


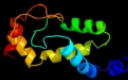
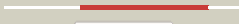






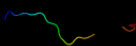
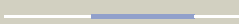


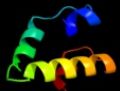





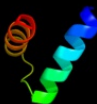

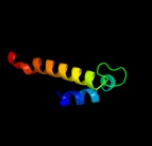
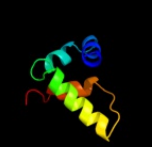
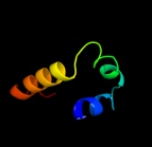
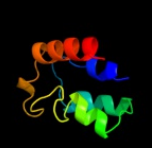

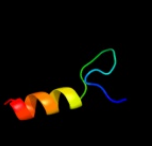




# Phyre2

Email	I.a.kelley@imperial.ac.uk
Description	P22707
Date	Thu Jan 5 11:39:03 GMT 2012
Unique Job ID	b53367407d91fd80

Detailed template information

#	Template	Alignment Coverage	3D Model	Confidence	% i.d.	Template Information
1	<a href="#">d1dvoa_</a>	 Alignment		100.0	97	<b>Fold:</b> FinO-like <b>Superfamily:</b> FinO-like <b>Family:</b> FinO-like
2	<a href="#">d2hxja1</a>	 Alignment		100.0	23	<b>Fold:</b> FinO-like <b>Superfamily:</b> FinO-like <b>Family:</b> FinO-like
3	<a href="#">c2hxjF_</a>	 Alignment		100.0	23	<b>PDB header:</b> structural genomics, unknown function <b>Chain:</b> F: <b>PDB Molecule:</b> hypothetical protein; <b>PDBTitle:</b> crystal structure of a protein of unknown function nmb1681 from2 neisseria meningitidis mc58, possible nucleic acid binding protein
4	<a href="#">c2k19A_</a>	 Alignment		53.1	30	<b>PDB header:</b> antimicrobial protein <b>Chain:</b> A: <b>PDB Molecule:</b> putative piscicolin 126 immunity protein; <b>PDBTitle:</b> nmr solution structure of pisi
5	<a href="#">c2zrrA_</a>	 Alignment		37.4	36	<b>PDB header:</b> antimicrobial protein <b>Chain:</b> A: <b>PDB Molecule:</b> mundticin ks immunity protein; <b>PDBTitle:</b> crystal structure of an immunity protein that contributes2 to the self-protection of bacteriocin-producing3 enterococcus mundtii 15-1a
6	<a href="#">d2jdqd1</a>	 Alignment		26.1	37	<b>Fold:</b> PB2 C-terminal domain-like <b>Superfamily:</b> PB2 C-terminal domain-like <b>Family:</b> PB2 C-terminal domain-like
7	<a href="#">c2yicC_</a>	 Alignment		21.3	17	<b>PDB header:</b> lyase <b>Chain:</b> C: <b>PDB Molecule:</b> 2-oxoglutarate decarboxylase; <b>PDBTitle:</b> crystal structure of the suca domain of mycobacterium smegmatis2 alpha-ketoglutarate decarboxylase (triclinic form)
8	<a href="#">d2i5ua1</a>	 Alignment		14.1	15	<b>Fold:</b> DnaD domain-like <b>Superfamily:</b> DnaD domain-like <b>Family:</b> DnaD domain
9	<a href="#">c2w50B_</a>	 Alignment		13.4	9	<b>PDB header:</b> hormone <b>Chain:</b> B: <b>PDB Molecule:</b> armet-like protein 1; <b>PDBTitle:</b> n-terminal domain of human conserved dopamine neurotrophic2 factor (cdnf)
10	<a href="#">c2xt6B_</a>	 Alignment		12.4	17	<b>PDB header:</b> lyase <b>Chain:</b> B: <b>PDB Molecule:</b> 2-oxoglutarate decarboxylase; <b>PDBTitle:</b> crystal structure of mycobacterium smegmatis alpha-ketoglutarate2 decarboxylase homodimer (orthorhombic form)
11	<a href="#">c2w51A_</a>	 Alignment		12.4	14	<b>PDB header:</b> hormone <b>Chain:</b> A: <b>PDB Molecule:</b> protein armet; <b>PDBTitle:</b> human mesencephalic astrocyte-derived neurotrophic factor (2 manf)

