:G:N2	1:1:947:U:O2	2.20	0.74
1:2:585:U:H5'	1:2:585:U:C6	2.22	0.74
12:ag:295:ASP:OD2	14:e:278:LYS:NZ	2.20	0.74
22:ab:1019:ARG:NH1	22:ab:1039:THR:O	2.21	0.74
36:p:36:ARG:NH2	50:a:277:LYS:O	2.21	0.74
78:Y:245:ASP:OD1	78:Y:246:LYS:N	2.19	0.74
1:2:501:U:O5'	14:e:790:VAL:HG22	1.86	0.74
1:2:504:A:OP2	6:s:80:GLN:OE1	2.04	0.74
1:2:303:G:C5	1:2:304:U:H5	2.06	0.74
1:2:502:A:O3'	6:s:77:GLY:HA2	1.86	0.74
7:au:169:LEU:HD21	24:ac:98:LEU:HD12	1.67	0.74
40:av:123:MET:HG2	40:av:142:LEU:HD23	1.69	0.74
22:ab:39:PRO:HG2	38:l:136:ARG:HG2	1.69	0.74
45:o:365:ARG:O	45:o:369:ASN:ND2	2.21	0.74
52:z:541:LEU:HD21	52:z:780:VAL:HG13	1.69	0.74
55:B:200:ASN:HB3	55:B:283:LEU:HD22	1.70	0.74
57:D:102:GLN:NE2	111:Ae:197:GLN:OE1	2.20	0.74
65:L:92:VAL:HB	95:Aa:191:THR:HG21	1.70	0.74
99:Aj:129:GLU:HG3	99:Aj:284:LEU:HB3	1.68	0.74
1:2:2:U:C3'	25:ad:706:GLN:HE21	1.94	0.74
1:2:18:A:C2	1:2:235:G:O2'	2.40	0.74
1:2:146:A:H8	1:2:146:A:C5'	2.01	0.74
1:2:227:U:H5'	1:2:227:U:C6	2.23	0.74
1:2:429:A:H4'	10:ae:135:PRO:CG	2.18	0.74
1:2:514:U:C3'	16:az:17:VAL:HG22	2.13	0.74
21:aa:644:ASP:HB2	21:aa:682:VAL:HB	1.69	0.74
21:aa:872:ARG:NH1	21:aa:912:THR:O	2.21	0.74
22:ab:511:ARG:NH2	22:ab:831:ASP:OD2	2.20	0.74
24:ac:982:CYS:O	24:ac:1018:ARG:NH2	2.15	0.74
36:p:271:HIS:ND1	36:p:272:GLU:OE1	2.20	0.74
65:L:80:THR:HG22	65:L:120:GLU:HB3	1.70	0.74

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
97:BM:263:ARG:HG3	97:BM:264:ALA:H	1.50	0.74
110:As:51:ARG:HH21	123:UD:42:UNK:C	1.99	0.74
118:BL:107:TRP:HD1	118:BL:107:TRP:O	1.69	0.74
1:2:181:U:O3'	33:w:98:LEU:CD1	2.36	0.74
1:2:281:A:C5	43:i:251:ILE:HA	2.23	0.74
1:2:436:U:C5'	6:s:154:VAL:HG13	2.17	0.74
1:2:525:A:C8	15:d:221:ASP:N	2.55	0.74
21:aa:388:VAL:HA	21:aa:427:LEU:HD22	1.67	0.74
26:an:21:ARG:NH2	26:an:240:PRO:O	2.19	0.74
52:z:277:ASP:OD1	52:z:281:ASN:ND2	2.20	0.74
56:C:168:PRO:HG2	115:Ay:134:ARG:HE	1.52	0.74
75:V:22:ARG:HH21	1:1:314:A:H4'	1.51	0.74
97:BM:76:TYR:O	97:BM:80:ARG:N	2.20	0.74
99:Aj:443:ARG:NH2	99:Aj:448:GLU:OE2	2.20	0.74
1:2:43:A:H2'	29:aq:25:GLY:HA2	1.69	0.74
1:2:46:U:OP1	29:aq:21:LEU:CA	2.35	0.74
1:2:243:A:C6	8:am:25:VAL:HG21	2.22	0.74
1:2:425:A:C2	13:aj:266:LYS:CG	2.39	0.74
1:2:460:A:C4'	8:am:306:LEU:HB3	2.18	0.74
1:2:478:U:H1'	2:h:20:ARG:NH2	2.02	0.74
52:z:287:LEU:HD11	52:z:378:MET:HB3	1.70	0.74
84:Bj:102:VAL:HB	112:Ac:131:MET:HE1	1.69	0.74
1:2:437:U:H6	6:s:151:ARG:H	1.23	0.73
1:2:581:U:H5''	1:2:582:A:O5'	1.88	0.73
21:aa:989:SER:O	50:a:415:ARG:NH2	2.21	0.73
24:ac:417:VAL:HG12	24:ac:419:ASP:H	1.53	0.73
60:G:13:LEU:O	72:S:309:ARG:NH2	2.21	0.73
66:M:143:TRP:NE1	66:M:206:PRO:HA	2.02	0.73
104:Ak:41:ALA:HA	104:Ak:44:ARG:HH11	1.50	0.73
1:2:408:U:H4'	9:n:56:HIS:ND1	2.03	0.73
1:2:409:U:H6	9:n:56:HIS:CE1	2.06	0.73
1:2:412:G:O6	10:ae:53:THR:HG22	1.87	0.73
1:2:525:A:P	5:f:27:ARG:CZ	2.76	0.73
3:aw:20:ILE:HD12	3:aw:25:LYS:HD2	1.70	0.73
14:e:311:PHE:C	20:u:629:VAL:HA	2.13	0.73
20:u:83:GLU:O	20:u:95:ARG:NH1	2.21	0.73
30:as:93:ALA:HB3	30:as:168:HIS:HB2	1.68	0.73
45:o:293:TYR:OH	45:o:307:HIS:NE2	2.20	0.73
60:G:172:PHE:CE1	60:G:214:PRO:HG2	2.23	0.73
106:Ad:21:ALA:O	106:Ad:23:THR:OG1	2.04	0.73
113:Ah:55:TYR:CE2	113:Ah:57:LEU:HA	2.24	0.73

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:306:A:H2'	1:2:306:A:N3	2.03	0.73
1:2:332:G:H5'	1:2:354:A:H2	1.53	0.73
1:2:506:U:OP1	9:n:77:LYS:CE	2.35	0.73
24:ac:377:GLN:HE21	24:ac:425:ASP:HB2	1.53	0.73
61:H:95:GLN:HA	61:H:109:ILE:HG12	1.71	0.73
94:Au:94:LYS:HD3	1:1:239:U:C5	2.22	0.73
100:BH:147:GLY:O	100:BH:149:ASN:ND2	2.20	0.73
107:BF:60:LYS:NZ	1:1:551:A:N7	2.36	0.73
116:Ag:59:GLU:HA	116:Ag:62:ARG:HG2	1.70	0.73
117:Ax:98:VAL:HG11	120:BG:1265:PRO:HA	1.69	0.73
1:2:502:A:H2	6:s:75:ARG:HH21	0.91	0.73
21:aa:1228:ARG:HD3	22:ab:966:SER:H	1.52	0.73
24:ac:290:VAL:HG13	24:ac:320:LYS:HE2	1.69	0.73
28:ap:19:ALA:O	28:ap:23:GLU:N	2.21	0.73
36:p:151:TYR:O	36:p:155:THR:OG1	2.05	0.73
65:L:165:ASP:OD1	65:L:166:TRP:N	2.21	0.73
82:BB:105:GLU:OE1	82:BB:106:PRO:HD2	1.89	0.73
1:1:205:U:O2'	1:1:206:U:H5'	1.88	0.73
1:2:2:U:H2'	25:ad:706:GLN:NE2	2.03	0.73
1:2:201:A:OP2	31:at:245:ASN:ND2	2.21	0.73
1:2:415:A:N1	10:ae:38:GLY:CA	2.47	0.73
1:2:526:A:P	15:d:331:GLU:HB3	2.29	0.73
37:j:48:VAL:HG23	37:j:65:LEU:HD11	1.69	0.73
94:Au:22:ARG:N	1:1:587:U:OP1	2.22	0.73
114:BD:88:MET:HB3	114:BD:92:GLU:HG3	1.71	0.73
117:Ax:66:GLN:NE2	1:1:252:U:O2'	2.22	0.73
1:2:82:A:H4'	39:ar:32:LEU:CD2	2.18	0.73
1:2:108:A:C8	39:ar:22:ASN:CB	2.71	0.73
1:2:491:U:C4	14:e:383:THR:CB	2.68	0.73
1:2:522:A:C1'	15:d:343:LYS:HE2	2.16	0.73
7:au:113:GLN:HG3	22:ab:360:PRO:HB2	1.71	0.73
23:ak:186:GLN:HG2	23:ak:231:PRO:HG3	1.68	0.73
55:B:193:VAL:HG23	55:B:284:LEU:HD12	1.70	0.73
64:K:46:GLN:NE2	95:Aa:192:LEU:HA	2.01	0.73
68:O:173:VAL:HA	68:O:192:GLU:HA	1.69	0.73
83:Aw:8:ARG:NH2	86:Al:286:ASP:HB3	2.03	0.73
1:2:2:U:C2'	25:ad:706:GLN:HE21	2.00	0.73
1:2:37:U:C5	33:w:134:THR:OG1	2.30	0.73
1:2:323:U:OP1	46:c:171:LYS:CB	2.36	0.73
1:2:414:C:C5'	10:ae:158:LEU:HB2	2.18	0.73
1:2:436:U:OP2	1:2:436:U:H6	1.70	0.73

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:491:U:P	9:n:46:GLN:HE21	2.12	0.73
1:2:562:U:H4'	1:2:563:A:OP1	1.88	0.73
5:f:17:ARG:HE	5:f:20:MET:HG3	1.52	0.73
24:ac:285:LYS:HD2	24:ac:288:ALA:H	1.52	0.73
45:o:132:ARG:HE	50:a:349:TRP:C	1.96	0.73
55:B:82:THR:HG22	55:B:83:VAL:H	1.54	0.73
59:F:141:ARG:NH1	91:Ab:119:ASN:O	2.20	0.73
60:G:10:ARG:NH2	105:BP:-1:GLU:OE2	2.21	0.73
107:BF:14:ARG:NH2	1:1:543:U:OP1	2.20	0.73
119:BO:47:TRP:HD1	1:1:813:U:H5''	1.54	0.73
1:1:755:G:O6	1:1:782:U:O2'	2.06	0.73
1:2:158:U:C3'	29:aq:18:TYR:CB	2.26	0.73
1:2:397:U:N3	5:f:16:PRO:C	2.41	0.73
1:2:408:U:P	9:n:58:LYS:NZ	2.61	0.73
1:2:440:C:OP2	2:h:19:ARG:HG3	1.89	0.73
1:2:516:A:C6	17:ax:35:LYS:HB2	2.23	0.73
5:f:226:LEU:HD11	48:q:200:LEU:HD23	1.70	0.73
7:au:83:VAL:HG13	7:au:135:ILE:HB	1.70	0.73
24:ac:987:THR:H	24:ac:990:GLN:HE21	1.36	0.73
49:b:9:VAL:HG23	49:b:90:ASN:HB2	1.71	0.73
62:I:233:ARG:NH1	68:O:97:GLN:OE1	2.21	0.73
68:O:104:GLN:NE2	1:1:557:A:OP2	2.22	0.73
99:Aj:256:PHE:HB2	99:Aj:265:SER:HB2	1.71	0.73
1:1:841:A:H61	1:1:854:A:H61	1.36	0.73
1:2:122:U:C6	43:i:293:VAL:HG13	2.21	0.73
1:2:142:U:O2'	47:k:118:PRO:O	2.07	0.73
1:2:175:U:C2'	48:q:12:MET:O	2.37	0.73
1:2:369:G:H2'	1:2:370:A:H5'	1.70	0.73
1:2:417:C:C4	10:ae:128:TYR:CD1	2.77	0.73
1:2:426:U:C2	13:aj:237:ARG:NH1	2.57	0.73
1:2:482:C:C2	10:ae:56:TYR:HB2	2.24	0.73
1:2:499:A:H8	3:aw:10:ARG:N	1.85	0.73
1:2:509:C:O2	1:2:509:C:H2'	1.85	0.73
1:2:522:A:H4'	15:d:343:LYS:O	1.89	0.73
21:aa:198:THR:O	45:o:470:ARG:NH2	2.22	0.73
21:aa:872:ARG:NH2	27:ao:163:GLU:OE1	2.22	0.73
21:aa:983:MET:O	21:aa:991:ARG:NH2	2.22	0.73
24:ac:1111:THR:HG23	24:ac:1113:ALA:H	1.53	0.73
27:ao:47:VAL:HG13	27:ao:130:LEU:HB2	1.70	0.73
64:K:20:LEU:HD22	95:Aa:188:ALA:HB3	1.69	0.73
69:P:51:ARG:O	69:P:53:PHE:N	2.21	0.73

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
93:Ap:23:ALA:O	93:Ap:191:ARG:NH2	2.20	0.73
97:BM:68:LEU:HG	97:BM:320:LEU:HA	1.71	0.73
99:Aj:258:ARG:NH2	109:Af:129:GLU:OE1	2.22	0.73
105:BP:-4:THR:O	105:BP:-2:ILE:N	2.22	0.73
108:Av:165:ASP:HB2	108:Av:168:HIS:CD2	2.24	0.73
12:ag:20:THR:HG22	12:ag:22:LEU:H	1.52	0.73
24:ac:118:PRO:HG2	24:ac:122:ARG:HG3	1.69	0.73
29:aq:60:ARG:NH1	29:aq:65:ALA:O	2.21	0.73
43:i:235:LEU:HD11	43:i:251:ILE:HG23	1.71	0.73
49:b:24:GLU:HA	85:An:150:PHE:CZ	2.24	0.73
52:z:270:LYS:O	52:z:274:ARG:NH2	2.22	0.73
56:C:68:GLU:OE2	56:C:70:ARG:NH1	2.22	0.73
60:G:125:LYS:O	95:Aa:20:GLN:NE2	2.22	0.73
84:Bj:143:ASN:OD1	84:Bj:144:PRO:HD3	1.88	0.73
93:Ap:163:SER:O	93:Ap:167:MET:N	2.22	0.73
101:Am:102:TRP:NE1	101:Am:107:CYS:SG	2.60	0.73
1:2:44:A:O5'	29:aq:26:ALA:N	2.22	0.72
1:2:435:U:OP1	6:s:159:GLY:HA3	1.85	0.72
1:2:527:U:O4'	16:az:69:HIS:NE2	2.21	0.72
1:2:575:G:O2'	1:2:576:U:H5'	1.89	0.72
2:h:88:ARG:NH1	9:n:55:PRO:O	2.20	0.72
43:i:213:GLU:HB3	43:i:273:ARG:HH12	1.52	0.72
54:A:256:GLY:HA3	119:BO:40:LYS:HG3	1.71	0.72
78:Y:286:TYR:HD2	92:Ai:161:PRO:HA	1.54	0.72
113:Ah:452:MET:HB2	113:Ah:457:PHE:CZ	2.24	0.72
1:2:64:U:O2'	1:2:65:U:OP1	2.08	0.72
1:2:176:U:H5'	1:2:176:U:C6	2.23	0.72
1:2:395:U:H2'	1:2:395:U:OP2	1.90	0.72
1:2:497:A:N6	3:aw:17:ILE:HG21	1.73	0.72
7:au:145:GLU:OE2	7:au:161:ASN:ND2	2.20	0.72
56:C:96:HIS:HB3	70:Q:79:ASN:HD22	1.50	0.72
61:H:83:THR:HB	61:H:124:GLU:HB2	1.70	0.72
94:Au:29:ARG:NH1	1:1:650:U:O4	2.22	0.72
1:2:438:G:OP1	2:h:12:HIS:O	2.08	0.72
1:2:605:A:H2'	1:2:606:U:H5''	1.59	0.72
12:ag:32:GLU:O	20:u:703:ARG:NH1	2.21	0.72
15:d:267:ASP:OD2	18:r:408:ARG:NH1	2.21	0.72
21:aa:1079:ALA:HA	21:aa:1644:LEU:HD21	1.70	0.72
22:ab:301:TRP:CZ2	38:l:459:VAL:HG13	2.22	0.72
23:ak:247:GLU:OE1	24:ac:129:ARG:NH2	2.21	0.72
24:ac:684:ILE:O	24:ac:685:LEU:HB2	1.89	0.72

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
52:z:277:ASP:OD2	52:z:369:ARG:NH1	2.22	0.72
80:BA:131:ARG:NH2	80:BA:138:VAL:O	2.22	0.72
113:Ah:285:THR:OG1	113:Ah:421:CYS:SG	2.46	0.72
118:BL:107:TRP:O	118:BL:107:TRP:CD1	2.43	0.72
118:BL:147:VAL:HA	118:BL:185:GLU:HG3	1.71	0.72
1:1:533:U:H3	1:1:831:A:H61	1.38	0.72
1:2:414:C:H42	2:h:13:ILE:CG2	1.99	0.72
1:2:443:C:O2'	1:2:444:A:H5'	1.89	0.72
5:f:123:LEU:HA	5:f:126:GLN:HE21	1.52	0.72
25:ad:416:THR:OG1	25:ad:633:ARG:NH2	2.23	0.72
59:F:82:LYS:O	101:Am:30:ARG:NH2	2.23	0.72
77:X:374:HIS:ND1	77:X:401:GLU:OE2	2.21	0.72
97:BM:80:ARG:NH2	97:BM:80:ARG:O	2.20	0.72
1:2:359:A:H2'	1:2:360:A:O4'	1.90	0.72
1:2:476:U:H6	1:2:476:U:C5'	1.98	0.72
14:e:485:LEU:HA	14:e:521:ALA:HA	1.70	0.72
14:e:587:SER:HA	14:e:596:ILE:HG21	1.70	0.72
19:af:493:SER:O	19:af:502:ARG:NH2	2.23	0.72
23:ak:191:ARG:HB2	23:ak:259:ARG:HH12	1.54	0.72
26:an:1:MET:SD	26:an:39:LYS:NZ	2.62	0.72
58:E:277:LEU:HD13	58:E:336:ALA:HB2	1.70	0.72
1:2:36:G:O2'	33:w:126:TRP:CZ2	2.16	0.72
1:2:46:U:C3'	29:aq:11:SER:OG	2.37	0.72
1:2:202:A:OP1	31:at:230:ARG:CZ	2.38	0.72
1:2:305:C:H2'	1:2:306:A:C5'	2.20	0.72
1:2:321:U:O2	46:c:167:LYS:HE3	1.90	0.72
1:2:471:A:OP1	13:aj:12:TYR:N	2.22	0.72
1:2:499:A:O2'	14:e:784:LEU:HD13	1.86	0.72
1:2:532:U:C5	16:az:76:ARG:HD3	2.24	0.72
1:2:585:U:HO2'	1:2:586:A:C5'	2.01	0.72
2:h:119:ASN:ND2	14:e:378:THR:O	2.23	0.72
35:t:200:ASP:OD2	35:t:202:SER:OG	2.07	0.72
66:M:205:MET:HB3	66:M:230:HIS:HB2	1.70	0.72
85:An:130:LEU:HA	85:An:133:VAL:HG12	1.70	0.72
1:2:208:C:H2'	1:2:209:U:C1'	2.19	0.72
1:2:316:A:H3'	1:2:317:U:H5''	1.69	0.72
1:2:341:C:H2'	1:2:342:A:C5'	2.19	0.72
1:2:417:C:N3	10:ae:128:TYR:CE1	2.57	0.72
1:2:422:U:H5'	10:ae:298:TYR:HE1	1.52	0.72
1:2:524:C:C6	15:d:332:PRO:HG3	2.24	0.72
5:f:94:SER:OG	5:f:95:VAL:N	2.22	0.72

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
79:Z:48:LYS:HB2	79:Z:80:ARG:HH12	1.53	0.72
97:BM:146:PRO:HB3	97:BM:192:LEU:HD13	1.72	0.72
115:Ay:35:TRP:O	115:Ay:37:ASP:N	2.23	0.72
118:BL:119:ARG:NH1	118:BL:132:HIS:HB3	2.04	0.72
1:1:284:A:H4'	1:1:285:U:OP1	1.88	0.72
1:1:617:G:O2'	1:1:1040:C:OP1	2.08	0.72
1:1:850:U:O2'	1:1:851:U:O5'	2.07	0.72
1:2:37:U:HO2'	1:2:173:A:N6	1.88	0.72
1:2:65:U:C4'	35:t:36:ARG:CG	2.67	0.72
1:2:142:U:H2'	47:k:119:LYS:HA	1.70	0.72
1:2:413:U:O4	2:h:23:HIS:CA	2.38	0.72
1:2:462:G:P	2:h:133:HIS:HE1	2.13	0.72
1:2:529:A:O2'	16:az:71:CYS:C	2.31	0.72
1:2:605:A:OP1	44:g:83:ASN:CG	2.33	0.72
1:2:615:U:C1'	44:g:101:ARG:NH1	2.51	0.72
19:af:525:ASP:HB3	19:af:528:SER:HB3	1.70	0.72
20:u:190:LEU:HD11	20:u:235:PRO:HD2	1.72	0.72
21:aa:246:ILE:HD11	21:aa:252:ARG:HE	1.54	0.72
23:ak:270:ARG:HH11	24:ac:558:PHE:HA	1.54	0.72
55:B:413:ALA:HB2	86:Al:277:LEU:HD23	1.72	0.72
56:C:177:GLU:HG2	114:BD:58:VAL:H	1.54	0.72
83:Aw:49:VAL:HG11	89:At:19:THR:HA	1.72	0.72
96:Ao:234:LEU:HD21	98:Ar:171:LEU:HD12	1.72	0.72
119:BO:175:ASN:HA	119:BO:180:LEU:HD22	1.70	0.72
1:2:37:U:C2'	1:2:173:A:N1	2.52	0.72
1:2:39:U:O2	29:aq:10:ALA:CA	2.37	0.72
1:2:67:A:O2'	37:j:22:TRP:HA	1.90	0.72
1:2:89:U:C4	1:2:90:A:N6	2.58	0.72
1:2:419:A:C3'	10:ae:181:ARG:CG	2.58	0.72
1:2:431:U:C4	13:aj:280:HIS:HD2	2.05	0.72
1:2:436:U:O5'	6:s:154:VAL:CG1	2.31	0.72
8:am:183:GLU:O	8:am:187:ARG:NH1	2.23	0.72
24:ac:1070:THR:HA	24:ac:1110:GLY:HA3	1.70	0.72
29:aq:37:GLN:O	29:aq:41:GLN:N	2.23	0.72
38:l:136:ARG:HH12	38:l:478:ARG:HA	1.54	0.72
49:b:23:ARG:HG2	85:An:150:PHE:CZ	2.24	0.72
56:C:72:PRO:HB2	56:C:73:MET:HE2	1.71	0.72
1:2:48:U:C5'	1:2:48:U:H6	2.03	0.72
1:2:132:U:O2'	21:aa:100:HIS:HE1	1.73	0.72
1:2:132:U:H5	1:2:150:A:N1	1.87	0.72
1:2:507:A:N7	3:aw:28:LEU:CD2	2.52	0.72

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
14:e:311:PHE:CZ	20:u:653:ILE:HB	2.21	0.72
26:an:154:ALA:O	26:an:156:LEU:N	2.23	0.72
50:a:360:LEU:HD22	50:a:362:GLU:H	1.55	0.72
73:T:76:GLU:OE2	73:T:79:ARG:NH2	2.21	0.72
86:Al:270:PRO:CB	116:Ag:147:ARG:HE	2.02	0.72
125:Ag:301:NAD:O1A	125:Ag:301:NAD:H52N	1.90	0.72
1:2:68:A:C6	1:2:69:A:N6	2.57	0.71
1:2:229:C:C5	1:2:241:G:O5'	2.41	0.71
1:2:419:A:C8	10:ae:181:ARG:CB	2.73	0.71
22:ab:578:PRO:HG2	22:ab:609:ARG:HE	1.55	0.71
77:X:352:LYS:CB	77:X:353:PRO:HD2	2.19	0.71
78:Y:230:ARG:NH1	90:BC:34:GLU:OE1	2.23	0.71
80:BA:113:MET:HG2	80:BA:114:PHE:H	1.55	0.71
85:An:90:PRO:HD2	85:An:93:TYR:HB3	1.72	0.71
94:Au:28:ARG:NH1	1:1:280:A:OP1	2.23	0.71
1:1:410:A:C8	1:1:490:U:H4'	2.24	0.71
1:2:101:G:H4'	1:2:102:U:C5'	2.20	0.71
1:2:332:G:C5'	1:2:354:A:H2	2.02	0.71
1:2:420:U:OP1	13:aj:59:VAL:HG23	1.90	0.71
1:2:460:A:H4'	8:am:306:LEU:HB3	1.72	0.71
1:2:472:A:C2	12:ag:15:TYR:HD2	2.08	0.71
1:2:570:A:C5'	1:2:570:A:H8	2.02	0.71
6:s:64:ASN:ND2	15:d:286:ALA:O	2.21	0.71
12:ag:214:ILE:HA	12:ag:218:VAL:HG12	1.72	0.71
12:ag:260:ARG:NH1	20:u:121:GLU:OE1	2.23	0.71
16:az:96:ARG:NH1	17:ax:108:GLU:OE2	2.23	0.71
21:aa:762:GLN:HE21	21:aa:809:PRO:HG3	1.54	0.71
22:ab:467:PRO:HD3	22:ab:956:PRO:HB2	1.72	0.71
23:ak:285:GLU:OE1	24:ac:554:ARG:NH1	2.23	0.71
46:c:194:GLN:OE1	46:c:196:LYS:NZ	2.23	0.71
84:Bj:76:PRO:HA	112:Ac:84:ARG:HB3	1.71	0.71
92:Ai:235:ASP:OD1	92:Ai:442:ASN:ND2	2.23	0.71
1:1:135:A:H2'	1:1:135:A:N3	2.06	0.71
1:2:180:A:C2	33:w:87:SER:CA	2.73	0.71
1:2:435:U:OP1	6:s:159:GLY:N	2.23	0.71
14:e:324:HIS:HE1	20:u:322:ALA:HB3	1.55	0.71
32:y:130:ALA:HB1	32:y:173:ALA:HB1	1.72	0.71
67:N:115:LYS:NZ	71:R:396:TRP:O	2.22	0.71
68:O:159:VAL:HG22	68:O:166:ILE:HG12	1.71	0.71
71:R:279:PRO:HA	71:R:282:HIS:HB3	1.73	0.71
76:W:79:HIS:HD2	76:W:88:ARG:HB2	1.53	0.71

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
86:Al:279:ASN:H	86:Al:279:ASN:HD22	1.39	0.71
1:2:36:G:N9	33:w:130:LYS:HD3	2.06	0.71
1:2:434:U:H3'	7:au:244:TYR:CE1	2.25	0.71
1:2:437:U:H4'	6:s:153:LYS:HD3	1.72	0.71
1:2:439:A:OP1	6:s:135:LYS:NZ	2.19	0.71
1:2:481:U:O2	2:h:90:ALA:HB2	1.89	0.71
3:aw:10:ARG:HG2	14:e:784:LEU:HD13	1.71	0.71
15:d:111:ASP:H	15:d:119:ASN:HD21	1.38	0.71
43:i:232:VAL:HG21	43:i:259:LEU:HD12	1.72	0.71
45:o:75:LEU:HG	45:o:77:PRO:HD2	1.71	0.71
89:At:84:LEU:HD12	89:At:91:VAL:HG23	1.72	0.71
113:Ah:385:GLN:NE2	113:Ah:460:TYR:OH	2.17	0.71
115:Ay:167:ARG:NH1	1:1:962:A:OP2	2.24	0.71
117:Ax:56:ARG:NH2	1:1:624:A:OP2	2.23	0.71
118:BL:222:GLU:HB3	118:BL:243:ALA:HB1	1.71	0.71
1:2:175:U:P	48:q:11:GLN:OE1	2.48	0.71
1:2:315:A:O2'	1:2:316:A:H5'	1.90	0.71
1:2:437:U:C6	6:s:151:ARG:O	2.44	0.71
1:2:462:G:H3'	8:am:298:ARG:HB2	1.73	0.71
1:2:462:G:H5''	2:h:134:TYR:CE1	2.25	0.71
1:2:528:A:H5''	16:az:69:HIS:HB2	1.72	0.71
1:2:606:U:O2'	1:2:607:U:O5'	2.07	0.71
21:aa:551:ARG:HD2	27:ao:185:PRO:HG3	1.72	0.71
35:t:112:ARG:HH21	35:t:187:VAL:HG23	1.54	0.71
45:o:132:ARG:HB2	50:a:349:TRP:CD2	2.24	0.71
75:V:63:ARG:NH1	1:1:957:U:OP1	2.23	0.71
97:BM:142:ARG:HH12	97:BM:185:LEU:HD13	1.55	0.71
99:Aj:369:ARG:HH12	109:Af:129:GLU:HA	1.55	0.71
1:2:70:A:C5'	35:t:13:ALA:HB2	2.20	0.71
1:2:277:U:H2'	1:2:278:A:C8	2.24	0.71
1:2:397:U:P	5:f:19:GLY:H	2.14	0.71
1:2:434:U:H5	10:ae:11:ARG:N	1.53	0.71
1:2:484:A:C5	9:n:102:ARG:CD	2.74	0.71
1:2:510:A:N3	3:aw:19:PRO:C	2.48	0.71
5:f:97:PRO:HG2	36:p:275:HIS:CE1	2.25	0.71
19:af:766:PRO:O	19:af:826:ARG:NH2	2.23	0.71
20:u:396:CYS:SG	20:u:398:ARG:NH1	2.64	0.71
26:an:36:TYR:OH	50:a:309:ARG:NH2	2.24	0.71
37:j:59:ILE:HG23	37:j:60:ARG:HG3	1.72	0.71
38:l:106:PHE:O	38:l:478:ARG:NH2	2.23	0.71
45:o:98:PRO:HB3	45:o:166:ARG:HH12	1.53	0.71

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
60:G:373:ARG:HG2	60:G:374:LEU:H	1.54	0.71
103:BE:38:ASP:HB3	103:BE:41:SER:HB3	1.71	0.71
106:Ad:56:LYS:NZ	1:1:190:A:OP2	2.21	0.71
113:Ah:64:VAL:HG12	113:Ah:65:GLY:H	1.55	0.71
119:BO:82:LYS:HD2	1:1:772:U:C4	2.26	0.71
1:2:282:A:O3'	43:i:247:ILE:CD1	2.38	0.71
1:2:421:A:O3'	10:ae:298:TYR:CZ	2.43	0.71
1:2:453:A:H4'	8:am:274:ILE:O	1.91	0.71
25:ad:761:GLN:OE1	25:ad:764:ARG:NH2	2.23	0.71
54:A:392:LEU:HD13	63:J:64:TYR:CD2	2.26	0.71
1:2:85:U:H3	39:ar:19:PHE:HD2	1.36	0.71
1:2:193:A:N6	1:2:259:A:C5'	2.54	0.71
1:2:240:G:C5'	1:2:240:G:H8	2.03	0.71
1:2:459:A:H1'	1:2:460:A:OP1	1.91	0.71
1:2:513:U:C2	16:az:146:TYR:HE1	2.08	0.71
4:m:8:THR:HG22	4:m:13:MET:HE2	1.70	0.71
14:e:556:TRP:HZ3	14:e:570:LEU:HD22	1.55	0.71
21:aa:116:THR:OG1	21:aa:120:THR:OG1	2.08	0.71
22:ab:1151:LYS:HE2	90:BC:140:PHE:CZ	2.26	0.71
50:a:71:VAL:HG13	50:a:320:GLY:HA2	1.73	0.71
54:A:153:CYS:HG	54:A:307:TRP:CD1	2.08	0.71
56:C:54:ARG:NH2	89:At:68:ASN:OD1	2.24	0.71
65:L:71:ARG:O	65:L:73:LEU:N	2.23	0.71
1:2:37:U:O2'	1:2:173:A:N6	2.24	0.71
1:2:181:U:H5'	33:w:101:ARG:CB	2.21	0.71
1:2:422:U:C4	13:aj:52:TYR:CG	2.78	0.71
1:2:436:U:O2	6:s:152:PHE:C	2.34	0.71
1:2:568:A:O2'	1:2:569:G:H5'	1.90	0.71
23:ak:186:GLN:HG3	24:ac:129:ARG:HH22	1.56	0.71
42:x:253:CYS:HG	42:x:255:TRP:NE1	1.88	0.71
54:A:47:ARG:O	111:Ae:85:LYS:NZ	2.24	0.71
79:Z:104:LYS:HD2	79:Z:108:ARG:HA	1.72	0.71
87:BI:173:GLN:HB3	87:BI:209:GLY:HA3	1.73	0.71
94:Au:24:ARG:NH1	1:1:282:U:OP2	2.23	0.71
1:2:510:A:C4	3:aw:19:PRO:O	2.43	0.71
1:2:527:U:C1'	16:az:69:HIS:CD2	2.74	0.71
4:m:37:LYS:NZ	8:am:186:ALA:O	2.23	0.71
21:aa:1066:ARG:NH2	42:x:142:TRP:O	2.24	0.71
25:ad:648:GLN:N	35:t:209:TYR:OH	2.24	0.71
32:y:150:THR:O	42:x:91:ARG:NH1	2.23	0.71
58:E:202:VAL:HG22	58:E:204:GLY:H	1.54	0.71

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
64:K:145:HIS:HD2	64:K:147:ALA:H	1.38	0.71
65:L:92:VAL:HB	95:Aa:191:THR:CG2	2.21	0.71
117:Ax:72:LEU:HB3	117:Ax:199:GLN:H	1.54	0.71
120:BG:1287:CYS:HG	124:BG:1401:ZN:ZN	1.04	0.71
1:2:242:U:O2	1:2:242:U:O2'	2.07	0.70
1:2:314:U:O4	4:m:169:GLN:NE2	2.22	0.70
21:aa:93:LYS:HB2	21:aa:96:ARG:HB2	1.73	0.70
29:aq:145:ARG:NH1	35:t:106:GLN:O	2.23	0.70
52:z:422:MET:HG2	52:z:425:LEU:HD13	1.72	0.70
91:Ab:72:ARG:NH1	1:1:508:G:O4'	2.24	0.70
122:UC:66:UNK:O	122:UC:70:UNK:N	2.23	0.70
1:2:37:U:O2	1:2:173:A:C2	2.44	0.70
1:2:217:C:H2'	1:2:218:A:H5'	1.71	0.70
1:2:301:U:C4	1:2:302:A:C5	2.79	0.70
1:2:460:A:O4'	8:am:306:LEU:HB2	1.90	0.70
1:2:464:U:O4	8:am:295:ARG:CZ	2.26	0.70
1:2:521:A:O3'	15:d:345:LYS:CG	2.36	0.70
1:2:526:A:OP2	15:d:331:GLU:HB3	1.91	0.70
10:ae:543:PHE:O	22:ab:691:ARG:NH2	2.23	0.70
49:b:23:ARG:CG	85:An:150:PHE:CZ	2.74	0.70
52:z:548:PRO:O	52:z:554:ASN:ND2	2.24	0.70
56:C:150:PRO:HB2	113:Ah:55:TYR:CE2	2.25	0.70
92:Ai:191:VAL:HG23	92:Ai:196:LYS:HB2	1.72	0.70
99:Aj:311:GLU:OE2	99:Aj:374:TYR:OH	2.06	0.70
122:UC:90:UNK:HA	122:UC:94:UNK:HA	1.72	0.70
1:1:433:G:N2	1:1:435:A:H1'	2.06	0.70
1:1:1027:G:N2	1:1:1027:G:OP2	2.24	0.70
1:2:181:U:O5'	33:w:101:ARG:C	2.34	0.70
1:2:259:A:O2'	1:2:260:A:H5''	1.90	0.70
1:2:418:A:N1	13:aj:52:TYR:CE1	2.59	0.70
6:s:128:PRO:HB2	6:s:132:ARG:HB3	1.74	0.70
21:aa:175:THR:HG22	48:q:88:LEU:HB3	1.73	0.70
21:aa:590:PRO:HG2	21:aa:809:PRO:HD2	1.73	0.70
22:ab:216:ASP:OD1	22:ab:217:ASP:N	2.24	0.70
38:l:626:HIS:HA	38:l:630:HIS:HB2	1.72	0.70
39:ar:99:PHE:CZ	81:UA:132:UNK:CB	2.74	0.70
54:A:169:ARG:HH21	1:1:1117:U:H3	1.39	0.70
79:Z:81:ARG:NH2	1:1:67:U:OP1	2.24	0.70
89:At:33:ASN:ND2	1:1:123:U:OP1	2.25	0.70
100:BH:86:PRO:HA	100:BH:173:VAL:HG22	1.73	0.70
1:1:268:A:H2	1:1:272:A:H1'	1.57	0.70

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:320:G:O2'	1:1:377:U:N3	2.23	0.70
1:2:101:G:H4'	1:2:102:U:H5''	1.72	0.70
1:2:418:A:N6	13:aj:54:PRO:CB	2.51	0.70
1:2:495:U:H5	3:aw:30:LYS:HB2	1.53	0.70
1:2:613:U:C6	44:g:99:TRP:CZ3	2.78	0.70
21:aa:1586:GLY:O	21:aa:1588:THR:N	2.24	0.70
28:ap:201:LYS:HE2	28:ap:204:LEU:HD11	1.72	0.70
34:v:104:ARG:HA	34:v:107:MET:HE2	1.72	0.70
36:p:137:VAL:HA	52:z:696:VAL:HG11	1.72	0.70
54:A:383:PHE:HE2	54:A:385:ASP:HB3	1.55	0.70
58:E:107:TYR:HE2	58:E:113:ILE:HD12	1.57	0.70
70:Q:19:THR:OG1	116:Ag:151:ASP:OD1	2.07	0.70
117:Ax:73:THR:CG2	117:Ax:200:PHE:HB2	2.21	0.70
120:BG:1287:CYS:SG	124:BG:1401:ZN:ZN	1.81	0.70
1:1:781:A:O2'	1:1:782:U:H2'	1.91	0.70
1:2:47:U:O4	29:aq:10:ALA:HB1	1.92	0.70
1:2:166:G:O2'	1:2:167:U:H4'	1.92	0.70
1:2:519:U:O4	17:ax:121:ARG:HB2	1.90	0.70
5:f:139:LEU:O	5:f:142:GLU:N	2.23	0.70
9:n:68:PRO:HG3	11:ay:167:HIS:HD2	1.56	0.70
31:at:337:LEU:HD23	31:at:338:HIS:H	1.55	0.70
45:o:132:ARG:HD3	50:a:352:PHE:HA	1.73	0.70
86:Al:46:ASP:HB2	115:Ay:88:VAL:HG12	1.72	0.70
113:Ah:452:MET:HB2	113:Ah:457:PHE:HZ	1.56	0.70
113:Ah:484:HIS:NE2	118:BL:199:LYS:O	2.25	0.70
118:BL:95:ALA:HA	118:BL:98:MET:HE3	1.74	0.70
1:2:481:U:H1'	2:h:90:ALA:HB2	1.71	0.70
21:aa:433:HIS:HD2	21:aa:435:HIS:H	1.37	0.70
52:z:718:ARG:NH2	52:z:770:THR:O	2.24	0.70
58:E:206:THR:HG22	58:E:208:LYS:H	1.57	0.70
79:Z:68:ARG:NH2	79:Z:118:HIS:O	2.24	0.70
1:2:229:C:H5''	1:2:230:C:H6	1.54	0.70
1:2:418:A:C5	13:aj:54:PRO:CA	2.75	0.70
1:2:471:A:C6	13:aj:10:LEU:HD21	2.27	0.70
1:2:555:U:H5'	1:2:556:U:OP2	1.91	0.70
9:n:76:ALA:HB1	9:n:81:PHE:HD2	1.56	0.70
13:aj:255:VAL:HG11	13:aj:295:MET:HE1	1.72	0.70
14:e:491:SER:H	14:e:494:SER:HB2	1.56	0.70
22:ab:59:TYR:OH	38:l:461:GLU:OE2	2.06	0.70
55:B:384:ARG:NH2	71:R:223:ASP:OD1	2.25	0.70
61:H:132:ARG:NH2	108:Av:121:GLU:OE1	2.24	0.70

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
65:L:168:LYS:HG2	95:Aa:126:GLU:HB2	1.73	0.70
77:X:172:PRO:HA	77:X:195:GLN:HE21	1.57	0.70
117:Ax:53:HIS:NE2	1:1:651:U:OP1	2.23	0.70
1:2:44:A:H4'	29:aq:24:LYS:CA	2.22	0.70
1:2:193:A:H61	1:2:259:A:C5'	2.04	0.70
1:2:200:A:H8	31:at:228:HIS:ND1	1.88	0.70
1:2:407:U:H4'	9:n:58:LYS:NZ	2.05	0.70
1:2:617:U:C4	4:m:208:HIS:CE1	2.79	0.70
9:n:104:VAL:HA	9:n:138:GLU:HA	1.74	0.70
12:ag:410:THR:O	14:e:15:ARG:NH2	2.23	0.70
14:e:484:GLU:O	14:e:522:VAL:N	2.25	0.70
20:u:274:TYR:HB2	22:ab:883:GLN:HE21	1.54	0.70
24:ac:104:ALA:O	24:ac:108:ARG:NH1	2.25	0.70
24:ac:687:GLU:HA	38:l:319:GLU:HB2	1.72	0.70
25:ad:685:THR:O	45:o:469:LYS:NZ	2.25	0.70
43:i:268:LYS:NZ	43:i:309:LEU:O	2.24	0.70
44:g:72:PHE:HA	44:g:75:PHE:HB3	1.73	0.70
61:H:99:GLU:HG3	1:1:390:A:N3	2.07	0.70
63:J:67:ARG:HB2	63:J:67:ARG:CZ	2.21	0.70
66:M:46:ARG:NH2	1:1:509:U:OP1	2.25	0.70
69:P:139:GLU:OE1	96:Ao:214:ARG:NH1	2.24	0.70
70:Q:106:THR:HG21	1:1:905:A:N1	2.07	0.70
88:Az:16:LYS:HD2	88:Az:19:GLN:HE21	1.56	0.70
101:Am:221:GLU:OE2	103:BE:95:ARG:NH2	2.24	0.70
109:Af:91:ARG:NH1	109:Af:93:ALA:O	2.25	0.70
116:Ag:75:ARG:NH2	1:1:108:U:OP1	2.22	0.70
1:2:1:G:H8	1:2:1:G:OP2	1.75	0.70
1:2:53:U:C5	1:2:54:A:C6	2.79	0.70
1:2:497:A:C3'	3:aw:4:ALA:CB	2.68	0.70
1:2:499:A:O2'	3:aw:10:ARG:HG2	1.92	0.70
1:2:499:A:N7	3:aw:10:ARG:HG3	2.07	0.70
1:2:528:A:H3'	4:m:270:ARG:HH22	1.57	0.70
7:au:53:GLN:OE1	7:au:215:GLN:NE2	2.24	0.70
10:ae:412:ARG:NH1	12:ag:180:GLU:O	2.25	0.70
12:ag:239:LEU:HD11	12:ag:275:LEU:HD23	1.73	0.70
56:C:142:ASN:ND2	1:1:903:G:OP1	2.24	0.70
94:Au:89:PHE:O	94:Au:101:LYS:NZ	2.24	0.70
111:Ae:33:PRO:HB2	111:Ae:54:ASN:HD21	1.56	0.70
112:Ac:174:GLN:NE2	112:Ac:255:ASP:OD1	2.25	0.70
117:Ax:173:ARG:N	117:Ax:173:ARG:HD3	2.06	0.70
1:2:132:U:C5	1:2:150:A:N1	2.60	0.70

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:419:A:H62	10:ae:182:ARG:HD2	1.56	0.70
1:2:420:U:O2	10:ae:258:SER:O	2.10	0.70
1:2:438:G:O6	6:s:134:HIS:CE1	2.45	0.70
1:2:480:A:C1'	2:h:21:HIS:CE1	2.75	0.70
1:2:482:C:C1'	10:ae:56:TYR:CD2	2.75	0.70
1:2:549:C:C2'	1:2:550:C:H5'	2.21	0.70
1:2:615:U:H5'	44:g:101:ARG:HH21	1.55	0.70
13:aj:81:PRO:HA	13:aj:84:LYS:HD2	1.74	0.70
21:aa:311:PRO:HG2	21:aa:343:GLN:HE21	1.57	0.70
22:ab:1028:ASP:HB2	22:ab:1032:GLN:HB2	1.74	0.70
24:ac:477:HIS:HA	24:ac:480:GLU:HG2	1.74	0.70
50:a:40:ARG:HH21	50:a:94:LYS:HG3	1.57	0.70
60:G:158:SER:O	60:G:161:GLY:N	2.23	0.70
61:H:94:VAL:HB	61:H:108:ASN:HB3	1.74	0.70
75:V:25:VAL:HG22	75:V:26:LEU:H	1.55	0.70
90:BC:124:GLU:OE2	90:BC:128:ARG:NH1	2.24	0.70
102:Aq:336:ARG:O	102:Aq:336:ARG:HG3	1.90	0.70
113:Ah:154:ASP:OD1	113:Ah:427:ARG:NH2	2.24	0.70
1:1:225:U:H2'	1:1:226:A:H8	1.54	0.70
1:2:55:G:C5'	1:2:152:G:H22	1.97	0.69
1:2:83:A:HO2'	1:2:84:U:P	2.13	0.69
1:2:422:U:O4	13:aj:52:TYR:CD1	2.44	0.69
1:2:486:A:N6	9:n:121:PHE:HZ	1.86	0.69
1:2:529:A:H2	16:az:72:LYS:CE	1.69	0.69
22:ab:739:ALA:HB3	22:ab:742:LYS:HB2	1.74	0.69
59:F:41:ASP:O	95:Aa:155:THR:OG1	2.10	0.69
61:H:72:LEU:O	61:H:77:ARG:NH2	2.25	0.69
74:U:33:LYS:O	74:U:34:ILE:HG13	1.91	0.69
85:An:135:PHE:O	85:An:135:PHE:CG	2.43	0.69
113:Ah:167:ARG:NH1	113:Ah:412:ASP:OD2	2.25	0.69
1:2:39:U:C5	33:w:139:TYR:C	2.65	0.69
1:2:142:U:C2'	47:k:119:LYS:HA	2.22	0.69
1:2:147:U:O2'	1:2:148:U:C5'	2.40	0.69
1:2:202:A:H4'	31:at:244:LYS:HD2	1.74	0.69
1:2:363:A:N3	1:2:365:A:N6	2.17	0.69
1:2:385:U:C2	1:2:539:G:C6	2.80	0.69
1:2:417:C:C6	10:ae:128:TYR:CD1	2.80	0.69
1:2:521:A:OP1	5:f:10:ARG:HB3	1.91	0.69
6:s:58:HIS:HB3	6:s:67:THR:HG22	1.73	0.69
16:az:62:GLN:OE1	16:az:99:GLN:NE2	2.24	0.69
18:r:115:ILE:HB	18:r:365:PHE:HB2	1.73	0.69

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
23:ak:269:GLN:HA	24:ac:1179:LYS:HA	1.72	0.69
64:K:81:ARG:NH2	1:1:410:A:OP1	2.25	0.69
71:R:208:TRP:CD1	71:R:211:SER:HG	2.10	0.69
79:Z:109:GLY:HA3	1:1:571:U:H4'	1.73	0.69
106:Ad:28:THR:O	106:Ad:30:GLU:N	2.24	0.69
1:2:184:A:OP1	33:w:98:LEU:HD22	1.93	0.69
1:2:313:C:O2'	4:m:165:VAL:HA	1.92	0.69
1:2:514:U:H5'	16:az:17:VAL:CG2	2.22	0.69
1:2:529:A:H2'	16:az:73:PRO:HD2	1.70	0.69
1:2:589:G:O6	1:2:604:U:O4	2.08	0.69
10:ae:110:SER:O	22:ab:1080:ARG:NH2	2.24	0.69
14:e:291:SER:O	14:e:293:GLY:N	2.25	0.69
24:ac:1175:GLU:HB3	38:l:521:ARG:HB3	1.74	0.69
25:ad:154:VAL:HG22	25:ad:156:GLN:H	1.57	0.69
36:p:40:LEU:HD23	50:a:203:ALA:HB2	1.74	0.69
45:o:132:ARG:NH2	50:a:352:PHE:HB2	2.07	0.69
55:B:290:ASP:HB3	55:B:293:ARG:HE	1.56	0.69
58:E:179:ARG:NH2	1:1:454:A:H1'	2.08	0.69
77:X:249:LYS:O	77:X:252:SER:N	2.24	0.69
95:Aa:123:HIS:ND1	95:Aa:126:GLU:OE1	2.19	0.69
97:BM:224:PRO:O	97:BM:228:ASN:ND2	2.25	0.69
113:Ah:425:GLU:HA	113:Ah:428:ARG:HD2	1.72	0.69
1:1:159:U:H2'	1:1:160:U:H4'	1.75	0.69
1:1:236:A:H1'	1:1:288:C:H42	1.57	0.69
1:1:1130:A:H61	1:1:1148:A:H62	1.38	0.69
1:2:94:A:N1	1:2:372:A:N7	2.41	0.69
1:2:106:U:O2	1:2:110:A:H2	1.74	0.69
1:2:321:U:O2	46:c:167:LYS:CE	2.41	0.69
1:2:434:U:C2'	6:s:158:SER:OG	2.41	0.69
1:2:526:A:N6	15:d:294:ILE:CG2	2.55	0.69
1:2:567:A:C2'	1:2:568:A:H5'	2.22	0.69
3:aw:137:LYS:O	19:af:828:ARG:NH1	2.25	0.69
15:d:73:ARG:NH1	15:d:76:GLU:OE2	2.23	0.69
20:u:791:ARG:HH21	20:u:794:GLN:HG3	1.58	0.69
28:ap:8:ARG:NH2	52:z:751:GLU:OE1	2.25	0.69
52:z:423:THR:OG1	52:z:821:GLU:OE2	2.10	0.69
85:An:129:LYS:HE2	85:An:129:LYS:HA	1.72	0.69
86:Al:69:TYR:HB2	115:Ay:87:TRP:HZ3	1.57	0.69
94:Au:15:GLN:HG3	1:1:287:G:H1'	1.75	0.69
110:As:108:ARG:NH2	110:As:111:GLU:OE2	2.26	0.69
112:Ac:192:GLU:OE1	112:Ac:200:ARG:NH1	2.25	0.69

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
113:Ah:115:TYR:OH	113:Ah:179:ASN:OD1	2.10	0.69
1:1:901:G:H22	1:1:908:U:H3	1.38	0.69
1:2:179:G:H5'	33:w:105:ARG:HB3	1.73	0.69
1:2:347:U:O3'	1:2:348:U:C4'	2.40	0.69
1:2:486:A:C5'	9:n:145:PRO:HB3	2.21	0.69
1:2:556:U:C5'	1:2:556:U:H6	2.05	0.69
2:h:153:ASN:OD1	6:s:58:HIS:NE2	2.25	0.69
12:ag:513:HIS:HA	24:ac:196:ARG:HH12	1.56	0.69
18:r:202:LEU:HB3	18:r:206:GLU:HB3	1.73	0.69
20:u:421:MET:HG2	20:u:553:ARG:HG2	1.73	0.69
21:aa:1049:GLU:HB3	21:aa:1052:GLN:HB3	1.74	0.69
25:ad:415:GLN:NE2	25:ad:518:TYR:O	2.25	0.69
45:o:130:ARG:NH2	45:o:136:TRP:O	2.25	0.69
84:Bj:143:ASN:HA	84:Bj:158:LYS:HD2	1.74	0.69
91:Ab:135:ARG:NH2	101:Am:333:ASN:OD1	2.26	0.69
94:Au:24:ARG:HG3	94:Au:36:ASN:HD22	1.58	0.69
94:Au:45:THR:HG22	94:Au:51:PHE:HD2	1.58	0.69
96:Ao:17:MET:HE3	99:Aj:107:ILE:HB	1.73	0.69
102:Aq:1:MET:HA	102:Aq:7:ARG:HH12	1.57	0.69
118:BL:114:ASP:CB	118:BL:130:LEU:HD13	2.21	0.69
1:1:1074:A:N6	1:1:1086:U:OP2	2.26	0.69
1:2:27:U:H5''	1:2:27:U:C6	2.27	0.69
1:2:33:A:H61	1:2:169:U:C2'	1.99	0.69
1:2:172:A:H62	37:j:17:LYS:HA	0.92	0.69
1:2:282:A:H62	43:i:251:ILE:CD1	2.05	0.69
1:2:282:A:C6	43:i:251:ILE:CG2	2.71	0.69
1:2:512:G:C2'	16:az:141:VAL:CG2	2.70	0.69
1:2:596:U:H6	1:2:596:U:C5'	2.05	0.69
1:2:614:U:H4'	44:g:104:GLN:HE22	1.58	0.69
42:x:69:ALA:O	42:x:71:LEU:N	2.25	0.69
52:z:494:HIS:O	52:z:498:LYS:NZ	2.25	0.69
52:z:955:ASP:N	52:z:959:ASN:O	2.25	0.69
64:K:83:ASP:HB3	64:K:114:CYS:HB2	1.73	0.69
102:Aq:341:PHE:HD1	102:Aq:341:PHE:N	1.90	0.69
115:Ay:68:TYR:HB2	1:1:697:A:H61	1.57	0.69
1:2:102:U:H6	1:2:102:U:C5'	2.03	0.69
1:2:425:A:O4'	13:aj:235:GLU:CA	2.33	0.69
1:2:503:A:C3'	6:s:79:GLY:HA3	2.23	0.69
1:2:510:A:C6	3:aw:20:ILE:O	2.45	0.69
1:2:615:U:O4'	44:g:101:ARG:NH1	2.25	0.69
4:m:182:PRO:HB3	49:b:48:TYR:OH	1.93	0.69

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
5:f:138:ARG:NH1	44:g:138:LEU:O	2.25	0.69
32:y:288:TYR:HA	32:y:293:ARG:HD2	1.73	0.69
52:z:502:MET:SD	52:z:507:HIS:NE2	2.66	0.69
57:D:27:ARG:NE	57:D:29:TYR:OH	2.26	0.69
74:U:30:ILE:HG23	74:U:30:ILE:O	1.92	0.69
91:Ab:136:LYS:HB2	101:Am:335:ALA:HB3	1.74	0.69
97:BM:34:ARG:HD3	97:BM:38:PRO:HG3	1.75	0.69
100:BH:155:LYS:NZ	109:Af:128:ASP:OD2	2.25	0.69
118:BL:147:VAL:HG13	118:BL:185:GLU:HB2	1.75	0.69
119:BO:172:ARG:HH21	119:BO:172:ARG:CA	2.04	0.69
1:2:44:A:C5'	29:aq:26:ALA:HB3	2.23	0.69
1:2:87:A:OP1	1:2:87:A:H4'	1.93	0.69
1:2:108:A:C4	40:av:131:GLN:NE2	2.61	0.69
1:2:240:G:H8	1:2:240:G:H5'	1.57	0.69
1:2:397:U:P	5:f:19:GLY:N	2.66	0.69
1:2:432:G:N3	10:ae:22:LEU:HD21	2.05	0.69
1:2:491:U:OP2	9:n:43:ARG:NH2	2.24	0.69
1:2:596:U:H6	1:2:596:U:H5'	1.56	0.69
1:2:613:U:O5'	44:g:96:ARG:CZ	2.36	0.69
5:f:135:PHE:CE2	44:g:135:ASN:HB3	2.27	0.69
10:ae:388:PRO:HB3	10:ae:425:ASP:H	1.56	0.69
13:aj:67:ILE:HG13	13:aj:126:GLN:HB2	1.73	0.69
14:e:696:SER:O	22:ab:1176:GLN:NE2	2.26	0.69
21:aa:714:ASP:H	21:aa:717:GLN:HB3	1.57	0.69
22:ab:961:LEU:HD22	22:ab:972:ASN:H	1.58	0.69
24:ac:721:ASP:OD1	24:ac:724:ARG:NH1	2.26	0.69
27:ao:72:ALA:HA	27:ao:109:ILE:HA	1.74	0.69
48:q:63:ARG:NH1	48:q:67:GLU:OE2	2.26	0.69
50:a:386:ARG:HD3	50:a:391:THR:HG22	1.74	0.69
57:D:135:PRO:HA	57:D:138:VAL:HB	1.73	0.69
58:E:55:PHE:HE2	58:E:104:ILE:HD12	1.58	0.69
60:G:246:GLU:OE2	60:G:295:ARG:NH1	2.26	0.69
62:I:112:ARG:NH2	94:Au:171:SER:HG	1.91	0.69
80:BA:102:PRO:HG2	109:Af:50:ARG:HB3	1.74	0.69
82:BB:54:VAL:HG23	82:BB:56:PRO:HD2	1.75	0.69
90:BC:14:MET:HG3	90:BC:45:MET:HE2	1.75	0.69
93:Ap:54:ASP:OD2	93:Ap:216:TYR:OH	2.11	0.69
94:Au:92:VAL:HG23	94:Au:93:HIS:H	1.57	0.69
100:BH:29:VAL:O	100:BH:45:VAL:N	2.23	0.69
117:Ax:173:ARG:HG2	117:Ax:173:ARG:NH1	2.06	0.69
1:1:781:A:O2'	1:1:782:U:O5'	2.10	0.69

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:1018:A:H62	1:1:1070:C:H42	1.40	0.69
1:2:35:A:N6	37:j:16:ARG:HH22	1.74	0.69
1:2:324:U:O4	46:c:173:TRP:CE2	2.21	0.69
1:2:471:A:O2'	12:ag:18:ILE:HG13	1.92	0.69
1:2:484:A:C2	9:n:102:ARG:HD2	2.28	0.69
1:2:513:U:H5	16:az:148:ARG:NH1	1.89	0.69
13:aj:224:MET:HE1	13:aj:234:VAL:HG11	1.74	0.69
21:aa:615:GLN:NE2	21:aa:616:ARG:O	2.26	0.69
22:ab:871:GLU:O	22:ab:876:ALA:N	2.26	0.69
24:ac:689:ARG:HH12	38:l:322:TRP:HH2	1.38	0.69
25:ad:241:PHE:O	25:ad:243:GLN:NE2	2.26	0.69
25:ad:771:ASP:HB2	25:ad:773:VAL:HG12	1.75	0.69
41:ai:371:VAL:HB	41:ai:374:GLU:HG2	1.72	0.69
49:b:24:GLU:CA	85:An:150:PHE:CZ	2.76	0.69
56:C:97:ARG:NH2	114:BD:48:GLN:OE1	2.26	0.69
63:J:54:ILE:HG23	63:J:120:GLY:HA2	1.74	0.69
84:Bj:128:ARG:O	84:Bj:130:LYS:NZ	2.19	0.69
95:Aa:40:GLY:H	95:Aa:45:GLY:HA3	1.56	0.69
95:Aa:181:THR:HB	95:Aa:186:MET:HG2	1.74	0.69
1:1:983:U:H3'	1:1:984:A:H5''	1.75	0.69
1:2:303:G:H5''	1:2:303:G:H8	1.58	0.69
1:2:483:A:N7	2:h:83:LYS:O	2.26	0.69
1:2:499:A:H8	3:aw:10:ARG:CA	2.06	0.69
1:2:525:A:OP2	5:f:27:ARG:HB2	1.92	0.69
1:2:613:U:H5'	1:2:614:U:OP1	1.93	0.69
3:aw:57:ASP:HA	20:u:809:ARG:HE	1.57	0.69
6:s:107:ASN:OD1	10:ae:161:ARG:NH2	2.26	0.69
10:ae:27:ARG:HH22	10:ae:36:ARG:HD2	1.56	0.69
22:ab:341:ALA:HA	22:ab:344:GLN:HE21	1.57	0.69
25:ad:367:ALA:O	30:as:194:HIS:NE2	2.23	0.69
36:p:175:ILE:HG23	36:p:179:GLU:HB2	1.75	0.69
39:ar:87:ARG:HA	39:ar:90:VAL:HG12	1.75	0.69
46:c:273:HIS:ND1	46:c:273:HIS:O	2.25	0.69
54:A:171:GLY:O	111:Ae:104:ARG:NH2	2.26	0.69
59:F:94:ASP:OD2	82:BB:16:TYR:OH	2.10	0.69
86:Al:129:VAL:HG22	86:Al:181:VAL:HG22	1.75	0.69
92:Ai:207:GLU:OE2	92:Ai:211:ARG:NH1	2.24	0.69
94:Au:31:SER:OG	1:1:279:U:O2'	2.11	0.69
94:Au:135:HIS:CG	1:1:590:A:H5'	2.28	0.69
104:Ak:91:TRP:HD1	104:Ak:118:GLY:HA3	1.57	0.69
1:2:182:A:P	33:w:98:LEU:CD1	2.81	0.68

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:200:A:H8	31:at:228:HIS:HD1	1.39	0.68
1:2:298:U:O2'	1:2:299:U:H5'	1.92	0.68
1:2:332:G:H4'	1:2:354:A:C2	2.28	0.68
1:2:363:A:N3	1:2:365:A:N1	2.41	0.68
1:2:425:A:H8	1:2:425:A:OP1	1.76	0.68
1:2:500:U:P	3:aw:13:TYR:CE1	2.51	0.68
1:2:526:A:H61	15:d:293:GLU:CB	2.06	0.68
1:2:528:A:C5'	16:az:69:HIS:HB2	2.23	0.68
20:u:556:ARG:HA	20:u:559:GLN:HB3	1.74	0.68
20:u:837:TYR:HB2	20:u:852:LEU:HD11	1.74	0.68
37:j:121:LYS:O	45:o:476:ARG:NE	2.24	0.68
38:l:253:LEU:HA	38:l:353:LYS:HG3	1.75	0.68
39:ar:54:VAL:O	39:ar:56:ARG:NH2	2.25	0.68
41:ai:257:TYR:CD1	41:ai:288:PRO:HA	2.28	0.68
46:c:203:SER:OG	46:c:208:ARG:NH2	2.26	0.68
55:B:58:ARG:NH1	89:At:145:GLY:O	2.26	0.68
62:I:79:ARG:NH1	107:BF:26:ARG:HE	1.91	0.68
71:R:275:PRO:O	71:R:277:ARG:NH2	2.27	0.68
77:X:275:LEU:HD11	106:Ad:32:ARG:HD2	1.74	0.68
80:BA:51:ASP:HA	80:BA:54:LYS:HE2	1.75	0.68
92:Ai:301:THR:HG22	92:Ai:304:HIS:CE1	2.28	0.68
97:BM:242:THR:OG1	97:BM:276:HIS:ND1	2.25	0.68
113:Ah:452:MET:N	113:Ah:452:MET:SD	2.66	0.68
118:BL:320:ASN:ND2	1:1:1087:A:OP2	2.22	0.68
1:1:410:A:H8	1:1:490:U:H4'	1.58	0.68
1:2:239:C:H2'	1:2:240:G:H5'	1.76	0.68
1:2:394:U:O2'	1:2:395:U:C5'	2.41	0.68
1:2:504:A:O4'	6:s:80:GLN:NE2	2.25	0.68
6:s:143:ASN:ND2	6:s:150:ASN:OD1	2.26	0.68
10:ae:505:ASN:ND2	22:ab:524:ALA:O	2.25	0.68
13:aj:209:GLY:HA3	13:aj:241:TYR:HB3	1.74	0.68
21:aa:823:GLU:OE1	21:aa:867:LYS:NZ	2.26	0.68
22:ab:283:MET:SD	22:ab:287:ARG:NH2	2.66	0.68
24:ac:686:ARG:HE	38:l:140:PRO:HB3	1.57	0.68
32:y:40:TYR:OH	32:y:188:HIS:ND1	2.21	0.68
37:j:151:LEU:O	37:j:154:ARG:NH1	2.26	0.68
47:k:147:ILE:HG22	47:k:161:VAL:HA	1.74	0.68
97:BM:31:ARG:NH1	97:BM:47:LYS:O	2.24	0.68
97:BM:101:LYS:NZ	97:BM:122:LEU:O	2.26	0.68
110:As:82:CYS:HG	110:As:87:THR:HG1	1.39	0.68
1:1:336:U:O2	1:1:351:U:O2'	2.09	0.68

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:526:A:HI'	15:d:329:ARG:CZ	2.24	0.68
2:h:157:GLN:HB2	6:s:71:MET:HE1	1.74	0.68
3:aw:105:GLU:HA	3:aw:108:GLN:HE21	1.57	0.68
10:ae:279:ARG:NH1	14:e:509:ALA:O	2.26	0.68
20:u:204:LEU:HD12	20:u:207:SER:HB3	1.74	0.68
21:aa:286:ARG:NH2	21:aa:290:LEU:O	2.25	0.68
22:ab:691:ARG:NH1	22:ab:798:TYR:O	2.25	0.68
32:y:60:LYS:NZ	42:x:199:VAL:O	2.25	0.68
38:l:306:ILE:HG13	38:l:308:ARG:H	1.57	0.68
60:G:102:GLU:HG2	1:1:183:U:H4'	1.74	0.68
66:M:19:GLN:NE2	1:1:327:U:O2'	2.26	0.68
74:U:41:LEU:HD13	74:U:53:TYR:HB3	1.75	0.68
75:V:120:ALA:HB2	1:1:91:U:H5	1.57	0.68
78:Y:226:LYS:NZ	78:Y:264:GLY:O	2.27	0.68
93:Ap:183:VAL:HA	93:Ap:186:THR:HG22	1.74	0.68
95:Aa:189:ARG:HE	1:1:146:U:H5	1.39	0.68
96:Ao:188:VAL:HG13	96:Ao:189:ILE:HD12	1.76	0.68
101:Am:148:ASN:ND2	101:Am:181:SER:OG	2.25	0.68
106:Ad:198:GLU:HA	106:Ad:201:MET:HE2	1.74	0.68
1:2:305:C:C2'	1:2:306:A:H5'	2.23	0.68
1:2:396:A:C5	1:2:529:A:C1'	2.76	0.68
1:2:481:U:O2	2:h:90:ALA:HB1	1.89	0.68
20:u:833:LEU:HD22	20:u:852:LEU:HB3	1.75	0.68
22:ab:1066:SER:HB2	22:ab:1070:SER:HB2	1.74	0.68
23:ak:186:GLN:OE1	23:ak:189:ARG:NH1	2.26	0.68
39:ar:104:ILE:HD12	39:ar:107:LEU:HD12	1.74	0.68
52:z:127:VAL:HG21	52:z:144:ILE:HG21	1.75	0.68
56:C:146:GLU:HA	113:Ah:57:LEU:HD11	1.75	0.68
71:R:236:GLY:O	71:R:237:HIS:ND1	2.24	0.68
82:BB:109:THR:O	82:BB:110:PHE:HB2	1.94	0.68
107:BF:23:PRO:HD2	1:1:595:A:H61	1.57	0.68
113:Ah:112:TYR:OH	113:Ah:144:ASN:OD1	2.11	0.68
1:2:10:U:O3'	50:a:263:LYS:HG2	1.25	0.68
1:2:414:C:C5	6:s:155:LEU:HD22	2.28	0.68
1:2:431:U:C2	13:aj:280:HIS:CD2	2.79	0.68
1:2:508:G:C6	11:ay:166:TYR:N	2.57	0.68
1:2:526:A:P	15:d:331:GLU:HA	2.28	0.68
3:aw:41:ASP:OD2	6:s:72:ARG:NH2	2.26	0.68
9:n:117:ARG:NH1	10:ae:81:SER:O	2.18	0.68
9:n:133:TRP:HE1	22:ab:1158:VAL:HG11	1.56	0.68
14:e:187:ARG:NH1	19:af:230:LYS:O	2.26	0.68

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
14:e:435:HIS:HB3	14:e:822:PRO:HG3	1.76	0.68
21:aa:786:THR:HA	21:aa:789:GLN:HG2	1.76	0.68
25:ad:39:ARG:NH1	25:ad:702:GLY:O	2.26	0.68
55:B:129:LEU:HD12	66:M:7:ARG:HD3	1.75	0.68
57:D:37:THR:HG22	101:Am:260:TRP:CH2	2.29	0.68
86:Al:159:THR:HG22	86:Al:242:ASN:HB3	1.74	0.68
95:Aa:97:MET:HB3	95:Aa:107:VAL:HG22	1.75	0.68
1:2:26:U:O5'	1:2:27:U:H5'	1.93	0.68
1:2:172:A:H62	37:j:17:LYS:CG	1.99	0.68
1:2:313:C:O2'	4:m:165:VAL:HB	1.94	0.68
1:2:450:A:H2'	1:2:451:G:C8	2.29	0.68
1:2:521:A:P	5:f:10:ARG:CB	2.81	0.68
1:2:605:A:P	44:g:84:SER:N	2.66	0.68
11:ay:83:ARG:NH1	16:az:135:TYR:OH	2.27	0.68
21:aa:1428:MET:O	21:aa:1432:TYR:N	2.25	0.68
67:N:85:ARG:NH2	1:1:314:A:OP2	2.27	0.68
81:UA:71:UNK:O	81:UA:75:UNK:N	2.26	0.68
118:BL:84:GLN:HE21	118:BL:294:VAL:HG11	1.57	0.68
118:BL:336:PRO:HD2	118:BL:340:VAL:HG13	1.76	0.68
1:2:93:U:H4'	1:2:94:A:OP2	1.93	0.68
1:2:437:U:O4'	6:s:153:LYS:HB2	1.92	0.68
13:aj:26:SER:HB2	53:bd:74:ASN:HD22	1.58	0.68
21:aa:1433:THR:O	21:aa:1615:TYR:OH	2.10	0.68
22:ab:155:LEU:HD13	38:l:427:ILE:HG23	1.75	0.68
24:ac:165:ASP:HB3	24:ac:169:SER:HB2	1.76	0.68
71:R:238:ARG:HH11	71:R:242:ALA:HB1	1.57	0.68
99:Aj:414:HIS:ND1	1:1:505:A:OP1	2.26	0.68
100:BH:188:TRP:CD2	100:BH:227:PRO:HB3	2.29	0.68
123:UD:49:UNK:O	123:UD:53:UNK:N	2.26	0.68
1:2:122:U:C4	43:i:297:GLN:HG2	2.29	0.68
1:2:480:A:N3	2:h:21:HIS:NE2	2.40	0.68
5:f:101:GLN:NE2	15:d:71:ASP:OD2	2.27	0.68
9:n:42:ALA:HB1	14:e:382:ASP:HB3	1.73	0.68
13:aj:163:VAL:HA	13:aj:166:ILE:HG22	1.76	0.68
19:af:668:ARG:HD3	19:af:773:ALA:HA	1.75	0.68
22:ab:1029:TYR:HE1	22:ab:1036:PRO:HD3	1.58	0.68
33:w:121:ASP:OD1	33:w:123:LYS:NZ	2.21	0.68
68:O:29:ARG:HD2	68:O:29:ARG:N	2.07	0.68
72:S:278:ARG:NH2	99:Aj:108:THR:O	2.27	0.68
85:An:143:TYR:N	85:An:143:TYR:CD1	2.62	0.68
112:Ac:280:LEU:O	112:Ac:284:SER:OG	2.11	0.68

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
113:Ah:55:TYR:CD2	113:Ah:57:LEU:HA	2.29	0.68
117:Ax:105:CYS:SG	117:Ax:108:CYS:N	2.67	0.68
118:BL:93:VAL:CG1	118:BL:163:VAL:HG22	2.24	0.68
1:2:32:A:H5''	1:2:32:A:H8	1.58	0.68
1:2:37:U:O3'	33:w:126:TRP:CE2	2.46	0.68
1:2:65:U:H4'	35:t:36:ARG:HG3	1.76	0.68
1:2:157:G:H4'	1:2:158:U:C6	2.29	0.68
1:2:491:U:C5	14:e:383:THR:O	2.46	0.68
2:h:25:VAL:HB	6:s:106:PRO:HG3	1.76	0.68
7:au:150:GLU:OE1	12:ag:481:ARG:NH2	2.27	0.68
8:am:310:LEU:HB3	15:d:326:VAL:HG11	1.75	0.68
10:ae:549:THR:HG22	10:ae:550:LEU:H	1.58	0.68
12:ag:558:LEU:HD12	38:l:17:LEU:HG	1.76	0.68
21:aa:499:PRO:O	21:aa:511:ASN:ND2	2.25	0.68
21:aa:1110:SER:O	21:aa:1114:ARG:N	2.24	0.68
24:ac:939:ARG:HE	24:ac:945:ILE:HB	1.58	0.68
27:ao:109:ILE:O	27:ao:131:PHE:N	2.26	0.68
32:y:202:ARG:NH2	32:y:205:GLU:OE2	2.26	0.68
36:p:191:GLN:O	36:p:194:GLN:NE2	2.27	0.68
62:I:153:ARG:NH2	1:1:543:U:O4	2.23	0.68
77:X:372:ARG:NH2	96:Ao:98:THR:O	2.27	0.68
118:BL:251:GLU:OE1	118:BL:372:TRP:N	2.27	0.68
118:BL:305:HIS:HD2	1:1:654:A:H5''	1.59	0.68
1:2:131:U:H2'	1:2:150:A:N6	2.07	0.68
1:2:150:A:H4'	1:2:151:A:OP1	1.94	0.68
1:2:335:U:H6	1:2:335:U:C5'	2.02	0.68
1:2:481:U:N1	2:h:90:ALA:CB	2.55	0.68
1:2:525:A:OP2	5:f:27:ARG:CB	2.41	0.68
1:2:557:C:O2'	1:2:558:U:H5'	1.92	0.68
9:n:132:ARG:NH1	22:ab:1120:HIS:O	2.24	0.68
21:aa:1093:ARG:NH1	50:a:431:HIS:O	2.27	0.68
52:z:566:LEU:HD21	52:z:575:LYS:HE3	1.76	0.68
61:H:58:MET:HG2	61:H:115:LYS:HG2	1.75	0.68
64:K:114:CYS:HG	95:Aa:85:SER:HG	1.42	0.68
77:X:247:ALA:HB1	77:X:253:HIS:HB2	1.76	0.68
81:UA:190:UNK:O	81:UA:194:UNK:N	2.27	0.68
84:Bj:109:ARG:NH1	90:BC:130:ASP:O	2.27	0.68
85:An:289:LEU:HA	85:An:292:VAL:HG12	1.74	0.68
96:Ao:71:ARG:NH2	1:1:351:U:OP1	2.23	0.68
96:Ao:275:ALA:H	96:Ao:280:ASN:HD22	1.39	0.68
102:Aq:120:PHE:CD2	102:Aq:133:ILE:HG22	2.28	0.68

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
112:Ac:59:VAL:HB	112:Ac:165:LEU:HB3	1.75	0.68
113:Ah:126:PHE:O	113:Ah:167:ARG:NH2	2.27	0.68
1:1:47:A:N6	1:1:130:U:O4	2.26	0.68
1:2:44:A:C4'	29:aq:24:LYS:C	2.66	0.67
1:2:44:A:O4'	29:aq:24:LYS:CA	2.24	0.67
1:2:108:A:C8	39:ar:22:ASN:CG	2.72	0.67
1:2:304:U:H5'	1:2:304:U:H6	1.56	0.67
4:m:11:ALA:HB2	28:ap:236:ARG:HG3	1.76	0.67
19:af:539:GLN:OE1	19:af:541:ARG:NH2	2.27	0.67
28:ap:202:PRO:HD3	41:ai:257:TYR:HE2	1.60	0.67
38:l:149:LEU:HD12	38:l:242:LEU:HD22	1.75	0.67
58:E:319:GLU:HB3	58:E:323:ARG:HH22	1.57	0.67
82:BB:121:VAL:HG12	103:BE:56:HIS:NE2	2.10	0.67
83:Aw:123:ARG:NH1	106:Ad:123:SER:O	2.26	0.67
1:2:256:U:C4'	1:2:257:U:H5'	2.16	0.67
1:2:280:A:C8	1:2:322:A:P	2.87	0.67
1:2:512:G:C2'	16:az:141:VAL:HG23	2.24	0.67
2:h:108:VAL:HG21	2:h:118:MET:HG2	1.76	0.67
3:aw:61:VAL:HG22	14:e:759:VAL:HG22	1.76	0.67
8:am:124:ASP:O	8:am:165:GLN:NE2	2.28	0.67
22:ab:711:VAL:HA	22:ab:726:SER:HA	1.75	0.67
24:ac:863:ARG:NH2	24:ac:886:THR:OG1	2.26	0.67
25:ad:679:PRO:O	45:o:472:ARG:NH1	2.27	0.67
27:ao:121:GLN:HG3	27:ao:159:SER:HB3	1.76	0.67
62:I:84:ILE:HG21	107:BF:12:PHE:HB2	1.76	0.67
79:Z:76:ARG:HH21	79:Z:80:ARG:NH1	1.92	0.67
85:An:46:GLN:HB2	116:Ag:14:PRO:HD3	1.76	0.67
110:As:115:LYS:NZ	110:As:116:GLU:OE1	2.26	0.67
119:BO:47:TRP:HE3	119:BO:57:GLY:HA2	1.60	0.67
1:1:542:G:O2'	1:1:596:U:O2	2.11	0.67
1:1:638:C:H42	1:1:800:A:H61	1.42	0.67
1:2:177:U:O2'	33:w:64:VAL:HB	1.94	0.67
1:2:436:U:O3'	2:h:13:ILE:HG23	1.95	0.67
4:m:37:LYS:HD3	8:am:190:GLU:HB3	1.77	0.67
14:e:316:ARG:O	20:u:654:ARG:NH2	2.27	0.67
15:d:130:THR:HG22	15:d:132:ALA:H	1.59	0.67
20:u:769:TYR:O	20:u:775:ASN:ND2	2.26	0.67
26:an:27:GLN:NE2	52:z:991:SER:O	2.26	0.67
38:l:481:ARG:HB3	38:l:484:GLU:HG2	1.76	0.67
52:z:1047:GLU:HA	52:z:1051:PHE:HB2	1.75	0.67
62:I:61:ARG:NH1	1:1:598:U:OP2	2.27	0.67

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
62:I:235:TRP:HB3	1:1:596:U:O4	1.94	0.67
69:P:123:ARG:NH2	100:BH:226:GLN:OE1	2.26	0.67
72:S:270:SER:O	72:S:274:ASN:ND2	2.26	0.67
80:BA:23:TYR:O	80:BA:25:ALA:N	2.27	0.67
83:Aw:176:VAL:HG12	83:Aw:178:ASP:H	1.59	0.67
85:An:22:ARG:HH21	1:1:286:G:H22	1.42	0.67
113:Ah:135:LEU:HA	113:Ah:138:ASP:HB2	1.76	0.67
1:2:36:G:C8	33:w:130:LYS:HD3	2.30	0.67
1:2:88:U:H5''	47:k:158:HIS:CE1	2.29	0.67
1:2:113:U:H2'	1:2:114:U:H5'	1.74	0.67
1:2:175:U:H4'	1:2:176:U:OP2	1.94	0.67
1:2:315:A:H3'	1:2:316:A:H8	1.57	0.67
1:2:420:U:O4'	10:ae:181:ARG:NH2	2.23	0.67
1:2:436:U:N1	6:s:154:VAL:HG22	2.09	0.67
1:2:497:A:C5'	3:aw:4:ALA:N	2.57	0.67
1:2:572:A:H4'	1:2:573:A:OP1	1.94	0.67
14:e:541:VAL:HB	14:e:598:GLU:HB3	1.75	0.67
21:aa:1645:GLU:O	21:aa:1649:SER:OG	2.10	0.67
22:ab:302:GLN:HE22	22:ab:323:VAL:HA	1.59	0.67
22:ab:826:TYR:O	22:ab:829:THR:OG1	2.10	0.67
25:ad:760:LYS:HG2	25:ad:764:ARG:HH11	1.59	0.67
29:aq:37:GLN:HB2	29:aq:40:HIS:HB2	1.75	0.67
29:aq:98:TYR:HA	29:aq:102:HIS:HB2	1.77	0.67
62:I:42:GLU:HB3	62:I:45:MET:HG3	1.77	0.67
103:BE:56:HIS:HD2	103:BE:57:THR:N	1.93	0.67
104:Ak:28:GLU:N	104:Ak:28:GLU:OE1	2.27	0.67
1:2:107:A:C3'	43:i:363:TYR:OH	2.42	0.67
1:2:147:U:H4'	1:2:148:U:OP1	1.95	0.67
1:2:418:A:N7	13:aj:54:PRO:C	2.52	0.67
8:am:195:THR:HG21	36:p:116:PHE:HE1	1.60	0.67
12:ag:211:VAL:HG11	22:ab:414:PHE:HE1	1.59	0.67
12:ag:212:LYS:HB3	38:l:644:ARG:NH2	2.08	0.67
14:e:262:ASP:OD1	22:ab:1019:ARG:NH2	2.27	0.67
14:e:313:GLY:H	20:u:630:LEU:HA	1.59	0.67
21:aa:871:ASP:OD1	27:ao:187:GLN:NE2	2.24	0.67
24:ac:930:ASP:O	24:ac:934:PHE:N	2.20	0.67
38:l:435:ARG:HG3	38:l:439:GLN:HE22	1.60	0.67
39:ar:151:GLN:O	39:ar:155:ASP:N	2.19	0.67
53:bd:51:ILE:HG23	53:bd:62:ILE:HD13	1.76	0.67
87:BI:239:VAL:O	87:BI:243:ILE:N	2.23	0.67
100:BH:123:HIS:O	100:BH:148:ARG:NH1	2.28	0.67

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
103:BE:72:ASN:HB3	111:Ae:132:HIS:HA	1.77	0.67
115:Ay:62:CYS:HB3	115:Ay:84:ARG:HD2	1.77	0.67
1:1:463:U:N3	1:1:466:U:OP2	2.18	0.67
1:2:396:A:N6	5:f:24:LYS:HB3	2.10	0.67
1:2:484:A:C5	9:n:102:ARG:HD3	2.28	0.67
21:aa:1260:GLU:HA	21:aa:1263:LYS:HD3	1.76	0.67
25:ad:247:VAL:HG13	25:ad:248:ASP:H	1.58	0.67
25:ad:725:PRO:O	48:q:96:GLN:NE2	2.27	0.67
54:A:283:ARG:HD2	1:1:840:A:H5'	1.77	0.67
57:D:23:ARG:HD3	101:Am:176:GLU:HB2	1.76	0.67
91:Ab:240:ARG:NH2	96:Ao:258:PHE:O	2.23	0.67
100:BH:58:ASN:HD22	100:BH:111:PHE:HE1	1.42	0.67
105:BP:170:ASN:HB2	105:BP:172:MET:HE3	1.77	0.67
113:Ah:435:TRP:HB2	113:Ah:452:MET:HG3	1.77	0.67
118:BL:355:GLN:NE2	1:1:664:C:OP2	2.27	0.67
1:1:99:A:H4'	1:1:100:A:H5'	1.76	0.67
1:1:426:G:HO2'	1:1:427:U:P	2.17	0.67
1:2:303:G:C5	1:2:304:U:C5	2.83	0.67
1:2:396:A:C8	1:2:529:A:H1'	2.30	0.67
1:2:418:A:C5	13:aj:54:PRO:HA	2.29	0.67
1:2:480:A:C2	2:h:21:HIS:NE2	2.62	0.67
1:2:506:U:OP2	9:n:77:LYS:CE	2.40	0.67
12:ag:138:ILE:HA	12:ag:142:GLU:HG2	1.77	0.67
12:ag:309:TYR:HE2	12:ag:342:VAL:HG21	1.59	0.67
21:aa:1249:ARG:HD3	21:aa:1301:GLU:HG3	1.76	0.67
24:ac:957:LEU:HD12	24:ac:961:GLY:HA2	1.76	0.67
62:I:131:GLU:OE2	62:I:135:ARG:NH1	2.28	0.67
69:P:51:ARG:HD2	69:P:76:THR:HA	1.77	0.67
83:Aw:159:VAL:HG12	99:Aj:432:LEU:HD13	1.77	0.67
86:Al:38:VAL:HG22	86:Al:38:VAL:O	1.95	0.67
93:Ap:37:ASN:ND2	110:As:99:GLU:OE2	2.28	0.67
104:Ak:263:GLU:HA	104:Ak:266:ASP:HB2	1.76	0.67
109:Af:57:PRO:HB2	109:Af:60:PHE:HB2	1.77	0.67
118:BL:72:ARG:NH2	118:BL:73:SER:OG	2.28	0.67
119:BO:104:GLN:C	119:BO:105:ARG:HD3	2.19	0.67
1:1:433:G:O2'	1:1:434:U:O5'	2.13	0.67
1:2:283:U:H6	43:i:247:ILE:HD13	1.27	0.67
1:2:302:A:N3	1:2:303:G:C6	2.62	0.67
1:2:432:G:O2'	10:ae:13:THR:HG23	1.94	0.67
12:ag:82:LEU:HD23	12:ag:88:ARG:HB2	1.77	0.67
12:ag:366:ASP:OD1	12:ag:369:ARG:NH2	2.28	0.67

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
21:aa:122:ARG:NH2	25:ad:40:MET:SD	2.67	0.67
38:l:321:LEU:HD12	38:l:327:ASN:HB3	1.76	0.67
82:BB:17:HIS:ND1	1:1:1118:G:O2'	2.27	0.67
88:Az:150:MET:HE1	89:At:75:SER:HB3	1.74	0.67
90:BC:59:GLY:O	90:BC:63:ASN:ND2	2.28	0.67
96:Ao:257:LYS:HD3	96:Ao:265:VAL:HG22	1.77	0.67
113:Ah:362:GLU:O	113:Ah:366:ALA:N	2.26	0.67
119:BO:117:ARG:NH2	119:BO:119:ARG:O	2.27	0.67
1:2:109:U:H5'	1:2:109:U:H6	1.59	0.67
1:2:181:U:OP1	33:w:101:ARG:O	2.11	0.67
1:2:240:G:H5'	1:2:240:G:C8	2.30	0.67
1:2:437:U:OP1	2:h:14:GLY:N	2.28	0.67
1:2:439:A:OP2	6:s:135:LYS:HE3	1.95	0.67
1:2:588:U:O2'	1:2:589:G:H5'	1.93	0.67
2:h:109:PRO:HB3	14:e:808:VAL:HG13	1.76	0.67
11:ay:89:ARG:HE	16:az:163:LYS:HE2	1.58	0.67
19:af:732:PHE:HA	19:af:735:TRP:HD1	1.60	0.67
26:an:30:ARG:O	26:an:34:TYR:N	2.20	0.67
31:at:358:THR:HG22	35:t:232:PRO:HG3	1.77	0.67
56:C:63:ARG:HH12	89:At:82:ARG:HD3	1.58	0.67
67:N:167:ILE:HG12	67:N:222:VAL:HG22	1.77	0.67
86:Al:254:ASP:N	86:Al:258:GLU:OE2	2.28	0.67
100:BH:79:THR:HG21	100:BH:95:ILE:HD12	1.76	0.67
111:Ae:50:MET:SD	111:Ae:54:ASN:ND2	2.68	0.67
119:BO:68:CYS:SG	119:BO:76:HIS:ND1	2.67	0.67
1:1:955:U:H5	1:1:970:A:N6	1.92	0.67
1:2:106:U:H6	1:2:106:U:C5'	2.00	0.67
1:2:243:A:N1	8:am:25:VAL:CG2	2.48	0.67
1:2:276:U:H2'	1:2:360:A:N3	2.10	0.67
1:2:396:A:C6	1:2:529:A:O4'	2.47	0.67
1:2:574:C:C2'	1:2:575:G:H5'	2.25	0.67
1:2:614:U:C2'	1:2:615:U:H5''	2.25	0.67
9:n:87:ASN:OD1	9:n:104:VAL:N	2.26	0.67
21:aa:407:LYS:O	21:aa:411:LEU:N	2.28	0.67
21:aa:1239:ARG:HG3	21:aa:1272:GLU:HG2	1.77	0.67
24:ac:1242:ARG:CZ	24:ac:1246:ARG:HE	2.08	0.67
56:C:71:TYR:OH	116:Ag:107:ARG:O	2.12	0.67
78:Y:74:TYR:OH	90:BC:7:ARG:NH2	2.28	0.67
85:An:29:LYS:HZ1	1:1:229:A:H5''	1.58	0.67
111:Ae:19:CYS:HG	1:1:1147:A:HO2'	1.43	0.67
112:Ac:188:ARG:NH2	112:Ac:192:GLU:O	2.28	0.67

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
113:Ah:420:LEU:O	113:Ah:424:THR:OG1	2.08	0.67
118:BL:128:VAL:O	118:BL:128:VAL:HG23	1.93	0.67
119:BO:103:VAL:HB	119:BO:105:ARG:HB3	1.77	0.67
1:1:1077:G:H22	1:1:1090:U:H3	1.41	0.67
1:2:278:A:C2	1:2:330:U:O2	2.48	0.66
1:2:419:A:OP2	1:2:419:A:C8	2.48	0.66
1:2:448:U:C6	2:h:123:ARG:HB2	2.29	0.66
1:2:529:A:C2	5:f:23:GLU:OE2	2.48	0.66
19:af:444:LEU:O	19:af:448:THR:OG1	2.11	0.66
21:aa:333:ARG:NH2	21:aa:334:LYS:O	2.27	0.66
21:aa:565:GLU:HA	21:aa:569:MET:HE2	1.76	0.66
40:av:121:GLU:O	40:av:125:GLN:N	2.27	0.66
54:A:73:ASN:ND2	101:Am:246:GLU:OE1	2.27	0.66
61:H:6:LEU:O	61:H:7:ARG:NH1	2.28	0.66
74:U:25:PHE:HB2	1:1:933:G:N3	2.09	0.66
82:BB:31:ILE:O	82:BB:35:GLU:N	2.27	0.66
85:An:48:HIS:CG	85:An:49:SER:N	2.63	0.66
104:Ak:12:LEU:HD13	104:Ak:87:MET:HE3	1.77	0.66
106:Ad:170:VAL:HG21	106:Ad:223:LEU:HG	1.77	0.66
114:BD:3:ASN:OD1	114:BD:4:ARG:N	2.28	0.66
119:BO:172:ARG:O	119:BO:172:ARG:HG3	1.93	0.66
1:1:218:A:N6	1:1:319:A:O2'	2.28	0.66
1:1:361:A:H3'	1:1:362:A:H5''	1.75	0.66
1:1:829:U:H2'	1:1:830:A:H8	1.61	0.66
1:1:1018:A:H62	1:1:1070:C:N4	1.93	0.66
1:2:471:A:C4'	12:ag:18:ILE:HD11	2.25	0.66
1:2:486:A:OP1	1:2:486:A:C8	2.44	0.66
6:s:130:ILE:HA	6:s:133:MET:HE2	1.76	0.66
20:u:358:ILE:HG22	20:u:359:VAL:HG13	1.76	0.66
21:aa:566:GLU:HB2	21:aa:597:VAL:HG21	1.77	0.66
38:l:139:LYS:HG3	38:l:141:GLU:H	1.60	0.66
46:c:212:LYS:NZ	46:c:216:ASP:OD2	2.28	0.66
59:F:14:TRP:NE1	59:F:50:ASP:OD2	2.26	0.66
68:O:306:ASN:HD21	88:Az:53:HIS:HB3	1.59	0.66
71:R:167:HIS:CD2	71:R:169:GLY:H	2.13	0.66
97:BM:76:TYR:OH	97:BM:323:ARG:O	2.13	0.66
102:Aq:95:HIS:CD2	102:Aq:96:PRO:HD2	2.30	0.66
114:BD:31:ASN:HD21	114:BD:34:LEU:HG	1.59	0.66
1:1:611:A:H61	1:1:809:A:H5'	1.60	0.66
1:1:890:U:O2	1:1:921:G:N2	2.28	0.66
1:2:39:U:C2	29:aq:10:ALA:N	2.60	0.66

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:526:A:H1'	15:d:329:ARG:NE	2.11	0.66
14:e:313:GLY:N	20:u:629:VAL:HG13	2.11	0.66
20:u:139:ASP:OD2	22:ab:884:ARG:NH2	2.28	0.66
20:u:719:ARG:O	20:u:775:ASN:ND2	2.28	0.66
22:ab:140:ARG:H	22:ab:140:ARG:HD2	1.59	0.66
22:ab:351:GLN:H	22:ab:363:ARG:HH12	1.44	0.66
24:ac:760:ARG:HD2	24:ac:823:GLY:HA3	1.77	0.66
38:l:75:HIS:HA	38:l:79:ARG:HE	1.60	0.66
41:ai:175:GLU:OE1	41:ai:175:GLU:N	2.27	0.66
43:i:318:VAL:HG22	43:i:319:LEU:HG	1.76	0.66
64:K:108:ARG:HH22	95:Aa:89:ARG:HB3	1.59	0.66
72:S:355:LYS:NZ	1:1:358:A:OP2	2.25	0.66
78:Y:54:VAL:HG11	92:Ai:158:LEU:HB3	1.77	0.66
91:Ab:260:PRO:HG2	98:Ar:72:PRO:HB3	1.75	0.66
92:Ai:222:PRO:HG3	92:Ai:446:LEU:HD11	1.76	0.66
95:Aa:192:LEU:HB3	1:1:146:U:H3	1.60	0.66
97:BM:134:LYS:O	97:BM:271:ARG:NH2	2.27	0.66
101:Am:260:TRP:CD1	101:Am:268:LYS:HA	2.31	0.66
1:1:55:A:N6	1:1:122:U:H3	1.92	0.66
1:2:14:A:OP2	50:a:261:ASN:O	2.12	0.66
1:2:18:A:C2	1:2:19:U:C6	2.84	0.66
4:m:103:ARG:NH1	36:p:110:MET:O	2.28	0.66
9:n:142:LEU:HD22	11:ay:54:LEU:HD21	1.77	0.66
16:az:145:ARG:O	16:az:148:ARG:NH2	2.27	0.66
18:r:188:LEU:HA	18:r:191:TRP:HB3	1.75	0.66
22:ab:1011:ASP:HA	22:ab:1014:ARG:HB2	1.76	0.66
24:ac:248:TRP:NE1	24:ac:586:TYR:O	2.23	0.66
24:ac:687:GLU:N	38:l:317:PRO:HA	2.10	0.66
27:ao:171:TYR:HD1	27:ao:174:LEU:HD12	1.59	0.66
34:v:107:MET:HE3	34:v:114:CYS:HB2	1.77	0.66
38:l:267:LEU:HB2	38:l:307:ALA:HB2	1.76	0.66
49:b:146:LYS:HE3	52:z:584:THR:HG21	1.78	0.66
50:a:217:ILE:HG21	50:a:274:GLU:HG3	1.76	0.66
60:G:157:VAL:HG21	75:V:58:LEU:HD12	1.77	0.66
63:J:48:HIS:ND1	63:J:48:HIS:O	2.28	0.66
91:Ab:122:GLY:O	91:Ab:124:ARG:NH1	2.28	0.66
1:1:137:U:H2'	1:1:137:U:O2	1.94	0.66
1:1:554:G:C8	1:1:573:A:H2'	2.31	0.66
1:1:639:A:H61	1:1:799:A:H61	1.42	0.66
1:1:975:U:O2	1:1:975:U:C2'	2.40	0.66
1:2:44:A:H4'	29:aq:24:LYS:C	2.21	0.66

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:383:A:O2'	50:a:153:LYS:HB2	1.94	0.66
1:2:425:A:H2	13:aj:266:LYS:HG2	1.54	0.66
1:2:459:A:H4'	1:2:460:A:OP2	1.96	0.66
1:2:548:C:H5''	1:2:548:C:H6	1.60	0.66
12:ag:354:THR:O	12:ag:361:ARG:NH1	2.28	0.66
15:d:17:LEU:H	44:g:142:GLN:HG3	1.58	0.66
24:ac:251:ASP:HB2	24:ac:589:PRO:HG3	1.77	0.66
24:ac:300:THR:HG21	24:ac:547:GLN:HE21	1.60	0.66
24:ac:1210:ALA:HB1	24:ac:1225:ALA:H	1.61	0.66
45:o:370:ARG:O	50:a:311:LYS:NZ	2.18	0.66
47:k:133:HIS:HB2	47:k:157:LYS:HE3	1.77	0.66
49:b:6:LEU:HB2	49:b:67:LEU:HB2	1.77	0.66
55:B:62:TYR:OH	55:B:213:LEU:O	2.13	0.66
55:B:194:LYS:HE2	55:B:194:LYS:O	1.95	0.66
58:E:307:ARG:CZ	58:E:325:LEU:HD13	2.26	0.66
64:K:75:SER:HB2	95:Aa:87:THR:HG21	1.76	0.66
66:M:18:ARG:NH1	1:1:179:U:OP2	2.29	0.66
68:O:263:ASP:O	71:R:41:ARG:NH2	2.28	0.66
70:Q:119:GLN:OE1	113:Ah:68:ILE:HD11	1.95	0.66
71:R:377:PRO:HB3	88:Az:52:VAL:HG11	1.77	0.66
85:An:192:THR:OG1	113:Ah:138:ASP:OD1	2.13	0.66
86:Al:216:SER:OG	86:Al:220:GLU:OE2	2.13	0.66
92:Ai:217:LEU:HA	102:Aq:136:ARG:HH12	1.60	0.66
97:BM:218:LEU:O	97:BM:221:ARG:NE	2.29	0.66
100:BH:59:PHE:HB2	100:BH:130:MET:HE1	1.77	0.66
102:Aq:174:ARG:O	102:Aq:176:ARG:N	2.29	0.66
118:BL:188:THR:HA	118:BL:278:ARG:O	1.96	0.66
1:1:143:A:C8	1:1:144:U:H5	2.14	0.66
1:1:843:A:H62	1:1:852:A:N6	1.93	0.66
1:2:14:A:P	50:a:259:SER:O	2.54	0.66
1:2:37:U:O2'	1:2:173:A:C6	2.46	0.66
1:2:40:U:HO2'	1:2:41:U:H5	0.67	0.66
1:2:55:G:C5'	1:2:152:G:N1	2.55	0.66
1:2:65:U:N3	1:2:66:U:C5	2.64	0.66
1:2:130:U:H6	1:2:130:U:O5'	1.78	0.66
1:2:200:A:C8	31:at:228:HIS:ND1	2.62	0.66
1:2:383:A:C2'	50:a:153:LYS:CB	2.62	0.66
1:2:419:A:H3'	10:ae:181:ARG:CG	2.18	0.66
1:2:499:A:N1	11:ay:132:THR:CB	2.39	0.66
1:2:513:U:C4'	16:az:145:ARG:HE	2.08	0.66
1:2:528:A:H3'	4:m:270:ARG:NH2	2.11	0.66

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
7:au:131:ASP:OD2	23:ak:4:ARG:NH2	2.28	0.66
12:ag:84:SER:HA	12:ag:88:ARG:HE	1.59	0.66
18:r:258:ASN:ND2	18:r:327:THR:O	2.27	0.66
33:w:48:PRO:HB2	33:w:53:PRO:HA	1.76	0.66
57:D:33:ARG:NH1	57:D:41:CYS:SG	2.68	0.66
60:G:282:ARG:NH1	116:Ag:155:MET:SD	2.69	0.66
71:R:398:ASN:HB3	1:1:62:U:C4	2.31	0.66
75:V:120:ALA:HB2	1:1:91:U:C5	2.30	0.66
104:Ak:173:TYR:CZ	104:Ak:175:ALA:HB3	2.31	0.66
1:1:864:A:N6	1:1:865:A:N1	2.43	0.66
1:2:51:A:H8	1:2:149:A:C4	2.13	0.66
1:2:436:U:P	6:s:154:VAL:HG13	2.35	0.66
9:n:160:ARG:HH21	9:n:171:LYS:HE3	1.61	0.66
19:af:211:CYS:O	19:af:242:ARG:NH1	2.29	0.66
21:aa:220:LYS:NZ	45:o:422:GLN:OE1	2.28	0.66
24:ac:203:ARG:O	24:ac:207:GLN:NE2	2.26	0.66
32:y:127:LEU:HB2	32:y:278:GLU:OE2	1.95	0.66
38:l:99:GLN:HA	38:l:102:MET:HE3	1.77	0.66
81:UA:40:UNK:HA	117:Ax:188:ASN:HD21	1.61	0.66
119:BO:72:THR:HG21	119:BO:162:LEU:HD23	1.75	0.66
1:2:383:A:C1'	50:a:153:LYS:HB2	2.25	0.66
1:2:413:U:H5'	2:h:10:MET:SD	2.35	0.66
1:2:435:U:H5'	6:s:156:ASN:O	1.94	0.66
1:2:439:A:H2'	6:s:131:TYR:OH	1.95	0.66
7:au:75:ARG:HG3	24:ac:101:LEU:HD13	1.78	0.66
21:aa:393:ARG:NH1	21:aa:431:THR:O	2.28	0.66
22:ab:567:ARG:NH2	22:ab:608:THR:O	2.29	0.66
54:A:254:ARG:NH2	1:1:1107:A:OP1	2.28	0.66
63:J:57:PRO:HG3	63:J:115:VAL:HG12	1.78	0.66
71:R:272:ARG:HH12	71:R:286:GLN:HE22	1.44	0.66
84:Bj:139:LYS:HE3	112:Ac:40:HIS:CE1	2.31	0.66
98:Ar:70:TYR:OH	98:Ar:75:GLU:OE1	2.13	0.66
110:As:68:PRO:HA	110:As:138:ARG:HH22	1.60	0.66
113:Ah:182:ARG:NH2	113:Ah:197:VAL:O	2.29	0.66
1:1:39:U:H1'	1:1:40:C:OP1	1.96	0.66
1:2:27:U:H5''	1:2:27:U:H6	1.58	0.66
1:2:464:U:OP2	8:am:295:ARG:O	2.14	0.66
1:2:471:A:P	13:aj:12:TYR:H	2.18	0.66
1:2:481:U:N1	2:h:90:ALA:HB2	2.10	0.66
1:2:504:A:H5''	6:s:81:ASN:HD22	1.58	0.66
10:ae:486:ARG:HH12	12:ag:124:HIS:HE1	1.43	0.66

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
11:ay:53:TYR:HA	17:ax:18:LEU:HD21	1.78	0.66
21:aa:193:HIS:HB2	48:q:71:VAL:HG11	1.78	0.66
21:aa:585:SER:HG	21:aa:586:TRP:CD1	2.14	0.66
21:aa:937:GLU:O	21:aa:941:ARG:NE	2.28	0.66
21:aa:1489:VAL:O	21:aa:1603:ARG:NH1	2.27	0.66
33:w:76:THR:O	33:w:94:ARG:NH1	2.28	0.66
38:l:518:SER:O	38:l:521:ARG:NH1	2.29	0.66
43:i:181:TYR:HE2	48:q:142:LEU:HD13	1.59	0.66
46:c:162:ARG:NH2	52:z:119:GLN:O	2.29	0.66
54:A:325:ASP:HA	62:I:28:ASP:HB3	1.77	0.66
59:F:161:GLN:HA	59:F:161:GLN:NE2	2.08	0.66
69:P:98:TYR:HE2	98:Ar:15:LEU:HA	1.60	0.66
1:1:204:U:H3'	1:1:204:U:OP2	1.95	0.66
1:1:209:U:P	1:1:209:U:O4'	2.54	0.66
1:1:305:U:OP1	1:1:308:C:N4	2.29	0.66
1:2:68:A:C5'	37:j:22:TRP:CE2	2.79	0.66
1:2:108:A:C2	40:av:131:GLN:CB	2.68	0.66
1:2:122:U:C5	43:i:293:VAL:HG11	1.97	0.66
1:2:508:G:O6	11:ay:164:THR:HB	1.95	0.66
4:m:82:PHE:HB2	8:am:197:LEU:HD21	1.78	0.66
7:au:225:ASP:HB3	7:au:228:LEU:HG	1.78	0.66
22:ab:692:TYR:N	22:ab:801:GLU:OE2	2.28	0.66
22:ab:703:ALA:HB2	22:ab:781:ARG:HG3	1.76	0.66
22:ab:1082:HIS:O	22:ab:1087:ASN:ND2	2.28	0.66
25:ad:501:THR:HG23	25:ad:503:PRO:HD2	1.76	0.66
39:ar:64:PRO:HB3	40:av:57:THR:HG23	1.78	0.66
52:z:783:GLN:HG2	52:z:787:GLN:HE21	1.61	0.66
61:H:137:GLU:HG2	108:Av:166:ILE:HG21	1.78	0.66
77:X:496:TRP:HZ3	106:Ad:65:ILE:CD1	2.09	0.66
97:BM:86:LEU:O	97:BM:90:GLN:N	2.29	0.66
111:Ae:170:HIS:ND1	111:Ae:284:ASP:OD2	2.26	0.66
118:BL:172:LEU:HB2	118:BL:185:GLU:HB3	1.77	0.66
1:1:663:U:H3	1:1:674:U:H3	1.44	0.66
1:2:414:C:C5	6:s:155:LEU:HB2	2.31	0.65
1:2:471:A:O2'	12:ag:18:ILE:CG1	2.44	0.65
10:ae:204:ARG:NH1	14:e:568:GLU:OE1	2.29	0.65
21:aa:165:ARG:NH2	48:q:96:GLN:OE1	2.29	0.65
28:ap:18:THR:HG21	28:ap:85:LEU:HD11	1.77	0.65
38:l:133:VAL:HG13	38:l:146:LYS:HE3	1.78	0.65
61:H:40:ASN:OD1	61:H:41:GLU:N	2.29	0.65
69:P:130:VAL:HG12	69:P:132:GLY:H	1.61	0.65

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
71:R:400:PRO:HB3	1:1:62:U:H5'	1.77	0.65
78:Y:114:GLU:O	112:Ac:36:GLN:NE2	2.29	0.65
84:Bj:137:ARG:NH1	112:Ac:191:ASP:OD2	2.29	0.65
92:Ai:295:ILE:HG22	92:Ai:296:HIS:H	1.60	0.65
106:Ad:31:LEU:HB3	106:Ad:36:ASP:CG	2.20	0.65
1:2:475:U:O4	6:s:142:ARG:NH2	2.29	0.65
1:2:495:U:H6	3:aw:30:LYS:HB3	0.58	0.65
1:2:495:U:OP1	3:aw:1:MET:HE1	1.95	0.65
1:2:532:U:C5	16:az:76:ARG:NE	2.64	0.65
28:ap:24:HIS:HB3	28:ap:27:PHE:HB2	1.78	0.65
30:as:25:SER:OG	39:ar:40:ASP:OD2	2.14	0.65
77:X:265:SER:HB2	77:X:337:HIS:ND1	2.11	0.65
77:X:498:ARG:HH11	77:X:498:ARG:CG	2.05	0.65
78:Y:119:ASN:ND2	112:Ac:215:TRP:O	2.25	0.65
79:Z:50:PRO:HD2	79:Z:53:MET:HE3	1.78	0.65
93:Ap:97:ARG:HH22	120:BG:1333:ILE:HD13	1.61	0.65
94:Au:92:VAL:C	94:Au:94:LYS:H	2.04	0.65
99:Aj:276:LEU:HD13	99:Aj:287:ILE:HG22	1.78	0.65
117:Ax:203:ARG:O	117:Ax:204:HIS:CB	2.44	0.65
118:BL:141:TRP:CD1	118:BL:141:TRP:O	2.49	0.65
1:1:661:G:H1	1:1:676:U:H3	1.44	0.65
1:1:691:G:N2	1:1:709:U:O2	2.29	0.65
1:2:289:A:C2'	1:2:290:C:O5'	2.45	0.65
1:2:303:G:H8	1:2:303:G:P	2.18	0.65
1:2:436:U:OP2	6:s:154:VAL:HG22	1.96	0.65
1:2:507:A:C8	3:aw:28:LEU:CD1	2.80	0.65
1:2:514:U:OP2	16:az:15:ARG:NH2	2.29	0.65
7:au:223:LEU:HG	7:au:232:ARG:HH22	1.62	0.65
8:am:75:GLU:HB3	45:o:243:LEU:HD22	1.78	0.65
12:ag:259:HIS:HA	14:e:291:SER:HB3	1.77	0.65
24:ac:269:VAL:HG11	24:ac:275:LEU:HB2	1.78	0.65
25:ad:551:ALA:O	25:ad:553:GLN:NE2	2.29	0.65
38:l:72:ARG:NH2	38:l:507:TYR:O	2.29	0.65
41:ai:69:HIS:O	41:ai:73:ASP:N	2.23	0.65
70:Q:50:ASN:OD1	1:1:100:A:O2'	2.14	0.65
73:T:46:HIS:CE1	1:1:861:A:H8	2.14	0.65
84:Bj:146:CYS:HB3	84:Bj:156:PRO:HA	1.77	0.65
85:An:110:PHE:CZ	85:An:114:VAL:HG21	2.31	0.65
85:An:115:LEU:HD11	85:An:217:ARG:HA	1.78	0.65
117:Ax:203:ARG:O	117:Ax:204:HIS:CG	2.49	0.65
1:1:41:A:N6	1:1:137:U:OP1	2.28	0.65

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:25:U:H2'	1:2:26:U:H5'	1.79	0.65
1:2:47:U:P	29:aq:13:ARG:CD	2.81	0.65
1:2:88:U:H6	1:2:88:U:O5'	1.80	0.65
1:2:169:U:O3'	37:j:17:LYS:HB3	1.97	0.65
1:2:279:U:C4	1:2:328:A:N6	2.59	0.65
1:2:436:U:OP2	1:2:436:U:C6	2.48	0.65
1:2:503:A:N1	14:e:717:THR:C	2.55	0.65
1:2:598:A:H8	1:2:598:A:O5'	1.79	0.65
1:2:614:U:H2'	1:2:615:U:C5'	2.26	0.65
2:h:11:ARG:HD2	10:ae:6:VAL:HG22	1.79	0.65
2:h:109:PRO:O	2:h:112:ASN:ND2	2.30	0.65
4:m:79:GLU:OE1	8:am:237:TRP:NE1	2.28	0.65
8:am:32:THR:HG22	8:am:34:GLY:H	1.60	0.65
13:aj:27:GLN:H	53:bd:74:ASN:HD21	1.43	0.65
14:e:234:ASP:O	14:e:336:GLN:NE2	2.26	0.65
22:ab:633:ARG:NH2	22:ab:812:LEU:O	2.29	0.65
24:ac:715:TRP:HH2	24:ac:870:ASP:HB2	1.62	0.65
45:o:386:ARG:O	45:o:389:GLN:NE2	2.30	0.65
54:A:166:HIS:NE2	54:A:220:ALA:O	2.29	0.65
54:A:391:GLN:HG2	119:BO:176:HIS:CE1	2.32	0.65
85:An:166:ASN:O	118:BL:152:GLN:NE2	2.29	0.65
90:BC:56:LEU:O	90:BC:104:ARG:NH1	2.28	0.65
110:As:110:ASP:OD1	110:As:111:GLU:N	2.30	0.65
111:Ae:55:HIS:HD2	111:Ae:57:LYS:H	1.45	0.65
119:BO:80:ILE:HG22	119:BO:100:ARG:HB3	1.78	0.65
119:BO:172:ARG:CZ	119:BO:172:ARG:HB2	2.27	0.65
1:2:3:C:H5	25:ad:103:PHE:HB3	1.61	0.65
1:2:49:A:O3'	37:j:11:ARG:HD3	1.96	0.65
1:2:180:A:H2	33:w:87:SER:CB	2.09	0.65
1:2:410:A:OP1	1:2:410:A:C8	2.50	0.65
1:2:513:U:O2	16:az:146:TYR:CE1	2.50	0.65
1:2:529:A:OP1	4:m:270:ARG:HD3	1.88	0.65
1:2:569:G:H2'	1:2:570:A:H5'	0.66	0.65
4:m:96:ASP:O	4:m:100:GLN:NE2	2.30	0.65
19:af:749:MET:HE1	19:af:766:PRO:HB3	1.78	0.65
21:aa:589:PHE:HE1	21:aa:806:LEU:HD13	1.60	0.65
21:aa:1040:HIS:HD2	21:aa:1042:THR:H	1.45	0.65
21:aa:1466:VAL:O	21:aa:1607:ARG:NH2	2.30	0.65
23:ak:235:VAL:HG11	24:ac:1188:LEU:HD11	1.78	0.65
54:A:258:ASP:OD1	119:BO:40:LYS:HE2	1.96	0.65
55:B:275:ARG:NH1	55:B:322:THR:O	2.30	0.65

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
65:L:105:ARG:NH2	1:1:403:U:O2	2.30	0.65
69:P:149:ARG:NH1	98:Ar:19:TYR:O	2.28	0.65
94:Au:34:ARG:NH1	1:1:256:A:O2'	2.30	0.65
96:Ao:77:TRP:O	96:Ao:79:TRP:N	2.28	0.65
96:Ao:246:LEU:O	98:Ar:186:ASN:ND2	2.28	0.65
104:Ak:107:MET:HE2	104:Ak:117:ILE:HG12	1.77	0.65
1:2:25:U:O5'	1:2:25:U:H6	1.80	0.65
1:2:171:A:O5'	1:2:172:A:H2	1.80	0.65
1:2:348:U:H3'	1:2:349:G:C5'	2.26	0.65
1:2:417:C:N1	10:ae:128:TYR:CE1	2.63	0.65
1:2:450:A:H5''	14:e:391:SER:CB	2.27	0.65
1:2:585:U:H6	1:2:585:U:C5'	2.10	0.65
8:am:298:ARG:NH2	14:e:390:MET:O	2.29	0.65
14:e:417:GLN:HG3	22:ab:1053:ILE:HD13	1.77	0.65
14:e:478:VAL:HG11	14:e:674:PRO:HB2	1.77	0.65
14:e:618:GLU:OE1	14:e:669:ARG:NH1	2.30	0.65
19:af:312:ARG:HG2	19:af:313:LEU:HD12	1.79	0.65
20:u:648:MET:HA	20:u:651:ILE:HD12	1.78	0.65
29:aq:109:ARG:NH1	29:aq:142:TYR:O	2.29	0.65
37:j:31:ARG:NH2	37:j:51:THR:O	2.29	0.65
54:A:182:ALA:H	54:A:206:LYS:HB3	1.62	0.65
60:G:131:ASN:ND2	1:1:326:U:O4	2.29	0.65
60:G:165:ARG:HA	60:G:169:LYS:HD2	1.79	0.65
86:Al:272:GLU:N	86:Al:272:GLU:OE2	2.30	0.65
87:BI:257:ARG:NH1	113:Ah:104:ASP:O	2.29	0.65
94:Au:123:ALA:O	94:Au:127:ARG:NE	2.29	0.65
101:Am:289:GLU:N	101:Am:289:GLU:OE1	2.28	0.65
105:BP:100:ALA:O	105:BP:139:ALA:N	2.29	0.65
108:Av:137:GLN:HA	108:Av:140:VAL:HG12	1.77	0.65
119:BO:77:VAL:HB	119:BO:104:GLN:HG3	1.77	0.65
1:2:16:U:C5	1:2:17:C:C4	2.82	0.65
1:2:35:A:N6	37:j:16:ARG:CZ	2.59	0.65
1:2:88:U:H2'	1:2:89:U:O4'	1.97	0.65
1:2:471:A:N3	12:ag:19:ARG:CG	2.58	0.65
7:au:247:GLN:O	10:ae:29:ARG:NH2	2.30	0.65
17:ax:55:LEU:O	17:ax:57:ARG:NH1	2.30	0.65
28:ap:118:GLN:NE2	28:ap:214:ASP:OD1	2.29	0.65
40:av:95:PHE:HA	40:av:104:GLN:HA	1.79	0.65
42:x:253:CYS:SG	42:x:255:TRP:NE1	2.69	0.65
49:b:5:SER:HB3	49:b:95:LEU:HB2	1.78	0.65
52:z:827:ARG:NH2	52:z:918:ASP:OD2	2.30	0.65

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
64:K:103:GLU:HG3	91:Ab:110:GLN:HG3	1.78	0.65
69:P:56:ASP:HB3	1:1:952:U:C4	2.32	0.65
72:S:329:SER:OG	109:Af:103:ARG:NH2	2.30	0.65
84:Bj:68:LEU:HD12	102:Aq:11:LEU:HD13	1.77	0.65
88:Az:43:LEU:HD13	88:Az:96:TYR:HD1	1.62	0.65
102:Aq:341:PHE:N	102:Aq:341:PHE:CD1	2.63	0.65
111:Ae:234:VAL:HG11	111:Ae:259:VAL:HG21	1.78	0.65
113:Ah:114:PHE:HA	113:Ah:118:GLU:HB2	1.78	0.65
118:BL:354:ARG:NH1	1:1:663:U:OP2	2.29	0.65
119:BO:73:ASN:HD22	119:BO:119:ARG:HB3	1.61	0.65
1:2:39:U:O2	29:aq:10:ALA:CB	2.36	0.65
1:2:282:A:N6	43:i:251:ILE:CG2	2.59	0.65
1:2:399:U:HO2'	1:2:400:U:H3	1.43	0.65
1:2:483:A:H5'	10:ae:57:ARG:HG3	1.77	0.65
7:au:75:ARG:HE	24:ac:101:LEU:HD22	1.61	0.65
10:ae:204:ARG:NH2	14:e:566:SER:OG	2.29	0.65
21:aa:262:VAL:O	21:aa:266:ASP:N	2.28	0.65
26:an:153:GLN:HG2	42:x:66:GLN:H	1.61	0.65
39:ar:261:LEU:HB3	39:ar:277:SER:HB3	1.79	0.65
52:z:440:GLU:HG3	52:z:799:LEU:HD23	1.79	0.65
60:G:287:ASN:ND2	1:1:198:A:OP1	2.30	0.65
77:X:348:VAL:HG21	77:X:353:PRO:HG2	1.78	0.65
1:1:704:U:O2'	1:1:705:A:OP1	2.14	0.65
1:2:15:U:O5'	1:2:16:U:OP2	2.15	0.65
1:2:50:U:H4'	37:j:11:ARG:HH21	1.56	0.65
1:2:225:G:P	6:s:146:LYS:HG2	2.36	0.65
1:2:243:A:H2'	1:2:243:A:N3	2.12	0.65
1:2:495:U:O3'	3:aw:2:HIS:CG	2.43	0.65
1:2:510:A:HO2'	3:aw:19:PRO:C	2.02	0.65
1:2:511:U:C5'	3:aw:19:PRO:HD2	2.27	0.65
1:2:522:A:P	15:d:345:LYS:CG	2.70	0.65
1:2:589:G:N2	1:2:604:U:H3	1.94	0.65
1:2:604:U:H5''	44:g:82:SER:HB2	1.79	0.65
12:ag:394:ARG:NH2	13:aj:48:LEU:O	2.27	0.65
12:ag:544:HIS:ND1	38:l:15:ASP:OD1	2.30	0.65
21:aa:620:ARG:HD3	21:aa:793:LEU:HD21	1.79	0.65
21:aa:1292:ARG:O	21:aa:1296:GLN:NE2	2.30	0.65
23:ak:189:ARG:HH22	24:ac:129:ARG:HB2	1.59	0.65
26:an:184:VAL:HG11	26:an:234:PRO:HD2	1.79	0.65
27:ao:190:LEU:HA	27:ao:193:TYR:HB2	1.78	0.65
45:o:174:PHE:HE2	45:o:223:THR:HB	1.62	0.65

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
50:a:164:TYR:HB2	50:a:182:VAL:HG12	1.79	0.65
55:B:12:VAL:HG13	91:Ab:60:ILE:HD13	1.79	0.65
58:E:52:ASN:N	1:1:467:U:O2'	2.28	0.65
59:F:14:TRP:HB2	59:F:52:VAL:HG12	1.79	0.65
60:G:74:THR:HB	99:Aj:423:THR:HG22	1.79	0.65
60:G:358:TRP:HA	116:Ag:163:LYS:HE3	1.79	0.65
64:K:17:LEU:HD23	64:K:39:ILE:HG23	1.78	0.65
69:P:157:LYS:N	69:P:160:GLU:OE2	2.28	0.65
76:W:74:GLU:HG2	108:Av:161:ILE:HG23	1.79	0.65
78:Y:149:GLN:HE21	112:Ac:120:LEU:HD23	1.62	0.65
97:BM:180:LEU:HB2	97:BM:181:PRO:HD3	1.78	0.65
1:2:66:U:OP2	35:t:35:ARG:CB	2.18	0.65
1:2:86:C:HO2'	47:k:152:LYS:HB3	1.59	0.65
1:2:472:A:C2	12:ag:15:TYR:HB2	2.31	0.65
1:2:483:A:C5'	10:ae:57:ARG:HG3	2.27	0.65
15:d:31:LYS:NZ	44:g:127:SER:O	2.30	0.65
16:az:126:LYS:NZ	17:ax:50:GLY:O	2.29	0.65
20:u:227:GLN:O	20:u:231:SER:OG	2.13	0.65
21:aa:680:VAL:HG12	21:aa:695:ALA:HA	1.77	0.65
24:ac:686:ARG:HA	38:l:144:TRP:HE1	1.61	0.65
26:an:243:PRO:HD3	45:o:133:PRO:HG2	1.79	0.65
27:ao:13:LYS:HG2	27:ao:14:LEU:HG	1.78	0.65
27:ao:79:TYR:HB2	27:ao:137:TRP:HA	1.79	0.65
27:ao:127:LEU:HD11	27:ao:154:ALA:HB2	1.79	0.65
43:i:246:ASN:HA	43:i:249:LYS:HD2	1.78	0.65
49:b:139:GLU:HG2	52:z:605:ILE:HD13	1.79	0.65
54:A:261:TYR:N	54:A:266:ASP:OD2	2.30	0.65
62:I:185:ARG:HD2	62:I:188:LEU:HD11	1.79	0.65
64:K:86:ARG:NH2	95:Aa:80:ASP:O	2.30	0.65
68:O:292:LEU:HB3	71:R:124:TYR:HB2	1.77	0.65
77:X:367:GLN:HB3	77:X:384:LYS:HE3	1.77	0.65
79:Z:43:ILE:CG2	79:Z:43:ILE:O	2.45	0.65
88:Az:140:TYR:OH	89:At:61:ARG:NH2	2.29	0.65
97:BM:317:PHE:HB2	97:BM:322:TYR:CE1	2.31	0.65
108:Av:60:ARG:H	108:Av:119:TYR:HE1	1.45	0.65
119:BO:174:VAL:O	119:BO:175:ASN:HB2	1.97	0.65
1:2:65:U:O2'	1:2:67:A:OP2	2.15	0.64
1:2:555:U:C6	1:2:555:U:C5'	2.76	0.64
1:2:605:A:C3'	1:2:606:U:H5''	2.22	0.64
5:f:55:GLU:HA	5:f:59:GLN:HB2	1.80	0.64
13:aj:107:LEU:HA	13:aj:110:LEU:HD13	1.79	0.64

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
23:ak:240:ALA:HB1	23:ak:244:LEU:HD21	1.79	0.64
38:l:318:ILE:O	38:l:320:ALA:N	2.30	0.64
55:B:54:PRO:O	99:Aj:437:THR:OG1	2.11	0.64
55:B:99:ASN:ND2	55:B:235:THR:O	2.30	0.64
58:E:21:PRO:HB2	58:E:224:GLN:HE22	1.61	0.64
68:O:229:ARG:HD3	68:O:238:LEU:HB3	1.78	0.64
69:P:53:PHE:HB3	69:P:60:ARG:HE	1.62	0.64
71:R:261:ALA:HB3	89:At:108:MET:SD	2.37	0.64
71:R:301:PHE:O	71:R:303:ASN:N	2.29	0.64
94:Au:57:TRP:HZ3	94:Au:78:PRO:O	1.78	0.64
96:Ao:24:ALA:HA	1:1:402:U:H1'	1.79	0.64
96:Ao:182:HIS:HA	96:Ao:186:MET:HE2	1.77	0.64
97:BM:197:PHE:HE2	97:BM:279:TYR:HB3	1.62	0.64
99:Aj:217:GLY:HA2	109:Af:109:VAL:HG11	1.79	0.64
106:Ad:76:TYR:CZ	106:Ad:155:PRO:HD3	2.32	0.64
112:Ac:173:VAL:O	112:Ac:182:THR:N	2.27	0.64
125:Ag:301:NAD:H52N	125:Ag:301:NAD:PA	2.37	0.64
1:2:68:A:H5'	37:j:22:TRP:HB3	1.78	0.64
1:2:116:U:HO2'	1:2:117:A:P	2.15	0.64
1:2:257:U:H3'	1:2:257:U:OP2	1.96	0.64
1:2:413:U:H6	10:ae:161:ARG:HB2	1.61	0.64
1:2:516:A:C5	17:ax:35:LYS:HB2	2.31	0.64
4:m:87:ARG:HB3	4:m:92:ASP:HB3	1.79	0.64
12:ag:550:ARG:HH11	38:l:350:ARG:HH12	1.45	0.64
17:ax:159:GLN:HA	17:ax:167:LEU:HD21	1.78	0.64
19:af:153:ASP:OD2	19:af:156:HIS:N	2.29	0.64
22:ab:68:PHE:HB2	38:l:434:VAL:HG13	1.79	0.64
22:ab:303:THR:HG22	22:ab:323:VAL:HG22	1.78	0.64
25:ad:174:HIS:HE1	25:ad:207:PRO:HA	1.61	0.64
35:t:200:ASP:HB3	35:t:203:THR:HG22	1.78	0.64
36:p:189:GLN:NE2	36:p:193:GLU:OE1	2.30	0.64
36:p:212:GLN:HA	36:p:278:VAL:HG12	1.79	0.64
44:g:151:GLU:HA	44:g:154:TYR:HB2	1.79	0.64
46:c:90:ASP:O	46:c:96:ARG:NH1	2.29	0.64
49:b:23:ARG:CD	85:An:150:PHE:HE1	2.01	0.64
49:b:80:GLU:OE1	49:b:92:THR:OG1	2.15	0.64
54:A:167:SER:OG	54:A:168:THR:N	2.31	0.64
75:V:104:ARG:NH1	1:1:184:G:O5'	2.30	0.64
77:X:357:THR:O	77:X:361:ARG:NH1	2.30	0.64
80:BA:57:LEU:HA	80:BA:60:ASP:HB2	1.79	0.64
93:Ap:177:ARG:O	93:Ap:180:SER:OG	2.16	0.64

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
94:Au:14:LEU:H	94:Au:14:LEU:HD12	1.62	0.64
97:BM:141:ARG:NH2	97:BM:268:HIS:O	2.30	0.64
97:BM:285:LEU:HB3	97:BM:289:ARG:HE	1.61	0.64
99:Aj:289:GLU:OE1	109:Af:137:ARG:NH1	2.30	0.64
109:Af:149:GLN:OE1	109:Af:152:ARG:NE	2.29	0.64
113:Ah:347:ASN:ND2	113:Ah:458:LEU:HB3	2.12	0.64
119:BO:47:TRP:CD1	1:1:813:U:H5''	2.32	0.64
1:2:38:U:N3	33:w:139:TYR:C	2.23	0.64
1:2:39:U:C2	29:aq:10:ALA:CA	2.80	0.64
1:2:48:U:H6	1:2:48:U:H5'	1.61	0.64
1:2:70:A:H2'	35:t:10:ALA:O	1.98	0.64
1:2:383:A:H2'	1:2:384:U:H5'	1.80	0.64
1:2:437:U:H4'	6:s:153:LYS:NZ	2.12	0.64
1:2:438:G:N3	1:2:474:U:C1'	2.60	0.64
1:2:451:G:OP1	14:e:390:MET:CG	2.45	0.64
1:2:494:A:C6	3:aw:22:HIS:HB2	2.33	0.64
14:e:544:LEU:HB2	14:e:597:LYS:HE3	1.79	0.64
19:af:157:TYR:HB2	22:ab:442:ILE:HG21	1.77	0.64
24:ac:157:THR:OG1	24:ac:1161:LYS:NZ	2.25	0.64
25:ad:520:TYR:OH	25:ad:604:ARG:NH1	2.29	0.64
25:ad:603:TYR:HB3	25:ad:612:TRP:HD1	1.61	0.64
36:p:36:ARG:HH21	50:a:277:LYS:HG2	1.61	0.64
38:l:108:ARG:NH2	38:l:113:PRO:O	2.31	0.64
52:z:399:ALA:O	52:z:460:SER:OG	2.10	0.64
52:z:534:ILE:HG13	52:z:796:LEU:HD22	1.79	0.64
54:A:138:ALA:HA	63:J:21:PHE:HZ	1.63	0.64
54:A:263:TRP:NE1	1:1:810:U:OP2	2.21	0.64
65:L:98:THR:HB	95:Aa:31:VAL:HG11	1.80	0.64
77:X:301:SER:HA	77:X:306:ALA:HB2	1.78	0.64
79:Z:58:ASP:N	79:Z:58:ASP:OD1	2.30	0.64
82:BB:112:LEU:HD21	111:Ae:10:PHE:HE1	1.61	0.64
97:BM:45:SER:HB2	97:BM:118:ILE:HD13	1.77	0.64
104:Ak:225:LYS:HB2	104:Ak:250:ASP:O	1.98	0.64
1:1:132:U:H5''	1:1:133:A:H2	1.63	0.64
1:2:16:U:C6	1:2:17:C:C5	2.83	0.64
1:2:68:A:C5'	37:j:22:TRP:CB	2.71	0.64
1:2:229:C:C5	1:2:240:G:H3'	2.32	0.64
1:2:384:U:O4'	50:a:153:LYS:CB	2.40	0.64
8:am:51:GLU:O	8:am:53:GLN:NE2	2.29	0.64
22:ab:591:ALA:HB1	22:ab:624:PHE:HB2	1.78	0.64
24:ac:687:GLU:N	38:l:318:ILE:H	1.95	0.64

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
60:G:187:GLY:O	83:Aw:27:TYR:OH	2.14	0.64
63:J:87:GLY:HA3	63:J:106:ALA:HB3	1.80	0.64
65:L:70:GLY:HA3	65:L:74:LEU:HG	1.79	0.64
66:M:202:ILE:HD13	66:M:233:LEU:HD13	1.79	0.64
68:O:29:ARG:HG2	68:O:33:ARG:HB2	1.79	0.64
90:BC:29:THR:HG21	90:BC:36:LEU:HB2	1.78	0.64
97:BM:251:ARG:NH1	97:BM:253:CYS:SG	2.63	0.64
97:BM:366:VAL:HB	97:BM:374:LEU:HD13	1.80	0.64
118:BL:241:GLY:O	118:BL:277:ARG:NH1	2.31	0.64
1:2:65:U:H1'	1:2:66:U:O5'	1.98	0.64
1:2:70:A:H5'	35:t:29:PRO:O	1.98	0.64
1:2:131:U:O4	1:2:149:A:C5'	2.46	0.64
1:2:203:U:O2'	1:2:205:U:H5	1.80	0.64
1:2:293:U:C2'	1:2:294:A:H4'	2.27	0.64
1:2:521:A:C5'	15:d:345:LYS:HB2	2.27	0.64
1:2:556:U:H5''	1:2:556:U:H6	1.63	0.64
7:au:148:GLY:HA2	7:au:151:TRP:HB2	1.78	0.64
20:u:121:GLU:O	20:u:125:CYS:N	2.23	0.64
38:l:597:LYS:HB3	38:l:600:LEU:HB2	1.79	0.64
43:i:194:MET:HE1	43:i:202:ALA:HB2	1.78	0.64
56:C:19:ASP:HA	56:C:26:PRO:HB3	1.79	0.64
56:C:67:ASN:HB3	116:Ag:114:VAL:HB	1.79	0.64
59:F:114:LYS:NZ	1:1:151:G:OP2	2.29	0.64
67:N:201:ARG:NH1	67:N:217:ASP:OD2	2.31	0.64
68:O:60:LYS:HD3	68:O:62:GLY:H	1.63	0.64
82:BB:111:PHE:CD1	82:BB:112:LEU:O	2.50	0.64
82:BB:125:LYS:HG3	82:BB:127:PRO:HD3	1.80	0.64
85:An:264:HIS:HE1	113:Ah:68:ILE:HD12	1.62	0.64
116:Ag:62:ARG:NH2	1:1:104:U:O2'	2.30	0.64
1:2:64:U:H5'	1:2:65:U:H5	1.62	0.64
1:2:261:U:H2'	1:2:262:A:C8	2.33	0.64
1:2:396:A:C2	1:2:529:A:H4'	2.32	0.64
1:2:554:A:N7	1:2:555:U:C5	2.65	0.64
14:e:272:ARG:NH1	14:e:345:ASN:OD1	2.31	0.64
22:ab:121:SER:O	38:l:139:LYS:NZ	2.29	0.64
22:ab:297:GLU:HG3	22:ab:327:LEU:HB2	1.80	0.64
24:ac:421:GLU:OE2	24:ac:430:TRP:NE1	2.30	0.64
27:ao:71:GLU:O	27:ao:110:ARG:N	2.27	0.64
35:t:112:ARG:NH2	35:t:185:ALA:O	2.31	0.64
41:ai:104:ARG:HG2	41:ai:109:VAL:HG13	1.79	0.64
50:a:187:GLN:O	50:a:191:ASN:ND2	2.30	0.64

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
77:X:172:PRO:HG2	77:X:220:GLN:HB3	1.78	0.64
78:Y:290:ARG:NH2	92:Ai:147:ASP:OD1	2.26	0.64
82:BB:111:PHE:HE1	82:BB:112:LEU:O	1.81	0.64
95:Aa:189:ARG:HA	1:1:146:U:O4	1.96	0.64
1:1:593:U:O2'	1:1:594:U:OP2	2.15	0.64
1:1:639:A:H2'	1:1:640:A:H8	1.62	0.64
1:2:68:A:C5'	37:j:22:TRP:CD1	2.49	0.64
1:2:158:U:H4'	29:aq:18:TYR:H	0.77	0.64
1:2:222:A:C2	1:2:252:G:C2	2.84	0.64
1:2:453:A:H8	1:2:453:A:OP2	1.80	0.64
1:2:483:A:C8	2:h:84:VAL:CG2	2.81	0.64
1:2:526:A:C2'	1:2:527:U:H5'	2.28	0.64
1:2:528:A:P	16:az:69:HIS:CB	2.84	0.64
10:ae:511:LEU:HD22	10:ae:514:ARG:HD2	1.79	0.64
60:G:192:ASN:OD1	83:Aw:25:THR:OG1	2.16	0.64
70:Q:218:ARG:NH2	70:Q:218:ARG:O	2.29	0.64
71:R:241:SER:O	71:R:245:SER:N	2.30	0.64
78:Y:147:VAL:HG22	112:Ac:122:LEU:HD22	1.78	0.64
79:Z:108:ARG:HE	1:1:571:U:H1'	1.63	0.64
92:Ai:35:ASP:OD2	92:Ai:38:ARG:NH1	2.31	0.64
115:Ay:169:PRO:HG2	116:Ag:167:ASP:HB2	1.80	0.64
1:2:9:U:H2'	1:2:9:U:OP1	1.97	0.64
1:2:42:U:HO2'	29:aq:24:LYS:CB	2.10	0.64
1:2:101:G:H4'	1:2:102:U:O5'	1.97	0.64
1:2:175:U:C4'	48:q:11:GLN:CA	2.66	0.64
1:2:277:U:O2'	1:2:278:A:O5'	2.15	0.64
1:2:344:C:C5	1:2:345:G:C5	2.85	0.64
1:2:412:G:H2'	10:ae:156:ALA:O	1.97	0.64
1:2:430:C:H1'	13:aj:272:ILE:CG2	2.26	0.64
1:2:432:G:N1	10:ae:22:LEU:HD21	2.12	0.64
1:2:449:A:OP1	2:h:123:ARG:NH2	2.28	0.64
7:au:200:TRP:HA	8:am:32:THR:HG23	1.80	0.64
20:u:185:GLY:O	20:u:189:LYS:NZ	2.23	0.64
24:ac:1205:ALA:HB1	24:ac:1208:GLN:HA	1.78	0.64
30:as:79:ARG:HG2	40:av:148:ASP:HB3	1.79	0.64
36:p:115:VAL:O	36:p:120:LYS:NZ	2.31	0.64
38:l:586:ARG:HH21	38:l:590:ARG:HH11	1.46	0.64
55:B:100:ASN:OD1	55:B:101:VAL:N	2.30	0.64
71:R:73:GLU:N	71:R:73:GLU:OE1	2.30	0.64
77:X:249:LYS:O	77:X:253:HIS:N	2.31	0.64
91:Ab:130:PRO:C	91:Ab:132:GLN:H	2.05	0.64

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
107:BF:47:ALA:O	107:BF:51:LYS:NZ	2.31	0.64
116:Ag:96:THR:OG1	116:Ag:141:GLY:O	2.14	0.64
117:Ax:73:THR:HG22	117:Ax:200:PHE:N	2.13	0.64
119:BO:47:TRP:CE3	119:BO:57:GLY:HA2	2.32	0.64
1:2:44:A:O4'	29:aq:24:LYS:C	2.41	0.64
1:2:315:A:C3'	1:2:316:A:H8	2.11	0.64
1:2:417:C:N3	10:ae:128:TYR:CD1	2.66	0.64
1:2:423:C:N4	12:ag:51:GLN:NE2	2.32	0.64
1:2:497:A:O5'	3:aw:15:ARG:CZ	2.46	0.64
7:au:167:ASN:HD21	7:au:174:TYR:H	1.46	0.64
8:am:142:MET:CE	8:am:147:ILE:HD13	2.28	0.64
10:ae:388:PRO:HD3	10:ae:427:ASN:ND2	2.13	0.64
18:r:9:LYS:HD3	18:r:26:THR:HG22	1.79	0.64
20:u:57:THR:HA	20:u:69:ASN:HA	1.79	0.64
20:u:301:VAL:HB	20:u:631:PRO:HB3	1.78	0.64
23:ak:174:THR:HG21	24:ac:786:GLU:HB3	1.80	0.64
25:ad:343:TRP:HE1	40:av:89:ARG:HB3	1.63	0.64
25:ad:592:ASP:OD2	25:ad:594:ARG:NH2	2.30	0.64
61:H:82:LEU:HD11	61:H:123:PHE:HB3	1.80	0.64
69:P:52:ARG:C	69:P:60:ARG:HG2	2.22	0.64
84:Bj:113:HIS:HA	84:Bj:116:ARG:HG2	1.79	0.64
84:Bj:145:VAL:HG13	84:Bj:159:MET:HB3	1.80	0.64
89:At:72:LEU:HD13	89:At:76:GLY:HA2	1.80	0.64
91:Ab:57:ILE:HG22	91:Ab:69:TYR:HB2	1.80	0.64
112:Ac:172:ILE:HG13	112:Ac:257:ALA:HB3	1.79	0.64
118:BL:167:ARG:HH11	118:BL:299:PRO:HD2	1.62	0.64
122:UC:126:UNK:O	122:UC:130:UNK:N	2.31	0.64
1:1:850:U:O2'	1:1:851:U:O4'	2.16	0.64
1:1:924:U:O2'	1:1:925:G:H8	1.75	0.64
1:2:217:C:C2'	1:2:218:A:H5'	2.27	0.64
1:2:283:U:O2	43:i:248:VAL:CG2	2.46	0.64
1:2:301:U:N3	1:2:302:A:N7	2.38	0.64
1:2:334:U:H4'	1:2:335:U:OP1	1.98	0.64
1:2:538:G:C2'	1:2:539:G:H5'	2.28	0.64
1:2:572:A:C4'	1:2:573:A:OP1	2.46	0.64
4:m:142:THR:HG22	4:m:146:HIS:H	1.62	0.64
14:e:501:CYS:SG	14:e:502:SER:N	2.71	0.64
15:d:97:ARG:HA	15:d:100:SER:HB3	1.80	0.64
18:r:78:PHE:HB3	18:r:130:GLN:HE21	1.62	0.64
19:af:471:TYR:O	19:af:473:ARG:NH2	2.31	0.64
22:ab:43:LEU:HD21	22:ab:48:HIS:HB2	1.80	0.64

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:346:TYR:HA	25:ad:349:GLN:HE21	1.61	0.64
28:ap:234:VAL:HG22	28:ap:238:LYS:HB2	1.80	0.64
38:l:605:ARG:HG2	38:l:672:MET:HB3	1.78	0.64
55:B:152:LYS:HG2	55:B:165:GLY:HA3	1.79	0.64
55:B:388:ALA:HB2	71:R:211:SER:HB3	1.80	0.64
93:Ap:97:ARG:NH1	120:BG:1336:GLN:O	2.31	0.64
1:2:242:U:OP1	1:2:242:U:H4'	1.98	0.63
1:2:363:A:N3	1:2:365:A:C6	2.65	0.63
1:2:417:C:C5	10:ae:128:TYR:CD1	2.86	0.63
1:2:437:U:O4'	6:s:153:LYS:HD3	1.96	0.63
1:2:497:A:C5	3:aw:17:ILE:CG2	2.78	0.63
1:2:513:U:C5	16:az:148:ARG:NH1	2.62	0.63
1:2:516:A:H8	17:ax:36:MET:HG2	0.75	0.63
10:ae:329:GLY:HA2	10:ae:478:LEU:HD12	1.79	0.63
13:aj:185:CYS:O	13:aj:193:THR:OG1	2.15	0.63
20:u:578:ARG:NH1	20:u:584:LEU:O	2.30	0.63
22:ab:95:ARG:HA	22:ab:98:TRP:HB3	1.80	0.63
22:ab:954:ALA:HB2	22:ab:997:THR:HG21	1.80	0.63
33:w:167:ILE:O	35:t:73:ARG:N	2.31	0.63
77:X:326:PRO:HB3	77:X:337:HIS:CE1	2.33	0.63
78:Y:153:GLN:HE22	90:BC:134:GLU:HB3	1.63	0.63
89:At:83:GLU:OE2	89:At:86:ARG:NE	2.31	0.63
113:Ah:235:ILE:HG23	113:Ah:409:TYR:HB3	1.79	0.63
116:Ag:50:SER:OG	116:Ag:53:ASN:OD1	2.16	0.63
1:1:870:A:H2'	1:1:871:A:C4	2.32	0.63
1:2:44:A:H5'	29:aq:26:ALA:CB	2.29	0.63
1:2:65:U:C4	1:2:66:U:C5	2.85	0.63
1:2:70:A:H5'	35:t:13:ALA:HB2	1.79	0.63
1:2:316:A:C2	43:i:197:GLN:NE2	2.65	0.63
1:2:375:A:H5''	1:2:376:A:OP2	1.99	0.63
1:2:435:U:OP1	7:au:244:TYR:HE1	1.78	0.63
1:2:513:U:C2	16:az:146:TYR:CD1	2.86	0.63
2:h:151:ARG:NH2	14:e:371:THR:O	2.28	0.63
10:ae:510:TRP:CD1	10:ae:522:ALA:HB2	2.34	0.63
11:ay:79:PRO:HG2	11:ay:117:VAL:HG11	1.80	0.63
12:ag:375:ARG:NH2	20:u:715:ASP:OD2	2.30	0.63
21:aa:443:LEU:HB2	21:aa:502:VAL:HG11	1.81	0.63
21:aa:1131:GLY:O	42:x:248:ASN:ND2	2.31	0.63
22:ab:66:ARG:NH1	38:l:441:TYR:OH	2.31	0.63
24:ac:481:SER:HB3	24:ac:484:LEU:HD12	1.81	0.63
24:ac:1116:SER:HB3	38:l:561:TYR:CE1	2.34	0.63

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
24:ac:1208:GLN:O	24:ac:1210:ALA:N	2.31	0.63
25:ad:488:LYS:O	25:ad:492:SER:N	2.31	0.63
25:ad:605:ARG:NH1	30:as:219:LEU:O	2.30	0.63
32:y:12:ARG:HH11	32:y:69:LYS:HA	1.63	0.63
50:a:91:ASN:HD22	50:a:302:PRO:HG2	1.64	0.63
55:B:59:PRO:HG2	55:B:88:GLN:HE21	1.63	0.63
55:B:412:TYR:HE1	86:Al:280:ARG:HD3	1.63	0.63
59:F:15:LEU:HB2	59:F:140:PRO:HB2	1.80	0.63
75:V:74:LYS:O	75:V:77:ARG:NE	2.31	0.63
79:Z:48:LYS:HB2	79:Z:80:ARG:NH1	2.12	0.63
96:Ao:10:ALA:HB2	1:1:491:U:H5''	1.79	0.63
1:2:36:G:C8	33:w:130:LYS:CD	2.81	0.63
1:2:36:G:C5	33:w:130:LYS:HB2	2.33	0.63
1:2:70:A:HO3'	35:t:10:ALA:N	1.96	0.63
1:2:172:A:H4'	37:j:19:PRO:O	1.97	0.63
1:2:417:C:N1	10:ae:128:TYR:CD1	2.67	0.63
1:2:563:A:H4'	1:2:564:A:OP1	1.98	0.63
2:h:29:ARG:NH1	6:s:104:ASP:O	2.26	0.63
2:h:57:LYS:HD3	14:e:463:HIS:CE1	2.34	0.63
10:ae:55:ARG:HE	10:ae:59:GLY:HA2	1.64	0.63
14:e:147:ASN:O	14:e:151:THR:OG1	2.15	0.63
14:e:312:GLY:C	20:u:629:VAL:HG13	2.23	0.63
21:aa:855:TYR:HE1	45:o:269:LEU:HB2	1.63	0.63
24:ac:894:ASP:OD1	24:ac:895:ALA:N	2.30	0.63
32:y:203:LEU:HD23	32:y:264:ILE:HD12	1.80	0.63
58:E:300:GLU:N	58:E:300:GLU:OE1	2.31	0.63
66:M:84:GLU:HA	66:M:93:THR:HA	1.79	0.63
77:X:486:MET:HA	106:Ad:182:PHE:HE2	1.63	0.63
79:Z:50:PRO:CG	79:Z:53:MET:HE3	2.28	0.63
85:An:215:VAL:O	85:An:215:VAL:HG13	1.98	0.63
92:Ai:296:HIS:ND1	92:Ai:307:ASN:OD1	2.31	0.63
96:Ao:132:SER:N	96:Ao:159:GLU:OE2	2.31	0.63
101:Am:227:ASP:O	101:Am:231:ARG:NH1	2.31	0.63
119:BO:156:ASN:OD1	119:BO:157:ASP:N	2.30	0.63
1:1:862:A:N6	1:1:1105:G:H22	1.95	0.63
1:2:47:U:OP2	29:aq:11:SER:HB3	1.97	0.63
1:2:165:A:H4'	1:2:166:G:OP2	1.99	0.63
1:2:395:U:O5'	1:2:395:U:H6	1.82	0.63
1:2:417:C:OP2	10:ae:166:ARG:HD2	1.98	0.63
12:ag:491:GLU:HG3	23:ak:302:ARG:HH22	1.63	0.63
21:aa:767:ARG:HG3	26:an:213:PHE:HB3	1.80	0.63

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
23:ak:37:GLY:HA2	23:ak:54:LEU:HG	1.79	0.63
23:ak:232:ILE:HG13	24:ac:1188:LEU:HG	1.80	0.63
24:ac:1015:ALA:O	24:ac:1019:ARG:NH2	2.31	0.63
25:ad:233:ASN:O	41:ai:32:ARG:NH1	2.31	0.63
35:t:52:LEU:HB3	35:t:169:PRO:HD2	1.80	0.63
46:c:208:ARG:HE	46:c:225:ASP:CG	2.07	0.63
47:k:93:ASP:HB3	47:k:148:LYS:HG2	1.80	0.63
52:z:314:LEU:HD11	52:z:829:LEU:HD13	1.80	0.63
61:H:7:ARG:HB3	61:H:8:PRO:CD	2.28	0.63
65:L:46:ARG:NH2	83:Aw:187:TYR:OXT	2.27	0.63
68:O:29:ARG:HG2	68:O:33:ARG:HD3	1.79	0.63
69:P:37:GLY:O	69:P:114:ARG:NH2	2.30	0.63
86:Al:147:ALA:O	86:Al:151:SER:N	2.27	0.63
88:Az:41:ASP:OD1	1:1:77:U:N3	2.32	0.63
94:Au:72:ASP:OD1	94:Au:72:ASP:N	2.30	0.63
1:1:1130:A:N6	1:1:1148:A:H62	1.97	0.63
1:2:425:A:C1'	13:aj:235:GLU:HA	2.28	0.63
1:2:488:U:H5''	9:n:34:LYS:HZ1	1.64	0.63
1:2:525:A:C8	15:d:221:ASP:HA	2.33	0.63
14:e:594:PRO:O	14:e:598:GLU:N	2.31	0.63
20:u:661:ALA:O	20:u:685:ASN:ND2	2.32	0.63
24:ac:1239:ARG:NE	24:ac:1256:ASP:OD2	2.28	0.63
27:ao:15:GLY:O	27:ao:173:LYS:NZ	2.30	0.63
36:p:279:LYS:NZ	36:p:283:GLU:OE2	2.31	0.63
37:j:172:MET:SD	48:q:70:ARG:NH1	2.70	0.63
38:l:261:LYS:HD3	38:l:266:VAL:HG22	1.79	0.63
79:Z:40:THR:HG22	85:An:50:HIS:CD2	2.33	0.63
92:Ai:442:ASN:OD1	92:Ai:443:ASN:N	2.31	0.63
102:Aq:341:PHE:CE1	1:1:975:U:O2'	2.45	0.63
105:BP:97:ARG:CZ	105:BP:97:ARG:HB3	2.28	0.63
116:Ag:54:GLU:HG3	116:Ag:55:LYS:HG2	1.79	0.63
1:2:45:U:C2'	1:2:46:U:H5''	2.27	0.63
1:2:50:U:C4'	37:j:11:ARG:HH22	1.95	0.63
1:2:51:A:C5	1:2:52:U:C4	2.87	0.63
1:2:55:G:H5''	1:2:152:G:C2	2.31	0.63
1:2:282:A:C1'	43:i:247:ILE:CD1	2.71	0.63
1:2:461:U:O4	8:am:275:PHE:HZ	1.80	0.63
4:m:25:ARG:HH11	52:z:404:ALA:HB2	1.63	0.63
12:ag:513:HIS:CD2	24:ac:209:VAL:HG23	2.33	0.63
14:e:23:PHE:HE1	53:bd:62:ILE:HD11	1.64	0.63
20:u:424:ASP:O	20:u:553:ARG:NH1	2.31	0.63

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
22:ab:521:GLU:OE1	22:ab:845:TRP:NE1	2.32	0.63
22:ab:830:GLN:HA	22:ab:833:ILE:HD12	1.81	0.63
25:ad:680:TRP:NE1	45:o:472:ARG:HB3	2.14	0.63
45:o:204:ILE:HG22	45:o:208:LEU:HD23	1.81	0.63
55:B:365:GLU:HG3	55:B:370:VAL:HG13	1.80	0.63
80:BA:14:ASN:N	98:Ar:157:THR:HG1	1.96	0.63
87:BI:170:GLY:O	87:BI:211:GLN:NE2	2.31	0.63
92:AI:312:LEU:HB2	92:AI:317:VAL:HG11	1.80	0.63
97:BM:317:PHE:HB3	97:BM:321:LYS:HB2	1.80	0.63
111:Ae:45:LEU:HD12	111:Ae:46:PRO:HD2	1.79	0.63
1:2:41:U:O5'	35:t:50:VAL:HG13	1.98	0.63
1:2:157:G:H4'	1:2:158:U:H6	1.63	0.63
1:2:175:U:H2'	48:q:11:GLN:CG	2.28	0.63
2:h:109:PRO:HB2	14:e:372:ARG:HH12	1.63	0.63
7:au:24:ILE:HD13	7:au:206:LEU:HD21	1.81	0.63
10:ae:323:LEU:HB3	10:ae:328:ALA:HB3	1.81	0.63
14:e:544:LEU:HB3	14:e:552:ALA:HB1	1.81	0.63
26:an:272:LYS:HA	26:an:275:ASP:HB2	1.80	0.63
41:ai:153:SER:OG	41:ai:154:ASN:N	2.31	0.63
43:i:321:PRO:HA	43:i:324:LEU:HD13	1.80	0.63
56:C:114:PRO:HD2	56:C:174:ILE:HD13	1.80	0.63
67:N:133:ARG:NH1	1:1:72:U:O4	2.30	0.63
68:O:89:HIS:HD2	68:O:91:LYS:H	1.46	0.63
76:W:79:HIS:CD2	76:W:88:ARG:HB2	2.33	0.63
77:X:332:ALA:HB2	77:X:436:ALA:HB2	1.81	0.63
105:BP:30:SER:HB2	109:Af:142:TRP:HB2	1.80	0.63
119:BO:151:THR:OG1	119:BO:152:CYS:N	2.29	0.63
1:1:548:A:H2'	1:1:588:A:H2	1.64	0.63
1:1:753:U:N3	1:1:754:A:N1	2.47	0.63
1:1:990:A:H3'	1:1:991:G:H8	1.64	0.63
1:2:54:A:OP1	1:2:152:G:N7	2.31	0.63
1:2:155:G:H8	1:2:155:G:C5'	2.03	0.63
1:2:460:A:O2'	8:am:282:GLN:O	2.17	0.63
1:2:595:A:O2'	1:2:597:A:OP1	2.16	0.63
1:2:614:U:H3	4:m:152:ILE:CD1	2.12	0.63
8:am:170:ARG:NH1	8:am:173:GLU:OE2	2.32	0.63
8:am:222:GLU:HG3	8:am:226:ARG:HE	1.62	0.63
18:r:251:ILE:HD11	18:r:323:ILE:HG12	1.79	0.63
21:aa:1373:LYS:HA	21:aa:1377:LYS:HD2	1.81	0.63
38:l:144:TRP:CZ2	38:l:318:ILE:HG21	2.31	0.63
38:l:552:LEU:HA	38:l:556:ALA:HB3	1.80	0.63

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
54:A:299:GLU:HG3	1:1:1155:A:N3	2.14	0.63
58:E:203:LYS:NZ	108:Av:40:ALA:O	2.29	0.63
59:F:12:ARG:NH1	91:Ab:115:PRO:HB3	2.14	0.63
74:U:36:ASN:OD1	74:U:36:ASN:N	2.29	0.63
80:BA:26:LYS:HE2	80:BA:28:TYR:HA	1.81	0.63
91:Ab:135:ARG:NH1	91:Ab:141:GLU:OE2	2.32	0.63
91:Ab:160:ILE:HD11	101:Am:276:ILE:HA	1.80	0.63
104:Ak:292:MET:HE2	112:Ac:131:MET:HG3	1.78	0.63
1:1:391:A:N7	1:1:393:A:N6	2.47	0.63
1:2:65:U:O2'	1:2:66:U:O5'	2.17	0.63
1:2:302:A:H2'	1:2:303:G:C5	2.34	0.63
1:2:417:C:O2'	10:ae:128:TYR:CZ	2.52	0.63
1:2:431:U:O2	13:aj:280:HIS:CE1	2.52	0.63
1:2:481:U:H5''	1:2:482:C:C4	2.34	0.63
1:2:483:A:C8	2:h:84:VAL:HG22	2.34	0.63
1:2:521:A:C3'	15:d:345:LYS:H	2.12	0.63
1:2:615:U:C5'	44:g:101:ARG:NH2	2.62	0.63
13:aj:304:SER:O	13:aj:309:ARG:NH1	2.32	0.63
14:e:328:SER:O	14:e:332:ARG:NH1	2.32	0.63
21:aa:1114:ARG:HE	21:aa:1142:PRO:HB2	1.64	0.63
28:ap:81:ARG:NH1	28:ap:227:ASP:OD1	2.30	0.63
31:at:267:VAL:HB	37:j:87:ARG:HH11	1.63	0.63
38:l:126:VAL:HG22	38:l:322:TRP:HB2	1.81	0.63
61:H:53:THR:HA	61:H:153:THR:HG22	1.81	0.63
67:N:108:LYS:NZ	1:1:63:G:OP2	2.32	0.63
69:P:39:PRO:HB2	96:Ao:80:ALA:O	1.99	0.63
86:Al:272:GLU:HG2	86:Al:272:GLU:O	1.98	0.63
104:Ak:91:TRP:CD1	104:Ak:118:GLY:HA3	2.33	0.63
111:Ae:29:PRO:HG3	1:1:1125:U:H1'	1.81	0.63
113:Ah:377:LYS:HD3	113:Ah:453:GLY:H	1.63	0.63
1:1:703:U:O2'	1:1:704:U:OP1	2.17	0.63
1:2:32:A:H8	1:2:32:A:C5'	2.12	0.62
1:2:342:A:H2'	1:2:343:C:C5'	2.26	0.62
1:2:391:A:C2	34:v:140:SER:HB2	2.34	0.62
1:2:396:A:C5	1:2:529:A:H1'	2.33	0.62
1:2:436:U:C4'	6:s:154:VAL:HG13	2.29	0.62
18:r:142:THR:H	18:r:184:ASN:HD21	1.46	0.62
18:r:358:ASP:OD2	18:r:361:LYS:NZ	2.25	0.62
24:ac:410:GLN:NE2	24:ac:414:ASP:OD2	2.32	0.62
28:ap:2:GLU:OE2	28:ap:3:ARG:NH2	2.32	0.62
29:aq:16:ARG:NH2	29:aq:20:MET:O	2.32	0.62

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
29:aq:94:VAL:HG22	29:aq:134:LEU:HD11	1.81	0.62
52:z:673:ASP:O	52:z:675:ALA:N	2.32	0.62
57:D:108:MET:SD	91:Ab:213:ALA:N	2.72	0.62
66:M:153:LEU:HA	66:M:156:LEU:HD12	1.79	0.62
91:Ab:183:LYS:HA	91:Ab:187:MET:HG3	1.81	0.62
101:Am:216:MET:HB2	101:Am:221:GLU:HG2	1.79	0.62
109:Af:81:TYR:HA	109:Af:84:ASP:OD1	1.99	0.62
1:1:137:U:O2	1:1:137:U:C2'	2.47	0.62
1:2:39:U:C4	29:aq:10:ALA:CB	2.81	0.62
1:2:105:A:H2	1:2:114:U:O2	1.81	0.62
1:2:175:U:H3	48:q:14:PRO:HD2	1.61	0.62
1:2:280:A:C6	1:2:323:U:OP2	2.52	0.62
1:2:332:G:H5'	1:2:354:A:C2	2.32	0.62
1:2:413:U:C6	2:h:23:HIS:ND1	2.63	0.62
3:aw:48:THR:HG22	18:r:337:SER:H	1.64	0.62
7:au:198:ASP:HB3	7:au:203:ARG:H	1.64	0.62
8:am:142:MET:HE2	8:am:147:ILE:HD13	1.81	0.62
10:ae:237:THR:OG1	10:ae:272:ASN:ND2	2.32	0.62
22:ab:224:ARG:HG3	22:ab:229:LEU:HD12	1.81	0.62
25:ad:325:THR:O	25:ad:385:ASN:ND2	2.32	0.62
37:j:46:MET:HG2	37:j:115:PRO:HB3	1.81	0.62
45:o:301:ARG:NH2	45:o:327:LEU:O	2.32	0.62
49:b:23:ARG:HD3	85:An:150:PHE:HE1	1.60	0.62
62:I:105:LYS:NZ	62:I:139:MET:O	2.29	0.62
63:J:49:THR:HG23	63:J:50:LYS:H	1.62	0.62
74:U:56:THR:O	74:U:60:ARG:N	2.32	0.62
85:An:48:HIS:CG	85:An:49:SER:H	2.17	0.62
85:An:51:ARG:HH11	118:BL:115:TYR:H	1.46	0.62
97:BM:137:ARG:HA	97:BM:271:ARG:HD3	1.80	0.62
117:Ax:56:ARG:HG2	1:1:798:A:P	2.39	0.62
1:2:175:U:C6	48:q:11:GLN:CG	2.69	0.62
1:2:211:A:H3'	1:2:211:A:N3	2.14	0.62
1:2:259:A:H5'	1:2:259:A:C8	2.35	0.62
1:2:305:C:C2'	1:2:306:A:C5'	2.77	0.62
1:2:499:A:C2	11:ay:132:THR:HG21	2.33	0.62
11:ay:74:THR:OG1	11:ay:76:ARG:NH2	2.24	0.62
16:az:50:ILE:HG13	16:az:109:PHE:HE2	1.64	0.62
17:ax:32:ARG:NH1	17:ax:36:MET:SD	2.72	0.62
19:af:221:TYR:HA	19:af:224:MET:HG2	1.80	0.62
19:af:419:LEU:HG	19:af:450:LEU:HD21	1.81	0.62
21:aa:1132:LEU:HD22	42:x:70:PRO:HB3	1.81	0.62

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
48:q:141:ARG:NE	49:b:118:ASP:OD1	2.28	0.62
50:a:240:ASP:O	50:a:244:ALA:N	2.32	0.62
55:B:193:VAL:CG2	55:B:284:LEU:HD12	2.30	0.62
60:G:169:LYS:NZ	1:1:197:U:OP1	2.31	0.62
68:O:29:ARG:HB2	68:O:32:THR:OG1	1.99	0.62
71:R:153:ARG:NH1	71:R:156:GLU:OE2	2.23	0.62
74:U:25:PHE:CB	1:1:933:G:N2	2.62	0.62
85:An:137:GLU:O	85:An:141:ASP:HB3	1.99	0.62
86:Al:215:VAL:O	86:Al:219:ASN:ND2	2.32	0.62
96:Ao:257:LYS:NZ	96:Ao:264:ASP:OD2	2.28	0.62
97:BM:82:LEU:HD11	97:BM:382:LEU:HD21	1.82	0.62
100:BH:176:CYS:SG	100:BH:185:SER:OG	2.55	0.62
106:Ad:125:ASP:HB3	106:Ad:127:PRO:HD2	1.81	0.62
111:Ae:52:ARG:HH12	111:Ae:59:THR:HG22	1.64	0.62
1:1:398:U:O2'	1:1:399:U:O5'	2.17	0.62
1:1:974:U:H4'	1:1:975:U:OP1	1.99	0.62
1:2:243:A:OP2	1:2:243:A:H4'	1.97	0.62
1:2:303:G:C6	1:2:304:U:C5	2.87	0.62
1:2:437:U:C6	6:s:151:ARG:CB	2.82	0.62
1:2:501:U:OP1	14:e:790:VAL:CG1	2.37	0.62
6:s:55:ASP:OD2	6:s:58:HIS:ND1	2.22	0.62
6:s:122:ILE:HD11	12:ag:405:LEU:HB3	1.81	0.62
6:s:125:THR:HG22	13:aj:310:GLN:HG3	1.81	0.62
12:ag:56:ARG:HH12	24:ac:1201:ALA:C	2.08	0.62
14:e:542:LEU:HD22	14:e:563:LEU:HG	1.80	0.62
15:d:83:LYS:HE3	42:x:115:PHE:HB2	1.82	0.62
18:r:219:GLY:HA2	18:r:230:ARG:HD2	1.79	0.62
20:u:116:THR:HG22	22:ab:525:ASN:HD22	1.64	0.62
21:aa:1420:ASN:HD21	21:aa:1424:LYS:HG2	1.63	0.62
39:ar:89:ARG:NH1	39:ar:250:ASP:O	2.31	0.62
41:ai:222:ASN:O	41:ai:224:VAL:N	2.31	0.62
43:i:324:LEU:O	47:k:163:SER:OG	2.15	0.62
43:i:332:ARG:NH1	43:i:340:ASP:OD2	2.31	0.62
52:z:563:PRO:HD3	52:z:767:LYS:HD3	1.81	0.62
54:A:289:ARG:O	54:A:290:MET:HB2	1.98	0.62
70:Q:108:ILE:CB	1:1:905:A:H62	2.12	0.62
97:BM:147:ASP:OD2	97:BM:182:ARG:NH2	2.32	0.62
102:Aq:329:ASP:OD1	102:Aq:330:VAL:N	2.29	0.62
103:BE:37:GLU:HB2	1:1:1144:G:N3	2.14	0.62
1:1:47:A:H4'	1:1:48:U:OP1	2.00	0.62
1:1:53:A:N6	1:1:124:A:H62	1.96	0.62

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:197:A:H4'	1:2:198:U:OP1	2.00	0.62
14:e:526:GLY:O	14:e:531:ARG:NH2	2.32	0.62
21:aa:1057:VAL:HG21	42:x:137:ARG:HD2	1.81	0.62
24:ac:374:ARG:O	24:ac:378:VAL:N	2.30	0.62
24:ac:1101:GLN:OE1	24:ac:1103:GLN:NE2	2.32	0.62
25:ad:454:GLY:HA2	25:ad:488:LYS:HZ1	1.65	0.62
29:aq:12:LEU:HB3	29:aq:16:ARG:HD3	1.82	0.62
39:ar:50:ARG:NH1	43:i:360:GLN:O	2.32	0.62
45:o:392:GLN:NE2	46:c:88:GLU:OE2	2.32	0.62
56:C:124:GLU:OE1	113:Ah:49:SER:OG	2.18	0.62
57:D:88:ARG:NH1	58:E:240:GLU:OE2	2.24	0.62
58:E:173:ILE:HD13	58:E:176:ARG:HE	1.65	0.62
59:F:114:LYS:HD2	1:1:150:A:H5''	1.80	0.62
62:I:77:LEU:HD13	62:I:83:VAL:HG12	1.81	0.62
70:Q:24:HIS:HE1	92:Ai:413:ARG:HH22	1.46	0.62
80:BA:103:ILE:O	80:BA:103:ILE:HG13	2.00	0.62
86:Al:38:VAL:CG2	86:Al:70:GLN:HA	2.30	0.62
102:Aq:336:ARG:HG2	102:Aq:336:ARG:NH1	1.98	0.62
117:Ax:105:CYS:HB3	117:Ax:109:ASP:H	1.64	0.62
118:BL:335:HIS:CD2	118:BL:337:ARG:HH21	2.18	0.62
119:BO:183:VAL:O	119:BO:185:LEU:N	2.25	0.62
1:2:4:A:C5	25:ad:27:ILE:HD13	2.35	0.62
1:2:182:A:H5''	33:w:98:LEU:HD13	1.80	0.62
1:2:378:U:H6	1:2:378:U:O5'	1.82	0.62
4:m:282:SER:OG	4:m:283:ILE:N	2.33	0.62
12:ag:147:PRO:HG3	12:ag:304:LEU:HD11	1.81	0.62
18:r:81:ARG:HH12	18:r:123:GLY:HA3	1.64	0.62
18:r:446:TYR:OH	18:r:450:ARG:NH2	2.31	0.62
25:ad:173:GLN:NE2	25:ad:276:HIS:O	2.32	0.62
28:ap:190:ARG:NE	41:ai:243:TYR:OH	2.33	0.62
39:ar:79:PRO:HA	39:ar:115:HIS:HB2	1.82	0.62
67:N:229:VAL:HG12	71:R:10:VAL:HA	1.82	0.62
85:An:50:HIS:CD2	85:An:51:ARG:H	2.18	0.62
88:Az:38:TYR:OH	88:Az:102:GLN:NE2	2.32	0.62
93:Ap:48:ALA:H	94:Au:185:TRP:HZ3	1.48	0.62
104:Ak:136:THR:HG21	104:Ak:208:VAL:HG11	1.81	0.62
105:BP:-4:THR:C	105:BP:-2:ILE:H	2.07	0.62
1:1:208:U:H4'	1:1:209:U:OP1	1.96	0.62
1:1:345:A:H62	1:1:379:U:H5'	1.64	0.62
1:1:770:A:N1	1:1:774:A:O2'	2.27	0.62
1:2:301:U:N1	1:2:302:A:C8	2.67	0.62

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:446:G:N7	12:ag:19:ARG:CZ	2.63	0.62
1:2:528:A:OP1	16:az:69:HIS:CG	2.41	0.62
5:f:188:ARG:NH2	52:z:644:ASN:OD1	2.33	0.62
10:ae:29:ARG:O	13:aj:310:GLN:NE2	2.32	0.62
13:aj:69:THR:HG22	13:aj:123:LYS:HE2	1.80	0.62
14:e:126:GLN:HB2	22:ab:875:GLY:HA3	1.82	0.62
23:ak:195:ALA:HA	23:ak:198:LYS:HE2	1.81	0.62
23:ak:211:GLN:HA	23:ak:215:GLU:HB2	1.81	0.62
23:ak:244:LEU:HD22	24:ac:129:ARG:HE	1.63	0.62
25:ad:459:LEU:HB3	25:ad:504:ASN:HD21	1.65	0.62
43:i:347:ARG:HB3	47:k:140:VAL:HG22	1.81	0.62
73:T:80:GLN:HG3	73:T:81:ILE:H	1.63	0.62
74:U:18:LEU:HD23	74:U:19:LYS:H	1.63	0.62
74:U:25:PHE:HB2	1:1:933:G:N2	2.14	0.62
74:U:78:GLN:HE21	84:Bj:12:SER:HB2	1.65	0.62
85:An:81:GLN:NE2	113:Ah:73:TYR:OH	2.31	0.62
87:BI:190:SER:OG	87:BI:224:ASN:O	2.16	0.62
89:At:33:ASN:HD21	1:1:123:U:H5'	1.63	0.62
92:Ai:429:LEU:HD13	92:Ai:463:ALA:HB3	1.81	0.62
101:Am:266:GLU:OE1	101:Am:300:ARG:NH2	2.29	0.62
113:Ah:115:TYR:HB3	113:Ah:178:ARG:HH12	1.64	0.62
118:BL:337:ARG:O	1:1:662:G:O2'	2.14	0.62
1:2:53:U:HO2'	1:2:54:A:P	2.17	0.62
1:2:67:A:H2'	1:2:68:A:O4'	2.00	0.62
1:2:181:U:H5'	33:w:101:ARG:HD2	1.81	0.62
1:2:364:A:N6	46:c:175:PHE:CE1	2.67	0.62
1:2:427:U:C4	13:aj:236:ALA:CB	2.78	0.62
1:2:447:A:C5'	53:bd:56:ASN:HD21	2.12	0.62
1:2:449:A:H8	1:2:449:A:OP2	1.83	0.62
1:2:462:G:OP1	2:h:133:HIS:HE1	1.83	0.62
1:2:483:A:H8	1:2:483:A:OP2	1.82	0.62
18:r:60:GLU:OE2	18:r:136:ARG:NH1	2.27	0.62
18:r:122:CYS:HA	18:r:421:PRO:HD2	1.82	0.62
19:af:397:LEU:HD21	19:af:500:ALA:HB3	1.82	0.62
20:u:332:LEU:O	20:u:335:SER:OG	2.18	0.62
25:ad:603:TYR:HE2	25:ad:619:ALA:HB2	1.65	0.62
26:an:6:ARG:HD3	50:a:324:ILE:HD11	1.82	0.62
36:p:39:ARG:HG3	50:a:203:ALA:HB3	1.82	0.62
38:l:117:ILE:HD11	38:l:168:ILE:HD13	1.80	0.62
54:A:235:GLN:NE2	54:A:334:ASP:OD1	2.32	0.62
58:E:179:ARG:HH11	58:E:179:ARG:HG3	1.64	0.62

