



Virtual Organisation Registration Procedure

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3.0	23-Mar-05	Maria Dimou	Comments by the JSPG meeting participants of 06-Dec-04 and by the NA4/SA1 Joint Group meeting participants of 09-Dec-04. Support section received by email from Torsten Antoni. Light-weight VO appendix by Cal Loomis.
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1 Introduction

This document lists the necessary steps a Virtual Organisation (VO) should take in order to get registered with and integrated into the EGEE infrastructure. Participation in the EGEE project and use of the EGEE infrastructure is a collaborative effort.

A VO using this infrastructure is required to:

- Contribute computational resources to the EGEE/LCG infrastructure corresponding approximately to the average needs of the VO for large-scale, production use.
- Help drive the evolution of the infrastructure and the middleware through use of the system and by providing feedback.

The EGEE project will provide:

- generic user support system,
- generic application porting support, and
- standard training sessions and tutorials

to all registered VOs. Those VOs with significant scientific interest may negotiate higher levels of resources and support with EGEE.

This document does not treat the full lifecycle of a VO; particularly the procedure for removing a VO is not presented.

The VO registration, configuration and integration processes take considerable effort and should only be used for VOs which expect to last six months or more.

VOs of a more transient nature should consider another infrastructure like GILDA.

The operational responsibilities during the life of the VO (e.g. regular membership expiration and re-registration, non-replication of Personal user data across sites etc.) are defined in the **User Registration and Virtual Organisation Membership Management Requirements**¹ document.

2 Definitions

This document makes use of terms defined in the [LCG/EGEE Security Policy Glossary of Terms](#)ⁱ

More specifically the following categories reflect the **support level received** from EGEE. In general the higher the level of support, the greater the expected involvement in the EGEE project.

- **Registered VO**

A VO which has successfully gone through the registration process described in this document. This is the minimum for a VO associated with EGEE.

- **Selected (Supported) VO**

A *registered* VO which has gone through an additional selection procedure. They are chosen based on their demanding requirements and dedication to validating the EGEE infrastructure.

These applications provide compelling example of grid use and are provided with dedicated user

¹ User Registration and VO Membership Management Requirements document: <https://edms.cern.ch/document/428034>

support, application porting support, and training by NA3 and GGUS. Such VOs today are the High Energy Physics (HEP) and biomedical applications.

- **External VO**

A *registered* VO which is supported by a separate funding project. These VOs are expected to participate directly in the evolution and management aspects of the infrastructure.

VOs are also categorised based on the **geographical distribution** of the Resource Centres (RCs) which accept them..

- **Local VO**

A VO accepted by only one Resource Centre (RC) within a given federation managed by one Regional Operations Centre (ROC). Such VOs don't need to go through the following Registration Procedure at the cost of facing name conflict problems, if they expand in the future.

- **Regional VO**

A VO accepted by more than one RCs within a single federation. Those VOs may wish to properly register in view of further expansion.

- **Global VO**

A VO accepted by RCs in multiple federations. If those VOs wish to ensure their validity grid-wide they should better register.

3 Registration Prerequisites

Creating and operating a VO requires commitments from both the VO and the infrastructure. The registration, configuration and integration processes are not trivial and should only be undertaken if the VO is likely to persist more than a six months. VOs with short lifetime should use another infrastructure like the GILDA² t-infrastructure.

Preparatory steps for setting up a new VO:

1. Become familiar with grid technology and the EGEE/LCG infrastructure. Attending one of the many EGEE/LCG tutorials or experimenting with the GILDA t-infrastructure are excellent ways to do so.
2. Verify that there is no other existing VO which covers your application or organisation. Often there are existing regional VOs which can be expanded to include the full membership of an application. This information can be found on the Core Infrastructure Centre (CIC) portal³.
3. Review the documentation describing the policies which govern the operation of a VO including the VO Security Acceptable Use Policy (AUP)⁴.
4. Ensure that the person managing the VO has a personal certificate issued by an accepted CA⁵.

