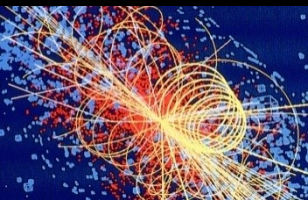


Installed Capacity

John Gordon
GDB, 6th April 2011, CERN

April GDB



Installed Capacity

- **9 (13) WLCG sites not publishing (Feb 11)**
- CSC (Finland)
- HEPHY-UIBK (Austria)
- IL-TAU-HEP (Israel)
- NO-NORGRID-T2 (Norway)
- Purdue-Rossmann (USA)
- Purdue-Steele (USA)
- RO-11-NIPNE (Romania)
- RU-Protvino-IHEP (Russia)
- RU-SPbSU (Russia)
- TECHNION-HEP (Israel)
- UFlorida-HPC (USA)
- WARSAW-EGEE (Poland)
- PragueLcg2 (Czech Republic)

Installed Capacity

- Still many sites 34(59) not publishing SHARE for the LHC VOs
- This is required to establish what fraction of the installed capacity is defined for the LHC VOs
- This may then be compared with the WLCG Pledges
- A report showing installed capacity per site will be sent to the April RRB

Country	Federation	Site Name	SUM
Austria	Austria Tier-2 Federation	HEPHY-UIBK	0
Austria	Austria Tier-2 Federation	Hephy-Vienna	0
Belgium	Belgian Tier-2 Federation	BEgrid-ULB-VUB	0
Belgium	Belgian Tier-2 Federation	BelGrid-UCL	0
Brazil	SPRACE, Sao Paulo	GridUNESP_CENTRAL	0
Brazil	SPRACE, Sao Paulo	SPRACE	0
Czech Republic	FZU AS, Prague	prague_cesnet_lcg2	0
Estonia	NICPB, Tallinn	T2_Estonia	0
Finland	NDGF/HIP Tier2	CSC	0
France	CC-IN2P3 AF	IN2P3-CC-T2	0
Germany	ATLAS Federation DESY	DESY-HH	0
Germany	CMS Federation DESY RWTH Aachen	DESY-HH	0
Germany	GSI, Darmstadt	GSI-LCG2	0
Germany	ATLAS Federation, Munich	LRZ-LMU	0
Germany	ATLAS Federation, Munich	MPPMU	0
Germany	ATLAS Federation FR/W	UNI-FREIBURG	0
India	TIFR, Mumbai	INDIACMS-TIFR	0
Israel	IL-HEP Tier-2 Federation	IL-TAU-HEP	0
Israel	IL-HEP Tier-2 Federation	WEIZMANN-LCG2	0
Pakistan	Pakistan Tier-2 Federation	PAKGRID-LCG2	0
Poland	Polish Tier-2 Federation	PSNC	0
Poland	Polish Tier-2 Federation	WARSAW-EGEE	0
Republic of Korea	CHEP of KNU, Daegu	LCG_KNU	0
Romania	Romanian Tier-2 Federation	RO-02-NIPNE	0
Romania	Romanian Tier-2 Federation	RO-16-UAIC	0
Russian Federation	Russian Data-Intensive GRID	RRC-KI	0
Russian Federation	Russian Data-Intensive GRID	ru-Moscow-MEPHI-LCG2	0
Russian Federation	Russian Data-Intensive GRID	RU-SPbSU	0
Russian Federation	Russian Data-Intensive GRID	RU-Troitsk-INR-LCG2	0
Sweden	SNIC Tier-2	SE-SNIC-T2	0
UK	SouthGrid	EFDA-JET	0
UK	London Tier 2	UKI-LT2-QMUL	0

