



LCG-France Tier-1

Réunion de Coordination

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Lyon, 7 juin 2007

► Table des Matières



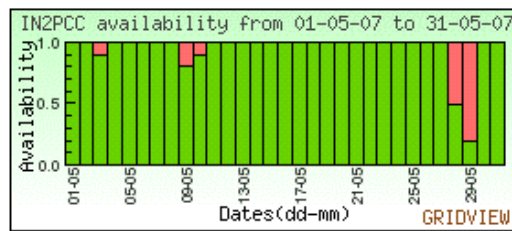
- Disponibilité du site
- Accounting
- GDB de Juin 2007
- Thèmes du jour
- Thème de la prochaine réunion

Disponibilité du site (1/3)



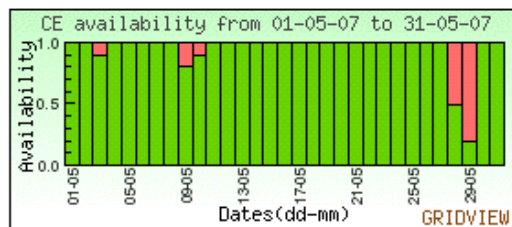
- Mai 2007

Overall Service Availability for site IN2PCC : Daily Report

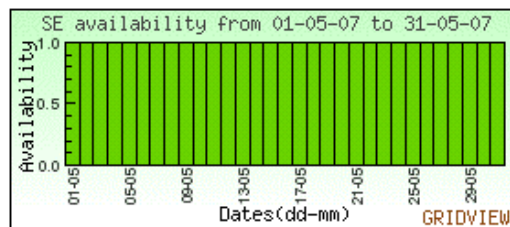


Individual Service Availability for site IN2PCC : Daily Report

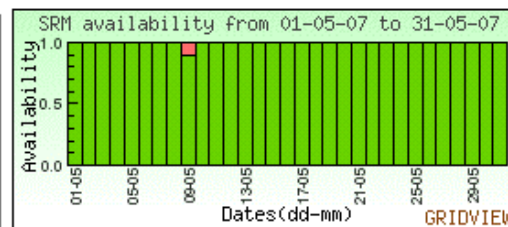
CE



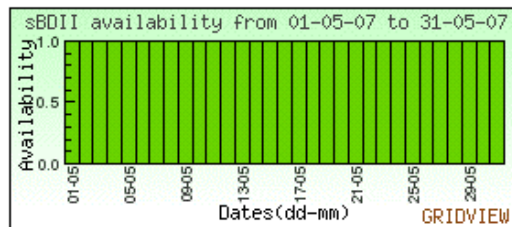
SE



SRM



sBDII



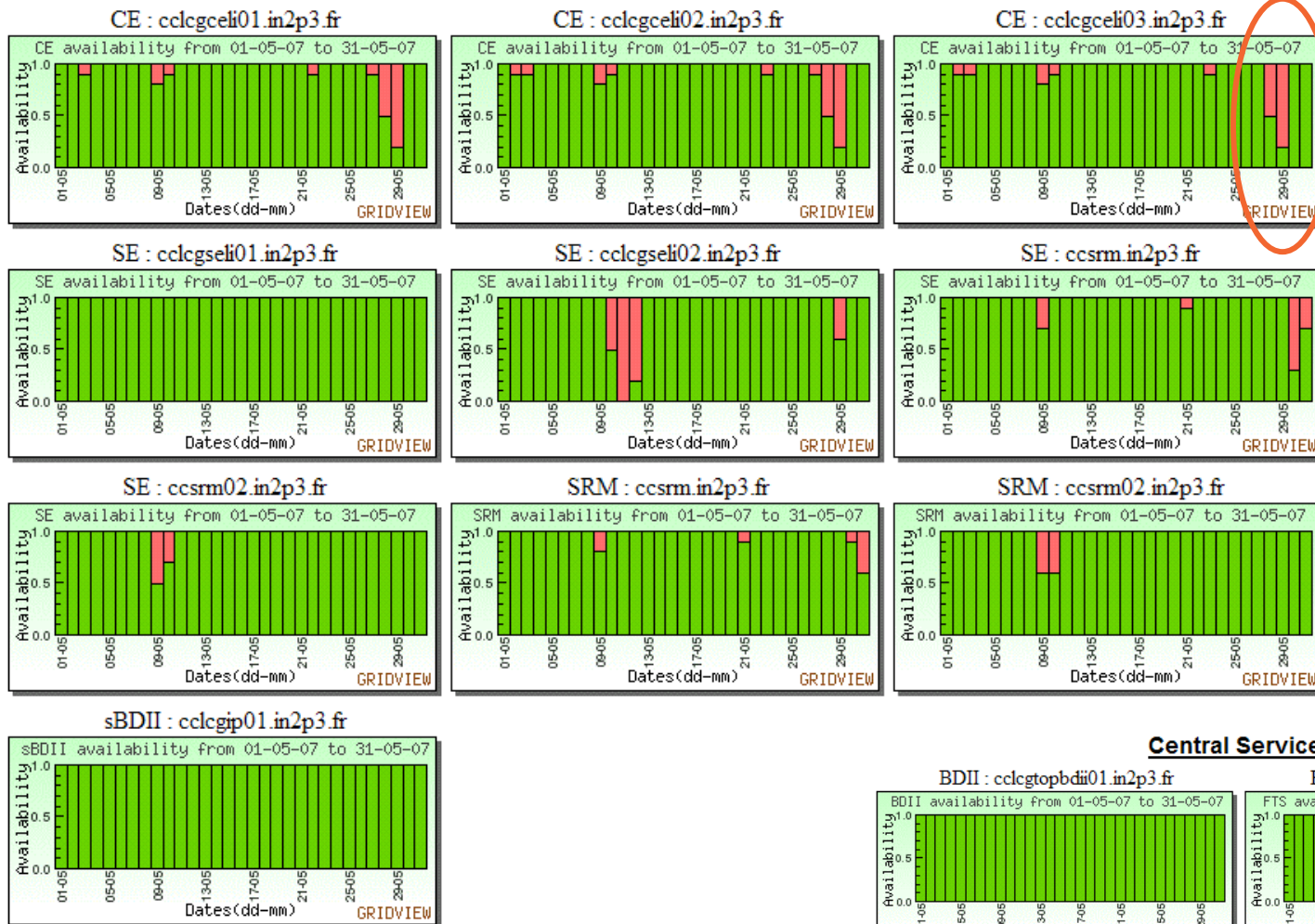
Source: <http://gridview.cern.ch>

Disponibilité du site (2/3)