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
66:M:6:PRO:HB2	66:M:8:TYR:CD2	2.35	0.62
76:W:76:CYS:SG	76:W:89:CYS:HB3	2.40	0.62
78:Y:130:PRO:HD3	112:Ac:57:HIS:HE1	1.64	0.62
94:Au:40:ARG:O	94:Au:44:ARG:HD3	1.99	0.62
103:BE:65:PHE:CZ	103:BE:67:LYS:HE3	2.34	0.62
108:Av:120:MET:SD	108:Av:148:ARG:NH2	2.72	0.62
1:1:1068:A:H4'	1:1:1069:U:H5'	1.82	0.62
1:2:146:A:O2'	1:2:147:U:H5'	2.00	0.62
1:2:203:U:H2'	31:at:230:ARG:HH12	1.65	0.62
1:2:482:C:H2'	10:ae:56:TYR:CE2	2.33	0.62
1:2:525:A:O2'	15:d:221:ASP:CA	2.33	0.62
10:ae:112:ARG:NH1	10:ae:115:HIS:O	2.33	0.62
11:ay:53:TYR:OH	11:ay:57:ARG:NH2	2.33	0.62
15:d:201:ARG:HA	19:af:199:ASN:ND2	2.15	0.62
19:af:460:ASP:OD1	19:af:515:ARG:NH1	2.33	0.62
21:aa:568:ALA:O	21:aa:572:LYS:N	2.32	0.62
22:ab:311:GLU:O	38:l:22:ARG:NH2	2.33	0.62
28:ap:203:TRP:CZ2	48:q:118:LYS:HD2	2.35	0.62
32:y:160:ILE:HD13	32:y:194:ALA:HB3	1.82	0.62
37:j:47:PHE:HD2	37:j:61:LEU:HD13	1.62	0.62
38:l:315:TYR:HD1	38:l:316:PRO:HD3	1.64	0.62
41:ai:290:THR:HG22	52:z:857:ARG:HH22	1.65	0.62
43:i:285:ASP:N	43:i:285:ASP:OD1	2.33	0.62
62:I:234:TYR:O	1:1:579:U:N3	2.29	0.62
65:L:92:VAL:HG12	95:Aa:190:SER:O	2.00	0.62
69:P:98:TYR:CE2	98:Ar:15:LEU:HA	2.35	0.62
102:Aq:97:GLU:OE2	102:Aq:101:ASN:ND2	2.32	0.62
116:Ag:73:VAL:O	116:Ag:110:SER:OG	2.12	0.62
118:BL:98:MET:HG3	118:BL:163:VAL:HG11	1.82	0.62
119:BO:176:HIS:HD2	119:BO:178:TYR:H	1.48	0.62
1:1:1127:U:O2'	1:1:1128:U:OP1	2.16	0.62
1:2:17:C:N4	1:2:367:A:OP2	2.27	0.62
11:ay:129:PRO:HD3	18:r:265:HIS:ND1	2.14	0.62
14:e:312:GLY:H	20:u:631:PRO:N	1.98	0.62
20:u:205:THR:HG23	20:u:206:THR:HG23	1.80	0.62
20:u:618:ARG:NH1	20:u:635:SER:O	2.33	0.62
21:aa:1445:ILE:HG12	21:aa:1561:LEU:HG	1.82	0.62
23:ak:279:ALA:O	23:ak:283:ARG:NH1	2.29	0.62
25:ad:539:MET:HA	25:ad:542:LEU:HB3	1.82	0.62
28:ap:144:MET:HB3	28:ap:149:TYR:HE1	1.65	0.62
29:aq:18:TYR:OH	35:t:37:ARG:NH2	2.32	0.62

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
38:l:235:ALA:O	38:l:239:HIS:N	2.33	0.62
51:ba:77:THR:HG1	51:ba:81:TRP:CD1	2.17	0.62
61:H:152:GLN:HE22	105:BP:175:MET:HA	1.63	0.62
81:UA:162:UNK:O	81:UA:166:UNK:N	2.32	0.62
85:An:135:PHE:H	85:An:139:GLN:HG2	1.63	0.62
93:Ap:189:HIS:HA	93:Ap:192:LYS:HE2	1.82	0.62
97:BM:79:ARG:HB3	97:BM:382:LEU:HD13	1.82	0.62
101:Am:25:LYS:NZ	1:1:1123:U:H3	1.97	0.62
101:Am:80:ASP:OD1	101:Am:254:ARG:NH1	2.33	0.62
1:1:642:A:O2'	1:1:643:G:OP1	2.14	0.62
1:2:181:U:O2	1:2:181:U:C3'	2.47	0.61
1:2:182:A:OP1	33:w:101:ARG:CZ	2.47	0.61
1:2:208:C:H2'	1:2:209:U:O4'	2.00	0.61
1:2:282:A:N6	43:i:251:ILE:CB	2.63	0.61
1:2:480:A:C1'	2:h:21:HIS:HE1	2.13	0.61
1:2:525:A:OP1	8:am:307:TYR:HD2	1.83	0.61
1:2:538:G:O2'	1:2:539:G:H5'	2.00	0.61
3:aw:97:ILE:HG13	3:aw:98:ARG:HD2	1.82	0.61
12:ag:388:PHE:HA	12:ag:391:ILE:HD12	1.81	0.61
20:u:72:PRO:O	22:ab:230:ARG:NH2	2.33	0.61
21:aa:1442:THR:HA	21:aa:1445:ILE:HD12	1.81	0.61
21:aa:1502:GLU:HA	21:aa:1505:LEU:HB2	1.82	0.61
25:ad:116:GLN:NE2	25:ad:694:ASP:O	2.26	0.61
25:ad:191:ASP:OD1	25:ad:191:ASP:N	2.32	0.61
36:p:215:GLU:O	36:p:273:THR:OG1	2.18	0.61
40:av:111:VAL:HG11	40:av:126:VAL:HG12	1.81	0.61
42:x:107:ASN:OD1	42:x:111:ARG:NH2	2.33	0.61
49:b:24:GLU:CB	85:An:150:PHE:HE2	2.12	0.61
50:a:409:LEU:HD11	50:a:420:LEU:HD11	1.81	0.61
54:A:276:MET:HA	54:A:288:HIS:CE1	2.35	0.61
74:U:29:VAL:HG23	74:U:30:ILE:N	2.14	0.61
85:An:22:ARG:HD3	1:1:286:G:H22	1.65	0.61
85:An:264:HIS:ND1	85:An:264:HIS:O	2.33	0.61
86:Al:270:PRO:HB2	116:Ag:147:ARG:HE	1.64	0.61
90:BC:104:ARG:HD2	116:Ag:235:THR:HG21	1.81	0.61
92:Ai:14:PRO:HG2	92:Ai:251:PHE:HE2	1.65	0.61
97:BM:17:ARG:NH2	97:BM:19:PHE:O	2.33	0.61
100:BH:72:CYS:HB3	100:BH:96:LEU:HD12	1.82	0.61
100:BH:123:HIS:NE2	100:BH:156:PHE:O	2.33	0.61
105:BP:97:ARG:HB3	105:BP:97:ARG:NH2	2.15	0.61
108:Av:41:PRO:HB2	108:Av:46:LEU:HD21	1.82	0.61

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
116:Ag:213:VAL:HA	116:Ag:216:ILE:HG22	1.81	0.61
118:BL:305:HIS:N	1:1:655:U:OP1	2.32	0.61
1:2:244:A:H4'	1:2:245:U:OP2	2.00	0.61
1:2:367:A:O2'	1:2:377:U:O4	2.17	0.61
1:2:456:A:N1	8:am:284:ARG:CD	2.62	0.61
2:h:79:PHE:CZ	10:ae:145:VAL:HG13	2.35	0.61
5:f:99:LEU:H	36:p:276:ASP:HB2	1.64	0.61
12:ag:316:HIS:ND1	12:ag:335:GLU:HG3	2.15	0.61
14:e:310:PRO:O	20:u:631:PRO:HD2	2.00	0.61
22:ab:28:TRP:HA	22:ab:31:ARG:HB3	1.82	0.61
22:ab:511:ARG:NH1	22:ab:615:SER:OG	2.33	0.61
25:ad:485:LEU:O	25:ad:489:ALA:N	2.32	0.61
36:p:116:PHE:HB2	36:p:117:TRP:HE3	1.64	0.61
45:o:245:THR:HG22	45:o:247:GLU:H	1.66	0.61
62:l:194:GLU:HA	62:l:197:LYS:HG2	1.82	0.61
88:Az:105:ARG:NH1	88:Az:106:VAL:O	2.34	0.61
94:Au:132:LYS:HE2	117:Ax:140:VAL:HG11	1.82	0.61
111:Ae:78:HIS:HD2	111:Ae:80:HIS:H	1.48	0.61
1:2:67:A:O2'	1:2:68:A:H5'	2.00	0.61
1:2:295:U:C3'	1:2:295:U:C6	2.84	0.61
1:2:432:G:H21	10:ae:22:LEU:HD23	1.60	0.61
1:2:569:G:O2'	1:2:570:A:C5'	2.42	0.61
1:2:569:G:C3'	1:2:570:A:C5'	2.78	0.61
1:2:589:G:N2	1:2:604:U:O2	2.29	0.61
19:af:486:LEU:HD23	19:af:540:PHE:HZ	1.65	0.61
20:u:676:PRO:HG3	22:ab:1064:GLY:HA2	1.82	0.61
22:ab:961:LEU:HD12	22:ab:963:PRO:HD2	1.81	0.61
24:ac:686:ARG:C	38:l:318:ILE:H	2.07	0.61
28:ap:164:TRP:HA	28:ap:167:ARG:HD2	1.82	0.61
29:aq:164:ARG:NH2	29:aq:189:TYR:O	2.33	0.61
32:y:36:VAL:HG12	36:p:286:LEU:HD23	1.82	0.61
41:ai:104:ARG:HA	41:ai:109:VAL:HG22	1.82	0.61
41:ai:265:VAL:HG12	41:ai:267:GLY:H	1.65	0.61
48:q:20:SER:OG	48:q:27:ARG:O	2.15	0.61
62:l:232:LEU:HD13	107:BF:16:TRP:HB2	1.80	0.61
67:N:72:THR:N	1:1:316:A:OP1	2.28	0.61
67:N:87:PHE:HB2	75:V:19:ARG:NH2	2.14	0.61
77:X:101:PRO:HB2	92:Ai:164:LYS:NZ	2.16	0.61
91:Ab:248:GLU:HB3	108:Av:121:GLU:HG2	1.82	0.61
92:Ai:399:GLN:N	92:Ai:399:GLN:OE1	2.33	0.61
95:Aa:193:TYR:HD1	1:1:146:U:H2'	1.64	0.61

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
102:Aq:171:ALA:C	102:Aq:173:HIS:H	2.07	0.61
117:Ax:155:ASN:ND2	117:Ax:187:VAL:HG12	2.15	0.61
1:1:159:U:N3	1:1:166:U:OP2	2.34	0.61
1:2:177:U:O2'	33:w:64:VAL:CB	2.48	0.61
1:2:182:A:P	33:w:98:LEU:HD13	2.40	0.61
1:2:488:U:H5''	9:n:34:LYS:NZ	2.16	0.61
1:2:497:A:OP2	3:aw:3:ASP:HA	2.00	0.61
4:m:120:ARG:NH1	4:m:154:PRO:O	2.33	0.61
11:ay:128:GLY:O	14:e:781:GLN:NE2	2.34	0.61
12:ag:260:ARG:HB3	14:e:289:LEU:HD21	1.82	0.61
14:e:311:PHE:HB2	20:u:628:GLY:O	1.99	0.61
17:ax:134:ASN:O	17:ax:139:TRP:NE1	2.32	0.61
20:u:187:GLU:O	20:u:191:GLU:N	2.26	0.61
22:ab:31:ARG:HH12	22:ab:168:GLN:HA	1.65	0.61
28:ap:122:ALA:O	28:ap:220:ARG:NH1	2.34	0.61
36:p:135:LYS:HA	52:z:735:ARG:HH11	1.65	0.61
42:x:134:PHE:HD2	42:x:218:ALA:HB2	1.64	0.61
46:c:170:PRO:HG3	46:c:177:VAL:HA	1.82	0.61
50:a:255:ASN:HD22	50:a:259:SER:H	1.49	0.61
55:B:149:LYS:HZ3	55:B:153:ASN:HB2	1.65	0.61
58:E:186:ARG:HH22	1:1:458:A:N6	1.98	0.61
64:K:119:ALA:HB2	105:BP:-23:PRO:HB2	1.82	0.61
70:Q:143:ARG:HB3	70:Q:148:LEU:HB2	1.82	0.61
71:R:172:LYS:HE2	88:Az:73:HIS:HD2	1.64	0.61
71:R:205:TYR:O	71:R:213:THR:OG1	2.13	0.61
71:R:267:PRO:HG2	71:R:305:THR:HG21	1.82	0.61
80:BA:66:ALA:HB1	80:BA:87:ILE:HA	1.82	0.61
102:Aq:41:GLU:HG3	102:Aq:42:MET:H	1.64	0.61
102:Aq:167:SER:O	102:Aq:169:TYR:N	2.33	0.61
108:Av:76:MET:HA	108:Av:79:TYR:HB2	1.83	0.61
113:Ah:67:ARG:HH21	1:1:905:A:H4'	1.65	0.61
118:BL:335:HIS:HA	118:BL:340:VAL:HG11	1.83	0.61
1:2:111:A:H3'	1:2:112:U:C5	2.35	0.61
1:2:302:A:H2	1:2:303:G:C2	2.18	0.61
1:2:425:A:N1	13:aj:232:ASP:O	2.32	0.61
1:2:438:G:C4	1:2:444:A:H2	2.18	0.61
1:2:565:U:H6	1:2:565:U:OP1	1.83	0.61
1:2:613:U:C6	44:g:99:TRP:HZ3	2.16	0.61
15:d:113:ALA:O	26:an:300:GLN:NE2	2.33	0.61
16:az:57:ARG:NH1	16:az:101:GLN:OE1	2.34	0.61
22:ab:589:GLY:O	22:ab:593:ASN:ND2	2.31	0.61

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
34:v:125:LEU:O	34:v:129:GLY:N	2.32	0.61
43:i:329:GLU:OE1	43:i:330:THR:OG1	2.17	0.61
67:N:92:VAL:O	88:Az:28:ARG:NH1	2.32	0.61
69:P:112:ARG:HH22	100:BH:219:LYS:HE2	1.65	0.61
85:An:48:HIS:CD2	85:An:49:SER:H	2.19	0.61
85:An:117:MET:HB2	85:An:122:ILE:CG1	2.31	0.61
92:Ai:380:ARG:NH1	92:Ai:471:ILE:O	2.31	0.61
97:BM:138:VAL:HG23	97:BM:139:PRO:HD3	1.82	0.61
103:BE:54:ALA:O	103:BE:68:LEU:HD23	2.01	0.61
108:Av:61:MET:HG3	108:Av:63:HIS:H	1.64	0.61
113:Ah:243:LEU:O	113:Ah:245:ARG:N	2.33	0.61
1:1:203:A:H3'	1:1:204:U:H5'	1.81	0.61
1:1:527:U:O2'	1:1:528:A:H8	1.83	0.61
1:2:4:A:C5	25:ad:27:ILE:CD1	2.81	0.61
1:2:45:U:C3'	29:aq:22:PHE:N	2.52	0.61
1:2:316:A:H2	43:i:197:GLN:NE2	1.97	0.61
1:2:460:A:C2	8:am:300:ILE:CG2	2.64	0.61
16:az:34:GLU:OE1	16:az:37:ARG:N	2.29	0.61
42:x:253:CYS:HG	42:x:255:TRP:CD1	2.18	0.61
45:o:67:ARG:NH1	45:o:79:MET:O	2.27	0.61
54:A:300:THR:O	1:1:1154:A:O2'	2.18	0.61
68:O:266:THR:HG23	71:R:43:SER:H	1.66	0.61
77:X:400:VAL:O	77:X:404:ILE:HG12	2.01	0.61
78:Y:128:ARG:NH2	112:Ac:59:VAL:O	2.34	0.61
78:Y:134:PRO:HD2	112:Ac:137:GLU:HB3	1.83	0.61
84:Bj:74:ARG:NH2	90:BC:92:GLN:OE1	2.31	0.61
101:Am:216:MET:HG2	111:Ae:150:HIS:HA	1.82	0.61
105:BP:97:ARG:N	105:BP:98:PRO:CD	2.57	0.61
105:BP:163:ARG:HD2	108:Av:156:MET:HE2	1.81	0.61
111:Ae:171:LYS:HE2	1:1:426:G:H4'	1.81	0.61
115:Ay:38:ARG:HD3	115:Ay:38:ARG:H	1.66	0.61
117:Ax:75:VAL:HG23	117:Ax:202:PRO:HG2	1.83	0.61
118:BL:334:ILE:HB	118:BL:336:PRO:HD3	1.82	0.61
1:2:32:A:H2'	1:2:33:A:H5'	1.81	0.61
1:2:55:G:N2	1:2:56:U:O4	2.29	0.61
1:2:413:U:C6	10:ae:161:ARG:HB2	2.36	0.61
1:2:448:U:C6	2:h:123:ARG:CB	2.83	0.61
1:2:467:U:O2	14:e:379:SER:OG	2.15	0.61
8:am:242:LEU:HA	36:p:24:TRP:HE1	1.65	0.61
9:n:106:THR:HG22	9:n:109:HIS:CD2	2.36	0.61
10:ae:351:VAL:HA	13:aj:77:VAL:HG21	1.82	0.61

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
10:ae:531:TYR:H	12:ag:252:ASP:HB3	1.64	0.61
18:r:91:ILE:HA	18:r:94:LEU:HD23	1.81	0.61
19:af:746:ARG:NH1	19:af:750:GLU:OE2	2.34	0.61
21:aa:165:ARG:NH1	21:aa:166:TYR:OH	2.32	0.61
22:ab:688:ARG:NH1	22:ab:701:GLU:OE1	2.34	0.61
24:ac:688:GLU:HB3	38:l:320:ALA:H	1.66	0.61
35:t:99:ASN:OD1	35:t:100:ILE:N	2.33	0.61
37:j:116:TRP:HE1	37:j:125:LEU:HB3	1.65	0.61
38:l:557:LEU:HD11	38:l:577:LEU:HD13	1.83	0.61
45:o:73:GLU:HA	45:o:186:LYS:HE2	1.80	0.61
55:B:402:HIS:N	55:B:403:PRO:HD3	2.16	0.61
58:E:130:ARG:HD2	108:Av:29:ASP:HA	1.82	0.61
58:E:186:ARG:HH22	1:l:458:A:H61	1.49	0.61
62:I:180:THR:HG22	73:T:76:GLU:H	1.65	0.61
64:K:44:ARG:NH2	1:l:156:A:OP2	2.28	0.61
66:M:92:VAL:HG12	99:Aj:467:VAL:HA	1.82	0.61
69:P:33:HIS:O	96:Ao:67:ARG:NH1	2.34	0.61
71:R:403:LYS:NZ	1:l:63:G:OP1	2.33	0.61
75:V:54:VAL:HG12	77:X:461:ARG:HE	1.66	0.61
79:Z:43:ILE:O	79:Z:44:LEU:HB3	2.01	0.61
81:UA:81:UNK:HA	117:Ax:127:ASN:HB2	1.82	0.61
85:An:110:PHE:HZ	85:An:187:PHE:HA	1.65	0.61
101:Am:178:ASN:OD1	101:Am:179:ALA:N	2.33	0.61
113:Ah:68:ILE:HG12	1:l:905:A:N1	2.15	0.61
115:Ay:38:ARG:HH12	1:l:749:U:H1'	1.64	0.61
1:2:70:A:C3'	35:t:10:ALA:O	2.49	0.61
1:2:280:A:H62	46:c:171:LYS:CB	2.13	0.61
8:am:32:THR:HB	8:am:35:TYR:HB2	1.82	0.61
10:ae:51:TRP:O	10:ae:55:ARG:NH1	2.34	0.61
10:ae:360:ALA:HB1	10:ae:365:LYS:HB2	1.83	0.61
12:ag:511:ARG:NH2	38:l:513:GLU:OE2	2.34	0.61
18:r:161:THR:HG21	20:u:847:VAL:HG23	1.82	0.61
19:af:533:CYS:SG	19:af:534:TYR:N	2.73	0.61
20:u:567:TYR:CZ	22:ab:609:ARG:HD3	2.36	0.61
20:u:745:THR:HG22	20:u:793:ALA:HB3	1.82	0.61
23:ak:240:ALA:O	23:ak:243:LEU:N	2.34	0.61
25:ad:165:MET:HG3	25:ad:170:PHE:HB2	1.82	0.61
31:at:276:ALA:HA	31:at:301:SER:HA	1.83	0.61
31:at:282:PRO:HA	31:at:285:PHE:HB3	1.83	0.61
32:y:305:GLU:HG2	36:p:271:HIS:HB2	1.82	0.61
35:t:228:ARG:NH2	48:q:43:ASN:OD1	2.31	0.61

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
40:av:73:ARG:HG3	40:av:74:HIS:H	1.65	0.61
52:z:122:ARG:HD3	52:z:148:PHE:H	1.65	0.61
55:B:375:GLN:O	89:At:113:ARG:NH2	2.34	0.61
61:H:93:VAL:HG12	61:H:94:VAL:HG23	1.81	0.61
67:N:203:ARG:HB2	67:N:215:LEU:HD12	1.81	0.61
68:O:31:ARG:HG2	1:1:135:A:H4'	1.82	0.61
80:BA:56:LEU:O	80:BA:60:ASP:N	2.33	0.61
86:Al:233:ARG:NH2	92:Ai:424:GLY:O	2.34	0.61
91:Ab:14:VAL:HG22	91:Ab:57:ILE:HD11	1.83	0.61
96:Ao:158:ILE:O	96:Ao:162:SER:OG	2.18	0.61
98:Ar:147:LEU:HD21	105:BP:141:TYR:CE2	2.35	0.61
98:Ar:149:GLU:OE2	98:Ar:155:ARG:NH2	2.34	0.61
113:Ah:165:TYR:HB2	113:Ah:281:ILE:HD12	1.82	0.61
113:Ah:187:GLU:HA	113:Ah:197:VAL:HG22	1.83	0.61
115:Ay:37:ASP:OD1	1:1:748:U:N3	2.34	0.61
120:BG:1341:VAL:HG23	120:BG:1342:CYS:H	1.64	0.61
1:2:70:A:C2'	35:t:10:ALA:O	2.48	0.61
1:2:88:U:C5'	47:k:158:HIS:NE2	2.64	0.61
1:2:315:A:C8	1:2:315:A:H5''	2.36	0.61
1:2:375:A:N3	1:2:375:A:H2'	2.16	0.61
1:2:529:A:N3	16:az:72:LYS:HE2	2.00	0.61
10:ae:357:MET:HE1	13:aj:75:PHE:HD1	1.66	0.61
14:e:389:GLU:HG2	15:d:337:GLY:HA2	1.82	0.61
15:d:41:MET:SD	36:p:191:GLN:NE2	2.74	0.61
16:az:48:MET:HE2	17:ax:88:ILE:HD13	1.83	0.61
18:r:153:HIS:HE2	18:r:259:LEU:HD22	1.65	0.61
24:ac:990:GLN:HA	24:ac:993:ILE:HG12	1.82	0.61
68:O:132:LYS:HB2	68:O:133:PRO:HD2	1.83	0.61
82:BB:112:LEU:HD21	111:Ae:10:PHE:CE1	2.36	0.61
90:BC:77:HIS:O	112:Ac:24:THR:N	2.34	0.61
98:Ar:204:LEU:HG	98:Ar:205:TYR:H	1.66	0.61
100:BH:176:CYS:HG	100:BH:185:SER:HG	1.47	0.61
1:1:865:A:O2'	1:1:870:A:N7	2.29	0.61
1:2:97:A:H4'	1:2:98:A:OP1	2.00	0.61
1:2:175:U:H6	48:q:11:GLN:HG2	1.62	0.61
1:2:209:U:H2'	1:2:210:U:C4'	2.30	0.61
1:2:475:U:O4	6:s:142:ARG:CZ	2.49	0.61
1:2:589:G:H8	1:2:589:G:OP2	1.84	0.61
2:h:25:VAL:HG22	2:h:92:VAL:HG13	1.83	0.61
8:am:172:PHE:O	8:am:177:ARG:NH2	2.34	0.61
13:aj:246:VAL:O	13:aj:292:ASN:ND2	2.34	0.61

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
14:e:418:ARG:NH2	22:ab:1048:GLU:OE1	2.34	0.61
18:r:382:LEU:HD12	18:r:385:ALA:HB3	1.83	0.61
21:aa:114:THR:O	25:ad:269:LYS:NZ	2.34	0.61
24:ac:830:MET:HG2	24:ac:833:ASP:HB3	1.82	0.61
24:ac:863:ARG:HB2	24:ac:889:PRO:HB3	1.82	0.61
37:j:37:VAL:HG12	37:j:38:THR:H	1.66	0.61
38:l:653:ILE:O	38:l:654:LEU:HD23	2.01	0.61
48:q:185:MET:HE1	49:b:61:TYR:CG	2.36	0.61
50:a:226:LEU:HD12	50:a:252:CYS:HB2	1.83	0.61
50:a:255:ASN:HB3	50:a:258:ALA:H	1.64	0.61
52:z:450:PHE:HD1	52:z:515:ALA:HB2	1.66	0.61
53:bd:47:ASN:OD1	53:bd:48:LEU:N	2.34	0.61
62:l:23:ARG:NH2	1:l:600:A:N3	2.48	0.61
62:l:238:ARG:NH2	68:O:88:ARG:O	2.34	0.61
71:R:242:ALA:HA	71:R:245:SER:HB2	1.83	0.61
75:V:61:LYS:HD3	1:l:955:U:H4'	1.83	0.61
79:Z:28:THR:HG22	85:An:81:GLN:OE1	2.01	0.61
96:Ao:260:GLN:O	96:Ao:262:MET:N	2.34	0.61
110:As:51:ARG:NH2	123:UD:42:UNK:O	2.34	0.61
1:2:301:U:C6	1:2:302:A:N7	2.68	0.60
1:2:370:A:C2	1:2:372:A:H5''	2.36	0.60
1:2:471:A:OP1	13:aj:11:GLY:CA	2.49	0.60
1:2:486:A:H5'	9:n:145:PRO:CB	2.23	0.60
1:2:589:G:N1	1:2:604:U:N3	2.25	0.60
2:h:55:LEU:O	14:e:465:ARG:HB2	2.01	0.60
18:r:386:ILE:HD13	18:r:428:TYR:HE1	1.66	0.60
20:u:407:ARG:O	20:u:407:ARG:NH2	2.26	0.60
22:ab:361:ASP:OD1	22:ab:373:ARG:NH2	2.33	0.60
23:ak:248:VAL:HB	23:ak:252:VAL:HG21	1.82	0.60
25:ad:484:PHE:HA	25:ad:487:LYS:HB2	1.83	0.60
27:ao:64:LEU:HD11	46:c:81:LEU:HD13	1.83	0.60
31:at:312:CYS:HB2	31:at:317:GLN:H	1.66	0.60
46:c:214:LEU:HD22	46:c:219:LEU:HD12	1.83	0.60
71:R:126:PRO:O	87:BI:161:GLN:NE2	2.29	0.60
71:R:187:ASP:OD1	71:R:188:ALA:N	2.34	0.60
79:Z:50:PRO:CD	79:Z:53:MET:HE3	2.31	0.60
88:Az:33:LYS:HD2	1:l:64:A:H5'	1.83	0.60
97:BM:271:ARG:O	97:BM:275:SER:N	2.33	0.60
113:Ah:182:ARG:O	113:Ah:182:ARG:NH1	2.34	0.60
113:Ah:457:PHE:HB3	113:Ah:461:ARG:NH1	2.15	0.60
1:1:650:U:O2'	1:1:651:U:O5'	2.19	0.60

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:112:U:H2'	1:2:112:U:O2	2.00	0.60
1:2:141:A:N6	1:2:267:A:C8	2.69	0.60
1:2:289:A:H1'	1:2:310:A:O2'	2.01	0.60
1:2:406:A:H61	3:aw:31:ARG:NH2	1.99	0.60
1:2:460:A:OP1	8:am:307:TYR:O	2.19	0.60
10:ae:471:ARG:HG2	10:ae:475:TRP:HE1	1.65	0.60
12:ag:320:PRO:HG2	22:ab:435:THR:HG23	1.82	0.60
17:ax:155:SER:N	17:ax:159:GLN:OE1	2.34	0.60
21:aa:334:LYS:HG2	21:aa:335:HIS:H	1.66	0.60
21:aa:1063:ALA:HB2	42:x:142:TRP:HB3	1.82	0.60
22:ab:667:MET:HG2	38:l:583:GLN:NE2	2.15	0.60
22:ab:818:GLU:N	22:ab:818:GLU:OE1	2.35	0.60
22:ab:955:ASP:HB3	22:ab:958:ASN:HA	1.82	0.60
24:ac:551:THR:OG1	24:ac:554:ARG:NH2	2.30	0.60
31:at:319:TYR:OH	31:at:326:ARG:NH1	2.34	0.60
34:v:136:SER:O	34:v:140:SER:N	2.33	0.60
38:l:320:ALA:HA	38:l:323:ARG:HB3	1.82	0.60
42:x:127:SER:OG	42:x:207:CYS:SG	2.58	0.60
45:o:132:ARG:HG3	50:a:348:TYR:HB3	1.82	0.60
50:a:69:GLU:OE2	50:a:78:LYS:NZ	2.35	0.60
59:F:5:TRP:HE3	59:F:7:CYS:H	1.46	0.60
68:O:157:ILE:HG13	68:O:169:GLN:HB2	1.82	0.60
74:U:25:PHE:HB2	1:1:933:G:C2	2.35	0.60
78:Y:86:ASP:HB2	90:BC:38:LEU:HD21	1.83	0.60
104:Ak:102:LEU:O	104:Ak:106:ARG:N	2.33	0.60
113:Ah:449:VAL:HA	113:Ah:457:PHE:CD2	2.36	0.60
1:1:574:A:O2'	1:1:575:G:O4'	2.19	0.60
1:1:936:G:H1	1:1:947:U:H3	1.49	0.60
1:1:969:U:O2'	1:1:970:A:O4'	2.15	0.60
1:1:1097:A:O2'	1:1:1098:A:OP1	2.16	0.60
1:2:4:A:H61	25:ad:27:ILE:HD11	1.56	0.60
1:2:48:U:C4	29:aq:11:SER:O	2.54	0.60
1:2:205:U:O4	31:at:230:ARG:NH1	2.34	0.60
1:2:282:A:O4'	43:i:247:ILE:HG12	1.95	0.60
1:2:435:U:C4	6:s:160:ALA:CA	2.83	0.60
1:2:437:U:C6	6:s:151:ARG:C	2.78	0.60
1:2:460:A:O4'	8:am:306:LEU:CB	2.48	0.60
1:2:525:A:O5'	15:d:329:ARG:HA	1.95	0.60
2:h:109:PRO:HB2	14:e:372:ARG:HH22	1.67	0.60
7:au:126:ILE:H	7:au:126:ILE:HD12	1.66	0.60
25:ad:28:LEU:HD21	46:c:269:LEU:HD21	1.83	0.60

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
28:ap:8:ARG:HH22	52:z:760:PRO:HA	1.65	0.60
29:aq:19:TRP:HZ3	29:aq:65:ALA:HB2	1.66	0.60
31:at:324:ARG:NE	33:w:39:GLU:OE2	2.33	0.60
36:p:91:ARG:HG3	52:z:139:ARG:HH22	1.66	0.60
45:o:132:ARG:CD	50:a:352:PHE:HA	2.32	0.60
52:z:294:GLN:NE2	52:z:382:ASN:O	2.35	0.60
52:z:651:ARG:NH2	52:z:671:THR:OG1	2.34	0.60
59:F:92:GLU:O	111:Ae:61:ASN:ND2	2.25	0.60
64:K:23:MET:SD	1:1:146:U:O4	2.58	0.60
66:M:132:TYR:OH	68:O:71:GLU:OE2	2.18	0.60
70:Q:106:THR:HG21	1:1:905:A:C2	2.37	0.60
78:Y:175:ASP:OD1	78:Y:176:ASP:N	2.34	0.60
83:Aw:80:THR:HG21	116:Ag:77:ARG:CZ	2.31	0.60
91:Ab:195:GLU:CD	91:Ab:195:GLU:H	2.09	0.60
94:Au:14:LEU:HD11	1:1:286:G:C4	2.35	0.60
101:Am:214:SER:HB2	101:Am:221:GLU:HG3	1.83	0.60
1:1:1077:G:N3	1:1:1091:G:N2	2.48	0.60
1:2:39:U:O2	29:aq:10:ALA:HB3	1.94	0.60
1:2:256:U:C4'	1:2:257:U:C5'	2.79	0.60
1:2:281:A:N6	43:i:251:ILE:HA	2.15	0.60
1:2:409:U:H5	9:n:56:HIS:HD1	1.47	0.60
1:2:410:A:H2'	1:2:410:A:N3	2.15	0.60
1:2:436:U:P	6:s:154:VAL:CG1	2.89	0.60
10:ae:348:ASP:OD1	10:ae:449:ARG:NH1	2.34	0.60
15:d:46:ILE:HG21	15:d:86:GLU:HG2	1.84	0.60
24:ac:685:LEU:HB2	38:l:316:PRO:HG2	1.82	0.60
25:ad:536:THR:HB	30:as:215:TRP:CZ3	2.34	0.60
38:l:144:TRP:CZ2	38:l:318:ILE:HD13	2.36	0.60
39:ar:56:ARG:HB3	39:ar:169:GLY:HA2	1.82	0.60
48:q:141:ARG:NH1	49:b:122:ARG:HH21	1.96	0.60
57:D:102:GLN:O	57:D:106:LEU:N	2.32	0.60
59:F:113:ARG:NH1	1:1:151:G:H5'	2.16	0.60
61:H:72:LEU:HB3	61:H:77:ARG:HH22	1.65	0.60
64:K:145:HIS:N	99:Aj:222:GLU:OE2	2.33	0.60
67:N:138:PHE:O	67:N:142:PHE:N	2.24	0.60
72:S:252:ARG:HB3	109:Af:54:PHE:CE2	2.37	0.60
77:X:170:VAL:HG12	77:X:206:THR:HG22	1.82	0.60
78:Y:108:LEU:HB3	78:Y:111:ALA:HB3	1.84	0.60
94:Au:40:ARG:NH2	1:1:253:U:O4	2.27	0.60
95:Aa:47:SER:HB2	1:1:845:A:H4'	1.82	0.60
102:Aq:153:MET:HG3	102:Aq:168:GLN:HG2	1.81	0.60

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
104:Ak:160:ILE:HG23	104:Ak:198:LEU:HD21	1.83	0.60
114:BD:47:GLU:OE1	114:BD:50:ARG:NH1	2.34	0.60
1:1:862:A:H61	1:1:1105:G:H22	1.48	0.60
1:2:203:U:OP2	31:at:230:ARG:NH2	2.35	0.60
1:2:413:U:O4	2:h:23:HIS:HA	2.01	0.60
1:2:486:A:H4'	9:n:145:PRO:CB	2.31	0.60
1:2:510:A:H62	3:aw:21:ASP:HA	1.64	0.60
18:r:132:VAL:HG13	18:r:142:THR:HG21	1.84	0.60
21:aa:321:ARG:HB2	31:at:198:ALA:HB2	1.83	0.60
21:aa:1071:LYS:NZ	21:aa:1124:GLU:OE2	2.27	0.60
21:aa:1562:ALA:O	21:aa:1566:ARG:NE	2.32	0.60
22:ab:79:MET:O	22:ab:80:GLN:NE2	2.34	0.60
24:ac:441:LEU:HB3	24:ac:461:GLN:HB2	1.84	0.60
25:ad:596:LEU:O	25:ad:600:TYR:N	2.29	0.60
30:as:270:PHE:OXT	35:t:125:THR:OG1	2.19	0.60
37:j:74:LYS:HG2	37:j:75:SER:H	1.67	0.60
38:l:572:SER:OG	38:l:574:LYS:O	2.19	0.60
50:a:399:LEU:O	50:a:401:LYS:NZ	2.28	0.60
52:z:431:THR:HA	52:z:457:LEU:HD22	1.84	0.60
64:K:14:THR:OG1	1:1:522:U:N3	2.35	0.60
66:M:12:LEU:HD13	66:M:13:ARG:HB2	1.84	0.60
66:M:214:ASP:HB3	66:M:222:ALA:O	2.01	0.60
67:N:194:ARG:HB2	1:1:565:U:H3	1.67	0.60
71:R:40:ARG:HA	71:R:101:ARG:HH21	1.67	0.60
78:Y:42:GLN:OE1	116:Ag:206:TRP:NE1	2.28	0.60
79:Z:56:GLY:HA3	79:Z:61:GLY:HA2	1.83	0.60
85:An:22:ARG:NH1	94:Au:23:ALA:O	2.34	0.60
89:At:156:GLN:O	89:At:156:GLN:NE2	2.34	0.60
97:BM:17:ARG:HH22	97:BM:19:PHE:HB3	1.65	0.60
100:BH:18:MET:HE2	100:BH:166:TRP:HB2	1.81	0.60
111:Ae:253:GLN:HB3	1:1:426:G:C2	2.37	0.60
112:Ac:188:ARG:NH1	112:Ac:190:ASP:O	2.32	0.60
112:Ac:205:GLN:HB3	112:Ac:249:PHE:HD1	1.67	0.60
1:1:135:A:O2'	1:1:136:A:N3	2.23	0.60
1:1:622:U:O4	1:1:623:A:N6	2.34	0.60
1:1:699:A:H2'	1:1:699:A:N3	2.15	0.60
1:2:119:U:C2'	1:2:120:U:H5'	2.31	0.60
1:2:294:A:H2'	1:2:295:U:O4'	2.00	0.60
1:2:295:U:H3'	1:2:295:U:C6	2.33	0.60
5:f:225:ASP:O	5:f:226:LEU:HG	2.02	0.60
20:u:175:ILE:HA	20:u:178:MET:HE3	1.83	0.60

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
21:aa:238:GLN:OE1	31:at:269:ARG:NH1	2.33	0.60
21:aa:265:HIS:O	21:aa:269:SER:OG	2.20	0.60
21:aa:975:TRP:O	21:aa:979:ASN:ND2	2.34	0.60
26:an:68:GLY:O	26:an:95:TYR:OH	2.10	0.60
38:l:616:ASP:OD1	38:l:646:TYR:OH	2.14	0.60
49:b:20:GLN:O	49:b:24:GLU:N	2.26	0.60
58:E:319:GLU:HB3	58:E:323:ARG:NH2	2.16	0.60
63:J:92:TYR:OH	63:J:99:ASN:ND2	2.35	0.60
65:L:160:LEU:HD21	101:Am:251:PRO:HD2	1.84	0.60
66:M:150:LEU:HD13	66:M:202:ILE:HG13	1.84	0.60
70:Q:89:SER:OG	70:Q:90:ARG:N	2.34	0.60
78:Y:127:TYR:HE1	112:Ac:238:THR:HG21	1.66	0.60
78:Y:247:TYR:HH	78:Y:258:TRP:HE1	1.46	0.60
89:At:87:ARG:NH2	116:Ag:85:GLU:OE2	2.35	0.60
92:Ai:450:LEU:HD12	116:Ag:165:ILE:HD13	1.84	0.60
93:Ap:26:MET:HG2	93:Ap:29:TRP:CE2	2.36	0.60
99:Aj:322:ASN:OD1	99:Aj:325:GLN:N	2.34	0.60
101:Am:183:VAL:HG21	103:BE:102:VAL:HG11	1.82	0.60
118:BL:139:ARG:O	118:BL:140:SER:HB3	2.02	0.60
120:BG:1304:MET:HE2	120:BG:1316:PRO:HD3	1.84	0.60
1:1:410:A:O2'	1:1:411:U:OP2	2.16	0.60
1:2:45:U:P	29:aq:23:LEU:HB3	2.41	0.60
1:2:292:A:C8	1:2:292:A:H5''	2.36	0.60
1:2:502:A:N9	14:e:722:PHE:HE2	1.78	0.60
1:2:513:U:C1'	16:az:146:TYR:CE1	2.74	0.60
1:2:585:U:C6	1:2:585:U:C5'	2.84	0.60
2:h:62:LEU:HD21	14:e:700:ASP:HA	1.83	0.60
12:ag:257:VAL:O	12:ag:261:HIS:HB2	2.01	0.60
13:aj:101:ILE:HG23	13:aj:140:LEU:HD11	1.82	0.60
18:r:51:ASN:OD1	18:r:76:ARG:NH1	2.34	0.60
19:af:307:LEU:HB2	19:af:344:VAL:HG12	1.82	0.60
22:ab:46:LEU:HD23	38:l:355:GLN:HE22	1.67	0.60
22:ab:103:VAL:HG11	22:ab:175:TYR:HE1	1.67	0.60
24:ac:684:ILE:C	38:l:316:PRO:HB2	2.26	0.60
29:aq:69:VAL:HG22	40:av:186:TRP:HB3	1.82	0.60
50:a:25:ILE:HD11	50:a:244:ALA:HA	1.84	0.60
71:R:411:LYS:NZ	1:1:116:U:H5'	2.16	0.60
79:Z:131:TRP:HZ2	1:1:567:A:C8	2.20	0.60
81:UA:152:UNK:O	81:UA:156:UNK:N	2.34	0.60
93:Ap:79:TRP:CD1	93:Ap:93:LYS:HE2	2.37	0.60
113:Ah:390:ASN:OD1	113:Ah:391:ALA:N	2.34	0.60

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:162:G:H8	1:1:164:U:H1'	1.67	0.60
1:1:438:G:H22	1:1:446:U:H3	1.50	0.60
1:1:841:A:H61	1:1:854:A:N6	2.00	0.60
1:2:130:U:H2'	1:2:131:U:C5'	2.12	0.60
1:2:227:U:C6	1:2:227:U:C5'	2.85	0.60
1:2:418:A:C6	13:aj:54:PRO:CA	2.83	0.60
14:e:106:PHE:HB2	14:e:111:ARG:HG3	1.84	0.60
21:aa:160:LEU:O	48:q:106:GLN:NE2	2.35	0.60
21:aa:933:VAL:HG21	26:an:115:LYS:HG2	1.83	0.60
24:ac:622:LEU:HD12	24:ac:625:ALA:HB3	1.84	0.60
24:ac:652:GLN:HE22	24:ac:882:MET:HG2	1.66	0.60
26:an:137:VAL:HG21	26:an:148:VAL:HG21	1.84	0.60
29:aq:126:LEU:HD11	35:t:76:GLN:HE21	1.67	0.60
30:as:79:ARG:HH22	40:av:150:ASP:HB2	1.67	0.60
36:p:127:ARG:HH22	36:p:131:GLU:HB2	1.66	0.60
41:ai:278:ASP:O	41:ai:283:ARG:NH2	2.34	0.60
41:ai:326:SER:OG	41:ai:330:ARG:NH1	2.34	0.60
60:G:166:TYR:HB2	102:Aq:302:PRO:HD2	1.83	0.60
62:I:18:HIS:HB3	1:1:815:A:O2'	2.02	0.60
64:K:102:TYR:HE1	95:Aa:157:LEU:HG	1.67	0.60
70:Q:84:GLU:HB3	70:Q:99:LEU:HD23	1.82	0.60
77:X:240:ALA:HB1	77:X:243:ALA:HB3	1.84	0.60
79:Z:86:ILE:HA	79:Z:89:VAL:HG12	1.82	0.60
83:Aw:8:ARG:HH22	86:Al:286:ASP:HB3	1.67	0.60
85:An:22:ARG:HH21	1:1:286:G:N2	2.00	0.60
90:BC:105:MET:HE1	116:Ag:209:ARG:HG3	1.84	0.60
93:Ap:164:PHE:O	93:Ap:168:ASN:ND2	2.26	0.60
97:BM:128:LEU:HB2	97:BM:278:LEU:HD22	1.82	0.60
100:BH:191:ASP:OD1	100:BH:192:CYS:N	2.35	0.60
101:Am:32:LYS:HG2	1:1:1124:A:H61	1.67	0.60
103:BE:56:HIS:CD2	103:BE:57:THR:H	2.13	0.60
1:1:1038:U:O4	1:1:1055:U:O2'	2.20	0.60
1:2:46:U:C2'	1:2:47:U:H5'	2.32	0.60
1:2:303:G:H8	1:2:303:G:C5'	2.13	0.60
2:h:73:CYS:O	2:h:77:ASN:ND2	2.35	0.60
12:ag:541:ARG:NH2	22:ab:308:THR:O	2.34	0.60
14:e:556:TRP:CD1	14:e:582:MET:HA	2.37	0.60
18:r:67:MET:HG3	18:r:70:MET:HB2	1.83	0.60
18:r:163:LEU:HD12	18:r:164:PRO:HD2	1.84	0.60
22:ab:118:ARG:HB3	24:ac:686:ARG:HH12	1.66	0.60
22:ab:132:ARG:HH12	24:ac:732:ALA:C	2.10	0.60

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
24:ac:996:GLN:N	24:ac:996:GLN:OE1	2.35	0.60
24:ac:1038:LEU:HD11	24:ac:1065:GLY:HA2	1.84	0.60
25:ad:264:LEU:HD21	47:k:85:PHE:HE1	1.66	0.60
25:ad:604:ARG:NH2	25:ad:641:ASP:OD1	2.31	0.60
33:w:65:HIS:HE2	33:w:126:TRP:CD1	2.20	0.60
35:t:121:TRP:HB3	35:t:128:LYS:HB3	1.84	0.60
38:l:456:SER:O	38:l:459:VAL:HB	2.02	0.60
41:ai:153:SER:HB2	41:ai:171:ASN:HB2	1.82	0.60
49:b:23:ARG:CG	85:An:150:PHE:HE1	2.02	0.60
54:A:286:PRO:HG2	59:F:77:ALA:O	2.02	0.60
62:I:59:ARG:NH2	1:l:601:A:OP2	2.35	0.60
66:M:159:ARG:HE	66:M:243:LEU:HD22	1.66	0.60
91:Ab:132:GLN:HA	91:Ab:135:ARG:HG2	1.84	0.60
96:Ao:26:ARG:NH1	1:l:336:U:OP2	2.33	0.60
98:Ar:40:ARG:HD3	98:Ar:42:ILE:HG22	1.84	0.60
98:Ar:108:TYR:N	98:Ar:139:TYR:OH	2.35	0.60
99:Aj:443:ARG:NE	99:Aj:448:GLU:OE1	2.35	0.60
104:Ak:42:ALA:O	104:Ak:46:GLU:N	2.22	0.60
109:Af:64:ARG:NH1	109:Af:65:VAL:O	2.35	0.60
116:Ag:49:ARG:HD3	1:l:82:U:H2'	1.84	0.60
117:Ax:127:ASN:ND2	117:Ax:199:GLN:OE1	2.35	0.60
1:l:41:A:C6	1:l:137:U:H5''	2.36	0.60
1:l:641:A:N6	1:l:795:U:O2'	2.35	0.60
1:l:681:G:H1	1:l:793:C:H42	1.50	0.60
1:2:13:U:C6	50:a:262:PRO:HB3	2.37	0.60
1:2:166:G:H2'	1:2:167:U:C2'	2.31	0.60
1:2:315:A:C2'	1:2:316:A:C8	2.85	0.60
1:2:331:U:C5	1:2:359:A:O2'	2.55	0.60
1:2:415:A:O4'	10:ae:36:ARG:NH1	2.27	0.60
1:2:420:U:OP1	13:aj:59:VAL:CG2	2.50	0.60
1:2:483:A:C5	2:h:83:LYS:O	2.55	0.60
1:2:503:A:O2'	6:s:82:LEU:CD2	2.50	0.60
1:2:615:U:P	44:g:101:ARG:HE	2.23	0.60
15:d:60:GLN:HE22	36:p:197:PRO:HB3	1.66	0.60
21:aa:1129:ASN:ND2	21:aa:1139:LEU:O	2.33	0.60
22:ab:117:ALA:O	22:ab:126:ARG:NH2	2.32	0.60
35:t:118:ARG:NH2	35:t:168:THR:OG1	2.35	0.60
38:l:623:TRP:HA	38:l:626:HIS:CD2	2.37	0.60
38:l:639:MET:HG3	38:l:643:PHE:HE1	1.67	0.60
39:ar:148:CYS:O	39:ar:152:ALA:N	2.23	0.60
39:ar:163:LEU:HD21	39:ar:190:LEU:HD22	1.84	0.60

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
39:ar:167:GLY:HA2	39:ar:248:HIS:HA	1.83	0.60
43:i:267:ARG:HH21	47:k:170:GLU:HB3	1.66	0.60
46:c:86:ALA:O	46:c:90:ASP:N	2.35	0.60
50:a:49:PRO:HA	50:a:52:ASN:HB3	1.84	0.60
55:B:124:ASN:HB2	55:B:199:SER:CB	2.22	0.60
61:H:163:GLU:HG2	98:Ar:168:TRP:HH2	1.67	0.60
65:L:166:TRP:NE1	95:Aa:126:GLU:HG3	2.17	0.60
71:R:200:ARG:HD3	89:At:98:THR:HG21	1.84	0.60
79:Z:76:ARG:HD3	79:Z:77:GLY:N	2.17	0.60
84:Bj:50:ARG:HA	84:Bj:53:SER:HB3	1.83	0.60
85:An:117:MET:N	85:An:117:MET:SD	2.75	0.60
85:An:137:GLU:HB3	113:Ah:472:ARG:HH22	1.67	0.60
91:Ab:145:TYR:O	91:Ab:149:TYR:N	2.34	0.60
92:Ai:253:PHE:HB2	92:Ai:388:MET:HE1	1.84	0.60
92:Ai:279:ILE:HA	92:Ai:283:TYR:HD2	1.67	0.60
95:Aa:68:ALA:O	95:Aa:70:THR:HG23	2.02	0.60
97:BM:311:CYS:HB3	97:BM:314:GLN:HB2	1.84	0.60
101:Am:11:LYS:N	1:1:1022:A:OP1	2.34	0.60
105:BP:63:GLU:HG3	105:BP:65:LEU:HB2	1.84	0.60
116:Ag:172:TRP:HA	116:Ag:175:VAL:HG12	1.84	0.60
118:BL:119:ARG:NH1	118:BL:132:HIS:C	2.58	0.60
1:1:162:G:C8	1:1:164:U:H1'	2.36	0.60
1:1:527:U:O2'	1:1:528:A:OP2	2.17	0.60
1:2:48:U:C5'	1:2:48:U:C6	2.84	0.59
1:2:283:U:O5'	43:i:247:ILE:HD12	2.00	0.59
1:2:394:U:O2'	1:2:395:U:P	2.60	0.59
1:2:396:A:N7	1:2:529:A:C4	2.70	0.59
1:2:396:A:C8	1:2:529:A:N3	2.70	0.59
1:2:437:U:C4'	6:s:153:LYS:CD	2.80	0.59
10:ae:486:ARG:HH12	12:ag:124:HIS:CE1	2.20	0.59
12:ag:444:TRP:CG	22:ab:232:LYS:HB2	2.37	0.59
13:aj:213:ASP:OD1	13:aj:216:GLY:N	2.34	0.59
21:aa:81:ARG:NH2	47:k:88:PRO:O	2.34	0.59
21:aa:730:ARG:NH1	21:aa:756:ARG:O	2.35	0.59
22:ab:410:LEU:HD12	22:ab:416:MET:HG2	1.84	0.59
23:ak:133:HIS:O	23:ak:136:SER:OG	2.16	0.59
25:ad:657:VAL:HG12	48:q:49:VAL:HA	1.84	0.59
28:ap:188:VAL:O	41:ai:299:ARG:NH1	2.34	0.59
32:y:105:ALA:O	32:y:273:ASN:ND2	2.35	0.59
40:av:65:GLU:HG3	40:av:74:HIS:CE1	2.37	0.59
44:g:126:VAL:HA	44:g:134:VAL:HG21	1.84	0.59

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
71:R:208:TRP:CG	71:R:211:SER:HG	2.20	0.59
75:V:123:LEU:HB2	75:V:126:TRP:HD1	1.67	0.59
96:Ao:131:LEU:HD22	96:Ao:197:LEU:HD11	1.84	0.59
98:Ar:31:PRO:O	98:Ar:40:ARG:NH1	2.23	0.59
119:BO:39:ARG:HG3	119:BO:40:LYS:H	1.67	0.59
1:1:202:A:H4'	1:1:203:A:O4'	2.01	0.59
1:2:10:U:H2'	1:2:10:U:O2	2.03	0.59
1:2:227:U:C5'	1:2:227:U:H6	2.16	0.59
1:2:282:A:N1	43:i:251:ILE:HG21	2.16	0.59
1:2:431:U:H2'	13:aj:280:HIS:ND1	2.16	0.59
1:2:437:U:H5''	6:s:153:LYS:HE2	1.83	0.59
1:2:472:A:C2	12:ag:15:TYR:CD2	2.86	0.59
1:2:525:A:C8	15:d:221:ASP:CA	2.86	0.59
1:2:556:U:C5'	1:2:556:U:C6	2.84	0.59
19:af:517:VAL:HG11	19:af:631:VAL:HG11	1.84	0.59
21:aa:349:TRP:HE3	21:aa:352:VAL:HG21	1.68	0.59
21:aa:532:ALA:O	21:aa:835:ARG:NH2	2.34	0.59
23:ak:174:THR:HG23	23:ak:176:TRP:H	1.66	0.59
24:ac:331:CYS:O	24:ac:335:HIS:N	2.32	0.59
41:ai:265:VAL:HG22	41:ai:270:ILE:HG23	1.83	0.59
45:o:104:LEU:O	45:o:109:SER:OG	2.19	0.59
52:z:303:GLY:HA2	52:z:386:ARG:HB2	1.83	0.59
56:C:216:GLU:N	56:C:216:GLU:OE1	2.35	0.59
59:F:76:THR:HG21	1:1:1120:U:H5''	1.84	0.59
60:G:46:LEU:HD21	72:S:338:PRO:HG2	1.83	0.59
71:R:170:ILE:HD11	71:R:173:LEU:HB3	1.83	0.59
77:X:252:SER:HA	77:X:257:ASN:HB3	1.84	0.59
77:X:359:GLU:HG2	77:X:361:ARG:H	1.66	0.59
77:X:498:ARG:O	77:X:501:THR:HG22	2.03	0.59
91:Ab:128:LYS:NZ	101:Am:331:TYR:O	2.35	0.59
104:Ak:260:CYS:O	104:Ak:264:VAL:HG22	2.03	0.59
106:Ad:31:LEU:HA	106:Ad:35:ALA:HB3	1.83	0.59
112:Ac:47:ARG:HD3	112:Ac:47:ARG:H	1.66	0.59
117:Ax:153:ILE:HD11	117:Ax:178:PRO:HB3	1.84	0.59
1:1:559:U:O2'	1:1:560:U:OP1	2.18	0.59
1:2:21:U:O2'	1:2:22:U:H5'	2.01	0.59
1:2:438:G:C4	1:2:444:A:C2	2.91	0.59
1:2:562:U:O5'	1:2:562:U:H6	1.85	0.59
9:n:44:ARG:HD2	14:e:388:LEU:HD21	1.83	0.59
14:e:188:LEU:HD13	19:af:267:ARG:HD3	1.83	0.59
21:aa:745:GLU:OE2	26:an:205:HIS:ND1	2.35	0.59

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
23:ak:186:GLN:HG3	24:ac:129:ARG:NH2	2.17	0.59
24:ac:342:LEU:O	24:ac:346:ALA:N	2.33	0.59
25:ad:658:PHE:HZ	37:j:154:ARG:HA	1.68	0.59
32:y:23:ARG:HG3	32:y:24:THR:HG22	1.84	0.59
38:l:403:SER:OG	38:l:405:SER:OG	2.19	0.59
38:l:605:ARG:NH1	38:l:609:GLN:HG3	2.16	0.59
49:b:150:ARG:HH21	52:z:195:THR:HG21	1.67	0.59
52:z:350:GLU:O	52:z:354:GLU:N	2.34	0.59
52:z:443:MET:HE2	52:z:799:LEU:HD22	1.84	0.59
52:z:742:ASP:O	52:z:746:SER:N	2.34	0.59
55:B:401:TYR:HB3	86:A1:293:ASN:HB3	1.85	0.59
60:G:227:PRO:HG2	60:G:228:TYR:CD2	2.37	0.59
65:L:90:ARG:NH1	91:Ab:96:SER:OG	2.35	0.59
68:O:268:ASP:N	68:O:268:ASP:OD1	2.34	0.59
70:Q:37:MET:HG3	70:Q:39:LEU:HG	1.84	0.59
74:U:20:LYS:O	1:1:970:A:H5'	2.02	0.59
89:At:55:ASN:HB3	1:1:110:U:O2	2.02	0.59
101:Am:255:ASP:N	101:Am:255:ASP:OD1	2.34	0.59
113:Ah:188:ASP:OD1	113:Ah:189:ASN:N	2.29	0.59
113:Ah:214:ARG:NH2	113:Ah:263:ASP:OD2	2.35	0.59
115:Ay:35:TRP:C	115:Ay:37:ASP:H	2.10	0.59
1:1:98:G:N3	1:1:98:G:H2'	2.17	0.59
1:2:70:A:H5''	35:t:30:SER:OG	2.02	0.59
1:2:119:U:H2'	1:2:120:U:H5'	1.83	0.59
1:2:180:A:C2	33:w:87:SER:CB	2.85	0.59
1:2:182:A:C5'	33:w:98:LEU:HD11	2.10	0.59
1:2:202:A:H4'	31:at:244:LYS:CD	2.33	0.59
1:2:415:A:H1'	10:ae:36:ARG:NH1	2.13	0.59
1:2:522:A:O2'	15:d:343:LYS:HE3	2.03	0.59
1:2:529:A:N1	16:az:72:LYS:HE3	2.09	0.59
1:2:532:U:O4	16:az:76:ARG:NH2	2.35	0.59
1:2:613:U:N1	44:g:100:HIS:CD2	2.70	0.59
5:f:10:ARG:HH11	5:f:12:GLY:HA3	1.67	0.59
5:f:130:ILE:HG23	15:d:7:VAL:HG21	1.83	0.59
12:ag:258:ARG:O	12:ag:262:ALA:N	2.35	0.59
14:e:23:PHE:CE1	53:bd:62:ILE:HD11	2.37	0.59
21:aa:1122:LYS:NZ	21:aa:1126:ASP:OD2	2.35	0.59
57:D:115:ARG:HH22	91:Ab:193:ASP:HB2	1.67	0.59
60:G:145:ARG:H	1:1:347:A:H1'	1.68	0.59
68:O:318:LEU:O	68:O:322:THR:N	2.34	0.59
80:BA:24:VAL:O	98:Ar:128:LYS:HG3	2.02	0.59

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
85:An:137:GLU:HB3	113:Ah:472:ARG:NH2	2.18	0.59
92:Ai:147:ASP:O	92:Ai:151:ASN:ND2	2.36	0.59
107:BF:101:LEU:HD21	107:BF:106:ILE:HD13	1.84	0.59
109:Af:23:PRO:O	109:Af:26:ALA:N	2.30	0.59
111:Ae:282:ILE:H	111:Ae:282:ILE:HD12	1.67	0.59
118:BL:153:LYS:HD3	118:BL:272:HIS:CE1	2.37	0.59
118:BL:303:LYS:NZ	1:1:676:U:OP2	2.35	0.59
120:BG:1263:HIS:CB	120:BG:1266:GLY:H	2.15	0.59
1:1:145:A:C3'	1:1:146:U:H5''	2.33	0.59
1:1:689:U:O2'	1:1:690:U:OP1	2.17	0.59
1:2:11:A:P	50:a:263:LYS:HD3	2.42	0.59
1:2:302:A:C2'	1:2:303:G:C8	2.85	0.59
1:2:495:U:C5'	3:aw:1:MET:HE1	2.18	0.59
1:2:532:U:C5	16:az:76:ARG:CD	2.85	0.59
13:aj:230:ASP:HB3	13:aj:233:ARG:HB2	1.83	0.59
18:r:274:LEU:HA	20:u:856:VAL:HG23	1.84	0.59
24:ac:970:ALA:O	24:ac:974:GLY:N	2.35	0.59
30:as:245:MET:HB2	35:t:46:TYR:HB2	1.84	0.59
30:as:250:ARG:HA	35:t:14:LEU:HD22	1.83	0.59
36:p:75:ASN:ND2	52:z:115:ASP:OD1	2.35	0.59
36:p:131:GLU:OE1	36:p:134:ARG:NH1	2.33	0.59
45:o:132:ARG:HH22	50:a:344:TYR:HB2	1.68	0.59
46:c:163:VAL:HG21	52:z:108:GLN:HA	1.85	0.59
47:k:143:ASP:OD1	47:k:168:ASN:N	2.25	0.59
52:z:286:LYS:HE2	52:z:483:MET:HG3	1.84	0.59
52:z:554:ASN:OD1	52:z:773:LEU:N	2.36	0.59
52:z:580:ARG:HH12	52:z:748:PRO:HD3	1.67	0.59
59:F:46:MET:HE2	59:F:46:MET:HA	1.85	0.59
68:O:91:LYS:NZ	1:1:824:A:N1	2.47	0.59
68:O:310:MET:HE3	85:An:241:LEU:HD22	1.84	0.59
69:P:79:LEU:HD12	69:P:101:LEU:HD22	1.83	0.59
78:Y:130:PRO:HD3	112:Ac:57:HIS:CE1	2.38	0.59
83:Aw:149:TYR:CD1	106:Ad:192:ASP:HB3	2.37	0.59
92:Ai:271:HIS:NE2	92:Ai:326:ASP:OD2	2.36	0.59
95:Aa:190:SER:O	95:Aa:190:SER:OG	2.19	0.59
95:Aa:193:TYR:CD1	1:1:146:U:H2'	2.37	0.59
101:Am:164:GLU:OE1	101:Am:202:TYR:OH	2.20	0.59
108:Av:45:GLU:HA	108:Av:48:ARG:HD3	1.83	0.59
116:Ag:36:ASN:OD1	116:Ag:41:ASN:ND2	2.34	0.59
118:BL:284:ASN:HD22	1:1:671:U:H1'	1.66	0.59
1:1:1113:G:C6	1:1:1114:A:H2	2.20	0.59

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:50:U:H5''	37:j:11:ARG:NE	2.16	0.59
1:2:182:A:H5''	33:w:98:LEU:CD1	2.33	0.59
1:2:283:U:O2	43:i:248:VAL:HG22	2.03	0.59
1:2:467:U:O2'	14:e:381:SER:HB2	2.01	0.59
1:2:481:U:C6	2:h:24:PHE:CZ	2.91	0.59
1:2:589:G:C2'	1:2:590:U:O5'	2.51	0.59
4:m:32:ILE:HD11	8:am:187:ARG:NE	2.18	0.59
10:ae:497:SER:OG	10:ae:507:ARG:NE	2.24	0.59
13:aj:138:MET:HE2	13:aj:177:GLU:HG3	1.85	0.59
14:e:637:GLU:OE2	14:e:641:ARG:NH1	2.33	0.59
16:az:81:THR:OG1	34:v:97:GLU:OE1	2.21	0.59
19:af:154:PRO:HB3	20:u:42:ILE:HG22	1.83	0.59
21:aa:866:THR:HA	26:an:223:ARG:HH12	1.68	0.59
21:aa:1281:ARG:HG2	22:ab:986:LEU:HB3	1.83	0.59
22:ab:350:ARG:HA	22:ab:363:ARG:HH12	1.67	0.59
22:ab:813:ASN:HB2	22:ab:816:ILE:HB	1.84	0.59
22:ab:1078:LYS:NZ	22:ab:1091:GLU:OE2	2.26	0.59
24:ac:894:ASP:OD2	24:ac:973:ARG:NH2	2.35	0.59
38:l:13:SER:HB3	38:l:16:TYR:HB3	1.84	0.59
54:A:291:ALA:O	1:1:1106:U:O2'	2.19	0.59
64:K:79:HIS:CD2	95:Aa:84:LEU:HB3	2.37	0.59
66:M:38:TYR:OH	66:M:46:ARG:NH1	2.35	0.59
66:M:97:TRP:CZ3	66:M:99:LEU:HG	2.38	0.59
66:M:229:SER:OG	66:M:230:HIS:N	2.35	0.59
68:O:131:ILE:HG22	68:O:132:LYS:HG2	1.82	0.59
68:O:139:GLY:N	68:O:156:ILE:O	2.34	0.59
77:X:494:LEU:HD12	77:X:494:LEU:N	2.16	0.59
84:Bj:52:SER:HA	84:Bj:55:MET:HE3	1.84	0.59
86:Al:178:THR:HG21	97:BM:259:LYS:HG2	1.84	0.59
93:Ap:54:ASP:HB2	93:Ap:214:TRP:CE2	2.38	0.59
97:BM:346:LEU:HG	97:BM:348:ARG:H	1.68	0.59
98:Ar:22:ILE:HG23	98:Ar:56:ALA:HB1	1.85	0.59
1:1:560:U:OP1	1:1:560:U:H2'	2.03	0.59
1:2:39:U:P	33:w:139:TYR:CD2	2.69	0.59
1:2:177:U:OP2	48:q:11:GLN:C	2.45	0.59
1:2:282:A:C4'	43:i:247:ILE:HG13	2.28	0.59
1:2:414:C:N4	6:s:155:LEU:HB2	2.18	0.59
1:2:422:U:C2	13:aj:52:TYR:HB3	2.38	0.59
1:2:431:U:OP2	1:2:431:U:H6	1.84	0.59
1:2:487:C:N4	9:n:146:ARG:HH22	2.01	0.59
1:2:488:U:C5'	9:n:34:LYS:NZ	2.66	0.59

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:521:A:P	5:f:10:ARG:HB3	2.43	0.59
1:2:589:G:H2'	1:2:590:U:O5'	2.03	0.59
2:h:152:TRP:HD1	14:e:809:ASN:HD22	1.50	0.59
3:aw:139:LEU:HD13	19:af:828:ARG:HB3	1.84	0.59
5:f:136:ASN:HD22	5:f:143:GLN:HB2	1.67	0.59
6:s:94:ASN:HD22	20:u:716:VAL:HG21	1.67	0.59
10:ae:11:ARG:NE	10:ae:42:LEU:O	2.35	0.59
21:aa:484:ARG:NH1	21:aa:836:GLU:O	2.35	0.59
21:aa:702:SER:O	21:aa:706:LYS:N	2.33	0.59
23:ak:245:GLN:NE2	24:ac:1168:PHE:O	2.35	0.59
25:ad:323:LEU:HD11	25:ad:445:ARG:HB3	1.84	0.59
25:ad:642:TYR:O	25:ad:646:HIS:N	2.31	0.59
31:at:282:PRO:O	31:at:286:LYS:N	2.35	0.59
32:y:79:LEU:O	32:y:83:ARG:NH2	2.35	0.59
45:o:448:GLU:O	45:o:471:ARG:NE	2.30	0.59
60:G:161:GLY:HA2	75:V:42:MET:HA	1.84	0.59
61:H:96:LYS:HB2	1:1:390:A:OP1	2.03	0.59
63:J:125:TYR:OH	63:J:129:ARG:NH2	2.23	0.59
65:L:61:VAL:HG21	65:L:77:VAL:HG21	1.85	0.59
68:O:113:HIS:ND1	1:1:129:U:H1'	2.17	0.59
69:P:33:HIS:HB2	69:P:45:LYS:O	2.02	0.59
70:Q:76:ILE:HG12	70:Q:150:SER:HB2	1.85	0.59
78:Y:180:VAL:HG22	84:Bj:148:ALA:HB2	1.84	0.59
80:BA:24:VAL:O	98:Ar:127:ARG:NH1	2.36	0.59
85:An:43:LYS:O	85:An:45:GLU:N	2.35	0.59
85:An:123:GLN:HB2	85:An:210:LEU:HD11	1.84	0.59
89:At:90:GLN:HE22	89:At:95:PRO:HG3	1.68	0.59
92:Ai:354:GLY:O	92:Ai:380:ARG:NH2	2.36	0.59
97:BM:209:ALA:HB1	97:BM:213:ARG:NH1	2.18	0.59
111:Ae:55:HIS:CD2	111:Ae:57:LYS:H	2.21	0.59
111:Ae:182:THR:HG23	111:Ae:233:GLU:HB2	1.85	0.59
120:BG:1304:MET:HG2	120:BG:1306:GLY:H	1.68	0.59
1:1:827:A:O2'	1:1:828:A:OP2	2.21	0.59
1:2:48:U:C6	1:2:48:U:C3'	2.85	0.59
1:2:54:A:OP1	1:2:152:G:C8	2.56	0.59
1:2:142:U:O2'	47:k:118:PRO:C	2.46	0.59
1:2:425:A:N1	13:aj:266:LYS:CB	2.65	0.59
1:2:498:U:OP1	3:aw:4:ALA:CB	2.46	0.59
1:2:538:G:O4'	1:2:582:A:N1	2.35	0.59
3:aw:70:LYS:HA	3:aw:73:GLN:HG3	1.83	0.59
7:au:51:GLN:OE1	7:au:215:GLN:NE2	2.27	0.59

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
9:n:106:THR:HG23	9:n:109:HIS:H	1.68	0.59
13:aj:88:HIS:HB2	13:aj:91:VAL:HG23	1.84	0.59
14:e:313:GLY:H	20:u:630:LEU:CA	2.15	0.59
20:u:664:ALA:O	20:u:668:GLN:N	2.32	0.59
21:aa:943:ILE:O	26:an:18:HIS:NE2	2.31	0.59
22:ab:330:ARG:O	22:ab:333:SER:OG	2.18	0.59
22:ab:1068:PHE:O	22:ab:1072:ASN:ND2	2.36	0.59
23:ak:272:GLU:OE1	24:ac:1179:LYS:N	2.35	0.59
30:as:269:TRP:HA	35:t:126:TYR:HB2	1.84	0.59
31:at:319:TYR:OH	31:at:345:SER:O	2.18	0.59
44:g:158:HIS:NE2	44:g:162:GLN:OE1	2.35	0.59
45:o:256:ARG:HH12	50:a:109:LYS:HD2	1.67	0.59
58:E:303:PRO:HB2	58:E:307:ARG:HH12	1.66	0.59
60:G:207:ALA:HB2	1:1:189:U:N3	2.17	0.59
60:G:293:ARG:NE	60:G:374:LEU:OXT	2.35	0.59
63:J:88:GLY:HA2	63:J:103:TRP:CE3	2.37	0.59
69:P:42:PRO:O	102:Aq:55:ASN:ND2	2.36	0.59
78:Y:56:ASP:OD1	78:Y:58:ARG:NH2	2.32	0.59
86:Al:108:TRP:CE2	86:Al:156:ILE:HG21	2.37	0.59
89:At:109:VAL:O	89:At:113:ARG:HG2	2.02	0.59
91:Ab:122:GLY:N	95:Aa:90:THR:OG1	2.36	0.59
93:Ap:54:ASP:O	93:Ap:95:HIS:NE2	2.35	0.59
100:BH:57:GLU:OE2	100:BH:61:SER:OG	2.19	0.59
102:Aq:336:ARG:CG	102:Aq:336:ARG:O	2.50	0.59
1:1:840:A:N1	1:1:855:A:H2	2.01	0.59
1:1:894:U:O2'	1:1:918:A:N6	2.36	0.59
1:2:38:U:H3	33:w:140:ARG:HG3	1.68	0.59
1:2:68:A:H5''	37:j:22:TRP:NE1	2.12	0.59
1:2:259:A:H5'	1:2:259:A:H8	1.66	0.59
1:2:279:U:H3	1:2:328:A:N6	2.01	0.59
1:2:413:U:N3	2:h:23:HIS:CG	2.71	0.59
1:2:440:C:OP2	2:h:19:ARG:CG	2.51	0.59
1:2:454:U:C4'	8:am:276:SER:OG	2.51	0.59
1:2:521:A:C4'	15:d:345:LYS:HB2	2.32	0.59
1:2:525:A:C5'	15:d:329:ARG:HB3	2.33	0.59
1:2:536:A:H2'	1:2:537:A:C8	2.38	0.59
1:2:613:U:H6	44:g:99:TRP:HZ3	1.44	0.59
7:au:66:TYR:N	7:au:69:ASP:OD2	2.36	0.59
11:ay:119:ARG:HH12	22:ab:1131:VAL:HA	1.66	0.59
20:u:135:TYR:CZ	20:u:143:ARG:HG3	2.38	0.59
25:ad:532:GLY:O	25:ad:534:ARG:NH2	2.36	0.59

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:638:ILE:HB	25:ad:649:THR:HG21	1.83	0.59
30:as:87:LEU:HG	30:as:171:LEU:HA	1.85	0.59
45:o:149:LEU:HA	45:o:152:GLN:HB3	1.85	0.59
53:bd:77:GLU:HG2	53:bd:78:TYR:HD1	1.68	0.59
54:A:272:ARG:NH2	1:1:1065:U:O2'	2.35	0.59
68:O:67:ILE:N	1:1:134:A:H61	2.01	0.59
74:U:25:PHE:HB2	1:1:933:G:H21	1.67	0.59
74:U:30:ILE:O	74:U:30:ILE:CG2	2.51	0.59
86:Al:269:GLU:N	86:Al:270:PRO:CD	2.66	0.59
90:BC:45:MET:O	90:BC:49:ASN:ND2	2.35	0.59
91:Ab:126:ARG:O	91:Ab:127:HIS:ND1	2.36	0.59
92:Ai:461:ARG:HD3	92:Ai:473:LEU:HD13	1.85	0.59
94:Au:182:ALA:HB1	94:Au:184:LEU:HD23	1.85	0.59
98:Ar:19:TYR:HB3	98:Ar:43:LYS:HA	1.84	0.59
105:BP:157:ARG:NH2	105:BP:169:ASP:OD2	2.35	0.59
106:Ad:14:THR:HB	106:Ad:15:PRO:HD2	1.85	0.59
1:1:204:U:H3'	1:1:204:U:P	2.43	0.59
1:1:798:A:H2'	1:1:798:A:N3	2.17	0.59
1:2:303:G:C8	1:2:303:G:C5'	2.85	0.59
1:2:395:U:O2'	16:az:72:LYS:NZ	2.29	0.59
8:am:195:THR:HG21	36:p:116:PHE:CE1	2.38	0.59
21:aa:433:HIS:HB2	21:aa:438:THR:HG23	1.84	0.59
21:aa:1054:ARG:HH21	42:x:61:ASP:HA	1.67	0.59
24:ac:355:LEU:O	24:ac:456:TYR:OH	2.21	0.59
24:ac:609:HIS:HA	24:ac:612:GLN:HE21	1.67	0.59
24:ac:685:LEU:C	38:l:318:ILE:HB	2.28	0.59
24:ac:863:ARG:HD3	24:ac:886:THR:OG1	2.03	0.59
28:ap:125:SER:OG	28:ap:129:GLU:OE2	2.18	0.59
29:aq:29:TRP:HZ2	33:w:142:VAL:HA	1.67	0.59
31:at:312:CYS:HB3	31:at:315:CYS:N	2.17	0.59
41:ai:91:LYS:HD2	41:ai:95:TRP:CE2	2.37	0.59
42:x:68:VAL:HB	42:x:72:MET:HB2	1.82	0.59
43:i:292:LEU:O	43:i:296:ARG:N	2.34	0.59
46:c:185:CYS:SG	46:c:248:ILE:HG12	2.43	0.59
50:a:297:VAL:O	50:a:300:ILE:HG22	2.03	0.59
54:A:386:GLU:OE1	63:J:63:GLU:HA	2.03	0.59
57:D:122:PHE:HA	57:D:125:PHE:HB3	1.85	0.59
58:E:69:GLY:HA2	58:E:79:ALA:HB3	1.84	0.59
59:F:87:LEU:HD11	59:F:98:VAL:HG13	1.84	0.59
67:N:198:ARG:HH21	67:N:220:VAL:HG11	1.68	0.59
82:BB:125:LYS:C	82:BB:127:PRO:HD3	2.28	0.59

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
83:Aw:123:ARG:HH11	106:Ad:123:SER:HB3	1.66	0.59
84:Bj:4:ASN:HD21	102:Aq:56:MET:HE1	1.68	0.59
91:Ab:137:LEU:HD12	101:Am:72:ASP:HB2	1.84	0.59
92:Ai:4:TYR:C	92:Ai:423:ALA:HB2	2.28	0.59
92:Ai:64:GLN:HE22	92:Ai:198:LEU:H	1.51	0.59
94:Au:107:ARG:NH2	113:Ah:130:GLU:OE2	2.36	0.59
97:BM:185:LEU:HD23	97:BM:193:ALA:HA	1.85	0.59
112:Ac:127:MET:HE1	112:Ac:131:MET:HE2	1.85	0.59
118:BL:167:ARG:NH1	118:BL:299:PRO:HD2	2.18	0.59
1:2:33:A:N7	1:2:169:U:C4	2.71	0.58
1:2:45:U:H5''	29:aq:21:LEU:C	2.27	0.58
1:2:55:G:N3	1:2:56:U:H5	2.00	0.58
1:2:82:A:O4'	39:ar:32:LEU:HD13	2.00	0.58
1:2:227:U:C2'	1:2:228:G:C8	2.85	0.58
1:2:228:G:O2'	1:2:242:U:H6	1.85	0.58
1:2:251:U:H2'	1:2:252:G:O4'	2.02	0.58
1:2:332:G:H22	44:g:83:ASN:HD22	1.50	0.58
1:2:503:A:C2'	6:s:82:LEU:HD21	2.32	0.58
1:2:508:G:C6	11:ay:164:THR:N	2.67	0.58
1:2:513:U:C4'	16:az:145:ARG:NE	2.66	0.58
2:h:149:GLU:N	2:h:149:GLU:OE1	2.36	0.58
8:am:184:ILE:HG23	52:z:505:ARG:HH11	1.68	0.58
10:ae:452:ARG:NE	10:ae:459:ASP:OD2	2.35	0.58
12:ag:259:HIS:H	14:e:289:LEU:C	2.10	0.58
12:ag:540:ARG:HD2	22:ab:309:THR:HG22	1.84	0.58
14:e:240:SER:HB3	14:e:407:LYS:HB3	1.84	0.58
19:af:515:ARG:O	19:af:519:ARG:NH1	2.36	0.58
21:aa:83:GLY:HA2	25:ad:168:ASP:OD2	2.03	0.58
21:aa:1221:ILE:N	22:ab:995:TYR:OH	2.34	0.58
21:aa:1491:LEU:O	21:aa:1516:ARG:NH2	2.36	0.58
23:ak:244:LEU:HD22	24:ac:129:ARG:HH21	1.68	0.58
24:ac:362:ALA:HB1	24:ac:460:LEU:HD12	1.84	0.58
24:ac:658:LEU:HD11	24:ac:1089:PRO:HG2	1.85	0.58
32:y:254:GLN:N	32:y:254:GLN:OE1	2.35	0.58
36:p:124:ARG:NH1	36:p:153:GLU:OE1	2.25	0.58
39:ar:63:PRO:HB3	39:ar:210:LYS:HB3	1.85	0.58
43:i:119:LEU:O	43:i:199:LYS:NZ	2.36	0.58
48:q:181:GLY:HA3	49:b:131:PRO:HG2	1.85	0.58
59:F:115:LEU:HA	59:F:118:ARG:HE	1.66	0.58
61:H:93:VAL:O	61:H:95:GLN:N	2.23	0.58
61:H:159:GLY:HA2	91:Ab:258:LEU:HD21	1.85	0.58

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
69:P:105:PRO:HG2	106:Ad:30:GLU:OE1	2.03	0.58
70:Q:114:LEU:O	70:Q:116:HIS:N	2.36	0.58
71:R:364:GLU:HG2	71:R:366:PRO:HG3	1.85	0.58
82:BB:128:ASP:OD1	82:BB:129:THR:N	2.36	0.58
92:Ai:26:ILE:HD11	102:Aq:219:ILE:HA	1.83	0.58
96:Ao:66:ASN:HA	96:Ao:71:ARG:HB2	1.85	0.58
117:Ax:143:PHE:CD1	117:Ax:143:PHE:O	2.56	0.58
118:BL:82:ILE:H	118:BL:82:ILE:HD12	1.68	0.58
119:BO:73:ASN:HB2	119:BO:119:ARG:HA	1.83	0.58
119:BO:148:ASP:OD1	119:BO:149:ARG:HG2	2.02	0.58
1:1:269:A:O2'	1:1:270:A:OP1	2.15	0.58
1:1:561:U:O2'	1:1:562:U:O4'	2.19	0.58
1:1:596:U:H1'	1:1:597:U:OP1	2.03	0.58
1:1:790:U:H4'	1:1:791:U:OP1	2.02	0.58
1:2:133:G:H4'	1:2:134:U:OP1	2.03	0.58
1:2:229:C:H4'	1:2:230:C:O5'	2.03	0.58
1:2:614:U:C4'	44:g:104:GLN:HE22	2.16	0.58
4:m:223:ILE:HD13	44:g:134:VAL:HG13	1.84	0.58
18:r:188:LEU:O	18:r:211:SER:OG	2.21	0.58
19:af:166:SER:OG	22:ab:460:ARG:NH2	2.36	0.58
19:af:361:GLU:O	19:af:365:PHE:N	2.26	0.58
21:aa:558:LEU:HD11	21:aa:596:ARG:HH11	1.68	0.58
21:aa:1660:ALA:O	21:aa:1664:TRP:N	2.36	0.58
23:ak:176:TRP:HB3	24:ac:786:GLU:HG2	1.85	0.58
24:ac:520:ARG:NH2	24:ac:580:LEU:O	2.36	0.58
25:ad:569:LEU:O	25:ad:573:GLY:N	2.36	0.58
41:ai:12:LYS:HD3	41:ai:17:LEU:HG	1.85	0.58
43:i:151:LYS:NZ	43:i:179:GLU:OE1	2.31	0.58
43:i:339:ARG:NH1	47:k:135:GLU:OE2	2.36	0.58
45:o:428:VAL:HG12	45:o:430:ALA:H	1.67	0.58
45:o:487:MET:N	45:o:487:MET:SD	2.76	0.58
46:c:237:LYS:O	46:c:244:THR:OG1	2.20	0.58
57:D:94:SER:HB2	96:Ao:281:MET:HA	1.85	0.58
58:E:81:ASP:OD1	58:E:82:PHE:N	2.35	0.58
59:F:170:MET:HE2	95:Aa:44:PHE:CE1	2.38	0.58
64:K:98:GLN:HE22	91:Ab:103:HIS:CE1	2.21	0.58
64:K:132:GLU:OE2	64:K:150:ARG:NE	2.36	0.58
69:P:39:PRO:HA	69:P:86:VAL:HA	1.85	0.58
73:T:72:TRP:NE1	73:T:82:LYS:HB3	2.18	0.58
85:An:110:PHE:CE2	85:An:114:VAL:HG21	2.37	0.58
86:Al:76:ASP:O	86:Al:80:ARG:NH1	2.36	0.58

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
94:Au:106:SER:OG	94:Au:107:ARG:N	2.36	0.58
97:BM:28:VAL:HG22	97:BM:180:LEU:HD22	1.85	0.58
1:2:41:U:H2'	1:2:42:U:C2	2.38	0.58
1:2:46:U:H6	1:2:46:U:H5'	1.68	0.58
1:2:194:U:H5'	1:2:194:U:H6	1.68	0.58
1:2:226:A:C5	1:2:227:U:C4	2.91	0.58
1:2:327:U:OP2	1:2:327:U:H6	1.85	0.58
1:2:489:A:N3	1:2:489:A:H2'	2.17	0.58
1:2:617:U:N3	4:m:208:HIS:CE1	2.67	0.58
5:f:108:LEU:HA	32:y:175:ARG:HH11	1.67	0.58
5:f:138:ARG:HB2	44:g:138:LEU:HB3	1.85	0.58
10:ae:39:ARG:NH2	10:ae:157:THR:OG1	2.36	0.58
10:ae:430:ALA:O	10:ae:434:TRP:N	2.35	0.58
12:ag:497:LEU:HD11	12:ag:508:ILE:HD13	1.85	0.58
19:af:382:LEU:HD11	19:af:445:ALA:HA	1.85	0.58
22:ab:953:VAL:HG21	22:ab:999:LYS:HD2	1.86	0.58
25:ad:416:THR:O	25:ad:418:ALA:N	2.36	0.58
27:ao:190:LEU:O	27:ao:194:GLY:N	2.31	0.58
28:ap:204:LEU:HD21	48:q:121:ASP:OD2	2.03	0.58
38:l:75:HIS:HA	38:l:79:ARG:NE	2.19	0.58
38:l:249:ASN:HB3	38:l:253:LEU:HD13	1.86	0.58
60:G:237:ALA:HB2	60:G:252:PHE:CZ	2.38	0.58
68:O:258:ALA:O	68:O:262:ALA:N	2.37	0.58
74:U:25:PHE:CE1	1:1:950:A:C5	2.92	0.58
82:BB:66:TRP:HD1	82:BB:74:PHE:HZ	1.50	0.58
85:An:135:PHE:CD2	85:An:158:LEU:HG	2.39	0.58
87:BI:133:GLU:OE2	113:Ah:186:TRP:NE1	2.36	0.58
94:Au:30:TRP:HZ3	1:1:259:U:H5''	1.67	0.58
97:BM:119:THR:O	97:BM:122:LEU:N	2.31	0.58
104:Ak:122:LEU:HD12	104:Ak:125:THR:HB	1.85	0.58
113:Ah:67:ARG:HB2	1:1:905:A:N3	2.19	0.58
113:Ah:493:LEU:HD11	118:BL:74:PRO:HD3	1.85	0.58
117:Ax:148:CYS:SG	117:Ax:176:ARG:CZ	2.91	0.58
1:1:315:A:O2'	1:1:317:A:OP2	2.21	0.58
1:2:191:U:H5'	1:2:192:A:OP2	2.02	0.58
1:2:222:A:C2	1:2:252:G:N1	2.71	0.58
1:2:325:U:N3	1:2:325:U:OP2	2.35	0.58
7:au:44:ARG:HD3	7:au:218:MET:HB3	1.84	0.58
14:e:445:ASP:HA	20:u:683:GLN:HA	1.85	0.58
20:u:747:ARG:NH2	20:u:801:PRO:O	2.35	0.58
21:aa:158:TYR:CZ	25:ad:262:GLU:HB3	2.38	0.58

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
21:aa:1117:LEU:HB3	21:aa:1121:LEU:HD12	1.84	0.58
25:ad:364:ARG:NH2	30:as:182:ASN:OD1	2.36	0.58
78:Y:231:GLN:HE22	84:Bj:154:CYS:HB3	1.66	0.58
79:Z:19:TYR:HB2	1:1:907:G:N3	2.18	0.58
85:An:136:ALA:O	85:An:140:ARG:HB3	2.04	0.58
92:Ai:242:SER:H	92:Ai:245:ASN:HD22	1.51	0.58
97:BM:149:ALA:HB1	97:BM:250:GLU:OE2	2.03	0.58
101:Am:233:GLY:O	101:Am:242:LEU:HB2	2.03	0.58
118:BL:360:GLN:O	118:BL:361:THR:HG23	2.02	0.58
1:2:197:A:OP1	1:2:257:U:O2	2.20	0.58
1:2:289:A:H2'	1:2:290:C:O5'	2.04	0.58
1:2:397:U:O2'	5:f:18:ALA:HB2	1.93	0.58
1:2:412:G:C2'	10:ae:156:ALA:O	2.51	0.58
1:2:466:U:H2'	1:2:466:U:O2	2.03	0.58
4:m:73:TYR:CZ	4:m:107:PRO:HB3	2.39	0.58
5:f:104:ILE:O	5:f:108:LEU:HG	2.03	0.58
16:az:109:PHE:HZ	17:ax:92:HIS:HB2	1.68	0.58
19:af:363:HIS:HB2	19:af:384:LEU:HD13	1.84	0.58
21:aa:572:LYS:O	21:aa:575:GLN:NE2	2.37	0.58
21:aa:1242:PRO:HD2	21:aa:1245:ILE:HD12	1.85	0.58
24:ac:685:LEU:HD21	38:l:215:PRO:HA	1.86	0.58
25:ad:569:LEU:HD21	30:as:201:LEU:HD11	1.85	0.58
29:aq:198:LYS:HG2	29:aq:207:TYR:HB2	1.84	0.58
32:y:63:PRO:HG2	32:y:66:LEU:HB2	1.84	0.58
41:ai:41:LEU:HB3	41:ai:45:VAL:HG23	1.86	0.58
55:B:311:PRO:HG2	55:B:314:ARG:HG2	1.85	0.58
60:G:79:TRP:CD2	60:G:90:ILE:HD12	2.38	0.58
62:I:122:PRO:HG3	93:Ap:206:LEU:HA	1.85	0.58
63:J:67:ARG:HB2	63:J:67:ARG:HH21	1.68	0.58
69:P:55:GLN:HB3	1:1:949:U:H1'	1.84	0.58
85:An:34:TRP:CZ2	85:An:38:ALA:HB2	2.38	0.58
97:BM:132:ALA:HB2	97:BM:278:LEU:HD11	1.85	0.58
97:BM:240:ASP:HB3	97:BM:279:TYR:CD2	2.38	0.58
113:Ah:84:ARG:HD3	113:Ah:89:GLN:HE21	1.67	0.58
119:BO:131:PHE:HB2	119:BO:151:THR:HG23	1.86	0.58
1:2:25:U:C2'	1:2:26:U:H5'	2.33	0.58
1:2:361:U:C2'	1:2:362:A:C5'	2.80	0.58
1:2:413:U:C5	2:h:23:HIS:CE1	2.90	0.58
1:2:453:A:OP2	1:2:453:A:C8	2.56	0.58
1:2:483:A:C6	2:h:83:LYS:O	2.56	0.58
4:m:230:LEU:HD13	15:d:40:GLY:HA3	1.85	0.58

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
7:au:224:PRO:HG3	24:ac:88:ILE:HA	1.85	0.58
10:ae:274:LEU:O	10:ae:278:ILE:HG12	2.03	0.58
14:e:184:ASP:HA	15:d:313:LEU:HD22	1.86	0.58
14:e:332:ARG:HE	20:u:319:ARG:HD2	1.69	0.58
17:ax:136:PRO:HA	17:ax:139:TRP:CG	2.38	0.58
19:af:798:GLY:O	19:af:802:GLU:N	2.24	0.58
21:aa:111:LEU:O	47:k:78:TYR:OH	2.18	0.58
21:aa:1192:GLN:HG2	21:aa:1222:GLN:HA	1.85	0.58
22:ab:690:ARG:NH2	22:ab:783:GLU:OE2	2.37	0.58
24:ac:451:ASN:O	24:ac:453:GLU:N	2.36	0.58
24:ac:947:LEU:HD23	38:l:127:GLU:HB3	1.86	0.58
25:ad:541:GLY:O	25:ad:545:THR:OG1	2.16	0.58
26:an:157:ASP:OD1	26:an:163:ASN:ND2	2.34	0.58
30:as:33:VAL:HG21	40:av:104:GLN:HE21	1.67	0.58
32:y:51:HIS:ND1	32:y:80:ASN:OD1	2.36	0.58
32:y:127:LEU:O	32:y:131:ILE:N	2.26	0.58
32:y:208:ALA:HB2	42:x:228:TYR:HE2	1.68	0.58
38:l:177:LEU:HA	38:l:214:ILE:HG21	1.85	0.58
38:l:602:ARG:NH1	38:l:671:TRP:O	2.36	0.58
42:x:69:ALA:HB3	42:x:141:PRO:C	2.29	0.58
48:q:174:PRO:HB2	52:z:610:VAL:HG21	1.85	0.58
56:C:150:PRO:HA	70:Q:110:TYR:CG	2.37	0.58
64:K:62:VAL:HG23	64:K:97:GLN:HB2	1.84	0.58
80:BA:26:LYS:HB3	98:Ar:127:ARG:NH2	2.18	0.58
86:Al:132:SER:HB3	86:Al:176:SER:HB2	1.86	0.58
94:Au:28:ARG:HB3	94:Au:31:SER:HB3	1.86	0.58
95:Aa:18:ARG:HA	1:1:161:U:H1'	1.85	0.58
102:Aq:67:SER:HA	106:Ad:31:LEU:HD22	1.85	0.58
116:Ag:11:ALA:N	1:1:290:C:OP1	2.36	0.58
1:2:33:A:N6	1:2:169:U:C6	2.71	0.58
1:2:369:G:H2'	1:2:370:A:O4'	2.03	0.58
1:2:391:A:H8	1:2:391:A:OP2	1.86	0.58
1:2:488:U:C5'	9:n:34:LYS:HZ1	2.17	0.58
1:2:512:G:C2'	16:az:141:VAL:HG21	2.32	0.58
1:2:523:A:H2	5:f:24:LYS:HD2	1.68	0.58
1:2:525:A:H2'	15:d:330:ARG:CA	2.32	0.58
6:s:117:LEU:HG	12:ag:388:PHE:HD2	1.69	0.58
6:s:133:MET:HG2	7:au:29:TRP:HH2	1.67	0.58
11:ay:76:ARG:NH1	11:ay:144:THR:O	2.34	0.58
14:e:183:ARG:HG3	15:d:311:LEU:HD21	1.86	0.58
21:aa:591:ASP:OD2	21:aa:596:ARG:NH2	2.37	0.58

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
22:ab:178:ALA:O	22:ab:182:SER:OG	2.15	0.58
22:ab:628:GLN:OE1	22:ab:637:LYS:NZ	2.27	0.58
25:ad:119:TYR:OH	25:ad:686:HIS:NE2	2.35	0.58
27:ao:53:LEU:O	27:ao:67:TYR:OH	2.20	0.58
33:w:42:PRO:HD2	37:j:135:ILE:HD13	1.86	0.58
36:p:157:LYS:HE2	42:x:94:ALA:HB1	1.84	0.58
41:ai:211:ILE:O	41:ai:215:SER:N	2.33	0.58
55:B:4:SER:HA	95:Aa:182:PRO:HB2	1.84	0.58
59:F:118:ARG:NH1	1:1:857:A:N7	2.52	0.58
70:Q:107:GLY:HA3	70:Q:122:MET:HE2	1.86	0.58
77:X:46:GLU:HA	77:X:49:ARG:HB3	1.84	0.58
83:Aw:8:ARG:HB3	86:Al:287:TRP:CZ2	2.38	0.58
91:Ab:126:ARG:NH1	95:Aa:88:THR:OG1	2.36	0.58
94:Au:43:TRP:CE3	94:Au:43:TRP:HA	2.38	0.58
101:Am:260:TRP:HD1	101:Am:268:LYS:HA	1.68	0.58
1:2:202:A:OP1	31:at:230:ARG:NH1	2.36	0.58
1:2:302:A:H2'	1:2:303:G:C8	2.39	0.58
1:2:396:A:N6	5:f:24:LYS:CB	2.67	0.58
1:2:436:U:H6	1:2:436:U:P	2.27	0.58
1:2:495:U:O2	1:2:495:U:C2'	2.50	0.58
1:2:540:U:H4'	1:2:541:A:OP2	2.03	0.58
17:ax:29:GLY:HA3	17:ax:34:ASN:C	2.28	0.58
19:af:347:ARG:HH22	19:af:351:ALA:HB2	1.69	0.58
19:af:390:ALA:O	19:af:395:ARG:NE	2.37	0.58
21:aa:633:THR:HA	21:aa:640:SER:HA	1.85	0.58
21:aa:1310:VAL:HB	21:aa:1314:LEU:HD12	1.85	0.58
21:aa:1669:GLU:OE2	38:l:440:ARG:NH2	2.37	0.58
22:ab:101:HIS:CG	24:ac:1025:MET:HG2	2.38	0.58
24:ac:588:SER:O	24:ac:592:PHE:N	2.35	0.58
25:ad:255:THR:HA	40:av:63:SER:HB2	1.84	0.58
33:w:130:LYS:O	33:w:133:LYS:NZ	2.30	0.58
36:p:57:MET:SD	50:a:49:PRO:HD2	2.43	0.58
49:b:23:ARG:O	85:An:150:PHE:CZ	2.46	0.58
52:z:1094:ASP:O	52:z:1098:TRP:NE1	2.35	0.58
65:L:9:ILE:HG23	65:L:13:LEU:HD13	1.86	0.58
68:O:223:THR:HG22	68:O:225:GLU:HG2	1.85	0.58
71:R:204:GLU:OE2	89:At:98:THR:OG1	2.17	0.58
72:S:341:PHE:HB2	105:BP:52:ARG:HH22	1.67	0.58
77:X:267:ASP:HB3	77:X:271:ARG:HA	1.86	0.58
86:Al:46:ASP:H	115:Ay:87:TRP:CD1	2.22	0.58
96:Ao:282:TYR:OH	1:1:428:A:OP1	2.20	0.58

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
97:BM:128:LEU:O	97:BM:132:ALA:N	2.34	0.58
101:Am:293:THR:HG21	111:Ae:257:GLN:HG2	1.86	0.58
113:Ah:66:LYS:HB2	1:1:905:A:H5''	1.86	0.58
117:Ax:53:HIS:HE2	1:1:651:U:P	2.26	0.58
1:1:641:A:H2'	1:1:796:A:H61	1.68	0.58
1:1:861:A:C5	1:1:1108:A:H2	2.21	0.58
1:2:57:U:O2	1:2:57:U:H2'	2.03	0.58
1:2:166:G:C3'	1:2:167:U:H4'	2.34	0.58
1:2:174:U:O3'	48:q:11:GLN:OE1	2.22	0.58
1:2:282:A:C1'	43:i:247:ILE:CG1	2.80	0.58
19:af:295:ARG:HH12	19:af:337:ASN:HB2	1.69	0.58
21:aa:339:TRP:NE1	31:at:251:LYS:HE3	2.18	0.58
21:aa:468:MET:HE2	27:ao:204:LEU:HD11	1.86	0.58
21:aa:933:VAL:HG22	26:an:118:LEU:HD12	1.85	0.58
21:aa:1440:ASN:ND2	21:aa:1534:ALA:O	2.37	0.58
22:ab:428:GLN:NE2	22:ab:432:GLU:OE2	2.36	0.58
24:ac:1208:GLN:HE21	24:ac:1212:ALA:HB2	1.69	0.58
25:ad:319:GLN:HE22	25:ad:441:ARG:HE	1.52	0.58
31:at:235:CYS:SG	31:at:236:SER:N	2.77	0.58
31:at:277:LEU:HA	31:at:302:VAL:HG12	1.86	0.58
38:l:150:TYR:HD2	38:l:334:LEU:HD12	1.69	0.58
50:a:310:ARG:HG2	50:a:315:ALA:HB2	1.85	0.58
54:A:162:GLN:HE21	54:A:225:LYS:HG2	1.68	0.58
56:C:194:TYR:OH	86:Al:115:GLU:OE2	2.16	0.58
58:E:184:ALA:HB1	58:E:189:ILE:HB	1.84	0.58
58:E:312:ASN:HB3	58:E:315:LEU:HD13	1.85	0.58
66:M:85:LYS:HD2	66:M:94:GLU:OE2	2.03	0.58
71:R:74:GLU:OE2	71:R:74:GLU:N	2.31	0.58
72:S:327:HIS:CD2	72:S:328:ILE:HG13	2.39	0.58
77:X:124:ASP:OD1	77:X:124:ASP:N	2.35	0.58
88:Az:40:TRP:HE1	88:Az:99:ARG:HH11	1.50	0.58
100:BH:77:LYS:O	100:BH:228:ARG:NH1	2.36	0.58
117:Ax:48:LYS:O	117:Ax:50:ALA:N	2.36	0.58
1:1:873:U:O4	1:1:1015:A:N6	2.36	0.58
1:1:929:G:H5''	1:1:930:A:C4	2.39	0.58
1:2:18:A:C6	1:2:19:U:C4	2.92	0.58
1:2:38:U:H2'	1:2:39:U:C6	2.37	0.58
1:2:155:G:C8	1:2:155:G:C5'	2.85	0.58
1:2:175:U:C2'	48:q:11:GLN:HG3	2.34	0.58
1:2:240:G:C5'	1:2:240:G:C8	2.85	0.58
1:2:465:A:N3	8:am:52:LYS:HD2	2.18	0.58

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:484:A:C8	9:n:102:ARG:NH1	2.72	0.58
1:2:529:A:C4'	4:m:270:ARG:HH21	2.17	0.58
1:2:589:G:H22	1:2:604:U:H3	1.49	0.58
2:h:19:ARG:HB3	2:h:22:THR:HG23	1.85	0.58
2:h:93:ASP:CG	2:h:114:SER:H	2.11	0.58
8:am:78:ARG:NH2	12:ag:420:SER:O	2.37	0.58
12:ag:156:ASP:O	23:ak:135:ARG:NH1	2.36	0.58
20:u:281:VAL:HG11	20:u:339:SER:HB3	1.86	0.58
21:aa:820:PHE:HB2	26:an:223:ARG:HH21	1.69	0.58
23:ak:173:ALA:HA	24:ac:790:TYR:CD1	2.38	0.58
27:ao:50:LEU:HA	27:ao:131:PHE:HB3	1.86	0.58
28:ap:12:TYR:OH	52:z:751:GLU:OE1	2.15	0.58
29:aq:84:GLU:H	33:w:168:ASN:HD21	1.52	0.58
32:y:161:VAL:HB	32:y:190:LEU:HB3	1.86	0.58
35:t:147:TYR:HA	35:t:162:GLU:HA	1.85	0.58
45:o:218:TRP:HH2	51:ba:87:ILE:HD13	1.68	0.58
58:E:42:PRO:HG2	58:E:113:ILE:HG23	1.85	0.58
63:J:99:ASN:N	119:BO:148:ASP:OD2	2.35	0.58
64:K:12:ARG:NH2	1:1:524:U:OP2	2.37	0.58
70:Q:204:TYR:C	85:An:225:PRO:HG3	2.29	0.58
82:BB:11:SER:OG	82:BB:12:PHE:N	2.36	0.58
96:Ao:37:ASN:O	96:Ao:40:VAL:HG22	2.04	0.58
97:BM:294:ASP:HB3	97:BM:323:ARG:HG3	1.86	0.58
107:BF:22:HIS:HA	1:1:595:A:N6	2.19	0.58
117:Ax:145:CYS:HB3	117:Ax:166:CYS:HB2	1.86	0.58
118:BL:109:GLY:O	118:BL:110:PHE:HB2	2.03	0.58
118:BL:316:ALA:HB2	118:BL:326:LEU:HD22	1.85	0.58
1:1:513:U:O2'	1:1:514:U:OP1	2.22	0.58
1:1:1046:G:H21	1:1:1047:C:H41	1.52	0.58
1:2:68:A:H5''	37:j:22:TRP:CD2	2.16	0.57
1:2:107:A:C5'	43:i:363:TYR:CD2	2.77	0.57
1:2:199:A:H2'	21:aa:336:ARG:NH1	2.05	0.57
1:2:413:U:H4'	10:ae:158:LEU:HA	1.86	0.57
1:2:514:U:O2	16:az:17:VAL:HG23	2.04	0.57
3:aw:63:MET:HE3	3:aw:64:PRO:HG2	1.85	0.57
4:m:31:TYR:HE1	36:p:127:ARG:HG3	1.69	0.57
21:aa:665:THR:HB	21:aa:724:LYS:HD3	1.84	0.57
22:ab:387:ARG:N	22:ab:391:ASP:OD2	2.34	0.57
22:ab:522:PRO:HG2	22:ab:838:THR:HG21	1.86	0.57
23:ak:30:THR:HB	23:ak:214:ARG:HD2	1.86	0.57
24:ac:1098:ILE:HD11	24:ac:1101:GLN:HE21	1.69	0.57

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:154:VAL:HG13	25:ad:157:GLU:H	1.69	0.57
25:ad:308:MET:HA	25:ad:311:PHE:HB3	1.86	0.57
28:ap:54:ALA:O	28:ap:58:LYS:N	2.36	0.57
33:w:45:ILE:HG21	33:w:84:MET:HB3	1.86	0.57
33:w:63:ASP:CG	33:w:123:LYS:HZ1	2.11	0.57
39:ar:161:LEU:O	39:ar:256:PHE:N	2.35	0.57
49:b:13:ARG:NH1	49:b:17:TYR:HB3	2.19	0.57
50:a:97:PRO:HD3	52:z:284:TYR:OH	2.03	0.57
61:H:163:GLU:HA	61:H:166:VAL:HG22	1.85	0.57
62:I:175:LYS:H	62:I:201:ARG:NH1	1.95	0.57
62:I:223:HIS:CE1	107:BF:87:LEU:H	2.17	0.57
67:N:234:LYS:O	71:R:24:ASN:ND2	2.37	0.57
68:O:194:PRO:HD3	71:R:434:LEU:HD13	1.84	0.57
69:P:30:LYS:HG3	69:P:50:ARG:HG2	1.86	0.57
73:T:73:CYS:SG	124:T:101:ZN:ZN	1.84	0.57
77:X:267:ASP:OD2	77:X:336:ARG:N	2.36	0.57
79:Z:81:ARG:NH1	1:1:68:U:OP1	2.37	0.57
82:BB:72:HIS:NE2	103:BE:80:SER:HB3	2.19	0.57
92:AI:451:ILE:O	102:AQ:282:THR:OG1	2.16	0.57
100:BH:96:LEU:HD23	100:BH:97:THR:HG23	1.86	0.57
113:Ah:188:ASP:HB2	113:Ah:192:GLN:HG2	1.86	0.57
116:Ag:55:LYS:HB2	116:Ag:59:GLU:HG3	1.86	0.57
1:2:416:A:P	10:ae:162:SER:CB	2.92	0.57
1:2:431:U:N1	13:aj:280:HIS:NE2	2.47	0.57
1:2:514:U:OP2	16:az:15:ARG:CZ	2.52	0.57
1:2:518:A:OP2	17:ax:120:HIS:HE1	1.84	0.57
12:ag:258:ARG:HB3	14:e:291:SER:OG	2.04	0.57
14:e:311:PHE:CB	20:u:633:VAL:HB	2.28	0.57
14:e:411:GLN:OE1	22:ab:1059:ARG:NH2	2.37	0.57
14:e:569:GLU:OE1	14:e:604:THR:OG1	2.18	0.57
16:az:36:GLU:OE1	17:ax:63:TYR:OH	2.22	0.57
21:aa:948:PRO:HB3	26:an:148:VAL:HG23	1.86	0.57
21:aa:1653:GLU:HG3	21:aa:1657:ARG:HH12	1.69	0.57
25:ad:415:GLN:HE22	25:ad:520:TYR:H	1.50	0.57
25:ad:588:GLN:N	25:ad:588:GLN:OE1	2.37	0.57
26:an:149:LEU:HG	26:an:150:ARG:H	1.69	0.57
34:v:103:LEU:HD12	34:v:109:LYS:HE3	1.85	0.57
35:t:16:ALA:O	35:t:25:LYS:NZ	2.37	0.57
42:x:106:LEU:HA	42:x:109:VAL:HG12	1.86	0.57
43:i:245:ASN:H	43:i:249:LYS:HE3	1.70	0.57
46:c:92:LEU:HA	46:c:96:ARG:HB3	1.86	0.57

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
59:F:8:ARG:O	95:Aa:138:TYR:OH	2.14	0.57
60:G:80:SER:OG	60:G:83:ASP:OD2	2.21	0.57
64:K:168:LEU:HD13	64:K:175:THR:HB	1.85	0.57
69:P:55:GLN:HG3	1:1:935:G:N3	2.19	0.57
78:Y:122:GLN:HG3	78:Y:123:PRO:HD2	1.86	0.57
83:Aw:56:ASN:ND2	83:Aw:61:CYS:O	2.37	0.57
88:Az:33:LYS:HD3	1:1:63:G:H2'	1.87	0.57
89:At:141:ASP:OD1	89:At:142:GLU:N	2.37	0.57
91:Ab:241:ARG:NH1	108:Av:142:ASP:OD1	2.37	0.57
97:BM:141:ARG:NE	97:BM:271:ARG:HB2	2.19	0.57
100:BH:229:TYR:CE2	105:BP:59:ARG:HD2	2.39	0.57
102:Aq:307:MET:SD	1:1:962:A:N6	2.77	0.57
104:Ak:97:HIS:HB2	104:Ak:123:LEU:HD12	1.85	0.57
107:BF:11:SER:O	107:BF:12:PHE:HB3	2.04	0.57
110:As:57:ARG:NH1	110:As:126:GLU:OE1	2.37	0.57
117:Ax:132:THR:HG22	117:Ax:133:THR:H	1.68	0.57
122:UC:74:UNK:O	122:UC:78:UNK:N	2.36	0.57
1:1:293:U:N3	1:1:919:U:O2	2.37	0.57
1:2:67:A:O2'	37:j:22:TRP:O	2.22	0.57
1:2:332:G:H4'	1:2:354:A:N3	2.18	0.57
1:2:418:A:H8	13:aj:55:HIS:CG	2.21	0.57
1:2:516:A:N7	17:ax:36:MET:HG3	2.18	0.57
14:e:31:ALA:HB3	14:e:32:PRO:HD3	1.86	0.57
30:as:58:VAL:HG13	30:as:59:THR:HG22	1.85	0.57
36:p:110:MET:HE2	36:p:114:ASN:HD22	1.69	0.57
38:l:150:TYR:HE1	38:l:235:ALA:HB2	1.69	0.57
45:o:132:ARG:HG2	50:a:349:TRP:CZ2	2.27	0.57
58:E:241:ARG:HE	91:Ab:217:LEU:HD22	1.69	0.57
59:F:170:MET:HE2	95:Aa:44:PHE:HE1	1.68	0.57
60:G:300:GLN:HB2	83:Aw:15:VAL:HG23	1.86	0.57
66:M:135:MET:HE3	66:M:137:LYS:HG2	1.86	0.57
71:R:319:ARG:NH2	71:R:325:GLU:OE2	2.27	0.57
84:Bj:94:GLU:OE1	90:BC:2:ASN:ND2	2.38	0.57
92:Ai:204:SER:OG	92:Ai:205:TYR:N	2.38	0.57
96:Ao:19:ARG:O	96:Ao:21:MET:N	2.37	0.57
99:Aj:269:CYS:O	99:Aj:272:VAL:HG12	2.04	0.57
113:Ah:193:VAL:HG23	113:Ah:194:GLY:H	1.69	0.57
1:2:14:A:OP1	50:a:259:SER:O	2.21	0.57
1:2:49:A:H4'	37:j:11:ARG:HE	1.69	0.57
1:2:67:A:HO2'	37:j:22:TRP:HE3	1.45	0.57
1:2:67:A:C2'	1:2:68:A:H5'	2.34	0.57

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:142:U:O2'	47:k:119:LYS:CA	2.50	0.57
1:2:176:U:C4'	48:q:10:ARG:O	2.52	0.57
1:2:313:C:H1'	4:m:165:VAL:HA	1.86	0.57
1:2:425:A:C2	13:aj:266:LYS:HG2	2.32	0.57
1:2:434:U:C6	10:ae:10:GLY:C	2.77	0.57
1:2:487:C:N3	9:n:146:ARG:CZ	2.67	0.57
1:2:568:A:C8	1:2:568:A:H3'	2.39	0.57
1:2:570:A:C5'	1:2:570:A:C8	2.86	0.57
12:ag:392:GLU:OE1	12:ag:396:ARG:NH2	2.36	0.57
15:d:205:ALA:HB2	15:d:312:PRO:HG3	1.85	0.57
18:r:115:ILE:HD12	18:r:365:PHE:HD2	1.69	0.57
21:aa:439:ASN:OD1	21:aa:440:ALA:N	2.33	0.57
21:aa:853:TYR:CZ	52:z:993:ARG:HB3	2.39	0.57
21:aa:1517:ARG:O	26:an:208:ARG:NH2	2.36	0.57
21:aa:1653:GLU:HG3	21:aa:1657:ARG:NH1	2.20	0.57
22:ab:1000:GLN:HG2	22:ab:1002:THR:H	1.68	0.57
24:ac:251:ASP:OD1	24:ac:254:PHE:N	2.36	0.57
24:ac:444:PRO:HA	24:ac:459:SER:HA	1.85	0.57
24:ac:445:LEU:O	24:ac:447:SER:N	2.37	0.57
24:ac:703:TRP:CD1	24:ac:707:SER:HB2	2.39	0.57
25:ad:465:ILE:HG13	25:ad:466:ARG:HD2	1.85	0.57
36:p:196:THR:HG22	36:p:198:HIS:H	1.68	0.57
42:x:226:ARG:HB2	42:x:230:TYR:HB2	1.87	0.57
43:i:271:PHE:HA	43:i:274:TYR:HB3	1.87	0.57
52:z:1061:VAL:HB	52:z:1066:ARG:HG3	1.86	0.57
55:B:194:LYS:C	55:B:194:LYS:CE	2.72	0.57
56:C:145:ARG:NH2	56:C:146:GLU:OE2	2.38	0.57
63:J:108:ASN:HB3	63:J:111:LEU:HB2	1.86	0.57
64:K:25:ARG:HA	1:1:41:A:H5''	1.87	0.57
67:N:89:GLU:O	88:Az:31:ASN:ND2	2.37	0.57
80:BA:42:SER:HB2	80:BA:139:THR:HA	1.85	0.57
85:An:129:LYS:HE2	85:An:129:LYS:CA	2.34	0.57
90:BC:68:ASP:N	90:BC:68:ASP:OD1	2.32	0.57
97:BM:251:ARG:HH21	97:BM:263:ARG:NH2	2.03	0.57
106:Ad:29:PRO:O	106:Ad:31:LEU:N	2.30	0.57
110:As:112:LEU:HD13	110:As:121:MET:HE3	1.86	0.57
115:Ay:167:ARG:NH2	1:1:961:A:OP2	2.38	0.57
117:Ax:124:PRO:HG2	117:Ax:124:PRO:O	2.04	0.57
1:1:433:G:C2	1:1:435:A:H1'	2.38	0.57
1:2:65:U:H1'	1:2:66:U:P	2.45	0.57
1:2:68:A:N6	1:2:69:A:N1	2.53	0.57

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:88:U:H5'	47:k:158:HIS:NE2	2.20	0.57
1:2:370:A:N1	1:2:372:A:H5''	2.19	0.57
1:2:426:U:H2'	13:aj:237:ARG:CZ	2.34	0.57
3:aw:60:VAL:HG21	14:e:763:TRP:CG	2.40	0.57
6:s:155:LEU:HD23	10:ae:37:PHE:HB3	1.86	0.57
14:e:107:ASP:OD1	14:e:110:GLY:N	2.25	0.57
14:e:384:SER:OG	14:e:387:GLU:OE1	2.21	0.57
14:e:460:SER:OG	14:e:461:HIS:N	2.38	0.57
21:aa:193:HIS:ND1	21:aa:193:HIS:O	2.38	0.57
21:aa:468:MET:HG2	27:ao:204:LEU:HD21	1.85	0.57
21:aa:944:SER:OG	26:an:275:ASP:OD2	2.14	0.57
24:ac:384:PRO:HG3	24:ac:398:GLU:HA	1.86	0.57
24:ac:685:LEU:CA	38:l:318:ILE:HB	2.33	0.57
24:ac:781:THR:HG22	24:ac:783:VAL:HG22	1.86	0.57
27:ao:137:TRP:CE3	27:ao:139:LEU:HD21	2.39	0.57
32:y:63:PRO:HB2	32:y:65:PRO:HD2	1.86	0.57
39:ar:183:THR:HG23	39:ar:187:PHE:HB3	1.86	0.57
41:ai:214:LEU:HD21	41:ai:238:GLU:HB3	1.85	0.57
41:ai:261:ASP:HB2	41:ai:274:ILE:HA	1.86	0.57
57:D:43:ALA:HB2	111:Ae:247:ILE:HG22	1.85	0.57
60:G:190:ASN:HB3	60:G:193:GLU:HG2	1.86	0.57
79:Z:55:HIS:HA	79:Z:64:ILE:HD11	1.86	0.57
85:An:192:THR:HG23	85:An:195:ASP:H	1.70	0.57
91:Ab:228:HIS:HD2	96:Ao:271:GLN:HE21	1.52	0.57
92:Ai:260:LYS:O	92:Ai:263:THR:OG1	2.17	0.57
108:Av:54:MET:HG2	108:Av:72:VAL:HG21	1.85	0.57
1:1:331:U:O2	1:1:502:U:H5'	2.04	0.57
1:2:259:A:O2'	1:2:260:A:OP2	2.16	0.57
1:2:509:C:O2	1:2:509:C:C2'	2.53	0.57
18:r:404:SER:HB2	18:r:437:GLU:HG3	1.87	0.57
21:aa:800:ASP:HB2	21:aa:803:PRO:HD2	1.87	0.57
22:ab:843:GLU:HB3	22:ab:924:TRP:HE1	1.68	0.57
23:ak:41:THR:O	23:ak:49:VAL:N	2.34	0.57
29:aq:185:ASN:HD22	29:aq:196:TRP:CD1	2.21	0.57
35:t:228:ARG:NH1	37:j:139:PRO:O	2.35	0.57
38:l:236:VAL:HG12	38:l:477:PRO:HD3	1.86	0.57
40:av:172:ASN:HB2	40:av:175:LEU:HB3	1.84	0.57
46:c:252:SER:OG	46:c:254:ASP:O	2.19	0.57
52:z:286:LYS:NZ	52:z:491:GLN:OE1	2.32	0.57
53:bd:52:LEU:HB3	53:bd:54:TRP:NE1	2.19	0.57
55:B:69:GLU:OE1	89:At:159:TYR:OH	2.20	0.57

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
58:E:134:GLY:HA2	1:1:437:U:H5'	1.87	0.57
62:I:215:LYS:HB3	107:BF:28:GLY:HA3	1.86	0.57
64:K:14:THR:O	64:K:18:ASP:N	2.32	0.57
70:Q:62:PRO:O	1:1:81:U:O2'	2.18	0.57
77:X:349:PRO:HD2	77:X:398:ARG:HB3	1.86	0.57
78:Y:122:GLN:HG2	112:Ac:26:HIS:O	2.04	0.57
91:Ab:252:ARG:NH2	108:Av:121:GLU:OE2	2.37	0.57
93:Ap:173:ARG:HD3	93:Ap:173:ARG:H	1.68	0.57
94:Au:38:TYR:C	94:Au:40:ARG:H	2.11	0.57
97:BM:28:VAL:HG12	97:BM:30:GLU:H	1.68	0.57
97:BM:263:ARG:HG3	97:BM:264:ALA:N	2.18	0.57
102:Aq:295:ARG:NH1	1:1:957:U:OP2	2.37	0.57
107:BF:9:TYR:OH	1:1:543:U:OP2	2.21	0.57
111:Ae:214:PHE:HE2	111:Ae:219:MET:HB2	1.69	0.57
118:BL:106:ASP:OD1	118:BL:107:TRP:N	2.38	0.57
120:BG:1304:MET:HE1	120:BG:1308:MET:HG3	1.85	0.57
1:1:110:U:O2'	1:1:111:A:OP1	2.21	0.57
1:2:66:U:C2'	1:2:67:A:H5'	2.34	0.57
1:2:166:G:C2'	1:2:167:U:C4'	2.83	0.57
1:2:283:U:C6	43:i:247:ILE:HD11	2.27	0.57
1:2:316:A:C2'	1:2:317:U:H4'	2.35	0.57
1:2:436:U:O4'	1:2:436:U:OP2	2.23	0.57
1:2:545:U:H6	1:2:545:U:O5'	1.88	0.57
1:2:586:A:C2	1:2:609:U:O2	2.58	0.57
4:m:72:HIS:HD2	4:m:75:ARG:HB2	1.68	0.57
4:m:281:ARG:HH21	34:v:112:SER:H	1.53	0.57
5:f:10:ARG:NH1	5:f:12:GLY:HA3	2.19	0.57
14:e:32:PRO:HG2	14:e:33:GLN:HE21	1.70	0.57
15:d:28:GLN:OE1	44:g:131:GLN:N	2.34	0.57
18:r:362:ASP:OD2	20:u:808:ARG:NH2	2.33	0.57
19:af:457:TYR:O	19:af:505:TRP:NE1	2.34	0.57
21:aa:1258:GLU:O	22:ab:626:GLY:HA2	2.04	0.57
22:ab:601:ASP:OD2	22:ab:605:THR:OG1	2.20	0.57
22:ab:729:LEU:O	22:ab:741:LYS:NZ	2.26	0.57
24:ac:356:LEU:HD11	24:ac:524:LEU:HD11	1.87	0.57
25:ad:343:TRP:HE1	40:av:89:ARG:CB	2.18	0.57
29:aq:84:GLU:CD	33:w:164:TYR:HB3	2.30	0.57
32:y:149:SER:OG	32:y:261:GLN:O	2.20	0.57
36:p:111:ARG:HH22	42:x:98:GLY:HA2	1.68	0.57
37:j:157:GLN:HE21	37:j:161:GLU:HG3	1.69	0.57
41:ai:246:SER:OG	41:ai:286:GLN:NE2	2.35	0.57

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
46:c:85:LEU:HB3	46:c:89:ARG:HH21	1.69	0.57
54:A:255:HIS:NE2	54:A:290:MET:O	2.37	0.57
56:C:124:GLU:OE2	113:Ah:51:LYS:HB3	2.04	0.57
58:E:21:PRO:HB2	58:E:224:GLN:NE2	2.19	0.57
60:G:156:ARG:NH2	60:G:159:ALA:O	2.38	0.57
64:K:123:PRO:HB3	105:BP:3:HIS:O	2.04	0.57
65:L:53:ILE:O	65:L:81:ALA:N	2.33	0.57
68:O:169:GLN:HA	68:O:192:GLU:HG2	1.87	0.57
71:R:164:PHE:HB2	85:An:301:PHE:CD2	2.40	0.57
75:V:32:PHE:HB2	75:V:98:LYS:HE3	1.86	0.57
78:Y:178:PRO:HB2	112:Ac:34:ILE:HD11	1.86	0.57
82:BB:61:TYR:OH	82:BB:65:ARG:NH2	2.36	0.57
84:Bj:68:LEU:H	84:Bj:68:LEU:HD23	1.70	0.57
88:Az:80:ASP:OD1	88:Az:81:GLN:N	2.38	0.57
92:Ai:402:VAL:O	92:Ai:405:VAL:HG12	2.05	0.57
93:Ap:93:LYS:HB3	120:BG:1339:ASN:O	2.05	0.57
95:Aa:77:ASP:OD2	1:1:484:A:N6	2.32	0.57
117:Ax:93:VAL:HG11	120:BG:1325:TRP:HB2	1.86	0.57
120:BG:1325:TRP:CZ2	120:BG:1329:ARG:HD2	2.40	0.57
122:UC:130:UNK:O	122:UC:134:UNK:N	2.38	0.57
1:1:267:U:O2	1:1:269:A:N6	2.38	0.57
1:1:268:A:C2	1:1:272:A:H1'	2.39	0.57
1:1:322:A:N7	1:1:990:A:O2'	2.37	0.57
1:1:445:A:N7	1:1:461:U:H5	2.03	0.57
1:2:2:U:C5'	25:ad:707:TRP:NE1	2.64	0.57
1:2:43:A:OP1	29:aq:25:GLY:HA2	2.04	0.57
1:2:315:A:C3'	1:2:316:A:C8	2.85	0.57
1:2:315:A:H5''	1:2:315:A:H8	1.68	0.57
1:2:326:U:H5'	1:2:327:U:OP1	2.04	0.57
1:2:371:C:H2'	1:2:371:C:O2	2.04	0.57
1:2:412:G:C6	10:ae:53:THR:CG2	2.82	0.57
1:2:489:A:O2'	9:n:43:ARG:CZ	2.53	0.57
1:2:549:C:N3	1:2:579:A:N6	2.51	0.57
1:2:567:A:N6	1:2:568:A:C6	2.73	0.57
10:ae:37:PHE:HA	10:ae:41:ASN:HD22	1.70	0.57
18:r:132:VAL:HG21	18:r:144:TYR:CD1	2.40	0.57
22:ab:351:GLN:OE1	22:ab:364:THR:OG1	2.22	0.57
25:ad:357:TRP:O	25:ad:625:ARG:NH2	2.38	0.57
38:l:559:GLU:O	38:l:566:HIS:ND1	2.33	0.57
39:ar:245:ASP:OD1	39:ar:246:HIS:N	2.37	0.57
42:x:96:THR:HG23	42:x:97:LEU:HD12	1.86	0.57

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
46:c:76:ARG:HA	46:c:79:GLN:HE21	1.69	0.57
55:B:15:ARG:NE	66:M:99:LEU:HD11	2.20	0.57
60:G:164:ASN:HA	75:V:111:ARG:NH2	2.20	0.57
64:K:36:LEU:O	64:K:40:THR:HG22	2.05	0.57
68:O:218:VAL:HG11	68:O:229:ARG:HE	1.69	0.57
77:X:165:VAL:HG21	77:X:341:LEU:HD23	1.85	0.57
82:BB:11:SER:CA	1:1:857:A:H5'	2.19	0.57
86:Al:133:GLN:O	86:Al:135:GLN:NE2	2.38	0.57
91:Ab:169:ASP:OD1	91:Ab:170:ILE:N	2.38	0.57
92:Ai:65:THR:HG21	92:Ai:197:MET:HE2	1.86	0.57
92:Ai:313:CYS:SG	92:Ai:341:GLN:HB3	2.44	0.57
95:Aa:55:ARG:HH22	1:1:855:A:P	2.27	0.57
97:BM:244:LEU:HD12	97:BM:247:PHE:HB3	1.87	0.57
99:Aj:250:LEU:HD13	99:Aj:272:VAL:HG11	1.86	0.57
99:Aj:291:LEU:HD11	99:Aj:313:ALA:HA	1.85	0.57
102:Aq:152:LYS:NZ	102:Aq:174:ARG:HB3	2.19	0.57
111:Ae:19:CYS:SG	1:1:1147:A:O2'	2.58	0.57
117:Ax:145:CYS:HG	117:Ax:166:CYS:CB	2.11	0.57
118:BL:246:VAL:HA	118:BL:257:LEU:HD23	1.86	0.57
1:2:46:U:H2'	29:aq:11:SER:OG	2.05	0.57
1:2:397:U:OP2	5:f:19:GLY:N	2.36	0.57
1:2:513:U:H6	1:2:513:U:OP2	1.87	0.57
4:m:74:HIS:ND1	4:m:79:GLU:OE2	2.38	0.57
5:f:28:VAL:O	5:f:33:LYS:NZ	2.38	0.57
12:ag:43:ARG:O	12:ag:47:VAL:N	2.32	0.57
19:af:484:ARG:HA	19:af:487:ARG:HD2	1.84	0.57
20:u:773:HIS:HA	20:u:776:ILE:HD12	1.85	0.57
21:aa:857:GLN:HG2	27:ao:209:TRP:CD1	2.40	0.57
21:aa:1605:PHE:HA	21:aa:1608:VAL:HG22	1.87	0.57
22:ab:56:ALA:O	22:ab:96:ARG:NH2	2.38	0.57
25:ad:680:TRP:HE3	37:j:124:LEU:HD11	1.69	0.57
25:ad:727:MET:HB2	48:q:103:ARG:CZ	2.34	0.57
37:j:118:ILE:HG22	45:o:446:PHE:HZ	1.69	0.57
38:l:344:SER:O	38:l:474:TYR:HB2	2.05	0.57
39:ar:164:ARG:HA	39:ar:253:ASP:HA	1.87	0.57
41:ai:96:LEU:HD22	41:ai:119:PHE:HD2	1.70	0.57
48:q:197:PRO:HD2	48:q:200:LEU:HD12	1.86	0.57
52:z:997:PHE:HB2	52:z:1002:LYS:HD2	1.87	0.57
55:B:11:ASP:OD1	55:B:11:ASP:N	2.32	0.57
63:J:65:ASN:O	63:J:67:ARG:N	2.38	0.57
64:K:23:MET:HE1	95:Aa:189:ARG:HB2	1.87	0.57

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
66:M:99:LEU:HD23	66:M:108:GLN:HA	1.87	0.57
75:V:79:TYR:HD2	77:X:477:TRP:HE3	1.52	0.57
77:X:293:ASN:ND2	77:X:348:VAL:HG22	2.19	0.57
85:An:34:TRP:CE2	85:An:38:ALA:HB2	2.40	0.57
95:Aa:44:PHE:H	95:Aa:45:GLY:HA2	1.70	0.57
102:Aq:87:GLY:C	102:Aq:89:PHE:H	2.12	0.57
102:Aq:120:PHE:CZ	102:Aq:136:ARG:HD3	2.40	0.57
110:As:62:VAL:HG12	110:As:63:HIS:HD2	1.69	0.57
113:Ah:116:ASN:O	113:Ah:120:LYS:NZ	2.29	0.57
1:1:508:G:O2'	1:1:509:U:OP1	2.23	0.57
1:2:47:U:O4	33:w:140:ARG:HG2	2.05	0.57
1:2:82:A:C3'	39:ar:32:LEU:HD22	2.35	0.57
1:2:181:U:H5'	33:w:101:ARG:CG	2.35	0.57
1:2:278:A:C2'	1:2:279:U:H5'	2.35	0.57
1:2:470:A:C2	2:h:116:TRP:CZ2	2.93	0.57
4:m:44:HIS:NE2	36:p:85:ASP:OD2	2.26	0.57
4:m:254:GLN:OE1	19:af:198:ARG:NH2	2.30	0.57
22:ab:69:VAL:HA	38:l:430:ARG:HH12	1.70	0.57
24:ac:436:LYS:O	24:ac:440:ILE:HG12	2.04	0.57
24:ac:563:SER:OG	24:ac:564:THR:N	2.37	0.57
28:ap:14:LEU:HA	28:ap:17:ARG:HB3	1.87	0.57
41:ai:283:ARG:HH11	41:ai:364:TYR:HA	1.69	0.57
41:ai:365:CYS:SG	52:z:861:LYS:NZ	2.66	0.57
43:i:235:LEU:HD22	43:i:252:LEU:HD13	1.87	0.57
52:z:1018:ASP:OD1	52:z:1018:ASP:N	2.37	0.57
54:A:255:HIS:HE2	54:A:290:MET:H	1.51	0.57
57:D:107:ILE:HG21	91:Ab:215:PRO:HB3	1.87	0.57
62:I:148:ARG:HH22	62:I:152:ARG:HE	1.53	0.57
66:M:91:ARG:O	99:Aj:468:HIS:HB2	2.05	0.57
71:R:38:SER:HA	71:R:41:ARG:HD2	1.87	0.57
77:X:349:PRO:HB2	77:X:352:LYS:HG2	1.87	0.57
86:Al:39:GLN:HA	86:Al:39:GLN:OE1	2.04	0.57
92:Ai:211:ARG:HA	92:Ai:214:SER:HB3	1.87	0.57
96:Ao:39:HIS:HB2	1:1:338:A:H5''	1.86	0.57
104:Ak:133:VAL:HA	104:Ak:136:THR:HG22	1.86	0.57
111:Ae:34:HIS:O	111:Ae:34:HIS:ND1	2.38	0.57
116:Ag:121:TYR:OH	116:Ag:143:ARG:NH2	2.33	0.57
119:BO:87:ARG:HH11	119:BO:89:ALA:HB3	1.69	0.57
1:1:364:U:H5'	1:1:365:U:O5'	2.04	0.57
1:1:664:C:H2'	1:1:670:A:N6	2.20	0.57
1:2:50:U:C4'	37:j:11:ARG:HH21	2.02	0.56

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:350:G:H5''	1:2:351:U:OP2	2.04	0.56
1:2:418:A:C6	13:aj:54:PRO:HA	2.40	0.56
1:2:492:U:O2'	9:n:48:LYS:NZ	2.38	0.56
1:2:508:G:O6	11:ay:164:THR:CA	2.38	0.56
1:2:586:A:C2	1:2:609:U:C2	2.93	0.56
2:h:113:VAL:HG23	2:h:118:MET:HB2	1.87	0.56
9:n:168:LEU:HD13	17:ax:24:LYS:HE2	1.87	0.56
15:d:202:ILE:HD11	15:d:316:ILE:HD11	1.87	0.56
20:u:555:ALA:O	20:u:559:GLN:N	2.38	0.56
22:ab:1160:ASP:OD1	22:ab:1162:VAL:HG12	2.05	0.56
24:ac:713:TYR:CZ	24:ac:841:GLN:HA	2.39	0.56
24:ac:1079:HIS:NE2	24:ac:1103:GLN:OE1	2.38	0.56
28:ap:11:ILE:HG21	28:ap:78:ALA:HB1	1.87	0.56
32:y:40:TYR:CD2	36:p:281:LEU:HB3	2.40	0.56
35:t:152:PHE:N	35:t:155:GLU:O	2.24	0.56
38:l:412:ARG:NH2	38:l:417:ALA:O	2.33	0.56
50:a:307:MET:O	50:a:311:LYS:NZ	2.38	0.56
58:E:266:ASN:OD1	91:Ab:228:HIS:NE2	2.38	0.56
60:G:19:GLN:HE22	109:Af:79:SER:HB3	1.70	0.56
62:I:25:ALA:O	62:I:52:ARG:NH2	2.37	0.56
62:I:55:LEU:HD23	62:I:55:LEU:H	1.69	0.56
63:J:65:ASN:HB3	119:BO:172:ARG:HD2	1.86	0.56
63:J:82:GLU:HG3	63:J:83:THR:H	1.70	0.56
65:L:93:VAL:HG21	65:L:106:TRP:CE2	2.40	0.56
69:P:62:PRO:HD3	69:P:77:PHE:HE2	1.69	0.56
71:R:284:LYS:HG3	71:R:285:TYR:N	2.20	0.56
72:S:368:ASP:OD2	99:Aj:350:TYR:OH	2.15	0.56
74:U:18:LEU:HD23	74:U:19:LYS:N	2.20	0.56
74:U:41:LEU:HB3	74:U:83:MET:HB3	1.87	0.56
79:Z:77:GLY:O	79:Z:80:ARG:NH2	2.37	0.56
82:BB:72:HIS:CE1	103:BE:80:SER:HB3	2.40	0.56
87:BI:146:TYR:OH	87:BI:210:SER:O	2.21	0.56
99:Aj:380:ARG:HA	99:Aj:383:VAL:HG12	1.86	0.56
107:BF:22:HIS:O	107:BF:26:ARG:NH1	2.37	0.56
115:Ay:164:ARG:NH2	1:1:960:A:OP1	2.38	0.56
119:BO:80:ILE:HG21	119:BO:100:ARG:NH1	2.19	0.56
119:BO:133:ARG:NH2	119:BO:135:GLN:OE1	2.32	0.56
1:2:53:U:C5	1:2:54:A:N6	2.73	0.56
1:2:227:U:H2'	1:2:228:G:N7	2.20	0.56
1:2:302:A:H2'	1:2:303:G:N7	2.19	0.56
1:2:356:G:H8	1:2:356:G:O5'	1.88	0.56

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:465:A:C6	8:am:52:LYS:HB3	2.39	0.56
1:2:496:U:H5''	3:aw:15:ARG:HG3	1.87	0.56
2:h:34:LYS:HG2	10:ae:122:ILE:HD11	1.87	0.56
2:h:45:CYS:O	2:h:49:ALA:N	2.37	0.56
2:h:152:TRP:HA	14:e:809:ASN:ND2	2.19	0.56
14:e:339:GLY:O	14:e:343:ARG:NH1	2.37	0.56
23:ak:175:GLU:HG2	23:ak:196:ALA:HB1	1.87	0.56
24:ac:285:LYS:HD3	24:ac:287:ASP:HB2	1.87	0.56
25:ad:694:ASP:OD1	25:ad:708:ARG:NH2	2.27	0.56
26:an:45:ARG:HD2	52:z:975:VAL:HG13	1.85	0.56
37:j:35:HIS:O	37:j:42:GLN:NE2	2.36	0.56
45:o:367:LEU:HD23	52:z:281:ASN:HB3	1.88	0.56
49:b:55:ASP:HB2	49:b:57:THR:HG22	1.87	0.56
71:R:119:LYS:HB3	71:R:121:ILE:HG23	1.87	0.56
71:R:212:SER:O	89:At:104:ARG:NH1	2.37	0.56
78:Y:151:ARG:O	84:Bj:107:GLN:NE2	2.33	0.56
79:Z:21:PHE:CD2	113:Ah:70:VAL:HG12	2.41	0.56
102:Aq:127:ARG:HG3	102:Aq:288:HIS:CG	2.40	0.56
112:Ac:97:SER:OG	112:Ac:98:ARG:NH1	2.34	0.56
113:Ah:260:THR:HG23	113:Ah:262:ILE:HG22	1.86	0.56
1:1:381:A:O2'	1:1:382:A:OP1	2.20	0.56
1:1:478:A:H4'	1:1:480:A:C6	2.40	0.56
1:1:812:A:H5'	1:1:813:U:OP2	2.04	0.56
1:1:963:A:O2'	1:1:964:A:N3	2.37	0.56
1:2:16:U:O5'	50:a:257:LYS:NZ	2.34	0.56
1:2:26:U:H2'	1:2:27:U:C6	2.39	0.56
1:2:175:U:H1'	48:q:12:MET:HG3	1.87	0.56
1:2:177:U:O2	1:2:177:U:H2'	2.05	0.56
1:2:185:U:H5''	1:2:185:U:O2	2.06	0.56
1:2:188:A:HO2'	1:2:189:A:P	2.22	0.56
1:2:228:G:OP2	1:2:242:U:O4	2.24	0.56
1:2:395:U:C2'	16:az:72:LYS:HZ3	2.17	0.56
1:2:434:U:C6	10:ae:10:GLY:HA3	2.40	0.56
1:2:491:U:H2'	14:e:384:SER:CA	2.26	0.56
1:2:525:A:H2'	15:d:221:ASP:HA	1.87	0.56
1:2:526:A:P	15:d:331:GLU:CA	2.90	0.56
1:2:549:C:O2	1:2:579:A:C6	2.59	0.56
4:m:145:GLY:O	4:m:167:LYS:NZ	2.30	0.56
7:au:160:TYR:HH	23:ak:2:SER:N	2.04	0.56
7:au:236:ASP:HB3	7:au:240:GLN:HG3	1.86	0.56
7:au:244:TYR:HA	7:au:247:GLN:HG3	1.87	0.56

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
8:am:24:ARG:HE	8:am:26:ILE:HD11	1.70	0.56
9:n:133:TRP:NE1	22:ab:1158:VAL:HG11	2.20	0.56
10:ae:403:GLN:NE2	10:ae:407:ALA:O	2.38	0.56
12:ag:154:LEU:HB3	12:ag:205:THR:HG23	1.87	0.56
12:ag:290:TRP:HD1	12:ag:291:GLN:HE22	1.53	0.56
13:aj:262:LEU:O	13:aj:306:ARG:NH2	2.31	0.56
14:e:593:ASP:HB3	14:e:596:ILE:HD13	1.87	0.56
21:aa:304:TYR:OH	21:aa:311:PRO:O	2.22	0.56
21:aa:471:ASN:HA	21:aa:474:ARG:HB2	1.87	0.56
21:aa:841:LEU:HD22	45:o:110:VAL:HG23	1.87	0.56
21:aa:937:GLU:OE1	21:aa:941:ARG:NH2	2.38	0.56
21:aa:964:ASN:ND2	45:o:139:SER:HB2	2.18	0.56
21:aa:1438:VAL:N	21:aa:1540:LEU:O	2.38	0.56
22:ab:126:ARG:NH1	38:l:139:LYS:HD2	2.15	0.56
22:ab:349:GLY:O	22:ab:363:ARG:NH2	2.38	0.56
22:ab:925:GLN:OE1	22:ab:933:ARG:NH1	2.38	0.56
23:ak:180:VAL:HG12	23:ak:189:ARG:HB2	1.86	0.56
24:ac:306:LEU:HD21	24:ac:573:MET:HB2	1.86	0.56
24:ac:366:VAL:HG13	24:ac:437:ILE:HG23	1.88	0.56
24:ac:766:GLU:HA	24:ac:769:LYS:HD2	1.86	0.56
25:ad:415:GLN:HB3	25:ad:633:ARG:NH2	2.20	0.56
25:ad:529:TYR:HE2	30:as:219:LEU:HD22	1.69	0.56
25:ad:600:TYR:OH	25:ad:641:ASP:OD2	2.20	0.56
26:an:182:ASP:HA	26:an:185:ARG:HH21	1.69	0.56
27:ao:135:ASP:OD1	27:ao:136:GLU:N	2.38	0.56
27:ao:184:GLU:OE2	27:ao:189:THR:OG1	2.23	0.56
29:aq:188:ARG:NH1	29:aq:194:GLN:HE21	2.03	0.56
35:t:88:ALA:O	35:t:92:TYR:N	2.35	0.56
38:l:151:ARG:NH1	38:l:151:ARG:O	2.38	0.56
38:l:654:LEU:HD13	38:l:658:GLY:HA2	1.86	0.56
41:ai:376:TRP:HE1	52:z:206:CYS:C	2.10	0.56
42:x:192:TRP:HD1	42:x:214:ILE:HD12	1.70	0.56
44:g:93:GLU:OE2	44:g:96:ARG:NH2	2.35	0.56
48:q:47:ARG:O	48:q:51:GLU:N	2.38	0.56
48:q:141:ARG:NH2	52:z:190:VAL:O	2.39	0.56
48:q:151:VAL:O	49:b:30:TYR:OH	2.11	0.56
50:a:85:ASN:O	52:z:485:ASN:ND2	2.38	0.56
52:z:990:SER:OG	52:z:991:SER:N	2.36	0.56
54:A:110:ASP:OD1	54:A:110:ASP:N	2.36	0.56
56:C:52:TRP:HB3	71:R:189:GLU:HG2	1.87	0.56
59:F:12:ARG:HH11	91:Ab:115:PRO:HB3	1.69	0.56

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
64:K:78:GLN:HE21	95:Aa:62:VAL:HG22	1.71	0.56
66:M:46:ARG:HB2	1:1:519:U:H5'	1.86	0.56
66:M:84:GLU:HB3	66:M:93:THR:HG22	1.88	0.56
68:O:230:ARG:NH2	68:O:240:PRO:O	2.33	0.56
72:S:376:GLU:OE1	106:Ad:195:ARG:NH2	2.37	0.56
76:W:63:LEU:HD13	76:W:98:GLN:HB3	1.86	0.56
77:X:80:PHE:HB3	92:Ai:165:PHE:CE2	2.40	0.56
78:Y:65:ASP:HA	78:Y:68:ARG:HB2	1.86	0.56
80:BA:67:LEU:O	80:BA:113:MET:HB2	2.05	0.56
82:BB:120:VAL:HG22	82:BB:121:VAL:H	1.70	0.56
87:BI:173:GLN:OE1	87:BI:209:GLY:N	2.39	0.56
91:Ab:228:HIS:HA	91:Ab:231:LEU:HB2	1.87	0.56
97:BM:35:GLN:HE22	97:BM:44:ALA:HA	1.70	0.56
100:BH:221:VAL:HG22	100:BH:225:ILE:HD11	1.86	0.56
104:Ak:192:VAL:O	104:Ak:201:ASP:N	2.37	0.56
105:BP:97:ARG:NH2	105:BP:97:ARG:CB	2.68	0.56
112:Ac:195:ARG:CZ	112:Ac:214:VAL:HB	2.35	0.56
114:BD:55:SER:OG	114:BD:56:GLY:N	2.39	0.56
118:BL:218:THR:H	118:BL:221:LYS:HZ1	1.53	0.56
119:BO:50:GLY:HA2	119:BO:56:ALA:HB1	1.86	0.56
119:BO:130:LEU:O	119:BO:173:HIS:HE1	1.89	0.56
1:2:46:U:OP1	29:aq:21:LEU:CB	2.23	0.56
1:2:363:A:C2'	1:2:364:A:H5'	2.35	0.56
1:2:413:U:C6	2:h:23:HIS:CE1	2.94	0.56
1:2:421:A:O3'	10:ae:298:TYR:CG	2.50	0.56
1:2:468:G:H1'	11:ay:29:TRP:CE2	2.41	0.56
1:2:510:A:C2'	3:aw:19:PRO:O	2.53	0.56
1:2:513:U:C6	16:az:145:ARG:O	2.58	0.56
1:2:613:U:O5'	44:g:96:ARG:NH2	2.36	0.56
3:aw:32:ASP:OD1	3:aw:32:ASP:N	2.36	0.56
7:au:87:ARG:HD2	7:au:93:MET:HE2	1.88	0.56
8:am:143:ARG:HG3	21:aa:1044:HIS:CD2	2.41	0.56
11:ay:125:GLY:O	18:r:267:ARG:N	2.36	0.56
14:e:283:ARG:NH2	20:u:109:VAL:O	2.38	0.56
19:af:231:VAL:HG11	19:af:261:LEU:HD22	1.87	0.56
19:af:443:TYR:HE1	19:af:468:VAL:HG13	1.71	0.56
21:aa:1086:GLY:O	21:aa:1637:ASN:ND2	2.38	0.56
23:ak:138:ARG:NH2	24:ac:1203:GLN:OE1	2.38	0.56
24:ac:1105:GLU:HB2	24:ac:1118:HIS:CD2	2.40	0.56
26:an:25:GLU:N	26:an:25:GLU:OE1	2.37	0.56
26:an:158:GLY:HA3	26:an:162:ALA:HB3	1.87	0.56

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
28:ap:216:LYS:HE3	28:ap:229:MET:HE1	1.88	0.56
29:aq:41:GLN:HE22	29:aq:59:VAL:HG21	1.71	0.56
38:l:225:TYR:CD1	38:l:266:VAL:HG11	2.41	0.56
39:ar:195:ARG:HH22	43:i:322:ARG:NH2	2.02	0.56
50:a:409:LEU:HD12	50:a:410:GLN:H	1.70	0.56
55:B:126:SER:HG	66:M:7:ARG:HH21	1.54	0.56
55:B:354:ALA:O	83:Aw:28:ASN:ND2	2.38	0.56
60:G:142:TRP:CZ2	60:G:152:MET:HE1	2.40	0.56
62:I:171:SER:OG	62:I:172:ASP:N	2.38	0.56
66:M:148:ILE:HG22	68:O:33:ARG:NH1	2.21	0.56
67:N:175:SER:OG	67:N:178:GLU:OE2	2.24	0.56
71:R:112:ILE:O	71:R:115:GLU:HG3	2.05	0.56
72:S:331:ARG:HD3	105:BP:59:ARG:HB2	1.86	0.56
74:U:28:LYS:O	74:U:29:VAL:HG22	2.04	0.56
78:Y:160:LEU:HD11	90:BC:68:ASP:HB3	1.86	0.56
79:Z:78:ASN:O	79:Z:88:ARG:NH2	2.37	0.56
83:Aw:165:ARG:NH2	83:Aw:167:GLU:OE2	2.39	0.56
84:Bj:160:LEU:HD23	84:Bj:162:ARG:HH21	1.71	0.56
85:An:82:TYR:HA	85:An:85:LEU:HG	1.88	0.56
86:Al:176:SER:HA	97:BM:143:GLU:HG3	1.87	0.56
90:BC:46:MET:HG3	102:Aq:2:LEU:HB3	1.86	0.56
93:Ap:205:ASP:OD1	93:Ap:205:ASP:N	2.39	0.56
106:Ad:31:LEU:O	106:Ad:35:ALA:HB3	2.06	0.56
116:Ag:215:ARG:HB3	116:Ag:219:MET:HE3	1.88	0.56
1:1:639:A:H2'	1:1:640:A:C8	2.40	0.56
1:1:829:U:H2'	1:1:830:A:C8	2.40	0.56
1:1:863:A:C6	1:1:1105:G:N2	2.73	0.56
1:1:1077:G:N2	1:1:1090:U:H3	2.04	0.56
1:2:138:U:O2'	1:2:266:U:H1'	2.03	0.56
1:2:201:A:HO2'	1:2:203:U:H5	1.53	0.56
1:2:384:U:C4'	50:a:153:LYS:HB3	2.36	0.56
1:2:426:U:OP1	13:aj:235:GLU:C	2.48	0.56
1:2:453:A:H1'	8:am:274:ILE:HG23	1.87	0.56
1:2:460:A:O2'	8:am:282:GLN:C	2.48	0.56
1:2:497:A:O5'	3:aw:15:ARG:CD	2.54	0.56
1:2:503:A:O3'	6:s:79:GLY:HA3	2.05	0.56
8:am:114:LYS:HE2	8:am:118:LYS:HE2	1.87	0.56
13:aj:71:MET:HG3	13:aj:116:ALA:HA	1.86	0.56
22:ab:151:ALA:HB2	38:l:419:LEU:HD11	1.87	0.56
22:ab:539:ASP:OD1	22:ab:615:SER:N	2.35	0.56
24:ac:619:ALA:O	24:ac:623:ALA:N	2.33	0.56

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
24:ac:1096:ARG:HH11	24:ac:1101:GLN:HE22	1.52	0.56
25:ad:127:ILE:O	25:ad:273:HIS:NE2	2.35	0.56
25:ad:226:THR:HA	37:j:189:LEU:HD13	1.86	0.56
26:an:19:HIS:O	26:an:21:ARG:N	2.38	0.56
26:an:227:GLY:O	52:z:982:ARG:NH2	2.36	0.56
38:l:321:LEU:HG	38:l:331:LEU:HD12	1.87	0.56
49:b:29:ILE:HG13	49:b:36:ILE:HD11	1.88	0.56
50:a:160:ARG:NH1	50:a:161:GLN:O	2.39	0.56
52:z:442:VAL:HG11	52:z:449:LEU:HD21	1.87	0.56
54:A:238:THR:OG1	54:A:302:ASP:O	2.19	0.56
55:B:159:MET:HE3	55:B:160:GLY:H	1.70	0.56
61:H:96:LYS:HD2	61:H:99:GLU:OE1	2.05	0.56
67:N:151:VAL:HG22	67:N:170:ILE:HG22	1.88	0.56
68:O:146:SER:OG	68:O:147:GLY:N	2.38	0.56
70:Q:99:LEU:HD12	116:Ag:26:LYS:HA	1.88	0.56
75:V:69:ARG:NH1	1:1:953:U:O2'	2.38	0.56
77:X:267:ASP:HB2	77:X:335:THR:HB	1.86	0.56
84:Bj:69:ALA:HB2	102:Aq:13:GLN:HG3	1.87	0.56
91:Ab:55:SER:O	91:Ab:55:SER:OG	2.22	0.56
97:BM:188:LYS:O	97:BM:191:GLU:HG2	2.05	0.56
100:BH:68:GLY:HA2	100:BH:214:HIS:HE1	1.70	0.56
103:BE:56:HIS:CD2	103:BE:57:THR:N	2.71	0.56
112:Ac:195:ARG:NE	112:Ac:214:VAL:HB	2.21	0.56
115:Ay:37:ASP:N	1:1:748:U:O4	2.39	0.56
119:BO:74:CYS:SG	119:BO:76:HIS:HB3	2.46	0.56
119:BO:172:ARG:HA	119:BO:172:ARG:NH2	2.13	0.56
1:1:1017:U:H5''	1:1:1018:A:OP2	2.06	0.56
1:2:408:U:P	9:n:58:LYS:HZ2	2.29	0.56
1:2:512:G:H4'	16:az:145:ARG:HH22	1.71	0.56
8:am:141:ASP:O	8:am:147:ILE:HD12	2.06	0.56
10:ae:265:ARG:NH2	10:ae:292:VAL:O	2.32	0.56
13:aj:36:GLN:HG3	14:e:255:HIS:NE2	2.20	0.56
18:r:101:GLU:OE1	18:r:105:ARG:NH2	2.38	0.56
18:r:142:THR:H	18:r:184:ASN:ND2	2.03	0.56
20:u:344:PRO:HG2	20:u:347:LEU:HD12	1.87	0.56
21:aa:148:GLN:HB3	21:aa:152:ARG:HB3	1.88	0.56
22:ab:690:ARG:HH21	22:ab:699:TYR:HD2	1.53	0.56
24:ac:511:SER:O	24:ac:527:HIS:N	2.34	0.56
25:ad:421:PHE:HZ	25:ad:517:ALA:HB3	1.71	0.56
26:an:251:ARG:HH12	45:o:130:ARG:CZ	2.18	0.56
28:ap:73:ARG:HG2	52:z:650:HIS:HE1	1.70	0.56

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
28:ap:146:MET:HE2	48:q:129:ARG:HG2	1.86	0.56
30:as:266:TRP:CD2	35:t:210:PRO:HA	2.41	0.56
31:at:303:THR:HG23	31:at:330:THR:HA	1.86	0.56
42:x:193:THR:OG1	42:x:196:ALA:O	2.24	0.56
45:o:287:GLU:HB3	50:a:309:ARG:CZ	2.35	0.56
46:c:190:GLU:OE1	46:c:194:GLN:NE2	2.38	0.56
46:c:278:ARG:HD3	46:c:295:ILE:HG12	1.87	0.56
52:z:677:ASP:OD1	52:z:677:ASP:N	2.37	0.56
56:C:102:ILE:O	70:Q:85:ARG:HD2	2.05	0.56
60:G:142:TRP:HZ2	60:G:152:MET:HE1	1.71	0.56
60:G:158:SER:O	60:G:160:GLY:N	2.38	0.56
61:H:61:GLN:NE2	61:H:114:TYR:OH	2.38	0.56
64:K:11:TYR:CZ	64:K:13:ALA:HA	2.40	0.56
75:V:96:ARG:NH2	1:1:374:U:H5'	2.20	0.56
78:Y:204:ARG:NH2	78:Y:218:GLU:OE2	2.37	0.56
85:An:88:VAL:HG23	85:An:89:ALA:H	1.69	0.56
88:Az:52:VAL:O	88:Az:56:ARG:NH1	2.38	0.56
93:Ap:75:VAL:HG22	93:Ap:122:CYS:SG	2.45	0.56
95:Aa:163:ALA:HB2	1:1:148:U:H5'	1.88	0.56
97:BM:294:ASP:HB2	97:BM:295:PRO:HD3	1.88	0.56
104:Ak:180:SER:O	104:Ak:184:ASP:N	2.39	0.56
113:Ah:171:ILE:HG12	113:Ah:202:MET:HE2	1.87	0.56
113:Ah:487:SER:OG	113:Ah:488:THR:N	2.37	0.56
1:1:391:A:H1'	1:1:392:A:C8	2.40	0.56
1:1:644:C:O2'	1:1:645:G:OP2	2.21	0.56
1:1:1075:A:H3'	1:1:1075:A:P	2.46	0.56
1:2:88:U:O2'	1:2:89:U:O5'	2.12	0.56
1:2:281:A:C5	43:i:254:ASN:CG	2.81	0.56
1:2:342:A:O2'	1:2:343:C:H5'	2.05	0.56
1:2:413:U:O4'	1:2:413:U:P	2.63	0.56
1:2:437:U:H4'	6:s:153:LYS:CD	2.35	0.56
1:2:460:A:O2'	8:am:282:GLN:CB	2.52	0.56
7:au:87:ARG:HE	7:au:166:THR:HG21	1.68	0.56
13:aj:179:ARG:NH2	13:aj:215:GLU:OE1	2.34	0.56
14:e:557:ARG:O	14:e:557:ARG:NH2	2.38	0.56
19:af:395:ARG:HD3	19:af:501:TYR:CZ	2.41	0.56
24:ac:338:PHE:HA	24:ac:342:LEU:HB2	1.88	0.56
27:ao:50:LEU:HD13	27:ao:109:ILE:HD12	1.87	0.56
28:ap:118:GLN:NE2	28:ap:214:ASP:HA	2.19	0.56
30:as:30:PRO:HG2	40:av:105:ARG:HA	1.88	0.56
36:p:108:GLU:HG2	36:p:121:PRO:HG2	1.87	0.56

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
49:b:23:ARG:NH1	85:An:151:GLU:HG3	2.15	0.56
50:a:241:ILE:O	50:a:245:PHE:HB2	2.05	0.56
54:A:124:ASN:HB3	54:A:127:TYR:HB3	1.88	0.56
56:C:140:ASN:OD1	56:C:141:ARG:N	2.39	0.56
57:D:76:GLU:CD	57:D:76:GLU:H	2.12	0.56
58:E:170:TYR:HA	58:E:171:PRO:C	2.30	0.56
63:J:59:THR:O	63:J:70:ARG:HA	2.05	0.56
66:M:68:ARG:NH1	1:1:123:U:OP2	2.39	0.56
70:Q:111:SER:HB3	70:Q:136:PHE:HD2	1.71	0.56
70:Q:158:ARG:NH1	85:An:246:ALA:O	2.34	0.56
78:Y:51:LYS:HZ3	78:Y:53:HIS:HB3	1.70	0.56
83:Aw:160:PRO:O	83:Aw:162:PRO:HD3	2.06	0.56
88:Az:60:HIS:CD2	88:Az:60:HIS:N	2.73	0.56
92:Ai:259:LEU:HD22	92:Ai:263:THR:HG21	1.86	0.56
97:BM:76:TYR:HE2	97:BM:323:ARG:HG2	1.71	0.56
118:BL:152:GLN:HB2	118:BL:177:TYR:CE1	2.41	0.56
118:BL:219:TYR:HB2	118:BL:248:ARG:HB2	1.88	0.56
118:BL:264:VAL:HG23	118:BL:351:LEU:HB3	1.87	0.56
1:1:176:A:N6	1:1:526:U:O4	2.23	0.56
1:1:243:G:N2	1:1:253:U:O2'	2.29	0.56
1:1:456:A:H1'	1:1:457:C:H5'	1.87	0.56
1:2:107:A:O3'	43:i:363:TYR:OH	2.24	0.56
1:2:282:A:C1'	1:2:283:U:C6	2.86	0.56
1:2:348:U:H5'	1:2:349:G:OP2	2.04	0.56
1:2:471:A:N3	12:ag:19:ARG:CB	2.69	0.56
1:2:487:C:O3'	9:n:34:LYS:NZ	2.39	0.56
1:2:496:U:C5'	3:aw:2:HIS:HB2	2.36	0.56
1:2:501:U:OP1	3:aw:13:TYR:CE2	2.59	0.56
1:2:508:G:O6	11:ay:164:THR:CB	2.54	0.56
13:aj:277:LEU:HD22	13:aj:285:LEU:HG	1.87	0.56
14:e:253:ASP:OD1	14:e:402:ARG:NH2	2.39	0.56
14:e:445:ASP:HB3	20:u:683:GLN:HG2	1.87	0.56
15:d:279:ASN:OD1	15:d:280:LEU:N	2.39	0.56
19:af:239:LEU:HD12	19:af:261:LEU:HD11	1.88	0.56
20:u:223:ARG:HE	20:u:247:ARG:HE	1.54	0.56
20:u:264:PRO:HB2	20:u:265:MET:HE2	1.86	0.56
21:aa:471:ASN:HB3	27:ao:203:PRO:HB2	1.87	0.56
21:aa:474:ARG:HB3	21:aa:478:ARG:HH12	1.71	0.56
23:ak:267:SER:O	24:ac:560:TYR:OH	2.20	0.56
24:ac:531:VAL:HA	24:ac:534:ARG:HD2	1.87	0.56
24:ac:755:ARG:O	24:ac:823:GLY:N	2.38	0.56

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
29:aq:152:GLU:O	29:aq:197:TYR:OH	2.23	0.56
33:w:55:HIS:NE2	33:w:77:PHE:HB2	2.21	0.56
35:t:52:LEU:HD12	35:t:168:THR:HB	1.87	0.56
55:B:117:GLU:CD	106:Ad:213:SER:HB2	2.31	0.56
56:C:179:PRO:HG3	56:C:185:TYR:CD1	2.41	0.56
60:G:116:GLY:H	1:1:353:A:H4'	1.71	0.56
60:G:201:ARG:NH1	60:G:266:LEU:O	2.39	0.56
68:O:274:PRO:HA	68:O:277:VAL:HG12	1.88	0.56
71:R:414:LEU:HA	71:R:417:VAL:HG12	1.87	0.56
81:UA:22:UNK:HA	1:1:590:A:O2'	2.06	0.56
98:Ar:144:ASP:OD2	98:Ar:146:ARG:NE	2.35	0.56
120:BG:1319:SER:HB3	120:BG:1321:ALA:H	1.71	0.56
1:1:177:G:H22	1:1:525:U:H3	1.54	0.56
1:2:45:U:C3'	29:aq:22:PHE:CA	2.75	0.56
1:2:53:U:C4	1:2:54:A:C6	2.94	0.56
1:2:199:A:H4'	1:2:200:A:H5'	1.88	0.56
1:2:226:A:C6	1:2:227:U:C4	2.94	0.56
1:2:384:U:H4'	50:a:156:PRO:N	2.21	0.56
1:2:394:U:O2'	1:2:395:U:O5'	2.24	0.56
1:2:615:U:H6	44:g:101:ARG:HD2	1.56	0.56
8:am:226:ARG:NH1	8:am:258:PHE:O	2.39	0.56
10:ae:104:THR:HG21	10:ae:112:ARG:HD2	1.86	0.56
10:ae:243:GLY:HA3	10:ae:245:LYS:HZ3	1.70	0.56
16:az:132:ASP:N	16:az:132:ASP:OD1	2.37	0.56
20:u:753:ALA:HB1	20:u:756:ARG:HB2	1.87	0.56
21:aa:77:ILE:HG21	21:aa:107:LYS:H	1.71	0.56
21:aa:876:ARG:HD2	21:aa:911:PRO:HG3	1.86	0.56
21:aa:1470:GLU:HB3	21:aa:1490:ARG:HB2	1.87	0.56
22:ab:753:SER:HA	22:ab:756:SER:HB2	1.87	0.56
24:ac:559:HIS:ND1	24:ac:559:HIS:O	2.38	0.56
25:ad:779:PRO:HB2	45:o:302:LYS:HD3	1.88	0.56
29:aq:29:TRP:CZ2	33:w:142:VAL:HA	2.41	0.56
31:at:237:PHE:CE2	31:at:296:ASN:HB3	2.41	0.56
31:at:337:LEU:O	45:o:439:LYS:NZ	2.36	0.56
32:y:13:LEU:HD11	32:y:68:GLY:HA3	1.87	0.56
48:q:178:ASN:O	49:b:132:GLN:NE2	2.35	0.56
56:C:104:GLU:HB3	102:Aq:326:TRP:CH2	2.41	0.56
60:G:192:ASN:ND2	83:Aw:100:GLN:OE1	2.39	0.56
65:L:166:TRP:HE1	95:Aa:126:GLU:HG3	1.70	0.56
68:O:213:LEU:HD11	68:O:230:ARG:HB3	1.86	0.56
69:P:112:ARG:HE	96:Ao:113:TRP:HH2	1.52	0.56

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
90:BC:78:CYS:HA	112:Ac:24:THR:N	2.21	0.56
95:Aa:55:ARG:NH2	1:1:855:A:OP2	2.38	0.56
97:BM:144:LEU:HD21	97:BM:263:ARG:HH22	1.71	0.56
97:BM:177:ARG:NE	97:BM:212:GLU:OE2	2.34	0.56
105:BP:70:PRO:HB3	109:Af:47:PRO:HA	1.86	0.56
105:BP:182:THR:OG1	105:BP:185:ASP:O	2.17	0.56
117:Ax:106:PHE:O	117:Ax:163:ARG:NH2	2.38	0.56
119:BO:172:ARG:CA	119:BO:172:ARG:NH2	2.69	0.56
1:2:48:U:C4'	37:j:10:ALA:N	2.69	0.56
1:2:63:G:N1	1:2:161:A:H5'	2.21	0.56
1:2:308:U:O2'	1:2:309:A:H8	1.79	0.56
1:2:347:U:OP2	115:Ay:39:ARG:HD2	2.06	0.56
1:2:438:G:N9	1:2:444:A:H2	2.04	0.56
1:2:479:A:H2'	9:n:40:TYR:OH	2.06	0.56
1:2:490:A:H2'	1:2:491:U:C6	2.41	0.56
1:2:526:A:P	15:d:331:GLU:CB	2.94	0.56
10:ae:294:VAL:O	10:ae:300:ASN:ND2	2.32	0.56
12:ag:85:LEU:HG	12:ag:86:PRO:O	2.05	0.56
12:ag:356:LEU:O	12:ag:361:ARG:NE	2.36	0.56
16:az:46:PHE:HD1	16:az:52:GLN:HE22	1.52	0.56
19:af:732:PHE:CZ	19:af:801:ALA:HA	2.41	0.56
21:aa:147:ASP:HB2	46:c:205:ILE:HD13	1.88	0.56
22:ab:656:VAL:HB	38:l:603:VAL:HG23	1.86	0.56
22:ab:1130:GLU:HG2	22:ab:1131:VAL:HG22	1.88	0.56
24:ac:164:GLU:O	38:l:78:ARG:NH2	2.38	0.56
24:ac:644:ARG:HH22	24:ac:1008:ALA:HA	1.71	0.56
26:an:110:GLU:HG2	50:a:319:PRO:HD3	1.87	0.56
28:ap:1:MET:HE1	28:ap:73:ARG:HB3	1.88	0.56
29:aq:116:HIS:HE1	29:aq:150:SER:HA	1.70	0.56
33:w:118:GLU:OE2	48:q:36:ARG:NH2	2.38	0.56
35:t:103:LEU:HD13	35:t:173:MET:HG2	1.87	0.56
40:av:41:GLU:O	40:av:44:THR:OG1	2.24	0.56
46:c:215:LEU:HD21	52:z:234:ARG:HB3	1.88	0.56
47:k:146:HIS:O	47:k:162:PHE:HB3	2.05	0.56
52:z:286:LYS:NZ	52:z:482:HIS:O	2.39	0.56
56:C:23:THR:HG21	56:C:63:ARG:HG2	1.88	0.56
61:H:99:GLU:HA	1:1:390:A:C5	2.41	0.56
64:K:31:GLU:HB2	64:K:34:VAL:HG12	1.88	0.56
65:L:32:TYR:CZ	65:L:42:VAL:HG12	2.41	0.56
68:O:265:GLU:HA	71:R:41:ARG:HB3	1.88	0.56
74:U:25:PHE:O	74:U:25:PHE:CD2	2.58	0.56

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
78:Y:44:ALA:HB1	90:BC:99:ILE:HD13	1.88	0.56
78:Y:165:ASP:OD2	112:Ac:30:ARG:NH2	2.39	0.56
81:UA:193:UNK:O	81:UA:197:UNK:N	2.39	0.56
85:An:134:ILE:HD11	85:An:169:PHE:CZ	2.41	0.56
86:Al:160:PHE:HA	86:Al:242:ASN:HD22	1.71	0.56
89:At:137:SER:OG	89:At:138:GLU:N	2.36	0.56
91:Ab:228:HIS:CD2	96:Ao:271:GLN:HE21	2.24	0.56
92:Ai:77:GLN:O	92:Ai:272:HIS:NE2	2.39	0.56
99:Aj:336:LEU:HD11	99:Aj:422:LEU:HD23	1.87	0.56
105:BP:-41:ARG:NH2	105:BP:18:GLU:OE2	2.37	0.56
105:BP:-4:THR:O	105:BP:-4:THR:OG1	2.17	0.56
118:BL:114:ASP:O	118:BL:114:ASP:CG	2.48	0.56
1:1:553:A:H2'	1:1:554:G:H5'	1.88	0.56
1:2:13:U:H6	50:a:262:PRO:HB3	1.71	0.55
1:2:109:U:H3'	1:2:109:U:P	2.46	0.55
1:2:167:U:O2	1:2:167:U:H2'	2.05	0.55
1:2:280:A:N7	1:2:322:A:P	2.79	0.55
1:2:282:A:C2'	43:i:247:ILE:HD11	2.35	0.55
1:2:283:U:C4	1:2:316:A:N6	2.73	0.55
1:2:453:A:H5'	8:am:277:PRO:CG	1.87	0.55
1:2:481:U:C5	2:h:24:PHE:CD2	2.94	0.55
1:2:504:A:C1'	6:s:80:GLN:HE21	2.19	0.55
1:2:508:G:N2	1:2:509:C:N3	2.53	0.55
1:2:513:U:O2	16:az:146:TYR:HE1	1.87	0.55
1:2:589:G:C6	1:2:604:U:O4	2.59	0.55
13:aj:118:ASP:O	13:aj:122:ALA:N	2.39	0.55
17:ax:53:GLU:OE2	17:ax:53:GLU:N	2.37	0.55
18:r:53:GLU:O	18:r:57:TYR:N	2.22	0.55
19:af:245:ARG:O	36:p:197:PRO:HG2	2.06	0.55
21:aa:1128:PHE:O	42:x:251:LYS:NZ	2.31	0.55
21:aa:1441:ILE:HG21	21:aa:1551:VAL:HB	1.88	0.55
21:aa:1527:VAL:HG21	21:aa:1606:TYR:CG	2.41	0.55
22:ab:472:ARG:HH22	22:ab:932:GLU:HB3	1.71	0.55
22:ab:643:ALA:HB3	38:l:416:LEU:HD23	1.88	0.55
24:ac:686:ARG:H	38:l:316:PRO:C	2.14	0.55
28:ap:182:GLU:O	28:ap:186:ASP:N	2.32	0.55
29:aq:205:LEU:HB2	29:aq:212:ASN:HB2	1.86	0.55
30:as:119:HIS:CG	35:t:188:PRO:HB3	2.41	0.55
35:t:60:LEU:HD21	35:t:89:THR:HG22	1.87	0.55
50:a:83:MET:SD	50:a:83:MET:N	2.79	0.55
61:H:11:LEU:HD12	61:H:14:ALA:N	2.21	0.55

