

BY-NCPHEP TIER 3: CURRENT STATUS

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Milestones

- 2008 Site registered in GocDB as **BY-NCPHEP**
- 2009 Site certified by ROC Russia
- 2011 Site registered in CMS SiteDB as **T3_BY_NCPHEP**

Facts

Approx. cost of hardware: ~ 20,000 USD

Site set-up: 1 FTE

Site support: 0.5 FTE, 2-3 admins

Jobs: remote CMS user MC, local user ATLAS/CMS MC/analysis

Belarusian National Grid Initiative (NGI-BY)

Member Sites

Short Name	Official Name
BY-BNTU	Belarusian National Technical University
BY-BSU	Belarusian State University
BY-JIPNR-SOSNY	Joint Institute for Power and Nuclear Research - Sosny
BY-NCPHEP	National Scientific and Educational Centre of Particle and High Energy Physics of the Belarusian State University
BY-UIIP	United Institute of Informatics Problems
BY-UIIP-TB	NGI_BY testbed provided by United Institute of Informatics Problems

Site	Cores	Storage	Virtual organizations
BY-UIIP	84	18 TB	belarus, ncphep, balticgrid, nabics
BY-NCPHEP	36	4 TB	belarus, ncphep, atlas , cms
BY-BNTU	56	1 TB	belarus, ncphep, balticgrid, nabics
BY-JIPNR-SOSNY	24	1 TB	belarus, nuclearby, cms

Site configuration: Hardware

- 12 hosts
- 36 cores, 2 GB RAM/core
- 4TB RAID5
- LAN: 1 Gbps
- Internet: 40 Mbps

Site configuration: Software

OS	Scientific Linux 5.7 x86_64
Autoconfiguration	PXE, CFEngine 2
Shared FS	NFS
Monitoring	Ganglia, Nagios
Middleware	EMI-1

Site services

Common

- Cream CE + Torque/Maui
- StoRM SE @ shared FS
- UI, direct job submission
- PROOF cluster
- Squid/Frontier
- CERN AFS

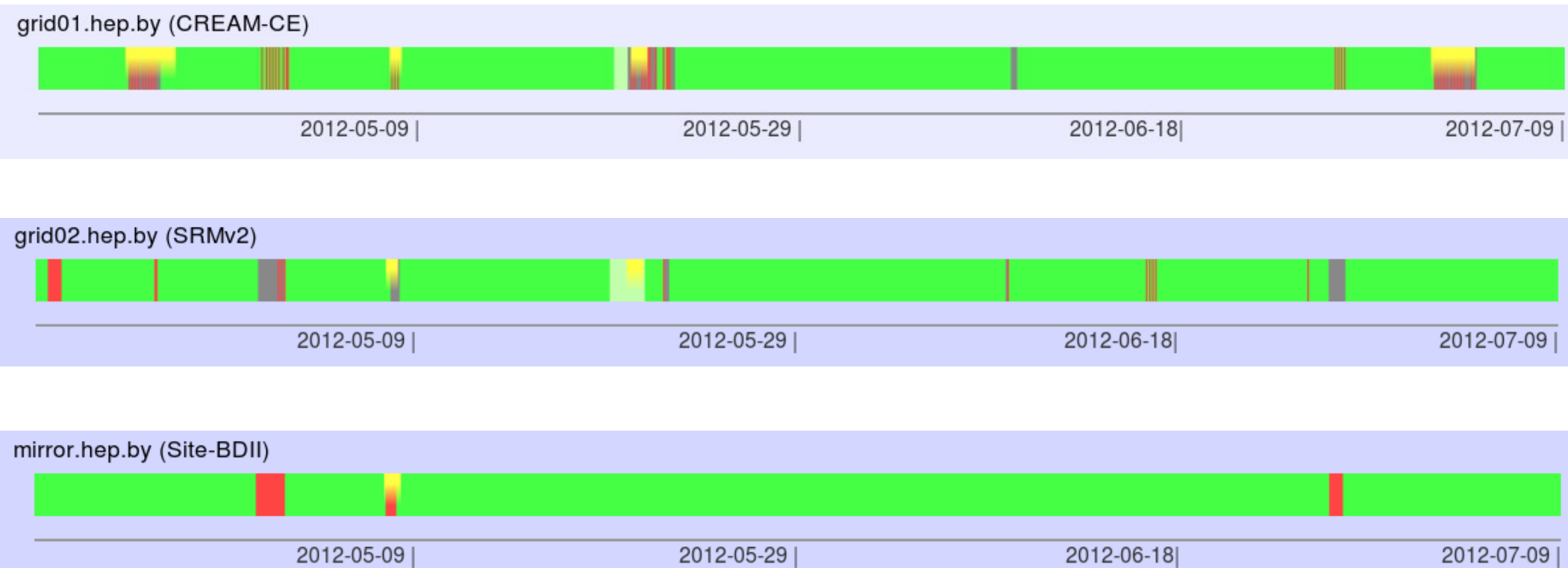
ATLAS

- ATLAS SW
- CVMFS
- ManageTier3SW

CMS

- CMSSW
- Vobox
- PhEDEx

Site availability



Downtime reasons:

- Power outage, especially at weekends
- NGI-BY monitoring problems
- Software upgrades

Plans

- PhEDEx
- Storage upgrade: 50TB, Lustre
- Optical fiber upgrade: 1 Gb/s hardware, 100-200Mb/s Internet
- ATLAS Tier 3 registration
- FTS channels to T1, DDM links
- Low-priority MC production