LHCb Storage Class Use

CERN

Tier-1 centres

Tier-2 centres

CERN

Tape1Disk0

- RAW data (280 TB)
- rDST data processed at CERN
- DST & MC data for archival

~50% RAW data at CERN will be accessed again for re-processing in a year

- Large fraction in the on-line farm with the input data moved to the pit
- Staging needed

All rDST data will be accessed additional twice a year for stripping

CERN

Tape1Disk1

- DST data for analysis

- MC DST data for analysis

DST data will migrate from T1D1 class to T1D0 as later copies of the stripping are performed

CERN

Tape0Disk1

- Shared user analysis output files

Envisage a user/group quota

Large turnover of data

Tier-1

Tape1Disk0

- RAW data
- rDST data processed at centre
- DST & MC data for archival

RAW data processed in real time upon arrival

Should stay in the disk cache for a while (~48 hours)

50% of RAW data will be accessed again for re-processing in a year

All rDST data will be accessed additional twice a year for stripping together with the corresponding RAW data:

Using already staged RAW data when following the reconstruction pass

Tier-1

Tape1Disk1

- DST data for analysis

- MC data

DST data will migrate from T1D1 class to T1D0 as later copies of the stripping are performed

Tier-1

Tape0Disk1

- Shared user analysis output files

Envisage a user/group quota

Large turnover of data

- (partial) DST data for analysis

will be removed from disk as later version become available

Tier-2

In general small requirement on disk at Tier-2's - buffer space for MC production

2 LHCb Tier02's request (have resources) to support analysis

- Minimum 139 TB of disk

- Depending on storage available datasets replaced up to 4 times per year