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
62:I:139:MET:HE1	62:I:166:LYS:HD3	1.88	0.55
64:K:105:LEU:HB2	91:Ab:110:GLN:OE1	2.05	0.55
95:Aa:158:SER:O	95:Aa:162:LYS:HG2	2.06	0.55
114:BD:8:LYS:HA	114:BD:23:ALA:HA	1.88	0.55
116:Ag:233:ILE:O	116:Ag:233:ILE:HG13	2.06	0.55
1:1:319:A:O2'	1:1:320:G:OP1	2.22	0.55
1:1:754:A:N6	1:1:784:A:H61	2.03	0.55
1:2:126:U:O5'	1:2:126:U:H6	1.90	0.55
1:2:283:U:O2	1:2:283:U:H2'	2.07	0.55
1:2:425:A:H5'	13:aj:235:GLU:HB3	1.81	0.55
1:2:462:G:OP2	2:h:134:TYR:CE1	2.51	0.55
1:2:587:A:H8	1:2:587:A:OP2	1.89	0.55
12:ag:81:PRO:O	12:ag:82:LEU:HB2	2.06	0.55
14:e:514:GLU:HG3	14:e:515:GLU:OE1	2.05	0.55
15:d:340:ASP:OD1	15:d:344:ASN:HB2	2.06	0.55
21:aa:1001:PHE:HE2	21:aa:1011:THR:HG21	1.70	0.55
23:ak:23:HIS:HD2	23:ak:161:HIS:HB3	1.70	0.55
24:ac:447:SER:OG	24:ac:453:GLU:HB2	2.06	0.55
24:ac:684:ILE:HB	38:l:317:PRO:HD2	1.89	0.55
24:ac:1114:ILE:HD12	24:ac:1141:ILE:HG22	1.86	0.55
28:ap:73:ARG:NH2	52:z:649:PRO:O	2.39	0.55
32:y:55:CYS:SG	32:y:57:VAL:HG22	2.46	0.55
32:y:133:ARG:NH1	32:y:169:SER:OG	2.40	0.55
38:l:151:ARG:HD3	38:l:220:TYR:CZ	2.42	0.55
38:l:229:ARG:HD3	38:l:230:TYR:CZ	2.42	0.55
39:ar:44:ARG:NH1	40:av:131:GLN:OE1	2.39	0.55
41:ai:377:LEU:HB3	46:c:145:HIS:HB3	1.87	0.55
45:o:350:PHE:CE1	50:a:207:GLU:HB3	2.42	0.55
48:q:18:LEU:O	48:q:29:THR:OG1	2.17	0.55
65:L:54:ALA:HA	65:L:80:THR:HA	1.89	0.55
66:M:148:ILE:HG22	68:O:33:ARG:CZ	2.35	0.55
72:S:347:VAL:HG12	72:S:348:ALA:H	1.72	0.55
75:V:147:GLU:HG3	116:Ag:143:ARG:HH12	1.72	0.55
79:Z:54:ASP:O	79:Z:55:HIS:ND1	2.40	0.55
80:BA:112:GLU:N	80:BA:112:GLU:OE1	2.39	0.55
93:Ap:101:GLN:HG3	120:BG:1336:GLN:HE22	1.71	0.55
96:Ao:41:ARG:HH21	1:1:941:A:H5'	1.71	0.55
99:Aj:378:ASN:HA	99:Aj:380:ARG:NH2	2.22	0.55
101:Am:185:MET:HG2	101:Am:202:TYR:CE1	2.41	0.55
105:BP:95:PRO:O	105:BP:97:ARG:N	2.40	0.55
1:1:303:U:O2'	1:1:304:G:OP1	2.23	0.55

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:558:C:N4	1:1:559:U:O4	2.40	0.55
1:2:64:U:H5'	1:2:65:U:C5	2.42	0.55
1:2:434:U:H2'	6:s:158:SER:OG	2.06	0.55
1:2:501:U:N3	3:aw:27:ARG:NH1	2.54	0.55
1:2:554:A:N7	1:2:555:U:C4	2.75	0.55
13:aj:163:VAL:HG11	13:aj:185:CYS:SG	2.46	0.55
15:d:201:ARG:HA	19:af:199:ASN:HD21	1.70	0.55
21:aa:349:TRP:HA	21:aa:352:VAL:HG22	1.89	0.55
21:aa:1404:PRO:O	21:aa:1408:GLN:N	2.32	0.55
24:ac:309:PRO:HB2	24:ac:311:ILE:HG22	1.88	0.55
25:ad:130:PHE:HD1	25:ad:131:PRO:HD2	1.72	0.55
25:ad:144:ASN:O	25:ad:148:SER:N	2.38	0.55
25:ad:614:GLU:O	25:ad:618:ARG:N	2.38	0.55
33:w:124:GLU:O	33:w:128:TYR:N	2.38	0.55
34:v:146:PHE:HB2	34:v:150:VAL:HB	1.88	0.55
37:j:175:SER:N	37:j:178:GLU:OE1	2.33	0.55
41:ai:254:ASP:O	41:ai:256:ILE:N	2.40	0.55
46:c:166:GLU:OE2	46:c:168:ARG:NE	2.39	0.55
48:q:137:ARG:NH2	49:b:118:ASP:OD2	2.39	0.55
52:z:832:PRO:HA	52:z:835:TYR:CZ	2.42	0.55
55:B:295:SER:OG	75:V:28:PRO:HA	2.06	0.55
64:K:116:SER:OG	65:L:133:LYS:O	2.14	0.55
65:L:90:ARG:HH11	95:Aa:190:SER:HB2	1.71	0.55
66:M:110:ASN:OD1	66:M:111:TRP:N	2.39	0.55
72:S:281:ARG:HA	99:Aj:110:LEU:HD13	1.89	0.55
77:X:302:THR:H	77:X:306:ALA:N	2.03	0.55
79:Z:37:PHE:O	85:An:44:TRP:NE1	2.39	0.55
81:UA:90:UNK:O	81:UA:94:UNK:N	2.38	0.55
85:An:127:LEU:HD23	85:An:127:LEU:C	2.31	0.55
86:Al:145:ARG:HB3	86:Al:203:VAL:HG11	1.88	0.55
88:Az:89:PRO:HG2	88:Az:92:TYR:CD2	2.40	0.55
90:BC:51:ARG:NH2	90:BC:90:GLN:O	2.39	0.55
91:Ab:116:TYR:HB2	95:Aa:116:MET:HE1	1.89	0.55
92:Ai:305:ALA:HB2	92:Ai:329:LEU:HD12	1.88	0.55
97:BM:90:GLN:HG2	97:BM:282:ARG:HH21	1.70	0.55
99:Aj:299:GLU:O	99:Aj:302:SER:N	2.39	0.55
99:Aj:413:GLY:O	99:Aj:415:TRP:N	2.39	0.55
108:Av:33:VAL:HG21	108:Av:98:VAL:HG12	1.86	0.55
119:BO:92:ARG:NH1	119:BO:97:VAL:HG11	2.22	0.55
1:2:32:A:H5''	1:2:32:A:C8	2.40	0.55
1:2:66:U:P	35:t:35:ARG:HB3	2.47	0.55

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:106:U:C3'	1:2:107:A:H5'	2.36	0.55
1:2:122:U:H4'	1:2:123:G:OP2	2.04	0.55
1:2:172:A:N3	1:2:172:A:H5''	2.21	0.55
1:2:177:U:C5'	33:w:119:ARG:NE	2.69	0.55
1:2:199:A:OP2	21:aa:336:ARG:NH1	2.40	0.55
1:2:228:G:C2'	1:2:242:U:H6	2.17	0.55
1:2:270:U:C6	1:2:270:U:H3'	2.41	0.55
1:2:313:C:C6	4:m:169:GLN:NE2	2.70	0.55
1:2:413:U:H3	2:h:23:HIS:HB2	1.71	0.55
1:2:469:C:O2'	2:h:19:ARG:CZ	2.49	0.55
1:2:585:U:H5'	1:2:585:U:H6	1.69	0.55
8:am:144:SER:OG	21:aa:1041:ASP:OD1	2.22	0.55
10:ae:419:PRO:HA	10:ae:422:THR:HG22	1.89	0.55
19:af:535:ASP:OD2	19:af:541:ARG:HG2	2.07	0.55
19:af:629:THR:HG23	19:af:631:VAL:HG13	1.89	0.55
20:u:80:LYS:HA	22:ab:403:GLU:OE1	2.07	0.55
22:ab:1129:PRO:HA	22:ab:1133:MET:HB2	1.87	0.55
25:ad:124:TYR:OH	25:ad:126:MET:SD	2.48	0.55
25:ad:415:GLN:HE22	25:ad:520:TYR:N	2.04	0.55
39:ar:190:LEU:O	39:ar:193:LEU:N	2.39	0.55
45:o:132:ARG:CD	50:a:349:TRP:CE2	2.89	0.55
49:b:15:ARG:HA	49:b:18:THR:HG22	1.87	0.55
60:G:16:PRO:HG2	60:G:19:GLN:HG2	1.87	0.55
68:O:316:ASP:HA	68:O:319:VAL:HG22	1.88	0.55
70:Q:220:MET:O	70:Q:224:LYS:N	2.38	0.55
78:Y:238:HIS:O	78:Y:244:ARG:NH2	2.40	0.55
86:Al:38:VAL:HG21	86:Al:70:GLN:O	2.07	0.55
96:Ao:40:VAL:HG13	1:1:338:A:P	2.47	0.55
97:BM:224:PRO:HD2	97:BM:228:ASN:OD1	2.07	0.55
99:Aj:314:VAL:HG11	99:Aj:367:LEU:HG	1.88	0.55
104:Ak:54:TRP:HA	104:Ak:54:TRP:CE3	2.41	0.55
113:Ah:342:PHE:O	113:Ah:346:ALA:N	2.40	0.55
115:Ay:172:PRO:HG3	1:1:962:A:H2'	1.89	0.55
116:Ag:231:LEU:HB2	116:Ag:232:PRO:HD2	1.88	0.55
1:1:1075:A:H8	1:1:1075:A:OP2	1.89	0.55
1:2:86:C:HO2'	47:k:152:LYS:CB	2.18	0.55
1:2:135:U:C6	1:2:147:U:O2	2.60	0.55
1:2:250:A:H2'	1:2:251:U:H6	1.67	0.55
1:2:281:A:N7	43:i:250:THR:O	2.40	0.55
1:2:297:U:H2'	1:2:298:U:OP2	2.06	0.55
1:2:554:A:C8	1:2:555:U:C5	2.94	0.55

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
7:au:239:ARG:NH2	7:au:247:GLN:OXT	2.32	0.55
13:aj:111:ILE:O	13:aj:117:ARG:NH1	2.40	0.55
14:e:639:ASP:HB3	14:e:659:VAL:HG21	1.89	0.55
20:u:134:GLN:O	20:u:138:GLY:N	2.40	0.55
21:aa:1502:GLU:OE1	26:an:129:ARG:NH2	2.33	0.55
22:ab:664:GLU:HA	22:ab:667:MET:SD	2.47	0.55
25:ad:505:TYR:HD2	25:ad:555:VAL:HG11	1.72	0.55
41:ai:137:CYS:O	41:ai:141:GLY:N	2.29	0.55
43:i:215:ASP:N	43:i:215:ASP:OD1	2.37	0.55
49:b:75:GLN:OE1	49:b:78:LYS:NZ	2.39	0.55
50:a:90:TYR:O	50:a:94:LYS:NZ	2.40	0.55
53:bd:54:TRP:CG	53:bd:59:HIS:HD1	2.24	0.55
58:E:185:ARG:NH2	108:Av:116:GLN:HA	2.22	0.55
63:J:119:LYS:O	63:J:121:SER:N	2.38	0.55
65:L:38:ASP:OD1	91:Ab:107:ARG:NH1	2.40	0.55
71:R:278:ASN:O	71:R:282:HIS:N	2.38	0.55
73:T:50:ARG:NH2	1:1:536:A:O2'	2.39	0.55
77:X:349:PRO:HG2	77:X:398:ARG:HG3	1.87	0.55
79:Z:20:PRO:HD3	1:1:907:G:C2	2.42	0.55
85:An:133:VAL:HG23	85:An:181:ARG:HD2	1.89	0.55
92:Ai:106:SER:OG	92:Ai:108:ASP:OD1	2.24	0.55
93:Ap:100:LEU:HG	93:Ap:111:PHE:HZ	1.72	0.55
96:Ao:10:ALA:N	1:1:409:A:N1	2.55	0.55
99:Aj:368:GLU:HG2	99:Aj:390:ARG:HH12	1.71	0.55
101:Am:117:VAL:O	101:Am:121:ALA:N	2.22	0.55
101:Am:119:GLU:OE1	101:Am:235:PHE:N	2.30	0.55
102:Aq:47:ASP:HB3	102:Aq:53:SER:HB3	1.88	0.55
118:BL:253:ASN:OD1	118:BL:269:ASN:ND2	2.18	0.55
1:2:175:U:OP2	48:q:11:GLN:OE1	2.17	0.55
1:2:209:U:H2'	1:2:209:U:O2	2.06	0.55
1:2:418:A:C5	13:aj:54:PRO:HB2	2.40	0.55
1:2:436:U:C6	6:s:154:VAL:HG22	2.41	0.55
1:2:491:U:P	9:n:46:GLN:HG3	2.44	0.55
1:2:503:A:N6	14:e:717:THR:O	2.34	0.55
1:2:570:A:H8	1:2:570:A:O5'	1.89	0.55
2:h:63:PRO:HG3	14:e:693:GLN:HE22	1.72	0.55
4:m:42:PRO:HD2	4:m:104:ASN:HD21	1.72	0.55
8:am:142:MET:SD	8:am:147:ILE:HG22	2.47	0.55
12:ag:53:LYS:HA	12:ag:56:ARG:HH21	1.72	0.55
12:ag:491:GLU:OE1	23:ak:302:ARG:NH1	2.39	0.55
13:aj:226:ASP:OD2	24:ac:1218:SER:OG	2.25	0.55

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
14:e:79:MET:HE3	53:bd:70:LEU:HA	1.87	0.55
17:ax:62:THR:OG1	17:ax:64:ASP:OD1	2.19	0.55
21:aa:307:GLU:HA	21:aa:345:TRP:CD1	2.41	0.55
22:ab:387:ARG:HH22	24:ac:1224:SER:C	2.14	0.55
22:ab:650:TYR:O	22:ab:652:GLN:NE2	2.38	0.55
22:ab:738:LEU:HA	22:ab:743:LEU:HD12	1.89	0.55
24:ac:246:THR:O	24:ac:588:SER:OG	2.17	0.55
24:ac:1118:HIS:ND1	38:l:561:TYR:O	2.40	0.55
25:ad:569:LEU:HB2	25:ad:577:ALA:HB2	1.89	0.55
28:ap:22:GLU:OE2	28:ap:222:SER:OG	2.19	0.55
37:j:33:ARG:HG2	37:j:47:PHE:CE1	2.42	0.55
41:ai:255:SER:OG	48:q:118:LYS:NZ	2.22	0.55
49:b:25:ILE:HG23	49:b:83:ILE:HG12	1.89	0.55
50:a:360:LEU:HD11	50:a:365:MET:HE3	1.89	0.55
56:C:67:ASN:HD21	89:At:79:ALA:HB3	1.70	0.55
56:C:71:TYR:HE2	116:Ag:102:PRO:HG3	1.72	0.55
60:G:115:MET:HG2	95:Aa:22:PRO:HG3	1.88	0.55
61:H:42:VAL:HB	61:H:161:VAL:HG13	1.88	0.55
65:L:93:VAL:HG21	65:L:106:TRP:CD2	2.41	0.55
68:O:116:ILE:O	68:O:120:GLY:N	2.35	0.55
71:R:212:SER:OG	89:At:108:MET:HB3	2.07	0.55
72:S:377:LYS:HD3	106:Ad:75:ARG:HG3	1.88	0.55
75:V:15:GLU:HA	75:V:18:THR:HG22	1.87	0.55
82:BB:124:ALA:HA	103:BE:55:PRO:HD2	1.88	0.55
88:Az:47:ASP:OD1	88:Az:49:ARG:HG2	2.06	0.55
94:Au:46:VAL:O	117:Ax:173:ARG:NH1	2.40	0.55
101:Am:276:ILE:HG13	101:Am:277:MET:N	2.21	0.55
117:Ax:203:ARG:O	117:Ax:204:HIS:HB2	2.05	0.55
1:2:46:U:C2'	29:aq:11:SER:OG	2.55	0.55
1:2:86:C:H5'	1:2:87:A:OP2	2.07	0.55
1:2:177:U:OP2	48:q:10:ARG:O	2.25	0.55
1:2:250:A:O2'	1:2:251:U:H5'	2.07	0.55
5:f:144:GLU:HA	44:g:154:TYR:HE2	1.71	0.55
8:am:280:ILE:HG23	8:am:281:LEU:HG	1.88	0.55
11:ay:118:LYS:HD3	11:ay:137:TRP:CD2	2.42	0.55
14:e:85:ASP:OD1	14:e:86:PHE:N	2.39	0.55
21:aa:576:ARG:HD3	21:aa:586:TRP:HZ2	1.72	0.55
21:aa:688:GLU:HA	21:aa:691:TRP:CD2	2.42	0.55
22:ab:1008:ASN:OD1	22:ab:1009:ARG:N	2.36	0.55
24:ac:285:LYS:HG2	24:ac:286:PRO:HD2	1.89	0.55
25:ad:292:ARG:HD3	25:ad:328:PRO:HG3	1.88	0.55

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:424:LEU:HD21	25:ad:471:LYS:H	1.72	0.55
25:ad:621:VAL:HG12	35:t:210:PRO:HD3	1.88	0.55
26:an:34:TYR:OH	52:z:981:ALA:O	2.23	0.55
27:ao:125:VAL:HG21	27:ao:154:ALA:HA	1.87	0.55
30:as:148:LEU:HD22	30:as:157:LEU:HD12	1.87	0.55
36:p:91:ARG:HD2	52:z:139:ARG:HH12	1.72	0.55
38:l:72:ARG:NH2	38:l:504:ARG:O	2.39	0.55
38:l:72:ARG:HG2	38:l:73:PRO:HD2	1.87	0.55
38:l:483:GLU:N	38:l:483:GLU:OE1	2.35	0.55
41:ai:190:ILE:HD11	41:ai:349:TRP:CD2	2.42	0.55
53:bd:72:LEU:HB2	53:bd:82:PHE:HB2	1.89	0.55
55:B:177:HIS:HE1	1:1:178:U:OP1	1.90	0.55
60:G:216:MET:HB2	60:G:234:LEU:HD22	1.89	0.55
61:H:31:LYS:HB2	1:1:388:U:OP2	2.06	0.55
65:L:133:LYS:HB2	65:L:149:ASN:ND2	2.22	0.55
67:N:68:HIS:CD2	116:Ag:34:ILE:HD13	2.41	0.55
67:N:76:TYR:O	67:N:78:ARG:N	2.39	0.55
67:N:209:VAL:HG11	71:R:419:GLN:HG2	1.89	0.55
71:R:289:SER:O	71:R:292:SER:N	2.39	0.55
77:X:496:TRP:HZ3	106:Ad:65:ILE:HD12	1.71	0.55
94:Au:112:MET:HG3	113:Ah:242:TYR:HB3	1.89	0.55
97:BM:75:VAL:HG12	97:BM:79:ARG:HE	1.72	0.55
98:Ar:149:GLU:HB2	105:BP:147:VAL:HG13	1.88	0.55
105:BP:-16:SER:OG	105:BP:-1:GLU:OE1	2.19	0.55
108:Av:48:ARG:HA	108:Av:51:ARG:NH1	2.22	0.55
113:Ah:58:VAL:HG11	113:Ah:68:ILE:HG23	1.88	0.55
114:BD:92:GLU:OE1	114:BD:96:ARG:NH1	2.39	0.55
120:BG:1262:CYS:HA	120:BG:1267:ASP:HA	1.89	0.55
120:BG:1278:ARG:HH21	1:1:593:U:H1'	1.72	0.55
1:1:135:A:N3	1:1:135:A:C2'	2.70	0.55
1:1:698:G:O6	1:1:699:A:N6	2.39	0.55
1:2:19:U:O4'	1:2:235:G:H1'	2.06	0.55
1:2:48:U:C6	1:2:48:U:H3'	2.41	0.55
1:2:226:A:C3'	1:2:227:U:C5'	2.85	0.55
1:2:282:A:O3'	1:2:283:U:H6	1.89	0.55
1:2:288:U:H2'	1:2:289:A:O5'	2.07	0.55
1:2:332:G:H22	44:g:83:ASN:ND2	2.05	0.55
1:2:347:U:C5	115:Ay:41:THR:CA	2.71	0.55
1:2:425:A:C2	13:aj:266:LYS:CB	2.89	0.55
1:2:499:A:OP1	3:aw:12:ALA:CB	2.52	0.55
1:2:499:A:H8	3:aw:10:ARG:CG	2.17	0.55

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:524:C:H5	15:d:332:PRO:CG	2.19	0.55
1:2:525:A:O5'	15:d:329:ARG:CA	2.54	0.55
1:2:544:G:O6	50:a:157:LYS:O	2.24	0.55
1:2:614:U:C3'	44:g:104:GLN:HE22	2.16	0.55
3:aw:105:GLU:OE1	20:u:814:SER:OG	2.22	0.55
4:m:96:ASP:OD1	4:m:99:ILE:N	2.36	0.55
10:ae:172:PRO:HG3	12:ag:379:TYR:HB3	1.88	0.55
12:ag:460:GLU:N	12:ag:460:GLU:OE1	2.35	0.55
14:e:32:PRO:HG2	14:e:33:GLN:NE2	2.22	0.55
14:e:192:LEU:HD12	14:e:196:GLY:HA3	1.88	0.55
14:e:356:ASP:HB3	14:e:359:VAL:HG22	1.88	0.55
16:az:111:ARG:HH22	17:ax:57:ARG:H	1.52	0.55
19:af:213:THR:OG1	19:af:216:GLU:OE1	2.25	0.55
19:af:333:LEU:HA	19:af:336:LEU:HB2	1.89	0.55
21:aa:1257:LEU:HG	21:aa:1259:ARG:HH11	1.70	0.55
22:ab:1151:LYS:CE	90:BC:140:PHE:CE1	2.88	0.55
23:ak:28:ARG:NE	23:ak:225:CYS:SG	2.75	0.55
24:ac:171:MET:SD	24:ac:182:SER:OG	2.61	0.55
25:ad:707:TRP:HB3	46:c:264:LYS:HG2	1.89	0.55
30:as:142:MET:HB3	30:as:171:LEU:HB3	1.89	0.55
39:ar:145:ILE:HA	39:ar:148:CYS:HB2	1.89	0.55
45:o:131:LYS:HB2	52:z:1005:PHE:HE2	1.72	0.55
48:q:14:PRO:HG2	48:q:17:ASN:HB2	1.88	0.55
50:a:82:GLY:HA2	52:z:374:PRO:HB2	1.88	0.55
55:B:424:TYR:CD1	86:Al:277:LEU:HD21	2.41	0.55
56:C:204:GLU:OE2	115:Ay:121:LYS:NZ	2.40	0.55
59:F:5:TRP:HA	59:F:8:ARG:CZ	2.37	0.55
59:F:62:MET:HB3	59:F:67:TRP:CE2	2.42	0.55
63:J:64:TYR:CG	63:J:64:TYR:O	2.59	0.55
67:N:176:LYS:NZ	1:1:564:U:O4	2.35	0.55
68:O:134:TRP:NE1	68:O:136:TRP:O	2.40	0.55
68:O:173:VAL:HG22	68:O:190:GLN:HB3	1.88	0.55
69:P:88:THR:HG23	69:P:102:ASP:HB2	1.87	0.55
71:R:33:ALA:HB1	71:R:90:SER:HB2	1.88	0.55
75:V:126:TRP:CH2	1:1:90:A:H8	2.24	0.55
77:X:266:PRO:O	96:Ao:97:ARG:NH2	2.39	0.55
77:X:373:LEU:HB3	77:X:374:HIS:HD2	1.72	0.55
79:Z:70:HIS:HB2	79:Z:138:VAL:HG23	1.88	0.55
84:Bj:101:PRO:HG2	104:Ak:291:GLU:OE2	2.07	0.55
87:BI:173:GLN:NE2	87:BI:201:ALA:O	2.40	0.55
90:BC:69:THR:OG1	90:BC:72:THR:HG23	2.07	0.55

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
107:BF:70:ARG:HH21	107:BF:76:SER:CB	2.20	0.55
108:Av:19:LYS:HE3	1:1:434:U:H1'	1.88	0.55
116:Ag:117:TRP:HB2	116:Ag:123:THR:HG21	1.88	0.55
117:Ax:145:CYS:CB	117:Ax:166:CYS:HB2	2.37	0.55
119:BO:172:ARG:HB2	119:BO:172:ARG:NH2	2.22	0.55
1:1:146:U:O4'	1:1:146:U:O2	2.20	0.55
1:1:711:A:H2'	1:1:711:A:N3	2.22	0.55
1:1:1097:A:HO2'	1:1:1098:A:P	2.29	0.55
1:2:13:U:H5''	50:a:261:ASN:HA	1.88	0.55
1:2:52:U:C6	1:2:167:U:C5	2.95	0.55
1:2:109:U:O2'	1:2:110:A:C5'	2.55	0.55
1:2:438:G:O6	6:s:134:HIS:HE1	1.90	0.55
1:2:510:A:O2'	3:aw:19:PRO:HG2	2.07	0.55
1:2:512:G:H8	1:2:512:G:OP2	1.90	0.55
1:2:555:U:C3'	1:2:556:U:H5''	2.22	0.55
12:ag:280:ALA:O	22:ab:433:ARG:NH1	2.40	0.55
12:ag:470:ILE:HG13	12:ag:471:TYR:HD1	1.72	0.55
18:r:90:PHE:HA	18:r:93:LYS:HE2	1.89	0.55
24:ac:800:ARG:HG3	24:ac:1084:VAL:HG22	1.88	0.55
24:ac:832:ASP:OD1	24:ac:834:ASP:N	2.36	0.55
28:ap:67:ARG:HG3	52:z:645:MET:HG3	1.88	0.55
31:at:348:CYS:O	31:at:352:ALA:N	2.40	0.55
32:y:80:ASN:OD1	32:y:81:CYS:N	2.40	0.55
38:l:247:GLN:HG3	38:l:249:ASN:H	1.72	0.55
39:ar:247:GLN:N	39:ar:247:GLN:OE1	2.39	0.55
45:o:367:LEU:HD11	50:a:307:MET:SD	2.46	0.55
50:a:231:ARG:HH22	50:a:233:ILE:HD13	1.70	0.55
56:C:145:ARG:HH12	70:Q:108:ILE:CG2	2.20	0.55
79:Z:131:TRP:CZ2	1:1:567:A:C8	2.95	0.55
86:Al:155:LEU:HB3	86:Al:167:VAL:HG11	1.88	0.55
87:BI:158:TYR:OH	87:BI:222:HIS:NE2	2.39	0.55
91:Ab:23:PRO:O	91:Ab:27:GLN:N	2.36	0.55
97:BM:46:ARG:HD2	97:BM:50:LYS:HZ2	1.72	0.55
109:Af:74:ASP:C	109:Af:76:GLN:H	2.15	0.55
111:Ae:66:ALA:HB1	111:Ae:70:GLU:HB2	1.88	0.55
114:BD:3:ASN:HD22	114:BD:24:GLN:CD	2.14	0.55
125:Ag:301:NAD:N7A	125:Ag:301:NAD:O3D	2.34	0.55
118:BL:127:LYS:O	1:1:667:A:H3'	2.07	0.55
1:2:40:U:O4	33:w:129:TYR:OH	2.25	0.55
1:2:42:U:H3'	1:2:43:A:H5'	1.88	0.55
1:2:50:U:H5''	37:j:11:ARG:CD	2.36	0.55

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:158:U:H5''	29:aq:18:TYR:CG	2.41	0.55
1:2:181:U:O3'	33:w:98:LEU:HD12	2.07	0.55
1:2:417:C:C3'	10:ae:128:TYR:CE2	2.90	0.55
1:2:427:U:C4	13:aj:236:ALA:HB3	2.42	0.55
1:2:439:A:OP2	6:s:131:TYR:HE2	1.90	0.55
1:2:559:U:H2'	1:2:560:U:C6	2.42	0.55
4:m:260:ALA:O	4:m:265:SER:HB3	2.07	0.55
4:m:274:SER:O	16:az:95:TYR:OH	2.13	0.55
7:au:190:TYR:OH	7:au:207:THR:O	2.17	0.55
16:az:37:ARG:NH1	16:az:106:GLN:OE1	2.36	0.55
18:r:20:THR:HG22	18:r:22:VAL:HG23	1.89	0.55
21:aa:581:THR:O	21:aa:585:SER:N	2.39	0.55
22:ab:175:TYR:OH	38:l:490:ARG:NH2	2.39	0.55
24:ac:937:PHE:HA	24:ac:940:GLU:CD	2.32	0.55
25:ad:596:LEU:H	25:ad:596:LEU:HD12	1.71	0.55
37:j:113:VAL:O	37:j:117:ASN:ND2	2.40	0.55
38:l:557:LEU:HD13	38:l:570:GLY:HA3	1.89	0.55
56:C:71:TYR:HB3	56:C:72:PRO:HD3	1.89	0.55
59:F:161:GLN:HE21	59:F:161:GLN:CA	2.15	0.55
62:I:43:PRO:O	62:I:45:MET:HE2	2.06	0.55
71:R:187:ASP:O	71:R:190:GLN:N	2.40	0.55
75:V:66:ARG:HH11	75:V:77:ARG:HH12	1.55	0.55
79:Z:18:VAL:CG2	79:Z:21:PHE:HB2	2.37	0.55
81:UA:81:UNK:HA	117:Ax:127:ASN:CB	2.36	0.55
83:Aw:115:LEU:HD12	83:Aw:116:SER:HB3	1.88	0.55
85:An:117:MET:HB2	85:An:122:ILE:HG12	1.88	0.55
88:Az:41:ASP:CG	1:1:77:U:H3	2.15	0.55
96:Ao:222:ILE:O	96:Ao:230:ARG:NE	2.40	0.55
97:BM:118:ILE:HG13	97:BM:119:THR:N	2.21	0.55
101:Am:13:TRP:HA	1:1:1037:C:O2'	2.06	0.55
105:BP:163:ARG:NE	1:1:473:U:O3'	2.39	0.55
118:BL:340:VAL:O	118:BL:341:LYS:C	2.51	0.55
1:1:322:A:N6	1:1:990:A:O2'	2.35	0.55
1:2:109:U:H3'	1:2:109:U:OP2	2.06	0.54
1:2:209:U:C2'	1:2:210:U:H4'	2.37	0.54
1:2:352:A:H8	1:2:352:A:O5'	1.90	0.54
1:2:449:A:O2'	14:e:379:SER:HB2	2.07	0.54
1:2:482:C:O2	10:ae:56:TYR:CB	2.46	0.54
1:2:596:U:C5'	1:2:596:U:C6	2.89	0.54
2:h:93:ASP:OD2	2:h:114:SER:N	2.35	0.54
12:ag:141:SER:OG	12:ag:142:GLU:OE2	2.20	0.54

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
13:aj:148:ARG:O	13:aj:156:SER:OG	2.23	0.54
19:af:296:ARG:HH12	20:u:420:ALA:HB2	1.71	0.54
19:af:737:ARG:NH1	19:af:740:GLN:OE1	2.40	0.54
21:aa:956:THR:HA	21:aa:959:GLN:HE21	1.72	0.54
21:aa:1109:PRO:O	21:aa:1114:ARG:NH2	2.39	0.54
25:ad:197:TRP:HA	25:ad:200:MET:HE3	1.88	0.54
37:j:148:ARG:O	37:j:152:ALA:N	2.40	0.54
38:l:107:GLU:HG3	38:l:480:VAL:H	1.71	0.54
38:l:245:HIS:HA	38:l:250:ALA:HB2	1.89	0.54
38:l:552:LEU:O	38:l:557:LEU:HG	2.07	0.54
48:q:94:GLU:O	48:q:98:GLN:N	2.39	0.54
52:z:924:ASN:O	52:z:927:VAL:HG12	2.06	0.54
52:z:1071:LYS:HG3	52:z:1077:LEU:HD23	1.88	0.54
55:B:243:LYS:NZ	99:Aj:449:LEU:O	2.40	0.54
58:E:155:TYR:OH	108:Av:111:ASN:OD1	2.25	0.54
65:L:44:ARG:NH1	1:1:496:U:OP1	2.40	0.54
66:M:94:GLU:HA	99:Aj:464:ASN:O	2.07	0.54
71:R:455:LYS:HB3	1:1:66:U:O2	2.06	0.54
74:U:38:MET:O	74:U:38:MET:HG3	2.07	0.54
77:X:404:ILE:HG22	77:X:405:PRO:O	2.07	0.54
77:X:494:LEU:HB2	77:X:496:TRP:CD1	2.42	0.54
79:Z:76:ARG:NH1	1:1:71:A:N3	2.55	0.54
85:An:135:PHE:CA	85:An:139:GLN:HB2	2.34	0.54
86:Al:279:ASN:ND2	86:Al:279:ASN:N	2.55	0.54
92:Ai:50:ASP:O	92:Ai:54:ASN:N	2.32	0.54
97:BM:318:PRO:HA	97:BM:322:TYR:CD2	2.41	0.54
119:BO:100:ARG:HD2	1:1:772:U:O5'	2.06	0.54
1:2:46:U:H2'	1:2:47:U:H5'	1.89	0.54
1:2:143:G:H1'	1:2:267:A:C2	2.42	0.54
1:2:169:U:H2'	1:2:170:U:OP2	2.06	0.54
1:2:280:A:H2	43:i:257:ARG:HH12	1.43	0.54
1:2:364:A:N6	46:c:175:PHE:CZ	2.76	0.54
1:2:439:A:OP2	6:s:131:TYR:CE2	2.59	0.54
1:2:459:A:H3'	8:am:284:ARG:NH2	2.22	0.54
7:au:61:LEU:HD12	7:au:149:TRP:HE1	1.72	0.54
12:ag:334:VAL:HG11	19:af:146:SER:HB2	1.89	0.54
16:az:47:THR:OG1	17:ax:73:MET:SD	2.62	0.54
16:az:109:PHE:O	16:az:113:MET:N	2.34	0.54
21:aa:128:VAL:HG11	46:c:256:LYS:HA	1.89	0.54
21:aa:317:TYR:HA	21:aa:342:HIS:CD2	2.41	0.54
21:aa:591:ASP:OD1	21:aa:592:THR:N	2.38	0.54

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
21:aa:755:ARG:HB2	21:aa:760:TYR:HE1	1.72	0.54
21:aa:964:ASN:ND2	26:an:251:ARG:HA	2.22	0.54
22:ab:86:HIS:HB3	38:l:593:LEU:HD22	1.90	0.54
24:ac:123:ALA:O	24:ac:127:TRP:N	2.38	0.54
24:ac:268:ARG:HH22	24:ac:270:THR:HG22	1.72	0.54
24:ac:735:ALA:HA	24:ac:738:ARG:HB3	1.88	0.54
25:ad:37:LEU:HA	25:ad:40:MET:HE3	1.89	0.54
25:ad:207:PRO:HD2	25:ad:235:TYR:CD1	2.42	0.54
31:at:312:CYS:N	31:at:317:GLN:O	2.32	0.54
45:o:97:ASN:ND2	45:o:176:ASP:OD1	2.39	0.54
45:o:339:ARG:NH1	45:o:346:GLY:O	2.41	0.54
49:b:123:LEU:HD12	52:z:601:GLN:HG2	1.89	0.54
54:A:276:MET:HG2	1:1:865:A:H4'	1.89	0.54
56:C:80:GLU:OE2	56:C:96:HIS:NE2	2.40	0.54
63:J:83:THR:HB	110:As:59:TRP:CH2	2.42	0.54
64:K:42:LEU:O	64:K:46:GLN:HG3	2.08	0.54
66:M:94:GLU:OE1	1:1:515:A:N6	2.40	0.54
71:R:84:LEU:HA	71:R:87:VAL:HG12	1.88	0.54
77:X:101:PRO:HB2	92:Ai:164:LYS:HZ2	1.72	0.54
80:BA:24:VAL:HA	98:Ar:127:ARG:CZ	2.37	0.54
83:Aw:187:TYR:CD1	99:Aj:124:LEU:HG	2.43	0.54
85:An:110:PHE:CZ	85:An:187:PHE:HA	2.43	0.54
86:Al:269:GLU:O	86:Al:269:GLU:CG	2.53	0.54
88:Az:16:LYS:O	88:Az:17:GLN:HB2	2.07	0.54
99:Aj:274:GLN:HA	99:Aj:277:ASP:OD2	2.08	0.54
108:Av:49:GLU:HG2	108:Av:77:TYR:HE1	1.73	0.54
109:Af:60:PHE:O	109:Af:62:SER:N	2.40	0.54
1:1:233:G:H5'	1:1:234:U:OP2	2.07	0.54
1:1:1046:G:OP1	1:1:1046:G:H4'	2.06	0.54
1:2:35:A:H2'	1:2:36:G:H3'	1.90	0.54
1:2:429:A:C4'	10:ae:135:PRO:HG2	2.28	0.54
1:2:435:U:O4	6:s:163:PRO:HA	2.07	0.54
1:2:436:U:O2'	1:2:437:U:H5'	2.08	0.54
5:f:127:ASP:OD2	36:p:151:TYR:OH	2.24	0.54
8:am:44:PHE:HA	53:bd:57:VAL:HG21	1.88	0.54
10:ae:321:GLU:HA	10:ae:475:TRP:CH2	2.42	0.54
15:d:116:HIS:CD2	21:aa:1047:THR:HG21	2.42	0.54
19:af:161:TRP:NE1	22:ab:1017:ASN:OD1	2.30	0.54
20:u:774:ASP:OD2	22:ab:1073:ARG:NH2	2.40	0.54
22:ab:965:SER:OG	22:ab:966:SER:N	2.41	0.54
24:ac:750:SER:OG	24:ac:865:ALA:O	2.23	0.54

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
24:ac:1134:LEU:O	24:ac:1138:MET:N	2.30	0.54
35:t:114:GLN:NE2	35:t:176:ASP:O	2.32	0.54
37:j:48:VAL:HG12	37:j:62:LEU:HB2	1.89	0.54
37:j:131:GLN:O	45:o:434:ARG:NE	2.41	0.54
55:B:174:TRP:HA	75:V:12:ALA:O	2.08	0.54
55:B:193:VAL:HG23	55:B:284:LEU:CD1	2.37	0.54
56:C:99:LEU:O	56:C:180:LYS:NZ	2.31	0.54
56:C:143:VAL:HG12	56:C:148:LEU:HG	1.89	0.54
58:E:218:ARG:NH2	108:Av:110:GLU:OE1	2.30	0.54
58:E:286:GLU:OE2	58:E:290:ARG:NH2	2.38	0.54
58:E:303:PRO:HB2	58:E:307:ARG:NH1	2.22	0.54
60:G:58:ASP:OD1	60:G:59:ALA:N	2.40	0.54
63:J:142:ARG:NH1	1:1:806:A:OP2	2.40	0.54
67:N:77:ASN:ND2	1:1:87:A:N3	2.56	0.54
84:Bj:32:LEU:HD11	102:Aq:90:PHE:HB3	1.90	0.54
103:BE:92:GLU:HB3	103:BE:95:ARG:HG3	1.88	0.54
104:Ak:188:SER:HG	104:Ak:191:SER:HG	1.50	0.54
109:Af:75:THR:HG23	109:Af:81:TYR:CE2	2.42	0.54
113:Ah:116:ASN:OD1	113:Ah:120:LYS:NZ	2.41	0.54
114:BD:2:SER:O	114:BD:2:SER:OG	2.19	0.54
117:Ax:55:VAL:HG13	1:1:624:A:C4	2.42	0.54
1:1:361:A:H3'	1:1:362:A:C5'	2.36	0.54
1:1:508:G:O2'	1:1:519:U:O4	2.24	0.54
1:1:861:A:N3	1:1:861:A:C2'	2.64	0.54
1:1:876:G:C2	1:1:877:G:C4	2.96	0.54
1:2:70:A:O3'	35:t:10:ALA:C	2.49	0.54
1:2:342:A:C8	1:2:342:A:C3'	2.90	0.54
1:2:405:C:O2	9:n:48:LYS:HE3	2.05	0.54
1:2:409:U:C6	9:n:56:HIS:CE1	2.93	0.54
3:aw:139:LEU:HD22	19:af:828:ARG:HG2	1.90	0.54
5:f:23:GLU:HB2	5:f:26:ARG:HB3	1.90	0.54
10:ae:497:SER:HG	10:ae:507:ARG:HE	1.54	0.54
12:ag:134:LEU:O	12:ag:138:ILE:HG12	2.06	0.54
20:u:116:THR:O	20:u:143:ARG:NH2	2.39	0.54
21:aa:589:PHE:CE1	21:aa:806:LEU:HD13	2.42	0.54
21:aa:1025:TYR:HB2	26:an:258:MET:HE1	1.88	0.54
22:ab:402:THR:HG22	22:ab:435:THR:HB	1.90	0.54
28:ap:240:GLY:HA2	52:z:657:ARG:NE	2.23	0.54
30:as:213:GLU:O	30:as:216:THR:OG1	2.24	0.54
45:o:403:ASP:OD1	45:o:407:ARG:NH2	2.36	0.54
50:a:431:HIS:CD2	52:z:1027:TYR:HB3	2.35	0.54

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
52:z:652:ARG:HD3	52:z:744:LEU:HD22	1.88	0.54
55:B:296:SER:OG	1:1:89:U:H4'	2.08	0.54
57:D:130:LYS:O	57:D:134:LEU:HG	2.07	0.54
58:E:174:GLU:OE1	58:E:174:GLU:N	2.32	0.54
60:G:128:ARG:HG2	1:1:320:G:O6	2.07	0.54
60:G:148:THR:HG22	60:G:148:THR:O	2.08	0.54
60:G:349:GLN:HB2	60:G:352:SER:HB3	1.90	0.54
64:K:117:ARG:O	105:BP:-21:TYR:OH	2.20	0.54
67:N:85:ARG:HH21	1:1:313:A:H3'	1.72	0.54
68:O:320:ARG:O	68:O:323:GLU:HG3	2.06	0.54
77:X:278:ARG:HH12	96:Ao:93:SER:HB3	1.72	0.54
78:Y:234:ILE:HD12	84:Bj:156:PRO:HD3	1.90	0.54
79:Z:22:THR:CG2	113:Ah:72:SER:HB3	2.38	0.54
79:Z:97:VAL:HB	79:Z:105:LEU:HB2	1.90	0.54
86:Al:268:TYR:O	86:Al:269:GLU:HG2	2.07	0.54
93:Ap:47:LYS:HB2	94:Au:185:TRP:HZ3	1.73	0.54
96:Ao:231:TYR:OH	105:BP:91:GLU:O	2.21	0.54
99:Aj:371:GLU:CD	99:Aj:387:LEU:HD21	2.31	0.54
99:Aj:402:ARG:HD2	106:Ad:194:PHE:CG	2.42	0.54
113:Ah:145:SER:OG	113:Ah:146:GLY:N	2.41	0.54
113:Ah:333:LEU:HD23	113:Ah:339:ARG:HH12	1.71	0.54
1:1:848:U:H4'	1:1:996:G:OP1	2.07	0.54
1:2:70:A:H3'	35:t:10:ALA:CA	2.37	0.54
1:2:454:U:O5'	8:am:277:PRO:HD3	2.07	0.54
1:2:568:A:C8	1:2:568:A:C3'	2.90	0.54
2:h:165:ARG:O	20:u:756:ARG:NH1	2.37	0.54
4:m:130:ASN:HD22	49:b:128:ASN:HB3	1.73	0.54
10:ae:202:MET:HG2	10:ae:229:PRO:HD2	1.89	0.54
12:ag:79:GLU:N	12:ag:79:GLU:OE2	2.41	0.54
12:ag:222:MET:HG3	12:ag:227:ILE:HB	1.89	0.54
14:e:68:GLN:HE22	14:e:87:ARG:H	1.55	0.54
19:af:515:ARG:HG2	19:af:519:ARG:HH12	1.72	0.54
21:aa:393:ARG:HB2	21:aa:431:THR:HG21	1.89	0.54
25:ad:564:GLN:O	25:ad:568:THR:OG1	2.14	0.54
26:an:179:GLN:HG3	50:a:347:VAL:HG21	1.90	0.54
35:t:100:ILE:HG13	35:t:171:TRP:CD1	2.42	0.54
41:ai:189:LEU:HD21	41:ai:208:ARG:HB2	1.89	0.54
45:o:287:GLU:HB3	50:a:309:ARG:NH2	2.23	0.54
52:z:240:CYS:O	52:z:256:ASN:ND2	2.40	0.54
54:A:183:MET:HE3	63:J:20:PHE:HB2	1.90	0.54
54:A:286:PRO:HB2	59:F:78:TYR:CE1	2.43	0.54

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
58:E:279:THR:O	58:E:285:ARG:NH2	2.40	0.54
60:G:215:GLY:N	60:G:235:GLN:OE1	2.38	0.54
62:I:16:MET:HB2	119:BO:46:ARG:HD2	1.88	0.54
62:I:48:TYR:HB3	62:I:57:LYS:HB3	1.89	0.54
63:J:88:GLY:HA2	63:J:103:TRP:HE3	1.71	0.54
63:J:142:ARG:NH2	1:1:615:U:OP2	2.40	0.54
65:L:78:ARG:NH2	105:BP:25:ALA:O	2.41	0.54
72:S:270:SER:OG	72:S:271:TRP:N	2.38	0.54
72:S:295:PRO:HG2	72:S:296:PRO:HD3	1.89	0.54
74:U:79:ARG:NE	92:AI:118:GLN:OE1	2.40	0.54
75:V:41:GLN:O	75:V:111:ARG:NH1	2.41	0.54
77:X:91:THR:HG22	77:X:94:LEU:HG	1.88	0.54
77:X:216:THR:HA	77:X:421:GLN:NE2	2.22	0.54
78:Y:275:ASP:OD1	78:Y:275:ASP:N	2.39	0.54
84:Bj:82:LEU:HD12	84:Bj:90:LEU:HD21	1.88	0.54
85:An:22:ARG:HD3	1:1:286:G:N2	2.21	0.54
85:An:46:GLN:HG2	85:An:49:SER:HB3	1.90	0.54
86:Al:181:VAL:HG11	86:Al:214:ILE:HD11	1.89	0.54
101:Am:71:LYS:HE2	101:Am:338:LYS:HD2	1.89	0.54
104:Ak:178:ASP:O	104:Ak:181:LEU:N	2.40	0.54
112:Ac:174:GLN:HG3	112:Ac:254:LYS:HB3	1.89	0.54
1:1:576:A:H5'	1:1:577:A:H5''	1.88	0.54
1:1:1028:U:O4	1:1:1057:A:N6	2.40	0.54
1:2:412:G:C2	10:ae:54:GLY:HA2	2.42	0.54
1:2:504:A:H5''	6:s:81:ASN:ND2	2.23	0.54
1:2:507:A:C2	9:n:61:GLN:HG3	2.40	0.54
2:h:160:ALA:O	2:h:165:ARG:NH2	2.41	0.54
13:aj:221:LEU:HA	13:aj:224:MET:HG3	1.90	0.54
17:ax:32:ARG:H	17:ax:36:MET:HE2	1.72	0.54
19:af:270:ILE:HA	19:af:305:LEU:HD21	1.90	0.54
20:u:160:SER:HB2	22:ab:717:GLN:HG3	1.88	0.54
21:aa:683:ASP:HB3	21:aa:691:TRP:HA	1.88	0.54
25:ad:521:ASP:OD2	25:ad:604:ARG:NH1	2.40	0.54
33:w:87:SER:HB3	33:w:90:GLU:HG2	1.88	0.54
35:t:159:ARG:NH1	35:t:160:PRO:O	2.40	0.54
38:l:319:GLU:OE2	38:l:322:TRP:NE1	2.32	0.54
39:ar:106:PRO:HB2	39:ar:230:GLN:HE22	1.72	0.54
39:ar:269:LYS:N	39:ar:272:TYR:O	2.41	0.54
44:g:132:ALA:HA	44:g:135:ASN:HD22	1.73	0.54
45:o:127:TYR:CZ	45:o:131:LYS:HD2	2.43	0.54
58:E:313:TYR:HB2	108:Av:138:ARG:NH2	2.22	0.54

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
60:G:255:VAL:HA	60:G:297:TRP:CD1	2.43	0.54
63:J:96:GLU:HG3	63:J:97:GLU:H	1.73	0.54
64:K:25:ARG:HE	1:1:145:A:P	2.31	0.54
64:K:62:VAL:O	64:K:66:VAL:HG12	2.07	0.54
65:L:90:ARG:HH11	95:Aa:190:SER:CB	2.20	0.54
66:M:71:TRP:HA	66:M:76:ASN:ND2	2.23	0.54
67:N:77:ASN:ND2	1:1:87:A:H1'	2.22	0.54
68:O:21:TYR:CE1	68:O:28:ALA:HA	2.43	0.54
82:BB:66:TRP:CD1	82:BB:76:HIS:HD1	2.26	0.54
92:Ai:70:GLY:HA3	102:Aq:118:ARG:HB3	1.90	0.54
97:BM:206:GLY:HA3	97:BM:314:GLN:HE21	1.71	0.54
98:Ar:124:CYS:HB2	109:Af:34:ARG:HD2	1.89	0.54
99:Aj:312:GLU:N	99:Aj:312:GLU:OE1	2.41	0.54
106:Ad:222:ASN:O	106:Ad:225:GLY:N	2.39	0.54
117:Ax:151:ARG:HH12	117:Ax:186:TYR:HE2	1.53	0.54
1:1:56:U:O4	1:1:57:A:N6	2.41	0.54
1:2:38:U:H2'	1:2:39:U:H6	1.73	0.54
1:2:244:A:O2'	1:2:246:U:OP1	2.24	0.54
1:2:343:C:H3'	1:2:343:C:C6	2.42	0.54
1:2:344:C:O5'	1:2:344:C:H6	1.90	0.54
1:2:422:U:C5'	10:ae:298:TYR:CE1	2.90	0.54
1:2:431:U:C6	1:2:431:U:OP2	2.61	0.54
1:2:501:U:C4	3:aw:27:ARG:NE	2.75	0.54
4:m:8:THR:H	52:z:845:PRO:HB3	1.72	0.54
5:f:135:PHE:HB3	5:f:138:ARG:H	1.73	0.54
8:am:128:TRP:CD2	8:am:158:VAL:HG21	2.43	0.54
8:am:281:LEU:HD22	8:am:287:PHE:HE1	1.73	0.54
11:ay:63:ASP:OD1	11:ay:66:ARG:NH2	2.28	0.54
12:ag:87:GLU:HA	12:ag:90:MET:HB2	1.89	0.54
14:e:309:GLY:N	20:u:630:LEU:HB2	2.22	0.54
15:d:12:ASN:HB3	15:d:22:ARG:HH22	1.72	0.54
15:d:34:TRP:O	15:d:38:SER:OG	2.19	0.54
18:r:29:HIS:NE2	18:r:75:PRO:HG3	2.23	0.54
20:u:411:TRP:NE1	20:u:563:ASN:HB3	2.18	0.54
22:ab:166:VAL:O	22:ab:170:ALA:N	2.41	0.54
22:ab:331:ARG:HH22	38:l:497:LYS:NZ	2.05	0.54
22:ab:578:PRO:HG2	22:ab:609:ARG:NE	2.22	0.54
24:ac:1222:GLN:O	24:ac:1229:ARG:NH2	2.37	0.54
25:ad:670:ARG:C	31:at:389:ILE:HD11	2.31	0.54
32:y:166:ILE:HG22	32:y:168:GLY:H	1.73	0.54
36:p:39:ARG:HH11	50:a:204:VAL:HA	1.73	0.54

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
49:b:2:VAL:HG22	49:b:37:ARG:HD2	1.89	0.54
50:a:258:ALA:O	50:a:261:ASN:HB3	2.06	0.54
58:E:206:THR:HB	58:E:209:GLN:HG2	1.88	0.54
59:F:12:ARG:HH21	59:F:14:TRP:HZ2	1.53	0.54
60:G:217:VAL:HG23	60:G:236:ASN:O	2.08	0.54
66:M:138:ALA:H	66:M:230:HIS:HD2	1.55	0.54
68:O:114:GLN:O	68:O:118:ILE:HG12	2.08	0.54
72:S:351:HIS:HD2	1:1:358:A:H62	1.56	0.54
75:V:47:MET:HE2	77:X:459:ARG:HG3	1.89	0.54
79:Z:110:GLY:HA2	1:1:555:U:H3	1.73	0.54
84:Bj:139:LYS:HD2	84:Bj:160:LEU:HD21	1.90	0.54
85:An:84:TRP:CD1	113:Ah:81:LEU:HD11	2.42	0.54
86:Al:61:THR:OG1	86:Al:65:GLU:OE2	2.24	0.54
88:Az:131:ALA:O	88:Az:133:ARG:N	2.38	0.54
99:Aj:137:LEU:CD2	99:Aj:282:PRO:HG3	2.38	0.54
104:Ak:195:GLU:HG3	104:Ak:198:LEU:HB2	1.88	0.54
105:BP:-20:PRO:HB3	109:Af:77:GLN:HB3	1.90	0.54
112:Ac:56:ARG:NH2	112:Ac:164:LYS:O	2.29	0.54
115:Ay:45:HIS:CE1	1:1:704:U:H5'	2.42	0.54
1:1:187:U:H5''	1:1:188:A:H2'	1.90	0.54
1:1:442:U:H4'	1:1:443:G:C8	2.42	0.54
1:2:512:G:O3'	16:az:145:ARG:NH2	2.41	0.54
9:n:151:ASP:HB2	9:n:154:MET:HG2	1.90	0.54
12:ag:551:THR:HG21	38:l:160:SER:HB2	1.89	0.54
13:aj:171:SER:O	13:aj:210:ARG:NH2	2.41	0.54
19:af:521:LEU:HD13	19:af:663:ALA:HB2	1.89	0.54
20:u:379:ARG:NE	20:u:565:THR:O	2.22	0.54
21:aa:395:LYS:O	21:aa:895:SER:OG	2.26	0.54
21:aa:596:ARG:HH21	21:aa:755:ARG:HH12	1.54	0.54
21:aa:631:PRO:O	21:aa:740:GLN:NE2	2.40	0.54
21:aa:876:ARG:NH2	21:aa:907:VAL:O	2.41	0.54
21:aa:936:ILE:HG21	26:an:118:LEU:HB3	1.90	0.54
22:ab:135:PRO:O	22:ab:138:ARG:NH1	2.41	0.54
22:ab:861:ARG:HA	22:ab:884:ARG:HA	1.89	0.54
24:ac:549:THR:HG22	24:ac:550:HIS:H	1.73	0.54
25:ad:122:GLN:OE1	25:ad:123:ARG:N	2.40	0.54
27:ao:210:THR:OG1	27:ao:213:ARG:NE	2.41	0.54
27:ao:217:ILE:HD11	45:o:306:TRP:CD1	2.42	0.54
30:as:50:GLU:O	30:as:54:THR:HG23	2.08	0.54
38:l:90:GLN:HA	38:l:93:LEU:HD12	1.89	0.54
38:l:145:ASP:HB3	38:l:242:LEU:HD11	1.89	0.54

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
45:o:453:VAL:HG13	45:o:462:GLU:HG2	1.89	0.54
48:q:141:ARG:HB3	49:b:121:THR:HG21	1.88	0.54
50:a:128:ILE:O	50:a:133:ARG:NH2	2.40	0.54
55:B:40:PRO:O	99:Aj:443:ARG:HD2	2.07	0.54
58:E:302:THR:HB	58:E:303:PRO:HD2	1.89	0.54
60:G:189:LEU:HD13	60:G:195:ILE:HG21	1.88	0.54
60:G:207:ALA:N	60:G:210:GLU:OE2	2.41	0.54
64:K:169:GLN:OE1	64:K:174:ARG:NH2	2.41	0.54
66:M:31:HIS:O	75:V:11:LYS:NZ	2.41	0.54
76:W:104:GLU:O	76:W:107:TRP:HD1	1.90	0.54
77:X:126:ARG:HD2	77:X:206:THR:HG21	1.89	0.54
77:X:252:SER:HA	77:X:257:ASN:CB	2.38	0.54
77:X:302:THR:HG22	77:X:304:ASP:H	1.73	0.54
83:Aw:19:ASN:HD22	83:Aw:22:ARG:HH11	1.54	0.54
85:An:285:ASN:HB3	85:An:288:TRP:HB3	1.89	0.54
96:Ao:242:MET:HE2	96:Ao:242:MET:HA	1.89	0.54
107:BF:33:ASP:OD1	107:BF:33:ASP:N	2.40	0.54
116:Ag:148:THR:HG22	116:Ag:149:ASN:H	1.72	0.54
117:Ax:49:PRO:HD3	1:1:1092:G:H4'	1.90	0.54
1:1:547:U:C4	1:1:592:A:C8	2.95	0.54
1:2:51:A:N1	1:2:52:U:O4	2.40	0.54
1:2:66:U:O2	1:2:66:U:H2'	2.06	0.54
1:2:275:U:H4'	1:2:276:U:H5'	1.90	0.54
1:2:397:U:P	5:f:19:GLY:CA	2.94	0.54
1:2:447:A:H5''	53:bd:56:ASN:HD21	1.71	0.54
1:2:501:U:C6	3:aw:27:ARG:NH1	2.75	0.54
1:2:506:U:OP1	9:n:77:LYS:HE2	2.05	0.54
1:2:521:A:H4'	15:d:345:LYS:N	2.23	0.54
1:2:614:U:H4'	44:g:104:GLN:NE2	2.21	0.54
4:m:210:MET:HE1	34:v:135:ILE:HD12	1.89	0.54
8:am:288:TRP:HE1	53:bd:65:ILE:HD11	1.72	0.54
12:ag:83:ALA:HB3	12:ag:85:LEU:HD22	1.90	0.54
24:ac:686:ARG:O	38:l:318:ILE:HG22	2.08	0.54
24:ac:1063:ARG:NH2	24:ac:1067:GLU:OE2	2.38	0.54
25:ad:522:PRO:HB2	25:ad:524:THR:HG22	1.88	0.54
38:l:524:GLU:HA	38:l:528:ASN:HB2	1.90	0.54
47:k:177:LEU:HD22	47:k:179:LEU:HG	1.89	0.54
50:a:109:LYS:HD3	50:a:114:TYR:CE1	2.43	0.54
50:a:255:ASN:ND2	50:a:259:SER:H	2.06	0.54
52:z:344:GLU:O	52:z:348:ASP:N	2.36	0.54
52:z:658:LEU:HD11	52:z:768:ARG:HB3	1.89	0.54

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
58:E:205:MET:HE3	58:E:210:TYR:HA	1.90	0.54
59:F:84:ARG:NH2	76:W:108:THR:OG1	2.41	0.54
60:G:180:LEU:O	60:G:184:VAL:HG23	2.08	0.54
62:I:229:HIS:ND1	62:I:246:VAL:HG11	2.23	0.54
63:J:5:ARG:HD3	1:1:1157:A:C4	2.42	0.54
68:O:20:THR:HG23	68:O:21:TYR:H	1.73	0.54
69:P:112:ARG:HH12	100:BH:219:LYS:HG2	1.73	0.54
70:Q:108:ILE:O	70:Q:108:ILE:CG2	2.48	0.54
72:S:346:SER:HA	72:S:353:ARG:NH2	2.20	0.54
85:An:80:THR:HA	113:Ah:78:ARG:NH2	2.23	0.54
86:Al:136:SER:HB2	86:Al:175:TYR:HD2	1.73	0.54
86:Al:192:LEU:HB2	97:BM:190:LYS:NZ	2.23	0.54
93:Ap:38:PHE:HE2	110:As:96:TRP:HB3	1.73	0.54
96:Ao:219:GLU:HB3	105:BP:94:ARG:HE	1.73	0.54
102:Aq:338:HIS:O	1:1:976:A:H5''	2.08	0.54
118:BL:167:ARG:NE	118:BL:297:ASN:O	2.40	0.54
1:1:798:A:H2	1:1:799:A:N6	2.04	0.54
1:2:107:A:H5''	43:i:363:TYR:CG	2.39	0.54
1:2:195:A:H3'	1:2:195:A:H8	1.72	0.54
1:2:335:U:C6	1:2:335:U:C5'	2.85	0.54
1:2:482:C:HO2'	10:ae:56:TYR:HD2	1.55	0.54
5:f:103:ASP:OD2	36:p:169:LYS:NZ	2.40	0.54
7:au:208:ARG:HD3	7:au:214:ARG:HG2	1.89	0.54
9:n:106:THR:HG22	9:n:109:HIS:HD2	1.71	0.54
10:ae:215:LYS:NZ	14:e:475:SER:O	2.30	0.54
10:ae:491:LEU:HD22	12:ag:261:HIS:ND1	2.23	0.54
14:e:368:GLU:O	14:e:816:SER:OG	2.17	0.54
14:e:641:ARG:HB3	14:e:646:VAL:HG22	1.90	0.54
15:d:86:GLU:CD	15:d:97:ARG:HH12	2.16	0.54
18:r:71:PRO:HD2	18:r:74:HIS:HB3	1.88	0.54
21:aa:146:ALA:O	46:c:285:ARG:NH2	2.41	0.54
21:aa:311:PRO:HG2	21:aa:343:GLN:NE2	2.21	0.54
21:aa:353:VAL:O	21:aa:357:ALA:N	2.34	0.54
22:ab:749:SER:C	22:ab:755:SER:HB3	2.33	0.54
24:ac:987:THR:HG22	24:ac:989:ALA:H	1.73	0.54
25:ad:768:PRO:HB3	45:o:370:ARG:HG3	1.89	0.54
31:at:219:GLN:H	31:at:222:ASP:HB3	1.72	0.54
37:j:39:TRP:O	37:j:71:HIS:NE2	2.40	0.54
38:l:157:ARG:NH2	38:l:233:ASP:OD1	2.37	0.54
42:x:72:MET:SD	42:x:76:GLN:HG2	2.48	0.54
42:x:234:ALA:HB2	42:x:241:GLU:HB3	1.90	0.54

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
50:a:242:LEU:HD12	50:a:247:PHE:HD2	1.72	0.54
62:I:72:ARG:HA	62:I:75:THR:HG22	1.90	0.54
63:J:54:ILE:HD12	63:J:55:GLY:H	1.72	0.54
64:K:23:MET:HG3	1:1:145:A:H2	1.72	0.54
64:K:27:ARG:NH1	1:1:835:A:OP2	2.41	0.54
75:V:138:LEU:HD23	75:V:138:LEU:H	1.72	0.54
78:Y:279:HIS:HB3	78:Y:282:GLN:HE21	1.72	0.54
80:BA:20:GLY:N	105:BP:-10:ARG:HG2	2.22	0.54
88:Az:152:SER:O	89:At:99:THR:OG1	2.25	0.54
100:BH:186:ARG:HB3	100:BH:188:TRP:HZ3	1.73	0.54
108:Av:152:VAL:HA	108:Av:155:ARG:HB3	1.90	0.54
118:BL:301:ARG:HH22	1:1:235:G:H4'	1.73	0.54
1:1:163:U:H2'	1:1:166:U:N3	2.23	0.54
1:1:392:A:O2'	1:1:997:A:N3	2.39	0.54
1:1:798:A:O2'	1:1:799:A:O5'	2.26	0.54
1:2:68:A:H5''	37:j:22:TRP:CE2	2.42	0.53
1:2:195:A:C3'	1:2:195:A:C8	2.92	0.53
1:2:302:A:C2	1:2:303:G:C2	2.94	0.53
1:2:438:G:H1	1:2:473:U:P	2.30	0.53
1:2:482:C:O2'	10:ae:56:TYR:HD2	1.89	0.53
1:2:560:U:C3'	1:2:561:G:C5'	2.85	0.53
1:2:585:U:C2'	1:2:586:A:O5'	2.56	0.53
2:h:146:GLY:HA3	2:h:150:HIS:HB2	1.90	0.53
7:au:13:ARG:NH1	13:aj:319:ASP:OD1	2.38	0.53
13:aj:59:VAL:HG12	13:aj:60:ASN:ND2	2.22	0.53
16:az:42:LYS:HG3	18:r:432:LEU:HD22	1.90	0.53
18:r:76:ARG:H	18:r:76:ARG:HD2	1.74	0.53
18:r:416:MET:O	18:r:423:ARG:NH1	2.36	0.53
19:af:275:THR:O	19:af:278:THR:OG1	2.24	0.53
21:aa:391:LYS:HA	21:aa:427:LEU:HD11	1.88	0.53
21:aa:420:MET:O	21:aa:424:ALA:N	2.41	0.53
22:ab:466:LYS:HB3	22:ab:467:PRO:HD2	1.90	0.53
23:ak:106:ASP:HA	24:ac:1123:ILE:HD12	1.89	0.53
23:ak:240:ALA:O	23:ak:244:LEU:HG	2.08	0.53
25:ad:408:PHE:HB3	25:ad:410:GLU:HG2	1.90	0.53
37:j:15:ASP:OD2	37:j:18:SER:OG	2.19	0.53
37:j:147:MET:O	37:j:151:LEU:N	2.39	0.53
43:i:261:HIS:ND1	43:i:303:TYR:OH	2.31	0.53
45:o:145:ASP:O	45:o:147:GLU:N	2.40	0.53
45:o:166:ARG:NH2	45:o:172:CYS:HA	2.23	0.53
45:o:287:GLU:OE2	45:o:386:ARG:NH2	2.41	0.53

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
45:o:335:ASP:HA	45:o:338:ALA:HB3	1.89	0.53
46:c:219:LEU:HD11	46:c:281:ILE:HD12	1.90	0.53
55:B:82:THR:HG21	55:B:347:MET:HE3	1.89	0.53
56:C:152:ARG:HB2	85:An:283:ARG:HE	1.73	0.53
61:H:38:ILE:O	98:Ar:192:ARG:NH1	2.41	0.53
62:I:115:LEU:HG	62:I:125:VAL:HG12	1.89	0.53
62:I:178:ASP:OD1	62:I:180:THR:HG23	2.08	0.53
63:J:7:ARG:HB3	1:1:1108:A:OP1	2.09	0.53
63:J:111:LEU:HD21	119:BO:143:LEU:HB2	1.88	0.53
77:X:137:TRP:O	77:X:141:ARG:N	2.40	0.53
77:X:201:ARG:HD2	104:Ak:149:VAL:HG23	1.91	0.53
79:Z:76:ARG:HH11	1:1:71:A:P	2.31	0.53
86:Al:132:SER:HB2	86:Al:174:GLU:O	2.08	0.53
88:Az:134:LYS:HG3	88:Az:135:LYS:O	2.08	0.53
89:At:108:MET:O	89:At:112:ARG:N	2.41	0.53
91:Ab:131:ALA:N	101:Am:333:ASN:OD1	2.37	0.53
94:Au:176:GLY:O	94:Au:179:VAL:HG12	2.08	0.53
96:Ao:272:LYS:NZ	96:Ao:279:HIS:HB3	2.23	0.53
97:BM:246:ARG:HE	97:BM:269:VAL:N	2.06	0.53
116:Ag:218:SER:O	116:Ag:222:GLN:HG2	2.08	0.53
117:Ax:124:PRO:O	117:Ax:124:PRO:CG	2.55	0.53
117:Ax:205:ARG:HG2	117:Ax:206:HIS:N	2.22	0.53
118:BL:336:PRO:HG2	118:BL:339:CYS:HB3	1.89	0.53
119:BO:47:TRP:N	1:1:814:A:H2	2.06	0.53
1:2:70:A:C3'	35:t:10:ALA:N	2.70	0.53
1:2:208:C:O3'	1:2:209:U:H4'	2.08	0.53
1:2:226:A:H2'	1:2:227:U:C5'	2.38	0.53
1:2:284:U:O5'	1:2:284:U:H6	1.90	0.53
1:2:503:A:C2	14:e:718:PRO:CD	2.91	0.53
2:h:64:GLN:HE21	2:h:68:GLN:NE2	2.06	0.53
6:s:35:ARG:NH2	20:u:751:ILE:O	2.28	0.53
15:d:32:GLU:HG2	15:d:36:ARG:NH2	2.23	0.53
21:aa:339:TRP:HD1	31:at:199:ARG:HH21	1.56	0.53
21:aa:439:ASN:HB2	21:aa:512:TRP:CD1	2.44	0.53
21:aa:486:PRO:O	52:z:1049:ARG:NH1	2.41	0.53
22:ab:535:ARG:NH2	22:ab:835:GLU:OE1	2.36	0.53
24:ac:1248:THR:OG1	24:ac:1252:TYR:O	2.16	0.53
29:aq:116:HIS:NE2	29:aq:147:SER:OG	2.32	0.53
30:as:225:THR:H	30:as:228:LYS:HB2	1.72	0.53
35:t:34:HIS:H	35:t:41:THR:HG21	1.74	0.53
45:o:164:GLY:HA3	45:o:170:TYR:CD2	2.33	0.53

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
62:I:66:ARG:NH2	1:1:819:U:OP1	2.40	0.53
65:L:3:ARG:HB2	65:L:126:THR:HG23	1.90	0.53
68:O:184:ARG:HH22	68:O:187:GLN:HG2	1.71	0.53
72:S:263:ILE:O	72:S:285:MET:HE3	2.08	0.53
85:An:197:LEU:O	85:An:200:LYS:HE3	2.07	0.53
87:BI:164:ASP:HB3	87:BI:211:GLN:HE21	1.72	0.53
95:Aa:39:TYR:HA	95:Aa:43:GLY:HA2	1.91	0.53
105:BP:141:TYR:O	105:BP:141:TYR:CG	2.61	0.53
118:BL:169:LYS:HB3	118:BL:283:TYR:CE2	2.42	0.53
1:1:73:G:H3'	1:1:74:A:C8	2.43	0.53
1:1:155:U:H2'	1:1:156:A:O4'	2.08	0.53
1:1:548:A:O2'	1:1:549:C:O4'	2.27	0.53
1:2:16:U:C5	1:2:367:A:OP2	2.62	0.53
1:2:304:U:H2'	1:2:305:C:O4'	2.08	0.53
1:2:453:A:C4'	8:am:277:PRO:HG3	2.25	0.53
1:2:482:C:C6	1:2:482:C:OP2	2.62	0.53
1:2:560:U:H2'	1:2:560:U:O2	2.06	0.53
4:m:221:ASP:OD2	4:m:225:GLN:NE2	2.42	0.53
8:am:106:LEU:HD23	8:am:106:LEU:H	1.74	0.53
8:am:159:ALA:O	8:am:160:SER:OG	2.25	0.53
12:ag:442:HIS:O	12:ag:445:GLU:N	2.41	0.53
15:d:83:LYS:NZ	42:x:114:SER:OG	2.26	0.53
19:af:534:TYR:O	19:af:624:ARG:NH2	2.42	0.53
21:aa:193:HIS:NE2	48:q:68:SER:HA	2.23	0.53
21:aa:1220:TYR:O	21:aa:1224:ASP:N	2.39	0.53
25:ad:463:LEU:HG	25:ad:477:LEU:HD22	1.90	0.53
25:ad:691:PRO:HD3	45:o:451:VAL:HG22	1.91	0.53
28:ap:24:HIS:ND1	28:ap:24:HIS:O	2.42	0.53
29:aq:188:ARG:HB3	29:aq:193:GLU:HB2	1.91	0.53
30:as:55:LEU:HA	30:as:58:VAL:HG12	1.89	0.53
35:t:90:ARG:HH22	35:t:106:GLN:CD	2.16	0.53
38:l:178:ALA:HB3	38:l:216:ARG:HA	1.89	0.53
54:A:86:TYR:O	103:BE:112:THR:OG1	2.23	0.53
55:B:142:GLU:OE1	55:B:144:ARG:N	2.35	0.53
56:C:29:GLY:H	88:Az:128:GLN:NE2	2.06	0.53
59:F:163:ARG:H	109:Af:20:HIS:CE1	2.27	0.53
60:G:102:GLU:O	99:Aj:407:ARG:NH1	2.41	0.53
92:Ai:242:SER:OG	92:Ai:245:ASN:ND2	2.41	0.53
92:Ai:287:THR:OG1	92:Ai:288:SER:N	2.41	0.53
97:BM:126:LEU:O	97:BM:130:GLN:N	2.41	0.53
97:BM:377:GLU:O	97:BM:381:ASN:ND2	2.41	0.53

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
99:Aj:242:HIS:CD2	99:Aj:244:GLN:H	2.26	0.53
105:BP:168:SER:O	105:BP:170:ASN:N	2.42	0.53
110:As:54:ASN:HA	110:As:57:ARG:HG2	1.89	0.53
110:As:72:PRO:HD2	110:As:139:GLU:HG3	1.89	0.53
112:Ac:195:ARG:NH1	112:Ac:216:SER:O	2.41	0.53
113:Ah:424:THR:HG23	113:Ah:427:ARG:HH11	1.72	0.53
117:Ax:148:CYS:SG	117:Ax:176:ARG:NE	2.81	0.53
1:1:1008:A:H8	1:1:1009:A:H1'	1.73	0.53
1:2:57:U:O2'	1:2:58:U:OP2	2.26	0.53
1:2:181:U:P	33:w:101:ARG:C	2.91	0.53
1:2:405:C:O4'	3:aw:22:HIS:CD2	2.62	0.53
1:2:502:A:OP1	14:e:790:VAL:N	2.36	0.53
1:2:527:U:H1'	16:az:69:HIS:CD2	2.36	0.53
1:2:556:U:N3	1:2:570:A:C2	2.69	0.53
5:f:98:ARG:HG2	36:p:178:ARG:NH2	2.24	0.53
7:au:94:HIS:NE2	7:au:174:TYR:OH	2.29	0.53
7:au:129:ALA:N	7:au:132:ASP:OD2	2.38	0.53
14:e:68:GLN:HA	14:e:81:HIS:CE1	2.43	0.53
15:d:85:LEU:O	15:d:89:SER:OG	2.25	0.53
18:r:285:THR:HG22	18:r:287:VAL:HG12	1.91	0.53
19:af:443:TYR:O	19:af:447:LEU:N	2.27	0.53
21:aa:1441:ILE:HG22	21:aa:1532:PHE:HB2	1.90	0.53
24:ac:371:LEU:HG	24:ac:505:PHE:HD2	1.73	0.53
24:ac:827:PHE:HZ	24:ac:830:MET:HB2	1.72	0.53
24:ac:987:THR:HB	24:ac:990:GLN:HG3	1.91	0.53
26:an:186:ARG:O	26:an:190:TRP:N	2.40	0.53
31:at:341:ILE:HD12	31:at:344:TRP:HB2	1.90	0.53
31:at:375:THR:O	31:at:379:GLU:N	2.36	0.53
37:j:150:TYR:O	37:j:154:ARG:HD2	2.08	0.53
38:l:72:ARG:HD3	38:l:78:ARG:HG2	1.91	0.53
52:z:357:ASP:OD2	52:z:822:TYR:OH	2.26	0.53
55:B:10:HIS:HE1	91:Ab:15:SER:HB3	1.74	0.53
62:I:152:ARG:NH1	62:I:157:ASN:O	2.41	0.53
63:J:38:ILE:HG22	63:J:43:MET:HG3	1.88	0.53
63:J:62:PHE:CE2	63:J:112:LYS:HD2	2.42	0.53
64:K:179:TRP:HE1	99:Aj:229:VAL:HG13	1.74	0.53
67:N:170:ILE:HD13	67:N:179:LEU:HD22	1.90	0.53
70:Q:74:ASP:OD2	79:Z:16:PRO:HA	2.08	0.53
74:U:55:LYS:O	74:U:60:ARG:HG3	2.09	0.53
75:V:62:MET:HA	75:V:77:ARG:HD2	1.91	0.53
75:V:104:ARG:NH1	1:1:184:G:O4'	2.41	0.53

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
83:Aw:71:VAL:HG11	1:1:109:U:H5'	1.91	0.53
86:Al:71:PHE:CD2	115:Ay:145:PRO:HA	2.43	0.53
86:Al:293:ASN:OD1	86:Al:293:ASN:N	2.40	0.53
94:Au:72:ASP:HB2	94:Au:74:GLN:HG3	1.89	0.53
97:BM:46:ARG:HH12	97:BM:47:LYS:HD3	1.73	0.53
100:BH:33:ILE:HG22	100:BH:40:LEU:HD12	1.90	0.53
108:Av:154:TRP:O	108:Av:158:MET:HG2	2.09	0.53
112:Ac:53:TYR:N	112:Ac:235:TYR:O	2.32	0.53
113:Ah:67:ARG:HA	1:1:905:A:C4	2.43	0.53
117:Ax:174:ASP:O	117:Ax:176:ARG:HG3	2.09	0.53
1:1:69:G:H5''	1:1:70:G:O4'	2.07	0.53
1:1:482:A:H2'	1:1:483:U:H4'	1.89	0.53
1:2:64:U:H5	1:2:84:U:O4	1.87	0.53
1:2:243:A:N3	1:2:243:A:C2'	2.72	0.53
1:2:525:A:C3'	15:d:330:ARG:CA	2.86	0.53
1:2:525:A:OP1	15:d:329:ARG:HA	2.06	0.53
4:m:31:TYR:HA	4:m:34:LEU:HB2	1.90	0.53
5:f:138:ARG:HG2	44:g:138:LEU:HD22	1.90	0.53
9:n:35:SER:OG	9:n:36:THR:N	2.41	0.53
9:n:45:GLY:N	14:e:382:ASP:O	2.41	0.53
16:az:130:LYS:HB3	16:az:158:ILE:HD12	1.90	0.53
21:aa:238:GLN:HG2	21:aa:239:HIS:CD2	2.44	0.53
21:aa:1250:THR:O	21:aa:1254:SER:N	2.40	0.53
22:ab:1073:ARG:HG3	22:ab:1078:LYS:HA	1.90	0.53
24:ac:460:LEU:O	24:ac:464:TRP:N	2.35	0.53
25:ad:296:LEU:HD13	25:ad:392:ALA:HB1	1.90	0.53
25:ad:656:ALA:HA	37:j:146:LEU:HD13	1.91	0.53
26:an:30:ARG:HD2	52:z:993:ARG:HH11	1.73	0.53
28:ap:99:VAL:O	28:ap:103:GLN:HG2	2.08	0.53
32:y:208:ALA:HB2	42:x:228:TYR:CE2	2.42	0.53
39:ar:76:LEU:HA	39:ar:261:LEU:HA	1.91	0.53
50:a:150:ARG:HH21	50:a:164:TYR:HE2	1.57	0.53
55:B:384:ARG:NH1	71:R:212:SER:H	2.07	0.53
56:C:136:THR:HG23	115:Ay:139:ALA:HA	1.90	0.53
58:E:149:LEU:HB2	58:E:191:ILE:HG22	1.91	0.53
63:J:65:ASN:HB3	119:BO:172:ARG:CD	2.38	0.53
67:N:77:ASN:HD21	1:1:87:A:H1'	1.73	0.53
69:P:123:ARG:HH12	100:BH:225:ILE:HB	1.72	0.53
74:U:32:ARG:HB3	75:V:65:ARG:HH22	1.69	0.53
77:X:496:TRP:HZ3	106:Ad:65:ILE:HD13	1.73	0.53
82:BB:17:HIS:HD2	82:BB:24:ARG:HH22	1.57	0.53

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
83:Aw:72:PRO:HD3	89:At:60:ARG:NH1	2.23	0.53
86:Al:67:ALA:HB1	115:Ay:148:HIS:HE2	1.73	0.53
86:Al:113:LEU:O	86:Al:161:HIS:NE2	2.29	0.53
86:Al:279:ASN:H	86:Al:279:ASN:ND2	2.07	0.53
87:BI:198:LEU:HD13	87:BI:214:ILE:HG12	1.91	0.53
94:Au:53:ARG:NH1	118:BL:141:TRP:HA	2.24	0.53
94:Au:66:LEU:HA	94:Au:71:MET:O	2.09	0.53
99:Aj:487:ASP:O	99:Aj:491:ASN:ND2	2.41	0.53
102:Aq:152:LYS:HZ2	102:Aq:174:ARG:HB3	1.74	0.53
106:Ad:162:SER:OG	1:1:188:A:OP2	2.24	0.53
113:Ah:181:LEU:HB2	113:Ah:184:HIS:CD2	2.44	0.53
113:Ah:249:ASN:O	113:Ah:249:ASN:ND2	2.42	0.53
1:1:269:A:H2	1:1:271:U:H1'	1.73	0.53
1:1:781:A:HO2'	1:1:782:U:P	2.31	0.53
1:2:41:U:C5'	1:2:41:U:H6	2.21	0.53
1:2:55:G:C5'	1:2:152:G:N2	2.57	0.53
1:2:313:C:HO2'	4:m:165:VAL:HG12	0.66	0.53
1:2:418:A:C6	13:aj:52:TYR:CZ	2.94	0.53
1:2:418:A:C5	13:aj:54:PRO:HB3	2.19	0.53
1:2:418:A:O4'	13:aj:55:HIS:ND1	2.29	0.53
1:2:419:A:C8	10:ae:181:ARG:HB2	2.43	0.53
1:2:463:G:OP1	8:am:298:ARG:CA	2.52	0.53
7:au:63:HIS:HD2	22:ab:385:TYR:CZ	2.27	0.53
21:aa:334:LYS:H	21:aa:337:GLY:HA3	1.72	0.53
24:ac:258:ALA:O	24:ac:261:SER:OG	2.23	0.53
24:ac:516:ARG:NH1	24:ac:583:GLN:OE1	2.42	0.53
24:ac:756:THR:HG22	24:ac:758:GLU:H	1.73	0.53
24:ac:1107:THR:N	38:l:561:TYR:OH	2.42	0.53
25:ad:233:ASN:O	25:ad:237:THR:OG1	2.27	0.53
28:ap:73:ARG:HG2	52:z:650:HIS:CE1	2.44	0.53
32:y:146:MET:SD	32:y:262:SER:OG	2.60	0.53
32:y:165:PRO:HD2	32:y:171:HIS:CD2	2.44	0.53
41:ai:324:ASP:OD1	41:ai:327:SER:N	2.35	0.53
44:g:131:GLN:HG3	44:g:135:ASN:ND2	2.24	0.53
45:o:107:VAL:HG12	45:o:108:LEU:HD23	1.90	0.53
50:a:373:ARG:NH2	50:a:409:LEU:O	2.39	0.53
54:A:169:ARG:NH2	1:1:1117:U:O2	2.41	0.53
61:H:99:GLU:HG3	1:1:390:A:C2	2.43	0.53
75:V:89:ARG:HG2	1:1:374:U:H5''	1.90	0.53
82:BB:131:PHE:CZ	103:BE:73:PHE:HB2	2.44	0.53
87:BI:115:LEU:HD21	87:BI:144:LEU:HD12	1.89	0.53

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
91:Ab:66:GLU:O	91:Ab:91:ASN:ND2	2.41	0.53
96:Ac:91:GLN:NE2	106:Ad:34:MET:SD	2.82	0.53
97:BM:31:ARG:O	97:BM:35:GLN:HG2	2.09	0.53
97:BM:104:ASP:OD1	97:BM:104:ASP:N	2.37	0.53
98:Ar:27:THR:HG23	98:Ar:35:PHE:HA	1.90	0.53
100:BH:32:ASP:HB2	100:BH:191:ASP:HB3	1.91	0.53
107:BF:22:HIS:HA	1:1:595:A:H61	1.74	0.53
118:BL:310:ARG:O	118:BL:312:SER:N	2.41	0.53
1:1:568:A:H2'	1:1:569:U:O4'	2.09	0.53
1:2:38:U:HO2'	1:2:39:U:C1'	2.11	0.53
1:2:47:U:P	29:aq:13:ARG:CB	2.94	0.53
1:2:435:U:O4	6:s:163:PRO:CA	2.56	0.53
1:2:495:U:O2'	3:aw:15:ARG:HA	2.09	0.53
1:2:615:U:C5	44:g:101:ARG:CG	2.92	0.53
7:au:97:VAL:O	7:au:100:SER:OG	2.20	0.53
7:au:139:HIS:HD2	7:au:176:ASP:HB3	1.73	0.53
10:ae:278:ILE:HD12	10:ae:322:TYR:CG	2.44	0.53
10:ae:501:MET:HE2	22:ab:806:ALA:HB2	1.91	0.53
12:ag:37:TYR:HB2	13:aj:52:TYR:HD1	1.74	0.53
13:aj:72:HIS:CD2	13:aj:74:ALA:H	2.26	0.53
14:e:244:TYR:HB3	14:e:419:MET:HE1	1.91	0.53
20:u:209:VAL:HG12	20:u:254:ARG:HG3	1.90	0.53
21:aa:1555:THR:HA	21:aa:1598:VAL:HG21	1.91	0.53
22:ab:910:ASP:OD1	22:ab:910:ASP:N	2.38	0.53
23:ak:120:GLN:HG2	23:ak:124:LYS:HE2	1.90	0.53
24:ac:363:TYR:HH	24:ac:464:TRP:CD1	2.26	0.53
24:ac:664:SER:H	24:ac:714:ASP:HB3	1.73	0.53
24:ac:947:LEU:HD22	38:l:128:LEU:HD23	1.90	0.53
28:ap:207:ILE:HB	28:ap:213:LYS:HD2	1.89	0.53
35:t:100:ILE:HG13	35:t:171:TRP:CG	2.43	0.53
38:l:141:GLU:HA	38:l:315:TYR:CE2	2.43	0.53
38:l:149:LEU:O	38:l:153:ILE:HG12	2.09	0.53
41:ai:293:LEU:HG	52:z:857:ARG:HD2	1.90	0.53
42:x:244:ARG:O	42:x:248:ASN:ND2	2.41	0.53
52:z:534:ILE:HD13	52:z:792:LEU:HB3	1.90	0.53
52:z:1071:LYS:HD2	52:z:1077:LEU:HA	1.91	0.53
60:G:174:ARG:HH11	1:1:191:A:H3'	1.73	0.53
64:K:165:SER:OG	99:Aj:198:TYR:O	2.22	0.53
66:M:12:LEU:HD11	66:M:13:ARG:HD3	1.91	0.53
66:M:198:ARG:HD3	66:M:241:MET:SD	2.49	0.53
68:O:175:ASP:HA	68:O:190:GLN:HG2	1.91	0.53

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
68:O:282:GLN:HB2	87:BI:206:HIS:CD2	2.44	0.53
80:BA:15:LEU:C	80:BA:17:LYS:H	2.16	0.53
84:Bj:53:SER:O	84:Bj:56:GLN:NE2	2.42	0.53
84:Bj:117:GLN:O	84:Bj:121:ALA:N	2.41	0.53
85:An:135:PHE:O	85:An:135:PHE:CD2	2.61	0.53
86:Al:111:ALA:HB3	86:Al:250:GLN:HE21	1.72	0.53
92:Ai:81:CYS:SG	92:Ai:82:GLU:N	2.81	0.53
93:Ap:26:MET:HG2	93:Ap:29:TRP:CD2	2.44	0.53
108:Av:55:HIS:HB3	108:Av:66:MET:SD	2.49	0.53
113:Ah:260:THR:OG1	113:Ah:261:GLU:N	2.40	0.53
117:Ax:152:ILE:HD13	117:Ax:157:PHE:HB3	1.90	0.53
118:BL:215:THR:HG22	118:BL:269:ASN:HB2	1.89	0.53
1:1:1029:U:H3	1:1:1057:A:H61	1.54	0.53
1:2:100:A:H4'	1:2:101:G:OP1	2.08	0.53
1:2:169:U:O3'	37:j:17:LYS:CB	2.57	0.53
1:2:175:U:C2	48:q:14:PRO:CD	2.92	0.53
1:2:224:G:C6	1:2:225:G:C5	2.96	0.53
1:2:321:U:H6	1:2:321:U:H3'	1.72	0.53
1:2:432:G:H5'	10:ae:15:HIS:N	2.23	0.53
1:2:459:A:H5'	8:am:284:ARG:NH1	2.24	0.53
1:2:466:U:H4'	1:2:467:U:O5'	2.08	0.53
1:2:470:A:N3	2:h:116:TRP:CH2	2.77	0.53
1:2:496:U:H4'	3:aw:15:ARG:HG3	1.90	0.53
4:m:21:PHE:HB3	52:z:771:LEU:HD13	1.91	0.53
4:m:218:VAL:O	4:m:222:ARG:N	2.36	0.53
10:ae:354:GLY:HA3	13:aj:77:VAL:HB	1.89	0.53
12:ag:259:HIS:HB2	14:e:290:SER:N	2.23	0.53
12:ag:316:HIS:CE1	12:ag:335:GLU:HG3	2.44	0.53
15:d:253:ASP:O	18:r:346:ARG:NH2	2.41	0.53
19:af:650:GLN:O	19:af:654:GLN:N	2.38	0.53
20:u:49:LEU:HD21	22:ab:446:ILE:HG12	1.91	0.53
20:u:618:ARG:NH2	20:u:634:ALA:O	2.42	0.53
20:u:763:LYS:HZ2	20:u:765:ASP:HB2	1.74	0.53
22:ab:229:LEU:O	22:ab:233:GLU:N	2.36	0.53
22:ab:962:SER:OG	22:ab:963:PRO:HD3	2.09	0.53
24:ac:482:GLU:N	24:ac:482:GLU:OE1	2.40	0.53
24:ac:1138:MET:HE3	24:ac:1142:GLN:HG3	1.91	0.53
25:ad:277:ASP:HB3	25:ad:280:LEU:HG	1.91	0.53
25:ad:300:LYS:HD2	25:ad:395:GLU:HG2	1.90	0.53
30:as:76:GLU:HA	30:as:79:ARG:HD3	1.90	0.53
35:t:102:GLN:O	35:t:106:GLN:HG2	2.09	0.53

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
36:p:269:THR:O	36:p:271:HIS:N	2.42	0.53
43:i:228:ARG:O	43:i:232:VAL:HG23	2.09	0.53
56:C:150:PRO:HA	70:Q:110:TYR:CD2	2.44	0.53
56:C:152:ARG:HB3	85:An:283:ARG:HG2	1.91	0.53
57:D:100:ASP:O	57:D:103:ALA:N	2.42	0.53
64:K:20:LEU:HD11	95:Aa:185:VAL:HA	1.89	0.53
69:P:53:PHE:HD1	69:P:56:ASP:H	1.57	0.53
71:R:243:ILE:HG13	71:R:257:GLY:H	1.74	0.53
73:T:79:ARG:O	73:T:82:LYS:NZ	2.35	0.53
77:X:75:LEU:HD13	77:X:80:PHE:HE2	1.73	0.53
80:BA:48:THR:H	80:BA:51:ASP:HB2	1.73	0.53
81:UA:195:UNK:O	81:UA:199:UNK:N	2.42	0.53
83:Aw:19:ASN:ND2	83:Aw:22:ARG:HH11	2.05	0.53
85:An:264:HIS:CD2	113:Ah:62:PHE:HB3	2.44	0.53
87:BI:97:THR:HB	87:BI:234:VAL:HG12	1.90	0.53
89:At:152:LEU:HB3	89:At:163:ILE:HG22	1.91	0.53
92:Ai:364:LEU:HB2	92:Ai:394:LEU:HD13	1.90	0.53
93:Ap:57:LYS:O	93:Ap:61:ASP:N	2.30	0.53
99:Aj:212:ASP:OD1	99:Aj:227:TYR:OH	2.24	0.53
101:Am:21:ARG:NH2	101:Am:24:GLY:O	2.40	0.53
101:Am:60:GLN:HE22	101:Am:64:LEU:HD21	1.73	0.53
102:Aq:89:PHE:O	102:Aq:90:PHE:HB2	2.07	0.53
102:Aq:167:SER:C	102:Aq:171:ALA:H	2.16	0.53
113:Ah:114:PHE:HD2	113:Ah:115:TYR:HD1	1.56	0.53
113:Ah:351:ARG:HA	113:Ah:354:ALA:HB3	1.90	0.53
118:BL:139:ARG:NH2	118:BL:299:PRO:HG3	2.24	0.53
119:BO:91:CYS:O	119:BO:95:PRO:HD3	2.09	0.53
1:1:132:U:H5''	1:1:133:A:C2	2.42	0.53
1:2:47:U:O2	29:aq:10:ALA:N	2.37	0.53
1:2:51:A:C4	1:2:52:U:C4	2.97	0.53
1:2:167:U:OP1	1:2:167:U:H4'	2.05	0.53
1:2:208:C:C4	1:2:209:U:C6	2.96	0.53
1:2:317:U:C5'	1:2:317:U:O2	2.57	0.53
1:2:341:C:H2'	1:2:342:A:H5'	1.91	0.53
1:2:436:U:OP2	6:s:154:VAL:CG1	2.57	0.53
1:2:483:A:C8	2:h:84:VAL:HG23	2.43	0.53
1:2:502:A:C8	14:e:789:PRO:CD	2.91	0.53
1:2:517:G:H2'	1:2:518:A:H8	1.74	0.53
1:2:543:U:P	50:a:159:HIS:CE1	3.02	0.53
4:m:133:ASN:O	4:m:137:ILE:HG12	2.09	0.53
6:s:45:GLU:OE1	14:e:461:HIS:NE2	2.32	0.53

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
7:au:42:PHE:CE1	13:aj:309:ARG:HG3	2.44	0.53
12:ag:64:ASN:O	12:ag:67:VAL:HG12	2.09	0.53
18:r:396:TRP:CE2	18:r:403:SER:HB3	2.44	0.53
21:aa:197:LEU:HD21	21:aa:208:VAL:HB	1.91	0.53
21:aa:393:ARG:HH12	21:aa:438:THR:HG21	1.74	0.53
21:aa:546:GLU:O	21:aa:550:SER:OG	2.27	0.53
21:aa:814:THR:OG1	21:aa:817:ARG:HB3	2.09	0.53
21:aa:964:ASN:HD22	26:an:251:ARG:HA	1.73	0.53
21:aa:1092:VAL:O	21:aa:1096:LEU:N	2.30	0.53
21:aa:1412:ASN:HB3	21:aa:1462:LEU:HD11	1.91	0.53
22:ab:125:GLU:OE2	24:ac:732:ALA:N	2.31	0.53
24:ac:1118:HIS:HD1	38:l:562:ASN:HA	1.72	0.53
25:ad:484:PHE:O	25:ad:488:LYS:N	2.34	0.53
37:j:148:ARG:HA	37:j:151:LEU:HD12	1.91	0.53
38:l:546:ASP:OD1	38:l:547:PRO:HD2	2.09	0.53
38:l:639:MET:HG3	38:l:643:PHE:CE1	2.44	0.53
45:o:422:GLN:HA	45:o:483:ARG:HA	1.91	0.53
50:a:168:TYR:HA	50:a:178:PHE:HA	1.90	0.53
50:a:391:THR:OG1	50:a:414:PRO:O	2.26	0.53
55:B:167:ARG:NH2	1:l:528:A:OP1	2.42	0.53
55:B:367:LEU:HD22	83:Aw:98:GLN:HG3	1.90	0.53
60:G:254:ASN:HD21	60:G:288:PHE:HB3	1.74	0.53
61:H:123:PHE:HE2	61:H:149:ILE:HD11	1.74	0.53
70:Q:67:PRO:HD2	70:Q:73:MET:HE1	1.91	0.53
80:BA:42:SER:HB3	80:BA:131:ARG:HH22	1.73	0.53
86:Al:36:GLU:O	86:Al:37:GLN:HB2	2.09	0.53
92:Ai:118:GLN:HG2	92:Ai:175:TYR:CZ	2.44	0.53
92:Ai:210:LEU:O	92:Ai:214:SER:N	2.34	0.53
92:Ai:353:ASP:OD1	92:Ai:354:GLY:N	2.41	0.53
97:BM:280:LEU:HD23	97:BM:280:LEU:H	1.73	0.53
107:BF:32:LEU:O	107:BF:36:ALA:N	2.31	0.53
110:As:110:ASP:O	110:As:114:TYR:N	2.41	0.53
115:Ay:143:GLU:OE2	115:Ay:144:THR:N	2.41	0.53
1:l:643:G:O3'	1:l:656:G:N2	2.42	0.53
1:2:1:G:N2	25:ad:699:ASP:OD2	2.41	0.53
1:2:2:U:H5''	25:ad:706:GLN:HB2	1.91	0.53
1:2:18:A:C6	1:2:19:U:C5	2.97	0.53
1:2:168:G:H1'	1:2:169:U:H5'	1.90	0.53
1:2:201:A:P	31:at:245:ASN:ND2	2.82	0.53
1:2:228:G:N7	1:2:242:U:C2	2.77	0.53
1:2:418:A:H5'	13:aj:56:HIS:CE1	2.44	0.53

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:491:U:C2	14:e:384:SER:CB	2.87	0.53
1:2:512:G:H4'	16:az:145:ARG:NH2	2.23	0.53
1:2:516:A:H2'	1:2:517:G:H8	1.72	0.53
1:2:555:U:C3'	1:2:556:U:C5'	2.85	0.53
1:2:567:A:H8	1:2:567:A:O5'	1.91	0.53
11:ay:89:ARG:NH1	11:ay:93:ASP:OD1	2.42	0.53
12:ag:491:GLU:HB2	23:ak:302:ARG:HH12	1.74	0.53
13:aj:26:SER:HB2	53:bd:74:ASN:ND2	2.22	0.53
21:aa:520:GLU:HG2	21:aa:887:VAL:HB	1.91	0.53
21:aa:1125:LEU:O	21:aa:1129:ASN:N	2.24	0.53
21:aa:1388:GLY:HA3	26:an:175:ALA:HB2	1.91	0.53
22:ab:635:PHE:HE1	22:ab:814:TYR:H	1.56	0.53
26:an:2:GLU:OE2	26:an:6:ARG:NE	2.43	0.53
29:aq:48:GLN:O	29:aq:52:GLY:N	2.41	0.53
29:aq:188:ARG:O	29:aq:193:GLU:N	2.41	0.53
31:at:225:TRP:CE3	31:at:251:LYS:HD3	2.44	0.53
36:p:184:MET:HA	36:p:187:LEU:HB2	1.91	0.53
38:l:272:ARG:HB2	38:l:273:PRO:HD3	1.91	0.53
38:l:421:ARG:HA	38:l:424:ALA:HB3	1.91	0.53
38:l:487:ALA:O	38:l:491:GLN:HG2	2.09	0.53
45:o:119:THR:HG23	45:o:122:GLU:H	1.73	0.53
58:E:178:ARG:HH11	108:Av:114:VAL:HG11	1.74	0.53
61:H:41:GLU:HA	98:Ar:184:TYR:CE2	2.44	0.53
66:M:87:VAL:HG22	99:Aj:449:LEU:HD22	1.91	0.53
68:O:29:ARG:CD	68:O:29:ARG:N	2.66	0.53
68:O:269:ARG:HG2	68:O:273:MET:HG3	1.91	0.53
75:V:39:VAL:HG21	1:1:98:G:C8	2.44	0.53
77:X:348:VAL:O	77:X:349:PRO:C	2.51	0.53
85:An:188:ARG:HG3	113:Ah:444:THR:HG21	1.89	0.53
90:BC:53:ALA:HB2	90:BC:90:GLN:O	2.09	0.53
97:BM:240:ASP:HB3	97:BM:279:TYR:CE2	2.44	0.53
100:BH:94:ASP:OD2	100:BH:141:GLN:NE2	2.41	0.53
106:Ad:203:ILE:O	106:Ad:205:PRO:HD3	2.09	0.53
112:Ac:180:LYS:HD3	112:Ac:272:LYS:HA	1.91	0.53
118:BL:112:SER:OG	118:BL:112:SER:O	2.25	0.53
122:UC:88:UNK:O	122:UC:92:UNK:N	2.42	0.53
1:2:68:A:C2	1:2:69:A:N6	2.78	0.52
1:2:93:U:C4'	1:2:94:A:OP2	2.55	0.52
1:2:141:A:C6	1:2:267:A:C8	2.97	0.52
1:2:169:U:O2'	37:j:17:LYS:HD2	2.09	0.52
1:2:172:A:N3	1:2:172:A:C5'	2.72	0.52

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:324:U:OP1	43:i:303:TYR:CD1	2.61	0.52
1:2:395:U:H6	1:2:395:U:P	2.32	0.52
1:2:469:C:H1'	2:h:19:ARG:HH12	1.75	0.52
1:2:481:U:C6	2:h:24:PHE:CE2	2.96	0.52
1:2:497:A:O3'	3:aw:4:ALA:HB3	2.09	0.52
1:2:504:A:OP2	6:s:79:GLY:CA	2.57	0.52
1:2:526:A:O2'	15:d:329:ARG:CZ	2.56	0.52
1:2:529:A:H2'	16:az:72:LYS:HA	1.88	0.52
8:am:98:ILE:HD12	15:d:152:VAL:HG13	1.90	0.52
15:d:57:ASP:OD1	15:d:58:GLN:N	2.43	0.52
15:d:58:GLN:HE21	15:d:78:GLN:HB3	1.75	0.52
20:u:178:MET:HB2	20:u:235:PRO:HB2	1.91	0.52
21:aa:236:ILE:HD13	21:aa:296:ILE:HG21	1.92	0.52
21:aa:571:LYS:O	21:aa:575:GLN:HA	2.09	0.52
22:ab:293:LEU:HD12	22:ab:331:ARG:HE	1.74	0.52
22:ab:504:TYR:OH	22:ab:574:VAL:O	2.22	0.52
23:ak:194:ASN:O	23:ak:198:LYS:N	2.42	0.52
24:ac:799:THR:HA	24:ac:1081:GLU:OE1	2.08	0.52
25:ad:641:ASP:HB3	25:ad:644:ILE:HD12	1.92	0.52
26:an:51:VAL:HG11	26:an:101:GLN:HB2	1.91	0.52
28:ap:160:GLU:HB2	43:i:138:LEU:HD13	1.91	0.52
37:j:76:LEU:H	37:j:76:LEU:HD23	1.73	0.52
40:av:138:SER:OG	40:av:170:GLU:OE2	2.22	0.52
42:x:257:LEU:HA	42:x:260:HIS:HD2	1.74	0.52
46:c:279:LEU:HD11	50:a:285:ILE:HG21	1.90	0.52
52:z:271:GLU:HA	52:z:274:ARG:HB2	1.91	0.52
52:z:983:HIS:HB3	52:z:986:GLU:O	2.09	0.52
54:A:168:THR:OG1	54:A:169:ARG:N	2.42	0.52
60:G:40:LEU:HD23	109:Af:108:PHE:CE1	2.44	0.52
60:G:213:TRP:CH2	75:V:140:PRO:HD3	2.44	0.52
60:G:282:ARG:HA	60:G:285:LEU:HD12	1.90	0.52
64:K:31:GLU:OE1	1:1:172:A:H4'	2.09	0.52
69:P:135:HIS:CD2	96:Ao:229:GLU:HA	2.43	0.52
78:Y:167:LEU:HD13	78:Y:180:VAL:HG11	1.91	0.52
83:Aw:164:TRP:CZ3	89:At:146:PRO:HB3	2.43	0.52
85:An:178:VAL:O	85:An:182:VAL:HG22	2.08	0.52
86:Al:256:PRO:O	86:Al:260:MET:HG2	2.10	0.52
89:At:141:ASP:OD1	89:At:143:THR:HG23	2.09	0.52
97:BM:97:GLY:O	97:BM:101:LYS:N	2.42	0.52
105:BP:162:ARG:NH2	108:Av:161:ILE:O	2.40	0.52
115:Ay:111:GLU:HA	115:Ay:114:GLU:HG2	1.91	0.52

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
117:Ax:122:TRP:HZ2	117:Ax:134:GLN:HG3	1.73	0.52
1:2:66:U:C6	1:2:160:G:C4	2.97	0.52
1:2:396:A:N7	1:2:529:A:C1'	2.71	0.52
1:2:396:A:C5	1:2:529:A:O4'	2.62	0.52
1:2:448:U:C5	2:h:123:ARG:HB2	2.44	0.52
1:2:502:A:H2'	14:e:789:PRO:CG	2.39	0.52
1:2:517:G:H2'	1:2:518:A:C8	2.44	0.52
4:m:137:ILE:HG23	4:m:163:LEU:HD11	1.91	0.52
10:ae:287:MET:HE1	10:ae:335:VAL:HB	1.91	0.52
10:ae:321:GLU:HA	10:ae:475:TRP:HH2	1.74	0.52
10:ae:357:MET:HE1	13:aj:75:PHE:CD1	2.43	0.52
10:ae:451:ALA:O	10:ae:471:ARG:NH1	2.43	0.52
12:ag:94:LYS:O	12:ag:98:CYS:N	2.42	0.52
12:ag:260:ARG:HD2	12:ag:261:HIS:NE2	2.25	0.52
12:ag:296:ARG:HD2	14:e:292:GLY:O	2.09	0.52
12:ag:307:GLU:OE2	12:ag:357:SER:OG	2.18	0.52
14:e:279:LEU:HB2	14:e:337:CYS:SG	2.49	0.52
15:d:114:PRO:O	26:an:300:GLN:NE2	2.42	0.52
20:u:193:LEU:HD13	20:u:230:MET:HB2	1.91	0.52
20:u:369:ALA:HB1	20:u:591:GLU:HG3	1.89	0.52
20:u:370:PHE:HB2	20:u:574:LEU:HD21	1.91	0.52
21:aa:257:VAL:HG11	21:aa:300:MET:HE1	1.91	0.52
22:ab:192:TYR:CG	24:ac:1052:SER:HB3	2.44	0.52
22:ab:671:TYR:HA	38:l:614:LEU:HD21	1.89	0.52
24:ac:683:THR:O	38:l:212:LEU:HB3	2.08	0.52
24:ac:939:ARG:HH12	38:l:124:HIS:CD2	2.26	0.52
25:ad:290:ARG:NH1	25:ad:331:GLU:OE2	2.42	0.52
26:an:24:PRO:HG2	26:an:27:GLN:HB3	1.91	0.52
26:an:185:ARG:O	26:an:189:ALA:N	2.39	0.52
28:ap:117:ILE:HD12	28:ap:137:MET:HE1	1.92	0.52
31:at:326:ARG:NH1	31:at:346:ALA:O	2.43	0.52
38:l:461:GLU:HB2	38:l:467:SER:H	1.74	0.52
43:i:170:ARG:NH2	49:b:99:GLU:OE1	2.28	0.52
45:o:212:THR:OG1	45:o:213:HIS:N	2.41	0.52
55:B:78:PRO:HB2	55:B:361:PHE:CE2	2.43	0.52
61:H:131:ARG:HD3	1:1:450:A:H5'	1.91	0.52
62:I:42:GLU:HB3	62:I:45:MET:HE3	1.90	0.52
70:Q:81:ARG:HH21	1:1:81:U:H5	1.57	0.52
70:Q:108:ILE:HB	1:1:905:A:N6	2.16	0.52
75:V:82:PRO:HD3	77:X:458:VAL:HG11	1.91	0.52
77:X:170:VAL:HG23	77:X:223:SER:HB2	1.92	0.52

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
86:Al:121:HIS:CD2	86:Al:222:GLY:HA3	2.43	0.52
86:Al:124:THR:HG21	86:Al:218:CYS:SG	2.49	0.52
92:Ai:296:HIS:HD2	92:Ai:297:SER:H	1.57	0.52
93:Ap:164:PHE:HA	93:Ap:167:MET:HB3	1.92	0.52
94:Au:15:GLN:NE2	1:1:237:U:O2'	2.38	0.52
96:Ao:11:SER:O	96:Ao:11:SER:OG	2.25	0.52
97:BM:67:GLU:H	97:BM:319:ALA:HB1	1.73	0.52
102:Aq:341:PHE:HE1	1:1:975:U:H1'	1.73	0.52
106:Ad:63:SER:HB2	106:Ad:81:PHE:CE2	2.44	0.52
108:Av:158:MET:HE2	1:1:460:A:C5	2.44	0.52
1:1:99:A:H4'	1:1:100:A:C5'	2.39	0.52
1:1:393:A:H4'	1:1:1012:A:N6	2.24	0.52
1:1:573:A:O2'	1:1:574:A:OP1	2.21	0.52
1:1:608:A:O2'	1:1:817:A:N6	2.43	0.52
1:2:48:U:P	29:aq:14:TYR:OH	2.64	0.52
1:2:52:U:C5	1:2:167:U:C6	2.97	0.52
1:2:102:U:C6	1:2:102:U:C5'	2.87	0.52
1:2:343:C:N3	1:2:350:G:O6	2.41	0.52
1:2:396:A:N7	1:2:529:A:N3	2.58	0.52
1:2:412:G:C6	10:ae:53:THR:C	2.86	0.52
1:2:431:U:H2'	13:aj:280:HIS:CE1	2.44	0.52
1:2:471:A:O5'	13:aj:12:TYR:CD2	2.62	0.52
1:2:516:A:C8	17:ax:32:ARG:NH1	2.77	0.52
1:2:554:A:H2'	1:2:555:U:O5'	2.10	0.52
1:2:613:U:C2	44:g:100:HIS:CD2	2.97	0.52
10:ae:283:ARG:NH2	10:ae:331:GLU:OE1	2.43	0.52
14:e:535:PHE:CE1	14:e:604:THR:HA	2.44	0.52
15:d:60:GLN:NE2	19:af:247:GLU:OE1	2.42	0.52
15:d:300:ARG:HD3	15:d:323:LEU:HD23	1.91	0.52
16:az:120:TYR:HE2	16:az:158:ILE:H	1.57	0.52
19:af:624:ARG:HE	19:af:628:ILE:HD11	1.73	0.52
20:u:624:TRP:CD1	20:u:654:ARG:HE	2.27	0.52
21:aa:548:ILE:HG13	21:aa:549:ALA:H	1.74	0.52
21:aa:591:ASP:HB2	21:aa:598:PHE:HZ	1.74	0.52
27:ao:152:MET:HA	27:ao:155:ILE:HG12	1.91	0.52
28:ap:150:HIS:CD2	28:ap:213:LYS:HE3	2.45	0.52
52:z:1092:ASP:HB2	52:z:1095:TYR:HB2	1.91	0.52
55:B:43:SER:HB3	99:Aj:440:GLN:NE2	2.20	0.52
55:B:254:SER:OG	55:B:255:ARG:N	2.39	0.52
63:J:65:ASN:O	63:J:66:PRO:C	2.51	0.52
64:K:46:GLN:HE22	95:Aa:192:LEU:CA	2.15	0.52

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
67:N:194:ARG:HD3	1:1:565:U:N3	2.25	0.52
107:BF:63:ARG:NH1	107:BF:68:GLN:HA	2.24	0.52
112:Ac:175:GLU:HG3	112:Ac:177:ALA:HB3	1.92	0.52
119:BO:42:SER:C	119:BO:44:ARG:H	2.16	0.52
120:BG:1298:PHE:O	120:BG:1298:PHE:CG	2.60	0.52
1:1:166:U:H5'	1:1:167:U:OP2	2.09	0.52
1:1:433:G:HO2'	1:1:434:U:P	2.32	0.52
1:1:504:U:O2'	1:1:505:A:OP2	2.24	0.52
1:1:508:G:H1'	1:1:509:U:OP2	2.09	0.52
1:1:654:A:H2'	1:1:655:U:H5''	1.92	0.52
1:1:1025:G:OP1	1:1:1025:G:H4'	2.08	0.52
1:2:114:U:O4	1:2:115:A:N6	2.42	0.52
1:2:222:A:N3	1:2:252:G:N2	2.57	0.52
1:2:341:C:C2'	1:2:342:A:H5''	2.36	0.52
1:2:449:A:P	2:h:123:ARG:NH2	2.77	0.52
1:2:522:A:OP1	15:d:338:PHE:CE2	2.63	0.52
1:2:540:U:H3'	1:2:541:A:H8	1.73	0.52
2:h:33:GLU:OE1	10:ae:167:TRP:NE1	2.38	0.52
6:s:37:ARG:NH2	20:u:789:ASP:OD2	2.29	0.52
9:n:160:ARG:HH12	9:n:169:LEU:HD12	1.74	0.52
12:ag:131:ALA:HB1	12:ag:134:LEU:HD12	1.92	0.52
14:e:348:ILE:HG13	14:e:351:THR:H	1.74	0.52
14:e:734:ASN:ND2	14:e:752:GLU:OE2	2.42	0.52
19:af:457:TYR:HE2	19:af:488:TYR:HB3	1.73	0.52
21:aa:1423:GLN:HA	21:aa:1426:GLN:HB3	1.92	0.52
22:ab:326:SER:O	22:ab:330:ARG:N	2.37	0.52
22:ab:907:PHE:HB2	22:ab:912:VAL:HG13	1.91	0.52
24:ac:727:ASP:OD1	24:ac:727:ASP:N	2.40	0.52
26:an:63:MET:HB3	26:an:72:ARG:HB2	1.89	0.52
26:an:208:ARG:O	26:an:211:GLU:HG2	2.10	0.52
30:as:230:ARG:HD2	30:as:231:LEU:N	2.25	0.52
33:w:98:LEU:HA	33:w:101:ARG:HB2	1.91	0.52
38:l:145:ASP:OD2	38:l:245:HIS:HE1	1.93	0.52
38:l:150:TYR:CD2	38:l:334:LEU:HD12	2.44	0.52
40:av:120:ALA:HB2	40:av:151:GLU:HB3	1.91	0.52
43:i:291:ASN:OD1	43:i:293:VAL:N	2.42	0.52
56:C:116:ILE:HD11	56:C:162:TYR:CE1	2.44	0.52
57:D:100:ASP:OD1	57:D:101:ARG:N	2.42	0.52
66:M:215:ILE:HG23	1:1:577:A:C6	2.44	0.52
67:N:78:ARG:HH21	67:N:79:ASP:H	1.55	0.52
67:N:85:ARG:NE	1:1:313:A:O3'	2.41	0.52

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
68:O:31:ARG:HD2	1:1:134:A:O3'	2.09	0.52
68:O:35:ARG:HH22	1:1:43:A:H5''	1.74	0.52
77:X:49:ARG:O	77:X:53:GLN:HG2	2.10	0.52
78:Y:155:ALA:HA	90:BC:134:GLU:CD	2.35	0.52
83:Aw:123:ARG:NH1	106:Ad:125:ASP:HB2	2.24	0.52
85:An:221:GLN:HA	85:An:221:GLN:NE2	2.24	0.52
85:An:266:ASP:N	85:An:266:ASP:OD1	2.38	0.52
88:Az:17:GLN:HG2	1:1:553:A:H4'	1.92	0.52
93:Ap:47:LYS:HB2	94:Au:185:TRP:CZ3	2.43	0.52
108:Av:36:PRO:HB3	108:Av:82:GLU:HB3	1.91	0.52
115:Ay:159:GLU:CD	115:Ay:159:GLU:H	2.17	0.52
116:Ag:114:VAL:H	116:Ag:117:TRP:HB3	1.74	0.52
1:1:433:G:O2'	1:1:434:U:H3'	2.09	0.52
1:1:929:G:H4'	1:1:930:A:C8	2.45	0.52
1:1:1131:A:N6	1:1:1147:A:H61	2.07	0.52
1:1:1136:U:H5	1:1:1142:U:N3	2.08	0.52
1:2:53:U:H5	1:2:54:A:N6	2.07	0.52
1:2:166:G:H2'	1:2:167:U:O2'	2.09	0.52
1:2:558:U:H2'	1:2:559:U:O4'	2.10	0.52
4:m:10:ASN:O	4:m:12:PRO:HD2	2.10	0.52
7:au:24:ILE:HD12	7:au:24:ILE:H	1.74	0.52
12:ag:208:TYR:OH	22:ab:421:ASP:OD2	2.28	0.52
19:af:364:ASN:HA	19:af:367:TRP:HB2	1.91	0.52
19:af:524:ARG:HH22	19:af:530:VAL:HB	1.74	0.52
20:u:564:LEU:HB3	20:u:573:THR:HG21	1.91	0.52
21:aa:1400:ASN:HD21	21:aa:1499:PHE:H	1.57	0.52
21:aa:1425:ALA:O	21:aa:1429:TYR:N	2.38	0.52
21:aa:1662:ARG:NH1	38:l:433:ASP:OD2	2.42	0.52
25:ad:526:GLN:HG2	25:ad:527:TYR:O	2.10	0.52
25:ad:539:MET:O	25:ad:543:SER:N	2.35	0.52
29:aq:167:ALA:HB1	29:aq:190:LEU:HD21	1.92	0.52
32:y:83:ARG:O	32:y:87:HIS:N	2.37	0.52
37:j:128:SER:H	37:j:131:GLN:NE2	2.08	0.52
38:l:575:HIS:NE2	38:l:579:LYS:HE2	2.24	0.52
39:ar:21:ILE:O	39:ar:25:ILE:HG12	2.10	0.52
45:o:323:LEU:HA	45:o:326:ARG:HG2	1.91	0.52
50:a:80:LEU:H	50:a:85:ASN:ND2	2.06	0.52
52:z:661:CYS:SG	52:z:782:HIS:ND1	2.81	0.52
53:bd:46:PHE:HZ	53:bd:70:LEU:HD21	1.74	0.52
54:A:236:GLU:HA	54:A:305:PRO:HA	1.91	0.52
57:D:111:ARG:NH2	91:Ab:219:GLU:OE1	2.36	0.52

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
59:F:115:LEU:N	1:1:143:A:OP2	2.37	0.52
60:G:359:HIS:HB2	70:Q:12:THR:HG21	1.91	0.52
65:L:153:THR:O	91:Ab:129:PRO:HG3	2.10	0.52
68:O:89:HIS:CD2	68:O:91:LYS:H	2.27	0.52
71:R:190:GLN:O	71:R:194:GLN:NE2	2.42	0.52
74:U:25:PHE:CB	1:1:972:A:N6	2.62	0.52
75:V:32:PHE:HD2	75:V:98:LYS:NZ	2.08	0.52
77:X:278:ARG:NH1	96:Ao:93:SER:HB3	2.24	0.52
82:BB:17:HIS:CE1	1:1:1118:G:HO2'	2.27	0.52
85:An:251:ASN:O	88:Az:44:HIS:NE2	2.42	0.52
85:An:291:GLU:HA	85:An:294:HIS:HB3	1.91	0.52
86:Al:185:CYS:SG	86:Al:186:LEU:N	2.83	0.52
88:Az:120:LYS:HG3	1:1:112:U:H5''	1.92	0.52
96:Ao:131:LEU:O	96:Ao:134:THR:HG22	2.10	0.52
98:Ar:42:ILE:HG13	98:Ar:47:ALA:HB2	1.91	0.52
98:Ar:97:TRP:CE2	98:Ar:174:ALA:HB2	2.43	0.52
103:BE:110:SER:OG	103:BE:113:HIS:N	2.26	0.52
114:BD:15:ASN:CG	114:BD:68:ARG:HH12	2.18	0.52
125:Ag:301:NAD:PA	125:Ag:301:NAD:C5D	2.98	0.52
117:Ax:94:ASP:N	117:Ax:94:ASP:OD1	2.41	0.52
119:BO:97:VAL:O	119:BO:99:HIS:ND1	2.43	0.52
1:1:981:A:O2'	1:1:1086:U:O2'	2.28	0.52
1:2:179:G:H2'	1:2:179:G:N3	2.25	0.52
1:2:282:A:N7	43:i:251:ILE:HD13	2.23	0.52
1:2:521:A:H4'	15:d:345:LYS:CA	2.40	0.52
1:2:615:U:C6	44:g:101:ARG:CZ	2.93	0.52
8:am:290:PRO:HG3	53:bd:71:ILE:HD13	1.92	0.52
8:am:296:ALA:HB1	8:am:299:PHE:HB3	1.91	0.52
10:ae:116:ARG:NH1	10:ae:179:TYR:OH	2.42	0.52
10:ae:206:ILE:O	10:ae:210:ARG:HG3	2.10	0.52
12:ag:334:VAL:O	12:ag:337:LYS:HB3	2.08	0.52
17:ax:76:GLU:OE2	17:ax:81:ARG:NH2	2.42	0.52
18:r:400:TRP:O	18:r:403:SER:OG	2.24	0.52
18:r:406:PHE:O	18:r:410:LEU:N	2.33	0.52
19:af:393:MET:HE1	19:af:455:VAL:HG12	1.90	0.52
20:u:137:LEU:HD11	20:u:332:LEU:HD12	1.92	0.52
22:ab:843:GLU:HG2	22:ab:926:ARG:HA	1.91	0.52
22:ab:885:GLY:HA2	22:ab:908:TYR:HB2	1.90	0.52
23:ak:168:LEU:HD21	24:ac:798:LEU:HD21	1.90	0.52
23:ak:215:GLU:O	23:ak:218:THR:OG1	2.22	0.52
24:ac:663:LYS:HB2	24:ac:714:ASP:HB3	1.92	0.52

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
32:y:40:TYR:HD2	36:p:281:LEU:HB3	1.74	0.52
38:l:597:LYS:HD2	38:l:600:LEU:HG	1.91	0.52
45:o:132:ARG:CA	50:a:349:TRP:CH2	2.93	0.52
45:o:222:LEU:HG	51:ba:82:LYS:HE2	1.91	0.52
45:o:323:LEU:O	45:o:327:LEU:N	2.43	0.52
47:k:131:PHE:O	47:k:159:TYR:HB2	2.09	0.52
49:b:86:HIS:NE2	49:b:88:ASP:OD2	2.41	0.52
52:z:655:TYR:HB3	52:z:665:LEU:HD11	1.92	0.52
59:F:159:THR:HG22	59:F:159:THR:O	2.09	0.52
60:G:34:LEU:HD12	60:G:39:ASN:HD21	1.74	0.52
60:G:79:TRP:HD1	60:G:96:TYR:CE2	2.27	0.52
60:G:130:TYR:CE2	60:G:134:ARG:HD2	2.44	0.52
61:H:167:PHE:HB3	98:Ar:166:TRP:HZ2	1.73	0.52
65:L:95:LEU:HD11	65:L:104:LEU:HD21	1.92	0.52
69:P:160:GLU:O	69:P:163:GLN:NE2	2.42	0.52
70:Q:142:LYS:HE2	70:Q:143:ARG:NH1	2.24	0.52
74:U:25:PHE:CE1	1:1:950:A:C6	2.97	0.52
83:Aw:77:ASN:HB3	1:1:106:A:N7	2.24	0.52
90:BC:95:LEU:HD13	90:BC:121:LEU:HD11	1.92	0.52
95:Aa:189:ARG:NE	1:1:146:U:H5	2.06	0.52
99:Aj:199:VAL:O	99:Aj:201:LEU:N	2.41	0.52
101:Am:250:LYS:HE2	101:Am:254:ARG:HD3	1.92	0.52
101:Am:260:TRP:HA	111:Ae:77:TYR:HE2	1.75	0.52
104:Ak:38:CYS:HB2	104:Ak:60:PHE:HE2	1.74	0.52
113:Ah:361:GLU:CD	113:Ah:361:GLU:H	2.17	0.52
118:BL:205:LEU:HD22	118:BL:210:GLN:NE2	2.24	0.52
119:BO:94:PHE:HE2	1:1:1128:U:H3'	1.74	0.52
1:1:1068:A:H2'	1:1:1096:A:H61	1.74	0.52
1:2:208:C:C6	1:2:209:U:O4'	2.63	0.52
1:2:270:U:H2'	1:2:271:U:OP2	2.10	0.52
1:2:294:A:C8	1:2:295:U:H1'	2.45	0.52
1:2:343:C:C6	1:2:343:C:C3'	2.93	0.52
1:2:526:A:H61	15:d:293:GLU:C	2.18	0.52
6:s:31:LEU:HD11	20:u:801:PRO:HB3	1.92	0.52
7:au:44:ARG:NH2	7:au:181:ASP:OD1	2.41	0.52
10:ae:137:VAL:HG22	10:ae:182:ARG:NH2	2.25	0.52
10:ae:247:ALA:O	22:ab:1066:SER:OG	2.20	0.52
10:ae:364:GLY:HA2	13:aj:110:LEU:HD21	1.92	0.52
10:ae:497:SER:O	10:ae:507:ARG:NH2	2.36	0.52
12:ag:389:ASP:HA	12:ag:392:GLU:HB2	1.91	0.52
14:e:174:ARG:HE	14:e:175:VAL:H	1.56	0.52

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
14:e:416:GLU:OE1	22:ab:1059:ARG:NH1	2.28	0.52
15:d:83:LYS:HZ1	42:x:114:SER:HG	1.52	0.52
16:az:118:ARG:NH1	16:az:160:GLU:O	2.30	0.52
18:r:128:LEU:HD11	18:r:253:ALA:HB1	1.92	0.52
19:af:491:ARG:HG2	19:af:502:ARG:NE	2.18	0.52
21:aa:1021:ILE:HG23	26:an:258:MET:HE2	1.91	0.52
23:ak:107:LEU:HB3	24:ac:1119:TYR:HD2	1.75	0.52
24:ac:602:ARG:HA	24:ac:605:VAL:HG12	1.90	0.52
25:ad:243:GLN:HB2	25:ad:246:GLU:OE2	2.10	0.52
25:ad:455:THR:HG22	25:ad:488:LYS:HD2	1.91	0.52
25:ad:588:GLN:HB2	30:as:194:HIS:CG	2.44	0.52
27:ao:62:ARG:HH12	45:o:392:GLN:HE22	1.56	0.52
33:w:100:THR:O	33:w:104:ILE:HG12	2.09	0.52
41:ai:285:ARG:HG2	41:ai:379:LEU:HD13	1.91	0.52
43:i:267:ARG:HB3	43:i:274:TYR:CZ	2.45	0.52
45:o:132:ARG:HD3	50:a:352:PHE:CD1	2.44	0.52
45:o:362:PHE:HZ	50:a:297:VAL:HG21	1.74	0.52
45:o:372:GLU:OE1	52:z:931:LYS:HA	2.09	0.52
56:C:75:PRO:HG2	56:C:76:HIS:CD2	2.44	0.52
77:X:274:LEU:HD11	77:X:278:ARG:HD3	1.92	0.52
79:Z:152:ARG:HD2	79:Z:154:LYS:HE3	1.90	0.52
81:UA:59:UNK:O	81:UA:63:UNK:N	2.43	0.52
82:BB:10:ASP:HB2	1:1:141:A:C6	2.45	0.52
87:BI:158:TYR:HA	87:BI:217:ALA:HB2	1.92	0.52
92:AI:269:PRO:HG3	92:AI:296:HIS:O	2.10	0.52
101:Am:104:LYS:HG3	101:Am:105:LEU:H	1.74	0.52
112:Ac:211:ASP:N	112:Ac:241:ALA:O	2.36	0.52
113:Ah:119:THR:O	113:Ah:123:TRP:HD1	1.92	0.52
113:Ah:131:LEU:HD23	113:Ah:394:VAL:HG11	1.91	0.52
115:Ay:173:LYS:HE2	1:1:962:A:C2	2.44	0.52
1:1:507:U:O2'	1:1:510:U:H4'	2.09	0.52
1:1:554:G:O2'	1:1:555:U:O5'	2.28	0.52
1:1:681:G:N2	1:1:793:C:N3	2.51	0.52
1:1:711:A:O2'	1:1:749:U:O4'	2.26	0.52
1:1:1157:A:O2'	1:1:1158:U:OP1	2.26	0.52
1:2:36:G:O3'	33:w:126:TRP:CZ2	2.63	0.52
1:2:88:U:C5'	47:k:158:HIS:CE1	2.92	0.52
1:2:88:U:HO2'	1:2:89:U:P	2.30	0.52
1:2:107:A:H5''	43:i:363:TYR:CD1	2.45	0.52
1:2:175:U:C2'	48:q:11:GLN:CG	2.87	0.52
1:2:277:U:O2'	1:2:278:A:O4'	2.24	0.52

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:279:U:N3	1:2:328:A:N6	2.57	0.52
1:2:280:A:H4'	43:i:254:ASN:HD21	1.75	0.52
1:2:332:G:C5'	1:2:354:A:C2	2.89	0.52
1:2:423:C:P	1:2:423:C:H6	2.33	0.52
1:2:432:G:C5'	10:ae:15:HIS:N	2.73	0.52
1:2:454:U:O5'	8:am:276:SER:OG	2.27	0.52
1:2:462:G:OP1	2:h:133:HIS:CE1	2.62	0.52
1:2:498:U:H5'	3:aw:4:ALA:HB1	1.91	0.52
1:2:550:C:H2'	1:2:551:A:C8	2.45	0.52
5:f:193:ASP:HA	5:f:196:GLN:HB2	1.91	0.52
7:au:121:GLU:HG2	12:ag:511:ARG:HD3	1.91	0.52
8:am:57:PHE:HE1	53:bd:61:ASN:HD22	1.58	0.52
11:ay:116:PRO:HB3	22:ab:1134:HIS:CE1	2.45	0.52
14:e:308:LYS:HB3	20:u:630:LEU:HD22	1.92	0.52
18:r:270:HIS:HD2	18:r:272:ASP:H	1.58	0.52
20:u:157:LEU:O	20:u:248:ARG:HD2	2.09	0.52
22:ab:1054:ILE:O	22:ab:1057:THR:HG22	2.10	0.52
23:ak:214:ARG:HG2	23:ak:214:ARG:O	2.09	0.52
23:ak:277:GLU:OE2	24:ac:557:LEU:N	2.43	0.52
25:ad:206:TRP:N	25:ad:279:ASN:OD1	2.42	0.52
25:ad:282:VAL:HA	25:ad:285:LEU:HB2	1.92	0.52
26:an:111:LEU:HB3	26:an:115:LYS:HE3	1.92	0.52
26:an:254:TRP:O	26:an:257:TYR:N	2.42	0.52
26:an:293:PRO:HB3	42:x:11:GLU:HG2	1.91	0.52
29:aq:96:GLU:O	29:aq:100:LYS:N	2.43	0.52
30:as:267:GLY:O	35:t:126:TYR:HD1	1.92	0.52
31:at:269:ARG:HH21	31:at:270:GLU:H	1.56	0.52
32:y:27:ALA:HB3	36:p:301:VAL:HA	1.92	0.52
36:p:267:LYS:C	36:p:269:THR:H	2.18	0.52
38:l:225:TYR:HD1	38:l:266:VAL:HG11	1.74	0.52
38:l:241:VAL:O	38:l:245:HIS:HB3	2.08	0.52
40:av:74:HIS:CG	43:i:330:THR:HG23	2.44	0.52
41:ai:279:ASN:HD22	41:ai:282:LEU:HD23	1.74	0.52
45:o:425:GLN:HE21	45:o:481:SER:HA	1.74	0.52
46:c:260:GLU:HA	46:c:305:ARG:HA	1.92	0.52
54:A:387:PHE:CE2	119:BO:93:VAL:HG11	2.44	0.52
55:B:58:ARG:NH2	89:At:144:GLU:OE1	2.43	0.52
55:B:210:GLN:HA	60:G:89:GLN:HE22	1.74	0.52
56:C:52:TRP:O	56:C:56:ALA:N	2.43	0.52
58:E:162:GLN:HG3	58:E:176:ARG:NH1	2.24	0.52
60:G:327:ARG:NH1	86:Al:238:ARG:O	2.43	0.52

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
61:H:11:LEU:HB3	61:H:17:TYR:CE1	2.45	0.52
62:I:59:ARG:NH1	1:1:821:U:OP2	2.42	0.52
67:N:47:ARG:HG3	1:1:90:A:OP1	2.09	0.52
69:P:53:PHE:HB3	69:P:60:ARG:NE	2.25	0.52
70:Q:154:GLU:CD	70:Q:157:ARG:HH21	2.17	0.52
71:R:406:TYR:O	71:R:410:THR:HG22	2.10	0.52
77:X:49:ARG:O	77:X:53:GLN:N	2.43	0.52
77:X:491:GLN:NE2	77:X:500:THR:OG1	2.42	0.52
79:Z:104:LYS:NZ	1:1:552:A:OP2	2.39	0.52
84:Bj:9:VAL:HA	102:Aq:127:ARG:HH12	1.74	0.52
84:Bj:104:MET:HG2	112:Ac:127:MET:SD	2.50	0.52
90:BC:117:THR:HG23	90:BC:120:LEU:H	1.74	0.52
101:Am:180:GLN:O	101:Am:183:VAL:N	2.42	0.52
102:Aq:90:PHE:H	102:Aq:93:GLN:HB2	1.75	0.52
103:BE:36:THR:O	103:BE:38:ASP:N	2.42	0.52
106:Ad:185:ARG:NH2	1:1:185:U:OP2	2.27	0.52
113:Ah:210:GLU:OE1	113:Ah:276:ARG:NE	2.37	0.52
115:Ay:99:GLU:O	115:Ay:103:LEU:HG	2.10	0.52
116:Ag:11:ALA:HA	1:1:291:A:OP2	2.10	0.52
118:BL:84:GLN:HG3	118:BL:291:LYS:HG3	1.91	0.52
1:1:401:U:O2'	1:1:402:U:OP2	2.25	0.52
1:2:42:U:H3'	1:2:43:A:C5'	2.40	0.52
1:2:48:U:H3	33:w:140:ARG:HG3	1.75	0.52
1:2:208:C:H2'	1:2:209:U:H1'	1.90	0.52
1:2:209:U:C2'	1:2:210:U:C4'	2.87	0.52
1:2:480:A:N1	2:h:21:HIS:CD2	2.78	0.52
1:2:516:A:H5'	17:ax:36:MET:SD	2.50	0.52
1:2:521:A:H4'	15:d:345:LYS:C	2.35	0.52
1:2:579:A:H1'	1:2:598:A:H2'	1.90	0.52
2:h:132:VAL:HA	8:am:300:ILE:HD12	1.91	0.52
10:ae:369:VAL:HG11	13:aj:72:HIS:CD2	2.45	0.52
18:r:95:PRO:HA	18:r:249:PRO:HG3	1.92	0.52
18:r:409:LYS:HG2	18:r:434:TRP:HZ3	1.74	0.52
20:u:245:VAL:O	20:u:249:LYS:N	2.43	0.52
21:aa:158:TYR:CE1	21:aa:162:THR:HG21	2.45	0.52
21:aa:296:ILE:O	21:aa:300:MET:HG3	2.10	0.52
21:aa:1034:HIS:CD2	21:aa:1036:HIS:H	2.26	0.52
22:ab:283:MET:HB3	22:ab:287:ARG:NE	2.24	0.52
24:ac:132:ASN:HD22	24:ac:137:HIS:CD2	2.27	0.52
25:ad:229:VAL:HG22	41:ai:156:ILE:HD13	1.91	0.52
25:ad:232:TRP:HA	25:ad:236:CYS:SG	2.49	0.52

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:755:TRP:HZ3	27:ao:29:ARG:HB3	1.74	0.52
26:an:184:VAL:HG23	26:an:187:ARG:HH21	1.75	0.52
30:as:145:ASP:HB2	30:as:168:HIS:CD2	2.44	0.52
30:as:159:GLY:O	30:as:162:THR:OG1	2.23	0.52
30:as:269:TRP:HE1	35:t:120:GLU:HB3	1.74	0.52
38:l:403:SER:O	38:l:406:SER:OG	2.23	0.52
41:ai:239:THR:O	41:ai:264:TYR:HA	2.10	0.52
45:o:363:LEU:HD21	52:z:283:LEU:HD11	1.92	0.52
49:b:6:LEU:HD11	49:b:76:MET:HE1	1.92	0.52
55:B:181:VAL:HG23	55:B:186:LEU:HD21	1.92	0.52
55:B:312:ILE:HD13	89:At:36:LEU:HD12	1.91	0.52
63:J:104:ILE:HG22	63:J:106:ALA:H	1.75	0.52
66:M:12:LEU:HD13	66:M:12:LEU:C	2.34	0.52
66:M:251:TYR:OH	123:UD:72:UNK:HA	2.10	0.52
71:R:348:LEU:HA	85:An:315:MET:HE1	1.91	0.52
71:R:404:TYR:CD2	1:1:60:A:C4	2.98	0.52
78:Y:95:ARG:HH12	112:Ac:278:LYS:HZ2	1.58	0.52
80:BA:22:PRO:O	80:BA:26:LYS:HB2	2.09	0.52
95:Aa:100:LEU:HD21	95:Aa:106:LEU:HB2	1.92	0.52
96:Ao:238:ARG:HG2	105:BP:98:PRO:CB	2.40	0.52
104:Ak:26:ARG:HB2	104:Ak:28:GLU:OE1	2.10	0.52
108:Av:57:TYR:HB3	108:Av:64:ARG:HH11	1.75	0.52
113:Ah:81:LEU:HD22	113:Ah:84:ARG:NH2	2.24	0.52
113:Ah:270:HIS:HB3	113:Ah:274:ARG:CZ	2.40	0.52
113:Ah:369:PRO:HA	113:Ah:372:ALA:HB3	1.92	0.52
116:Ag:129:TYR:HD2	125:Ag:301:NAD:O4B	1.92	0.52
1:1:225:U:H2'	1:1:226:A:C8	2.41	0.52
1:1:639:A:H61	1:1:799:A:N6	2.07	0.52
1:1:697:A:H4'	1:1:698:G:OP2	2.10	0.52
1:1:871:A:N7	1:1:1064:G:O2'	2.42	0.52
1:1:1131:A:H61	1:1:1147:A:H61	1.56	0.52
1:2:422:U:N3	13:aj:52:TYR:HB2	2.01	0.52
1:2:424:U:O5'	13:aj:233:ARG:CD	2.56	0.52
1:2:436:U:C2	6:s:152:PHE:CA	2.80	0.52
1:2:437:U:C6	6:s:151:ARG:HB2	2.45	0.52
1:2:510:A:C5	3:aw:21:ASP:CB	2.93	0.52
1:2:511:U:O2	1:2:511:U:C2'	2.57	0.52
1:2:514:U:C5'	16:az:17:VAL:CG2	2.88	0.52
4:m:52:ALA:N	4:m:61:GLU:O	2.40	0.52
4:m:84:ASN:OD1	4:m:87:ARG:NH1	2.33	0.52
7:au:154:GLN:O	7:au:156:TYR:N	2.38	0.52

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
10:ae:442:ILE:HG21	10:ae:479:LEU:HB3	1.91	0.52
12:ag:203:LEU:HB2	12:ag:214:ILE:HD11	1.92	0.52
13:aj:21:PRO:HB2	14:e:73:TRP:CZ2	2.45	0.52
13:aj:49:PRO:HG2	24:ac:1260:GLU:HB2	1.92	0.52
14:e:68:GLN:HE22	14:e:87:ARG:N	2.06	0.52
18:r:147:ASN:HB2	18:r:149:LYS:HG2	1.92	0.52
20:u:567:TYR:CE2	22:ab:609:ARG:HD3	2.45	0.52
20:u:628:GLY:H	20:u:629:VAL:HG23	1.74	0.52
21:aa:475:ARG:HD3	27:ao:207:ARG:HE	1.75	0.52
21:aa:698:ARG:HH12	21:aa:700:VAL:HG23	1.75	0.52
21:aa:1382:LEU:HD13	21:aa:1622:TYR:HD1	1.74	0.52
22:ab:159:GLY:H	22:ab:160:PRO:HD2	1.75	0.52
22:ab:1105:TRP:O	22:ab:1109:GLN:HG3	2.09	0.52
28:ap:230:GLY:HA2	52:z:750:PHE:CE2	2.46	0.52
32:y:51:HIS:CD2	32:y:58:LEU:HD13	2.45	0.52
33:w:162:PRO:HB2	33:w:167:ILE:HD13	1.91	0.52
38:l:213:VAL:O	38:l:318:ILE:HD11	2.09	0.52
39:ar:31:THR:HB	39:ar:34:SER:HB2	1.92	0.52
40:av:130:ASN:OD1	40:av:131:GLN:N	2.43	0.52
50:a:304:LEU:HA	50:a:307:MET:HE3	1.92	0.52
54:A:207:HIS:HD2	54:A:329:TYR:OH	1.93	0.52
55:B:5:ARG:H	95:Aa:182:PRO:HG2	1.75	0.52
56:C:125:GLU:OE1	56:C:126:ARG:HG3	2.10	0.52
58:E:164:SER:OG	58:E:167:LYS:O	2.28	0.52
60:G:153:LEU:HD13	60:G:153:LEU:O	2.10	0.52
60:G:209:ARG:HD3	1:1:190:A:H2	1.75	0.52
65:L:97:SER:HB3	65:L:104:LEU:HD12	1.91	0.52
74:U:18:LEU:CD2	74:U:19:LYS:H	2.23	0.52
75:V:10:PRO:N	75:V:14:CYS:HA	2.25	0.52
87:BI:86:ILE:HG21	87:BI:243:ILE:HD11	1.92	0.52
92:Ai:39:ILE:HD11	92:Ai:44:VAL:HB	1.92	0.52
92:Ai:69:PRO:HG3	92:Ai:213:LEU:HD11	1.91	0.52
92:Ai:375:ASP:OD1	92:Ai:376:VAL:N	2.42	0.52
97:BM:71:ARG:O	97:BM:75:VAL:HG23	2.10	0.52
99:Aj:284:LEU:HA	99:Aj:287:ILE:HG12	1.92	0.52
108:Av:162:LYS:NZ	1:1:461:U:O4'	2.43	0.52
119:BO:107:LYS:HG3	119:BO:108:GLY:N	2.25	0.52
119:BO:176:HIS:CD2	119:BO:178:TYR:H	2.27	0.52
1:1:235:G:C2	1:1:236:A:C5	2.98	0.52
1:1:248:U:N3	1:1:250:A:N1	2.58	0.52
1:1:681:G:H1	1:1:793:C:N4	2.08	0.52

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:828:A:H2	1:1:1099:A:H62	1.58	0.52
1:2:32:A:H2'	1:2:33:A:C5'	2.40	0.51
1:2:65:U:O2'	1:2:65:U:O2	2.27	0.51
1:2:279:U:C2	1:2:328:A:N1	2.78	0.51
1:2:426:U:O2	1:2:426:U:C2'	2.58	0.51
1:2:512:G:C1'	16:az:141:VAL:CG2	2.60	0.51
3:aw:108:GLN:NE2	3:aw:122:TYR:HB2	2.25	0.51
5:f:138:ARG:NH2	5:f:140:TRP:HE1	2.08	0.51
7:au:158:HIS:CE1	23:ak:4:ARG:HE	2.28	0.51
9:n:83:LEU:HB2	9:n:88:TYR:HE1	1.75	0.51
12:ag:108:VAL:HA	12:ag:111:MET:HE3	1.92	0.51
15:d:71:ASP:O	32:y:46:ARG:NH1	2.42	0.51
19:af:388:PHE:CZ	19:af:390:ALA:HB3	2.45	0.51
20:u:37:HIS:NE2	22:ab:254:ASP:OD1	2.43	0.51
21:aa:199:ASN:O	21:aa:205:THR:OG1	2.23	0.51
21:aa:407:LYS:HB2	27:ao:161:TYR:HE1	1.76	0.51
21:aa:581:THR:HA	21:aa:584:SER:HB3	1.92	0.51
21:aa:941:ARG:NH1	50:a:328:ASN:OD1	2.43	0.51
22:ab:63:TYR:OH	22:ab:160:PRO:O	2.17	0.51
22:ab:118:ARG:NE	38:l:134:LEU:O	2.42	0.51
23:ak:56:ARG:HH22	23:ak:60:GLU:HB2	1.74	0.51
24:ac:133:ASP:HB3	24:ac:136:VAL:HG12	1.91	0.51
24:ac:1191:ALA:O	24:ac:1195:MET:HG3	2.09	0.51
37:j:24:ALA:HB2	37:j:52:HIS:CE1	2.44	0.51
38:l:130:LYS:HB2	38:l:134:LEU:HD12	1.92	0.51
38:l:667:ASP:HB3	38:l:671:TRP:CZ3	2.45	0.51
39:ar:164:ARG:HG3	39:ar:253:ASP:HB2	1.92	0.51
40:av:68:LEU:HG	40:av:70:GLU:H	1.75	0.51
47:k:151:ARG:NH2	47:k:152:LYS:O	2.43	0.51
52:z:280:THR:HG21	52:z:373:SER:HB2	1.91	0.51
54:A:60:HIS:CD2	54:A:65:SER:HB3	2.45	0.51
55:B:127:TYR:CD1	55:B:189:PRO:HG2	2.45	0.51
56:C:102:ILE:HG13	70:Q:83:ARG:HE	1.75	0.51
58:E:221:HIS:O	58:E:225:TYR:N	2.35	0.51
71:R:297:GLN:HB3	71:R:303:ASN:O	2.10	0.51
79:Z:152:ARG:HH11	79:Z:154:LYS:HE3	1.75	0.51
84:Bj:109:ARG:N	90:BC:130:ASP:OD2	2.43	0.51
86:Al:124:THR:HA	86:Al:185:CYS:HA	1.92	0.51
87:BI:117:THR:HG22	87:BI:265:LYS:HB2	1.92	0.51
95:Aa:173:GLY:O	95:Aa:175:LEU:N	2.40	0.51
98:Ar:113:ARG:HG3	98:Ar:122:LEU:HD11	1.92	0.51

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
101:Am:100:PRO:HG2	101:Am:101:TYR:CD2	2.45	0.51
113:Ah:457:PHE:HB3	113:Ah:461:ARG:HH12	1.75	0.51
114:BD:31:ASN:ND2	114:BD:34:LEU:HG	2.24	0.51
116:Ag:11:ALA:HB1	1:1:291:A:C8	2.44	0.51
118:BL:236:ILE:HG13	118:BL:267:PHE:HZ	1.75	0.51
119:BO:68:CYS:H	119:BO:76:HIS:HB2	1.75	0.51
1:2:67:A:OP1	35:t:34:HIS:ND1	2.43	0.51
1:2:179:G:N7	33:w:102:ARG:HD3	2.25	0.51
1:2:243:A:C6	8:am:25:VAL:CG2	2.92	0.51
1:2:303:G:C8	1:2:303:G:P	3.02	0.51
1:2:316:A:C3'	1:2:317:U:C4'	2.85	0.51
1:2:405:C:O4'	3:aw:22:HIS:HD2	1.94	0.51
1:2:423:C:P	1:2:423:C:O4'	2.68	0.51
1:2:437:U:H5'	1:2:437:U:O2	2.09	0.51
1:2:451:G:OP1	14:e:390:MET:HG2	2.10	0.51
1:2:497:A:P	3:aw:3:ASP:HA	2.50	0.51
4:m:18:MET:HE1	52:z:779:ALA:O	2.10	0.51
5:f:226:LEU:HD22	49:b:46:ARG:HB3	1.92	0.51
14:e:308:LYS:HB3	20:u:630:LEU:HD13	1.91	0.51
14:e:449:PHE:CE2	14:e:477:PRO:HB3	2.45	0.51
18:r:81:ARG:N	18:r:84:SER:OG	2.42	0.51
19:af:619:TRP:CD1	19:af:741:CYS:HG	2.28	0.51
20:u:117:ALA:HB3	22:ab:525:ASN:HB3	1.92	0.51
21:aa:310:CYS:HB2	21:aa:342:HIS:HD2	1.74	0.51
21:aa:912:THR:HG21	21:aa:915:ARG:NH2	2.25	0.51
21:aa:1431:ASP:HB3	21:aa:1437:PHE:HB3	1.92	0.51
24:ac:612:GLN:HB2	24:ac:616:LEU:HD13	1.93	0.51
25:ad:591:TRP:CZ3	25:ad:596:LEU:HD11	2.45	0.51
25:ad:725:PRO:HG2	41:ai:58:ALA:HB2	1.91	0.51
38:l:12:TYR:HB2	38:l:17:LEU:HD13	1.92	0.51
38:l:103:LEU:HD23	38:l:106:PHE:HD2	1.74	0.51
39:ar:166:ARG:NH1	43:i:346:THR:O	2.36	0.51
39:ar:205:LEU:HG	39:ar:207:VAL:HG23	1.92	0.51
49:b:23:ARG:HH11	85:An:151:GLU:HG3	1.75	0.51
52:z:566:LEU:HD11	52:z:575:LYS:NZ	2.24	0.51
54:A:152:ASP:OD2	62:I:11:ARG:NH1	2.43	0.51
61:H:117:THR:OG1	61:H:118:THR:N	2.44	0.51
62:I:42:GLU:HB3	62:I:45:MET:CG	2.40	0.51
69:P:55:GLN:HG2	1:1:949:U:O2	2.10	0.51
78:Y:132:LEU:HD12	112:Ac:61:LYS:HD2	1.92	0.51
84:Bj:150:VAL:O	84:Bj:154:CYS:N	2.42	0.51

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
87:BI:152:HIS:CE1	87:BI:162:GLY:HA2	2.46	0.51
91:Ab:240:ARG:NH1	1:1:473:U:O4	2.43	0.51
92:AI:5:SER:OG	92:AI:409:VAL:HB	2.11	0.51
92:AI:101:PRO:HB3	92:AI:273:THR:HG21	1.91	0.51
99:AJ:341:ASN:ND2	1:1:356:A:N7	2.57	0.51
103:BE:72:ASN:H	111:Ae:132:HIS:HB2	1.74	0.51
104:AK:47:ALA:O	104:AK:50:SER:OG	2.27	0.51
1:1:1074:A:H1'	1:1:1075:A:P	2.50	0.51
1:2:33:A:C5	1:2:169:U:C2	2.98	0.51
1:2:189:A:H2'	1:2:190:A:C2'	2.39	0.51
1:2:225:G:N1	1:2:248:C:C2	2.38	0.51
1:2:303:G:C3'	1:2:304:U:H5''	2.41	0.51
1:2:481:U:C4	2:h:24:PHE:CE2	2.98	0.51
1:2:504:A:OP2	6:s:79:GLY:HA2	2.10	0.51
1:2:592:U:H2'	1:2:593:U:O4'	2.09	0.51
2:h:22:THR:HA	2:h:97:ALA:HB2	1.92	0.51
4:m:183:PHE:HZ	5:f:224:LEU:HA	1.74	0.51
6:s:112:MET:HE3	6:s:113:TYR:CE2	2.45	0.51
10:ae:67:TYR:CZ	10:ae:145:VAL:HG21	2.44	0.51
12:ag:176:ALA:O	12:ag:180:GLU:N	2.42	0.51
12:ag:291:GLN:HA	12:ag:294:VAL:HG12	1.92	0.51
14:e:62:PRO:O	14:e:69:TYR:OH	2.28	0.51
19:af:205:ASN:ND2	19:af:235:THR:OG1	2.40	0.51
20:u:547:LYS:O	20:u:551:GLU:HG3	2.11	0.51
21:aa:165:ARG:HH22	48:q:96:GLN:CD	2.18	0.51
21:aa:876:ARG:NH2	21:aa:909:GLY:O	2.43	0.51
23:ak:268:GLU:OE1	24:ac:1172:GLN:NE2	2.44	0.51
24:ac:189:TYR:O	24:ac:192:THR:OG1	2.25	0.51
24:ac:1063:ARG:HD3	38:l:531:SER:O	2.10	0.51
25:ad:764:ARG:NH2	25:ad:766:GLN:OE1	2.23	0.51
27:ao:199:LEU:HD21	27:ao:208:PRO:HG3	1.91	0.51
29:aq:172:GLU:HG3	29:aq:173:HIS:CE1	2.46	0.51
32:y:33:SER:O	32:y:37:SER:N	2.42	0.51
35:t:151:THR:HA	35:t:156:SER:HA	1.91	0.51
41:ai:187:ILE:HD12	41:ai:190:ILE:HB	1.91	0.51
46:c:188:LEU:HD22	46:c:236:LEU:HD11	1.91	0.51
46:c:270:MET:O	46:c:277:ASN:N	2.33	0.51
52:z:450:PHE:CD1	52:z:515:ALA:HB2	2.45	0.51
52:z:1056:ASP:HA	52:z:1059:ARG:HE	1.75	0.51
57:D:85:ASP:OD1	57:D:86:PHE:N	2.44	0.51
69:P:112:ARG:NH1	100:BH:219:LYS:HG2	2.26	0.51

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
71:R:412:LYS:HD3	71:R:451:CYS:HB3	1.92	0.51
75:V:119:GLN:NE2	75:V:123:LEU:HD21	2.25	0.51
77:X:141:ARG:HH11	106:Ad:20:LEU:HD11	1.75	0.51
77:X:481:LEU:HD12	77:X:482:PRO:HD2	1.93	0.51
78:Y:46:GLU:OE1	84:Bj:45:THR:N	2.44	0.51
85:An:130:LEU:O	85:An:133:VAL:HG12	2.11	0.51
88:Az:32:LYS:HZ2	1:1:66:U:H5'	1.74	0.51
89:At:108:MET:HA	89:At:111:LEU:HB2	1.91	0.51
95:Aa:44:PHE:H	95:Aa:45:GLY:CA	2.23	0.51
95:Aa:152:ILE:HD13	95:Aa:157:LEU:HD13	1.92	0.51
97:BM:148:ALA:HB1	97:BM:255:ARG:HH11	1.75	0.51
108:Av:19:LYS:HA	1:1:439:A:N6	2.25	0.51
113:Ah:51:LYS:O	113:Ah:52:ALA:HB3	2.09	0.51
1:1:509:U:O2	1:1:513:U:O2'	2.26	0.51
1:1:760:A:OP2	1:1:1079:A:O2'	2.17	0.51
1:2:38:U:P	33:w:126:TRP:CE2	2.85	0.51
1:2:201:A:OP2	31:at:228:HIS:CB	2.55	0.51
1:2:236:U:H2'	1:2:237:U:C5	2.46	0.51
1:2:283:U:O5'	43:i:247:ILE:CD1	2.59	0.51
1:2:385:U:C2	1:2:539:G:C5	2.98	0.51
1:2:456:A:H2	14:e:58:ASN:ND2	2.08	0.51
1:2:462:G:C8	8:am:298:ARG:NH1	2.78	0.51
1:2:468:G:H2'	1:2:469:C:C6	2.45	0.51
2:h:77:ASN:CG	10:ae:97:LEU:HG	2.36	0.51
14:e:466:LEU:HB3	14:e:467:PHE:CD1	2.45	0.51
14:e:584:ALA:HB1	14:e:596:ILE:HG13	1.93	0.51
18:r:193:LEU:HA	18:r:241:GLU:CD	2.35	0.51
20:u:327:VAL:HG12	20:u:617:ILE:HD12	1.92	0.51
21:aa:137:LEU:HB2	43:i:305:TRP:NE1	2.25	0.51
21:aa:650:CYS:HG	21:aa:658:SER:HG	1.54	0.51
21:aa:781:LEU:HD22	21:aa:791:TYR:OH	2.11	0.51
21:aa:912:THR:HA	45:o:279:LYS:O	2.10	0.51
21:aa:1288:SER:OG	21:aa:1292:ARG:NH2	2.42	0.51
22:ab:230:ARG:HD3	22:ab:233:GLU:OE2	2.10	0.51
22:ab:486:PHE:CE2	22:ab:488:LEU:HB3	2.45	0.51
22:ab:494:GLU:OE2	22:ab:497:GLU:HG3	2.10	0.51
24:ac:1260:GLU:HG2	24:ac:1261:ARG:H	1.74	0.51
25:ad:603:TYR:CE2	25:ad:615:LEU:HG	2.46	0.51
26:an:183:GLU:OE2	26:an:186:ARG:NH2	2.43	0.51
29:aq:72:SER:O	29:aq:76:HIS:N	2.42	0.51
38:l:210:SER:HA	38:l:213:VAL:HG12	1.93	0.51

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
39:ar:76:LEU:HD23	39:ar:121:MET:HE3	1.92	0.51
40:av:176:LEU:C	40:av:181:GLU:HG2	2.36	0.51
42:x:125:ALA:O	42:x:129:HIS:N	2.40	0.51
47:k:134:ASP:OD1	47:k:134:ASP:N	2.36	0.51
49:b:23:ARG:HD2	85:An:150:PHE:CZ	2.41	0.51
52:z:702:GLU:O	52:z:706:ARG:HG2	2.11	0.51
53:bd:53:ILE:HA	53:bd:80:ILE:HG22	1.93	0.51
54:A:84:THR:OG1	103:BE:89:GLU:OE2	2.26	0.51
55:B:14:PRO:HG2	66:M:105:VAL:HG12	1.91	0.51
59:F:58:LYS:HG3	59:F:59:ASP:OD1	2.10	0.51
62:I:57:LYS:NZ	1:1:819:U:OP2	2.44	0.51
64:K:29:ARG:HG3	1:1:42:A:OP1	2.11	0.51
68:O:217:LYS:HD3	68:O:228:GLU:HA	1.93	0.51
69:P:59:SER:C	69:P:60:ARG:HG3	2.36	0.51
69:P:143:VAL:HG11	96:Ao:210:ARG:HA	1.93	0.51
71:R:322:HIS:CG	89:At:86:ARG:HG3	2.45	0.51
74:U:45:ALA:O	74:U:47:THR:N	2.35	0.51
84:Bj:100:PRO:HD3	112:Ac:117:PHE:CD1	2.45	0.51
94:Au:145:ARG:HD2	107:BF:27:ARG:NH1	2.25	0.51
99:Aj:222:GLU:N	99:Aj:222:GLU:OE1	2.43	0.51
101:Am:260:TRP:HA	111:Ae:77:TYR:CE2	2.45	0.51
104:Ak:22:HIS:CD2	104:Ak:177:VAL:HG21	2.44	0.51
106:Ad:26:ALA:O	106:Ad:28:THR:N	2.43	0.51
117:Ax:100:PRO:HG2	117:Ax:103:VAL:HB	1.93	0.51
117:Ax:180:ARG:NH1	1:1:241:U:OP1	2.43	0.51
1:1:766:A:H2'	1:1:767:U:O4'	2.11	0.51
1:1:1113:G:C6	1:1:1114:A:C2	2.98	0.51
1:1:1121:U:O2'	1:1:1122:A:O5'	2.29	0.51
1:2:46:U:C5'	1:2:46:U:C6	2.86	0.51
1:2:166:G:O3'	1:2:167:U:H4'	2.08	0.51
1:2:182:A:O5'	33:w:98:LEU:HD13	2.10	0.51
1:2:195:A:H3'	1:2:195:A:C8	2.46	0.51
1:2:228:G:C8	1:2:242:U:C6	2.98	0.51
1:2:250:A:HO2'	1:2:251:U:C4'	2.16	0.51
1:2:332:G:O4'	1:2:354:A:C2	2.64	0.51
1:2:396:A:H4'	1:2:530:A:C4	2.46	0.51
1:2:412:G:C5	10:ae:54:GLY:N	2.77	0.51
1:2:446:G:O6	12:ag:19:ARG:NE	2.43	0.51
1:2:484:A:O2'	9:n:102:ARG:HB2	2.09	0.51
1:2:607:U:HO2'	1:2:608:U:P	2.23	0.51
8:am:57:PHE:HZ	14:e:42:GLU:HB2	1.74	0.51

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
10:ae:154:ASN:OD1	10:ae:155:ALA:N	2.43	0.51
10:ae:402:MET:HE1	10:ae:489:ALA:HA	1.92	0.51
10:ae:534:PRO:HD3	12:ag:255:ARG:HH12	1.75	0.51
19:af:469:VAL:O	19:af:472:SER:OG	2.16	0.51
22:ab:484:GLU:OE2	22:ab:823:ARG:NH1	2.44	0.51
23:ak:189:ARG:NH2	24:ac:129:ARG:HB2	2.25	0.51
24:ac:374:ARG:HH11	24:ac:505:PHE:HZ	1.59	0.51
24:ac:377:GLN:HB3	24:ac:383:TYR:CD1	2.45	0.51
25:ad:174:HIS:CE1	25:ad:207:PRO:HA	2.43	0.51
26:an:12:ARG:HH22	26:an:25:GLU:HG3	1.75	0.51
26:an:181:VAL:HA	26:an:184:VAL:HG12	1.92	0.51
29:aq:206:TYR:HB2	29:aq:215:ARG:HG2	1.91	0.51
31:at:208:ASP:OD2	31:at:234:LYS:N	2.43	0.51
32:y:175:ARG:HH22	32:y:177:LEU:HD13	1.76	0.51
34:v:94:ARG:HE	34:v:124:CYS:HB3	1.74	0.51
38:l:257:HIS:N	38:l:350:ARG:O	2.43	0.51
38:l:320:ALA:O	38:l:324:CYS:N	2.39	0.51
50:a:406:LEU:H	50:a:406:LEU:HD23	1.75	0.51
52:z:673:ASP:OD1	52:z:673:ASP:N	2.28	0.51
55:B:402:HIS:N	55:B:403:PRO:CD	2.74	0.51
55:B:407:GLU:HB3	86:Al:287:TRP:CE2	2.46	0.51
59:F:114:LYS:O	59:F:118:ARG:HG3	2.09	0.51
60:G:65:VAL:HG13	83:Aw:186:ASP:HB2	1.91	0.51
64:K:67:ASP:O	64:K:71:HIS:N	2.42	0.51
64:K:176:THR:O	64:K:179:TRP:N	2.43	0.51
77:X:142:ALA:O	77:X:146:GLN:N	2.36	0.51
77:X:326:PRO:C	77:X:328:PRO:HD3	2.35	0.51
83:Aw:8:ARG:CB	86:Al:287:TRP:CZ2	2.93	0.51
91:Ab:52:TRP:NE1	1:1:509:U:N3	2.57	0.51
92:Ai:213:LEU:HD12	102:Aq:40:LEU:HD11	1.92	0.51
94:Au:21:PRO:O	117:Ax:180:ARG:NH2	2.38	0.51
94:Au:127:ARG:O	1:1:549:C:N4	2.44	0.51
97:BM:46:ARG:HH21	97:BM:50:LYS:NZ	2.08	0.51
102:Aq:46:ARG:NH2	102:Aq:53:SER:O	2.42	0.51
119:BO:80:ILE:HD13	119:BO:100:ARG:NH1	2.25	0.51
1:2:44:A:C5'	29:aq:26:ALA:H	2.22	0.51
1:2:57:U:H6	1:2:91:U:O2	1.92	0.51
1:2:109:U:HO2'	1:2:110:A:C1'	2.16	0.51
1:2:139:U:O2'	1:2:141:A:N7	2.36	0.51
1:2:247:U:C5'	1:2:247:U:C6	2.85	0.51
1:2:492:U:O2	1:2:492:U:C2'	2.58	0.51

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:497:A:H5'	3:aw:15:ARG:HH12	1.71	0.51
2:h:67:LEU:HD22	14:e:686:LEU:HD11	1.93	0.51
8:am:219:SER:OG	8:am:220:TYR:N	2.44	0.51
10:ae:199:VAL:HG12	10:ae:203:GLN:HE21	1.75	0.51
12:ag:400:MET:HE1	12:ag:406:MET:HE2	1.91	0.51
14:e:300:VAL:HG23	14:e:322:VAL:HG21	1.91	0.51
14:e:303:PHE:HB3	14:e:317:TYR:CD2	2.46	0.51
15:d:153:ARG:NH2	19:af:185:GLU:O	2.42	0.51
19:af:282:HIS:HB3	36:p:198:HIS:CD2	2.46	0.51
19:af:486:LEU:HG	19:af:490:LEU:HD13	1.91	0.51
19:af:636:ALA:HB2	19:af:756:GLN:HA	1.92	0.51
22:ab:68:PHE:HA	22:ab:72:GLY:H	1.74	0.51
25:ad:641:ASP:O	25:ad:645:ILE:HG12	2.11	0.51
25:ad:732:MET:C	25:ad:734:GLY:H	2.19	0.51
28:ap:61:LEU:O	28:ap:104:VAL:HG21	2.10	0.51
32:y:135:TYR:O	32:y:137:SER:N	2.39	0.51
36:p:25:ASN:ND2	36:p:66:GLN:OE1	2.44	0.51
37:j:40:LYS:HA	37:j:71:HIS:CE1	2.45	0.51
38:l:145:ASP:OD1	38:l:246:ARG:NH2	2.44	0.51
38:l:222:TYR:O	38:l:225:TYR:HB3	2.10	0.51
39:ar:76:LEU:HD12	39:ar:118:LEU:HB2	1.92	0.51
42:x:74:ARG:HH12	42:x:75:LYS:HG3	1.74	0.51
43:i:160:TYR:CD2	43:i:174:PRO:HB3	2.45	0.51
43:i:171:PHE:HB2	43:i:173:VAL:HG23	1.92	0.51
49:b:34:GLY:HA3	49:b:71:MET:HG2	1.93	0.51
50:a:54:GLU:O	50:a:57:THR:HG23	2.10	0.51
50:a:255:ASN:C	50:a:257:LYS:H	2.19	0.51
50:a:405:ASP:HA	52:z:1031:LYS:HD3	1.93	0.51
54:A:392:LEU:HD13	63:J:64:TYR:HD2	1.74	0.51
55:B:33:HIS:ND1	55:B:34:PRO:HD2	2.26	0.51
56:C:122:TRP:O	113:Ah:49:SER:HA	2.11	0.51
71:R:195:TYR:OH	71:R:199:ARG:HD2	2.11	0.51
73:T:72:TRP:CD1	73:T:83:PRO:HD2	2.46	0.51
86:Al:267:ASP:CG	86:Al:267:ASP:O	2.53	0.51
90:BC:29:THR:OG1	90:BC:34:GLU:O	2.28	0.51
96:Ao:28:ARG:O	1:1:334:A:O2'	2.24	0.51
97:BM:298:ALA:O	97:BM:302:MET:HE2	2.10	0.51
98:Ar:151:ARG:HE	98:Ar:153:LYS:HD3	1.75	0.51
99:Aj:343:ASN:ND2	1:1:333:A:N7	2.57	0.51
102:Aq:336:ARG:CG	102:Aq:336:ARG:NH1	2.52	0.51
104:Ak:132:LEU:HA	104:Ak:168:GLU:HG2	1.92	0.51

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
111:Ae:264:TRP:CE3	111:Ae:265:LEU:HD23	2.46	0.51
1:1:969:U:H2'	1:1:970:A:C8	2.45	0.51
1:2:39:U:H5	33:w:129:TYR:CE2	2.29	0.51
1:2:65:U:C1'	1:2:66:U:H5'	2.36	0.51
1:2:422:U:C4	13:aj:52:TYR:CD1	2.97	0.51
1:2:491:U:C6	14:e:383:THR:O	2.63	0.51
1:2:529:A:O2'	16:az:72:LYS:N	2.43	0.51
5:f:138:ARG:CZ	5:f:140:TRP:HE1	2.24	0.51
8:am:106:LEU:O	8:am:111:ARG:NH2	2.43	0.51
8:am:215:ARG:HD3	15:d:178:PHE:HE2	1.76	0.51
11:ay:77:VAL:HG23	11:ay:145:ASN:O	2.11	0.51
14:e:451:THR:O	14:e:451:THR:OG1	2.28	0.51
14:e:702:PRO:HG2	22:ab:1115:TRP:HH2	1.75	0.51
19:af:660:PHE:HD2	19:af:749:MET:HE3	1.75	0.51
21:aa:1521:LEU:HB2	26:an:194:TRP:CH2	2.46	0.51
22:ab:1167:THR:HG22	22:ab:1169:ILE:H	1.75	0.51
24:ac:115:ILE:HD13	24:ac:617:LEU:HD23	1.92	0.51
24:ac:688:GLU:HA	38:l:317:PRO:HB3	1.91	0.51
24:ac:745:GLY:HA2	24:ac:870:ASP:HA	1.93	0.51
27:ao:20:ASP:OD1	27:ao:21:TYR:N	2.44	0.51
27:ao:21:TYR:CZ	27:ao:34:VAL:HG21	2.45	0.51
32:y:200:GLU:OE2	42:x:222:HIS:HB3	2.11	0.51
33:w:45:ILE:HD13	33:w:84:MET:HB3	1.92	0.51
36:p:112:TYR:OH	42:x:100:GLU:O	2.28	0.51
38:l:99:GLN:O	38:l:103:LEU:HG	2.11	0.51
39:ar:44:ARG:NH2	40:av:128:ILE:O	2.31	0.51
39:ar:262:CYS:SG	39:ar:275:VAL:HA	2.51	0.51
50:a:392:LEU:HB3	50:a:396:LEU:HD23	1.91	0.51
52:z:444:LEU:HD11	52:z:796:LEU:HD13	1.91	0.51
54:A:393:VAL:HG12	119:BO:180:LEU:HD23	1.92	0.51
58:E:136:THR:HA	58:E:146:CYS:SG	2.51	0.51
60:G:193:GLU:OE2	83:Aw:96:ARG:NH2	2.43	0.51
62:I:156:ASP:OD1	62:I:156:ASP:N	2.40	0.51
63:J:103:TRP:HE1	119:BO:144:GLN:NE2	2.09	0.51
66:M:145:LYS:O	66:M:148:ILE:HG12	2.11	0.51
75:V:43:ARG:NH1	1:1:97:U:O2	2.44	0.51
77:X:249:LYS:HB2	77:X:253:HIS:HA	1.92	0.51
83:Aw:50:ARG:HD3	83:Aw:83:LEU:HD13	1.92	0.51
85:An:167:PHE:HE2	85:An:174:LEU:HD21	1.76	0.51
98:Ar:147:LEU:HD21	105:BP:141:TYR:HE2	1.76	0.51
104:Ak:135:ASN:HD22	104:Ak:168:GLU:HG3	1.74	0.51