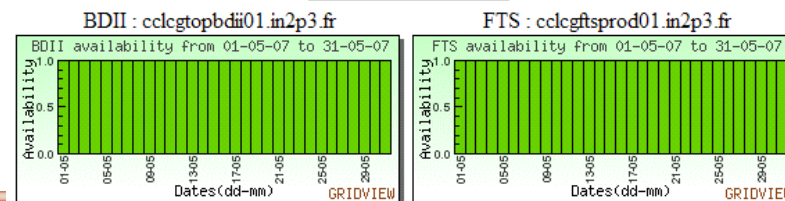


Service Instance Availability for site IN2PCC : Daily Report

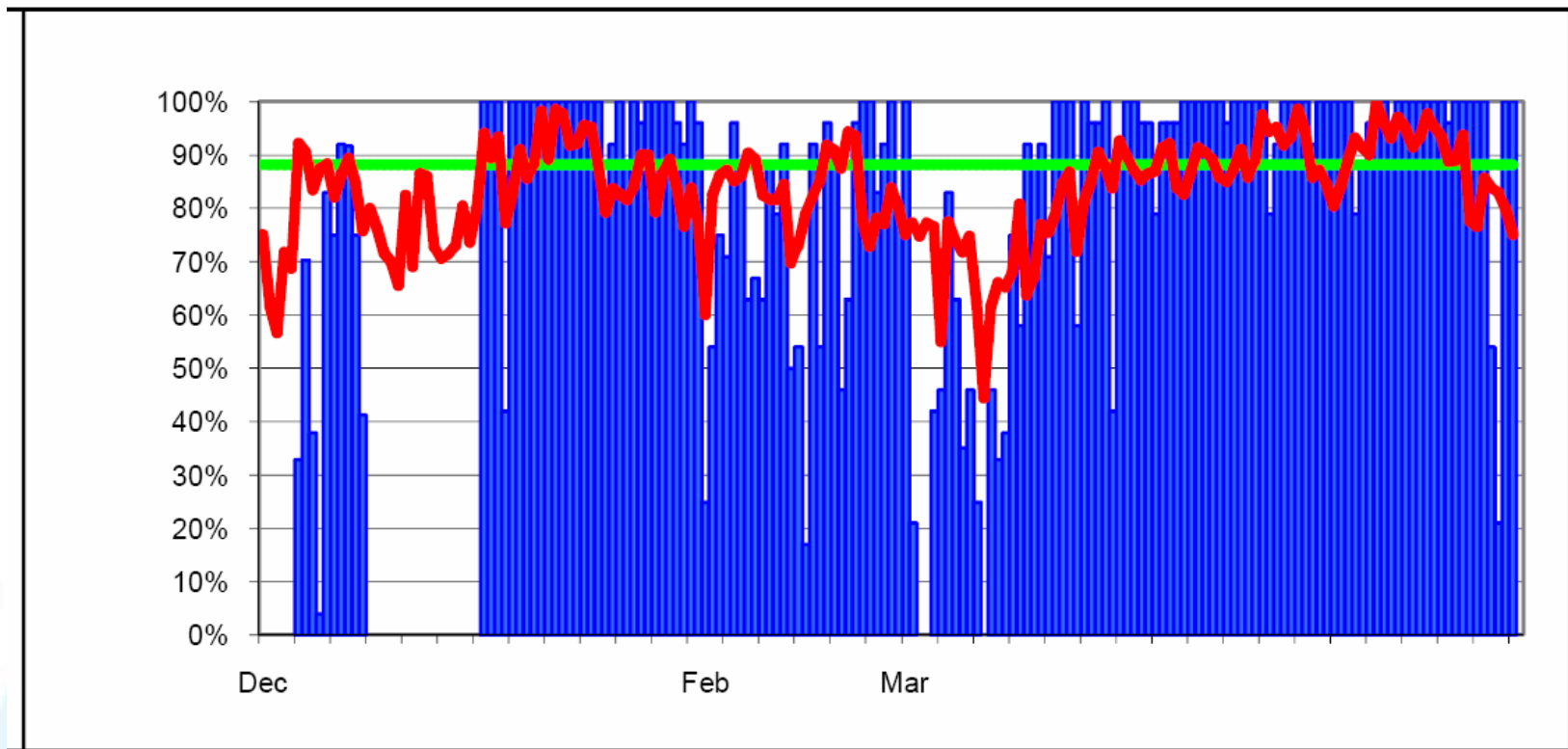
Site Services



Central Services



► Disponibilité du site (3/3)



IN2P3-CC

av.reliability last 3 mths 84%

Source: http://lcg.web.cern.ch/LCG/MB/availability/site_reliability.pdf

Effacité du Site: Mai 2007



SiteName	ALICE	ATLAS	CMS	LHCB	TOTAL
BNL-LCG2	no jobs	0 vs. 1 (0.00%)	no jobs	no jobs	0 vs 1 (0.00%)
CERN-PROD	23024 vs. 1631 (93.38%)	9779 vs. 5739 (63.02%)	128899 vs. 29872 (81.19%)	38866 vs. 12285 (75.98%)	200568 vs 49527 (80.20%)
FZK-LCG2	583 vs. 5343 (9.84%)	5906 vs. 3361 (63.73%)	61435 vs. 21062 (74.47%)	9101 vs. 2481 (78.58%)	77025 vs 32247 (70.49%)
IN2P3-CC	402 vs. 1041 (27.86%)	6725 vs. 4829 (58.20%)	27457 vs. 4448 (86.06%)	3766 vs. 376 (90.92%)	38350 vs 10694 (78.20%)
