IEEE **DALLAS • TEXAS**

GLOBECOM 2004
Emerging Technologies, Applications and Services

Call for Papers
Workshop on "High Performance Global Grid Networks"
IEEE Globecom 2004
November 29 – December 3, 2004
Dallas, Texas, USA
www.globecom2004.org

Scope:

The workshop will focus on the use of novel optical networking concepts that support future global Grid computing applications. It is now evident to the technical community that local computational resources cannot keep up with the demands generated by some users/applications. Therefore, distributed computing and the concept of a computational Grid are now emerging. Novel network concepts are needed to support such vision and high-speed optical networking may be the required infrastructure that will enable global Grids. Optical networks have the potential to support a large portion of Grid networking infrastructures since they offer bandwidth manipulation at the wavelength (wavelength switching) and sub-wavelength level (optical packet and burst switching) supporting not only high service granularity but also the capability to accommodate a wide variety of traffic characteristics. Research on novel optical switching paradigms (such as Optical Burst Switching - OBS) has recently emerged but the technology will not see any boost if there is no proper application space. We believe that the design of new optical network concepts (including OBS) should be linked to the demands of the real emerging applications.

The workshop will try to identify the features and properties of Grid networks and the characteristics of a suitable network infrastructure. Therefore we are inviting paper submissions related with the following issues:

- Photonic Grid network characteristics: functional requirements, network architecture, transport protocols, etc.
- Control, management & signaling for optical Grid networks.
- Standardization activities on Photonic Grids
- Experimental showcases

Workshop Organizers:

*Prof. Ioannis Tomko*s, e-mail: itom@ait.gr, phone: +302106682771, fax: +302106682703, Address: Athens Information Technology Center, Markopoulo Avenue, Peania, 19002, Athens, Greece, P.O. Box 68
*Prof. Dimitra Symeonido*u, dsimeo@essex.ac.uk, University of Essex, UK
*Prof. Anna Tzanakak*i, e-mail: atza@ait.gr, Athens Information Technology Center, Greece

Important dates:

Full papers due: July 15, 2004
Notification of acceptance: August 16, 2004
Final manuscript due: August 23, 2004
Workshop Date: December 3, 2004

Paper submission instructions:

Authors are invited to submit full papers of up to 10 double-spaced pages, including references, figures and tables. All submissions should be submitted electronically to itom@ait.gr

IEEE

IEEE COMMUNICATIONS SOCIETY