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
104:Ak:164:ARG:HH11	104:Ak:198:LEU:HD11	1.76	0.51
112:Ac:189:LYS:HD2	112:Ac:200:ARG:HH12	1.75	0.51
117:Ax:173:ARG:HH11	117:Ax:173:ARG:CG	2.18	0.51
1:1:572:A:H4'	1:1:573:A:OP2	2.10	0.51
1:1:575:G:H5'	1:1:576:A:OP2	2.11	0.51
1:1:1037:C:N4	1:1:1127:U:OP2	2.43	0.51
1:1:1077:G:H1	1:1:1090:U:H3	1.58	0.51
1:2:1:G:C1'	25:ad:705:GLY:O	2.59	0.51
1:2:26:U:P	1:2:27:U:H5'	2.51	0.51
1:2:52:U:C5	1:2:167:U:C5	2.99	0.51
1:2:158:U:H1'	29:aq:17:PRO:HA	1.93	0.51
1:2:342:A:C8	1:2:342:A:C5'	2.85	0.51
1:2:359:A:H8	1:2:359:A:O5'	1.93	0.51
1:2:384:U:H4'	50:a:155:SER:C	2.36	0.51
1:2:456:A:C2	14:e:58:ASN:ND2	2.79	0.51
2:h:50:ASN:HB3	14:e:718:PRO:HG2	1.91	0.51
3:aw:27:ARG:HH22	14:e:792:GLN:HG2	1.75	0.51
7:au:233:HIS:CE1	7:au:238:PRO:HA	2.46	0.51
8:am:189:LEU:HD11	8:am:194:ALA:HB2	1.93	0.51
9:n:83:LEU:HG	22:ab:1112:ARG:O	2.11	0.51
12:ag:283:PHE:CD1	12:ag:316:HIS:HB2	2.45	0.51
16:az:66:LYS:O	16:az:69:HIS:ND1	2.41	0.51
20:u:80:LYS:HB2	20:u:83:GLU:HG2	1.93	0.51
21:aa:277:TYR:O	21:aa:281:GLN:NE2	2.44	0.51
21:aa:862:ASP:OD1	21:aa:862:ASP:N	2.44	0.51
21:aa:942:ASP:OD2	50:a:329:ARG:NH1	2.43	0.51
24:ac:840:THR:OG1	24:ac:842:SER:O	2.28	0.51
25:ad:348:HIS:HE1	30:as:30:PRO:HG3	1.75	0.51
25:ad:591:TRP:HH2	25:ad:623:THR:HG22	1.76	0.51
35:t:119:GLU:O	35:t:123:GLN:HG2	2.11	0.51
38:l:12:TYR:HD1	38:l:16:TYR:HE2	1.57	0.51
38:l:667:ASP:OD1	38:l:670:ARG:NH2	2.32	0.51
39:ar:77:SER:HB3	39:ar:116:VAL:O	2.11	0.51
49:b:129:TRP:CE3	49:b:133:VAL:HG11	2.45	0.51
52:z:628:VAL:O	52:z:632:GLN:N	2.26	0.51
59:F:95:PRO:HG2	111:Ae:63:ALA:HB3	1.93	0.51
61:H:45:ILE:HD11	61:H:157:PRO:O	2.11	0.51
64:K:20:LEU:HD21	95:Aa:185:VAL:O	2.11	0.51
68:O:107:ALA:O	68:O:108:ARG:HG3	2.11	0.51
69:P:62:PRO:HG3	69:P:72:MET:HE1	1.91	0.51
70:Q:115:ASP:OD2	70:Q:163:ARG:NH2	2.43	0.51

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
71:R:190:GLN:HG2	71:R:194:GLN:HE22	1.75	0.51
71:R:301:PHE:HE2	89:At:103:ALA:HA	1.75	0.51
74:U:92:PHE:HE2	1:1:965:G:H21	1.58	0.51
75:V:53:ARG:HH21	75:V:109:ARG:NH1	2.08	0.51
77:X:440:GLU:HG2	106:Ad:42:LEU:HD22	1.91	0.51
77:X:504:ALA:HB3	106:Ad:49:LEU:HG	1.93	0.51
78:Y:148:PRO:HA	78:Y:151:ARG:HH11	1.75	0.51
81:UA:189:UNK:O	81:UA:193:UNK:N	2.44	0.51
81:UA:198:UNK:O	93:Ap:167:MET:HE1	2.11	0.51
82:BB:54:VAL:HG23	82:BB:56:PRO:CD	2.39	0.51
86:Al:69:TYR:HB2	115:Ay:87:TRP:CZ3	2.44	0.51
90:BC:4:ILE:HG23	90:BC:7:ARG:HH21	1.75	0.51
92:Ai:271:HIS:CE1	92:Ai:323:ARG:HG3	2.46	0.51
93:Ap:114:ASP:O	93:Ap:117:THR:N	2.32	0.51
97:BM:222:MET:HE3	97:BM:224:PRO:HG3	1.92	0.51
103:BE:67:LYS:O	103:BE:67:LYS:HD2	2.10	0.51
113:Ah:111:SER:O	113:Ah:115:TYR:HB2	2.11	0.51
117:Ax:165:TRP:HB3	117:Ax:170:ALA:HB2	1.93	0.51
118:BL:107:TRP:CD1	118:BL:138:VAL:HG21	2.45	0.51
118:BL:158:TRP:CD1	118:BL:176:LEU:HD12	2.45	0.51
118:BL:189:TYR:HB3	118:BL:277:ARG:HB2	1.92	0.51
1:1:416:A:H2'	1:1:416:A:N3	2.25	0.51
1:1:1143:A:C6	1:1:1144:G:C2	2.99	0.51
1:2:64:U:O2'	1:2:64:U:O2	2.28	0.51
1:2:101:G:C2'	1:2:101:G:N3	2.74	0.51
1:2:191:U:C5'	1:2:192:A:OP2	2.59	0.51
1:2:208:C:H2'	1:2:209:U:C4'	2.41	0.51
1:2:341:C:C2'	1:2:342:A:C5'	2.88	0.51
1:2:347:U:C5	115:Ay:41:THR:HA	2.46	0.51
1:2:383:A:C2'	1:2:384:U:H5'	2.39	0.51
1:2:422:U:C4	13:aj:52:TYR:CB	2.92	0.51
1:2:436:U:O2'	1:2:437:U:O2	2.28	0.51
1:2:469:C:H1'	2:h:19:ARG:NH1	2.25	0.51
1:2:511:U:O2	1:2:511:U:H2'	2.10	0.51
1:2:527:U:C4'	16:az:69:HIS:NE2	2.71	0.51
8:am:57:PHE:HD1	53:bd:61:ASN:HB2	1.76	0.51
8:am:288:TRP:NE1	53:bd:63:ILE:HG21	2.26	0.51
11:ay:145:ASN:HD21	11:ay:155:THR:HB	1.76	0.51
16:az:32:TRP:HZ2	16:az:58:THR:HG21	1.75	0.51
16:az:118:ARG:NE	16:az:163:LYS:OXT	2.44	0.51
19:af:231:VAL:HG23	19:af:266:ALA:HB2	1.92	0.51

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
20:u:648:MET:O	20:u:652:TYR:N	2.40	0.51
21:aa:401:HIS:HE1	21:aa:878:TYR:CE2	2.29	0.51
21:aa:1054:ARG:NH2	42:x:61:ASP:HA	2.26	0.51
22:ab:555:ASN:N	22:ab:558:GLU:OE2	2.41	0.51
23:ak:150:ARG:HD3	38:l:532:TYR:CZ	2.46	0.51
24:ac:259:TYR:OH	24:ac:263:ARG:NH1	2.44	0.51
26:an:30:ARG:HD3	52:z:993:ARG:HD2	1.92	0.51
31:at:310:TRP:CZ2	31:at:326:ARG:HD3	2.44	0.51
40:av:124:GLN:HE22	43:i:372:MET:HE1	1.76	0.51
41:ai:114:GLU:O	41:ai:118:ALA:N	2.32	0.51
42:x:241:GLU:O	42:x:245:PHE:N	2.42	0.51
44:g:116:MET:HE3	44:g:117:LYS:HE3	1.92	0.51
48:q:145:MET:O	48:q:148:ILE:HG22	2.11	0.51
48:q:150:TYR:HE1	49:b:37:ARG:HG2	1.75	0.51
52:z:719:ASP:OD1	52:z:720:VAL:N	2.43	0.51
55:B:295:SER:OG	55:B:295:SER:O	2.18	0.51
56:C:120:ASN:HD22	56:C:129:TRP:HZ3	1.59	0.51
77:X:486:MET:HB3	106:Ad:223:LEU:HD12	1.92	0.51
79:Z:44:LEU:O	79:Z:44:LEU:HG	2.10	0.51
82:BB:13:LYS:NZ	1:1:1120:U:OP1	2.33	0.51
82:BB:129:THR:HB	103:BE:73:PHE:HB3	1.93	0.51
87:BI:201:ALA:HB3	87:BI:211:GLN:HB3	1.93	0.51
92:AI:413:ARG:HH21	116:Ag:159:PHE:HB3	1.76	0.51
94:Au:27:GLU:HG2	94:Au:28:ARG:H	1.76	0.51
94:Au:37:PRO:HD2	1:1:281:G:H22	1.74	0.51
95:Aa:188:ALA:HB1	95:Aa:192:LEU:HD11	1.92	0.51
110:As:95:ILE:HD11	110:As:104:LEU:HD21	1.92	0.51
113:Ah:226:TRP:HZ2	113:Ah:243:LEU:HD21	1.74	0.51
1:2:122:U:C2	43:i:297:GLN:CD	2.89	0.51
1:2:413:U:N3	2:h:23:HIS:CB	2.70	0.51
1:2:511:U:H5'	3:aw:19:PRO:CD	2.34	0.51
1:2:526:A:N7	15:d:294:ILE:HG23	2.11	0.51
4:m:12:PRO:HD3	28:ap:240:GLY:N	2.26	0.51
4:m:72:HIS:CD2	4:m:75:ARG:HB2	2.46	0.51
8:am:35:TYR:CD1	8:am:40:ILE:HD11	2.46	0.51
10:ae:249:ALA:HB1	10:ae:273:MET:HG2	1.92	0.51
12:ag:56:ARG:NH1	24:ac:1201:ALA:O	2.42	0.51
12:ag:510:ILE:O	12:ag:514:LEU:N	2.33	0.51
13:aj:121:LEU:HG	13:aj:125:PHE:CZ	2.46	0.51
14:e:140:GLU:OE1	15:d:281:ILE:HG12	2.11	0.51
14:e:815:ARG:HH21	20:u:695:GLN:HE22	1.59	0.51

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
15:d:187:ARG:O	15:d:191:GLY:N	2.41	0.51
18:r:121:GLY:O	18:r:422:GLN:HB3	2.10	0.51
18:r:155:GLU:HB3	18:r:156:TRP:HD1	1.75	0.51
19:af:249:ILE:HA	22:ab:982:TYR:HE1	1.76	0.51
21:aa:755:ARG:HB2	21:aa:760:TYR:CE1	2.45	0.51
22:ab:214:ALA:O	22:ab:223:LEU:N	2.43	0.51
24:ac:165:ASP:OD1	24:ac:166:TYR:N	2.40	0.51
24:ac:277:LYS:HA	24:ac:580:LEU:HD11	1.92	0.51
24:ac:577:THR:HA	24:ac:584:LEU:HD11	1.93	0.51
25:ad:421:PHE:CZ	25:ad:517:ALA:HB3	2.45	0.51
26:an:5:ARG:O	26:an:9:GLU:HB2	2.11	0.51
26:an:279:GLN:HG3	50:a:326:MET:SD	2.50	0.51
31:at:248:VAL:HG12	31:at:254:ALA:HB3	1.93	0.51
38:l:494:ALA:O	38:l:498:THR:HG23	2.10	0.51
38:l:652:ARG:HH21	38:l:654:LEU:HD21	1.75	0.51
41:ai:19:GLU:HG3	41:ai:128:ARG:HH21	1.75	0.51
41:ai:22:GLU:OE2	41:ai:135:ARG:NH2	2.44	0.51
41:ai:136:LEU:O	41:ai:140:TYR:N	2.36	0.51
43:i:239:LEU:HD21	43:i:249:LYS:HG2	1.93	0.51
43:i:242:ASN:ND2	43:i:245:ASN:OD1	2.44	0.51
45:o:293:TYR:HH	45:o:307:HIS:CD2	2.26	0.51
47:k:168:ASN:OD1	47:k:171:GLY:N	2.37	0.51
49:b:23:ARG:NH1	85:An:151:GLU:HG2	2.23	0.51
52:z:594:GLU:OE2	52:z:637:ARG:NH2	2.44	0.51
55:B:386:GLU:HG3	83:Aw:47:PHE:CE2	2.46	0.51
59:F:168:GLN:NE2	1:l:490:U:OP2	2.44	0.51
62:I:244:SER:HB2	107:BF:70:ARG:HH22	1.75	0.51
65:L:35:SER:HB3	65:L:38:ASP:HB2	1.92	0.51
66:M:259:ARG:NE	123:UD:15:UNK:O	2.43	0.51
67:N:50:ARG:HB2	75:V:28:PRO:O	2.11	0.51
67:N:196:ARG:CZ	1:l:563:U:H5'	2.41	0.51
68:O:129:TYR:O	68:O:164:ASN:ND2	2.32	0.51
68:O:282:GLN:HB2	87:BI:206:HIS:NE2	2.26	0.51
75:V:116:ASP:O	75:V:119:GLN:HB3	2.10	0.51
78:Y:156:GLU:HB3	90:BC:133:SER:HB2	1.92	0.51
85:An:41:ILE:HD13	85:An:44:TRP:CD1	2.46	0.51
86:Al:147:ALA:HA	86:Al:150:VAL:HG12	1.93	0.51
87:BI:174:LEU:O	87:BI:210:SER:N	2.44	0.51
93:Ap:22:ASN:OD1	93:Ap:191:ARG:NH1	2.44	0.51
95:Aa:70:THR:OG1	95:Aa:72:VAL:HG22	2.10	0.51
95:Aa:186:MET:HE1	95:Aa:189:ARG:CD	2.26	0.51

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
96:Ao:257:LYS:HG3	96:Ao:258:PHE:CD1	2.46	0.51
97:BM:32:PHE:O	97:BM:36:VAL:HG23	2.11	0.51
102:Aq:221:THR:HA	102:Aq:226:ARG:HH11	1.74	0.51
110:As:51:ARG:HE	123:UD:43:UNK:HA	1.76	0.51
113:Ah:358:ALA:HB3	113:Ah:364:VAL:HG22	1.92	0.51
118:BL:152:GLN:NE2	118:BL:177:TYR:OH	2.45	0.51
1:1:847:A:C8	1:1:848:U:H5	2.28	0.51
1:1:1105:G:C2	1:1:1106:U:C4	2.98	0.51
1:2:36:G:N7	33:w:130:LYS:HG2	2.24	0.50
1:2:56:U:O2	1:2:59:A:C2	2.45	0.50
1:2:146:A:C2'	1:2:147:U:H5'	2.41	0.50
1:2:147:U:O5'	1:2:147:U:H6	1.94	0.50
1:2:396:A:O2'	1:2:530:A:O4'	2.20	0.50
1:2:432:G:C4	10:ae:22:LEU:HD21	2.47	0.50
1:2:437:U:N1	6:s:151:ARG:HB2	2.26	0.50
1:2:476:U:H2'	1:2:477:A:O4'	2.11	0.50
1:2:486:A:C4	9:n:121:PHE:HD2	2.27	0.50
1:2:526:A:C2'	15:d:329:ARG:NH1	2.74	0.50
2:h:55:LEU:HD23	2:h:64:GLN:HG3	1.94	0.50
4:m:270:ARG:HG2	4:m:271:ASN:H	1.76	0.50
5:f:143:GLN:HA	5:f:146:HIS:HB2	1.93	0.50
7:au:92:LYS:HE2	7:au:174:TYR:CD2	2.46	0.50
9:n:34:LYS:O	11:ay:35:ARG:NH2	2.44	0.50
11:ay:130:GLN:NE2	18:r:154:GLY:O	2.44	0.50
12:ag:530:ALA:O	12:ag:534:LYS:NZ	2.32	0.50
21:aa:745:GLU:OE1	21:aa:747:HIS:NE2	2.34	0.50
21:aa:777:VAL:HG11	21:aa:814:THR:HA	1.93	0.50
23:ak:115:GLN:NE2	38:l:559:GLU:OE2	2.41	0.50
25:ad:157:GLU:OE2	25:ad:161:TRP:NE1	2.44	0.50
25:ad:625:ARG:NH1	35:t:156:SER:O	2.42	0.50
26:an:284:GLN:HE21	26:an:291:HIS:HA	1.75	0.50
29:aq:176:GLU:HB3	35:t:90:ARG:HG2	1.93	0.50
42:x:85:HIS:O	42:x:89:VAL:HG23	2.11	0.50
42:x:223:GLU:O	42:x:227:CYS:N	2.44	0.50
45:o:132:ARG:HD2	50:a:349:TRP:CE2	2.45	0.50
50:a:42:ARG:HD2	50:a:105:GLN:HE22	1.77	0.50
54:A:62:ASP:OD1	54:A:63:LYS:N	2.44	0.50
54:A:283:ARG:O	54:A:284:ILE:C	2.54	0.50
62:I:103:LEU:HD21	62:I:114:GLN:OE1	2.11	0.50
65:L:29:ASN:ND2	65:L:29:ASN:O	2.44	0.50
66:M:254:LEU:HD13	123:UD:12:UNK:HA	1.93	0.50

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
77:X:353:PRO:HD3	77:X:393:CYS:HA	1.93	0.50
77:X:355:THR:OG1	77:X:356:ALA:N	2.44	0.50
78:Y:118:LEU:HD21	90:BC:74:LEU:HD12	1.92	0.50
78:Y:160:LEU:HD11	90:BC:68:ASP:CB	2.41	0.50
86:Al:125:LYS:HB3	86:Al:186:LEU:HD22	1.92	0.50
87:BI:85:ASP:HB3	87:BI:93:PRO:HB3	1.93	0.50
93:Ap:41:THR:O	93:Ap:45:ARG:HG3	2.11	0.50
96:Ao:138:ILE:HG12	96:Ao:200:VAL:HG21	1.92	0.50
97:BM:227:TYR:HA	97:BM:230:VAL:HG22	1.93	0.50
100:BH:69:TYR:OH	1:1:360:U:O2	2.24	0.50
101:Am:147:TYR:HB3	101:Am:170:MET:HE3	1.92	0.50
102:Aq:68:THR:HG21	106:Ad:30:GLU:CD	2.28	0.50
102:Aq:113:ASN:HB3	102:Aq:133:ILE:HD12	1.92	0.50
103:BE:63:GLY:C	103:BE:65:PHE:H	2.19	0.50
104:Ak:134:ARG:NH1	104:Ak:135:ASN:OD1	2.44	0.50
105:BP:-5:LYS:HD3	105:BP:0:TRP:CD1	2.46	0.50
106:Ad:221:VAL:CG2	106:Ad:225:GLY:HA3	2.41	0.50
110:As:135:LEU:O	110:As:139:GLU:HG2	2.11	0.50
113:Ah:344:LEU:O	113:Ah:368:GLN:NE2	2.38	0.50
116:Ag:57:TRP:CE2	116:Ag:58:LEU:HD12	2.46	0.50
118:BL:263:GLU:OE2	1:1:665:U:H2'	2.11	0.50
1:1:618:U:OP1	1:1:1040:C:H5'	2.10	0.50
1:2:63:G:N2	1:2:64:U:C4	2.78	0.50
1:2:307:A:N3	1:2:307:A:H2'	2.25	0.50
1:2:325:U:H3'	1:2:326:U:O4'	2.11	0.50
1:2:342:A:C8	1:2:342:A:H3'	2.46	0.50
1:2:391:A:H8	1:2:391:A:P	2.34	0.50
1:2:577:G:C3'	1:2:578:C:H5'	2.42	0.50
2:h:29:ARG:HD3	6:s:101:ALA:HA	1.92	0.50
2:h:106:GLU:HB2	14:e:377:TRP:CZ3	2.46	0.50
6:s:40:GLN:HB3	14:e:469:PHE:HB3	1.93	0.50
10:ae:200:PRO:O	10:ae:204:ARG:HG3	2.12	0.50
12:ag:97:SER:HA	12:ag:131:ALA:HA	1.93	0.50
12:ag:251:GLU:O	12:ag:255:ARG:N	2.42	0.50
13:aj:218:ARG:HD3	13:aj:251:ILE:HD12	1.94	0.50
13:aj:224:MET:HB3	13:aj:231:LEU:HD22	1.91	0.50
15:d:266:PHE:HZ	15:d:278:VAL:HG21	1.76	0.50
17:ax:55:LEU:HD11	17:ax:128:VAL:HG13	1.92	0.50
18:r:185:GLY:O	18:r:189:GLN:NE2	2.45	0.50
20:u:389:LEU:HG	20:u:582:VAL:HG22	1.93	0.50
21:aa:174:ILE:HD13	48:q:84:LYS:HD2	1.93	0.50

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
21:aa:646:THR:OG1	21:aa:649:ALA:HB3	2.11	0.50
21:aa:851:LYS:HD2	21:aa:858:HIS:ND1	2.26	0.50
22:ab:305:ALA:HB3	38:l:460:GLU:CD	2.37	0.50
24:ac:1024:ALA:HA	24:ac:1028:GLU:HG2	1.92	0.50
24:ac:1153:MET:O	24:ac:1157:CYS:N	2.44	0.50
25:ad:382:PHE:CE1	40:av:46:PRO:HD3	2.47	0.50
29:aq:82:ARG:HD2	35:t:71:ILE:H	1.76	0.50
30:as:71:ILE:O	30:as:71:ILE:HG13	2.11	0.50
30:as:254:ARG:HE	30:as:259:PHE:HA	1.76	0.50
32:y:197:ASN:OD1	32:y:199:THR:OG1	2.29	0.50
38:l:352:PRO:HG2	38:l:353:LYS:HE2	1.93	0.50
39:ar:171:PHE:HB2	39:ar:176:VAL:HB	1.93	0.50
43:i:351:GLU:HA	43:i:354:LYS:HB2	1.93	0.50
46:c:69:ASP:HA	46:c:72:VAL:HG22	1.92	0.50
50:a:245:PHE:CZ	50:a:276:VAL:HG11	2.45	0.50
54:A:371:GLU:N	54:A:371:GLU:OE2	2.44	0.50
55:B:312:ILE:HD11	89:At:44:TRP:CD2	2.46	0.50
77:X:89:LEU:HD21	77:X:125:HIS:NE2	2.26	0.50
77:X:293:ASN:H	77:X:344:GLN:NE2	2.09	0.50
77:X:358:GLU:OE1	77:X:368:ARG:HB2	2.12	0.50
78:Y:61:GLN:HA	78:Y:64:VAL:HG12	1.93	0.50
79:Z:44:LEU:O	79:Z:44:LEU:CG	2.59	0.50
83:Aw:11:PHE:O	83:Aw:14:VAL:HG23	2.11	0.50
85:An:127:LEU:HD23	85:An:127:LEU:O	2.12	0.50
86:Al:38:VAL:HG22	86:Al:70:GLN:HA	1.93	0.50
88:Az:40:TRP:NE1	88:Az:99:ARG:HH11	2.09	0.50
97:BM:28:VAL:HB	97:BM:30:GLU:HG2	1.94	0.50
100:BH:150:GLU:OE1	100:BH:150:GLU:N	2.42	0.50
101:Am:119:GLU:HG2	101:Am:236:THR:HG23	1.93	0.50
106:Ad:59:ARG:HD3	106:Ad:234:LEU:HD11	1.92	0.50
113:Ah:86:PHE:HE2	118:BL:148:ASN:HD21	1.57	0.50
113:Ah:344:LEU:HD22	113:Ah:371:GLN:HG2	1.93	0.50
113:Ah:362:GLU:HA	113:Ah:365:ASP:HB2	1.92	0.50
115:Ay:68:TYR:H	1:1:697:A:N6	2.08	0.50
119:BO:138:THR:HG22	119:BO:144:GLN:HB3	1.92	0.50
1:1:408:U:H2'	1:1:409:A:C8	2.46	0.50
1:1:1031:C:N3	1:1:1035:G:N2	2.59	0.50
1:2:106:U:C6	1:2:106:U:C5'	2.85	0.50
1:2:208:C:C3'	1:2:209:U:H4'	2.41	0.50
1:2:471:A:C2	12:ag:19:ARG:HB3	2.46	0.50
10:ae:297:HIS:CE1	12:ag:51:GLN:HE22	2.29	0.50

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
10:ae:352:ARG:HA	10:ae:352:ARG:HE	1.75	0.50
12:ag:208:TYR:HA	12:ag:211:VAL:HG12	1.93	0.50
12:ag:546:VAL:HG11	38:l:14:PRO:HG2	1.94	0.50
18:r:328:ARG:HH12	18:r:357:TYR:HB3	1.76	0.50
19:af:382:LEU:HD23	19:af:441:ARG:HH11	1.76	0.50
19:af:757:TYR:HD2	19:af:758:GLU:HG3	1.76	0.50
21:aa:648:GLU:OE1	21:aa:648:GLU:N	2.39	0.50
21:aa:851:LYS:HD2	21:aa:858:HIS:CG	2.46	0.50
22:ab:577:SER:OG	22:ab:607:ASP:O	2.21	0.50
22:ab:1105:TRP:CD1	22:ab:1109:GLN:HE21	2.29	0.50
40:av:49:ILE:HA	40:av:53:THR:HG22	1.93	0.50
42:x:116:ASP:OD1	42:x:116:ASP:N	2.41	0.50
45:o:455:HIS:N	45:o:462:GLU:OE1	2.44	0.50
50:a:401:LYS:HB3	50:a:405:ASP:HB2	1.93	0.50
56:C:124:GLU:CD	113:Ah:51:LYS:HB3	2.37	0.50
56:C:210:TYR:CD2	86:Al:102:GLU:HG3	2.46	0.50
57:D:86:PHE:O	57:D:89:GLY:N	2.29	0.50
58:E:37:ASP:OD1	58:E:38:ILE:N	2.44	0.50
58:E:50:LEU:HD11	58:E:108:PHE:HA	1.94	0.50
60:G:368:ARG:HD2	116:Ag:161:GLU:HG2	1.93	0.50
64:K:50:ARG:NH1	95:Aa:191:THR:HG21	2.26	0.50
65:L:32:TYR:CE2	91:Ab:102:LEU:HD22	2.47	0.50
74:U:25:PHE:CE2	74:U:27:PRO:HB3	2.47	0.50
86:Al:92:LEU:HD11	115:Ay:156:VAL:HG21	1.94	0.50
99:Aj:339:ARG:NH1	99:Aj:411:MET:O	2.44	0.50
104:Ak:26:ARG:HB3	104:Ak:65:VAL:HG12	1.93	0.50
104:Ak:93:HIS:HE1	104:Ak:275:PHE:HB2	1.76	0.50
104:Ak:193:PHE:HD2	104:Ak:200:ARG:HG3	1.77	0.50
108:Av:133:GLU:HB2	108:Av:137:GLN:HE22	1.76	0.50
113:Ah:210:GLU:CD	113:Ah:276:ARG:HH21	2.20	0.50
119:BO:79:LEU:HD12	119:BO:101:VAL:HG23	1.94	0.50
1:1:116:U:H2'	1:1:117:U:H5''	1.93	0.50
1:1:928:U:HO2'	1:1:929:G:P	2.28	0.50
1:2:55:G:C5'	1:2:152:G:C2	2.93	0.50
1:2:146:A:C8	1:2:146:A:C5'	2.87	0.50
1:2:175:U:C2	48:q:14:PRO:HD2	2.45	0.50
1:2:304:U:H2'	1:2:304:U:O2	2.10	0.50
1:2:437:U:H4'	6:s:153:LYS:CE	2.41	0.50
1:2:530:A:H8	16:az:73:PRO:CG	2.24	0.50
11:ay:84:PHE:HZ	16:az:13:LEU:HD11	1.76	0.50
12:ag:297:ARG:HG3	12:ag:349:LEU:HD13	1.94	0.50

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
12:ag:298:TRP:HB2	14:e:296:ASP:CG	2.36	0.50
14:e:115:GLU:OE2	22:ab:898:PRO:HB3	2.11	0.50
14:e:440:ARG:HD3	20:u:690:MET:SD	2.51	0.50
15:d:201:ARG:HD3	19:af:193:LEU:O	2.12	0.50
21:aa:136:LEU:HD21	43:i:306:ASN:HA	1.93	0.50
21:aa:197:LEU:HD23	21:aa:205:THR:HA	1.94	0.50
21:aa:1495:GLU:HG3	21:aa:1496:ILE:HG23	1.93	0.50
29:aq:163:ARG:NH1	29:aq:165:ASP:OD2	2.45	0.50
34:v:96:CYS:HB3	34:v:120:LEU:HB3	1.94	0.50
36:p:29:GLU:OE2	36:p:66:GLN:NE2	2.44	0.50
41:ai:57:LYS:O	41:ai:61:LEU:HG	2.11	0.50
54:A:330:VAL:HG13	54:A:332:PHE:HE1	1.76	0.50
55:B:387:GLU:HG3	71:R:222:TYR:HE2	1.76	0.50
58:E:281:ASP:HB3	58:E:284:ASP:HB3	1.93	0.50
62:I:214:SER:HB3	107:BF:29:ARG:HD3	1.92	0.50
63:J:108:ASN:HD22	63:J:111:LEU:HD22	1.76	0.50
70:Q:114:LEU:HD23	70:Q:114:LEU:H	1.77	0.50
77:X:260:THR:OG1	77:X:344:GLN:NE2	2.44	0.50
79:Z:44:LEU:O	79:Z:44:LEU:HD23	2.11	0.50
85:An:14:HIS:H	1:1:271:U:H5	1.58	0.50
85:An:61:PRO:HD2	94:Au:89:PHE:CD1	2.47	0.50
85:An:78:TRP:HA	85:An:78:TRP:CE3	2.46	0.50
85:An:125:TYR:CD1	85:An:125:TYR:C	2.89	0.50
85:An:176:GLU:OE2	113:Ah:468:LEU:HD13	2.11	0.50
85:An:304:ASP:OD2	85:An:313:ARG:NH1	2.43	0.50
92:Ai:134:LYS:O	92:Ai:135:GLN:HG2	2.11	0.50
97:BM:325:GLN:HA	97:BM:328:TYR:CD2	2.47	0.50
99:Aj:385:ARG:HA	99:Aj:388:GLN:HG3	1.92	0.50
108:Av:94:GLN:HE21	108:Av:97:PRO:HG3	1.75	0.50
113:Ah:379:ASP:O	113:Ah:383:LEU:HB2	2.12	0.50
115:Ay:61:LEU:HG	115:Ay:84:ARG:HG2	1.93	0.50
117:Ax:148:CYS:SG	117:Ax:176:ARG:NH1	2.84	0.50
118:BL:301:ARG:HH12	1:1:235:G:H5'	1.77	0.50
1:1:865:A:H4'	1:1:866:A:OP1	2.12	0.50
1:1:1080:A:H2'	1:1:1081:U:C6	2.46	0.50
1:2:88:U:H5''	47:k:158:HIS:NE2	2.25	0.50
1:2:108:A:H8	39:ar:22:ASN:HD22	0.61	0.50
1:2:228:G:C8	1:2:242:U:C2	2.99	0.50
1:2:302:A:H2	1:2:303:G:H1	1.49	0.50
1:2:321:U:O2'	1:2:322:A:OP1	2.29	0.50
1:2:417:C:N4	10:ae:131:ARG:HD2	2.26	0.50

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:434:U:O2	1:2:434:U:C2'	2.45	0.50
1:2:447:A:H5'	53:bd:56:ASN:HD21	1.75	0.50
1:2:471:A:H4'	12:ag:18:ILE:CD1	2.36	0.50
1:2:529:A:H5'	4:m:270:ARG:HH22	1.57	0.50
10:ae:96:SER:H	22:ab:1107:GLN:NE2	2.09	0.50
10:ae:287:MET:O	10:ae:291:ASN:N	2.43	0.50
10:ae:390:VAL:HA	10:ae:469:VAL:HG23	1.94	0.50
11:ay:52:GLU:HG3	17:ax:18:LEU:HD13	1.93	0.50
12:ag:52:ARG:HE	12:ag:358:GLY:C	2.20	0.50
12:ag:124:HIS:O	12:ag:128:SER:N	2.42	0.50
18:r:352:ASP:OD1	18:r:352:ASP:N	2.44	0.50
19:af:310:ILE:HD13	19:af:348:TYR:HA	1.93	0.50
19:af:423:VAL:O	19:af:427:VAL:HG23	2.12	0.50
20:u:160:SER:H	22:ab:717:GLN:HE21	1.60	0.50
21:aa:148:GLN:HG2	21:aa:152:ARG:HD3	1.93	0.50
21:aa:888:ILE:HA	27:ao:204:LEU:HD12	1.94	0.50
21:aa:905:GLN:HE22	45:o:401:ASN:HD22	1.60	0.50
24:ac:686:ARG:NH1	24:ac:687:GLU:OE2	2.44	0.50
26:an:211:GLU:HG3	26:an:215:ARG:HH12	1.77	0.50
29:aq:166:CYS:SG	35:t:80:LEU:HB2	2.52	0.50
32:y:259:SER:O	32:y:263:ALA:N	2.44	0.50
37:j:25:PRO:HB2	37:j:60:ARG:NH1	2.26	0.50
39:ar:161:LEU:HD13	39:ar:190:LEU:HD13	1.92	0.50
46:c:282:TYR:HB2	46:c:294:HIS:HB3	1.94	0.50
48:q:139:SER:O	48:q:143:GLN:HG2	2.11	0.50
50:a:91:ASN:HA	50:a:94:LYS:NZ	2.26	0.50
50:a:148:ASP:O	50:a:164:TYR:N	2.38	0.50
54:A:353:PHE:HB3	54:A:354:PRO:HD3	1.94	0.50
54:A:390:ALA:HB1	1:1:1132:U:O2'	2.12	0.50
57:D:76:GLU:HA	57:D:79:PHE:HB3	1.92	0.50
58:E:186:ARG:HD2	1:1:452:A:C5	2.46	0.50
60:G:175:LEU:HB2	60:G:216:MET:HE2	1.93	0.50
61:H:132:ARG:HH22	91:Ab:248:GLU:HA	1.76	0.50
66:M:101:GLU:CD	66:M:101:GLU:H	2.19	0.50
67:N:152:ARG:HG3	67:N:169:HIS:HB2	1.93	0.50
69:P:167:TYR:HB3	69:P:173:VAL:HG23	1.93	0.50
71:R:17:VAL:HG23	71:R:64:ILE:HD11	1.94	0.50
91:Ab:132:GLN:OE1	91:Ab:135:ARG:NH1	2.44	0.50
101:Am:263:HIS:HB2	101:Am:302:PRO:HB2	1.92	0.50
103:BE:62:VAL:O	103:BE:64:ALA:N	2.45	0.50
108:Av:42:THR:N	108:Av:45:GLU:OE2	2.44	0.50

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
108:Av:60:ARG:HD3	108:Av:117:HIS:O	2.12	0.50
116:Ag:22:THR:HG21	1:1:907:G:O3'	2.12	0.50
117:Ax:60:SER:HB2	117:Ax:63:TRP:HB3	1.93	0.50
1:1:991:G:N2	1:1:992:G:O4'	2.44	0.50
1:2:87:A:C8	1:2:87:A:C5'	2.85	0.50
1:2:108:A:C8	39:ar:22:ASN:HB3	2.46	0.50
1:2:177:U:H5''	33:w:119:ARG:NE	2.27	0.50
1:2:276:U:H2'	1:2:360:A:C2	2.46	0.50
1:2:412:G:H3'	10:ae:156:ALA:CB	2.21	0.50
1:2:422:U:C2'	1:2:422:U:O2	2.59	0.50
1:2:501:U:OP1	3:aw:13:TYR:CD2	2.59	0.50
3:aw:128:VAL:HA	18:r:111:ARG:HH12	1.76	0.50
4:m:54:ARG:HH21	4:m:63:TRP:HB2	1.75	0.50
4:m:255:GLN:OE1	15:d:200:VAL:N	2.45	0.50
7:au:145:GLU:OE1	7:au:149:TRP:NE1	2.44	0.50
10:ae:265:ARG:HH21	10:ae:307:VAL:HG23	1.75	0.50
12:ag:259:HIS:CG	14:e:291:SER:HA	2.46	0.50
12:ag:375:ARG:HB3	12:ag:379:TYR:CE2	2.46	0.50
14:e:140:GLU:HG2	14:e:209:TRP:CZ3	2.46	0.50
19:af:816:VAL:HG11	19:af:835:VAL:HG23	1.94	0.50
20:u:78:ARG:HG2	38:l:671:TRP:HH2	1.77	0.50
20:u:223:ARG:HG3	20:u:247:ARG:HD3	1.93	0.50
20:u:576:VAL:O	20:u:580:VAL:HG23	2.12	0.50
20:u:767:ASP:OD1	20:u:767:ASP:N	2.44	0.50
21:aa:165:ARG:HD2	48:q:99:GLU:HG2	1.93	0.50
21:aa:457:VAL:HG22	21:aa:459:HIS:H	1.76	0.50
21:aa:610:VAL:HG11	21:aa:751:VAL:HG21	1.92	0.50
21:aa:1375:VAL:HG11	21:aa:1615:TYR:CE1	2.47	0.50
22:ab:332:TRP:O	22:ab:336:HIS:N	2.44	0.50
24:ac:287:ASP:OD1	24:ac:321:LYS:HE2	2.12	0.50
24:ac:750:SER:OG	24:ac:752:TRP:NE1	2.42	0.50
24:ac:755:ARG:HH21	24:ac:826:VAL:HG21	1.77	0.50
24:ac:945:ILE:HA	24:ac:978:HIS:HE1	1.77	0.50
24:ac:1108:VAL:HG12	24:ac:1109:ASP:O	2.11	0.50
25:ad:189:GLU:OE1	37:j:170:ASN:ND2	2.45	0.50
26:an:227:GLY:O	26:an:229:LYS:NZ	2.37	0.50
26:an:243:PRO:HA	45:o:136:TRP:CZ3	2.47	0.50
32:y:160:ILE:HG23	32:y:174:VAL:HG13	1.94	0.50
36:p:181:THR:O	36:p:185:GLY:N	2.38	0.50
38:l:157:ARG:HE	38:l:233:ASP:HA	1.76	0.50
42:x:60:MET:HE1	42:x:81:TYR:CE2	2.46	0.50

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
54:A:92:ASP:OD2	111:Ae:143:ARG:NE	2.41	0.50
54:A:377:PRO:HD3	82:BB:106:PRO:HB2	1.94	0.50
55:B:254:SER:HB3	55:B:257:THR:CG2	2.42	0.50
56:C:90:TYR:HB3	56:C:91:PRO:HD2	1.93	0.50
61:H:19:HIS:HB3	61:H:22:THR:O	2.12	0.50
62:I:42:GLU:HB3	62:I:45:MET:SD	2.52	0.50
63:J:121:SER:HG	63:J:124:HIS:H	1.54	0.50
68:O:163:LYS:NZ	71:R:430:ASP:OD2	2.45	0.50
71:R:131:PRO:HG2	71:R:134:ALA:HB2	1.93	0.50
71:R:381:GLU:OE2	88:Az:49:ARG:NE	2.45	0.50
77:X:300:VAL:HB	77:X:306:ALA:HA	1.93	0.50
77:X:365:LEU:N	77:X:367:GLN:OE1	2.37	0.50
78:Y:241:PRO:HA	78:Y:244:ARG:HH12	1.76	0.50
85:An:229:ARG:HH11	88:Az:60:HIS:HB2	1.77	0.50
91:Ab:135:ARG:HH22	101:Am:331:TYR:C	2.19	0.50
92:Ai:268:MET:HE3	92:Ai:320:LEU:HB2	1.93	0.50
93:Ap:37:ASN:HB3	110:As:73:GLY:HA3	1.92	0.50
104:Ak:119:SER:OG	104:Ak:271:TRP:NE1	2.40	0.50
115:Ay:63:HIS:O	115:Ay:64:ILE:HD13	2.11	0.50
119:BO:101:VAL:O	119:BO:103:VAL:N	2.44	0.50
1:1:757:A:O2'	1:1:758:G:H5'	2.11	0.50
1:1:1061:A:H3'	1:1:1062:U:H5''	1.93	0.50
1:2:38:U:C2	33:w:139:TYR:C	2.85	0.50
1:2:117:A:OP2	1:2:117:A:H8	1.94	0.50
1:2:166:G:H2'	1:2:167:U:C4'	2.42	0.50
1:2:181:U:H5'	33:w:101:ARG:CD	2.42	0.50
1:2:280:A:H62	46:c:171:LYS:CG	2.25	0.50
1:2:312:A:H5'	1:2:313:C:OP2	2.11	0.50
1:2:342:A:C8	1:2:342:A:C4'	2.94	0.50
1:2:350:G:C5'	1:2:351:U:OP2	2.59	0.50
1:2:409:U:O2	1:2:409:U:C2'	2.60	0.50
1:2:419:A:N6	10:ae:182:ARG:HD2	2.26	0.50
1:2:497:A:O5'	3:aw:15:ARG:NH1	2.44	0.50
1:2:506:U:OP2	14:e:793:MET:SD	2.70	0.50
4:m:94:VAL:O	36:p:112:TYR:OH	2.17	0.50
8:am:23:ARG:HH21	8:am:48:PRO:HG2	1.76	0.50
10:ae:204:ARG:HG2	10:ae:207:ARG:HH12	1.74	0.50
10:ae:217:ALA:O	10:ae:221:TYR:N	2.41	0.50
12:ag:53:LYS:HA	12:ag:56:ARG:HE	1.77	0.50
12:ag:118:ARG:HE	12:ag:119:ALA:H	1.59	0.50
12:ag:259:HIS:HB3	14:e:288:SER:O	2.12	0.50

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
12:ag:283:PHE:CD2	12:ag:316:HIS:HD2	2.30	0.50
13:aj:304:SER:OG	13:aj:309:ARG:NH1	2.45	0.50
14:e:338:VAL:HG13	22:ab:847:PRO:HG3	1.94	0.50
18:r:60:GLU:HG3	18:r:144:TYR:HD2	1.76	0.50
22:ab:415:ASP:OD1	22:ab:418:ARG:NH2	2.43	0.50
22:ab:556:ASP:OD1	22:ab:940:ARG:NH1	2.45	0.50
23:ak:173:ALA:HB1	23:ak:177:MET:HB2	1.93	0.50
23:ak:213:PRO:O	23:ak:215:GLU:N	2.44	0.50
24:ac:414:ASP:O	24:ac:469:ARG:NH2	2.39	0.50
24:ac:518:ASP:HB2	24:ac:525:LYS:HZ2	1.77	0.50
25:ad:156:GLN:HE22	48:q:67:GLU:HG3	1.75	0.50
28:ap:58:LYS:HD3	28:ap:59:TYR:CE1	2.47	0.50
28:ap:150:HIS:NE2	28:ap:197:MET:SD	2.85	0.50
29:aq:44:GLU:OE2	29:aq:60:ARG:NE	2.44	0.50
31:at:315:CYS:O	31:at:317:GLN:HG2	2.12	0.50
41:ai:133:LEU:HD22	41:ai:190:ILE:HD13	1.93	0.50
43:i:289:PRO:HG2	47:k:185:PRO:HA	1.93	0.50
52:z:927:VAL:O	52:z:931:LYS:HB2	2.12	0.50
52:z:987:ASP:OD1	52:z:987:ASP:N	2.42	0.50
54:A:35:TYR:C	54:A:37:CYS:H	2.20	0.50
54:A:312:LYS:HD2	54:A:367:LEU:HD12	1.94	0.50
55:B:401:TYR:C	55:B:403:PRO:HD3	2.37	0.50
58:E:175:VAL:HG13	58:E:178:ARG:HH21	1.77	0.50
59:F:29:ILE:HG13	59:F:145:TRP:CE2	2.46	0.50
59:F:95:PRO:HD3	111:Ae:61:ASN:HD22	1.76	0.50
59:F:167:ASN:ND2	95:Aa:43:GLY:O	2.45	0.50
60:G:221:GLY:HA2	1:1:202:A:OP1	2.12	0.50
65:L:2:LEU:HB2	65:L:125:PRO:HG2	1.94	0.50
65:L:45:LEU:O	65:L:47:ALA:N	2.45	0.50
66:M:20:ASN:OD1	1:1:326:U:O2'	2.30	0.50
66:M:143:TRP:CD1	66:M:206:PRO:HA	2.47	0.50
67:N:95:TYR:HD2	88:Az:25:GLN:HE21	1.59	0.50
77:X:141:ARG:NH1	106:Ad:20:LEU:HD11	2.27	0.50
77:X:199:THR:HG23	77:X:202:ASN:H	1.76	0.50
77:X:340:LEU:HG	77:X:411:VAL:HG22	1.94	0.50
78:Y:185:ILE:HD12	84:Bj:146:CYS:SG	2.52	0.50
83:Aw:123:ARG:HH12	106:Ad:125:ASP:HB2	1.77	0.50
84:Bj:96:GLU:OE2	90:BC:95:LEU:HB3	2.12	0.50
86:Al:69:TYR:CD2	115:Ay:90:THR:HG21	2.47	0.50
89:At:49:GLU:O	89:At:53:THR:HG22	2.11	0.50
91:Ab:15:SER:OG	91:Ab:54:GLU:O	2.30	0.50

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
95:Aa:125:GLU:HA	95:Aa:128:LYS:HD2	1.93	0.50
97:BM:15:ASN:HA	97:BM:20:LEU:HD22	1.93	0.50
97:BM:68:LEU:O	97:BM:69:LEU:HD23	2.12	0.50
101:Am:86:PRO:C	101:Am:88:ALA:H	2.20	0.50
103:BE:46:SER:HB2	103:BE:48:ALA:O	2.11	0.50
104:Ak:54:TRP:HA	104:Ak:54:TRP:HE3	1.77	0.50
104:Ak:207:PRO:HG2	104:Ak:210:HIS:CG	2.47	0.50
113:Ah:55:TYR:O	113:Ah:56:HIS:C	2.52	0.50
1:1:651:U:O2'	1:1:652:A:H5'	2.12	0.50
1:2:87:A:O2'	47:k:158:HIS:CE1	2.65	0.50
1:2:316:A:C3'	1:2:317:U:H4'	2.41	0.50
1:2:454:U:C5'	8:am:277:PRO:HD3	2.42	0.50
8:am:279:THR:HG23	8:am:282:GLN:HG3	1.93	0.50
14:e:466:LEU:HB3	14:e:467:PHE:HD1	1.77	0.50
15:d:153:ARG:HH12	19:af:184:LEU:HD13	1.77	0.50
17:ax:63:TYR:CD2	18:r:346:ARG:HA	2.47	0.50
20:u:668:GLN:HE22	20:u:675:GLY:C	2.19	0.50
21:aa:511:ASN:HB2	21:aa:514:ALA:HB3	1.93	0.50
21:aa:947:ARG:HD3	26:an:18:HIS:HA	1.94	0.50
21:aa:1494:PRO:HD3	21:aa:1516:ARG:NH2	2.27	0.50
24:ac:313:VAL:HG21	24:ac:477:HIS:CG	2.45	0.50
24:ac:1004:TYR:HD2	24:ac:1081:GLU:HG2	1.77	0.50
25:ad:119:TYR:CE1	25:ad:692:ASP:HA	2.47	0.50
26:an:46:PHE:CE2	26:an:106:MET:HG2	2.47	0.50
27:ao:222:ARG:H	45:o:258:GLU:HB2	1.77	0.50
28:ap:227:ASP:HB3	52:z:753:PRO:HG3	1.93	0.50
31:at:296:ASN:O	31:at:299:SER:OG	2.29	0.50
33:w:170:MET:HG2	33:w:174:ALA:HB3	1.94	0.50
34:v:103:LEU:HB2	34:v:116:ARG:NH2	2.27	0.50
41:ai:307:PRO:HG2	41:ai:310:LYS:HB2	1.93	0.50
50:a:84:ASP:OD1	50:a:85:ASN:N	2.45	0.50
52:z:737:ASP:O	52:z:741:VAL:HG23	2.12	0.50
55:B:147:TRP:NE1	67:N:83:ASP:O	2.35	0.50
60:G:315:ARG:HD3	92:Ai:427:GLY:HA2	1.93	0.50
62:I:100:VAL:O	62:I:104:ALA:N	2.41	0.50
63:J:11:HIS:CD2	1:1:1113:G:H4'	2.47	0.50
66:M:14:PRO:CD	66:M:14:PRO:O	2.59	0.50
71:R:32:GLY:O	79:Z:156:TYR:HB2	2.12	0.50
78:Y:65:ASP:O	78:Y:69:SER:N	2.43	0.50
78:Y:102:GLU:OE1	112:Ac:222:THR:OG1	2.26	0.50
80:BA:68:VAL:HG12	80:BA:114:PHE:HB2	1.94	0.50

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
82:BB:19:VAL:HG12	82:BB:20:HIS:CD2	2.38	0.50
85:An:137:GLU:HA	85:An:140:ARG:NH2	2.23	0.50
85:An:141:ASP:OD1	85:An:142:GLY:N	2.45	0.50
92:Ai:141:ARG:O	92:Ai:141:ARG:HG3	2.12	0.50
94:Au:137:ASP:HA	94:Au:140:LEU:HB2	1.93	0.50
97:BM:224:PRO:HB2	97:BM:226:ASP:H	1.77	0.50
100:BH:202:GLU:HA	100:BH:205:GLU:OE2	2.12	0.50
103:BE:60:LYS:HZ1	103:BE:67:LYS:HB3	1.75	0.50
104:Ak:173:TYR:CE1	104:Ak:178:ASP:HB2	2.47	0.50
107:BF:48:SER:HB2	107:BF:56:THR:HG21	1.93	0.50
107:BF:48:SER:OG	107:BF:57:TYR:OH	2.25	0.50
111:Ae:133:ASN:HB2	111:Ae:140:MET:HE2	1.94	0.50
113:Ah:301:THR:HG23	113:Ah:333:LEU:HD12	1.94	0.50
118:BL:111:SER:OG	118:BL:112:SER:N	2.44	0.50
1:1:572:A:H3'	1:1:573:A:C8	2.46	0.50
1:1:646:U:H2'	1:1:647:U:H6	1.77	0.50
1:2:63:G:N2	1:2:64:U:O4	2.44	0.50
1:2:118:A:H8	1:2:118:A:O5'	1.95	0.50
1:2:140:A:H2'	1:2:141:A:C8	2.47	0.50
1:2:177:U:P	48:q:10:ARG:O	2.69	0.50
1:2:431:U:H6	1:2:431:U:P	2.34	0.50
1:2:436:U:N1	6:s:154:VAL:CG2	2.73	0.50
12:ag:271:ASN:OD1	12:ag:305:THR:OG1	2.15	0.50
12:ag:366:ASP:OD2	12:ag:370:LYS:NZ	2.39	0.50
13:aj:132:ARG:HH12	13:aj:286:ARG:NH2	2.10	0.50
13:aj:188:ASP:OD1	13:aj:189:GLY:N	2.45	0.50
14:e:164:ARG:HG2	14:e:175:VAL:HG11	1.94	0.50
19:af:301:LEU:O	19:af:305:LEU:N	2.35	0.50
21:aa:922:TRP:CZ2	52:z:980:MET:HG3	2.47	0.50
21:aa:1537:CYS:HG	21:aa:1539:SER:HG	1.48	0.50
22:ab:363:ARG:HD3	22:ab:373:ARG:HG2	1.93	0.50
24:ac:1246:ARG:NH1	24:ac:1254:MET:HB3	2.26	0.50
30:as:138:LEU:HB2	30:as:175:PHE:CE1	2.47	0.50
39:ar:88:VAL:HA	39:ar:91:LYS:HG2	1.94	0.50
42:x:146:VAL:HA	42:x:255:TRP:HB2	1.93	0.50
44:g:122:GLN:O	44:g:126:VAL:HG23	2.12	0.50
45:o:122:GLU:OE2	45:o:144:MET:HG2	2.11	0.50
45:o:277:TRP:HH2	45:o:308:HIS:HD1	1.60	0.50
47:k:93:ASP:HA	47:k:148:LYS:HA	1.94	0.50
52:z:122:ARG:NE	52:z:146:ALA:O	2.45	0.50
52:z:141:HIS:HB3	52:z:144:ILE:HG12	1.93	0.50

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
56:C:12:TRP:HB2	88:Az:84:TYR:CE1	2.47	0.50
56:C:100:LEU:HD21	56:C:106:HIS:HB2	1.93	0.50
58:E:139:VAL:O	58:E:143:GLY:N	2.40	0.50
58:E:153:MET:O	58:E:157:ILE:HD12	2.11	0.50
60:G:232:ILE:HD13	60:G:245:LEU:HD13	1.94	0.50
61:H:22:THR:HG21	61:H:24:ARG:HH21	1.76	0.50
62:I:185:ARG:CD	62:I:188:LEU:HD11	2.41	0.50
62:I:186:PHE:CD1	62:I:186:PHE:C	2.90	0.50
62:I:258:TRP:O	62:I:262:MET:HG3	2.11	0.50
64:K:168:LEU:HD12	64:K:179:TRP:HE3	1.76	0.50
65:L:65:ARG:HG2	95:Aa:111:SER:HB3	1.92	0.50
65:L:92:VAL:HG21	1:1:407:C:OP1	2.11	0.50
66:M:17:LYS:NZ	1:1:177:G:OP1	2.44	0.50
66:M:210:ASP:OD1	66:M:211:LYS:N	2.45	0.50
69:P:111:TYR:HB2	96:Ao:82:TRP:CE3	2.47	0.50
70:Q:62:PRO:HD2	1:1:81:U:C2	2.47	0.50
71:R:208:TRP:HD1	71:R:213:THR:CG2	2.25	0.50
81:UA:8:UNK:HA	120:BG:1274:ASN:HD21	1.77	0.50
85:An:22:ARG:CD	1:1:286:G:H22	2.25	0.50
85:An:67:THR:HG22	113:Ah:84:ARG:NH2	2.26	0.50
86:Al:249:TYR:HB3	86:Al:252:TYR:O	2.12	0.50
98:Ar:111:PHE:HB2	98:Ar:195:ILE:HA	1.94	0.50
99:Aj:291:LEU:HA	99:Aj:294:LEU:HB3	1.93	0.50
104:Ak:123:LEU:HD23	104:Ak:221:LEU:HD12	1.94	0.50
107:BF:22:HIS:CD2	1:1:595:A:H62	2.30	0.50
108:Av:121:GLU:HG3	1:1:451:A:H61	1.76	0.50
110:As:102:ALA:HB2	110:As:128:ALA:HB1	1.94	0.50
119:BO:85:ALA:O	119:BO:86:GLU:HG3	2.11	0.50
119:BO:92:ARG:NE	119:BO:92:ARG:HA	2.26	0.50
119:BO:183:VAL:O	119:BO:183:VAL:HG12	2.12	0.50
1:1:562:U:H4'	1:1:563:U:OP2	2.10	0.50
1:1:632:A:H2'	1:1:632:A:OP2	2.12	0.50
1:2:66:U:P	35:t:35:ARG:CB	2.99	0.49
1:2:269:A:C3'	1:2:270:U:H5'	2.41	0.49
2:h:128:LEU:HB2	13:aj:21:PRO:HG3	1.94	0.49
3:aw:15:ARG:H	3:aw:30:LYS:NZ	2.10	0.49
3:aw:48:THR:HG21	18:r:336:VAL:HG23	1.94	0.49
4:m:214:ALA:HB1	34:v:131:LEU:HD21	1.94	0.49
7:au:136:LEU:HD21	7:au:151:TRP:CD1	2.47	0.49
8:am:288:TRP:HE1	53:bd:63:ILE:HG21	1.76	0.49
9:n:93:TRP:CZ3	9:n:96:LYS:HD2	2.47	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
10:ae:565:THR:OG1	10:ae:567:SER:O	2.22	0.49
12:ag:86:PRO:O	12:ag:87:GLU:HB2	2.11	0.49
12:ag:197:ASN:ND2	12:ag:230:THR:OG1	2.45	0.49
12:ag:278:ARG:NE	12:ag:311:ARG:HB3	2.26	0.49
12:ag:323:GLU:OE2	12:ag:327:ARG:NH1	2.42	0.49
14:e:248:LEU:HD13	14:e:259:LEU:HG	1.94	0.49
16:az:20:PRO:HG2	16:az:23:SER:HB2	1.94	0.49
20:u:219:LEU:HD13	20:u:247:ARG:HG3	1.94	0.49
21:aa:1302:LEU:HD23	21:aa:1308:PHE:HB3	1.93	0.49
21:aa:1469:PHE:HD1	21:aa:1489:VAL:HA	1.76	0.49
22:ab:858:LEU:HD12	22:ab:859:PRO:HD2	1.93	0.49
23:ak:34:VAL:HG12	23:ak:39:GLU:HA	1.94	0.49
24:ac:269:VAL:HG13	24:ac:274:GLN:HB2	1.93	0.49
24:ac:1189:GLU:HB2	24:ac:1193:ARG:NH2	2.27	0.49
25:ad:773:VAL:HG22	50:a:297:VAL:HG11	1.92	0.49
26:an:64:THR:HG22	26:an:65:THR:O	2.12	0.49
26:an:292:ARG:HD3	52:z:507:HIS:CE1	2.47	0.49
30:as:125:ARG:HB3	30:as:144:PHE:HA	1.93	0.49
32:y:64:LEU:H	32:y:64:LEU:HD12	1.77	0.49
32:y:133:ARG:NH1	32:y:169:SER:O	2.45	0.49
43:i:320:ASP:OD1	43:i:322:ARG:HG3	2.12	0.49
50:a:353:PHE:HB3	50:a:360:LEU:HD12	1.93	0.49
52:z:251:ASN:OD1	52:z:252:THR:N	2.44	0.49
55:B:324:ASP:N	55:B:324:ASP:OD1	2.41	0.49
57:D:113:VAL:HG12	91:Ab:191:GLN:OE1	2.12	0.49
58:E:58:LYS:NZ	58:E:97:ASP:OD2	2.45	0.49
62:I:185:ARG:HD2	62:I:188:LEU:CD1	2.41	0.49
63:J:65:ASN:HD22	119:BO:189:PHE:HD2	1.57	0.49
64:K:20:LEU:HD13	95:Aa:188:ALA:CB	2.41	0.49
66:M:143:TRP:HB3	68:O:36:PHE:CZ	2.47	0.49
77:X:320:VAL:HG12	77:X:321:VAL:HG23	1.94	0.49
82:BB:21:LEU:O	82:BB:25:LEU:HG	2.12	0.49
82:BB:88:ARG:NH2	82:BB:89:GLU:HG2	2.26	0.49
84:Bj:12:SER:OG	1:1:964:A:N7	2.43	0.49
91:Ab:16:TYR:CZ	91:Ab:29:MET:HE1	2.47	0.49
91:Ab:182:TRP:CE3	91:Ab:186:VAL:HG11	2.47	0.49
92:Ai:77:GLN:OE1	92:Ai:182:THR:OG1	2.25	0.49
92:Ai:191:VAL:HB	92:Ai:195:ARG:HG3	1.94	0.49
95:Aa:141:SER:O	95:Aa:145:ALA:N	2.45	0.49
98:Ar:122:LEU:HD12	98:Ar:195:ILE:HG21	1.92	0.49
107:BF:96:ARG:HA	107:BF:100:VAL:HG12	1.93	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
108:Av:19:LYS:NZ	1:1:443:G:OP1	2.33	0.49
111:Ae:39:ASN:N	111:Ae:56:ASP:OD2	2.45	0.49
116:Ag:76:GLN:OE1	116:Ag:76:GLN:N	2.39	0.49
1:1:830:A:H3'	1:1:831:A:C8	2.47	0.49
1:1:1032:A:H2'	1:1:1033:U:H5''	1.93	0.49
1:2:175:U:H5''	48:q:11:GLN:CD	2.33	0.49
1:2:187:U:C2	1:2:188:A:C2	2.99	0.49
1:2:252:G:H2'	1:2:253:C:O5'	2.11	0.49
1:2:269:A:O2'	1:2:270:U:H5'	2.10	0.49
1:2:281:A:C8	43:i:250:THR:HB	2.47	0.49
1:2:414:C:C2	10:ae:33:GLN:NE2	2.77	0.49
1:2:423:C:H42	12:ag:51:GLN:HE21	1.52	0.49
1:2:436:U:C6	6:s:152:PHE:CZ	2.83	0.49
1:2:449:A:H4'	14:e:378:THR:HG22	1.94	0.49
1:2:462:G:OP2	2:h:133:HIS:CE1	2.66	0.49
1:2:604:U:O2	1:2:604:U:H2'	2.11	0.49
3:aw:84:PRO:HG2	14:e:142:PHE:HE2	1.77	0.49
8:am:35:TYR:CZ	53:bd:77:GLU:HG3	2.47	0.49
12:ag:520:ASN:O	12:ag:524:VAL:HG23	2.12	0.49
13:aj:95:THR:O	13:aj:131:GLN:NE2	2.45	0.49
14:e:794:GLN:HG3	14:e:795:GLN:N	2.26	0.49
19:af:443:TYR:OH	19:af:468:VAL:HG22	2.12	0.49
20:u:77:PHE:HA	22:ab:217:ASP:OD1	2.12	0.49
21:aa:232:LEU:HB2	21:aa:260:PHE:HE2	1.77	0.49
21:aa:1063:ALA:HB3	21:aa:1158:GLY:HA3	1.94	0.49
22:ab:38:SER:O	22:ab:174:ARG:NH2	2.45	0.49
24:ac:759:GLU:O	24:ac:763:VAL:HG23	2.12	0.49
32:y:272:MET:HB3	32:y:274:TRP:NE1	2.27	0.49
35:t:72:ASP:N	35:t:72:ASP:OD1	2.43	0.49
36:p:78:GLU:CD	36:p:81:GLN:HB2	2.36	0.49
37:j:129:TYR:HA	45:o:434:ARG:HH21	1.77	0.49
39:ar:266:GLY:HA3	39:ar:269:LYS:HE2	1.93	0.49
52:z:231:ALA:O	52:z:233:SER:N	2.45	0.49
56:C:88:THR:HA	116:Ag:54:GLU:OE2	2.13	0.49
58:E:152:GLU:OE2	108:Av:102:GLU:HA	2.12	0.49
61:H:27:ARG:NH2	61:H:96:LYS:HG2	2.16	0.49
62:I:186:PHE:HE1	62:I:216:PHE:CE2	2.30	0.49
77:X:363:PHE:CE1	77:X:387:PRO:HD3	2.47	0.49
78:Y:169:PHE:CD1	90:BC:139:PRO:HD2	2.47	0.49
84:Bj:154:CYS:SG	84:Bj:155:VAL:N	2.85	0.49
85:An:109:GLU:CD	85:An:109:GLU:C	2.81	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
91:Ab:114:ASN:HB2	95:Aa:153:GLU:HG2	1.95	0.49
92:Ai:279:ILE:HG13	92:Ai:280:ILE:HG13	1.93	0.49
93:Ap:68:TYR:CE2	93:Ap:136:VAL:HG21	2.48	0.49
94:Au:86:TYR:HB3	94:Au:89:PHE:HD2	1.77	0.49
94:Au:113:PRO:O	94:Au:115:THR:N	2.45	0.49
97:BM:329:THR:O	97:BM:333:ILE:HG13	2.12	0.49
110:As:134:PRO:O	110:As:138:ARG:HG2	2.12	0.49
113:Ah:166:TRP:HB2	113:Ah:171:ILE:HD12	1.94	0.49
114:BD:80:GLN:O	114:BD:80:GLN:NE2	2.45	0.49
115:Ay:41:THR:OG1	115:Ay:42:ARG:N	2.45	0.49
118:BL:121:GLY:HA2	118:BL:130:LEU:O	2.12	0.49
1:1:341:U:H4'	1:1:973:U:C5	2.47	0.49
1:1:665:U:O4'	1:1:670:A:N6	2.45	0.49
1:1:827:A:HO2'	1:1:828:A:P	2.35	0.49
1:2:149:A:N6	1:2:189:A:OP2	2.46	0.49
1:2:270:U:C6	1:2:270:U:C3'	2.95	0.49
1:2:304:U:C6	1:2:304:U:C5'	2.86	0.49
1:2:408:U:C5'	9:n:56:HIS:HD2	2.01	0.49
1:2:557:C:H42	1:2:569:G:H1	1.60	0.49
3:aw:58:TRP:CZ3	3:aw:60:VAL:HG23	2.47	0.49
4:m:64:LEU:HG	4:m:65:PHE:HD1	1.78	0.49
7:au:215:GLN:O	7:au:219:GLN:N	2.45	0.49
8:am:260:ARG:HD3	15:d:143:SER:HB3	1.94	0.49
13:aj:67:ILE:HB	13:aj:123:LYS:NZ	2.28	0.49
13:aj:166:ILE:HD12	13:aj:169:CYS:HB3	1.94	0.49
14:e:673:HIS:CD2	14:e:675:GLN:HB3	2.48	0.49
16:az:43:VAL:O	16:az:47:THR:HG22	2.12	0.49
18:r:310:LYS:O	18:r:314:SER:OG	2.22	0.49
21:aa:448:ALA:HB2	21:aa:454:ALA:HB2	1.94	0.49
21:aa:615:GLN:NE2	21:aa:796:LEU:HA	2.26	0.49
21:aa:860:THR:OG1	52:z:985:TRP:HA	2.11	0.49
22:ab:578:PRO:HG3	22:ab:611:HIS:HB2	1.93	0.49
24:ac:640:PHE:HD1	24:ac:643:ARG:HH22	1.60	0.49
24:ac:797:LYS:O	24:ac:800:ARG:NH2	2.46	0.49
25:ad:118:ARG:HE	25:ad:692:ASP:HB2	1.77	0.49
27:ao:207:ARG:O	27:ao:210:THR:HG22	2.12	0.49
28:ap:185:LEU:HD21	41:ai:239:THR:HG21	1.93	0.49
33:w:56:GLU:HG2	33:w:57:VAL:N	2.28	0.49
38:l:141:GLU:HA	38:l:315:TYR:CD2	2.47	0.49
41:ai:72:GLY:O	41:ai:76:ILE:HG13	2.12	0.49
43:i:109:PRO:O	43:i:113:LYS:HG3	2.12	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
44:g:132:ALA:HA	44:g:135:ASN:HB2	1.93	0.49
45:o:132:ARG:HD3	50:a:352:PHE:HD1	1.77	0.49
45:o:301:ARG:HH22	45:o:328:PHE:HA	1.77	0.49
50:a:264:ALA:HB3	50:a:267:HIS:HD2	1.76	0.49
50:a:292:VAL:HG12	52:z:284:TYR:CZ	2.48	0.49
54:A:176:ASP:HB3	54:A:219:TYR:OH	2.12	0.49
56:C:106:HIS:ND1	56:C:106:HIS:O	2.45	0.49
60:G:146:LYS:HE3	1:1:345:A:O2'	2.12	0.49
60:G:321:ILE:HG22	116:Ag:151:ASP:O	2.12	0.49
61:H:56:PHE:HE1	105:BP:183:ILE:HD13	1.77	0.49
62:I:80:LYS:HA	62:I:174:HIS:HE1	1.77	0.49
62:I:160:MET:HE2	107:BF:12:PHE:HA	1.93	0.49
62:I:214:SER:HA	62:I:217:LYS:HE2	1.94	0.49
64:K:88:ASN:OD1	105:BP:6:HIS:HE1	1.95	0.49
67:N:95:TYR:CZ	88:Az:21:MET:HG3	2.47	0.49
68:O:35:ARG:HH12	1:1:43:A:H3'	1.77	0.49
68:O:197:VAL:HA	68:O:200:VAL:HG22	1.94	0.49
68:O:299:HIS:NE2	71:R:381:GLU:OE1	2.46	0.49
72:S:248:ALA:HB2	80:BA:66:ALA:H	1.77	0.49
78:Y:200:HIS:CD2	78:Y:221:VAL:HG11	2.47	0.49
79:Z:67:ASN:HB3	79:Z:121:LEU:HB2	1.94	0.49
81:UA:88:UNK:O	81:UA:92:UNK:N	2.45	0.49
83:Aw:32:GLU:HG2	83:Aw:93:TRP:HZ3	1.77	0.49
90:BC:90:GLN:HE21	102:Aq:4:GLY:HA3	1.77	0.49
92:Ai:276:ILE:HG12	92:Ai:351:PHE:CD2	2.46	0.49
94:Au:29:ARG:HH22	1:1:648:U:P	2.32	0.49
94:Au:62:ARG:C	94:Au:64:LYS:H	2.20	0.49
96:Ao:83:THR:HG21	100:BH:215:VAL:HB	1.93	0.49
98:Ar:121:LEU:HD22	98:Ar:160:GLN:HG2	1.93	0.49
101:Am:144:HIS:CE1	101:Am:175:LEU:HB3	2.47	0.49
104:Ak:52:LEU:HD23	104:Ak:54:TRP:HB2	1.93	0.49
108:Av:121:GLU:HG3	1:1:451:A:N6	2.27	0.49
115:Ay:46:ASN:ND2	1:1:702:U:O2	2.45	0.49
118:BL:128:VAL:O	118:BL:128:VAL:CG2	2.60	0.49
119:BO:127:TRP:NE1	1:1:1053:U:OP2	2.34	0.49
119:BO:128:VAL:HG23	119:BO:154:ILE:HA	1.95	0.49
119:BO:132:THR:HG21	119:BO:147:PHE:CE2	2.47	0.49
1:1:127:A:H2'	1:1:128:U:H5'	1.94	0.49
1:1:302:A:C6	1:1:303:U:C4	3.00	0.49
1:1:509:U:C4	1:1:513:U:O2	2.66	0.49
1:1:1141:A:C6	1:1:1142:U:C2	3.01	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:48:U:C6	1:2:48:U:C4'	2.96	0.49
1:2:111:A:H4'	1:2:112:U:OP2	2.11	0.49
1:2:460:A:N6	8:am:300:ILE:HG23	2.27	0.49
1:2:469:C:HO2'	2:h:19:ARG:NH2	2.00	0.49
1:2:471:A:P	13:aj:11:GLY:HA3	2.52	0.49
1:2:503:A:N9	6:s:82:LEU:HD21	2.27	0.49
1:2:526:A:H2'	1:2:527:U:H5'	1.94	0.49
1:2:560:U:H3'	1:2:561:G:C5'	2.42	0.49
12:ag:7:VAL:HG11	12:ag:408:ASN:HD22	1.77	0.49
14:e:207:PHE:HD2	15:d:279:ASN:HD22	1.60	0.49
19:af:748:ASP:HA	19:af:751:GLN:HE21	1.77	0.49
20:u:167:VAL:HG23	20:u:242:ALA:HB1	1.93	0.49
20:u:180:LYS:HB3	20:u:235:PRO:HB3	1.94	0.49
21:aa:1524:PRO:HD3	26:an:190:TRP:CZ3	2.46	0.49
22:ab:560:GLU:HG2	22:ab:964:SER:H	1.76	0.49
22:ab:800:LEU:HD13	22:ab:808:TYR:CZ	2.47	0.49
29:aq:75:ARG:O	29:aq:79:GLN:N	2.44	0.49
30:as:270:PHE:CZ	48:q:38:TRP:HB2	2.47	0.49
35:t:81:GLU:HA	35:t:84:LYS:HB2	1.94	0.49
41:ai:215:SER:HA	41:ai:222:ASN:HD22	1.77	0.49
43:i:217:ASP:OD1	43:i:220:SER:N	2.45	0.49
48:q:17:ASN:OD1	48:q:18:LEU:N	2.45	0.49
53:bd:54:TRP:HB2	53:bd:79:LEU:HD22	1.94	0.49
56:C:172:HIS:ND1	56:C:196:GLU:OE2	2.43	0.49
59:F:113:ARG:NH1	1:1:150:A:O2'	2.44	0.49
61:H:96:LYS:HB3	61:H:99:GLU:HB2	1.93	0.49
64:K:53:GLN:HE22	1:1:489:A:H61	1.60	0.49
65:L:159:ASP:OD1	65:L:159:ASP:N	2.44	0.49
66:M:71:TRP:CZ2	66:M:77:LEU:HD22	2.47	0.49
66:M:170:ARG:HD2	66:M:173:HIS:CD2	2.48	0.49
72:S:270:SER:HA	98:Ar:201:TYR:CE1	2.47	0.49
77:X:187:ASP:OD1	77:X:188:LYS:N	2.45	0.49
77:X:250:GLN:HA	77:X:253:HIS:HB3	1.94	0.49
78:Y:237:LEU:HD23	90:BC:31:VAL:HG22	1.94	0.49
82:BB:20:HIS:HA	82:BB:23:ARG:HB2	1.94	0.49
83:Aw:107:ILE:HD12	106:Ad:130:TYR:HB2	1.94	0.49
85:An:15:LYS:HG3	1:1:258:U:H5'	1.93	0.49
85:An:26:GLN:NE2	1:1:230:A:H62	2.09	0.49
86:Al:158:ILE:HG22	86:Al:165:VAL:HG21	1.93	0.49
94:Au:132:LYS:NZ	1:1:590:A:OP2	2.46	0.49
94:Au:134:MET:HE3	1:1:548:A:N6	2.28	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
96:Ao:85:ASP:OD1	96:Ao:85:ASP:N	2.45	0.49
97:BM:80:ARG:NH2	97:BM:83:TYR:HB2	2.27	0.49
102:Aq:1:MET:HA	102:Aq:7:ARG:NH1	2.24	0.49
106:Ad:146:GLY:O	106:Ad:237:GLY:HA3	2.12	0.49
111:Ae:181:VAL:HG13	111:Ae:234:VAL:HG12	1.94	0.49
112:Ac:52:TYR:CZ	112:Ac:184:PRO:HB2	2.46	0.49
113:Ah:383:LEU:O	113:Ah:387:THR:HG22	2.13	0.49
1:1:753:U:C4	1:1:754:A:C6	3.01	0.49
1:1:1121:U:H4'	1:1:1122:A:OP1	2.11	0.49
1:2:172:A:O2'	1:2:173:A:H8	1.95	0.49
1:2:175:U:C6	48:q:11:GLN:NE2	2.80	0.49
1:2:193:A:N6	1:2:259:A:H5'	2.27	0.49
1:2:222:A:H1'	1:2:252:G:N2	2.27	0.49
1:2:224:G:C5'	6:s:145:ARG:HD2	2.31	0.49
1:2:433:U:OP2	10:ae:14:GLY:C	2.55	0.49
1:2:560:U:C3'	1:2:561:G:H5''	2.43	0.49
1:2:608:U:H3'	1:2:608:U:C6	2.47	0.49
1:2:614:U:H3	4:m:152:ILE:HD11	1.77	0.49
5:f:220:ALA:HB1	52:z:618:ASN:HD21	1.77	0.49
11:ay:146:PRO:HD3	11:ay:169:ASP:OD1	2.12	0.49
12:ag:506:SER:H	12:ag:522:LYS:HZ1	1.60	0.49
13:aj:221:LEU:O	13:aj:258:TYR:OH	2.18	0.49
17:ax:64:ASP:OD1	17:ax:65:GLN:N	2.45	0.49
19:af:502:ARG:HH11	19:af:502:ARG:HB2	1.75	0.49
20:u:117:ALA:H	22:ab:525:ASN:HB3	1.78	0.49
20:u:178:MET:HA	20:u:236:CYS:SG	2.53	0.49
21:aa:135:HIS:HB3	21:aa:140:ARG:HB2	1.94	0.49
21:aa:145:GLU:OE1	46:c:204:THR:HG21	2.12	0.49
21:aa:396:MET:HE2	21:aa:427:LEU:HB3	1.95	0.49
21:aa:1101:GLU:HB2	50:a:361:ASN:ND2	2.27	0.49
22:ab:415:ASP:O	22:ab:419:ARG:N	2.41	0.49
22:ab:530:GLU:N	22:ab:530:GLU:OE1	2.46	0.49
22:ab:660:PHE:CE1	38:l:607:LYS:HG2	2.47	0.49
22:ab:863:ARG:HD3	22:ab:920:ASN:OD1	2.13	0.49
24:ac:311:ILE:HG13	24:ac:320:LYS:HG2	1.95	0.49
24:ac:662:VAL:HB	24:ac:885:ALA:HB2	1.94	0.49
24:ac:1048:ALA:HB1	38:l:78:ARG:HH12	1.77	0.49
25:ad:124:TYR:HE1	48:q:84:LYS:HE2	1.78	0.49
27:ao:32:ILE:HG13	27:ao:56:LEU:HD21	1.93	0.49
27:ao:171:TYR:CD1	27:ao:174:LEU:HD12	2.45	0.49
29:aq:149:ASP:HB3	29:aq:153:ILE:HG12	1.94	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
39:ar:164:ARG:O	39:ar:182:ILE:HG22	2.12	0.49
55:B:234:ARG:HH21	99:Aj:498:ALA:HA	1.78	0.49
58:E:302:THR:N	58:E:305:GLU:OE2	2.45	0.49
60:G:192:ASN:O	83:Aw:22:ARG:NH2	2.28	0.49
61:H:32:TYR:O	61:H:115:LYS:NZ	2.38	0.49
66:M:12:LEU:CD1	66:M:13:ARG:HD3	2.43	0.49
66:M:213:VAL:HG22	66:M:223:TRP:CZ3	2.46	0.49
78:Y:195:GLN:O	78:Y:199:GLN:HG2	2.12	0.49
86:Al:279:ASN:HD22	86:Al:279:ASN:N	2.07	0.49
91:Ab:10:GLN:HE21	91:Ab:62:ARG:HB3	1.76	0.49
92:Ai:442:ASN:HD21	116:Ag:176:ASN:HB2	1.76	0.49
98:Ar:201:TYR:CE1	1:1:399:U:H1'	2.48	0.49
111:Ae:224:SER:OG	111:Ae:225:ILE:N	2.43	0.49
113:Ah:303:LEU:HB2	113:Ah:331:VAL:HG13	1.92	0.49
113:Ah:429:ILE:O	113:Ah:436:GLY:HA3	2.13	0.49
115:Ay:46:ASN:HD21	1:1:702:U:H2'	1.77	0.49
118:BL:119:ARG:NH1	118:BL:132:HIS:O	2.40	0.49
119:BO:87:ARG:HE	119:BO:89:ALA:HB3	1.77	0.49
1:1:410:A:HO2'	1:1:411:U:P	2.35	0.49
1:1:425:A:H8	1:1:471:A:H5''	1.77	0.49
1:1:445:A:O2'	1:1:461:U:OP2	2.22	0.49
1:1:649:A:N6	1:1:1073:A:H2'	2.28	0.49
1:1:750:U:H4'	1:1:751:A:C8	2.48	0.49
1:2:42:U:O2'	29:aq:24:LYS:CG	2.60	0.49
1:2:168:G:O2'	1:2:169:U:H5'	2.11	0.49
1:2:201:A:P	31:at:228:HIS:HB3	2.52	0.49
1:2:288:U:H2'	1:2:289:A:C5'	2.42	0.49
1:2:577:G:H2'	1:2:578:C:C5'	2.33	0.49
7:au:114:LEU:HD21	22:ab:354:LEU:HD11	1.94	0.49
8:am:101:ALA:HB2	15:d:152:VAL:HG12	1.94	0.49
10:ae:115:HIS:HE2	10:ae:167:TRP:HH2	1.58	0.49
11:ay:118:LYS:HB2	14:e:785:MET:HE2	1.95	0.49
13:aj:84:LYS:HA	13:aj:88:HIS:NE2	2.27	0.49
18:r:141:ILE:HB	18:r:187:LEU:HD23	1.95	0.49
18:r:199:ASP:OD2	20:u:838:ARG:NE	2.45	0.49
20:u:379:ARG:HG3	20:u:570:VAL:HG11	1.93	0.49
21:aa:913:ALA:HB3	21:aa:918:LEU:HD21	1.93	0.49
22:ab:296:THR:O	22:ab:300:ALA:HB2	2.12	0.49
22:ab:301:TRP:O	22:ab:306:GLN:HG2	2.12	0.49
22:ab:556:ASP:OD1	22:ab:556:ASP:N	2.45	0.49
24:ac:264:HIS:HB3	24:ac:291:GLN:HB3	1.94	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
24:ac:445:LEU:HB3	24:ac:456:TYR:CG	2.48	0.49
24:ac:445:LEU:HD13	24:ac:456:TYR:CE1	2.48	0.49
30:as:57:ALA:O	30:as:152:SER:HB3	2.12	0.49
30:as:176:ARG:HB3	30:as:177:PRO:HD2	1.94	0.49
32:y:272:MET:HB3	32:y:274:TRP:CE2	2.48	0.49
38:l:100:GLN:HA	38:l:103:LEU:HD12	1.95	0.49
38:l:515:GLU:O	38:l:518:SER:OG	2.21	0.49
46:c:276:HIS:HE1	46:c:278:ARG:HE	1.59	0.49
50:a:396:LEU:HD12	50:a:401:LYS:HB2	1.94	0.49
52:z:502:MET:O	52:z:503:LYS:HD3	2.13	0.49
52:z:1010:LYS:HA	52:z:1013:GLU:HB3	1.94	0.49
55:B:184:TRP:HB2	75:V:26:LEU:HD13	1.93	0.49
55:B:189:PRO:HG3	66:M:5:ALA:HB2	1.95	0.49
55:B:384:ARG:HH11	71:R:212:SER:H	1.59	0.49
57:D:84:ARG:O	57:D:93:ARG:HB2	2.13	0.49
58:E:54:ARG:NE	1:1:434:U:H5'	2.28	0.49
59:F:163:ARG:H	109:Af:20:HIS:HE1	1.59	0.49
60:G:188:ARG:NH2	1:1:188:A:OP2	2.38	0.49
65:L:62:GLY:HA2	65:L:67:THR:HA	1.94	0.49
74:U:50:MET:O	1:1:965:G:O2'	2.27	0.49
75:V:96:ARG:O	106:Ad:176:LYS:NZ	2.39	0.49
77:X:439:ASP:HB3	77:X:442:ILE:HB	1.95	0.49
85:An:176:GLU:CD	113:Ah:468:LEU:HD13	2.37	0.49
86:Al:192:LEU:HD12	97:BM:190:LYS:HD2	1.95	0.49
94:Au:29:ARG:NH2	1:1:648:U:OP1	2.29	0.49
95:Aa:91:LEU:HD23	95:Aa:91:LEU:H	1.77	0.49
101:Am:163:ALA:C	101:Am:185:MET:HE1	2.37	0.49
104:Ak:126:PRO:HG3	104:Ak:172:PRO:HG2	1.94	0.49
105:BP:173:VAL:C	105:BP:175:MET:H	2.20	0.49
106:Ad:120:SER:OG	106:Ad:121:SER:N	2.45	0.49
106:Ad:182:PHE:HD2	106:Ad:222:ASN:HB3	1.76	0.49
108:Av:134:SER:HB3	108:Av:137:GLN:HE21	1.77	0.49
116:Ag:87:LEU:HA	116:Ag:90:VAL:HG23	1.95	0.49
117:Ax:151:ARG:NH1	117:Ax:186:TYR:HE2	2.10	0.49
119:BO:109:ARG:NE	119:BO:109:ARG:HA	2.28	0.49
122:UC:131:UNK:O	122:UC:135:UNK:N	2.44	0.49
1:1:164:U:O2'	1:1:165:G:OP1	2.30	0.49
1:1:226:A:H61	1:1:310:A:N6	2.10	0.49
1:1:463:U:C2	1:1:465:A:H5''	2.47	0.49
1:2:58:U:H4'	1:2:59:A:OP2	2.11	0.49
1:2:179:G:H5'	33:w:105:ARG:CB	2.41	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:179:G:H5''	33:w:109:LEU:HD12	1.95	0.49
1:2:404:U:P	1:2:404:U:H6	2.36	0.49
1:2:424:U:OP1	13:aj:233:ARG:HD3	2.12	0.49
1:2:455:U:H2'	8:am:285:ARG:HH12	1.78	0.49
1:2:462:G:OP2	2:h:133:HIS:HE1	1.94	0.49
1:2:521:A:O3'	15:d:345:LYS:CB	2.60	0.49
4:m:134:PRO:HA	4:m:137:ILE:HB	1.95	0.49
4:m:158:GLU:OE2	52:z:178:ASN:N	2.46	0.49
10:ae:267:GLY:HA3	10:ae:311:TRP:HB3	1.95	0.49
12:ag:253:VAL:O	12:ag:257:VAL:HG23	2.13	0.49
15:d:83:LYS:NZ	42:x:111:ARG:O	2.45	0.49
20:u:630:LEU:HB3	20:u:631:PRO:HD3	1.93	0.49
21:aa:688:GLU:HA	21:aa:691:TRP:CE2	2.48	0.49
21:aa:1078:GLN:OE1	50:a:425:LYS:NZ	2.30	0.49
21:aa:1081:SER:HB3	21:aa:1096:LEU:HD13	1.95	0.49
21:aa:1083:GLN:OE1	21:aa:1084:GLN:NE2	2.46	0.49
22:ab:308:THR:HA	38:l:19:TRP:NE1	2.28	0.49
22:ab:578:PRO:HA	22:ab:581:VAL:HG22	1.93	0.49
23:ak:115:GLN:NE2	24:ac:1116:SER:HA	2.27	0.49
23:ak:138:ARG:HA	23:ak:144:LEU:HD11	1.94	0.49
27:ao:115:VAL:HA	27:ao:126:VAL:HA	1.94	0.49
28:ap:117:ILE:HA	28:ap:120:LEU:HD13	1.94	0.49
30:as:104:ARG:HD2	30:as:126:ARG:HB2	1.95	0.49
31:at:312:CYS:HB2	31:at:316:GLY:N	2.27	0.49
32:y:200:GLU:OE2	42:x:224:SER:N	2.23	0.49
35:t:184:ASP:OD1	35:t:185:ALA:N	2.45	0.49
39:ar:93:MET:HG3	39:ar:246:HIS:HD2	1.77	0.49
39:ar:161:LEU:N	39:ar:256:PHE:O	2.45	0.49
42:x:158:TYR:OH	42:x:198:ASP:HA	2.13	0.49
43:i:126:GLU:HA	43:i:129:VAL:HG22	1.93	0.49
46:c:196:LYS:O	46:c:238:TYR:OH	2.17	0.49
50:a:234:ALA:HB1	50:a:238:VAL:HB	1.94	0.49
54:A:329:TYR:CZ	63:J:17:ALA:HB2	2.47	0.49
58:E:105:GLN:HE22	1:1:429:A:H1'	1.75	0.49
58:E:273:HIS:HD2	58:E:279:THR:HG21	1.77	0.49
59:F:164:TRP:HB3	95:Aa:44:PHE:O	2.13	0.49
62:I:29:ASP:N	62:I:29:ASP:OD1	2.43	0.49
62:I:180:THR:HG22	73:T:75:ARG:HA	1.93	0.49
62:I:238:ARG:HG2	68:O:94:ASP:OD2	2.12	0.49
68:O:267:TYR:CE2	68:O:269:ARG:HB2	2.48	0.49
70:Q:169:LYS:HD3	85:An:243:PHE:HZ	1.78	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
71:R:12:ALA:O	71:R:15:GLU:HG2	2.12	0.49
72:S:376:GLU:OE1	106:Ad:75:ARG:NE	2.46	0.49
77:X:328:PRO:O	77:X:418:TRP:HD1	1.96	0.49
78:Y:143:PHE:HE2	112:Ac:130:VAL:HA	1.77	0.49
80:BA:112:GLU:HG2	80:BA:112:GLU:O	2.13	0.49
81:UA:159:UNK:O	81:UA:163:UNK:N	2.46	0.49
86:Al:123:TYR:C	86:Al:186:LEU:HD23	2.38	0.49
89:At:54:ARG:NH2	1:1:59:U:O4'	2.44	0.49
89:At:149:PRO:HA	89:At:152:LEU:HD12	1.95	0.49
91:Ab:135:ARG:HH12	101:Am:331:TYR:HA	1.77	0.49
91:Ab:135:ARG:CZ	101:Am:333:ASN:H	2.25	0.49
94:Au:80:SER:O	94:Au:80:SER:OG	2.28	0.49
96:Ao:188:VAL:HG13	96:Ao:189:ILE:H	1.77	0.49
99:Aj:305:ALA:O	99:Aj:308:THR:OG1	2.25	0.49
102:Aq:43:GLN:CD	102:Aq:44:LEU:H	2.20	0.49
102:Aq:81:ALA:O	102:Aq:82:ASP:HB2	2.13	0.49
102:Aq:323:ARG:NH1	1:1:912:U:OP2	2.46	0.49
104:Ak:295:LEU:HB3	112:Ac:115:GLY:HA2	1.95	0.49
105:BP:179:PRO:HG2	105:BP:181:ASN:HB3	1.93	0.49
106:Ad:54:LEU:HD11	106:Ad:230:HIS:HB2	1.94	0.49
110:As:68:PRO:HA	110:As:138:ARG:NH2	2.26	0.49
113:Ah:389:HIS:HB2	113:Ah:393:ARG:HD3	1.94	0.49
118:BL:75:ASP:OD2	118:BL:280:GLY:HA2	2.13	0.49
119:BO:68:CYS:N	119:BO:76:HIS:HB2	2.28	0.49
1:1:219:A:O4'	1:1:319:A:N6	2.40	0.49
1:1:1125:U:O2'	1:1:1126:A:OP1	2.31	0.49
1:2:174:U:O3'	35:t:27:MET:HE1	2.13	0.49
1:2:181:U:P	33:w:101:ARG:HA	2.53	0.49
1:2:353:U:HO2'	1:2:354:A:P	2.30	0.49
1:2:390:U:H2'	1:2:390:U:O2	2.11	0.49
1:2:462:G:O5'	8:am:282:GLN:NE2	2.46	0.49
1:2:510:A:C5	3:aw:21:ASP:N	2.80	0.49
1:2:544:G:H5''	1:2:545:U:OP1	2.13	0.49
1:2:568:A:H2'	1:2:569:G:O5'	2.13	0.49
14:e:303:PHE:HB3	14:e:317:TYR:HD2	1.78	0.49
14:e:311:PHE:H	20:u:630:LEU:N	2.03	0.49
18:r:97:TRP:CD1	18:r:249:PRO:HB3	2.47	0.49
19:af:450:LEU:HB3	19:af:457:TYR:HE1	1.78	0.49
21:aa:388:VAL:HG13	21:aa:427:LEU:HB2	1.94	0.49
21:aa:906:ARG:HH21	27:ao:157:GLN:HG2	1.78	0.49
22:ab:127:GLU:O	22:ab:130:THR:OG1	2.27	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
24:ac:938:LEU:HD12	24:ac:943:LEU:HD12	1.94	0.49
25:ad:126:MET:HG3	25:ad:273:HIS:CG	2.47	0.49
25:ad:567:ARG:O	25:ad:571:GLY:N	2.24	0.49
28:ap:22:GLU:O	28:ap:26:GLN:N	2.42	0.49
28:ap:138:ARG:NH2	48:q:136:GLU:OE2	2.42	0.49
30:as:266:TRP:CG	35:t:210:PRO:HA	2.48	0.49
34:v:99:GLU:HB3	34:v:116:ARG:HH12	1.78	0.49
35:t:104:ALA:HB3	35:t:137:PHE:HZ	1.78	0.49
36:p:102:SER:OG	36:p:105:LEU:HB3	2.13	0.49
38:l:602:ARG:HD2	38:l:674:ALA:O	2.13	0.49
41:ai:81:THR:HG21	41:ai:95:TRP:HZ2	1.77	0.49
45:o:368:VAL:HG23	52:z:934:ARG:HH22	1.78	0.49
46:c:132:ASP:O	46:c:136:ARG:HB3	2.13	0.49
50:a:163:ILE:HG21	50:a:186:THR:HA	1.94	0.49
50:a:264:ALA:HB3	50:a:267:HIS:CD2	2.48	0.49
53:bd:54:TRP:N	53:bd:79:LEU:O	2.46	0.49
55:B:94:VAL:HG22	55:B:103:HIS:O	2.13	0.49
55:B:254:SER:HB3	55:B:257:THR:HG22	1.94	0.49
56:C:121:LEU:HD21	113:Ah:50:TYR:HB3	1.95	0.49
60:G:262:LEU:O	60:G:266:LEU:HG	2.12	0.49
60:G:336:TYR:O	60:G:340:LYS:N	2.40	0.49
62:I:72:ARG:NH2	1:1:543:U:O2'	2.46	0.49
68:O:289:VAL:HA	68:O:292:LEU:HB2	1.95	0.49
77:X:349:PRO:CD	77:X:398:ARG:HB3	2.42	0.49
78:Y:205:GLU:HG3	78:Y:206:ALA:N	2.28	0.49
78:Y:231:GLN:NE2	84:Bj:154:CYS:HB3	2.27	0.49
80:BA:115:VAL:HG23	80:BA:140:ALA:O	2.12	0.49
82:BB:18:ARG:NH1	1:1:1118:G:N7	2.60	0.49
89:At:50:ARG:O	89:At:54:ARG:N	2.21	0.49
91:Ab:73:PHE:HZ	1:1:508:G:C8	2.31	0.49
94:Au:54:PRO:O	94:Au:55:SER:OG	2.28	0.49
95:Aa:92:SER:N	95:Aa:93:PRO:HD2	2.27	0.49
96:Ao:31:ARG:NH1	1:1:401:U:OP1	2.43	0.49
97:BM:68:LEU:HD13	97:BM:72:TYR:HD2	1.78	0.49
97:BM:330:SER:HB2	97:BM:331:PRO:HD3	1.95	0.49
100:BH:82:HIS:CE1	100:BH:91:GLN:HG2	2.48	0.49
100:BH:188:TRP:CE3	100:BH:227:PRO:HB3	2.47	0.49
101:Am:291:VAL:HG12	111:Ae:247:ILE:HD11	1.95	0.49
104:Ak:246:ILE:HG13	104:Ak:264:VAL:HG12	1.95	0.49
106:Ad:136:ASP:OD1	106:Ad:137:SER:N	2.46	0.49
109:Af:141:SER:OG	109:Af:142:TRP:N	2.46	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
118:BL:214:LEU:HB3	118:BL:255:VAL:HG11	1.94	0.49
119:BO:88:PHE:C	119:BO:91:CYS:H	2.21	0.49
1:1:425:A:H2'	1:1:425:A:N3	2.27	0.49
1:1:871:A:H2'	1:1:872:A:C4	2.48	0.49
1:2:14:A:OP1	50:a:259:SER:C	2.18	0.49
1:2:42:U:HO2'	29:aq:24:LYS:HB2	1.65	0.49
1:2:56:U:H5'	1:2:57:U:OP2	2.12	0.49
1:2:180:A:H2	33:w:87:SER:OG	1.96	0.49
1:2:383:A:H2'	1:2:384:U:C5'	2.42	0.49
1:2:501:U:O2	1:2:501:U:H2'	2.13	0.49
1:2:538:G:H2'	1:2:539:G:H5'	1.94	0.49
1:2:560:U:H3'	1:2:561:G:H5'	1.94	0.49
6:s:75:ARG:HD3	6:s:78:TYR:HD1	1.77	0.49
6:s:172:ASP:OD1	6:s:172:ASP:N	2.41	0.49
14:e:342:ASN:O	14:e:346:VAL:HG23	2.12	0.49
14:e:517:VAL:O	14:e:520:VAL:HG12	2.13	0.49
15:d:25:LEU:HD12	42:x:116:ASP:HB3	1.95	0.49
15:d:80:LEU:HD21	36:p:175:ILE:HD13	1.94	0.49
15:d:161:LEU:O	22:ab:997:THR:HG23	2.13	0.49
18:r:217:GLU:O	18:r:221:ARG:HB2	2.13	0.49
18:r:289:LEU:HD22	22:ab:1131:VAL:HB	1.95	0.49
19:af:158:ASN:HA	22:ab:929:HIS:CD2	2.48	0.49
19:af:638:LEU:HD13	19:af:642:ARG:HG3	1.95	0.49
23:ak:16:ARG:HA	23:ak:19:LEU:HD12	1.94	0.49
24:ac:338:PHE:HA	24:ac:342:LEU:HD12	1.94	0.49
25:ad:535:PRO:HB3	30:as:219:LEU:HD21	1.94	0.49
28:ap:150:HIS:HB3	28:ap:214:ASP:OD2	2.12	0.49
30:as:29:LEU:O	30:as:31:TRP:N	2.44	0.49
30:as:262:ARG:HH21	35:t:13:ALA:HA	1.78	0.49
35:t:103:LEU:HD22	35:t:173:MET:HG2	1.95	0.49
40:av:40:THR:HA	40:av:43:GLN:HG3	1.95	0.49
43:i:334:ARG:O	43:i:337:VAL:HG22	2.12	0.49
45:o:335:ASP:OD1	45:o:339:ARG:NH2	2.46	0.49
46:c:87:ASP:HA	46:c:90:ASP:HB2	1.94	0.49
48:q:65:TRP:HE3	48:q:66:LEU:HD23	1.77	0.49
52:z:452:GLY:HA3	52:z:514:CYS:HA	1.95	0.49
57:D:115:ARG:NH2	91:Ab:193:ASP:HB2	2.27	0.49
57:D:134:LEU:HB2	57:D:135:PRO:HD3	1.95	0.49
61:H:27:ARG:HH12	61:H:96:LYS:HA	1.77	0.49
65:L:135:ASP:O	65:L:137:VAL:HG22	2.13	0.49
68:O:106:ILE:HD11	88:Az:21:MET:SD	2.53	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
71:R:20:ASN:OD1	71:R:21:PHE:N	2.45	0.49
71:R:262:ALA:N	89:At:108:MET:HE2	2.28	0.49
77:X:173:GLY:HA3	77:X:205:PHE:CD2	2.47	0.49
77:X:290:MET:SD	77:X:400:VAL:HG21	2.52	0.49
78:Y:162:ARG:HB2	78:Y:163:PRO:HD2	1.95	0.49
78:Y:234:ILE:O	78:Y:238:HIS:N	2.45	0.49
79:Z:84:SER:HB2	1:1:76:U:OP2	2.12	0.49
80:BA:23:TYR:CE2	98:Ar:127:ARG:HD3	2.48	0.49
91:Ab:36:PHE:HE2	91:Ab:45:ILE:HD11	1.78	0.49
91:Ab:169:ASP:O	91:Ab:173:ALA:N	2.26	0.49
93:Ap:139:ARG:O	93:Ap:143:GLN:N	2.46	0.49
97:BM:51:GLU:OE2	97:BM:312:VAL:HG23	2.13	0.49
97:BM:89:ARG:O	97:BM:92:THR:OG1	2.29	0.49
101:Am:27:LEU:O	111:Ae:55:HIS:ND1	2.43	0.49
109:Af:114:PRO:C	109:Af:115:LYS:HD3	2.37	0.49
111:Ae:61:ASN:OD1	111:Ae:92:ARG:NH2	2.40	0.49
118:BL:90:PRO:O	118:BL:91:PHE:HB2	2.13	0.49
1:1:320:G:N2	1:1:322:A:O3'	2.45	0.49
1:1:482:A:H2'	1:1:483:U:C4'	2.42	0.49
1:1:559:U:O2'	1:1:560:U:H3'	2.13	0.49
1:1:643:G:H2'	1:1:644:C:O4'	2.13	0.49
1:2:46:U:H5''	1:2:46:U:H6	1.77	0.49
1:2:66:U:O5'	35:t:35:ARG:CG	2.57	0.49
1:2:442:A:HO2'	1:2:443:C:H6	1.59	0.49
1:2:504:A:N9	6:s:80:GLN:NE2	2.60	0.49
1:2:529:A:C2'	16:az:73:PRO:CD	2.58	0.49
1:2:560:U:C2'	1:2:561:G:H5''	2.42	0.49
4:m:128:LYS:HA	4:m:133:ASN:HD22	1.78	0.49
6:s:37:ARG:HD2	14:e:673:HIS:NE2	2.28	0.49
6:s:94:ASN:ND2	20:u:716:VAL:HG21	2.28	0.49
7:au:61:LEU:HD23	24:ac:1231:ALA:HB1	1.93	0.49
7:au:152:ARG:NH2	22:ab:385:TYR:OH	2.46	0.49
7:au:158:HIS:HB3	7:au:160:TYR:HE1	1.77	0.49
8:am:114:LYS:O	8:am:118:LYS:HG2	2.13	0.49
10:ae:348:ASP:HA	10:ae:351:VAL:HG12	1.94	0.49
10:ae:387:ALA:HB3	10:ae:427:ASN:HD22	1.76	0.49
12:ag:256:PHE:O	14:e:289:LEU:HD22	2.12	0.49
18:r:437:GLU:OE2	18:r:439:LYS:N	2.46	0.49
19:af:397:LEU:HB2	19:af:501:TYR:CE1	2.47	0.49
20:u:174:VAL:HG22	20:u:178:MET:HB3	1.95	0.49
21:aa:148:GLN:HE22	48:q:101:LYS:HE3	1.78	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
21:aa:461:PRO:HD3	21:aa:500:TYR:CE2	2.47	0.49
21:aa:1029:PHE:CG	26:an:265:GLU:HG2	2.48	0.49
24:ac:256:GLU:O	24:ac:260:LEU:HG	2.13	0.49
25:ad:156:GLN:NE2	48:q:70:ARG:HH11	2.11	0.49
26:an:179:GLN:HE22	26:an:238:LEU:HD11	1.78	0.49
28:ap:146:MET:HE1	48:q:132:PHE:CD2	2.48	0.49
28:ap:206:ARG:O	48:q:129:ARG:NH2	2.45	0.49
29:aq:101:PHE:CG	29:aq:110:PRO:HG3	2.48	0.49
36:p:197:PRO:O	36:p:201:THR:OG1	2.28	0.49
40:av:175:LEU:HG	40:av:176:LEU:H	1.78	0.49
50:a:368:ARG:HG3	50:a:370:ASP:OD1	2.13	0.49
55:B:50:SER:OG	55:B:211:GLY:O	2.29	0.49
55:B:147:TRP:HH2	67:N:87:PHE:CD2	2.31	0.49
60:G:227:PRO:HG2	60:G:228:TYR:CE2	2.48	0.49
60:G:366:MET:SD	70:Q:28:ARG:NH1	2.69	0.49
61:H:81:ALA:O	61:H:126:THR:HG22	2.13	0.49
63:J:101:MET:HE2	63:J:132:TRP:CD2	2.48	0.49
65:L:166:TRP:CD1	95:Aa:126:GLU:HG3	2.48	0.49
66:M:196:HIS:HA	66:M:241:MET:HE2	1.95	0.49
68:O:137:TYR:HB3	68:O:138:PRO:HD2	1.95	0.49
68:O:260:GLN:H	68:O:260:GLN:CD	2.19	0.49
69:P:43:VAL:HA	102:Aq:55:ASN:ND2	2.27	0.49
80:BA:49:SER:OG	80:BA:50:ALA:N	2.46	0.49
85:An:79:HIS:HB2	118:BL:107:TRP:CG	2.48	0.49
85:An:134:ILE:HD11	85:An:169:PHE:HZ	1.76	0.49
85:An:229:ARG:HH22	85:An:233:ARG:N	2.11	0.49
87:BI:147:ARG:HH11	87:BI:148:ASN:ND2	2.11	0.49
96:Ao:232:TYR:HE2	98:Ar:103:ARG:CZ	2.25	0.49
99:Aj:129:GLU:O	99:Aj:284:LEU:N	2.42	0.49
100:BH:101:ARG:NH2	1:1:365:U:O2	2.46	0.49
101:Am:129:VAL:HG12	101:Am:150:VAL:HG23	1.94	0.49
102:Aq:37:ASP:OD1	102:Aq:38:LEU:N	2.45	0.49
105:BP:8:ASP:OD2	1:1:491:U:O2'	2.26	0.49
108:Av:32:GLN:NE2	108:Av:83:GLY:O	2.46	0.49
112:Ac:150:ALA:O	112:Ac:151:LEU:HB2	2.12	0.49
113:Ah:349:GLU:O	113:Ah:353:VAL:HG12	2.13	0.49
116:Ag:216:ILE:HD11	116:Ag:231:LEU:HD22	1.95	0.49
118:BL:116:PHE:O	118:BL:118:HIS:CD2	2.66	0.49
118:BL:241:GLY:HA3	1:1:671:U:C4	2.48	0.49
1:1:47:A:N6	1:1:131:U:H3	2.11	0.49
1:1:299:U:H4'	1:1:300:A:O5'	2.13	0.49

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:170:U:O4	37:j:17:LYS:N	2.45	0.48
1:2:295:U:O2'	1:2:296:A:C8	2.58	0.48
1:2:384:U:C2'	1:2:385:U:H5'	2.43	0.48
1:2:397:U:H5''	1:2:397:U:H6	1.78	0.48
1:2:413:U:N3	2:h:23:HIS:ND1	2.55	0.48
1:2:413:U:O4'	1:2:413:U:OP2	2.31	0.48
1:2:435:U:O2	1:2:435:U:O5'	2.31	0.48
1:2:460:A:C2'	8:am:282:GLN:O	2.61	0.48
1:2:493:U:O2	1:2:493:U:O4'	2.30	0.48
1:2:526:A:N6	15:d:294:ILE:H	2.04	0.48
1:2:575:G:H2'	1:2:576:U:O5'	2.13	0.48
3:aw:123:PRO:HG3	20:u:817:TYR:CE1	2.47	0.48
6:s:117:LEU:HG	12:ag:388:PHE:CD2	2.47	0.48
7:au:138:SER:OG	7:au:139:HIS:N	2.46	0.48
8:am:62:ASP:OD1	8:am:65:ARG:NH1	2.45	0.48
9:n:105:TYR:CE1	9:n:109:HIS:HB3	2.48	0.48
10:ae:231:ASP:OD1	10:ae:231:ASP:N	2.45	0.48
14:e:324:HIS:CE1	20:u:322:ALA:HB3	2.41	0.48
14:e:637:GLU:HG2	14:e:641:ARG:HG3	1.94	0.48
15:d:110:LEU:HD13	15:d:119:ASN:ND2	2.28	0.48
20:u:169:THR:O	20:u:173:GLU:N	2.37	0.48
22:ab:386:ARG:HG3	22:ab:391:ASP:HB2	1.94	0.48
22:ab:617:TYR:CZ	22:ab:621:LEU:HD11	2.48	0.48
23:ak:23:HIS:CD2	23:ak:161:HIS:HB3	2.47	0.48
23:ak:270:ARG:NH1	24:ac:558:PHE:HA	2.26	0.48
24:ac:111:TRP:HE1	24:ac:494:ARG:CZ	2.25	0.48
24:ac:1248:THR:HG23	24:ac:1254:MET:HB2	1.95	0.48
25:ad:212:ILE:HD13	25:ad:236:CYS:HB3	1.95	0.48
26:an:253:ASN:N	26:an:253:ASN:OD1	2.46	0.48
30:as:261:ARG:NE	35:t:12:ASP:OD1	2.35	0.48
31:at:307:ARG:HA	31:at:322:THR:HA	1.95	0.48
33:w:167:ILE:HB	35:t:72:ASP:HB2	1.93	0.48
39:ar:153:CYS:O	39:ar:157:CYS:N	2.30	0.48
43:i:161:PRO:HB2	43:i:216:PHE:CE1	2.48	0.48
45:o:94:TRP:HH2	45:o:108:LEU:HD12	1.76	0.48
45:o:132:ARG:CD	50:a:349:TRP:CD2	2.95	0.48
50:a:91:ASN:ND2	50:a:302:PRO:HG2	2.28	0.48
50:a:176:ALA:HB3	50:a:245:PHE:CD1	2.47	0.48
52:z:264:LEU:HB2	52:z:363:ASN:HD21	1.78	0.48
54:A:162:GLN:HB3	54:A:206:LYS:HE3	1.94	0.48
54:A:299:GLU:HG2	54:A:300:THR:H	1.78	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
59:F:20:GLY:O	101:Am:54:ASN:N	2.46	0.48
61:H:93:VAL:HG12	61:H:94:VAL:H	1.78	0.48
66:M:118:LEU:O	66:M:121:GLU:N	2.45	0.48
68:O:65:LYS:HE2	1:1:135:A:N6	2.16	0.48
68:O:204:ASP:HB3	68:O:207:THR:HB	1.95	0.48
71:R:247:CYS:HA	71:R:252:ASN:HA	1.94	0.48
74:U:54:ILE:O	74:U:54:ILE:HG13	2.12	0.48
74:U:72:MET:HB2	74:U:83:MET:HG3	1.95	0.48
75:V:116:ASP:HA	75:V:119:GLN:HB3	1.94	0.48
83:Aw:43:VAL:HG11	83:Aw:90:ARG:NH1	2.28	0.48
83:Aw:165:ARG:NH1	83:Aw:167:GLU:OE1	2.46	0.48
85:An:24:HIS:HD2	94:Au:11:ARG:N	2.11	0.48
91:Ab:29:MET:HG2	91:Ab:33:LEU:HD13	1.95	0.48
91:Ab:129:PRO:HA	95:Aa:69:THR:OG1	2.13	0.48
94:Au:48:ASN:OD1	94:Au:50:ASP:N	2.46	0.48
97:BM:158:MET:HG3	97:BM:217:LYS:NZ	2.27	0.48
99:Aj:350:TYR:HE1	99:Aj:401:MET:HE1	1.78	0.48
112:Ac:129:VAL:HA	112:Ac:132:GLN:HE21	1.77	0.48
113:Ah:268:ASN:OD1	113:Ah:269:THR:N	2.45	0.48
115:Ay:64:ILE:HG23	1:1:697:A:H5'	1.95	0.48
116:Ag:22:THR:O	116:Ag:24:PRO:HD3	2.13	0.48
1:1:269:A:C2	1:1:271:U:H1'	2.47	0.48
1:1:390:A:H2	1:1:391:A:C8	2.30	0.48
1:1:1013:U:H5''	1:1:1014:U:C4	2.48	0.48
1:2:225:G:O6	1:2:248:C:C4	2.67	0.48
1:2:348:U:C2'	1:2:349:G:C8	2.86	0.48
1:2:409:U:H5'	1:2:486:A:H62	1.78	0.48
1:2:525:A:OP2	15:d:329:ARG:HA	2.10	0.48
1:2:559:U:H2'	1:2:559:U:O2	2.11	0.48
1:2:574:C:OP2	1:2:574:C:H6	1.96	0.48
1:2:615:U:OP2	44:g:101:ARG:NE	2.29	0.48
2:h:134:TYR:CG	8:am:298:ARG:HD3	2.48	0.48
7:au:46:LYS:NZ	24:ac:1234:THR:HB	2.27	0.48
8:am:293:TRP:CE3	14:e:74:TYR:HD1	2.31	0.48
12:ag:93:THR:O	12:ag:128:SER:OG	2.29	0.48
12:ag:234:TYR:O	12:ag:238:ILE:HG12	2.13	0.48
12:ag:515:GLU:HG2	38:l:512:GLU:HB3	1.93	0.48
14:e:179:LEU:HD11	15:d:310:LEU:HD21	1.94	0.48
14:e:310:PRO:C	20:u:631:PRO:HD2	2.38	0.48
15:d:114:PRO:HD3	36:p:117:TRP:HB3	1.95	0.48
18:r:90:PHE:HD1	18:r:107:LEU:HD12	1.77	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
18:r:153:HIS:HA	18:r:265:HIS:NE2	2.27	0.48
18:r:233:VAL:HG21	20:u:837:TYR:CE2	2.49	0.48
21:aa:1096:LEU:HD23	50:a:429:LEU:HD21	1.94	0.48
21:aa:1378:VAL:HG13	21:aa:1622:TYR:CD1	2.49	0.48
21:aa:1570:LEU:O	21:aa:1574:ILE:HG13	2.13	0.48
24:ac:293:PHE:HD2	24:ac:311:ILE:HD13	1.77	0.48
24:ac:1050:ALA:O	24:ac:1052:SER:N	2.46	0.48
25:ad:546:LEU:HB3	30:as:198:LEU:HD13	1.95	0.48
26:an:46:PHE:CE1	52:z:972:PRO:HD3	2.48	0.48
30:as:33:VAL:HG21	40:av:104:GLN:NE2	2.26	0.48
40:av:46:PRO:C	40:av:81:HIS:HE1	2.20	0.48
43:i:246:ASN:O	43:i:250:THR:HG23	2.13	0.48
43:i:264:ARG:NH2	43:i:304:ASP:OD2	2.46	0.48
45:o:124:ILE:O	45:o:128:ARG:HG3	2.13	0.48
52:z:340:ALA:HA	52:z:343:HIS:HD2	1.78	0.48
54:A:166:HIS:ND1	54:A:178:VAL:HG22	2.28	0.48
56:C:70:ARG:NH1	56:C:70:ARG:HB2	2.28	0.48
65:L:154:ALA:HB1	95:Aa:67:PRO:HD2	1.94	0.48
66:M:63:ASP:O	99:Aj:476:ARG:NH2	2.45	0.48
79:Z:154:LYS:HB3	79:Z:155:PRO:HD2	1.96	0.48
84:Bj:70:ILE:HD11	112:Ac:79:GLN:NE2	2.28	0.48
89:At:33:ASN:ND2	1:1:123:U:H5'	2.28	0.48
90:BC:127:ALA:O	90:BC:131:GLY:N	2.45	0.48
91:Ab:132:GLN:HA	91:Ab:135:ARG:NE	2.28	0.48
91:Ab:133:TRP:HH2	101:Am:75:PHE:HB2	1.78	0.48
91:Ab:257:GLN:NE2	96:Ao:248:GLN:OE1	2.46	0.48
92:Ai:406:GLU:HB2	92:Ai:432:LYS:HB3	1.95	0.48
93:Ap:58:ILE:HG22	93:Ap:89:VAL:HG11	1.95	0.48
97:BM:45:SER:CB	97:BM:118:ILE:HD13	2.43	0.48
101:Am:13:TRP:HZ3	101:Am:15:HIS:CE1	2.31	0.48
105:BP:96:PRO:C	105:BP:98:PRO:HD2	2.37	0.48
109:Af:40:ASN:O	109:Af:43:ILE:N	2.40	0.48
111:Ae:25:LEU:H	111:Ae:25:LEU:HD12	1.79	0.48
112:Ac:53:TYR:CE1	112:Ac:170:TYR:HB3	2.48	0.48
114:BD:13:CYS:SG	114:BD:14:GLY:N	2.86	0.48
119:BO:172:ARG:NH2	119:BO:172:ARG:CB	2.76	0.48
1:1:55:A:H2'	1:1:56:U:O4'	2.14	0.48
1:1:120:A:H2	1:1:121:U:C5	2.30	0.48
1:1:433:G:HO2'	1:1:434:U:H3'	1.78	0.48
1:1:450:A:O2'	1:1:451:A:H4'	2.13	0.48
1:1:643:G:OP2	1:1:680:A:C4	2.66	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:935:G:N2	1:1:936:G:C4	2.81	0.48
1:2:465:A:C5	8:am:52:LYS:HB3	2.48	0.48
1:2:471:A:N3	12:ag:19:ARG:HB3	2.28	0.48
1:2:471:A:H1'	12:ag:19:ARG:HG2	1.95	0.48
1:2:583:A:H5''	1:2:584:U:H5'	1.95	0.48
4:m:197:GLU:N	4:m:197:GLU:OE2	2.42	0.48
10:ae:222:ARG:CZ	22:ab:1090:ASN:HB3	2.43	0.48
12:ag:321:THR:OG1	12:ag:322:SER:N	2.46	0.48
14:e:313:GLY:O	20:u:630:LEU:HA	2.14	0.48
15:d:57:ASP:HB3	15:d:60:GLN:HG3	1.95	0.48
15:d:226:MET:HE3	15:d:284:GLY:HA2	1.94	0.48
19:af:528:SER:O	19:af:618:ARG:NH1	2.45	0.48
20:u:196:GLN:O	20:u:226:TYR:OH	2.17	0.48
20:u:223:ARG:O	20:u:227:GLN:HG2	2.13	0.48
21:aa:644:ASP:H	21:aa:682:VAL:H	1.61	0.48
21:aa:819:ASP:O	21:aa:867:LYS:HE2	2.12	0.48
21:aa:1520:ILE:HG12	26:an:194:TRP:CD1	2.48	0.48
21:aa:1542:TYR:HD1	21:aa:1550:VAL:HG22	1.77	0.48
22:ab:268:GLN:N	22:ab:268:GLN:OE1	2.45	0.48
24:ac:503:ASP:O	24:ac:507:GLY:N	2.27	0.48
24:ac:703:TRP:O	24:ac:892:VAL:HG13	2.13	0.48
24:ac:799:THR:HA	24:ac:1081:GLU:CD	2.38	0.48
24:ac:937:PHE:HD1	24:ac:938:LEU:HD22	1.78	0.48
24:ac:951:PHE:O	24:ac:955:GLN:HG2	2.13	0.48
26:an:150:ARG:HH22	42:x:66:GLN:HG2	1.77	0.48
28:ap:5:VAL:HG21	52:z:758:ARG:HG3	1.95	0.48
32:y:158:LEU:HD21	32:y:176:LEU:HD22	1.95	0.48
34:v:94:ARG:HD2	34:v:125:LEU:HD12	1.95	0.48
38:l:666:GLU:HA	38:l:669:GLU:OE2	2.13	0.48
39:ar:33:GLY:O	39:ar:37:GLU:HB2	2.13	0.48
42:x:30:GLY:HA2	42:x:33:ARG:HH22	1.77	0.48
45:o:143:LEU:HD12	45:o:143:LEU:O	2.13	0.48
45:o:234:GLU:O	45:o:238:GLY:N	2.44	0.48
45:o:354:LYS:HB2	50:a:294:HIS:CD2	2.48	0.48
45:o:360:ASP:OD2	52:z:284:TYR:HB2	2.13	0.48
54:A:288:HIS:HE2	1:1:1024:U:HO2'	1.59	0.48
55:B:287:GLU:OE1	55:B:288:PRO:HD2	2.13	0.48
59:F:58:LYS:HD2	111:Ae:72:ASN:HD21	1.77	0.48
60:G:174:ARG:HA	60:G:217:VAL:HG13	1.94	0.48
62:I:150:LYS:HA	73:T:71:GLU:HB3	1.95	0.48
62:I:256:GLU:HA	62:I:259:HIS:CD2	2.48	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
67:N:75:GLU:C	67:N:77:ASN:H	2.22	0.48
71:R:167:HIS:HD2	71:R:169:GLY:N	2.05	0.48
72:S:281:ARG:O	99:Aj:112:THR:HG21	2.14	0.48
72:S:372:ARG:NH2	106:Ad:198:GLU:OE1	2.47	0.48
73:T:35:PRO:O	73:T:39:ARG:N	2.44	0.48
75:V:48:GLY:HA2	77:X:459:ARG:O	2.14	0.48
77:X:300:VAL:HB	77:X:305:GLY:O	2.14	0.48
82:BB:120:VAL:HG13	82:BB:122:ASP:H	1.78	0.48
86:Al:57:GLY:N	1:1:698:G:H21	2.11	0.48
92:Ai:343:GLU:OE1	92:Ai:343:GLU:N	2.39	0.48
95:Aa:34:ARG:NH1	1:1:153:U:OP1	2.32	0.48
97:BM:271:ARG:C	97:BM:274:GLY:H	2.22	0.48
100:BH:84:ILE:HG23	100:BH:90:MET:HG2	1.94	0.48
101:Am:217:ARG:HG2	101:Am:220:THR:HG22	1.96	0.48
101:Am:290:LEU:HD13	101:Am:293:THR:HB	1.94	0.48
106:Ad:119:LEU:HD13	106:Ad:124:PRO:O	2.13	0.48
108:Av:143:ASN:HB3	1:1:454:A:C8	2.48	0.48
118:BL:281:VAL:O	118:BL:282:MET:HB2	2.13	0.48
1:1:347:A:OP2	1:1:347:A:C8	2.66	0.48
1:1:991:G:N1	1:1:992:G:C2	2.81	0.48
1:1:1123:U:O2'	1:1:1124:A:H5'	2.13	0.48
1:1:1126:A:H4'	1:1:1127:U:OP1	2.14	0.48
1:2:51:A:H1'	1:2:149:A:H1'	1.94	0.48
1:2:65:U:C1'	1:2:66:U:P	3.00	0.48
1:2:127:A:H2'	1:2:128:G:O5'	2.14	0.48
1:2:283:U:O2	43:i:248:VAL:HG23	2.14	0.48
1:2:356:G:H2'	1:2:357:C:C2	2.48	0.48
1:2:485:A:H8	9:n:57:ILE:O	1.96	0.48
1:2:493:U:O2	15:d:339:VAL:HG12	2.13	0.48
1:2:603:A:C5	1:2:604:U:C5	3.01	0.48
4:m:29:ASN:ND2	52:z:138:MET:SD	2.86	0.48
5:f:124:VAL:HG22	36:p:151:TYR:CE2	2.48	0.48
11:ay:119:ARG:HH12	22:ab:1131:VAL:HG12	1.78	0.48
12:ag:38:SER:O	13:aj:49:PRO:HB2	2.14	0.48
18:r:13:VAL:HG11	18:r:24:LYS:NZ	2.29	0.48
19:af:152:TRP:CD1	19:af:152:TRP:H	2.31	0.48
20:u:301:VAL:HB	20:u:631:PRO:CB	2.44	0.48
20:u:421:MET:HE3	20:u:553:ARG:HA	1.95	0.48
21:aa:339:TRP:HE1	31:at:251:LYS:HE3	1.76	0.48
21:aa:429:ASP:N	21:aa:429:ASP:OD1	2.44	0.48
21:aa:1300:LYS:HA	21:aa:1310:VAL:HG12	1.95	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
22:ab:66:ARG:HH21	22:ab:72:GLY:C	2.21	0.48
22:ab:371:ASP:OD1	22:ab:372:GLU:N	2.47	0.48
23:ak:122:ILE:HG21	24:ac:1113:ALA:HB2	1.94	0.48
26:an:114:TYR:CE2	26:an:118:LEU:HD11	2.48	0.48
30:as:139:CYS:SG	30:as:140:LEU:N	2.85	0.48
32:y:160:ILE:O	32:y:193:LEU:N	2.44	0.48
43:i:181:TYR:HE1	49:b:156:TYR:O	1.97	0.48
45:o:471:ARG:HB3	45:o:473:PHE:HE1	1.78	0.48
48:q:102:ARG:O	48:q:106:GLN:HB2	2.14	0.48
50:a:431:HIS:HB3	52:z:1027:TYR:CD2	2.48	0.48
54:A:86:TYR:HE1	54:A:91:GLU:HG2	1.78	0.48
54:A:166:HIS:HD2	54:A:222:VAL:HG23	1.79	0.48
62:I:187:PHE:CE1	62:I:250:TRP:HB2	2.49	0.48
64:K:21:ARG:NH1	64:K:29:ARG:O	2.34	0.48
66:M:91:ARG:HH12	99:Aj:475:ARG:CZ	2.27	0.48
66:M:139:VAL:O	66:M:141:SER:N	2.46	0.48
69:P:53:PHE:HB2	69:P:56:ASP:HA	1.95	0.48
70:Q:158:ARG:O	70:Q:162:VAL:HG23	2.14	0.48
72:S:331:ARG:NH1	105:BP:62:GLU:OE1	2.46	0.48
77:X:128:LEU:HB2	77:X:166:ASN:ND2	2.28	0.48
78:Y:279:HIS:CD2	78:Y:281:ALA:H	2.32	0.48
91:Ab:168:THR:O	91:Ab:172:GLU:HG2	2.13	0.48
97:BM:235:LYS:C	97:BM:238:PRO:HD2	2.38	0.48
102:Aq:114:VAL:HA	102:Aq:117:MET:HB2	1.95	0.48
104:Ak:41:ALA:HA	104:Ak:44:ARG:NH1	2.26	0.48
105:BP:79:ASP:HB3	105:BP:82:ILE:HD12	1.95	0.48
105:BP:163:ARG:HG3	105:BP:164:ARG:N	2.28	0.48
110:As:138:ARG:HG3	110:As:139:GLU:OE1	2.12	0.48
111:Ae:185:VAL:O	111:Ae:224:SER:N	2.32	0.48
112:Ac:160:THR:HG22	112:Ac:162:HIS:H	1.78	0.48
112:Ac:288:THR:HG22	112:Ac:290:GLU:H	1.78	0.48
118:BL:284:ASN:ND2	1:1:671:U:H1'	2.27	0.48
119:BO:60:LEU:HB2	119:BO:86:GLU:HB2	1.95	0.48
1:1:70:G:H4'	1:1:70:G:OP1	2.14	0.48
1:1:448:U:O2'	1:1:449:U:O5'	2.30	0.48
1:1:691:G:C2	1:1:709:U:O2	2.66	0.48
1:2:32:A:C2'	1:2:33:A:C5'	2.89	0.48
1:2:37:U:O2	1:2:173:A:H2	1.94	0.48
1:2:101:G:N3	1:2:101:G:H2'	2.29	0.48
1:2:102:U:H2'	1:2:103:U:C6	2.49	0.48
1:2:171:A:N7	33:w:102:ARG:NH1	2.62	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:229:C:C2'	1:2:241:G:C2	2.97	0.48
1:2:440:C:OP1	2:h:19:ARG:HA	2.14	0.48
1:2:501:U:O4	3:aw:27:ARG:NE	2.46	0.48
1:2:502:A:C2	14:e:721:ARG:HA	2.40	0.48
1:2:521:A:OP1	5:f:10:ARG:N	2.42	0.48
2:h:152:TRP:HD1	14:e:809:ASN:ND2	2.12	0.48
4:m:74:HIS:O	4:m:106:GLN:NE2	2.47	0.48
9:n:99:VAL:HG21	9:n:103:GLN:NE2	2.29	0.48
12:ag:388:PHE:O	12:ag:392:GLU:N	2.33	0.48
13:aj:113:ASP:CG	13:aj:116:ALA:H	2.22	0.48
14:e:198:ILE:HG13	14:e:199:PRO:HD2	1.94	0.48
14:e:231:ASN:OD1	20:u:689:GLU:HG3	2.14	0.48
14:e:463:HIS:CE1	14:e:676:LEU:HD11	2.49	0.48
14:e:485:LEU:HD23	14:e:485:LEU:H	1.78	0.48
18:r:152:THR:HB	18:r:264:THR:HG22	1.96	0.48
18:r:245:GLU:HG3	18:r:319:ASN:ND2	2.29	0.48
19:af:666:PHE:O	19:af:670:VAL:HG23	2.13	0.48
20:u:93:TYR:HB3	22:ab:234:ARG:HD3	1.95	0.48
21:aa:122:ARG:NH2	25:ad:700:GLU:O	2.36	0.48
21:aa:1105:LYS:HD3	50:a:361:ASN:OD1	2.13	0.48
22:ab:556:ASP:C	22:ab:558:GLU:H	2.20	0.48
25:ad:197:TRP:CZ3	25:ad:207:PRO:HG3	2.49	0.48
27:ao:22:LYS:N	27:ao:117:TYR:O	2.34	0.48
29:aq:156:GLU:HG2	29:aq:197:TYR:HE2	1.79	0.48
32:y:191:TRP:HH2	36:p:296:THR:H	1.62	0.48
38:l:144:TRP:HZ2	38:l:318:ILE:HD13	1.77	0.48
38:l:150:TYR:O	38:l:154:LEU:HD23	2.13	0.48
41:ai:256:ILE:O	41:ai:259:LEU:HD22	2.13	0.48
49:b:146:LYS:HG2	49:b:150:ARG:HB3	1.93	0.48
50:a:104:PHE:CE1	50:a:106:TRP:HB2	2.48	0.48
52:z:264:LEU:HD11	52:z:302:CYS:SG	2.54	0.48
52:z:709:LEU:HD22	52:z:714:MET:HE3	1.96	0.48
54:A:169:ARG:NH1	54:A:172:ASP:OD2	2.46	0.48
54:A:255:HIS:CE1	54:A:289:ARG:HB3	2.49	0.48
58:E:22:GLY:HA2	108:Av:104:THR:C	2.38	0.48
58:E:145:TYR:CG	58:E:190:ALA:HB2	2.48	0.48
59:F:6:LEU:H	59:F:8:ARG:NH1	2.12	0.48
61:H:30:ARG:HH11	1:1:389:A:H62	1.60	0.48
62:I:223:HIS:CE1	107:BF:87:LEU:HG	2.48	0.48
64:K:77:TRP:HZ2	64:K:81:ARG:HH11	1.61	0.48
66:M:31:HIS:CE1	1:1:177:G:H5'	2.47	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
66:M:143:TRP:CD1	66:M:229:SER:HB2	2.48	0.48
67:N:150:GLU:HG3	67:N:152:ARG:HH12	1.77	0.48
68:O:218:VAL:O	68:O:226:LEU:HA	2.14	0.48
71:R:289:SER:HA	71:R:476:GLY:O	2.13	0.48
78:Y:110:GLU:CD	112:Ac:39:VAL:HB	2.37	0.48
79:Z:76:ARG:HH22	1:1:70:G:P	2.37	0.48
86:Al:272:GLU:N	86:Al:272:GLU:CD	2.72	0.48
89:At:14:LYS:O	89:At:17:ARG:HG2	2.12	0.48
91:Ab:170:ILE:HG21	91:Ab:228:HIS:HE1	1.79	0.48
92:Ai:218:HIS:HE1	102:Aq:139:ASP:OD2	1.96	0.48
96:Ao:193:VAL:O	96:Ao:197:LEU:N	2.35	0.48
99:Aj:209:LEU:HD22	109:Af:144:THR:OG1	2.14	0.48
99:Aj:342:LEU:HD21	1:1:333:A:C5	2.48	0.48
101:Am:225:TRP:CZ2	103:BE:111:PRO:HD3	2.49	0.48
110:As:133:THR:OG1	110:As:134:PRO:HD3	2.13	0.48
113:Ah:57:LEU:H	113:Ah:57:LEU:HD12	1.77	0.48
113:Ah:264:VAL:HA	113:Ah:267:PHE:CD2	2.48	0.48
115:Ay:96:GLU:HG2	115:Ay:97:THR:HG23	1.95	0.48
118:BL:127:LYS:HG3	1:1:667:A:OP1	2.13	0.48
122:UC:103:UNK:O	122:UC:107:UNK:N	2.47	0.48
1:1:162:G:N3	1:1:162:G:H2'	2.28	0.48
1:1:649:A:HO2'	1:1:650:U:P	2.35	0.48
1:1:992:G:O2'	1:1:993:U:O5'	2.31	0.48
1:1:1068:A:N6	1:1:1096:A:H2'	2.29	0.48
1:1:1079:A:C6	1:1:1080:A:N7	2.82	0.48
1:2:42:U:O2'	1:2:44:A:H1'	2.07	0.48
1:2:44:A:O5'	29:aq:26:ALA:HB3	2.14	0.48
1:2:417:C:H42	10:ae:131:ARG:NE	2.11	0.48
1:2:436:U:C1'	6:s:153:LYS:C	2.70	0.48
1:2:446:G:O2'	1:2:471:A:N6	2.47	0.48
1:2:495:U:C6	3:aw:30:LYS:C	2.91	0.48
1:2:507:A:C8	3:aw:28:LEU:HD11	2.43	0.48
12:ag:123:VAL:HG21	12:ag:194:GLN:HB3	1.94	0.48
14:e:313:GLY:H	20:u:629:VAL:C	2.21	0.48
19:af:374:HIS:CD2	19:af:388:PHE:HB3	2.49	0.48
19:af:614:ALA:O	19:af:618:ARG:HG2	2.12	0.48
19:af:662:GLY:HA2	19:af:665:ALA:HB3	1.95	0.48
20:u:273:GLY:O	22:ab:883:GLN:NE2	2.46	0.48
21:aa:216:VAL:O	45:o:422:GLN:NE2	2.47	0.48
21:aa:853:TYR:CE2	52:z:993:ARG:HB3	2.48	0.48
21:aa:1031:LEU:HD21	26:an:276:ARG:HD3	1.95	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
22:ab:351:GLN:H	22:ab:363:ARG:NH1	2.09	0.48
22:ab:710:PRO:HA	22:ab:774:THR:HA	1.96	0.48
23:ak:13:LEU:HA	23:ak:16:ARG:HB2	1.95	0.48
24:ac:364:ARG:O	24:ac:368:ALA:N	2.43	0.48
24:ac:424:LEU:HB3	24:ac:427:THR:OG1	2.14	0.48
24:ac:574:TYR:O	24:ac:578:LYS:N	2.46	0.48
25:ad:107:ASP:OD1	25:ad:107:ASP:N	2.45	0.48
25:ad:530:ALA:H	25:ad:533:PHE:HD2	1.62	0.48
25:ad:615:LEU:HD13	35:t:199:VAL:HG11	1.95	0.48
26:an:24:PRO:HD3	26:an:244:MET:HG3	1.94	0.48
30:as:70:LEU:HD23	30:as:81:MET:SD	2.53	0.48
30:as:249:GLU:HG2	35:t:14:LEU:HD13	1.96	0.48
32:y:118:VAL:HG13	32:y:119:GLY:H	1.79	0.48
32:y:153:MET:N	36:p:167:GLU:OE1	2.47	0.48
43:i:252:LEU:HA	43:i:255:THR:HG22	1.95	0.48
52:z:367:ILE:HD12	52:z:818:LEU:HD11	1.95	0.48
52:z:726:LEU:HD13	52:z:730:ASP:O	2.13	0.48
54:A:67:TYR:OH	54:A:91:GLU:OE1	2.25	0.48
54:A:245:ASP:OD1	54:A:246:TYR:N	2.47	0.48
54:A:400:ASP:OD1	54:A:400:ASP:N	2.44	0.48
56:C:112:GLU:HG2	56:C:140:ASN:HA	1.95	0.48
57:D:122:PHE:O	57:D:126:THR:N	2.46	0.48
58:E:241:ARG:HH21	91:Ab:217:LEU:HB2	1.78	0.48
58:E:266:ASN:HD21	91:Ab:170:ILE:HG23	1.78	0.48
61:H:164:TYR:OH	98:Ar:149:GLU:OE2	2.25	0.48
63:J:53:ILE:HG23	63:J:54:ILE:HG22	1.95	0.48
66:M:82:ARG:HG3	66:M:93:THR:HB	1.94	0.48
71:R:211:SER:C	71:R:213:THR:H	2.21	0.48
76:W:91:ALA:O	76:W:92:HIS:C	2.56	0.48
80:BA:101:CYS:HA	80:BA:104:LEU:HD12	1.94	0.48
81:UA:186:UNK:O	81:UA:190:UNK:N	2.47	0.48
82:BB:109:THR:O	82:BB:110:PHE:CB	2.62	0.48
90:BC:26:TRP:O	90:BC:30:GLN:HG2	2.14	0.48
90:BC:119:GLN:HB2	112:Ac:104:ILE:HD11	1.94	0.48
91:Ab:240:ARG:HD2	108:Av:149:LEU:HD13	1.95	0.48
92:Ai:348:VAL:HG22	92:Ai:376:VAL:HG22	1.95	0.48
96:Ao:275:ALA:H	96:Ao:280:ASN:ND2	2.10	0.48
97:BM:76:TYR:HH	97:BM:323:ARG:C	2.21	0.48
97:BM:95:GLU:OE2	97:BM:115:ASN:HB2	2.12	0.48
97:BM:147:ASP:HA	97:BM:195:MET:HE2	1.96	0.48
98:Ar:136:TRP:CE3	98:Ar:142:ARG:HB2	2.48	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
104:Ak:222:VAL:HG23	104:Ak:245:VAL:HG13	1.94	0.48
105:BP:-14:PHE:HE2	105:BP:-9:PRO:HG2	1.78	0.48
106:Ad:158:VAL:HG21	106:Ad:233:LEU:HD22	1.96	0.48
109:Af:71:HIS:HB2	109:Af:72:GLU:OE1	2.14	0.48
1:1:206:U:O2'	1:1:207:G:H5'	2.13	0.48
1:1:361:A:H8	1:1:361:A:O5'	1.96	0.48
1:1:548:A:O2'	1:1:549:C:O5'	2.25	0.48
1:1:941:A:N1	1:1:942:C:N4	2.61	0.48
1:1:1105:G:H8	1:1:1105:G:OP2	1.96	0.48
1:2:82:A:O3'	39:ar:32:LEU:HD22	2.14	0.48
1:2:106:U:N3	1:2:110:A:C2	2.80	0.48
1:2:146:A:H2'	1:2:147:U:C5'	2.44	0.48
1:2:191:U:O2	1:2:191:U:H2'	2.14	0.48
1:2:215:G:H2'	1:2:215:G:N3	2.29	0.48
1:2:357:C:H2'	1:2:358:A:O5'	2.13	0.48
1:2:436:U:O2	6:s:153:LYS:N	2.47	0.48
1:2:438:G:C6	6:s:134:HIS:HE1	2.31	0.48
1:2:460:A:H2'	8:am:282:GLN:O	2.14	0.48
1:2:466:U:O2	1:2:466:U:C2'	2.62	0.48
1:2:489:A:O2'	9:n:43:ARG:NH2	2.46	0.48
5:f:94:SER:HG	5:f:95:VAL:H	1.55	0.48
8:am:221:PHE:HD1	15:d:133:PHE:CZ	2.32	0.48
9:n:142:LEU:HD23	9:n:142:LEU:HA	1.76	0.48
10:ae:312:ARG:NH1	10:ae:338:TYR:OH	2.46	0.48
12:ag:167:TYR:O	12:ag:171:ASP:N	2.36	0.48
12:ag:310:LEU:O	12:ag:314:VAL:HG22	2.14	0.48
12:ag:513:HIS:HD2	24:ac:209:VAL:HG23	1.79	0.48
19:af:456:LEU:HB3	19:af:505:TRP:CE2	2.49	0.48
19:af:486:LEU:HD23	19:af:540:PHE:CZ	2.48	0.48
20:u:569:GLN:HE21	20:u:573:THR:HG23	1.78	0.48
21:aa:85:PHE:HB3	21:aa:88:GLU:OE2	2.13	0.48
21:aa:216:VAL:HG11	25:ad:672:VAL:HG22	1.94	0.48
24:ac:644:ARG:HG2	24:ac:648:TYR:CZ	2.49	0.48
25:ad:124:TYR:CE1	48:q:84:LYS:HG3	2.48	0.48
26:an:74:ARG:HH11	52:z:948:VAL:HG21	1.78	0.48
29:aq:126:LEU:HD22	33:w:170:MET:HE2	1.96	0.48
30:as:45:LEU:HB3	30:as:49:TYR:CE2	2.49	0.48
30:as:249:GLU:O	30:as:262:ARG:HD3	2.14	0.48
33:w:71:SER:HA	33:w:74:LYS:HG3	1.94	0.48
35:t:118:ARG:HB3	35:t:121:TRP:CD1	2.49	0.48
38:l:120:ALA:O	38:l:332:ARG:NH1	2.44	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
38:l:627:CYS:HA	38:l:637:ARG:HH21	1.78	0.48
40:av:92:PHE:HB2	40:av:107:GLN:O	2.14	0.48
43:i:338:ALA:O	43:i:342:GLY:N	2.46	0.48
47:k:138:ALA:O	47:k:172:ARG:NH2	2.44	0.48
49:b:132:GLN:HG3	52:z:609:TYR:HB2	1.96	0.48
52:z:360:LEU:HD11	52:z:829:LEU:HD21	1.96	0.48
52:z:1030:SER:O	52:z:1034:VAL:HG23	2.14	0.48
55:B:194:LYS:HE2	55:B:195:THR:N	2.27	0.48
55:B:409:GLU:CD	55:B:409:GLU:H	2.22	0.48
56:C:26:PRO:HG3	56:C:43:SER:HB3	1.96	0.48
67:N:78:ARG:HH21	67:N:79:ASP:N	2.11	0.48
71:R:48:GLN:HA	71:R:51:TRP:HB3	1.96	0.48
75:V:119:GLN:HE22	75:V:123:LEU:HD21	1.77	0.48
77:X:363:PHE:HB2	77:X:364:PRO:HD3	1.96	0.48
77:X:421:GLN:OE1	77:X:421:GLN:N	2.45	0.48
78:Y:244:ARG:O	78:Y:248:ASN:ND2	2.47	0.48
80:BA:21:ALA:N	80:BA:22:PRO:HD2	2.28	0.48
80:BA:41:SER:HA	80:BA:44:GLN:NE2	2.27	0.48
84:Bj:139:LYS:HB2	84:Bj:160:LEU:HD11	1.96	0.48
89:At:134:ASP:HB3	89:At:160:THR:OG1	2.13	0.48
97:BM:277:PRO:O	97:BM:281:GLN:NE2	2.29	0.48
98:Ar:51:MET:SD	98:Ar:58:THR:HG23	2.54	0.48
102:Aq:165:ARG:O	102:Aq:168:GLN:HA	2.13	0.48
104:Ak:91:TRP:CD1	104:Ak:91:TRP:C	2.91	0.48
116:Ag:62:ARG:NH2	1:1:104:U:O3'	2.47	0.48
118:BL:296:GLU:N	118:BL:296:GLU:OE1	2.47	0.48
1:1:576:A:OP1	1:1:576:A:H4'	2.14	0.48
1:1:880:A:N6	1:1:881:G:O6	2.46	0.48
1:1:1093:G:C6	1:1:1094:U:C2	3.01	0.48
1:2:68:A:C5	1:2:69:A:C6	3.01	0.48
1:2:122:U:C2	43:i:297:GLN:CG	2.85	0.48
1:2:301:U:H2'	1:2:302:A:H8	1.79	0.48
1:2:415:A:N3	10:ae:36:ARG:NH1	2.61	0.48
1:2:448:U:C6	2:h:123:ARG:HB3	2.48	0.48
1:2:471:A:O2'	12:ag:18:ILE:HG12	2.13	0.48
1:2:504:A:C5'	6:s:80:GLN:NE2	2.76	0.48
1:2:522:A:OP1	15:d:338:PHE:HE2	1.95	0.48
1:2:526:A:OP1	15:d:331:GLU:CB	2.61	0.48
1:2:585:U:O2'	1:2:586:A:P	2.71	0.48
4:m:76:PHE:CE2	8:am:196:ARG:HD2	2.49	0.48
10:ae:206:ILE:HG23	10:ae:235:ALA:HB2	1.96	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
21:aa:178:HIS:HB2	48:q:85:SER:HB2	1.94	0.48
21:aa:974:GLY:O	21:aa:978:HIS:HB3	2.12	0.48
22:ab:219:MET:HA	22:ab:404:ARG:NH2	2.28	0.48
22:ab:264:PRO:HA	22:ab:815:GLY:HA3	1.95	0.48
22:ab:619:ASN:OD1	22:ab:825:ASN:ND2	2.42	0.48
23:ak:115:GLN:HG2	24:ac:1114:ILE:HG23	1.94	0.48
23:ak:288:ARG:O	23:ak:292:LEU:HG	2.14	0.48
24:ac:133:ASP:OD1	24:ac:135:VAL:HG22	2.13	0.48
24:ac:377:GLN:NE2	24:ac:425:ASP:HB2	2.25	0.48
24:ac:727:ASP:O	24:ac:729:SER:N	2.47	0.48
25:ad:154:VAL:HG13	25:ad:157:GLU:N	2.27	0.48
26:an:267:LEU:HD21	50:a:46:MET:HE1	1.96	0.48
28:ap:78:ALA:O	28:ap:82:LEU:N	2.43	0.48
28:ap:144:MET:HB3	28:ap:149:TYR:CE1	2.47	0.48
32:y:49:THR:HB	32:y:80:ASN:HD22	1.79	0.48
43:i:315:LEU:HD23	43:i:321:PRO:HB3	1.95	0.48
45:o:132:ARG:HH22	50:a:344:TYR:CB	2.26	0.48
46:c:136:ARG:HH12	46:c:162:ARG:CZ	2.27	0.48
48:q:32:LEU:HD13	48:q:37:HIS:HB2	1.95	0.48
50:a:393:ASP:HB2	50:a:415:ARG:HG2	1.95	0.48
53:bd:51:ILE:C	53:bd:52:LEU:HD12	2.39	0.48
54:A:364:LEU:HD23	123:UD:36:UNK:HA	1.96	0.48
55:B:384:ARG:NH2	89:At:108:MET:HE1	2.28	0.48
56:C:71:TYR:H	114:BD:79:GLN:HE22	1.60	0.48
59:F:16:LEU:HD23	59:F:30:ALA:HB2	1.95	0.48
60:G:301:TRP:HD1	86:Al:278:ARG:HH22	1.62	0.48
62:I:11:ARG:HH22	119:BO:53:GLY:HA2	1.79	0.48
62:I:38:TRP:HA	62:I:52:ARG:HB3	1.96	0.48
62:I:178:ASP:OD1	62:I:179:TYR:N	2.46	0.48
63:J:77:ASP:HB2	63:J:90:LYS:CB	2.40	0.48
68:O:175:ASP:HB3	68:O:190:GLN:HE21	1.78	0.48
72:S:379:LEU:HB2	99:Aj:387:LEU:HB3	1.96	0.48
73:T:59:PHE:HE1	73:T:66:PRO:HG3	1.78	0.48
77:X:141:ARG:NH2	77:X:163:ALA:O	2.47	0.48
78:Y:220:TYR:OH	90:BC:64:GLU:OE2	2.31	0.48
83:Aw:45:ARG:NE	89:At:21:LEU:HD12	2.29	0.48
83:Aw:157:HIS:ND1	99:Aj:392:GLU:OE1	2.46	0.48
85:An:205:ILE:O	85:An:209:VAL:HG23	2.14	0.48
85:An:263:HIS:CG	85:An:264:HIS:H	2.30	0.48
95:Aa:133:THR:O	95:Aa:137:GLU:HG3	2.14	0.48
97:BM:68:LEU:HD13	97:BM:72:TYR:CD2	2.49	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
99:Aj:314:VAL:HA	99:Aj:317:VAL:HG22	1.95	0.48
101:Am:93:TYR:OH	101:Am:132:VAL:HA	2.14	0.48
112:Ac:60:VAL:HG22	112:Ac:165:LEU:HB2	1.96	0.48
112:Ac:259:VAL:HG11	112:Ac:267:TYR:CE1	2.49	0.48
113:Ah:134:MET:HG3	113:Ah:388:ARG:O	2.13	0.48
117:Ax:91:GLU:CD	120:BG:1321:ALA:HB1	2.39	0.48
117:Ax:92:ASP:OD1	120:BG:1297:ARG:NH1	2.46	0.48
117:Ax:151:ARG:NH1	117:Ax:186:TYR:CE2	2.82	0.48
118:BL:73:SER:O	118:BL:75:ASP:N	2.45	0.48
118:BL:177:TYR:O	118:BL:177:TYR:CG	2.67	0.48
119:BO:187:ASN:CG	119:BO:188:PHE:H	2.21	0.48
1:1:1075:A:H2'	1:1:1076:A:O4'	2.14	0.48
1:2:322:A:OP1	46:c:171:LYS:HE3	2.12	0.48
1:2:455:U:C5'	8:am:276:SER:HB2	2.44	0.48
1:2:459:A:H1'	8:am:305:ASN:HB2	1.77	0.48
4:m:132:LYS:NZ	49:b:124:GLU:OE1	2.46	0.48
10:ae:109:MET:HG2	10:ae:116:ARG:HG3	1.95	0.48
10:ae:348:ASP:OD1	10:ae:349:LEU:N	2.47	0.48
11:ay:42:PHE:HD1	11:ay:45:LYS:HE2	1.78	0.48
12:ag:343:LEU:HB3	12:ag:353:ARG:HH22	1.79	0.48
14:e:309:GLY:O	20:u:630:LEU:HB3	2.14	0.48
15:d:312:PRO:HB2	15:d:313:LEU:HD12	1.96	0.48
18:r:212:LEU:HD12	18:r:215:LEU:HB3	1.96	0.48
22:ab:69:VAL:HA	38:l:430:ARG:NH1	2.29	0.48
22:ab:214:ALA:O	22:ab:224:ARG:N	2.41	0.48
22:ab:504:TYR:HB3	22:ab:826:TYR:CE2	2.49	0.48
22:ab:643:ALA:HB2	22:ab:683:TRP:CD1	2.48	0.48
22:ab:802:VAL:HG22	22:ab:803:SER:H	1.78	0.48
22:ab:1017:ASN:OD1	22:ab:1018:HIS:N	2.47	0.48
23:ak:36:ASN:HD21	38:l:635:GLY:CA	2.23	0.48
24:ac:300:THR:OG1	24:ac:303:ARG:N	2.45	0.48
25:ad:488:LYS:NZ	25:ad:498:GLU:HG2	2.29	0.48
26:an:40:TYR:OH	45:o:382:ASP:OD2	2.18	0.48
27:ao:212:MET:HE2	45:o:313:TYR:HD2	1.78	0.48
28:ap:87:VAL:HB	28:ap:88:PRO:HD3	1.96	0.48
32:y:158:LEU:HA	32:y:178:ASN:HA	1.96	0.48
35:t:94:THR:HG22	35:t:102:GLN:HE22	1.79	0.48
38:l:118:ASP:HB3	38:l:167:TYR:CD1	2.48	0.48
48:q:35:TYR:O	48:q:38:TRP:N	2.46	0.48
49:b:23:ARG:CD	85:An:150:PHE:CZ	2.86	0.48
50:a:386:ARG:NE	50:a:394:ASP:HB2	2.29	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
52:z:538:LEU:HD22	52:z:781:LYS:HE3	1.96	0.48
52:z:673:ASP:OD2	52:z:703:ARG:HD3	2.14	0.48
54:A:346:GLU:HG2	54:A:347:HIS:N	2.28	0.48
55:B:49:VAL:HG11	55:B:214:GLN:HB2	1.94	0.48
55:B:118:THR:OG1	60:G:84:GLN:OE1	2.20	0.48
59:F:29:ILE:HG13	59:F:145:TRP:NE1	2.29	0.48
61:H:34:ASP:OD1	61:H:35:PRO:HD2	2.14	0.48
64:K:20:LEU:HD13	95:Aa:188:ALA:HB2	1.96	0.48
67:N:64:MET:SD	102:Aq:337:PRO:HD2	2.54	0.48
68:O:258:ALA:HB1	68:O:260:GLN:NE2	2.29	0.48
68:O:317:VAL:HG12	70:Q:180:LEU:HD12	1.95	0.48
74:U:68:LEU:N	74:U:85:GLU:HG2	2.28	0.48
79:Z:60:THR:HG22	94:Au:119:VAL:HG11	1.96	0.48
85:An:67:THR:HG21	85:An:85:LEU:O	2.14	0.48
89:At:77:ARG:HA	89:At:81:GLU:OE1	2.13	0.48
92:Ai:14:PRO:HG2	92:Ai:251:PHE:CE2	2.47	0.48
92:Ai:236:LYS:HA	92:Ai:440:TYR:CD2	2.48	0.48
92:Ai:439:GLY:HA2	92:Ai:448:THR:HA	1.96	0.48
96:Ao:272:LYS:HZ3	96:Ao:279:HIS:HB3	1.79	0.48
99:Aj:138:ALA:HB1	99:Aj:142:LYS:HD3	1.95	0.48
101:Am:75:PHE:CZ	101:Am:247:GLU:HG3	2.48	0.48
107:BF:70:ARG:NE	107:BF:76:SER:OG	2.43	0.48
108:Av:109:PHE:CD1	108:Av:112:LYS:HD2	2.48	0.48
111:Ae:206:ARG:HH12	1:1:426:G:H21	1.62	0.48
113:Ah:377:LYS:HD3	113:Ah:452:MET:HB3	1.96	0.48
116:Ag:191:GLU:HG2	116:Ag:194:ARG:HH12	1.78	0.48
119:BO:101:VAL:HG22	119:BO:103:VAL:HG12	1.96	0.48
1:1:107:U:H6	1:1:107:U:OP1	1.96	0.48
1:1:145:A:H5''	1:1:146:U:OP2	2.14	0.48
1:1:162:G:H1	1:1:401:U:H6	1.61	0.48
1:1:642:A:H2'	1:1:643:G:O4'	2.13	0.48
1:1:1038:U:H5	1:1:1056:A:C8	2.31	0.48
1:2:3:C:C5	25:ad:103:PHE:HB3	2.46	0.48
1:2:32:A:C5'	1:2:32:A:C8	2.96	0.48
1:2:46:U:C5	29:aq:11:SER:HA	2.49	0.48
1:2:58:U:H3'	1:2:59:A:H5'	1.95	0.48
1:2:109:U:O2'	1:2:110:A:O5'	2.32	0.48
1:2:215:G:O6	1:2:253:C:N3	2.47	0.48
1:2:270:U:H3'	1:2:270:U:H6	1.78	0.48
1:2:503:A:O2'	6:s:82:LEU:HD23	2.13	0.48
2:h:155:VAL:HG21	14:e:809:ASN:HD21	1.78	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
4:m:118:PHE:HA	4:m:156:ASN:HD22	1.78	0.48
7:au:63:HIS:ND1	24:ac:1229:ARG:O	2.41	0.48
10:ae:88:LEU:HD11	10:ae:92:MET:HE2	1.96	0.48
12:ag:332:HIS:HE1	22:ab:436:VAL:HG11	1.79	0.48
18:r:35:PRO:HG3	18:r:133:HIS:CE1	2.49	0.48
20:u:630:LEU:CB	20:u:631:PRO:HD3	2.44	0.48
21:aa:1110:SER:OG	50:a:336:PRO:HB3	2.14	0.48
22:ab:76:TYR:CG	22:ab:77:PRO:HD2	2.49	0.48
25:ad:663:ALA:HB3	31:at:373:LEU:HD13	1.96	0.48
26:an:89:LYS:NZ	52:z:920:ALA:HA	2.29	0.48
38:l:72:ARG:HA	38:l:508:ARG:HG2	1.96	0.48
39:ar:57:GLU:OE1	39:ar:170:THR:OG1	2.22	0.48
39:ar:248:HIS:CD2	43:i:349:LEU:HD11	2.48	0.48
42:x:155:GLN:NE2	42:x:164:LEU:HA	2.29	0.48
45:o:465:PRO:HA	45:o:470:ARG:HH11	1.78	0.48
49:b:24:GLU:O	49:b:28:ASN:ND2	2.47	0.48
49:b:145:TRP:HE3	52:z:599:VAL:HG11	1.79	0.48
50:a:293:PRO:HG2	50:a:296:LEU:HB2	1.95	0.48
55:B:120:GLU:OE2	55:B:120:GLU:HA	2.14	0.48
55:B:188:MET:N	55:B:304:LYS:O	2.40	0.48
60:G:185:ASP:OD1	60:G:186:THR:N	2.47	0.48
61:H:134:ASN:H	61:H:137:GLU:HB2	1.79	0.48
62:I:188:LEU:HD22	62:I:258:TRP:CH2	2.49	0.48
63:J:86:LYS:HD2	63:J:86:LYS:HA	1.68	0.48
70:Q:48:ARG:HB3	1:1:100:A:H4'	1.95	0.48
71:R:172:LYS:O	71:R:335:THR:HG22	2.14	0.48
72:S:275:ARG:O	72:S:279:GLU:HG3	2.14	0.48
72:S:281:ARG:HE	105:BP:49:GLN:NE2	2.12	0.48
77:X:263:MET:HG2	77:X:288:ASN:HD22	1.79	0.48
77:X:278:ARG:HG2	77:X:279:HIS:CD2	2.49	0.48
79:Z:48:LYS:HB3	1:1:71:A:H8	1.79	0.48
91:Ab:36:PHE:CE2	91:Ab:45:ILE:HD11	2.49	0.48
94:Au:52:ALA:O	94:Au:53:ARG:C	2.57	0.48
97:BM:39:VAL:HB	97:BM:108:LEU:HG	1.94	0.48
104:Ak:73:MET:HE1	104:Ak:102:LEU:HB2	1.95	0.48
113:Ah:58:VAL:HG11	113:Ah:68:ILE:CG2	2.44	0.48
115:Ay:132:ALA:HA	115:Ay:135:VAL:HG12	1.95	0.48
118:BL:158:TRP:HB3	118:BL:176:LEU:HB2	1.96	0.48
118:BL:260:PRO:HB2	1:1:671:U:OP1	2.13	0.48
118:BL:330:LEU:HA	118:BL:335:HIS:H	1.78	0.48
1:1:166:U:H1'	1:1:847:A:H61	1.79	0.48

