



Study into European Research and Education Networking as Targeted by eEurope

SERENATE – why? and why now?

Many people who know about the subject will tell you that European Research and Education Networking is in better shape today than it has ever been in before, and compares very favourably with similar networks in other continents. So why choose this moment to launch a strategic study into the evolution of this networking over the next 5-10 years?

- The present situation is the outcome of almost two decades of development of the national networks in Europe, and of their pan-European interconnections. We have learned that many people – national and European politicians, ministries and agencies in the national governments, the European Commission, telecoms vendors, equipment vendors, various service suppliers, local and regional authorities, universities and user communities all have to be mobilised, and to move in the same direction, if we are to make progress. If we do not make plans to maintain and even improve the situation over the next 5-10 years, then the sustained pace of technical, organisational and political change will inevitably lead to rapid decay.
- Despite a situation which is often very healthy in general terms, a closer look shows that the service which is available to any random pair of collaborating end-users is often far from satisfactory. While problems can be particularly severe in European countries which are economically weaker and/or still have *de facto* telecoms monopolies – such as some of the accession states – the overall infrastructure, including any country's campus LANs, local MANs, national networks and international interconnections, often shows signs of frailty when asked to support large numbers of very heavy users simultaneously.
- There are indications that the very nature of teaching and research is starting to be heavily influenced by the development of the Internet, and that this may further increase the load placed on our National Research and Education Networks (NRENs). If Europe wishes to play its full part in, and perhaps even lead some of, these developments, it will be essential to maintain the quality of our networking.
- European governments have come to realise the importance of the academic community in the development, especially at the pre-commercial stage, of components of the “knowledge-based” society. In the eEurope Action Plans for 2002 and 2005 the governments have defined certain targets in relation to “Faster Internet for researchers” which we need to consider and react to.
- The ambitious plans for a European Research Area are predicated on fast, high-quality access to networking being available as a matter of course and in a rather uniform manner to researchers all over “Europe”. We need to consider how that objective can be met “everywhere”.

SERENATE – who?

We hope that all actors feeling concerned by some or all of these issues will contribute to the SERENATE studies. That includes all those mentioned above - national and European politicians, ministries and agencies in the national governments, the European Commission, telecoms vendors, equipment vendors, various service suppliers, local and regional authorities, universities and user communities.

In addition to the formal partners, Europe's National Research and Education Networks (NRENs), which jointly fund and oversee DANTE and TERENA, have a strong interest in the outcome of the studies, and will provide considerable support for SERENATE.

Formally the SERENATE project is an *Accompanying Measure* under the *User-friendly Information Society Programme* of the European Union's Fifth Framework Programme for Research and Technical Development. The SERENATE consortium consists of five partners:

- The Academia Europaea
- The Center for Tele-Information of the Technical University of Denmark
- DANTE, Delivery of Advanced Network Technology to Europe Ltd.
- The European Science Foundation
- The co-ordinator of the project is TERENA, the Trans-European Research and Education Networking Association.

These partners bring together extensive contacts in the European and global networking environment (TERENA and DANTE) and the European and global research community (the Academia Europaea and the ESF), and knowledge of the regulatory and economic aspects of the present-day telecoms market (CTI and DANTE).

SERENATE – how?

Work items

The project itself is broken down into 14 interlinked work items, each looking into a topic of crucial importance for the future development of European research networks to 100 Gb/s and beyond. Each work item will lead to a public report.

Workshops

One of the earliest activities of SERENATE has been a 1.5-day workshop, held at IBM's La Hulpe centre near Brussels, on 17 and 18 September 2002. Participants included representatives of the national research and education networks, the European scientific and education communities, funding bodies and governments and the European Commission, and telecoms operators.

On 8 November 2002 there has been another workshop, in Amsterdam, intended specifically for the traditional and alternative telecoms operators, aimed at capturing their views of the likely evolution of infrastructure and services in Europe.

In addition the Academia Europaea and the European Science Foundation have jointly organised a workshop aimed at exploring the views and needs of "end-user" researchers. This took place in Montpellier during the weekend from 17-19 January 2003.

Specific issues will be discussed with NRENs in a further workshop in Noordwijkerhout, the Netherlands on 4-5 February 2003.

The results of the SERENATE studies will be presented and discussed at a large workshop before the summer holidays. This workshop will take place in Bad Nauheim near Frankfurt on 16 and 17 June 2003. Invitations will be extended to representatives of all the stakeholders mentioned above.

SERENATE –more?

More information is available via the SERENATE Web site at <http://www.serenate.org/>. If you have specific questions, please send them to info@serenate.org.