

Ethernet Considerations

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10 Gigabit Ethernet : 10GBASE-T (IEEE P802.3an)

- Category 6 twisted pair copper (UTP)
 - At least 50m on existing Cat 6 cable
 - 100m on new (augmented) Cat 6 cable
- 50-100m Cat 6 cable: adequate for many data centers
 Short coax (current copper 10Gig Ethernet) is problematic
- Timeframe similar to 8 Gigabit FC fabric (2-3 years)
 - FC has to transition through 4 Gigabit fabric first
- 8 Gigabit FC Fabric could be:
 - Slower (8.5 gigabit FC vs. 10 gigabit Ethernet)
 - More expensive (optical fiber & transceivers vs. Cat6 cable)
- Is this what the FCIA wants to see happen???



What's the Fibre Channel Fabric Alternative?

10 Gigabit

- Not slower, but ...
- ... still more expensive
 - Copper fabric = oxymoron
- Not backwards compatible

Not Likely

Faster Optical (16 Gig)

- Optical is fabric only
 Drive interface: 8 Gig copper
- Backwards compatible
 Auto-neg. to (8), 4, 2 and/or 1
- FC is faster than Ethernet
 Justifies price premium
- Continues current relationship
 - 2 Gig FC vs. 1 Gig Ethernet

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