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:390:A:C2	1:1:391:A:C4	3.02	0.48
1:1:548:A:H2'	1:1:588:A:C2	2.45	0.48
1:1:876:G:C2	1:1:991:G:N2	2.82	0.48
1:1:1022:A:N6	1:1:1023:A:N1	2.61	0.48
1:1:1077:G:H2'	1:1:1078:C:C6	2.48	0.48
1:2:54:A:H4'	1:2:55:G:O5'	2.13	0.47
1:2:87:A:O2'	47:k:158:HIS:ND1	2.47	0.47
1:2:222:A:C2	1:2:252:G:C6	3.02	0.47
1:2:223:U:H3'	1:2:223:U:C6	2.49	0.47
1:2:282:A:H1'	1:2:283:U:C5	2.45	0.47
1:2:397:U:O2	1:2:399:U:H5	1.96	0.47
1:2:424:U:O4'	1:2:424:U:O2	2.30	0.47
1:2:448:U:C5	2:h:124:SER:N	2.82	0.47
1:2:453:A:C4'	8:am:277:PRO:CG	2.86	0.47
4:m:7:ALA:HB3	4:m:13:MET:HA	1.95	0.47
10:ae:59:GLY:O	10:ae:65:SER:OG	2.26	0.47
10:ae:398:TYR:CD2	10:ae:416:LEU:HD12	2.48	0.47
15:d:50:TYR:HA	15:d:53:VAL:HG22	1.96	0.47
19:af:531:HIS:HE1	19:af:624:ARG:NH1	2.12	0.47
24:ac:705:LEU:HB3	24:ac:849:TYR:CE1	2.50	0.47
24:ac:1016:ALA:O	24:ac:1020:VAL:HG12	2.14	0.47
25:ad:116:GLN:CD	25:ad:693:ARG:HB2	2.39	0.47
25:ad:239:LEU:HD13	25:ad:294:VAL:HG21	1.96	0.47
25:ad:247:VAL:HG23	40:av:56:ASP:HB3	1.94	0.47
33:w:51:TYR:CD2	33:w:52:VAL:HG13	2.49	0.47
39:ar:184:GLU:O	43:i:318:VAL:HG23	2.14	0.47
43:i:326:GLY:H	47:k:163:SER:HB2	1.78	0.47
47:k:79:ASP:N	47:k:82:SER:OG	2.42	0.47
48:q:125:GLU:O	48:q:129:ARG:N	2.47	0.47
50:a:62:ARG:HE	50:a:65:ARG:HD2	1.79	0.47
52:z:718:ARG:NH2	52:z:775:GLU:OE1	2.47	0.47
58:E:241:ARG:HD2	58:E:323:ARG:NH1	2.29	0.47
58:E:295:ARG:NE	58:E:295:ARG:HA	2.29	0.47
59:F:1:MET:HG3	59:F:3:LYS:HG2	1.96	0.47
60:G:237:ALA:HB2	60:G:252:PHE:CE2	2.49	0.47
60:G:285:LEU:HA	60:G:289:ALA:HB3	1.96	0.47
62:I:210:ASP:O	62:I:214:SER:OG	2.14	0.47
64:K:113:LEU:HA	95:Aa:97:MET:HE1	1.95	0.47
66:M:81:ASN:ND2	66:M:112:LYS:HG3	2.29	0.47
66:M:250:PRO:HB3	73:T:56:GLU:HB3	1.95	0.47
71:R:290:VAL:HG12	71:R:293:LYS:HD2	1.95	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
71:R:398:ASN:HB3	1:1:62:U:C5	2.48	0.47
72:S:244:THR:HA	80:BA:111:ALA:HB2	1.96	0.47
75:V:50:PRO:HA	75:V:53:ARG:NH1	2.29	0.47
75:V:79:TYR:OH	84:Bj:4:ASN:ND2	2.47	0.47
77:X:176:ASN:OD1	77:X:180:ARG:NH1	2.47	0.47
77:X:373:LEU:HB3	77:X:374:HIS:CD2	2.49	0.47
80:BA:105:PRO:HG2	80:BA:135:PHE:HE2	1.78	0.47
83:Aw:45:ARG:HE	89:At:21:LEU:HD12	1.79	0.47
84:Bj:143:ASN:HB3	84:Bj:158:LYS:NZ	2.29	0.47
85:An:129:LYS:CG	85:An:182:VAL:HG12	2.44	0.47
85:An:212:HIS:HE1	113:Ah:96:TYR:CZ	2.32	0.47
94:Au:24:ARG:NE	94:Au:26:TYR:OH	2.47	0.47
99:Aj:138:ALA:HA	99:Aj:141:ARG:HB2	1.95	0.47
101:Am:75:PHE:CE2	101:Am:247:GLU:HG3	2.49	0.47
101:Am:76:TYR:CD2	101:Am:253:PRO:HD3	2.49	0.47
101:Am:281:ARG:HA	101:Am:284:VAL:HG22	1.95	0.47
102:Aq:120:PHE:HD2	102:Aq:133:ILE:HG22	1.76	0.47
104:Ak:167:LEU:HG	104:Ak:168:GLU:H	1.77	0.47
107:BF:104:ARG:O	113:Ah:200:GLN:HB2	2.14	0.47
108:Av:155:ARG:NE	1:1:459:A:N7	2.61	0.47
112:Ac:118:PHE:HB3	112:Ac:120:LEU:HD13	1.96	0.47
113:Ah:139:GLU:HB2	113:Ah:147:MET:HG3	1.95	0.47
115:Ay:38:ARG:NH1	1:1:749:U:H1'	2.28	0.47
117:Ax:94:ASP:O	117:Ax:95:GLN:NE2	2.47	0.47
118:BL:218:THR:H	118:BL:221:LYS:NZ	2.11	0.47
119:BO:134:ARG:NH1	119:BO:148:ASP:O	2.47	0.47
1:1:574:A:O2'	1:1:575:G:H8	1.97	0.47
1:1:752:U:C4	1:1:753:U:C2	3.01	0.47
1:2:179:G:H4'	33:w:105:ARG:HG2	1.96	0.47
1:2:306:A:N3	1:2:306:A:C2'	2.75	0.47
1:2:453:A:OP1	8:am:278:HIS:CE1	2.66	0.47
1:2:455:U:H5'	8:am:276:SER:HB2	1.96	0.47
1:2:503:A:H1'	6:s:81:ASN:HD21	1.80	0.47
1:2:564:A:H2'	1:2:565:U:OP1	2.14	0.47
4:m:249:THR:O	4:m:253:LYS:N	2.41	0.47
5:f:110:ARG:HG2	5:f:115:THR:HG21	1.96	0.47
10:ae:192:VAL:HG13	10:ae:194:VAL:HG23	1.94	0.47
11:ay:52:GLU:OE2	17:ax:16:SER:HB2	2.14	0.47
17:ax:95:TRP:CH2	17:ax:136:PRO:HB2	2.48	0.47
21:aa:128:VAL:HG23	21:aa:129:PHE:CD2	2.49	0.47
21:aa:484:ARG:NH1	21:aa:833:PHE:O	2.47	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
21:aa:615:GLN:HE22	21:aa:617:VAL:HB	1.78	0.47
21:aa:1569:ALA:O	21:aa:1572:LYS:HG2	2.14	0.47
23:ak:191:ARG:HA	23:ak:253:ALA:HA	1.95	0.47
24:ac:167:MET:O	38:l:73:PRO:HG3	2.14	0.47
24:ac:195:VAL:O	24:ac:593:ARG:NH2	2.47	0.47
24:ac:630:GLY:O	24:ac:634:ARG:HB3	2.14	0.47
25:ad:547:ASN:O	25:ad:551:ALA:N	2.36	0.47
27:ao:74:TYR:HA	27:ao:107:ASN:HB2	1.95	0.47
29:aq:139:ARG:HG2	29:aq:177:LEU:HA	1.95	0.47
36:p:155:THR:O	36:p:159:ARG:N	2.44	0.47
45:o:166:ARG:HH21	45:o:172:CYS:HA	1.78	0.47
48:q:179:PHE:CD1	49:b:42:GLU:HG2	2.48	0.47
52:z:262:GLN:HG3	52:z:300:PHE:O	2.14	0.47
52:z:783:GLN:HG2	52:z:787:GLN:NE2	2.27	0.47
52:z:979:GLU:O	52:z:982:ARG:HD2	2.13	0.47
53:bd:80:ILE:HD12	53:bd:82:PHE:CE2	2.48	0.47
54:A:394:THR:O	54:A:398:VAL:HG23	2.15	0.47
58:E:177:VAL:HA	58:E:180:VAL:HG12	1.95	0.47
61:H:61:GLN:HG2	61:H:114:TYR:CE2	2.49	0.47
64:K:114:CYS:SG	64:K:115:ALA:N	2.88	0.47
65:L:39:VAL:HG22	65:L:117:ARG:HD2	1.96	0.47
66:M:41:GLN:NE2	68:O:44:LEU:HD12	2.29	0.47
68:O:27:TYR:O	68:O:28:ALA:HB2	2.13	0.47
71:R:18:ASP:OD1	71:R:19:GLY:N	2.47	0.47
74:U:34:ILE:HB	74:U:37:ASN:HB2	1.94	0.47
77:X:486:MET:CB	106:Ad:223:LEU:HD12	2.44	0.47
84:Bj:157:LYS:NZ	84:Bj:159:MET:SD	2.88	0.47
85:An:44:TRP:HB2	85:An:48:HIS:NE2	2.28	0.47
86:Al:117:VAL:HG23	86:Al:161:HIS:ND1	2.29	0.47
91:Ab:210:GLY:C	91:Ab:212:PRO:HD3	2.39	0.47
92:Ai:221:ASP:HB2	92:Ai:222:PRO:HD2	1.94	0.47
94:Au:50:ASP:O	94:Au:51:PHE:C	2.58	0.47
95:Aa:123:HIS:O	95:Aa:126:GLU:HB3	2.14	0.47
97:BM:321:LYS:HB3	97:BM:325:GLN:NE2	2.29	0.47
99:Aj:206:LYS:HB2	109:Af:143:ASP:OD2	2.14	0.47
102:Aq:124:VAL:HB	102:Aq:129:ARG:HG3	1.97	0.47
102:Aq:294:THR:HG22	1:1:961:A:N7	2.29	0.47
104:Ak:178:ASP:HB3	104:Ak:181:LEU:HB3	1.97	0.47
113:Ah:114:PHE:HD2	113:Ah:115:TYR:CD1	2.32	0.47
117:Ax:158:TYR:CD1	117:Ax:170:ALA:HB1	2.49	0.47
118:BL:86:ASP:OD1	118:BL:87:ILE:N	2.45	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
118:BL:119:ARG:NH1	118:BL:132:HIS:CB	2.75	0.47
118:BL:334:ILE:HB	118:BL:336:PRO:CD	2.43	0.47
1:1:649:A:H3'	1:1:1093:G:H21	1.80	0.47
1:1:652:A:H4'	1:1:653:A:OP2	2.14	0.47
1:1:749:U:C5	1:1:750:U:C4	3.01	0.47
1:2:25:U:C3'	1:2:26:U:H5'	2.44	0.47
1:2:89:U:C4	1:2:90:A:C6	3.03	0.47
1:2:279:U:N3	1:2:328:A:C6	2.72	0.47
1:2:282:A:H62	43:i:251:ILE:HG12	0.65	0.47
1:2:315:A:H2'	1:2:316:A:H8	1.74	0.47
1:2:384:U:H2'	1:2:385:U:H5'	1.94	0.47
1:2:396:A:N3	1:2:529:A:H4'	2.30	0.47
1:2:417:C:C5	10:ae:128:TYR:HD1	2.31	0.47
1:2:419:A:H62	10:ae:182:ARG:CD	2.27	0.47
1:2:485:A:N7	9:n:57:ILE:HD12	2.29	0.47
1:2:497:A:O5'	3:aw:15:ARG:NE	2.47	0.47
3:aw:10:ARG:HH21	18:r:339:PHE:HE1	1.62	0.47
4:m:176:TYR:OH	4:m:181:ASN:OD1	2.32	0.47
5:f:127:ASP:OD1	36:p:103:ARG:N	2.47	0.47
7:au:157:GLN:OE1	22:ab:383:ASP:HB3	2.13	0.47
9:n:108:GLN:HA	9:n:111:THR:HG22	1.96	0.47
10:ae:549:THR:HG22	10:ae:550:LEU:N	2.28	0.47
12:ag:197:ASN:CG	12:ag:233:THR:HG1	2.17	0.47
14:e:230:GLU:N	14:e:230:GLU:OE1	2.45	0.47
15:d:25:LEU:HD22	15:d:30:LEU:HD21	1.96	0.47
19:af:417:SER:HA	19:af:420:LEU:HB3	1.95	0.47
20:u:323:MET:SD	20:u:323:MET:N	2.88	0.47
20:u:564:LEU:HA	20:u:569:GLN:HG2	1.95	0.47
20:u:614:LEU:HD11	20:u:647:CYS:SG	2.54	0.47
20:u:653:ILE:HG22	20:u:657:TYR:HB2	1.96	0.47
21:aa:1517:ARG:NH2	21:aa:1518:TYR:OH	2.46	0.47
22:ab:99:LEU:HD11	22:ab:179:ALA:HB2	1.96	0.47
22:ab:691:ARG:O	22:ab:700:GLY:N	2.47	0.47
24:ac:330:ALA:O	24:ac:334:ALA:N	2.47	0.47
24:ac:404:ASN:C	24:ac:408:LYS:HE2	2.39	0.47
25:ad:180:ALA:HB3	25:ad:196:VAL:HG11	1.97	0.47
25:ad:388:PHE:O	25:ad:392:ALA:N	2.40	0.47
25:ad:598:ALA:O	25:ad:602:GLU:N	2.46	0.47
38:l:636:VAL:O	38:l:640:ALA:N	2.43	0.47
41:ai:238:GLU:HA	41:ai:265:VAL:O	2.14	0.47
42:x:114:SER:HA	42:x:123:HIS:CD2	2.48	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
43:i:239:LEU:HD11	43:i:249:LYS:HG3	1.95	0.47
45:o:119:THR:OG1	52:z:1035:ASP:HA	2.14	0.47
46:c:99:SER:O	46:c:100:SER:HB3	2.14	0.47
52:z:378:MET:HA	52:z:398:TYR:O	2.14	0.47
52:z:463:PHE:HB3	52:z:502:MET:HE2	1.95	0.47
52:z:650:HIS:H	52:z:672:ILE:HG13	1.78	0.47
56:C:120:ASN:HB3	56:C:129:TRP:HZ3	1.79	0.47
57:D:124:LEU:HA	57:D:127:LEU:HB2	1.96	0.47
63:J:64:TYR:CD2	63:J:64:TYR:C	2.92	0.47
66:M:97:TRP:O	66:M:97:TRP:HE3	1.91	0.47
66:M:98:ALA:HB2	66:M:111:TRP:HD1	1.79	0.47
68:O:311:GLN:NE2	87:BI:250:ALA:HB2	2.30	0.47
78:Y:132:LEU:HD23	104:Ak:281:MET:SD	2.54	0.47
78:Y:155:ALA:HA	90:BC:134:GLU:HG2	1.95	0.47
84:Bj:74:ARG:O	112:Ac:84:ARG:NH2	2.36	0.47
85:An:45:GLU:C	85:An:47:GLY:H	2.22	0.47
85:An:87:ASN:HB3	113:Ah:92:TRP:CZ2	2.49	0.47
88:Az:89:PRO:HG2	88:Az:92:TYR:HD2	1.79	0.47
88:Az:105:ARG:NH2	1:1:79:A:OP1	2.46	0.47
91:Ab:11:ARG:HH11	91:Ab:44:LYS:NZ	2.12	0.47
94:Au:39:ASN:OD1	94:Au:39:ASN:C	2.56	0.47
94:Au:55:SER:HB2	94:Au:97:ALA:N	2.29	0.47
96:Ao:181:TRP:CH2	96:Ao:191:LEU:HB3	2.49	0.47
97:BM:188:LYS:C	97:BM:191:GLU:HG2	2.39	0.47
101:Am:264:ARG:NH2	101:Am:308:GLY:H	2.07	0.47
104:Ak:276:GLU:OE2	104:Ak:277:PRO:HD2	2.13	0.47
109:Af:81:TYR:HB3	109:Af:85:ARG:NH1	2.29	0.47
113:Ah:299:SER:HB3	113:Ah:470:LYS:HD3	1.95	0.47
114:BD:44:TYR:OH	114:BD:48:GLN:NE2	2.47	0.47
115:Ay:64:ILE:HG23	1:1:697:A:C5'	2.44	0.47
119:BO:77:VAL:CB	119:BO:104:GLN:HG3	2.43	0.47
119:BO:101:VAL:O	119:BO:103:VAL:HG13	2.13	0.47
1:1:40:C:H4'	1:1:41:A:H8	1.79	0.47
1:1:131:U:H1'	1:1:132:U:OP1	2.14	0.47
1:1:345:A:H62	1:1:379:U:C5'	2.27	0.47
1:1:408:U:H2'	1:1:409:A:H8	1.80	0.47
1:1:444:A:C1'	1:1:458:A:H8	2.27	0.47
1:1:487:U:O2'	1:1:488:U:OP1	2.28	0.47
1:1:923:A:H1'	1:1:979:G:C8	2.48	0.47
1:2:175:U:H2'	48:q:11:GLN:HG2	1.94	0.47
1:2:202:A:C4'	31:at:244:LYS:HD2	2.43	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:247:U:H5'	1:2:247:U:C6	2.36	0.47
1:2:452:G:C4'	8:am:278:HIS:CD2	2.95	0.47
1:2:474:U:H2'	1:2:474:U:O2	2.13	0.47
1:2:520:A:H2'	1:2:521:A:H8	1.79	0.47
2:h:122:VAL:HG11	14:e:395:TYR:CD2	2.50	0.47
3:aw:20:ILE:HG23	3:aw:25:LYS:HB3	1.96	0.47
4:m:279:VAL:HG11	17:ax:98:HIS:CG	2.50	0.47
5:f:191:GLY:H	52:z:639:TYR:HE2	1.61	0.47
6:s:64:ASN:OD1	15:d:285:LYS:HE3	2.14	0.47
6:s:119:ASP:HB3	6:s:125:THR:O	2.14	0.47
7:au:71:GLU:HB2	24:ac:101:LEU:HD11	1.95	0.47
13:aj:66:TRP:HH2	13:aj:89:GLY:HA2	1.79	0.47
16:az:139:ASP:CG	16:az:140:SER:H	2.22	0.47
19:af:205:ASN:O	19:af:209:ARG:NE	2.41	0.47
19:af:648:PRO:HG2	19:af:651:GLU:HB2	1.97	0.47
20:u:276:ASP:HB3	22:ab:864:ARG:HD3	1.97	0.47
21:aa:199:ASN:ND2	45:o:466:THR:HA	2.28	0.47
21:aa:295:ALA:HB2	21:aa:379:GLN:HG2	1.97	0.47
21:aa:400:LEU:HD12	21:aa:404:ARG:HH21	1.77	0.47
21:aa:444:GLU:HB3	21:aa:447:ALA:HB3	1.95	0.47
21:aa:717:GLN:HE21	21:aa:721:SER:HB2	1.80	0.47
21:aa:1534:ALA:N	21:aa:1549:GLU:O	2.47	0.47
22:ab:163:ASP:OD1	22:ab:164:GLU:N	2.47	0.47
22:ab:816:ILE:H	22:ab:816:ILE:HD12	1.78	0.47
22:ab:1122:PRO:HB3	22:ab:1145:MET:HE3	1.96	0.47
23:ak:297:LYS:HB2	23:ak:300:VAL:HG12	1.96	0.47
24:ac:635:GLN:HB3	24:ac:774:VAL:HG21	1.96	0.47
24:ac:795:TYR:CD1	24:ac:1006:PRO:HB3	2.49	0.47
24:ac:1132:ASP:HA	24:ac:1135:ARG:HG2	1.97	0.47
24:ac:1189:GLU:HB2	24:ac:1193:ARG:HH22	1.79	0.47
25:ad:512:TYR:O	25:ad:516:SER:N	2.48	0.47
26:an:12:ARG:NH2	26:an:25:GLU:HG3	2.29	0.47
28:ap:73:ARG:NH1	52:z:648:ALA:HB3	2.28	0.47
30:as:157:LEU:O	30:as:161:THR:HG23	2.14	0.47
32:y:163:THR:OG1	32:y:172:GLY:HA3	2.15	0.47
38:l:654:LEU:O	38:l:668:TYR:OH	2.19	0.47
45:o:328:PHE:HB3	45:o:331:GLU:HB2	1.96	0.47
45:o:383:ASP:O	45:o:386:ARG:HG2	2.14	0.47
50:a:163:ILE:HG23	50:a:189:ALA:HB2	1.97	0.47
52:z:271:GLU:O	52:z:275:GLU:HG2	2.14	0.47
54:A:271:ARG:N	1:1:605:U:OP1	2.47	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
56:C:196:GLU:HA	115:Ay:138:GLN:HB2	1.96	0.47
59:F:91:TYR:HD2	111:Ae:65:PRO:HD3	1.79	0.47
60:G:28:VAL:HG13	72:S:322:ILE:HB	1.96	0.47
60:G:69:ARG:HB2	1:1:497:A:H5'	1.97	0.47
60:G:165:ARG:NH2	60:G:171:SER:OG	2.47	0.47
60:G:182:TRP:HA	106:Ad:139:VAL:HG11	1.96	0.47
62:I:258:TRP:N	62:I:258:TRP:CD1	2.82	0.47
63:J:83:THR:HG1	110:As:63:HIS:CE1	2.27	0.47
65:L:123:TYR:CZ	65:L:125:PRO:HB3	2.49	0.47
66:M:190:LYS:HD3	66:M:192:LEU:HD23	1.97	0.47
68:O:98:ASP:OD2	107:BF:66:ALA:HB2	2.14	0.47
69:P:35:ILE:O	69:P:38:THR:OG1	2.30	0.47
75:V:66:ARG:H	1:1:967:A:P	2.37	0.47
79:Z:115:PRO:HA	79:Z:118:HIS:CD2	2.49	0.47
80:BA:50:ALA:HA	80:BA:53:LYS:HB2	1.95	0.47
86:Al:39:GLN:OE1	86:Al:39:GLN:CA	2.62	0.47
86:Al:192:LEU:HB2	97:BM:190:LYS:HZ2	1.78	0.47
89:At:17:ARG:HG3	1:1:110:U:O2'	2.15	0.47
91:Ab:183:LYS:HA	91:Ab:187:MET:CG	2.44	0.47
94:Au:127:ARG:HA	94:Au:130:TYR:HB3	1.96	0.47
96:Ao:143:ALA:HB3	100:BH:224:LEU:HD21	1.94	0.47
101:Am:48:HIS:O	101:Am:50:ARG:N	2.47	0.47
104:Ak:91:TRP:O	104:Ak:91:TRP:CG	2.67	0.47
113:Ah:66:LYS:O	113:Ah:67:ARG:CB	2.61	0.47
118:BL:324:PRO:HG2	1:1:710:A:OP1	2.14	0.47
119:BO:139:ARG:NH1	119:BO:143:LEU:HD23	2.23	0.47
120:BG:1330:SER:O	120:BG:1333:ILE:HG23	2.15	0.47
1:1:556:A:H5'	1:1:557:A:H5'	1.96	0.47
1:1:924:U:O2'	1:1:925:G:C8	2.58	0.47
1:2:181:U:P	33:w:101:ARG:CA	3.02	0.47
1:2:264:U:H6	1:2:264:U:H5'	1.78	0.47
1:2:299:U:C4	1:2:300:U:C4	3.03	0.47
1:2:531:U:O2	1:2:531:U:C2'	2.61	0.47
1:2:577:G:O2'	1:2:578:C:H5'	2.15	0.47
2:h:48:LEU:HG	14:e:467:PHE:CZ	2.49	0.47
2:h:140:ASP:OD1	2:h:141:ASN:N	2.48	0.47
4:m:81:LEU:HD22	36:p:113:TYR:CG	2.49	0.47
6:s:46:LYS:HE3	14:e:720:SER:HA	1.97	0.47
6:s:141:GLN:NE2	7:au:18:MET:SD	2.88	0.47
7:au:29:TRP:CD1	7:au:29:TRP:H	2.32	0.47
7:au:155:TYR:HB2	22:ab:376:ASP:CG	2.40	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
8:am:234:MET:HG2	44:g:113:PHE:CD1	2.49	0.47
14:e:275:VAL:HG22	14:e:337:CYS:SG	2.54	0.47
15:d:112:ASN:HB3	26:an:301:ARG:NH2	2.29	0.47
16:az:20:PRO:HD3	17:ax:128:VAL:HG22	1.96	0.47
18:r:8:LEU:HB3	18:r:23:VAL:HG21	1.96	0.47
18:r:345:ASP:OD2	18:r:348:LYS:HE2	2.14	0.47
19:af:165:TYR:CE2	22:ab:451:LEU:HB2	2.50	0.47
20:u:376:ILE:O	20:u:380:ARG:N	2.46	0.47
21:aa:346:GLY:O	21:aa:350:TYR:N	2.47	0.47
21:aa:407:LYS:HB2	27:ao:161:TYR:CE1	2.49	0.47
21:aa:1172:GLU:HG2	21:aa:1173:HIS:CD2	2.49	0.47
21:aa:1254:SER:O	21:aa:1254:SER:OG	2.23	0.47
22:ab:287:ARG:HH11	38:l:465:LEU:HG	1.80	0.47
24:ac:445:LEU:HD13	24:ac:456:TYR:CZ	2.50	0.47
25:ad:28:LEU:HD21	46:c:269:LEU:HD11	1.96	0.47
25:ad:352:LEU:HD22	25:ad:367:ALA:HB2	1.96	0.47
26:an:107:GLU:HG2	50:a:319:PRO:HG3	1.96	0.47
27:ao:19:VAL:HG21	27:ao:150:ILE:HD12	1.96	0.47
30:as:188:PHE:HA	30:as:191:PHE:CE2	2.50	0.47
32:y:96:ASP:HB3	32:y:100:LYS:HE3	1.96	0.47
38:l:166:ARG:HA	38:l:169:LEU:HB2	1.97	0.47
38:l:575:HIS:HD2	38:l:579:LYS:H	1.63	0.47
45:o:227:VAL:HG13	45:o:228:GLN:H	1.79	0.47
48:q:143:GLN:C	49:b:145:TRP:HH2	2.21	0.47
49:b:23:ARG:HH11	85:An:151:GLU:CG	2.25	0.47
49:b:76:MET:HE2	49:b:94:ARG:HD3	1.96	0.47
49:b:141:LEU:HD22	52:z:597:VAL:HG11	1.97	0.47
50:a:214:PRO:HA	50:a:226:LEU:O	2.14	0.47
52:z:520:ARG:HG2	52:z:557:ASP:OD2	2.15	0.47
52:z:898:VAL:O	52:z:901:VAL:HG12	2.14	0.47
55:B:194:LYS:HZ3	55:B:194:LYS:HB3	1.80	0.47
58:E:142:ARG:HG3	58:E:144:ASN:OD1	2.14	0.47
59:F:28:LYS:HE3	95:Aa:60:MET:HE1	1.97	0.47
59:F:113:ARG:HD2	1:l:151:G:H5"	1.97	0.47
61:H:61:GLN:HG3	61:H:112:PHE:O	2.14	0.47
70:Q:193:SER:HB3	70:Q:195:GLU:OE1	2.15	0.47
74:U:77:LEU:HD12	74:U:81:THR:HG21	1.97	0.47
75:V:12:ALA:HB3	75:V:17:ILE:HG21	1.95	0.47
75:V:53:ARG:HE	75:V:109:ARG:NH2	2.11	0.47
79:Z:91:ASN:O	79:Z:95:GLN:HB2	2.13	0.47
81:UA:86:UNK:O	81:UA:88:UNK:N	2.47	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
82:BB:112:LEU:HD11	111:Ae:10:PHE:CD1	2.48	0.47
85:An:41:ILE:HD13	85:An:44:TRP:HD1	1.80	0.47
85:An:264:HIS:O	85:An:264:HIS:CG	2.67	0.47
88:Az:119:THR:O	88:Az:122:LYS:HG3	2.15	0.47
92:Ai:279:ILE:HA	92:Ai:283:TYR:CD2	2.47	0.47
97:BM:119:THR:O	97:BM:121:ARG:N	2.48	0.47
98:Ar:111:PHE:CZ	98:Ar:134:LYS:HG3	2.50	0.47
98:Ar:126:LEU:HB2	98:Ar:159:ILE:HB	1.96	0.47
100:BH:69:TYR:CE1	1:1:360:U:C2	3.02	0.47
101:Am:187:LEU:HD13	101:Am:229:LEU:HG	1.95	0.47
102:Aq:294:THR:O	102:Aq:297:SER:OG	2.32	0.47
104:Ak:12:LEU:HA	104:Ak:12:LEU:HD23	1.75	0.47
105:BP:156:ARG:NH2	1:1:420:A:OP2	2.48	0.47
106:Ad:66:TYR:OH	106:Ad:78:LEU:HB3	2.14	0.47
1:1:48:U:N3	1:1:130:U:H5	2.12	0.47
1:1:90:A:H2'	1:1:90:A:N3	2.28	0.47
1:1:433:G:O2'	1:1:434:U:P	2.73	0.47
1:1:553:A:C2'	1:1:554:G:H5'	2.45	0.47
1:2:18:A:C5	1:2:19:U:C5	3.02	0.47
1:2:317:U:O2	1:2:317:U:O4'	2.29	0.47
1:2:384:U:O2'	1:2:385:U:H5'	2.15	0.47
1:2:423:C:H6	1:2:423:C:OP1	1.98	0.47
1:2:457:U:H4'	1:2:458:A:OP1	2.15	0.47
1:2:499:A:O2'	3:aw:10:ARG:HA	2.15	0.47
1:2:499:A:H2'	3:aw:10:ARG:HA	1.95	0.47
4:m:49:GLU:OE2	4:m:64:LEU:N	2.47	0.47
4:m:97:VAL:HG23	44:g:123:ALA:HB1	1.96	0.47
6:s:17:HIS:HD2	6:s:19:HIS:HB2	1.80	0.47
6:s:118:TYR:CZ	6:s:122:ILE:HG13	2.50	0.47
7:au:44:ARG:HB3	24:ac:85:TYR:CE1	2.50	0.47
8:am:143:ARG:HH22	21:aa:1047:THR:HG23	1.79	0.47
12:ag:146:ASP:OD2	12:ag:278:ARG:NH2	2.44	0.47
14:e:247:VAL:HG22	14:e:403:VAL:HG22	1.95	0.47
14:e:303:PHE:CD1	20:u:662:ALA:HB3	2.49	0.47
15:d:159:TYR:O	15:d:162:MET:HG2	2.15	0.47
21:aa:940:LEU:O	21:aa:943:ILE:HG12	2.15	0.47
21:aa:963:LEU:H	21:aa:968:TRP:CD1	2.32	0.47
21:aa:1284:PRO:HA	21:aa:1287:ILE:HD12	1.96	0.47
22:ab:252:ASP:HB3	22:ab:255:ARG:HB3	1.97	0.47
22:ab:768:LEU:HB2	22:ab:771:SER:HB2	1.96	0.47
23:ak:24:ARG:NH1	23:ak:185:PRO:HG3	2.29	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
24:ac:348:ASP:HB3	24:ac:454:LYS:HD3	1.97	0.47
24:ac:903:TYR:HB2	24:ac:937:PHE:CE1	2.50	0.47
25:ad:256:PRO:HD3	40:av:63:SER:HA	1.96	0.47
26:an:151:ARG:H	26:an:151:ARG:HD2	1.78	0.47
27:ao:178:SER:C	27:ao:180:THR:H	2.22	0.47
52:z:229:MET:HE3	52:z:474:LYS:HD3	1.97	0.47
54:A:182:ALA:HB3	54:A:208:VAL:HG12	1.97	0.47
56:C:123:ASP:OD1	56:C:124:GLU:N	2.48	0.47
58:E:66:PRO:N	58:E:67:PRO:HD2	2.29	0.47
59:F:4:GLN:O	59:F:8:ARG:NH2	2.44	0.47
61:H:30:ARG:O	61:H:115:LYS:NZ	2.42	0.47
64:K:152:LEU:HD23	64:K:180:MET:HE3	1.97	0.47
66:M:254:LEU:C	66:M:256:THR:H	2.22	0.47
69:P:161:ARG:HD2	69:P:181:ARG:HE	1.80	0.47
70:Q:221:GLU:HA	70:Q:224:LYS:HB2	1.96	0.47
75:V:55:TRP:O	75:V:83:ILE:HG12	2.14	0.47
78:Y:235:MET:SD	84:Bj:156:PRO:HG3	2.54	0.47
84:Bj:34:PRO:HG2	84:Bj:37:TYR:HB2	1.96	0.47
85:An:134:ILE:HG12	85:An:169:PHE:HE1	1.80	0.47
85:An:264:HIS:NE2	113:Ah:68:ILE:HB	2.29	0.47
86:Al:175:TYR:CD1	97:BM:139:PRO:HB2	2.49	0.47
92:Ai:140:GLU:OE1	92:Ai:141:ARG:N	2.48	0.47
92:Ai:296:HIS:ND1	92:Ai:304:HIS:HB2	2.29	0.47
96:Ao:32:TYR:CD2	96:Ao:33:LEU:HD13	2.50	0.47
97:BM:247:PHE:HA	97:BM:266:TRP:CH2	2.49	0.47
98:Ar:97:TRP:CZ2	98:Ar:174:ALA:HB2	2.50	0.47
99:Aj:312:GLU:HA	99:Aj:315:ALA:HB3	1.97	0.47
101:Am:111:ILE:HG23	101:Am:129:VAL:HG13	1.96	0.47
101:Am:169:GLU:N	101:Am:169:GLU:OE1	2.48	0.47
102:Aq:3:TYR:O	102:Aq:5:GLY:N	2.47	0.47
102:Aq:32:TYR:HB2	106:Ad:36:ASP:HA	1.95	0.47
104:Ak:24:VAL:HG13	104:Ak:25:ALA:N	2.30	0.47
1:1:52:U:H3'	1:1:53:A:H5''	1.96	0.47
1:1:781:A:H1'	1:1:782:U:OP1	2.13	0.47
1:1:880:A:N1	1:1:987:A:N1	2.63	0.47
1:2:9:U:OP1	1:2:9:U:H6	1.98	0.47
1:2:36:G:N9	33:w:130:LYS:HB2	2.25	0.47
1:2:47:U:O5'	29:aq:11:SER:OG	2.33	0.47
1:2:134:U:H6	1:2:134:U:H3'	1.80	0.47
1:2:184:A:OP1	33:w:98:LEU:CD2	2.60	0.47
1:2:278:A:H2'	1:2:279:U:H5'	1.95	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:301:U:C2	1:2:302:A:N7	2.74	0.47
1:2:383:A:H8	1:2:383:A:OP2	1.98	0.47
1:2:451:G:OP1	14:e:390:MET:HG3	2.15	0.47
1:2:516:A:N6	17:ax:33:ASN:CB	2.72	0.47
2:h:15:GLN:O	6:s:135:LYS:NZ	2.47	0.47
2:h:52:ASP:OD2	14:e:717:THR:HB	2.15	0.47
4:m:100:GLN:HG2	36:p:111:ARG:O	2.14	0.47
6:s:99:LEU:HD13	20:u:713:MET:HE1	1.97	0.47
7:au:138:SER:HB3	7:au:144:SER:HB2	1.95	0.47
7:au:154:GLN:HE22	22:ab:373:ARG:HH21	1.62	0.47
10:ae:204:ARG:O	10:ae:208:LEU:N	2.47	0.47
11:ay:106:LYS:HE3	18:r:277:LEU:H	1.80	0.47
14:e:157:THR:HG23	14:e:160:THR:H	1.79	0.47
14:e:311:PHE:O	20:u:629:VAL:HG22	2.14	0.47
14:e:744:ASP:OD2	20:u:825:ARG:NH2	2.47	0.47
16:az:40:LYS:HG2	17:ax:63:TYR:CE1	2.50	0.47
19:af:180:TRP:CE2	19:af:227:ARG:HD2	2.49	0.47
19:af:395:ARG:HD3	19:af:501:TYR:CE1	2.49	0.47
19:af:467:ASP:CG	19:af:519:ARG:HE	2.20	0.47
20:u:331:LEU:HD22	20:u:648:MET:HE2	1.95	0.47
21:aa:97:GLY:HA2	21:aa:101:ILE:HG22	1.97	0.47
21:aa:311:PRO:HD3	21:aa:345:TRP:CD1	2.49	0.47
21:aa:368:PRO:HG2	21:aa:369:PHE:CD1	2.50	0.47
21:aa:909:GLY:C	45:o:317:VAL:HG11	2.40	0.47
21:aa:1060:LEU:N	21:aa:1172:GLU:OE2	2.47	0.47
21:aa:1383:ALA:HA	21:aa:1390:ALA:HB2	1.96	0.47
21:aa:1521:LEU:HA	21:aa:1525:ALA:HB3	1.96	0.47
22:ab:292:ALA:O	22:ab:296:THR:OG1	2.28	0.47
22:ab:693:ILE:HG23	22:ab:798:TYR:HE2	1.79	0.47
22:ab:728:LYS:CA	22:ab:731:GLU:HG2	2.42	0.47
22:ab:730:VAL:O	22:ab:747:SER:N	2.48	0.47
22:ab:741:LYS:HD3	22:ab:760:PHE:HA	1.97	0.47
23:ak:37:GLY:O	23:ak:54:LEU:N	2.41	0.47
23:ak:139:ARG:HA	24:ac:1203:GLN:HG2	1.97	0.47
23:ak:192:ARG:HD2	23:ak:195:ALA:HB3	1.96	0.47
24:ac:184:GLU:O	24:ac:188:GLU:N	2.36	0.47
25:ad:157:GLU:HG3	25:ad:161:TRP:CD1	2.50	0.47
25:ad:603:TYR:CZ	25:ad:615:LEU:HG	2.49	0.47
25:ad:636:ARG:NH2	37:j:155:LYS:O	2.48	0.47
25:ad:680:TRP:CE3	37:j:124:LEU:HD11	2.48	0.47
25:ad:686:HIS:HB2	45:o:452:ASN:HD22	1.80	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:769:SER:OG	45:o:366:ASP:OD2	2.33	0.47
26:an:11:VAL:HG21	26:an:121:LEU:HD23	1.97	0.47
27:ao:111:ALA:HB3	27:ao:131:PHE:CE1	2.49	0.47
31:at:212:ASN:HB3	31:at:219:GLN:HE22	1.79	0.47
34:v:129:GLY:HA2	34:v:132:ARG:HD3	1.96	0.47
35:t:121:TRP:HA	35:t:126:TYR:CD2	2.50	0.47
36:p:149:MET:HE2	36:p:149:MET:HB3	1.78	0.47
38:l:103:LEU:HD23	38:l:106:PHE:CD2	2.50	0.47
38:l:214:ILE:HD11	38:l:326:GLU:HG2	1.95	0.47
38:l:426:MET:O	38:l:429:SER:OG	2.31	0.47
40:av:43:GLN:C	40:av:46:PRO:HD2	2.40	0.47
41:ai:131:ARG:O	41:ai:135:ARG:HG3	2.14	0.47
44:g:131:GLN:HG3	44:g:135:ASN:HD21	1.80	0.47
45:o:75:LEU:HD13	51:ba:75:TYR:CE1	2.50	0.47
45:o:458:LEU:O	45:o:462:GLU:N	2.47	0.47
48:q:101:LYS:HA	48:q:104:GLU:HG2	1.96	0.47
48:q:148:ILE:HD11	49:b:123:LEU:HD21	1.96	0.47
49:b:127:ILE:H	49:b:127:ILE:HD12	1.79	0.47
50:a:30:TYR:CE2	50:a:206:LEU:HB2	2.50	0.47
50:a:140:PHE:HD2	50:a:169:VAL:HG22	1.78	0.47
50:a:204:VAL:HG21	50:a:247:PHE:CZ	2.49	0.47
50:a:358:GLU:CD	50:a:358:GLU:H	2.22	0.47
52:z:339:GLU:HA	52:z:342:VAL:HG22	1.97	0.47
52:z:426:LEU:HD22	52:z:439:ALA:HA	1.97	0.47
52:z:545:GLU:OE1	52:z:781:LYS:HD3	2.15	0.47
52:z:650:HIS:HD2	52:z:652:ARG:HD2	1.79	0.47
52:z:661:CYS:HG	52:z:782:HIS:CE1	2.32	0.47
54:A:45:LYS:HD3	111:Ae:67:ARG:HD2	1.95	0.47
54:A:169:ARG:HH22	82:BB:25:LEU:HD22	1.80	0.47
55:B:260:SER:HB2	89:At:22:TRP:HE1	1.80	0.47
56:C:136:THR:HG21	56:C:172:HIS:HE1	1.80	0.47
57:D:60:PRO:HG2	57:D:62:GLN:HG3	1.96	0.47
58:E:151:LEU:HG	58:E:191:ILE:HD12	1.97	0.47
59:F:57:ILE:HG12	59:F:128:TYR:O	2.14	0.47
59:F:147:ASP:OD1	59:F:148:THR:N	2.48	0.47
60:G:82:TRP:HE1	99:Aj:428:PRO:HG3	1.80	0.47
60:G:325:THR:OG1	60:G:327:ARG:O	2.29	0.47
61:H:26:ILE:HG23	61:H:28:GLN:HG2	1.96	0.47
61:H:93:VAL:C	61:H:95:GLN:H	2.17	0.47
61:H:94:VAL:O	61:H:94:VAL:HG12	2.14	0.47
62:I:251:THR:OG1	62:I:252:GLU:OE1	2.31	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
63:J:58:ILE:O	63:J:58:ILE:HG13	2.15	0.47
64:K:31:GLU:HG2	68:O:38:LYS:HD3	1.97	0.47
65:L:93:VAL:HG12	95:Aa:187:GLY:O	2.15	0.47
66:M:37:TRP:CH2	66:M:47:PRO:HG3	2.50	0.47
66:M:91:ARG:HH12	99:Aj:475:ARG:NE	2.13	0.47
67:N:196:ARG:HD3	1:1:563:U:OP1	2.15	0.47
69:P:30:LYS:HB3	69:P:48:GLU:O	2.15	0.47
69:P:51:ARG:HG3	69:P:53:PHE:CE2	2.49	0.47
69:P:135:HIS:ND1	96:Ao:229:GLU:OE2	2.48	0.47
70:Q:122:MET:HB3	70:Q:126:ALA:HB3	1.96	0.47
70:Q:161:LEU:HD23	88:Az:92:TYR:CD1	2.50	0.47
71:R:470:HIS:HE1	89:At:47:GLY:HA2	1.78	0.47
77:X:181:LEU:HD22	77:X:188:LYS:HA	1.96	0.47
77:X:352:LYS:HB3	77:X:353:PRO:CD	2.35	0.47
79:Z:30:TYR:CZ	79:Z:43:ILE:HG13	2.50	0.47
80:BA:113:MET:HG2	80:BA:114:PHE:N	2.27	0.47
80:BA:117:ALA:HB3	80:BA:123:ALA:HB2	1.97	0.47
83:Aw:184:ILE:HG21	99:Aj:124:LEU:HB3	1.97	0.47
84:Bj:48:LYS:O	116:Ag:191:GLU:HG2	2.15	0.47
85:An:46:GLN:HA	85:An:49:SER:HB3	1.96	0.47
85:An:50:HIS:CE1	1:1:289:A:H5"	2.50	0.47
85:An:144:GLU:OE2	85:An:146:ARG:HG2	2.14	0.47
86:Al:150:VAL:O	86:Al:155:LEU:HD13	2.14	0.47
86:Al:156:ILE:HD11	86:Al:244:TYR:HE1	1.79	0.47
90:BC:106:ALA:O	90:BC:107:GLU:HG3	2.14	0.47
92:Ai:155:GLU:OE1	92:Ai:171:GLN:NE2	2.48	0.47
93:Ap:147:SER:HB3	93:Ap:150:ARG:HG2	1.97	0.47
94:Au:97:ALA:C	94:Au:99:HIS:H	2.23	0.47
95:Aa:146:ILE:HD11	95:Aa:153:GLU:OE2	2.14	0.47
96:Ao:215:ILE:HG23	105:BP:89:VAL:HG12	1.97	0.47
97:BM:233:VAL:HA	97:BM:236:LEU:HG	1.97	0.47
98:Ar:50:TYR:O	98:Ar:54:GLY:N	2.48	0.47
98:Ar:78:ASP:OD1	98:Ar:79:ARG:N	2.48	0.47
99:Aj:304:ALA:HB1	99:Aj:377:ARG:HD2	1.95	0.47
99:Aj:409:HIS:CE1	106:Ad:173:MET:HG3	2.50	0.47
100:BH:201:GLU:O	100:BH:204:GLN:N	2.48	0.47
100:BH:210:GLU:HG3	100:BH:211:ARG:H	1.79	0.47
100:BH:229:TYR:CD2	105:BP:59:ARG:HD2	2.50	0.47
101:Am:15:HIS:CE1	119:BO:40:LYS:HD3	2.49	0.47
101:Am:47:VAL:HG11	111:Ae:68:TRP:NE1	2.29	0.47
101:Am:127:GLU:OE1	101:Am:127:GLU:N	2.48	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
101:Am:319:TYR:HB3	1:1:482:A:N7	2.30	0.47
103:BE:57:THR:HG23	103:BE:58:THR:H	1.78	0.47
106:Ad:224:ASP:O	106:Ad:228:VAL:HG23	2.14	0.47
109:Af:95:SER:OG	109:Af:97:GLU:OE1	2.30	0.47
113:Ah:187:GLU:N	113:Ah:195:THR:O	2.48	0.47
113:Ah:202:MET:O	113:Ah:205:ALA:N	2.47	0.47
113:Ah:307:PRO:HB2	113:Ah:310:SER:OG	2.14	0.47
114:BD:54:TYR:HB2	114:BD:75:VAL:HG21	1.96	0.47
118:BL:111:SER:OG	118:BL:301:ARG:NH2	2.42	0.47
118:BL:188:THR:HB	118:BL:224:HIS:HE1	1.79	0.47
119:BO:97:VAL:HB	119:BO:99:HIS:HE1	1.80	0.47
1:1:145:A:H3'	1:1:146:U:H5''	1.97	0.47
1:1:1097:A:O2'	1:1:1098:A:P	2.72	0.47
1:2:36:G:O4'	33:w:130:LYS:HD2	2.02	0.47
1:2:281:A:C2'	1:2:281:A:N3	2.78	0.47
1:2:438:G:N7	1:2:439:A:C8	2.83	0.47
9:n:118:VAL:HG11	9:n:139:MET:HE2	1.97	0.47
9:n:160:ARG:NH2	9:n:171:LYS:HE3	2.26	0.47
10:ae:285:ARG:O	10:ae:289:VAL:HG23	2.15	0.47
12:ag:193:SER:O	12:ag:196:THR:OG1	2.20	0.47
13:aj:22:MET:O	13:aj:26:SER:HB3	2.15	0.47
14:e:625:THR:N	14:e:628:SER:OG	2.41	0.47
18:r:104:LEU:HD13	18:r:321:PHE:CE2	2.50	0.47
19:af:215:PRO:HA	19:af:218:LEU:HD23	1.97	0.47
19:af:269:ASP:N	19:af:272:SER:OG	2.47	0.47
20:u:246:LEU:HD12	20:u:246:LEU:HA	1.75	0.47
21:aa:148:GLN:HG3	21:aa:149:ALA:H	1.79	0.47
21:aa:178:HIS:CD2	48:q:86:ALA:HA	2.50	0.47
21:aa:643:LEU:HD11	21:aa:694:TYR:HB2	1.97	0.47
21:aa:873:LEU:HA	21:aa:911:PRO:HG2	1.96	0.47
22:ab:592:LEU:HA	22:ab:624:PHE:CE1	2.50	0.47
23:ak:28:ARG:HD3	23:ak:220:LEU:HB3	1.96	0.47
23:ak:295:ILE:HG22	23:ak:298:GLY:H	1.80	0.47
24:ac:501:LEU:HA	24:ac:504:VAL:HG22	1.96	0.47
24:ac:1077:SER:HB2	24:ac:1105:GLU:HG3	1.97	0.47
25:ad:156:GLN:NE2	48:q:70:ARG:HD3	2.20	0.47
25:ad:198:LYS:O	25:ad:202:ARG:N	2.46	0.47
25:ad:773:VAL:HG23	50:a:294:HIS:CE1	2.50	0.47
26:an:136:THR:OG1	50:a:331:VAL:O	2.27	0.47
26:an:158:GLY:CA	26:an:162:ALA:HB3	2.44	0.47
36:p:36:ARG:HD3	36:p:36:ARG:HA	1.73	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
38:l:176:ASN:O	38:l:214:ILE:HD13	2.14	0.47
38:l:616:ASP:OD2	38:l:649:PHE:N	2.46	0.47
43:i:371:LYS:O	43:i:372:MET:HE2	2.15	0.47
45:o:256:ARG:NH1	50:a:109:LYS:HD2	2.29	0.47
45:o:388:LEU:HD23	45:o:394:TYR:CE1	2.49	0.47
48:q:90:GLN:HG3	48:q:94:GLU:OE1	2.14	0.47
48:q:96:GLN:HG3	48:q:100:ARG:NH1	2.30	0.47
49:b:20:GLN:HA	49:b:23:ARG:HB3	1.96	0.47
49:b:44:ILE:HA	49:b:63:ARG:HA	1.95	0.47
52:z:291:THR:OG1	52:z:292:SER:N	2.44	0.47
52:z:959:ASN:OD1	52:z:960:ALA:N	2.47	0.47
55:B:318:TYR:CE2	89:At:34:LYS:HE2	2.50	0.47
58:E:145:TYR:CD2	58:E:190:ALA:HB2	2.50	0.47
62:I:78:ILE:HD13	62:I:128:ALA:HB2	1.96	0.47
64:K:128:GLN:NE2	109:Af:86:GLN:OE1	2.48	0.47
66:M:196:HIS:HB3	66:M:238:ASP:O	2.14	0.47
67:N:169:HIS:CE1	67:N:220:VAL:HG22	2.50	0.47
68:O:306:ASN:ND2	88:Az:53:HIS:HB3	2.29	0.47
69:P:80:TYR:HD2	102:Aq:55:ASN:ND2	2.13	0.47
71:R:207:LYS:NZ	71:R:314:ALA:H	2.12	0.47
72:S:243:THR:O	72:S:245:THR:HG23	2.15	0.47
75:V:55:TRP:CD1	75:V:88:GLN:HE22	2.33	0.47
78:Y:290:ARG:HD2	92:Ai:150:TYR:CE2	2.49	0.47
79:Z:76:ARG:HH21	79:Z:80:ARG:CZ	2.27	0.47
81:UA:81:UNK:CB	117:Ax:129:ARG:HG3	2.45	0.47
88:Az:35:LEU:HD12	88:Az:36:HIS:H	1.80	0.47
92:Ai:328:ASP:OD1	92:Ai:329:LEU:N	2.48	0.47
93:Ap:167:MET:HG2	93:Ap:175:HIS:ND1	2.30	0.47
94:Au:57:TRP:HB2	94:Au:86:TYR:HE2	1.78	0.47
94:Au:107:ARG:NH1	113:Ah:128:THR:HG22	2.30	0.47
96:Ao:87:VAL:HG23	96:Ao:88:ARG:H	1.77	0.47
97:BM:302:MET:HA	97:BM:305:ASP:HB2	1.97	0.47
106:Ad:122:ALA:C	106:Ad:124:PRO:HD3	2.39	0.47
108:Av:45:GLU:HA	108:Av:48:ARG:HB2	1.97	0.47
116:Ag:96:THR:HG22	116:Ag:124:LEU:HD21	1.96	0.47
120:BG:1319:SER:O	120:BG:1323:LEU:HD13	2.15	0.47
1:1:798:A:H2	1:1:799:A:C6	2.33	0.47
1:1:904:A:H4'	1:1:906:C:OP1	2.14	0.47
1:2:11:A:H5''	50:a:263:LYS:H	1.56	0.47
1:2:171:A:HO2'	1:2:172:A:P	2.27	0.47
1:2:180:A:OP1	33:w:109:LEU:HD12	2.11	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:225:G:OP1	6:s:146:LYS:CG	2.43	0.47
1:2:496:U:P	3:aw:2:HIS:CD2	3.00	0.47
1:2:525:A:C5'	15:d:329:ARG:CB	2.85	0.47
4:m:199:TYR:HB2	4:m:212:HIS:CD2	2.49	0.47
4:m:227:PHE:HZ	44:g:133:SER:HB3	1.80	0.47
8:am:93:ALA:HB2	8:am:118:LYS:HG3	1.97	0.47
15:d:28:GLN:NE2	44:g:127:SER:HA	2.30	0.47
15:d:110:LEU:HD13	15:d:119:ASN:HD22	1.80	0.47
15:d:260:GLU:OE1	18:r:436:TYR:HB2	2.15	0.47
20:u:118:PRO:HG3	20:u:146:LEU:HD11	1.97	0.47
21:aa:1001:PHE:CE2	21:aa:1011:THR:HG21	2.49	0.47
21:aa:1097:LEU:HB3	50:a:337:ASP:OD2	2.13	0.47
22:ab:118:ARG:HH21	38:l:135:ASP:HA	1.78	0.47
22:ab:852:ASP:HA	22:ab:931:PRO:O	2.15	0.47
25:ad:225:LYS:HB3	25:ad:305:SER:OG	2.15	0.47
25:ad:529:TYR:OH	25:ad:605:ARG:NH1	2.45	0.47
25:ad:595:PHE:O	25:ad:599:LEU:HG	2.15	0.47
25:ad:664:GLU:CD	45:o:431:GLY:HA2	2.40	0.47
30:as:176:ARG:HB2	30:as:179:ARG:HD3	1.96	0.47
32:y:27:ALA:HA	32:y:29:HIS:CE1	2.50	0.47
32:y:73:PHE:HZ	32:y:78:CYS:HB3	1.79	0.47
36:p:75:ASN:HA	52:z:116:ASP:OD1	2.14	0.47
37:j:54:ARG:HH11	37:j:60:ARG:HD2	1.80	0.47
37:j:102:TYR:HB2	48:q:65:TRP:NE1	2.30	0.47
39:ar:52:SER:OG	39:ar:57:GLU:O	2.25	0.47
43:i:161:PRO:HB2	43:i:216:PHE:HE1	1.79	0.47
46:c:67:ALA:O	46:c:71:THR:HG23	2.14	0.47
50:a:358:GLU:OE2	50:a:358:GLU:N	2.46	0.47
55:B:52:TYR:HD1	89:At:147:LEU:HD23	1.80	0.47
55:B:169:ASN:O	55:B:175:GLY:HA3	2.15	0.47
60:G:156:ARG:O	75:V:63:ARG:NH2	2.47	0.47
64:K:46:GLN:OE1	95:Aa:194:ASN:ND2	2.48	0.47
65:L:90:ARG:HB2	91:Ab:95:HIS:C	2.40	0.47
70:Q:75:VAL:HG23	70:Q:121:PRO:O	2.15	0.47
73:T:31:ARG:HD3	1:1:834:A:N7	2.30	0.47
74:U:37:ASN:CG	74:U:60:ARG:HG2	2.39	0.47
78:Y:63:ASP:OD1	78:Y:64:VAL:N	2.48	0.47
78:Y:231:GLN:NE2	78:Y:234:ILE:HD11	2.30	0.47
79:Z:25:PHE:HB3	79:Z:28:THR:OG1	2.15	0.47
80:BA:52:MET:O	80:BA:56:LEU:N	2.45	0.47
83:Aw:6:VAL:CG1	83:Aw:96:ARG:HG2	2.45	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
83:Aw:49:VAL:CG1	89:At:19:THR:HA	2.44	0.47
83:Aw:58:PHE:CE2	89:At:46:TYR:HB2	2.50	0.47
87:BI:237:TRP:CD1	87:BI:237:TRP:H	2.32	0.47
93:Ap:43:GLU:N	93:Ap:43:GLU:OE1	2.47	0.47
94:Au:138:ARG:NH1	1:1:548:A:N1	2.63	0.47
97:BM:69:LEU:HD11	97:BM:371:TRP:CE3	2.49	0.47
98:Ar:113:ARG:HD3	98:Ar:113:ARG:HA	1.57	0.47
102:Aq:2:LEU:HD23	102:Aq:2:LEU:H	1.78	0.47
105:BP:163:ARG:HH11	108:Av:156:MET:HE1	1.80	0.47
114:BD:13:CYS:SG	114:BD:15:ASN:N	2.82	0.47
119:BO:96:ALA:HB2	119:BO:178:TYR:OH	2.15	0.47
1:1:168:U:H2'	1:1:169:U:C6	2.49	0.47
1:1:423:G:H2'	1:1:423:G:N3	2.30	0.47
1:1:559:U:C2'	1:1:560:U:H5''	2.45	0.47
1:1:1063:U:H4'	1:1:1064:G:N2	2.30	0.47
1:1:1113:G:C5	1:1:1114:A:C2	3.03	0.47
1:2:175:U:C2	48:q:14:PRO:HD3	2.50	0.47
1:2:228:G:O2'	1:2:242:U:C6	2.63	0.47
1:2:281:A:N7	43:i:254:ASN:CG	2.73	0.47
1:2:429:A:H4'	10:ae:135:PRO:CB	2.44	0.47
1:2:431:U:N1	13:aj:280:HIS:CD2	2.81	0.47
1:2:432:G:C5'	10:ae:15:HIS:H	2.28	0.47
1:2:479:A:OP1	2:h:20:ARG:HD3	2.15	0.47
1:2:513:U:N1	16:az:146:TYR:HE1	2.13	0.47
7:au:83:VAL:HG12	7:au:137:ILE:HD11	1.96	0.47
7:au:180:LYS:HG2	23:ak:308:ALA:O	2.15	0.47
8:am:145:ARG:HG3	21:aa:1040:HIS:O	2.15	0.47
8:am:306:LEU:HG	8:am:307:TYR:CD1	2.50	0.47
10:ae:489:ALA:HB3	12:ag:264:HIS:CE1	2.49	0.47
11:ay:159:ASP:OD1	11:ay:160:LYS:N	2.48	0.47
12:ag:380:GLU:O	12:ag:386:LYS:NZ	2.42	0.47
15:d:60:GLN:NE2	36:p:197:PRO:HB3	2.28	0.47
17:ax:72:TRP:NE1	17:ax:76:GLU:OE2	2.48	0.47
17:ax:120:HIS:O	17:ax:123:LYS:HG2	2.14	0.47
19:af:425:ARG:CZ	19:af:429:GLY:HA3	2.45	0.47
20:u:99:ASN:OD1	20:u:100:GLN:N	2.48	0.47
21:aa:1170:ALA:O	21:aa:1174:ALA:N	2.48	0.47
21:aa:1492:LEU:HD11	21:aa:1497:GLY:HA2	1.96	0.47
22:ab:1016:ASP:N	22:ab:1016:ASP:OD1	2.45	0.47
24:ac:461:GLN:O	24:ac:465:LEU:N	2.48	0.47
24:ac:752:TRP:NE1	24:ac:865:ALA:HB3	2.30	0.47

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
24:ac:833:ASP:OD1	24:ac:833:ASP:N	2.48	0.47
26:an:243:PRO:HA	45:o:136:TRP:CE3	2.50	0.47
28:ap:100:LYS:O	28:ap:104:VAL:HG23	2.14	0.47
29:aq:44:GLU:OE1	29:aq:59:VAL:HG23	2.14	0.47
31:at:310:TRP:CE2	31:at:326:ARG:HD3	2.50	0.47
32:y:99:GLU:OE1	32:y:197:ASN:ND2	2.46	0.47
37:j:172:MET:HE3	48:q:67:GLU:HB3	1.97	0.47
38:l:461:GLU:CB	38:l:467:SER:H	2.28	0.47
39:ar:102:GLN:OE1	39:ar:102:GLN:N	2.48	0.47
39:ar:208:ASP:OD1	39:ar:209:MET:N	2.48	0.47
45:o:77:PRO:HA	52:z:1098:TRP:CE3	2.50	0.47
52:z:452:GLY:N	52:z:513:ARG:O	2.47	0.47
52:z:1030:SER:O	52:z:1034:VAL:N	2.43	0.47
54:A:158:PHE:CZ	54:A:316:ILE:HG21	2.50	0.47
55:B:199:SER:O	55:B:203:LEU:HD12	2.15	0.47
56:C:160:GLU:O	56:C:164:LEU:HG	2.15	0.47
60:G:297:TRP:CD1	60:G:297:TRP:H	2.32	0.47
62:I:79:ARG:HD2	62:I:124:MET:HE3	1.96	0.47
63:J:5:ARG:NH2	1:1:1109:A:OP2	2.44	0.47
63:J:52:GLN:HE21	63:J:75:VAL:HG21	1.80	0.47
71:R:342:LEU:HA	71:R:345:VAL:HG12	1.97	0.47
71:R:448:ASP:OD1	71:R:451:CYS:N	2.46	0.47
71:R:455:LYS:CG	1:1:66:U:H3	2.22	0.47
77:X:357:THR:HG23	77:X:358:GLU:N	2.30	0.47
78:Y:127:TYR:HE2	112:Ac:25:PHE:HE2	1.63	0.47
99:Aj:345:GLU:CD	99:Aj:345:GLU:H	2.22	0.47
101:Am:143:ASP:OD1	101:Am:144:HIS:N	2.44	0.47
101:Am:212:MET:HE3	101:Am:212:MET:HB2	1.87	0.47
102:Aq:325:LEU:HD23	102:Aq:325:LEU:HA	1.75	0.47
102:Aq:337:PRO:O	102:Aq:339:ARG:N	2.48	0.47
109:Af:81:TYR:OH	109:Af:88:ARG:NH1	2.47	0.47
110:As:72:PRO:O	110:As:99:GLU:HG3	2.14	0.47
113:Ah:64:VAL:O	113:Ah:65:GLY:C	2.57	0.47
116:Ag:219:MET:O	116:Ag:224:THR:HB	2.14	0.47
1:1:58:A:HO2'	1:1:112:U:HO2'	1.56	0.47
1:1:58:A:C4	1:1:114:A:C2	3.03	0.47
1:1:303:U:HO2'	1:1:304:G:P	2.38	0.47
1:1:862:A:H61	1:1:1105:G:H1	1.63	0.47
1:1:933:G:C2'	1:1:934:G:C8	2.95	0.47
1:2:33:A:N7	1:2:169:U:N3	2.63	0.46
1:2:65:U:H4'	35:t:36:ARG:HG2	1.77	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:68:A:C6	1:2:69:A:N1	2.83	0.46
1:2:120:U:H4'	1:2:124:A:O4'	2.16	0.46
1:2:130:U:C3'	1:2:131:U:H5'	2.46	0.46
1:2:177:U:O4'	33:w:119:ARG:HD2	2.15	0.46
1:2:201:A:O2'	1:2:203:U:H5	1.98	0.46
1:2:223:U:H2'	1:2:224:G:O4'	2.14	0.46
1:2:381:U:H2'	1:2:381:U:O5'	2.14	0.46
1:2:433:U:C2	10:ae:12:ALA:HB2	2.45	0.46
1:2:437:U:P	2:h:13:ILE:HG23	2.55	0.46
1:2:459:A:H2'	1:2:459:A:N3	2.30	0.46
1:2:472:A:C2	12:ag:15:TYR:CB	2.97	0.46
1:2:592:U:C4	1:2:593:U:C4	3.03	0.46
2:h:72:THR:HG21	9:n:82:PHE:HD2	1.79	0.46
3:aw:121:PRO:HA	14:e:753:PRO:HG2	1.97	0.46
5:f:192:ASP:OD1	5:f:193:ASP:N	2.48	0.46
13:aj:224:MET:HB2	13:aj:258:TYR:OH	2.15	0.46
14:e:151:THR:HG23	14:e:203:SER:HB3	1.97	0.46
20:u:61:ARG:HD2	20:u:64:PHE:CE2	2.50	0.46
21:aa:96:ARG:NH1	37:j:59:ILE:O	2.46	0.46
21:aa:385:SER:O	21:aa:389:LYS:HG2	2.15	0.46
21:aa:544:LEU:HD22	21:aa:821:VAL:HG13	1.97	0.46
22:ab:237:PHE:O	22:ab:241:GLN:NE2	2.34	0.46
22:ab:561:ILE:HG23	22:ab:565:THR:HB	1.95	0.46
24:ac:416:GLY:HA2	24:ac:469:ARG:HD2	1.98	0.46
24:ac:752:TRP:HE1	24:ac:865:ALA:HB3	1.80	0.46
24:ac:870:ASP:OD2	24:ac:872:GLU:HG3	2.14	0.46
25:ad:123:ARG:HA	25:ad:716:PRO:HB3	1.97	0.46
25:ad:224:GLU:OE2	37:j:183:ARG:NH2	2.46	0.46
25:ad:247:VAL:HG13	25:ad:248:ASP:N	2.29	0.46
26:an:80:GLU:CD	41:ai:113:LYS:HD3	2.40	0.46
27:ao:123:ILE:HG23	45:o:326:ARG:HH22	1.81	0.46
30:as:109:THR:OG1	35:t:136:ASP:OD2	2.31	0.46
31:at:259:CYS:HA	31:at:306:PHE:CE1	2.50	0.46
37:j:171:SER:HB3	48:q:63:ARG:NH1	2.31	0.46
42:x:109:VAL:O	42:x:113:SER:HB3	2.16	0.46
46:c:118:VAL:HG22	52:z:352:TYR:OH	2.15	0.46
48:q:150:TYR:CE1	49:b:37:ARG:HG2	2.50	0.46
52:z:672:ILE:C	52:z:674:PRO:HD3	2.40	0.46
53:bd:57:VAL:HG12	53:bd:58:LEU:HD22	1.96	0.46
54:A:302:ASP:OD1	54:A:302:ASP:N	2.48	0.46
55:B:66:GLU:CD	55:B:72:HIS:HB2	2.41	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
55:B:342:THR:OG1	83:Aw:38:ARG:NH1	2.47	0.46
58:E:214:SER:HB2	108:Av:109:PHE:CD2	2.50	0.46
58:E:241:ARG:HD2	58:E:323:ARG:HH11	1.80	0.46
60:G:42:ALA:HB2	72:S:336:GLN:HB3	1.97	0.46
60:G:82:TRP:CD1	99:Aj:331:ARG:HH12	2.32	0.46
60:G:110:HIS:CE1	66:M:20:ASN:HB3	2.51	0.46
61:H:11:LEU:HD23	61:H:11:LEU:H	1.80	0.46
61:H:53:THR:O	61:H:119:GLY:N	2.32	0.46
62:I:113:GLN:O	62:I:116:ALA:N	2.48	0.46
63:J:29:ILE:O	63:J:33:LEU:N	2.37	0.46
66:M:17:LYS:HE2	66:M:33:ALA:O	2.14	0.46
66:M:46:ARG:NE	1:1:517:U:O2	2.48	0.46
71:R:212:SER:OG	89:At:104:ARG:O	2.27	0.46
71:R:218:SER:C	71:R:263:ARG:HH22	2.22	0.46
71:R:244:GLU:OE1	71:R:244:GLU:N	2.45	0.46
74:U:18:LEU:CG	74:U:19:LYS:H	2.28	0.46
77:X:502:MET:HA	77:X:508:PRO:HA	1.97	0.46
84:Bj:143:ASN:CG	84:Bj:144:PRO:HD3	2.40	0.46
86:Al:126:SER:HA	86:Al:166:TYR:H	1.81	0.46
91:Ab:11:ARG:HE	91:Ab:44:LYS:HE2	1.79	0.46
92:Ai:431:LEU:HD12	92:Ai:459:THR:HG21	1.97	0.46
94:Au:60:ASP:C	94:Au:62:ARG:N	2.73	0.46
94:Au:93:HIS:CE1	94:Au:94:LYS:HE3	2.50	0.46
97:BM:232:ALA:O	97:BM:236:LEU:N	2.45	0.46
97:BM:255:ARG:HB3	97:BM:256:PRO:HD3	1.97	0.46
98:Ar:174:ALA:HB1	98:Ar:179:ILE:CG2	2.45	0.46
101:Am:13:TRP:CZ3	101:Am:15:HIS:CE1	3.03	0.46
101:Am:90:TRP:CE2	101:Am:128:ARG:HG2	2.51	0.46
104:Ak:98:SER:O	104:Ak:101:ALA:N	2.34	0.46
104:Ak:121:LEU:HD11	104:Ak:272:MET:HE1	1.96	0.46
108:Av:151:LYS:HE2	1:1:458:A:H2'	1.96	0.46
112:Ac:36:GLN:OE1	112:Ac:195:ARG:HB3	2.15	0.46
112:Ac:47:ARG:H	112:Ac:47:ARG:CD	2.26	0.46
112:Ac:174:GLN:HA	112:Ac:181:TRP:HA	1.97	0.46
113:Ah:232:ILE:HD13	113:Ah:409:TYR:CE1	2.49	0.46
118:BL:113:ARG:HH22	1:1:289:A:H1'	1.80	0.46
118:BL:123:ASN:CG	118:BL:124:PRO:HD2	2.41	0.46
119:BO:101:VAL:O	119:BO:101:VAL:HG13	2.15	0.46
119:BO:136:THR:O	119:BO:136:THR:OG1	2.32	0.46
1:1:442:U:H4'	1:1:443:G:H8	1.80	0.46
1:1:476:A:O2'	1:1:477:U:OP1	2.33	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:911:A:N1	1:1:912:U:C2	2.82	0.46
1:2:114:U:C4	1:2:115:A:N7	2.84	0.46
1:2:237:U:H5'	1:2:238:G:OP2	2.13	0.46
1:2:239:C:H2'	1:2:240:G:C5'	2.44	0.46
1:2:436:U:C4'	6:s:154:VAL:CB	2.91	0.46
1:2:446:G:N7	12:ag:19:ARG:NH1	2.62	0.46
1:2:449:A:H1'	1:2:467:U:N3	2.29	0.46
1:2:516:A:H8	17:ax:36:MET:SD	2.31	0.46
1:2:527:U:C5'	5:f:25:TYR:CE1	2.95	0.46
1:2:529:A:H3'	4:m:270:ARG:HE	1.80	0.46
4:m:27:PRO:HA	52:z:135:ASP:OD1	2.15	0.46
5:f:227:TRP:HB2	49:b:48:TYR:HA	1.98	0.46
10:ae:11:ARG:NH2	10:ae:44:ASP:OD1	2.48	0.46
10:ae:29:ARG:H	13:aj:315:GLN:NE2	2.12	0.46
14:e:452:GLU:OE1	14:e:670:ARG:NE	2.47	0.46
14:e:453:HIS:HB3	14:e:669:ARG:HG2	1.97	0.46
18:r:76:ARG:HD2	18:r:76:ARG:N	2.30	0.46
18:r:420:ASN:O	18:r:424:VAL:HG23	2.15	0.46
19:af:223:GLU:O	19:af:226:GLN:N	2.46	0.46
21:aa:594:TRP:CG	21:aa:595:TYR:N	2.83	0.46
21:aa:965:GLU:OE1	45:o:257:TYR:OH	2.21	0.46
21:aa:1025:TYR:HD1	26:an:261:LYS:HE2	1.80	0.46
22:ab:236:ASP:OD1	22:ab:237:PHE:N	2.48	0.46
22:ab:658:LYS:HG3	22:ab:659:TYR:CD1	2.49	0.46
24:ac:644:ARG:HG2	24:ac:648:TYR:CE2	2.51	0.46
24:ac:1246:ARG:HH12	24:ac:1254:MET:HE3	1.80	0.46
25:ad:535:PRO:C	30:as:215:TRP:CZ2	2.92	0.46
25:ad:733:ARG:HG2	46:c:113:PRO:HG3	1.96	0.46
26:an:63:MET:HE3	52:z:965:LEU:HB3	1.97	0.46
26:an:189:ALA:O	26:an:192:ASP:HB3	2.15	0.46
27:ao:25:SER:OG	27:ao:26:ARG:N	2.48	0.46
28:ap:67:ARG:CG	52:z:645:MET:HG3	2.46	0.46
28:ap:73:ARG:HG3	28:ap:108:GLN:NE2	2.30	0.46
28:ap:192:VAL:O	28:ap:195:GLN:HG3	2.15	0.46
28:ap:215:ASN:HB2	28:ap:216:LYS:NZ	2.29	0.46
38:l:126:VAL:HG12	38:l:130:LYS:HE3	1.97	0.46
38:l:661:THR:HG22	38:l:663:ALA:H	1.80	0.46
45:o:75:LEU:HD13	51:ba:75:TYR:HE1	1.81	0.46
45:o:116:PRO:O	45:o:118:ARG:NH2	2.48	0.46
47:k:98:VAL:HG13	47:k:107:ALA:HB1	1.96	0.46
52:z:624:ASP:O	52:z:628:VAL:HG23	2.15	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
52:z:652:ARG:HE	52:z:760:PRO:HB2	1.79	0.46
54:A:125:MET:HE3	54:A:126:PHE:CE2	2.50	0.46
55:B:312:ILE:HD13	89:At:36:LEU:CD1	2.45	0.46
56:C:101:GLU:HG2	114:BD:45:HIS:CG	2.50	0.46
57:D:65:ARG:NH2	111:Ae:226:ASP:OD1	2.42	0.46
60:G:75:THR:C	91:Ab:75:SER:HB2	2.39	0.46
61:H:99:GLU:HG3	1:1:390:A:C4	2.50	0.46
65:L:71:ARG:HD2	95:Aa:103:GLY:O	2.15	0.46
67:N:149:VAL:O	71:R:58:ARG:NH2	2.44	0.46
69:P:43:VAL:HA	102:Aq:55:ASN:HD21	1.79	0.46
69:P:161:ARG:HD2	69:P:181:ARG:HB2	1.98	0.46
74:U:28:LYS:HZ3	74:U:28:LYS:HB2	1.79	0.46
75:V:75:ASP:OD2	84:Bj:2:VAL:N	2.48	0.46
77:X:228:GLU:N	77:X:228:GLU:OE1	2.48	0.46
77:X:293:ASN:H	77:X:344:GLN:HE22	1.63	0.46
78:Y:234:ILE:HG13	78:Y:235:MET:N	2.30	0.46
84:Bj:76:PRO:HG3	84:Bj:96:GLU:OE1	2.15	0.46
84:Bj:86:THR:HG23	84:Bj:108:ASP:HB2	1.97	0.46
85:An:263:HIS:CG	113:Ah:71:ARG:HB2	2.50	0.46
91:Ab:244:ALA:HB1	108:Av:148:ARG:NH2	2.30	0.46
92:Ai:133:MET:SD	92:Ai:133:MET:N	2.85	0.46
97:BM:242:THR:H	97:BM:276:HIS:CE1	2.33	0.46
100:BH:168:ILE:O	100:BH:172:VAL:HG23	2.15	0.46
102:Aq:32:TYR:HB3	106:Ad:36:ASP:HB3	1.96	0.46
108:Av:60:ARG:CZ	108:Av:60:ARG:HB3	2.45	0.46
113:Ah:111:SER:O	113:Ah:111:SER:OG	2.32	0.46
1:1:295:G:N1	1:1:296:U:O2	2.48	0.46
1:1:835:A:O3'	1:1:836:U:H4'	2.15	0.46
1:2:43:A:C2'	29:aq:25:GLY:HA2	2.40	0.46
1:2:122:U:O4	43:i:297:GLN:CG	2.61	0.46
1:2:174:U:H5''	1:2:175:U:OP1	2.14	0.46
1:2:175:U:OP1	48:q:11:GLN:N	2.40	0.46
1:2:180:A:OP1	33:w:105:ARG:CG	2.63	0.46
1:2:271:U:H5'	1:2:271:U:H6	1.80	0.46
1:2:305:C:N4	1:2:306:A:H62	2.13	0.46
1:2:360:A:H8	1:2:360:A:O5'	1.99	0.46
1:2:397:U:H5''	1:2:397:U:C6	2.50	0.46
1:2:417:C:O2	10:ae:128:TYR:HE1	1.82	0.46
1:2:437:U:C5	6:s:151:ARG:C	2.93	0.46
1:2:438:G:C1'	1:2:444:A:H2	2.28	0.46
1:2:496:U:H4'	3:aw:15:ARG:CD	2.45	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:510:A:N3	3:aw:19:PRO:HB2	2.31	0.46
7:au:93:MET:HE1	7:au:102:TRP:NE1	2.30	0.46
10:ae:211:ARG:HH12	14:e:605:ALA:HA	1.80	0.46
13:aj:85:LYS:HB3	13:aj:95:THR:HG21	1.96	0.46
13:aj:178:TRP:CE2	13:aj:179:ARG:HG2	2.50	0.46
14:e:321:GLU:HA	14:e:324:HIS:HB3	1.96	0.46
15:d:97:ARG:HH21	42:x:111:ARG:NH2	2.13	0.46
17:ax:136:PRO:HA	17:ax:139:TRP:CD2	2.50	0.46
19:af:296:ARG:NH1	20:u:420:ALA:HB2	2.29	0.46
19:af:739:MET:HE3	19:af:739:MET:HB3	1.85	0.46
21:aa:1237:VAL:HG11	21:aa:1266:THR:HB	1.97	0.46
24:ac:665:VAL:HG13	24:ac:712:SER:O	2.15	0.46
24:ac:686:ARG:HB2	38:l:316:PRO:HD2	1.97	0.46
24:ac:796:ARG:HA	24:ac:799:THR:HG22	1.96	0.46
24:ac:981:GLN:OE1	24:ac:984:HIS:ND1	2.48	0.46
25:ad:34:PHE:HA	25:ad:37:LEU:HD23	1.96	0.46
30:as:139:CYS:HB2	30:as:174:PHE:CD2	2.50	0.46
32:y:14:LEU:HD21	32:y:34:LEU:HD11	1.97	0.46
32:y:162:TYR:HE1	32:y:164:PRO:HA	1.79	0.46
35:t:33:ALA:HA	35:t:41:THR:HB	1.98	0.46
38:l:605:ARG:HH12	38:l:609:GLN:HG3	1.77	0.46
39:ar:162:GLN:NE2	39:ar:186:HIS:HB2	2.30	0.46
44:g:102:GLN:O	44:g:106:SER:N	2.36	0.46
45:o:110:VAL:HA	45:o:113:MET:HE3	1.97	0.46
45:o:200:PHE:HA	45:o:204:ILE:HD13	1.97	0.46
47:k:120:PHE:HB3	47:k:122:GLN:HG2	1.96	0.46
49:b:129:TRP:HB3	49:b:133:VAL:HG21	1.97	0.46
54:A:169:ARG:HH22	82:BB:25:LEU:CD2	2.28	0.46
55:B:434:MET:HG3	60:G:275:MET:HB3	1.97	0.46
59:F:84:ARG:HE	59:F:84:ARG:HB3	1.50	0.46
61:H:146:ARG:NH1	105:BP:171:PHE:O	2.48	0.46
62:I:148:ARG:HA	62:I:161:TYR:HA	1.97	0.46
67:N:198:ARG:NH1	1:1:561:U:OP1	2.40	0.46
69:P:49:GLN:NE2	69:P:64:TYR:O	2.48	0.46
70:Q:170:ASN:HD22	85:An:280:GLU:HG2	1.80	0.46
71:R:143:LEU:HD11	71:R:358:VAL:HG21	1.98	0.46
78:Y:147:VAL:HG12	78:Y:149:GLN:H	1.80	0.46
81:UA:27:UNK:O	81:UA:31:UNK:N	2.49	0.46
85:An:198:GLU:OE1	113:Ah:91:ASN:HB2	2.16	0.46
92:Ai:218:HIS:CE1	102:Aq:139:ASP:HB3	2.50	0.46
94:Au:54:PRO:HB3	94:Au:59:SER:CB	2.45	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
97:BM:125:GLU:O	97:BM:129:LEU:HB2	2.14	0.46
99:Aj:293:GLU:OE1	109:Af:130:TYR:OH	2.33	0.46
100:BH:80:PRO:HA	100:BH:188:TRP:HA	1.96	0.46
100:BH:80:PRO:HD2	100:BH:98:LYS:HB3	1.97	0.46
100:BH:88:PHE:CG	100:BH:89:VAL:HG13	2.50	0.46
103:BE:65:PHE:HZ	103:BE:67:LYS:HE3	1.78	0.46
106:Ad:32:ARG:O	106:Ad:32:ARG:HD2	2.16	0.46
108:Av:157:SER:O	1:1:471:A:O2'	2.14	0.46
111:Ae:214:PHE:CE2	111:Ae:219:MET:HB2	2.50	0.46
111:Ae:232:ILE:O	111:Ae:244:PRO:HD2	2.15	0.46
112:Ac:171:LEU:HB2	112:Ac:258:TRP:CZ3	2.50	0.46
117:Ax:90:THR:HB	117:Ax:200:PHE:HD1	1.79	0.46
117:Ax:105:CYS:HB3	117:Ax:109:ASP:N	2.27	0.46
118:BL:218:THR:OG1	118:BL:221:LYS:NZ	2.35	0.46
118:BL:310:ARG:O	118:BL:313:SER:N	2.24	0.46
118:BL:358:ARG:NH2	1:1:663:U:OP2	2.48	0.46
119:BO:47:TRP:H	1:1:814:A:H2	1.63	0.46
1:1:47:A:H61	1:1:131:U:H3	1.62	0.46
1:1:171:U:H3	1:1:532:U:H3	1.64	0.46
1:1:343:A:O2'	1:1:344:U:OP1	2.26	0.46
1:1:649:A:H5''	1:1:1075:A:H5'	1.98	0.46
1:1:702:U:H5'	1:1:703:U:OP2	2.15	0.46
1:1:838:A:O2'	1:1:1103:U:O2'	2.15	0.46
1:1:847:A:O2'	1:1:848:U:H5''	2.15	0.46
1:2:67:A:C5'	37:j:22:TRP:HZ3	2.27	0.46
1:2:68:A:C5'	37:j:22:TRP:HB3	2.41	0.46
1:2:260:A:H2'	1:2:261:U:O5'	2.14	0.46
1:2:286:G:N3	1:2:286:G:H2'	2.29	0.46
1:2:291:U:N1	1:2:291:U:H5''	2.31	0.46
1:2:503:A:H2'	6:s:82:LEU:HD21	1.96	0.46
1:2:555:U:H2'	1:2:556:U:O4'	2.16	0.46
1:2:559:U:C2	1:2:560:U:C5	3.04	0.46
3:aw:134:THR:HG23	18:r:107:LEU:O	2.14	0.46
6:s:59:MET:SD	14:e:223:ARG:NH2	2.88	0.46
7:au:26:PRO:O	7:au:32:TRP:NE1	2.48	0.46
10:ae:127:PRO:HA	10:ae:136:ALA:HB3	1.97	0.46
11:ay:48:LYS:O	11:ay:52:GLU:HG2	2.15	0.46
12:ag:194:GLN:O	12:ag:198:ALA:N	2.42	0.46
12:ag:260:ARG:H	14:e:289:LEU:HD23	1.80	0.46
13:aj:72:HIS:CG	13:aj:73:PRO:HD2	2.51	0.46
14:e:148:THR:HA	14:e:151:THR:HB	1.98	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
14:e:340:LEU:HD11	14:e:361:TRP:CZ2	2.51	0.46
14:e:686:LEU:HD23	14:e:686:LEU:HA	1.72	0.46
19:af:249:ILE:HA	22:ab:982:TYR:CE1	2.50	0.46
19:af:527:TRP:C	19:af:618:ARG:HH12	2.23	0.46
21:aa:81:ARG:HB2	21:aa:112:TRP:CH2	2.50	0.46
21:aa:325:GLU:OE2	21:aa:339:TRP:NE1	2.49	0.46
21:aa:744:PRO:HB3	21:aa:792:LYS:NZ	2.30	0.46
21:aa:1537:CYS:SG	21:aa:1539:SER:OG	2.60	0.46
22:ab:1112:ARG:NE	22:ab:1116:GLU:OE1	2.33	0.46
23:ak:236:HIS:O	23:ak:240:ALA:N	2.48	0.46
24:ac:387:TRP:HA	24:ac:398:GLU:HG2	1.96	0.46
24:ac:547:GLN:O	24:ac:554:ARG:N	2.44	0.46
24:ac:588:SER:H	24:ac:591:THR:HG1	1.62	0.46
27:ao:186:VAL:O	27:ao:190:LEU:N	2.40	0.46
33:w:128:TYR:OH	48:q:24:HIS:O	2.31	0.46
37:j:176:PRO:O	37:j:180:ALA:N	2.47	0.46
41:ai:20:LYS:HG2	41:ai:24:TYR:HE1	1.81	0.46
42:x:219:LEU:HA	42:x:219:LEU:HD12	1.75	0.46
44:g:113:PHE:O	44:g:116:MET:N	2.49	0.46
49:b:69:LEU:HD23	49:b:69:LEU:H	1.80	0.46
49:b:146:LYS:HD3	49:b:151:THR:HG23	1.97	0.46
50:a:257:LYS:HE3	50:a:259:SER:HA	1.96	0.46
50:a:267:HIS:HA	50:a:270:GLU:HG2	1.97	0.46
52:z:422:MET:O	52:z:425:LEU:N	2.47	0.46
52:z:532:SER:N	52:z:536:GLU:OE2	2.42	0.46
54:A:40:SER:OG	82:BB:75:VAL:HG22	2.16	0.46
56:C:68:GLU:HA	116:Ag:115:GLY:O	2.15	0.46
58:E:339:SER:HB3	91:Ab:189:ARG:HE	1.80	0.46
60:G:282:ARG:NH2	60:G:368:ARG:HH12	2.13	0.46
61:H:167:PHE:HB3	98:Ar:166:TRP:CZ2	2.49	0.46
64:K:168:LEU:HD12	64:K:179:TRP:CE3	2.50	0.46
66:M:181:GLU:O	66:M:185:GLN:HB2	2.15	0.46
67:N:122:PRO:HG2	67:N:123:HIS:CE1	2.50	0.46
68:O:310:MET:SD	88:Az:60:HIS:CD2	3.08	0.46
77:X:242:GLU:O	77:X:245:ASP:HB2	2.15	0.46
78:Y:177:PHE:C	78:Y:179:TYR:H	2.23	0.46
82:BB:111:PHE:CD1	82:BB:112:LEU:N	2.83	0.46
85:An:180:ASP:HA	85:An:184:GLU:HB2	1.97	0.46
86:Al:38:VAL:O	86:Al:38:VAL:CG2	2.63	0.46
86:Al:71:PHE:HD2	115:Ay:145:PRO:HA	1.80	0.46
86:Al:156:ILE:HG22	86:Al:157:PRO:HD3	1.96	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
86:Al:195:VAL:HG13	86:Al:210:VAL:HG21	1.97	0.46
90:BC:54:MET:O	90:BC:56:LEU:N	2.49	0.46
91:Ab:55:SER:OG	91:Ab:72:ARG:HD2	2.15	0.46
104:Ak:66:SER:HB2	104:Ak:71:ASN:C	2.41	0.46
104:Ak:139:ARG:NE	104:Ak:197:GLY:O	2.43	0.46
105:BP:99:VAL:O	105:BP:99:VAL:HG23	2.16	0.46
112:Ac:286:ASP:OD1	112:Ac:287:GLY:N	2.48	0.46
116:Ag:120:ASN:HB3	116:Ag:123:THR:HB	1.96	0.46
118:BL:237:CYS:SG	118:BL:260:PRO:HD3	2.55	0.46
1:1:138:A:OP2	1:1:138:A:H8	1.98	0.46
1:1:426:G:O2'	1:1:427:U:O5'	2.30	0.46
1:1:642:A:HO2'	1:1:643:G:P	2.33	0.46
1:1:880:A:H8	1:1:880:A:O5'	1.97	0.46
1:2:143:G:P	25:ad:34:PHE:CE1	3.08	0.46
1:2:223:U:C6	1:2:223:U:C3'	2.99	0.46
1:2:284:U:O2'	43:i:245:ASN:ND2	2.41	0.46
1:2:348:U:C3'	1:2:349:G:H5''	2.31	0.46
1:2:414:C:H4'	1:2:415:A:OP2	2.12	0.46
1:2:423:C:N3	12:ag:47:VAL:HG11	2.30	0.46
1:2:492:U:O5'	14:e:385:PHE:CD2	2.58	0.46
1:2:495:U:C4	3:aw:31:ARG:HG3	2.51	0.46
2:h:131:ARG:NH1	8:am:299:PHE:O	2.49	0.46
6:s:112:MET:HG2	20:u:706:TRP:CH2	2.51	0.46
9:n:147:MET:SD	11:ay:50:ARG:NE	2.89	0.46
10:ae:27:ARG:NH2	10:ae:36:ARG:HD2	2.27	0.46
10:ae:29:ARG:H	13:aj:315:GLN:HE22	1.63	0.46
14:e:445:ASP:OD1	14:e:445:ASP:N	2.41	0.46
19:af:412:ASP:O	19:af:416:CYS:N	2.46	0.46
19:af:524:ARG:NH2	19:af:530:VAL:HB	2.29	0.46
20:u:166:MET:HA	20:u:169:THR:HG22	1.96	0.46
20:u:704:TYR:O	20:u:707:GLN:N	2.42	0.46
21:aa:98:LEU:HA	21:aa:99:PRO:HA	1.73	0.46
21:aa:1629:ALA:O	21:aa:1632:GLU:HG3	2.16	0.46
22:ab:620:ARG:HA	22:ab:623:LEU:HD12	1.98	0.46
23:ak:48:VAL:HG21	24:ac:1141:ILE:HD12	1.96	0.46
24:ac:438:GLN:HE21	24:ac:442:GLU:HB2	1.81	0.46
24:ac:681:LEU:HD22	38:l:323:ARG:NH2	2.30	0.46
24:ac:1105:GLU:HB2	24:ac:1118:HIS:HD2	1.80	0.46
25:ad:319:GLN:HE22	25:ad:441:ARG:NE	2.14	0.46
25:ad:591:TRP:CZ3	25:ad:628:VAL:HG11	2.51	0.46
25:ad:618:ARG:NH1	25:ad:621:VAL:HG21	2.30	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:619:ALA:HA	25:ad:622:TRP:CE3	2.50	0.46
25:ad:685:THR:OG1	45:o:472:ARG:NH2	2.49	0.46
29:aq:30:LYS:HG3	33:w:143:PRO:O	2.15	0.46
29:aq:155:LEU:HD21	29:aq:190:LEU:HD13	1.97	0.46
35:t:35:ARG:HB2	35:t:38:MET:HG2	1.98	0.46
36:p:289:THR:HG23	36:p:291:LYS:N	2.26	0.46
38:l:72:ARG:HD2	38:l:505:ASP:O	2.15	0.46
38:l:76:SER:O	38:l:80:GLN:HG3	2.16	0.46
39:ar:92:GLU:O	39:ar:96:SER:OG	2.20	0.46
44:g:126:VAL:HG13	44:g:131:GLN:HA	1.98	0.46
45:o:253:LYS:O	45:o:256:ARG:HD2	2.16	0.46
46:c:215:LEU:HD13	46:c:222:GLY:HA2	1.97	0.46
50:a:204:VAL:HG21	50:a:247:PHE:CE1	2.50	0.46
50:a:368:ARG:O	50:a:372:LEU:HD12	2.16	0.46
50:a:391:THR:HG23	50:a:393:ASP:HB3	1.96	0.46
52:z:554:ASN:HA	52:z:773:LEU:HB3	1.97	0.46
53:bd:45:TYR:CG	53:bd:46:PHE:N	2.82	0.46
54:A:314:SER:O	54:A:314:SER:OG	2.33	0.46
58:E:95:LYS:HB2	58:E:95:LYS:HE3	1.79	0.46
58:E:218:ARG:HB3	108:Av:109:PHE:HD2	1.80	0.46
59:F:22:GLN:HA	59:F:61:VAL:O	2.15	0.46
60:G:57:PHE:CD2	105:BP:29:PRO:HD2	2.51	0.46
61:H:164:TYR:HA	98:Ar:168:TRP:CZ2	2.50	0.46
62:I:98:ASP:HA	62:I:143:TYR:HD2	1.81	0.46
62:I:99:HIS:O	62:I:103:LEU:N	2.48	0.46
63:J:100:MET:HE2	119:BO:147:PHE:CE2	2.51	0.46
64:K:35:GLY:O	64:K:39:ILE:HG22	2.15	0.46
64:K:168:LEU:HD23	64:K:168:LEU:HA	1.84	0.46
67:N:196:ARG:NH2	1:1:562:U:O2'	2.49	0.46
67:N:209:VAL:HG12	71:R:419:GLN:HE21	1.80	0.46
68:O:167:LEU:HD11	68:O:194:PRO:HG3	1.98	0.46
69:P:71:ARG:HD3	69:P:82:THR:HG21	1.97	0.46
70:Q:161:LEU:HD23	88:Az:92:TYR:HD1	1.80	0.46
77:X:401:GLU:OE1	77:X:402:ARG:NH2	2.49	0.46
77:X:482:PRO:HG2	1:1:203:A:N6	2.30	0.46
79:Z:62:PHE:HZ	79:Z:131:TRP:CH2	2.33	0.46
80:BA:24:VAL:HA	98:Ar:127:ARG:NH1	2.30	0.46
80:BA:118:SER:OG	80:BA:119:GLU:N	2.48	0.46
90:BC:3:ASP:O	90:BC:6:ALA:N	2.48	0.46
91:Ab:244:ALA:HB1	108:Av:148:ARG:HH21	1.80	0.46
101:Am:274:ASP:HA	101:Am:277:MET:HG2	1.98	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
107:BF:23:PRO:O	107:BF:24:LEU:HG	2.15	0.46
108:Av:60:ARG:NH1	108:Av:122:GLU:OE1	2.48	0.46
109:Af:64:ARG:HH11	109:Af:65:VAL:HG23	1.79	0.46
110:As:51:ARG:HD3	110:As:53:THR:HG23	1.96	0.46
113:Ah:165:TYR:OH	113:Ah:274:ARG:NH1	2.40	0.46
116:Ag:68:LYS:HG2	116:Ag:122:TRP:CZ3	2.50	0.46
116:Ag:217:LYS:NZ	116:Ag:241:PHE:HB3	2.30	0.46
118:BL:187:LEU:O	118:BL:279:ALA:HB2	2.16	0.46
118:BL:247:LEU:HD11	118:BL:258:LEU:HB2	1.97	0.46
118:BL:335:HIS:O	118:BL:335:HIS:CG	2.66	0.46
1:1:432:U:N3	1:1:433:G:C6	2.84	0.46
1:1:433:G:O6	1:1:453:A:H2	1.99	0.46
1:1:698:G:H2'	1:1:699:A:C5'	2.46	0.46
1:2:61:U:H3'	1:2:61:U:O2	2.15	0.46
1:2:147:U:C6	1:2:147:U:H3'	2.51	0.46
1:2:226:A:H2'	1:2:227:U:H5''	1.98	0.46
1:2:419:A:C3'	10:ae:181:ARG:CD	2.90	0.46
1:2:460:A:N1	8:am:300:ILE:N	2.56	0.46
1:2:513:U:N1	16:az:146:TYR:CE1	2.83	0.46
1:2:525:A:OP1	15:d:328:ARG:O	2.34	0.46
1:2:538:G:O4'	1:2:582:A:C2	2.69	0.46
1:2:570:A:H2'	1:2:571:C:O5'	2.15	0.46
4:m:132:LYS:HD3	48:q:179:PHE:O	2.16	0.46
7:au:109:GLU:CD	7:au:109:GLU:H	2.24	0.46
7:au:167:ASN:ND2	7:au:174:TYR:H	2.12	0.46
9:n:126:GLU:N	11:ay:47:GLN:OE1	2.42	0.46
11:ay:70:ASP:O	11:ay:74:THR:HG23	2.16	0.46
12:ag:73:GLN:HG2	12:ag:107:PHE:CZ	2.51	0.46
12:ag:506:SER:HB2	12:ag:518:TYR:OH	2.16	0.46
18:r:62:VAL:HG21	18:r:67:MET:HB2	1.97	0.46
19:af:149:ARG:HA	19:af:152:TRP:NE1	2.31	0.46
20:u:422:LEU:HD22	20:u:553:ARG:HB3	1.98	0.46
21:aa:861:GLN:HE22	52:z:982:ARG:HB2	1.80	0.46
21:aa:1467:GLU:HA	21:aa:1607:ARG:HH12	1.81	0.46
24:ac:762:LYS:HD3	24:ac:765:ALA:HB3	1.97	0.46
25:ad:506:PHE:HE2	25:ad:560:GLU:HB3	1.81	0.46
25:ad:582:VAL:HG22	25:ad:586:LEU:HD13	1.96	0.46
25:ad:668:HIS:O	25:ad:674:ASN:ND2	2.49	0.46
25:ad:707:TRP:CG	46:c:264:LYS:HE2	2.50	0.46
32:y:210:ARG:NH1	32:y:260:ILE:HB	2.31	0.46
32:y:265:ALA:O	32:y:269:LEU:HD23	2.16	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
38:l:624:ARG:HA	38:l:627:CYS:HB3	1.97	0.46
41:ai:83:ILE:HG13	41:ai:84:SER:H	1.79	0.46
41:ai:257:TYR:HE1	41:ai:292:GLN:HB2	1.79	0.46
45:o:127:TYR:CE1	45:o:131:LYS:HD2	2.50	0.46
45:o:454:GLY:H	45:o:462:GLU:CD	2.23	0.46
46:c:276:HIS:CE1	46:c:278:ARG:HG3	2.50	0.46
52:z:881:GLN:HE22	52:z:885:HIS:N	2.13	0.46
53:bd:49:ASN:OD1	53:bd:66:LYS:HB2	2.16	0.46
56:C:100:LEU:HA	56:C:104:GLU:OE1	2.15	0.46
58:E:201:PRO:HD3	108:Av:53:PHE:CZ	2.50	0.46
59:F:155:TYR:O	59:F:155:TYR:CD2	2.69	0.46
60:G:331:ALA:N	60:G:335:GLU:OE1	2.25	0.46
62:I:60:ALA:HB3	62:I:66:ARG:HB2	1.98	0.46
62:I:97:ALA:HB3	62:I:144:ALA:HB2	1.97	0.46
64:K:170:ARG:H	64:K:174:ARG:HG3	1.81	0.46
67:N:112:VAL:HG11	71:R:399:VAL:HG11	1.97	0.46
71:R:200:ARG:NH2	88:Az:151:CYS:HB2	2.30	0.46
72:S:360:ARG:HG3	109:Af:155:ILE:HD11	1.97	0.46
73:T:80:GLN:HG3	73:T:81:ILE:N	2.30	0.46
74:U:33:LYS:C	74:U:34:ILE:HG13	2.40	0.46
74:U:73:TRP:CE3	84:Bj:15:PRO:HB3	2.50	0.46
77:X:467:SER:HB3	96:Ao:73:HIS:HA	1.96	0.46
78:Y:253:PHE:O	78:Y:257:GLU:N	2.36	0.46
79:Z:43:ILE:O	79:Z:43:ILE:HG22	2.16	0.46
80:BA:26:LYS:HB3	98:Ar:127:ARG:HH21	1.81	0.46
80:BA:113:MET:O	80:BA:114:PHE:CG	2.68	0.46
83:Aw:103:ILE:O	83:Aw:107:ILE:HG12	2.15	0.46
86:Al:84:ASP:HB2	86:Al:86:LEU:HD23	1.97	0.46
86:Al:130:TYR:HB3	86:Al:172:LEU:HD23	1.98	0.46
90:BC:132:ILE:O	90:BC:132:ILE:HG13	2.16	0.46
91:Ab:204:GLN:HB3	91:Ab:210:GLY:HA3	1.97	0.46
91:Ab:240:ARG:HE	96:Ao:259:THR:HA	1.81	0.46
92:Ai:74:LEU:HD12	92:Ai:98:CYS:HB2	1.97	0.46
93:Ap:14:HIS:CE1	93:Ap:48:ALA:HB1	2.51	0.46
94:Au:103:GLN:HE21	94:Au:108:HIS:CE1	2.33	0.46
94:Au:129:ASP:OD1	113:Ah:248:HIS:NE2	2.48	0.46
96:Ao:89:PHE:HD1	106:Ad:34:MET:HG3	1.81	0.46
97:BM:253:CYS:HB3	97:BM:259:LYS:HB2	1.97	0.46
98:Ar:22:ILE:HD12	98:Ar:56:ALA:HB1	1.97	0.46
101:Am:110:THR:O	101:Am:114:LEU:HG	2.16	0.46
102:Aq:126:VAL:O	102:Aq:129:ARG:N	2.33	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
104:Ak:252:HIS:C	104:Ak:254:ASP:H	2.23	0.46
111:Ae:206:ARG:NH1	1:1:426:G:H21	2.14	0.46
113:Ah:159:TYR:HA	113:Ah:162:GLU:HG2	1.97	0.46
114:BD:50:ARG:HG2	114:BD:54:TYR:CE1	2.49	0.46
125:Ag:301:NAD:H8A	125:Ag:301:NAD:H51N	1.98	0.46
120:BG:1288:PRO:C	120:BG:1290:CYS:H	2.24	0.46
1:1:249:U:O5'	1:1:249:U:O2	2.34	0.46
1:1:764:U:O2'	1:1:765:A:OP1	2.33	0.46
1:1:869:A:O2'	1:1:870:A:P	2.73	0.46
1:1:935:G:C2	1:1:936:G:C4	3.04	0.46
1:1:1045:U:H3'	1:1:1045:U:O2	2.16	0.46
1:2:511:U:C4'	3:aw:19:PRO:HD2	2.46	0.46
1:2:517:G:OP1	17:ax:125:ARG:NH2	2.49	0.46
1:2:527:U:H5''	5:f:25:TYR:HE1	1.73	0.46
4:m:114:ASP:OD1	4:m:114:ASP:N	2.49	0.46
8:am:30:GLN:OE1	12:ag:466:ARG:NH1	2.49	0.46
8:am:136:VAL:HA	36:p:81:GLN:NE2	2.31	0.46
9:n:63:MET:HE3	11:ay:53:TYR:HE2	1.80	0.46
10:ae:510:TRP:HB2	10:ae:527:PHE:CD2	2.51	0.46
15:d:58:GLN:NE2	15:d:78:GLN:HB3	2.30	0.46
16:az:107:HIS:CD2	16:az:111:ARG:HH21	2.34	0.46
19:af:494:SER:O	19:af:494:SER:OG	2.30	0.46
20:u:52:HIS:CE1	20:u:92:PRO:HB3	2.51	0.46
21:aa:140:ARG:NE	21:aa:159:GLU:OE2	2.47	0.46
21:aa:310:CYS:HB3	21:aa:313:CYS:HB2	1.65	0.46
21:aa:438:THR:HA	21:aa:512:TRP:HB2	1.98	0.46
21:aa:529:PRO:HB2	21:aa:531:GLU:OE1	2.15	0.46
21:aa:546:GLU:OE2	21:aa:554:ARG:NH2	2.48	0.46
21:aa:643:LEU:HG	21:aa:681:GLY:HA3	1.97	0.46
21:aa:664:LEU:HD13	21:aa:722:TYR:HB3	1.98	0.46
22:ab:118:ARG:HB3	24:ac:686:ARG:NH1	2.29	0.46
22:ab:122:SER:HB2	22:ab:125:GLU:HB2	1.97	0.46
22:ab:158:SER:OG	22:ab:159:GLY:N	2.48	0.46
23:ak:139:ARG:NE	24:ac:1203:GLN:HE21	2.14	0.46
24:ac:199:ARG:HB2	24:ac:593:ARG:HH22	1.81	0.46
26:an:279:GLN:HA	26:an:282:GLN:HB2	1.96	0.46
28:ap:26:GLN:O	28:ap:28:SER:N	2.48	0.46
29:aq:155:LEU:HB3	29:aq:197:TYR:OH	2.14	0.46
30:as:47:PRO:HA	30:as:50:GLU:HG3	1.96	0.46
30:as:247:LEU:HD13	48:q:37:HIS:CE1	2.51	0.46
32:y:125:LYS:O	32:y:129:GLU:N	2.40	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
34:v:120:LEU:O	34:v:124:CYS:HB2	2.16	0.46
35:t:149:TYR:CE1	35:t:189:PRO:HB3	2.51	0.46
36:p:216:ALA:C	36:p:273:THR:H	2.23	0.46
50:a:337:ASP:OD1	50:a:337:ASP:N	2.48	0.46
52:z:539:LYS:O	52:z:542:SER:OG	2.30	0.46
52:z:914:ASP:N	52:z:914:ASP:OD1	2.49	0.46
55:B:38:PHE:HB2	60:G:96:TYR:OH	2.16	0.46
55:B:417:VAL:HG23	55:B:418:GLU:OE1	2.15	0.46
58:E:254:GLN:O	58:E:258:GLY:N	2.47	0.46
59:F:80:GLY:N	1:1:1027:G:H5"	2.30	0.46
65:L:92:VAL:HB	95:Aa:191:THR:HG23	1.97	0.46
66:M:50:ILE:HD11	68:O:54:LEU:HD23	1.98	0.46
67:N:149:VAL:HG21	67:N:182:TYR:CE1	2.51	0.46
68:O:77:ASP:OD2	68:O:79:GLU:HB2	2.16	0.46
69:P:33:HIS:HB3	96:Ao:67:ARG:HH12	1.81	0.46
69:P:167:TYR:CD1	69:P:172:LEU:HD12	2.51	0.46
70:Q:169:LYS:HD3	85:An:243:PHE:CZ	2.50	0.46
70:Q:217:LYS:O	70:Q:221:GLU:HB2	2.16	0.46
71:R:421:ASN:ND2	71:R:448:ASP:HB3	2.31	0.46
71:R:423:SER:OG	71:R:424:ASN:N	2.49	0.46
71:R:479:ASP:OD1	71:R:480:ILE:N	2.49	0.46
73:T:34:ASN:OD1	73:T:34:ASN:N	2.48	0.46
75:V:32:PHE:O	75:V:98:LYS:NZ	2.40	0.46
78:Y:168:GLU:HB2	78:Y:177:PHE:CD1	2.50	0.46
84:Bj:10:THR:HG23	102:Aq:130:THR:HG21	1.98	0.46
92:Ai:116:GLU:OE1	92:Ai:238:HIS:NE2	2.49	0.46
94:Au:124:GLN:HA	94:Au:127:ARG:HG2	1.98	0.46
97:BM:75:VAL:CG1	97:BM:79:ARG:HE	2.28	0.46
97:BM:153:HIS:HA	97:BM:156:LEU:HB3	1.97	0.46
97:BM:290:HIS:HB3	97:BM:326:TYR:CE1	2.51	0.46
97:BM:357:ALA:O	97:BM:361:LEU:HD12	2.15	0.46
97:BM:374:LEU:HD12	97:BM:374:LEU:HA	1.82	0.46
101:Am:263:HIS:CB	101:Am:302:PRO:HB2	2.46	0.46
105:BP:-10:ARG:HA	105:BP:-10:ARG:HD2	1.75	0.46
105:BP:11:GLY:HA2	105:BP:16:SER:OG	2.16	0.46
108:Av:57:TYR:CE1	108:Av:66:MET:HB2	2.50	0.46
113:Ah:439:LEU:HD13	113:Ah:452:MET:HE3	1.98	0.46
114:BD:86:LEU:HA	114:BD:93:ARG:HH21	1.81	0.46
118:BL:98:MET:HE2	118:BL:163:VAL:HG13	1.97	0.46
118:BL:183:VAL:O	118:BL:183:VAL:HG23	2.15	0.46
119:BO:91:CYS:C	119:BO:93:VAL:N	2.73	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:219:A:C8	1:1:319:A:N6	2.84	0.46
1:1:288:C:O2'	1:1:289:A:O5'	2.33	0.46
1:1:511:A:O2'	1:1:512:A:OP2	2.28	0.46
1:1:540:U:H5	1:1:541:U:C2	2.34	0.46
1:1:689:U:HO2'	1:1:690:U:P	2.39	0.46
1:1:881:G:H8	1:1:987:A:C2	2.33	0.46
1:1:1036:U:H5'	1:1:1037:C:OP1	2.15	0.46
1:2:11:A:P	50:a:263:LYS:CG	2.97	0.46
1:2:67:A:HO2'	1:2:68:A:H5'	1.79	0.46
1:2:281:A:N3	1:2:281:A:H2'	2.31	0.46
1:2:406:A:H61	3:aw:31:ARG:HH21	1.64	0.46
1:2:426:U:OP1	13:aj:235:GLU:HB2	2.14	0.46
1:2:487:C:O2'	1:2:488:U:H5'	2.15	0.46
1:2:520:A:H4'	15:d:347:LYS:HG2	1.98	0.46
1:2:540:U:H6	1:2:540:U:O5'	1.99	0.46
2:h:137:TRP:CZ2	15:d:334:GLN:HB3	2.51	0.46
3:aw:57:ASP:OD1	3:aw:58:TRP:N	2.48	0.46
4:m:261:LEU:HD22	4:m:268:MET:SD	2.55	0.46
4:m:267:GLU:HG2	4:m:272:ALA:HB2	1.98	0.46
5:f:11:ARG:HH12	5:f:15:ARG:HD2	1.81	0.46
5:f:222:ALA:HB3	52:z:618:ASN:CG	2.41	0.46
10:ae:533:GLY:HA2	12:ag:255:ARG:CZ	2.45	0.46
11:ay:100:ARG:O	11:ay:104:ASP:HB2	2.16	0.46
13:aj:184:LYS:O	13:aj:189:GLY:HA3	2.16	0.46
14:e:301:ALA:O	14:e:305:ALA:N	2.49	0.46
14:e:372:ARG:HH21	14:e:809:ASN:C	2.23	0.46
15:d:308:THR:HG23	15:d:315:ARG:HB2	1.97	0.46
19:af:672:THR:HA	19:af:727:ALA:HB2	1.98	0.46
21:aa:1115:LYS:HB3	21:aa:1384:TRP:HE1	1.80	0.46
23:ak:5:TYR:O	23:ak:9:LEU:N	2.41	0.46
23:ak:36:ASN:ND2	38:l:635:GLY:HA3	2.26	0.46
24:ac:516:ARG:O	24:ac:524:LEU:HD12	2.16	0.46
24:ac:1028:GLU:HB2	24:ac:1031:TRP:CD1	2.50	0.46
25:ad:33:GLY:O	25:ad:36:GLN:N	2.49	0.46
25:ad:654:GLU:HA	25:ad:657:VAL:HG22	1.96	0.46
25:ad:760:LYS:HG2	25:ad:764:ARG:NH1	2.28	0.46
29:aq:29:TRP:CZ2	33:w:143:PRO:HD2	2.51	0.46
29:aq:78:LEU:O	29:aq:80:LYS:HD3	2.16	0.46
29:aq:94:VAL:O	29:aq:97:TRP:HB3	2.16	0.46
29:aq:119:PHE:HD1	29:aq:131:ALA:HB1	1.81	0.46
29:aq:136:ASN:ND2	29:aq:140:ASN:OD1	2.49	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
35:t:118:ARG:HA	35:t:171:TRP:HA	1.97	0.46
35:t:225:LEU:HB3	35:t:231:LEU:HG	1.97	0.46
43:i:339:ARG:HD2	47:k:135:GLU:OE1	2.15	0.46
44:g:88:LYS:HE2	44:g:89:LEU:HD22	1.98	0.46
47:k:152:LYS:HD2	47:k:158:HIS:HB3	1.97	0.46
50:a:360:LEU:CD2	50:a:362:GLU:H	2.27	0.46
55:B:144:ARG:HD3	67:N:76:TYR:HE1	1.80	0.46
55:B:389:GLU:O	55:B:392:MET:HG2	2.15	0.46
58:E:250:LEU:HB2	58:E:255:LEU:HD13	1.98	0.46
58:E:325:LEU:HA	58:E:326:ASN:HA	1.67	0.46
59:F:33:TYR:CZ	59:F:143:LEU:HD11	2.51	0.46
61:H:6:LEU:CG	61:H:7:ARG:H	2.28	0.46
67:N:168:PHE:HE1	67:N:223:VAL:HG11	1.80	0.46
72:S:362:ARG:O	72:S:365:ARG:N	2.49	0.46
75:V:64:ARG:HD3	1:l:955:U:OP2	2.15	0.46
77:X:90:ASP:HB2	77:X:147:TYR:CE1	2.51	0.46
79:Z:90:LEU:O	79:Z:94:ILE:HG12	2.16	0.46
81:UA:55:UNK:O	81:UA:59:UNK:N	2.49	0.46
85:An:319:LYS:HD2	85:An:319:LYS:N	2.31	0.46
88:Az:19:GLN:NE2	1:l:576:A:OP2	2.49	0.46
93:Ap:176:PHE:O	93:Ap:180:SER:N	2.46	0.46
94:Au:54:PRO:HD2	118:BL:143:TYR:HE1	1.80	0.46
97:BM:67:GLU:HA	97:BM:323:ARG:NH1	2.31	0.46
101:Am:93:TYR:OH	101:Am:97:ARG:NH1	2.48	0.46
104:Ak:229:THR:HG23	104:Ak:229:THR:O	2.16	0.46
104:Ak:263:GLU:O	104:Ak:267:VAL:HG23	2.16	0.46
104:Ak:292:MET:SD	104:Ak:296:MET:HG2	2.56	0.46
109:Af:46:GLU:OE2	109:Af:64:ARG:HD2	2.15	0.46
119:BO:87:ARG:HG2	119:BO:88:PHE:H	1.80	0.46
119:BO:180:LEU:HD11	119:BO:185:LEU:HD23	1.98	0.46
1:l:599:U:O2'	1:l:600:A:H5'	2.16	0.46
1:2:175:U:H5	48:q:11:GLN:HE21	1.54	0.46
1:2:208:C:C3'	1:2:209:U:C4'	2.94	0.46
1:2:325:U:OP2	1:2:325:U:C2	2.69	0.46
1:2:384:U:O5'	1:2:384:U:H6	1.99	0.46
1:2:401:U:O2	1:2:401:U:O4'	2.34	0.46
1:2:516:A:C6	17:ax:35:LYS:CB	2.96	0.46
2:h:140:ASP:HB2	14:e:371:THR:HB	1.98	0.46
4:m:279:VAL:HG11	17:ax:98:HIS:CD2	2.50	0.46
7:au:143:ALA:N	7:au:176:ASP:OD2	2.24	0.46
8:am:35:TYR:CE1	8:am:40:ILE:HD11	2.51	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
10:ae:248:ASP:OD2	22:ab:1068:PHE:HB2	2.16	0.46
11:ay:71:PHE:HD1	11:ay:169:ASP:HB2	1.80	0.46
11:ay:103:MET:HE1	11:ay:124:VAL:HG11	1.97	0.46
11:ay:133:THR:OG1	11:ay:134:THR:N	2.49	0.46
12:ag:11:THR:HB	12:ag:17:HIS:NE2	2.31	0.46
13:aj:104:PHE:O	13:aj:108:SER:N	2.47	0.46
14:e:144:THR:HG21	14:e:207:PHE:HD1	1.80	0.46
14:e:249:GLU:HG2	14:e:399:LYS:HE3	1.97	0.46
15:d:104:THR:HG21	42:x:107:ASN:HD22	1.80	0.46
18:r:166:PHE:CE2	18:r:306:ARG:HD2	2.51	0.46
18:r:191:TRP:CZ2	18:r:241:GLU:HG2	2.50	0.46
18:r:191:TRP:O	18:r:211:SER:OG	2.34	0.46
19:af:292:GLU:O	19:af:296:ARG:NH2	2.49	0.46
21:aa:77:ILE:HA	21:aa:80:LYS:HZ1	1.81	0.46
21:aa:196:GLN:HB3	21:aa:204:LEU:HD21	1.98	0.46
21:aa:281:GLN:O	21:aa:285:ALA:N	2.47	0.46
21:aa:330:THR:HG22	21:aa:332:PHE:H	1.80	0.46
21:aa:697:HIS:CE1	21:aa:709:LEU:HD22	2.50	0.46
21:aa:1666:ASN:OD1	21:aa:1667:VAL:N	2.49	0.46
22:ab:483:ILE:HD12	22:ab:501:PHE:CE1	2.51	0.46
22:ab:946:GLY:O	22:ab:949:ARG:NE	2.47	0.46
22:ab:970:GLY:HA3	22:ab:994:ARG:HH11	1.81	0.46
24:ac:628:VAL:HA	24:ac:631:ARG:HG3	1.97	0.46
24:ac:652:GLN:NE2	24:ac:882:MET:HG2	2.31	0.46
24:ac:1217:LEU:O	24:ac:1220:GLN:HG3	2.16	0.46
30:as:118:HIS:CD2	35:t:186:ALA:HB3	2.51	0.46
30:as:262:ARG:NH2	35:t:29:PRO:O	2.49	0.46
32:y:253:ALA:HB1	42:x:82:ASN:HB3	1.97	0.46
43:i:238:HIS:O	43:i:241:THR:OG1	2.34	0.46
43:i:263:LEU:HD22	43:i:274:TYR:CE1	2.51	0.46
45:o:222:LEU:HD12	51:ba:87:ILE:HD11	1.98	0.46
46:c:183:ASP:O	46:c:187:ARG:HG2	2.16	0.46
47:k:169:ILE:O	47:k:173:GLU:HG2	2.15	0.46
50:a:254:ILE:C	50:a:256:LEU:H	2.22	0.46
54:A:240:THR:HG21	1:1:1156:U:O4	2.16	0.46
55:B:5:ARG:HB3	55:B:5:ARG:CZ	2.45	0.46
56:C:159:GLU:OE2	56:C:171:ASN:HA	2.16	0.46
56:C:162:TYR:OH	56:C:172:HIS:NE2	2.26	0.46
58:E:92:PRO:HG2	58:E:93:HIS:CE1	2.51	0.46
58:E:148:TYR:CD2	58:E:192:ILE:HD11	2.50	0.46
58:E:202:VAL:HG22	58:E:204:GLY:N	2.25	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
62:I:83:VAL:HG23	107:BF:10:ASN:OD1	2.16	0.46
65:L:24:VAL:HA	65:L:32:TYR:O	2.16	0.46
68:O:217:LYS:HD2	68:O:226:LEU:O	2.15	0.46
69:P:47:LYS:NZ	1:1:940:U:O4	2.42	0.46
70:Q:158:ARG:HB3	85:An:248:PRO:HD3	1.97	0.46
80:BA:54:LYS:HE3	80:BA:54:LYS:HB2	1.64	0.46
81:UA:136:UNK:O	81:UA:140:UNK:N	2.49	0.46
84:Bj:61:ARG:HA	84:Bj:65:ARG:HH11	1.81	0.46
85:An:49:SER:O	85:An:50:HIS:HB2	2.16	0.46
90:BC:51:ARG:O	90:BC:51:ARG:HG3	2.16	0.46
94:Au:77:VAL:HG22	94:Au:78:PRO:O	2.16	0.46
97:BM:131:GLN:O	97:BM:133:LYS:HE2	2.16	0.46
97:BM:134:LYS:HZ3	97:BM:270:PHE:HD2	1.64	0.46
97:BM:204:THR:HA	97:BM:286:TYR:CE1	2.51	0.46
97:BM:250:GLU:HA	97:BM:265:LEU:O	2.16	0.46
97:BM:258:ASP:C	97:BM:259:LYS:HD3	2.40	0.46
98:Ar:146:ARG:CD	105:BP:143:PRO:HG3	2.45	0.46
99:Aj:402:ARG:HD2	106:Ad:194:PHE:CD2	2.51	0.46
100:BH:18:MET:HE3	100:BH:18:MET:HB3	1.79	0.46
100:BH:215:VAL:CG1	1:1:361:A:H5'	2.46	0.46
101:Am:185:MET:HG2	101:Am:202:TYR:CZ	2.51	0.46
104:Ak:55:ASP:O	112:Ac:145:LEU:HD11	2.16	0.46
106:Ad:80:ASP:HB3	106:Ad:83:THR:HG22	1.98	0.46
113:Ah:235:ILE:HD13	113:Ah:411:PRO:HD3	1.98	0.46
113:Ah:293:ARG:NH2	113:Ah:428:ARG:HD3	2.31	0.46
113:Ah:383:LEU:HD11	113:Ah:425:GLU:OE2	2.16	0.46
116:Ag:38:LYS:HB2	116:Ag:38:LYS:HE2	1.78	0.46
116:Ag:126:SER:HB3	125:Ag:301:NAD:H4B	1.98	0.46
1:1:316:A:H3'	1:1:317:A:H5'	1.98	0.46
1:1:839:A:N7	1:1:856:A:H2	2.14	0.46
1:1:911:A:C2	1:1:912:U:C2	3.04	0.46
1:2:44:A:C5'	29:aq:26:ALA:CB	2.92	0.46
1:2:46:U:H5'	1:2:46:U:C6	2.50	0.46
1:2:341:C:C3'	1:2:342:A:C5'	2.93	0.46
1:2:356:G:O5'	1:2:356:G:C8	2.69	0.46
1:2:418:A:C8	13:aj:56:HIS:N	2.79	0.46
1:2:440:C:C5	1:2:444:A:N6	2.83	0.46
1:2:453:A:C4'	8:am:274:ILE:O	2.62	0.46
1:2:558:U:C6	1:2:558:U:OP2	2.69	0.46
2:h:26:LEU:HD21	10:ae:165:TYR:CE1	2.51	0.46
4:m:222:ARG:HD2	5:f:138:ARG:NH1	2.32	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
5:f:10:ARG:HH21	15:d:350:LYS:HB2	1.81	0.46
8:am:97:PHE:HA	8:am:111:ARG:HH11	1.81	0.46
8:am:129:LEU:HD23	8:am:129:LEU:HA	1.75	0.46
8:am:281:LEU:HD22	8:am:287:PHE:CE1	2.51	0.46
8:am:306:LEU:HG	8:am:307:TYR:HD1	1.81	0.46
12:ag:66:GLN:HE21	12:ag:94:LYS:NZ	2.14	0.46
12:ag:82:LEU:HD12	12:ag:82:LEU:HA	1.84	0.46
12:ag:313:VAL:O	12:ag:317:ALA:N	2.41	0.46
12:ag:506:SER:H	12:ag:522:LYS:NZ	2.13	0.46
17:ax:85:PHE:HA	17:ax:88:ILE:HD12	1.98	0.46
18:r:153:HIS:HD2	18:r:259:LEU:HD13	1.81	0.46
18:r:191:TRP:NE1	18:r:241:GLU:OE2	2.49	0.46
19:af:162:VAL:HG21	22:ab:474:GLN:HB3	1.98	0.46
19:af:456:LEU:HB3	19:af:505:TRP:CD2	2.51	0.46
21:aa:465:ARG:HB2	21:aa:519:ILE:HD12	1.98	0.46
21:aa:713:THR:HG22	21:aa:717:GLN:HG2	1.98	0.46
21:aa:762:GLN:HG3	21:aa:776:SER:O	2.15	0.46
21:aa:775:ARG:CZ	21:aa:807:GLN:HB2	2.46	0.46
21:aa:853:TYR:HE1	52:z:993:ARG:NH2	2.14	0.46
21:aa:870:LYS:HD3	21:aa:870:LYS:HA	1.73	0.46
22:ab:105:SER:HG	24:ac:987:THR:HG1	1.64	0.46
22:ab:248:PHE:HB2	22:ab:942:TYR:CE2	2.51	0.46
22:ab:660:PHE:HE1	38:l:607:LYS:HG2	1.81	0.46
24:ac:1016:ALA:HA	24:ac:1019:ARG:HH21	1.81	0.46
25:ad:382:PHE:HE1	40:av:46:PRO:HD3	1.80	0.46
25:ad:686:HIS:CB	45:o:452:ASN:HD22	2.29	0.46
26:an:49:MET:HB3	52:z:969:ALA:HA	1.98	0.46
26:an:53:GLY:O	26:an:61:GLU:HA	2.15	0.46
26:an:153:GLN:HE22	42:x:63:ASP:CG	2.24	0.46
27:ao:217:ILE:HG21	27:ao:220:LEU:HG	1.97	0.46
28:ap:48:ARG:HH22	28:ap:88:PRO:HB2	1.80	0.46
28:ap:200:ASN:ND2	41:ai:256:ILE:HA	2.24	0.46
29:aq:19:TRP:HB3	40:av:99:THR:HG21	1.98	0.46
32:y:100:LYS:HA	32:y:104:GLU:HB2	1.97	0.46
38:l:13:SER:HA	38:l:113:PRO:HG3	1.98	0.46
38:l:643:PHE:O	38:l:644:ARG:HG2	2.16	0.46
41:ai:293:LEU:HD12	41:ai:313:ILE:HG23	1.98	0.46
48:q:91:TRP:HD1	48:q:94:GLU:OE1	1.98	0.46
50:a:95:ILE:HD12	50:a:300:ILE:HB	1.98	0.46
52:z:837:VAL:HA	52:z:875:VAL:HG13	1.98	0.46
52:z:1045:LEU:HA	52:z:1048:GLU:HG2	1.97	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
53:bd:52:LEU:HD23	53:bd:54:TRP:CZ2	2.51	0.46
54:A:395:GLN:HA	54:A:398:VAL:HB	1.98	0.46
56:C:118:LEU:HD11	56:C:155:ILE:HG23	1.98	0.46
58:E:86:PHE:CE2	58:E:90:THR:HG21	2.51	0.46
61:H:22:THR:HG22	61:H:24:ARG:HD3	1.97	0.46
62:I:217:LYS:HD3	62:I:258:TRP:CZ3	2.51	0.46
62:I:236:GLY:HA3	68:O:94:ASP:O	2.16	0.46
66:M:183:ALA:O	66:M:187:ALA:N	2.48	0.46
68:O:64:LEU:HD23	68:O:64:LEU:HA	1.72	0.46
69:P:149:ARG:HH11	98:Ar:17:LEU:HD23	1.81	0.46
70:Q:74:ASP:HB3	70:Q:152:TYR:CZ	2.51	0.46
70:Q:192:THR:OG1	70:Q:193:SER:N	2.48	0.46
73:T:69:GLN:HG2	73:T:70:GLY:N	2.31	0.46
74:U:80:TYR:O	116:Ag:186:MET:HE1	2.16	0.46
76:W:64:VAL:HB	76:W:65:PRO:HD3	1.98	0.46
77:X:212:TYR:CZ	92:Ai:202:PRO:HD3	2.51	0.46
77:X:254:ALA:HB3	77:X:257:ASN:ND2	2.30	0.46
77:X:302:THR:C	77:X:305:GLY:H	2.24	0.46
84:Bj:143:ASN:OD1	84:Bj:143:ASN:N	2.40	0.46
85:An:229:ARG:NH1	88:Az:60:HIS:HB2	2.31	0.46
91:Ab:172:GLU:HA	91:Ab:175:THR:HG22	1.98	0.46
92:Ai:447:MET:HE1	116:Ag:172:TRP:HB3	1.98	0.46
94:Au:29:ARG:NH1	1:1:648:U:OP2	2.26	0.46
94:Au:139:ARG:NH2	1:1:591:U:C2	2.84	0.46
96:Ao:64:TRP:CE3	96:Ao:68:MET:HG2	2.51	0.46
97:BM:79:ARG:HH21	97:BM:382:LEU:HD13	1.80	0.46
98:Ar:123:ASN:HA	109:Af:27:ARG:NH2	2.30	0.46
100:BH:223:ASP:C	100:BH:224:LEU:HD22	2.41	0.46
101:Am:160:TYR:HB2	101:Am:192:CYS:SG	2.56	0.46
102:Aq:112:ASN:HB3	102:Aq:133:ILE:HD11	1.98	0.46
104:Ak:114:PRO:HD2	104:Ak:115:HIS:ND1	2.31	0.46
104:Ak:139:ARG:NH1	104:Ak:168:GLU:OE2	2.50	0.46
106:Ad:192:ASP:OD1	106:Ad:192:ASP:N	2.48	0.46
107:BF:58:SER:H	107:BF:95:ASN:HD22	1.64	0.46
109:Af:62:SER:O	109:Af:62:SER:OG	2.24	0.46
117:Ax:201:PHE:HB3	117:Ax:202:PRO:HD3	1.98	0.46
118:BL:192:LEU:N	118:BL:197:TYR:OH	2.45	0.46
118:BL:205:LEU:HD22	118:BL:210:GLN:CD	2.41	0.46
119:BO:62:ASP:HB2	1:1:617:G:H8	1.81	0.46
1:1:212:A:O2'	1:1:213:U:H5'	2.15	0.46
1:1:454:A:H2'	1:1:455:U:H5''	1.97	0.46

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:565:U:H4'	1:1:566:G:OP1	2.16	0.46
1:1:750:U:H4'	1:1:751:A:H8	1.81	0.46
1:1:1130:A:N6	1:1:1131:A:N1	2.64	0.46
1:2:42:U:O2	1:2:42:U:H2'	2.16	0.45
1:2:109:U:HO2'	1:2:110:A:C4'	2.21	0.45
1:2:175:U:C1'	48:q:11:GLN:HG3	2.45	0.45
1:2:247:U:H2'	1:2:248:C:O5'	2.16	0.45
1:2:424:U:H1'	13:aj:61:LYS:HD2	1.97	0.45
3:aw:82:ASP:OD1	3:aw:83:VAL:N	2.47	0.45
3:aw:118:GLY:O	3:aw:121:PRO:HD2	2.17	0.45
7:au:45:HIS:HB3	24:ac:85:TYR:CE2	2.51	0.45
8:am:122:ASN:ND2	8:am:212:LEU:HG	2.31	0.45
8:am:210:MET:HE3	8:am:212:LEU:HD13	1.98	0.45
10:ae:186:LEU:HD21	10:ae:261:PHE:HB3	1.98	0.45
10:ae:496:LYS:NZ	12:ag:215:PRO:O	2.40	0.45
11:ay:78:GLU:HG3	11:ay:112:TYR:CE1	2.51	0.45
12:ag:441:ARG:NH2	12:ag:446:ARG:HA	2.31	0.45
14:e:786:HIS:CG	14:e:787:PRO:HD2	2.51	0.45
15:d:271:LEU:HD23	15:d:276:PHE:CZ	2.50	0.45
17:ax:74:MET:O	17:ax:78:ILE:HG12	2.15	0.45
18:r:87:LEU:HD13	18:r:131:ALA:HB2	1.98	0.45
19:af:458:THR:HA	19:af:505:TRP:HZ2	1.81	0.45
19:af:478:ARG:CZ	19:af:675:ARG:HE	2.29	0.45
21:aa:514:ALA:O	21:aa:517:GLU:HG2	2.16	0.45
21:aa:544:LEU:HD11	21:aa:824:ARG:NH1	2.32	0.45
21:aa:624:TYR:OH	21:aa:741:ARG:NH2	2.49	0.45
21:aa:1665:ARG:HD3	21:aa:1665:ARG:HA	1.76	0.45
22:ab:570:PHE:HB2	22:ab:574:VAL:HG21	1.98	0.45
23:ak:45:TYR:CE2	23:ak:162:PRO:HB2	2.51	0.45
24:ac:713:TYR:CE1	24:ac:841:GLN:HG2	2.51	0.45
24:ac:1025:MET:SD	24:ac:1029:ARG:HG3	2.55	0.45
24:ac:1204:VAL:HG23	24:ac:1206:SER:H	1.81	0.45
25:ad:630:ALA:HB3	25:ad:635:LYS:HE3	1.96	0.45
26:an:73:VAL:HG11	52:z:939:ILE:HG23	1.98	0.45
26:an:81:ASP:O	41:ai:116:ARG:NH2	2.49	0.45
26:an:216:HIS:C	26:an:218:PRO:HD3	2.41	0.45
29:aq:27:ASP:OD1	29:aq:28:ASN:N	2.43	0.45
38:l:122:ARG:NH2	38:l:323:ARG:O	2.49	0.45
41:ai:206:LEU:HD22	41:ai:275:ILE:HD11	1.98	0.45
41:ai:288:PRO:HG2	41:ai:315:ASN:HD21	1.81	0.45
45:o:277:TRP:HA	45:o:284:TRP:CD1	2.51	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
48:q:35:TYR:CZ	48:q:39:MET:HB2	2.51	0.45
50:a:231:ARG:NH1	50:a:232:ILE:O	2.49	0.45
54:A:128:SER:HB3	54:A:353:PHE:HE1	1.81	0.45
55:B:72:HIS:CD2	55:B:74:GLN:HE21	2.34	0.45
55:B:166:ASP:OD1	55:B:168:LYS:HG2	2.17	0.45
56:C:161:ALA:O	56:C:165:LEU:HD23	2.16	0.45
58:E:92:PRO:HG2	58:E:93:HIS:ND1	2.31	0.45
59:F:37:GLN:HG2	59:F:42:PHE:CE2	2.50	0.45
60:G:310:HIS:CD2	60:G:312:GLY:H	2.35	0.45
62:I:173:ASN:HB2	62:I:174:HIS:CD2	2.50	0.45
66:M:131:GLN:O	66:M:190:LYS:NZ	2.42	0.45
68:O:20:THR:OG1	68:O:21:TYR:N	2.48	0.45
68:O:160:VAL:HG13	68:O:165:GLU:HB3	1.99	0.45
68:O:216:VAL:HG23	71:R:283:ILE:HD12	1.98	0.45
69:P:162:PHE:O	78:Y:204:ARG:HD3	2.16	0.45
70:Q:193:SER:HB2	70:Q:196:GLU:CB	2.45	0.45
71:R:153:ARG:NH2	71:R:354:ASP:OD2	2.24	0.45
71:R:207:LYS:HZ1	71:R:314:ALA:H	1.64	0.45
78:Y:119:ASN:OD1	78:Y:121:GLU:HG2	2.17	0.45
78:Y:209:LEU:HD12	78:Y:214:GLY:HA2	1.98	0.45
80:BA:27:GLY:O	80:BA:29:ALA:N	2.48	0.45
86:Al:95:PRO:HD2	86:Al:246:ARG:HH21	1.81	0.45
89:At:136:PRO:HD3	89:At:163:ILE:HD11	1.98	0.45
89:At:141:ASP:OD1	89:At:143:THR:N	2.30	0.45
96:Ao:202:ARG:HD2	96:Ao:202:ARG:HA	1.69	0.45
97:BM:290:HIS:HB3	97:BM:326:TYR:HE1	1.81	0.45
97:BM:302:MET:N	97:BM:303:PRO:HD2	2.31	0.45
98:Ar:146:ARG:NE	105:BP:143:PRO:HG3	2.30	0.45
98:Ar:160:GLN:HG2	98:Ar:160:GLN:O	2.15	0.45
99:Aj:137:LEU:HD21	99:Aj:287:ILE:HG21	1.97	0.45
109:Af:135:ARG:HG3	109:Af:150:PRO:HG3	1.98	0.45
111:Ae:55:HIS:CG	111:Ae:57:LYS:HG2	2.51	0.45
112:Ac:101:THR:HG22	112:Ac:108:THR:HG22	1.98	0.45
112:Ac:158:ARG:HE	112:Ac:259:VAL:HG12	1.81	0.45
112:Ac:175:GLU:HA	112:Ac:253:PRO:HA	1.98	0.45
112:Ac:225:LEU:HD12	112:Ac:226:LYS:H	1.81	0.45
113:Ah:72:SER:C	113:Ah:74:LEU:H	2.23	0.45
115:Ay:69:LYS:C	115:Ay:71:ASP:H	2.23	0.45
118:BL:278:ARG:HD3	118:BL:278:ARG:C	2.40	0.45
118:BL:339:CYS:HB2	1:1:693:A:O2'	2.17	0.45
1:1:121:U:C4	1:1:122:U:N3	2.84	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:125:A:H2'	1:1:126:U:H5'	1.97	0.45
1:1:328:A:H4'	1:1:328:A:OP1	2.15	0.45
1:1:378:A:O2'	1:1:379:U:H5''	2.15	0.45
1:1:439:A:N6	1:1:442:U:OP2	2.50	0.45
1:1:457:C:H4'	1:1:458:A:OP1	2.15	0.45
1:1:753:U:C4	1:1:754:A:N6	2.84	0.45
1:1:765:A:C6	1:1:766:A:N1	2.83	0.45
1:1:901:G:N2	1:1:908:U:H3	2.09	0.45
1:1:1000:A:H2'	1:1:1001:G:H8	1.81	0.45
1:2:121:C:H4'	1:2:122:U:H5''	1.97	0.45
1:2:200:A:O2'	1:2:201:A:OP2	2.25	0.45
1:2:209:U:O3'	1:2:210:U:H4'	2.16	0.45
1:2:226:A:H2'	1:2:227:U:H5'	1.96	0.45
1:2:226:A:C2'	1:2:227:U:H5''	2.46	0.45
1:2:229:C:H5	1:2:241:G:P	2.39	0.45
1:2:290:C:H2'	1:2:291:U:O5'	2.17	0.45
1:2:417:C:C2'	10:ae:128:TYR:CE1	2.86	0.45
1:2:422:U:C4	13:aj:52:TYR:HB2	2.50	0.45
10:ae:427:ASN:OD1	10:ae:427:ASN:N	2.49	0.45
12:ag:558:LEU:HD11	38:l:18:ASP:HA	1.99	0.45
14:e:68:GLN:NE2	14:e:87:ARG:H	2.14	0.45
14:e:711:PHE:HZ	22:ab:1140:LEU:HD11	1.81	0.45
16:az:47:THR:HG23	17:ax:73:MET:HE1	1.98	0.45
18:r:161:THR:HG22	20:u:852:LEU:HD12	1.97	0.45
18:r:382:LEU:HD21	18:r:413:ILE:HD12	1.98	0.45
19:af:748:ASP:HA	19:af:751:GLN:NE2	2.30	0.45
20:u:354:LEU:HB2	20:u:602:ARG:NH1	2.31	0.45
21:aa:475:ARG:HD3	27:ao:207:ARG:NE	2.31	0.45
21:aa:1462:LEU:HD12	21:aa:1462:LEU:HA	1.75	0.45
21:aa:1522:ALA:O	21:aa:1524:PRO:HD2	2.17	0.45
21:aa:1661:GLU:H	21:aa:1661:GLU:CD	2.21	0.45
22:ab:852:ASP:OD2	22:ab:923:ILE:HD11	2.15	0.45
24:ac:708:ARG:HD3	24:ac:844:GLU:HG2	1.98	0.45
24:ac:998:ARG:O	24:ac:1002:SER:N	2.41	0.45
25:ad:341:PRO:HD2	40:av:39:PHE:CD2	2.52	0.45
25:ad:648:GLN:H	35:t:209:TYR:HH	1.57	0.45
26:an:153:GLN:OE1	42:x:63:ASP:HB3	2.15	0.45
26:an:250:LEU:HD23	26:an:250:LEU:HA	1.70	0.45
28:ap:146:MET:HE2	48:q:129:ARG:HA	1.97	0.45
28:ap:170:GLU:O	28:ap:174:ALA:N	2.36	0.45
31:at:225:TRP:CE3	31:at:226:ASN:HB2	2.51	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
32:y:293:ARG:O	32:y:296:THR:HG22	2.16	0.45
37:j:89:LEU:H	37:j:89:LEU:HD12	1.80	0.45
41:ai:125:TYR:CE2	46:c:113:PRO:HD3	2.51	0.45
45:o:231:GLU:O	45:o:234:GLU:HG3	2.16	0.45
45:o:433:HIS:CD2	45:o:433:HIS:N	2.82	0.45
46:c:130:PRO:HB3	52:z:293:ALA:HB1	1.98	0.45
46:c:134:ILE:HG21	52:z:141:HIS:CE1	2.51	0.45
46:c:221:ALA:HB2	46:c:237:LYS:HB2	1.97	0.45
46:c:280:ILE:HG23	46:c:311:HIS:HB3	1.97	0.45
48:q:141:ARG:HH12	49:b:122:ARG:NH2	2.08	0.45
49:b:126:GLU:OE2	52:z:602:ALA:HB3	2.16	0.45
54:A:254:ARG:HE	54:A:292:GLY:HA3	1.81	0.45
56:C:114:PRO:HB3	56:C:138:TYR:CE1	2.51	0.45
59:F:131:SER:O	59:F:133:HIS:ND1	2.37	0.45
65:L:42:VAL:HG23	65:L:114:THR:HG23	1.97	0.45
66:M:52:LYS:NZ	1:1:125:A:OP2	2.43	0.45
66:M:61:LEU:HD21	99:Aj:476:ARG:NH1	2.31	0.45
66:M:204:CYS:SG	66:M:229:SER:OG	2.70	0.45
69:P:96:PRO:HD3	98:Ar:18:GLU:HG2	1.98	0.45
71:R:200:ARG:HH22	88:Az:151:CYS:HB2	1.81	0.45
73:T:67:LYS:HG2	73:T:68:LYS:O	2.16	0.45
74:U:29:VAL:O	74:U:30:ILE:HB	2.15	0.45
74:U:67:LYS:HE3	74:U:84:LYS:NZ	2.32	0.45
77:X:147:TYR:CB	77:X:209:CYS:HB3	2.47	0.45
78:Y:67:GLU:HB2	112:Ac:74:LEU:HD11	1.98	0.45
82:BB:111:PHE:HD1	82:BB:111:PHE:O	1.99	0.45
86:Al:117:VAL:O	86:Al:117:VAL:HG13	2.17	0.45
86:Al:123:TYR:OH	86:Al:232:MET:SD	2.64	0.45
87:BI:152:HIS:O	87:BI:254:PRO:HD3	2.17	0.45
87:BI:164:ASP:OD1	87:BI:164:ASP:N	2.48	0.45
89:At:51:LEU:HA	89:At:54:ARG:HB3	1.98	0.45
89:At:80:PHE:O	89:At:83:GLU:N	2.49	0.45
90:BC:16:HIS:O	90:BC:19:MET:N	2.49	0.45
91:Ab:28:PHE:HE2	91:Ab:33:LEU:HD12	1.82	0.45
94:Au:37:PRO:HD2	1:1:281:G:H1	1.81	0.45
94:Au:48:ASN:OD1	94:Au:48:ASN:C	2.59	0.45
99:Aj:110:LEU:HD23	99:Aj:110:LEU:HA	1.63	0.45
101:Am:203:PHE:CD2	101:Am:222:PHE:HB2	2.52	0.45
110:As:102:ALA:HB3	110:As:132:ILE:HD13	1.99	0.45
112:Ac:202:ILE:HG12	112:Ac:210:LEU:HD23	1.98	0.45
113:Ah:66:LYS:O	113:Ah:67:ARG:HB3	2.16	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
113:Ah:181:LEU:HB2	113:Ah:184:HIS:HD2	1.81	0.45
113:Ah:300:LEU:HD13	113:Ah:343:TYR:CZ	2.51	0.45
117:Ax:203:ARG:O	117:Ax:203:ARG:HD3	2.16	0.45
119:BO:134:ARG:HD3	1:1:614:A:OP1	2.16	0.45
1:1:48:U:H3	1:1:130:U:H5	1.64	0.45
1:1:204:U:O2'	1:1:205:U:H5''	2.16	0.45
1:1:249:U:O2	1:1:249:U:O4'	2.32	0.45
1:1:338:A:N6	1:1:381:A:C4	2.85	0.45
1:1:961:A:C8	1:1:966:A:N7	2.84	0.45
1:2:37:U:H5	33:w:134:THR:HG1	0.65	0.45
1:2:42:U:H4'	1:2:43:A:OP2	2.15	0.45
1:2:45:U:O2'	29:aq:22:PHE:CD1	2.69	0.45
1:2:159:G:N2	1:2:161:A:H3'	2.30	0.45
1:2:202:A:OP2	1:2:203:U:H6	2.00	0.45
1:2:409:U:C6	9:n:56:HIS:ND1	2.84	0.45
1:2:417:C:N4	10:ae:131:ARG:CD	2.80	0.45
1:2:507:A:P	3:aw:27:ARG:HH21	2.39	0.45
1:2:526:A:O2'	1:2:527:U:H5'	2.16	0.45
1:2:556:U:C4	1:2:570:A:N1	2.84	0.45
1:2:606:U:C3'	1:2:606:U:C6	2.99	0.45
2:h:36:PHE:HE1	6:s:92:PRO:HB2	1.81	0.45
4:m:259:TYR:N	5:f:39:GLN:OE1	2.50	0.45
6:s:74:LEU:HD23	6:s:74:LEU:HA	1.83	0.45
9:n:151:ASP:HB2	9:n:154:MET:CG	2.46	0.45
9:n:169:LEU:HD13	17:ax:22:HIS:CD2	2.51	0.45
10:ae:214:LEU:HD13	10:ae:239:ALA:HB3	1.98	0.45
11:ay:76:ARG:NH2	11:ay:146:PRO:HB3	2.32	0.45
12:ag:290:TRP:CD1	12:ag:291:GLN:HE22	2.34	0.45
12:ag:328:PHE:HZ	12:ag:438:PHE:CZ	2.33	0.45
15:d:86:GLU:CD	15:d:92:ALA:H	2.23	0.45
18:r:39:SER:OG	18:r:40:PHE:N	2.47	0.45
18:r:260:PHE:O	18:r:299:ALA:HB3	2.16	0.45
19:af:227:ARG:HG3	19:af:229:VAL:HG23	1.98	0.45
19:af:459:ALA:HA	19:af:511:PRO:HA	1.98	0.45
19:af:526:PRO:HA	19:af:666:PHE:CE2	2.51	0.45
20:u:632:ALA:O	20:u:650:ARG:HD2	2.15	0.45
20:u:687:PRO:HG2	20:u:729:ASP:OD2	2.15	0.45
21:aa:605:LEU:HD23	21:aa:610:VAL:HG13	1.98	0.45
21:aa:1311:PRO:HG2	21:aa:1314:LEU:HG	1.99	0.45
21:aa:1654:GLN:HB3	21:aa:1658:ARG:NH1	2.31	0.45
22:ab:302:GLN:NE2	22:ab:326:SER:HB3	2.32	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
22:ab:758:VAL:O	22:ab:765:TYR:N	2.48	0.45
25:ad:298:MET:HE3	25:ad:302:MET:HE2	1.98	0.45
25:ad:302:MET:HE3	25:ad:310:MET:HE3	1.98	0.45
25:ad:604:ARG:O	30:as:224:ARG:NH2	2.50	0.45
33:w:168:ASN:O	35:t:73:ARG:NH1	2.46	0.45
42:x:155:GLN:HE21	42:x:166:ALA:HB2	1.82	0.45
43:i:139:LEU:O	43:i:143:LEU:N	2.42	0.45
45:o:388:LEU:HA	45:o:393:ASP:OD2	2.15	0.45
48:q:134:TRP:CH2	49:b:113:ALA:HB1	2.52	0.45
48:q:177:LEU:HD12	49:b:132:GLN:HB3	1.98	0.45
50:a:360:LEU:HD22	50:a:362:GLU:N	2.29	0.45
52:z:600:ARG:NH1	52:z:624:ASP:OD2	2.50	0.45
54:A:158:PHE:O	54:A:314:SER:OG	2.33	0.45
55:B:144:ARG:HD3	67:N:76:TYR:CE1	2.52	0.45
61:H:32:TYR:CD2	61:H:91:PHE:HE1	2.34	0.45
61:H:80:PHE:CZ	61:H:133:LEU:HG	2.51	0.45
61:H:149:ILE:HG22	61:H:151:LEU:HD23	1.99	0.45
63:J:100:MET:HE1	119:BO:190:VAL:HG21	1.97	0.45
67:N:78:ARG:NH2	67:N:79:ASP:O	2.49	0.45
69:P:51:ARG:C	69:P:60:ARG:HD3	2.42	0.45
69:P:87:MET:SD	69:P:88:THR:N	2.89	0.45
71:R:146:SER:OG	71:R:147:ARG:N	2.48	0.45
71:R:480:ILE:HD13	89:At:42:MET:SD	2.55	0.45
74:U:50:MET:HG2	74:U:92:PHE:CE2	2.52	0.45
75:V:43:ARG:NH2	1:1:956:A:O2'	2.49	0.45
86:Al:108:TRP:O	86:Al:248:ASN:N	2.41	0.45
89:At:35:TYR:CZ	89:At:37:SER:HA	2.51	0.45
95:Aa:177:ARG:HH22	95:Aa:178:ARG:HH21	1.62	0.45
96:Ao:21:MET:HE2	96:Ao:27:ARG:NH2	2.31	0.45
97:BM:94:MET:HE2	97:BM:115:ASN:HD21	1.82	0.45
99:Aj:246:ALA:HB1	99:Aj:272:VAL:HG23	1.97	0.45
99:Aj:336:LEU:HD23	99:Aj:336:LEU:HA	1.70	0.45
108:Av:142:ASP:HA	108:Av:145:VAL:HG12	1.97	0.45
117:Ax:122:TRP:O	117:Ax:124:PRO:HD3	2.16	0.45
119:BO:188:PHE:C	119:BO:188:PHE:CD2	2.94	0.45
1:1:228:G:H2'	1:1:291:A:N6	2.31	0.45
1:1:312:A:H2'	1:1:313:A:O4'	2.16	0.45
1:1:876:G:H3'	1:1:877:G:C8	2.51	0.45
1:1:886:A:C2	1:1:980:A:C5	3.05	0.45
1:1:1022:A:H8	1:1:1022:A:O5'	2.00	0.45
1:1:1075:A:H3'	1:1:1075:A:OP2	2.16	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:437:U:C4'	6:s:153:LYS:CB	2.81	0.45
1:2:450:A:H5''	14:e:391:SER:CA	2.47	0.45
1:2:458:A:C2'	19:af:190:ARG:NH1	2.77	0.45
1:2:491:U:OP2	9:n:43:ARG:NH1	2.49	0.45
1:2:499:A:HO2'	3:aw:13:TYR:HE1	1.64	0.45
1:2:517:G:O6	17:ax:32:ARG:NE	2.48	0.45
7:au:225:ASP:OD1	7:au:227:GLU:N	2.49	0.45
8:am:57:PHE:CD1	53:bd:61:ASN:HB2	2.51	0.45
8:am:95:ILE:HD13	8:am:95:ILE:HA	1.76	0.45
10:ae:471:ARG:O	10:ae:475:TRP:HD1	1.99	0.45
10:ae:520:LEU:HB3	38:l:627:CYS:SG	2.56	0.45
14:e:499:LEU:C	14:e:530:ARG:HB3	2.41	0.45
14:e:542:LEU:O	14:e:598:GLU:HA	2.16	0.45
14:e:734:ASN:OD1	14:e:734:ASN:N	2.49	0.45
16:az:32:TRP:CZ2	16:az:58:THR:HG21	2.52	0.45
20:u:320:THR:OG1	22:ab:880:GLY:HA3	2.16	0.45
21:aa:799:ALA:HB3	21:aa:804:ALA:HB2	1.99	0.45
21:aa:971:LEU:HD12	21:aa:971:LEU:O	2.16	0.45
22:ab:219:MET:HG3	22:ab:220:ASP:H	1.82	0.45
22:ab:713:ASP:OD1	22:ab:724:THR:OG1	2.29	0.45
22:ab:716:HIS:HD2	22:ab:719:THR:H	1.63	0.45
24:ac:110:LEU:HD11	24:ac:490:ALA:HB1	1.98	0.45
24:ac:528:PHE:HZ	24:ac:575:TYR:HD2	1.63	0.45
24:ac:1186:TYR:CZ	24:ac:1190:LYS:HG3	2.52	0.45
25:ad:139:LEU:O	25:ad:143:GLY:N	2.48	0.45
26:an:1:MET:HE2	26:an:2:GLU:H	1.81	0.45
31:at:351:CYS:HA	31:at:354:ARG:NH2	2.30	0.45
32:y:9:GLU:OE1	32:y:9:GLU:N	2.36	0.45
34:v:131:LEU:O	34:v:135:ILE:HG12	2.17	0.45
37:j:180:ALA:HA	37:j:183:ARG:HH11	1.81	0.45
38:l:536:LEU:O	38:l:540:VAL:HG23	2.17	0.45
38:l:591:THR:HA	38:l:604:ASN:HB3	1.99	0.45
41:ai:87:SER:O	41:ai:91:LYS:HG2	2.17	0.45
41:ai:365:CYS:HB2	52:z:860:HIS:CD2	2.51	0.45
45:o:146:ASP:HA	45:o:149:LEU:HD13	1.99	0.45
52:z:341:LYS:HD3	52:z:341:LYS:HA	1.76	0.45
52:z:1067:GLN:O	52:z:1071:LYS:N	2.44	0.45
53:bd:70:LEU:HD12	53:bd:70:LEU:O	2.17	0.45
55:B:194:LYS:NZ	1:l:186:U:OP2	2.41	0.45
60:G:34:LEU:HD11	99:Aj:214:LEU:HA	1.97	0.45
60:G:75:THR:O	91:Ab:75:SER:HB2	2.17	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
60:G:79:TRP:HD1	60:G:96:TYR:CD2	2.35	0.45
60:G:316:ARG:HD2	92:Ai:479:TYR:OH	2.15	0.45
61:H:35:PRO:HD3	61:H:115:LYS:HD3	1.99	0.45
61:H:135:GLN:HG3	61:H:139:GLU:OE2	2.16	0.45
62:I:152:ARG:HH11	62:I:157:ASN:HB3	1.80	0.45
62:I:263:LEU:O	62:I:266:THR:OG1	2.29	0.45
64:K:108:ARG:NH2	64:K:112:GLU:OE2	2.50	0.45
64:K:179:TRP:NE1	99:Aj:229:VAL:HG13	2.30	0.45
66:M:9:ASN:HD21	66:M:12:LEU:HD12	1.82	0.45
66:M:259:ARG:NH2	123:UD:15:UNK:HA	2.32	0.45
69:P:52:ARG:O	69:P:54:GLY:N	2.49	0.45
71:R:126:PRO:HB3	87:BI:173:GLN:HE21	1.82	0.45
71:R:311:PHE:CD2	71:R:317:VAL:HG22	2.51	0.45
73:T:32:LYS:HG3	1:1:533:U:H1'	1.98	0.45
78:Y:177:PHE:O	78:Y:180:VAL:HG13	2.16	0.45
84:Bj:60:ASN:O	84:Bj:65:ARG:NH1	2.49	0.45
87:BI:145:THR:O	87:BI:165:ILE:HD12	2.16	0.45
98:Ar:151:ARG:HD3	98:Ar:166:TRP:CE2	2.52	0.45
98:Ar:153:LYS:HD2	98:Ar:153:LYS:H	1.80	0.45
110:As:89:LYS:HD2	110:As:116:GLU:HG3	1.99	0.45
113:Ah:137:HIS:HA	113:Ah:140:THR:HG22	1.98	0.45
113:Ah:445:ASP:N	113:Ah:445:ASP:OD1	2.47	0.45
117:Ax:120:TYR:OH	117:Ax:190:HIS:HD2	1.99	0.45
117:Ax:151:ARG:N	117:Ax:182:TRP:O	2.49	0.45
117:Ax:153:ILE:C	117:Ax:155:ASN:H	2.24	0.45
120:BG:1295:THR:HG21	1:1:591:U:O4	2.16	0.45
120:BG:1327:LYS:O	120:BG:1331:GLY:HA3	2.16	0.45
1:1:71:A:C2	1:1:72:U:H1'	2.51	0.45
1:1:435:A:OP1	1:1:443:G:H4'	2.17	0.45
1:1:844:A:O2'	1:1:845:A:OP1	2.29	0.45
1:1:1001:G:N3	1:1:1001:G:H2'	2.31	0.45
1:1:1049:A:N6	1:1:1050:A:C6	2.85	0.45
1:2:23:A:H2'	1:2:24:A:O4'	2.17	0.45
1:2:33:A:N6	1:2:169:U:N1	2.63	0.45
1:2:43:A:OP1	29:aq:25:GLY:CA	2.65	0.45
1:2:65:U:C4'	35:t:36:ARG:HG3	2.38	0.45
1:2:299:U:O5'	1:2:299:U:H6	1.99	0.45
1:2:325:U:C2	1:2:325:U:O5'	2.70	0.45
1:2:348:U:C2	1:2:349:G:N7	2.85	0.45
1:2:396:A:C4	1:2:529:A:H4'	2.51	0.45
1:2:482:C:O2'	10:ae:56:TYR:HB3	2.17	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:502:A:H8	14:e:789:PRO:HG3	0.75	0.45
1:2:503:A:C2	14:e:718:PRO:N	2.76	0.45
1:2:558:U:C2'	1:2:559:U:H6	2.19	0.45
1:2:572:A:O5'	1:2:572:A:C8	2.70	0.45
2:h:37:ARG:HG3	10:ae:115:HIS:ND1	2.32	0.45
4:m:29:ASN:HA	4:m:32:ILE:HG22	1.98	0.45
6:s:124:GLY:HA3	7:au:37:TYR:O	2.17	0.45
7:au:212:PHE:HD1	13:aj:317:TYR:CE1	2.35	0.45
9:n:106:THR:HA	9:n:135:VAL:HG13	1.97	0.45
12:ag:319:THR:O	12:ag:332:HIS:ND1	2.49	0.45
14:e:494:SER:O	14:e:497:LYS:HB3	2.16	0.45
15:d:34:TRP:HD1	15:d:42:TYR:CE1	2.35	0.45
17:ax:21:THR:OG1	17:ax:22:HIS:N	2.49	0.45
17:ax:104:LEU:H	17:ax:104:LEU:HD12	1.82	0.45
19:af:746:ARG:HD2	19:af:815:LEU:HD11	1.98	0.45
21:aa:349:TRP:CE3	21:aa:352:VAL:HG21	2.50	0.45
21:aa:851:LYS:HB2	21:aa:858:HIS:CD2	2.51	0.45
21:aa:869:TYR:O	21:aa:873:LEU:N	2.46	0.45
21:aa:1459:PRO:O	21:aa:1463:THR:N	2.41	0.45
22:ab:29:ALA:HB1	22:ab:134:VAL:HG21	1.98	0.45
22:ab:332:TRP:HA	22:ab:335:GLN:HB2	1.97	0.45
22:ab:572:VAL:HG21	22:ab:598:HIS:HA	1.99	0.45
22:ab:649:LYS:HA	22:ab:649:LYS:HD2	1.79	0.45
24:ac:1158:ALA:HA	24:ac:1161:LYS:HD3	1.97	0.45
25:ad:251:PRO:HB3	40:av:58:ARG:O	2.17	0.45
25:ad:341:PRO:HD2	40:av:39:PHE:HD2	1.81	0.45
27:ao:214:TYR:N	45:o:198:GLU:OE2	2.50	0.45
28:ap:135:TYR:HB3	28:ap:139:ARG:NH1	2.32	0.45
29:aq:212:ASN:O	29:aq:216:ASN:N	2.49	0.45
30:as:250:ARG:NH1	35:t:27:MET:SD	2.89	0.45
31:at:232:TYR:CE1	31:at:243:ARG:HB2	2.51	0.45
31:at:371:LEU:HD11	37:j:145:GLN:NE2	2.32	0.45
32:y:36:VAL:HG11	36:p:294:TRP:HE1	1.82	0.45
37:j:81:THR:O	37:j:87:ARG:HD3	2.16	0.45
37:j:140:ILE:HD12	37:j:140:ILE:HA	1.85	0.45
37:j:148:ARG:HD2	37:j:149:TYR:N	2.32	0.45
38:l:600:LEU:HD23	38:l:600:LEU:HA	1.85	0.45
41:ai:324:ASP:O	41:ai:327:SER:OG	2.35	0.45
42:x:33:ARG:CZ	42:x:33:ARG:HB3	2.47	0.45
45:o:128:ARG:HG2	50:a:349:TRP:CD1	2.51	0.45
45:o:182:ASN:O	45:o:186:LYS:HD3	2.17	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
45:o:381:MET:O	50:a:308:ARG:NH2	2.42	0.45
48:q:203:ASN:HD22	49:b:46:ARG:HH12	1.65	0.45
49:b:146:LYS:HB2	52:z:194:ASP:OD2	2.17	0.45
52:z:505:ARG:O	52:z:507:HIS:N	2.41	0.45
55:B:21:MET:SD	91:Ab:44:LYS:HE3	2.57	0.45
56:C:145:ARG:HH12	70:Q:108:ILE:HG22	1.81	0.45
59:F:150:THR:HB	101:Am:59:ARG:NH1	2.32	0.45
60:G:138:ALA:HB2	1:1:346:A:C2	2.51	0.45
60:G:165:ARG:HG2	1:1:93:U:OP1	2.16	0.45
61:H:163:GLU:HB2	61:H:167:PHE:CE2	2.51	0.45
62:I:88:ALA:N	1:1:600:A:OP1	2.38	0.45
62:I:114:GLN:HG3	121:UB:21:UNK:CB	2.46	0.45
64:K:187:ASP:OD1	64:K:188:LEU:N	2.49	0.45
66:M:72:LEU:HD22	1:1:50:A:N7	2.31	0.45
66:M:179:ALA:O	66:M:182:VAL:N	2.50	0.45
68:O:178:ILE:HD12	68:O:187:GLN:HG3	1.98	0.45
70:Q:67:PRO:HD3	70:Q:77:TRP:CZ3	2.51	0.45
70:Q:156:ILE:O	70:Q:160:LEU:HB2	2.16	0.45
71:R:153:ARG:O	71:R:156:GLU:HG2	2.17	0.45
72:S:291:VAL:HG21	72:S:301:ILE:HD11	1.98	0.45
73:T:29:PRO:HD2	1:1:830:A:N1	2.32	0.45
75:V:127:GLU:N	75:V:127:GLU:OE1	2.50	0.45
77:X:111:ASP:OD1	77:X:111:ASP:N	2.45	0.45
81:UA:86:UNK:C	81:UA:88:UNK:N	2.79	0.45
85:An:59:PHE:CD2	85:An:75:TRP:HB3	2.51	0.45
87:BI:183:ALA:HB3	87:BI:186:GLU:HB2	1.98	0.45
92:Ai:283:TYR:O	92:Ai:287:THR:HG23	2.17	0.45
92:Ai:352:GLU:HG2	92:Ai:353:ASP:O	2.16	0.45
93:Ap:176:PHE:HA	93:Ap:179:LEU:HB3	1.97	0.45
95:Aa:194:ASN:CG	1:1:151:G:H22	2.25	0.45
96:Ao:200:VAL:HG12	96:Ao:204:ILE:HG13	1.98	0.45
98:Ar:180:ASP:N	98:Ar:180:ASP:OD1	2.49	0.45
100:BH:188:TRP:CG	100:BH:227:PRO:HB3	2.51	0.45
101:Am:310:LEU:HD22	1:1:420:A:C8	2.51	0.45
102:Aq:146:ASP:OD2	102:Aq:159:HIS:HD2	2.00	0.45
108:Av:151:LYS:HD3	1:1:458:A:OP1	2.17	0.45
112:Ac:52:TYR:CE2	112:Ac:202:ILE:HD13	2.51	0.45
112:Ac:249:PHE:HB3	112:Ac:251:PRO:HD2	1.98	0.45
113:Ah:67:ARG:HB3	1:1:905:A:O4'	2.16	0.45
115:Ay:131:GLU:HA	115:Ay:134:ARG:HH22	1.80	0.45
116:Ag:148:THR:HG22	116:Ag:149:ASN:N	2.31	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
117:Ax:151:ARG:HD3	117:Ax:181:ARG:O	2.16	0.45
118:BL:335:HIS:HD2	118:BL:337:ARG:HH21	1.64	0.45
1:1:383:A:H8	1:1:383:A:O5'	2.00	0.45
1:1:552:A:N1	1:1:584:U:N3	2.64	0.45
1:2:38:U:O2	29:aq:10:ALA:HB2	2.17	0.45
1:2:51:A:C4	1:2:52:U:O4	2.68	0.45
1:2:177:U:OP2	48:q:11:GLN:O	2.34	0.45
1:2:181:U:O3'	33:w:98:LEU:HD11	2.15	0.45
1:2:306:A:O2'	1:2:307:A:OP2	2.26	0.45
1:2:314:U:H3'	1:2:314:U:P	2.56	0.45
1:2:390:U:HO2'	1:2:391:A:P	2.27	0.45
1:2:421:A:C4'	10:ae:298:TYR:HE2	1.79	0.45
1:2:499:A:C8	3:aw:9:GLY:C	2.95	0.45
4:m:137:ILE:HD12	4:m:163:LEU:HD13	1.98	0.45
7:au:229:GLU:OE1	7:au:232:ARG:NH1	2.40	0.45
8:am:78:ARG:NH2	12:ag:419:PRO:O	2.49	0.45
13:aj:17:PRO:HA	13:aj:23:LEU:HD23	1.98	0.45
13:aj:202:SER:HB3	13:aj:235:GLU:HG2	1.98	0.45
14:e:303:PHE:CD2	14:e:322:VAL:HG13	2.51	0.45
19:af:362:VAL:HA	19:af:365:PHE:HB3	1.98	0.45
21:aa:467:ASP:OD1	21:aa:471:ASN:ND2	2.49	0.45
21:aa:482:VAL:HG23	21:aa:838:TRP:CE3	2.51	0.45
21:aa:1236:ILE:O	21:aa:1239:ARG:HG2	2.17	0.45
22:ab:69:VAL:HG11	22:ab:156:ARG:HA	1.97	0.45
22:ab:650:TYR:OH	38:l:650:GLU:HB2	2.16	0.45
24:ac:165:ASP:O	38:l:78:ARG:NH2	2.50	0.45
25:ad:639:GLU:CD	37:j:147:MET:HE1	2.42	0.45
27:ao:215:MET:HE3	45:o:269:LEU:HA	1.99	0.45
30:as:64:LEU:HD23	30:as:64:LEU:HA	1.84	0.45
30:as:265:MET:HE2	30:as:265:MET:HB2	1.74	0.45
33:w:55:HIS:HE1	33:w:74:LYS:O	2.00	0.45
38:l:152:ALA:O	38:l:155:THR:HG22	2.16	0.45
39:ar:225:LYS:HE3	39:ar:225:LYS:HB3	1.76	0.45
39:ar:249:HIS:HB3	39:ar:251:PHE:CE1	2.52	0.45
43:i:128:ARG:HH21	43:i:209:GLU:HG3	1.82	0.45
43:i:154:PRO:HD3	48:q:135:TYR:CE2	2.51	0.45
46:c:252:SER:OG	46:c:257:THR:O	2.34	0.45
52:z:701:VAL:O	52:z:705:LYS:HG3	2.16	0.45
56:C:88:THR:HG21	70:Q:61:SER:OG	2.16	0.45
57:D:93:ARG:HD3	57:D:93:ARG:H	1.82	0.45
59:F:111:PHE:O	59:F:118:ARG:HG2	2.17	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
60:G:76:THR:HG21	91:Ab:23:PRO:HD2	1.99	0.45
62:I:61:ARG:H	62:I:65:HIS:CD2	2.23	0.45
65:L:74:LEU:HD23	65:L:74:LEU:HA	1.74	0.45
66:M:184:GLN:HA	66:M:187:ALA:HB3	1.97	0.45
68:O:296:HIS:CE1	68:O:300:LYS:HD2	2.51	0.45
69:P:62:PRO:HB3	69:P:77:PHE:HD2	1.82	0.45
69:P:143:VAL:HG22	96:Ao:213:TYR:CD2	2.52	0.45
70:Q:35:ILE:CD1	114:BD:29:ILE:HD12	2.46	0.45
71:R:172:LYS:HE2	88:Az:73:HIS:CD2	2.50	0.45
71:R:421:ASN:HD22	71:R:448:ASP:HB3	1.80	0.45
72:S:334:ALA:C	72:S:336:GLN:H	2.24	0.45
77:X:468:VAL:O	96:Ao:73:HIS:HB3	2.17	0.45
78:Y:181:ASP:OD1	78:Y:182:THR:N	2.49	0.45
79:Z:47:ASN:OD1	79:Z:47:ASN:N	2.50	0.45
85:An:291:GLU:O	85:An:295:HIS:N	2.37	0.45
91:Ab:198:LEU:HD11	111:Ae:225:ILE:HG13	1.97	0.45
92:Ai:38:ARG:NH1	92:Ai:264:ARG:HH22	2.15	0.45
96:Ao:45:ALA:O	96:Ao:47:LYS:N	2.49	0.45
98:Ar:108:TYR:O	98:Ar:110:LEU:HD22	2.17	0.45
101:Am:300:ARG:HH12	111:Ae:79:GLN:NE2	2.14	0.45
103:BE:91:ILE:HG23	103:BE:113:HIS:HE2	1.81	0.45
105:BP:66:LEU:HD23	105:BP:66:LEU:HA	1.74	0.45
105:BP:143:PRO:O	105:BP:147:VAL:HB	2.16	0.45
108:Av:50:ARG:CZ	108:Av:74:GLN:HA	2.47	0.45
113:Ah:299:SER:O	113:Ah:470:LYS:NZ	2.32	0.45
118:BL:179:ASN:O	118:BL:180:GLY:C	2.60	0.45
118:BL:364:ASP:O	118:BL:367:SER:OG	2.34	0.45
1:1:255:U:C4	1:1:279:U:C5	3.05	0.45
1:1:341:U:H4'	1:1:973:U:C6	2.52	0.45
1:1:452:A:C2	1:1:453:A:H1'	2.52	0.45
1:1:553:A:N1	1:1:573:A:H5'	2.32	0.45
1:1:991:G:H2'	1:1:991:G:N3	2.32	0.45
1:2:224:G:C6	1:2:225:G:N7	2.84	0.45
1:2:259:A:C2	1:2:260:A:C4	3.05	0.45
1:2:302:A:O3'	1:2:303:G:C8	2.70	0.45
1:2:415:A:C5'	10:ae:159:ASP:OD1	2.55	0.45
1:2:418:A:N7	13:aj:54:PRO:CB	2.73	0.45
1:2:486:A:C6	9:n:121:PHE:HE2	1.84	0.45
1:2:503:A:C2'	6:s:82:LEU:CD2	2.94	0.45
1:2:574:C:C6	1:2:574:C:OP2	2.70	0.45
7:au:92:LYS:HE2	7:au:174:TYR:HD2	1.82	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
10:ae:252:ILE:HA	22:ab:1069:PHE:CE2	2.52	0.45
10:ae:397:ARG:NH2	10:ae:474:GLN:OE1	2.47	0.45
12:ag:70:LEU:O	12:ag:74:TYR:N	2.39	0.45
12:ag:137:CYS:O	12:ag:141:SER:OG	2.34	0.45
12:ag:147:PRO:HG2	12:ag:308:LEU:HD21	1.97	0.45
15:d:46:ILE:HG13	15:d:47:ASP:OD1	2.16	0.45
18:r:202:LEU:HD11	18:r:208:GLN:CD	2.42	0.45
18:r:373:PHE:HA	18:r:377:GLU:OE2	2.17	0.45
19:af:182:ILE:HD11	19:af:204:TYR:HA	1.98	0.45
21:aa:312:ARG:HB2	21:aa:343:GLN:NE2	2.31	0.45
22:ab:53:ARG:NH1	22:ab:61:PRO:HD3	2.32	0.45
22:ab:1037:ARG:NH1	22:ab:1038:TYR:OH	2.50	0.45
23:ak:121:ALA:O	23:ak:125:VAL:HG23	2.17	0.45
23:ak:176:TRP:O	23:ak:180:VAL:HG22	2.17	0.45
25:ad:123:ARG:HG3	25:ad:124:TYR:O	2.16	0.45
25:ad:475:ARG:H	25:ad:475:ARG:HD2	1.82	0.45
25:ad:596:LEU:HA	25:ad:599:LEU:HB2	1.99	0.45
25:ad:681:ILE:O	48:q:64:GLN:NE2	2.50	0.45
25:ad:733:ARG:HD3	41:ai:125:TYR:CE1	2.51	0.45
26:an:157:ASP:HB2	32:y:249:ALA:O	2.16	0.45
30:as:72:VAL:HG11	30:as:81:MET:CG	2.47	0.45
31:at:289:ALA:HB3	31:at:309:GLU:HG3	1.99	0.45
32:y:13:LEU:HA	32:y:16:LEU:HD13	1.99	0.45
33:w:80:TRP:O	33:w:84:MET:HG2	2.17	0.45
37:j:139:PRO:HG2	37:j:141:PHE:CZ	2.52	0.45
40:av:66:THR:OG1	40:av:67:ILE:N	2.47	0.45
41:ai:349:TRP:CD1	41:ai:349:TRP:H	2.33	0.45
42:x:241:GLU:OE1	42:x:241:GLU:N	2.46	0.45
43:i:177:MET:HE2	48:q:135:TYR:HD1	1.81	0.45
50:a:211:PRO:O	50:a:228:PRO:HG3	2.16	0.45
53:bd:49:ASN:HD21	53:bd:66:LYS:HD3	1.81	0.45
55:B:19:ASP:OD1	55:B:20:PHE:N	2.49	0.45
60:G:51:TYR:CE2	105:BP:34:GLY:HA2	2.52	0.45
60:G:148:THR:O	60:G:149:PRO:C	2.60	0.45
60:G:275:MET:HE1	125:Ag:301:NAD:H4D	1.98	0.45
64:K:59:ARG:HA	64:K:62:VAL:HG12	1.99	0.45
69:P:177:ARG:HD3	69:P:177:ARG:HA	1.83	0.45
72:S:348:ALA:HA	1:l:368:U:C5	2.52	0.45
86:Al:118:ILE:HD12	86:Al:211:LEU:HD21	1.98	0.45
89:At:108:MET:O	89:At:111:LEU:N	2.50	0.45
92:Ai:285:ALA:HA	92:Ai:290:ALA:HB3	1.97	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
97:BM:66:PRO:HD2	97:BM:319:ALA:HB3	1.99	0.45
100:BH:70:GLY:H	100:BH:74:LEU:HD13	1.81	0.45
104:Ak:136:THR:O	104:Ak:140:GLU:HG3	2.17	0.45
105:BP:97:ARG:CB	105:BP:97:ARG:HH21	2.29	0.45
106:Ad:26:ALA:O	106:Ad:27:HIS:C	2.59	0.45
106:Ad:193:MET:O	106:Ad:197:GLU:N	2.31	0.45
111:Ae:55:HIS:CD2	111:Ae:57:LYS:HG2	2.52	0.45
113:Ah:118:GLU:O	113:Ah:122:ILE:HD12	2.17	0.45
113:Ah:469:ASP:O	113:Ah:473:ARG:HG2	2.16	0.45
117:Ax:91:GLU:HB2	120:BG:1300:SER:HB3	1.98	0.45
118:BL:114:ASP:O	118:BL:114:ASP:OD1	2.34	0.45
118:BL:186:LEU:CD2	118:BL:278:ARG:HH11	2.30	0.45
118:BL:352:ARG:NH2	118:BL:357:ASN:OD1	2.49	0.45
1:1:257:G:N3	1:1:257:G:H2'	2.30	0.45
1:1:1130:A:C6	1:1:1131:A:N1	2.85	0.45
1:2:121:C:O2	1:2:123:G:C2	2.70	0.45
1:2:288:U:H2'	1:2:289:A:H5'	1.99	0.45
1:2:303:G:C3'	1:2:304:U:C5'	2.95	0.45
1:2:413:U:H5'	2:h:10:MET:HB3	1.96	0.45
1:2:498:U:OP2	11:ay:136:ARG:NH2	2.50	0.45
1:2:514:U:C4'	16:az:17:VAL:CG2	2.93	0.45
4:m:132:LYS:HE2	48:q:179:PHE:HD2	1.80	0.45
5:f:98:ARG:HH11	36:p:178:ARG:HB2	1.82	0.45
7:au:114:LEU:HD12	7:au:118:GLU:CB	2.47	0.45
10:ae:18:VAL:HG13	13:aj:279:GLY:HA3	1.99	0.45
10:ae:386:VAL:O	10:ae:390:VAL:HG23	2.17	0.45
10:ae:509:ALA:HB2	10:ae:538:PHE:HB3	1.98	0.45
12:ag:359:PRO:HA	12:ag:362:ASP:OD2	2.16	0.45
12:ag:375:ARG:HB3	12:ag:379:TYR:HE2	1.81	0.45
15:d:111:ASP:OD1	15:d:119:ASN:ND2	2.49	0.45
18:r:243:ARG:HG3	18:r:244:ALA:N	2.31	0.45
20:u:160:SER:H	22:ab:717:GLN:NE2	2.15	0.45
20:u:161:PRO:O	20:u:164:GLU:HG3	2.17	0.45
21:aa:294:PHE:CD2	21:aa:364:ALA:HA	2.52	0.45
22:ab:831:ASP:O	22:ab:835:GLU:N	2.36	0.45
22:ab:838:THR:HG22	22:ab:924:TRP:HZ2	1.82	0.45
24:ac:660:ASN:HB3	24:ac:715:TRP:HE1	1.82	0.45
24:ac:677:ALA:HB2	38:l:325:GLU:HB2	1.97	0.45
24:ac:793:HIS:HA	24:ac:796:ARG:NE	2.31	0.45
25:ad:29:ARG:HG3	46:c:259:PHE:CE2	2.52	0.45
25:ad:126:MET:HE3	25:ad:273:HIS:ND1	2.32	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:177:TYR:CE1	25:ad:200:MET:HB3	2.51	0.45
25:ad:205:THR:HG23	25:ad:278:PRO:HB2	1.99	0.45
25:ad:208:ASP:O	25:ad:212:ILE:HG13	2.16	0.45
26:an:251:ARG:HH11	45:o:138:LYS:H	1.63	0.45
27:ao:17:MET:SD	27:ao:170:LEU:HG	2.57	0.45
28:ap:195:GLN:HB3	28:ap:198:PRO:HA	1.97	0.45
30:as:243:TYR:CE2	48:q:33:THR:HG22	2.51	0.45
38:l:236:VAL:O	38:l:347:PRO:HG3	2.17	0.45
39:ar:29:ARG:HE	39:ar:29:ARG:HB2	1.53	0.45
41:ai:9:THR:O	41:ai:12:LYS:NZ	2.44	0.45
41:ai:16:THR:HG23	41:ai:17:LEU:H	1.81	0.45
45:o:349:ARG:HG3	45:o:351:ALA:H	1.82	0.45
48:q:180:VAL:HG21	49:b:45:LEU:HD11	1.98	0.45
50:a:87:VAL:HG22	50:a:306:GLU:HG2	1.99	0.45
52:z:799:LEU:HD12	52:z:799:LEU:HA	1.85	0.45
54:A:60:HIS:NE2	54:A:65:SER:HB3	2.32	0.45
54:A:338:THR:HA	111:Ae:32:ARG:NH1	2.32	0.45
55:B:399:ASN:ND2	55:B:402:HIS:HB2	2.32	0.45
56:C:196:GLU:O	115:Ay:138:GLN:N	2.45	0.45
57:D:32:ARG:HG2	57:D:38:HIS:CE1	2.52	0.45
58:E:218:ARG:NH2	108:Av:113:ILE:HG13	2.32	0.45
58:E:272:SER:O	58:E:272:SER:OG	2.29	0.45
60:G:236:ASN:H	60:G:254:ASN:CG	2.25	0.45
61:H:76:PRO:HB3	108:Av:171:ARG:HE	1.82	0.45
62:I:42:GLU:CB	62:I:45:MET:HE3	2.47	0.45
62:I:214:SER:HB3	107:BF:29:ARG:HB2	1.99	0.45
62:I:214:SER:CB	107:BF:29:ARG:HB2	2.47	0.45
63:J:83:THR:HG22	63:J:83:THR:O	2.17	0.45
66:M:41:GLN:HE21	68:O:44:LEU:HD12	1.81	0.45
68:O:19:PHE:O	73:T:52:LEU:HD13	2.16	0.45
70:Q:74:ASP:HB3	70:Q:152:TYR:CE2	2.52	0.45
70:Q:156:ILE:HB	85:An:270:GLY:HA2	1.98	0.45
70:Q:171:PHE:O	70:Q:174:ASP:N	2.49	0.45
71:R:259:VAL:O	71:R:259:VAL:HG23	2.17	0.45
72:S:258:PHE:HE1	72:S:312:GLN:HB2	1.82	0.45
72:S:367:ARG:HD3	109:Af:133:ARG:NH1	2.32	0.45
75:V:139:ALA:HB1	75:V:140:PRO:HD2	1.99	0.45
80:BA:53:LYS:O	80:BA:56:LEU:HB3	2.17	0.45
85:An:304:ASP:O	85:An:308:GLY:N	2.37	0.45
89:At:117:GLU:O	89:At:121:LYS:N	2.31	0.45
90:BC:16:HIS:HA	90:BC:19:MET:HE2	1.99	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
91:Ab:225:VAL:HG22	91:Ab:226:PRO:HD2	1.99	0.45
91:Ab:228:HIS:HB3	96:Ao:271:GLN:HG2	1.98	0.45
92:Ai:110:LEU:C	92:Ai:112:PHE:H	2.25	0.45
92:Ai:119:PRO:HB2	92:Ai:121:HIS:O	2.17	0.45
94:Au:92:VAL:HG23	94:Au:93:HIS:N	2.29	0.45
97:BM:46:ARG:HH21	97:BM:50:LYS:HZ2	1.64	0.45
97:BM:192:LEU:HD12	97:BM:192:LEU:O	2.17	0.45
97:BM:269:VAL:O	97:BM:273:VAL:HG22	2.17	0.45
97:BM:285:LEU:HB3	97:BM:289:ARG:NE	2.30	0.45
98:Ar:114:GLN:HE21	98:Ar:200:SER:HA	1.81	0.45
104:Ak:24:VAL:HG13	104:Ak:25:ALA:H	1.80	0.45
104:Ak:148:ASP:OD1	104:Ak:149:VAL:N	2.49	0.45
105:BP:146:PHE:CD2	105:BP:147:VAL:HG23	2.52	0.45
109:Af:126:TYR:OH	109:Af:130:TYR:HD2	1.99	0.45
111:Ae:146:GLN:HB3	111:Ae:160:PRO:HD2	1.98	0.45
113:Ah:324:THR:O	113:Ah:324:THR:OG1	2.33	0.45
117:Ax:73:THR:CG2	117:Ax:200:PHE:H	2.20	0.45
117:Ax:117:ILE:HG23	117:Ax:119:SER:H	1.82	0.45
119:BO:103:VAL:HB	119:BO:105:ARG:CB	2.46	0.45
119:BO:130:LEU:HD12	119:BO:151:THR:O	2.17	0.45
1:1:269:A:H2'	1:1:270:A:H5''	1.98	0.45
1:1:577:A:H2'	1:1:577:A:N3	2.30	0.45
1:1:777:G:H2'	1:1:778:A:C8	2.52	0.45
1:1:1079:A:N6	1:1:1088:G:H1	2.14	0.45
1:2:116:U:O2	1:2:117:A:C8	2.70	0.45
1:2:291:U:HO2'	1:2:292:A:P	2.27	0.45
1:2:321:U:C1'	46:c:169:GLU:OE2	2.44	0.45
1:2:323:U:O4	43:i:261:HIS:CB	2.56	0.45
1:2:341:C:C3'	1:2:342:A:H5'	2.47	0.45
1:2:432:G:H5'	10:ae:15:HIS:H	1.81	0.45
4:m:217:TRP:HH2	34:v:130:HIS:HB3	1.82	0.45
5:f:34:PRO:HB3	16:az:71:CYS:SG	2.57	0.45
5:f:40:GLN:HG3	5:f:41:TYR:CD1	2.51	0.45
7:au:241:ASN:OD1	7:au:242:MET:HG3	2.17	0.45
12:ag:3:LEU:HD23	12:ag:6:ASN:ND2	2.32	0.45
12:ag:27:PRO:HG3	13:aj:29:HIS:CE1	2.51	0.45
12:ag:417:ARG:HH21	12:ag:422:PRO:HB2	1.81	0.45
14:e:574:ASN:OD1	14:e:600:VAL:N	2.50	0.45
16:az:43:VAL:HG22	18:r:429:HIS:CD2	2.52	0.45
18:r:351:LEU:HB3	18:r:353:GLU:OE2	2.16	0.45
19:af:249:ILE:HD12	22:ab:982:TYR:CE1	2.51	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
19:af:521:LEU:HD21	19:af:625:LEU:HD23	1.99	0.45
20:u:219:LEU:HD23	20:u:219:LEU:HA	1.81	0.45
20:u:244:GLU:O	20:u:248:ARG:HG2	2.16	0.45
20:u:381:PHE:O	20:u:385:ALA:N	2.36	0.45
21:aa:498:VAL:HG11	21:aa:514:ALA:HB1	1.99	0.45
21:aa:625:ALA:HA	21:aa:743:LEU:HD12	1.98	0.45
21:aa:881:SER:HA	21:aa:892:HIS:CE1	2.52	0.45
22:ab:123:ASP:OD1	22:ab:124:ALA:N	2.47	0.45
22:ab:576:PRO:HG3	22:ab:617:TYR:CE2	2.52	0.45
22:ab:628:GLN:OE1	22:ab:636:THR:OG1	2.35	0.45
24:ac:1118:HIS:HB2	38:l:561:TYR:CD2	2.51	0.45
25:ad:415:GLN:HB3	25:ad:633:ARG:HH22	1.81	0.45
28:ap:96:ASP:HA	28:ap:99:VAL:HG22	1.99	0.45
28:ap:182:GLU:CD	28:ap:182:GLU:H	2.24	0.45
31:at:256:CYS:SG	31:at:259:CYS:N	2.83	0.45
32:y:51:HIS:CD2	32:y:51:HIS:H	2.35	0.45
38:l:269:SER:O	38:l:273:PRO:HD2	2.17	0.45
38:l:559:GLU:HB2	38:l:562:ASN:HB3	1.97	0.45
39:ar:247:GLN:HG2	39:ar:248:HIS:CD2	2.52	0.45
40:av:88:LEU:HD23	40:av:88:LEU:HA	1.76	0.45
41:ai:198:VAL:HG23	41:ai:199:VAL:HG23	1.99	0.45
43:i:171:PHE:CD1	49:b:116:PRO:HB2	2.52	0.45
51:ba:77:THR:O	51:ba:81:TRP:HD1	2.00	0.45
54:A:163:ILE:HG21	54:A:166:HIS:CE1	2.52	0.45
55:B:170:HIS:HE1	1:1:216:U:H4'	1.81	0.45
55:B:256:LEU:C	55:B:258:PRO:HD3	2.41	0.45
55:B:408:GLY:HA2	86:Al:287:TRP:CE3	2.51	0.45
57:D:28:ASP:OD1	57:D:42:SER:OG	2.31	0.45
60:G:128:ARG:HB2	95:Aa:20:GLN:NE2	2.32	0.45
67:N:138:PHE:HE1	71:R:98:VAL:HG12	1.82	0.45
68:O:161:LYS:HB3	71:R:441:TRP:O	2.17	0.45
71:R:221:VAL:HG21	86:Al:295:PRO:O	2.16	0.45
77:X:231:PRO:HB3	77:X:257:ASN:HD21	1.82	0.45
77:X:440:GLU:OE2	106:Ad:42:LEU:HB2	2.16	0.45
80:BA:16:ASN:OD1	80:BA:16:ASN:C	2.60	0.45
82:BB:129:THR:HG23	82:BB:130:LYS:HA	1.99	0.45
83:Aw:149:TYR:CG	106:Ad:192:ASP:HB3	2.52	0.45
84:Bj:104:MET:SD	112:Ac:130:VAL:HG11	2.57	0.45
89:At:17:ARG:NH1	89:At:26:HIS:O	2.50	0.45
92:Ai:118:GLN:HG2	92:Ai:175:TYR:CE2	2.51	0.45
93:Ap:83:LEU:HA	93:Ap:88:ILE:HD12	1.98	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
95:Aa:19:ALA:HB1	1:1:378:A:N3	2.31	0.45
95:Aa:133:THR:HG22	95:Aa:134:VAL:H	1.82	0.45
97:BM:321:LYS:O	97:BM:325:GLN:N	2.40	0.45
99:Aj:485:PHE:O	99:Aj:485:PHE:CG	2.70	0.45
101:Am:280:VAL:O	101:Am:284:VAL:HG13	2.17	0.45
107:BF:63:ARG:HH12	107:BF:68:GLN:HA	1.82	0.45
110:As:71:THR:O	110:As:74:THR:N	2.42	0.45
112:Ac:260:THR:HG22	112:Ac:261:ARG:N	2.32	0.45
116:Ag:55:LYS:HB3	116:Ag:55:LYS:HE2	1.71	0.45
117:Ax:167:LEU:O	117:Ax:171:LEU:N	2.49	0.45
118:BL:119:ARG:HH12	118:BL:132:HIS:HB3	1.81	0.45
119:BO:79:LEU:O	119:BO:79:LEU:HD23	2.16	0.45
119:BO:103:VAL:CB	119:BO:105:ARG:HB3	2.47	0.45
119:BO:103:VAL:CG1	119:BO:122:PRO:HA	2.39	0.45
1:1:42:A:C2'	1:1:42:A:N3	2.80	0.45
1:2:16:U:O4	1:2:17:C:N4	2.50	0.45
1:2:53:U:H3'	1:2:53:U:H6	1.81	0.45
1:2:108:A:P	43:i:363:TYR:OH	2.74	0.45
1:2:218:A:C3'	1:2:218:A:C8	3.00	0.45
1:2:335:U:C6	1:2:335:U:C4'	3.00	0.45
1:2:395:U:OP2	1:2:395:U:C6	2.70	0.45
1:2:424:U:O2	1:2:424:U:OP2	2.34	0.45
1:2:430:C:O2	1:2:430:C:C2'	2.65	0.45
1:2:522:A:O2'	15:d:343:LYS:HE2	2.14	0.45
1:2:570:A:H5'	1:2:570:A:C8	2.52	0.45
1:2:570:A:C8	1:2:570:A:C4'	3.00	0.45
3:aw:102:PHE:O	20:u:807:VAL:HA	2.17	0.45
7:au:41:TYR:HE1	13:aj:308:PRO:HG3	1.81	0.45
8:am:170:ARG:HB3	36:p:30:PRO:HD3	1.99	0.45
10:ae:418:ASP:OD2	10:ae:421:LYS:N	2.50	0.45
13:aj:75:PHE:O	13:aj:79:LEU:HG	2.16	0.45
13:aj:257:LYS:HD3	24:ac:89:TYR:CZ	2.51	0.45
14:e:148:THR:HA	14:e:151:THR:CB	2.47	0.45
14:e:209:TRP:CD1	14:e:214:TRP:HB2	2.52	0.45
18:r:203:GLU:HG2	18:r:230:ARG:HH22	1.82	0.45
19:af:736:GLN:O	19:af:740:GLN:NE2	2.50	0.45
20:u:139:ASP:OD1	20:u:140:GLN:N	2.50	0.45
20:u:166:MET:HE3	20:u:166:MET:HB3	1.86	0.45
21:aa:152:ARG:HH11	21:aa:155:ASP:HA	1.82	0.45
21:aa:184:ASN:HA	25:ad:202:ARG:HG3	1.98	0.45
22:ab:680:LEU:O	22:ab:684:ALA:N	2.49	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
22:ab:730:VAL:HA	22:ab:742:LYS:HD2	1.98	0.45
23:ak:270:ARG:HB2	24:ac:560:TYR:CE1	2.52	0.45
24:ac:510:GLU:HA	24:ac:513:ALA:HB3	1.98	0.45
24:ac:733:GLU:N	24:ac:733:GLU:OE2	2.50	0.45
24:ac:1174:LEU:HD12	24:ac:1176:PHE:CZ	2.51	0.45
25:ad:172:PRO:HG2	25:ad:177:TYR:OH	2.17	0.45
28:ap:203:TRP:HZ2	48:q:118:LYS:HD2	1.81	0.45
29:aq:172:GLU:HG3	29:aq:173:HIS:ND1	2.32	0.45
30:as:157:LEU:HD13	30:as:160:VAL:HG21	1.99	0.45
34:v:119:LEU:HD12	34:v:123:ALA:HB3	1.98	0.45
36:p:92:ILE:O	36:p:96:ASP:HB2	2.17	0.45
38:l:644:ARG:HA	38:l:644:ARG:NE	2.32	0.45
39:ar:249:HIS:HB3	39:ar:251:PHE:HE1	1.81	0.45
46:c:117:LEU:HD23	52:z:352:TYR:CD1	2.52	0.45
48:q:137:ARG:O	48:q:140:GLU:HB3	2.16	0.45
49:b:148:PHE:O	49:b:153:TRP:HB3	2.17	0.45
52:z:499:CYS:HG	52:z:500:PHE:HD1	1.64	0.45
52:z:1076:LYS:HD3	52:z:1076:LYS:HA	1.70	0.45
53:bd:65:ILE:HD13	53:bd:65:ILE:HA	1.79	0.45
54:A:284:ILE:N	1:1:1104:U:O2'	2.50	0.45
56:C:101:GLU:N	56:C:101:GLU:OE1	2.50	0.45
57:D:36:ARG:CZ	101:Am:266:GLU:HB3	2.47	0.45
60:G:125:LYS:C	60:G:126:TYR:HD1	2.25	0.45
63:J:45:PRO:HA	63:J:83:THR:HG23	1.99	0.45
66:M:61:LEU:HD21	99:Aj:476:ARG:HD2	1.99	0.45
66:M:99:LEU:HB3	66:M:106:MET:HE3	1.99	0.45
68:O:265:GLU:HB2	71:R:41:ARG:NH2	2.31	0.45
69:P:30:LYS:O	1:1:940:U:N3	2.33	0.45
69:P:51:ARG:NE	69:P:53:PHE:HE2	2.15	0.45
71:R:203:GLU:HG2	71:R:207:LYS:HD2	1.98	0.45
73:T:76:GLU:O	73:T:80:GLN:HG2	2.16	0.45
74:U:17:ARG:N	74:U:17:ARG:CD	2.64	0.45
76:W:84:THR:HG22	76:W:102:TRP:HB3	1.99	0.45
81:UA:65:UNK:HA	81:UA:114:UNK:HA	1.97	0.45
82:BB:127:PRO:O	103:BE:43:GLU:HA	2.16	0.45
84:Bj:137:ARG:HD3	112:Ac:40:HIS:NE2	2.32	0.45
85:An:51:ARG:HE	85:An:52:PRO:HD2	1.82	0.45
85:An:118:SER:H	85:An:121:GLU:HB2	1.82	0.45
86:Al:86:LEU:HD23	86:Al:86:LEU:H	1.82	0.45
86:Al:96:LYS:HD3	86:Al:168:GLU:OE2	2.17	0.45
88:Az:57:TYR:HB2	88:Az:66:LYS:HE3	1.99	0.45

