

Basis of Estimate –M&S line 1.5 Online Upgrade

1.5.2 Level 3 Filter Nodes

1.5.2.1 Nodes, racks, power supplies, cables

\$150,000 - Basis- Recent purchases of similar items

1.5.3 Fibre Channel SAN

1.5.3.2 Hubs, cables

\$20,000 - Basis- Run 2a purchases of similar items

1.5.4 RAID Storage Array

1.5.4.1 FC RAID controllers

2 needed @ \$5,000 per controller; total \$10,000 - Basis - Run 2a purchases

1.5.4.2 Disk crates, rack

6 needed @ \$2,500 per set; total \$15,000 - Basis - Run 2a purchases

1.5.4.3 Hot-swappable disks

1 needed @ \$18,000 per lot; total \$18,000 - Basis - extrapolation of current prices

1.5.5 DAQ HOST System

1.5.5.2 Primary high-end server

1 needed @ \$32,000 per server; total \$32,000 - Basis - Vendor quotes

1.5.5.3 Secondary mid-range server

1 needed @ \$20,000 per server; total \$20,000 - Basis - Vendor quotes

1.5.5.5 Fibre Channel JBOD buffer disk

1 needed @ \$40,000 per disk; total \$40,000 - Basis - Vendor quotes

1.5.6 Database System

1.5.6.1 Primary high-end server

1 needed @ \$32,000 per server; total \$32,000 - Basis - Vendor quotes

1.5.6.2 Secondary mid-range server

1 needed @ \$20,000 per server; total \$20,000 - Basis - Vendor quotes

1.5.7 File Server System

1.5.7.1 Primary mid-range server

1 needed @ \$20,000 per server; total \$20,000 - Basis - Vendor quotes

1.5.7.2 Secondary mid-range server

1 needed @ \$20,000 per server; total \$20,000 - Basis - Vendor quotes