INFN-T1	5250 vs. 437 (92.32%)	2086 vs. 592 (77.89%)	10343 vs. 4112 (71.55%)	1387 vs. 901 (60.62%)	19066 vs 6042 (75.94%)
NIKHEF-ELPROD	231 vs. 21615 (1.06%)	4464 vs. 442 (90.99%)	no jobs	1299 vs. 213 (85.91%)	5994 vs 22270 (21.21%)
RAL-LCG2	3680 vs. 1048 (77.83%)	4801 vs. 940 (83.63%)	5828 vs. 7144 (44.93%)	7322 vs. 13259 (35.58%)	21631 vs 22391 (49.14%)
Taiwan-LCG2	no jobs	464 vs. 288 (61.70%)	17790 vs. 8958 (66.51%)	no jobs	18254 vs 9246 (66.38%)
USCMS-FNAL-WC1	no jobs	no jobs	101542 vs. 8623 (92.17%)	no jobs	101542 vs 8623 (92.17%)
pic	no jobs	1061 vs. 534 (66.52%)	6301 vs. 2297 (73.28%)	5489 vs. 3796 (59.12%)	12851 vs 6627 (65.98%)
TOTAL	33170 vs 31115 (51.60%)	35286 vs 16726 (67.84%)	359595 vs 86516 (80.61%)	67230 vs 33311 (66.87%)	495281 vs 167668 (74.71%)