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
88:Az:100:ASP:O	88:Az:104:ARG:HG3	2.16	0.45
90:BC:117:THR:HG21	112:Ac:104:ILE:HG12	1.99	0.45
94:Au:42:PHE:CE1	94:Au:46:VAL:HG21	2.52	0.45
95:Aa:40:GLY:N	95:Aa:45:GLY:HA3	2.29	0.45
95:Aa:108:SER:O	95:Aa:108:SER:OG	2.34	0.45
96:Ao:181:TRP:CZ2	96:Ao:191:LEU:HB3	2.52	0.45
97:BM:140:ARG:HH12	97:BM:263:ARG:CD	2.30	0.45
98:Ar:151:ARG:HE	98:Ar:153:LYS:CD	2.30	0.45
100:BH:94:ASP:OD2	100:BH:101:ARG:N	2.49	0.45
102:Aq:295:ARG:H	1:1:961:A:N6	2.14	0.45
107:BF:27:ARG:O	107:BF:27:ARG:HD2	2.16	0.45
107:BF:109:ASP:N	107:BF:109:ASP:OD1	2.50	0.45
109:Af:64:ARG:HG3	109:Af:66:SER:HB3	1.98	0.45
110:As:70:VAL:HG11	110:As:78:TRP:CZ3	2.52	0.45
113:Ah:363:VAL:HG13	113:Ah:364:VAL:N	2.32	0.45
117:Ax:130:VAL:HB	117:Ax:131:PRO:HD3	1.98	0.45
119:BO:50:GLY:O	119:BO:52:GLU:HG3	2.16	0.45
1:1:216:U:O4	1:1:217:A:N6	2.50	0.45
1:1:316:A:H3'	1:1:317:A:C5'	2.47	0.45
1:1:480:A:H8	1:1:481:U:H5'	1.82	0.45
1:1:558:C:C4	1:1:559:U:C4	3.05	0.45
1:1:563:U:O2'	1:1:564:U:O4'	2.24	0.45
1:1:762:A:H8	1:1:762:A:O5'	2.00	0.45
1:1:1027:G:H2'	1:1:1028:U:O4'	2.16	0.45
1:1:1141:A:H2'	1:1:1142:U:O4'	2.17	0.45
1:2:38:U:P	33:w:139:TYR:CD1	2.99	0.44
1:2:48:U:H6	1:2:48:U:C3'	2.30	0.44
1:2:94:A:H2'	1:2:95:G:O5'	2.17	0.44
1:2:270:U:C5	25:ad:21:ARG:NH2	2.85	0.44
1:2:282:A:C1'	43:i:247:ILE:HG12	2.46	0.44
1:2:453:A:C1'	8:am:274:ILE:HG23	2.46	0.44
1:2:468:G:H1'	11:ay:29:TRP:NE1	2.32	0.44
1:2:500:U:P	3:aw:13:TYR:HE1	2.18	0.44
1:2:528:A:P	16:az:69:HIS:O	2.74	0.44
10:ae:97:LEU:HB2	10:ae:101:ALA:HB2	1.98	0.44
11:ay:76:ARG:HA	11:ay:146:PRO:HA	1.99	0.44
11:ay:83:ARG:HB3	16:az:120:TYR:CD1	2.51	0.44
11:ay:128:GLY:HA3	18:r:265:HIS:ND1	2.32	0.44
12:ag:327:ARG:HH21	12:ag:437:PHE:HB2	1.82	0.44
14:e:312:GLY:HA3	20:u:629:VAL:HG22	1.98	0.44
14:e:580:THR:HG23	14:e:581:TYR:N	2.32	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
15:d:38:SER:HA	36:p:188:THR:HG21	1.99	0.44
19:af:365:PHE:CZ	19:af:418:VAL:HG21	2.52	0.44
20:u:283:PHE:CZ	22:ab:878:ILE:HG12	2.52	0.44
21:aa:935:ALA:O	21:aa:939:ALA:N	2.50	0.44
21:aa:1604:PHE:O	21:aa:1607:ARG:HG2	2.17	0.44
22:ab:1096:LEU:HA	22:ab:1099:VAL:HG12	2.00	0.44
23:ak:137:LEU:HB3	23:ak:144:LEU:HD21	1.99	0.44
24:ac:371:LEU:HD21	24:ac:502:PRO:HA	1.99	0.44
24:ac:451:ASN:OD1	24:ac:452:GLY:N	2.48	0.44
24:ac:738:ARG:HA	24:ac:741:LEU:HB2	1.98	0.44
26:an:281:ARG:NE	50:a:65:ARG:O	2.33	0.44
27:ao:47:VAL:HB	27:ao:137:TRP:CZ3	2.52	0.44
30:as:72:VAL:HG11	30:as:81:MET:HG2	1.99	0.44
32:y:58:LEU:HA	32:y:58:LEU:HD12	1.82	0.44
32:y:118:VAL:HG13	32:y:119:GLY:N	2.33	0.44
33:w:133:LYS:HA	33:w:133:LYS:HD3	1.82	0.44
35:t:90:ARG:HH12	35:t:106:GLN:HE22	1.65	0.44
38:l:578:GLU:O	38:l:582:VAL:HG22	2.16	0.44
43:i:315:LEU:HD21	43:i:324:LEU:HD22	1.98	0.44
45:o:158:TRP:CZ3	51:ba:82:LYS:HB3	2.52	0.44
46:c:110:ARG:NH2	46:c:114:GLN:HE22	2.14	0.44
46:c:237:LYS:NZ	50:a:288:SER:O	2.36	0.44
50:a:44:GLU:HG3	50:a:90:TYR:CD1	2.52	0.44
50:a:132:HIS:HA	50:a:135:ARG:HG3	1.98	0.44
52:z:705:LYS:NZ	52:z:721:ASP:HA	2.32	0.44
55:B:91:VAL:HG12	55:B:104:THR:OG1	2.16	0.44
60:G:34:LEU:HD11	99:Aj:213:TYR:O	2.17	0.44
60:G:147:MET:HE3	60:G:147:MET:HB3	1.78	0.44
62:I:153:ARG:HG3	62:I:160:MET:SD	2.57	0.44
62:I:215:LYS:O	62:I:218:THR:OG1	2.35	0.44
65:L:93:VAL:HG11	65:L:106:TRP:CH2	2.53	0.44
66:M:7:ARG:O	66:M:8:TYR:C	2.60	0.44
67:N:132:ARG:CZ	71:R:393:LEU:HD11	2.47	0.44
70:Q:133:ASP:OD1	70:Q:142:LYS:HD3	2.17	0.44
72:S:271:TRP:CE3	96:Ao:34:ALA:HA	2.53	0.44
74:U:49:HIS:CE1	74:U:75:PRO:HG2	2.52	0.44
75:V:64:ARG:CZ	1:1:969:U:C4	3.00	0.44
77:X:155:PRO:O	96:Ao:107:ASN:ND2	2.40	0.44
83:Aw:4:GLY:C	83:Aw:6:VAL:H	2.25	0.44
85:An:141:ASP:OD1	85:An:141:ASP:C	2.60	0.44
87:BI:144:LEU:HD11	87:BI:176:ILE:HD13	1.98	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
88:Az:151:CYS:O	89:At:98:THR:HB	2.17	0.44
94:Au:44:ARG:HD2	1:1:250:A:OP1	2.17	0.44
94:Au:53:ARG:HA	94:Au:54:PRO:HD2	1.72	0.44
95:Aa:30:ARG:NH2	1:1:162:G:N7	2.66	0.44
97:BM:47:LYS:HA	97:BM:47:LYS:HD2	1.77	0.44
97:BM:202:SER:OG	97:BM:205:LYS:HE2	2.17	0.44
97:BM:294:ASP:HB3	97:BM:323:ARG:CG	2.46	0.44
101:Am:56:TRP:O	101:Am:59:ARG:N	2.50	0.44
104:Ak:273:GLN:HB3	104:Ak:279:VAL:HG11	2.00	0.44
106:Ad:85:GLN:HA	106:Ad:85:GLN:HE21	1.82	0.44
113:Ah:309:ALA:HA	113:Ah:312:VAL:HG12	1.99	0.44
113:Ah:444:THR:O	113:Ah:448:ARG:HB2	2.17	0.44
118:BL:241:GLY:HA3	1:1:671:U:O4	2.16	0.44
119:BO:51:THR:HG23	119:BO:136:THR:HG21	1.99	0.44
119:BO:80:ILE:HG21	119:BO:100:ARG:HH11	1.80	0.44
1:1:149:U:O2'	1:1:150:A:C8	2.65	0.44
1:1:347:A:H5'	1:1:348:U:OP2	2.17	0.44
1:2:13:U:H3'	50:a:261:ASN:O	2.15	0.44
1:2:142:U:O3'	25:ad:34:PHE:CD1	2.71	0.44
1:2:225:G:OP2	6:s:146:LYS:HE2	2.17	0.44
1:2:285:U:C4	1:2:286:G:O6	2.70	0.44
1:2:294:A:C8	1:2:295:U:O2	2.70	0.44
1:2:417:C:N4	10:ae:131:ARG:NE	2.66	0.44
1:2:484:A:C2	1:2:505:U:C6	3.06	0.44
1:2:525:A:P	15:d:329:ARG:CA	2.79	0.44
1:2:532:U:C6	16:az:76:ARG:CD	2.95	0.44
1:2:592:U:C6	1:2:592:U:H3'	2.52	0.44
2:h:104:THR:HG22	2:h:105:ARG:H	1.82	0.44
10:ae:47:MET:HE2	10:ae:132:LEU:HD22	1.98	0.44
10:ae:211:ARG:NH1	14:e:605:ALA:HA	2.32	0.44
12:ag:63:TYR:OH	12:ag:98:CYS:O	2.28	0.44
12:ag:267:VAL:HG22	12:ag:271:ASN:ND2	2.33	0.44
14:e:478:VAL:HB	14:e:480:TYR:CE1	2.53	0.44
15:d:68:LEU:HD13	36:p:182:VAL:HG12	2.00	0.44
17:ax:13:GLU:OE1	17:ax:13:GLU:N	2.48	0.44
21:aa:802:ALA:HB3	21:aa:803:PRO:HD3	1.98	0.44
22:ab:383:ASP:OD1	22:ab:386:ARG:HB3	2.17	0.44
23:ak:176:TRP:CE2	23:ak:180:VAL:HG11	2.52	0.44
23:ak:180:VAL:HG12	23:ak:189:ARG:CB	2.47	0.44
24:ac:127:TRP:CH2	24:ac:132:ASN:HB3	2.53	0.44
24:ac:1037:MET:HG3	24:ac:1064:TYR:CZ	2.52	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:298:MET:O	25:ad:302:MET:HG2	2.17	0.44
26:an:74:ARG:NH2	52:z:964:PRO:HA	2.32	0.44
26:an:194:TRP:O	26:an:200:GLY:HA3	2.17	0.44
27:ao:207:ARG:HD3	27:ao:209:TRP:CZ2	2.52	0.44
28:ap:118:GLN:HB3	28:ap:216:LYS:HB2	2.00	0.44
29:aq:162:ASP:HB3	33:w:184:LYS:NZ	2.32	0.44
30:as:255:PRO:HG2	30:as:260:GLY:HA3	1.98	0.44
33:w:148:LYS:HD2	33:w:154:ASN:HA	1.99	0.44
35:t:50:VAL:O	35:t:54:SER:OG	2.35	0.44
35:t:85:ALA:O	35:t:89:THR:HG23	2.17	0.44
35:t:125:THR:HA	35:t:207:LYS:HD3	2.00	0.44
36:p:278:VAL:HG23	36:p:281:LEU:HD12	1.98	0.44
38:l:640:ALA:HA	38:l:643:PHE:CD1	2.53	0.44
46:c:72:VAL:HA	46:c:75:LYS:HG2	1.97	0.44
46:c:136:ARG:O	46:c:162:ARG:NH2	2.49	0.44
48:q:164:LEU:HG	49:b:41:ASN:ND2	2.32	0.44
55:B:97:LEU:HD23	55:B:97:LEU:HA	1.70	0.44
58:E:103:ARG:CZ	1:1:431:A:H5"	2.46	0.44
58:E:107:TYR:CE2	58:E:113:ILE:HD12	2.45	0.44
60:G:196:THR:N	60:G:199:HIS:HD2	2.15	0.44
60:G:228:TYR:HE1	60:G:230:LEU:HD13	1.82	0.44
66:M:146:LEU:HD23	66:M:204:CYS:SG	2.57	0.44
72:S:377:LYS:HD2	72:S:377:LYS:HA	1.72	0.44
74:U:42:ARG:HA	74:U:50:MET:HA	1.99	0.44
77:X:213:MET:HE2	77:X:213:MET:HB3	1.79	0.44
80:BA:107:ASN:HB3	80:BA:110:ARG:HB2	1.98	0.44
82:BB:10:ASP:HB2	1:1:141:A:N6	2.32	0.44
83:Aw:120:MET:HE1	83:Aw:121:GLU:OE2	2.18	0.44
86:Al:76:ASP:HB3	86:Al:80:ARG:HH12	1.82	0.44
89:At:115:GLU:O	89:At:119:HIS:HB2	2.16	0.44
92:Ai:252:LEU:O	92:Ai:256:LEU:HG	2.17	0.44
92:Ai:265:PHE:HB2	92:Ai:319:THR:HG22	1.99	0.44
93:Ap:191:ARG:HH12	93:Ap:195:ARG:CZ	2.29	0.44
94:Au:108:HIS:HB3	113:Ah:126:PHE:HE1	1.82	0.44
96:Ao:253:TYR:HA	96:Ao:254:PRO:HD3	1.84	0.44
99:Aj:409:HIS:HE1	106:Ad:173:MET:HG3	1.82	0.44
99:Aj:459:VAL:HG22	99:Aj:460:GLN:H	1.81	0.44
101:Am:26:ASN:HD22	101:Am:29:TRP:HD1	1.65	0.44
101:Am:215:VAL:HG23	111:Ae:161:LEU:HD22	1.99	0.44
104:Ak:282:LYS:HA	104:Ak:282:LYS:HD2	1.67	0.44
111:Ae:178:MET:HB2	111:Ae:178:MET:HE3	1.79	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
112:Ac:95:PHE:HB3	112:Ac:100:GLN:O	2.16	0.44
112:Ac:107:ARG:O	112:Ac:113:ILE:HD11	2.16	0.44
113:Ah:318:LEU:O	113:Ah:322:ALA:HB2	2.17	0.44
113:Ah:337:ASP:O	113:Ah:340:THR:HG22	2.17	0.44
115:Ay:38:ARG:O	115:Ay:38:ARG:HG2	2.18	0.44
118:BL:93:VAL:HG22	118:BL:97:MET:HB2	1.99	0.44
119:BO:60:LEU:HG	119:BO:133:ARG:HH12	1.81	0.44
1:1:372:A:N6	1:1:373:A:C6	2.85	0.44
1:1:447:A:C6	1:1:448:U:C4	3.06	0.44
1:1:508:G:O2'	1:1:509:U:P	2.74	0.44
1:1:572:A:H8	1:1:572:A:H5''	1.83	0.44
1:1:687:U:H2'	1:1:688:C:H5'	1.99	0.44
1:1:812:A:C3'	1:1:813:U:H5'	2.43	0.44
1:1:841:A:N1	1:1:854:A:N1	2.66	0.44
1:1:845:A:H2'	1:1:846:A:H5''	1.98	0.44
1:2:54:A:O2'	1:2:55:G:C8	2.70	0.44
1:2:169:U:H6	1:2:169:U:H3'	1.80	0.44
1:2:243:A:C8	1:2:473:U:C1'	3.00	0.44
1:2:383:A:H1'	50:a:153:LYS:HB2	1.99	0.44
1:2:478:U:H1'	2:h:20:ARG:NH1	2.31	0.44
1:2:479:A:P	2:h:20:ARG:HD3	2.57	0.44
1:2:483:A:N7	2:h:83:LYS:C	2.76	0.44
1:2:514:U:OP1	17:ax:43:ASN:ND2	2.50	0.44
1:2:571:C:O3'	1:2:572:A:C8	2.70	0.44
1:2:585:U:OP1	1:2:585:U:C5	2.71	0.44
1:2:590:U:C2	1:2:603:A:N1	2.85	0.44
1:2:593:U:H2'	1:2:594:U:O5'	2.17	0.44
1:2:606:U:C5'	1:2:606:U:H6	2.30	0.44
4:m:30:GLU:H	52:z:137:THR:HG21	1.83	0.44
4:m:108:PHE:CG	4:m:201:PRO:HB3	2.52	0.44
4:m:230:LEU:HD23	4:m:230:LEU:HA	1.81	0.44
7:au:55:ALA:HA	7:au:58:ASN:HD22	1.83	0.44
8:am:81:ALA:HA	8:am:84:THR:HG23	1.99	0.44
11:ay:140:TYR:HD2	11:ay:141:ARG:HG2	1.83	0.44
12:ag:52:ARG:HD3	12:ag:52:ARG:HA	1.70	0.44
12:ag:143:ALA:HA	12:ag:149:LEU:HD23	2.00	0.44
12:ag:400:MET:HE2	12:ag:406:MET:HG3	1.99	0.44
13:aj:67:ILE:HB	13:aj:123:LYS:HZ3	1.82	0.44
14:e:765:MET:HE1	14:e:767:GLN:HB2	2.00	0.44
16:az:142:HIS:O	16:az:151:LEU:HG	2.18	0.44
19:af:250:GLN:N	22:ab:982:TYR:OH	2.43	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
19:af:328:ARG:O	19:af:332:ASN:ND2	2.50	0.44
19:af:410:PHE:O	19:af:413:THR:HG22	2.17	0.44
19:af:730:LEU:HD22	19:af:734:VAL:HG11	1.99	0.44
20:u:110:LEU:HD12	22:ab:922:MET:SD	2.56	0.44
21:aa:157:ALA:O	21:aa:161:ASN:ND2	2.51	0.44
21:aa:860:THR:OG1	52:z:984:PRO:O	2.31	0.44
21:aa:939:ALA:HB1	26:an:129:ARG:HD3	1.99	0.44
21:aa:1263:LYS:HE3	22:ab:630:ARG:HD2	1.99	0.44
21:aa:1621:GLU:O	21:aa:1625:THR:HG22	2.17	0.44
22:ab:35:GLU:HA	22:ab:38:SER:OG	2.16	0.44
22:ab:134:VAL:N	22:ab:135:PRO:HD2	2.33	0.44
24:ac:147:ARG:C	24:ac:149:GLU:H	2.25	0.44
24:ac:703:TRP:NE1	24:ac:707:SER:HB2	2.33	0.44
25:ad:313:HIS:HE1	41:ai:169:GLU:HG2	1.81	0.44
27:ao:132:VAL:HG11	27:ao:137:TRP:HB3	1.99	0.44
28:ap:12:TYR:CE1	28:ap:81:ARG:HD2	2.52	0.44
30:as:35:SER:HB2	40:av:177:HIS:CD2	2.53	0.44
31:at:354:ARG:O	31:at:358:THR:HG23	2.17	0.44
36:p:37:MET:HA	36:p:40:LEU:HD12	1.99	0.44
36:p:110:MET:HE2	36:p:114:ASN:ND2	2.33	0.44
38:l:78:ARG:O	38:l:81:ALA:HB3	2.17	0.44
38:l:96:LEU:HG	38:l:488:LEU:HD12	1.98	0.44
38:l:602:ARG:NE	38:l:673:ALA:HB3	2.32	0.44
40:av:123:MET:HE3	40:av:141:LYS:HA	1.98	0.44
41:ai:197:ASN:ND2	41:ai:200:SER:O	2.50	0.44
42:x:69:ALA:HB1	42:x:70:PRO:HD3	1.98	0.44
46:c:144:ASP:O	46:c:146:ALA:N	2.48	0.44
49:b:146:LYS:HA	49:b:150:ARG:HB3	1.99	0.44
50:a:33:MET:SD	50:a:296:LEU:HD21	2.57	0.44
52:z:801:GLU:OE1	52:z:824:TYR:OH	2.19	0.44
54:A:360:GLU:N	54:A:360:GLU:OE1	2.50	0.44
55:B:80:VAL:HG13	55:B:361:PHE:CE2	2.52	0.44
55:B:250:MET:HG2	55:B:279:VAL:CG2	2.48	0.44
60:G:41:LEU:HD12	60:G:42:ALA:H	1.83	0.44
60:G:146:LYS:HZ1	1:1:345:A:H1'	1.83	0.44
60:G:217:VAL:HG21	1:1:200:U:O4	2.17	0.44
62:I:90:ALA:HB3	62:I:91:PRO:HD3	2.00	0.44
63:J:52:GLN:HE22	63:J:75:VAL:HG11	1.83	0.44
68:O:23:GLN:HA	68:O:23:GLN:HE21	1.76	0.44
70:Q:215:MET:HE3	70:Q:215:MET:HB3	1.86	0.44
71:R:208:TRP:CD1	71:R:211:SER:OG	2.69	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
77:X:363:PHE:CB	77:X:364:PRO:HD3	2.48	0.44
85:An:85:LEU:HD23	85:An:85:LEU:HA	1.85	0.44
85:An:110:PHE:CZ	85:An:114:VAL:CG2	3.01	0.44
85:An:115:LEU:O	85:An:115:LEU:HD23	2.18	0.44
88:Az:51:LEU:HD23	88:Az:51:LEU:HA	1.73	0.44
91:Ab:137:LEU:HD22	91:Ab:141:GLU:HB3	2.00	0.44
92:Ai:77:GLN:NE2	92:Ai:123:VAL:HG12	2.32	0.44
92:Ai:312:LEU:HB2	92:Ai:317:VAL:CG1	2.47	0.44
93:Ap:132:VAL:HA	93:Ap:135:LEU:HB3	1.98	0.44
96:Ao:134:THR:O	96:Ao:138:ILE:HG13	2.17	0.44
97:BM:36:VAL:O	97:BM:122:LEU:HD23	2.17	0.44
98:Ar:135:LEU:HD23	98:Ar:135:LEU:HA	1.78	0.44
99:Aj:449:LEU:HA	99:Aj:449:LEU:HD23	1.78	0.44
100:BH:42:ARG:HE	100:BH:42:ARG:HB2	1.66	0.44
100:BH:215:VAL:HG11	1:1:361:A:H5'	1.98	0.44
101:Am:152:GLN:HB2	101:Am:184:ASN:ND2	2.31	0.44
106:Ad:193:MET:SD	106:Ad:193:MET:N	2.75	0.44
108:Av:82:GLU:HG2	108:Av:83:GLY:N	2.32	0.44
115:Ay:35:TRP:HB3	115:Ay:36:ILE:H	1.59	0.44
118:BL:333:ARG:O	118:BL:334:ILE:HG23	2.17	0.44
1:1:194:U:O2'	1:1:196:A:N7	2.42	0.44
1:1:288:C:H1'	1:1:289:A:H5'	1.98	0.44
1:1:543:U:H2'	1:1:598:U:OP1	2.17	0.44
1:1:688:C:H42	1:1:710:A:H62	1.65	0.44
1:1:837:U:H2'	1:1:838:A:C8	2.52	0.44
1:2:226:A:C2'	1:2:227:U:C5'	2.96	0.44
1:2:286:G:OP2	1:2:286:G:C2	2.70	0.44
1:2:391:A:OP2	1:2:391:A:C8	2.70	0.44
1:2:417:C:H3'	10:ae:128:TYR:CD2	2.52	0.44
4:m:28:TRP:HE1	52:z:403:ASP:CG	2.25	0.44
10:ae:67:TYR:CE1	10:ae:145:VAL:HG21	2.53	0.44
10:ae:390:VAL:O	10:ae:394:VAL:HG23	2.16	0.44
12:ag:298:TRP:HB2	14:e:296:ASP:OD2	2.17	0.44
12:ag:477:SER:HB2	12:ag:480:GLU:HB2	1.98	0.44
12:ag:550:ARG:HG2	38:l:345:GLU:OE2	2.17	0.44
13:aj:252:TYR:O	13:aj:255:VAL:HG12	2.17	0.44
14:e:215:TYR:O	14:e:219:VAL:HG23	2.18	0.44
14:e:621:PHE:N	14:e:624:ASP:OD2	2.34	0.44
15:d:207:VAL:HG12	15:d:310:LEU:HA	1.99	0.44
18:r:307:GLY:O	18:r:311:LEU:HG	2.16	0.44
19:af:813:ALA:O	19:af:817:GLU:HG2	2.17	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
20:u:850:MET:N	20:u:850:MET:SD	2.90	0.44
21:aa:72:ARG:NE	21:aa:73:GLN:O	2.45	0.44
21:aa:465:ARG:NH2	21:aa:523:PHE:HA	2.31	0.44
21:aa:709:LEU:HG	21:aa:711:LEU:HD12	1.99	0.44
21:aa:823:GLU:OE1	21:aa:823:GLU:N	2.51	0.44
22:ab:331:ARG:HH22	38:l:497:LYS:HZ3	1.65	0.44
22:ab:520:LEU:HD13	22:ab:538:LEU:HA	1.99	0.44
22:ab:852:ASP:CG	22:ab:933:ARG:HE	2.25	0.44
24:ac:401:TRP:NE1	24:ac:405:GLU:OE2	2.50	0.44
24:ac:418:TYR:HB3	24:ac:441:LEU:HD11	1.99	0.44
25:ad:155:PRO:HB3	25:ad:187:SER:HB3	1.99	0.44
25:ad:236:CYS:HB2	25:ad:239:LEU:HD12	1.99	0.44
25:ad:565:VAL:O	25:ad:569:LEU:HG	2.17	0.44
26:an:274:ALA:HB2	50:a:61:PHE:CE2	2.53	0.44
27:ao:73:VAL:O	27:ao:108:ALA:N	2.43	0.44
29:aq:196:TRP:HE3	29:aq:215:ARG:HE	1.65	0.44
30:as:36:HIS:HA	30:as:41:LEU:HD13	1.99	0.44
30:as:66:LEU:HB2	30:as:88:LEU:HD21	1.98	0.44
36:p:118:ILE:HD12	42:x:97:LEU:HD21	1.99	0.44
36:p:215:GLU:HB2	36:p:279:LYS:HE3	1.99	0.44
41:ai:49:VAL:O	41:ai:53:GLN:HG3	2.17	0.44
42:x:28:PRO:O	42:x:32:THR:HG22	2.17	0.44
43:i:150:PRO:HB2	49:b:156:TYR:HB3	2.00	0.44
45:o:89:ARG:NH1	45:o:91:ASP:OD1	2.41	0.44
48:q:147:HIS:CG	49:b:145:TRP:HZ3	2.36	0.44
49:b:24:GLU:HB2	85:An:150:PHE:HE2	1.81	0.44
50:a:265:PRO:O	50:a:268:THR:OG1	2.22	0.44
52:z:453:ASP:OD2	52:z:515:ALA:HB3	2.18	0.44
52:z:955:ASP:OD1	52:z:956:LYS:N	2.51	0.44
55:B:284:LEU:HD23	55:B:339:GLU:CD	2.41	0.44
55:B:350:PRO:HB3	60:G:186:THR:HG23	1.98	0.44
56:C:35:SER:HB2	88:Az:129:ASP:HB3	1.99	0.44
56:C:73:MET:O	56:C:82:ASP:HB2	2.17	0.44
56:C:149:LEU:HD11	56:C:156:TYR:CZ	2.51	0.44
58:E:86:PHE:O	58:E:90:THR:HG22	2.16	0.44
58:E:118:PRO:HG3	58:E:165:TRP:HE1	1.83	0.44
60:G:155:PRO:HD3	75:V:59:GLY:O	2.17	0.44
61:H:72:LEU:HD23	61:H:72:LEU:HA	1.79	0.44
62:I:77:LEU:HD22	62:I:93:LEU:HD21	1.99	0.44
62:I:154:ARG:O	68:O:89:HIS:NE2	2.51	0.44
63:J:21:PHE:CD2	63:J:26:ILE:HD11	2.52	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
63:J:61:ASN:C	63:J:63:GLU:H	2.24	0.44
72:S:245:THR:HB	80:BA:65:GLY:O	2.18	0.44
74:U:61:LEU:O	74:U:63:ALA:N	2.47	0.44
75:V:55:TRP:NE1	75:V:88:GLN:HE22	2.16	0.44
77:X:328:PRO:HD2	77:X:422:VAL:HG21	2.00	0.44
78:Y:147:VAL:HG11	78:Y:150:LEU:HD13	1.99	0.44
80:BA:123:ALA:HB1	80:BA:140:ALA:O	2.17	0.44
81:UA:111:UNK:O	81:UA:113:UNK:N	2.50	0.44
88:Az:150:MET:HE3	88:Az:150:MET:HB2	1.86	0.44
92:Ai:59:ALA:HB3	92:Ai:210:LEU:HD11	2.00	0.44
97:BM:140:ARG:O	97:BM:140:ARG:HD2	2.17	0.44
98:Ar:44:ARG:HH21	98:Ar:48:GLN:HE22	1.65	0.44
98:Ar:111:PHE:CE2	98:Ar:134:LYS:HG3	2.52	0.44
98:Ar:161:ASP:OD1	98:Ar:162:LEU:N	2.51	0.44
98:Ar:168:TRP:CZ3	98:Ar:190:LYS:HB2	2.52	0.44
101:Am:328:ALA:O	101:Am:330:GLU:N	2.51	0.44
104:Ak:71:ASN:O	104:Ak:75:GLN:HB2	2.16	0.44
106:Ad:70:LEU:HD23	106:Ad:70:LEU:HA	1.83	0.44
106:Ad:160:ARG:HD3	106:Ad:164:GLY:O	2.17	0.44
106:Ad:204:PHE:HB3	106:Ad:207:LYS:HG2	2.00	0.44
111:Ae:196:LEU:HD21	111:Ae:246:LEU:O	2.16	0.44
116:Ag:229:LYS:HA	116:Ag:229:LYS:HD2	1.85	0.44
117:Ax:155:ASN:CG	117:Ax:187:VAL:HG12	2.42	0.44
118:BL:135:ARG:HG2	118:BL:136:ASP:N	2.30	0.44
118:BL:188:THR:HB	118:BL:224:HIS:CE1	2.53	0.44
118:BL:192:LEU:O	118:BL:197:TYR:OH	2.24	0.44
118:BL:339:CYS:O	118:BL:341:LYS:N	2.50	0.44
1:1:654:A:H8	1:1:654:A:O5'	2.01	0.44
1:1:777:G:H8	1:1:777:G:O5'	2.00	0.44
1:1:924:U:C2	1:1:925:G:C8	3.05	0.44
1:1:1018:A:H61	1:1:1096:A:H2	1.65	0.44
1:2:13:U:H5''	50:a:261:ASN:CA	2.47	0.44
1:2:64:U:HO2'	1:2:65:U:P	2.38	0.44
1:2:90:A:H2'	1:2:91:U:C5'	2.47	0.44
1:2:146:A:C8	1:2:146:A:C4'	3.00	0.44
1:2:278:A:H2	1:2:330:U:O2	1.95	0.44
1:2:434:U:C6	10:ae:10:GLY:CA	3.00	0.44
1:2:437:U:C4	6:s:151:ARG:O	2.71	0.44
1:2:523:A:C2	5:f:24:LYS:HD2	2.50	0.44
1:2:530:A:H8	16:az:73:PRO:HG3	1.81	0.44
1:2:548:C:H5''	1:2:548:C:C6	2.48	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
4:m:53:TYR:CE2	36:p:68:GLU:HG3	2.53	0.44
8:am:26:ILE:O	8:am:46:THR:HG23	2.17	0.44
10:ae:459:ASP:OD1	10:ae:462:ALA:N	2.38	0.44
11:ay:121:LEU:O	11:ay:124:VAL:HG12	2.18	0.44
12:ag:142:GLU:OE1	24:ac:1203:GLN:HB2	2.18	0.44
12:ag:343:LEU:HD22	12:ag:353:ARG:NH2	2.33	0.44
12:ag:448:ALA:O	12:ag:450:GLU:HG3	2.17	0.44
14:e:51:PHE:O	14:e:56:ARG:NH1	2.49	0.44
14:e:313:GLY:N	20:u:630:LEU:HA	2.31	0.44
18:r:8:LEU:HD22	18:r:23:VAL:HG22	1.98	0.44
20:u:175:ILE:HB	20:u:176:PRO:HD3	1.99	0.44
21:aa:91:ILE:HA	21:aa:96:ARG:HD2	1.99	0.44
21:aa:484:ARG:HG3	21:aa:838:TRP:CZ3	2.53	0.44
21:aa:598:PHE:HE2	21:aa:760:TYR:CG	2.36	0.44
21:aa:762:GLN:NE2	21:aa:809:PRO:HG3	2.29	0.44
21:aa:766:GLN:CD	21:aa:776:SER:HB3	2.41	0.44
21:aa:781:LEU:HD13	21:aa:791:TYR:CZ	2.53	0.44
22:ab:893:GLN:H	22:ab:893:GLN:CD	2.24	0.44
24:ac:247:LYS:H	24:ac:250:ALA:HB3	1.83	0.44
25:ad:233:ASN:HD21	41:ai:156:ILE:N	2.10	0.44
25:ad:270:TRP:CE2	25:ad:271:LYS:HG2	2.52	0.44
25:ad:759:TYR:CZ	27:ao:29:ARG:HD2	2.53	0.44
26:an:142:VAL:HG23	26:an:152:ASP:OD1	2.17	0.44
27:ao:68:HIS:HB3	27:ao:113:PRO:HD3	1.99	0.44
29:aq:88:THR:HG22	29:aq:89:SER:H	1.83	0.44
42:x:190:LEU:HB3	42:x:217:LEU:HB2	1.99	0.44
42:x:216:LEU:HB3	42:x:258:VAL:HB	1.99	0.44
44:g:93:GLU:O	44:g:97:ARG:N	2.49	0.44
45:o:118:ARG:HD3	45:o:122:GLU:HG2	1.99	0.44
46:c:136:ARG:HA	52:z:228:MET:HE2	1.98	0.44
46:c:161:ASP:HB3	52:z:122:ARG:HB3	2.00	0.44
48:q:63:ARG:HG2	48:q:67:GLU:OE2	2.18	0.44
54:A:162:GLN:NE2	54:A:225:LYS:HG2	2.31	0.44
58:E:16:THR:HG22	108:Av:82:GLU:OE2	2.18	0.44
58:E:31:VAL:HG21	108:Av:94:GLN:HB2	1.99	0.44
58:E:39:PHE:O	58:E:165:TRP:HB3	2.17	0.44
59:F:49:GLY:H	59:F:124:LYS:NZ	2.15	0.44
60:G:50:ASP:HB3	109:Af:149:GLN:HB2	2.00	0.44
60:G:139:LYS:HB3	60:G:139:LYS:HE3	1.81	0.44
60:G:197:LEU:HD22	60:G:266:LEU:HD21	2.00	0.44
62:I:89:ARG:O	62:I:93:LEU:N	2.50	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
67:N:171:PRO:HG2	67:N:174:MET:HG3	1.98	0.44
68:O:216:VAL:N	68:O:229:ARG:O	2.49	0.44
70:Q:210:GLU:O	70:Q:214:LEU:HB2	2.17	0.44
71:R:261:ALA:HB1	71:R:264:LEU:HD12	1.99	0.44
72:S:273:VAL:HG13	72:S:304:VAL:HG12	1.99	0.44
74:U:31:PRO:CB	74:U:60:ARG:NH1	2.67	0.44
80:BA:24:VAL:HA	98:Ar:127:ARG:HD2	2.00	0.44
80:BA:67:LEU:HD12	80:BA:67:LEU:HA	1.86	0.44
83:Aw:23:ILE:N	83:Aw:24:PRO:HD3	2.32	0.44
85:An:78:TRP:O	85:An:82:TYR:HD2	2.00	0.44
85:An:240:GLN:HE21	88:Az:55:ASN:HB3	1.82	0.44
86:Al:143:ALA:HA	86:Al:197:PRO:HG3	2.00	0.44
93:Ap:171:THR:HA	93:Ap:173:ARG:NH2	2.33	0.44
93:Ap:218:MET:N	93:Ap:218:MET:SD	2.91	0.44
94:Au:139:ARG:HA	94:Au:142:GLU:HB3	2.00	0.44
96:Ao:82:TRP:O	96:Ao:83:THR:OG1	2.29	0.44
97:BM:140:ARG:HG3	97:BM:141:ARG:HH11	1.82	0.44
97:BM:141:ARG:HH21	97:BM:272:LYS:HE2	1.82	0.44
97:BM:221:ARG:HD2	97:BM:228:ASN:OD1	2.17	0.44
97:BM:222:MET:HG3	97:BM:224:PRO:HD3	1.99	0.44
97:BM:288:ALA:HB1	97:BM:306:LEU:HD21	2.00	0.44
98:Ar:140:LYS:NZ	105:BP:77:SER:HB2	2.32	0.44
101:Am:293:THR:HG21	111:Ae:257:GLN:CG	2.47	0.44
109:Af:65:VAL:O	109:Af:65:VAL:HG23	2.18	0.44
113:Ah:166:TRP:O	113:Ah:171:ILE:HB	2.18	0.44
113:Ah:426:LEU:HD23	113:Ah:426:LEU:HA	1.81	0.44
118:BL:360:GLN:HB2	118:BL:365:LEU:HD21	2.00	0.44
1:1:270:A:C5	1:1:306:A:N6	2.85	0.44
1:1:845:A:H2	1:1:850:U:O4	2.01	0.44
1:1:876:G:H3'	1:1:877:G:H8	1.82	0.44
1:2:306:A:H2'	1:2:306:A:O5'	2.18	0.44
1:2:525:A:N9	15:d:329:ARG:HB2	2.32	0.44
1:2:593:U:C6	1:2:593:U:OP2	2.70	0.44
1:2:614:U:C2'	1:2:615:U:C5'	2.91	0.44
2:h:109:PRO:HB2	14:e:372:ARG:NH2	2.33	0.44
6:s:17:HIS:ND1	6:s:18:PRO:HD2	2.32	0.44
7:au:54:TYR:O	7:au:58:ASN:ND2	2.50	0.44
8:am:34:GLY:O	8:am:36:PRO:HD3	2.17	0.44
8:am:200:LEU:HA	8:am:203:ALA:HB3	2.00	0.44
9:n:115:LYS:NZ	10:ae:83:ILE:HG12	2.33	0.44
10:ae:513:GLU:HG2	10:ae:514:ARG:H	1.83	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
12:ag:49:LEU:HB3	24:ac:1213:GLU:OE1	2.17	0.44
12:ag:512:THR:HA	12:ag:518:TYR:CG	2.53	0.44
13:aj:36:GLN:OE1	14:e:428:ARG:HB3	2.18	0.44
13:aj:201:TRP:CE3	13:aj:224:MET:HG2	2.52	0.44
14:e:188:LEU:HD13	19:af:267:ARG:CD	2.47	0.44
15:d:64:ILE:HD12	36:p:186:VAL:HG11	1.99	0.44
21:aa:851:LYS:HB3	52:z:998:THR:HG22	1.99	0.44
21:aa:1249:ARG:HA	21:aa:1249:ARG:HH21	1.83	0.44
21:aa:1555:THR:OG1	21:aa:1556:GLU:OE1	2.26	0.44
22:ab:102:ASP:O	22:ab:106:MET:HB2	2.18	0.44
23:ak:2:SER:HB3	23:ak:3:PHE:CD2	2.53	0.44
23:ak:169:LYS:HG3	23:ak:181:ARG:HH12	1.83	0.44
24:ac:612:GLN:H	24:ac:612:GLN:HG2	1.60	0.44
25:ad:570:VAL:HG11	25:ad:598:ALA:O	2.17	0.44
26:an:195:LEU:O	26:an:201:GLN:NE2	2.50	0.44
27:ao:46:THR:H	27:ao:153:ASP:CG	2.24	0.44
27:ao:62:ARG:HH12	45:o:392:GLN:NE2	2.15	0.44
30:as:130:CYS:HB2	30:as:139:CYS:HB3	2.00	0.44
36:p:135:LYS:HA	52:z:735:ARG:NH1	2.32	0.44
37:j:18:SER:OG	37:j:18:SER:O	2.36	0.44
38:l:587:ALA:HA	38:l:590:ARG:HB2	1.98	0.44
38:l:601:ARG:HH21	38:l:602:ARG:HH12	1.64	0.44
39:ar:52:SER:HB3	43:i:339:ARG:HE	1.83	0.44
41:ai:36:ARG:C	41:ai:53:GLN:HE22	2.26	0.44
45:o:218:TRP:CH2	51:ba:87:ILE:HD13	2.51	0.44
52:z:736:ASN:O	52:z:740:LEU:N	2.49	0.44
52:z:789:PRO:HB3	52:z:898:VAL:HA	2.00	0.44
52:z:988:THR:O	52:z:990:SER:N	2.50	0.44
54:A:312:LYS:NZ	54:A:368:ALA:HA	2.31	0.44
55:B:145:GLU:OE2	55:B:182:LYS:NZ	2.42	0.44
56:C:204:GLU:N	56:C:204:GLU:OE1	2.51	0.44
57:D:93:ARG:HG2	57:D:93:ARG:O	2.18	0.44
58:E:162:GLN:HG3	58:E:176:ARG:CZ	2.47	0.44
58:E:221:HIS:CD2	108:Av:107:GLY:H	2.34	0.44
60:G:23:PHE:HA	60:G:26:ASN:OD1	2.17	0.44
61:H:35:PRO:HB2	61:H:56:PHE:HB2	1.98	0.44
64:K:16:GLU:N	64:K:16:GLU:OE2	2.50	0.44
68:O:67:ILE:HB	1:l:134:A:C6	2.53	0.44
68:O:113:HIS:O	68:O:117:GLN:HB2	2.18	0.44
68:O:169:GLN:HG2	68:O:170:ASN:OD1	2.18	0.44
70:Q:35:ILE:HD12	114:BD:29:ILE:HD12	1.99	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
71:R:50:ILE:HG22	79:Z:153:TYR:CG	2.53	0.44
71:R:364:GLU:HA	71:R:365:PHE:C	2.42	0.44
77:X:320:VAL:HG21	77:X:400:VAL:HG11	2.00	0.44
77:X:496:TRP:CH2	106:Ad:228:VAL:HG22	2.52	0.44
79:Z:76:ARG:NH2	1:1:70:G:O5'	2.51	0.44
79:Z:76:ARG:CZ	1:1:71:A:O4'	2.65	0.44
80:BA:67:LEU:HG	80:BA:113:MET:HA	1.99	0.44
82:BB:92:ASN:OD1	82:BB:93:THR:HG23	2.18	0.44
85:An:46:GLN:HG2	85:An:49:SER:CB	2.47	0.44
85:An:78:TRP:O	85:An:82:TYR:CD2	2.71	0.44
88:Az:74:ASN:O	88:Az:90:LYS:N	2.51	0.44
89:At:142:GLU:HG2	89:At:171:VAL:HB	2.00	0.44
90:BC:119:GLN:NE2	112:Ac:104:ILE:HG13	2.26	0.44
92:Ai:160:TYR:O	92:Ai:162:GLY:N	2.50	0.44
92:Ai:445:GLY:O	92:Ai:447:MET:HG3	2.18	0.44
93:Ap:114:ASP:HB3	93:Ap:117:THR:OG1	2.18	0.44
95:Aa:188:ALA:HB1	95:Aa:192:LEU:CD1	2.47	0.44
96:Ao:87:VAL:HG23	96:Ao:88:ARG:N	2.32	0.44
97:BM:137:ARG:NE	97:BM:278:LEU:HD12	2.33	0.44
97:BM:169:ILE:HG21	97:BM:175:GLN:HE21	1.82	0.44
97:BM:210:ALA:HB2	97:BM:239:VAL:HG21	2.00	0.44
105:BP:97:ARG:HH21	105:BP:97:ARG:HB2	1.82	0.44
106:Ad:50:LEU:HD23	106:Ad:51:LYS:N	2.32	0.44
108:Av:47:ASP:O	108:Av:51:ARG:HB2	2.17	0.44
111:Ae:27:ARG:NH2	1:1:1152:U:O4'	2.46	0.44
111:Ae:264:TRP:HE3	111:Ae:265:LEU:HD23	1.81	0.44
113:Ah:306:ILE:HG12	113:Ah:462:HIS:HD2	1.83	0.44
117:Ax:93:VAL:HG12	120:BG:1299:MET:SD	2.57	0.44
118:BL:155:ILE:HB	118:BL:177:TYR:CE1	2.53	0.44
119:BO:60:LEU:HG	119:BO:133:ARG:NH1	2.33	0.44
119:BO:104:GLN:O	119:BO:105:ARG:HD3	2.18	0.44
1:1:124:A:H2'	1:1:125:A:O4'	2.18	0.44
1:1:145:A:H2'	1:1:146:U:H5''	1.98	0.44
1:1:539:U:C2	1:1:540:U:O2	2.71	0.44
1:1:645:G:N1	1:1:646:U:O2	2.51	0.44
1:2:18:A:N3	1:2:18:A:H2'	2.32	0.44
1:2:37:U:H1'	1:2:173:A:N1	2.32	0.44
1:2:146:A:H2'	1:2:147:U:O5'	2.18	0.44
1:2:303:G:C8	1:2:303:G:OP2	2.70	0.44
1:2:329:U:O2'	1:2:330:U:O5'	2.35	0.44
1:2:452:G:O4'	1:2:452:G:OP2	2.35	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
3:aw:98:ARG:O	20:u:806:LYS:NZ	2.40	0.44
6:s:130:ILE:H	6:s:130:ILE:HG13	1.65	0.44
8:am:191:THR:HA	36:p:84:THR:O	2.18	0.44
9:n:98:PHE:CE1	9:n:119:LYS:HB2	2.53	0.44
9:n:149:LEU:HD21	11:ay:45:LYS:HD2	1.99	0.44
10:ae:190:GLY:N	10:ae:191:PRO:HD2	2.32	0.44
10:ae:226:SER:OG	10:ae:227:VAL:N	2.51	0.44
12:ag:394:ARG:O	12:ag:398:GLY:N	2.41	0.44
12:ag:547:GLU:HB2	12:ag:554:ASN:ND2	2.33	0.44
16:az:112:HIS:CE1	17:ax:88:ILE:HG12	2.52	0.44
17:ax:83:GLU:HA	17:ax:86:ASN:HD22	1.82	0.44
18:r:117:ASP:HA	18:r:326:THR:OG1	2.18	0.44
21:aa:630:VAL:HB	21:aa:740:GLN:HG2	1.99	0.44
22:ab:160:PRO:HG2	22:ab:161:GLN:OE1	2.17	0.44
22:ab:325:ASN:HA	22:ab:328:HIS:CD2	2.53	0.44
22:ab:389:ILE:HG13	22:ab:390:THR:HG23	1.99	0.44
24:ac:1018:ARG:HD3	24:ac:1018:ARG:HA	1.79	0.44
25:ad:512:TYR:O	25:ad:516:SER:OG	2.25	0.44
34:v:149:ASN:OD1	34:v:150:VAL:HG23	2.18	0.44
35:t:96:THR:HG23	35:t:169:PRO:HB2	1.99	0.44
35:t:149:TYR:CZ	35:t:160:PRO:HG3	2.53	0.44
37:j:176:PRO:HA	37:j:179:ARG:HB2	1.99	0.44
39:ar:87:ARG:O	39:ar:91:LYS:N	2.34	0.44
42:x:71:LEU:HD11	42:x:245:PHE:CE1	2.52	0.44
45:o:132:ARG:CA	50:a:349:TRP:CZ3	2.99	0.44
46:c:170:PRO:HB2	46:c:172:ASP:O	2.17	0.44
54:A:48:ASP:OD1	54:A:48:ASP:N	2.50	0.44
54:A:70:ILE:HD11	54:A:77:TRP:CZ2	2.52	0.44
54:A:144:TYR:CE2	54:A:150:GLN:HB2	2.53	0.44
56:C:173:SER:HB2	56:C:176:GLU:HB2	1.99	0.44
57:D:27:ARG:NE	57:D:29:TYR:HH	2.15	0.44
57:D:121:ALA:O	57:D:125:PHE:N	2.31	0.44
58:E:72:PHE:HB3	58:E:77:LEU:HB2	2.00	0.44
59:F:16:LEU:O	59:F:54:ILE:HA	2.18	0.44
60:G:43:LYS:HD3	60:G:43:LYS:HA	1.85	0.44
60:G:110:HIS:O	60:G:112:VAL:N	2.51	0.44
60:G:128:ARG:NH2	95:Aa:18:ARG:O	2.49	0.44
60:G:167:GLU:OE2	102:Aq:303:HIS:HB2	2.18	0.44
62:I:40:THR:O	62:I:40:THR:OG1	2.29	0.44
63:J:66:PRO:HG3	119:BO:185:LEU:HD11	1.99	0.44
63:J:92:TYR:HE1	63:J:99:ASN:HB3	1.82	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
65:L:152:PHE:O	91:Ab:124:ARG:HB3	2.17	0.44
68:O:231:ILE:HG22	68:O:238:LEU:HA	2.00	0.44
69:P:129:MET:HE3	69:P:129:MET:HB2	1.81	0.44
69:P:161:ARG:CD	69:P:181:ARG:HE	2.30	0.44
71:R:208:TRP:HD1	71:R:213:THR:HG23	1.83	0.44
71:R:259:VAL:O	71:R:261:ALA:N	2.51	0.44
73:T:72:TRP:CE2	73:T:82:LYS:HB3	2.52	0.44
74:U:31:PRO:HG2	1:1:951:U:C1'	2.48	0.44
76:W:94:LYS:H	76:W:94:LYS:HD2	1.82	0.44
78:Y:40:TRP:CD1	90:BC:113:LYS:HE3	2.53	0.44
79:Z:29:PRO:CD	85:An:77:TRP:HA	2.48	0.44
79:Z:76:ARG:NH1	1:1:71:A:C4	2.86	0.44
81:UA:140:UNK:O	81:UA:144:UNK:N	2.51	0.44
88:Az:38:TYR:OH	1:1:79:A:H2	2.01	0.44
88:Az:43:LEU:HD23	88:Az:43:LEU:HA	1.88	0.44
88:Az:139:SER:O	88:Az:143:VAL:HG23	2.18	0.44
92:Ai:73:VAL:HG11	92:Ai:90:CYS:SG	2.58	0.44
98:Ar:146:ARG:HB3	105:BP:143:PRO:CB	2.47	0.44
99:Aj:296:LEU:HD13	109:Af:129:GLU:OE2	2.18	0.44
103:BE:91:ILE:H	103:BE:91:ILE:HD12	1.82	0.44
106:Ad:177:THR:OG1	1:1:374:U:O4'	2.36	0.44
116:Ag:204:THR:O	116:Ag:208:ASN:N	2.31	0.44
119:BO:73:ASN:ND2	119:BO:119:ARG:HD3	2.33	0.44
119:BO:121:LYS:HB2	119:BO:124:ASN:ND2	2.33	0.44
1:1:784:A:N1	1:1:787:G:C6	2.86	0.44
1:1:798:A:O2'	1:1:799:A:O4'	2.36	0.44
1:1:960:A:O2'	1:1:961:A:OP1	2.32	0.44
1:2:86:C:C2	47:k:152:LYS:CG	2.98	0.44
1:2:332:G:O4'	1:2:354:A:H2	1.97	0.44
1:2:412:G:C2	10:ae:54:GLY:CA	3.01	0.44
1:2:460:A:C4'	8:am:306:LEU:CB	2.90	0.44
1:2:496:U:C5'	3:aw:15:ARG:HG3	2.48	0.44
2:h:110:TYR:HB2	14:e:372:ARG:HD3	1.99	0.44
3:aw:43:TRP:HB3	18:r:339:PHE:HZ	1.83	0.44
4:m:30:GLU:N	52:z:137:THR:HG21	2.33	0.44
4:m:120:ARG:HG2	4:m:121:PRO:HA	2.00	0.44
5:f:56:ALA:HA	5:f:60:GLY:HA2	2.00	0.44
5:f:144:GLU:OE1	5:f:147:ARG:NH1	2.34	0.44
6:s:67:THR:HG21	6:s:71:MET:HE2	2.00	0.44
6:s:138:ASN:ND2	12:ag:15:TYR:OH	2.51	0.44
8:am:45:THR:H	53:bd:57:VAL:HG21	1.82	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
8:am:120:SER:O	8:am:120:SER:OG	2.35	0.44
8:am:215:ARG:HD3	15:d:178:PHE:CE2	2.52	0.44
9:n:150:ILE:HB	9:n:169:LEU:HD21	2.00	0.44
10:ae:514:ARG:HD3	10:ae:540:GLU:OE2	2.17	0.44
12:ag:165:GLU:CD	12:ag:168:ARG:HH12	2.25	0.44
12:ag:469:ASP:OD1	12:ag:469:ASP:N	2.50	0.44
14:e:187:ARG:NH1	19:af:198:ARG:HH11	2.16	0.44
14:e:312:GLY:N	20:u:630:LEU:C	2.65	0.44
14:e:797:HIS:CD2	14:e:799:GLU:H	2.36	0.44
15:d:104:THR:OG1	42:x:107:ASN:HB2	2.18	0.44
16:az:16:SER:OG	17:ax:57:ARG:HD2	2.17	0.44
16:az:42:LYS:HE2	16:az:52:GLN:HE21	1.82	0.44
19:af:180:TRP:HB3	19:af:223:GLU:OE2	2.17	0.44
19:af:396:PRO:HD2	19:af:410:PHE:CD1	2.52	0.44
19:af:830:LEU:HA	19:af:833:GLN:HB2	1.99	0.44
20:u:139:ASP:CG	20:u:140:GLN:HE21	2.25	0.44
20:u:409:TYR:HA	20:u:412:SER:HB3	2.00	0.44
21:aa:455:GLN:N	21:aa:455:GLN:OE1	2.51	0.44
21:aa:548:ILE:HG13	21:aa:549:ALA:N	2.32	0.44
21:aa:606:LYS:N	21:aa:607:PRO:HD2	2.33	0.44
21:aa:662:LEU:HD12	21:aa:727:THR:HA	2.00	0.44
21:aa:1111:LEU:HA	21:aa:1114:ARG:HD2	1.99	0.44
22:ab:351:GLN:N	22:ab:363:ARG:HH12	2.13	0.44
22:ab:760:PHE:N	22:ab:763:GLN:O	2.50	0.44
24:ac:105:ASP:O	24:ac:109:THR:HG22	2.17	0.44
24:ac:950:GLU:HA	24:ac:953:MET:SD	2.58	0.44
24:ac:1076:GLY:N	24:ac:1106:CYS:O	2.42	0.44
28:ap:7:ALA:HB2	28:ap:59:TYR:CG	2.53	0.44
29:aq:125:PRO:HD3	33:w:181:LEU:HD22	1.99	0.44
32:y:49:THR:HG21	32:y:80:ASN:HB3	1.99	0.44
33:w:171:PRO:O	33:w:175:VAL:HG23	2.18	0.44
34:v:94:ARG:NH2	34:v:128:VAL:HG21	2.33	0.44
37:j:124:LEU:O	48:q:61:TYR:OH	2.26	0.44
38:l:108:ARG:HE	38:l:340:ASN:HD22	1.65	0.44
38:l:315:TYR:HD1	38:l:315:TYR:HA	1.60	0.44
39:ar:80:LEU:HD12	39:ar:81:PRO:HD2	1.99	0.44
43:i:115:GLN:HG2	43:i:118:MET:HE2	2.00	0.44
46:c:247:ILE:HB	46:c:311:HIS:CE1	2.52	0.44
52:z:738:GLU:HA	52:z:741:VAL:HG23	2.00	0.44
52:z:798:LEU:HD12	52:z:824:TYR:CG	2.53	0.44
55:B:383:ALA:HB1	71:R:222:TYR:CZ	2.53	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
55:B:384:ARG:CZ	89:At:108:MET:HE1	2.48	0.44
56:C:18:HIS:HB3	56:C:27:PRO:HD2	1.98	0.44
60:G:120:ILE:HG21	66:M:19:GLN:HE21	1.82	0.44
62:I:85:VAL:HG22	62:I:89:ARG:HB2	2.00	0.44
62:I:238:ARG:NH1	68:O:88:ARG:HB2	2.33	0.44
66:M:94:GLU:OE2	99:Aj:465:ARG:NE	2.51	0.44
67:N:118:GLU:OE1	67:N:139:PRO:HG3	2.18	0.44
68:O:26:MET:O	68:O:27:TYR:C	2.60	0.44
68:O:112:SER:O	68:O:116:ILE:HG12	2.18	0.44
68:O:156:ILE:HG23	68:O:166:ILE:HG23	2.00	0.44
69:P:94:ILE:HD11	69:P:152:VAL:HG11	1.99	0.44
77:X:58:PRO:HB3	116:Ag:208:ASN:HD21	1.82	0.44
77:X:192:PRO:HA	77:X:193:PRO:HD3	1.87	0.44
77:X:275:LEU:HD13	106:Ad:34:MET:H	1.82	0.44
77:X:345:THR:HG23	77:X:403:ALA:O	2.18	0.44
77:X:354:MET:O	77:X:355:THR:HB	2.16	0.44
79:Z:34:ARG:HG3	85:An:48:HIS:HB3	2.00	0.44
80:BA:130:LEU:O	80:BA:133:TRP:N	2.50	0.44
85:An:108:ASP:O	85:An:109:GLU:HB3	2.18	0.44
86:Al:43:THR:N	115:Ay:83:ASN:HD22	2.16	0.44
91:Ab:204:GLN:HB3	91:Ab:210:GLY:CA	2.48	0.44
94:Au:60:ASP:C	94:Au:62:ARG:H	2.25	0.44
96:Ao:275:ALA:HB1	96:Ao:279:HIS:H	1.83	0.44
97:BM:244:LEU:HD11	97:BM:348:ARG:HH11	1.83	0.44
97:BM:246:ARG:NE	97:BM:267:GLY:O	2.50	0.44
98:Ar:28:ILE:HD11	98:Ar:55:ASN:ND2	2.33	0.44
99:Aj:395:ASP:OD1	99:Aj:396:LYS:N	2.51	0.44
99:Aj:460:GLN:O	99:Aj:465:ARG:NH2	2.51	0.44
103:BE:56:HIS:CE1	103:BE:59:GLU:HB3	2.53	0.44
104:Ak:227:PRO:HB2	104:Ak:228:ILE:O	2.18	0.44
108:Av:140:VAL:HG23	1:1:454:A:OP2	2.18	0.44
116:Ag:101:ARG:HA	116:Ag:121:TYR:CD2	2.53	0.44
116:Ag:195:TYR:CE2	116:Ag:199:LYS:HD2	2.52	0.44
117:Ax:136:TYR:CD1	117:Ax:136:TYR:N	2.65	0.44
118:BL:129:LEU:N	118:BL:129:LEU:CD1	2.81	0.44
119:BO:40:LYS:HA	119:BO:40:LYS:HD2	1.40	0.44
1:1:169:U:O4	1:1:170:A:N6	2.51	0.44
1:1:355:U:C2	1:1:356:A:C8	3.06	0.44
1:1:629:A:C8	1:1:631:C:N4	2.86	0.44
1:1:640:A:C2	1:1:799:A:C2	3.06	0.44
1:1:703:U:HO2'	1:1:704:U:P	2.40	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:933:G:H2'	1:1:934:G:N7	2.33	0.44
1:1:1033:U:H2'	1:1:1034:C:C6	2.53	0.44
1:2:400:U:H6	1:2:400:U:H2'	1.65	0.44
1:2:434:U:H5	10:ae:11:ARG:O	1.93	0.44
1:2:474:U:C5	1:2:475:U:C4	3.06	0.44
1:2:518:A:H2'	1:2:519:U:O4'	2.18	0.44
1:2:560:U:C6	1:2:560:U:C5'	2.85	0.44
2:h:16:ASP:OD1	2:h:16:ASP:N	2.50	0.44
3:aw:17:ILE:O	3:aw:20:ILE:HD11	2.18	0.44
5:f:136:ASN:ND2	5:f:143:GLN:HB2	2.32	0.44
10:ae:417:THR:H	12:ag:120:ILE:HD11	1.82	0.44
12:ag:21:ASN:HD21	13:aj:10:LEU:N	2.15	0.44
12:ag:84:SER:HA	12:ag:88:ARG:NE	2.29	0.44
12:ag:434:LEU:HD12	12:ag:438:PHE:CE2	2.53	0.44
14:e:572:GLN:HB3	14:e:684:ALA:HA	1.99	0.44
15:d:167:LEU:O	15:d:171:SER:N	2.38	0.44
15:d:173:ASP:HB3	15:d:175:TYR:CE2	2.53	0.44
18:r:341:ASP:OD1	18:r:343:GLU:HB2	2.17	0.44
19:af:390:ALA:HB2	19:af:454:GLY:HA3	2.00	0.44
20:u:142:PRO:O	20:u:145:PRO:HD2	2.18	0.44
20:u:379:ARG:HH21	20:u:566:SER:HA	1.82	0.44
20:u:690:MET:HE2	20:u:690:MET:HB3	1.71	0.44
21:aa:122:ARG:HB2	46:c:260:GLU:OE1	2.18	0.44
21:aa:193:HIS:CD2	48:q:68:SER:HA	2.53	0.44
21:aa:268:LEU:HB3	21:aa:369:PHE:CD2	2.53	0.44
21:aa:938:GLN:OE1	21:aa:941:ARG:HD2	2.17	0.44
21:aa:1041:ASP:HB2	50:a:53:LEU:HD21	1.99	0.44
22:ab:194:ALA:HA	22:ab:199:SER:HB3	1.99	0.44
22:ab:233:GLU:HA	22:ab:236:ASP:OD2	2.18	0.44
22:ab:1120:HIS:HD2	22:ab:1165:TYR:HE2	1.66	0.44
23:ak:5:TYR:OH	24:ac:1175:GLU:OE1	2.30	0.44
23:ak:129:LYS:O	23:ak:132:THR:OG1	2.36	0.44
24:ac:135:VAL:HG11	24:ac:794:LEU:HD23	1.99	0.44
24:ac:306:LEU:HD11	24:ac:573:MET:HB3	2.00	0.44
24:ac:313:VAL:HG21	24:ac:477:HIS:CD2	2.53	0.44
24:ac:368:ALA:O	24:ac:372:GLU:HG2	2.17	0.44
24:ac:1053:PHE:HB3	24:ac:1166:MET:SD	2.58	0.44
25:ad:228:ALA:HB3	25:ad:301:VAL:HG11	2.00	0.44
25:ad:240:ARG:HB2	41:ai:150:GLU:OE2	2.18	0.44
25:ad:502:ALA:HB3	25:ad:503:PRO:HD3	1.99	0.44
25:ad:537:GLU:N	30:as:215:TRP:CZ2	2.80	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
27:ao:116:LEU:N	27:ao:125:VAL:O	2.50	0.44
28:ap:204:LEU:HA	28:ap:204:LEU:HD23	1.65	0.44
29:aq:171:LEU:HB2	29:aq:190:LEU:HD23	1.99	0.44
35:t:22:LEU:HD21	37:j:110:ARG:HD2	1.99	0.44
35:t:82:VAL:O	35:t:86:ALA:N	2.42	0.44
37:j:40:LYS:HA	37:j:71:HIS:NE2	2.32	0.44
37:j:185:VAL:HG13	37:j:187:PRO:HD2	2.00	0.44
38:l:250:ALA:O	38:l:254:LEU:N	2.40	0.44
39:ar:205:LEU:HD23	39:ar:205:LEU:H	1.83	0.44
41:ai:219:ASN:O	41:ai:222:ASN:ND2	2.51	0.44
42:x:30:GLY:HA2	42:x:33:ARG:HH12	1.83	0.44
42:x:52:LYS:HA	42:x:52:LYS:HD3	1.81	0.44
42:x:69:ALA:HB3	42:x:141:PRO:O	2.17	0.44
46:c:224:ARG:NH2	52:z:231:ALA:O	2.51	0.44
47:k:140:VAL:HG21	47:k:172:ARG:HG3	2.00	0.44
48:q:144:TYR:HA	49:b:145:TRP:CH2	2.52	0.44
54:A:41:LEU:HD21	101:Am:41:PHE:CZ	2.53	0.44
54:A:384:ARG:HD3	119:BO:140:MET:SD	2.57	0.44
55:B:283:LEU:HB2	55:B:340:MET:HE3	2.00	0.44
57:D:131:MET:HE2	57:D:132:MET:HE2	2.00	0.44
60:G:21:VAL:O	60:G:21:VAL:HG23	2.18	0.44
60:G:139:LYS:HB2	67:N:52:LEU:HD11	1.99	0.44
60:G:373:ARG:HG3	102:Aq:280:LEU:O	2.18	0.44
62:I:11:ARG:NH1	62:I:11:ARG:O	2.51	0.44
66:M:210:ASP:O	66:M:225:THR:OG1	2.26	0.44
71:R:35:PRO:HG2	71:R:38:SER:HB2	2.00	0.44
71:R:185:LYS:HE3	71:R:185:LYS:HB3	1.65	0.44
72:S:285:MET:HE2	1:1:491:U:C5	2.52	0.44
74:U:45:ALA:O	74:U:47:THR:HG22	2.18	0.44
77:X:363:PHE:CD1	77:X:387:PRO:HD3	2.52	0.44
78:Y:54:VAL:CG1	84:Bj:55:MET:HE1	2.48	0.44
78:Y:102:GLU:OE1	112:Ac:233:PHE:HE1	2.01	0.44
78:Y:267:SER:O	78:Y:267:SER:OG	2.36	0.44
78:Y:286:TYR:CD2	92:Ai:161:PRO:HA	2.43	0.44
83:Aw:123:ARG:NH1	106:Ad:123:SER:HB3	2.32	0.44
85:An:66:LEU:O	85:An:67:THR:OG1	2.29	0.44
91:Ab:67:LYS:HB2	91:Ab:91:ASN:ND2	2.33	0.44
96:Ao:169:ASP:OD1	96:Ao:173:ARG:HG3	2.17	0.44
97:BM:246:ARG:HG2	97:BM:266:TRP:CE3	2.53	0.44
101:Am:22:ARG:NH1	1:1:1026:U:OP1	2.51	0.44
102:Aq:300:ARG:HH12	102:Aq:307:MET:HG3	1.83	0.44

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
104:Ak:25:ALA:O	104:Ak:64:GLN:HA	2.18	0.44
104:Ak:48:MET:HE3	104:Ak:49:LEU:HD12	2.00	0.44
104:Ak:88:ASP:OD1	112:Ac:262:HIS:ND1	2.50	0.44
113:Ah:284:ASP:OD1	113:Ah:284:ASP:N	2.47	0.44
113:Ah:303:LEU:HD13	113:Ah:331:VAL:HA	1.99	0.44
113:Ah:348:PRO:HG2	113:Ah:351:ARG:HB2	2.00	0.44
1:1:320:G:H4'	1:1:321:U:O5'	2.18	0.44
1:1:433:G:O6	1:1:452:A:N6	2.46	0.44
1:1:588:A:H2'	1:1:589:A:C8	2.53	0.44
1:1:835:A:HO2'	1:1:836:U:P	2.40	0.44
1:1:1036:U:C4	1:1:1057:A:C5	3.06	0.44
1:2:13:U:H2'	1:2:14:A:C8	2.53	0.43
1:2:133:G:O2'	1:2:135:U:OP2	2.35	0.43
1:2:186:U:O2	1:2:187:U:C2	2.70	0.43
1:2:202:A:OP2	1:2:203:U:C6	2.70	0.43
1:2:271:U:H5'	1:2:271:U:C6	2.53	0.43
1:2:292:A:O2'	1:2:293:U:C6	2.70	0.43
1:2:344:C:O5'	1:2:344:C:C6	2.70	0.43
1:2:353:U:O2'	1:2:354:A:P	2.74	0.43
1:2:385:U:H5'	50:a:156:PRO:CA	2.43	0.43
1:2:415:A:H2	10:ae:38:GLY:HA2	1.76	0.43
1:2:425:A:C8	1:2:425:A:P	3.11	0.43
1:2:514:U:O2	16:az:17:VAL:CG2	2.65	0.43
1:2:524:C:C5	15:d:332:PRO:CG	2.91	0.43
4:m:287:THR:HB	17:ax:134:ASN:OD1	2.18	0.43
5:f:190:LEU:HD11	5:f:195:PHE:CZ	2.53	0.43
9:n:37:PHE:HD2	9:n:41:LEU:HD11	1.82	0.43
10:ae:111:ALA:HB2	22:ab:1091:GLU:OE1	2.18	0.43
10:ae:313:TYR:OH	10:ae:348:ASP:HB3	2.17	0.43
14:e:211:THR:HG23	14:e:212:GLU:N	2.33	0.43
15:d:220:ALA:HB3	15:d:298:ALA:HB2	1.99	0.43
15:d:305:ASN:O	15:d:309:LYS:HG2	2.18	0.43
18:r:60:GLU:HB3	18:r:179:THR:HB	2.00	0.43
19:af:527:TRP:CH2	19:af:615:LEU:HB3	2.53	0.43
20:u:45:HIS:HB3	20:u:92:PRO:HG3	1.99	0.43
20:u:725:CYS:SG	20:u:762:LEU:HD23	2.58	0.43
21:aa:1382:LEU:HD13	21:aa:1622:TYR:CD1	2.52	0.43
21:aa:1543:MET:HG3	21:aa:1546:ARG:HD2	1.98	0.43
23:ak:232:ILE:HD12	23:ak:260:VAL:HG22	1.99	0.43
24:ac:311:ILE:O	24:ac:314:HIS:ND1	2.50	0.43
24:ac:748:GLU:N	24:ac:748:GLU:OE1	2.51	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:113:TYR:CD1	25:ad:710:PRO:HG3	2.53	0.43
25:ad:240:ARG:HH21	25:ad:241:PHE:H	1.65	0.43
29:aq:12:LEU:HD12	33:w:140:ARG:HD2	2.00	0.43
29:aq:126:LEU:HD22	33:w:170:MET:HG3	2.00	0.43
29:aq:138:CYS:O	29:aq:143:TYR:N	2.51	0.43
30:as:26:TYR:CE2	30:as:28:LYS:HB2	2.52	0.43
30:as:157:LEU:HD11	30:as:169:PHE:CE2	2.53	0.43
31:at:341:ILE:HD13	33:w:42:PRO:HG3	1.99	0.43
35:t:110:HIS:HB2	35:t:183:PHE:CE1	2.53	0.43
37:j:156:ASP:OD1	37:j:157:GLN:N	2.51	0.43
38:l:277:THR:OG1	38:l:278:ALA:N	2.51	0.43
40:av:40:THR:O	40:av:43:GLN:NE2	2.51	0.43
41:ai:19:GLU:HG3	41:ai:128:ARG:NH2	2.32	0.43
43:i:156:TRP:HZ2	43:i:177:MET:HG2	1.83	0.43
43:i:258:LYS:O	43:i:262:THR:OG1	2.26	0.43
52:z:897:THR:HB	52:z:900:GLU:HG3	2.00	0.43
54:A:70:ILE:HA	54:A:83:GLN:NE2	2.33	0.43
54:A:338:THR:HA	111:Ae:32:ARG:HH12	1.82	0.43
55:B:248:LEU:HD12	55:B:248:LEU:HA	1.85	0.43
55:B:410:ALA:HB2	55:B:423:ARG:NH1	2.32	0.43
58:E:252:ASN:HB3	91:Ab:242:ARG:HD2	1.99	0.43
59:F:16:LEU:HD21	59:F:26:VAL:HG13	1.98	0.43
60:G:17:VAL:O	60:G:20:THR:HG22	2.18	0.43
60:G:142:TRP:O	60:G:145:ARG:NH2	2.50	0.43
60:G:257:MET:SD	60:G:262:LEU:HA	2.57	0.43
62:I:44:LEU:HD22	62:I:99:HIS:HB3	2.00	0.43
65:L:133:LYS:N	65:L:149:ASN:HD21	2.15	0.43
69:P:141:ASP:OD1	69:P:148:TRP:NE1	2.50	0.43
70:Q:137:ASP:HB2	70:Q:160:LEU:HD21	2.00	0.43
70:Q:215:MET:O	70:Q:218:ARG:HB3	2.18	0.43
72:S:277:LEU:HD11	72:S:307:VAL:HG11	2.00	0.43
78:Y:96:MET:HB3	90:BC:22:HIS:CD2	2.53	0.43
82:BB:35:GLU:O	82:BB:39:SER:OG	2.25	0.43
82:BB:61:TYR:CD2	111:Ae:109:ARG:HG3	2.53	0.43
82:BB:81:VAL:HG21	111:Ae:107:LEU:HD13	1.99	0.43
85:An:126:LEU:HG	85:An:187:PHE:CZ	2.53	0.43
85:An:167:PHE:CE2	85:An:174:LEU:HD21	2.52	0.43
94:Au:62:ARG:HD2	118:BL:97:MET:SD	2.57	0.43
97:BM:119:THR:O	97:BM:120:PRO:C	2.61	0.43
97:BM:276:HIS:HA	97:BM:279:TYR:CE2	2.53	0.43
99:Aj:368:GLU:HG2	99:Aj:390:ARG:NH1	2.33	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
102:Aq:341:PHE:C	1:1:98:G:C5	2.96	0.43
110:As:65:GLU:OE2	110:As:65:GLU:N	2.47	0.43
115:Ay:149:ARG:HB2	115:Ay:150:PRO:HD3	2.00	0.43
117:Ax:56:ARG:O	117:Ax:57:THR:HB	2.18	0.43
117:Ax:143:PHE:O	117:Ax:143:PHE:HD1	2.01	0.43
1:1:496:U:C5	1:1:497:A:C4	3.06	0.43
1:1:983:U:H3'	1:1:984:A:C5'	2.46	0.43
1:1:1114:A:O2'	1:1:1115:U:H5'	2.19	0.43
1:2:36:G:O3'	33:w:126:TRP:CH2	2.66	0.43
1:2:48:U:H6	1:2:48:U:C4'	2.31	0.43
1:2:68:A:O5'	37:j:22:TRP:CE2	2.65	0.43
1:2:106:U:C2	1:2:110:A:H2	2.36	0.43
1:2:195:A:O2'	1:2:196:A:OP1	2.31	0.43
1:2:239:C:C2'	1:2:240:G:H5'	2.47	0.43
1:2:292:A:H5''	1:2:292:A:H8	1.81	0.43
1:2:327:U:H6	1:2:327:U:P	2.41	0.43
1:2:361:U:C3'	1:2:362:A:H5'	2.48	0.43
1:2:419:A:N9	10:ae:181:ARG:HB3	2.33	0.43
1:2:421:A:O3'	10:ae:298:TYR:CE1	2.64	0.43
1:2:423:C:OP1	1:2:423:C:C6	2.71	0.43
1:2:450:A:C5'	14:e:391:SER:CB	2.96	0.43
1:2:457:U:O2	1:2:457:U:O4'	2.37	0.43
1:2:485:A:H2'	9:n:57:ILE:O	2.18	0.43
1:2:522:A:C4'	15:d:343:LYS:O	2.64	0.43
1:2:589:G:N2	1:2:604:U:N3	2.60	0.43
3:aw:81:THR:HG22	20:u:758:GLY:HA2	1.99	0.43
7:au:18:MET:HA	7:au:31:ASN:HD21	1.83	0.43
7:au:105:ARG:O	7:au:105:ARG:NH1	2.42	0.43
7:au:240:GLN:NE2	7:au:247:GLN:HE22	2.17	0.43
9:n:129:SER:O	9:n:129:SER:OG	2.30	0.43
10:ae:382:ASN:HD22	10:ae:452:ARG:HH12	1.66	0.43
10:ae:442:ILE:HD13	10:ae:479:LEU:HB2	1.99	0.43
12:ag:156:ASP:HA	23:ak:131:GLU:HG3	2.01	0.43
12:ag:381:TRP:HE1	20:u:707:GLN:NE2	2.15	0.43
12:ag:442:HIS:HB3	12:ag:444:TRP:CZ2	2.54	0.43
15:d:323:LEU:H	15:d:323:LEU:HD12	1.82	0.43
18:r:254:VAL:HG21	18:r:260:PHE:CE2	2.53	0.43
19:af:213:THR:O	19:af:217:MET:HG3	2.18	0.43
20:u:133:LEU:HD21	20:u:278:VAL:HB	1.98	0.43
23:ak:41:THR:OG1	23:ak:50:GLY:N	2.51	0.43
23:ak:266:LEU:HD22	24:ac:105:ASP:CG	2.43	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
24:ac:132:ASN:ND2	24:ac:1164:GLN:OE1	2.49	0.43
24:ac:656:GLN:HA	24:ac:659:LEU:HB2	1.99	0.43
25:ad:270:TRP:CH2	25:ad:271:LYS:HD3	2.53	0.43
25:ad:419:PRO:HA	25:ad:420:ALA:HA	1.70	0.43
26:an:46:PHE:HE1	52:z:972:PRO:HD3	1.83	0.43
28:ap:114:MET:HE1	52:z:581:LEU:HG	1.99	0.43
32:y:124:PRO:HG2	32:y:278:GLU:HG3	2.00	0.43
32:y:307:VAL:HG23	32:y:311:ARG:NH1	2.33	0.43
38:l:122:ARG:O	38:l:126:VAL:HG23	2.17	0.43
38:l:135:ASP:OD1	38:l:136:ARG:N	2.47	0.43
39:ar:41:ILE:HD12	40:av:108:VAL:HG13	2.00	0.43
41:ai:12:LYS:HE2	41:ai:175:GLU:HB3	2.01	0.43
41:ai:185:PRO:HG2	41:ai:186:GLN:HG3	1.99	0.43
41:ai:231:LEU:HD13	41:ai:237:LYS:HZ3	1.82	0.43
41:ai:260:PRO:HA	41:ai:274:ILE:HG12	2.00	0.43
43:i:275:TRP:HD1	43:i:278:ILE:HD11	1.82	0.43
45:o:127:TYR:HE2	50:a:349:TRP:HB3	1.82	0.43
50:a:336:PRO:O	50:a:340:LYS:HB2	2.18	0.43
52:z:138:MET:HE2	52:z:140:SER:O	2.18	0.43
52:z:554:ASN:OD1	52:z:772:HIS:HB3	2.18	0.43
52:z:664:THR:O	52:z:664:THR:OG1	2.35	0.43
52:z:876:PHE:CD1	52:z:889:LEU:HD21	2.53	0.43
56:C:144:ALA:HA	56:C:148:LEU:HB2	1.99	0.43
56:C:177:GLU:HG2	114:BD:58:VAL:N	2.27	0.43
58:E:226:GLU:CD	58:E:317:LYS:HB2	2.43	0.43
62:I:173:ASN:HB2	62:I:174:HIS:HD2	1.82	0.43
69:P:53:PHE:CB	69:P:60:ARG:HE	2.29	0.43
69:P:112:ARG:NE	96:Ao:113:TRP:HH2	2.16	0.43
71:R:140:THR:HA	71:R:335:THR:HA	2.00	0.43
72:S:266:PRO:HG3	72:S:283:GLU:O	2.17	0.43
72:S:340:THR:HB	109:Af:155:ILE:HD12	2.00	0.43
74:U:17:ARG:O	74:U:18:LEU:HB3	2.18	0.43
75:V:22:ARG:NH2	1:1:314:A:H4'	2.28	0.43
76:W:89:CYS:SG	76:W:92:HIS:O	2.76	0.43
79:Z:42:ASN:OD1	79:Z:42:ASN:N	2.49	0.43
84:Bj:68:LEU:HB2	102:Aq:11:LEU:HB3	2.00	0.43
86:Al:118:ILE:HB	86:Al:158:ILE:HG12	2.00	0.43
86:Al:154:TYR:CD2	86:Al:211:LEU:HD22	2.53	0.43
86:Al:194:PRO:HB3	97:BM:259:LYS:HG3	1.99	0.43
88:Az:143:VAL:HG21	89:At:61:ARG:HB2	2.00	0.43
92:Ai:233:MET:SD	116:Ag:169:ARG:NH1	2.91	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
92:Ai:236:LYS:HA	92:Ai:440:TYR:HD2	1.84	0.43
92:Ai:321:VAL:HG12	92:Ai:349:VAL:HB	1.99	0.43
92:Ai:331:LEU:HD23	92:Ai:331:LEU:HA	1.77	0.43
94:Au:28:ARG:CB	94:Au:31:SER:HB3	2.48	0.43
95:Aa:149:ASP:HB3	95:Aa:151:THR:HG23	2.00	0.43
99:Aj:332:LEU:HA	99:Aj:332:LEU:HD23	1.72	0.43
102:Aq:24:GLU:H	102:Aq:24:GLU:CD	2.26	0.43
102:Aq:339:ARG:CG	102:Aq:339:ARG:NH1	2.50	0.43
104:Ak:22:HIS:N	104:Ak:98:SER:OG	2.51	0.43
107:BF:16:TRP:CD1	107:BF:16:TRP:H	2.34	0.43
111:Ae:22:GLN:O	111:Ae:30:ARG:NH1	2.51	0.43
113:Ah:444:THR:HG22	113:Ah:445:ASP:OD1	2.18	0.43
115:Ay:121:LYS:HD2	115:Ay:136:TYR:CZ	2.53	0.43
116:Ag:49:ARG:HD2	1:1:82:U:OP2	2.18	0.43
118:BL:259:LEU:HD21	118:BL:267:PHE:CE1	2.53	0.43
119:BO:36:ILE:HD11	119:BO:38:ARG:NH1	2.32	0.43
1:1:107:U:H5'	1:1:108:U:H5'	2.00	0.43
1:1:109:U:O2'	1:1:110:U:OP2	2.36	0.43
1:1:164:U:OP2	1:1:166:U:N3	2.51	0.43
1:1:567:A:O2'	1:1:568:A:P	2.76	0.43
1:1:826:A:N6	1:1:827:A:N1	2.66	0.43
1:1:861:A:N7	1:1:1108:A:C2	2.74	0.43
1:1:913:A:H5'	1:1:914:U:OP2	2.18	0.43
1:2:172:A:H62	37:j:17:LYS:CB	1.99	0.43
1:2:289:A:H1'	1:2:311:A:H5''	1.99	0.43
1:2:315:A:C2'	1:2:316:A:H8	2.27	0.43
1:2:414:C:H5'	10:ae:158:LEU:HD13	1.99	0.43
1:2:440:C:O2	2:h:12:HIS:CG	2.70	0.43
3:aw:58:TRP:HZ3	3:aw:60:VAL:HG23	1.84	0.43
6:s:122:ILE:O	12:ag:9:ARG:NH1	2.51	0.43
7:au:87:ARG:HB2	7:au:93:MET:HE2	1.99	0.43
8:am:194:ALA:HB3	8:am:196:ARG:HH22	1.82	0.43
8:am:196:ARG:HB3	8:am:200:LEU:HD13	1.99	0.43
8:am:217:MET:HE3	15:d:132:ALA:HB3	2.00	0.43
9:n:115:LYS:HZ3	10:ae:83:ILE:HG12	1.83	0.43
14:e:452:GLU:CD	14:e:670:ARG:HE	2.26	0.43
15:d:274:ARG:HD2	15:d:274:ARG:HA	1.82	0.43
19:af:214:PHE:HA	19:af:217:MET:SD	2.58	0.43
20:u:680:GLU:CD	20:u:681:PRO:HD2	2.43	0.43
20:u:845:LEU:HD22	78:Y:145:LEU:CD2	2.48	0.43
21:aa:287:PRO:HB2	21:aa:290:LEU:HD13	1.99	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
21:aa:387:TYR:HE2	21:aa:395:LYS:HB3	1.82	0.43
21:aa:595:TYR:OH	21:aa:817:ARG:NH2	2.48	0.43
21:aa:1215:ASN:O	21:aa:1219:GLU:HG2	2.18	0.43
21:aa:1246:ILE:HB	22:ab:597:GLN:HE22	1.83	0.43
22:ab:241:GLN:O	22:ab:453:HIS:NE2	2.51	0.43
22:ab:255:ARG:HH11	22:ab:816:ILE:HD11	1.84	0.43
23:ak:269:GLN:OE1	24:ac:1182:ARG:HD3	2.17	0.43
25:ad:578:ASN:OD1	25:ad:578:ASN:N	2.50	0.43
25:ad:581:PHE:CE2	25:ad:586:LEU:HD12	2.53	0.43
26:an:91:VAL:HG12	52:z:935:LEU:HD21	1.99	0.43
26:an:151:ARG:C	26:an:153:GLN:H	2.26	0.43
27:ao:27:ASN:HD22	45:o:391:GLU:HG3	1.82	0.43
28:ap:172:PHE:CE1	28:ap:178:GLU:HG3	2.53	0.43
29:aq:163:ARG:HH21	33:w:180:ARG:CZ	2.31	0.43
29:aq:206:TYR:CD2	29:aq:215:ARG:HG3	2.54	0.43
30:as:39:THR:HG21	30:as:109:THR:HG22	1.99	0.43
30:as:201:LEU:HD13	30:as:204:PHE:HE2	1.83	0.43
30:as:243:TYR:CG	48:q:18:LEU:HD13	2.54	0.43
30:as:245:MET:HG2	30:as:269:TRP:CH2	2.53	0.43
30:as:255:PRO:HA	30:as:265:MET:SD	2.58	0.43
31:at:263:TYR:HB3	31:at:269:ARG:O	2.18	0.43
31:at:269:ARG:HG2	31:at:270:GLU:N	2.33	0.43
31:at:343:GLU:OE1	31:at:343:GLU:N	2.36	0.43
33:w:164:TYR:HA	33:w:167:ILE:HG12	2.00	0.43
34:v:94:ARG:NE	34:v:124:CYS:HB3	2.33	0.43
38:l:117:ILE:HD13	38:l:336:PHE:HB2	1.99	0.43
38:l:344:SER:HB2	38:l:474:TYR:CG	2.52	0.43
40:av:47:GLY:HA2	40:av:81:HIS:NE2	2.33	0.43
43:i:111:GLN:HG2	43:i:281:HIS:O	2.18	0.43
43:i:352:ASN:O	43:i:356:GLN:HG3	2.18	0.43
48:q:177:LEU:HD23	48:q:177:LEU:HA	1.82	0.43
49:b:111:ALA:O	49:b:113:ALA:N	2.51	0.43
52:z:197:ASP:OD1	52:z:197:ASP:N	2.51	0.43
54:A:235:GLN:HG2	54:A:236:GLU:H	1.83	0.43
54:A:235:GLN:HG2	54:A:236:GLU:N	2.33	0.43
55:B:117:GLU:H	55:B:202:MET:HE2	1.83	0.43
57:D:88:ARG:HE	58:E:240:GLU:CD	2.27	0.43
58:E:179:ARG:HD3	1:1:432:U:O4'	2.19	0.43
60:G:374:LEU:HD21	92:Ai:455:GLY:HA2	2.01	0.43
61:H:72:LEU:HB3	61:H:77:ARG:NH2	2.30	0.43
62:I:103:LEU:HD13	62:I:115:LEU:HB2	2.01	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
63:J:50:LYS:C	63:J:52:GLN:H	2.27	0.43
64:K:73:HIS:HE1	91:Ab:118:TRP:CD1	2.36	0.43
64:K:101:GLN:NE2	95:Aa:156:SER:OG	2.51	0.43
68:O:159:VAL:N	71:R:439:SER:OG	2.41	0.43
68:O:202:HIS:O	68:O:211:CYS:N	2.36	0.43
71:R:203:GLU:HG3	71:R:314:ALA:HB2	1.99	0.43
71:R:261:ALA:O	71:R:264:LEU:HB2	2.19	0.43
72:S:351:HIS:O	72:S:354:SER:N	2.50	0.43
77:X:267:ASP:OD1	77:X:336:ARG:NH2	2.51	0.43
77:X:334:THR:HB	77:X:415:THR:HB	2.00	0.43
77:X:484:ARG:HD2	77:X:511:TYR:HE1	1.83	0.43
80:BA:116:VAL:HG13	80:BA:143:VAL:HA	2.01	0.43
85:An:55:TYR:HB3	85:An:57:GLU:OE2	2.19	0.43
90:BC:91:ARG:HD2	90:BC:91:ARG:N	2.33	0.43
97:BM:200:GLY:C	97:BM:239:VAL:HG11	2.43	0.43
110:As:45:GLY:O	110:As:48:THR:OG1	2.30	0.43
110:As:60:TRP:CZ3	110:As:127:HIS:HA	2.53	0.43
113:Ah:78:ARG:CD	1:1:667:A:H61	2.32	0.43
117:Ax:90:THR:HB	117:Ax:200:PHE:CD1	2.53	0.43
1:1:105:A:O3'	1:1:106:A:H4'	2.17	0.43
1:1:163:U:N3	1:1:1013:U:H5'	2.34	0.43
1:1:383:A:H2'	1:1:384:A:O4'	2.18	0.43
1:1:509:U:C2	1:1:513:U:H1'	2.53	0.43
1:1:510:U:H5	1:1:513:U:H4'	1.84	0.43
1:1:682:A:C6	1:1:683:U:C4	3.06	0.43
1:1:910:U:HO2'	1:1:911:A:P	2.41	0.43
1:1:975:U:C2	1:1:976:A:H2	2.36	0.43
1:1:991:G:N2	1:1:992:G:C4	2.86	0.43
1:1:1045:U:OP2	1:1:1070:C:H4'	2.18	0.43
1:2:33:A:N6	1:2:169:U:C1'	2.81	0.43
1:2:37:U:H2'	1:2:38:U:O5'	2.17	0.43
1:2:46:U:P	29:aq:21:LEU:HA	2.58	0.43
1:2:176:U:H4'	48:q:10:ARG:O	2.19	0.43
1:2:281:A:C2	1:2:282:A:N7	2.87	0.43
1:2:335:U:C6	1:2:335:U:C3'	3.00	0.43
1:2:419:A:OP2	1:2:419:A:O4'	2.36	0.43
1:2:438:G:C5	1:2:439:A:N7	2.86	0.43
1:2:497:A:C5	3:aw:17:ILE:HG23	2.48	0.43
1:2:525:A:C2'	15:d:330:ARG:CA	2.96	0.43
1:2:605:A:OP1	44:g:83:ASN:CA	2.67	0.43
1:2:617:U:H3	4:m:208:HIS:HE1	1.57	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
2:h:102:LEU:HD23	2:h:103:GLY:N	2.32	0.43
2:h:106:GLU:O	2:h:115:SER:N	2.52	0.43
4:m:14:TYR:CD2	52:z:889:LEU:HD22	2.54	0.43
5:f:10:ARG:CG	15:d:348:PHE:HB3	2.49	0.43
10:ae:108:LEU:HD23	10:ae:108:LEU:HA	1.83	0.43
10:ae:199:VAL:O	10:ae:203:GLN:HG3	2.19	0.43
11:ay:146:PRO:O	11:ay:149:THR:OG1	2.23	0.43
13:aj:186:LEU:HD11	13:aj:219:LEU:HD11	1.99	0.43
14:e:755:THR:HG22	14:e:757:TYR:H	1.82	0.43
15:d:9:ALA:HB2	36:p:107:SER:OG	2.18	0.43
17:ax:53:GLU:OE1	17:ax:57:ARG:N	2.50	0.43
17:ax:57:ARG:HD3	17:ax:57:ARG:HA	1.73	0.43
17:ax:115:LEU:HD23	17:ax:115:LEU:HA	1.86	0.43
18:r:13:VAL:HG11	18:r:24:LYS:HZ2	1.84	0.43
18:r:81:ARG:HH22	18:r:123:GLY:HA3	1.83	0.43
20:u:285:SER:HA	20:u:342:ARG:HD2	2.00	0.43
20:u:324:THR:HG22	20:u:325:ALA:N	2.33	0.43
21:aa:961:LEU:HD23	21:aa:968:TRP:CZ2	2.54	0.43
21:aa:1071:LYS:HG3	21:aa:1120:TYR:OH	2.19	0.43
21:aa:1234:ALA:O	22:ab:565:THR:HG23	2.18	0.43
23:ak:170:ASN:OD1	23:ak:181:ARG:NH1	2.51	0.43
23:ak:184:VAL:HG13	23:ak:220:LEU:HD23	2.00	0.43
24:ac:427:THR:HG23	24:ac:430:TRP:CE3	2.53	0.43
24:ac:527:HIS:HD2	24:ac:529:ASN:HB3	1.83	0.43
24:ac:540:PHE:CE1	24:ac:571:ALA:HA	2.53	0.43
24:ac:562:ALA:HB3	24:ac:566:VAL:HG21	2.01	0.43
25:ad:560:GLU:O	25:ad:564:GLN:HG2	2.17	0.43
25:ad:604:ARG:NH1	25:ad:641:ASP:OD2	2.50	0.43
27:ao:132:VAL:HG21	27:ao:137:TRP:H	1.84	0.43
29:aq:29:TRP:CZ3	29:aq:30:LYS:HG2	2.53	0.43
29:aq:89:SER:HA	29:aq:92:LYS:NZ	2.34	0.43
30:as:100:PHE:CE1	30:as:132:SER:HB2	2.54	0.43
32:y:123:LEU:HD12	32:y:127:LEU:HD23	2.00	0.43
40:av:161:HIS:NE2	40:av:163:TYR:HB2	2.33	0.43
41:ai:87:SER:OG	41:ai:91:LYS:HE2	2.18	0.43
42:x:36:ARG:O	42:x:40:MET:HG2	2.17	0.43
42:x:81:TYR:HA	42:x:136:TYR:OH	2.19	0.43
45:o:408:MET:O	45:o:410:PRO:HD3	2.18	0.43
46:c:98:GLN:HG2	46:c:103:GLU:OE2	2.18	0.43
49:b:86:HIS:CD2	49:b:88:ASP:HB2	2.54	0.43
50:a:272:VAL:O	50:a:276:VAL:HG23	2.18	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
50:a:373:ARG:HB3	50:a:377:GLU:OE2	2.19	0.43
52:z:139:ARG:H	52:z:139:ARG:HG3	1.64	0.43
52:z:272:LEU:O	52:z:276:VAL:HG12	2.18	0.43
52:z:306:ASP:OD2	52:z:309:CYS:HB2	2.18	0.43
52:z:720:VAL:HG22	52:z:766:VAL:HG22	2.00	0.43
55:B:15:ARG:NH2	1:1:516:A:OP2	2.43	0.43
55:B:33:HIS:HB2	99:Aj:441:VAL:HG22	2.00	0.43
56:C:162:TYR:HD1	56:C:167:LEU:HB2	1.83	0.43
58:E:156:GLU:OE2	108:Av:105:TYR:OH	2.34	0.43
65:L:99:PRO:HG2	95:Aa:31:VAL:HG12	2.00	0.43
70:Q:169:LYS:O	70:Q:172:VAL:HG22	2.19	0.43
70:Q:173:LEU:HD23	70:Q:173:LEU:HA	1.79	0.43
71:R:280:LEU:HD23	71:R:281:GLU:HG3	2.00	0.43
71:R:290:VAL:HG21	83:Aw:59:PRO:HG3	1.99	0.43
77:X:278:ARG:HG2	77:X:279:HIS:NE2	2.32	0.43
79:Z:43:ILE:O	79:Z:44:LEU:CB	2.64	0.43
81:UA:81:UNK:CB	117:Ax:129:ARG:CG	2.96	0.43
85:An:46:GLN:CB	116:Ag:14:PRO:HD3	2.45	0.43
86:Al:179:PRO:HG2	86:Al:195:VAL:HB	1.99	0.43
86:Al:255:THR:H	86:Al:258:GLU:CD	2.26	0.43
89:At:14:LYS:HE3	1:1:110:U:OP2	2.19	0.43
91:Ab:7:LEU:HG	91:Ab:42:GLN:HE21	1.84	0.43
92:Ai:268:MET:HE1	92:Ai:295:ILE:HG13	1.99	0.43
93:Ap:39:ASN:OD1	93:Ap:39:ASN:N	2.51	0.43
93:Ap:124:LEU:HD13	93:Ap:132:VAL:HG21	1.99	0.43
95:Aa:78:PHE:CZ	105:BP:-8:ARG:HD2	2.53	0.43
96:Ao:85:ASP:OD2	96:Ao:90:HIS:N	2.48	0.43
97:BM:119:THR:HG23	97:BM:122:LEU:HB2	1.99	0.43
98:Ar:69:CYS:SG	98:Ar:79:ARG:HD3	2.59	0.43
99:Aj:122:ASN:ND2	99:Aj:356:TYR:OH	2.51	0.43
102:Aq:165:ARG:HD2	102:Aq:165:ARG:HA	1.80	0.43
102:Aq:338:HIS:HA	102:Aq:341:PHE:HB3	1.99	0.43
104:Ak:26:ARG:HB3	104:Ak:65:VAL:CG1	2.49	0.43
105:BP:158:PRO:HB3	105:BP:160:TRP:CZ2	2.52	0.43
106:Ad:58:SER:HA	106:Ad:139:VAL:HG22	1.99	0.43
113:Ah:185:CYS:O	113:Ah:197:VAL:HG23	2.18	0.43
118:BL:213:SER:OG	118:BL:216:GLU:OE2	2.35	0.43
119:BO:47:TRP:HB2	1:1:814:A:C2	2.53	0.43
1:1:228:G:N2	1:1:304:G:H2'	2.32	0.43
1:1:574:A:O2'	1:1:575:G:C8	2.69	0.43
1:1:772:U:C5	1:1:773:A:C6	3.06	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:881:G:C8	1:1:987:A:C2	3.06	0.43
1:1:1110:G:H3'	1:1:1111:C:H5'	2.01	0.43
1:2:46:U:H2'	29:aq:11:SER:HG	1.83	0.43
1:2:147:U:C6	1:2:147:U:C3'	3.01	0.43
1:2:413:U:H4'	1:2:414:C:OP2	2.14	0.43
1:2:452:G:O4'	1:2:452:G:P	2.77	0.43
1:2:533:U:H4'	5:f:17:ARG:HH22	1.83	0.43
1:2:608:U:C6	1:2:608:U:C3'	3.01	0.43
2:h:73:CYS:O	2:h:77:ASN:N	2.50	0.43
4:m:31:TYR:HB2	52:z:506:TRP:NE1	2.33	0.43
4:m:32:ILE:HD11	8:am:187:ARG:HE	1.82	0.43
7:au:134:VAL:HG12	7:au:158:HIS:O	2.19	0.43
10:ae:302:VAL:HG22	13:aj:61:LYS:HA	2.00	0.43
11:ay:93:ASP:OD2	18:r:228:ILE:HD11	2.18	0.43
12:ag:337:LYS:O	12:ag:340:PRO:HD2	2.19	0.43
13:aj:27:GLN:H	53:bd:74:ASN:ND2	2.12	0.43
13:aj:167:LEU:HD12	13:aj:167:LEU:HA	1.86	0.43
14:e:206:PRO:HB3	15:d:277:ASP:OD1	2.17	0.43
14:e:311:PHE:CE2	20:u:654:ARG:HB2	2.52	0.43
15:d:64:ILE:O	15:d:68:LEU:HG	2.19	0.43
16:az:63:LYS:HD2	18:r:434:TRP:O	2.18	0.43
16:az:107:HIS:HB3	16:az:111:ARG:HE	1.83	0.43
18:r:279:THR:OG1	18:r:280:LEU:N	2.50	0.43
20:u:46:GLY:HA3	20:u:50:VAL:HB	2.00	0.43
20:u:571:GLU:OE2	20:u:571:GLU:N	2.47	0.43
21:aa:812:TRP:CD1	21:aa:813:ARG:HG2	2.54	0.43
22:ab:66:ARG:NH2	22:ab:72:GLY:O	2.41	0.43
22:ab:400:ARG:O	22:ab:435:THR:OG1	2.36	0.43
22:ab:656:VAL:CG1	38:l:675:PRO:HB3	2.48	0.43
22:ab:732:LYS:HD3	22:ab:732:LYS:HA	1.81	0.43
23:ak:177:MET:HE2	23:ak:177:MET:HB3	1.86	0.43
24:ac:795:TYR:O	24:ac:799:THR:HG22	2.19	0.43
24:ac:930:ASP:O	24:ac:933:SER:N	2.52	0.43
24:ac:1176:PHE:O	24:ac:1181:GLY:HA2	2.19	0.43
25:ad:229:VAL:HG21	41:ai:165:LEU:HD13	2.01	0.43
25:ad:400:VAL:HG21	25:ad:434:PHE:HE2	1.83	0.43
25:ad:680:TRP:HE1	45:o:472:ARG:HB3	1.80	0.43
26:an:51:VAL:O	26:an:63:MET:HA	2.19	0.43
31:at:268:LEU:HD22	31:at:271:GLN:OE1	2.19	0.43
32:y:307:VAL:HG23	32:y:311:ARG:HH11	1.83	0.43
33:w:106:ALA:HA	33:w:109:LEU:HB2	2.00	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
38:l:594:GLU:OE1	38:l:596:HIS:NE2	2.51	0.43
39:ar:33:GLY:HA2	39:ar:37:GLU:CD	2.43	0.43
40:av:91:ARG:HA	40:av:108:VAL:HA	2.00	0.43
41:ai:123:GLU:OE1	52:z:343:HIS:NE2	2.51	0.43
41:ai:137:CYS:HA	41:ai:140:TYR:HB3	2.00	0.43
42:x:71:LEU:HG	42:x:72:MET:HE2	2.01	0.43
47:k:114:MET:HG3	47:k:123:ARG:HH21	1.83	0.43
48:q:160:ILE:HG23	48:q:164:LEU:HD13	2.01	0.43
50:a:40:ARG:HG2	50:a:93:TYR:CE2	2.54	0.43
50:a:300:ILE:HD11	50:a:303:TYR:HD2	1.83	0.43
50:a:340:LYS:HG2	50:a:353:PHE:CE1	2.53	0.43
50:a:376:LEU:HA	50:a:376:LEU:HD13	1.86	0.43
52:z:370:ALA:HA	52:z:377:LEU:HD23	2.00	0.43
52:z:452:GLY:O	52:z:456:ARG:HD3	2.18	0.43
54:A:392:LEU:HD13	63:J:64:TYR:CE2	2.53	0.43
55:B:82:THR:O	55:B:87:LYS:NZ	2.43	0.43
56:C:136:THR:HG21	56:C:172:HIS:CE1	2.54	0.43
57:D:19:SER:OG	57:D:22:LEU:HD12	2.18	0.43
58:E:206:THR:O	58:E:210:TYR:N	2.50	0.43
58:E:264:LEU:HD13	58:E:297:TRP:CE2	2.53	0.43
60:G:227:PRO:HD3	106:Ad:138:ALA:HB2	2.00	0.43
61:H:75:MET:HE2	61:H:75:MET:HB3	1.91	0.43
63:J:67:ARG:CZ	63:J:67:ARG:CB	2.94	0.43
63:J:133:ASP:O	63:J:137:LEU:HD23	2.19	0.43
64:K:66:VAL:O	64:K:70:ALA:N	2.44	0.43
64:K:140:ASP:HB2	64:K:143:VAL:HG22	1.99	0.43
64:K:186:TYR:HB3	99:Aj:268:ASN:ND2	2.34	0.43
65:L:89:MET:HG3	65:L:113:ALA:HB3	1.99	0.43
66:M:15:ALA:O	66:M:35:GLU:HB2	2.19	0.43
69:P:61:GLN:NE2	69:P:65:ARG:HD3	2.33	0.43
70:Q:108:ILE:HG21	1:1:905:A:N7	2.34	0.43
72:S:272:GLU:HG2	96:Ao:49:PRO:HB3	2.00	0.43
74:U:25:PHE:O	74:U:25:PHE:CG	2.65	0.43
75:V:25:VAL:HG22	75:V:26:LEU:N	2.29	0.43
76:W:60:HIS:HE1	76:W:94:LYS:HB3	1.83	0.43
82:BB:46:VAL:HG22	82:BB:47:ALA:H	1.83	0.43
82:BB:100:GLU:O	82:BB:104:LYS:HB2	2.18	0.43
84:Bj:165:ILE:HG13	112:Ac:35:PRO:HG3	1.98	0.43
85:An:19:ARG:HA	94:Au:11:ARG:HH22	1.84	0.43
85:An:61:PRO:HD2	94:Au:89:PHE:CE1	2.54	0.43
85:An:133:VAL:O	85:An:136:ALA:HB3	2.18	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
90:BC:136:GLU:OE2	90:BC:139:PRO:HA	2.18	0.43
91:Ab:248:GLU:CD	91:Ab:248:GLU:H	2.27	0.43
92:Ai:23:TYR:CD2	92:Ai:247:VAL:HG11	2.54	0.43
93:Ap:63:LEU:O	93:Ap:66:VAL:HB	2.18	0.43
97:BM:221:ARG:HD2	97:BM:228:ASN:CG	2.43	0.43
98:Ar:18:GLU:O	98:Ar:43:LYS:HD3	2.18	0.43
99:Aj:308:THR:HG21	99:Aj:374:TYR:CE1	2.53	0.43
99:Aj:347:LYS:NZ	99:Aj:407:ARG:O	2.50	0.43
100:BH:74:LEU:HD23	100:BH:106:VAL:HG12	2.01	0.43
101:Am:328:ALA:N	101:Am:329:PRO:HD2	2.32	0.43
104:Ak:113:TYR:N	104:Ak:114:PRO:HD3	2.33	0.43
104:Ak:262:ASP:O	104:Ak:266:ASP:N	2.41	0.43
105:BP:140:THR:O	105:BP:140:THR:HG23	2.18	0.43
106:Ad:29:PRO:C	106:Ad:31:LEU:N	2.75	0.43
106:Ad:156:PHE:HE2	106:Ad:199:GLU:OE2	2.02	0.43
107:BF:22:HIS:C	107:BF:24:LEU:H	2.27	0.43
107:BF:53:LEU:HD12	107:BF:57:TYR:CE2	2.53	0.43
109:Af:99:LEU:HB3	109:Af:100:GLN:HE21	1.82	0.43
110:As:46:ILE:HG13	110:As:81:CYS:SG	2.58	0.43
112:Ac:172:ILE:HG21	112:Ac:264:LEU:HD21	2.00	0.43
112:Ac:245:GLN:O	112:Ac:248:SER:OG	2.35	0.43
116:Ag:175:VAL:O	116:Ag:179:LEU:HB2	2.18	0.43
117:Ax:59:HIS:CD2	1:1:624:A:H4'	2.54	0.43
1:1:217:A:H62	1:1:323:A:N6	2.08	0.43
1:1:434:U:O4'	1:1:443:G:H1'	2.18	0.43
1:1:699:A:O2'	1:1:700:U:O4'	2.32	0.43
1:1:711:A:H5''	1:1:712:U:C5	2.54	0.43
1:1:837:U:H2'	1:1:838:A:O4'	2.19	0.43
1:1:876:G:N1	1:1:991:G:N2	2.67	0.43
1:1:1068:A:H2'	1:1:1096:A:N6	2.32	0.43
1:1:1080:A:H8	1:1:1088:G:C2	2.36	0.43
1:1:1122:A:O2'	1:1:1123:U:OP2	2.31	0.43
1:2:2:U:C5'	25:ad:706:GLN:HB2	2.48	0.43
1:2:3:C:O2	1:2:3:C:C2'	2.66	0.43
1:2:108:A:H8	39:ar:22:ASN:CG	2.15	0.43
1:2:124:A:H2'	1:2:125:U:O5'	2.19	0.43
1:2:167:U:C2'	1:2:167:U:O2	2.67	0.43
1:2:169:U:O2'	37:j:17:LYS:NZ	2.50	0.43
1:2:332:G:N1	44:g:83:ASN:ND2	2.44	0.43
1:2:348:U:O3'	1:2:349:G:O4'	2.37	0.43
1:2:437:U:C5	6:s:151:ARG:CA	2.86	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:525:A:OP1	8:am:307:TYR:CD2	2.68	0.43
1:2:557:C:N3	1:2:569:G:N2	2.62	0.43
1:2:590:U:O2	1:2:603:A:C2	2.70	0.43
3:aw:122:TYR:HD1	20:u:814:SER:HB3	1.84	0.43
4:m:73:TYR:H	4:m:107:PRO:HD3	1.84	0.43
6:s:112:MET:HG2	20:u:706:TRP:CZ3	2.54	0.43
7:au:155:TYR:HB2	22:ab:376:ASP:OD1	2.18	0.43
7:au:175:GLN:OE1	7:au:178:ILE:HA	2.18	0.43
7:au:224:PRO:HB3	13:aj:301:TRP:CH2	2.53	0.43
8:am:39:PHE:O	8:am:43:SER:N	2.33	0.43
8:am:146:LEU:HB2	50:a:53:LEU:HD11	1.99	0.43
8:am:222:GLU:CG	8:am:226:ARG:HE	2.30	0.43
11:ay:153:GLU:OE2	16:az:142:HIS:HB3	2.19	0.43
13:aj:125:PHE:HB2	13:aj:165:ALA:HB1	2.00	0.43
14:e:116:HIS:O	14:e:119:LYS:N	2.51	0.43
18:r:399:MET:HE3	18:r:399:MET:HB2	1.77	0.43
19:af:456:LEU:HD13	19:af:505:TRP:HB2	2.01	0.43
21:aa:214:MET:O	21:aa:217:ARG:HG2	2.18	0.43
21:aa:840:SER:OG	21:aa:845:LYS:HB3	2.18	0.43
23:ak:119:TRP:HA	23:ak:122:ILE:HG22	2.00	0.43
23:ak:297:LYS:HB2	23:ak:300:VAL:CG1	2.49	0.43
24:ac:268:ARG:NH2	24:ac:270:THR:HG22	2.33	0.43
24:ac:438:GLN:NE2	24:ac:442:GLU:HB2	2.33	0.43
25:ad:394:LYS:HG3	25:ad:461:THR:OG1	2.18	0.43
25:ad:447:GLU:O	25:ad:491:LEU:HD22	2.19	0.43
25:ad:538:THR:O	25:ad:542:LEU:N	2.39	0.43
25:ad:657:VAL:O	25:ad:661:ARG:N	2.30	0.43
29:aq:32:TYR:HA	29:aq:35:ILE:HD11	2.00	0.43
30:as:26:TYR:HE2	30:as:28:LYS:HB2	1.84	0.43
30:as:32:GLU:HG2	30:as:181:ALA:H	1.82	0.43
30:as:160:VAL:HG11	30:as:169:PHE:CD1	2.53	0.43
35:t:193:ILE:HA	35:t:197:VAL:HB	2.00	0.43
39:ar:258:ARG:NH1	39:ar:260:ASP:OD2	2.51	0.43
45:o:425:GLN:HG3	45:o:482:LEU:HD13	2.01	0.43
49:b:124:GLU:OE2	49:b:128:ASN:HB2	2.18	0.43
50:a:176:ALA:HB3	50:a:245:PHE:HD1	1.84	0.43
52:z:827:ARG:NE	52:z:918:ASP:OD1	2.49	0.43
52:z:915:PHE:HB3	52:z:921:VAL:HG23	2.01	0.43
54:A:42:MET:HE2	82:BB:67:TRP:HB3	2.01	0.43
55:B:152:LYS:HE2	55:B:165:GLY:HA3	2.00	0.43
55:B:246:GLY:HA3	55:B:275:ARG:HG2	2.01	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
58:E:138:PRO:HG2	58:E:141:LEU:HD13	2.00	0.43
60:G:142:TRP:HB2	102:Aq:340:TYR:CD1	2.52	0.43
61:H:77:ARG:HA	61:H:77:ARG:HD3	1.61	0.43
66:M:99:LEU:HD21	66:M:108:GLN:HG2	2.00	0.43
67:N:95:TYR:CZ	67:N:97:GLY:HA3	2.53	0.43
68:O:280:ARG:HH21	71:R:102:ASP:CG	2.26	0.43
69:P:40:VAL:HG11	69:P:46:LEU:HD21	2.00	0.43
69:P:139:GLU:O	69:P:143:VAL:HG23	2.19	0.43
70:Q:29:GLY:HA2	102:Aq:306:LEU:HG	2.00	0.43
71:R:19:GLY:O	71:R:23:ASN:ND2	2.52	0.43
71:R:373:ALA:HB1	71:R:379:TYR:CE1	2.54	0.43
75:V:132:ARG:HD3	1:1:103:U:C5	2.54	0.43
82:BB:66:TRP:NE1	82:BB:76:HIS:HD1	2.17	0.43
82:BB:112:LEU:HB3	82:BB:113:PRO:HD2	2.01	0.43
85:An:264:HIS:CE1	113:Ah:68:ILE:HB	2.54	0.43
87:BI:261:VAL:HG23	87:BI:262:GLU:H	1.84	0.43
91:Ab:170:ILE:HG21	91:Ab:228:HIS:CE1	2.52	0.43
101:Am:273:ARG:O	101:Am:277:MET:HE3	2.19	0.43
102:Aq:222:ARG:O	102:Aq:226:ARG:N	2.52	0.43
103:BE:78:PRO:O	103:BE:79:VAL:C	2.62	0.43
104:Ak:180:SER:O	104:Ak:184:ASP:HB2	2.18	0.43
105:BP:70:PRO:HD2	105:BP:85:PHE:CZ	2.54	0.43
106:Ad:189:ILE:HG12	106:Ad:190:GLU:N	2.34	0.43
111:Ae:33:PRO:O	111:Ae:34:HIS:CD2	2.71	0.43
113:Ah:169:ILE:HG13	113:Ah:206:LEU:HD21	2.00	0.43
113:Ah:306:ILE:CG1	113:Ah:462:HIS:HD2	2.30	0.43
115:Ay:56:GLN:NE2	1:1:695:A:O2'	2.52	0.43
118:BL:84:GLN:HG3	118:BL:291:LYS:HD2	1.99	0.43
118:BL:310:ARG:NH1	1:1:297:U:H3	2.01	0.43
119:BO:65:LYS:HB3	119:BO:78:ARG:HG3	2.00	0.43
120:BG:1341:VAL:HG23	120:BG:1342:CYS:N	2.30	0.43
1:1:37:A:H3'	1:1:38:A:C8	2.53	0.43
1:1:46:U:H2'	1:1:47:A:N7	2.33	0.43
1:1:190:A:H61	1:1:207:G:H2'	1.77	0.43
1:1:390:A:H2	1:1:391:A:C4	2.36	0.43
1:1:949:U:N3	1:1:950:A:N7	2.67	0.43
1:1:1079:A:N6	1:1:1080:A:N7	2.66	0.43
1:2:53:U:C3'	1:2:53:U:C6	3.02	0.43
1:2:213:U:H3'	1:2:214:A:H8	1.83	0.43
1:2:247:U:C6	1:2:247:U:C4'	3.02	0.43
1:2:436:U:H1'	6:s:154:VAL:N	2.33	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:484:A:C6	9:n:102:ARG:HD2	2.54	0.43
1:2:602:U:H2'	1:2:603:A:H5'	2.01	0.43
1:2:617:U:O4	4:m:208:HIS:CE1	2.72	0.43
3:aw:5:ASN:ND2	16:az:12:TYR:HA	2.34	0.43
4:m:53:TYR:HE2	36:p:68:GLU:HG3	1.84	0.43
4:m:286:PRO:O	17:ax:140:MET:HB2	2.18	0.43
8:am:288:TRP:NE1	53:bd:65:ILE:HD11	2.33	0.43
9:n:101:LYS:HD3	9:n:143:THR:HG21	1.99	0.43
10:ae:302:VAL:O	13:aj:62:TYR:N	2.51	0.43
14:e:327:ARG:HH22	20:u:130:TRP:HB2	1.83	0.43
14:e:779:GLU:O	14:e:782:THR:OG1	2.34	0.43
16:az:116:LEU:HD13	17:ax:72:TRP:CZ2	2.54	0.43
17:ax:162:GLU:HG2	17:ax:163:HIS:CD2	2.54	0.43
19:af:450:LEU:HB3	19:af:457:TYR:CE1	2.52	0.43
20:u:110:LEU:HD23	20:u:110:LEU:HA	1.91	0.43
21:aa:1409:GLU:HB3	21:aa:1608:VAL:HA	2.00	0.43
22:ab:488:LEU:HG	22:ab:497:GLU:OE1	2.18	0.43
22:ab:534:ARG:O	22:ab:538:LEU:N	2.45	0.43
23:ak:169:LYS:O	23:ak:181:ARG:NH2	2.52	0.43
23:ak:179:ALA:HB2	23:ak:219:VAL:HG21	2.00	0.43
24:ac:178:HIS:CD2	38:l:77:VAL:HG23	2.54	0.43
24:ac:205:SER:HA	24:ac:208:TYR:CD2	2.54	0.43
24:ac:528:PHE:CZ	24:ac:575:TYR:HD2	2.37	0.43
24:ac:675:LEU:HD13	24:ac:679:ALA:HB3	1.99	0.43
24:ac:862:TYR:CD2	24:ac:892:VAL:HB	2.53	0.43
24:ac:1018:ARG:O	24:ac:1022:ARG:HB2	2.19	0.43
25:ad:180:ALA:HB1	25:ad:196:VAL:HG21	2.01	0.43
25:ad:259:LEU:O	43:i:325:ASN:ND2	2.52	0.43
27:ao:156:GLU:HG3	27:ao:157:GLN:HG3	2.01	0.43
27:ao:163:GLU:HB2	27:ao:170:LEU:HD12	2.00	0.43
29:aq:23:LEU:HD22	29:aq:26:ALA:HB2	1.99	0.43
30:as:270:PHE:CE2	48:q:38:TRP:HB2	2.54	0.43
33:w:56:GLU:HB2	33:w:74:LYS:NZ	2.32	0.43
36:p:190:LEU:HD13	36:p:190:LEU:HA	1.91	0.43
36:p:262:PRO:O	36:p:264:ILE:HD12	2.19	0.43
38:l:139:LYS:HG2	38:l:141:GLU:HB2	1.99	0.43
38:l:319:GLU:HG3	38:l:322:TRP:CZ2	2.53	0.43
38:l:632:SER:OG	38:l:637:ARG:HG2	2.19	0.43
40:av:175:LEU:C	40:av:177:HIS:H	2.26	0.43
42:x:29:TYR:O	42:x:33:ARG:NH2	2.51	0.43
43:i:168:GLU:HG2	43:i:169:GLN:HG2	2.01	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
43:i:187:LYS:HE3	43:i:193:MET:HE3	2.01	0.43
45:o:164:GLY:N	45:o:172:CYS:O	2.43	0.43
45:o:293:TYR:HB2	45:o:300:VAL:HG13	2.00	0.43
46:c:163:VAL:HG22	52:z:150:PRO:HB2	2.00	0.43
55:B:119:GLU:OE1	106:Ad:213:SER:OG	2.32	0.43
56:C:79:GLY:O	56:C:95:LYS:NZ	2.52	0.43
56:C:185:TYR:O	56:C:188:LEU:N	2.51	0.43
58:E:22:GLY:N	108:Av:103:TRP:O	2.51	0.43
58:E:261:ASP:OD1	58:E:261:ASP:N	2.52	0.43
58:E:298:PHE:CD2	58:E:301:MET:HE2	2.54	0.43
61:H:58:MET:HE2	61:H:58:MET:HB3	1.92	0.43
65:L:89:MET:HB3	91:Ab:95:HIS:O	2.18	0.43
65:L:145:ASP:OD1	65:L:145:ASP:N	2.51	0.43
68:O:178:ILE:HG12	71:R:435:LEU:HD21	2.01	0.43
69:P:53:PHE:O	69:P:54:GLY:C	2.61	0.43
75:V:122:SER:O	75:V:122:SER:OG	2.27	0.43
78:Y:287:GLU:HB3	92:Ai:163:GLN:NE2	2.34	0.43
79:Z:105:LEU:O	79:Z:107:PHE:N	2.52	0.43
80:BA:91:HIS:CD2	80:BA:93:HIS:H	2.37	0.43
83:Aw:12:HIS:C	83:Aw:14:VAL:H	2.26	0.43
84:Bj:108:ASP:CG	84:Bj:109:ARG:H	2.27	0.43
84:Bj:123:ILE:HG23	84:Bj:125:LYS:H	1.84	0.43
85:An:58:ARG:HG3	118:BL:108:LYS:NZ	2.34	0.43
87:BI:83:PHE:HB2	87:BI:95:ARG:HG3	2.01	0.43
92:Ai:14:PRO:HB3	102:Aq:225:ASP:HB3	2.00	0.43
92:Ai:452:ASP:OD1	92:Ai:456:PHE:N	2.51	0.43
95:Aa:135:MET:O	95:Aa:138:TYR:HB3	2.19	0.43
97:BM:210:ALA:HB3	97:BM:236:LEU:HA	2.00	0.43
97:BM:364:GLN:O	97:BM:367:VAL:HG12	2.18	0.43
108:Av:31:LYS:O	108:Av:85:SER:OG	2.37	0.43
110:As:57:ARG:NE	110:As:130:THR:OG1	2.41	0.43
111:Ae:202:ASP:OD1	111:Ae:203:PHE:N	2.52	0.43
114:BD:50:ARG:HG3	114:BD:57:MET:HE3	2.00	0.43
116:Ag:36:ASN:O	116:Ag:44:GLY:HA3	2.19	0.43
116:Ag:230:ASP:OD1	116:Ag:230:ASP:N	2.48	0.43
117:Ax:122:TRP:CD1	117:Ax:122:TRP:C	2.97	0.43
117:Ax:134:GLN:OE1	117:Ax:135:GLY:N	2.52	0.43
119:BO:51:THR:HG22	119:BO:144:GLN:NE2	2.34	0.43
119:BO:87:ARG:HG3	119:BO:133:ARG:NH1	2.33	0.43
1:1:170:A:O2'	1:1:172:A:OP2	2.31	0.43
1:1:855:A:H8	1:1:855:A:O5'	2.02	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:886:A:C2	1:1:980:A:C4	3.07	0.43
1:2:41:U:P	35:t:50:VAL:HG13	2.59	0.43
1:2:248:C:H2'	1:2:249:U:O4'	2.18	0.43
1:2:302:A:C3'	1:2:303:G:C8	3.02	0.43
1:2:391:A:C2	34:v:140:SER:CB	3.02	0.43
1:2:397:U:H2'	1:2:398:A:C8	2.54	0.43
1:2:409:U:H6	9:n:56:HIS:HE1	1.58	0.43
1:2:416:A:H2'	1:2:417:C:C6	2.54	0.43
1:2:417:C:H3'	10:ae:128:TYR:CE2	2.53	0.43
1:2:432:G:N2	10:ae:22:LEU:O	2.52	0.43
1:2:613:U:C5'	1:2:614:U:P	3.07	0.43
2:h:94:ARG:HD3	6:s:104:ASP:HA	2.01	0.43
7:au:19:MET:HE3	7:au:22:GLY:HA2	2.00	0.43
7:au:162:TYR:CD2	7:au:165:GLY:HA2	2.54	0.43
9:n:83:LEU:HD11	22:ab:1117:VAL:HG21	2.01	0.43
10:ae:32:TRP:CD1	10:ae:32:TRP:H	2.37	0.43
10:ae:398:TYR:CG	10:ae:416:LEU:HD12	2.54	0.43
10:ae:423:GLY:O	10:ae:431:ALA:N	2.51	0.43
12:ag:70:LEU:HD12	12:ag:71:ARG:N	2.34	0.43
12:ag:341:ILE:HA	22:ab:1058:MET:HE1	2.01	0.43
12:ag:429:ALA:HA	53:bd:72:LEU:HD11	2.00	0.43
12:ag:457:LYS:HD3	12:ag:457:LYS:HA	1.84	0.43
13:aj:46:ARG:HA	13:aj:46:ARG:HD3	1.76	0.43
13:aj:215:GLU:O	13:aj:218:ARG:HB3	2.19	0.43
13:aj:253:ASN:HD21	24:ac:90:ALA:H	1.66	0.43
14:e:126:GLN:HG3	22:ab:875:GLY:O	2.18	0.43
14:e:140:GLU:O	14:e:144:THR:HG22	2.19	0.43
14:e:807:PHE:HD2	14:e:808:VAL:HG23	1.83	0.43
18:r:79:LEU:HD22	18:r:81:ARG:HG3	2.01	0.43
18:r:168:ASP:OD1	18:r:303:SER:OG	2.21	0.43
19:af:534:TYR:HD2	19:af:537:SER:H	1.66	0.43
20:u:111:ARG:NH1	22:ab:841:GLN:OE1	2.52	0.43
20:u:324:THR:HG22	20:u:325:ALA:H	1.84	0.43
21:aa:1616:GLN:HE21	21:aa:1620:GLN:CD	2.27	0.43
22:ab:87:ASP:CG	22:ab:90:ALA:H	2.26	0.43
24:ac:748:GLU:OE2	24:ac:867:ARG:HB2	2.18	0.43
24:ac:881:LEU:HD11	24:ac:1087:PRO:O	2.19	0.43
24:ac:935:CYS:SG	24:ac:945:ILE:HG21	2.59	0.43
24:ac:1228:ASP:OD1	24:ac:1228:ASP:N	2.45	0.43
24:ac:1260:GLU:HG2	24:ac:1261:ARG:N	2.33	0.43
25:ad:171:ASN:OD1	25:ad:171:ASN:N	2.52	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:181:MET:HE1	25:ad:215:TYR:HD1	1.82	0.43
25:ad:520:TYR:CZ	25:ad:521:ASP:HB2	2.54	0.43
29:aq:146:LEU:O	29:aq:180:TRP:NE1	2.51	0.43
30:as:91:GLN:NE2	30:as:93:ALA:HA	2.33	0.43
30:as:256:GLY:HA3	35:t:152:PHE:CZ	2.53	0.43
31:at:284:LEU:HB3	31:at:310:TRP:HH2	1.84	0.43
35:t:156:SER:OG	35:t:190:PRO:O	2.26	0.43
35:t:220:PHE:HB3	48:q:38:TRP:CE3	2.53	0.43
39:ar:72:PRO:HB3	39:ar:120:VAL:HG13	2.01	0.43
41:ai:271:PHE:CE2	41:ai:335:VAL:HA	2.53	0.43
42:x:66:GLN:OE1	42:x:67:GLY:N	2.52	0.43
42:x:101:LEU:HD12	42:x:109:VAL:HA	2.00	0.43
43:i:162:THR:HG22	43:i:164:ARG:H	1.84	0.43
45:o:98:PRO:HD2	45:o:176:ASP:OD1	2.17	0.43
45:o:236:ARG:O	45:o:239:PHE:HB3	2.19	0.43
46:c:140:GLN:OE1	46:c:226:PHE:HA	2.19	0.43
50:a:348:TYR:HB3	50:a:349:TRP:CE3	2.54	0.43
52:z:673:ASP:O	52:z:676:GLY:N	2.36	0.43
54:A:312:LYS:NZ	54:A:367:LEU:O	2.29	0.43
55:B:273:ASN:HA	89:At:38:ALA:HB2	2.00	0.43
55:B:408:GLY:HA2	86:Al:287:TRP:CZ3	2.53	0.43
60:G:298:LEU:HD23	60:G:298:LEU:HA	1.86	0.43
61:H:56:PHE:CE1	105:BP:183:ILE:HD13	2.52	0.43
62:I:72:ARG:NH1	1:1:544:U:H2'	2.33	0.43
62:I:228:ARG:NH1	62:I:232:LEU:HD21	2.34	0.43
63:J:48:HIS:NE2	63:J:52:GLN:HG2	2.33	0.43
63:J:79:HIS:HB3	63:J:87:GLY:O	2.19	0.43
64:K:19:ARG:NH2	95:Aa:178:ARG:HH12	2.16	0.43
66:M:15:ALA:HA	66:M:16:PRO:HD3	1.91	0.43
66:M:178:ARG:HA	66:M:178:ARG:HD3	1.79	0.43
68:O:305:ARG:NH1	85:An:244:VAL:HG11	2.33	0.43
69:P:30:LYS:NZ	69:P:48:GLU:OE2	2.33	0.43
69:P:161:ARG:NH1	69:P:181:ARG:HH21	2.17	0.43
70:Q:82:VAL:O	70:Q:82:VAL:HG23	2.18	0.43
72:S:292:PRO:HB2	72:S:294:ILE:HG23	2.01	0.43
77:X:494:LEU:N	77:X:494:LEU:CD1	2.81	0.43
77:X:499:ARG:O	77:X:502:MET:HG2	2.19	0.43
80:BA:27:GLY:C	80:BA:29:ALA:N	2.75	0.43
85:An:129:LYS:HG3	85:An:182:VAL:HG12	2.00	0.43
90:BC:101:SER:OG	90:BC:104:ARG:NH2	2.52	0.43
92:AI:239:ILE:HD13	92:AI:239:ILE:HA	1.88	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
95:Aa:90:THR:C	95:Aa:92:SER:N	2.76	0.43
97:BM:101:LYS:HG2	97:BM:108:LEU:HD13	1.99	0.43
97:BM:204:THR:C	97:BM:205:LYS:HD3	2.43	0.43
97:BM:251:ARG:HE	97:BM:253:CYS:HB2	1.84	0.43
102:Aq:109:HIS:HD2	102:Aq:111:THR:HG22	1.83	0.43
104:Ak:76:SER:HA	104:Ak:79:HIS:HB3	2.00	0.43
104:Ak:192:VAL:HG13	104:Ak:193:PHE:CD2	2.53	0.43
104:Ak:193:PHE:HB3	104:Ak:200:ARG:HA	2.00	0.43
111:Ae:38:LEU:HD22	111:Ae:56:ASP:HB3	2.01	0.43
112:Ac:210:LEU:HA	112:Ac:242:GLY:HA3	2.01	0.43
115:Ay:45:HIS:ND1	1:1:704:U:OP1	2.52	0.43
118:BL:119:ARG:HH11	118:BL:132:HIS:CA	2.32	0.43
118:BL:200:ALA:HB2	118:BL:205:LEU:HD23	2.01	0.43
119:BO:92:ARG:O	119:BO:95:PRO:HD2	2.19	0.43
119:BO:176:HIS:HD2	119:BO:178:TYR:N	2.16	0.43
121:UB:5:UNK:C	121:UB:7:UNK:H	2.32	0.43
121:UB:38:UNK:O	121:UB:39:UNK:C	2.66	0.43
1:1:71:A:H61	1:1:75:A:H61	1.67	0.43
1:1:420:A:O2'	1:1:421:U:H5''	2.19	0.43
1:2:2:U:H5'	25:ad:707:TRP:HE1	1.78	0.43
1:2:15:U:H3'	1:2:15:U:C6	2.54	0.43
1:2:85:U:N3	39:ar:19:PHE:HD2	2.08	0.43
1:2:107:A:C4'	43:i:363:TYR:CE1	2.86	0.43
1:2:281:A:C6	43:i:251:ILE:CA	2.84	0.43
1:2:370:A:C6	1:2:372:A:H5''	2.53	0.43
1:2:412:G:OP2	1:2:412:G:C2	2.68	0.43
1:2:525:A:H2	1:2:526:A:N3	2.16	0.43
1:2:596:U:H2'	1:2:597:A:O4'	2.18	0.43
3:aw:41:ASP:OD2	6:s:57:ARG:HG3	2.19	0.43
4:m:53:TYR:CD2	36:p:68:GLU:HA	2.53	0.43
6:s:146:LYS:O	6:s:147:LEU:HD12	2.19	0.43
7:au:106:ASP:OD1	23:ak:304:TYR:OH	2.29	0.43
8:am:230:ARG:HA	8:am:230:ARG:HD2	1.83	0.43
10:ae:207:ARG:HH12	14:e:566:SER:HB2	1.84	0.43
13:aj:247:HIS:NE2	13:aj:292:ASN:HB2	2.33	0.43
14:e:686:LEU:HD13	14:e:689:THR:HG21	2.00	0.43
15:d:256:SER:HB2	18:r:434:TRP:CD1	2.53	0.43
17:ax:100:LEU:HG	17:ax:143:PRO:HD3	2.00	0.43
18:r:54:LEU:HD12	18:r:76:ARG:NH1	2.34	0.43
19:af:520:TYR:HA	19:af:523:SER:OG	2.19	0.43
19:af:765:GLU:HB3	19:af:826:ARG:HE	1.84	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
20:u:333:LEU:O	20:u:336:ILE:N	2.52	0.43
20:u:353:HIS:CD2	22:ab:910:ASP:HB3	2.54	0.43
20:u:614:LEU:HD22	20:u:643:TRP:HE1	1.84	0.43
21:aa:644:ASP:OD2	21:aa:684:LYS:HB2	2.18	0.43
21:aa:1034:HIS:HD2	21:aa:1036:HIS:H	1.66	0.43
21:aa:1165:ASP:OD1	21:aa:1168:ALA:N	2.37	0.43
23:ak:192:ARG:HB2	23:ak:195:ALA:CB	2.49	0.43
25:ad:739:TRP:O	25:ad:740:ARG:NE	2.43	0.43
29:aq:177:LEU:HD23	29:aq:179:PHE:HE1	1.84	0.43
32:y:32:ALA:O	32:y:36:VAL:HG23	2.18	0.43
36:p:274:GLU:OE1	36:p:274:GLU:N	2.51	0.43
37:j:125:LEU:HD23	37:j:125:LEU:HA	1.88	0.43
38:l:315:TYR:HA	38:l:316:PRO:HD3	1.35	0.43
39:ar:74:HIS:HB2	39:ar:121:MET:HG3	2.01	0.43
39:ar:106:PRO:HB2	39:ar:230:GLN:NE2	2.34	0.43
41:ai:217:LYS:HA	41:ai:217:LYS:HD3	1.76	0.43
41:ai:231:LEU:HD13	41:ai:237:LYS:NZ	2.33	0.43
42:x:20:GLN:HG2	42:x:21:VAL:H	1.84	0.43
43:i:305:TRP:CH2	47:k:80:LEU:HD22	2.53	0.43
48:q:36:ARG:CZ	48:q:39:MET:HE2	2.48	0.43
52:z:291:THR:HA	52:z:301:PHE:HE1	1.84	0.43
52:z:366:VAL:HG12	52:z:392:LEU:HD13	2.00	0.43
52:z:874:VAL:O	52:z:892:ARG:HD2	2.19	0.43
58:E:75:LEU:HB3	58:E:110:LYS:NZ	2.34	0.43
58:E:148:TYR:CZ	108:Av:69:VAL:HG11	2.54	0.43
60:G:272:PRO:HB3	83:Aw:88:ARG:HH21	1.83	0.43
61:H:95:GLN:HA	61:H:109:ILE:CG1	2.46	0.43
62:I:175:LYS:N	62:I:201:ARG:HH12	1.97	0.43
64:K:134:TYR:CD2	109:Af:92:ARG:HG3	2.54	0.43
66:M:144:LYS:HE2	66:M:144:LYS:HB3	1.76	0.43
67:N:162:GLU:HG2	67:N:228:PRO:HB2	2.01	0.43
67:N:170:ILE:HG21	67:N:179:LEU:HD13	2.01	0.43
68:O:29:ARG:CG	68:O:33:ARG:HD3	2.48	0.43
68:O:30:TYR:CD2	68:O:31:ARG:HG3	2.54	0.43
70:Q:108:ILE:CG1	1:1:905:A:H62	2.31	0.43
71:R:54:LEU:HD22	71:R:87:VAL:HG23	2.01	0.43
71:R:118:ALA:O	71:R:371:PRO:HG3	2.19	0.43
71:R:211:SER:C	71:R:213:THR:N	2.77	0.43
74:U:19:LYS:O	74:U:19:LYS:HG2	2.19	0.43
75:V:150:VAL:HG22	116:Ag:104:GLN:HG3	2.01	0.43
77:X:89:LEU:C	77:X:91:THR:H	2.26	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
77:X:234:ALA:H	77:X:237:ALA:HA	1.84	0.43
77:X:275:LEU:CD1	106:Ad:32:ARG:HD2	2.45	0.43
77:X:343:LYS:HD3	77:X:409:CYS:SG	2.59	0.43
78:Y:93:ILE:HD11	90:BC:41:VAL:HG21	2.01	0.43
80:BA:74:GLU:HG2	80:BA:75:PRO:HD3	2.00	0.43
85:An:63:GLY:C	85:An:65:GLY:H	2.26	0.43
86:Al:69:TYR:OH	86:Al:73:LYS:HD2	2.19	0.43
91:Ab:9:LEU:HD23	91:Ab:87:VAL:HG12	2.01	0.43
93:Ap:200:TYR:HB3	93:Ap:214:TRP:CE3	2.53	0.43
94:Au:144:LEU:O	94:Au:148:GLU:N	2.40	0.43
96:Ao:244:VAL:HG23	96:Ao:245:GLN:N	2.33	0.43
99:Aj:369:ARG:HD3	99:Aj:369:ARG:HA	1.75	0.43
99:Aj:382:GLY:HA2	99:Aj:385:ARG:HG2	2.01	0.43
100:BH:152:LEU:HD22	100:BH:156:PHE:CD2	2.54	0.43
102:Aq:32:TYR:HB3	106:Ad:36:ASP:CB	2.49	0.43
105:BP:-4:THR:HB	1:1:487:U:OP2	2.19	0.43
113:Ah:320:LEU:HD21	113:Ah:327:ALA:HB2	2.00	0.43
117:Ax:81:ARG:HD3	117:Ax:81:ARG:HA	1.80	0.43
118:BL:133:TYR:CD2	118:BL:303:LYS:HG2	2.54	0.43
118:BL:141:TRP:O	118:BL:141:TRP:HD1	1.98	0.43
118:BL:284:ASN:HB2	1:1:671:U:C2	2.54	0.43
118:BL:330:LEU:HD12	118:BL:330:LEU:O	2.19	0.43
119:BO:68:CYS:SG	119:BO:76:HIS:HB3	2.58	0.43
1:1:503:U:O2'	1:1:504:U:OP2	2.31	0.43
1:1:556:A:OP2	1:1:557:A:H2'	2.19	0.43
1:1:581:U:H5'	1:1:582:U:C5	2.54	0.43
1:1:763:G:H4'	1:1:764:U:OP1	2.18	0.43
1:1:861:A:N6	1:1:1108:A:N1	2.67	0.43
1:1:974:U:O2	1:1:974:U:H2'	2.18	0.43
1:1:1023:A:H2'	1:1:1024:U:O4'	2.18	0.43
1:2:22:U:O2	1:2:138:U:H4'	2.18	0.43
1:2:229:C:C6	1:2:240:G:H2'	2.54	0.43
1:2:315:A:O4'	1:2:315:A:P	2.77	0.43
1:2:337:U:O5'	1:2:337:U:H2'	2.19	0.43
1:2:431:U:O2'	10:ae:14:GLY:HA2	2.19	0.43
1:2:558:U:C2	1:2:559:U:C6	3.07	0.43
1:2:605:A:OP1	44:g:83:ASN:ND2	2.52	0.43
1:2:615:U:C4'	44:g:101:ARG:NH2	2.81	0.43
3:aw:53:TRP:CZ3	14:e:776:PRO:HD2	2.54	0.43
4:m:203:THR:O	44:g:108:ILE:HD13	2.18	0.43
4:m:258:LEU:HD12	15:d:316:ILE:HG22	2.01	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
7:au:84:ILE:HG21	7:au:103:LEU:HB3	2.01	0.43
9:n:156:THR:HG22	9:n:157:LYS:H	1.82	0.43
10:ae:241:VAL:HG11	10:ae:275:ARG:NH2	2.34	0.43
12:ag:275:LEU:HD12	12:ag:275:LEU:HA	1.82	0.43
14:e:309:GLY:C	20:u:630:LEU:HB3	2.43	0.43
15:d:85:LEU:HD23	15:d:85:LEU:HA	1.83	0.43
16:az:40:LYS:HD3	17:ax:61:LEU:O	2.19	0.43
18:r:70:MET:N	18:r:71:PRO:HD3	2.33	0.43
19:af:157:TYR:CE2	19:af:159:GLU:HA	2.54	0.43
19:af:663:ALA:O	19:af:667:LEU:HG	2.19	0.43
20:u:144:LEU:HB3	20:u:266:VAL:HG11	2.01	0.43
20:u:316:ASP:OD1	20:u:317:ALA:N	2.51	0.43
21:aa:88:GLU:HG2	21:aa:89:HIS:N	2.34	0.43
21:aa:217:ARG:NH2	45:o:421:GLN:OE1	2.52	0.43
21:aa:512:TRP:CG	21:aa:513:ARG:N	2.87	0.43
21:aa:946:ARG:O	26:an:137:VAL:HG22	2.19	0.43
21:aa:1220:TYR:HA	21:aa:1223:GLN:HB3	2.01	0.43
21:aa:1258:GLU:HA	21:aa:1261:SER:OG	2.19	0.43
22:ab:353:ALA:HB3	22:ab:356:GLN:HE21	1.84	0.43
22:ab:585:VAL:HG11	22:ab:616:ARG:CZ	2.48	0.43
22:ab:634:GLY:HA2	22:ab:637:LYS:HZ1	1.84	0.43
22:ab:821:TYR:CD2	22:ab:829:THR:HG22	2.54	0.43
24:ac:1109:ASP:OD2	38:l:554:HIS:NE2	2.49	0.43
25:ad:154:VAL:HG23	37:j:169:LYS:HD2	2.01	0.43
25:ad:546:LEU:HD23	30:as:198:LEU:HD22	2.00	0.43
28:ap:222:SER:O	28:ap:225:SER:N	2.52	0.43
30:as:178:ASN:O	30:as:179:ARG:HD2	2.19	0.43
32:y:22:ARG:HA	32:y:22:ARG:HD2	1.86	0.43
34:v:123:ALA:O	34:v:126:SER:OG	2.30	0.43
38:l:90:GLN:HB2	38:l:499:TYR:HE2	1.82	0.43
38:l:560:VAL:HG11	38:l:572:SER:HB3	2.01	0.43
39:ar:34:SER:O	39:ar:38:GLU:N	2.52	0.43
41:ai:41:LEU:HD23	41:ai:41:LEU:HA	1.77	0.43
41:ai:136:LEU:HD13	41:ai:180:ILE:HD13	1.99	0.43
42:x:242:VAL:HA	42:x:245:PHE:HB3	2.01	0.43
43:i:254:ASN:C	43:i:258:LYS:HZ2	2.27	0.43
46:c:266:MET:HE3	46:c:266:MET:HB2	1.86	0.43
49:b:145:TRP:O	49:b:149:SER:OG	2.21	0.43
50:a:37:SER:OG	50:a:98:ASP:OD2	2.25	0.43
52:z:551:ASP:OD1	52:z:552:ARG:N	2.51	0.43
57:D:36:ARG:NH2	101:Am:266:GLU:HB3	2.34	0.43

