

Executive Summary

European Competence Mapping

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Executive Summary

“Solving the puzzle of European competence in the field of advanced displays” – that is the short way of describing what the adria network has tried to accomplish with its competence mapping workpackage.

Numerous publications on European competence in a lot of especially technology-oriented fields conclude that Europeans are champions. Europe is a unique place – we all love it for its rich diversity and we believe that this diversity has made us champions in a lot of fields. However, usually one comes also to the conclusion that collaborations and collaboration structures – may it be between academia and industry, between large companies and small or medium sized enterprises or between regions – are also very diverse and could be well improved – that is the other side of the medal.

Our field of activity is no exception: Europe is a global driver in advanced displays research and innovation and is one of the largest markets for information and communication technologies, where advanced displays play a decisive role for the “look and feel” of products. Europe is also at the forefront of research and development in the emerging field of organic electronics. However, research and industrial capabilities, collaboration structures between academia and industry, as well as networking activities in Europe are today scattered.

“If we only knew what we know...” – There is a strong need for knowledge exchange, technology transfer from research to industry and collaboration among all European players in the field of advanced displays. For companies or research organisations encountering a specific technical problem, it is often hard to find the best solution available. Even worse, they might not at all be aware that a solution for a technical problem already exists, probably in form of a result of a completed publicly funded research project, or that a private company offers a commercial solution. They might then decide to “reinvent the wheel”. This issue especially applies for small and medium sized enterprises, which neither have the budget nor the dedicated personnel to conduct comprehensive literature researches or do not have an extensive network of contacts to companies all over Europe.

And that’s where adria’s competence mapping approach comes in: the goal is to collect, and properly review information available on European advanced display research activities, expertise and industrial capabilities, and then integrate it into a multi-dimensional competence matrix. The data has been solicited from European players in the field during the run of the project. The result is made available in a searchable database, the adria competence mapping database. Organic electronics has been included in distinct areas: OLEDs, organic backplanes, including organic substrates and organic TFTs, as well as electronic paper.

By the end of 2006, 373 competence profiles have been entered, reviewed and approved and they are ready for the utilization by the Community. This “living” data source also serves for other objectives, for vision creation, educational content, comparison and communication with the advanced display communities outside Europe.

In order to document the progress and to summarise the content of the competence mapping database, this Synthesis Report has been issued. A market analysis links the capabilities reported to the needs of customers. We have done that with a European view also adding a global perspective.

Although the competence mapping is a dynamic process, and it is maybe hard to map all activities at once, we believe that this report – compiled from profiles entered in the timeframe of 18 months – gives a very good overview on the current state of research and industrial capabilities in the field. This will foster the collaboration between players– and will make Europe stronger in the field. In the end, the exploitation of research and development results secures sustainable growth and wealth for us – that’s what we aim for.

Future developments from this starting point were developed in the adria Roadmap and the adria vision paper, published separately. They represent a good addition to this paper.