Source: <http://dboard-gr.cern.ch/dashboard/data/monthlysummaries/May-07.html>

Accounting: CPU (1/3)

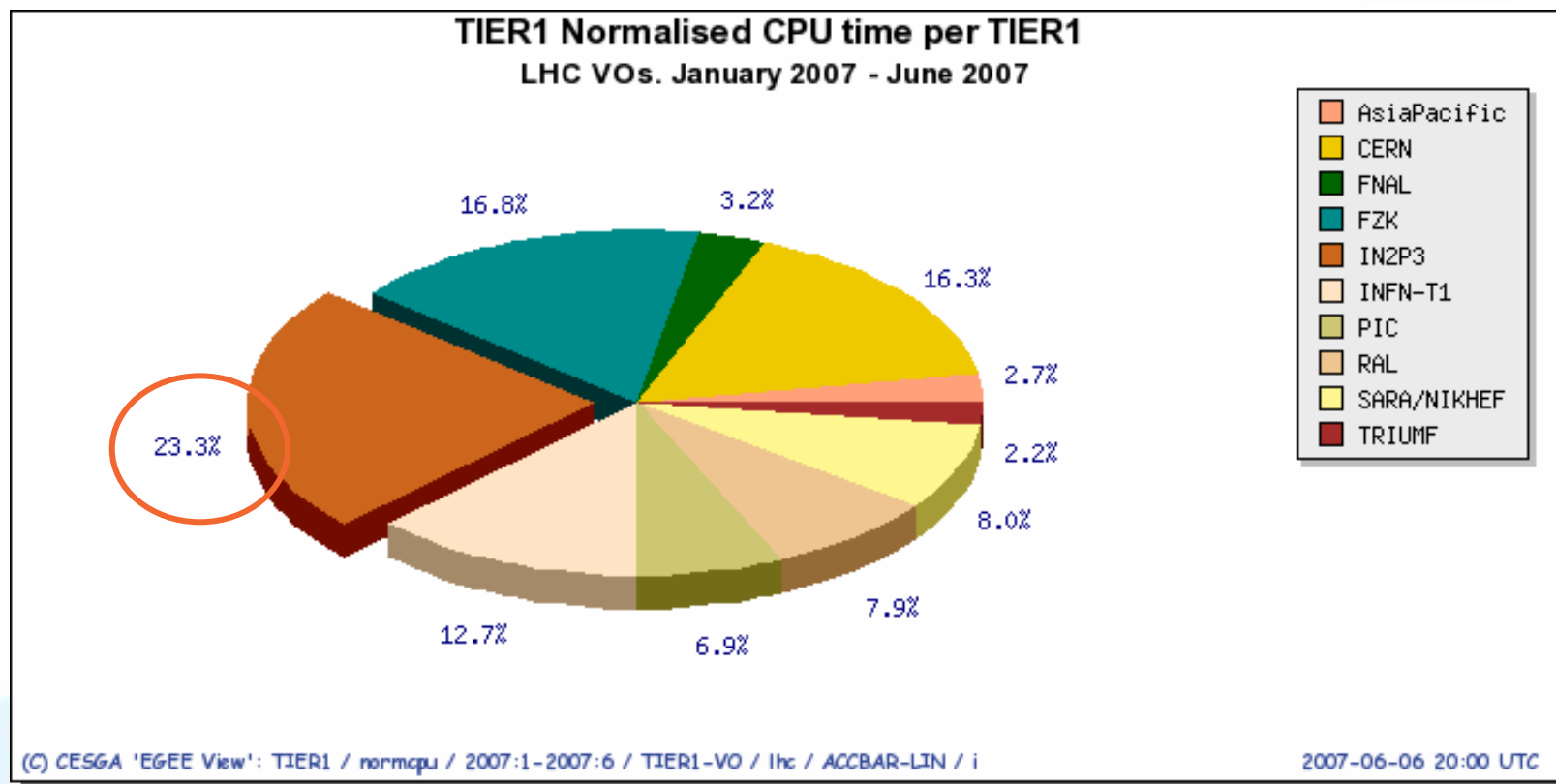


Comparison of Manual vs. Automatic CPU Accounting

CPU Time in kH 2000

		2007-01	2007-02	2007-03	2007-04	2007-05	2007-06	2007-07	2007-08	2007-09	2007-10	2007-11	2007-12	Aggregate
Alice	Manual	18 021	32 655	38 886	33 109	28 028	0	0	0	0	0	0	0	150 699
	Automatic	17 230	32 563	37 785	32 464	28 022								148 064
	Δ (automatic vs. manual)	-4,4%	-0,3%	-2,8%	-1,9%	-0,0%								-2%
Atlas	Manual	190 681	135 599	85 813	202 934	209 299	0	0	0	0	0	0	0	824 325
	Automatic	190 681	135 600	84 025	202 933	209 289								822 528
	Δ (automatic vs. manual)	-0,0%	+0,0%	-2,1%	-0,0%	-0,0%								-0%
CMS	Manual	83 135	118 364	86 624	167 267	66 313	0	0	0	0	0	0	0	521 702
	Automatic	83 113	118 364	86 612	167 262	66 313								521 664
	Δ (automatic vs. manual)	-0,0%	+0,0%	-0,0%	-0,0%	-0,0%								-0%
LHCb	Manual	159 138	138 702	29 857	24 647	20 308	0	0	0	0	0	0	0	372 652
	Automatic	159 086	138 722	29 402	24 638	20 308								372 156
	Δ (automatic vs. manual)	-0,0%	+0,0%	-1,5%	-0,0%	-0,0%								-0%

Accounting: CPU (2/3)



Source: http://www3.egee.cesga.es/gridsite/accounting/CESGA/tier1_view.html

Accounting: Storage (3/3)



- Portal
 - <http://goc02.grid-support.ac.uk/storage-accounting/view.php?queryType=storage&ExecutingSite=IN2P3-CC>
