

## **Call for Participation in the mini-symposium:**

### **Computational Steering and Visualization on the Grid: Practice and Experience**

#### **Organisers**

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This mini-workshop will follow the mini-symposium route and will take place over one of the sessions, lasting 2 hours. We will look to have about 6 people speaking during the course of the session.

#### **Abstract**

Computational steering and visualization are essential for interpreting the vast quantities of data that are produced by modern massively parallel computer simulations. There, however, remain a number of issues concerning the integration of these services into the grid environment.

The requirements for performing both computational steering and high-performance visualization naturally fit into the concept of grid computing. They require high-performance computing resources for the calculations or large data repositories and high performance visualization capabilities to view the data. In many cases these resources will neither be local to the user nor even to each other, which means that we need high-speed networks to connect the resources together. To tie all of these resources together we require a great deal of grid middleware, for tasks that range from data transport, to user authentication, and data security.

The use of grid technologies is non-trivial and consequently performing these tasks in a grid environment provides significant challenges. The aim of the workshop will be to focus on the problems groups have faced and the solutions that they have devised to address these challenges and to identify issues that still remain particularly in the grid middleware.

This will be addressed by inviting talks both from those involved in the development of computational steering and visualization tools and the application scientists who are using these tools in the grid environment. The talks will illustrate just how powerful a tool computational steering and visualization in the grid environment can be whilst highlighting the issues that still exist in using the grid. A question and answer session will follow each presentation, where users can exchange ideas on best practice, and highlight alternative approaches that could be considered.

To submit a paper please see <http://www.allhands.org.uk/submissions>.