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
57:D:65:ARG:HH11	91:Ab:195:GLU:HG3	1.83	0.43
59:F:112:VAL:O	59:F:118:ARG:HD3	2.19	0.43
60:G:75:THR:OG1	99:Aj:419:ALA:O	2.19	0.43
60:G:357:PRO:HB3	70:Q:13:PHE:HA	2.01	0.43
62:I:152:ARG:NH1	62:I:157:ASN:HB3	2.34	0.43
66:M:76:ASN:O	66:M:78:PRO:HD3	2.19	0.43
68:O:21:TYR:OH	68:O:28:ALA:HA	2.19	0.43
68:O:112:SER:O	68:O:115:LYS:HB3	2.19	0.43
70:Q:141:LEU:HD23	70:Q:141:LEU:HA	1.74	0.43
71:R:246:ASN:HD22	71:R:255:ALA:HB1	1.83	0.43
73:T:29:PRO:HA	1:1:1101:C:H1'	2.00	0.43
77:X:93:GLN:HG3	77:X:94:LEU:N	2.34	0.43
77:X:100:PRO:HD2	92:Ai:65:THR:HG22	2.01	0.43
77:X:106:TYR:CE2	92:Ai:195:ARG:HD3	2.53	0.43
79:Z:110:GLY:N	1:1:572:A:OP1	2.52	0.43
83:Aw:120:MET:SD	83:Aw:121:GLU:HG3	2.59	0.43
84:Bj:128:ARG:HE	84:Bj:130:LYS:CD	2.32	0.43
86:Al:254:ASP:HB2	86:Al:258:GLU:OE1	2.19	0.43
87:Bl:182:ASP:HB2	87:Bl:206:HIS:HA	2.00	0.43
94:Au:30:TRP:CE2	1:1:259:U:C5	3.07	0.43
94:Au:99:HIS:N	117:Ax:177:VAL:HG11	2.34	0.43
99:Aj:422:LEU:O	99:Aj:422:LEU:HD12	2.19	0.43
99:Aj:469:ASP:OD1	99:Aj:469:ASP:N	2.50	0.43
101:Am:134:ARG:O	101:Am:138:LYS:HG2	2.19	0.43
113:Ah:154:ASP:OD1	113:Ah:427:ARG:HD3	2.19	0.43
113:Ah:448:ARG:HB3	113:Ah:461:ARG:HH22	1.84	0.43
114:BD:58:VAL:HG13	114:BD:71:SER:HB2	1.99	0.43
114:BD:63:CYS:SG	114:BD:64:HIS:N	2.92	0.43
118:BL:157:LYS:HA	118:BL:177:TYR:HA	2.01	0.43
118:BL:259:LEU:HD21	118:BL:267:PHE:HE1	1.83	0.43
119:BO:75:LYS:C	119:BO:76:HIS:CG	2.96	0.43
119:BO:80:ILE:HB	119:BO:102:SER:HB2	2.01	0.43
1:1:863:A:N6	1:1:864:A:C6	2.86	0.43
1:2:12:U:H3'	50:a:262:PRO:HB3	1.28	0.42
1:2:70:A:H5'	35:t:13:ALA:CB	2.47	0.42
1:2:109:U:H1'	1:2:110:A:H5'	2.01	0.42
1:2:169:U:C2'	1:2:170:U:OP2	2.59	0.42
1:2:247:U:C2'	1:2:248:C:O5'	2.67	0.42
1:2:436:U:O4'	6:s:154:VAL:CA	2.64	0.42
1:2:437:U:O4'	6:s:153:LYS:CD	2.66	0.42
1:2:474:U:H5'	1:2:475:U:OP2	2.19	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
9:n:67:ALA:HB1	11:ay:65:LEU:HD23	2.01	0.42
10:ae:236:LEU:HB3	10:ae:252:ILE:HD13	2.00	0.42
10:ae:398:TYR:OH	10:ae:415:PRO:HD2	2.19	0.42
10:ae:554:TYR:OH	22:ab:637:LYS:HG2	2.19	0.42
12:ag:46:HIS:HA	12:ag:49:LEU:HD12	2.00	0.42
13:aj:141:TRP:NE1	13:aj:146:ALA:HB2	2.33	0.42
14:e:738:TYR:CE2	18:r:268:TYR:HB3	2.54	0.42
15:d:301:MET:HE1	15:d:326:VAL:HG23	2.01	0.42
16:az:32:TRP:O	16:az:37:ARG:NH2	2.26	0.42
19:af:449:MET:O	19:af:453:SER:OG	2.25	0.42
19:af:726:TYR:HA	19:af:780:CYS:SG	2.59	0.42
21:aa:590:PRO:HG2	21:aa:808:GLU:HG3	2.00	0.42
21:aa:1532:PHE:HZ	21:aa:1605:PHE:CD1	2.36	0.42
21:aa:1611:MET:HA	21:aa:1614:PHE:HB3	2.00	0.42
23:ak:176:TRP:CB	24:ac:786:GLU:HG2	2.48	0.42
23:ak:238:LEU:HD12	23:ak:239:PHE:CD1	2.53	0.42
24:ac:494:ARG:O	24:ac:494:ARG:NH2	2.43	0.42
25:ad:115:GLU:HG3	46:c:85:LEU:HD13	2.00	0.42
25:ad:205:THR:HA	25:ad:279:ASN:HD21	1.84	0.42
25:ad:615:LEU:O	25:ad:619:ALA:N	2.52	0.42
26:an:70:LEU:HD21	52:z:938:MET:HB3	2.01	0.42
26:an:283:LEU:HB3	26:an:289:ALA:HB2	2.00	0.42
30:as:104:ARG:NH1	30:as:127:VAL:H	2.16	0.42
31:at:192:ARG:HG3	31:at:221:SER:HA	2.01	0.42
36:p:210:LYS:O	36:p:275:HIS:NE2	2.52	0.42
38:l:553:SER:HB2	38:l:571:VAL:HG21	1.99	0.42
38:l:606:GLN:O	38:l:610:VAL:HG12	2.19	0.42
39:ar:26:VAL:HB	39:ar:32:LEU:HD21	2.01	0.42
39:ar:78:LEU:HG	39:ar:118:LEU:HD11	2.01	0.42
39:ar:78:LEU:HD23	39:ar:259:VAL:HA	2.01	0.42
39:ar:192:THR:O	39:ar:196:ARG:N	2.51	0.42
39:ar:213:PRO:HD3	40:av:58:ARG:HB3	2.00	0.42
40:av:65:GLU:HG3	40:av:74:HIS:HE1	1.79	0.42
41:ai:4:LYS:NZ	41:ai:149:ASP:OD2	2.49	0.42
41:ai:331:LEU:HD12	41:ai:335:VAL:HB	2.00	0.42
42:x:151:LYS:HB2	42:x:151:LYS:HE2	1.84	0.42
46:c:251:CYS:HG	46:c:261:TRP:HZ2	1.64	0.42
50:a:66:ASP:CG	52:z:424:ARG:HH22	2.27	0.42
54:A:261:TYR:CB	54:A:264:LEU:HB2	2.49	0.42
55:B:133:GLN:NE2	66:M:10:ILE:HD13	2.34	0.42
55:B:140:ASP:OD1	55:B:141:TYR:N	2.52	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
55:B:250:MET:HE2	55:B:250:MET:HB3	1.94	0.42
55:B:295:SER:O	55:B:296:SER:C	2.62	0.42
55:B:364:SER:O	55:B:364:SER:OG	2.34	0.42
55:B:406:ASP:C	55:B:408:GLY:N	2.75	0.42
56:C:122:TRP:HD1	56:C:129:TRP:NE1	2.17	0.42
58:E:339:SER:HB3	91:Ab:189:ARG:NE	2.34	0.42
62:I:116:ALA:HA	62:I:125:VAL:HG11	2.01	0.42
62:I:226:ARG:O	62:I:243:PRO:HB3	2.18	0.42
64:K:45:THR:HG21	1:1:153:U:O2	2.18	0.42
65:L:86:GLN:OE1	65:L:114:THR:HB	2.18	0.42
66:M:159:ARG:HE	66:M:243:LEU:HD13	1.84	0.42
68:O:131:ILE:HG12	68:O:164:ASN:CG	2.44	0.42
71:R:116:ARG:HH11	71:R:121:ILE:HD11	1.83	0.42
71:R:393:LEU:HD23	71:R:393:LEU:HA	1.92	0.42
74:U:17:ARG:HB2	74:U:19:LYS:HE2	2.01	0.42
75:V:37:MET:HG3	75:V:39:VAL:HG23	2.01	0.42
79:Z:29:PRO:HD3	85:An:77:TRP:HA	2.01	0.42
79:Z:76:ARG:NE	1:1:71:A:O4'	2.51	0.42
85:An:134:ILE:O	85:An:135:PHE:C	2.62	0.42
87:BI:249:THR:HG22	87:BI:253:GLU:O	2.19	0.42
92:Ai:269:PRO:HG2	92:Ai:299:MET:HB2	2.00	0.42
97:BM:17:ARG:NH2	97:BM:19:PHE:HB3	2.32	0.42
97:BM:98:LYS:HA	97:BM:123:GLN:NE2	2.34	0.42
99:Aj:384:MET:O	99:Aj:388:GLN:N	2.49	0.42
100:BH:68:GLY:HA2	100:BH:214:HIS:CE1	2.52	0.42
100:BH:118:GLY:C	100:BH:120:ALA:H	2.27	0.42
102:Aq:52:ASN:ND2	102:Aq:52:ASN:O	2.52	0.42
104:Ak:136:THR:CG2	104:Ak:208:VAL:HG11	2.49	0.42
104:Ak:249:ALA:HB2	104:Ak:260:CYS:SG	2.59	0.42
104:Ak:276:GLU:CD	104:Ak:277:PRO:HD2	2.44	0.42
105:BP:-12:LEU:O	105:BP:-11:GLU:HB3	2.19	0.42
106:Ad:31:LEU:HB3	106:Ad:36:ASP:OD2	2.18	0.42
106:Ad:222:ASN:O	106:Ad:224:ASP:N	2.52	0.42
114:BD:63:CYS:SG	114:BD:65:ARG:N	2.90	0.42
115:Ay:82:VAL:O	115:Ay:86:ARG:HG3	2.19	0.42
115:Ay:143:GLU:CD	115:Ay:148:HIS:HA	2.44	0.42
116:Ag:171:ARG:NH2	1:1:963:A:OP2	2.49	0.42
117:Ax:132:THR:HG22	117:Ax:133:THR:N	2.31	0.42
117:Ax:151:ARG:HE	117:Ax:153:ILE:HG12	1.84	0.42
119:BO:129:CYS:HB3	119:BO:153:ILE:HG13	2.01	0.42
121:UB:63:UNK:O	121:UB:67:UNK:N	2.53	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:235:G:N2	1:1:236:A:C5	2.86	0.42
1:1:278:C:H2'	1:1:279:U:O4'	2.19	0.42
1:1:318:U:N3	1:1:319:A:N7	2.67	0.42
1:1:353:A:H61	1:1:373:A:N6	2.17	0.42
1:1:662:G:N2	1:1:675:A:C2	2.87	0.42
1:1:700:U:C3'	1:1:701:U:H5'	2.49	0.42
1:1:763:G:H2'	1:1:764:U:H3'	2.01	0.42
1:1:803:U:H2'	1:1:804:U:O4'	2.19	0.42
1:1:910:U:H2'	1:1:911:A:O4'	2.19	0.42
1:1:1029:U:H3	1:1:1057:A:N6	2.17	0.42
1:1:1039:A:H61	1:1:1051:A:H61	1.67	0.42
1:2:66:U:C5'	35:t:35:ARG:HG2	2.14	0.42
1:2:109:U:O2'	1:2:110:A:P	2.77	0.42
1:2:122:U:H3	43:i:297:GLN:CG	1.97	0.42
1:2:301:U:H2'	1:2:302:A:O5'	2.19	0.42
1:2:317:U:C4'	1:2:317:U:O2	2.67	0.42
1:2:409:U:C5	9:n:56:HIS:ND1	2.84	0.42
4:m:54:ARG:HA	4:m:54:ARG:HD3	1.71	0.42
5:f:99:LEU:HD21	36:p:281:LEU:HD11	2.01	0.42
6:s:76:PRO:HD2	14:e:722:PHE:CZ	2.54	0.42
7:au:117:ASP:O	7:au:120:GLN:HB3	2.19	0.42
7:au:145:GLU:O	7:au:148:GLY:N	2.52	0.42
10:ae:514:ARG:NH2	10:ae:540:GLU:OE2	2.52	0.42
10:ae:530:ALA:HA	12:ag:252:ASP:HB3	2.02	0.42
12:ag:18:ILE:HD13	13:aj:12:TYR:CD1	2.54	0.42
12:ag:278:ARG:HE	12:ag:311:ARG:HB3	1.84	0.42
12:ag:290:TRP:NE1	12:ag:342:VAL:HG13	2.34	0.42
15:d:24:ASP:OD1	15:d:24:ASP:N	2.53	0.42
15:d:136:GLU:N	15:d:136:GLU:OE2	2.52	0.42
18:r:54:LEU:HD12	18:r:76:ARG:HH11	1.83	0.42
20:u:55:MET:HE3	20:u:55:MET:HB3	1.91	0.42
20:u:152:LEU:HD21	20:u:258:LEU:HB2	2.00	0.42
20:u:347:LEU:HD13	20:u:356:GLU:HB3	2.00	0.42
20:u:546:ARG:HA	20:u:549:ARG:HG3	2.01	0.42
20:u:690:MET:HE2	20:u:723:ILE:HG23	2.01	0.42
21:aa:276:ARG:NH1	45:o:416:SER:OG	2.51	0.42
21:aa:401:HIS:CE1	21:aa:882:PRO:HB3	2.53	0.42
21:aa:538:TRP:O	21:aa:542:LEU:HG	2.19	0.42
21:aa:967:TRP:HH2	26:an:254:TRP:HE1	1.67	0.42
21:aa:1001:PHE:HZ	21:aa:1014:MET:HG2	1.84	0.42
22:ab:49:LYS:HA	38:l:449:PHE:CE2	2.55	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
22:ab:437:HIS:CE1	22:ab:439:GLY:HA2	2.54	0.42
24:ac:287:ASP:O	24:ac:291:GLN:N	2.45	0.42
25:ad:113:TYR:HE1	25:ad:696:GLY:H	1.67	0.42
25:ad:643:ASP:OD1	25:ad:644:ILE:N	2.52	0.42
25:ad:662:ASP:O	25:ad:666:LYS:N	2.44	0.42
29:aq:16:ARG:HG3	29:aq:20:MET:HB2	2.02	0.42
29:aq:140:ASN:ND2	35:t:89:THR:OG1	2.52	0.42
30:as:76:GLU:CD	30:as:79:ARG:HE	2.27	0.42
31:at:259:CYS:HA	31:at:306:PHE:HE1	1.85	0.42
33:w:87:SER:OG	33:w:88:LYS:N	2.52	0.42
38:l:640:ALA:HA	38:l:643:PHE:CE1	2.54	0.42
40:av:58:ARG:O	40:av:59:PHE:HD1	2.01	0.42
40:av:62:GLY:C	40:av:64:ALA:H	2.27	0.42
41:ai:22:GLU:O	41:ai:26:ALA:N	2.47	0.42
41:ai:239:THR:HG22	41:ai:241:PHE:H	1.85	0.42
43:i:181:TYR:CE2	48:q:142:LEU:HD13	2.47	0.42
45:o:476:ARG:NH1	45:o:480:GLY:O	2.51	0.42
46:c:200:ILE:HB	52:z:110:VAL:HB	2.01	0.42
48:q:189:LYS:HD3	48:q:190:ASP:H	1.84	0.42
52:z:252:THR:HG23	52:z:289:VAL:HG13	2.00	0.42
52:z:406:GLU:HB3	52:z:448:SER:OG	2.19	0.42
54:A:289:ARG:O	1:1:1106:U:H4'	2.19	0.42
55:B:241:ARG:HG2	99:Aj:492:PHE:HZ	1.84	0.42
58:E:249:PRO:HG3	58:E:309:VAL:HG22	2.01	0.42
58:E:339:SER:HB2	91:Ab:189:ARG:O	2.19	0.42
61:H:13:ARG:CZ	61:H:13:ARG:HA	2.49	0.42
62:I:73:MET:CE	62:I:89:ARG:HH11	2.33	0.42
63:J:34:ALA:O	63:J:38:ILE:HG23	2.18	0.42
63:J:142:ARG:HD2	1:1:806:A:OP2	2.18	0.42
64:K:24:LEU:HD11	64:K:39:ILE:HB	2.00	0.42
64:K:44:ARG:HD2	65:L:97:SER:O	2.19	0.42
66:M:149:GLU:HG2	66:M:170:ARG:HD3	2.01	0.42
67:N:47:ARG:NH1	1:1:91:U:OP1	2.52	0.42
70:Q:219:VAL:O	70:Q:222:GLN:HB3	2.18	0.42
72:S:260:VAL:HG12	72:S:282:LEU:HD11	2.01	0.42
74:U:31:PRO:HG2	1:1:951:U:C2	2.54	0.42
75:V:45:LYS:HE3	1:1:194:U:OP2	2.19	0.42
77:X:67:GLN:HG3	77:X:69:PRO:HD2	2.01	0.42
77:X:362:ASP:OD1	77:X:362:ASP:N	2.51	0.42
77:X:481:LEU:HD12	77:X:482:PRO:CD	2.49	0.42
78:Y:127:TYR:HD1	112:Ac:240:LEU:HD21	1.85	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
86:Al:184:HIS:HA	86:Al:190:HIS:HB3	2.01	0.42
92:Ai:222:PRO:HB3	92:Ai:240:THR:CG2	2.49	0.42
95:Aa:176:GLN:C	95:Aa:178:ARG:H	2.26	0.42
96:Ao:39:HIS:CE1	96:Ao:62:VAL:HB	2.54	0.42
96:Ao:71:ARG:HH22	1:1:351:U:P	2.40	0.42
96:Ao:88:ARG:O	96:Ao:91:GLN:HG2	2.20	0.42
97:BM:15:ASN:OD1	97:BM:16:TYR:N	2.52	0.42
97:BM:178:ALA:O	97:BM:182:ARG:HB3	2.20	0.42
98:Ar:144:ASP:OD2	98:Ar:146:ARG:HB2	2.19	0.42
101:Am:28:ALA:HA	111:Ae:55:HIS:CE1	2.54	0.42
101:Am:72:ASP:O	101:Am:85:THR:HB	2.19	0.42
102:Aq:341:PHE:CD1	102:Aq:341:PHE:C	2.97	0.42
110:As:110:ASP:HA	110:As:113:LYS:HG2	2.00	0.42
112:Ac:109:ASP:OD1	112:Ac:109:ASP:N	2.52	0.42
114:BD:33:ILE:HG21	115:Ay:174:TRP:CD1	2.55	0.42
125:Ag:301:NAD:H3B	125:Ag:301:NAD:PA	2.58	0.42
117:Ax:190:HIS:O	117:Ax:190:HIS:CG	2.72	0.42
118:BL:257:LEU:HD12	118:BL:267:PHE:CD1	2.53	0.42
118:BL:337:ARG:HB3	1:1:707:U:O2'	2.19	0.42
119:BO:42:SER:C	119:BO:44:ARG:N	2.77	0.42
119:BO:44:ARG:HA	119:BO:44:ARG:HD3	1.78	0.42
1:1:478:A:H4'	1:1:480:A:N6	2.34	0.42
1:1:617:G:H3'	1:1:617:G:N3	2.34	0.42
1:1:801:A:H2'	1:1:802:U:O4'	2.19	0.42
1:1:864:A:N7	1:1:865:A:C6	2.87	0.42
1:2:47:U:C5'	29:aq:11:SER:OG	2.67	0.42
1:2:66:U:P	35:t:36:ARG:HG2	2.52	0.42
1:2:210:U:O2	1:2:210:U:H2'	2.18	0.42
1:2:281:A:N3	1:2:281:A:H3'	2.34	0.42
1:2:301:U:N1	1:2:302:A:H8	2.11	0.42
1:2:606:U:C6	1:2:606:U:H3'	2.54	0.42
1:2:616:U:O4'	4:m:152:ILE:O	2.37	0.42
2:h:15:GLN:HB3	6:s:135:LYS:NZ	2.33	0.42
5:f:10:ARG:HG3	15:d:348:PHE:HB3	2.00	0.42
5:f:220:ALA:C	5:f:222:ALA:H	2.26	0.42
5:f:224:LEU:HB3	48:q:182:GLN:HG2	2.00	0.42
6:s:75:ARG:HD2	14:e:721:ARG:NH2	2.35	0.42
7:au:196:PHE:HA	12:ag:462:MET:O	2.19	0.42
8:am:217:MET:SD	15:d:127:MET:HB3	2.59	0.42
10:ae:109:MET:HB3	10:ae:114:GLY:HA2	2.01	0.42
14:e:587:SER:OG	14:e:588:GLY:N	2.52	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
19:af:269:ASP:O	19:af:273:VAL:HG23	2.20	0.42
19:af:502:ARG:O	19:af:506:ARG:HD3	2.19	0.42
20:u:283:PHE:CE2	22:ab:878:ILE:HG12	2.53	0.42
21:aa:85:PHE:CE1	25:ad:689:PRO:HG3	2.54	0.42
21:aa:169:VAL:HG23	25:ad:271:LYS:O	2.19	0.42
21:aa:279:TYR:CE2	45:o:415:LYS:HD3	2.55	0.42
21:aa:851:LYS:HD3	52:z:998:THR:HG22	2.01	0.42
22:ab:74:ILE:HG21	22:ab:286:MET:HE1	1.99	0.42
22:ab:219:MET:HB3	22:ab:221:GLU:HG3	2.00	0.42
22:ab:297:GLU:O	22:ab:300:ALA:N	2.51	0.42
24:ac:166:TYR:OH	38:l:509:VAL:N	2.52	0.42
25:ad:343:TRP:CH2	25:ad:345:PRO:HG3	2.55	0.42
25:ad:501:THR:OG1	25:ad:502:ALA:N	2.48	0.42
26:an:96:ALA:HB2	52:z:927:VAL:HG11	2.00	0.42
28:ap:38:ALA:O	28:ap:43:LYS:N	2.48	0.42
28:ap:89:LEU:HD21	28:ap:95:ALA:N	2.34	0.42
29:aq:212:ASN:OD1	29:aq:213:ALA:N	2.53	0.42
30:as:241:GLN:CD	30:as:241:GLN:H	2.27	0.42
32:y:102:CYS:HB3	32:y:272:MET:HE1	2.02	0.42
32:y:263:ALA:O	32:y:266:GLU:HG2	2.19	0.42
33:w:97:PRO:O	33:w:100:THR:OG1	2.34	0.42
39:ar:240:ILE:HB	43:i:365:GLU:OE1	2.20	0.42
42:x:164:LEU:O	42:x:164:LEU:HD23	2.19	0.42
43:i:266:LEU:O	43:i:269:VAL:N	2.49	0.42
45:o:359:SER:HA	50:a:291:LYS:HG2	2.00	0.42
46:c:134:ILE:HD12	46:c:134:ILE:H	1.84	0.42
52:z:411:GLY:H	52:z:412:PRO:CD	2.33	0.42
54:A:128:SER:HB3	54:A:353:PHE:CE1	2.53	0.42
55:B:257:THR:HB	89:At:113:ARG:HB3	2.01	0.42
55:B:425:ILE:HD12	55:B:430:THR:HG21	2.00	0.42
57:D:67:ILE:HD13	57:D:72:VAL:HG13	2.00	0.42
57:D:72:VAL:O	91:Ab:212:PRO:HB3	2.18	0.42
58:E:101:ILE:HG13	58:E:120:PRO:HD3	2.01	0.42
61:H:68:ARG:HG3	61:H:82:LEU:HD23	2.00	0.42
63:J:83:THR:HB	110:As:59:TRP:HH2	1.83	0.42
64:K:183:TRP:NE1	99:Aj:225:GLU:HG2	2.34	0.42
65:L:90:ARG:HG3	91:Ab:94:ASN:HB3	2.00	0.42
65:L:134:TYR:OH	95:Aa:88:THR:HG23	2.19	0.42
68:O:114:GLN:HA	68:O:117:GLN:CB	2.48	0.42
68:O:280:ARG:NE	71:R:102:ASP:OD1	2.45	0.42
70:Q:207:ASP:N	70:Q:210:GLU:OE2	2.52	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
72:S:295:PRO:CG	72:S:296:PRO:HD3	2.49	0.42
77:X:66:PHE:HB3	77:X:71:GLU:OE1	2.19	0.42
78:Y:147:VAL:O	78:Y:151:ARG:HG2	2.19	0.42
84:Bj:149:LEU:HD22	90:BC:70:HIS:CG	2.55	0.42
87:BI:138:ASP:O	87:BI:141:LEU:HB3	2.18	0.42
87:BI:141:LEU:HG	87:BI:142:PRO:HD2	2.02	0.42
89:At:136:PRO:HB2	89:At:140:TYR:HB2	2.00	0.42
91:Ab:261:PRO:HB2	98:Ar:27:THR:HB	1.99	0.42
92:Ai:364:LEU:HD22	92:Ai:376:VAL:HG11	2.00	0.42
93:Ap:191:ARG:HH22	93:Ap:195:ARG:NH2	2.16	0.42
96:Ao:124:GLU:O	96:Ao:126:PRO:HD3	2.20	0.42
98:Ar:25:THR:OG1	98:Ar:54:GLY:O	2.36	0.42
116:Ag:32:LEU:HD12	116:Ag:32:LEU:HA	1.78	0.42
118:BL:205:LEU:N	118:BL:206:PRO:HD3	2.34	0.42
118:BL:279:ALA:O	118:BL:280:GLY:C	2.61	0.42
119:BO:87:ARG:HH11	119:BO:89:ALA:CB	2.31	0.42
119:BO:88:PHE:N	119:BO:88:PHE:CD1	2.87	0.42
119:BO:95:PRO:HG2	119:BO:97:VAL:HG13	2.01	0.42
1:1:111:A:H4'	1:1:112:U:O5'	2.19	0.42
1:1:288:C:H2'	1:1:288:C:OP2	2.20	0.42
1:1:448:U:HO2'	1:1:449:U:H6	1.62	0.42
1:1:520:A:O2'	1:1:521:U:OP2	2.31	0.42
1:1:596:U:H6	1:1:596:U:H2'	1.69	0.42
1:1:936:G:N1	1:1:937:C:C4	2.87	0.42
1:1:1019:C:O5'	1:1:1019:C:H6	2.01	0.42
1:2:44:A:C1'	29:aq:25:GLY:H	2.30	0.42
1:2:66:U:H2'	1:2:67:A:H5'	2.00	0.42
1:2:93:U:C3'	1:2:94:A:H5'	2.48	0.42
1:2:176:U:O2'	48:q:12:MET:HB3	2.19	0.42
1:2:183:U:H6	1:2:183:U:OP1	2.02	0.42
1:2:259:A:O2'	1:2:260:A:P	2.78	0.42
1:2:419:A:C2'	10:ae:181:ARG:HB3	2.37	0.42
1:2:511:U:H4'	3:aw:19:PRO:HD2	2.00	0.42
1:2:558:U:OP2	1:2:558:U:H6	2.03	0.42
1:2:603:A:C6	1:2:604:U:C4	3.07	0.42
5:f:108:LEU:HA	32:y:175:ARG:NH1	2.32	0.42
5:f:220:ALA:HB1	52:z:618:ASN:ND2	2.34	0.42
6:s:80:GLN:HA	6:s:85:PHE:CD1	2.54	0.42
8:am:70:ILE:HD12	8:am:71:PRO:HD2	1.99	0.42
9:n:97:PHE:CE1	10:ae:63:TYR:HB2	2.55	0.42
10:ae:185:LYS:O	10:ae:193:PRO:HG3	2.19	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
10:ae:291:ASN:ND2	12:ag:353:ARG:H	2.17	0.42
12:ag:27:PRO:HB3	13:aj:17:PRO:HB2	2.01	0.42
13:aj:22:MET:HG2	53:bd:75:ASN:HB3	2.01	0.42
13:aj:244:ASN:HD22	13:aj:289:LEU:HD22	1.85	0.42
13:aj:252:TYR:O	13:aj:256:LYS:HG3	2.19	0.42
18:r:156:TRP:CH2	18:r:170:PRO:HG2	2.54	0.42
18:r:193:LEU:O	18:r:193:LEU:HD12	2.20	0.42
19:af:502:ARG:HB2	19:af:502:ARG:NH1	2.34	0.42
19:af:515:ARG:HG2	19:af:519:ARG:NH1	2.34	0.42
20:u:332:LEU:O	20:u:336:ILE:HG13	2.19	0.42
20:u:768:LYS:HG3	22:ab:1087:ASN:OD1	2.18	0.42
21:aa:1660:ALA:HA	21:aa:1663:TYR:HB3	2.01	0.42
22:ab:416:MET:HE1	23:ak:152:TRP:HB3	2.01	0.42
24:ac:146:GLU:OE1	24:ac:155:SER:HA	2.19	0.42
24:ac:758:GLU:O	24:ac:762:LYS:N	2.52	0.42
24:ac:1055:PHE:HE1	38:l:527:ASN:HD22	1.67	0.42
26:an:280:LEU:HA	42:x:9:PHE:CG	2.54	0.42
28:ap:72:SER:HA	28:ap:75:LEU:HD12	2.01	0.42
28:ap:79:LEU:HD11	28:ap:101:LEU:HD22	2.01	0.42
28:ap:198:PRO:HG2	28:ap:204:LEU:HD13	2.01	0.42
38:l:72:ARG:CG	38:l:73:PRO:HD2	2.47	0.42
40:av:40:THR:O	40:av:44:THR:HG23	2.19	0.42
40:av:95:PHE:CE1	40:av:176:LEU:HD13	2.54	0.42
41:ai:217:LYS:NZ	41:ai:339:SER:H	2.17	0.42
41:ai:285:ARG:NH1	41:ai:285:ARG:HA	2.34	0.42
42:x:113:SER:O	42:x:123:HIS:HB2	2.20	0.42
46:c:164:GLN:HG3	46:c:230:ARG:HG3	2.02	0.42
50:a:306:GLU:O	50:a:310:ARG:HB2	2.20	0.42
52:z:1024:GLN:NE2	52:z:1025:ARG:O	2.52	0.42
55:B:93:PRO:HA	55:B:104:THR:HA	2.00	0.42
55:B:150:ALA:HB3	67:N:85:ARG:HH22	1.83	0.42
57:D:33:ARG:NE	57:D:41:CYS:SG	2.91	0.42
58:E:179:ARG:NH1	1:1:432:U:C4	2.87	0.42
59:F:34:MET:O	59:F:49:GLY:HA3	2.20	0.42
60:G:83:ASP:O	60:G:90:ILE:HD11	2.19	0.42
62:I:207:MET:SD	94:Au:159:VAL:HG11	2.59	0.42
64:K:159:MET:HE3	64:K:159:MET:HB3	1.83	0.42
65:L:44:ARG:HA	65:L:114:THR:HG22	2.00	0.42
65:L:132:ASP:OD1	65:L:132:ASP:N	2.46	0.42
68:O:32:THR:OG1	68:O:33:ARG:N	2.52	0.42
68:O:184:ARG:HG2	68:O:185:PRO:HD2	2.00	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
69:P:104:GLU:HA	69:P:104:GLU:OE1	2.19	0.42
69:P:151:ARG:HH21	69:P:185:GLU:HG3	1.82	0.42
70:Q:70:PRO:HG2	70:Q:71:HIS:CE1	2.53	0.42
70:Q:180:LEU:HD23	70:Q:180:LEU:HA	1.88	0.42
71:R:42:LYS:O	71:R:101:ARG:NH2	2.41	0.42
74:U:78:GLN:NE2	84:Bj:12:SER:HB2	2.31	0.42
75:V:38:GLN:HA	75:V:41:GLN:HB2	2.00	0.42
77:X:249:LYS:O	77:X:250:GLN:C	2.62	0.42
77:X:349:PRO:HD3	77:X:398:ARG:HE	1.83	0.42
77:X:359:GLU:C	77:X:361:ARG:N	2.77	0.42
81:UA:10:UNK:O	81:UA:14:UNK:N	2.52	0.42
83:Aw:79:HIS:CD2	89:At:96:LEU:HD21	2.54	0.42
85:An:286:LEU:O	85:An:290:ARG:N	2.40	0.42
86:Al:181:VAL:HB	86:Al:193:ILE:HB	2.01	0.42
87:BI:167:SER:OG	87:BI:171:THR:O	2.30	0.42
90:BC:77:HIS:CE1	90:BC:79:ALA:HB2	2.53	0.42
91:Ab:142:TRP:CH2	101:Am:88:ALA:HB2	2.54	0.42
91:Ab:214:PRO:HA	91:Ab:215:PRO:HD3	1.89	0.42
94:Au:14:LEU:HD23	94:Au:21:PRO:HD2	2.01	0.42
94:Au:39:ASN:ND2	1:1:243:G:N7	2.66	0.42
95:Aa:46:MET:HE3	95:Aa:47:SER:H	1.84	0.42
96:Ao:65:HIS:O	96:Ao:69:ARG:HB3	2.19	0.42
97:BM:103:ALA:O	97:BM:107:LEU:HG	2.18	0.42
97:BM:251:ARG:HD2	97:BM:263:ARG:NH2	2.34	0.42
97:BM:285:LEU:HA	97:BM:288:ALA:HB3	2.01	0.42
100:BH:107:PHE:O	106:Ad:205:PRO:HG2	2.19	0.42
104:Ak:296:MET:HE1	112:Ac:115:GLY:O	2.19	0.42
106:Ad:177:THR:O	1:1:373:A:O2'	2.33	0.42
106:Ad:236:LEU:HD13	106:Ad:236:LEU:HA	1.88	0.42
112:Ac:118:PHE:C	112:Ac:120:LEU:H	2.28	0.42
113:Ah:121:VAL:O	113:Ah:125:ALA:N	2.38	0.42
116:Ag:49:ARG:NH2	1:1:84:U:O2	2.48	0.42
1:1:314:A:OP2	1:1:314:A:H3'	2.19	0.42
1:1:1031:C:C4	1:1:1035:G:C2	3.07	0.42
1:1:1067:C:O2'	1:1:1068:A:OP1	2.34	0.42
1:2:28:U:HO2'	1:2:29:U:P	2.27	0.42
1:2:94:A:C2	1:2:372:A:N7	2.88	0.42
1:2:146:A:C2'	1:2:147:U:O5'	2.67	0.42
1:2:150:A:C4'	1:2:151:A:OP1	2.64	0.42
1:2:265:A:C2'	1:2:266:U:H5'	2.49	0.42
1:2:322:A:N7	1:2:323:U:C4	2.88	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:424:U:P	13:aj:233:ARG:CD	2.99	0.42
1:2:450:A:H5''	14:e:391:SER:HB3	2.00	0.42
1:2:456:A:N7	8:am:283:GLY:HA2	2.34	0.42
1:2:460:A:HO2'	8:am:282:GLN:HB3	1.79	0.42
1:2:475:U:C4	6:s:142:ARG:NE	2.87	0.42
1:2:544:G:C6	50:a:157:LYS:O	2.72	0.42
5:f:11:ARG:C	5:f:13:LYS:H	2.26	0.42
6:s:37:ARG:NH2	20:u:785:GLU:OE2	2.44	0.42
7:au:118:GLU:O	7:au:122:MET:HG2	2.18	0.42
9:n:97:PHE:CD2	10:ae:80:VAL:HG13	2.54	0.42
11:ay:52:GLU:HG3	17:ax:18:LEU:CD1	2.50	0.42
14:e:271:GLY:O	14:e:275:VAL:HG12	2.20	0.42
14:e:312:GLY:H	20:u:630:LEU:CA	2.33	0.42
14:e:342:ASN:HD22	22:ab:847:PRO:HG2	1.84	0.42
14:e:557:ARG:NH2	14:e:560:ALA:HB3	2.35	0.42
15:d:18:ARG:H	44:g:142:GLN:HB2	1.85	0.42
15:d:116:HIS:HD2	21:aa:1047:THR:HG21	1.84	0.42
17:ax:31:GLY:HA3	17:ax:36:MET:HE3	2.01	0.42
18:r:306:ARG:HA	20:u:819:SER:OG	2.19	0.42
18:r:382:LEU:HA	18:r:385:ALA:HB3	2.01	0.42
19:af:172:ARG:HH12	22:ab:1008:ASN:HB3	1.85	0.42
19:af:222:LYS:O	19:af:226:GLN:HG2	2.19	0.42
20:u:132:THR:O	20:u:135:TYR:N	2.53	0.42
20:u:173:GLU:O	20:u:176:PRO:HD2	2.19	0.42
21:aa:535:SER:OG	21:aa:536:GLU:N	2.53	0.42
21:aa:884:ALA:HA	27:ao:205:VAL:HG21	2.01	0.42
21:aa:1173:HIS:HB3	21:aa:1176:GLN:NE2	2.17	0.42
22:ab:955:ASP:OD1	22:ab:960:LYS:HG3	2.20	0.42
23:ak:244:LEU:HD13	24:ac:129:ARG:HE	1.84	0.42
24:ac:256:GLU:HG3	24:ac:257:VAL:N	2.34	0.42
24:ac:395:THR:HG22	24:ac:397:THR:H	1.84	0.42
24:ac:708:ARG:NH1	24:ac:846:PHE:HB2	2.35	0.42
24:ac:710:THR:CG2	24:ac:842:SER:HB3	2.49	0.42
24:ac:1016:ALA:HA	24:ac:1019:ARG:NH2	2.34	0.42
24:ac:1178:GLY:HA3	38:l:521:ARG:NH2	2.34	0.42
24:ac:1217:LEU:HD23	24:ac:1217:LEU:HA	1.83	0.42
25:ad:135:LYS:HD3	40:av:72:GLU:OE2	2.19	0.42
25:ad:449:LYS:H	25:ad:449:LYS:HG3	1.70	0.42
29:aq:82:ARG:HD2	35:t:70:HIS:HA	2.01	0.42
31:at:364:ALA:O	31:at:368:GLY:N	2.52	0.42
35:t:213:ASP:OD1	35:t:214:ALA:N	2.52	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
38:l:320:ALA:O	38:l:323:ARG:N	2.53	0.42
41:ai:124:VAL:HG21	46:c:113:PRO:HD2	2.01	0.42
44:g:86:GLU:O	44:g:90:ARG:HB2	2.19	0.42
45:o:149:LEU:O	45:o:153:ILE:N	2.40	0.42
46:c:73:SER:O	46:c:77:VAL:HG23	2.19	0.42
49:b:2:VAL:HG21	49:b:68:GLN:HB3	2.02	0.42
50:a:367:LEU:HD22	50:a:371:GLU:OE2	2.20	0.42
52:z:403:ASP:OD1	52:z:513:ARG:HB2	2.19	0.42
52:z:445:THR:HG22	52:z:784:LEU:HG	2.01	0.42
54:A:42:MET:HB2	82:BB:75:VAL:HG21	2.02	0.42
54:A:81:GLN:HE21	111:Ae:82:ALA:HB1	1.83	0.42
54:A:346:GLU:HG2	54:A:347:HIS:H	1.84	0.42
54:A:357:ILE:CD1	82:BB:95:PRO:HG2	2.49	0.42
54:A:384:ARG:HH21	1:1:1149:A:H5''	1.84	0.42
55:B:28:VAL:O	55:B:28:VAL:HG13	2.18	0.42
55:B:170:HIS:HB3	55:B:177:HIS:HA	2.01	0.42
60:G:366:MET:CG	70:Q:28:ARG:HH12	2.30	0.42
61:H:31:LYS:HE3	1:1:388:U:OP2	2.19	0.42
62:I:44:LEU:H	62:I:99:HIS:CD2	2.36	0.42
62:I:123:LEU:HD13	94:Au:156:LEU:HD21	2.01	0.42
62:I:187:PHE:HZ	62:I:249:LEU:HB3	1.85	0.42
62:I:244:SER:CB	107:BF:70:ARG:HH22	2.33	0.42
65:L:145:ASP:O	65:L:176:LEU:HD23	2.20	0.42
68:O:22:THR:HG22	68:O:22:THR:O	2.18	0.42
68:O:110:LEU:HD12	68:O:111:GLU:H	1.85	0.42
71:R:145:LEU:O	71:R:330:TRP:N	2.53	0.42
72:S:350:PRO:HB2	99:Aj:342:LEU:HD11	2.01	0.42
72:S:367:ARG:HD2	109:Af:154:GLU:OE2	2.20	0.42
74:U:23:VAL:O	74:U:23:VAL:HG12	2.19	0.42
75:V:38:GLN:O	75:V:42:MET:HG2	2.19	0.42
75:V:147:GLU:CG	116:Ag:143:ARG:HH12	2.32	0.42
77:X:228:GLU:CD	77:X:296:ALA:HB1	2.44	0.42
77:X:278:ARG:HG3	96:Ao:95:CYS:HA	2.02	0.42
77:X:294:LEU:HD23	77:X:317:GLY:HA3	2.01	0.42
78:Y:151:ARG:HA	84:Bj:107:GLN:HB2	2.02	0.42
80:BA:45:GLN:O	80:BA:46:THR:HB	2.20	0.42
82:BB:27:LEU:O	82:BB:30:TYR:HB3	2.20	0.42
84:Bj:55:MET:HE2	84:Bj:55:MET:HB2	1.89	0.42
88:Az:35:LEU:HD23	1:1:68:U:H1'	2.01	0.42
91:Ab:194:LEU:O	91:Ab:197:ASN:N	2.52	0.42
92:Ai:5:SER:HB2	92:Ai:423:ALA:H	1.84	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
92:Ai:376:VAL:O	92:Ai:394:LEU:N	2.53	0.42
94:Au:57:TRP:HB2	94:Au:86:TYR:CE2	2.53	0.42
94:Au:60:ASP:O	94:Au:61:PHE:HB3	2.18	0.42
95:Aa:194:ASN:ND2	1:1:151:G:H22	2.18	0.42
96:Ao:135:ALA:N	96:Ao:136:PRO:HD2	2.35	0.42
97:BM:162:VAL:HB	97:BM:165:ASP:HB2	2.00	0.42
98:Ar:127:ARG:NH1	98:Ar:128:LYS:H	2.17	0.42
99:Aj:295:GLY:HA3	99:Aj:310:PHE:CE1	2.54	0.42
102:Aq:335:PHE:CE1	102:Aq:337:PRO:HD3	2.54	0.42
105:BP:69:ILE:HG23	105:BP:85:PHE:CD1	2.55	0.42
112:Ac:54:LEU:HD12	112:Ac:54:LEU:HA	1.86	0.42
116:Ag:95:GLU:OE2	116:Ag:141:GLY:HA3	2.19	0.42
117:Ax:74:ALA:O	117:Ax:75:VAL:C	2.63	0.42
119:BO:36:ILE:HG22	1:1:1128:U:H3	1.85	0.42
1:1:438:G:H2'	1:1:439:A:O4'	2.19	0.42
1:1:538:A:C6	1:1:539:U:C2	3.08	0.42
1:1:551:A:H2'	1:1:552:A:O4'	2.19	0.42
1:1:617:G:C2'	1:1:618:U:H5'	2.50	0.42
1:1:650:U:H2'	1:1:650:U:O2	2.19	0.42
1:2:16:U:H6	1:2:16:U:H3'	1.84	0.42
1:2:53:U:H3'	1:2:53:U:C6	2.54	0.42
1:2:86:C:C2	47:k:152:LYS:HG3	2.54	0.42
1:2:278:A:N6	1:2:328:A:N6	2.68	0.42
1:2:314:U:O2	1:2:314:U:C2'	2.67	0.42
1:2:432:G:O2'	10:ae:13:THR:CG2	2.64	0.42
1:2:436:U:C6	6:s:154:VAL:CG2	3.03	0.42
1:2:442:A:O2'	1:2:443:C:H6	2.02	0.42
1:2:486:A:C8	9:n:121:PHE:CD2	3.07	0.42
1:2:488:U:H4'	1:2:489:A:OP1	2.19	0.42
1:2:498:U:C2	11:ay:132:THR:O	2.71	0.42
1:2:525:A:P	5:f:27:ARG:NH1	2.92	0.42
1:2:525:A:H2'	15:d:329:ARG:O	2.19	0.42
4:m:40:ALA:HB3	36:p:110:MET:HE1	2.01	0.42
5:f:64:ALA:O	5:f:67:VAL:HG13	2.20	0.42
5:f:224:LEU:HD21	49:b:48:TYR:CE2	2.55	0.42
9:n:160:ARG:O	9:n:164:VAL:HG23	2.20	0.42
10:ae:196:VAL:HG12	10:ae:197:HIS:H	1.84	0.42
11:ay:123:ASN:ND2	18:r:287:VAL:O	2.53	0.42
12:ag:111:MET:HB3	12:ag:117:LEU:HG	2.01	0.42
12:ag:405:LEU:HD21	20:u:704:TYR:OH	2.20	0.42
12:ag:552:HIS:CE1	38:l:162:PRO:HD3	2.55	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
13:aj:201:TRP:CD1	13:aj:201:TRP:H	2.38	0.42
14:e:133:ALA:HA	14:e:136:PHE:HD2	1.84	0.42
14:e:313:GLY:C	20:u:629:VAL:O	2.62	0.42
15:d:335:PHE:HD2	15:d:338:PHE:HD1	1.67	0.42
16:az:39:VAL:HG21	18:r:430:GLN:HG2	2.01	0.42
16:az:119:MET:HG3	17:ax:65:GLN:OE1	2.20	0.42
18:r:51:ASN:O	18:r:55:ILE:HG13	2.19	0.42
18:r:191:TRP:CH2	18:r:245:GLU:HB2	2.55	0.42
19:af:231:VAL:H	19:af:264:LEU:HD22	1.85	0.42
19:af:394:LYS:HB3	19:af:411:GLU:OE2	2.20	0.42
19:af:456:LEU:HA	19:af:493:SER:HB3	2.01	0.42
19:af:799:GLY:O	19:af:803:ASN:N	2.52	0.42
20:u:624:TRP:CZ3	20:u:651:ILE:HG23	2.54	0.42
20:u:647:CYS:O	20:u:651:ILE:N	2.41	0.42
21:aa:324:GLY:HA3	21:aa:339:TRP:CZ3	2.54	0.42
21:aa:1048:LEU:HD13	21:aa:1048:LEU:HA	1.89	0.42
21:aa:1493:PRO:HA	21:aa:1494:PRO:HD3	1.93	0.42
22:ab:690:ARG:C	22:ab:801:GLU:HG2	2.45	0.42
22:ab:1102:VAL:O	22:ab:1104:PRO:HD3	2.20	0.42
23:ak:156:ASP:OD1	23:ak:159:THR:HG22	2.19	0.42
24:ac:289:PHE:CD2	24:ac:328:LEU:HD11	2.55	0.42
24:ac:952:ALA:HB2	24:ac:977:TYR:CZ	2.54	0.42
24:ac:1028:GLU:HG3	24:ac:1032:TRP:CD1	2.55	0.42
25:ad:197:TRP:NE1	25:ad:201:GLU:OE2	2.53	0.42
25:ad:646:HIS:CD2	30:as:231:LEU:HD22	2.55	0.42
27:ao:59:PRO:HB2	46:c:84:LEU:HD11	2.01	0.42
27:ao:79:TYR:CB	27:ao:137:TRP:HA	2.47	0.42
30:as:230:ARG:HD2	30:as:231:LEU:C	2.45	0.42
31:at:329:LEU:HD12	31:at:330:THR:H	1.85	0.42
38:l:168:ILE:HA	38:l:171:THR:HG22	2.00	0.42
38:l:344:SER:HB2	38:l:474:TYR:CD2	2.54	0.42
38:l:654:LEU:HD22	38:l:658:GLY:O	2.19	0.42
39:ar:20:PRO:HD2	39:ar:23:HIS:ND1	2.34	0.42
42:x:114:SER:HA	42:x:123:HIS:CG	2.54	0.42
45:o:132:ARG:HA	50:a:349:TRP:CZ3	2.54	0.42
48:q:33:THR:OG1	48:q:36:ARG:HB2	2.19	0.42
48:q:65:TRP:CE3	48:q:66:LEU:HD23	2.54	0.42
48:q:178:ASN:ND2	48:q:184:PRO:HD3	2.34	0.42
48:q:180:VAL:HG23	48:q:182:GLN:H	1.85	0.42
48:q:203:ASN:ND2	49:b:46:ARG:HH12	2.18	0.42
49:b:129:TRP:HE1	52:z:189:MET:HE2	1.84	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
52:z:264:LEU:HD11	52:z:302:CYS:HG	1.84	0.42
52:z:318:GLN:HG2	52:z:835:TYR:CZ	2.54	0.42
54:A:158:PHE:CE2	54:A:316:ILE:HG21	2.54	0.42
55:B:23:GLU:OE1	55:B:27:GLN:NE2	2.53	0.42
55:B:25:PRO:HD3	91:Ab:37:HIS:HD2	1.85	0.42
55:B:207:LYS:HD3	55:B:207:LYS:HA	1.66	0.42
55:B:356:LEU:HB3	55:B:361:PHE:HB2	2.02	0.42
56:C:17:ARG:HB3	56:C:32:VAL:HG11	2.01	0.42
56:C:77:ARG:CZ	56:C:83:LEU:HD23	2.50	0.42
56:C:102:ILE:H	56:C:102:ILE:HD12	1.84	0.42
58:E:216:LYS:HG3	58:E:217:HIS:N	2.35	0.42
60:G:99:GLN:CD	1:1:183:U:H3	2.27	0.42
61:H:6:LEU:HG	61:H:7:ARG:N	2.35	0.42
65:L:22:PHE:HA	65:L:34:VAL:O	2.19	0.42
67:N:154:VAL:HG22	67:N:167:ILE:O	2.19	0.42
68:O:216:VAL:O	68:O:229:ARG:N	2.44	0.42
69:P:96:PRO:CD	98:Ar:18:GLU:HG2	2.49	0.42
71:R:141:VAL:HG11	71:R:345:VAL:HG11	2.01	0.42
74:U:67:LYS:NZ	74:U:84:LYS:HD2	2.35	0.42
78:Y:230:ARG:HA	78:Y:233:LEU:HB3	2.02	0.42
78:Y:277:GLU:N	78:Y:277:GLU:OE1	2.52	0.42
79:Z:19:TYR:HB2	1:1:907:G:C2	2.53	0.42
80:BA:69:ILE:HD12	80:BA:95:ILE:HD11	2.01	0.42
83:Aw:95:GLN:C	83:Aw:97:ILE:N	2.76	0.42
86:Al:234:LEU:O	86:Al:238:ARG:N	2.52	0.42
89:At:12:THR:HG21	1:1:111:A:C8	2.53	0.42
91:Ab:142:TRP:HH2	101:Am:88:ALA:HB2	1.85	0.42
95:Aa:183:ASP:HA	95:Aa:186:MET:HB2	2.00	0.42
96:Ao:89:PHE:CD1	106:Ad:34:MET:HG3	2.53	0.42
97:BM:353:LEU:C	97:BM:356:PRO:HD2	2.45	0.42
98:Ar:122:LEU:HD12	98:Ar:195:ILE:HD13	2.01	0.42
99:Aj:355:ASP:OD2	109:Af:151:SER:HB3	2.19	0.42
99:Aj:418:ARG:HA	99:Aj:421:VAL:HG22	2.01	0.42
100:BH:20:TYR:HD2	100:BH:161:GLN:NE2	2.17	0.42
105:BP:-23:PRO:HG2	105:BP:-21:TYR:CZ	2.55	0.42
106:Ad:86:ALA:O	106:Ad:87:HIS:ND1	2.51	0.42
111:Ae:29:PRO:HG3	1:1:1125:U:O2'	2.20	0.42
111:Ae:214:PHE:CE2	111:Ae:219:MET:HE3	2.53	0.42
112:Ac:211:ASP:HB3	112:Ac:241:ALA:H	1.84	0.42
118:BL:331:ASP:CG	118:BL:332:TRP:H	2.27	0.42
119:BO:130:LEU:O	119:BO:173:HIS:CE1	2.70	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
119:BO:165:ARG:NH2	119:BO:167:MET:SD	2.93	0.42
120:BG:1308:MET:HB2	120:BG:1315:THR:HG21	2.02	0.42
122:UC:70:UNK:O	122:UC:74:UNK:N	2.52	0.42
1:1:127:A:C2'	1:1:128:U:H5'	2.49	0.42
1:1:128:U:O2'	1:1:129:U:C6	2.73	0.42
1:1:698:G:H2'	1:1:699:A:H5''	2.02	0.42
1:1:1043:A:H8	1:1:1043:A:O5'	2.03	0.42
1:2:92:U:C2'	1:2:93:U:O5'	2.68	0.42
1:2:177:U:O2'	33:w:64:VAL:HG11	2.20	0.42
1:2:182:A:OP1	33:w:98:LEU:CD1	2.68	0.42
1:2:364:A:C6	46:c:175:PHE:CE1	3.08	0.42
1:2:409:U:H5'	1:2:486:A:N6	2.34	0.42
1:2:425:A:C6	13:aj:266:LYS:HE2	2.15	0.42
1:2:525:A:H2	1:2:526:A:C2	2.38	0.42
1:2:590:U:H2'	1:2:591:A:O5'	2.19	0.42
3:aw:80:TYR:HA	14:e:220:ALA:HB2	2.01	0.42
5:f:51:ASN:OD1	19:af:320:ALA:HB3	2.19	0.42
10:ae:104:THR:HG23	10:ae:105:PRO:HD2	2.00	0.42
12:ag:75:ALA:HA	12:ag:79:GLU:OE1	2.20	0.42
12:ag:89:LEU:H	12:ag:89:LEU:HD12	1.85	0.42
12:ag:427:ALA:HB3	53:bd:45:TYR:CE1	2.55	0.42
12:ag:517:GLU:N	12:ag:517:GLU:OE1	2.53	0.42
14:e:496:ALA:HB1	14:e:501:CYS:O	2.18	0.42
14:e:557:ARG:HD2	14:e:557:ARG:HA	1.55	0.42
14:e:711:PHE:HB3	14:e:714:GLU:OE2	2.20	0.42
19:af:660:PHE:CD2	19:af:749:MET:HG2	2.55	0.42
20:u:194:TRP:HB2	20:u:230:MET:HE1	2.02	0.42
21:aa:390:THR:HG23	21:aa:392:HIS:HB2	2.01	0.42
21:aa:465:ARG:NH1	21:aa:469:GLU:OE1	2.53	0.42
21:aa:593:ALA:HB3	21:aa:596:ARG:NH1	2.34	0.42
21:aa:947:ARG:CD	26:an:18:HIS:HA	2.50	0.42
21:aa:1128:PHE:CZ	42:x:251:LYS:HB3	2.55	0.42
21:aa:1218:ALA:O	21:aa:1221:ILE:HG22	2.20	0.42
21:aa:1470:GLU:CB	21:aa:1490:ARG:HB2	2.50	0.42
21:aa:1523:GLY:HA3	26:an:190:TRP:CE3	2.54	0.42
22:ab:110:SER:O	22:ab:114:ARG:HG2	2.20	0.42
22:ab:563:ALA:O	22:ab:567:ARG:HG3	2.19	0.42
23:ak:120:GLN:HB2	38:l:639:MET:HE1	2.02	0.42
24:ac:416:GLY:HA2	24:ac:464:TRP:CZ3	2.54	0.42
24:ac:519:LEU:HD12	24:ac:520:ARG:N	2.34	0.42
24:ac:676:ALA:HA	38:l:325:GLU:OE1	2.20	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:320:ALA:O	25:ad:324:THR:HG22	2.19	0.42
25:ad:661:ARG:HA	45:o:429:TRP:CD1	2.54	0.42
25:ad:733:ARG:HD3	41:ai:125:TYR:CD1	2.53	0.42
25:ad:773:VAL:HG13	25:ad:774:TYR:CD1	2.55	0.42
26:an:150:ARG:C	26:an:152:ASP:H	2.27	0.42
26:an:228:ALA:N	52:z:982:ARG:HH12	2.18	0.42
29:aq:108:ASP:OD1	29:aq:108:ASP:N	2.46	0.42
30:as:46:ALA:HA	30:as:49:TYR:HD2	1.85	0.42
30:as:166:GLU:HB3	30:as:168:HIS:CE1	2.55	0.42
31:at:233:TRP:CH2	31:at:244:LYS:HB3	2.54	0.42
35:t:81:GLU:O	35:t:85:ALA:N	2.44	0.42
35:t:139:ARG:HE	35:t:139:ARG:HB3	1.57	0.42
35:t:181:VAL:HG13	35:t:185:ALA:HB3	2.01	0.42
36:p:31:TRP:CZ3	46:c:240:GLN:HG2	2.55	0.42
37:j:37:VAL:HG12	37:j:38:THR:N	2.33	0.42
37:j:54:ARG:HE	37:j:60:ARG:HD2	1.83	0.42
37:j:185:VAL:HG22	37:j:187:PRO:HD2	2.01	0.42
38:l:512:GLU:H	38:l:512:GLU:CD	2.28	0.42
41:ai:131:ARG:O	41:ai:131:ARG:HG3	2.20	0.42
42:x:70:PRO:HD2	42:x:252:THR:HG22	2.02	0.42
43:i:136:HIS:NE2	43:i:158:LYS:HD3	2.34	0.42
43:i:162:THR:O	43:i:165:HIS:HB2	2.19	0.42
44:g:81:LYS:HB3	44:g:85:THR:CG2	2.50	0.42
45:o:132:ARG:HD3	50:a:352:PHE:CA	2.46	0.42
50:a:149:MET:HG3	50:a:163:ILE:HD12	2.01	0.42
52:z:261:HIS:HB3	52:z:300:PHE:CD2	2.55	0.42
52:z:672:ILE:HD13	52:z:744:LEU:HD12	2.01	0.42
52:z:855:ARG:HD2	52:z:869:LEU:HB2	2.00	0.42
52:z:935:LEU:HA	52:z:938:MET:HB2	2.02	0.42
54:A:393:VAL:CG2	54:A:397:ASP:HB3	2.49	0.42
56:C:151:GLN:NE2	113:Ah:55:TYR:HB2	2.35	0.42
57:D:123:ARG:O	57:D:127:LEU:N	2.53	0.42
58:E:38:ILE:HG22	58:E:89:ARG:HG2	2.01	0.42
58:E:219:LYS:HB2	58:E:219:LYS:HE3	1.81	0.42
59:F:101:TRP:HE3	82:BB:12:PHE:CE2	2.37	0.42
60:G:68:THR:O	60:G:72:GLU:HG2	2.19	0.42
60:G:145:ARG:HG2	1:1:346:A:H5''	2.02	0.42
60:G:197:LEU:O	60:G:197:LEU:HD23	2.19	0.42
63:J:73:GLY:HA2	63:J:93:ALA:HA	2.01	0.42
64:K:103:GLU:HG2	65:L:22:PHE:CE1	2.54	0.42
66:M:204:CYS:HG	66:M:229:SER:HG	1.61	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
66:M:258:LYS:HD2	66:M:259:ARG:H	1.83	0.42
68:O:276:LEU:HB3	71:R:105:ALA:HB1	2.01	0.42
69:P:64:TYR:O	69:P:79:LEU:HD11	2.20	0.42
77:X:97:LEU:HD11	92:Ai:203:PHE:HB3	2.02	0.42
77:X:182:THR:HG23	77:X:189:ILE:HG22	2.02	0.42
80:BA:57:LEU:O	80:BA:61:SER:N	2.50	0.42
80:BA:122:ARG:NE	105:BP:88:ASP:OD1	2.48	0.42
84:Bj:77:ARG:O	84:Bj:96:GLU:HA	2.19	0.42
86:Al:256:PRO:HA	86:Al:259:ARG:HB2	2.01	0.42
88:Az:16:LYS:HB3	88:Az:16:LYS:HE2	1.84	0.42
94:Au:15:GLN:NE2	1:1:237:U:O3'	2.51	0.42
94:Au:59:SER:HB3	118:BL:96:ASN:O	2.20	0.42
95:Aa:30:ARG:HG3	1:1:402:U:O4	2.20	0.42
96:Ao:246:LEU:HD11	98:Ar:178:ALA:HA	2.02	0.42
97:BM:141:ARG:HH12	97:BM:268:HIS:HB2	1.84	0.42
101:Am:85:THR:HG22	101:Am:86:PRO:O	2.19	0.42
101:Am:222:PHE:O	101:Am:226:MET:HG2	2.20	0.42
104:Ak:284:ARG:O	104:Ak:287:LYS:HB3	2.19	0.42
106:Ad:208:LYS:NZ	106:Ad:220:ASN:HD21	2.18	0.42
108:Av:138:ARG:HE	108:Av:138:ARG:HB3	1.77	0.42
111:Ae:13:LEU:HD21	111:Ae:19:CYS:C	2.44	0.42
113:Ah:457:PHE:HD1	113:Ah:460:TYR:HE1	1.67	0.42
115:Ay:68:TYR:OH	1:1:703:U:O2	2.37	0.42
118:BL:168:LYS:O	118:BL:170:THR:N	2.53	0.42
1:1:106:A:O2'	1:1:107:U:OP2	2.32	0.42
1:1:826:A:H62	1:1:827:A:N6	2.17	0.42
1:1:865:A:C5	1:1:1100:U:C4	3.07	0.42
1:1:1000:A:N6	1:1:1009:A:O2'	2.50	0.42
1:2:65:U:H1'	1:2:66:U:OP1	2.20	0.42
1:2:146:A:C2'	1:2:147:U:C5'	2.97	0.42
1:2:146:A:H2'	1:2:147:U:H5'	2.02	0.42
1:2:240:G:C4'	1:2:244:A:C2	3.03	0.42
1:2:270:U:C2'	1:2:271:U:OP2	2.67	0.42
1:2:283:U:H3'	1:2:284:U:C5	2.54	0.42
1:2:303:G:H2'	1:2:304:U:H5''	2.02	0.42
1:2:327:U:P	1:2:327:U:O4'	2.78	0.42
1:2:414:C:C4	2:h:13:ILE:HG22	2.40	0.42
1:2:504:A:H4'	1:2:505:U:OP2	2.19	0.42
1:2:571:C:O2'	1:2:572:A:C8	2.70	0.42
7:au:190:TYR:CD1	7:au:191:PRO:HD2	2.54	0.42
10:ae:403:GLN:OE1	10:ae:409:THR:HB	2.19	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
10:ae:475:TRP:CD1	10:ae:475:TRP:N	2.87	0.42
12:ag:432:VAL:HG22	12:ag:434:LEU:HD22	2.02	0.42
14:e:211:THR:HG23	14:e:212:GLU:H	1.84	0.42
14:e:267:LEU:HD11	14:e:422:ILE:HD11	2.01	0.42
14:e:625:THR:H	14:e:628:SER:HG	1.63	0.42
16:az:148:ARG:HD3	16:az:148:ARG:HA	1.91	0.42
18:r:363:SER:OG	18:r:364:PHE:N	2.53	0.42
20:u:73:ALA:HB1	20:u:85:LEU:HB3	2.01	0.42
20:u:353:HIS:O	20:u:355:ASP:N	2.53	0.42
20:u:375:PRO:HB2	20:u:567:TYR:CE1	2.55	0.42
21:aa:261:PHE:O	21:aa:265:HIS:N	2.38	0.42
21:aa:393:ARG:HD2	21:aa:431:THR:HB	2.01	0.42
21:aa:475:ARG:CZ	27:ao:203:PRO:HA	2.50	0.42
22:ab:115:ALA:HA	22:ab:118:ARG:CZ	2.49	0.42
22:ab:390:THR:HB	22:ab:393:HIS:CG	2.54	0.42
22:ab:947:LEU:HD12	22:ab:1001:ILE:HD11	2.02	0.42
23:ak:172:GLU:OE1	24:ac:794:LEU:HD13	2.19	0.42
24:ac:548:HIS:HA	24:ac:553:SER:HA	2.02	0.42
24:ac:703:TRP:CE2	24:ac:709:GLN:HG2	2.54	0.42
24:ac:1041:THR:OG1	24:ac:1042:ASP:N	2.53	0.42
24:ac:1116:SER:O	38:l:561:TYR:OH	2.26	0.42
25:ad:118:ARG:HH22	45:o:469:LYS:HE3	1.84	0.42
25:ad:505:TYR:CG	25:ad:549:ILE:HG12	2.54	0.42
28:ap:149:TYR:OH	48:q:136:GLU:OE2	2.26	0.42
28:ap:198:PRO:HG2	28:ap:204:LEU:CD1	2.49	0.42
32:y:292:GLU:O	32:y:296:THR:N	2.37	0.42
33:w:48:PRO:HD3	33:w:80:TRP:CE2	2.55	0.42
36:p:37:MET:SD	36:p:46:TYR:HE2	2.43	0.42
37:j:84:THR:C	37:j:86:ASP:H	2.28	0.42
37:j:139:PRO:HG2	37:j:141:PHE:CE2	2.55	0.42
38:l:32:ASP:O	38:l:36:LYS:HG3	2.20	0.42
38:l:117:ILE:HD12	38:l:332:ARG:HG2	2.01	0.42
38:l:161:TYR:CZ	38:l:341:LEU:HD22	2.55	0.42
38:l:225:TYR:OH	38:l:229:ARG:NE	2.50	0.42
39:ar:40:ASP:HB2	40:av:107:GLN:OE1	2.19	0.42
39:ar:139:PRO:HA	39:ar:142:LEU:HD12	2.01	0.42
42:x:135:TRP:O	42:x:139:LEU:HG	2.19	0.42
50:a:109:LYS:HD3	50:a:114:TYR:HE1	1.81	0.42
50:a:372:LEU:CD2	50:a:430:LEU:HD23	2.50	0.42
50:a:416:LEU:HD23	50:a:416:LEU:HA	1.91	0.42
54:A:393:VAL:HG21	54:A:397:ASP:HB3	2.02	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
55:B:191:MET:HG2	55:B:196:TRP:CE3	2.54	0.42
55:B:331:GLY:O	55:B:335:GLN:HG3	2.20	0.42
58:E:144:ASN:HD22	108:Av:70:LYS:HB2	1.85	0.42
58:E:206:THR:HG22	58:E:208:LYS:N	2.28	0.42
59:F:22:GLN:O	59:F:26:VAL:HG23	2.20	0.42
59:F:23:LEU:HB3	59:F:24:PRO:HD3	2.01	0.42
59:F:34:MET:SD	59:F:125:ALA:HB2	2.60	0.42
59:F:102:TYR:O	59:F:106:GLU:HG2	2.20	0.42
61:H:98:PRO:HG2	61:H:99:GLU:OE1	2.20	0.42
64:K:48:ARG:O	64:K:52:GLU:HG2	2.19	0.42
64:K:50:ARG:HH12	95:Aa:191:THR:HG21	1.83	0.42
64:K:131:GLU:H	64:K:131:GLU:HG3	1.69	0.42
65:L:131:LEU:HD12	95:Aa:99:ALA:HB2	2.02	0.42
66:M:249:ILE:O	66:M:250:PRO:C	2.63	0.42
67:N:78:ARG:HA	67:N:78:ARG:HD2	1.65	0.42
68:O:177:VAL:HG23	68:O:177:VAL:O	2.20	0.42
69:P:53:PHE:N	69:P:60:ARG:HG2	2.34	0.42
69:P:131:ALA:HA	69:P:140:LEU:HD22	2.01	0.42
70:Q:15:LEU:HG	86:Al:256:PRO:HB2	2.01	0.42
70:Q:44:ALA:O	102:Aq:310:ARG:NH1	2.52	0.42
70:Q:150:SER:OG	70:Q:151:THR:N	2.52	0.42
75:V:75:ASP:C	75:V:77:ARG:N	2.77	0.42
77:X:303:VAL:HA	77:X:307:VAL:HB	2.01	0.42
77:X:476:PHE:HE2	102:Aq:51:TYR:HE1	1.67	0.42
78:Y:84:LYS:HA	78:Y:87:GLU:HG2	2.01	0.42
80:BA:20:GLY:HA2	105:BP:-10:ARG:HH11	1.83	0.42
82:BB:88:ARG:HG3	82:BB:89:GLU:N	2.35	0.42
83:Aw:27:TYR:CE2	83:Aw:29:SER:HA	2.55	0.42
85:An:22:ARG:NH1	94:Au:21:PRO:HB2	2.34	0.42
85:An:192:THR:OG1	85:An:193:SER:N	2.52	0.42
86:Al:154:TYR:C	86:Al:157:PRO:HD2	2.45	0.42
87:BI:126:SER:O	87:BI:131:ILE:HG22	2.19	0.42
90:BC:9:LEU:HD23	90:BC:82:GLU:CD	2.45	0.42
91:Ab:114:ASN:O	91:Ab:116:TYR:N	2.52	0.42
91:Ab:138:THR:HG22	91:Ab:141:GLU:OE1	2.20	0.42
91:Ab:238:MET:HA	91:Ab:241:ARG:HG2	2.02	0.42
92:Ai:256:LEU:HG	92:Ai:256:LEU:H	1.70	0.42
92:Ai:275:PRO:O	92:Ai:279:ILE:HG12	2.20	0.42
94:Au:46:VAL:HG12	94:Au:47:LEU:CD1	2.41	0.42
95:Aa:176:GLN:O	95:Aa:177:ARG:HB2	2.20	0.42
95:Aa:192:LEU:HA	95:Aa:192:LEU:HD23	1.90	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
96:Ao:126:PRO:HD2	96:Ao:129:PHE:CZ	2.54	0.42
96:Ao:191:LEU:O	96:Ao:195:GLN:HG2	2.20	0.42
97:BM:141:ARG:HH22	97:BM:268:HIS:N	2.17	0.42
99:Aj:266:LYS:HD2	99:Aj:301:MET:SD	2.60	0.42
99:Aj:348:PHE:HZ	106:Ad:208:LYS:HB3	1.84	0.42
99:Aj:470:MET:C	99:Aj:472:ASN:H	2.28	0.42
101:Am:60:GLN:NE2	101:Am:64:LEU:HD21	2.33	0.42
101:Am:147:TYR:HD1	101:Am:147:TYR:HA	1.73	0.42
101:Am:214:SER:O	101:Am:214:SER:OG	2.38	0.42
112:Ac:97:SER:HG	112:Ac:98:ARG:NH1	2.17	0.42
112:Ac:200:ARG:HA	112:Ac:203:SER:OG	2.19	0.42
115:Ay:42:ARG:O	115:Ay:43:VAL:C	2.63	0.42
116:Ag:91:PRO:HD3	116:Ag:118:TYR:CZ	2.55	0.42
118:BL:266:LEU:HG	118:BL:351:LEU:HD13	2.02	0.42
119:BO:82:LYS:HD3	119:BO:82:LYS:HA	1.80	0.42
119:BO:86:GLU:O	119:BO:87:ARG:HB2	2.19	0.42
119:BO:155:MET:HE3	119:BO:159:ARG:HA	2.01	0.42
1:1:75:A:O5'	1:1:75:A:H8	2.02	0.42
1:1:130:U:N3	1:1:131:U:C4	2.88	0.42
1:1:391:A:C8	1:1:393:A:N6	2.87	0.42
1:1:567:A:C8	1:1:568:A:C8	3.08	0.42
1:1:646:U:H2'	1:1:647:U:C6	2.54	0.42
1:2:156:U:C4	29:aq:62:LYS:HB3	2.54	0.42
1:2:208:C:H6	1:2:208:C:H3'	1.83	0.42
1:2:294:A:H2'	1:2:295:U:C4'	2.50	0.42
1:2:341:C:H3'	1:2:342:A:H5'	2.02	0.42
1:2:411:A:O2'	1:2:480:A:OP1	2.37	0.42
1:2:496:U:P	3:aw:2:HIS:H	2.37	0.42
1:2:499:A:O5'	3:aw:12:ALA:HB3	2.19	0.42
1:2:504:A:C5'	6:s:81:ASN:ND2	2.62	0.42
5:f:136:ASN:HA	5:f:139:LEU:HB2	2.01	0.42
8:am:163:MET:HE3	8:am:167:THR:HG22	2.02	0.42
8:am:201:ALA:O	8:am:205:ASP:HB2	2.20	0.42
8:am:293:TRP:CD2	14:e:74:TYR:HA	2.55	0.42
10:ae:275:ARG:O	10:ae:279:ARG:HG3	2.19	0.42
11:ay:78:GLU:HA	11:ay:79:PRO:HD3	1.92	0.42
12:ag:144:ALA:O	12:ag:311:ARG:NH2	2.52	0.42
12:ag:211:VAL:HG11	22:ab:414:PHE:CE1	2.48	0.42
13:aj:121:LEU:HA	13:aj:124:ILE:HD12	2.01	0.42
13:aj:158:PRO:HB3	13:aj:162:LEU:HD23	2.02	0.42
14:e:140:GLU:HB3	14:e:207:PHE:CG	2.55	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
14:e:275:VAL:HA	14:e:410:PHE:HZ	1.84	0.42
18:r:264:THR:OG1	18:r:297:ILE:O	2.22	0.42
18:r:396:TRP:HE1	18:r:431:GLU:CD	2.27	0.42
18:r:416:MET:HB2	18:r:427:HIS:CD2	2.54	0.42
19:af:270:ILE:HG21	19:af:328:ARG:HD2	2.01	0.42
20:u:318:VAL:HG23	22:ab:878:ILE:HA	2.00	0.42
21:aa:474:ARG:HB3	21:aa:478:ARG:HH22	1.84	0.42
21:aa:990:GLU:HB2	50:a:376:LEU:HD12	2.02	0.42
21:aa:1111:LEU:HD21	21:aa:1394:LEU:HD12	2.02	0.42
21:aa:1232:GLY:O	21:aa:1236:ILE:HG12	2.19	0.42
22:ab:86:HIS:NE2	22:ab:200:GLY:HA2	2.35	0.42
22:ab:693:ILE:HA	22:ab:798:TYR:CE2	2.55	0.42
22:ab:716:HIS:CD2	22:ab:719:THR:H	2.37	0.42
23:ak:244:LEU:HD13	24:ac:129:ARG:CD	2.50	0.42
24:ac:665:VAL:O	24:ac:887:SER:HA	2.20	0.42
24:ac:667:VAL:HG21	24:ac:703:TRP:CZ3	2.55	0.42
24:ac:939:ARG:HH22	38:l:124:HIS:CE1	2.38	0.42
24:ac:1214:LYS:HG3	24:ac:1220:GLN:HB3	2.01	0.42
25:ad:184:LEU:HD12	25:ad:193:ALA:HA	2.01	0.42
26:an:161:ALA:C	26:an:163:ASN:H	2.26	0.42
28:ap:87:VAL:HG11	28:ap:120:LEU:O	2.19	0.42
30:as:185:THR:HG22	30:as:189:GLU:OE2	2.20	0.42
33:w:109:LEU:HD22	37:j:134:LYS:NZ	2.35	0.42
38:l:489:SER:O	38:l:493:VAL:HG23	2.19	0.42
39:ar:193:LEU:O	39:ar:197:ILE:HG12	2.20	0.42
41:ai:88:VAL:HA	41:ai:91:LYS:HG3	2.01	0.42
43:i:163:ARG:HD2	48:q:134:TRP:CD1	2.55	0.42
45:o:215:ASP:OD2	45:o:254:ARG:NH1	2.52	0.42
46:c:264:LYS:HD2	46:c:267:ARG:HB3	2.02	0.42
48:q:122:LEU:HD23	48:q:122:LEU:HA	1.87	0.42
48:q:185:MET:H	48:q:185:MET:HG2	1.59	0.42
50:a:32:TRP:CD1	50:a:33:MET:H	2.38	0.42
50:a:40:ARG:HB3	50:a:44:GLU:OE1	2.20	0.42
52:z:318:GLN:HE21	52:z:322:LYS:HE3	1.85	0.42
52:z:362:GLU:O	52:z:366:VAL:HG23	2.20	0.42
52:z:462:LEU:HB3	52:z:500:PHE:HD2	1.84	0.42
52:z:564:TYR:CE1	52:z:733:PRO:HB3	2.55	0.42
52:z:641:ALA:O	52:z:645:MET:HG2	2.20	0.42
52:z:644:ASN:O	52:z:648:ALA:N	2.52	0.42
52:z:1010:LYS:HA	52:z:1010:LYS:HD3	1.79	0.42
54:A:208:VAL:CG2	63:J:12:PHE:HA	2.50	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
57:D:108:MET:O	57:D:111:ARG:HG3	2.20	0.42
58:E:186:ARG:NH2	1:1:458:A:H61	2.17	0.42
59:F:49:GLY:H	59:F:124:LYS:HZ2	1.67	0.42
61:H:139:GLU:HB3	105:BP:171:PHE:HB2	2.01	0.42
62:I:187:PHE:HB3	62:I:216:PHE:HD2	1.84	0.42
67:N:184:LYS:HE3	67:N:184:LYS:HB2	1.90	0.42
69:P:55:GLN:CB	1:1:949:U:H1'	2.50	0.42
70:Q:73:MET:HE2	70:Q:73:MET:HB2	1.95	0.42
70:Q:90:ARG:O	70:Q:91:GLN:C	2.63	0.42
70:Q:106:THR:HG21	1:1:905:A:C6	2.55	0.42
71:R:150:ASP:OD1	71:R:151:GLU:N	2.53	0.42
71:R:177:LEU:HA	71:R:177:LEU:HD23	1.77	0.42
76:W:74:GLU:C	76:W:74:GLU:CD	2.88	0.42
77:X:60:PRO:HG3	116:Ag:208:ASN:O	2.19	0.42
77:X:266:PRO:HB3	77:X:285:PHE:CD2	2.54	0.42
82:BB:100:GLU:HA	82:BB:103:TRP:NE1	2.35	0.42
82:BB:128:ASP:HA	111:Ae:131:TRP:CH2	2.55	0.42
83:Aw:77:ASN:O	83:Aw:80:THR:N	2.53	0.42
83:Aw:92:ILE:O	83:Aw:96:ARG:HG3	2.19	0.42
83:Aw:183:PRO:HG2	91:Ab:32:HIS:CE1	2.54	0.42
92:Ai:124:ALA:O	92:Ai:181:ILE:HA	2.20	0.42
95:Aa:76:ASP:O	95:Aa:82:ARG:NE	2.50	0.42
96:Ao:234:LEU:HD23	96:Ao:235:PRO:HD2	2.01	0.42
97:BM:101:LYS:HE3	97:BM:126:LEU:HB2	2.02	0.42
97:BM:174:MET:SD	97:BM:216:GLN:HG2	2.60	0.42
102:Aq:168:GLN:H	102:Aq:171:ALA:HA	1.84	0.42
105:BP:67:PRO:O	109:Af:48:TYR:HD2	2.03	0.42
1:1:145:A:C2'	1:1:146:U:H5''	2.49	0.42
1:1:438:G:N2	1:1:447:A:C4	2.88	0.42
1:1:754:A:H3'	1:1:755:G:H5''	2.01	0.42
1:1:933:G:C2	1:1:950:A:N6	2.87	0.42
1:1:1132:U:C4	1:1:1133:U:C2	3.07	0.42
1:2:2:U:H2'	25:ad:108:THR:HG21	1.64	0.42
1:2:48:U:H6	1:2:48:U:H3'	1.84	0.42
1:2:138:U:H2'	1:2:139:U:O5'	2.20	0.42
1:2:187:U:N3	1:2:188:A:C2	2.88	0.42
1:2:224:G:C2'	1:2:225:G:C5'	2.85	0.42
1:2:228:G:C8	1:2:242:U:C5	3.07	0.42
1:2:367:A:N3	1:2:367:A:C2'	2.73	0.42
1:2:379:A:H2'	1:2:380:U:O4'	2.20	0.42
1:2:423:C:O4'	1:2:423:C:OP2	2.38	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:496:U:O3'	3:aw:15:ARG:HD2	2.20	0.42
1:2:507:A:OP1	3:aw:27:ARG:NH2	2.51	0.42
1:2:533:U:O2	1:2:533:U:O4'	2.37	0.42
1:2:586:A:C5'	1:2:586:A:H8	2.33	0.42
1:2:606:U:H5'	1:2:606:U:H6	1.85	0.42
10:ae:188:ARG:HH22	13:aj:206:LYS:HZ2	1.67	0.42
10:ae:285:ARG:HA	10:ae:288:TRP:HB3	2.02	0.42
10:ae:414:LEU:HD23	10:ae:414:LEU:HA	1.91	0.42
12:ag:35:TYR:HA	13:aj:45:ASN:OD1	2.20	0.42
13:aj:85:LYS:O	13:aj:93:PRO:HG2	2.20	0.42
13:aj:132:ARG:HH22	13:aj:286:ARG:CZ	2.33	0.42
14:e:755:THR:HG22	14:e:757:TYR:N	2.35	0.42
15:d:100:SER:HA	15:d:103:ILE:HG22	2.02	0.42
17:ax:104:LEU:HD22	34:v:104:ARG:HD3	2.02	0.42
18:r:141:ILE:HD12	18:r:188:LEU:HD21	2.02	0.42
18:r:208:GLN:OE1	18:r:209:PRO:HD2	2.20	0.42
19:af:615:LEU:HD22	19:af:734:VAL:HG13	2.01	0.42
20:u:246:LEU:HD12	20:u:249:LYS:HB3	2.02	0.42
20:u:772:GLN:O	20:u:776:ILE:HG13	2.20	0.42
21:aa:282:PHE:O	21:aa:286:ARG:HB2	2.20	0.42
21:aa:497:ILE:HG12	21:aa:519:ILE:HD13	2.02	0.42
21:aa:648:GLU:HG2	21:aa:649:ALA:N	2.35	0.42
21:aa:661:VAL:HG22	21:aa:678:VAL:HG22	2.02	0.42
21:aa:849:LYS:HB3	21:aa:849:LYS:HE2	1.83	0.42
21:aa:1409:GLU:OE2	21:aa:1467:GLU:HG3	2.20	0.42
21:aa:1518:TYR:HE2	26:an:216:HIS:CE1	2.38	0.42
22:ab:239:VAL:HG12	22:ab:240:MET:HE2	2.00	0.42
22:ab:581:VAL:HG12	22:ab:617:TYR:CG	2.55	0.42
22:ab:843:GLU:HA	22:ab:925:GLN:O	2.20	0.42
23:ak:53:MET:HE2	23:ak:63:TYR:HD2	1.85	0.42
23:ak:60:GLU:O	23:ak:64:GLN:N	2.53	0.42
24:ac:136:VAL:HG13	24:ac:137:HIS:ND1	2.35	0.42
25:ad:278:PRO:O	25:ad:282:VAL:HG23	2.20	0.42
25:ad:773:VAL:HG23	50:a:294:HIS:ND1	2.35	0.42
26:an:89:LYS:HZ1	52:z:920:ALA:HA	1.84	0.42
27:ao:176:HIS:CD2	27:ao:182:ALA:HA	2.55	0.42
30:as:52:LEU:HD13	30:as:191:PHE:CD2	2.54	0.42
30:as:59:THR:HB	30:as:195:ARG:HH11	1.85	0.42
30:as:269:TRP:NE1	35:t:120:GLU:HB3	2.34	0.42
32:y:175:ARG:NH1	36:p:166:GLU:OE1	2.53	0.42
33:w:150:ARG:O	33:w:153:GLN:HG2	2.20	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
33:w:174:ALA:HA	33:w:177:GLU:HB2	2.02	0.42
35:t:101:PHE:HB2	35:t:142:SER:HA	2.01	0.42
36:p:125:MET:HE3	36:p:146:VAL:O	2.20	0.42
37:j:121:LYS:HD2	45:o:444:TRP:NE1	2.35	0.42
37:j:185:VAL:C	37:j:189:LEU:HB3	2.44	0.42
38:l:8:LEU:HD23	38:l:8:LEU:HA	1.83	0.42
39:ar:21:ILE:HA	39:ar:24:ARG:HB2	2.02	0.42
39:ar:186:HIS:NE2	39:ar:189:THR:OG1	2.52	0.42
43:i:274:TYR:O	43:i:278:ILE:HG12	2.19	0.42
48:q:13:ARG:CZ	48:q:26:ARG:HH21	2.33	0.42
49:b:5:SER:HB2	49:b:98:LEU:HD11	2.02	0.42
49:b:105:LYS:C	49:b:107:ASN:H	2.28	0.42
50:a:119:SER:OG	50:a:120:ASN:N	2.53	0.42
50:a:254:ILE:O	50:a:256:LEU:N	2.53	0.42
52:z:306:ASP:HB3	52:z:309:CYS:HB3	2.01	0.42
52:z:1016:VAL:HG12	52:z:1017:TYR:CD1	2.55	0.42
52:z:1025:ARG:NH2	52:z:1027:TYR:HE1	2.17	0.42
55:B:374:LEU:HD12	55:B:374:LEU:HA	1.89	0.42
56:C:215:PRO:HA	56:C:218:GLN:CD	2.44	0.42
58:E:126:LEU:HD12	108:Av:23:LYS:HD2	2.02	0.42
59:F:23:LEU:HD12	59:F:23:LEU:HA	1.79	0.42
59:F:135:HIS:O	59:F:140:PRO:HD3	2.19	0.42
60:G:16:PRO:HG2	60:G:19:GLN:CG	2.50	0.42
60:G:104:VAL:CG1	99:Aj:407:ARG:HD2	2.49	0.42
60:G:196:THR:OG1	60:G:265:GLU:OE2	2.37	0.42
66:M:53:HIS:CD2	66:M:58:PRO:HB3	2.54	0.42
69:P:80:TYR:CD2	102:Aq:55:ASN:ND2	2.88	0.42
70:Q:88:THR:OG1	102:Aq:328:GLN:OE1	2.37	0.42
71:R:415:ALA:O	71:R:419:GLN:HG3	2.20	0.42
73:T:34:ASN:HD22	73:T:36:MET:HE2	1.84	0.42
78:Y:238:HIS:HA	78:Y:244:ARG:HH21	1.85	0.42
79:Z:12:PHE:O	79:Z:33:ASP:HB2	2.20	0.42
79:Z:68:ARG:HB2	79:Z:79:LEU:HD13	2.02	0.42
80:BA:96:LEU:HD23	80:BA:129:ALA:HB2	2.01	0.42
82:BB:128:ASP:OD1	82:BB:128:ASP:C	2.63	0.42
84:Bj:97:PHE:HB3	112:Ac:91:ALA:HB3	2.02	0.42
86:Al:254:ASP:N	86:Al:254:ASP:OD1	2.53	0.42
88:Az:40:TRP:HB2	88:Az:102:GLN:OE1	2.19	0.42
90:BC:51:ARG:HB3	90:BC:67:ASN:ND2	2.35	0.42
91:Ab:130:PRO:HD3	95:Aa:69:THR:OG1	2.20	0.42
93:Ap:40:PHE:HB2	93:Ap:45:ARG:HG2	2.02	0.42

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
94:Au:73:TYR:CD1	94:Au:73:TYR:C	2.97	0.42
95:Aa:94:THR:HB	95:Aa:110:PRO:HD3	2.01	0.42
97:BM:155:TYR:O	97:BM:158:MET:N	2.50	0.42
97:BM:233:VAL:HG22	97:BM:332:ASP:OD2	2.20	0.42
97:BM:366:VAL:HG13	97:BM:370:GLU:HB2	2.01	0.42
98:Ar:167:CYS:O	98:Ar:191:VAL:HG22	2.20	0.42
99:Aj:144:GLN:HB3	99:Aj:312:GLU:HG2	2.01	0.42
99:Aj:212:ASP:HA	99:Aj:215:THR:HG22	2.02	0.42
100:BH:85:ILE:HG12	100:BH:181:GLY:HA2	2.01	0.42
101:Am:292:GLY:O	111:Ae:258:MET:HE2	2.20	0.42
102:Aq:120:PHE:HD1	102:Aq:120:PHE:HA	1.66	0.42
105:BP:10:TYR:H	105:BP:10:TYR:HD1	1.68	0.42
108:Av:37:TYR:CE1	108:Av:41:PRO:HD3	2.55	0.42
108:Av:86:ILE:HD12	108:Av:88:ILE:HG12	2.01	0.42
108:Av:117:HIS:CD2	1:1:452:A:H5'	2.54	0.42
110:As:57:ARG:HE	110:As:130:THR:HG1	1.63	0.42
110:As:99:GLU:HA	110:As:132:ILE:HD11	2.01	0.42
112:Ac:130:VAL:HG13	112:Ac:134:TYR:HB2	2.00	0.42
112:Ac:216:SER:OG	112:Ac:217:ASN:N	2.53	0.42
113:Ah:422:TYR:CD2	113:Ah:423:LEU:HD12	2.54	0.42
114:BD:66:CYS:O	114:BD:68:ARG:N	2.53	0.42
116:Ag:62:ARG:HB2	1:1:104:U:OP2	2.19	0.42
117:Ax:127:ASN:ND2	117:Ax:127:ASN:N	2.66	0.42
118:BL:265:ARG:NH1	1:1:666:A:OP2	2.53	0.42
119:BO:58:VAL:HB	119:BO:135:GLN:HE22	1.85	0.42
119:BO:74:CYS:O	119:BO:76:HIS:ND1	2.53	0.42
1:1:39:U:C1'	1:1:40:C:OP1	2.67	0.42
1:1:231:C:N3	1:1:305:U:H5'	2.35	0.42
1:1:238:U:H6	1:1:238:U:H2'	1.71	0.42
1:1:269:A:N3	1:1:271:U:O2'	2.50	0.42
1:1:424:A:N6	1:1:476:A:OP2	2.53	0.42
1:1:896:A:C4	1:1:915:G:O6	2.72	0.42
1:1:954:A:N1	1:1:970:A:H3'	2.35	0.42
1:2:70:A:OP2	35:t:30:SER:CB	2.68	0.41
1:2:158:U:O2'	29:aq:18:TYR:N	2.53	0.41
1:2:260:A:C2'	1:2:261:U:O5'	2.68	0.41
1:2:432:G:C8	1:2:432:G:OP1	2.73	0.41
1:2:499:A:OP2	3:aw:12:ALA:HB2	2.17	0.41
1:2:504:A:C1'	6:s:80:GLN:NE2	2.82	0.41
1:2:511:U:C6	11:ay:156:PHE:HB3	2.46	0.41
5:f:193:ASP:OD1	5:f:194:TYR:N	2.53	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
12:ag:38:SER:O	12:ag:38:SER:OG	2.29	0.41
12:ag:74:TYR:HA	12:ag:77:HIS:CD2	2.55	0.41
12:ag:238:ILE:O	12:ag:242:ALA:N	2.51	0.41
12:ag:375:ARG:O	12:ag:378:PHE:N	2.53	0.41
13:aj:161:PRO:HA	13:aj:164:GLN:HB2	2.02	0.41
14:e:148:THR:HA	14:e:151:THR:OG1	2.19	0.41
14:e:188:LEU:HD22	19:af:308:GLU:OE2	2.19	0.41
14:e:441:ASN:HD22	20:u:668:GLN:NE2	2.18	0.41
14:e:556:TRP:HZ2	14:e:578:ALA:HA	1.85	0.41
15:d:86:GLU:OE2	15:d:97:ARG:NH1	2.51	0.41
17:ax:46:TRP:HB3	17:ax:49:LYS:HD3	2.02	0.41
17:ax:49:LYS:N	17:ax:49:LYS:HD2	2.34	0.41
18:r:29:HIS:NE2	18:r:391:LEU:HD22	2.34	0.41
18:r:217:GLU:HA	18:r:220:HIS:CE1	2.55	0.41
18:r:218:TRP:NE1	18:r:230:ARG:HH11	2.18	0.41
19:af:322:LEU:O	19:af:326:ILE:HG12	2.20	0.41
19:af:742:VAL:HG21	19:af:777:VAL:HG11	2.02	0.41
20:u:151:LEU:HD23	20:u:151:LEU:HA	1.83	0.41
21:aa:225:CYS:O	21:aa:228:TRP:HB2	2.20	0.41
21:aa:591:ASP:HB2	21:aa:598:PHE:CZ	2.55	0.41
21:aa:632:TYR:CE1	21:aa:736:VAL:HB	2.55	0.41
21:aa:1405:THR:HG21	21:aa:1496:ILE:HB	2.02	0.41
22:ab:225:ILE:HD13	22:ab:230:ARG:HG3	2.02	0.41
22:ab:843:GLU:HB3	22:ab:924:TRP:NE1	2.34	0.41
22:ab:949:ARG:O	22:ab:1001:ILE:HG23	2.20	0.41
24:ac:881:LEU:HG	24:ac:1089:PRO:HD3	2.02	0.41
25:ad:124:TYR:CE1	48:q:84:LYS:HE2	2.54	0.41
25:ad:226:THR:HG23	25:ad:227:TRP:CD1	2.55	0.41
26:an:92:LEU:HD13	52:z:935:LEU:HD22	2.02	0.41
28:ap:137:MET:HB3	28:ap:144:MET:HE1	2.02	0.41
30:as:116:ARG:HD2	35:t:158:THR:HG23	2.01	0.41
35:t:98:PHE:CD2	35:t:103:LEU:HD21	2.55	0.41
36:p:269:THR:OG1	36:p:270:ILE:N	2.53	0.41
38:l:584:LEU:HG	38:l:588:LEU:HD13	2.02	0.41
41:ai:45:VAL:O	41:ai:49:VAL:HG23	2.20	0.41
41:ai:206:LEU:O	41:ai:210:LEU:HG	2.20	0.41
42:x:208:PRO:CG	42:x:215:PRO:HB3	2.50	0.41
42:x:209:ILE:HD13	42:x:209:ILE:HA	1.86	0.41
45:o:340:LYS:HD3	45:o:340:LYS:HA	1.86	0.41
48:q:171:SER:O	48:q:175:TYR:OH	2.31	0.41
48:q:188:ASP:N	48:q:192:ASN:O	2.52	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
49:b:23:ARG:HD2	85:An:150:PHE:CG	2.50	0.41
50:a:245:PHE:CE2	50:a:276:VAL:HG11	2.55	0.41
50:a:279:LEU:HD12	50:a:279:LEU:HA	1.87	0.41
50:a:377:GLU:O	50:a:380:GLN:HB2	2.20	0.41
54:A:325:ASP:HB3	62:I:26:GLY:HA3	2.01	0.41
55:B:19:ASP:OD2	91:Ab:48:ARG:HG2	2.20	0.41
55:B:56:PRO:HG3	99:Aj:432:LEU:O	2.20	0.41
58:E:149:LEU:O	58:E:192:ILE:HG12	2.21	0.41
58:E:277:LEU:HD12	58:E:333:GLN:HA	2.01	0.41
59:F:113:ARG:HD2	1:1:151:G:OP1	2.20	0.41
59:F:162:ARG:NH2	1:1:414:U:O2	2.52	0.41
60:G:99:GLN:OE1	1:1:183:U:N3	2.52	0.41
60:G:349:GLN:HB3	60:G:350:PRO:HD2	2.02	0.41
62:I:80:LYS:O	62:I:82:TYR:N	2.53	0.41
62:I:145:MET:O	62:I:163:VAL:HA	2.20	0.41
65:L:160:LEU:HD11	101:Am:252:MET:O	2.20	0.41
66:M:86:VAL:HA	66:M:90:GLN:O	2.20	0.41
71:R:57:GLU:O	71:R:61:LEU:N	2.49	0.41
77:X:266:PRO:HD3	77:X:338:LEU:HD13	2.01	0.41
77:X:484:ARG:HD2	77:X:511:TYR:CE1	2.55	0.41
79:Z:92:MET:HE3	79:Z:92:MET:HB3	1.89	0.41
79:Z:106:TYR:OH	79:Z:118:HIS:NE2	2.25	0.41
80:BA:150:ILE:H	80:BA:150:ILE:HG13	1.61	0.41
83:Aw:8:ARG:HB3	86:Al:287:TRP:CH2	2.55	0.41
83:Aw:47:PHE:CE2	83:Aw:83:LEU:HD21	2.55	0.41
85:An:46:GLN:HB2	116:Ag:14:PRO:CD	2.47	0.41
85:An:143:TYR:N	85:An:143:TYR:HD1	2.15	0.41
86:Al:285:LEU:O	86:Al:286:ASP:HB2	2.19	0.41
90:BC:14:MET:SD	102:Aq:2:LEU:HD12	2.60	0.41
91:Ab:28:PHE:CE2	91:Ab:33:LEU:HD12	2.55	0.41
92:Ai:217:LEU:HD23	92:Ai:217:LEU:H	1.85	0.41
96:Ao:64:TRP:HE3	96:Ao:68:MET:HG2	1.85	0.41
96:Ao:131:LEU:HD23	96:Ao:131:LEU:HA	1.91	0.41
98:Ar:20:ILE:O	98:Ar:41:LEU:HA	2.19	0.41
98:Ar:81:VAL:O	98:Ar:81:VAL:HG13	2.20	0.41
102:Aq:88:ALA:N	102:Aq:91:THR:HB	2.26	0.41
105:BP:10:TYR:CG	105:BP:11:GLY:N	2.88	0.41
106:Ad:74:LEU:HD23	106:Ad:202:LYS:HD2	2.01	0.41
106:Ad:198:GLU:O	106:Ad:202:LYS:HE3	2.19	0.41
113:Ah:99:GLN:O	113:Ah:102:CYS:N	2.49	0.41
113:Ah:268:ASN:H	113:Ah:272:GLN:HE21	1.68	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
114:BD:82:LEU:HD13	116:Ag:119:THR:HG22	2.02	0.41
117:Ax:75:VAL:O	117:Ax:76:PRO:C	2.63	0.41
119:BO:172:ARG:CZ	119:BO:172:ARG:CB	2.98	0.41
120:BG:1319:SER:HB2	120:BG:1322:THR:H	1.84	0.41
1:1:355:U:N3	1:1:356:A:N7	2.67	0.41
1:1:792:C:H2'	1:1:793:C:O4'	2.20	0.41
1:1:870:A:H2'	1:1:871:A:C5	2.54	0.41
1:1:875:G:N2	1:1:992:G:O6	2.25	0.41
1:1:1008:A:H3'	1:1:1009:A:O4'	2.19	0.41
1:2:2:U:H4'	1:2:3:C:H5'	2.02	0.41
1:2:58:U:O4	1:2:124:A:H4'	2.20	0.41
1:2:239:C:C3'	1:2:240:G:C5'	2.98	0.41
1:2:343:C:O5'	1:2:343:C:H6	2.03	0.41
1:2:344:C:N4	1:2:345:G:C2	2.88	0.41
1:2:344:C:C4	1:2:345:G:C5	3.08	0.41
1:2:471:A:OP1	13:aj:11:GLY:C	2.63	0.41
1:2:492:U:O2	1:2:492:U:H2'	2.19	0.41
1:2:526:A:N6	15:d:293:GLU:HG3	2.21	0.41
4:m:52:ALA:HA	36:p:67:GLN:HE22	1.85	0.41
6:s:15:TYR:HB2	14:e:769:PRO:HB3	2.02	0.41
6:s:60:SER:OG	6:s:62:GLU:OE2	2.38	0.41
8:am:212:LEU:HD12	21:aa:1008:PHE:HB3	2.02	0.41
10:ae:204:ARG:HG2	14:e:566:SER:HB2	2.02	0.41
10:ae:349:LEU:HG	10:ae:449:ARG:HH11	1.84	0.41
10:ae:465:ARG:O	10:ae:469:VAL:HG12	2.20	0.41
12:ag:316:HIS:O	12:ag:319:THR:OG1	2.38	0.41
13:aj:221:LEU:HB3	13:aj:258:TYR:CE2	2.55	0.41
14:e:211:THR:OG1	18:r:334:ASP:O	2.14	0.41
14:e:486:ALA:HA	14:e:495:LEU:HD21	2.02	0.41
14:e:732:SER:OG	14:e:738:TYR:HD1	2.03	0.41
15:d:43:PHE:CD1	15:d:89:SER:HB3	2.55	0.41
15:d:267:ASP:OD1	18:r:411:TYR:HE2	2.03	0.41
16:az:10:ASN:N	16:az:119:MET:HB3	2.35	0.41
16:az:55:LEU:O	16:az:59:ALA:N	2.47	0.41
17:ax:94:GLU:HG3	17:ax:144:ARG:HB2	2.03	0.41
18:r:128:LEU:O	18:r:131:ALA:N	2.52	0.41
18:r:386:ILE:HG12	18:r:409:LYS:HE2	2.02	0.41
19:af:180:TRP:HZ3	22:ab:960:LYS:HG2	1.85	0.41
19:af:216:GLU:O	19:af:219:VAL:HG12	2.20	0.41
19:af:632:LEU:HD22	19:af:752:PHE:CZ	2.55	0.41
20:u:201:TYR:CE1	20:u:222:LEU:HB3	2.55	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
20:u:616:ALA:O	20:u:620:ARG:N	2.36	0.41
20:u:763:LYS:NZ	20:u:765:ASP:HB2	2.35	0.41
21:aa:289:HIS:ND1	21:aa:289:HIS:O	2.53	0.41
21:aa:463:GLN:HE21	52:z:1069:ARG:HE	1.69	0.41
21:aa:591:ASP:OD2	21:aa:596:ARG:HG3	2.19	0.41
21:aa:941:ARG:HD3	50:a:328:ASN:OD1	2.20	0.41
21:aa:1507:GLU:OE2	21:aa:1507:GLU:N	2.29	0.41
22:ab:263:ARG:NH2	22:ab:815:GLY:HA2	2.35	0.41
22:ab:581:VAL:HG12	22:ab:617:TYR:CD1	2.55	0.41
22:ab:649:LYS:NZ	22:ab:650:TYR:H	2.18	0.41
22:ab:1035:LEU:HD21	53:bd:44:ILE:HG21	2.02	0.41
24:ac:423:LEU:O	24:ac:425:ASP:N	2.53	0.41
24:ac:510:GLU:HG2	24:ac:514:LYS:HZ1	1.85	0.41
24:ac:1155:LYS:HG3	24:ac:1156:LEU:HD22	2.02	0.41
26:an:21:ARG:HE	26:an:240:PRO:HA	1.85	0.41
27:ao:69:THR:O	27:ao:111:ALA:HA	2.20	0.41
28:ap:230:GLY:O	28:ap:234:VAL:HG12	2.21	0.41
29:aq:36:GLN:NE2	29:aq:37:GLN:HG2	2.35	0.41
30:as:124:ILE:HA	30:as:144:PHE:HB2	2.01	0.41
32:y:57:VAL:HG12	32:y:62:LEU:O	2.20	0.41
32:y:179:LEU:HD23	32:y:179:LEU:HA	1.87	0.41
37:j:141:PHE:CZ	48:q:49:VAL:HG21	2.56	0.41
38:l:160:SER:OG	38:l:161:TYR:N	2.52	0.41
38:l:241:VAL:HG23	38:l:254:LEU:HD11	2.02	0.41
38:l:319:GLU:C	38:l:321:LEU:N	2.78	0.41
38:l:335:VAL:O	38:l:339:LEU:HG	2.20	0.41
38:l:575:HIS:HD2	38:l:579:LYS:N	2.17	0.41
39:ar:75:PHE:HD2	39:ar:77:SER:OG	2.02	0.41
40:av:153:LYS:HD2	40:av:158:TYR:CE2	2.55	0.41
45:o:113:MET:HA	45:o:157:ARG:HH22	1.85	0.41
45:o:146:ASP:OD1	45:o:146:ASP:C	2.63	0.41
46:c:203:SER:HG	46:c:208:ARG:HH22	1.60	0.41
48:q:182:GLN:NE2	49:b:45:LEU:HD13	2.34	0.41
52:z:273:ASN:HB2	52:z:369:ARG:HE	1.84	0.41
52:z:880:VAL:HG11	52:z:890:ARG:HD3	2.03	0.41
54:A:308:ARG:HD3	54:A:373:GLN:HE21	1.85	0.41
55:B:2:TYR:C	55:B:4:SER:H	2.27	0.41
60:G:145:ARG:CG	1:1:346:A:H5''	2.50	0.41
60:G:146:LYS:NZ	1:1:345:A:N3	2.65	0.41
61:H:102:MET:HG2	61:H:102:MET:O	2.19	0.41
62:I:177:GLU:OE1	62:I:179:TYR:OH	2.35	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
64:K:155:CYS:SG	99:Aj:207:LEU:HD13	2.60	0.41
65:L:75:GLU:HG3	105:BP:-43:GLU:HA	2.02	0.41
66:M:99:LEU:HD13	66:M:106:MET:HE2	2.02	0.41
66:M:121:GLU:O	66:M:125:ALA:N	2.52	0.41
66:M:138:ALA:HA	66:M:228:SER:OG	2.20	0.41
68:O:111:GLU:CD	1:1:129:U:H4'	2.45	0.41
68:O:117:GLN:HG2	68:O:121:ARG:HG2	2.02	0.41
69:P:33:HIS:CE1	69:P:45:LYS:HE2	2.56	0.41
70:Q:201:LEU:HD23	70:Q:201:LEU:HA	1.77	0.41
71:R:192:TRP:HE3	71:R:320:PRO:HG2	1.85	0.41
71:R:365:PHE:HA	71:R:366:PRO:HD3	1.89	0.41
75:V:36:ARG:HE	75:V:108:MET:HE3	1.85	0.41
75:V:128:ARG:HA	75:V:128:ARG:HD3	1.77	0.41
76:W:92:HIS:HB3	76:W:95:GLU:HB3	2.01	0.41
79:Z:43:ILE:O	79:Z:43:ILE:HG23	2.18	0.41
82:BB:68:VAL:O	82:BB:68:VAL:HG23	2.20	0.41
83:Aw:50:ARG:HD2	83:Aw:79:HIS:HB2	2.02	0.41
83:Aw:164:TRP:CD1	83:Aw:164:TRP:H	2.39	0.41
85:An:68:ARG:NH2	113:Ah:90:LYS:O	2.39	0.41
85:An:218:LYS:O	85:An:219:PRO:C	2.63	0.41
86:Al:43:THR:H	115:Ay:83:ASN:HD22	1.67	0.41
88:Az:29:ILE:HG13	88:Az:30:LEU:HD23	2.02	0.41
89:At:116:LEU:HD23	89:At:116:LEU:HA	1.90	0.41
91:Ab:203:LYS:O	91:Ab:207:THR:HG23	2.20	0.41
92:Ai:172:GLU:OE1	116:Ag:184:ARG:HA	2.20	0.41
92:Ai:222:PRO:HG3	92:Ai:446:LEU:CD1	2.46	0.41
93:Ap:23:ALA:C	93:Ap:191:ARG:HH21	2.20	0.41
94:Au:157:GLN:HE22	94:Au:160:ARG:HD3	1.84	0.41
96:Ao:23:TYR:O	96:Ao:23:TYR:CG	2.73	0.41
96:Ao:188:VAL:HG13	96:Ao:189:ILE:N	2.35	0.41
96:Ao:275:ALA:C	96:Ao:280:ASN:HB2	2.44	0.41
97:BM:139:PRO:O	97:BM:142:ARG:N	2.53	0.41
98:Ar:69:CYS:SG	98:Ar:70:TYR:N	2.93	0.41
98:Ar:122:LEU:N	98:Ar:160:GLN:O	2.53	0.41
98:Ar:127:ARG:CZ	98:Ar:129:LYS:HG3	2.50	0.41
99:Aj:119:LEU:HD12	99:Aj:119:LEU:HA	1.79	0.41
104:Ak:127:LEU:H	104:Ak:234:HIS:CE1	2.38	0.41
106:Ad:137:SER:OG	106:Ad:141:TYR:O	2.30	0.41
108:Av:165:ASP:OD1	108:Av:165:ASP:N	2.46	0.41
113:Ah:126:PHE:HE2	113:Ah:166:TRP:CD1	2.38	0.41
118:BL:123:ASN:OD1	118:BL:124:PRO:HD2	2.19	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
118:BL:331:ASP:OD1	118:BL:332:TRP:N	2.46	0.41
1:1:393:A:H4'	1:1:1012:A:C6	2.55	0.41
1:1:557:A:N6	1:1:573:A:N7	2.69	0.41
1:1:753:U:C2	1:1:754:A:C2	3.07	0.41
1:1:952:U:H5''	1:1:953:U:H5'	2.02	0.41
1:2:43:A:H5''	29:aq:25:GLY:H	1.85	0.41
1:2:70:A:O3'	35:t:10:ALA:O	2.38	0.41
1:2:229:C:H2'	1:2:241:G:C2	2.56	0.41
1:2:249:U:N3	1:2:250:A:N7	2.68	0.41
1:2:277:U:O2'	1:2:278:A:P	2.79	0.41
1:2:286:G:H4'	1:2:287:U:OP2	2.19	0.41
1:2:436:U:O4'	1:2:436:U:P	2.79	0.41
1:2:440:C:O2	2:h:12:HIS:ND1	2.53	0.41
1:2:462:G:H3'	8:am:298:ARG:HD2	2.01	0.41
1:2:479:A:OP1	2:h:20:ARG:CD	2.67	0.41
1:2:551:A:H2'	1:2:552:C:C6	2.55	0.41
2:h:134:TYR:HD2	15:d:335:PHE:CE1	2.38	0.41
3:aw:5:ASN:OD1	16:az:11:THR:HG22	2.20	0.41
5:f:226:LEU:HD13	49:b:46:ARG:NH1	2.34	0.41
9:n:117:ARG:HG2	9:n:126:GLU:HG2	2.01	0.41
10:ae:453:PHE:O	10:ae:471:ARG:NH1	2.42	0.41
14:e:498:ARG:HD2	14:e:610:PRO:HG2	2.02	0.41
16:az:33:ALA:HB2	16:az:62:GLN:HG3	2.02	0.41
18:r:200:LEU:HD23	20:u:834:TYR:OH	2.20	0.41
20:u:55:MET:HB2	20:u:57:THR:HG22	2.02	0.41
20:u:132:THR:HA	20:u:322:ALA:HA	2.02	0.41
20:u:144:LEU:HB3	20:u:145:PRO:HD3	2.02	0.41
20:u:278:VAL:HG13	20:u:335:SER:HB3	2.02	0.41
21:aa:321:ARG:C	21:aa:342:HIS:HD1	2.26	0.41
21:aa:954:SER:O	21:aa:958:THR:HG23	2.20	0.41
21:aa:980:ARG:NH2	21:aa:984:ALA:HB2	2.35	0.41
22:ab:263:ARG:CZ	22:ab:815:GLY:HA2	2.50	0.41
24:ac:752:TRP:HB3	24:ac:825:TRP:HB3	2.01	0.41
32:y:97:TYR:HA	32:y:100:LYS:HD2	2.03	0.41
33:w:116:PRO:O	33:w:118:GLU:N	2.52	0.41
36:p:37:MET:HE2	36:p:37:MET:HB2	1.92	0.41
36:p:125:MET:SD	36:p:150:PHE:HB2	2.60	0.41
38:l:161:TYR:HB3	38:l:165:TYR:HD2	1.85	0.41
39:ar:238:LEU:HD23	39:ar:238:LEU:HA	1.86	0.41
41:ai:158:GLN:HB2	41:ai:165:LEU:HD23	2.02	0.41
42:x:137:ARG:HG3	42:x:257:LEU:HD13	2.01	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
42:x:221:THR:O	42:x:226:ARG:NH1	2.53	0.41
45:o:200:PHE:CE1	51:ba:77:THR:HG21	2.55	0.41
45:o:210:VAL:HG23	45:o:210:VAL:O	2.21	0.41
52:z:127:VAL:HA	52:z:130:TRP:CD1	2.54	0.41
52:z:141:HIS:CD2	52:z:142:PRO:HD2	2.55	0.41
52:z:372:THR:HG22	52:z:372:THR:O	2.21	0.41
52:z:566:LEU:HD23	52:z:571:GLU:HB3	2.03	0.41
52:z:1011:LYS:HB3	52:z:1011:LYS:HE2	1.92	0.41
52:z:1032:ALA:HA	52:z:1035:ASP:OD1	2.20	0.41
54:A:217:ASP:OD1	54:A:217:ASP:N	2.51	0.41
57:D:109:LEU:HD23	57:D:109:LEU:HA	1.94	0.41
63:J:121:SER:OG	63:J:124:HIS:N	2.33	0.41
66:M:36:LEU:HD12	66:M:36:LEU:HA	1.69	0.41
67:N:108:LYS:HA	88:Az:35:LEU:HD13	2.02	0.41
68:O:192:GLU:N	68:O:192:GLU:OE1	2.53	0.41
69:P:55:GLN:CG	1:1:949:U:HI'	2.51	0.41
69:P:159:THR:OG1	69:P:160:GLU:N	2.53	0.41
71:R:241:SER:HB2	71:R:244:GLU:HB2	2.02	0.41
72:S:367:ARG:HG3	100:BH:137:GLN:NE2	2.35	0.41
74:U:38:MET:HE3	74:U:88:VAL:HG11	2.01	0.41
75:V:129:SER:O	75:V:133:LYS:HB2	2.21	0.41
77:X:233:ALA:HB3	77:X:237:ALA:HA	2.01	0.41
80:BA:27:GLY:HA3	98:Ar:146:ARG:HG3	2.02	0.41
80:BA:68:VAL:HG12	80:BA:114:PHE:HD2	1.85	0.41
81:UA:24:UNK:HA	117:Ax:195:ARG:HH12	1.84	0.41
82:BB:128:ASP:O	82:BB:129:THR:HB	2.19	0.41
85:An:115:LEU:CD1	85:An:217:ARG:HA	2.48	0.41
86:Al:135:GLN:HB2	86:Al:141:GLU:HG2	2.02	0.41
87:BI:141:LEU:O	87:BI:142:PRO:C	2.64	0.41
92:Ai:67:VAL:HG23	92:Ai:121:HIS:CE1	2.55	0.41
92:Ai:274:ASP:OD1	92:Ai:274:ASP:N	2.36	0.41
94:Au:123:ALA:HB1	94:Au:127:ARG:HH21	1.85	0.41
97:BM:176:ALA:HA	97:BM:179:TYR:CD2	2.55	0.41
97:BM:192:LEU:HD21	97:BM:252:VAL:HG13	2.02	0.41
99:Aj:208:GLU:HB2	99:Aj:230:VAL:HG11	2.02	0.41
100:BH:98:LYS:HD2	100:BH:98:LYS:H	1.84	0.41
104:Ak:5:VAL:HG13	104:Ak:60:PHE:O	2.20	0.41
105:BP:-28:ALA:HB3	105:BP:-25:ALA:HB3	2.02	0.41
106:Ad:158:VAL:HG22	106:Ad:238:PHE:CD2	2.56	0.41
110:As:71:THR:O	110:As:74:THR:OG1	2.29	0.41
113:Ah:320:LEU:HA	113:Ah:320:LEU:HD23	1.75	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
115:Ay:61:LEU:HD11	115:Ay:88:VAL:HG11	2.02	0.41
116:Ag:38:LYS:HG2	1:1:85:U:C5	2.55	0.41
117:Ax:205:ARG:HD3	117:Ax:205:ARG:N	2.34	0.41
118:BL:138:VAL:HG13	118:BL:144:ARG:NE	2.35	0.41
118:BL:327:LEU:O	118:BL:329:PRO:HD3	2.20	0.41
119:BO:87:ARG:NH1	119:BO:89:ALA:HB3	2.33	0.41
1:1:181:A:N6	1:1:211:U:OP1	2.54	0.41
1:1:382:A:H3'	1:1:383:A:C8	2.55	0.41
1:1:442:U:O2'	1:1:443:G:OP2	2.38	0.41
1:1:539:U:N3	1:1:540:U:O2	2.53	0.41
1:1:631:C:H4'	1:1:632:A:OP2	2.20	0.41
1:1:997:A:N6	1:1:1012:A:O5'	2.54	0.41
1:1:1080:A:H2'	1:1:1081:U:H6	1.85	0.41
1:1:1131:A:H8	1:1:1131:A:O5'	2.04	0.41
1:2:21:U:H2'	1:2:22:U:O5'	2.20	0.41
1:2:52:U:H4'	1:2:53:U:O2	2.19	0.41
1:2:67:A:H5''	37:j:22:TRP:HZ3	1.85	0.41
1:2:92:U:O2'	1:2:93:U:P	2.78	0.41
1:2:136:U:O2'	1:2:137:G:H5'	2.20	0.41
1:2:280:A:C8	1:2:322:A:OP1	2.71	0.41
1:2:379:A:H8	1:2:379:A:O5'	2.03	0.41
1:2:433:U:O5'	10:ae:13:THR:N	2.33	0.41
1:2:437:U:O4'	1:2:437:U:O2	2.38	0.41
1:2:459:A:H5''	8:am:284:ARG:HH22	1.86	0.41
1:2:484:A:C4	9:n:102:ARG:HD2	2.52	0.41
1:2:484:A:C6	9:n:102:ARG:CD	3.03	0.41
1:2:496:U:H4'	3:aw:15:ARG:CG	2.50	0.41
1:2:496:U:H4'	3:aw:15:ARG:HD2	2.03	0.41
2:h:51:VAL:HG21	2:h:55:LEU:HD11	2.03	0.41
4:m:98:ALA:HB1	44:g:120:GLU:OE1	2.20	0.41
4:m:183:PHE:CZ	5:f:224:LEU:HA	2.54	0.41
4:m:254:GLN:OE1	19:af:202:TYR:OH	2.37	0.41
6:s:133:MET:HG2	7:au:29:TRP:CH2	2.52	0.41
6:s:159:GLY:HA2	7:au:244:TYR:OH	2.21	0.41
7:au:221:PHE:CE2	13:aj:305:ILE:HD11	2.54	0.41
8:am:173:GLU:O	8:am:177:ARG:NH1	2.45	0.41
10:ae:110:SER:HB3	22:ab:1080:ARG:HG3	2.03	0.41
10:ae:164:ILE:O	10:ae:167:TRP:N	2.54	0.41
10:ae:539:VAL:HG21	10:ae:561:HIS:ND1	2.35	0.41
12:ag:239:LEU:HD12	12:ag:239:LEU:HA	1.86	0.41
12:ag:370:LYS:O	13:aj:46:ARG:NH2	2.53	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
14:e:444:HIS:CD2	20:u:784:SER:HB2	2.55	0.41
17:ax:75:ARG:N	17:ax:75:ARG:HD2	2.35	0.41
18:r:13:VAL:O	18:r:20:THR:HB	2.20	0.41
18:r:401:HIS:HD2	18:r:444:LYS:NZ	2.18	0.41
19:af:360:GLN:O	19:af:363:HIS:HB3	2.19	0.41
19:af:401:ASP:OD1	19:af:401:ASP:N	2.54	0.41
19:af:467:ASP:OD2	19:af:519:ARG:NE	2.34	0.41
19:af:649:THR:HG23	19:af:762:LEU:HD21	2.02	0.41
19:af:768:PHE:O	19:af:772:GLU:N	2.49	0.41
20:u:223:ARG:HH11	20:u:247:ARG:HE	1.66	0.41
20:u:700:GLN:HG3	20:u:701:TYR:CD1	2.56	0.41
21:aa:643:LEU:HD12	21:aa:643:LEU:HA	1.88	0.41
21:aa:946:ARG:HG2	26:an:272:LYS:NZ	2.35	0.41
21:aa:1093:ARG:O	21:aa:1097:LEU:HB2	2.19	0.41
21:aa:1453:GLY:HA2	21:aa:1574:ILE:HG12	2.02	0.41
22:ab:41:ASP:HB2	22:ab:42:PRO:HD2	2.02	0.41
22:ab:86:HIS:ND1	38:l:593:LEU:O	2.53	0.41
23:ak:26:LEU:HD21	23:ak:129:LYS:HG2	2.03	0.41
23:ak:150:ARG:O	23:ak:154:GLU:HB2	2.20	0.41
24:ac:1173:GLY:O	38:l:521:ARG:NH1	2.53	0.41
25:ad:692:ASP:OD1	25:ad:692:ASP:N	2.53	0.41
25:ad:740:ARG:NH1	46:c:111:PRO:O	2.49	0.41
28:ap:82:LEU:HG	28:ap:101:LEU:HD11	2.02	0.41
29:aq:126:LEU:O	29:aq:129:SER:OG	2.34	0.41
29:aq:155:LEU:HD21	29:aq:190:LEU:HD22	2.02	0.41
30:as:148:LEU:O	30:as:148:LEU:HD12	2.20	0.41
35:t:67:GLU:OE2	35:t:69:ASP:N	2.53	0.41
35:t:148:GLY:N	35:t:161:VAL:O	2.52	0.41
36:p:196:THR:O	36:p:200:VAL:HG23	2.20	0.41
38:l:139:LYS:HG3	38:l:140:PRO:N	2.34	0.41
38:l:572:SER:O	38:l:575:HIS:ND1	2.53	0.41
39:ar:78:LEU:HD21	39:ar:259:VAL:HG22	2.02	0.41
39:ar:156:THR:HB	39:ar:158:LYS:HD3	2.01	0.41
41:ai:25:ILE:O	41:ai:28:TRP:HB2	2.20	0.41
41:ai:211:ILE:HD11	41:ai:230:LEU:HB3	2.02	0.41
41:ai:279:ASN:OD1	48:q:107:GLN:HG2	2.20	0.41
42:x:257:LEU:HA	42:x:260:HIS:CD2	2.53	0.41
45:o:132:ARG:NH2	50:a:344:TYR:HB2	2.35	0.41
45:o:269:LEU:O	45:o:310:LYS:HG2	2.20	0.41
48:q:81:ASN:O	48:q:85:SER:OG	2.30	0.41
49:b:106:HIS:CD2	52:z:181:PRO:HB2	2.55	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
49:b:152:ARG:HG3	49:b:156:TYR:HA	2.02	0.41
52:z:272:LEU:HD12	52:z:272:LEU:HA	1.83	0.41
52:z:523:TRP:CD1	52:z:773:LEU:HD13	2.56	0.41
52:z:915:PHE:H	52:z:921:VAL:HG22	1.85	0.41
57:D:22:LEU:HD11	111:Ae:226:ASP:HB3	2.00	0.41
58:E:307:ARG:NH1	58:E:325:LEU:HD13	2.35	0.41
59:F:143:LEU:HD12	59:F:143:LEU:HA	1.92	0.41
60:G:211:VAL:O	60:G:211:VAL:HG13	2.20	0.41
60:G:358:TRP:O	60:G:359:HIS:CG	2.73	0.41
63:J:54:ILE:HG23	63:J:120:GLY:CA	2.48	0.41
63:J:142:ARG:HB3	1:1:805:U:H5''	2.02	0.41
66:M:172:GLY:O	66:M:176:VAL:HG12	2.21	0.41
68:O:28:ALA:HB1	68:O:29:ARG:NE	2.23	0.41
68:O:132:LYS:O	68:O:133:PRO:C	2.63	0.41
70:Q:175:GLN:O	85:An:235:HIS:NE2	2.52	0.41
71:R:261:ALA:C	89:At:108:MET:HG3	2.45	0.41
71:R:312:THR:HG22	71:R:313:LYS:HG3	2.02	0.41
71:R:348:LEU:HB3	85:An:318:ILE:HD13	2.02	0.41
74:U:77:LEU:HD21	116:Ag:175:VAL:HG21	2.02	0.41
77:X:380:GLN:OE1	77:X:384:LYS:HD3	2.20	0.41
78:Y:101:GLU:OE2	78:Y:104:ARG:NH1	2.54	0.41
80:BA:104:LEU:HD23	80:BA:104:LEU:HA	1.96	0.41
82:BB:113:PRO:HG2	111:Ae:8:TYR:HD2	1.86	0.41
86:Al:250:GLN:C	86:Al:252:TYR:H	2.28	0.41
94:Au:171:SER:OG	94:Au:171:SER:O	2.39	0.41
98:Ar:40:ARG:HD3	98:Ar:42:ILE:CG2	2.49	0.41
103:BE:91:ILE:HG22	103:BE:95:ARG:HB2	2.03	0.41
104:Ak:15:ARG:HG2	104:Ak:89:VAL:HG23	2.02	0.41
104:Ak:130:GLU:HG2	104:Ak:233:ILE:HB	2.02	0.41
108:Av:36:PRO:HB2	108:Av:81:LYS:NZ	2.36	0.41
109:Af:22:LEU:HD12	109:Af:23:PRO:HD2	2.01	0.41
111:Ae:38:LEU:HD23	111:Ae:38:LEU:HA	1.74	0.41
112:Ac:225:LEU:HG	112:Ac:227:ASP:H	1.86	0.41
113:Ah:56:HIS:O	113:Ah:58:VAL:N	2.53	0.41
113:Ah:347:ASN:HB3	113:Ah:348:PRO:HD3	2.02	0.41
114:BD:62:ARG:HA	114:BD:69:VAL:HA	2.02	0.41
118:BL:72:ARG:HA	118:BL:72:ARG:HD2	1.89	0.41
119:BO:49:ASN:OD1	119:BO:49:ASN:N	2.53	0.41
119:BO:50:GLY:HA2	119:BO:56:ALA:CB	2.49	0.41
119:BO:133:ARG:O	119:BO:147:PHE:HB2	2.21	0.41
1:1:649:A:O2'	1:1:650:U:OP2	2.38	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:688:C:H42	1:1:710:A:N6	2.18	0.41
1:2:39:U:H5	33:w:129:TYR:CZ	2.38	0.41
1:2:55:G:N3	1:2:56:U:C5	2.85	0.41
1:2:70:A:C3'	35:t:10:ALA:C	2.94	0.41
1:2:106:U:C2	1:2:110:A:C2	3.09	0.41
1:2:231:A:N1	1:2:247:U:H1'	2.35	0.41
1:2:305:C:O2'	1:2:306:A:C5'	2.69	0.41
1:2:442:A:C4'	1:2:443:C:OP1	2.68	0.41
1:2:459:A:C5'	8:am:284:ARG:HH12	2.31	0.41
1:2:483:A:O2'	1:2:484:A:H5'	2.21	0.41
1:2:556:U:C6	1:2:556:U:H5'	2.55	0.41
3:aw:94:TYR:CD2	14:e:145:LYS:HE2	2.56	0.41
4:m:42:PRO:HG2	15:d:6:TYR:CE1	2.54	0.41
4:m:259:TYR:CE2	18:r:442:ARG:HD2	2.56	0.41
7:au:236:ASP:HB3	7:au:240:GLN:CG	2.50	0.41
8:am:143:ARG:HA	8:am:143:ARG:HD2	1.72	0.41
8:am:187:ARG:HD3	52:z:505:ARG:HD3	2.01	0.41
9:n:93:TRP:CD1	10:ae:67:TYR:CZ	3.08	0.41
14:e:235:ASN:ND2	14:e:335:GLU:HB3	2.35	0.41
14:e:441:ASN:HB3	20:u:675:GLY:HA3	2.00	0.41
15:d:248:LEU:HB3	15:d:259:MET:HE3	2.03	0.41
16:az:21:PRO:HB2	16:az:100:TYR:CE1	2.56	0.41
16:az:83:TYR:CE1	34:v:114:CYS:HB3	2.56	0.41
19:af:227:ARG:O	19:af:229:VAL:N	2.48	0.41
19:af:298:LEU:HD12	19:af:301:LEU:HD12	2.02	0.41
20:u:359:VAL:HG23	20:u:362:GLU:HB2	2.01	0.41
20:u:398:ARG:HB3	20:u:580:VAL:HG13	2.02	0.41
21:aa:242:ALA:HA	21:aa:252:ARG:HB2	2.02	0.41
21:aa:1448:PHE:HB2	21:aa:1605:PHE:HE2	1.86	0.41
22:ab:460:ARG:HD3	22:ab:464:TYR:CD2	2.55	0.41
22:ab:1031:ARG:C	22:ab:1032:GLN:HE21	2.29	0.41
23:ak:7:ASN:HD21	23:ak:142:GLN:HE21	1.67	0.41
23:ak:200:LEU:HD23	24:ac:786:GLU:HG3	2.02	0.41
23:ak:240:ALA:O	23:ak:241:PRO:C	2.63	0.41
24:ac:686:ARG:C	24:ac:686:ARG:HD2	2.46	0.41
24:ac:689:ARG:HA	24:ac:689:ARG:HD3	1.77	0.41
24:ac:873:LEU:HD23	24:ac:873:LEU:HA	1.89	0.41
24:ac:1087:PRO:HA	24:ac:1088:PRO:HD3	1.83	0.41
24:ac:1122:PRO:O	24:ac:1124:SER:N	2.54	0.41
25:ad:276:HIS:HE1	43:i:329:GLU:HG2	1.85	0.41
25:ad:307:ASP:OD2	41:ai:165:LEU:HD12	2.21	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:356:PRO:HB2	35:t:157:THR:OG1	2.20	0.41
26:an:82:LEU:HD22	26:an:86:GLN:OE1	2.21	0.41
26:an:245:ASP:OD2	26:an:248:ARG:NH2	2.34	0.41
29:aq:139:ARG:O	29:aq:139:ARG:HG3	2.20	0.41
29:aq:164:ARG:O	29:aq:168:ILE:HG12	2.21	0.41
30:as:245:MET:HE3	35:t:46:TYR:HB2	2.02	0.41
32:y:6:ALA:HB3	32:y:93:SER:HB3	2.03	0.41
33:w:108:VAL:O	33:w:112:GLN:HG2	2.19	0.41
35:t:78:ASP:OD2	35:t:80:LEU:HB3	2.20	0.41
35:t:110:HIS:HB2	35:t:183:PHE:HE1	1.86	0.41
36:p:212:GLN:O	36:p:277:SER:OG	2.39	0.41
38:l:608:VAL:O	38:l:612:ALA:N	2.37	0.41
39:ar:104:ILE:O	39:ar:108:LEU:N	2.49	0.41
43:i:133:GLU:HA	43:i:140:SER:OG	2.19	0.41
45:o:274:PHE:CD1	45:o:311:ALA:HB1	2.56	0.41
46:c:293:ASP:OD1	46:c:296:GLN:HB2	2.20	0.41
50:a:142:LEU:HD21	50:a:144:ILE:HG23	2.03	0.41
52:z:926:VAL:O	52:z:926:VAL:HG13	2.21	0.41
54:A:42:MET:HE3	54:A:47:ARG:HB3	2.02	0.41
54:A:185:VAL:HG23	63:J:20:PHE:CZ	2.55	0.41
54:A:234:GLY:HA3	82:BB:107:GLN:O	2.20	0.41
55:B:21:MET:HA	91:Ab:46:ASP:HA	2.01	0.41
56:C:140:ASN:HB3	56:C:143:VAL:HG23	2.03	0.41
58:E:72:PHE:CG	58:E:79:ALA:HB2	2.55	0.41
58:E:179:ARG:HG3	58:E:179:ARG:NH1	2.32	0.41
58:E:280:GLN:HE22	58:E:333:GLN:HA	1.85	0.41
60:G:87:ASN:O	60:G:90:ILE:HG12	2.21	0.41
60:G:189:LEU:HD23	60:G:189:LEU:HA	1.85	0.41
62:I:93:LEU:O	62:I:96:LEU:N	2.51	0.41
62:I:186:PHE:CZ	107:BF:21:VAL:HG21	2.55	0.41
67:N:170:ILE:O	67:N:219:LYS:HB3	2.21	0.41
71:R:220:SER:N	71:R:223:ASP:OD2	2.53	0.41
71:R:470:HIS:HE1	89:At:47:GLY:CA	2.33	0.41
72:S:352:MET:HE2	1:1:359:C:H1'	2.02	0.41
72:S:362:ARG:C	72:S:364:MET:N	2.78	0.41
75:V:37:MET:HE2	75:V:37:MET:HB3	1.82	0.41
77:X:163:ALA:HA	77:X:409:CYS:O	2.21	0.41
77:X:275:LEU:HD13	106:Ad:33:HIS:CA	2.51	0.41
78:Y:70:ILE:HA	104:Ak:215:HIS:CD2	2.56	0.41
78:Y:130:PRO:HB3	112:Ac:58:PRO:O	2.19	0.41
79:Z:90:LEU:HA	79:Z:90:LEU:HD23	1.76	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
80:BA:66:ALA:CB	80:BA:87:ILE:HA	2.50	0.41
80:BA:93:HIS:NE2	105:BP:87:GLU:OE2	2.54	0.41
80:BA:145:ALA:O	80:BA:149:ALA:N	2.43	0.41
82:BB:110:PHE:HE1	111:Ae:22:GLN:HA	1.85	0.41
82:BB:110:PHE:CE1	111:Ae:22:GLN:HA	2.55	0.41
86:Al:36:GLU:O	86:Al:37:GLN:CB	2.68	0.41
88:Az:146:ASN:HB3	89:At:74:HIS:CE1	2.55	0.41
90:BC:5:TYR:CD2	112:Ac:61:LYS:HD3	2.55	0.41
91:Ab:21:GLY:N	91:Ab:26:ARG:HH12	2.18	0.41
91:Ab:54:GLU:HG3	1:1:516:A:H3'	2.03	0.41
92:Ai:69:PRO:HB2	102:Aq:115:LEU:HD11	2.02	0.41
94:Au:53:ARG:HG3	118:BL:143:TYR:CE1	2.56	0.41
94:Au:80:SER:HB3	113:Ah:240:ALA:H	1.85	0.41
97:BM:76:TYR:CZ	97:BM:326:TYR:HB3	2.55	0.41
97:BM:158:MET:SD	97:BM:214:LYS:HD3	2.60	0.41
97:BM:217:LYS:HB2	97:BM:217:LYS:HE3	1.88	0.41
99:Aj:343:ASN:HD21	1:1:500:U:H5	1.68	0.41
99:Aj:442:TYR:OH	99:Aj:444:ASP:OD2	2.37	0.41
101:Am:57:GLN:O	101:Am:256:MET:HE3	2.20	0.41
102:Aq:54:ILE:HD12	102:Aq:54:ILE:HA	1.82	0.41
102:Aq:288:HIS:CE1	1:1:963:A:H1'	2.55	0.41
104:Ak:281:MET:HE3	104:Ak:281:MET:HB3	1.75	0.41
104:Ak:282:LYS:O	104:Ak:286:GLU:HB2	2.21	0.41
105:BP:10:TYR:CE1	1:1:409:A:H1'	2.55	0.41
105:BP:94:ARG:HG3	105:BP:95:PRO:O	2.21	0.41
106:Ad:21:ALA:O	106:Ad:22:ALA:C	2.63	0.41
106:Ad:158:VAL:O	106:Ad:158:VAL:HG23	2.20	0.41
108:Av:19:LYS:HA	1:1:439:A:H62	1.85	0.41
111:Ae:78:HIS:O	111:Ae:80:HIS:N	2.53	0.41
112:Ac:153:ASP:OD1	112:Ac:153:ASP:N	2.45	0.41
118:BL:127:LYS:HB2	1:1:667:A:OP1	2.20	0.41
119:BO:54:TYR:CD2	119:BO:140:MET:HE3	2.55	0.41
121:UB:34:UNK:O	121:UB:36:UNK:N	2.53	0.41
1:1:521:U:O2'	1:1:522:U:O5'	2.37	0.41
1:1:610:A:H2'	1:1:611:A:O4'	2.21	0.41
1:2:21:U:C2'	1:2:22:U:O5'	2.69	0.41
1:2:282:A:C6	43:i:251:ILE:CB	3.03	0.41
1:2:306:A:O2'	1:2:307:A:P	2.78	0.41
1:2:313:C:C2'	4:m:165:VAL:HB	2.50	0.41
1:2:397:U:O4	5:f:16:PRO:C	2.55	0.41
1:2:426:U:OP2	13:aj:235:GLU:CB	2.56	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:426:U:H4'	1:2:427:U:H3'	2.02	0.41
1:2:497:A:C4'	3:aw:15:ARG:CZ	2.98	0.41
1:2:510:A:C2	3:aw:19:PRO:C	2.99	0.41
1:2:513:U:H4'	16:az:145:ARG:NE	2.35	0.41
1:2:519:U:O2'	1:2:520:A:H5'	2.20	0.41
1:2:570:A:C8	1:2:570:A:C3'	3.03	0.41
3:aw:128:VAL:HA	18:r:111:ARG:HH22	1.86	0.41
7:au:25:ASN:ND2	7:au:28:GLU:OE2	2.51	0.41
7:au:112:LEU:HB3	7:au:154:GLN:HG3	2.03	0.41
7:au:182:ARG:HH21	7:au:219:GLN:HE21	1.67	0.41
8:am:197:LEU:HB2	15:d:117:TYR:CZ	2.55	0.41
8:am:304:ILE:HD13	8:am:304:ILE:HA	1.93	0.41
10:ae:51:TRP:CZ2	10:ae:150:ARG:HA	2.55	0.41
12:ag:213:ALA:O	12:ag:217:ALA:N	2.43	0.41
13:aj:253:ASN:ND2	24:ac:90:ALA:H	2.17	0.41
14:e:370:TRP:HE1	14:e:811:GLU:CD	2.28	0.41
14:e:482:SER:O	14:e:524:VAL:N	2.46	0.41
17:ax:78:ILE:HG13	17:ax:79:ALA:N	2.34	0.41
17:ax:93:ARG:HG3	17:ax:153:HIS:CD2	2.56	0.41
21:aa:382:ALA:O	21:aa:385:SER:HB3	2.21	0.41
21:aa:615:GLN:OE1	21:aa:617:VAL:HB	2.20	0.41
21:aa:1466:VAL:HA	21:aa:1468:TYR:HE1	1.84	0.41
22:ab:396:PRO:O	22:ab:400:ARG:HG2	2.21	0.41
22:ab:580:ILE:HD12	22:ab:595:HIS:CG	2.54	0.41
22:ab:759:HIS:HA	22:ab:764:ALA:HA	2.01	0.41
22:ab:1054:ILE:HG22	22:ab:1056:GLU:H	1.83	0.41
23:ak:228:ALA:O	23:ak:257:GLY:HA3	2.21	0.41
24:ac:378:VAL:O	24:ac:379:GLN:HB2	2.21	0.41
24:ac:867:ARG:HD3	24:ac:882:MET:SD	2.60	0.41
25:ad:240:ARG:NH2	25:ad:241:PHE:HB2	2.35	0.41
25:ad:331:GLU:O	25:ad:381:ARG:NH2	2.44	0.41
25:ad:725:PRO:HG2	25:ad:726:PRO:HD3	2.02	0.41
28:ap:121:PHE:HB3	28:ap:155:SER:OG	2.20	0.41
29:aq:156:GLU:N	29:aq:197:TYR:OH	2.54	0.41
29:aq:166:CYS:HB3	35:t:83:LEU:HD12	2.01	0.41
31:at:218:ILE:HG12	31:at:229:ARG:CZ	2.50	0.41
32:y:202:ARG:O	32:y:205:GLU:HG3	2.21	0.41
35:t:90:ARG:HH12	35:t:106:GLN:NE2	2.19	0.41
38:l:665:VAL:O	38:l:668:TYR:N	2.54	0.41
48:q:36:ARG:NE	48:q:39:MET:HE2	2.35	0.41
48:q:63:ARG:HH11	48:q:67:GLU:CD	2.28	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
49:b:149:SER:OG	49:b:150:ARG:N	2.54	0.41
52:z:258:PRO:HB2	52:z:297:LEU:HB2	2.03	0.41
52:z:260:ARG:HH12	52:z:265:SER:HB2	1.86	0.41
52:z:381:VAL:HG11	52:z:393:ALA:HB1	2.01	0.41
52:z:718:ARG:HE	52:z:772:HIS:HD2	1.68	0.41
52:z:1055:ARG:O	52:z:1059:ARG:HG3	2.21	0.41
54:A:262:VAL:HG22	1:1:809:A:C2	2.56	0.41
54:A:294:THR:N	63:J:6:GLU:OE2	2.53	0.41
55:B:28:VAL:HG23	83:Aw:175:ARG:HH12	1.85	0.41
55:B:86:MET:HE3	83:Aw:148:ASN:HD21	1.85	0.41
55:B:86:MET:HE2	55:B:86:MET:HB3	1.91	0.41
55:B:216:VAL:O	55:B:329:THR:HA	2.21	0.41
55:B:242:HIS:ND1	66:M:59:ARG:HB3	2.36	0.41
55:B:243:LYS:HB3	55:B:243:LYS:HE2	1.90	0.41
59:F:113:ARG:H	59:F:113:ARG:HG3	1.52	0.41
60:G:251:SER:OG	60:G:252:PHE:N	2.53	0.41
62:I:45:MET:SD	121:UB:19:UNK:HA	2.61	0.41
62:I:153:ARG:HD2	62:I:158:VAL:CG1	2.50	0.41
63:J:5:ARG:NH1	1:1:1108:A:OP2	2.54	0.41
63:J:53:ILE:HD12	63:J:53:ILE:HA	1.83	0.41
69:P:26:ARG:HD3	1:1:340:U:OP1	2.20	0.41
70:Q:64:SER:OG	70:Q:81:ARG:HG3	2.21	0.41
71:R:261:ALA:HA	71:R:264:LEU:HG	2.02	0.41
73:T:38:LEU:HD21	1:1:533:U:H5"	2.02	0.41
79:Z:123:GLY:O	79:Z:131:TRP:HD1	2.03	0.41
82:BB:51:ALA:O	82:BB:55:GLN:NE2	2.53	0.41
83:Aw:120:MET:HE3	83:Aw:120:MET:HB3	1.66	0.41
85:An:68:ARG:NH2	113:Ah:91:ASN:HA	2.36	0.41
85:An:126:LEU:HD13	85:An:206:ILE:HA	2.03	0.41
92:Ai:386:SER:O	92:Ai:388:MET:HG2	2.21	0.41
93:Ap:198:MET:HB3	93:Ap:216:TYR:CE1	2.55	0.41
94:Au:30:TRP:CE3	1:1:259:U:C2	3.08	0.41
94:Au:66:LEU:O	94:Au:66:LEU:HD23	2.21	0.41
96:Ao:239:GLY:HA3	98:Ar:176:GLU:HG3	2.01	0.41
97:BM:328:TYR:O	97:BM:331:PRO:HD2	2.20	0.41
99:Aj:328:LYS:HA	99:Aj:427:THR:HG23	2.02	0.41
101:Am:93:TYR:CE2	101:Am:132:VAL:HG22	2.56	0.41
103:BE:71:SER:OG	111:Ae:132:HIS:HB2	2.20	0.41
104:Ak:126:PRO:CG	104:Ak:172:PRO:HG2	2.51	0.41
105:BP:95:PRO:HA	105:BP:96:PRO:HD2	1.74	0.41
113:Ah:494:GLU:OE1	113:Ah:494:GLU:N	2.37	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
117:Ax:147:ASN:OD1	117:Ax:147:ASN:C	2.63	0.41
118:BL:247:LEU:HD13	118:BL:370:TYR:CE2	2.56	0.41
118:BL:335:HIS:O	118:BL:336:PRO:C	2.63	0.41
120:BG:1333:ILE:O	120:BG:1335:SER:N	2.54	0.41
1:1:178:U:H2'	1:1:327:U:O4	2.21	0.41
1:1:269:A:HO2'	1:1:270:A:P	2.37	0.41
1:1:798:A:O2'	1:1:799:A:P	2.79	0.41
1:2:44:A:H1'	29:aq:24:LYS:HB2	0.99	0.41
1:2:240:G:C8	1:2:240:G:C4'	3.03	0.41
1:2:361:U:O5'	1:2:361:U:H6	2.04	0.41
1:2:396:A:H4'	1:2:530:A:C5	2.56	0.41
1:2:463:G:OP1	8:am:299:PHE:N	2.54	0.41
1:2:487:C:N4	9:n:146:ARG:NH2	2.63	0.41
1:2:573:A:C2'	1:2:574:C:O5'	2.68	0.41
1:2:599:A:H2'	1:2:600:A:C8	2.56	0.41
3:aw:134:THR:HG22	3:aw:135:LEU:N	2.36	0.41
4:m:215:TYR:CZ	4:m:219:GLN:NE2	2.89	0.41
5:f:94:SER:C	5:f:96:HIS:H	2.29	0.41
6:s:122:ILE:HG22	6:s:123:HIS:CD2	2.56	0.41
12:ag:497:LEU:HB2	22:ab:355:VAL:HG21	2.03	0.41
13:aj:28:CYS:O	14:e:13:ARG:NE	2.47	0.41
13:aj:270:LEU:HA	13:aj:273:THR:HG22	2.03	0.41
14:e:402:ARG:HA	14:e:402:ARG:HD3	1.90	0.41
14:e:425:TRP:CD1	14:e:425:TRP:H	2.38	0.41
14:e:614:PHE:CD2	14:e:668:PRO:HG2	2.55	0.41
16:az:42:LYS:HE3	16:az:56:ARG:NH2	2.36	0.41
16:az:52:GLN:N	16:az:52:GLN:OE1	2.53	0.41
17:ax:64:ASP:HA	18:r:349:ASN:OD1	2.20	0.41
18:r:166:PHE:HE1	18:r:301:ARG:HD2	1.85	0.41
18:r:191:TRP:HH2	18:r:245:GLU:HB2	1.86	0.41
19:af:486:LEU:HD22	19:af:520:TYR:CE1	2.55	0.41
20:u:359:VAL:HG23	20:u:359:VAL:O	2.21	0.41
21:aa:163:ASP:OD1	21:aa:165:ARG:HD3	2.21	0.41
21:aa:199:ASN:OD1	21:aa:202:SER:N	2.54	0.41
21:aa:597:VAL:O	21:aa:755:ARG:HD2	2.21	0.41
21:aa:697:HIS:CD2	21:aa:709:LEU:HB2	2.55	0.41
21:aa:955:PRO:O	21:aa:959:GLN:HG3	2.21	0.41
22:ab:305:ALA:HB3	38:l:460:GLU:OE1	2.20	0.41
22:ab:1148:MET:HE3	22:ab:1148:MET:HB3	1.86	0.41
23:ak:244:LEU:HD22	24:ac:129:ARG:NE	2.33	0.41
24:ac:1063:ARG:HA	24:ac:1066:THR:HB	2.02	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:34:PHE:HA	25:ad:37:LEU:HB2	2.03	0.41
25:ad:174:HIS:ND1	25:ad:208:ASP:OD1	2.54	0.41
25:ad:485:LEU:HD12	25:ad:500:LEU:HD12	2.03	0.41
25:ad:588:GLN:HB2	30:as:194:HIS:CD2	2.56	0.41
26:an:280:LEU:HA	42:x:9:PHE:CD2	2.56	0.41
27:ao:137:TRP:CZ3	27:ao:139:LEU:HD21	2.56	0.41
27:ao:178:SER:OG	27:ao:180:THR:O	2.32	0.41
29:aq:133:GLN:O	29:aq:137:GLN:HG3	2.19	0.41
29:aq:166:CYS:O	29:aq:170:ALA:N	2.52	0.41
30:as:245:MET:HA	48:q:31:PHE:CD2	2.55	0.41
32:y:300:HIS:O	32:y:304:LYS:N	2.50	0.41
33:w:109:LEU:HD22	37:j:134:LYS:HZ3	1.85	0.41
33:w:181:LEU:HA	33:w:184:LYS:HE3	2.02	0.41
36:p:58:PHE:HE2	50:a:49:PRO:HB2	1.86	0.41
38:l:249:ASN:HA	38:l:252:GLU:OE2	2.21	0.41
39:ar:197:ILE:O	39:ar:201:VAL:HG12	2.20	0.41
41:ai:260:PRO:O	41:ai:261:ASP:C	2.63	0.41
43:i:187:LYS:HD2	43:i:187:LYS:HA	1.76	0.41
48:q:158:GLU:H	48:q:158:GLU:CD	2.29	0.41
49:b:32:HIS:HB2	49:b:71:MET:HE1	2.03	0.41
49:b:141:LEU:O	49:b:142:ASP:HB2	2.20	0.41
52:z:107:HIS:CD2	52:z:108:GLN:HG3	2.55	0.41
52:z:368:TRP:CE2	52:z:926:VAL:HB	2.56	0.41
55:B:194:LYS:O	55:B:194:LYS:CE	2.68	0.41
58:E:55:PHE:HE1	58:E:71:GLU:OE2	2.03	0.41
60:G:130:TYR:C	60:G:132:ASP:H	2.28	0.41
63:J:93:ALA:O	63:J:94:ARG:C	2.63	0.41
66:M:13:ARG:NH2	1:1:506:A:O2'	2.52	0.41
66:M:159:ARG:NE	66:M:243:LEU:HD22	2.34	0.41
69:P:51:ARG:NE	69:P:53:PHE:CE2	2.89	0.41
69:P:86:VAL:HG11	69:P:110:VAL:HG11	2.03	0.41
70:Q:107:GLY:O	70:Q:119:GLN:HA	2.21	0.41
71:R:116:ARG:HA	71:R:119:LYS:HB2	2.02	0.41
71:R:148:ARG:HB2	71:R:330:TRP:CE2	2.56	0.41
71:R:261:ALA:O	89:At:108:MET:HG3	2.20	0.41
76:W:91:ALA:HB2	111:Ae:293:PHE:CD1	2.56	0.41
77:X:73:THR:CG2	84:Bj:58:ILE:HG22	2.50	0.41
77:X:76:SER:OG	77:X:77:ASP:N	2.53	0.41
78:Y:220:TYR:HE1	90:BC:67:ASN:HD21	1.67	0.41
83:Aw:152:HIS:ND1	83:Aw:154:THR:HG22	2.35	0.41
87:BI:96:VAL:HG22	87:BI:239:VAL:HG21	2.02	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
91:Ab:14:VAL:HB	91:Ab:47:ILE:HG22	2.02	0.41
92:Ai:274:ASP:HB2	92:Ai:275:PRO:HD2	2.01	0.41
95:Aa:18:ARG:N	1:1:161:U:O2	2.54	0.41
96:Ao:147:SER:OG	96:Ao:150:ASP:HB2	2.21	0.41
97:BM:22:THR:O	97:BM:24:PRO:HD3	2.21	0.41
97:BM:93:LEU:HA	97:BM:96:THR:OG1	2.20	0.41
97:BM:242:THR:HG1	97:BM:276:HIS:CE1	2.34	0.41
97:BM:268:HIS:O	97:BM:272:LYS:HG2	2.20	0.41
98:Ar:162:LEU:HA	98:Ar:195:ILE:HB	2.03	0.41
99:Aj:275:MET:HE3	99:Aj:275:MET:HB2	1.79	0.41
99:Aj:293:GLU:O	99:Aj:296:LEU:N	2.53	0.41
99:Aj:391:LYS:HA	99:Aj:394:ILE:HG22	2.03	0.41
99:Aj:449:LEU:HD12	1:1:514:U:H3'	2.03	0.41
102:Aq:83:GLY:C	102:Aq:85:ASP:H	2.29	0.41
102:Aq:286:MET:HB2	116:Ag:165:ILE:HG13	2.02	0.41
102:Aq:301:GLY:H	102:Aq:304:MET:HE3	1.86	0.41
104:Ak:122:LEU:HD23	104:Ak:218:LEU:HD11	2.02	0.41
112:Ac:160:THR:O	112:Ac:163:ARG:HB2	2.20	0.41
116:Ag:169:ARG:O	116:Ag:173:ILE:HG13	2.21	0.41
118:BL:90:PRO:O	118:BL:91:PHE:CB	2.68	0.41
118:BL:98:MET:HE3	118:BL:98:MET:HB2	1.77	0.41
1:1:177:G:N2	1:1:525:U:H3	2.16	0.41
1:1:432:U:C2	1:1:433:G:C6	3.09	0.41
1:1:513:U:O2'	1:1:514:U:P	2.79	0.41
1:1:536:A:N6	1:1:861:A:H5'	2.35	0.41
1:1:1004:U:H3'	1:1:1005:A:C8	2.55	0.41
1:1:1074:A:C1'	1:1:1075:A:P	3.08	0.41
1:2:15:U:C6	1:2:15:U:C3'	3.03	0.41
1:2:109:U:P	1:2:109:U:C3'	3.07	0.41
1:2:172:A:N7	37:j:17:LYS:CA	2.62	0.41
1:2:180:A:C3'	33:w:105:ARG:CB	2.79	0.41
1:2:189:A:O2'	1:2:190:A:C8	2.70	0.41
1:2:242:U:OP1	1:2:242:U:C4'	2.67	0.41
1:2:410:A:OP2	9:n:36:THR:HG22	2.21	0.41
1:2:419:A:O2'	13:aj:59:VAL:HG22	2.21	0.41
1:2:428:U:HO2'	1:2:429:A:P	2.44	0.41
1:2:437:U:C4	6:s:151:ARG:C	2.99	0.41
1:2:453:A:H4'	8:am:277:PRO:CD	2.50	0.41
1:2:458:A:C2	19:af:190:ARG:CZ	2.81	0.41
1:2:459:A:C5'	8:am:284:ARG:NH1	2.84	0.41
1:2:459:A:H8	8:am:308:PRO:HA	1.85	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:497:A:O3'	3:aw:4:ALA:CB	2.68	0.41
1:2:525:A:H3'	15:d:331:GLU:H	1.58	0.41
1:2:585:U:C6	1:2:585:U:C4'	3.03	0.41
1:2:605:A:P	44:g:84:SER:H	2.42	0.41
4:m:103:ARG:HH22	36:p:110:MET:HB3	1.85	0.41
4:m:281:ARG:NH2	34:v:112:SER:O	2.54	0.41
5:f:10:ARG:HG2	15:d:348:PHE:O	2.21	0.41
5:f:147:ARG:HG2	44:g:154:TYR:CE2	2.55	0.41
5:f:190:LEU:HD13	5:f:194:TYR:HD2	1.86	0.41
7:au:139:HIS:CD2	7:au:176:ASP:HB3	2.54	0.41
7:au:146:GLN:HG2	7:au:149:TRP:CZ3	2.56	0.41
8:am:103:TYR:OH	19:af:172:ARG:HB2	2.20	0.41
8:am:123:ASP:HA	8:am:126:PHE:HB2	2.02	0.41
9:n:89:ILE:HD12	10:ae:89:GLU:OE2	2.21	0.41
10:ae:347:CYS:O	10:ae:351:VAL:N	2.36	0.41
10:ae:483:HIS:O	10:ae:486:ARG:HG2	2.21	0.41
10:ae:507:ARG:NE	10:ae:530:ALA:HB3	2.35	0.41
11:ay:54:LEU:O	11:ay:57:ARG:HB3	2.21	0.41
13:aj:67:ILE:O	13:aj:161:PRO:HB3	2.20	0.41
14:e:545:GLN:O	14:e:546:GLN:C	2.63	0.41
14:e:768:VAL:HG13	14:e:771:LYS:HB2	2.01	0.41
15:d:83:LYS:NZ	42:x:114:SER:O	2.51	0.41
15:d:241:VAL:HG11	18:r:415:PHE:CE1	2.56	0.41
18:r:9:LYS:O	18:r:23:VAL:HG23	2.21	0.41
18:r:49:LEU:HD12	18:r:49:LEU:HA	1.78	0.41
18:r:413:ILE:HA	18:r:416:MET:HE2	2.02	0.41
19:af:379:VAL:HG12	19:af:448:THR:HG21	2.02	0.41
19:af:440:ARG:HA	19:af:443:TYR:HD2	1.85	0.41
19:af:474:ASP:OD1	19:af:475:ASP:N	2.53	0.41
19:af:733:ASP:O	19:af:737:ARG:HG2	2.21	0.41
20:u:240:ALA:HA	20:u:243:LEU:HB2	2.02	0.41
20:u:417:LEU:CD2	20:u:556:ARG:HH12	2.33	0.41
21:aa:217:ARG:O	45:o:422:GLN:HG2	2.19	0.41
21:aa:745:GLU:HG2	26:an:205:HIS:HB3	2.01	0.41
22:ab:373:ARG:HA	22:ab:373:ARG:HD3	1.83	0.41
22:ab:503:ARG:HE	22:ab:575:LEU:HD11	1.85	0.41
22:ab:1161:SER:O	22:ab:1165:TYR:HB2	2.20	0.41
24:ac:293:PHE:CD2	24:ac:311:ILE:HD13	2.55	0.41
24:ac:373:ARG:HH11	24:ac:430:TRP:HE1	1.67	0.41
24:ac:456:TYR:C	24:ac:458:PHE:H	2.29	0.41
24:ac:896:LEU:HD11	24:ac:969:ALA:HA	2.03	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
24:ac:939:ARG:NE	24:ac:945:ILE:HB	2.32	0.41
25:ad:375:GLU:CD	25:ad:503:PRO:HG2	2.45	0.41
25:ad:383:PHE:HE2	25:ad:391:HIS:CG	2.38	0.41
31:at:323:ILE:O	31:at:327:THR:OG1	2.34	0.41
34:v:142:PHE:O	34:v:145:TRP:N	2.53	0.41
36:p:112:TYR:HB2	36:p:113:TYR:HD1	1.86	0.41
37:j:38:THR:HG23	37:j:41:PHE:H	1.85	0.41
37:j:171:SER:N	48:q:67:GLU:OE1	2.39	0.41
38:l:435:ARG:HA	38:l:438:GLN:HE21	1.84	0.41
38:l:579:LYS:O	38:l:583:GLN:HB3	2.21	0.41
39:ar:215:ASP:OD2	40:av:61:MET:HE3	2.20	0.41
41:ai:11:VAL:HG23	41:ai:11:VAL:O	2.21	0.41
41:ai:187:ILE:HD12	41:ai:187:ILE:HA	1.80	0.41
45:o:465:PRO:HA	45:o:470:ARG:NH1	2.36	0.41
46:c:136:ARG:NH1	46:c:162:ARG:CZ	2.84	0.41
48:q:99:GLU:CD	48:q:102:ARG:HE	2.28	0.41
50:a:178:PHE:HB3	50:a:273:PHE:CE2	2.55	0.41
54:A:126:PHE:C	111:Ae:44:PRO:HG2	2.45	0.41
55:B:69:GLU:OE2	55:B:69:GLU:N	2.52	0.41
57:D:53:PHE:O	57:D:57:LYS:NZ	2.52	0.41
60:G:34:LEU:HB3	60:G:37:GLU:HB2	2.01	0.41
60:G:329:PHE:CG	60:G:330:PRO:HD2	2.55	0.41
61:H:12:LEU:HG	61:H:12:LEU:O	2.21	0.41
61:H:55:ASP:OD1	61:H:152:GLN:HB3	2.20	0.41
61:H:61:GLN:HG2	61:H:114:TYR:CZ	2.56	0.41
62:I:72:ARG:HH22	1:1:544:U:P	2.43	0.41
62:I:127:LYS:HB2	62:I:205:MET:HE1	2.02	0.41
62:I:256:GLU:HA	62:I:259:HIS:HD2	1.85	0.41
63:J:48:HIS:CE1	63:J:52:GLN:HG2	2.56	0.41
64:K:153:GLU:HB2	64:K:180:MET:SD	2.60	0.41
65:L:134:TYR:H	65:L:149:ASN:ND2	2.19	0.41
66:M:238:ASP:HB3	66:M:241:MET:HB2	2.03	0.41
68:O:299:HIS:HE2	71:R:381:GLU:CD	2.28	0.41
68:O:314:GLN:NE2	88:Az:60:HIS:HB3	2.36	0.41
69:P:165:PRO:HA	69:P:176:LEU:HD11	2.03	0.41
71:R:429:VAL:O	71:R:433:VAL:HG12	2.21	0.41
72:S:294:ILE:HG13	72:S:296:PRO:HD2	2.02	0.41
75:V:58:LEU:HD23	75:V:58:LEU:HA	1.54	0.41
77:X:423:GLN:HE21	102:Aq:214:PRO:HG3	1.85	0.41
78:Y:87:GLU:O	78:Y:91:ARG:HG2	2.20	0.41
80:BA:24:VAL:HA	98:Ar:127:ARG:CD	2.51	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
83:Aw:70:MET:HE1	83:Aw:78:PHE:CD2	2.56	0.41
83:Aw:170:LEU:HD22	99:Aj:442:TYR:CD1	2.56	0.41
84:Bj:46:PHE:HB2	116:Ag:198:PHE:CE1	2.56	0.41
85:An:129:LYS:O	85:An:133:VAL:N	2.45	0.41
87:Bi:239:VAL:HA	87:Bi:242:ALA:HB3	2.03	0.41
92:Ai:204:SER:OG	102:Aq:34:GLU:OE1	2.26	0.41
93:Ap:72:PRO:HB3	93:Ap:123:HIS:CE1	2.56	0.41
94:Au:15:GLN:H	94:Au:15:GLN:HG2	1.64	0.41
94:Au:47:LEU:HD12	94:Au:47:LEU:HA	1.86	0.41
97:BM:171:ASP:OD1	97:BM:172:ALA:N	2.54	0.41
97:BM:380:THR:HG22	97:BM:384:HIS:CE1	2.56	0.41
100:BH:33:ILE:HD12	100:BH:43:VAL:HG21	2.01	0.41
100:BH:81:PHE:CE1	100:BH:90:MET:HE1	2.56	0.41
100:BH:148:ARG:HA	100:BH:148:ARG:HD2	1.83	0.41
104:Ak:139:ARG:HH21	104:Ak:197:GLY:HA2	1.85	0.41
105:BP:97:ARG:H	105:BP:98:PRO:HD2	1.75	0.41
106:Ad:167:PRO:HB3	106:Ad:188:ASN:H	1.85	0.41
108:Av:155:ARG:HH12	108:Av:159:LEU:CD1	2.34	0.41
109:Af:23:PRO:O	109:Af:25:TRP:N	2.53	0.41
112:Ac:39:VAL:HG22	112:Ac:191:ASP:HA	2.02	0.41
113:Ah:300:LEU:HD13	113:Ah:343:TYR:OH	2.20	0.41
117:Ax:154:HIS:O	117:Ax:154:HIS:CG	2.72	0.41
118:BL:214:LEU:O	118:BL:217:VAL:HG22	2.21	0.41
119:BO:70:ASP:HB2	119:BO:163:GLY:HA3	2.03	0.41
119:BO:153:ILE:HG13	119:BO:153:ILE:O	2.20	0.41
120:BG:1340:GLU:OE2	120:BG:1343:ASN:HB2	2.20	0.41
1:1:542:G:N3	1:1:596:U:O2'	2.51	0.41
1:1:641:A:H2	1:1:798:A:N6	2.18	0.41
1:1:879:A:H8	1:1:879:A:O5'	2.04	0.41
1:2:62:U:H2'	1:2:63:G:C8	2.56	0.41
1:2:92:U:H2'	1:2:93:U:C6	2.55	0.41
1:2:134:U:C3'	1:2:134:U:C6	3.04	0.41
1:2:146:A:C8	1:2:146:A:C3'	3.04	0.41
1:2:172:A:C6	37:j:17:LYS:O	2.73	0.41
1:2:177:U:O2'	33:w:64:VAL:CG1	2.69	0.41
1:2:191:U:O2	1:2:191:U:C2'	2.68	0.41
1:2:240:G:O4'	1:2:244:A:C2	2.74	0.41
1:2:280:A:N6	46:c:171:LYS:HB2	2.25	0.41
1:2:305:C:O2'	1:2:306:A:H5'	2.21	0.41
1:2:388:A:H4'	1:2:389:U:OP2	2.20	0.41
1:2:407:U:C4'	9:n:58:LYS:HZ2	2.18	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:418:A:C8	13:aj:55:HIS:CA	3.03	0.41
1:2:422:U:OP2	1:2:422:U:H4'	2.21	0.41
1:2:437:U:H5'	6:s:153:LYS:O	2.20	0.41
1:2:445:U:O4	1:2:472:A:H8	2.03	0.41
1:2:501:U:C2	3:aw:27:ARG:NH1	2.89	0.41
1:2:502:A:H1'	6:s:77:GLY:HA3	1.60	0.41
1:2:503:A:C1'	6:s:81:ASN:HD21	2.34	0.41
1:2:510:A:C1'	3:aw:19:PRO:O	2.69	0.41
1:2:525:A:C4	15:d:329:ARG:HB2	2.56	0.41
1:2:530:A:OP2	1:2:530:A:O4'	2.39	0.41
1:2:540:U:O5'	1:2:540:U:C6	2.74	0.41
1:2:571:C:HO2'	1:2:572:A:H8	1.65	0.41
1:2:589:G:OP2	1:2:589:G:C8	2.70	0.41
1:2:595:A:O2'	1:2:597:A:P	2.78	0.41
2:h:122:VAL:HG11	14:e:395:TYR:CE2	2.56	0.41
3:aw:5:ASN:HD21	16:az:12:TYR:HA	1.86	0.41
4:m:12:PRO:HB3	28:ap:240:GLY:HA3	2.03	0.41
4:m:17:ALA:C	4:m:18:MET:HE2	2.46	0.41
4:m:134:PRO:O	4:m:138:SER:N	2.54	0.41
5:f:33:LYS:HA	5:f:34:PRO:HA	1.92	0.41
5:f:198:LYS:HD3	5:f:198:LYS:HA	1.85	0.41
7:au:87:ARG:HB3	7:au:139:HIS:NE2	2.36	0.41
7:au:105:ARG:NH1	7:au:109:GLU:OE2	2.52	0.41
7:au:154:GLN:HE22	22:ab:373:ARG:NH2	2.18	0.41
8:am:24:ARG:HH21	8:am:26:ILE:HG12	1.85	0.41
8:am:56:ARG:O	53:bd:60:ILE:HA	2.21	0.41
8:am:68:GLN:HG2	50:a:126:GLU:HB2	2.03	0.41
8:am:121:GLU:HB2	8:am:122:ASN:OD1	2.20	0.41
8:am:151:LEU:HD23	8:am:151:LEU:HA	1.76	0.41
10:ae:96:SER:O	10:ae:97:LEU:HD23	2.20	0.41
10:ae:132:LEU:HD22	10:ae:150:ARG:HG3	2.02	0.41
10:ae:278:ILE:HG23	10:ae:322:TYR:CD1	2.56	0.41
10:ae:357:MET:HE3	10:ae:367:VAL:HG21	2.02	0.41
12:ag:78:HIS:HB3	12:ag:79:GLU:OE2	2.20	0.41
13:aj:68:SER:O	13:aj:68:SER:OG	2.33	0.41
14:e:143:LEU:HD23	14:e:143:LEU:HA	1.92	0.41
14:e:510:ASN:ND2	14:e:523:SER:O	2.42	0.41
14:e:550:LYS:N	14:e:551:PRO:HD2	2.36	0.41
14:e:735:TRP:HZ2	20:u:818:TYR:CG	2.38	0.41
15:d:221:ASP:OD2	15:d:294:ILE:HD12	2.21	0.41
18:r:98:GLN:HA	18:r:101:GLU:HG3	2.03	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
18:r:212:LEU:HB2	18:r:241:GLU:CD	2.46	0.41
18:r:274:LEU:HD22	20:u:854:LEU:HD21	2.02	0.41
18:r:396:TRP:CD2	18:r:403:SER:HB3	2.55	0.41
19:af:165:TYR:HE2	22:ab:451:LEU:HB2	1.86	0.41
19:af:174:HIS:HB2	19:af:187:ARG:CZ	2.50	0.41
19:af:341:SER:O	19:af:344:VAL:HG22	2.21	0.41
19:af:357:THR:O	19:af:361:GLU:HG2	2.21	0.41
19:af:367:TRP:CD2	19:af:387:PRO:HG3	2.56	0.41
19:af:524:ARG:HA	19:af:524:ARG:HD2	1.95	0.41
20:u:157:LEU:HB3	20:u:248:ARG:NH2	2.36	0.41
20:u:201:TYR:CD1	20:u:222:LEU:HD13	2.56	0.41
20:u:239:SER:O	20:u:243:LEU:HD23	2.21	0.41
20:u:635:SER:HB2	20:u:643:TRP:HH2	1.84	0.41
21:aa:309:TYR:CE2	21:aa:316:PRO:HD3	2.56	0.41
21:aa:883:GLN:O	21:aa:889:PRO:HB3	2.20	0.41
21:aa:1077:ILE:HB	21:aa:1096:LEU:HD11	2.02	0.41
21:aa:1445:ILE:O	21:aa:1449:VAL:HG22	2.21	0.41
21:aa:1537:CYS:SG	21:aa:1538:LYS:N	2.93	0.41
21:aa:1601:PHE:O	21:aa:1605:PHE:HB2	2.21	0.41
22:ab:138:ARG:HD3	22:ab:140:ARG:HD3	2.03	0.41
22:ab:273:VAL:O	22:ab:273:VAL:HG23	2.20	0.41
22:ab:348:LEU:HD23	22:ab:349:GLY:N	2.36	0.41
22:ab:560:GLU:N	22:ab:964:SER:OG	2.38	0.41
22:ab:585:VAL:HG11	22:ab:616:ARG:NE	2.36	0.41
22:ab:653:PRO:HB2	22:ab:655:GLU:OE1	2.21	0.41
22:ab:712:VAL:HG13	22:ab:727:SER:OG	2.21	0.41
22:ab:793:GLU:HG2	22:ab:794:VAL:H	1.86	0.41
22:ab:1028:ASP:O	22:ab:1034:TYR:HB3	2.21	0.41
22:ab:1063:ILE:HG13	22:ab:1064:GLY:N	2.36	0.41
23:ak:223:GLU:O	23:ak:229:ASN:ND2	2.45	0.41
24:ac:248:TRP:HD1	24:ac:271:ASN:HD22	1.69	0.41
24:ac:296:PHE:CZ	24:ac:298:GLN:HB2	2.56	0.41
24:ac:311:ILE:HG13	24:ac:320:LYS:CG	2.51	0.41
24:ac:540:PHE:CD1	24:ac:571:ALA:HA	2.56	0.41
24:ac:694:LYS:H	24:ac:694:LYS:HG2	1.74	0.41
24:ac:930:ASP:HB3	24:ac:934:PHE:HB2	2.02	0.41
24:ac:996:GLN:HA	24:ac:999:LEU:HD12	2.03	0.41
24:ac:1123:ILE:O	24:ac:1125:ALA:N	2.52	0.41
25:ad:686:HIS:HB2	45:o:469:LYS:HZ2	1.86	0.41
26:an:117:PHE:HA	52:z:978:TYR:OH	2.20	0.41
26:an:186:ARG:HD3	26:an:190:TRP:CZ2	2.56	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
27:ao:212:MET:HA	45:o:198:GLU:OE1	2.20	0.41
28:ap:38:ALA:HA	28:ap:42:ALA:HB3	2.03	0.41
28:ap:202:PRO:HD3	41:ai:257:TYR:CE2	2.47	0.41
30:as:135:LEU:HB3	40:av:174:HIS:HB2	2.03	0.41
32:y:34:LEU:HD23	32:y:34:LEU:HA	1.86	0.41
32:y:160:ILE:HG13	32:y:176:LEU:HD23	2.03	0.41
35:t:60:LEU:HD23	35:t:60:LEU:HA	1.76	0.41
36:p:116:PHE:HB2	36:p:117:TRP:CE3	2.50	0.41
36:p:286:LEU:HA	36:p:294:TRP:NE1	2.36	0.41
37:j:113:VAL:HG23	37:j:128:SER:OG	2.21	0.41
38:l:8:LEU:HG	38:l:120:ALA:HB2	2.03	0.41
38:l:108:ARG:HA	38:l:108:ARG:HD2	1.87	0.41
38:l:229:ARG:HG2	38:l:260:PRO:HB2	2.03	0.41
38:l:319:GLU:C	38:l:321:LEU:H	2.29	0.41
38:l:481:ARG:HG3	38:l:483:GLU:OE1	2.21	0.41
39:ar:113:LYS:O	39:ar:115:HIS:ND1	2.48	0.41
39:ar:240:ILE:O	39:ar:244:ALA:N	2.53	0.41
42:x:127:SER:OG	42:x:207:CYS:N	2.53	0.41
42:x:217:LEU:HD23	42:x:217:LEU:HA	1.75	0.41
45:o:297:PHE:CD2	50:a:302:PRO:HG3	2.56	0.41
46:c:157:ARG:HG2	46:c:160:GLU:OE2	2.21	0.41
47:k:144:LEU:O	47:k:165:LEU:N	2.46	0.41
48:q:71:VAL:O	48:q:74:ASP:HB3	2.20	0.41
48:q:136:GLU:O	49:b:150:ARG:NH2	2.54	0.41
49:b:8:LEU:HD12	49:b:89:VAL:HG22	2.03	0.41
49:b:150:ARG:HH12	49:b:152:ARG:NH1	2.19	0.41
50:a:95:ILE:HG23	52:z:284:TYR:HE1	1.86	0.41
50:a:386:ARG:HD2	50:a:390:ARG:HA	2.03	0.41
50:a:413:ASN:ND2	50:a:416:LEU:HG	2.35	0.41
52:z:105:HIS:CD2	52:z:154:LEU:HD13	2.56	0.41
52:z:112:PHE:HE1	52:z:119:GLN:HG3	1.86	0.41
52:z:779:ALA:O	52:z:782:HIS:N	2.53	0.41
53:bd:46:PHE:CZ	53:bd:70:LEU:HD21	2.54	0.41
54:A:133:MET:HE2	54:A:133:MET:HB3	1.79	0.41
54:A:143:ASP:HB3	54:A:307:TRP:HE1	1.86	0.41
54:A:157:TRP:CZ3	54:A:183:MET:HE1	2.55	0.41
54:A:173:VAL:HG21	111:Ae:102:VAL:HG12	2.03	0.41
54:A:302:ASP:O	54:A:335:THR:OG1	2.39	0.41
55:B:20:PHE:HE1	91:Ab:49:PRO:HG3	1.86	0.41
55:B:125:LEU:HD11	55:B:129:LEU:HD21	2.03	0.41
55:B:170:HIS:CD2	55:B:170:HIS:C	2.99	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
55:B:251:ASP:HB2	55:B:278:LEU:HD11	2.03	0.41
55:B:349:PRO:HB3	106:Ad:160:ARG:HB2	2.02	0.41
55:B:421:VAL:HG11	83:Aw:11:PHE:HE2	1.86	0.41
55:B:434:MET:CG	60:G:275:MET:HB3	2.51	0.41
56:C:198:ARG:HH22	115:Ay:135:VAL:HG22	1.85	0.41
57:D:21:ARG:NH2	111:Ae:226:ASP:OD2	2.45	0.41
58:E:49:VAL:HG21	58:E:52:ASN:ND2	2.36	0.41
58:E:264:LEU:HD21	58:E:295:ARG:HG3	2.03	0.41
59:F:100:TRP:CZ2	59:F:122:LEU:HB3	2.56	0.41
60:G:54:ARG:HD3	60:G:63:LEU:HD22	2.03	0.41
60:G:70:LEU:HG	1:1:498:G:OP2	2.21	0.41
60:G:237:ALA:HB3	60:G:242:ILE:HG13	2.02	0.41
61:H:11:LEU:HD23	61:H:11:LEU:N	2.36	0.41
62:I:238:ARG:HH21	68:O:89:HIS:C	2.29	0.41
64:K:144:ALA:HB1	99:Aj:222:GLU:HG3	2.03	0.41
65:L:57:LYS:HE2	105:BP:19:ILE:O	2.21	0.41
66:M:32:TYR:CD1	1:1:176:A:H4'	2.55	0.41
66:M:62:LEU:HD23	66:M:91:ARG:HG2	2.02	0.41
66:M:99:LEU:CD2	66:M:108:GLN:HA	2.51	0.41
66:M:143:TRP:HB3	68:O:36:PHE:CE2	2.55	0.41
66:M:257:MET:HE2	66:M:257:MET:HB2	2.00	0.41
70:Q:50:ASN:O	70:Q:53:ALA:N	2.54	0.41
71:R:48:GLN:H	71:R:48:GLN:HG2	1.73	0.41
74:U:68:LEU:H	74:U:85:GLU:HG2	1.85	0.41
75:V:22:ARG:NH2	116:Ag:40:TRP:O	2.52	0.41
75:V:51:PHE:H	75:V:53:ARG:NH1	2.19	0.41
75:V:104:ARG:NE	1:1:184:G:C8	2.88	0.41
77:X:178:ARG:HB3	92:Ai:53:LYS:HE2	2.02	0.41
77:X:379:LYS:NZ	77:X:382:GLY:HA3	2.36	0.41
80:BA:39:ALA:HB1	80:BA:124:VAL:HG23	2.03	0.41
82:BB:92:ASN:OD1	82:BB:93:THR:N	2.51	0.41
82:BB:127:PRO:HB3	103:BE:43:GLU:HG2	2.03	0.41
83:Aw:6:VAL:HG13	83:Aw:96:ARG:HG2	2.03	0.41
84:Bj:147:ASN:OD1	84:Bj:148:ALA:N	2.54	0.41
86:Al:58:LYS:HB2	1:1:698:G:O2'	2.20	0.41
87:BI:197:LEU:HD12	87:BI:232:ARG:HB3	2.03	0.41
87:BI:249:THR:OG1	87:BI:250:ALA:N	2.53	0.41
88:Az:149:ASP:OD1	88:Az:150:MET:N	2.54	0.41
92:Ai:309:ILE:HG23	92:Ai:342:PHE:HE1	1.85	0.41
92:Ai:380:ARG:HH22	92:Ai:472:THR:HA	1.85	0.41
93:Ap:106:GLU:OE1	120:BG:1288:PRO:HB2	2.20	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
93:Ap:173:ARG:HD3	93:Ap:173:ARG:N	2.34	0.41
94:Au:57:TRP:C	94:Au:59:SER:N	2.77	0.41
95:Aa:155:THR:O	95:Aa:159:GLN:N	2.33	0.41
96:Ao:252:LYS:HB2	96:Ao:252:LYS:HE2	1.84	0.41
97:BM:134:LYS:HG2	97:BM:271:ARG:NH1	2.36	0.41
97:BM:244:LEU:O	97:BM:247:PHE:HB3	2.21	0.41
98:Ar:165:ASN:O	98:Ar:193:MET:N	2.54	0.41
99:Aj:344:PHE:CE2	106:Ad:208:LYS:HD3	2.56	0.41
100:BH:186:ARG:NH1	100:BH:225:ILE:O	2.54	0.41
101:Am:17:PRO:CB	1:1:1037:C:H5'	2.51	0.41
101:Am:60:GLN:HG3	101:Am:257:TRP:CZ2	2.56	0.41
101:Am:126:MET:HE1	101:Am:154:ALA:HA	2.02	0.41
101:Am:168:LYS:HD3	101:Am:168:LYS:HA	1.73	0.41
101:Am:256:MET:HB2	101:Am:256:MET:HE2	1.73	0.41
101:Am:305:LYS:HB3	101:Am:305:LYS:HE3	1.85	0.41
102:Aq:67:SER:HA	106:Ad:31:LEU:CD2	2.48	0.41
102:Aq:213:PRO:HG2	102:Aq:216:GLU:OE1	2.21	0.41
102:Aq:286:MET:HG2	102:Aq:287:GLY:N	2.36	0.41
104:Ak:16:PRO:HB3	104:Ak:56:HIS:O	2.20	0.41
104:Ak:139:ARG:NH1	104:Ak:200:ARG:HB2	2.36	0.41
104:Ak:281:MET:O	104:Ak:284:ARG:HB3	2.21	0.41
105:BP:24:TYR:O	105:BP:27:GLY:N	2.35	0.41
106:Ad:47:ILE:HA	106:Ad:48:PRO:HD3	1.95	0.41
107:BF:59:MET:HE2	1:1:549:C:O2'	2.21	0.41
109:Af:76:GLN:O	109:Af:77:GLN:HB2	2.21	0.41
110:As:131:ILE:O	110:As:134:PRO:HD2	2.21	0.41
113:Ah:132:ILE:O	113:Ah:136:LEU:HD13	2.21	0.41
113:Ah:357:LYS:HB3	113:Ah:357:LYS:HE3	1.88	0.41
115:Ay:45:HIS:HE1	1:1:705:A:OP2	2.03	0.41
117:Ax:211:LEU:HG	117:Ax:212:PHE:CD1	2.55	0.41
118:BL:247:LEU:HD23	118:BL:247:LEU:HA	1.65	0.41
118:BL:337:ARG:HA	118:BL:337:ARG:NE	2.35	0.41
119:BO:81:ALA:HA	119:BO:99:HIS:CD2	2.55	0.41
119:BO:87:ARG:CB	119:BO:90:HIS:HB3	2.44	0.41
123:UD:26:UNK:C	123:UD:28:UNK:N	2.83	0.41
1:1:68:U:H5	1:1:76:U:H3	1.69	0.41
1:1:149:U:O2'	1:1:150:A:H8	2.04	0.41
1:1:163:U:H3	1:1:1013:U:H5'	1.84	0.41
1:1:302:A:N6	1:1:303:U:O4	2.54	0.41
1:1:391:A:O3'	1:1:392:A:H3'	2.21	0.41
1:1:393:A:O2'	1:1:394:U:P	2.79	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:465:A:N6	1:1:466:U:C4	2.89	0.41
1:1:628:U:H4'	1:1:629:A:OP1	2.19	0.41
1:1:652:A:C8	1:1:758:G:O6	2.74	0.41
1:1:810:U:C3'	1:1:811:U:H5''	2.51	0.41
1:1:856:A:H2'	1:1:857:A:O4'	2.21	0.41
1:1:911:A:C6	1:1:912:U:C4	3.09	0.41
1:1:975:U:N3	1:1:976:A:H2	2.18	0.41
1:2:1:G:OP2	1:2:1:G:C8	2.65	0.41
1:2:175:U:C1'	48:q:12:MET:HG3	2.51	0.41
1:2:300:U:H5''	1:2:301:U:OP2	2.21	0.41
1:2:344:C:N4	1:2:345:G:N1	2.69	0.41
1:2:368:U:H2'	1:2:368:U:O2	2.21	0.41
1:2:524:C:OP2	1:2:524:C:N1	2.54	0.41
1:2:560:U:O4	1:2:562:U:O4	2.38	0.41
1:2:567:A:C6	1:2:568:A:C6	3.09	0.41
1:2:609:U:C3'	1:2:609:U:C6	3.04	0.41
5:f:123:LEU:O	5:f:127:ASP:HB2	2.21	0.41
6:s:49:GLY:HA2	14:e:765:MET:HE2	2.02	0.41
6:s:159:GLY:HA2	7:au:244:TYR:CZ	2.56	0.41
7:au:63:HIS:HD1	24:ac:1230:PHE:HA	1.87	0.41
9:n:51:PHE:CE2	9:n:52:HIS:HB2	2.56	0.41
10:ae:42:LEU:HD23	10:ae:42:LEU:HA	1.90	0.41
10:ae:188:ARG:HA	13:aj:63:ARG:HD2	2.02	0.41
10:ae:204:ARG:HG2	10:ae:207:ARG:HH22	1.85	0.41
10:ae:454:ARG:HG3	10:ae:460:LEU:HD11	2.03	0.41
10:ae:558:GLN:N	10:ae:558:GLN:OE1	2.54	0.41
12:ag:56:ARG:CZ	12:ag:56:ARG:HB2	2.49	0.41
12:ag:497:LEU:HD11	12:ag:508:ILE:CD1	2.49	0.41
12:ag:531:LEU:HA	12:ag:534:LYS:HG2	2.03	0.41
13:aj:271:ARG:HD2	13:aj:303:ALA:HB3	2.03	0.41
14:e:560:ALA:HB2	14:e:567:VAL:HG12	2.03	0.41
15:d:261:MET:HG2	18:r:436:TYR:CD2	2.56	0.41
15:d:287:MET:HE3	15:d:287:MET:HB2	1.87	0.41
18:r:218:TRP:CE2	18:r:230:ARG:HD3	2.56	0.41
20:u:159:VAL:HG11	20:u:245:VAL:HG13	2.03	0.41
22:ab:390:THR:HB	22:ab:393:HIS:ND1	2.36	0.41
22:ab:613:LEU:H	22:ab:613:LEU:HD12	1.86	0.41
24:ac:367:HIS:HA	24:ac:370:LEU:HB2	2.03	0.41
24:ac:540:PHE:HB2	24:ac:567:VAL:HG13	2.03	0.41
24:ac:715:TRP:H	24:ac:841:GLN:NE2	2.19	0.41
24:ac:874:ASN:HB2	24:ac:881:LEU:O	2.21	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
24:ac:899:LEU:HB3	24:ac:937:PHE:HE1	1.85	0.41
24:ac:1202:GLY:O	24:ac:1204:VAL:HG13	2.20	0.41
25:ad:154:VAL:HG21	37:j:169:LYS:O	2.21	0.41
25:ad:650:ARG:HD2	25:ad:654:GLU:CD	2.46	0.41
26:an:182:ASP:OD1	26:an:185:ARG:NH2	2.53	0.41
27:ao:112:GLY:HA3	27:ao:128:ASN:CG	2.46	0.41
30:as:146:GLY:HA3	30:as:147:VAL:C	2.45	0.41
33:w:125:GLU:O	33:w:128:TYR:HB3	2.21	0.41
35:t:101:PHE:CB	35:t:142:SER:HA	2.51	0.41
38:l:140:PRO:HA	38:l:143:VAL:HG23	2.02	0.41
38:l:145:ASP:O	38:l:149:LEU:HB2	2.21	0.41
39:ar:32:LEU:HD12	39:ar:32:LEU:H	1.86	0.41
39:ar:47:ARG:HD3	43:i:364:TYR:CG	2.56	0.41
41:ai:289:HIS:HE1	41:ai:369:LYS:HG3	1.86	0.41
42:x:100:GLU:OE2	42:x:100:GLU:N	2.45	0.41
45:o:188:LEU:HD12	45:o:188:LEU:HA	1.95	0.41
46:c:285:ARG:HE	46:c:289:ASN:HD22	1.67	0.41
49:b:22:LEU:HD23	49:b:22:LEU:HA	1.74	0.41
49:b:23:ARG:CB	85:An:150:PHE:CZ	3.04	0.41
50:a:107:LYS:HE3	50:a:107:LYS:HB3	1.74	0.41
50:a:145:VAL:HG13	50:a:237:ARG:NH1	2.36	0.41
54:A:83:GLN:HB2	103:BE:114:LEU:O	2.20	0.41
55:B:6:SER:OG	95:Aa:182:PRO:HB3	2.21	0.41
55:B:174:TRP:HA	75:V:13:GLY:HA2	2.03	0.41
59:F:157:ASP:OD1	59:F:157:ASP:N	2.52	0.41
60:G:157:VAL:CG2	75:V:58:LEU:HD12	2.48	0.41
60:G:347:LEU:O	60:G:349:GLN:N	2.54	0.41
62:I:88:ALA:HB2	1:I:600:A:C8	2.56	0.41
62:I:258:TRP:C	62:I:261:GLU:H	2.28	0.41
65:L:88:ARG:HB3	65:L:110:GLN:HB2	2.03	0.41
66:M:29:GLN:HG2	66:M:30:LYS:H	1.86	0.41
66:M:62:LEU:HD22	66:M:84:GLU:HG3	2.02	0.41
68:O:141:THR:OG1	68:O:203:VAL:O	2.18	0.41
68:O:176:VAL:HB	68:O:189:VAL:O	2.21	0.41
69:P:130:VAL:HG22	96:Ao:120:GLY:HA3	2.02	0.41
69:P:162:PHE:O	69:P:163:GLN:C	2.64	0.41
70:Q:108:ILE:HD11	113:Ah:58:VAL:HG11	1.98	0.41
70:Q:122:MET:HB2	70:Q:122:MET:HE3	1.64	0.41
70:Q:197:LEU:HA	70:Q:200:VAL:HG12	2.03	0.41
75:V:57:ALA:O	75:V:81:ARG:HG2	2.21	0.41
75:V:116:ASP:OD1	75:V:117:ILE:N	2.54	0.41