² <https://gilda.ct.infn.it/> t-Infrastructure: an e-Infrastructure specifically adapted to the needs of education, trainers and students.

³ Open <https://cic.in2p3.fr/index.php?id=vo> with your certificate loaded and expand the menu list next to "Please, choose a VO".

⁴ VO Security Policy document <http://edms.cern.ch/document/573348>

⁵ <http://cern.ch/LCG/users/registration/certificate.html>

4 Registration Procedure

To register a new VO you use the web interface⁶ which will guide you through the registration process and prompt you for the required information. You will need to provide the following information:

1. Name of the VO.

To avoid problems with conflicting VO names, new VOs should use a DNS-based⁷ naming scheme, as soon as this is technically feasible. EGEE VOs are suggested to use names in the format *<VOname>.vo.eu-egee.org*.

2. The VO's AUP, which should reside in the VO id card space of the CIC portal. The document should be uploaded by the VO manager. Major VO AUP changes should trigger a re-registration of the VO and its members.

3. Contact information for the VO manager (see [VO Security Policy document](#)).

4. Contact information for security representative (see [VO Security Policy document](#)).

5. Textual description of the VO and its aims.

6. Link to any relevant web sites for the VO.

7. The scientific discipline of the VO (e.g. HEP, Biomed, Earth Sciences, Astrophysics, Computational Chemistry, Fusion, Other).

8. Indication of the size of the VO (number of active users and number impacted by the grid use).

9. Average resource consumption per job (CPU, memory, network, temporary disk space) and number of concurrent jobs.

10. Average sizes of input and output files and the number of those stored on the grid. Also the permanence of those files.

After submission of this information the following bodies will be contacted in parallel automatically:

⁶ https://cic.in2p3.fr/index.php?id=oag&subid=vo_requirement&js_status=2

and https://cic.in2p3.fr/index.php?id=oag&js_status=2

⁷ Text contributed by David Groep (JSPG) in March 2006 on VO Naming:

The VO name is a string, used to represent the VO in all interactions with grid software, such as in expressions of policy and access rights.

The VO name MUST be formatted as a subdomain name as specified in RFC1034 section 3.5 (<http://www.faqs.org/rfcs/rfc1034.html>). The VO Manager of a VO using a thus-formatted name MUST be entitled to the use of this name, when interpreted as a name in the Internet Domain Name System.

This entitlement MUST stem either from a direct delegation of the corresponding name in the Domain Name System by an accredited registrar for the next-higher level sub-domain, or from a direct delegation of the equivalent name in the Domain Name System by ICANN, or from the consent of the administrative or operational contact of the next-higher equivalent sub-domain name for that VO name that itself is registered with such an accredited registrar.

Considering that RFC1034 section 3.5 states that both upper case and lower case letters are allowed, but no significance is to be attached to the case, but that today the software handling VO names may still be case sensitive, all VO names MUST be entirely in lower case.

- The EGEE/LCG Operations Advisory Group (OAG)⁸ to review the provided information, evaluate the feasibility of the VO's AUP, help with the VO name registration and approve the new VO.
- The EGEE NA3⁹ to cover training needs, if necessary.

If there are no objections from the various EGEE activities, the request will be approved by the OAG within three business days. If there are concerns, you will be contacted by an OAG representative for further information or clarifications. You may contact the OAG chairs during this process to understand the status of the VO creation request.

5 Enabling a new VO

Once a VO registration has been approved by the OAG, the ROC managers as representatives of the RCs in their federation, will find a RC willing to host the VO's VOMS server and authorise the VO on a very restricted set of resources. This will allow simple job submissions and testing. The OAG will work with you in parallel to arrange more permanent resources and other grid services for the VO.

