Services and Tools Activity Summary

Staff news
- Dmitry Arkhipkin joined our team (6/1)
- New opening: https://jobs.bnl.gov/job/upton/technology-architect/3437/27638567920

Storage / dCache support (RT support**)**
- **ATLAS**
    - **Upgraded ATLAS instance 7.2.16 (05/17/22 9:00-13:00)**
    - Completed Endit monitoring script, which has been deployed in pool hosts that are enabled Endit services
        - The monitoring will restart Endit service once probing endit is not working well
        - Probe Endit service every 5 minutes
    - **Lustre / dcache testbed for ATLAS (**Total size: 5PB + 5PB)
        - Evaluation is undergoing smoothly
            - Completed functional testing, satisfying the requirements of ATLAS RSE
            - Stress performance shows we reach some overall input peak at 26GB/s, which is close to saturate the network bandwidth
                - USATLAS→Lustre, Lustre ←→BNLHPC
                - Some errors happen, most of them are related to checksum issue
            - Close interaction with (OSG) Xrootd development team
- **DUNE dCache**
    - Troubleshoot WRITE/READ issues for external clients to the dCache instance via XROOTD
        - DUNE pools are not accessible to external clients
        - dCache Xrootd troubleshooting two issues related with IPV6, reported to dCache github:
            - Xootd IPV6 transfer fails with (General problem: Unable to find address that faces lxplus730.cern.ch/2001:1458:d00:12:0:0:0:270 [666]) (source)
                - Issue is not longer observed after dcdn001 is enabled with IPV6 capability (IPV6 enabled 05/19/22)
    - Alternative configuration identified to overcome external WRITE/READs using DMZ pools

- ■ Applied to /pnfs/sdcc.bnl.gov/data/dune/ (05/12/22)

Storage / BNLBOX
- Upgraded to latest release of Nextcloud Hub 24 - numerous performance enhancements and feature updates
- Updated BNLBox theme information following Nextcloud upgrade 6/1

General Web Services
- US-ATLAS([RT support](#)):
  - Weekly meeting with Data Art 5/31
    - ■ Currently no extension in place, contract set to expire 7/1
    - ■ US-ATLAS may place Data Art on retainer for 4 months to assist with outstanding issues and smooth transition to SDCC maintenance of site
  - Working with Data Art on outstanding issues related to website — deployments ongoing to resolve outstanding issues
  - Doing QA with Louis P. on staging to assist Data Art during the last mile
  - Data Art configuration files should track with status on production now; we also have the capability to ignore configuration files in future deployments now
  - Following meeting with stakeholders yesterday, modified Events view to pull in events from the correct Indico feeds and categorize them correctly; have contributed config changes back to Data Art to be rolled into future deployments from them
  - Next meeting with Data Art 6/7
- SDCC Website:
  - Collating and incorporating feedback to design changes from team leaders and Charity Plata/CSI; will set up focus group with new technical users in coming weeks
- STAR:
  - Drupal website - new Hard Probes Physics Working Group added, conveners assigned, publication workflow permissions updated accordingly.

Experiment support activities

- STAR
  - database servers patching and node update is ~90% complete (101/114 instances patched). The remaining servers are mostly master DBs that require experiment-coordinated downtime periods - to be completed in about two weeks.
- EICUG (Electron-Ion Collider User Group)
    - Request to implement the IB representative notifications feature (EICUG PhoneBook) to allow annual record-keeping updates - to be implemented by mid-June.
- NSLS2
  - Completed the Lustre MDS and OSS upgrade with Tejas from 2.12.2 to 2.12.8 to fix a Lustre bug
    - https://jira.whamcloud.com/browse/LU-11613
  - Puppetized the selective mount requested from NSLS2 for SFTP and Globus services instead of mounting all directories (sftp1,sftp2,dtn1 nodes)
    - RT tickets: #34192, #34268
  - Setup a MySQL database for NSLS2 user
    - RT tickets: #34188
  - Created 3 vhosts and configured in reverse proxy in proxy 2(RT tickets: #34296)
    - Add puppet code to configure in proxy2 and websockets configuration as well