Technical Evolution Group – Mandate

To reassess the implementation of the grid infrastructures that we use in the light of the experience with LHC data, and technology evolution, but never forgetting the important successes and lessons, and ensuring that any evolution does not disrupt our successful operation.

The work should:
- Document a strategy for evolution of the technical implementation of the WLCG distributed computing infrastructure.
- This strategy should provide a clear statement of needs for WLCG, which can also be used to provide input to any external middleware and infrastructure projects.

The work should, in each technical area, take into account the current understanding of:
- Experiment and site needs in the light of experience with real data, operational needs (effort, functionality, security, etc.), and constraints;
- Lessons learned over several years in terms of deployability of software;
- Evolution of technology over the last several years;
- Partnership and capabilities of the various middleware providers.

It should also consider issues of:
- Long term support and sustainability of the solutions;
- Achieving commonalities between experiments where possible;
- Achieving commonalities across all WLCG supporting infrastructures (EGI-related, OSG, NDGF, etc).

Deliverables
- Assessment of the current situation with middleware, operations, and support structure.
- Strategy document setting out a plan and needs for the next 2-5 years.

Structure

1) The MB manages the process directly, and appoints several TWGs, one for each area to be addressed, monitors the results of the technical analysis and takes final decisions on the proposals.
2) Each TWG should be co-chaired by 1 experiment and 1 site representative. The membership should include the technical experts drawn from the experiments, sites, and various middleware and infrastructure providers. The chairs and the group members to be proposed and agreed by the MB.
3) The MB will define scope, mandate, and membership of each TWG, and monitor progress and have editorial ownership of the process. The TWGs report to the MB.