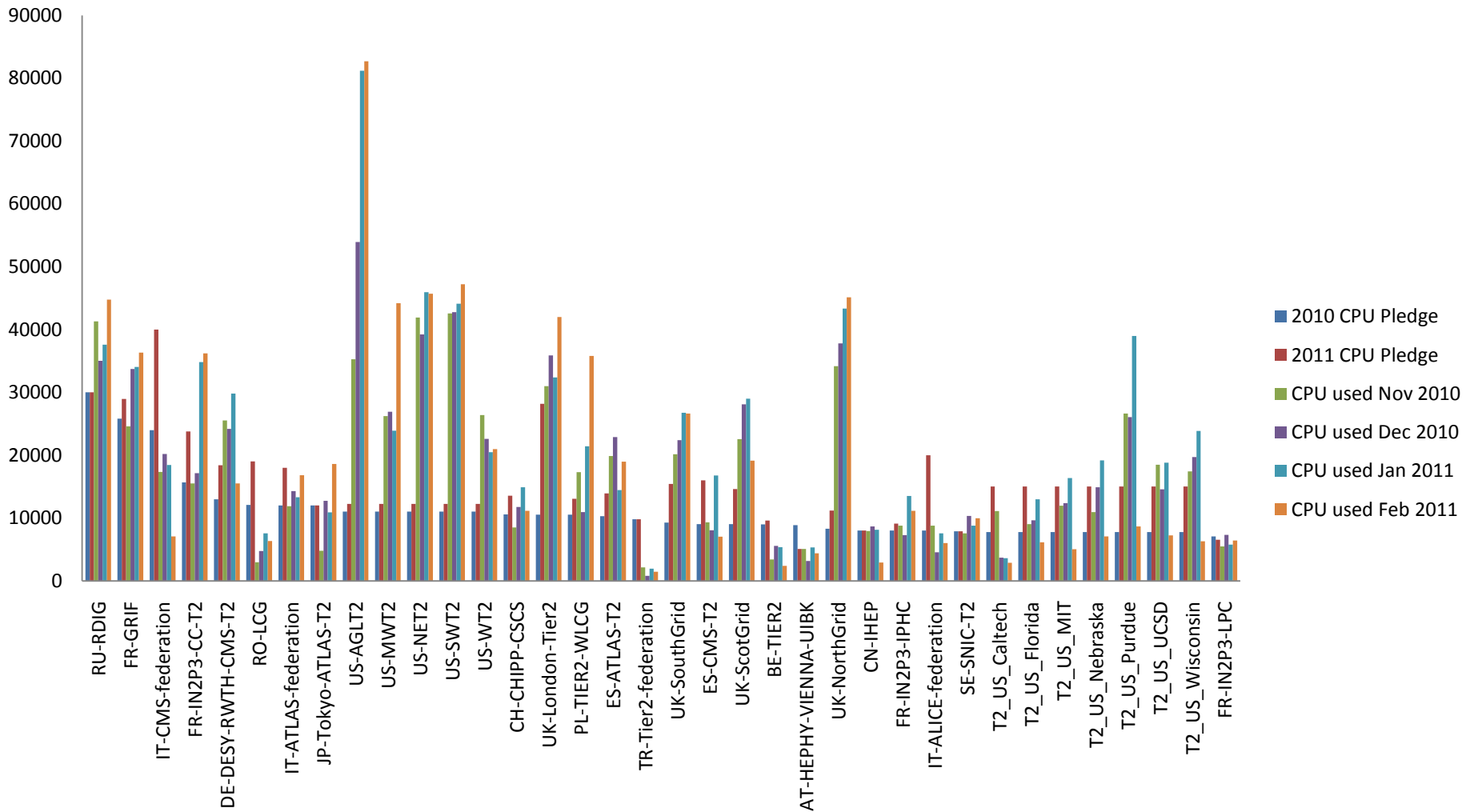
Ukrainian Tier-2 Federation	UA-Tier2-Federation	0
Northeast ATLAS T2	HU_ATLAS_Tier2	0

Installed Capacity Report

- Real March Accounting data
(although since I downloaded on 1 April there may be some data still in the pipeline)
- March pledges taken from the Accounting Portal.
- Format of T2 Monthly Accounting Report.
- I have then added two columns to the right. The first shows for each site the total installed capacity for LHC taken from the shares collected by REBUS.
- This is then totalled for each T2 federation.
Zero probably means the site is not publishing shares.
- The second new column shows for each T2 Federation, the LHC installed capacity as a percentage of pledge.