12	<a href="#">c3pp5A_</a>	Alignment		12.3	12	<b>PDB header:</b> structural protein <b>Chain:</b> A: <b>PDB Molecule:</b> brk1; <b>PDBTitle:</b> high-resolution structure of the trimeric scar/wave complex precursor2 brk1
13	<a href="#">d1b33a_</a>	Alignment		12.1	17	<b>Fold:</b> Globin-like <b>Superfamily:</b> Globin-like <b>Family:</b> Phycocyanin-like phycobilisome proteins
14	<a href="#">c3mixA_</a>	Alignment		12.1	18	<b>PDB header:</b> protein transport <b>Chain:</b> A: <b>PDB Molecule:</b> flagellar biosynthesis protein flha; <b>PDBTitle:</b> crystal structure of the cytosolic domain of b. subtilis flha
15	<a href="#">c3a5iB_</a>	Alignment		11.2	12	<b>PDB header:</b> protein transport <b>Chain:</b> B: <b>PDB Molecule:</b> flagellar biosynthesis protein flha; <b>PDBTitle:</b> structure of the cytoplasmic domain of flha
16	<a href="#">c2kq6A_</a>	Alignment		11.1	25	<b>PDB header:</b> transport protein <b>Chain:</b> A: <b>PDB Molecule:</b> polycystin-2; <b>PDBTitle:</b> the structure of the ef-hand domain of polycystin-2 suggests a2 mechanism for ca2+-dependent regulation of polycystin-2 channel3 activity
17	<a href="#">d1a1a_</a>	Alignment		11.0	17	<b>Fold:</b> Globin-like <b>Superfamily:</b> Globin-like <b>Family:</b> Phycocyanin-like phycobilisome proteins
18	<a href="#">c1us2A_</a>	Alignment		10.9	36	<b>PDB header:</b> hydrolase <b>Chain:</b> A: <b>PDB Molecule:</b> endo-beta-1,4-xylanase; <b>PDBTitle:</b> xylanase10c (mutant e385a) from cellvibrio japonicus in2 complex with xylopentaose
19	<a href="#">d1qnta2</a>	Alignment		10.7	15	<b>Fold:</b> Ribonuclease H-like motif <b>Superfamily:</b> Methylated DNA-protein cysteine methyltransferase domain <b>Family:</b> Methylated DNA-protein cysteine methyltransferase domain
20	<a href="#">d1v4va_</a>	Alignment		10.7	12	<b>Fold:</b> UDP-Glycosyltransferase/glycogen phosphorylase <b>Superfamily:</b> UDP-Glycosyltransferase/glycogen phosphorylase <b>Family:</b> UDP-N-acetylglucosamine 2-epimerase
21	<a href="#">c3dv9A_</a>	Alignment	not modelled	9.7	19	<b>PDB header:</b> isomerase <b>Chain:</b> A: <b>PDB Molecule:</b> beta-phosphoglucumutase; <b>PDBTitle:</b> putative beta-phosphoglucumutase from bacteroides vulgatus.
22	<a href="#">d1qh8b_</a>	Alignment	not modelled	9.6	15	<b>Fold:</b> Chelatase-like <b>Superfamily:</b> "Helical backbone" metal receptor <b>Family:</b> Nitrogenase iron-molybdenum protein
23	<a href="#">d1kn1a_</a>	Alignment	not modelled	9.4	15	<b>Fold:</b> Globin-like <b>Superfamily:</b> Globin-like <b>Family:</b> Phycocyanin-like phycobilisome proteins
24	<a href="#">d1cpcb_</a>	Alignment	not modelled	9.1	23	<b>Fold:</b> Globin-like <b>Superfamily:</b> Globin-like <b>Family:</b> Phycocyanin-like phycobilisome proteins
25	<a href="#">c3aicC_</a>	Alignment	not modelled	8.9	24	<b>PDB header:</b> transferase <b>Chain:</b> C: <b>PDB Molecule:</b> glucosyltransferase-si; <b>PDBTitle:</b> crystal structure of glucansucrase from streptococcus mutans
26	<a href="#">d1gjja2</a>	Alignment	not modelled	8.9	29	<b>Fold:</b> LEM/SAP HeH motif <b>Superfamily:</b> LEM domain <b>Family:</b> LEM domain
27	<a href="#">d1xg0c_</a>	Alignment	not modelled	8.8	21	<b>Fold:</b> Globin-like <b>Superfamily:</b> Globin-like <b>Family:</b> Phycocyanin-like phycobilisome proteins
28	<a href="#">c3mydA_</a>	Alignment	not modelled	8.4	15	<b>PDB header:</b> protein transport <b>Chain:</b> A: <b>PDB Molecule:</b> flagellar biosynthesis protein flha; <b>PDBTitle:</b> structure of the cytoplasmic domain of flha from helicobacter pylori
						<b>Fold:</b> DNA/RNA-binding 3-helical bundle

