

DPM support ... Questions from EGI

WLCG Ops Coordination - 16 May 2019



EGI questions on lcg-dm

- Following is a set of questions coming from EGI regarding the end of support for the DPM “legacy codebase”, also called “lcg-dm”
- In the current DPM version lcg-dm gives:
 - srm, rfio
 - Internal protocols that obsolete apps may use: Cns (dpsndaemon binary protocol), dpm daemon binary protocol. I (FF) am not aware of such apps now, beside the dpm legacy command line tools.
- We start from the announcements, from 2018

Main public announcements

- DPM workshop May 2018, Slides 11 and 38/39
 - <https://indico.cern.ch/event/699602/contributions/2941768/attachments/1659504/2658082/Status-Directions2018.pdf>
- GDB report, July 2018, Slide 15
 - <https://indico.cern.ch/event/651355/contributions/3064592/attachments/1688597/2716571/DPMWorkshop2018-GDBReport.pdf>
- CHEP 2018, July 2018, Slide 13
 - <https://indico.cern.ch/event/587955/contributions/2936831/attachments/1683997/2707005/DPM-CHEP2018.pdf>

Be prepared

- Our wish is to deprecate the legacy mode
- Our goal is to reduce support for components that can't cope with the increasing requirements of WLCG computing
- LCGDM received good enhancements 2-3 years ago, and it can survive some time
 - it won't scale in larger sites
 - Its performance may not scale
 - (= more client failures)

LCGDM support from 01/Jun/2019

- From **1st of June, 2019** our standard LCGDM support answer will be **“there is an alternative: upgrade to DOME flavour, please”**
 - That affects: dpns, dpmdaemon, rfio, CSec, dmlite::Adapter, SRM
- LCGDM will stay in EPEL as long as it compiles untouched in Rawhide (EPEL rules will remove it the day it breaks)
- It's pure C, hence that can be even years, we don't give limits

EGI Question 1

- Q: Is there a tentative roadmap for the SRM deprecation by DPM?
- A: In Spring 2018 we started announcing the end of support for the lcg-dm codebase, set for May 31st, 2019
 - The components will be left in EPEL6/7, and not ported to EPEL8

EGI Question 2

- Q: Is there a tentative roadmap for the support of security updates related to SRM support in DPM?
- A: That was the year following the announcement, ending 31st of May 2019

EGI Question 3

- Q: Are you aware of any specific difficulties with regards to the migration?
- A: (*Interpreting “migration” as “DPM upgrade”*) No fundamental difficulties, just careful sysadmin work, parameters, certificates, etc.
 - The setup tools and instructions are pretty solid and well documented
 - <https://twiki.cern.ch/twiki/bin/view/DPM/DpmSetup>
 - The pilot phase is pedantically tracked in the DPM upgrade TF:
 - <https://twiki.cern.ch/twiki/bin/view/LCG/DPMupgrade>

EGI Question 4

- Q: What is the new list of supported protocols
- A: gsiftp v1/v2, http(s)/WebDAV, xrootd
- Note: gsiftp v1 is supported but
 - The protocol has known scalability issues without SRM. Not an option for WLCG computing
 - Its current usage is mainly due to some communities still using lcg-utils, deprecated 5 years ago. Any plan in EGI to warn them ?

EGI Question 5

- Q: Is there some kind of default protocol for WLCG sites?
- A: No. The WLCG DOMA activities may express a preference at some point, and we don't expect it to exclude the others
 - The general idea is not to prefer srm and gsiftp

EGI Question 6

- Q: Related to this, we are using SRM for the monitoring probe, do you have any recommendation regarding how this should be changed? Which protocol may be the most appropriate? Any remark with regards the monitoring?
- A: The flexibility of HTTP/WebDAV is unmatched, so choosing HTTP/WebDAV can't be wrong for checking/monitoring things
 - In production there's already the SAM WebDAV probe written by CERN-IT (G.Bitzes) a few years ago
 - If EGI is monitoring space, then moving together with WLCG to the SRR (Storage Reporting Record) through JSON/HTTP would be an optimal and technically solid move

EGI Question 7

- Q: How should we manage this, will you coordinate with WLCG sites and communities while we manage other EGI sites and communities?
- A: No preference so far, if this is agreed between WLCG and EGI
 - On the DPM side, the plan is to ask sites to upgrade DPM to the DOME flavour, once the pilot phase is finished. Upgrading makes the legacy components optional and still working. The sysadmin can then freely choose if he wants to keep them running or not. This choice depends on the said agreement between WLCG, EGI and the site.

DPM workshop 2019

- An important place where these discussions will take place with the involved people
- **June 13-14, 2019 in Bern**
- <https://indico.cern.ch/event/776832/>
- Please register if you intend to participate