COUNTRY	FEDERATION	2010 CPU Pledge (KSI2K)	pledge inc. efficiency (KSI2K-Hrs)	SITE	Usage (norm HS06 Hours)					Installed HS06			
					alice	atlas	cms	lhcb	Total	delivered as % of pledge	Total LHC	Installed as % of Pledge	
Australia	AU-ATLAS			Australia-ATLAS	0	443756	0	0	443756		635		
		2,500	1,008,000	Total	0	443756	0	0	443756	39.76	635	25.38%	
				WallClock		506348			506348				
Austria	AT-HEPHY-VIENNA-UIBK			HEPHY-UIBK	0	0	0	0	0		-		
Austria	AT-HEPHY-VIENNA-UIBK			Hephy-Vienna	0	0	1464024	0	1464024		-		
		8,850	3,568,320	Total	0	0	1464024	0	1464024	37.06	-	0.00%	
				WallClock			1663212		1663212				
Belgium	BE-TIER2			BEgrid-ULB-VUB	0	0	0	0	0		-		
Belgium	BE-TIER2			BelGrid-UCL	0	0	0	0	0		-		
		9,000	3,628,800	Total	0	0	0	0	0		-	0.00%	
				WallClock					0				
Brazil	BR-SP-SPRACE			GridUNESP_CENTRAL	0	0	0	0	0		-		
Brazil	BR-SP-SPRACE			SPRACE	0	0	152008	0	152008		-		
		3,200	1,290,240	Total	0	0	152008	0	152008	10.64	-	0.00%	
				WallClock	552	384	600188		601124				
Canada	CA-EAST-T2			CA-McGill-CLUMEQ-T2	0	0	0	0	0		1,710		
Canada	CA-EAST-T2			CA-SCINET-T2	0	3159560	0	0	3159560		5,360		
		5,760	2,322,432	Total	0	3159560	0	0	3159560	122.88	7,070	122.74%	
				WallClock		3986056			3986056				
Canada	CA-WEST-T2			CA-ALBERTA-WESTGRID-T2	0	816168	0	0	816168		1,710		
Canada	CA-WEST-T2			CA-VICTORIA-WESTGRID-T2	0	1704988	0	0	1704988		1,816		
Canada	CA-WEST-T2			SFU-LCG2	0	1641496	0	0	1641496		1,990		
		5,760	2,322,432	Total	0	4162652	0	0	4162652	161.89	5,516	95.76%	
				WallClock		4631180			4631180				
China	CN-IHEP			BEIJING-LCG2	0	850464	360216	0	1210680		8,885		
		8,000	3,225,600	Total	0	850464	360216	0	1210680	33.90	8,885	111.06%	
				WallClock		971284	383056		1354340				
Czech Republic	CZ-Prague-T2			prague1cg2	892640	1881592	0	0	2774232		9,529		
	12 th October 2010				Sue.Foffano@cern.ch							6	
		5,900	2,378,880	Total	892640	1881592	0	0	2774232	105.33	9,529	161.50%	
				WallClock	2305788	2058308			4364096				

Tier-2 Federations with 2010 CPU pledge >7000 HS06



Quality

- So most sites are now publishing installed capacity and shares
- But can we believe the data?
- http://w3.hepix.org/benchmarks/doku.php?id=bench:results_sl5_x86_64_gcc_412

Core/cpu?