6 Evolution of a new VO

After the VO has been running in production, the resource needs for the VO usually grow. To obtain more resources, the VO manager will have to interact with the OAG and the ROCs. The OAG will drive this process to ensure that the VO has the necessary resources. Requests for more resources will only be considered if the VO itself has integrated some of its own resources into the EGEE infrastructure.

7 Becoming a "Selected (Supported)" VO

VOs may grow to the point where they require dedicated EGEE/LCG manpower for user support, application porting or training. These are provided only to "Selected" VOs. These VOs have a high scientific merit and are likely to provide significant input for the evolution of the infrastructure.

The detailed procedure for becoming a selected VO is managed by NA4. It will minimally involve a presentation of the application and its needs at an EGEE User Forum or Conference and a subsequent evaluation of the proposal by the NA4 steering committee. If the NA4 steering committee believes the request merits follow-up, it will consult with the other EGEE/LCG activities. If the other activities also agree, a formal process will be started to develop a Memorandum of Understanding (MoU) between EGEE and the application.

⁸Contact address: oag-chair@in2p3.fr and activities: <http://agenda.cern.ch/displayLevel.php?fid=193>

⁹ <http://www.egee.nesc.ac.uk/>

8 Summary

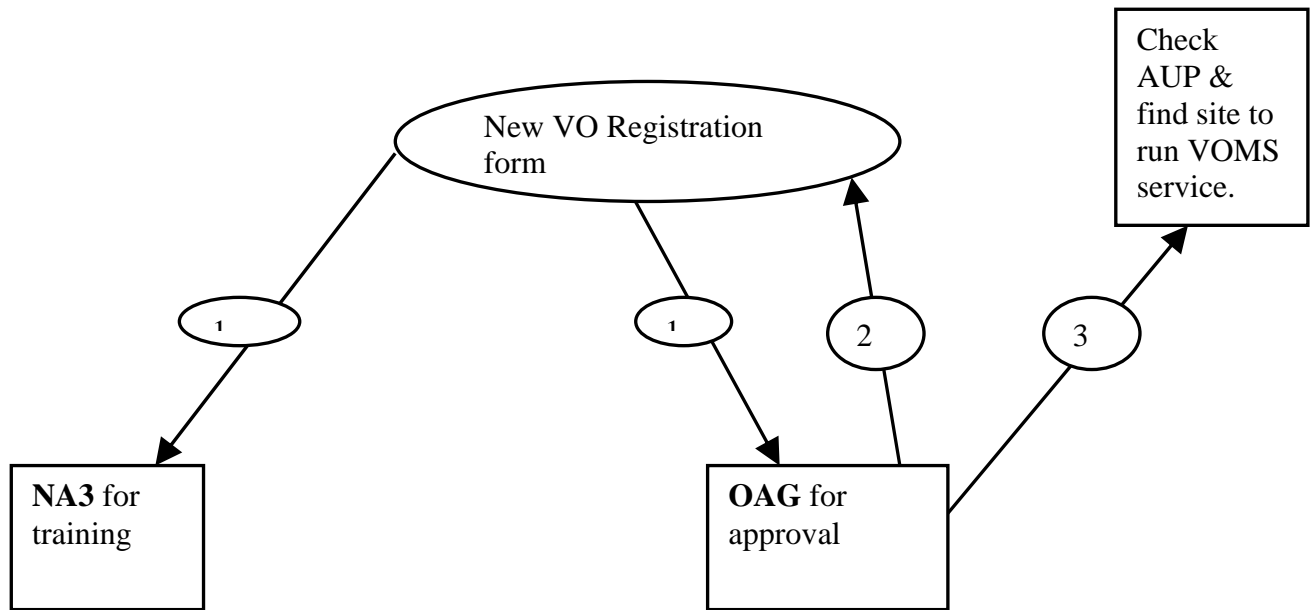


Figure: Acceptance process for new VO

ⁱ LCG/EGEE Security Policy Documents' Glossary of Terms - <https://edms.cern.ch/document/573613>