



GridPP

UK Computing for Particle Physics

HEPiX Summary Spring 2014 - Annecy

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Science & Technology
Facilities Council

- 105 registered participants
- 43 different affiliations
- 71 presentations
 - Scheduled time: 26 hours and 50 minutes

- Site Reports
- IT end-user services and Operating Systems
- Basic IT services
- Computing and Batch Systems
- Security and Networking
- IT Facilities and business continuity
- Storage and File Systems
- Grids, Clouds, Virtualisation

- Scientific Linux - 10th anniversary
- History of Scientific Linux (Silverman)
- CentOS and Red Hat (Karanbir Singh, CentOS)
 - History of CentOS and details of the Red Hat / CentOS 'merger'
- SL Status, Futures
 - Coming: SL 5.11, SL6.6, SL7 in some form
- Next Linux @ CERN
 - Prefer to adopt CentOS
- Issue tracking and version control @ CERN
 - CVS closed, SVN now main service. Git service available
- Windows 8 Integration @ CERN
 - 8.1 is the real launch of Windows 8

Scientific Linux (2)

- Very constructive discussion on Tuesday with Connie Sieh, Jarek Polok, Tim Bell, Helge Meinhard
 - CentOS still not stable enough - too early to take firm decisions on SL
 - HEP should try and participate in CentOS discussions and decisions
 - Launch Scientific SIG with contributions by (at least) FNAL and CERN
 - Each team to build respective SL release when RHEL 7/CentOS 7 get released
 - Both teams to observe and maintain active dialogue
 - Review of situation, possibly decision at fall HEPiX meeting

- Puppet, Agile Infrastructure
- Managing Secrets (DESY)
- Agile Infrastructure Monitoring @ CERN
 - Using Flume to transport data to ElasticSearch/Kibana
- From Quattor to Puppet, T2 PoV
 - Migration of GRIF T2 -> Puppet
- Quattor Update (Collier)
- Cluster Consolidation at NERSC
 - Using xCat, Cfengine3 and various NERSC-developed tools

- Batch System Review (Jouvin)
 - Report on pre-GDB in March 2014.
 - Review of five common batch systems
- Future of Batch Processing at CERN
 - Report on their testing of HTCondor
- The Art of Running HTCondor as a batch system: Bockelman
 - A.K.A: 'Ten HTCondor Features You Should Know.'
- Support for Linux Control Groups: Daniel Gruber (Univa)
- Scheduling of multicore jobs (LHCb)
 - Predicting MC job throughput using past performance
- Ivy Bridge v Opteron: performance and power implications: Wong
- Benchmarking
 - activity starting again, experiment participation assured
 - Work to select typical applications starting
 - Will consider benchmark candidates when SPEC CPU2014 released

- IPv6 Deployment at FZY Prague
- IPv6 in UK (Walker)
- WLCG perfSONAR-PS update
- Measuring WLCG data streams at batch level
 - Report on PhD work, based on UGE
- Emergency Suspension list in WLCG (Brillault)
- New Windows security at CEA and IRFU
 - Nightmare scenario!
- Security Update
 - More problems to worry about

- Please attend pre-GDB on IPv6 in June

- **OpenCompute @ CERN**
 - Review of OpenCompute hardware
- **Shared datacentre at Orsay University**
 - based on the P2IO initiative
- **Update on Wigner Datacentre**
- **Lesson Learned After Our Recent Cooling Problem: Chierici**
 - Interesting talk about an incident at CNAF
- **Business Continuity @ DESY**

- Batch System data locality via managed caches (KIT)
- CEPH @ CERN one year on
- CEPH @ UK Tier 1
- Update on CERN Tape System
- DESY Big Data Cloud Service
- Bit Preservation WG

- **Big Data Transfer over Internet (Shevel)**
 - Russian research project to work out how to achieve the maximum data transfer speeds (for some definition of) over the internet
- **FermiCloud On-demand Services (Timm)**
- **RAL Tier1 Cloud and Virtualisation (Collier)**
 - Tier1 activities
- **Enabling multi-cloud resources at CERN within the Helix Nebula project: Giordano**
- **Experiences with ATLAS and LHCb jobs in Vac virtual machines: McNab**

- New HEPiX website under construction (@DESY)
 - Aim to release 30/06.
- HEPiX net presence moved from CASPUR to INFN
- Next Meetings
 - Fall 2014: University of Nebraska-Lincoln, USA
 - 13-17 October
 - Spring 2015: University of Oxford, UK
 - 23-27 March
 - May swap European/North America rotation

- CEPH
- HTCondor
- IPv6