

## **MediGRID – Grid Computing for Medicine and Life Sciences**

Anette Weisbecker, Otto Rienhoff

MediGRID<sup>1</sup> has established a Grid infrastructure for medical and bioinformatical research. It enhances interdisciplinary and widely location-independent collaboration of researchers by providing grid services in a controlled e-Science platform which is continually available, economically calculable and secure.

As part of the German e-Science initiative D-Grid MediGRID provides access to the available D-Grid resources by the MediGRID portal. This gives an easy, secure and transparent access to a broad spectrum of applications for bioinformatics, medical image processing, numerical fluid simulation and clinical research. The advantages of using grid computing for these applications are the reduction of processing times, world-wide usage for a broad community of users and access to distributed information sources of academic and clinic providers.

The presentation shows the major MediGRID middleware components which comprises the portal, data management and enhanced security as well as the user-centred design process which has been used to build up a grid environment for a heterogeneous user group.

### Address:

Priv.-Doz. Dr.-Ing. Anette Weisbecker  
Fraunhofer-Institut für Arbeitswirtschaft und Organisation  
Nobelstrasse 12  
70569 Stuttgart, Germany  
Phone: +497119702400  
E-Mail: Anette.Weisbecker@iao.fraunhofer.de

Professor Dr. Otto Rienhoff  
Abteilung Medizinische Informatik, Georg-August-Universität Göttingen  
Robert-Koch-Strasse 40  
37075 Göttingen, Germany  
Phone: +495513991216  
E-Mail: haegar@med.uni-goettingen.de

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