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
78:Y:220:TYR:CE1	90:BC:67:ASN:ND2	2.89	0.41
79:Z:107:PHE:CE1	79:Z:112:PRO:HA	2.56	0.41
80:BA:112:GLU:HA	80:BA:137:ARG:O	2.21	0.41
82:BB:69:SER:OG	82:BB:73:GLU:HG3	2.21	0.41
85:An:170:GLU:HG2	118:BL:180:GLY:O	2.21	0.41
86:Al:108:TRP:CZ2	86:Al:156:ILE:HG21	2.56	0.41
86:Al:159:THR:HG22	86:Al:242:ASN:CB	2.48	0.41
89:At:42:MET:HE2	89:At:42:MET:HB3	1.77	0.41
89:At:128:ARG:CZ	89:At:128:ARG:HB2	2.51	0.41
91:Ab:236:ILE:O	91:Ab:240:ARG:N	2.51	0.41
95:Aa:190:SER:O	95:Aa:191:THR:OG1	2.38	0.41
98:Ar:125:PRO:HD2	109:Af:31:TRP:NE1	2.36	0.41
99:Aj:364:ASP:CG	99:Aj:390:ARG:HH21	2.29	0.41
99:Aj:367:LEU:HA	99:Aj:367:LEU:HD23	1.82	0.41
99:Aj:388:GLN:O	99:Aj:392:GLU:HG3	2.20	0.41
101:Am:119:GLU:OE1	101:Am:234:SER:HB2	2.21	0.41
103:BE:104:VAL:O	103:BE:105:TYR:C	2.64	0.41
105:BP:2:LEU:HD13	105:BP:2:LEU:HA	1.92	0.41
112:Ac:210:LEU:HD12	112:Ac:241:ALA:O	2.21	0.41
120:BG:1327:LYS:HA	120:BG:1327:LYS:HD2	1.88	0.41
1:1:395:U:O2'	1:1:943:U:C2	2.73	0.41
1:1:544:U:H1'	1:1:595:A:C2	2.56	0.41
1:1:594:U:O2'	1:1:595:A:P	2.79	0.41
1:2:12:U:O4	1:2:380:U:O4	2.40	0.40
1:2:41:U:H6	1:2:41:U:H5''	1.86	0.40
1:2:57:U:O2'	1:2:58:U:P	2.79	0.40
1:2:57:U:HO2'	1:2:58:U:P	2.43	0.40
1:2:99:U:O4	1:2:100:A:N6	2.54	0.40
1:2:167:U:H3'	1:2:168:G:H5'	2.04	0.40
1:2:325:U:C5'	1:2:325:U:O2	2.69	0.40
1:2:371:C:O2	1:2:371:C:C2'	2.65	0.40
1:2:424:U:O4	13:aj:197:ASP:OD2	2.39	0.40
1:2:438:G:C6	6:s:134:HIS:CE1	3.08	0.40
1:2:448:U:O2	1:2:448:U:C2'	2.68	0.40
1:2:497:A:N1	3:aw:17:ILE:HD13	2.31	0.40
1:2:533:U:P	5:f:17:ARG:NH1	2.93	0.40
1:2:615:U:P	44:g:101:ARG:NE	2.91	0.40
2:h:109:PRO:HB2	14:e:372:ARG:NH1	2.30	0.40
3:aw:136:ASP:OD1	3:aw:136:ASP:N	2.53	0.40
6:s:41:GLU:CD	6:s:42:TYR:H	2.28	0.40
7:au:213:ASP:OD1	7:au:214:ARG:N	2.53	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
8:am:173:GLU:HA	8:am:177:ARG:HH22	1.86	0.40
8:am:178:SER:HB3	8:am:181:TYR:HB2	2.03	0.40
8:am:204:ALA:O	8:am:208:ARG:HG2	2.21	0.40
9:n:88:TYR:CE2	22:ab:1111:ILE:HA	2.56	0.40
10:ae:385:ALA:HA	10:ae:427:ASN:HD21	1.87	0.40
10:ae:531:TYR:CG	12:ag:256:PHE:HB2	2.56	0.40
11:ay:138:LYS:HE2	16:az:138:TYR:OH	2.20	0.40
12:ag:551:THR:OG1	12:ag:552:HIS:N	2.54	0.40
13:aj:305:ILE:HD13	13:aj:305:ILE:HA	1.87	0.40
14:e:333:LEU:HD12	14:e:333:LEU:HA	1.89	0.40
18:r:2:TRP:NE1	18:r:3:GLU:OE1	2.54	0.40
19:af:386:ILE:HG21	19:af:449:MET:HA	2.03	0.40
19:af:754:ALA:HA	19:af:757:TYR:HB2	2.03	0.40
20:u:203:LYS:HD2	20:u:204:LEU:N	2.36	0.40
20:u:371:ALA:HA	20:u:378:LYS:NZ	2.36	0.40
20:u:744:GLN:HE22	20:u:747:ARG:HH12	1.69	0.40
21:aa:569:MET:HE2	21:aa:569:MET:HB3	2.00	0.40
21:aa:906:ARG:HH22	45:o:403:ASP:CG	2.28	0.40
21:aa:1229:PHE:CE1	21:aa:1276:LEU:HD23	2.56	0.40
21:aa:1379:LEU:HA	21:aa:1379:LEU:HD12	1.80	0.40
21:aa:1492:LEU:O	21:aa:1516:ARG:NH2	2.54	0.40
22:ab:302:GLN:NE2	22:ab:323:VAL:HA	2.29	0.40
22:ab:510:GLN:HE21	22:ab:510:GLN:HB3	1.67	0.40
23:ak:120:GLN:OE1	38:l:639:MET:HE1	2.21	0.40
24:ac:117:VAL:HG13	24:ac:126:LEU:HD12	2.04	0.40
24:ac:685:LEU:C	38:l:316:PRO:HD2	2.46	0.40
24:ac:1259:PRO:HA	24:ac:1262:ALA:HB3	2.02	0.40
25:ad:625:ARG:NE	35:t:155:GLU:OE2	2.54	0.40
25:ad:675:GLU:CD	31:at:389:ILE:HG21	2.46	0.40
25:ad:686:HIS:CG	45:o:452:ASN:HD22	2.39	0.40
25:ad:731:HIS:O	25:ad:731:HIS:ND1	2.50	0.40
29:aq:126:LEU:HD13	33:w:170:MET:HG3	2.03	0.40
30:as:26:TYR:CZ	39:ar:37:GLU:HA	2.56	0.40
32:y:73:PHE:CZ	32:y:78:CYS:HB3	2.56	0.40
32:y:149:SER:HA	32:y:198:MET:HE1	2.04	0.40
35:t:127:GLU:OE1	35:t:207:LYS:HE3	2.20	0.40
36:p:266:TYR:HD1	36:p:266:TYR:HA	1.71	0.40
37:j:78:SER:C	37:j:80:ASP:H	2.28	0.40
37:j:129:TYR:O	45:o:434:ARG:NH2	2.54	0.40
37:j:133:SER:HB3	45:o:436:HIS:CE1	2.56	0.40
39:ar:92:GLU:HA	39:ar:95:GLU:OE1	2.22	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
40:av:91:ARG:HG3	40:av:167:ASP:HA	2.03	0.40
40:av:96:ILE:HD12	40:av:96:ILE:HA	1.86	0.40
41:ai:16:THR:HG23	41:ai:17:LEU:N	2.36	0.40
45:o:325:LYS:HD2	45:o:400:ASP:OD2	2.21	0.40
47:k:133:HIS:H	47:k:160:TYR:HA	1.86	0.40
50:a:373:ARG:NH2	50:a:411:VAL:O	2.54	0.40
52:z:566:LEU:HD11	52:z:575:LYS:HZ1	1.84	0.40
52:z:652:ARG:NE	52:z:760:PRO:HB2	2.35	0.40
54:A:281:GLN:HB2	54:A:283:ARG:HG2	2.03	0.40
54:A:383:PHE:CE1	63:J:110:LYS:HD2	2.56	0.40
59:F:115:LEU:HD13	1:1:142:U:O2'	2.21	0.40
60:G:218:LEU:O	60:G:219:LEU:HD23	2.21	0.40
60:G:324:PRO:O	116:Ag:149:ASN:ND2	2.54	0.40
62:I:252:GLU:H	62:I:252:GLU:CD	2.28	0.40
64:K:158:ARG:HH21	105:BP:-41:ARG:HG2	1.86	0.40
65:L:133:LYS:NZ	95:Aa:92:SER:O	2.54	0.40
67:N:138:PHE:HA	67:N:141:PHE:HB3	2.03	0.40
68:O:35:ARG:NH2	1:1:43:A:H5''	2.37	0.40
69:P:117:ARG:HD3	96:Ao:119:VAL:O	2.21	0.40
70:Q:30:LEU:O	70:Q:33:ARG:HB3	2.20	0.40
75:V:39:VAL:C	75:V:40:TRP:CD1	2.99	0.40
77:X:496:TRP:CZ3	106:Ad:65:ILE:HD12	2.54	0.40
78:Y:74:TYR:O	78:Y:77:TYR:N	2.54	0.40
78:Y:223:LEU:HA	78:Y:223:LEU:HD23	1.90	0.40
79:Z:25:PHE:C	79:Z:27:ASP:H	2.15	0.40
83:Aw:74:LYS:HD2	1:1:110:U:H5	1.85	0.40
84:Bj:2:VAL:HG21	102:Aq:109:HIS:HB3	2.03	0.40
84:Bj:32:LEU:HD13	84:Bj:32:LEU:HA	1.84	0.40
85:An:199:LEU:HA	85:An:199:LEU:HD12	1.78	0.40
86:Al:73:LYS:O	86:Al:77:LEU:HG	2.21	0.40
86:Al:207:ALA:O	86:Al:211:LEU:N	2.41	0.40
87:BI:198:LEU:HD11	87:BI:212:PHE:HB2	2.03	0.40
92:Ai:68:ARG:HB2	92:Ai:71:ASP:OD2	2.20	0.40
92:Ai:69:PRO:HA	92:Ai:93:ILE:O	2.21	0.40
92:Ai:296:HIS:HD2	92:Ai:297:SER:N	2.17	0.40
93:Ap:73:CYS:H	93:Ap:121:VAL:HG13	1.86	0.40
94:Au:137:ASP:OD1	107:BF:49:LEU:HD11	2.21	0.40
95:Aa:182:PRO:C	95:Aa:184:PHE:H	2.29	0.40
96:Ao:174:ARG:O	96:Ao:178:TYR:HD1	2.04	0.40
96:Ao:244:VAL:HG23	96:Ao:245:GLN:H	1.87	0.40
97:BM:298:ALA:O	97:BM:302:MET:HB2	2.20	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
101:Am:276:ILE:HG13	101:Am:277:MET:H	1.86	0.40
102:Aq:42:MET:HG2	102:Aq:110:ASP:HA	2.03	0.40
102:Aq:42:MET:HB2	102:Aq:106:TYR:OH	2.21	0.40
102:Aq:131:GLU:O	102:Aq:135:ILE:HG13	2.21	0.40
109:Af:75:THR:HG22	109:Af:85:ARG:HH22	1.87	0.40
111:Ae:174:PHE:HB3	111:Ae:213:PRO:HG2	2.02	0.40
112:Ac:47:ARG:HG2	112:Ac:47:ARG:O	2.21	0.40
113:Ah:228:ARG:HG2	113:Ah:236:ASP:OD2	2.20	0.40
113:Ah:460:TYR:C	113:Ah:463:ILE:H	2.30	0.40
114:BD:29:ILE:HG12	114:BD:30:ALA:O	2.21	0.40
119:BO:36:ILE:N	1:1:1128:U:O2	2.54	0.40
1:1:542:G:C2	1:1:596:U:C6	3.09	0.40
1:1:643:G:C5'	1:1:656:G:H22	2.34	0.40
1:1:828:A:N3	1:1:828:A:H2'	2.36	0.40
1:1:923:A:C2	1:1:980:A:N7	2.89	0.40
1:1:936:G:N2	1:1:937:C:C2	2.89	0.40
1:2:18:A:H2	1:2:235:G:HO2'	1.50	0.40
1:2:44:A:C4'	29:aq:25:GLY:N	2.81	0.40
1:2:164:A:C2'	1:2:165:A:OP2	2.68	0.40
1:2:213:U:O2'	1:2:214:A:P	2.79	0.40
1:2:304:U:C2'	1:2:305:C:O4'	2.69	0.40
1:2:306:A:C2'	1:2:306:A:O5'	2.70	0.40
1:2:321:U:C3'	1:2:321:U:C6	3.04	0.40
1:2:455:U:OP1	8:am:276:SER:CB	2.68	0.40
1:2:460:A:HO2'	1:2:461:U:P	2.44	0.40
1:2:496:U:P	3:aw:2:HIS:CB	3.01	0.40
1:2:526:A:O2'	15:d:329:ARG:CD	2.70	0.40
1:2:608:U:H6	1:2:608:U:O5'	2.04	0.40
3:aw:64:PRO:HB3	6:s:25:CYS:HB3	2.02	0.40
3:aw:89:PRO:HA	3:aw:94:TYR:CE1	2.56	0.40
4:m:84:ASN:OD1	4:m:87:ARG:HD3	2.22	0.40
4:m:96:ASP:HA	44:g:127:SER:OG	2.21	0.40
5:f:47:ILE:HD13	5:f:47:ILE:HA	1.98	0.40
5:f:135:PHE:CE2	44:g:140:ASP:HB3	2.56	0.40
11:ay:65:LEU:HD23	11:ay:65:LEU:HA	1.83	0.40
11:ay:93:ASP:OD1	11:ay:94:GLY:N	2.54	0.40
12:ag:23:PRO:HG3	13:aj:23:LEU:HD21	2.02	0.40
12:ag:501:ASN:O	12:ag:503:PRO:HD3	2.21	0.40
12:ag:502:HIS:O	12:ag:502:HIS:CG	2.74	0.40
14:e:268:LYS:HE3	14:e:268:LYS:HB3	1.94	0.40
14:e:416:GLU:OE2	22:ab:1059:ARG:NH2	2.51	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
18:r:272:ASP:OD2	18:r:285:THR:HG23	2.21	0.40
18:r:313:LEU:HD11	20:u:816:ALA:HB1	2.03	0.40
21:aa:766:GLN:NE2	21:aa:776:SER:HB3	2.36	0.40
21:aa:1434:LEU:HD23	21:aa:1434:LEU:HA	1.92	0.40
21:aa:1543:MET:HG3	21:aa:1546:ARG:NH1	2.36	0.40
22:ab:655:GLU:HA	22:ab:658:LYS:HE2	2.03	0.40
22:ab:730:VAL:HG23	22:ab:747:SER:OG	2.21	0.40
22:ab:994:ARG:O	22:ab:998:THR:HG23	2.21	0.40
22:ab:1127:ASN:ND2	22:ab:1136:ASN:OD1	2.46	0.40
24:ac:337:PHE:HD2	24:ac:466:HIS:HB2	1.86	0.40
25:ad:326:PRO:O	25:ad:385:ASN:ND2	2.55	0.40
25:ad:343:TRP:CD1	40:av:89:ARG:HD3	2.56	0.40
25:ad:360:ASP:OD1	25:ad:361:ASN:N	2.54	0.40
25:ad:474:GLY:HA3	25:ad:512:TYR:CE1	2.56	0.40
26:an:5:ARG:HG3	26:an:32:LEU:HD21	2.03	0.40
26:an:77:PRO:HD3	52:z:948:VAL:O	2.20	0.40
28:ap:36:GLU:C	28:ap:38:ALA:H	2.29	0.40
28:ap:131:LEU:HD13	43:i:155:PHE:CE1	2.57	0.40
30:as:238:ARG:HE	30:as:238:ARG:HB2	1.54	0.40
32:y:29:HIS:O	32:y:29:HIS:ND1	2.52	0.40
32:y:101:LYS:HB3	32:y:276:PHE:CZ	2.56	0.40
32:y:147:LEU:HA	32:y:147:LEU:HD12	1.73	0.40
32:y:161:VAL:HG21	32:y:190:LEU:HD13	2.04	0.40
33:w:91:LEU:HD13	33:w:104:ILE:HD11	2.04	0.40
34:v:125:LEU:HA	34:v:128:VAL:HG22	2.04	0.40
35:t:73:ARG:HA	35:t:76:GLN:OE1	2.22	0.40
35:t:129:TYR:O	35:t:151:THR:OG1	2.27	0.40
38:l:425:MET:C	38:l:426:MET:HE2	2.46	0.40
40:av:50:ARG:HD2	40:av:80:PRO:HB3	2.02	0.40
41:ai:87:SER:O	41:ai:90:GLU:HG3	2.21	0.40
46:c:81:LEU:HG	46:c:85:LEU:HD11	2.03	0.40
46:c:254:ASP:OD2	46:c:256:LYS:HE3	2.20	0.40
48:q:164:LEU:C	49:b:15:ARG:HH12	2.29	0.40
49:b:29:ILE:HG23	49:b:71:MET:SD	2.62	0.40
49:b:71:MET:HE2	49:b:71:MET:HB3	1.89	0.40
50:a:285:ILE:O	50:a:288:SER:OG	2.25	0.40
54:A:100:LEU:HD13	111:Ae:126:TRP:CZ2	2.56	0.40
54:A:173:VAL:O	54:A:175:THR:HG23	2.22	0.40
54:A:384:ARG:NH2	1:1:1149:A:OP1	2.54	0.40
55:B:102:THR:OG1	55:B:217:GLU:OE2	2.33	0.40
55:B:127:TYR:OH	55:B:310:ILE:HG12	2.21	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
55:B:146:ILE:HD13	55:B:146:ILE:HA	1.77	0.40
62:I:11:ARG:NH2	119:BO:53:GLY:HA2	2.36	0.40
62:I:65:HIS:O	62:I:69:ILE:HG13	2.21	0.40
62:I:219:GLU:HA	62:I:222:HIS:HB3	2.03	0.40
67:N:71:TRP:CD1	1:1:315:A:H1'	2.56	0.40
68:O:138:PRO:HA	68:O:156:ILE:HG22	2.02	0.40
70:Q:12:THR:HG23	115:Ay:174:TRP:CZ2	2.56	0.40
71:R:243:ILE:HD11	71:R:258:VAL:N	2.36	0.40
77:X:245:ASP:HA	77:X:250:GLN:HE21	1.86	0.40
79:Z:22:THR:HG21	113:Ah:72:SER:HB3	2.02	0.40
79:Z:25:PHE:O	79:Z:28:THR:N	2.35	0.40
80:BA:23:TYR:O	80:BA:26:LYS:N	2.54	0.40
81:UA:48:UNK:CB	117:Ax:159:SER:H	2.34	0.40
83:Aw:100:GLN:O	83:Aw:100:GLN:NE2	2.52	0.40
87:BI:173:GLN:HE22	87:BI:202:VAL:HA	1.86	0.40
87:BI:193:ASP:OD1	87:BI:193:ASP:N	2.54	0.40
92:Ai:114:LEU:HD23	92:Ai:114:LEU:HA	1.87	0.40
93:Ap:120:TRP:CD2	120:BG:1335:SER:HA	2.56	0.40
94:Au:21:PRO:HA	1:1:587:U:OP1	2.22	0.40
94:Au:117:ARG:NH2	117:Ax:179:THR:O	2.48	0.40
99:Aj:310:PHE:CE2	99:Aj:369:ARG:HB3	2.56	0.40
100:BH:190:SER:HB2	100:BH:223:ASP:HA	2.03	0.40
102:Aq:339:ARG:O	102:Aq:340:TYR:C	2.64	0.40
103:BE:88:GLU:HG3	103:BE:90:GLU:OE2	2.21	0.40
109:Af:99:LEU:O	109:Af:103:ARG:N	2.43	0.40
112:Ac:129:VAL:O	112:Ac:132:GLN:HG2	2.22	0.40
113:Ah:188:ASP:H	113:Ah:192:GLN:HB2	1.86	0.40
113:Ah:344:LEU:HB3	113:Ah:371:GLN:OE1	2.21	0.40
114:BD:20:GLN:HB3	114:BD:64:HIS:HD2	1.86	0.40
117:Ax:167:LEU:O	117:Ax:171:LEU:HB2	2.21	0.40
117:Ax:201:PHE:CD1	117:Ax:201:PHE:O	2.74	0.40
118:BL:257:LEU:HD12	118:BL:267:PHE:CG	2.56	0.40
119:BO:73:ASN:HB2	119:BO:119:ARG:HE	1.86	0.40
119:BO:81:ALA:HB1	119:BO:86:GLU:OE2	2.21	0.40
122:UC:121:UNK:C	122:UC:123:UNK:N	2.83	0.40
1:1:38:A:H2	1:1:139:U:N3	2.19	0.40
1:1:228:G:C2	1:1:310:A:C2	3.09	0.40
1:1:236:A:H1'	1:1:288:C:N4	2.32	0.40
1:1:712:U:OP2	1:1:749:U:H5''	2.21	0.40
1:1:780:U:C4	1:1:781:A:C6	3.09	0.40
1:1:798:A:C2	1:1:799:A:C6	3.09	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:821:U:H2'	1:1:822:A:O4'	2.22	0.40
1:1:1033:U:H2'	1:1:1034:C:N1	2.36	0.40
1:1:1075:A:C2	1:1:1092:G:C2	3.10	0.40
1:1:1080:A:H8	1:1:1088:G:N2	2.20	0.40
1:2:38:U:H5''	33:w:139:TYR:OH	1.98	0.40
1:2:43:A:H4'	1:2:44:A:C8	2.56	0.40
1:2:53:U:O4'	1:2:53:U:P	2.78	0.40
1:2:115:A:C5'	1:2:116:U:OP2	2.70	0.40
1:2:174:U:C5'	1:2:175:U:OP1	2.69	0.40
1:2:175:U:C6	48:q:11:GLN:HG2	2.49	0.40
1:2:177:U:O2	1:2:177:U:C2'	2.68	0.40
1:2:193:A:O4'	1:2:196:A:N6	2.53	0.40
1:2:348:U:C3'	1:2:349:G:C5'	2.96	0.40
1:2:406:A:N6	3:aw:31:ARG:NH2	2.68	0.40
1:2:429:A:H4'	10:ae:135:PRO:HB2	2.02	0.40
1:2:478:U:C1'	2:h:20:ARG:NH1	2.84	0.40
2:h:88:ARG:HA	2:h:88:ARG:HD2	1.79	0.40
6:s:119:ASP:OD1	6:s:123:HIS:ND1	2.54	0.40
8:am:58:SER:O	53:bd:62:ILE:HA	2.21	0.40
10:ae:240:CYS:SG	10:ae:248:ASP:HB3	2.61	0.40
10:ae:388:PRO:HB3	10:ae:425:ASP:N	2.31	0.40
12:ag:199:LEU:O	12:ag:203:LEU:HG	2.21	0.40
14:e:275:VAL:HG23	14:e:410:PHE:CE1	2.56	0.40
14:e:312:GLY:N	20:u:631:PRO:N	2.67	0.40
14:e:711:PHE:CE2	22:ab:1125:GLN:HB2	2.56	0.40
18:r:285:THR:CG2	18:r:287:VAL:HG12	2.52	0.40
19:af:349:PHE:O	19:af:352:ILE:HG22	2.21	0.40
19:af:481:ASP:O	19:af:485:LEU:N	2.36	0.40
19:af:522:ALA:O	19:af:675:ARG:NH2	2.53	0.40
20:u:133:LEU:HD23	20:u:275:GLY:O	2.21	0.40
20:u:152:LEU:HD23	20:u:258:LEU:HD12	2.02	0.40
21:aa:134:GLU:HB2	47:k:83:MET:HE1	2.04	0.40
21:aa:270:SER:OG	21:aa:271:PHE:N	2.55	0.40
21:aa:594:TRP:CG	21:aa:595:TYR:H	2.39	0.40
21:aa:693:LEU:O	21:aa:711:LEU:HB2	2.21	0.40
21:aa:743:LEU:HD13	26:an:205:HIS:HD2	1.86	0.40
21:aa:1192:GLN:CG	21:aa:1222:GLN:HA	2.51	0.40
21:aa:1389:VAL:O	21:aa:1393:VAL:HG22	2.21	0.40
22:ab:280:GLU:H	22:ab:280:GLU:HG3	1.66	0.40
22:ab:383:ASP:CG	22:ab:386:ARG:HB3	2.47	0.40
22:ab:540:GLU:O	22:ab:544:LYS:HG3	2.21	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
23:ak:55:ASP:HB3	23:ak:58:VAL:HB	2.03	0.40
23:ak:119:TRP:CZ2	23:ak:123:GLN:HG3	2.56	0.40
23:ak:289:ARG:NH2	24:ac:200:GLN:HB3	2.37	0.40
24:ac:598:ARG:HH22	24:ac:599:HIS:CD2	2.40	0.40
25:ad:232:TRP:CE3	25:ad:298:MET:HG3	2.57	0.40
25:ad:704:ILE:HG22	25:ad:706:GLN:H	1.86	0.40
27:ao:17:MET:HE1	27:ao:163:GLU:HG3	2.02	0.40
28:ap:119:HIS:CE1	28:ap:226:PHE:HB2	2.57	0.40
31:at:248:VAL:HG13	31:at:252:TYR:CD2	2.57	0.40
35:t:20:MET:HG2	48:q:51:GLU:HG3	2.04	0.40
37:j:66:GLY:HA3	37:j:94:THR:O	2.21	0.40
39:ar:147:ASP:O	39:ar:151:GLN:N	2.55	0.40
40:av:174:HIS:CG	40:av:175:LEU:N	2.89	0.40
41:ai:214:LEU:HD22	41:ai:336:PHE:HE1	1.86	0.40
41:ai:365:CYS:HB2	52:z:860:HIS:HD2	1.85	0.40
43:i:128:ARG:NH1	43:i:165:HIS:O	2.38	0.40
43:i:214:HIS:NE2	48:q:120:LEU:HD13	2.36	0.40
43:i:248:VAL:O	43:i:251:ILE:HG22	2.21	0.40
45:o:165:ASP:O	45:o:170:TYR:HB2	2.21	0.40
46:c:154:GLU:HA	46:c:154:GLU:OE1	2.21	0.40
48:q:179:PHE:HD1	49:b:42:GLU:OE1	2.04	0.40
50:a:62:ARG:HH22	52:z:462:LEU:CD1	2.34	0.40
52:z:622:HIS:HB3	52:z:625:ARG:HB2	2.03	0.40
54:A:387:PHE:CD1	54:A:387:PHE:N	2.89	0.40
55:B:201:ARG:HA	55:B:204:VAL:HG12	2.02	0.40
56:C:69:THR:HG23	56:C:69:THR:O	2.21	0.40
56:C:132:ARG:HE	56:C:132:ARG:HB3	1.60	0.40
57:D:59:ASP:N	57:D:60:PRO:HD2	2.35	0.40
58:E:119:PRO:HD2	58:E:124:PHE:CZ	2.57	0.40
59:F:54:ILE:HB	59:F:127:LEU:HD13	2.03	0.40
60:G:72:GLU:O	91:Ab:74:LEU:HD11	2.21	0.40
60:G:356:LEU:HA	60:G:356:LEU:HD23	1.80	0.40
64:K:31:GLU:HB2	64:K:34:VAL:CG1	2.50	0.40
64:K:103:GLU:CD	65:L:33:LYS:HE3	2.47	0.40
64:K:136:THR:HB	109:Af:105:GLN:NE2	2.36	0.40
66:M:214:ASP:HB2	66:M:224:LYS:HG3	2.02	0.40
67:N:122:PRO:HG3	71:R:460:HIS:HB2	2.03	0.40
68:O:184:ARG:HH22	68:O:187:GLN:HE21	1.69	0.40
69:P:164:ASP:OD2	69:P:166:ASN:HB2	2.20	0.40
72:S:348:ALA:HA	1:1:368:U:C6	2.56	0.40
75:V:104:ARG:NH2	1:1:184:G:OP2	2.46	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
77:X:60:PRO:HD2	116:Ag:212:LEU:HD22	2.03	0.40
77:X:261:PHE:HE1	77:X:339:CYS:HB3	1.85	0.40
77:X:498:ARG:HA	77:X:498:ARG:HD3	1.91	0.40
78:Y:127:TYR:HE2	112:Ac:25:PHE:CE2	2.39	0.40
80:BA:49:SER:O	80:BA:53:LYS:N	2.46	0.40
80:BA:82:LEU:HD13	80:BA:146:VAL:HG23	2.03	0.40
80:BA:91:HIS:CG	80:BA:92:PRO:HD2	2.55	0.40
85:An:107:ASP:CG	85:An:108:ASP:N	2.80	0.40
85:An:166:ASN:HA	113:Ah:87:MET:SD	2.61	0.40
85:An:293:ARG:O	85:An:297:ALA:N	2.54	0.40
86:Al:226:LYS:HG2	86:Al:227:ASN:H	1.84	0.40
91:Ab:124:ARG:HG2	95:Aa:89:ARG:O	2.22	0.40
91:Ab:162:ASP:O	91:Ab:165:ARG:N	2.54	0.40
92:Ai:64:GLN:HE21	92:Ai:197:MET:HB2	1.86	0.40
92:Ai:409:VAL:HG12	92:Ai:421:LEU:HD22	2.02	0.40
93:Ap:73:CYS:N	93:Ap:121:VAL:HG13	2.35	0.40
93:Ap:199:ASP:OD1	93:Ap:199:ASP:N	2.44	0.40
94:Au:66:LEU:HD23	94:Au:66:LEU:C	2.46	0.40
94:Au:96:LEU:HD12	94:Au:96:LEU:HA	1.71	0.40
96:Ao:248:GLN:HG2	98:Ar:186:ASN:ND2	2.35	0.40
97:BM:97:GLY:HA2	97:BM:100:ALA:HB3	2.03	0.40
97:BM:129:LEU:HD13	97:BM:129:LEU:HA	1.92	0.40
97:BM:373:LYS:HA	97:BM:376:ILE:HG12	2.03	0.40
99:Aj:128:LEU:HD21	99:Aj:283:PRO:HB3	2.03	0.40
100:BH:132:HIS:HB2	100:BH:137:GLN:O	2.21	0.40
102:Aq:106:TYR:CE1	102:Aq:114:VAL:HG21	2.55	0.40
102:Aq:120:PHE:CE2	102:Aq:133:ILE:HG22	2.57	0.40
104:Ak:139:ARG:HH21	104:Ak:197:GLY:CA	2.34	0.40
106:Ad:72:LEU:HA	106:Ad:72:LEU:HD23	1.86	0.40
111:Ae:69:GLY:H	111:Ae:73:THR:HG21	1.86	0.40
111:Ae:124:PRO:HB3	111:Ae:147:TYR:CD1	2.57	0.40
111:Ae:244:PRO:HA	111:Ae:245:PRO:HD2	1.95	0.40
113:Ah:322:ALA:CB	113:Ah:361:GLU:HG2	2.51	0.40
113:Ah:376:GLU:H	113:Ah:376:GLU:HG3	1.76	0.40
115:Ay:54:GLY:HA2	118:BL:356:TYR:CD2	2.55	0.40
117:Ax:91:GLU:HG2	117:Ax:93:VAL:HG13	2.03	0.40
118:BL:263:GLU:HB2	118:BL:352:ARG:O	2.21	0.40
118:BL:305:HIS:HE1	1:1:678:U:OP2	2.05	0.40
120:BG:1338:LEU:H	120:BG:1338:LEU:HG	1.65	0.40
121:UB:59:UNK:O	121:UB:63:UNK:N	2.54	0.40
1:1:229:A:C8	1:1:290:C:N4	2.89	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:1:396:A:N6	1:1:397:A:C5	2.90	0.40
1:1:862:A:H2'	1:1:863:A:O4'	2.21	0.40
1:1:934:G:O2'	1:1:935:G:O5'	2.39	0.40
1:1:998:G:N3	1:1:998:G:H2'	2.37	0.40
1:1:1103:U:C4	1:1:1104:U:C2	3.10	0.40
1:1:1105:G:OP2	1:1:1105:G:C8	2.73	0.40
1:2:32:A:N3	1:2:184:A:H8	2.19	0.40
1:2:104:A:C2	1:2:115:A:C2	3.10	0.40
1:2:158:U:H5''	29:aq:18:TYR:CD2	2.56	0.40
1:2:181:U:OP1	33:w:101:ARG:HA	2.22	0.40
1:2:352:A:H5''	1:2:353:U:H5'	2.04	0.40
1:2:425:A:C8	1:2:425:A:OP2	2.74	0.40
1:2:437:U:O4'	6:s:153:LYS:CG	2.70	0.40
1:2:439:A:H5''	1:2:440:C:C2	2.57	0.40
1:2:556:U:O4	1:2:570:A:N1	2.54	0.40
1:2:557:C:N4	1:2:569:G:H1	2.19	0.40
6:s:38:ILE:HD11	20:u:789:ASP:OD2	2.21	0.40
8:am:98:ILE:HD11	15:d:155:MET:HB2	2.03	0.40
9:n:75:THR:CG2	9:n:137:LYS:HE3	2.52	0.40
9:n:103:GLN:O	9:n:139:MET:HG2	2.22	0.40
10:ae:239:ALA:O	10:ae:242:PRO:HD2	2.22	0.40
10:ae:370:GLN:HE21	10:ae:370:GLN:HB2	1.62	0.40
12:ag:203:LEU:HD12	12:ag:214:ILE:HG12	2.03	0.40
13:aj:208:LEU:O	13:aj:212:GLY:N	2.36	0.40
14:e:208:ARG:HA	15:d:245:GLY:HA2	2.03	0.40
14:e:229:PHE:CD2	20:u:726:ARG:HB2	2.56	0.40
15:d:9:ALA:HB1	36:p:104:LEU:HD13	2.02	0.40
16:az:141:VAL:HG22	16:az:142:HIS:H	1.86	0.40
18:r:147:ASN:ND2	18:r:150:ALA:HB2	2.37	0.40
19:af:619:TRP:CH2	19:af:745:LEU:HB2	2.57	0.40
19:af:660:PHE:CE2	19:af:749:MET:HA	2.57	0.40
21:aa:619:MET:SD	21:aa:794:GLN:HG2	2.61	0.40
21:aa:1097:LEU:HD23	21:aa:1097:LEU:HA	1.97	0.40
21:aa:1110:SER:O	21:aa:1114:ARG:HG3	2.21	0.40
23:ak:177:MET:HA	23:ak:180:VAL:HG22	2.04	0.40
23:ak:238:LEU:HD12	23:ak:239:PHE:HD1	1.87	0.40
23:ak:306:ASP:OD1	23:ak:306:ASP:N	2.53	0.40
24:ac:374:ARG:HG3	24:ac:501:LEU:HD21	2.03	0.40
25:ad:23:PRO:O	25:ad:27:ILE:HG13	2.22	0.40
25:ad:113:TYR:O	25:ad:116:GLN:HG2	2.21	0.40
25:ad:539:MET:HE1	25:ad:568:THR:HG22	2.03	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
25:ad:618:ARG:O	25:ad:621:VAL:HG22	2.20	0.40
26:an:133:GLU:OE2	26:an:133:GLU:N	2.54	0.40
28:ap:182:GLU:O	28:ap:185:LEU:N	2.48	0.40
28:ap:188:VAL:CG2	41:ai:303:VAL:HG11	2.51	0.40
30:as:26:TYR:CE1	39:ar:37:GLU:HA	2.56	0.40
33:w:41:LEU:HD12	33:w:41:LEU:HA	1.95	0.40
36:p:91:ARG:HG3	52:z:139:ARG:NH2	2.34	0.40
39:ar:46:ARG:HH21	39:ar:50:ARG:HH21	1.69	0.40
39:ar:74:HIS:CE1	39:ar:263:SER:HB3	2.55	0.40
41:ai:14:ASP:HA	41:ai:179:TYR:HE2	1.86	0.40
41:ai:113:LYS:O	41:ai:117:ASP:N	2.54	0.40
41:ai:309:ASP:OD1	41:ai:310:LYS:HG3	2.22	0.40
50:a:352:PHE:HD2	50:a:353:PHE:CG	2.39	0.40
52:z:340:ALA:HA	52:z:343:HIS:CD2	2.55	0.40
52:z:531:GLN:OE1	52:z:537:ILE:HG12	2.22	0.40
52:z:580:ARG:HA	52:z:580:ARG:HD3	1.94	0.40
52:z:1052:ALA:O	52:z:1055:ARG:N	2.55	0.40
53:bd:52:LEU:HB2	53:bd:81:ILE:HB	2.04	0.40
54:A:283:ARG:CD	1:1:840:A:H5''	2.49	0.40
54:A:356:PHE:HA	82:BB:98:THR:OG1	2.22	0.40
55:B:21:MET:SD	91:Ab:44:LYS:HG3	2.62	0.40
55:B:75:THR:HB	55:B:77:ARG:O	2.22	0.40
56:C:31:GLU:OE2	56:C:74:SER:HB2	2.21	0.40
58:E:21:PRO:O	58:E:224:GLN:NE2	2.51	0.40
60:G:16:PRO:C	60:G:18:HIS:N	2.77	0.40
60:G:145:ARG:HD2	1:1:346:A:H5''	2.04	0.40
60:G:228:TYR:CE1	60:G:230:LEU:HD13	2.56	0.40
62:I:114:GLN:NE2	121:UB:19:UNK:O	2.54	0.40
64:K:106:ALA:HB2	91:Ab:110:GLN:NE2	2.35	0.40
65:L:109:ALA:HB2	1:1:405:U:O2'	2.22	0.40
67:N:112:VAL:HG13	67:N:121:TRP:CZ3	2.57	0.40
67:N:166:PRO:O	67:N:223:VAL:HG12	2.21	0.40
70:Q:13:PHE:HB2	70:Q:16:ASN:OD1	2.22	0.40
71:R:70:ARG:HD3	71:R:70:ARG:HA	1.94	0.40
75:V:32:PHE:HD2	75:V:98:LYS:HZ1	1.69	0.40
75:V:32:PHE:HZ	1:1:91:U:C5	2.40	0.40
77:X:234:ALA:N	77:X:237:ALA:HA	2.36	0.40
78:Y:121:GLU:OE2	112:Ac:195:ARG:NH2	2.54	0.40
78:Y:134:PRO:HG3	112:Ac:165:LEU:HD13	2.03	0.40
84:Bj:95:PHE:HB2	84:Bj:99:VAL:HG11	2.04	0.40
85:An:90:PRO:C	85:An:92:ASP:H	2.29	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
95:Aa:118:TRP:CZ3	95:Aa:121:ARG:HD3	2.57	0.40
96:Ao:164:LEU:HD22	96:Ao:177:LEU:HB2	2.03	0.40
97:BM:7:LEU:O	97:BM:11:VAL:HG22	2.21	0.40
97:BM:214:LYS:HD2	97:BM:214:LYS:HA	1.81	0.40
97:BM:247:PHE:HD2	97:BM:248:THR:HG23	1.87	0.40
98:Ar:127:ARG:HB2	98:Ar:130:ASP:OD1	2.22	0.40
98:Ar:155:ARG:NE	105:BP:149:ASP:HA	2.36	0.40
100:BH:49:ARG:NH2	100:BH:198:TYR:HD2	2.19	0.40
102:Aq:112:ASN:O	102:Aq:114:VAL:HG23	2.22	0.40
102:Aq:120:PHE:HE2	102:Aq:133:ILE:HA	1.86	0.40
102:Aq:174:ARG:C	102:Aq:176:ARG:N	2.80	0.40
102:Aq:304:MET:HE3	102:Aq:304:MET:HB2	1.67	0.40
104:Ak:282:LYS:HE3	112:Ac:136:PRO:HD2	2.03	0.40
109:Af:66:SER:O	109:Af:66:SER:OG	2.32	0.40
110:As:65:GLU:N	110:As:65:GLU:CD	2.80	0.40
110:As:104:LEU:HD23	110:As:104:LEU:HA	1.94	0.40
110:As:131:ILE:C	110:As:134:PRO:HD2	2.47	0.40
113:Ah:67:ARG:HB3	113:Ah:67:ARG:HE	1.59	0.40
113:Ah:137:HIS:CE1	113:Ah:443:LEU:HD23	2.56	0.40
116:Ag:95:GLU:HG3	116:Ag:97:CYS:H	1.86	0.40
118:BL:135:ARG:HD3	1:1:235:G:OP1	2.22	0.40
118:BL:155:ILE:HG21	118:BL:179:ASN:OD1	2.21	0.40
118:BL:341:LYS:HE2	118:BL:341:LYS:HB3	1.87	0.40
1:1:128:U:O2'	1:1:129:U:O4'	2.37	0.40
1:1:226:A:H61	1:1:310:A:H62	1.69	0.40
1:1:608:A:H1'	1:1:817:A:H61	1.85	0.40
1:1:656:G:N7	1:1:679:A:N6	2.69	0.40
1:1:950:A:O2'	1:1:951:U:H5''	2.21	0.40
1:1:971:U:H4'	1:1:972:A:OP2	2.21	0.40
1:2:82:A:H5'	39:ar:32:LEU:HD12	1.66	0.40
1:2:88:U:O2'	1:2:89:U:O4'	2.38	0.40
1:2:194:U:H5'	1:2:194:U:C6	2.52	0.40
1:2:195:A:C2'	1:2:196:A:OP1	2.68	0.40
1:2:242:U:O2	1:2:242:U:C2'	2.70	0.40
1:2:243:A:N7	1:2:473:U:C1'	2.82	0.40
1:2:250:A:O2'	1:2:251:U:C5'	2.69	0.40
1:2:301:U:C2'	1:2:302:A:O5'	2.70	0.40
1:2:303:G:H8	1:2:303:G:OP2	2.04	0.40
1:2:449:A:H4'	14:e:378:THR:CG2	2.51	0.40
1:2:459:A:H5'	8:am:284:ARG:CZ	2.52	0.40
1:2:478:U:H1'	2:h:20:ARG:CZ	2.50	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
1:2:501:U:C6	14:e:792:GLN:HG2	2.56	0.40
1:2:514:U:C5'	16:az:17:VAL:HG22	2.51	0.40
1:2:555:U:C6	1:2:555:U:C4'	3.05	0.40
1:2:609:U:C6	1:2:609:U:H3'	2.57	0.40
2:h:115:SER:OG	2:h:116:TRP:N	2.54	0.40
5:f:20:MET:O	8:am:274:ILE:HG13	2.21	0.40
5:f:24:LYS:HG2	5:f:25:TYR:CE1	2.56	0.40
12:ag:31:TRP:CE2	13:aj:38:MET:HG3	2.57	0.40
12:ag:131:ALA:HB1	12:ag:134:LEU:HB2	2.02	0.40
14:e:85:ASP:OD2	14:e:87:ARG:NH2	2.52	0.40
14:e:162:MET:HE2	14:e:162:MET:HB2	1.80	0.40
14:e:364:VAL:HG22	14:e:404:VAL:HG22	2.04	0.40
15:d:49:TYR:OH	36:p:187:LEU:O	2.36	0.40
16:az:111:ARG:NH1	16:az:125:THR:HG23	2.37	0.40
17:ax:93:ARG:HD2	17:ax:150:THR:HG21	2.04	0.40
19:af:390:ALA:HB1	19:af:395:ARG:NH2	2.37	0.40
20:u:77:PHE:CD2	20:u:85:LEU:HD21	2.57	0.40
20:u:223:ARG:HE	20:u:247:ARG:NE	2.18	0.40
20:u:261:GLY:O	20:u:265:MET:HG2	2.21	0.40
20:u:387:LYS:HE2	20:u:387:LYS:HB2	1.90	0.40
21:aa:485:VAL:HG12	52:z:1049:ARG:HH11	1.86	0.40
21:aa:653:PHE:HD2	21:aa:693:LEU:HB2	1.86	0.40
21:aa:825:LEU:O	21:aa:829:GLU:HG3	2.22	0.40
21:aa:1451:PHE:HA	21:aa:1454:ASN:HD22	1.87	0.40
21:aa:1486:TYR:HB3	21:aa:1583:LEU:HD22	2.03	0.40
22:ab:96:ARG:HD2	38:l:490:ARG:HH11	1.86	0.40
22:ab:192:TYR:HA	24:ac:1037:MET:HE1	2.03	0.40
22:ab:198:LEU:O	22:ab:203:LEU:HB2	2.22	0.40
22:ab:693:ILE:HA	22:ab:798:TYR:CD2	2.55	0.40
23:ak:16:ARG:HA	23:ak:16:ARG:HD3	1.76	0.40
23:ak:119:TRP:CH2	23:ak:123:GLN:HG3	2.57	0.40
24:ac:256:GLU:HG3	24:ac:257:VAL:H	1.87	0.40
24:ac:659:LEU:HD13	24:ac:882:MET:O	2.22	0.40
24:ac:715:TRP:HZ3	24:ac:837:LEU:HD21	1.87	0.40
24:ac:753:ARG:HH21	24:ac:858:PRO:C	2.29	0.40
24:ac:1020:VAL:HG13	24:ac:1021:LEU:N	2.37	0.40
25:ad:148:SER:O	25:ad:153:ALA:HB3	2.22	0.40
25:ad:379:GLN:CD	40:av:38:ARG:HH22	2.28	0.40
26:an:134:PHE:HB3	50:a:333:ASN:HD22	1.85	0.40
26:an:284:GLN:NE2	26:an:291:HIS:HA	2.36	0.40
27:ao:24:VAL:HG12	27:ao:25:SER:O	2.21	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
29:aq:205:LEU:HD22	29:aq:212:ASN:HD22	1.84	0.40
31:at:225:TRP:HE3	31:at:251:LYS:HD3	1.85	0.40
32:y:208:ALA:O	32:y:211:SER:OG	2.29	0.40
32:y:210:ARG:HH12	32:y:260:ILE:HB	1.86	0.40
36:p:73:PRO:HG2	36:p:74:HIS:ND1	2.37	0.40
43:i:160:TYR:HD2	43:i:174:PRO:HB3	1.85	0.40
43:i:283:VAL:O	43:i:286:VAL:HG22	2.22	0.40
43:i:317:ASP:OD1	43:i:318:VAL:N	2.55	0.40
45:o:170:TYR:HA	45:o:171:PRO:HD3	1.96	0.40
45:o:204:ILE:HG21	51:ba:77:THR:OG1	2.21	0.40
52:z:313:ASP:OD2	52:z:356:ALA:N	2.54	0.40
52:z:441:PHE:HB2	52:z:528:PHE:CD1	2.57	0.40
54:A:129:VAL:CG1	54:A:333:ARG:HH12	2.35	0.40
55:B:179:LYS:NZ	1:1:215:U:O3'	2.55	0.40
57:D:30:LEU:HA	57:D:39:GLN:O	2.21	0.40
58:E:129:ILE:HG22	58:E:149:LEU:HD21	2.03	0.40
58:E:171:PRO:HA	58:E:172:PRO:HD3	1.95	0.40
60:G:72:GLU:HB3	91:Ab:81:VAL:HG11	2.02	0.40
61:H:45:ILE:HD13	61:H:156:VAL:HG23	2.04	0.40
61:H:158:ARG:O	91:Ab:254:ARG:NE	2.55	0.40
62:I:57:LYS:HG3	62:I:57:LYS:O	2.20	0.40
64:K:137:ARG:HE	64:K:146:PRO:HD3	1.85	0.40
67:N:105:ILE:HG12	79:Z:86:ILE:HD13	2.03	0.40
69:P:33:HIS:ND1	69:P:45:LYS:HE2	2.37	0.40
69:P:94:ILE:HG23	98:Ar:17:LEU:HG	2.03	0.40
70:Q:158:ARG:HA	70:Q:158:ARG:HD3	1.74	0.40
70:Q:179:ALA:HB2	85:An:235:HIS:CD2	2.56	0.40
71:R:57:GLU:HG3	79:Z:155:PRO:HG3	2.03	0.40
71:R:104:GLU:OE2	71:R:104:GLU:HA	2.21	0.40
76:W:74:GLU:CD	76:W:74:GLU:O	2.64	0.40
77:X:107:TRP:CH2	92:Ai:82:GLU:HB2	2.56	0.40
77:X:270:TYR:CZ	77:X:437:PRO:HD3	2.57	0.40
77:X:486:MET:O	106:Ad:222:ASN:HB2	2.22	0.40
78:Y:45:MET:HE3	84:Bj:43:LEU:HD12	2.03	0.40
78:Y:224:HIS:HD2	90:BC:66:LEU:HD22	1.87	0.40
84:Bj:3:LEU:HD23	84:Bj:3:LEU:HA	1.95	0.40
89:At:21:LEU:HD23	89:At:21:LEU:O	2.20	0.40
89:At:107:GLU:O	89:At:111:LEU:HD13	2.21	0.40
89:At:151:PHE:CE2	89:At:155:MET:HG3	2.56	0.40
92:Ai:233:MET:HE1	116:Ag:173:ILE:CD1	2.51	0.40
94:Au:73:TYR:CD1	94:Au:73:TYR:O	2.74	0.40

Continued on next page...

Continued from previous page...

Atom-1	Atom-2	Interatomic distance (Å)	Clash overlap (Å)
94:AU:108:HIS:HA	113:Ah:167:ARG:HG3	2.03	0.40
97:BM:31:ARG:HD2	97:BM:31:ARG:HA	1.89	0.40
104:AK:214:VAL:O	104:AK:214:VAL:HG23	2.22	0.40
104:AK:262:ASP:OD1	104:AK:262:ASP:N	2.54	0.40
107:BF:93:LYS:NZ	1:1:562:U:H5''	2.36	0.40
112:AC:169:LEU:HA	112:AC:169:LEU:HD23	1.78	0.40
112:AC:206:ASN:ND2	112:AC:244:PRO:HA	2.37	0.40
112:AC:286:ASP:OD2	112:AC:288:THR:HB	2.22	0.40
113:Ah:67:ARG:HB2	1:1:905:A:C4	2.56	0.40
113:Ah:137:HIS:HE1	113:Ah:443:LEU:HD23	1.87	0.40
113:Ah:188:ASP:HB3	113:Ah:191:LEU:H	1.87	0.40
113:Ah:234:PHE:HD1	113:Ah:234:PHE:HA	1.75	0.40
113:Ah:460:TYR:O	113:Ah:463:ILE:N	2.54	0.40
116:AG:49:ARG:HH11	1:1:82:U:P	2.45	0.40
116:AG:64:GLY:HA3	1:1:104:U:O4'	2.20	0.40
116:AG:201:VAL:HA	116:AG:204:THR:HG22	2.04	0.40
118:BL:263:GLU:OE1	118:BL:353:GLY:HA2	2.22	0.40
1:1:51:U:O4	1:1:119:G:N2	2.54	0.40
1:1:166:U:H1'	1:1:847:A:N6	2.37	0.40
1:1:205:U:C2'	1:1:206:U:H5'	2.52	0.40
1:1:419:U:C2	1:1:420:A:N6	2.89	0.40
1:1:912:U:O4	1:1:913:A:C5	2.74	0.40
1:1:982:A:O2'	1:1:983:U:H5''	2.21	0.40

There are no symmetry-related clashes.

5.3 Torsion angles [i](#)

5.3.1 Protein backbone [i](#)

In the following table, the Percentiles column shows the percent Ramachandran outliers of the chain as a percentile score with respect to all PDB entries followed by that with respect to all EM entries.

The Analysed column shows the number of residues for which the backbone conformation was analysed, and the total number of residues.

Mol	Chain	Analysed	Favoured	Allowed	Outliers	Percentiles	
2	h	155/166 (93%)	148 (96%)	7 (4%)	0	100	100
3	aw	137/139 (99%)	123 (90%)	14 (10%)	0	100	100

Continued on next page...

Continued from previous page...

Mol	Chain	Analysed	Favoured	Allowed	Outliers	Percentiles	
4	m	286/325 (88%)	267 (93%)	19 (7%)	0	100	100
5	f	140/371 (38%)	118 (84%)	22 (16%)	0	100	100
6	s	163/179 (91%)	148 (91%)	15 (9%)	0	100	100
7	au	237/247 (96%)	225 (95%)	12 (5%)	0	100	100
8	am	264/313 (84%)	242 (92%)	22 (8%)	0	100	100
9	n	140/171 (82%)	129 (92%)	11 (8%)	0	100	100
10	ae	582/655 (89%)	542 (93%)	39 (7%)	1 (0%)	43	74
11	ay	139/169 (82%)	129 (93%)	10 (7%)	0	100	100
12	ag	555/564 (98%)	520 (94%)	33 (6%)	2 (0%)	30	64
13	aj	314/397 (79%)	297 (95%)	17 (5%)	0	100	100
14	e	805/822 (98%)	736 (91%)	67 (8%)	2 (0%)	43	74
15	d	339/351 (97%)	317 (94%)	22 (6%)	0	100	100
16	az	152/163 (93%)	148 (97%)	4 (3%)	0	100	100
17	ax	159/184 (86%)	147 (92%)	12 (8%)	0	100	100
18	r	449/467 (96%)	423 (94%)	26 (6%)	0	100	100
19	af	579/835 (69%)	541 (93%)	38 (7%)	0	100	100
20	u	702/890 (79%)	652 (93%)	47 (7%)	3 (0%)	30	64
21	aa	1504/1813 (83%)	1411 (94%)	92 (6%)	1 (0%)	48	80
22	ab	1149/1177 (98%)	1070 (93%)	79 (7%)	0	100	100
23	ak	264/325 (81%)	244 (92%)	20 (8%)	0	100	100
24	ac	1108/1267 (88%)	1014 (92%)	89 (8%)	5 (0%)	24	59
25	ad	688/811 (85%)	643 (94%)	43 (6%)	2 (0%)	36	69
26	an	300/302 (99%)	272 (91%)	26 (9%)	2 (1%)	18	53
27	ao	187/291 (64%)	170 (91%)	17 (9%)	0	100	100
28	ap	238/245 (97%)	213 (90%)	25 (10%)	0	100	100
29	aq	210/295 (71%)	202 (96%)	8 (4%)	0	100	100
30	as	245/270 (91%)	213 (87%)	32 (13%)	0	100	100
31	at	202/397 (51%)	185 (92%)	17 (8%)	0	100	100
32	y	279/485 (58%)	250 (90%)	29 (10%)	0	100	100
33	w	153/190 (80%)	143 (94%)	10 (6%)	0	100	100
34	v	61/214 (28%)	55 (90%)	6 (10%)	0	100	100

Continued on next page...

Continued from previous page...

Mol	Chain	Analysed	Favoured	Allowed	Outliers	Percentiles	
35	t	224/267 (84%)	210 (94%)	14 (6%)	0	100	100
36	p	232/321 (72%)	210 (90%)	21 (9%)	1 (0%)	30	64
37	j	178/189 (94%)	158 (89%)	20 (11%)	0	100	100
38	l	535/677 (79%)	489 (91%)	44 (8%)	2 (0%)	30	64
39	ar	248/282 (88%)	235 (95%)	13 (5%)	0	100	100
40	av	148/236 (63%)	124 (84%)	23 (16%)	1 (1%)	18	53
41	ai	377/379 (100%)	346 (92%)	31 (8%)	0	100	100
42	x	253/268 (94%)	236 (93%)	16 (6%)	1 (0%)	30	64
43	i	265/429 (62%)	248 (94%)	17 (6%)	0	100	100
44	g	97/192 (50%)	94 (97%)	3 (3%)	0	100	100
45	o	436/604 (72%)	412 (94%)	23 (5%)	1 (0%)	43	74
46	c	249/311 (80%)	223 (90%)	26 (10%)	0	100	100
47	k	114/312 (36%)	107 (94%)	7 (6%)	0	100	100
48	q	194/425 (46%)	189 (97%)	5 (3%)	0	100	100
49	b	153/159 (96%)	127 (83%)	25 (16%)	1 (1%)	18	53
50	a	406/431 (94%)	373 (92%)	32 (8%)	1 (0%)	43	74
51	ba	24/94 (26%)	23 (96%)	1 (4%)	0	100	100
52	z	965/1169 (82%)	891 (92%)	73 (8%)	1 (0%)	48	80
53	bd	39/89 (44%)	30 (77%)	9 (23%)	0	100	100
54	A	366/466 (78%)	311 (85%)	50 (14%)	5 (1%)	9	38
55	B	433/435 (100%)	380 (88%)	52 (12%)	1 (0%)	43	74
56	C	210/261 (80%)	179 (85%)	31 (15%)	0	100	100
57	D	126/204 (62%)	109 (86%)	17 (14%)	0	100	100
58	E	324/345 (94%)	293 (90%)	31 (10%)	0	100	100
59	F	168/171 (98%)	153 (91%)	14 (8%)	1 (1%)	21	55
60	G	363/373 (97%)	314 (86%)	47 (13%)	2 (1%)	21	55
61	H	160/167 (96%)	144 (90%)	14 (9%)	2 (1%)	9	40
62	I	255/304 (84%)	224 (88%)	31 (12%)	0	100	100
63	J	139/143 (97%)	102 (73%)	36 (26%)	1 (1%)	18	53
64	K	177/193 (92%)	158 (89%)	19 (11%)	0	100	100
65	L	176/185 (95%)	157 (89%)	18 (10%)	1 (1%)	21	55

Continued on next page...

Continued from previous page...

Mol	Chain	Analysed	Favoured	Allowed	Outliers	Percentiles	
66	M	257/278 (92%)	217 (84%)	38 (15%)	2 (1%)	16	50
67	N	187/251 (74%)	163 (87%)	24 (13%)	0	100	100
68	O	305/475 (64%)	273 (90%)	29 (10%)	3 (1%)	12	45
69	P	163/184 (89%)	145 (89%)	17 (10%)	1 (1%)	21	55
70	Q	215/233 (92%)	192 (89%)	22 (10%)	1 (0%)	24	59
71	R	470/479 (98%)	405 (86%)	65 (14%)	0	100	100
72	S	148/408 (36%)	132 (89%)	16 (11%)	0	100	100
73	T	53/82 (65%)	50 (94%)	3 (6%)	0	100	100
74	U	90/117 (77%)	76 (84%)	12 (13%)	2 (2%)	5	31
75	V	139/150 (93%)	120 (86%)	19 (14%)	0	100	100
76	W	52/185 (28%)	46 (88%)	6 (12%)	0	100	100
77	X	466/512 (91%)	417 (90%)	46 (10%)	3 (1%)	21	55
78	Y	253/292 (87%)	233 (92%)	20 (8%)	0	100	100
79	Z	148/197 (75%)	114 (77%)	31 (21%)	3 (2%)	6	32
80	BA	136/167 (81%)	103 (76%)	29 (21%)	4 (3%)	3	26
82	BB	120/156 (77%)	95 (79%)	23 (19%)	2 (2%)	7	35
83	Aw	183/187 (98%)	161 (88%)	22 (12%)	0	100	100
84	Bj	166/185 (90%)	143 (86%)	22 (13%)	1 (1%)	21	55
85	An	312/331 (94%)	253 (81%)	52 (17%)	7 (2%)	5	31
86	Al	262/346 (76%)	219 (84%)	43 (16%)	0	100	100
87	BI	184/266 (69%)	155 (84%)	29 (16%)	0	100	100
88	Az	136/152 (90%)	110 (81%)	24 (18%)	2 (2%)	8	37
89	At	163/183 (89%)	145 (89%)	18 (11%)	0	100	100
90	BC	138/147 (94%)	129 (94%)	9 (6%)	0	100	100
91	Ab	258/262 (98%)	226 (88%)	32 (12%)	0	100	100
92	Ai	474/479 (99%)	413 (87%)	60 (13%)	1 (0%)	43	74
93	Ap	212/240 (88%)	188 (89%)	24 (11%)	0	100	100
94	Au	174/186 (94%)	131 (75%)	37 (21%)	6 (3%)	3	24
95	Aa	176/195 (90%)	142 (81%)	31 (18%)	3 (2%)	7	35
96	Ao	273/284 (96%)	232 (85%)	39 (14%)	2 (1%)	18	53
97	BM	387/457 (85%)	326 (84%)	61 (16%)	0	100	100

Continued on next page...

Continued from previous page...

Mol	Chain	Analysed	Favoured	Allowed	Outliers	Percentiles	
98	Ar	193/205 (94%)	168 (87%)	25 (13%)	0	100	100
99	Aj	337/503 (67%)	292 (87%)	45 (13%)	0	100	100
100	BH	212/229 (93%)	185 (87%)	27 (13%)	0	100	100
101	Am	328/340 (96%)	275 (84%)	53 (16%)	0	100	100
102	Aq	250/341 (73%)	201 (80%)	43 (17%)	6 (2%)	4	29
103	BE	82/118 (70%)	56 (68%)	25 (30%)	1 (1%)	10	41
104	Ak	298/323 (92%)	254 (85%)	44 (15%)	0	100	100
105	BP	191/254 (75%)	161 (84%)	28 (15%)	2 (1%)	12	45
106	Ad	203/237 (86%)	163 (80%)	38 (19%)	2 (1%)	12	45
107	BF	99/109 (91%)	79 (80%)	20 (20%)	0	100	100
108	Av	153/192 (80%)	128 (84%)	25 (16%)	0	100	100
109	Af	137/155 (88%)	117 (85%)	19 (14%)	1 (1%)	18	53
110	As	95/249 (38%)	87 (92%)	8 (8%)	0	100	100
111	Ae	289/311 (93%)	253 (88%)	36 (12%)	0	100	100
112	Ac	266/291 (91%)	234 (88%)	32 (12%)	0	100	100
113	Ah	450/570 (79%)	386 (86%)	60 (13%)	4 (1%)	14	47
114	BD	95/102 (93%)	85 (90%)	10 (10%)	0	100	100
115	Ay	140/174 (80%)	118 (84%)	18 (13%)	4 (3%)	3	26
116	Ag	229/244 (94%)	204 (89%)	25 (11%)	0	100	100
117	Ax	165/216 (76%)	129 (78%)	33 (20%)	3 (2%)	6	34
118	BL	307/380 (81%)	233 (76%)	67 (22%)	7 (2%)	5	30
119	BO	153/190 (80%)	104 (68%)	46 (30%)	3 (2%)	6	32
120	BG	83/1347 (6%)	57 (69%)	23 (28%)	3 (4%)	2	23
All	All	32374/40717 (80%)	28909 (89%)	3346 (10%)	119 (0%)	31	64

All (119) Ramachandran outliers are listed below:

Mol	Chain	Res	Type
24	ac	685	LEU
54	A	289	ARG
54	A	290	MET
61	H	94	VAL
63	J	66	PRO
68	O	28	ALA

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
74	U	30	ILE
77	X	353	PRO
79	Z	26	HIS
80	BA	24	VAL
82	BB	110	PHE
85	An	46	GLN
85	An	50	HIS
85	An	78	TRP
85	An	97	SER
94	Au	54	PRO
95	Aa	91	LEU
95	Aa	191	THR
102	Aq	172	ILE
102	Aq	175	VAL
105	BP	-3	HIS
115	Ay	36	ILE
117	Ax	204	HIS
118	BL	115	TYR
119	BO	184	VAL
120	BG	1265	PRO
21	aa	1587	ILE
24	ac	1083	ALA
59	F	168	GLN
60	G	149	PRO
60	G	159	ALA
66	M	56	SER
68	O	20	THR
68	O	21	TYR
77	X	355	THR
79	Z	44	LEU
79	Z	106	TYR
88	Az	16	LYS
94	Au	27	GLU
94	Au	92	VAL
94	Au	93	HIS
95	Aa	189	ARG
96	Ao	20	VAL
102	Aq	338	HIS
103	BE	37	GLU
105	BP	96	PRO
109	Af	61	VAL
113	Ah	67	ARG

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
119	BO	92	ARG
12	ag	81	PRO
20	u	354	LEU
20	u	631	PRO
24	ac	1209	ALA
26	an	155	PRO
26	an	162	ALA
45	o	146	ASP
49	b	109	GLN
80	BA	114	PHE
82	BB	129	THR
88	Az	17	GLN
94	Au	96	LEU
102	Aq	53	SER
102	Aq	168	GLN
106	Ad	15	PRO
106	Ad	27	HIS
115	Ay	35	TRP
117	Ax	56	ARG
117	Ax	58	GLN
120	BG	1263	HIS
10	ae	426	THR
24	ac	1123	ILE
38	l	316	PRO
38	l	319	GLU
40	av	80	PRO
42	x	70	PRO
50	a	255	ASN
74	U	29	VAL
84	Bj	76	PRO
85	An	44	TRP
94	Au	45	THR
96	Ao	19	ARG
113	Ah	56	HIS
12	ag	82	LEU
14	e	292	GLY
14	e	310	PRO
25	ad	417	ALA
25	ad	419	PRO
54	A	284	ILE
69	P	56	ASP
70	Q	90	ARG

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
80	BA	23	TYR
85	An	215	VAL
113	Ah	57	LEU
115	Ay	149	ARG
118	BL	116	PHE
119	BO	61	SER
20	u	630	LEU
24	ac	452	GLY
65	L	72	PRO
80	BA	45	GLN
85	An	142	GLY
118	BL	140	SER
54	A	159	PRO
52	z	674	PRO
54	A	377	PRO
113	Ah	64	VAL
115	Ay	150	PRO
61	H	93	VAL
77	X	364	PRO
92	Ai	161	PRO
118	BL	74	PRO
118	BL	324	PRO
118	BL	340	VAL
120	BG	1318	PRO
36	p	270	ILE
55	B	302	GLY
66	M	14	PRO
118	BL	311	VAL
102	Aq	54	ILE

5.3.2 Protein sidechains ⓘ

In the following table, the Percentiles column shows the percent sidechain outliers of the chain as a percentile score with respect to all PDB entries followed by that with respect to all EM entries.

The Analysed column shows the number of residues for which the sidechain conformation was analysed, and the total number of residues.

Mol	Chain	Analysed	Rotameric	Outliers	Percentiles	
2	h	138/146 (94%)	138 (100%)	0	100	100
3	aw	120/120 (100%)	120 (100%)	0	100	100

Continued on next page...

Continued from previous page...

Mol	Chain	Analysed	Rotameric	Outliers	Percentiles	
4	m	250/283 (88%)	250 (100%)	0	100	100
5	f	122/292 (42%)	120 (98%)	2 (2%)	55	69
6	s	143/157 (91%)	142 (99%)	1 (1%)	76	78
7	au	217/223 (97%)	217 (100%)	0	100	100
8	am	228/262 (87%)	228 (100%)	0	100	100
9	n	127/147 (86%)	127 (100%)	0	100	100
10	ae	479/532 (90%)	479 (100%)	0	100	100
11	ay	126/149 (85%)	125 (99%)	1 (1%)	73	77
12	ag	478/484 (99%)	477 (100%)	1 (0%)	87	87
13	aj	275/345 (80%)	275 (100%)	0	100	100
14	e	688/700 (98%)	687 (100%)	1 (0%)	88	89
15	d	289/296 (98%)	289 (100%)	0	100	100
16	az	137/144 (95%)	137 (100%)	0	100	100
17	ax	146/166 (88%)	145 (99%)	1 (1%)	76	78
18	r	396/409 (97%)	396 (100%)	0	100	100
19	af	486/676 (72%)	486 (100%)	0	100	100
20	u	582/733 (79%)	580 (100%)	2 (0%)	86	85
21	aa	1266/1465 (86%)	1264 (100%)	2 (0%)	87	87
22	ab	951/971 (98%)	950 (100%)	1 (0%)	88	89
23	ak	224/268 (84%)	224 (100%)	0	100	100
24	ac	889/1002 (89%)	889 (100%)	0	100	100
25	ad	595/699 (85%)	593 (100%)	2 (0%)	86	85
26	an	248/248 (100%)	248 (100%)	0	100	100
27	ao	167/253 (66%)	167 (100%)	0	100	100
28	ap	191/194 (98%)	191 (100%)	0	100	100
29	aq	190/249 (76%)	190 (100%)	0	100	100
30	as	207/226 (92%)	207 (100%)	0	100	100
31	at	172/334 (52%)	171 (99%)	1 (1%)	78	80
32	y	230/379 (61%)	230 (100%)	0	100	100
33	w	140/170 (82%)	140 (100%)	0	100	100
34	v	53/182 (29%)	53 (100%)	0	100	100

Continued on next page...

Continued from previous page...

Mol	Chain	Analysed	Rotameric	Outliers	Percentiles	
35	t	186/214 (87%)	186 (100%)	0	100	100
36	p	209/278 (75%)	209 (100%)	0	100	100
37	j	163/172 (95%)	163 (100%)	0	100	100
38	l	465/552 (84%)	465 (100%)	0	100	100
39	ar	217/237 (92%)	217 (100%)	0	100	100
40	av	136/208 (65%)	136 (100%)	0	100	100
41	ai	338/338 (100%)	338 (100%)	0	100	100
42	x	211/222 (95%)	211 (100%)	0	100	100
43	i	241/383 (63%)	241 (100%)	0	100	100
44	g	84/168 (50%)	84 (100%)	0	100	100
45	o	393/546 (72%)	393 (100%)	0	100	100
46	c	217/260 (84%)	217 (100%)	0	100	100
47	k	104/272 (38%)	104 (100%)	0	100	100
48	q	177/363 (49%)	177 (100%)	0	100	100
49	b	140/144 (97%)	140 (100%)	0	100	100
50	a	346/365 (95%)	346 (100%)	0	100	100
51	ba	21/82 (26%)	21 (100%)	0	100	100
52	z	817/979 (84%)	816 (100%)	1 (0%)	88	89
53	bd	39/85 (46%)	39 (100%)	0	100	100
54	A	314/393 (80%)	313 (100%)	1 (0%)	86	85
55	B	380/380 (100%)	375 (99%)	5 (1%)	61	71
56	C	190/226 (84%)	189 (100%)	1 (0%)	81	82
57	D	106/154 (69%)	106 (100%)	0	100	100
58	E	285/300 (95%)	285 (100%)	0	100	100
59	F	151/152 (99%)	149 (99%)	2 (1%)	61	71
60	G	315/322 (98%)	307 (98%)	8 (2%)	42	62
61	H	138/142 (97%)	138 (100%)	0	100	100
62	I	223/261 (85%)	222 (100%)	1 (0%)	84	83
63	J	119/121 (98%)	115 (97%)	4 (3%)	32	55
64	K	151/161 (94%)	151 (100%)	0	100	100
65	L	151/157 (96%)	151 (100%)	0	100	100

Continued on next page...

Continued from previous page...

Mol	Chain	Analysed	Rotameric	Outliers	Percentiles	
66	M	226/241 (94%)	222 (98%)	4 (2%)	51	67
67	N	175/219 (80%)	175 (100%)	0	100	100
68	O	278/396 (70%)	274 (99%)	4 (1%)	59	71
69	P	147/162 (91%)	145 (99%)	2 (1%)	59	71
70	Q	191/203 (94%)	189 (99%)	2 (1%)	68	75
71	R	406/411 (99%)	405 (100%)	1 (0%)	87	87
72	S	135/335 (40%)	135 (100%)	0	100	100
73	T	52/73 (71%)	52 (100%)	0	100	100
74	U	80/99 (81%)	74 (92%)	6 (8%)	12	38
75	V	125/134 (93%)	124 (99%)	1 (1%)	73	77
76	W	50/163 (31%)	46 (92%)	4 (8%)	11	35
77	X	402/437 (92%)	397 (99%)	5 (1%)	63	72
78	Y	209/236 (89%)	209 (100%)	0	100	100
79	Z	132/172 (77%)	129 (98%)	3 (2%)	44	63
80	BA	112/135 (83%)	111 (99%)	1 (1%)	70	75
82	BB	106/140 (76%)	105 (99%)	1 (1%)	70	75
83	Aw	157/159 (99%)	155 (99%)	2 (1%)	61	71
84	Bj	150/165 (91%)	149 (99%)	1 (1%)	76	78
85	An	274/289 (95%)	265 (97%)	9 (3%)	33	56
86	Al	236/299 (79%)	228 (97%)	8 (3%)	32	55
87	BI	153/221 (69%)	152 (99%)	1 (1%)	76	78
88	Az	129/143 (90%)	128 (99%)	1 (1%)	73	77
89	At	140/153 (92%)	140 (100%)	0	100	100
90	BC	117/124 (94%)	116 (99%)	1 (1%)	70	75
91	Ab	233/235 (99%)	232 (100%)	1 (0%)	84	83
92	Ai	408/410 (100%)	407 (100%)	1 (0%)	87	87
93	Ap	189/208 (91%)	188 (100%)	1 (0%)	81	82
94	Au	154/164 (94%)	148 (96%)	6 (4%)	28	52
95	Aa	150/166 (90%)	150 (100%)	0	100	100
96	Ao	236/245 (96%)	235 (100%)	1 (0%)	84	83
97	BM	319/370 (86%)	318 (100%)	1 (0%)	86	85

Continued on next page...

Continued from previous page...

Mol	Chain	Analysed	Rotameric	Outliers	Percentiles	
98	Ar	169/179 (94%)	168 (99%)	1 (1%)	78	80
99	Aj	286/420 (68%)	284 (99%)	2 (1%)	76	78
100	BH	177/189 (94%)	176 (99%)	1 (1%)	78	80
101	Am	278/287 (97%)	276 (99%)	2 (1%)	76	78
102	Aq	221/276 (80%)	218 (99%)	3 (1%)	59	71
103	BE	76/100 (76%)	76 (100%)	0	100	100
104	Ak	254/272 (93%)	254 (100%)	0	100	100
105	BP	167/215 (78%)	166 (99%)	1 (1%)	78	80
106	Ad	172/193 (89%)	170 (99%)	2 (1%)	63	72
107	BF	88/95 (93%)	87 (99%)	1 (1%)	65	74
108	Av	141/169 (83%)	140 (99%)	1 (1%)	76	78
109	Af	120/135 (89%)	120 (100%)	0	100	100
110	As	88/204 (43%)	88 (100%)	0	100	100
111	Ae	249/261 (95%)	247 (99%)	2 (1%)	73	77
112	Ac	232/253 (92%)	232 (100%)	0	100	100
113	Ah	385/485 (79%)	380 (99%)	5 (1%)	61	71
114	BD	85/90 (94%)	85 (100%)	0	100	100
115	Ay	130/158 (82%)	129 (99%)	1 (1%)	73	77
116	Ag	202/211 (96%)	201 (100%)	1 (0%)	81	82
117	Ax	150/190 (79%)	144 (96%)	6 (4%)	28	51
118	BL	268/329 (82%)	262 (98%)	6 (2%)	45	64
119	BO	130/158 (82%)	129 (99%)	1 (1%)	73	77
120	BG	67/1047 (6%)	66 (98%)	1 (2%)	57	70
All	All	27983/34364 (81%)	27840 (100%)	143 (0%)	78	82

All (143) residues with a non-rotameric sidechain are listed below:

Mol	Chain	Res	Type
5	f	96	HIS
5	f	135	PHE
6	s	96	HIS
11	ay	29	TRP
12	ag	282	LEU
14	e	289	LEU

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
17	ax	20	THR
20	u	617	ILE
20	u	629	VAL
21	aa	429	ASP
21	aa	1492	LEU
22	ab	430	LEU
25	ad	191	ASP
25	ad	536	THR
31	at	351	CYS
52	z	975	VAL
54	A	205	VAL
55	B	75	THR
55	B	192	ASP
55	B	193	VAL
55	B	194	LYS
55	B	403	PRO
56	C	100	LEU
59	F	157	ASP
59	F	161	GLN
60	G	142	TRP
60	G	143	GLN
60	G	145	ARG
60	G	146	LYS
60	G	148	THR
60	G	149	PRO
60	G	150	ARG
60	G	153	LEU
62	I	186	PHE
63	J	66	PRO
63	J	67	ARG
63	J	69	VAL
63	J	75	VAL
66	M	9	ASN
66	M	14	PRO
66	M	54	MET
66	M	56	SER
68	O	19	PHE
68	O	20	THR
68	O	29	ARG
68	O	100	THR
69	P	41	THR
69	P	134	VAL

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
70	Q	49	VAL
70	Q	108	ILE
71	R	375	VAL
74	U	17	ARG
74	U	19	LYS
74	U	26	ILE
74	U	28	LYS
74	U	30	ILE
74	U	36	ASN
75	V	39	VAL
76	W	72	HIS
76	W	74	GLU
76	W	94	LYS
76	W	97	ASN
77	X	77	ASP
77	X	158	VAL
77	X	353	PRO
77	X	498	ARG
77	X	500	THR
79	Z	40	THR
79	Z	43	ILE
79	Z	44	LEU
80	BA	115	VAL
82	BB	111	PHE
83	Aw	6	VAL
83	Aw	53	VAL
84	Bj	143	ASN
85	An	101	ILE
85	An	106	TRP
85	An	117	MET
85	An	129	LYS
85	An	140	ARG
85	An	143	TYR
85	An	217	ARG
85	An	221	GLN
85	An	304	ASP
86	Al	36	GLU
86	Al	39	GLN
86	Al	268	TYR
86	Al	269	GLU
86	Al	274	VAL
86	Al	279	ASN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
86	Al	284	VAL
86	Al	289	ASN
87	BI	165	ILE
88	Az	60	HIS
90	BC	68	ASP
91	Ab	63	ASP
92	Ai	168	VAL
93	Ap	210	VAL
94	Au	46	VAL
94	Au	47	LEU
94	Au	71	MET
94	Au	72	ASP
94	Au	77	VAL
94	Au	93	HIS
96	Ao	33	LEU
97	BM	138	VAL
98	Ar	58	THR
99	Aj	349	VAL
99	Aj	422	LEU
100	BH	225	ILE
101	Am	14	THR
101	Am	332	THR
102	Aq	336	ARG
102	Aq	339	ARG
102	Aq	341	PHE
105	BP	0	TRP
106	Ad	27	HIS
106	Ad	64	ASP
107	BF	103	HIS
108	Av	42	THR
111	Ae	163	VAL
111	Ae	254	ASP
113	Ah	67	ARG
113	Ah	68	ILE
113	Ah	112	TYR
113	Ah	279	ASP
113	Ah	444	THR
115	Ay	51	TRP
116	Ag	99	VAL
117	Ax	63	TRP
117	Ax	109	ASP
117	Ax	134	GLN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
117	Ax	136	TYR
117	Ax	167	LEU
117	Ax	173	ARG
118	BL	132	HIS
118	BL	134	ARG
118	BL	141	TRP
118	BL	211	THR
118	BL	328	THR
118	BL	361	THR
119	BO	128	VAL
120	BG	1333	ILE

Sometimes sidechains can be flipped to improve hydrogen bonding and reduce clashes. All (716) such sidechains are listed below:

Mol	Chain	Res	Type
2	h	15	GLN
2	h	64	GLN
2	h	77	ASN
2	h	133	HIS
3	aw	5	ASN
3	aw	22	HIS
3	aw	108	GLN
4	m	20	GLN
4	m	29	ASN
4	m	68	GLN
4	m	72	HIS
4	m	156	ASN
4	m	208	HIS
4	m	219	GLN
4	m	235	GLN
4	m	252	HIS
4	m	255	GLN
5	f	35	GLN
5	f	126	GLN
5	f	132	GLN
6	s	19	HIS
6	s	81	ASN
6	s	94	ASN
6	s	134	HIS
6	s	138	ASN
7	au	45	HIS
7	au	58	ASN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
7	au	72	HIS
7	au	113	GLN
7	au	139	HIS
7	au	146	GLN
7	au	154	GLN
7	au	167	ASN
7	au	219	GLN
7	au	247	GLN
8	am	105	GLN
8	am	225	GLN
8	am	303	HIS
9	n	66	ASN
9	n	103	GLN
9	n	109	HIS
9	n	140	ASN
10	ae	41	ASN
10	ae	73	HIS
10	ae	203	GLN
10	ae	272	ASN
10	ae	297	HIS
10	ae	370	GLN
10	ae	371	GLN
10	ae	382	ASN
10	ae	427	ASN
11	ay	58	HIS
11	ay	114	HIS
11	ay	130	GLN
12	ag	6	ASN
12	ag	51	GLN
12	ag	62	GLN
12	ag	66	GLN
12	ag	264	HIS
12	ag	291	GLN
12	ag	316	HIS
12	ag	408	ASN
13	aj	72	HIS
13	aj	127	HIS
13	aj	253	ASN
13	aj	307	GLN
13	aj	315	GLN
14	e	33	GLN
14	e	68	GLN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
14	e	82	HIS
14	e	116	HIS
14	e	224	ASN
14	e	231	ASN
14	e	394	HIS
14	e	417	GLN
14	e	463	HIS
14	e	693	GLN
14	e	716	HIS
14	e	766	GLN
14	e	774	GLN
14	e	795	GLN
14	e	797	HIS
14	e	810	HIS
15	d	12	ASN
15	d	116	HIS
15	d	119	ASN
15	d	223	GLN
16	az	99	GLN
16	az	112	HIS
16	az	128	GLN
16	az	142	HIS
16	az	144	HIS
17	ax	34	ASN
17	ax	43	ASN
17	ax	86	ASN
17	ax	92	HIS
17	ax	98	HIS
17	ax	120	HIS
17	ax	153	HIS
17	ax	163	HIS
18	r	130	GLN
18	r	184	ASN
18	r	189	GLN
18	r	270	HIS
18	r	281	ASN
18	r	401	HIS
18	r	427	HIS
18	r	443	GLN
19	af	199	ASN
19	af	205	ASN
19	af	332	ASN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
19	af	464	GLN
19	af	531	HIS
19	af	655	GLN
19	af	751	GLN
19	af	763	GLN
19	af	833	GLN
20	u	45	HIS
20	u	128	GLN
20	u	140	GLN
20	u	196	GLN
20	u	208	HIS
20	u	341	ASN
20	u	353	HIS
20	u	569	GLN
20	u	604	GLN
20	u	621	HIS
20	u	668	GLN
20	u	695	GLN
20	u	744	GLN
21	aa	100	HIS
21	aa	108	HIS
21	aa	148	GLN
21	aa	161	ASN
21	aa	164	GLN
21	aa	185	GLN
21	aa	239	HIS
21	aa	306	ASN
21	aa	343	GLN
21	aa	392	HIS
21	aa	401	HIS
21	aa	413	GLN
21	aa	433	HIS
21	aa	575	GLN
21	aa	622	GLN
21	aa	717	GLN
21	aa	762	GLN
21	aa	764	HIS
21	aa	789	GLN
21	aa	794	GLN
21	aa	830	GLN
21	aa	843	GLN
21	aa	880	HIS

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
21	aa	905	GLN
21	aa	950	ASN
21	aa	964	ASN
21	aa	978	HIS
21	aa	982	GLN
21	aa	1034	HIS
21	aa	1040	HIS
21	aa	1084	GLN
21	aa	1094	GLN
21	aa	1223	GLN
21	aa	1286	ASN
21	aa	1400	ASN
21	aa	1503	ASN
21	aa	1559	GLN
21	aa	1616	GLN
21	aa	1634	GLN
21	aa	1637	ASN
22	ab	48	HIS
22	ab	62	GLN
22	ab	78	HIS
22	ab	80	GLN
22	ab	133	HIS
22	ab	139	HIS
22	ab	265	HIS
22	ab	325	ASN
22	ab	344	GLN
22	ab	356	GLN
22	ab	425	HIS
22	ab	434	ASN
22	ab	437	HIS
22	ab	444	GLN
22	ab	507	HIS
22	ab	510	GLN
22	ab	670	GLN
22	ab	698	GLN
22	ab	716	HIS
22	ab	717	GLN
22	ab	763	GLN
22	ab	929	HIS
22	ab	1032	GLN
22	ab	1047	GLN
22	ab	1107	GLN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
22	ab	1120	HIS
22	ab	1125	GLN
23	ak	23	HIS
23	ak	36	ASN
23	ak	133	HIS
23	ak	142	GLN
23	ak	158	ASN
23	ak	161	HIS
23	ak	178	GLN
24	ac	132	ASN
24	ac	245	ASN
24	ac	271	ASN
24	ac	291	GLN
24	ac	299	GLN
24	ac	367	HIS
24	ac	438	GLN
24	ac	527	HIS
24	ac	547	GLN
24	ac	550	HIS
24	ac	612	GLN
24	ac	652	GLN
24	ac	709	GLN
24	ac	775	GLN
24	ac	841	GLN
24	ac	978	HIS
24	ac	990	GLN
24	ac	1005	HIS
24	ac	1075	HIS
24	ac	1101	GLN
24	ac	1103	GLN
24	ac	1172	GLN
24	ac	1208	GLN
25	ad	144	ASN
25	ad	156	GLN
25	ad	173	GLN
25	ad	233	ASN
25	ad	276	HIS
25	ad	286	ASN
25	ad	313	HIS
25	ad	348	HIS
25	ad	349	GLN
25	ad	387	GLN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
25	ad	507	GLN
25	ad	564	GLN
25	ad	606	HIS
25	ad	646	HIS
25	ad	706	GLN
26	an	153	GLN
26	an	188	HIS
26	an	216	HIS
26	an	282	GLN
26	an	284	GLN
26	an	291	HIS
26	an	300	GLN
27	ao	27	ASN
27	ao	78	ASN
28	ap	26	GLN
28	ap	118	GLN
28	ap	200	ASN
28	ap	235	GLN
29	aq	41	GLN
29	aq	136	ASN
29	aq	140	ASN
29	aq	141	HIS
30	as	96	ASN
32	y	115	ASN
32	y	246	ASN
33	w	55	HIS
33	w	163	ASN
33	w	168	ASN
35	t	93	ASN
35	t	102	GLN
35	t	153	HIS
36	p	67	GLN
36	p	114	ASN
36	p	139	HIS
36	p	194	GLN
36	p	198	HIS
36	p	207	GLN
36	p	280	GLN
37	j	50	HIS
37	j	88	HIS
37	j	117	ASN
37	j	131	GLN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
37	j	157	GLN
37	j	167	ASN
38	l	239	HIS
38	l	257	HIS
38	l	355	GLN
38	l	575	HIS
38	l	583	GLN
38	l	599	GLN
39	ar	42	GLN
39	ar	74	HIS
39	ar	220	HIS
39	ar	230	GLN
39	ar	246	HIS
39	ar	248	HIS
40	av	84	HIS
40	av	124	GLN
40	av	177	HIS
41	ai	52	GLN
41	ai	53	GLN
41	ai	92	ASN
41	ai	97	GLN
41	ai	197	ASN
41	ai	222	ASN
41	ai	279	ASN
41	ai	289	HIS
42	x	104	HIS
42	x	119	HIS
42	x	123	HIS
42	x	129	HIS
42	x	155	GLN
42	x	181	GLN
43	i	111	GLN
43	i	136	HIS
43	i	260	ASN
43	i	325	ASN
44	g	83	ASN
44	g	100	HIS
44	g	104	GLN
44	g	112	GLN
44	g	122	GLN
44	g	131	GLN
44	g	135	ASN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
45	o	76	GLN
45	o	199	HIS
45	o	225	ASN
45	o	392	GLN
45	o	438	ASN
45	o	452	ASN
45	o	477	GLN
46	c	79	GLN
46	c	114	GLN
46	c	276	HIS
46	c	277	ASN
46	c	311	HIS
47	k	122	GLN
47	k	133	HIS
48	q	72	ASN
48	q	81	ASN
48	q	98	GLN
48	q	106	GLN
48	q	119	HIS
48	q	203	ASN
49	b	56	ASN
49	b	90	ASN
49	b	106	HIS
49	b	108	GLN
50	a	85	ASN
50	a	91	ASN
50	a	105	GLN
50	a	132	HIS
50	a	208	GLN
50	a	218	ASN
50	a	248	GLN
50	a	255	ASN
50	a	267	HIS
50	a	338	HIS
50	a	427	ASN
50	a	431	HIS
51	ba	69	HIS
52	z	105	HIS
52	z	141	HIS
52	z	151	ASN
52	z	217	ASN
52	z	261	HIS

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
52	z	318	GLN
52	z	482	HIS
52	z	772	HIS
52	z	836	GLN
52	z	860	HIS
52	z	970	HIS
52	z	1026	ASN
53	bd	56	ASN
53	bd	74	ASN
54	A	81	GLN
54	A	109	GLN
54	A	162	GLN
54	A	184	ASN
54	A	207	HIS
54	A	337	ASN
55	B	74	GLN
55	B	88	GLN
55	B	133	GLN
55	B	153	ASN
55	B	170	HIS
55	B	172	HIS
55	B	177	HIS
55	B	200	ASN
55	B	273	ASN
55	B	276	ASN
55	B	323	HIS
56	C	67	ASN
56	C	120	ASN
56	C	142	ASN
57	D	26	HIS
57	D	38	HIS
57	D	62	GLN
58	E	52	ASN
58	E	87	ASN
58	E	221	HIS
58	E	246	ASN
58	E	273	HIS
58	E	280	GLN
59	F	51	HIS
59	F	135	HIS
59	F	161	GLN
60	G	19	GLN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
60	G	29	GLN
60	G	38	ASN
60	G	89	GLN
60	G	143	GLN
60	G	202	ASN
60	G	236	ASN
60	G	264	GLN
60	G	277	GLN
61	H	61	GLN
61	H	108	ASN
61	H	134	ASN
61	H	152	GLN
62	I	18	HIS
62	I	65	HIS
62	I	99	HIS
62	I	120	HIS
62	I	223	HIS
62	I	242	HIS
62	I	259	HIS
63	J	52	GLN
63	J	65	ASN
63	J	99	ASN
64	K	78	GLN
64	K	79	HIS
64	K	97	GLN
64	K	98	GLN
64	K	101	GLN
64	K	145	HIS
65	L	14	GLN
65	L	29	ASN
65	L	43	GLN
65	L	52	GLN
66	M	19	GLN
66	M	24	GLN
66	M	31	HIS
66	M	76	ASN
66	M	123	GLN
66	M	131	GLN
66	M	173	HIS
66	M	230	HIS
67	N	55	GLN
67	N	58	ASN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
67	N	77	ASN
67	N	160	ASN
68	O	23	GLN
68	O	89	HIS
68	O	104	GLN
68	O	187	GLN
68	O	190	GLN
68	O	193	HIS
68	O	212	HIS
68	O	296	HIS
68	O	303	GLN
69	P	142	HIS
70	Q	24	HIS
70	Q	79	ASN
70	Q	164	GLN
70	Q	170	ASN
70	Q	222	GLN
71	R	23	ASN
71	R	67	HIS
71	R	71	HIS
71	R	167	HIS
71	R	194	GLN
71	R	246	ASN
71	R	260	GLN
71	R	286	GLN
71	R	370	GLN
71	R	419	GLN
71	R	421	ASN
71	R	470	HIS
72	S	256	ASN
72	S	327	HIS
72	S	371	HIS
72	S	374	GLN
72	S	384	HIS
72	S	385	HIS
72	S	388	GLN
72	S	389	GLN
73	T	46	HIS
74	U	37	ASN
74	U	78	GLN
75	V	29	GLN
75	V	119	GLN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
76	W	60	HIS
76	W	72	HIS
76	W	79	HIS
76	W	97	ASN
77	X	64	HIS
77	X	220	GLN
77	X	250	GLN
77	X	257	ASN
77	X	344	GLN
77	X	347	HIS
77	X	479	GLN
77	X	491	GLN
78	Y	149	GLN
78	Y	153	GLN
78	Y	231	GLN
78	Y	279	HIS
79	Z	13	HIS
79	Z	14	ASN
79	Z	26	HIS
79	Z	91	ASN
79	Z	146	GLN
80	BA	91	HIS
82	BB	41	HIS
82	BB	55	GLN
82	BB	70	ASN
82	BB	108	GLN
83	Aw	79	HIS
83	Aw	89	HIS
83	Aw	95	GLN
84	Bj	4	ASN
84	Bj	29	ASN
84	Bj	57	HIS
84	Bj	91	ASN
85	An	24	HIS
85	An	48	HIS
85	An	123	GLN
85	An	166	ASN
85	An	212	HIS
85	An	221	GLN
85	An	240	GLN
85	An	264	HIS
85	An	295	HIS

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
85	An	314	HIS
86	Al	133	GLN
86	Al	164	HIS
86	Al	276	GLN
86	Al	279	ASN
86	Al	298	ASN
87	BI	81	HIS
87	BI	148	ASN
87	BI	206	HIS
88	Az	19	GLN
88	Az	24	HIS
88	Az	31	ASN
88	Az	73	HIS
88	Az	128	GLN
88	Az	146	ASN
89	At	56	ASN
89	At	73	HIS
89	At	90	GLN
89	At	161	GLN
90	BC	22	HIS
90	BC	49	ASN
90	BC	65	ASN
90	BC	67	ASN
90	BC	90	GLN
90	BC	119	GLN
90	BC	123	ASN
90	BC	125	HIS
91	Ab	10	GLN
91	Ab	27	GLN
91	Ab	37	HIS
91	Ab	84	HIS
91	Ab	94	ASN
91	Ab	147	GLN
91	Ab	205	HIS
91	Ab	245	GLN
91	Ab	257	GLN
92	Ai	18	GLN
92	Ai	27	GLN
92	Ai	64	GLN
92	Ai	80	ASN
92	Ai	151	ASN
92	Ai	245	ASN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
92	Ai	248	ASN
93	Ap	81	HIS
93	Ap	123	HIS
94	Au	74	GLN
94	Au	93	HIS
94	Au	98	ASN
94	Au	99	HIS
94	Au	103	GLN
94	Au	135	HIS
94	Au	157	GLN
94	Au	167	HIS
95	Aa	20	GLN
95	Aa	23	ASN
95	Aa	109	HIS
95	Aa	112	HIS
95	Aa	159	GLN
95	Aa	194	ASN
96	Ao	90	HIS
96	Ao	96	HIS
96	Ao	160	GLN
96	Ao	248	GLN
96	Ao	271	GLN
96	Ao	280	ASN
97	BM	35	GLN
97	BM	113	GLN
97	BM	127	HIS
97	BM	228	ASN
97	BM	314	GLN
97	BM	325	GLN
97	BM	381	ASN
98	Ar	48	GLN
98	Ar	96	GLN
98	Ar	105	ASN
98	Ar	160	GLN
98	Ar	164	HIS
98	Ar	186	ASN
98	Ar	194	HIS
99	Aj	122	ASN
99	Aj	210	GLN
99	Aj	220	HIS
99	Aj	242	HIS
99	Aj	281	GLN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
99	Aj	375	GLN
99	Aj	389	GLN
99	Aj	409	HIS
99	Aj	440	GLN
99	Aj	450	ASN
99	Aj	468	HIS
99	Aj	482	GLN
100	BH	82	HIS
100	BH	132	HIS
100	BH	137	GLN
100	BH	149	ASN
100	BH	214	HIS
101	Am	15	HIS
101	Am	95	HIS
101	Am	106	HIS
101	Am	144	HIS
101	Am	148	ASN
101	Am	184	ASN
101	Am	228	GLN
101	Am	263	HIS
101	Am	278	GLN
101	Am	315	ASN
102	Aq	19	HIS
102	Aq	36	HIS
102	Aq	55	ASN
102	Aq	80	HIS
102	Aq	109	HIS
102	Aq	159	HIS
102	Aq	281	GLN
102	Aq	289	ASN
102	Aq	308	GLN
103	BE	56	HIS
103	BE	97	HIS
104	Ak	22	HIS
104	Ak	64	GLN
104	Ak	216	HIS
104	Ak	234	HIS
104	Ak	294	GLN
105	BP	6	HIS
105	BP	49	GLN
106	Ad	85	GLN
106	Ad	187	GLN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
106	Ad	188	ASN
106	Ad	220	ASN
108	Av	137	GLN
108	Av	168	HIS
109	Af	20	HIS
109	Af	30	GLN
109	Af	100	GLN
109	Af	105	GLN
110	As	94	ASN
111	Ae	37	HIS
111	Ae	54	ASN
111	Ae	79	GLN
111	Ae	83	HIS
111	Ae	172	HIS
112	Ac	38	HIS
112	Ac	55	HIS
112	Ac	57	HIS
112	Ac	62	HIS
112	Ac	124	GLN
112	Ac	132	GLN
112	Ac	147	GLN
112	Ac	149	ASN
112	Ac	245	GLN
113	Ah	56	HIS
113	Ah	107	HIS
113	Ah	184	HIS
113	Ah	272	GLN
113	Ah	347	ASN
113	Ah	385	GLN
114	BD	64	HIS
114	BD	80	GLN
115	Ay	83	ASN
115	Ay	158	GLN
116	Ag	120	ASN
116	Ag	197	HIS
117	Ax	66	GLN
117	Ax	85	HIS
117	Ax	95	GLN
117	Ax	183	HIS
117	Ax	188	ASN
117	Ax	204	HIS
118	BL	92	GLN

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
118	BL	118	HIS
118	BL	152	GLN
118	BL	164	HIS
118	BL	210	GLN
118	BL	224	HIS
118	BL	232	HIS
118	BL	284	ASN
118	BL	305	HIS
118	BL	335	HIS
118	BL	374	ASN
119	BO	118	HIS
119	BO	137	ASN
119	BO	144	GLN
119	BO	176	HIS
120	BG	1274	ASN
120	BG	1328	GLN
120	BG	1336	GLN

5.3.3 RNA ⓘ

Mol	Chain	Analysed	Backbone Outliers	Pucker Outliers
1	1	1082/18998 (5%)	639 (59%)	129 (11%)
1	2	602/18998 (3%)	496 (82%)	200 (33%)
All	All	1684/37996 (4%)	1135 (67%)	329 (19%)

All (1135) RNA backbone outliers are listed below:

Mol	Chain	Res	Type
1	2	2	U
1	2	3	C
1	2	4	A
1	2	6	U
1	2	7	U
1	2	9	U
1	2	10	U
1	2	11	A
1	2	12	U
1	2	13	U
1	2	15	U
1	2	16	U
1	2	17	C

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	18	A
1	2	24	A
1	2	25	U
1	2	26	U
1	2	27	U
1	2	28	U
1	2	29	U
1	2	32	A
1	2	33	A
1	2	34	A
1	2	35	A
1	2	36	G
1	2	37	U
1	2	41	U
1	2	42	U
1	2	43	A
1	2	44	A
1	2	46	U
1	2	47	U
1	2	48	U
1	2	49	A
1	2	50	U
1	2	51	A
1	2	52	U
1	2	53	U
1	2	54	A
1	2	55	G
1	2	56	U
1	2	57	U
1	2	58	U
1	2	60	U
1	2	61	U
1	2	64	U
1	2	65	U
1	2	66	U
1	2	67	A
1	2	68	A
1	2	69	A
1	2	70	A
1	2	83	A
1	2	84	U
1	2	86	C

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	87	A
1	2	88	U
1	2	90	A
1	2	91	U
1	2	92	U
1	2	93	U
1	2	94	A
1	2	95	G
1	2	96	G
1	2	97	A
1	2	98	A
1	2	99	U
1	2	100	A
1	2	101	G
1	2	102	U
1	2	103	U
1	2	107	A
1	2	108	A
1	2	109	U
1	2	110	A
1	2	111	A
1	2	112	U
1	2	113	U
1	2	114	U
1	2	116	U
1	2	117	A
1	2	120	U
1	2	123	G
1	2	125	U
1	2	127	A
1	2	131	U
1	2	132	U
1	2	133	G
1	2	134	U
1	2	135	U
1	2	136	U
1	2	138	U
1	2	139	U
1	2	140	A
1	2	141	A
1	2	142	U
1	2	148	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	149	A
1	2	150	A
1	2	151	A
1	2	152	G
1	2	155	G
1	2	156	U
1	2	157	G
1	2	161	A
1	2	163	A
1	2	165	A
1	2	166	G
1	2	167	U
1	2	168	G
1	2	169	U
1	2	170	U
1	2	171	A
1	2	172	A
1	2	173	A
1	2	174	U
1	2	175	U
1	2	176	U
1	2	177	U
1	2	178	U
1	2	179	G
1	2	180	A
1	2	182	A
1	2	183	U
1	2	184	A
1	2	185	U
1	2	186	U
1	2	189	A
1	2	190	A
1	2	191	U
1	2	192	A
1	2	193	A
1	2	194	U
1	2	195	A
1	2	196	A
1	2	197	A
1	2	198	U
1	2	199	A
1	2	200	A

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	201	A
1	2	202	A
1	2	203	U
1	2	204	A
1	2	205	U
1	2	206	A
1	2	208	C
1	2	209	U
1	2	210	U
1	2	211	A
1	2	212	U
1	2	213	U
1	2	214	A
1	2	215	G
1	2	217	C
1	2	218	A
1	2	219	G
1	2	220	A
1	2	221	A
1	2	222	A
1	2	223	U
1	2	225	G
1	2	227	U
1	2	228	G
1	2	229	C
1	2	230	C
1	2	232	G
1	2	234	C
1	2	235	G
1	2	237	U
1	2	238	G
1	2	239	C
1	2	240	G
1	2	241	G
1	2	242	U
1	2	243	A
1	2	244	A
1	2	245	U
1	2	246	U
1	2	247	U
1	2	248	C
1	2	249	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	250	A
1	2	251	U
1	2	254	U
1	2	255	U
1	2	257	U
1	2	258	A
1	2	259	A
1	2	260	A
1	2	262	A
1	2	264	U
1	2	266	U
1	2	267	A
1	2	268	C
1	2	269	A
1	2	270	U
1	2	271	U
1	2	272	U
1	2	273	A
1	2	274	U
1	2	275	U
1	2	276	U
1	2	277	U
1	2	279	U
1	2	280	A
1	2	281	A
1	2	282	A
1	2	286	G
1	2	287	U
1	2	290	C
1	2	291	U
1	2	292	A
1	2	293	U
1	2	294	A
1	2	295	U
1	2	296	A
1	2	297	U
1	2	300	U
1	2	301	U
1	2	302	A
1	2	303	G
1	2	304	U
1	2	305	C

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	306	A
1	2	307	A
1	2	308	U
1	2	310	A
1	2	311	A
1	2	312	A
1	2	313	C
1	2	314	U
1	2	315	A
1	2	316	A
1	2	317	U
1	2	318	A
1	2	319	A
1	2	320	U
1	2	321	U
1	2	322	A
1	2	323	U
1	2	324	U
1	2	325	U
1	2	326	U
1	2	327	U
1	2	328	A
1	2	330	U
1	2	331	U
1	2	332	G
1	2	333	U
1	2	334	U
1	2	335	U
1	2	336	U
1	2	337	U
1	2	338	A
1	2	339	A
1	2	340	A
1	2	342	A
1	2	343	C
1	2	344	C
1	2	346	U
1	2	347	U
1	2	348	U
1	2	349	G
1	2	350	G
1	2	352	A

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	353	U
1	2	354	A
1	2	355	U
1	2	356	G
1	2	357	C
1	2	358	A
1	2	359	A
1	2	360	A
1	2	361	U
1	2	362	A
1	2	363	A
1	2	364	A
1	2	365	A
1	2	366	A
1	2	367	A
1	2	368	U
1	2	370	A
1	2	371	C
1	2	372	A
1	2	373	U
1	2	374	U
1	2	375	A
1	2	376	A
1	2	377	U
1	2	381	U
1	2	382	A
1	2	383	A
1	2	386	A
1	2	387	U
1	2	388	A
1	2	389	U
1	2	390	U
1	2	391	A
1	2	395	U
1	2	396	A
1	2	397	U
1	2	398	A
1	2	399	U
1	2	400	U
1	2	401	U
1	2	402	A
1	2	403	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	404	U
1	2	405	C
1	2	406	A
1	2	407	U
1	2	408	U
1	2	409	U
1	2	410	A
1	2	411	A
1	2	412	G
1	2	413	U
1	2	414	C
1	2	415	A
1	2	416	A
1	2	417	C
1	2	418	A
1	2	419	A
1	2	420	U
1	2	421	A
1	2	422	U
1	2	423	C
1	2	424	U
1	2	425	A
1	2	426	U
1	2	427	U
1	2	428	U
1	2	429	A
1	2	430	C
1	2	431	U
1	2	432	G
1	2	433	U
1	2	434	U
1	2	435	U
1	2	436	U
1	2	437	U
1	2	438	G
1	2	439	A
1	2	441	A
1	2	442	A
1	2	443	C
1	2	444	A
1	2	446	G
1	2	447	A

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	448	U
1	2	449	A
1	2	450	A
1	2	452	G
1	2	453	A
1	2	454	U
1	2	455	U
1	2	456	A
1	2	457	U
1	2	458	A
1	2	459	A
1	2	460	A
1	2	461	U
1	2	462	G
1	2	463	G
1	2	464	U
1	2	465	A
1	2	466	U
1	2	467	U
1	2	468	G
1	2	469	C
1	2	470	A
1	2	471	A
1	2	472	A
1	2	473	U
1	2	476	U
1	2	477	A
1	2	478	U
1	2	479	A
1	2	480	A
1	2	481	U
1	2	482	C
1	2	483	A
1	2	484	A
1	2	485	A
1	2	486	A
1	2	487	C
1	2	488	U
1	2	489	A
1	2	490	A
1	2	492	U
1	2	493	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	494	A
1	2	495	U
1	2	496	U
1	2	497	A
1	2	498	U
1	2	500	U
1	2	501	U
1	2	502	A
1	2	503	A
1	2	504	A
1	2	505	U
1	2	506	U
1	2	507	A
1	2	508	G
1	2	509	C
1	2	510	A
1	2	511	U
1	2	512	G
1	2	513	U
1	2	514	U
1	2	515	U
1	2	516	A
1	2	517	G
1	2	518	A
1	2	519	U
1	2	520	A
1	2	522	A
1	2	523	A
1	2	524	C
1	2	525	A
1	2	527	U
1	2	528	A
1	2	529	A
1	2	530	A
1	2	531	U
1	2	532	U
1	2	533	U
1	2	534	A
1	2	535	G
1	2	536	A
1	2	537	A
1	2	538	G

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	541	A
1	2	542	U
1	2	543	U
1	2	544	G
1	2	545	U
1	2	546	U
1	2	547	G
1	2	548	C
1	2	549	C
1	2	550	C
1	2	551	A
1	2	552	C
1	2	553	C
1	2	554	A
1	2	555	U
1	2	556	U
1	2	557	C
1	2	558	U
1	2	559	U
1	2	560	U
1	2	561	G
1	2	563	A
1	2	564	A
1	2	565	U
1	2	566	A
1	2	567	A
1	2	568	A
1	2	570	A
1	2	571	C
1	2	572	A
1	2	573	A
1	2	574	C
1	2	575	G
1	2	578	C
1	2	579	A
1	2	582	A
1	2	583	A
1	2	585	U
1	2	586	A
1	2	587	A
1	2	588	U
1	2	589	G

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	590	U
1	2	592	U
1	2	593	U
1	2	595	A
1	2	596	U
1	2	597	A
1	2	598	A
1	2	599	A
1	2	605	A
1	2	606	U
1	2	607	U
1	2	608	U
1	2	609	U
1	2	610	U
1	2	611	U
1	2	612	U
1	2	613	U
1	2	614	U
1	2	615	U
1	2	616	U
1	2	617	U
1	1	38	A
1	1	39	U
1	1	40	C
1	1	41	A
1	1	42	A
1	1	43	A
1	1	44	G
1	1	45	U
1	1	46	U
1	1	47	A
1	1	48	U
1	1	49	U
1	1	50	A
1	1	51	U
1	1	52	U
1	1	53	A
1	1	58	A
1	1	59	U
1	1	62	U
1	1	63	G
1	1	64	A

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	66	U
1	1	67	U
1	1	68	U
1	1	69	G
1	1	70	G
1	1	71	A
1	1	72	U
1	1	73	G
1	1	74	A
1	1	75	A
1	1	76	U
1	1	79	A
1	1	81	U
1	1	83	U
1	1	84	U
1	1	88	U
1	1	89	U
1	1	90	A
1	1	91	U
1	1	92	A
1	1	93	U
1	1	96	U
1	1	98	G
1	1	99	A
1	1	102	U
1	1	103	U
1	1	104	U
1	1	106	A
1	1	107	U
1	1	108	U
1	1	110	U
1	1	111	A
1	1	113	U
1	1	115	U
1	1	116	U
1	1	117	U
1	1	118	U
1	1	119	G
1	1	120	A
1	1	126	U
1	1	127	A
1	1	128	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	130	U
1	1	132	U
1	1	134	A
1	1	135	A
1	1	136	A
1	1	137	U
1	1	138	A
1	1	139	U
1	1	141	A
1	1	142	U
1	1	143	A
1	1	144	U
1	1	145	A
1	1	146	U
1	1	147	U
1	1	148	U
1	1	149	U
1	1	150	A
1	1	152	A
1	1	153	U
1	1	154	U
1	1	155	U
1	1	156	A
1	1	158	A
1	1	160	U
1	1	161	U
1	1	162	G
1	1	163	U
1	1	164	U
1	1	165	G
1	1	166	U
1	1	167	U
1	1	184	G
1	1	185	U
1	1	187	U
1	1	188	A
1	1	189	U
1	1	190	A
1	1	192	A
1	1	193	U
1	1	198	A
1	1	201	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	202	A
1	1	203	A
1	1	204	U
1	1	205	U
1	1	206	U
1	1	207	G
1	1	208	U
1	1	209	U
1	1	210	U
1	1	211	U
1	1	212	A
1	1	214	U
1	1	215	U
1	1	221	U
1	1	225	U
1	1	226	A
1	1	230	A
1	1	233	G
1	1	238	U
1	1	239	U
1	1	240	A
1	1	241	U
1	1	245	U
1	1	246	U
1	1	247	A
1	1	249	U
1	1	250	A
1	1	251	U
1	1	252	U
1	1	253	U
1	1	254	U
1	1	256	A
1	1	257	G
1	1	259	U
1	1	268	A
1	1	270	A
1	1	271	U
1	1	272	A
1	1	280	A
1	1	282	U
1	1	283	G
1	1	284	A

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	285	U
1	1	286	G
1	1	287	G
1	1	288	C
1	1	289	A
1	1	290	C
1	1	292	G
1	1	293	U
1	1	294	U
1	1	298	C
1	1	299	U
1	1	300	A
1	1	301	U
1	1	302	A
1	1	303	U
1	1	304	G
1	1	306	A
1	1	307	C
1	1	308	C
1	1	309	U
1	1	310	A
1	1	311	U
1	1	312	A
1	1	314	A
1	1	316	A
1	1	317	A
1	1	319	A
1	1	320	G
1	1	322	A
1	1	323	A
1	1	327	U
1	1	328	A
1	1	329	U
1	1	331	U
1	1	333	A
1	1	336	U
1	1	339	A
1	1	343	A
1	1	344	U
1	1	345	A
1	1	346	A
1	1	347	A

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	350	A
1	1	359	C
1	1	360	U
1	1	361	A
1	1	362	A
1	1	363	U
1	1	364	U
1	1	365	U
1	1	370	U
1	1	374	U
1	1	377	U
1	1	379	U
1	1	380	G
1	1	381	A
1	1	382	A
1	1	383	A
1	1	384	A
1	1	388	U
1	1	391	A
1	1	392	A
1	1	393	A
1	1	394	U
1	1	396	A
1	1	397	A
1	1	398	U
1	1	399	U
1	1	400	U
1	1	401	U
1	1	402	U
1	1	404	U
1	1	405	U
1	1	407	C
1	1	411	U
1	1	412	U
1	1	413	U
1	1	414	U
1	1	415	U
1	1	416	A
1	1	418	A
1	1	420	A
1	1	421	U
1	1	422	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	423	G
1	1	424	A
1	1	425	A
1	1	426	G
1	1	427	U
1	1	429	A
1	1	431	A
1	1	432	U
1	1	433	G
1	1	434	U
1	1	435	A
1	1	439	A
1	1	440	A
1	1	443	G
1	1	446	U
1	1	447	A
1	1	449	U
1	1	450	A
1	1	451	A
1	1	452	A
1	1	453	A
1	1	454	A
1	1	455	U
1	1	457	C
1	1	458	A
1	1	459	A
1	1	460	A
1	1	465	A
1	1	466	U
1	1	468	U
1	1	471	A
1	1	472	A
1	1	473	U
1	1	474	U
1	1	475	A
1	1	476	A
1	1	477	U
1	1	478	A
1	1	479	A
1	1	480	A
1	1	481	U
1	1	482	A

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	483	U
1	1	484	A
1	1	486	U
1	1	488	U
1	1	489	A
1	1	492	U
1	1	495	A
1	1	496	U
1	1	497	A
1	1	498	G
1	1	500	U
1	1	501	G
1	1	504	U
1	1	506	A
1	1	507	U
1	1	508	G
1	1	509	U
1	1	510	U
1	1	511	A
1	1	512	A
1	1	514	U
1	1	515	A
1	1	516	A
1	1	517	U
1	1	518	U
1	1	519	U
1	1	520	A
1	1	521	U
1	1	522	U
1	1	523	A
1	1	524	U
1	1	525	U
1	1	526	U
1	1	527	U
1	1	528	A
1	1	529	A
1	1	532	U
1	1	536	A
1	1	537	U
1	1	538	A
1	1	543	U
1	1	544	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	545	U
1	1	546	A
1	1	547	U
1	1	548	A
1	1	549	C
1	1	550	A
1	1	552	A
1	1	555	U
1	1	556	A
1	1	557	A
1	1	558	C
1	1	559	U
1	1	560	U
1	1	561	U
1	1	562	U
1	1	564	U
1	1	565	U
1	1	566	G
1	1	567	A
1	1	568	A
1	1	572	A
1	1	573	A
1	1	574	A
1	1	575	G
1	1	576	A
1	1	578	U
1	1	580	A
1	1	581	U
1	1	582	U
1	1	583	A
1	1	584	U
1	1	587	U
1	1	588	A
1	1	589	A
1	1	590	A
1	1	591	U
1	1	592	A
1	1	593	U
1	1	594	U
1	1	595	A
1	1	596	U
1	1	597	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	598	U
1	1	599	U
1	1	600	A
1	1	601	A
1	1	602	A
1	1	604	A
1	1	608	A
1	1	609	A
1	1	612	A
1	1	617	G
1	1	618	U
1	1	621	A
1	1	622	U
1	1	624	A
1	1	625	A
1	1	626	A
1	1	627	U
1	1	629	A
1	1	630	U
1	1	631	C
1	1	632	A
1	1	633	A
1	1	634	G
1	1	641	A
1	1	642	A
1	1	643	G
1	1	644	C
1	1	645	G
1	1	647	U
1	1	648	U
1	1	649	A
1	1	650	U
1	1	651	U
1	1	652	A
1	1	653	A
1	1	655	U
1	1	661	G
1	1	665	U
1	1	666	A
1	1	667	A
1	1	668	G
1	1	669	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	670	A
1	1	675	A
1	1	679	A
1	1	680	A
1	1	684	U
1	1	685	A
1	1	690	U
1	1	691	G
1	1	697	A
1	1	698	G
1	1	699	A
1	1	700	U
1	1	701	U
1	1	702	U
1	1	704	U
1	1	705	A
1	1	710	A
1	1	712	U
1	1	749	U
1	1	750	U
1	1	751	A
1	1	754	A
1	1	755	G
1	1	756	U
1	1	760	A
1	1	763	G
1	1	764	U
1	1	765	A
1	1	768	U
1	1	769	U
1	1	772	U
1	1	775	C
1	1	776	U
1	1	781	A
1	1	782	U
1	1	783	U
1	1	784	A
1	1	785	A
1	1	786	A
1	1	787	G
1	1	788	C
1	1	789	G

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	790	U
1	1	791	U
1	1	794	A
1	1	795	U
1	1	796	A
1	1	798	A
1	1	799	A
1	1	802	U
1	1	807	A
1	1	808	A
1	1	809	A
1	1	810	U
1	1	811	U
1	1	812	A
1	1	813	U
1	1	815	A
1	1	816	C
1	1	817	A
1	1	821	U
1	1	822	A
1	1	830	A
1	1	835	A
1	1	836	U
1	1	837	U
1	1	839	A
1	1	845	A
1	1	847	A
1	1	848	U
1	1	850	U
1	1	851	U
1	1	856	A
1	1	857	A
1	1	862	A
1	1	863	A
1	1	864	A
1	1	868	U
1	1	869	A
1	1	870	A
1	1	873	U
1	1	876	G
1	1	887	C
1	1	888	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	889	C
1	1	890	U
1	1	892	C
1	1	893	U
1	1	894	U
1	1	895	U
1	1	896	A
1	1	902	A
1	1	903	G
1	1	904	A
1	1	905	A
1	1	906	C
1	1	907	G
1	1	908	U
1	1	910	U
1	1	911	A
1	1	914	U
1	1	915	G
1	1	916	U
1	1	917	A
1	1	918	A
1	1	919	U
1	1	924	U
1	1	925	G
1	1	927	U
1	1	928	U
1	1	929	G
1	1	930	A
1	1	932	U
1	1	933	G
1	1	934	G
1	1	939	A
1	1	940	U
1	1	941	A
1	1	943	U
1	1	944	A
1	1	945	U
1	1	948	C
1	1	949	U
1	1	952	U
1	1	953	U
1	1	954	A

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	955	U
1	1	960	A
1	1	961	A
1	1	962	A
1	1	963	A
1	1	964	A
1	1	969	U
1	1	971	U
1	1	972	A
1	1	973	U
1	1	974	U
1	1	975	U
1	1	977	U
1	1	978	U
1	1	980	A
1	1	982	A
1	1	983	U
1	1	984	A
1	1	985	A
1	1	988	A
1	1	990	A
1	1	992	G
1	1	993	U
1	1	995	C
1	1	996	G
1	1	997	A
1	1	998	G
1	1	999	C
1	1	1002	G
1	1	1003	U
1	1	1004	U
1	1	1005	A
1	1	1006	A
1	1	1007	C
1	1	1008	A
1	1	1009	A
1	1	1010	G
1	1	1011	C
1	1	1012	A
1	1	1013	U
1	1	1014	U
1	1	1015	A

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	1016	A
1	1	1017	U
1	1	1018	A
1	1	1019	C
1	1	1025	G
1	1	1028	U
1	1	1031	C
1	1	1032	A
1	1	1033	U
1	1	1034	C
1	1	1035	G
1	1	1036	U
1	1	1037	C
1	1	1038	U
1	1	1040	C
1	1	1041	U
1	1	1044	U
1	1	1045	U
1	1	1046	G
1	1	1047	C
1	1	1050	A
1	1	1051	A
1	1	1053	U
1	1	1054	A
1	1	1055	U
1	1	1056	A
1	1	1059	U
1	1	1062	U
1	1	1063	U
1	1	1064	G
1	1	1065	U
1	1	1066	U
1	1	1068	A
1	1	1069	U
1	1	1072	A
1	1	1073	A
1	1	1074	A
1	1	1075	A
1	1	1086	U
1	1	1093	G
1	1	1095	U
1	1	1096	A

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	1097	A
1	1	1098	A
1	1	1099	A
1	1	1100	U
1	1	1101	C
1	1	1103	U
1	1	1105	G
1	1	1107	A
1	1	1111	C
1	1	1116	U
1	1	1117	U
1	1	1118	G
1	1	1122	A
1	1	1123	U
1	1	1124	A
1	1	1125	U
1	1	1126	A
1	1	1127	U
1	1	1128	U
1	1	1129	U
1	1	1135	U
1	1	1136	U
1	1	1137	G
1	1	1138	U
1	1	1139	A
1	1	1140	U
1	1	1141	A
1	1	1146	U
1	1	1157	A
1	1	1158	U

All (329) RNA pucker outliers are listed below:

Mol	Chain	Res	Type
1	2	1	G
1	2	2	U
1	2	3	C
1	2	5	A
1	2	27	U
1	2	28	U
1	2	32	A
1	2	46	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	53	U
1	2	54	A
1	2	60	U
1	2	65	U
1	2	83	A
1	2	87	A
1	2	92	U
1	2	100	A
1	2	102	U
1	2	108	A
1	2	109	U
1	2	111	A
1	2	123	G
1	2	133	G
1	2	134	U
1	2	147	U
1	2	149	A
1	2	150	A
1	2	156	U
1	2	165	A
1	2	166	G
1	2	167	U
1	2	171	A
1	2	172	A
1	2	174	U
1	2	175	U
1	2	176	U
1	2	179	G
1	2	183	U
1	2	188	A
1	2	190	A
1	2	194	U
1	2	195	A
1	2	198	U
1	2	200	A
1	2	210	U
1	2	213	U
1	2	218	A
1	2	227	U
1	2	234	C
1	2	241	G
1	2	242	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	243	A
1	2	247	U
1	2	255	U
1	2	257	U
1	2	258	A
1	2	259	A
1	2	267	A
1	2	271	U
1	2	272	U
1	2	274	U
1	2	286	G
1	2	291	U
1	2	304	U
1	2	306	A
1	2	311	A
1	2	312	A
1	2	315	A
1	2	325	U
1	2	326	U
1	2	327	U
1	2	333	U
1	2	335	U
1	2	338	A
1	2	353	U
1	2	358	A
1	2	361	U
1	2	371	C
1	2	372	A
1	2	373	U
1	2	381	U
1	2	387	U
1	2	390	U
1	2	397	U
1	2	399	U
1	2	400	U
1	2	401	U
1	2	403	U
1	2	404	U
1	2	405	C
1	2	406	A
1	2	407	U
1	2	408	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	409	U
1	2	410	A
1	2	411	A
1	2	412	G
1	2	413	U
1	2	414	C
1	2	415	A
1	2	416	A
1	2	417	C
1	2	418	A
1	2	419	A
1	2	420	U
1	2	421	A
1	2	422	U
1	2	423	C
1	2	424	U
1	2	425	A
1	2	426	U
1	2	427	U
1	2	428	U
1	2	429	A
1	2	430	C
1	2	431	U
1	2	432	G
1	2	433	U
1	2	434	U
1	2	435	U
1	2	436	U
1	2	442	A
1	2	446	G
1	2	448	U
1	2	452	G
1	2	453	A
1	2	454	U
1	2	455	U
1	2	456	A
1	2	457	U
1	2	459	A
1	2	461	U
1	2	462	G
1	2	463	G
1	2	464	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	465	A
1	2	466	U
1	2	468	G
1	2	469	C
1	2	470	A
1	2	472	A
1	2	476	U
1	2	478	U
1	2	483	A
1	2	484	A
1	2	485	A
1	2	486	A
1	2	487	C
1	2	488	U
1	2	489	A
1	2	492	U
1	2	493	U
1	2	494	A
1	2	495	U
1	2	496	U
1	2	497	A
1	2	500	U
1	2	503	A
1	2	504	A
1	2	505	U
1	2	506	U
1	2	507	A
1	2	508	G
1	2	509	C
1	2	510	A
1	2	511	U
1	2	512	G
1	2	513	U
1	2	514	U
1	2	515	U
1	2	516	A
1	2	517	G
1	2	518	A
1	2	519	U
1	2	523	A
1	2	524	C
1	2	528	A

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	2	529	A
1	2	530	A
1	2	531	U
1	2	532	U
1	2	533	U
1	2	534	A
1	2	535	G
1	2	536	A
1	2	537	A
1	2	540	U
1	2	543	U
1	2	545	U
1	2	555	U
1	2	556	U
1	2	559	U
1	2	560	U
1	2	565	U
1	2	570	A
1	2	572	A
1	2	578	C
1	2	585	U
1	2	607	U
1	2	611	U
1	2	616	U
1	1	39	U
1	1	40	C
1	1	41	A
1	1	45	U
1	1	47	A
1	1	50	A
1	1	65	U
1	1	70	G
1	1	74	A
1	1	97	U
1	1	98	G
1	1	106	A
1	1	131	U
1	1	135	A
1	1	136	A
1	1	137	U
1	1	146	U
1	1	155	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	161	U
1	1	164	U
1	1	191	A
1	1	201	U
1	1	202	A
1	1	203	A
1	1	204	U
1	1	206	U
1	1	207	G
1	1	208	U
1	1	209	U
1	1	210	U
1	1	239	U
1	1	249	U
1	1	269	A
1	1	282	U
1	1	284	A
1	1	293	U
1	1	299	U
1	1	303	U
1	1	309	U
1	1	343	A
1	1	346	A
1	1	369	A
1	1	381	A
1	1	398	U
1	1	401	U
1	1	403	U
1	1	406	U
1	1	414	U
1	1	424	A
1	1	430	U
1	1	433	G
1	1	450	A
1	1	477	U
1	1	487	U
1	1	491	U
1	1	506	A
1	1	508	G
1	1	509	U
1	1	511	A
1	1	513	U

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	519	U
1	1	523	A
1	1	547	U
1	1	565	U
1	1	572	A
1	1	589	A
1	1	590	A
1	1	591	U
1	1	592	A
1	1	593	U
1	1	595	A
1	1	596	U
1	1	617	G
1	1	626	A
1	1	628	U
1	1	632	A
1	1	642	A
1	1	643	G
1	1	649	A
1	1	650	U
1	1	652	A
1	1	660	C
1	1	668	G
1	1	689	U
1	1	697	A
1	1	698	G
1	1	703	U
1	1	704	U
1	1	754	A
1	1	759	C
1	1	763	G
1	1	781	A
1	1	782	U
1	1	790	U
1	1	798	A
1	1	811	U
1	1	821	U
1	1	835	A
1	1	844	A
1	1	847	A
1	1	849	U
1	1	856	A

Continued on next page...

Continued from previous page...

Mol	Chain	Res	Type
1	1	861	A
1	1	862	A
1	1	905	A
1	1	906	C
1	1	910	U
1	1	915	G
1	1	916	U
1	1	928	U
1	1	929	G
1	1	932	U
1	1	944	A
1	1	951	U
1	1	960	A
1	1	974	U
1	1	1015	A
1	1	1044	U
1	1	1054	A
1	1	1067	C
1	1	1074	A
1	1	1097	A
1	1	1121	U
1	1	1122	A
1	1	1125	U
1	1	1126	A
1	1	1127	U
1	1	1128	U
1	1	1157	A

5.4 Non-standard residues in protein, DNA, RNA chains [i](#)

There are no non-standard protein/DNA/RNA residues in this entry.

5.5 Carbohydrates [i](#)

There are no oligosaccharides in this entry.

5.6 Ligand geometry [i](#)

Of 9 ligands modelled in this entry, 8 are monoatomic - leaving 1 for Mogul analysis.

In the following table, the Counts columns list the number of bonds (or angles) for which Mogul statistics could be retrieved, the number of bonds (or angles) that are observed in the model and the number of bonds (or angles) that are defined in the Chemical Component Dictionary. The Link column lists molecule types, if any, to which the group is linked. The Z score for a bond length (or angle) is the number of standard deviations the observed value is removed from the expected value. A bond length (or angle) with $|Z| > 2$ is considered an outlier worth inspection. RMSZ is the root-mean-square of all Z scores of the bond lengths (or angles).

Mol	Type	Chain	Res	Link	Bond lengths			Bond angles		
					Counts	RMSZ	$\# Z > 2$	Counts	RMSZ	$\# Z > 2$
125	NAD	Ag	301	-	46,48,48	0.50	0	64,73,73	0.79	3 (4%)

In the following table, the Chirals column lists the number of chiral outliers, the number of chiral centers analysed, the number of these observed in the model and the number defined in the Chemical Component Dictionary. Similar counts are reported in the Torsion and Rings columns. '-' means no outliers of that kind were identified.

Mol	Type	Chain	Res	Link	Chirals	Torsions	Rings
125	NAD	Ag	301	-	-	11/30/62/62	0/5/5/5

There are no bond length outliers.

All (3) bond angle outliers are listed below:

Mol	Chain	Res	Type	Atoms	Z	Observed(°)	Ideal(°)
125	Ag	301	NAD	C4D-O4D-C1D	-3.26	106.94	109.92
125	Ag	301	NAD	C6N-N1N-C2N	-2.24	119.97	121.88
125	Ag	301	NAD	O4B-C4B-C3B	-2.10	100.98	105.15

There are no chirality outliers.

All (11) torsion outliers are listed below:

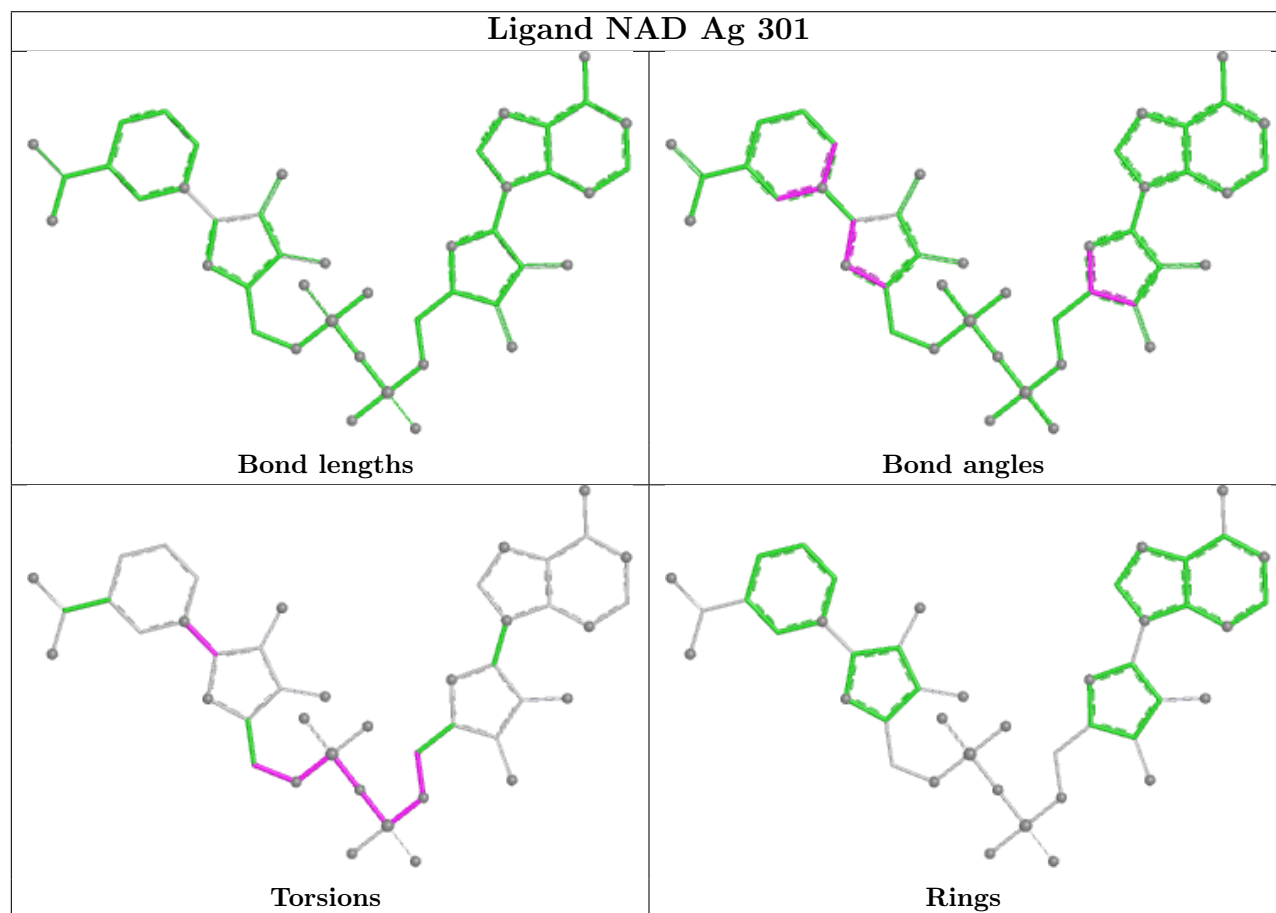
Mol	Chain	Res	Type	Atoms
125	Ag	301	NAD	C5B-O5B-PA-O3
125	Ag	301	NAD	C2D-C1D-N1N-C2N
125	Ag	301	NAD	C4B-C5B-O5B-PA
125	Ag	301	NAD	PN-O3-PA-O5B
125	Ag	301	NAD	PA-O3-PN-O5D
125	Ag	301	NAD	C4D-C5D-O5D-PN
125	Ag	301	NAD	C5B-O5B-PA-O1A
125	Ag	301	NAD	C5D-O5D-PN-O1N
125	Ag	301	NAD	PA-O3-PN-O1N
125	Ag	301	NAD	C2D-C1D-N1N-C6N
125	Ag	301	NAD	PN-O3-PA-O2A

There are no ring outliers.

1 monomer is involved in 10 short contacts:

Mol	Chain	Res	Type	Clashes	Symm-Clashes
125	Ag	301	NAD	10	0

The following is a two-dimensional graphical depiction of Mogul quality analysis of bond lengths, bond angles, torsion angles, and ring geometry for all instances of the Ligand of Interest. In addition, ligands with molecular weight > 250 and outliers as shown on the validation Tables will also be included. For torsion angles, if less than 5% of the Mogul distribution of torsion angles is within 10 degrees of the torsion angle in question, then that torsion angle is considered an outlier. Any bond that is central to one or more torsion angles identified as an outlier by Mogul will be highlighted in the graph. For rings, the root-mean-square deviation (RMSD) between the ring in question and similar rings identified by Mogul is calculated over all ring torsion angles. If the average RMSD is greater than 60 degrees and the minimal RMSD between the ring in question and any Mogul-identified rings is also greater than 60 degrees, then that ring is considered an outlier. The outliers are highlighted in purple. The color gray indicates Mogul did not find sufficient equivalents in the CSD to analyse the geometry.



5.7 Other polymers [i](#)

There are no such residues in this entry.

5.8 Polymer linkage issues [i](#)

The following chains have linkage breaks:

Mol	Chain	Number of breaks
8	am	1

All chain breaks are listed below:

Model	Chain	Residue-1	Atom-1	Residue-2	Atom-2	Distance (Å)
1	am	121:GLU	C	122:ASN	N	3.38

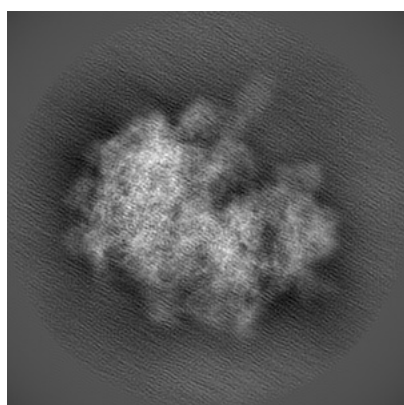
6 Map visualisation [i](#)

This section contains visualisations of the EMDB entry EMD-11829. These allow visual inspection of the internal detail of the map and identification of artifacts.

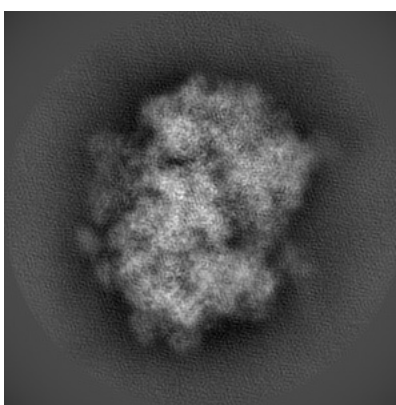
No raw map or half-maps were deposited for this entry and therefore no images, graphs, etc. pertaining to the raw map can be shown.

6.1 Orthogonal projections [i](#)

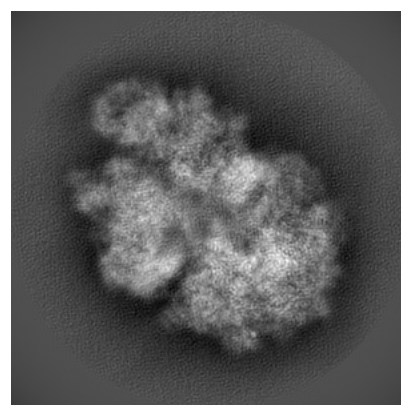
6.1.1 Primary map



X



Y

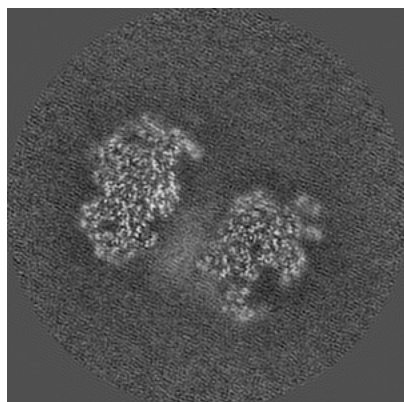


Z

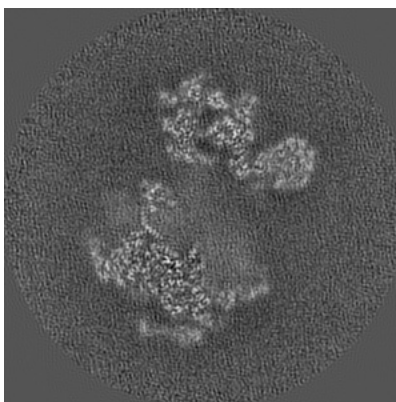
The images above show the map projected in three orthogonal directions.

6.2 Central slices [i](#)

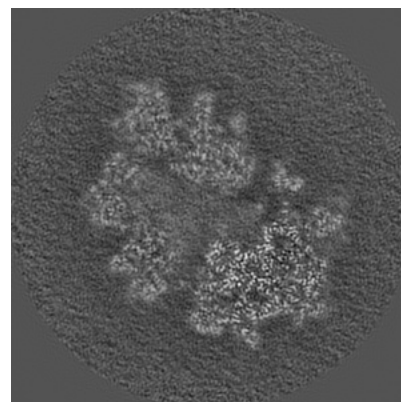
6.2.1 Primary map



X Index: 200



Y Index: 200

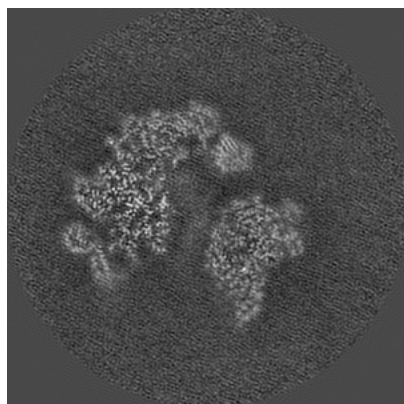


Z Index: 200

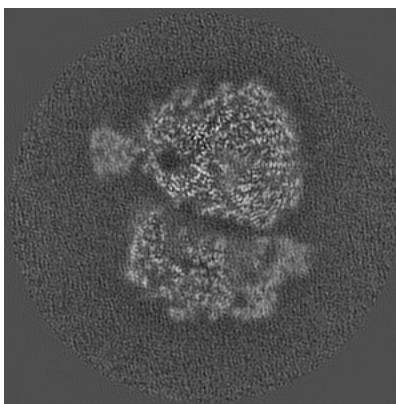
The images above show central slices of the map in three orthogonal directions.

6.3 Largest variance slices [i](#)

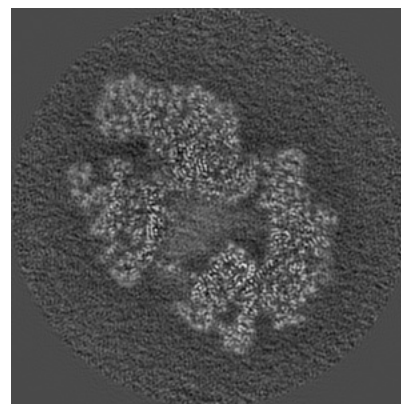
6.3.1 Primary map



X Index: 224



Y Index: 150

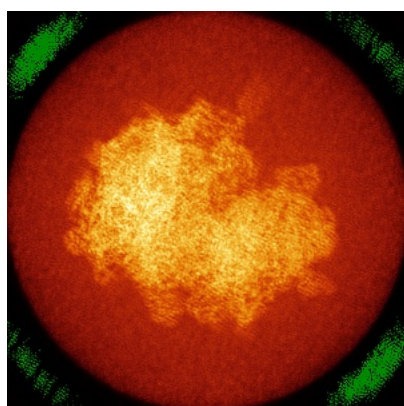


Z Index: 173

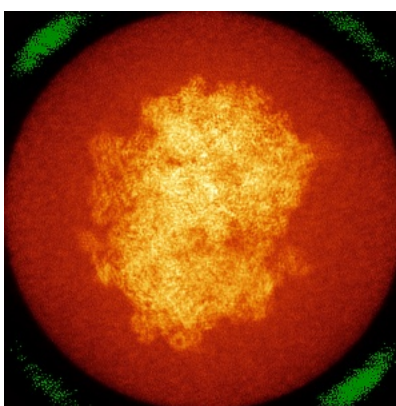
The images above show the largest variance slices of the map in three orthogonal directions.

6.4 Orthogonal standard-deviation projections (False-color) [i](#)

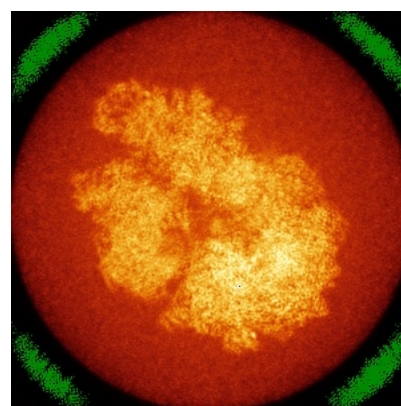
6.4.1 Primary map



X



Y



Z

The images above show the map standard deviation projections with false color in three orthogonal directions. Minimum values are shown in green, max in blue, and dark to light orange shades represent small to large values respectively.

6.5 Orthogonal surface views [i](#)

6.5.1 Primary map



The images above show the 3D surface view of the map at the recommended contour level 0.045. These images, in conjunction with the slice images, may facilitate assessment of whether an appropriate contour level has been provided.

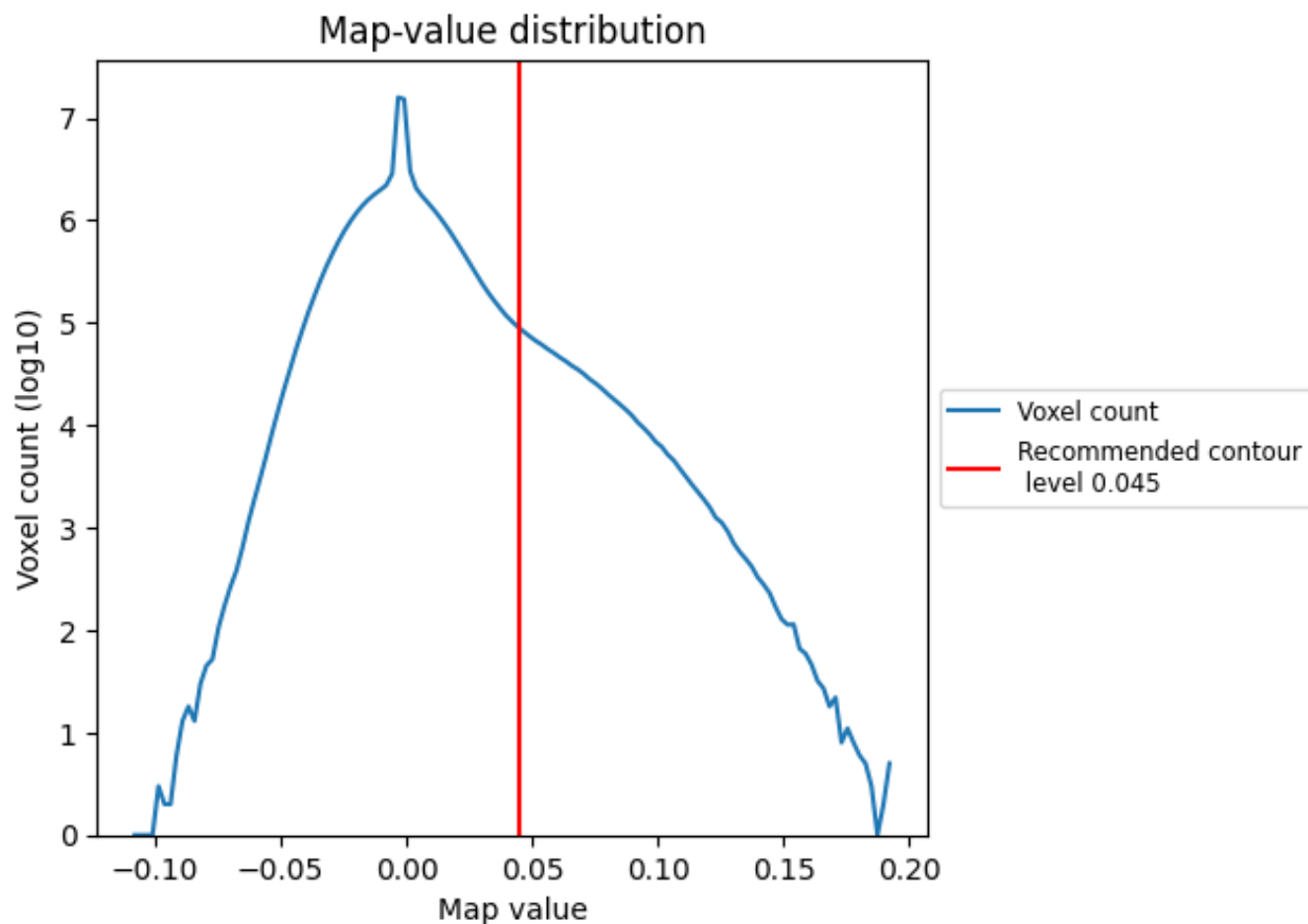
6.6 Mask visualisation [i](#)

This section was not generated. No masks/segmentation were deposited.

7 Map analysis [i](#)

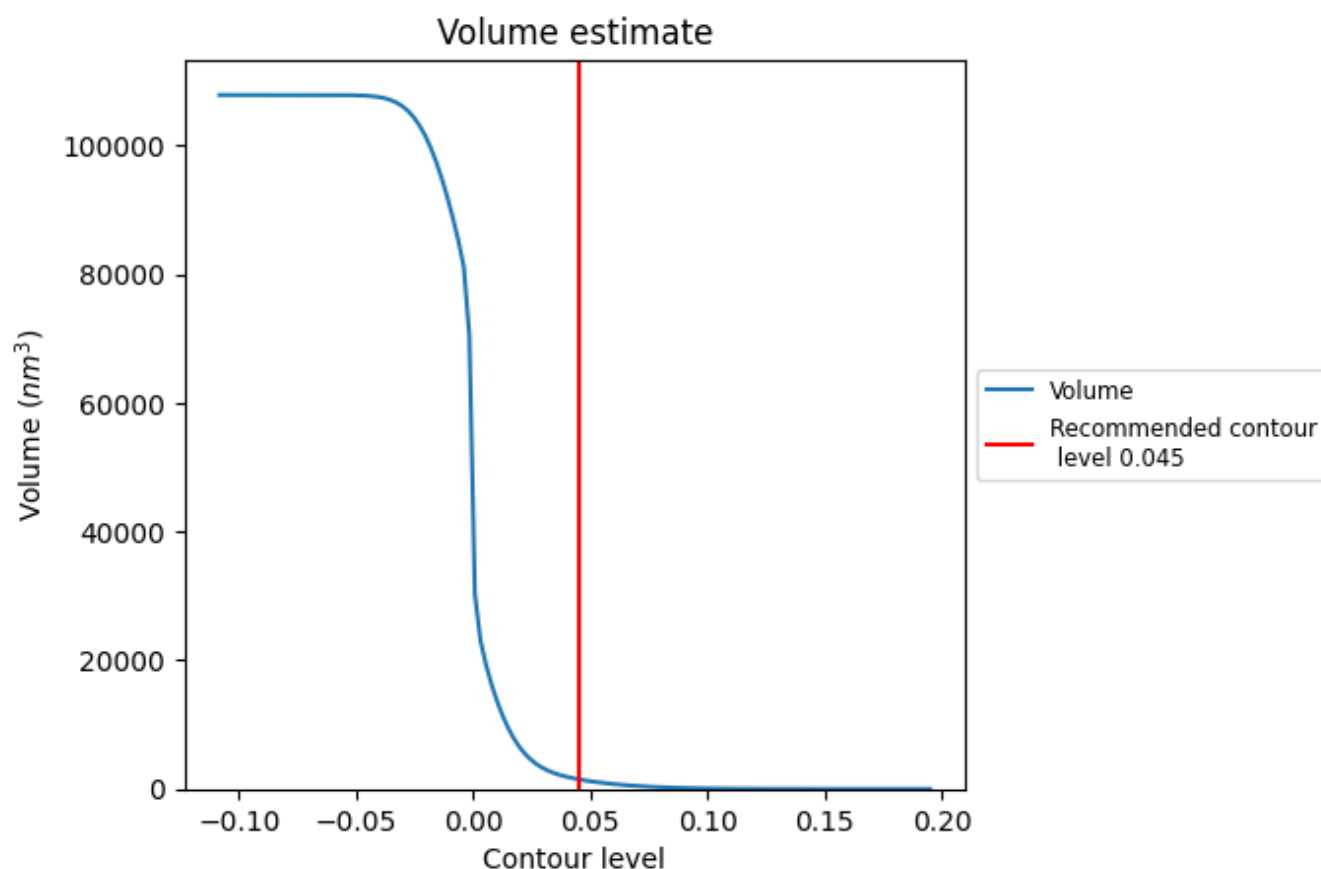
This section contains the results of statistical analysis of the map.

7.1 Map-value distribution [i](#)



The map-value distribution is plotted in 128 intervals along the x-axis. The y-axis is logarithmic. A spike in this graph at zero usually indicates that the volume has been masked.

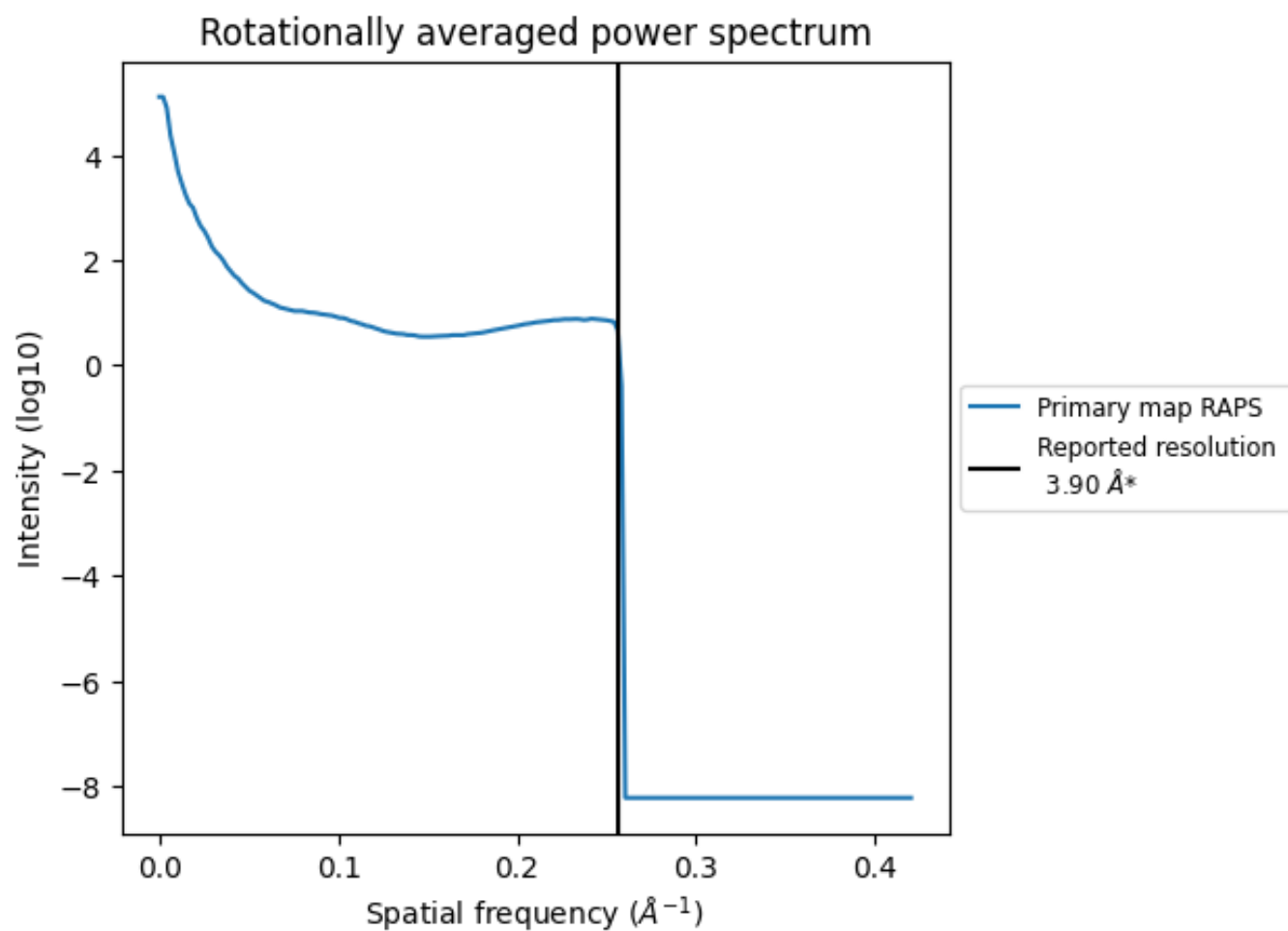
7.2 Volume estimate [i](#)



The volume at the recommended contour level is 1487 nm³; this corresponds to an approximate mass of 1343 kDa.

The volume estimate graph shows how the enclosed volume varies with the contour level. The recommended contour level is shown as a vertical line and the intersection between the line and the curve gives the volume of the enclosed surface at the given level.

7.3 Rotationally averaged power spectrum ⓘ



*Reported resolution corresponds to spatial frequency of 0.256 Å⁻¹

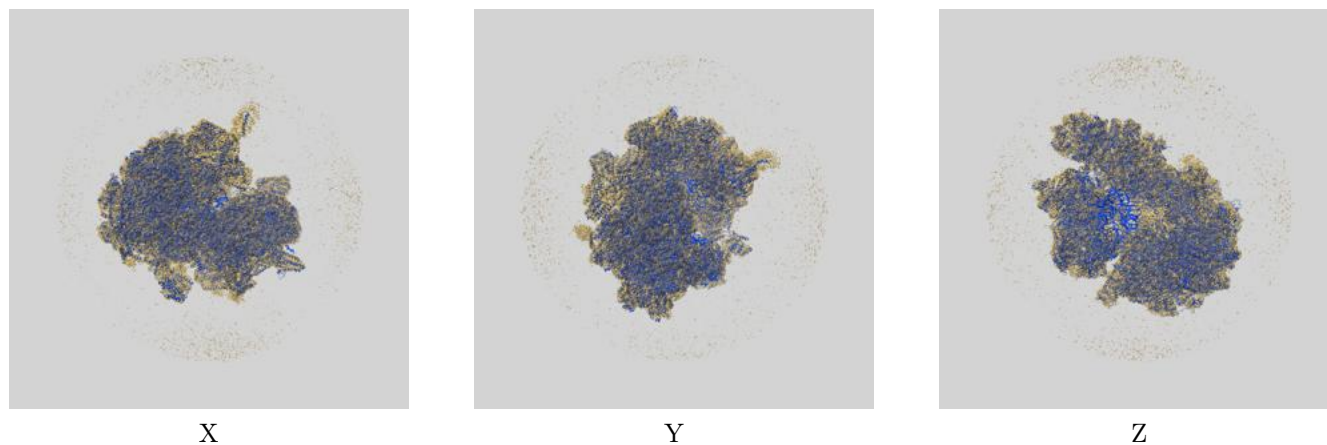
8 Fourier-Shell correlation

This section was not generated. No FSC curve or half-maps provided.

9 Map-model fit [i](#)

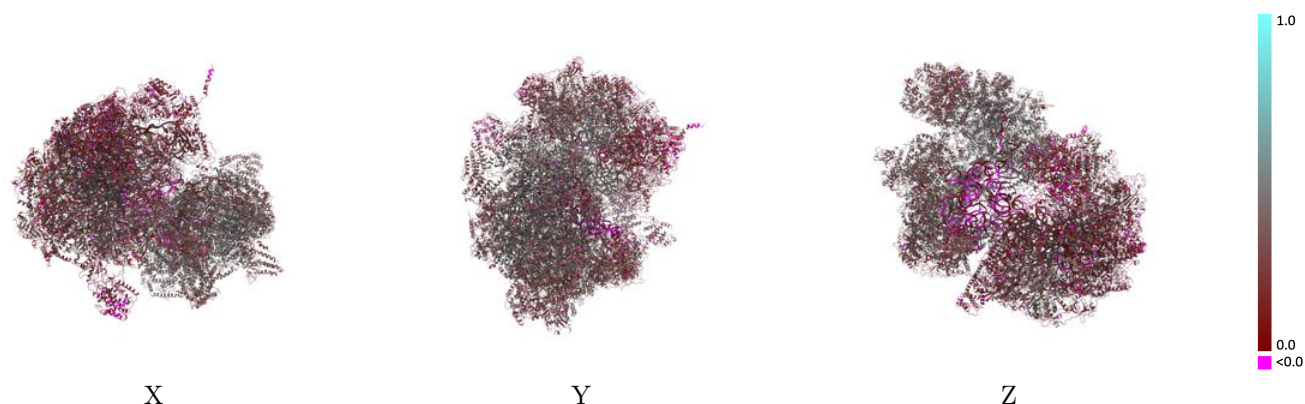
This section contains information regarding the fit between EMDB map EMD-11829 and PDB model 7ANE. Per-residue inclusion information can be found in section 3 on page 27.

9.1 Map-model overlay [i](#)



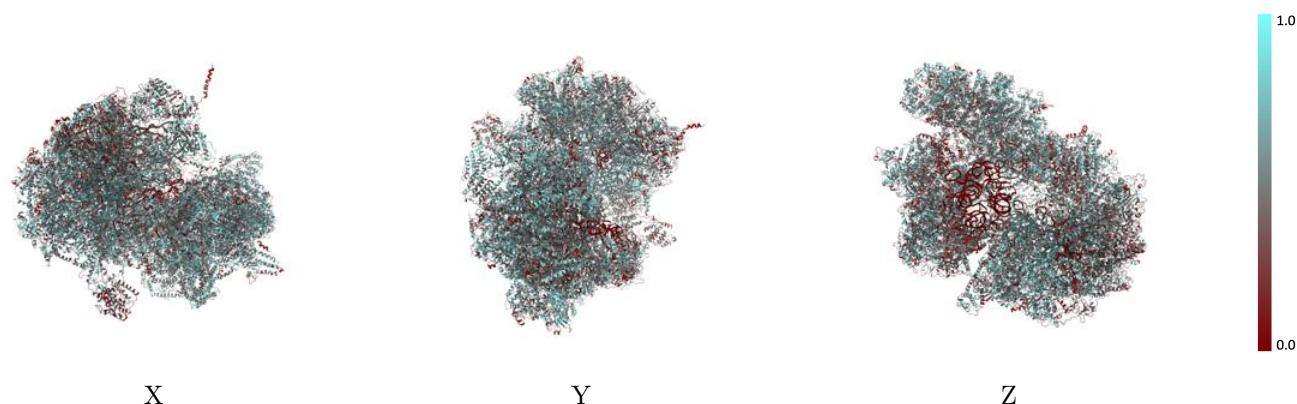
The images above show the 3D surface view of the map at the recommended contour level 0.045 at 50% transparency in yellow overlaid with a ribbon representation of the model coloured in blue. These images allow for the visual assessment of the quality of fit between the atomic model and the map.

9.2 Q-score mapped to coordinate model [i](#)



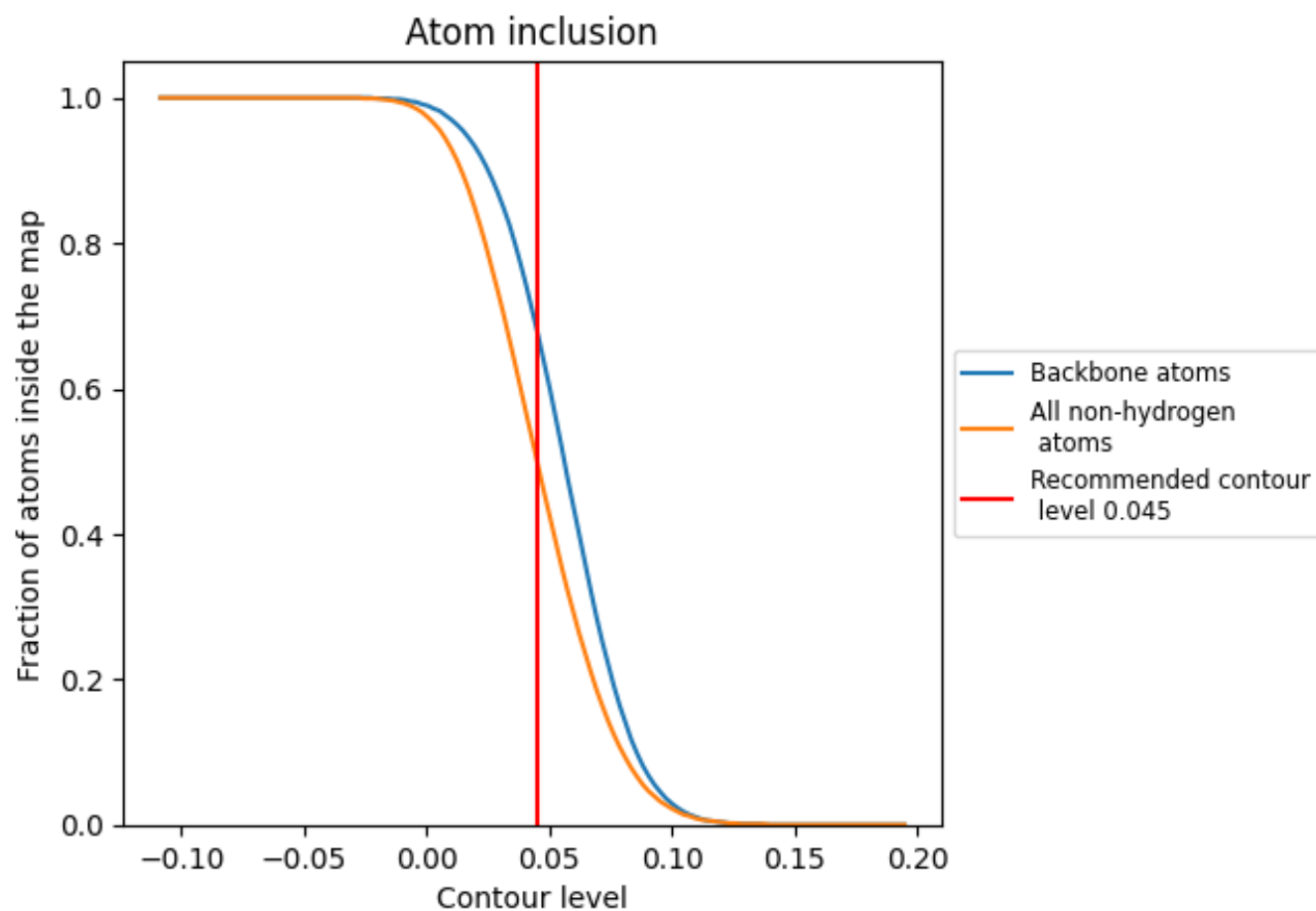
The images above show the model with each residue coloured according to its Q-score. This shows their resolvability in the map with higher Q-score values reflecting better resolvability. Please note: Q-score is calculating the resolvability of atoms, and thus high values are only expected at resolutions at which atoms can be resolved. Low Q-score values may therefore be expected for many entries.

9.3 Atom inclusion mapped to coordinate model [i](#)



The images above show the model with each residue coloured according to its atom inclusion. This shows to what extent they are inside the map at the recommended contour level (0.045).

9.4 Atom inclusion [i](#)



At the recommended contour level, 68% of all backbone atoms, 50% of all non-hydrogen atoms, are inside the map.

9.5 Map-model fit summary ⓘ

The table lists the average atom inclusion at the recommended contour level (0.045) and Q-score for the entire model and for each chain.

Chain	Atom inclusion	Q-score
All	 0.5010	 0.3210
1	 0.6440	 0.3250
2	 0.1120	 0.0360
A	 0.4610	 0.2040
Aa	 0.3690	 0.2020
Ab	 0.4850	 0.2250
Ac	 0.5310	 0.3030
Ad	 0.4300	 0.2790
Ae	 0.4230	 0.1760
Af	 0.4190	 0.2100
Ag	 0.5820	 0.3550
Ah	 0.5310	 0.2640
Ai	 0.5150	 0.2900
Aj	 0.4460	 0.2260
Ak	 0.5080	 0.2390
Al	 0.5480	 0.2700
Am	 0.4360	 0.1610
An	 0.5300	 0.2960
Ao	 0.5800	 0.3180
Ap	 0.4250	 0.1900
Aq	 0.5120	 0.3570
Ar	 0.5580	 0.3460
As	 0.4710	 0.1780
At	 0.5100	 0.2510
Au	 0.5970	 0.3460
Av	 0.4840	 0.2070
Aw	 0.5140	 0.2570
Ax	 0.5600	 0.3310
Ay	 0.5790	 0.2930
Az	 0.6210	 0.3700
B	 0.5050	 0.2890
BA	 0.4840	 0.2390
BB	 0.4210	 0.1810
BC	 0.5510	 0.3630
BD	 0.5930	 0.3220



Continued on next page...

Continued from previous page...

Chain	Atom inclusion	Q-score
BE	 0.4470	 0.1690
BF	 0.5210	 0.3430
BG	 0.5290	 0.3080
BH	 0.4620	 0.2390
BI	 0.5840	 0.2960
BL	 0.5730	 0.3350
BM	 0.3460	 0.1220
BO	 0.4170	 0.2090
BP	 0.4470	 0.2500
Bj	 0.4920	 0.3330
C	 0.5840	 0.3250
D	 0.3250	 0.1210
E	 0.4720	 0.1750
F	 0.4170	 0.2200
G	 0.5290	 0.3200
H	 0.4850	 0.3200
I	 0.4870	 0.2790
J	 0.4400	 0.1980
K	 0.4380	 0.2300
L	 0.4190	 0.2030
M	 0.5270	 0.3060
N	 0.6120	 0.4010
O	 0.4020	 0.2560
P	 0.5730	 0.3810
Q	 0.5820	 0.3370
R	 0.5320	 0.2830
S	 0.4750	 0.2740
T	 0.5820	 0.3010
U	 0.5240	 0.3610
UA	 0.6670	 0.2890
UB	 0.5370	 0.3040
UC	 0.3280	 0.1890
UD	 0.5030	 0.1910
V	 0.5590	 0.3960
W	 0.4600	 0.2770
X	 0.4890	 0.2890
Y	 0.5370	 0.3210
Z	 0.6180	 0.3990
a	 0.4880	 0.4310
aa	 0.5240	 0.3740
ab	 0.5000	 0.4030
ac	 0.4990	 0.3150

Continued on next page...

Continued from previous page...

Chain	Atom inclusion	Q-score
ad	 0.4910	 0.3690
ae	 0.5580	 0.3940
af	 0.5580	 0.3690
ag	 0.4930	 0.4050
ai	 0.5610	 0.3960
aj	 0.6130	 0.4020
ak	 0.4450	 0.3460
am	 0.4960	 0.4470
an	 0.5890	 0.4180
ao	 0.5520	 0.4140
ap	 0.6240	 0.3810
aq	 0.3490	 0.2790
ar	 0.4900	 0.3620
as	 0.4150	 0.3030
at	 0.2090	 0.2680
au	 0.5050	 0.3990
av	 0.3970	 0.3520
aw	 0.5600	 0.4370
ax	 0.5370	 0.4190
ay	 0.5480	 0.4160
az	 0.6230	 0.4420
b	 0.5500	 0.3990
ba	 0.0730	 0.3450
bd	 0.4940	 0.4070
c	 0.4700	 0.4340
d	 0.5590	 0.4430
e	 0.5400	 0.4250
f	 0.4810	 0.3670
g	 0.3030	 0.3410
h	 0.5830	 0.4480
i	 0.5020	 0.4050
j	 0.4610	 0.3630
k	 0.5070	 0.4440
l	 0.4720	 0.3280
m	 0.5350	 0.4250
n	 0.4920	 0.4150
o	 0.4140	 0.3920
p	 0.5950	 0.4110
q	 0.5720	 0.3820
r	 0.6050	 0.4200
s	 0.5520	 0.4360
t	 0.4240	 0.3090

Continued on next page...

Continued from previous page...

Chain	Atom inclusion	Q-score
u	 0.5160	 0.3860
v	 0.5070	 0.3990
w	 0.2920	 0.2890
x	 0.5900	 0.4250
y	 0.5590	 0.3560
z	 0.5650	 0.4190