- Situation de notre site au 06/06/2007 22h09

Disk Usage Reported in the last Hour (TB)

- GridPP Wiki **Storage Accounting**
- The term **Allocated** is defined as **GlueSAStateSpaceUsed + GlueSAStateSpaceAvailable**
- The table reports what is actually published into the information system from sites.
- Storage areas that are shared by VOs are **not** treated in any special way.
- **Savannah Bug 25139** There is a problem in adding together the allocated storage for each VO at a particular site of resources.

Disk Used and Allocated per VO (Units are TB)								
Org Unit	Site	Disk	VO				Total (TB)	Percentage
France			alice	atlas	cms	lhcb		
	IN2P3-CC	Used	0.005	0.000	0.002	0.001	0.008	100 %
		Allocated	1.806	1000.000	1.803	1.802	n/a	n/a
Table Summaries								
		Used (TB)	0.005	0	0.002	0.001	0.008	
		Percentage	62.5%	0%	25%	12.5%	100%	
 CSV dump of this table								

- Agenda
 - <http://indico.cern.ch/conferenceDisplay.py?confId=8484>
- Sujets
 - **Présentation de l'organisation des interactions tier-1 tier-2**
 - Tests de transferts RAL↔Glasgow avec différents paramètres
 - France: présentation prévue pour le GDB de Juillet 2007
 - **VOMS**
 - Réplication du registre et support des ACLs par les différents SEs
 - **Middleware: état d'avancement**
 - **Monitoring**
 - **Sécurité**
 - **Planification**

