

## 24. CRYSTALLOGRAPHIC DATABASES

Table 24.1.3.3. 3DB Browser's linked external data sources

Source name	Short description
BioMagResBank	Relational database for sequence-specific protein NMR data
BLOCKS	Database of conserved regions in groups of proteins
CATH	Protein structure classification
DALI/FSSP	Families of structurally similar proteins
EMBL	European Molecular Biology Laboratory sequence database
Entrez	NCBI's documentation database
ENZYME	Enzyme nomenclature database
ESTHER	Esterases and alpha/beta hydrolase enzymes and relatives database
GenBank	NIH genetic sequence database
GDB	Genome Data Base
Kinase	Protein Kinase Database Project
KineMage	Protein Science's <i>Kinemage</i> server
LPFC	Library of Protein Family Cores
MacroMolecule	Crystal MacroMolecule files at the EBI
MMDB	Molecular Modelling Database
NDB	Nucleic Acid Database
OLDERADO	Core, domain and representative structure database
PDBObjs	Archive of obsolete PDB entries at SDSC
PDBREPORT	Structure verification reports for X-ray structures
PIR	Protein Information Resource
PROSITE	Dictionary of protein sites and patterns
ProtMotDB	Protein Motions Database
PubMed	Medline bibliographic database
SCOP	Structural classification of proteins
Swiss 3D-Image	3D images of proteins and other biological macromolecules
SwissProt	Annotated protein sequence database
TREMBL	Translation from EMBL sequence database

Table 24.1.3.5. Search engines used by 3DB Browser

Engine	Example
American–British Synonyms Spelling search	‘Amoeba’ and ‘ameba’ are equivalent ‘Protease’ is equivalent to ‘proteinase’ Based on a dictionary built from the current PDB data, the spelling engine will produce words that are close to the entered one. As an example, entering ‘imune’ will offer ‘immune’ as a valid alternative.
Soundex search	Based on the soundex algorithm that approximates the sound of the word when spoken by an English speaker. Looking for author ‘Weich’ will offer as alternatives Weiss, Wess and Wyss

Special steps are taken to isolate files, thus obviating problems associated with the existence of files and directories not related to PDB web activities. HTML documents are stored under the directory /pdb-docs/, and executables are stored under the directory /pdb-bin/. In addition, index files and local configuration files are stored in the directory /PDB-support/.

Specific areas on the http server are dedicated to PDB web activities. All the HTML pages and CGI scripts are in the /pdb-docs/ and /pdb-bin/ directories, respectively. There are also index files and local configuration files in /PDB-support/. This avoids confusing PDB applications with other applications on the same server, which would complicate the mirror procedure.

Relative links are used in all the HTML pages and the HTML pages generated by the scripts. For example, to create a hyperlink to 3DB Browser in the file named index.html, <a href=“/pdb-bin/pdbmain”>3DB Browser</a> is used instead of <a href=“http://

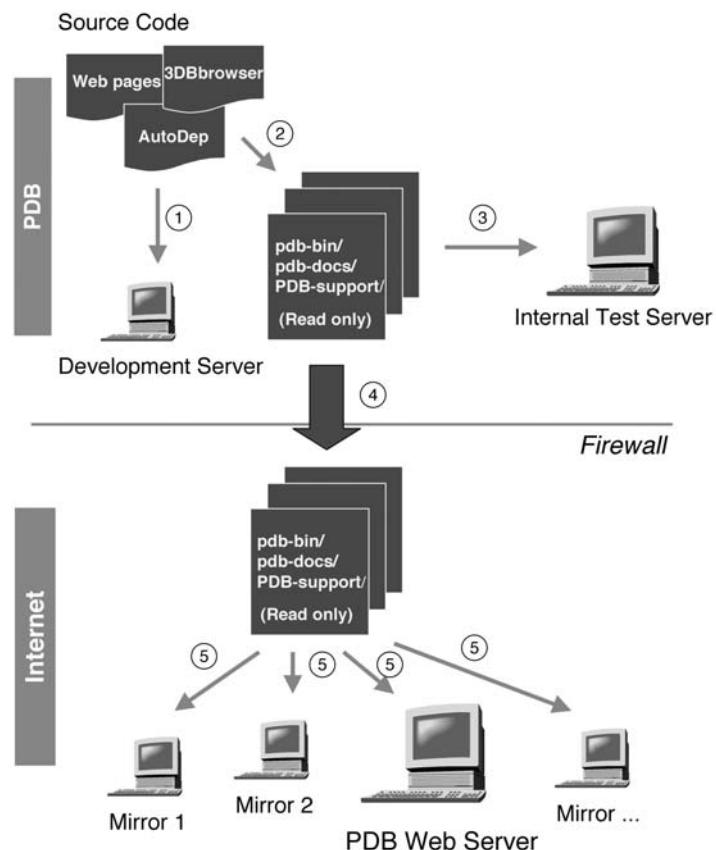


Fig. 24.1.3.2. Schematic diagram of the PDB WWW mirror system.