Revamp of High Energy Physics Laboratory's Computer Systems

Josef Bostik Eric Pereira Ryan Wojtyla

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Milestone 4

GEM Computers

Compute Cluster

Muon Tomography Station

Existing MTS

Development MTS

Milestone 5 Goals



Milestone 4 Progress

Milestone 4 Goals

GEM Computers

Compute Cluster

Muon Tomography Station Existing MTS

Milestone 5

Task	% Completion	Eric	Josef	Ryan	To Do	
Integrate cluster components.	0%	0%	0%	0%	find new solutions	
Rewire the existing MTS.	90%	70%	20%	0%	miscellaneous touch ups	
Resolve software issues with development MTS.	60%	0%	40%	20%	reinstall AMORE	

GEM Computers

Milestone 4

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Development MT!

Milestone 5 Goals

- Attempted to save Truth PC
- Checked computers RAID systems
- Adjusted drivers on multiple computers
- Assist GEM Team with programming issues.

Compute Cluster

- Milestone 4 Goals
- GEM Computers
- Compute Cluster
- Muon Tomography Station Existing MTS
- Milestone 5 Goals

- Ideally:
 - Node boots into ROCKS Kernel CD
 - Node notifies head node of its existence
 - Node requests kickstart file from head node

- In Reality:
 - Node boots into ROCKS Kernel CD
 - Node notifies head node as soon as networking is enabled within the installer
 - In what state does the node request a kickstart file?

Existing MTS

Milestone 4

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Milestone ! Goals

- Cable lengths have been optimized
- Cables have been tidied up
- Still waiting on FEC firmware

Development MTS

- Milestone 4
- GEM Computer
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- Milestone 5
- Questions

- Attempted a reinstall of ROOT and AMORE to help solve issues
- Reinstallation of ROOT solved ROOT problems
- Tried to reinstall AMORE only to find that its repository has been decommissioned and AMORE no longer supported
- Fortunately, we are in communication with former lab member who has access to the AMORE source on CERN's private GitHub

Milestone 5 Goals

Milestone 4 Goals

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Milestone 5 Goals

Task		Josef	Ryan
Continue to Care for Existing MTS		20%	20%
Compile Instructions for MTS Operation		40%	40%
Prepare Development MTS Machine		50%	30%
Integrate Nodes into Cluster		10%	80%
Assist Researchers		10%	20%

Questions

Milestone 4

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