

Summary of WG3: Organisational Issues

A. Hilgers and E. Daly

ESA Space Environments and Effects Analysis Section
TOS-EMA, PO Box 299, 2200AG Noordwijk, The Netherlands

Working group 3 gathered about 27 participants. Most ESA member states and two other countries (Czechia and Russia) were represented. The discussion was very lively and constructive. The key issues addressed were:

- the use of European Assets;
- the relation to US, and other space weather initiatives;
- the role of ESA, National agencies, EU, and others.

First, considering the large attendance at the workshop and also the diversity of the participants in terms of geography and profession, the necessity to establish a permanent communication channel within this space weather community was discussed. The suggestion to create a dedicated journal did not meet a consensus. There were particular concerns about the viability of it and the risk of interference with other European journals. Two suggestions met a consensus: (i) to utilise the electronic newsletter SWEN¹ as a main communication channel within the community and (ii) to favour special issues on space weather in the European journals, e.g., *Annales Geophysicae* or *Planetary and Space Science* opened to both scientific and engineering papers.

Based on a report produced by FMI², a detailed proposal on possible versions of a European space weather centre (possibly distributed) was presented. Depending of resource and state of maturity of the centre the task of it could range from basic data and model service (provision, conversion and testing) to 24 hour a day forecast operations. Such a "centre" could be build on existing activities.

Concerns were raised about funding issues. It was noted that any duplication of activities in

several countries could increase costs compared with standardisation and co-ordination. Technological spin-off from a programme was also stressed (micro-satellites, modelling, etc) since in-orbit hardware might be part of a space weather programme.. The idea of a "shopping list", as used in the US, grouping funds from different sources under the same label and making them available to all following the approach did not meet a consensus. It was suggested that an appropriate funding source may be the EU. However, the fifth framework programme does not explicitly mention space weather and an action was generated on this. The possibility that WMO and weather agencies could be involved was mentioned.

There was also a consensus on the need for a working team to help co-ordinating future activity. However, there was no consensus on the way that it could be set-up. A possible compromised appeared to be a small working group assisted by a wide forum, represented by the SWEN subscriber community.

Some issues more specifically related to in-orbit hardware were also addressed.

There was a consensus about the fact that Europe needs autonomy for data sources. European autonomy aspect seems also to be supported by the US. Several ideas were suggested that may be feasible even on the short term: (i) support hitchhiking space weather payloads on science/other missions, although this is often very difficult for to arrange, (ii) use science mission like Cluster-II and SOHO in a prototype of a space weather observatory. Ultimately a dedicated space segment may be necessary.

It was noted that the transfer of capability and tools from the science community to applications needs proper funding. This is not normally foreseen in science budgets.

As a synthesis of the results of working group 3 an organisational map and a work plan for the coming year was produced. The organisational

¹ <http://www.astro.lu.se/~henrik/spweuro.html>
Space Weather Euro News Archive

² State of the Art of Space Weather Modelling and Proposed ESA Strategy
http://www.geo.fmi.fi/spee/docs/wp310_tn.pdf

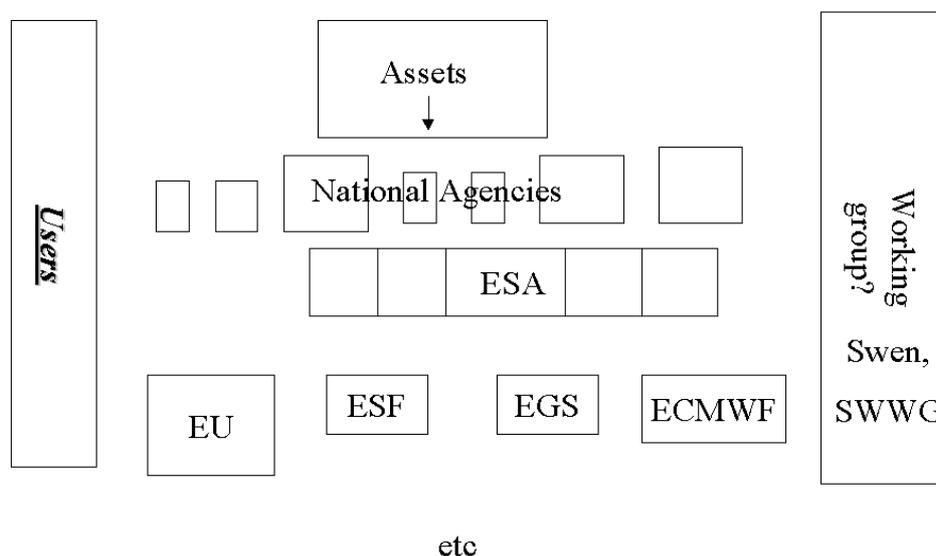
map identifies some main entities that could be part of a European space weather activity. The relations between these entities and the funding still need to be clarified.

The urgent actions to be performed were:

- establish a comprehensive assessment of User needs and quantification of requirements
- perform an inventory of European assets (National, multilateral, synthesis, classification, accounting for past work);

- identify linkages between agencies/entities;
- some agencies/national representatives to make their position clearer;
- production of a Roadmap for preparation of a European space weather programme;
- ESA to co-ordinate the above actions and to try to establish a space weather activity.

Organisational Map



List of Participants

- | | |
|--|---|
| Baumjohann W. (MPE Garching) | Latham P. (DERA) |
| Bentley R. (MSSL-UCL) | Lefeuvre F. (CNRS/LPCE) |
| Bieler T. (FH-Aachen) | Lilensten J. (CNRS) |
| Blelly P.-L. (CNRS) | Lundstedt H. (IRF-Lund) |
| Breton J. (CNES) | Minaeva J. (SINP Moscow State University) |
| Candidi M. (CNR/IFSI) | Moretto T. (DSRI) |
| Cargill P. (Imperial college) | Norberg O. (IRF-K) |
| Coates A. (MSSL-UCL) | Otrube W. (Solar Obs. Karlsruhe) |
| Daly E. (ESA) | Prado J.-Y. (CNES) |
| Danilov V. (RLC, KFCT) | Pulkkinen T. (FMI) |
| Dmitriev A. (SINP Moscow State University) | Wu J.-G. (DMI) |
| Gendrin R. (ISU) | |
| Henoux J.-C. (Obs Paris) | |
| Hilgers A. (ESA) | |
| Karlicki M. (Astr. Inst) | |
| Lantos P. (Obs Paris-Meudon) | |