

10Gb/s Serial Technology Roadmap

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10Gb/s Process Capability

- H-GaAs-IV In Production
 - Products with 13GHz B/W (OC-3 to OC192)
- H-GaAs-IVA In Development
 - 13 GHz Laser Drivers, Amplifiers
- H-GaAs-V In Development
 - 13 GHz Power Reduction
 - Integrated Analog Functions

Goals

- Make 10Gb/s As Affordable As 2.5Gb/s
- Provide Complete Product Offering
 - CMU, MUX, DEMUX, CRU
 - Management
 - Analog (Laser Driver, Post Amp)
 - FEC
- Design To Meet FEC Requirements

The Time Is Right - WHY?

- 1000BASE-X Market Doubles Every 3 Months
 - Backbone Switches
 - Workgroup Switch Uplinks
 - Extended Distance Links
- 1000BASE-T Market Heating Up
- Telecom-Datacom Convergence - IP Everywhere
- Industry Push - Make 10G Competitive W/ 2.5G

Single Stream Or WDM?

- Define Standard Interfaces For
 - 10Gb/s Metallic
 - 10Gb/s Fiber
 - Receivers
 - Transmitters
 - WDM (?)
- Avoid Arbitrary Distance Limits