9/22
Used my recently-appointed powers for the first time today, got the "talk" package up and running on the server.
*Note: "talk" was installed, but "talk-server" was not. Both are necessary for proper function.

9/27
Issue with no jobs running with idle nodes, looked into it. After condor_q -analyze and -better-analyze, turned out the jobs had resource requirements that were not being met, likely due to the switch-over to the 10 Gb setup.

/opt/condor/etc/condor_config.local is the machine-specific local config file for each host
/mnt/nas0/condor/condor-etc/condor_config.cluster is where above config.local pulls from.

9/28
PROBLEMS! The SE is running on 2 public addresses, and default is the old one (when pinged).
Command to use: rocks remove host interface dev-0-0 iface=eth1 (163.118.206.162) FIXED.

10/2
Submission of new jobs on condor is successful, went back to check after the "failure" on the 28th, that job must've ran too fast for us to see it.
*Note: when in doubt, check condor_history.

10/4
Looking into OSG logs to see if anything pops out as to why it can't authenticate on the cluster. Investigation got to the /opt/osg/globus/var/globus-gatekeeper.log log file.

Just realized that rocks has uscms1 public (eth2) gateway set to 163.118.42.126, whereas it should be 163.118.42.127.
Command to use: rocks set host interface gateway uscms1 iface=eth2 163.118.42.127 FIXED.
This did not fix the client error. However, at least we know rocks is now configured properly.

10/5
Concerning the GRAM error: documentation online (http://vdt.cs.wisc.edu/tmp/jobs_not_running_admin.html) suggested checking /etc/grid-security/grid-mapfile to see if the authorized user (/DC=org/DC=doegrids/OU=Services/CN=http/uscms1.fltech-grid3.fit.edu) of the failing occurrence was listed. Said user was not listed. As such, looking into GUMS.

*Note: in /opt/osg/globus/etc/globus-job-manager.conf, the user is -
/DC=org/DC=doegrids/OU=Services/CN=uscms1.fltech-grid3.fit.edu.

10/12
Found grid-mapfile-local! It's tucked away in /etc/grid-security, not sure why I didn't see it before... Regardless, contains:

"/DC=org/DC=doegrids/OU=People/CN=Patrick Ford 571150" uscms01

"/DC=org/DC=doegrids/OU=Services/CN=uscms1.fltech-grid3.fit.edu" rsvuser

Idea: change Patrick to JLF, as she's the new cert holder, so "Patrick Ford 571150" → "Johanna-Laina Fischer 131160"
Haven't implemented yet, going to check elsewhere first.
-modified rsvuser line, added rsv/ to location line, also didn't help.
Since GUMS runs off the grid-mapfile, we *could* go in manually and edit the grid-mapfile if necessary.

10/16

Finished wiring for the lower UPS, used 10-gauge wiring from Tedco Electronics and crimp-able F2 connectors from Radio Shack. New configuration logged on power spreadsheet. Need to verify Nas1's wattage consumption and the per-node idle amperage consumption.

*Note: Tripplite says those two UPS are programmable for the 8 switched outlets, look into this once everything else is smoothed out. This may contain some sort of weekly self-test too, probably a good idea to work that somehow.

10/18

Finished wiring for upper UPS, running smoothly as well. Just waiting on the battery pack for the APC UPS, once that's in we'll take down the cluster, do a final re-route, and be done with it all! Should change batteries in 3-4 years.

Been reading through Patrick's GUMS config stuff, perhaps JLF's DN didn't get added to the gums admin stuff? Need to figure out how to load a cert into a browser so I can access the :8443 port properly...

10/23

Everything has been appropriately routed and numbers checked. New configuration is on the power spreadsheet, to be uploaded asap with battery backup documentation to the FLTECH wiki.

11/9

Finally made headway on the GRAM authentication error: turns out the rsv accounts didn't exist on GUMS, had to re-make them (a rather easy process, described in Patrick's GUMS installation documentation, pg. 5). GRAM is now authenticating, although there appear to still be a few mapping issues, and OSG is unable to execute globus-job-run, error code 22.

osg can't create things on the server, I suspect the error means no home directory, but I have no idea how to fix that

just found an old IP in /opt/osg-1.2/globus/var/globus-condor.log, need to find out where they were generated
Old IP is 163.118.206.157, switched to new IP 163.118.42.127
Assumed the old IP's might be in globus-fork.log as well, but it isn't in a readable format (a string of numbers/symbols)...
Before I forget: if the log change doesn't work, the reason the jobs are failing is because they're being directed to an old address. HAVE to find where the hell that log is coming from (somewhere in /opt/osg/globus, but not in etc, the .conf file only says where the log is). Whatever uses that log has that old IP as a param.

Also just found a power shutdown script in /opt/Tripplite/PowerAlert

11/15

Major progress today. RSV has been holding, got a solution from hypernews, turns out the lack of home directories is due to a NAGIOS config issue, JLF fixed it (see her docu for details). Green across the board for OSG RSV status on the CE.

Condor, Ganglia, and GUMS all had issues post NAGIOS fix, but seem to have stabilized after a few restarts and some time. Currently receiving rsv jobs and “mis” jobs, whatever those may be. Will keep on alert tonight for glow/osg/uscms01 jobs as well, but JLF believes we may still have a glidein error that is preventing them from contact. Other possibility is that OSG has yet to update our new IP in their systems, such that they are in error.

11/16

Still receiving minor errors, hence no new jobs (error 73 from job manager, docu says it's a firewall issue).
In /etc/hosts on the SE, changing: line 5 → 10.1.1.230 to 10.255.255.230, as it is in rocks on the CE
line 6 → 163.118.42.3 to 10.255.255.251, as it is in rocks on the CE
moving line 7 to position of line 4, as per docu recommendation
Above had no effect.
In SE:/sandbox/squid/frontier-cache/squid/etc/squid.conf, editing line 601 at 3:12 a.m. EST 11/16/2012:
10.255.255.255/255.255.255.0 → 10.255.255.255/255.0.0.0, as it is in ifconfig on CE

11/21

Just had a sudden realization; in file /etc/sysconfig/iptables, we had eth1 in a forwarding line (line 35), but in the bit 10 Gbit switch we moved from eth1 to eth2. Line 48 had eth1 as well, moved both lines from eth1 to eth2. Unfortunately, this did not solve the issue.

11/29

After a vdt/OSG update, PRIMA seems to be having issues, MyOSG can no longer speak with us (nobody is authorizing as per GUMS being down).