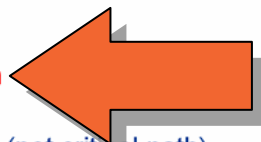
GDB: SL4



Enabling Grids for E-science

Status June 2007

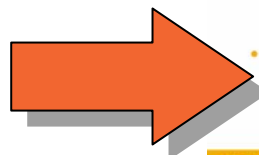
- <http://grid-deployment.web.cern.ch/grid-deployment/cgi-bin/reports.cgi?action=index>
- **WN**
 - 100% build success – sl4_32
 - Released to production on June 6th
 - Tarball: Released today
 - 70 % success – sl4_64 (DM fails) (not critical path)
- **UI**
 - Ready for PPS (known issues)
 - 6 like:
 - Path issues (LFC api),
 - myproxy (works, but returns non zero) -----> VDT
 - YAIM a bit verbose (info messages)
 - Tarball: configuration problems



Enabling Grids for E-science

Status June 2007

- gLite-CE (VDT1.6 and SL4)
 - First testing
- WMS builds, but test focus on experimental WMS
- Not building (SL4 32bit)
 - MonBox (APEL)
 - Amga (Alberto is working on it)
 - InfoProvider for DPM
 - Software on disk servers is working-----> new hardware can be used
- SL4 64bit
 - BDII builds, but no tests
 - Not much activity there, EMT doesn't follow up on this
 - "Build unstable"
- Main focus:
 - UI and WNs 32bits SL4
 - gLite-CE and WMS experimental services (SL3 32bits)



INFSO-RI-508833

SL4 Status and Plans 05/02/ 2007

2

INFSO-RI-508833

SL4 Status and Plans 05/02/ 2007

3

Source: Markus Schulz, [GDB 06/06/2007](#)

GDB: Système d'Information



Enabling Grids for E-science

Summary

- **Significant performance improvements of the BDII**
 - SAM lcg-utils timeout problem fixed.
- **Replacing the MDS with BDII**
 - Uses later (unmodified) version of openldap
 - Improves reliability and performance.
- **Site BDII leverages GIP cache**
 - Will help eliminate CE outages
- **Reconfiguration of the BDII and GIP**
 - Increased deployment flexibility and enables the required changes
 - BDII service publishing etc.
- **Further work needed**
 - On the improving clients
 - On Information System Testing/Monitoring
- **Continue Evaluating Alternative Technologies**
 - Re-think deployment architecture

GDB: Computing Element



Status and short term

- **The LCG-CE is the only production Computing Element**
 - Runs using GT2 on SL3 platforms only
 - If SL4 is needed the installation should be done in a Virtual Machine
- **Tests of the gLiteCE (using GT2 on SL3)**
 - Condor 6.8.4 + a work around from Condor
 - 6000 jobs/day with ~98% success rate
 - up to ~4000 jobs simultaneously on the CE
 - Condor 6.8.5 tests just started but a BLAH bug introduced at the same time invalidated the tests. Now fixed. Tests restarting.
 - Tests of the new BLAH that uses glexec to change the identity should start soon
- **Tests of CREAM (using GT2 on SL3)**
 - A small test site deployed in Padova; another one identical to the one used for the gLiteCE tests being deployed at CERN
 - Will try to reproduce the same tests done on the gLiteCE

EGEE-II INFISO-RJ-031603

GDB - 6 June 2007 3

Les détails de cette présentation peuvent intéresser Sylvain



Medium term

- **The gLiteCE and CREAM versions that should go in production are those built on SL4**
 - The same code base of those being tested now (gLite 3.1) but:
 - will depend on VDT 1.6.0 (GT4)
 - are produced by ETICS
- **Everything builds but more work also on the packaging is needed. Hopefully they will be ready during the summer**
 - Will follow the same path of UI and WN but should be faster
- **Then testing will start**

EGEE-II INFISO-RJ-031603

GDB - 6 June 2007 4

Source: Claudio Grandi, [GDB 06/06/2007](#)

GDB: Job Priorities



Enabling Grids for E-science

Current status

- **Short term solution:**

- WMS change done, but currently only in “experimental Services”
 - Need to get the WMS certified
- Latest YAIM version configuring DENY tags has problems
 - New version being released with a quick fix.
- In other words the short term solution is not there yet.

