

OMII-Europe Interoperability of e-Infrastructures

Achim Streit

Forschungszentrum Juelich, Germany

a.streit@fz-juelich.de

The OMII-Europe project was established in May 2006 under the European Union Sixth Framework Programme (FP6). The main responsibility of the project is to re-engineer essential Grid software components so that they can work across the three major Grid middleware platforms: gLite, Globus and UNICORE. This helps achieving interoperability across heterogeneous Grid e-infrastructures which, in turn, enables e-scientists to overcome institutional and regional boundaries and gain access to far more computing resources.

Open standards play a vital role in this work. OMII-Europe has identified five important Grid components (e.g. Basic Execution Service for submitting jobs) and has re-engineered them using standards emerging from bodies such as OGF (e.g. OGSA-BES specification). Prototype implementations of these components were ready for the QA process by the end of 2007 and early 2008 sees a lot of components bedded down in a number of projects and available via the OMII-Europe public repository. Additionally, the project has developed a conceptual architecture for interoperability that defines the interaction between these components. This architecture has been proposed as solutions to other projects, e.g. the Wide In Silicio Docking On Malaria (WISDOM) project.

In addition to the development of the software, the definition of QA procedures and the set up of a software repository, training material covering general Grid topics and specific instructions for OMII-Europe software is available via the web and also through taught-courses. More information about OMII-Europe can be found at <http://omii-europe.org>.