

Hardware/Sysadmin/Puppet February 27, 2024

- Procurement:
 - CMS and FermiGrid worker nodes (79 CMS, 21 FermiGrid) installed, getting added to production.
 - 25 CMS tape dCache servers (NVMe SSD storage) turned over to SSA.
 - Disk storage:
 - 100 CMS servers (dCache and EOS) turned over to SSA.
 - 25 servers for public dCache and Ceph turned over to SSA.
 - 13 GPU servers:
 - 2 for Wilson Cluster are done.
 - 2 for FermiGrid in progress.
 - 9 for EAF in progress.
 - 28 General CMS servers in progress.
- Networking:
 - Working with network services to investigate odd problem where servers lose IPv6 connections, after they'd worked for some time.
 - Still hope to make all 10 and 100 Gb/s connections use jumbo frames, MTU 9000. (Many do now, but not uniformly.)
- Puppet: Gradually moving to Puppet 8
- HPC: A few lingering InfiniBand issues in Wilson Cluster
- Upgrading from SL7
 - Status:

OS version	SL7	EL8	EL9
# nodes	1863	669	736

Other Activities

- OKD
 - Adding two additional hosts to increase capacity
 - Improvements to monitoring
 - Detailed monitoring of firewall rules in OKD VMs
 - Monitoring MTU in OKD VMs
 - Installing new GPU servers
 - IPMI not working, which is critical. Working on it.
- Harbor container registry
 - Two more nodes upgraded to EL9
- Proxmox/RHV/GPCF/CMS LPC interactive nodes
 - Adding two more hosts to the cluster to increase capacity
- Miscellaneous
 - More tickets than usual last week
 - Large downtime Wednesday had some problems, which were resolved but affected EAF and other services depending on SSI Ceph. Everything was resolved on Wednesday.
 - Last experiments on the schedule migrated from NAS to Ceph; however, many other NAS mounts remain to be decommissioned. This is primarily being driven by Andy Romero, but we are helping.
 - Troubleshooting a very strange problem with unusual IPv6 routing failures. Working with Networking.
- SL7 Upgrades
 - ssiregistry04 upgraded to Alma 9
 - imageregistry02 upgraded to Alma 9
 - installed sbndbuild02 with Alma 9
 - installed lssrv11/12 with Alma 9 (Landscape)
 - ailab01 upgraded to Alma 9
 - lqlogin1 upgraded to Alma 8
 - cmsosgce to Alma 9
 - cmsspare-f-{1701,1901,2001,2002,2003} to Alma 9
 - cmssrv{2312,2313,2314} to Alma 9
 - cmsstor{111,112,213,214,407} to Alma 9
 - 80 new CMS LPC VM (Alma 8 and Alma 9) installs are in progress. Waiting for DNS requests to proceed.
- Installs/Moves/Retirements
 - Reinstalled cmslpc203/208/210 to modify disk partitioning
 - Retired hepcgitgpvm03

- cmsrv{2401-2428} prepped for OS install
- Installed fnpcg2401/2402 (New GPU nodes)

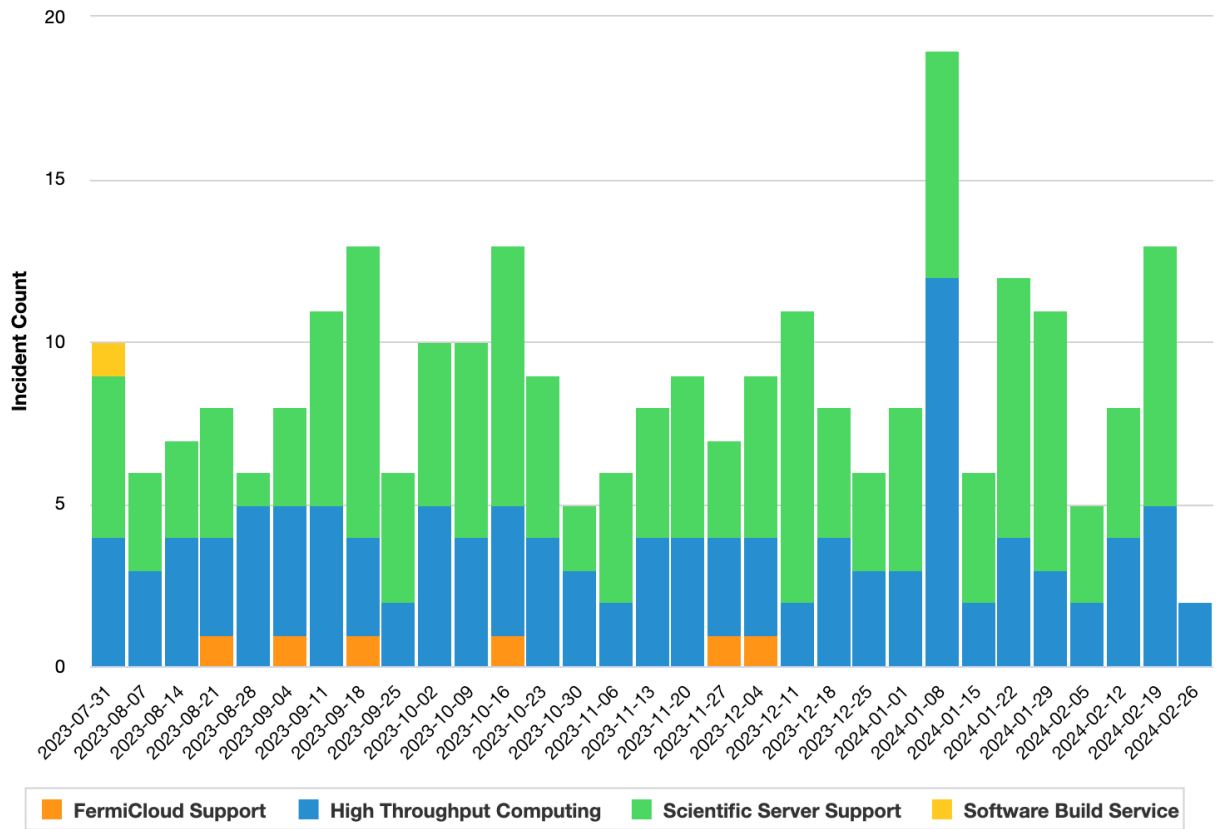
- Normal operations: 94 logged interventions last 3 weeks—replacing disks, rebooting hung systems, fixing corrupt RPM databases, retiring systems, fixing xinetd issues, clearing caches, fixing hung NFS mounts, fixing Puppet errors, etc.