29	<a href="#">d1ka8a_</a>	Alignment	not modelled	7.9	15	<b>Superfamily:</b> "Winged helix" DNA-binding domain <b>Family:</b> P4 origin-binding domain-like
30	<a href="#">c3hz3A_</a>	Alignment	not modelled	7.6	35	<b>PDB header:</b> transferase <b>Chain:</b> A: <b>PDB Molecule:</b> glucansucrase; <b>PDBTitle:</b> lactobacillus reuteri n-terminally truncated glucansucrase2 gtf180(d1025n)-sucrose complex
31	<a href="#">c4ktqA_</a>	Alignment	not modelled	7.2	25	<b>PDB header:</b> transferase/dna <b>Chain:</b> A: <b>PDB Molecule:</b> protein (large fragment of dna polymerase i); <b>PDBTitle:</b> binary complex of the large fragment of dna polymerase i2 from t. aquaticus bound to a primer/template dna
32	<a href="#">d1s9aa_</a>	Alignment	not modelled	6.8	3	<b>Fold:</b> Prealbumin-like <b>Superfamily:</b> Aromatic compound dioxygenase <b>Family:</b> Aromatic compound dioxygenase
33	<a href="#">c3hj8A_</a>	Alignment	not modelled	6.8	10	<b>PDB header:</b> oxidoreductase <b>Chain:</b> A: <b>PDB Molecule:</b> catechol 1,2-dioxygenase; <b>PDBTitle:</b> crystal structure determination of catechol 1,2-dioxygenase from2 rhodococcus opacus 1cp in complex with 4-chlorocatechol
34	<a href="#">c3s2xB_</a>	Alignment	not modelled	6.7	12	<b>PDB header:</b> transferase <b>Chain:</b> B: <b>PDB Molecule:</b> acetyl-coa synthase subunit alpha; <b>PDBTitle:</b> structure of acetyl-coenzyme a synthase alpha subunit c-terminal2 domain
35	<a href="#">c1tmxA_</a>	Alignment	not modelled	6.5	13	<b>PDB header:</b> oxidoreductase <b>Chain:</b> A: <b>PDB Molecule:</b> hydroxyquinol 1,2-dioxygenase; <b>PDBTitle:</b> crystal structure of hydroxyquinol 1,2-dioxygenase from2 nocardioides simplex 3e
36	<a href="#">c2boyC_</a>	Alignment	not modelled	6.4	7	<b>PDB header:</b> oxidoreductase <b>Chain:</b> C: <b>PDB Molecule:</b> 3-chlorocatechol 1,2-dioxygenase; <b>PDBTitle:</b> crystal structure of 3-chlorocatechol 1,2-dioxygenase from2 rhodococcus opacus 1cp
37	<a href="#">c2c7jB_</a>	Alignment	not modelled	6.4	21	<b>PDB header:</b> electron transport <b>Chain:</b> B: <b>PDB Molecule:</b> phycocerythrocyanin beta chain; <b>PDBTitle:</b> phycocerythrocyanin from mastigocladus laminosus, 295 k,2 3.0 a
38	<a href="#">d1dmha_</a>	Alignment	not modelled	6.4	10	<b>Fold:</b> Prealbumin-like <b>Superfamily:</b> Aromatic compound dioxygenase <b>Family:</b> Aromatic compound dioxygenase
