

News from EMBnet

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Motivation

-About EMBnet

The European Molecular Biology Network (EMBnet) is a bioinformatics international network active in supporting and promoting the research in the expanding fields of Genetics and Molecular Biology. First established in 1988 as a European Bioinformatics network, during the last two decades, EMBnet has been growing and attracting an increasing number of countries from all over the world. Currently it is composed of 27 National nodes and 8 Specialist nodes spread over Europe, South-and North America, Africa and Asia.

-The EMBnet goal and activities

The main goal of EMBnet is to enforce and support the life sciences scientific research through education and development of new tools in the field of Bioinformatics and Computational Biology. To reach this aim, EMBnet provides the scientific community with education and training in Bioinformatics, software development, bio-computing and technical resources as well as help desks in local languages and publications.

Methods

Results

- The EMBnet e-Learning web site

Collaboration and mutual support are the two main features of EMBnet, and the main reasons why EMBnet is recently attracting so many developing countries. EMBnet supports training in Bioinformatics and Computational Biology offering a panel of experts available to hold local specialized courses and to collaborate in education initiatives providing the remote access to virtual courses and training materials. In order to extend its training offers, EMBnet has recently added to its list of services a web-based e-learning system (<http://edu.embnet.org>). The new system is based on the Moodle (<http://moodle.org>) software with a few plugin extensions and provides facilities to support on-site training as well as a rich remote training facility for on line learning. The e-Learning server is offered as a community service providing training materials and experience for end-users, such as bioinformaticians, teachers and, more in general, life sciences scientists, to use. To facilitate sharing/exchange of teaching material, the e-learning web site also provides an exchange service where the community may share their documents and experiences in Bioinformatics training.

- Software development

Staffs from several EMBnet nodes collaborate also in developing new bioinformatics tools and services like wEMBOSS web interface (<http://wemboss.sourceforge.net/>), eBiotools toolkit for MacOSX (<http://www.ebioinformatics.org/>) and the last released Bioclipse (<http://www.bioclipse.net/>), an open source project aiming to integrate chemioinformatic and bioinformatic functionality into a single user-friendly workbench.

- News about the EMBnet organization: the Associated academic nodes_ The EMBnet organization includes several types of nodes with different rights and duties depending on their typology. Up to 2004, EMBnet was composed of three kinds of nodes: National, Specialist and Industrial. National nodes represent their country within EMBnet and are academic institutions or consortia with commitment and support from their national governments. This rule limited the number of bioinformatics institution which could join EMBnet to only one for each country. In order to allow more than one member per country, starting from 2005, EMBnet has decided to expand its organization including the Associated node. Any academic group looking to serve, or already serving its regional community/institute with tools and databanks in bioinformatics, or which is proficient in the development of such tools or databanks, can apply for the status of Associate academic node. New candidatures can be sent to EMBnet using the candidature form at: <http://www.embnet.org/members/nodecandidate.html>.

- The EMBnet.news journal: download numbers_ In addition to courses, EMBnet also produces information and guidance in Bioinformatics by publishing support material for the end users such as the quick guides and the EMBnet.news, both freely downloadable from the EMBnet website. The 'EMBnet.news' is an international Journal in the form of a quarterly newsletter presenting the latest achievements within the organization, such as new bioinformatics tools and services, and article aimed to guide young students as well as skilled researchers in acquiring essential information on how to approach and solve common problems in Bioinformatics, such as secure web browsing, building and management of

efficient user helpdesks, updating of local databases and so on.

Starting from 2002 the number of downloading from the EMBnet.news has increased from 526 to 27,106 in 2006 and promises to further increase in the current year. Publication is not restricted to EMBnet members but is open to everyone who wants to make public his/her most recent achievements, research and experience of public utility in Bioinformatics and Computational Biology.

Availability <http://www.embnet.org/>

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