

ECSN Quarterly Report January-March 2005

Prepared by the ECSN Manager and the Project Leaders

General remarks

The Danish Meteorological Institute will host the 10th ECSN Advisory Committee Meeting in Copenhagen, 8-10 June 2005.

At the combined EMS-ECAM-IPC Meeting in Amsterdam, Netherlands, 8 March 2005, EMS agreed to the topics for the Climatology part of the Conference proposed by the ECAC Advisory Board.

Programme overview for the EMS part Climatology:

CL1: Global change activities. Conveners: Raino Heino and Albert Klein Tank.

CL2: Weather and climate extremes. Convener: Aryan van Engelen.

CL3: Climatology in seasonal forecasting. Convener: Mark Liniger.

CL4: Climatology derived from satellite observations. Convener: Jörg Schulz.

CL5: Climate data products and data policy will be combined with a similar ECAM session.

The conveners are responsible for their topics and therefore they have the right to influence the programme and to make some minor changes.

The combined EMS/ECAM Conference will take place in Utrecht, Netherlands, 12-16 September 2005.

The Chairman of the ECSN Advisory Committee invited the ECSN Manager to an informal Consulting Meeting to Offenbach, 5-6 April 2005. In a sense of a preparatory approach for the coming

ECSN Advisory Committee Meeting in Copenhagen, the status of the actual projects and the implementation of new project activities have been discussed.

Unfortunately this Consulting Meeting has been the last one with the present Chairman Volker Vent-Schmidt. Because of his health conditions Volker had to retire by the end of March 2005. Volker was a very competent and active Chairman. On behalf of ECSN, the Manager, Walter Kirchhofer, would like to thank Volker Vent-Schmidt for his friendship, for his enthusiasm and for his efficient support he has given to all the ECSN activities. ECSN will miss him as an engaged climatologist and supporter for the common climatological approaches.

Recently the ECSN Climate Atlas of Europe has been made available on a CD-ROM, providing monthly normals and additional statistical information for selected parameters. In the Atlas project it was stated that maps could be added at a later stage when the GIS project reaches a conclusion.

In the meantime the Austrian Meteorological Institute has taken the initiative and prepared a proposal for a new EUMETNET/ECSN project "High Resolution Temperature Climatology in Complex terrain - demonstrated in the test area Greater Alpine Region (GAR)". The proposed project will provide a high quality data product for a special European region based on the experiences and knowledge of the involved countries. However the results and findings can be generalised

and transferred to other European countries with a complicated orography and therefore sub-grid scale problems in spatial interpolation. That is to say, the results and the findings can also be used and implemented in the new EUROGRID project.

The Members of the ECSN Advisory Committee support this project initiative with the following comments:

- The time table should be enlarged to two years;
- The computation period should be 1971-2000, this in correspondence with the ECSN Climate Atlas of Europe.

The proposal for this EUMETNET/ECSN project has been introduced in the Agenda of the 24th EUMETNET Council Meeting to be discussed on 14 April 2005.

European Climate Assessment & Dataset (KNMI)

Following the document that describes the technical work of the ECA&D project and its infrastructure, prototypes were developed for the operational database and for the new web-interface. KNMI has tested all these prototypes. The results of these tests were promising and clearly illustrate the advantage of the new website. The automated updating procedure of daily ECA series with GTS synoptical data turned out to work well. Furthermore, automated procedures for placing quality control flags to the daily data were developed, tested and implemented.

ENSEMBLES (KNMI)

The project ENSEMBLES -Ensembles based predictions of Climate Changes and their Impacts- is a European Union FP6 integrated project ([http://](http://www.ensembles-eu.org/)

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ENSEMBLES consists of 10 research themes, while each research theme is divided into several workpackages. MeteoSwiss and KNMI cooperate in the workpackage that involves the development of a daily resolution gridded dataset for Europe. Two researchers, who have recently been recruited, already started with the collation and homogenization of data that will be used for the gridding (Evelyn Zenklussen at MeteoSwiss and Lisette Klok at KNMI). The gridded datasets will include several climate variables: minimum/maximum temperature, precipitation, air pressure and snow cover, and the datasets will go back as far as station data availability allows (45 years or possibly even longer). The resolution of the datasets should be high enough to capture extreme weather events.

The gridded datasets are going to be built on a dense network of daily station data. Therefore, the dataset developed in ECA&D serves as a good start for this network. However, the eventual grid resolution is going to be 25 km. For this reason, the intended station density is 1 station per 2500 km² and additional data series have been requested in a letter that was recently sent to all ECA&D members. These additional series will not be released publicly like the other ECA&D data, but will be used for the gridding purpose only. Furthermore, daily series collated within several other national or international projects will be used to obtain a dense network of series. For instance, datasets of the EU FP5 projects STARDEX and EMULATE will be included.

At this stage, the development of the gridded datasets thus focuses on the collation of daily stations series. These series are quality controlled and analyzed. Later this year, two British ENSEMBLES partners (Oxford Univ. and CRU) will cooperate in the development and evaluation of gridding methods. The daily gridded datasets should be produced by the end of 2007, and will be accompanied by estimates of data uncertainty.

Generate Climate Monitoring Products (DWD)

The project Generate Climate Monitoring Products which was completed early in 2004 is continued since then in a quasi operational stage. The climate monitoring products distributed under GCMP are accessible through:

<http://www.gcmp.dwd.de>

The number of participating European National Meteorological and Hydrological Services as well as the number of monitoring products they contribute to the project are still going up, presently 18 Services take part.

As a logical further step an ECSN-project "European Climate Information System" is proposed, starting from the existing prototype GCMP. It will be extended towards a high sophisticated system to provide climate monitoring products at national and European levels on a routine basis.

In the meantime efforts continue to enhance the participation and co-operation, leading to additional monitoring products on the GCMP Web site.

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