

Kohinoor2 cluster Specification

Specification:

- 32 compute nodes, 1 frontend/login node
- 8 core Dual CPU Intel Xeon E5-2680 2.7GHz 20MB cache
- Fujitsu Primergy DX60 S2 dual controller
- 25TB aggregate storage capacity
- NFS share over Infiniband
- Infiniband interconnect
- SGE (Open Grid Scheduler)
- OPENMPI-1.6.5
MVAPICH2-.0b

Nodes	Name	CPU / GPU Type	Cores	HT	RAM (GB)	Purpose
1	Kohinoor2	Xeon E5-2680 @ 2.7 GHz	2 x 8	N	64	Frontend/Login Node
32	Nodes [1 - 32]	Xeon E5-2680 @ 2.7 GHz	2 x 8	N	32	Computer Nodes

Hardware

Frontend Node

- FUJITSU Primergy PY RX300S7 2U rack model
- 8-core Dual CPU Intel Xeon E5-2680 2.7GHz 20MB cache
- 64GB ECC DDR3 1600MHz RAM
- 1TB 2.5in 7.2K RPM 6Gbps SAS
- 8GB FC dual-port HBA
- Intel Truescale Infiniband HCA

Compute Nodes without GPU

- 32 compute nodes
- Fujitsu Primergy PY RX200S7 2U rack model
- 8-core Dual CPU Intel Xeon E5-2680 2.7 GHz 20MB cache
- 32 GB ECC DDR3 1333MHz RAM
- 1TB 7.2K RPM 6Gbps NL SAS
- Intel Truescale Infiniband HCA

Storage

- Fujitsu Eternus DX 60 S2 Dual Controller 2U rack model
- 3TB 3.5in 7.2K RPM NL SAS
- 8Gb FC 4 Port Daughter Card
- 25TB aggregate storage capacity
- NFS share over Infiniband from frontend node

Network

Interconnect

- Intel truescale Infiniband 36 port Switch
- Infiniband 4X QDR

Administrative/ Management Network

- Gigabit Ethernet

Operating Environment

OS

- Ganana cluster toolkit based on Centos 6.3

Job Scheduler

- Sun Grid Engine (Open Grid Scheduler)

MPI

- OpenMPI-1.6.5
- Mvapich2- 2.0b