39	<a href="#">c2azqA_</a>	Alignment	not modelled	6.1	20	<b>PDB header:</b> oxidoreductase <b>Chain:</b> A: <b>PDB Molecule:</b> catechol 1,2-dioxygenase; <b>PDBTitle:</b> crystal structure of catechol 1,2-dioxygenase from pseudomonas arvilla2 c-1
40	<a href="#">d2c7fa2</a>	Alignment	not modelled	6.0	25	<b>Fold:</b> TIM beta/alpha-barrel <b>Superfamily:</b> (Trans)glycosidases <b>Family:</b> beta-glycanases
41	<a href="#">d2b1xa1</a>	Alignment	not modelled	6.0	17	<b>Fold:</b> ISP domain <b>Superfamily:</b> ISP domain <b>Family:</b> Ring hydroxylating alpha subunit ISP domain
42	<a href="#">d2ijqa1</a>	Alignment	not modelled	5.9	11	<b>Fold:</b> Hyaluronidase domain-like <b>Superfamily:</b> TTHA0068-like <b>Family:</b> TTHA0068-like
43	<a href="#">c2kpgA_</a>	Alignment	not modelled	5.9	21	<b>PDB header:</b> structural genomics, unknown function <b>Chain:</b> A: <b>PDB Molecule:</b> uncharacterized protein; <b>PDBTitle:</b> nmr structure of agrobacterium tumefaciens protein atu1219:2 northeast structural genomics consortium target att14
44	<a href="#">c2zc2A_</a>	Alignment	not modelled	5.5	22	<b>PDB header:</b> replication <b>Chain:</b> A: <b>PDB Molecule:</b> dnad-like replication protein; <b>PDBTitle:</b> crystal structure of dnad-like replication protein from2 streptococcus mutans ua159, gi 24377835, residues 127-199
45	<a href="#">c2vmlA_</a>	Alignment	not modelled	5.5	17	<b>PDB header:</b> photosynthesis <b>Chain:</b> A: <b>PDB Molecule:</b> phycocyanin alpha chain; <b>PDBTitle:</b> the monoclinic structure of phycocyanin from gloebacter2 violaceus
46	<a href="#">d1ezfa_</a>	Alignment	not modelled	5.5	26	<b>Fold:</b> Terpenoid synthases <b>Superfamily:</b> Terpenoid synthases <b>Family:</b> Squalene synthase
47	<a href="#">d1liab_</a>	Alignment	not modelled	5.4	23	<b>Fold:</b> Globin-like <b>Superfamily:</b> Globin-like <b>Family:</b> Phycocyanin-like phycobilisome proteins
48	<a href="#">d2ghra1</a>	Alignment	not modelled	5.2	33	<b>Fold:</b> Flavodoxin-like <b>Superfamily:</b> Class I glutamine amidotransferase-like <b>Family:</b> HTS-like
49	<a href="#">d1b8da_</a>	Alignment	not modelled	5.2	15	<b>Fold:</b> Globin-like <b>Superfamily:</b> Globin-like <b>Family:</b> Phycocyanin-like phycobilisome proteins