Site	cpu	core	HS06	core/cpu	HS06/core
ifae	30	360	4950	12.00	13.75
IL-TAU-HEP	34	272	0	8.00	0.00
TECHNION-HEP	34	272	0	8.00	0.00
INDIACMS-TIFR	48	382	28778	7.96	75.34
UKI-NORTHGRID-LANCS-HEP	292	2323	28421	7.96	12.23
MPPMU	126	896	12992	7.11	14.50
T2_Estonia	63	404	54994	6.41	136.12
praguelcg2	310	1923	15881	6.20	8.26
CSCS-LCG2	253	1525	14565	6.03	9.55
AGLT2	670	4002	36380	5.97	9.09
Purdue-Rossmann	716	4249	0	5.93	0.00
RO-07-NIPNE	90	529	4020	5.88	7.60
INFN-MILANO-ATLASC	77	446	3628	5.79	8.13
DESY-HH	736	4232	33941	5.75	8.02
IN2P3-CC-T2	451	2534	21792	5.62	8.60
INFN-ROMA1	120	664	5365	5.53	8.08
UKI-SOUTHGRID-BHAM-HEP	72	384	3368	5.33	8.77
INFN-FRASCATI	32	168	1341	5.25	7.98
IN2P3-IRES	288	1504	13536	5.22	9.00
CA-ALBERTA-WESTGRID-					

88	456	4275	5.18	9.38
1020	5104	52571	5.00	10.30



Site	cpu	core	HS06		core/cpu	HS06/core
NDGF-T1	11185	11185	102398	3338455	1.00	9.15
SE-SNIC-T2	1433	1433	7489	1593747	1.00	5.23
NO-NORGRID-T2	5432	5432	27893	68428	1.00	5.13
MIT_CMS	2917	2917	7760	570000	1.00	2.66
ELTE	44	56	175	78	1.27	3.13
UKI-NORTHGRID-SHEF-HEP	300	400	4800	297506	1.33	12.00
UCSDT2	897	1209	7760	570000	1.35	6.42
UTA_SWT2	315	518	10707	39000	1.64	20.67
BelGrid-UCL	353	631	3373	184879	1.79	5.35
ru-PNPI	211	390	3657	140009	1.85	9.38
TR-03-METU	320	596	3762	206568	1.86	6.31
TR-10-ULAKBIM	320	603	3783	1585997	1.88	6.27
SPRACE	160	303	2630	120000	1.89	8.68
UFlorida-PG	252	493	7760	570000	1.96	15.74

HS06/core

Site	cpu	core	HS06	core/cpu	HS06/core
T2_Estonia	63	404	54994	6.41	136.12
WEIZMANN-LCG2	124	496	54560	4.00	110.00
INDIACMS-TIFR	48	382	28778	7.96	75.34
MWT2_IU	80	160	9503	2.00	59.39
KR-KISTI-GCRT-01	114	492	11234	4.32	22.83
IN-DAE-VECC-02	94	220	4737	2.34	21.53
UTA_SWT2	315	518	10707	1.64	20.67
UFlorida-PG	252	493	7760	1.96	15.74
UKI-NORTHGRID-LIV-HEP	133	544	8174	4.09	15.03
ITEP	72	208	3052	2.89	14.67
MPPMU	126	896	12992	7.11	14.50
TOKYO-LCG2	288	1152	16531	4.00	14.35
ifae	30	360	4950	12.00	13.75
CA-VICTORIA-WESTGRID-T2	84	336	4539	4.00	13.51
CA-SCINET-T2	268	1072	13400	4.00	12.50
UKI-SOUTHGRID-BRIS-HEP	37	149	1848	4.03	12.40
UKI-NORTHGRID-LANCS-HEP	292	2323	28421	7.96	12.23
NCP-LCG2	106	524	6365	4.94	12.15
UKI-NORTHGRID-SHEF-HEP	300	400	4800	1.33	12.00



Next

- ALL sites to publish
- Check your data
- Feedback from RRB
 - Report and data
- Automate report