

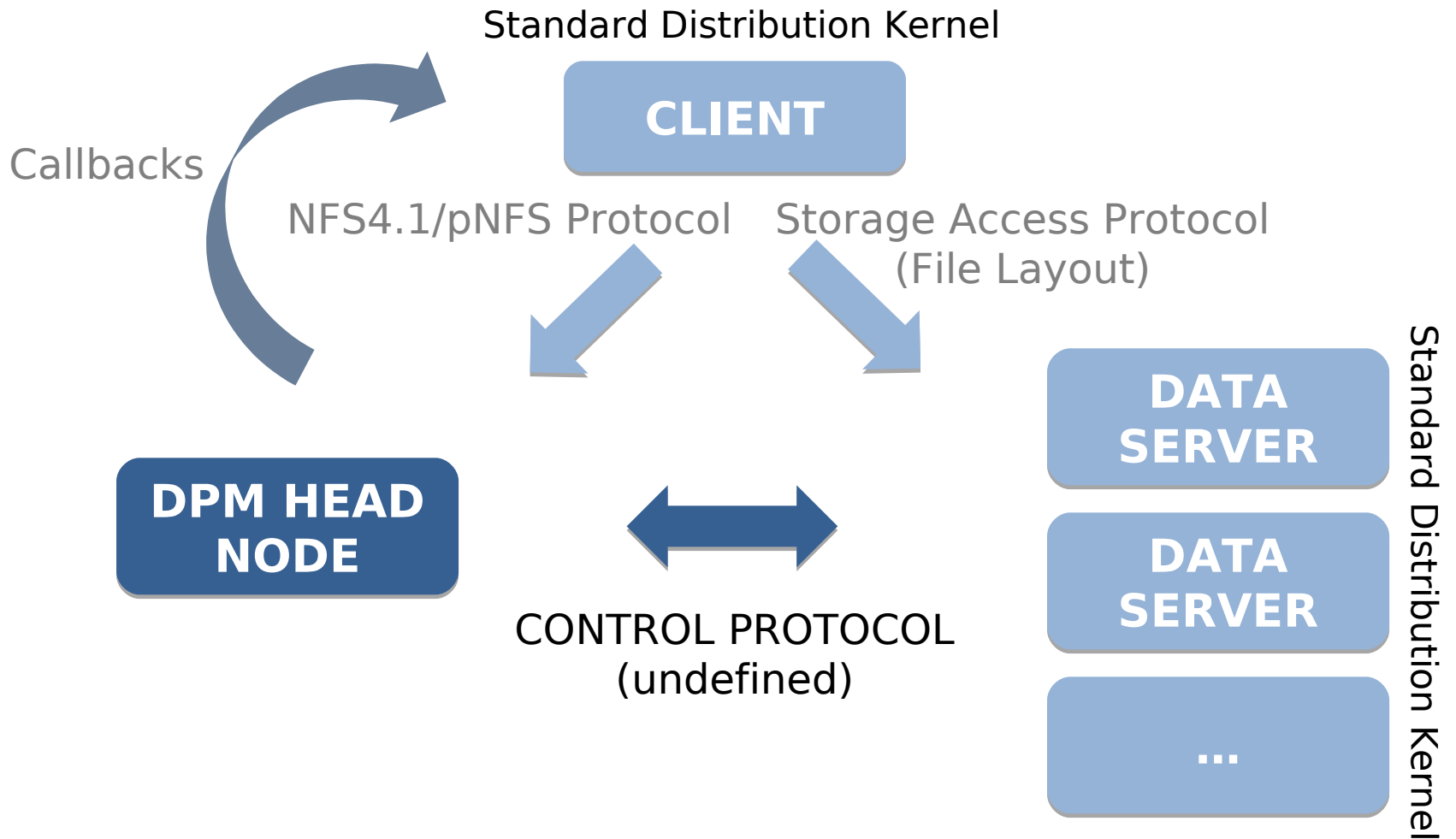


# pNFS / DPM status

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# Reminder



# Code

- All required functionality is there
  - filesystem metadata operations, pNFS read/write, krb5 security
- Existing code relies on Ganesha (with patches for the pNFS functionality)
- Work being done now
  - Ganesha pNFS is now stabilising into an internal API
  - We started migrating our code to use their own pNFS implementation

# Disk Server Update

- Goal was (is?) to use the kernel nfsd
  - Not yet possible with the current Ganesha
  - Some code in a branch to allow this
- So we provide the possibility of deploying the DPM NFS daemon on disk servers
  - No need for a kernel update
  - Would be needed at least for the next months
  - *This is the current recommended setup*

# Validation / Testing

- Functional tests run periodically
  - No blocking failures
- Cthon4 + PyNFS
  - What is dCache using for this?
- Initial contacts with ATLAS / CMS for further validation
  - But not much happened since...
  - EMI + themselves being quite busy
- <https://svnweb.cern.ch/trac/lcgdm/wiki/Dpm/NFS41/Validation>

# Deployment

- Two internal testbeds with DPM NFS running
  - gLite + EMI
- First site to deploy it in a ‘production like’ environment selected: Taiwan
  - Largest DPM site (WLCG Tier 1)
  - ASGC visitor at CERN will collaborate on this (among other DPM related work)
- End June 2011

# Open Issues

- Still using 2.6.37+pNFS patch on the client machines
  - No time to upgrade and test yet
- X509 certificate support
  - Anyone looking at it? We stopped...
  - Pkinit?
- Experiment test cases
  - We'll talk to ATLAS & CMS, but should we be using something that dCache already uses?
- Nameserver performance
  - Some issues with the current way the DPM NFS daemon interacts with the DPNS service (NFS is heavy on metadata calls)

# EMI Year 2

- Informal site testing
  - June to September 2011
- Public prototype release
  - Safe for read-only
  - Beta write functionality
  - September 2011
- Implementation of any necessary changes to DPM
- Production release
  - EMI 2





# Thank you

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