- **Situation at the sites**

- All T1s deploy the FQAN VOVIEWS
 - Since 6 weeks at least.
 - Probably too aggressive approach (especially since the mechanism is broken...)
- Several T2s now deploy the FQAN VOVIEWS
 - Despite ATLAS asked explicitly NOT to!
 - Comes automatically if you run the latest YAIM out of the box.
- Several sites have lots of problems with local configuration
 - Mapping of right unix account with VOMS FQAN
- Still not clear if requested shares are really implemented
 - Very hard to test

Source: Simone Campana, [GDB 06/06/2007](#)

- Major new release
 - Delegation
 - Beta SRM 2.2 support
 - Performance and useability
 - Better monitoring of transfers
- **Scheduled upgrade – week of 18 June 2007**
- Tier-1 sites ~3 weeks afterwards
- SRM 2.2 / FTS integration ongoing on PPS

Déploiement
chez nous la
semaine du 9
juillet?

GDB: Grid Services Monitoring



Specifications

□ Probe Specification

- Defines how a fabric monitoring system can interact with probes that test grid services
- Simple text-based protocol (lightweight)
- Decouples grid probes from the specifics of the fabric monitoring system
- Allows for currently existing probes to be re-used by any monitoring system
 - SAM Tests
 - EGEE CE ROC Nagios testing
 - OSG Tests

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Grid Data Exchange Format

- Query interface for repositories to provide stored information to clients
- HTTP message based
 - Query parameters encoded in URL
 - Response is single XML message
- Based on SAM Query format
 - Either current status or history
 - Structured data is returned
 - E.g. all metrics gathered for a site, a VO, ...

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Source: James Casey, [GDB 06/06/2007](#)

GDB: Grid Services Monitoring (suite)



"The Nagios-based Prototype"

- ☐ How to make this real?
- ☐ Initially implement using one fabric monitoring system - Nagios
 - ... but architecture checked with LEMON developers
- ☐ Implement some of the site components
 - Configuration Generation
 - Certificate handling
 - Service Status Calculator
- ☐ Staged approach for integrating sensors

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- Jeu de sondes à exécuter sur tous les sites
- Référentiel avec le résultat des sondes avec une interface d'interrogation: opportunité pour le portail CIC
- Important de suivre ce travail

Source: James Casey, [GDB 06/06/2007](#)

GDB: Weekly Intervention Report



Week : 04-June-07 to 10-June-07

Service Interventions

Scheduled
Unscheduled
Extended Scheduled

Sites (T0/T1)	Monday 04-06-07	Tuesday 05-06-07	Wednesday 06-06-07	Thursday 07-06-07	Friday 08-06-07	Saturday 09-06-07	Sunday 10-06-07
CERN	SAM Failure (occasional)		SRM: intervention of Tape Library				
ASGC							
BNL							
CNAF							
FNAL							
FZK	Gridservices unavailable - NW problem				Network Interruption		
IN2P3		CIC Portal unavailable - Switchover	SRM down				
		SES degraded/ unavailable - HPSS problem					
NDGF	FTS offline - DB problem						

- Filtrage manuel (!) des messages EGEE Broadcast
- Opportunité pour le portail CIC: améliorer l'outil de broadcast pour permettre un filtrage automatique (par site, par type d'intervention, etc.)

Source: <https://twiki.cern.ch/twiki/pub/LCG/WLCGServiceLog/Weekly.htm>

- Finalisation de la publication correcte des VOViews et rôles/groups VOMS associés
 - Date cible: 15/06
- Tests de SRM v2.2 (dCache 1.8)
 - Problèmes de configuration actuellement
 - *Presque tous les sites dCache impactés*
- Rédaction des SLAs pour les VO Boxes
 - Deadline: fin mai 2007 (!)

- Consolidation des services de grille
- Etat de l'intégration à l'exploitation des services grille (suite)

► Prochaine réunion



- Point sur l'interface BQS pour gLite CE

► Questions/Commentaires