HPC (High Performance & Parallel Computing

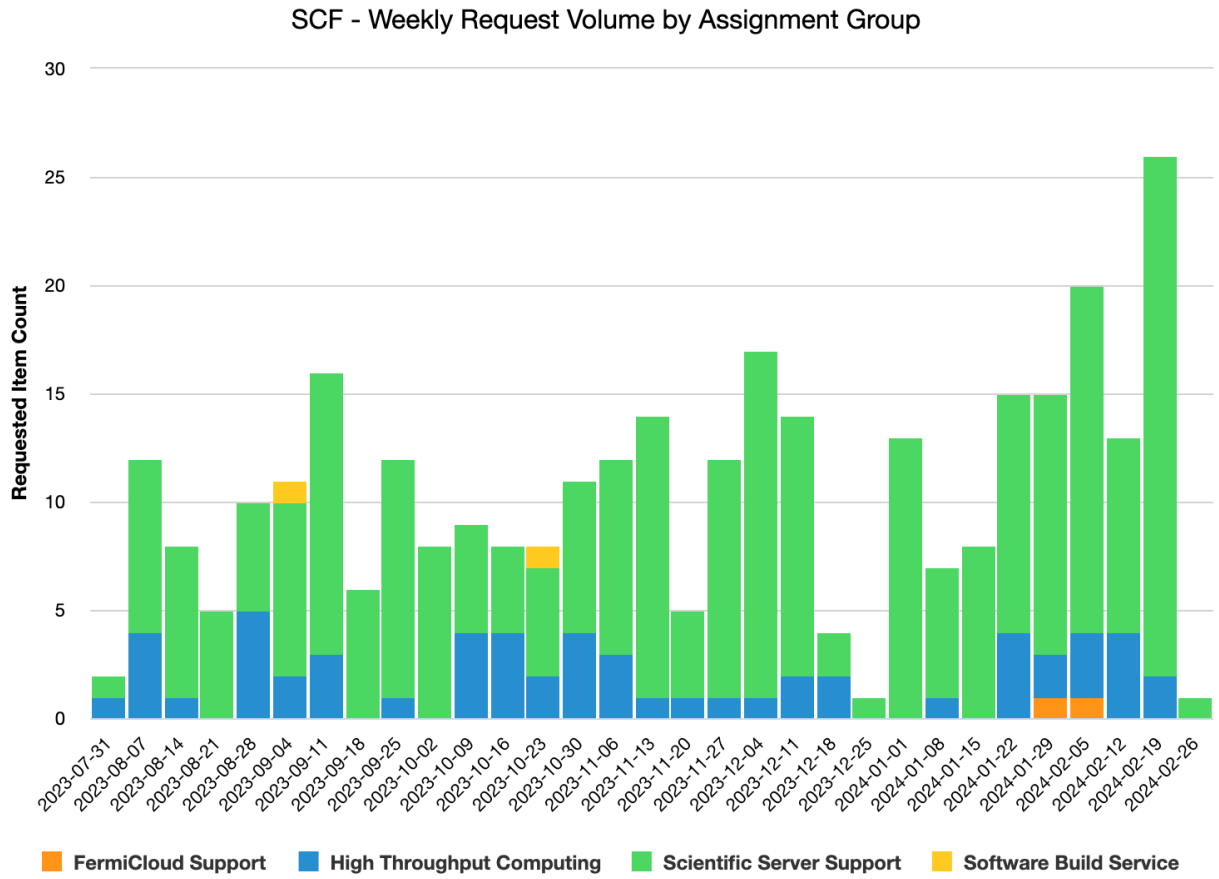
- Steady running.

Incidents

SCF - Weekly Incident Volume by Assignment Group



Requests



Ticket Trend

