

Tuesday Dec 19th, 2023 (06:00 – 21:00) Maintenance Window

- What network connectivity will be lost on December 19th?
 - Internet, WAN and Campus connectivity from both Science DMZ and Science Zone (SDCC Facility) will be down starting at 06:30. **Please notify collaborations the facility will be down for the majority of the maintenance window.** Although network connectivity should be restored prior to 21:00, we would like to reserve the entire window just incase we run into any issues.
 - If all goes well Internet/WAN connectivity to the Science DMZ and Science Zone should be restored around 11:00.
 - **NOTE:** Connectivity from the below subnets will be completely down starting at 06:30 while routing and default gateways are moved from 515 to 725 Science Cores/Science DMZ. Internal connectivity will hopefully be restored at 11:00 as well.

SDCC Services	Science DMZ
130.199.6.0/24	10.43.1.0/24
130.199.48.0/24	10.43.2.0/24
130.199.148.0/24	192.12.15.0/24 - 2620:0:210:1::2/64
130.199.180.0/24	192.33.128.0/24 - 2620:0:210:2::/64
130.199.185.0/24	198.125.208.0/26 - 2001:400:6410:3::/64
10.42.34.0/24	198.125.208.64/27
10.42.43.0/24	198.125.209.0/26 - 2001:400:6410:2::/64
10.42.44.0/24	198.125.209.64/26 - 2001:400:6410:4::/64
10.42.45.0/24	198.125.210.0/25 - 2001:400:6410:5::/64

Tuesday Dec 19th, 2023 (06:00 – 21:00) Maintenance Window Timeline

Thursday Dec 14th, 2023

- 09:00
 - Migration of secondary HTSN firewall from 515 to 725. During this timeframe we will upgrade the firmware along with reconfiguring the firewall for the new 100G line cards.
 - This will leave the facility in an “at risk” state while operating on a single firewall until the Dec 19th maintenance has completed.

Tuesday Dec 19th, 2023

- 06:00 – 06:30
 - Migrate all hosts off s707/s708 (EoL) and onto new 515 science core services block.
 - Inv[01-02], phnxdbrcf[1,2,4,5,7], phnxcare[03-04], dockerhub and infvmm[00-08].
- 06:30 – 09:00
 - Migrate Science Core Services subnets (listed on previous page) from 515 to 725 Science Core.
 - Disconnect 515 Firewall and connect newly configured 725 Firewall.
 - Migrate Network Perimeter connectivity to 725 Science DMZ (Moving from native 100GbE to 400GbE, total capacity of 1.6Tbps).
 - Migrate EBGP routing and subnet gateways from 515 to 725 Science DMZ.
 - Enable Multi-Agent protocols and upgrade firmware on 725 Science DMZ.
- 09:00 – 11:00
 - Move 515 Firewall to 725 and reconfigure and rejoin firewall to cluster.
 - Configure additional SDCC public address space to be utilized in Science Zone. New subnets are 130.199.187.0/24, 130.199.188.0/24, 130.199.190.0/23 and 130.199.192.0/21

Tuesday Dec 19th, 2023 (06:00 – 21:00) Maintenance Window Timeline

Timeline (Continue):

- 12:00 – 18:00
 - (NOC) Firmware upgrades for primary network aggregation switches. These devices are all redundant and shouldn't impact internal connectivity.
 - B.515 Spine, Storage Core and Science Core
 - B.725 Spine, Storage Core, Science Core and Science Core Services Switches.
 - Work on cleaning up documentation and monitoring tools (Spectrum, SevOne, Cacti, etc.)
- 18:00 – 20:00
 - Migration of Network Perimeter WAN circuits to 2x(2x400GbE). Each Network Perimeter router will be upgraded one at a time, so no Internet/WAN outage is expected for the BNL site.
 - Migrate NR0725-906 WAN circuit.
 - Migrate NR0515-905 WAN circuit.
 - Migrate NR0515-905 Esnet v6 peering to new address
- 20:00 – 21:00
 - Correct Network Perimeter documentation and monitoring tools (Spectrum, SevOne, Cacti, etc.)