

Proposals on Bidi 200 Gb/s

Frank Effenberger

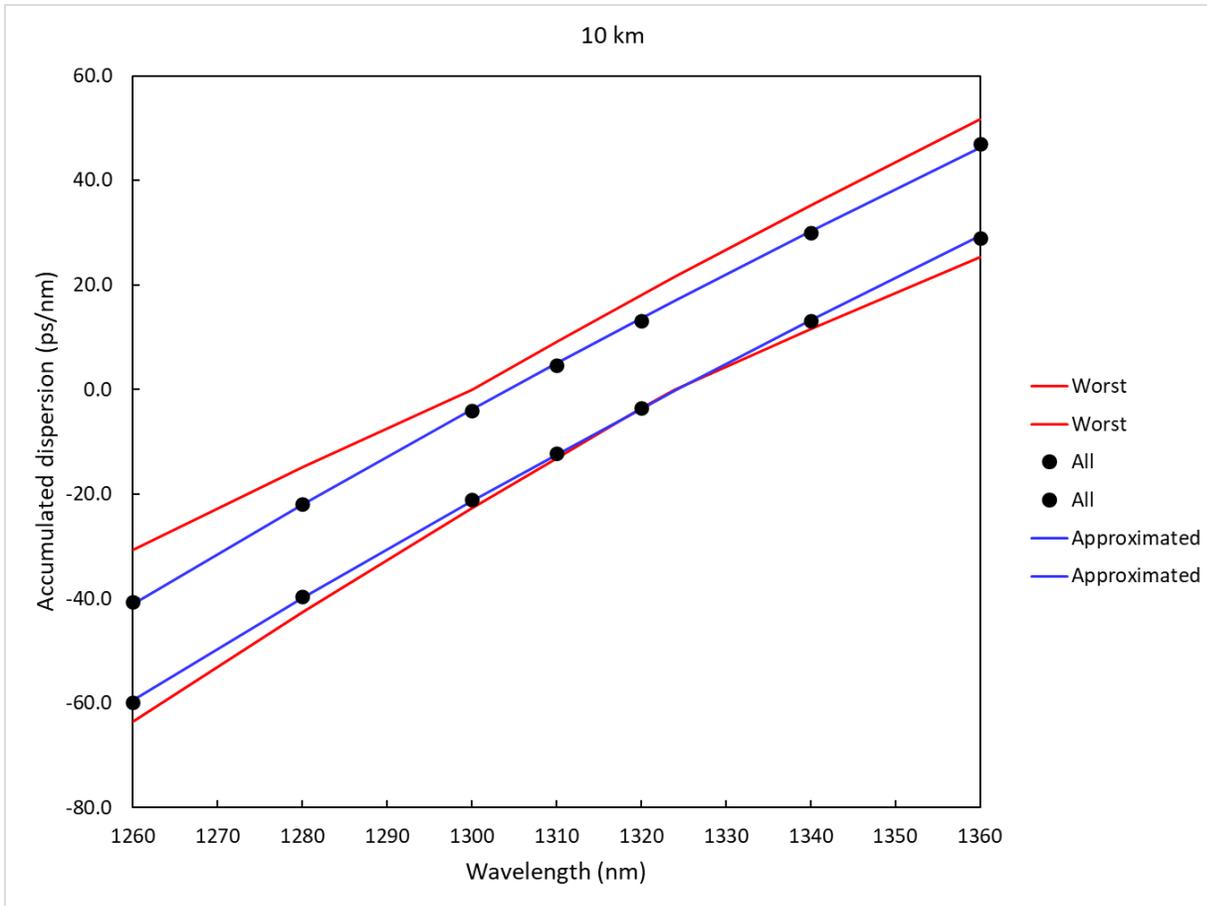
Futurewei Technologies

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Simplest way to 200 Gb/s – 2x the channel

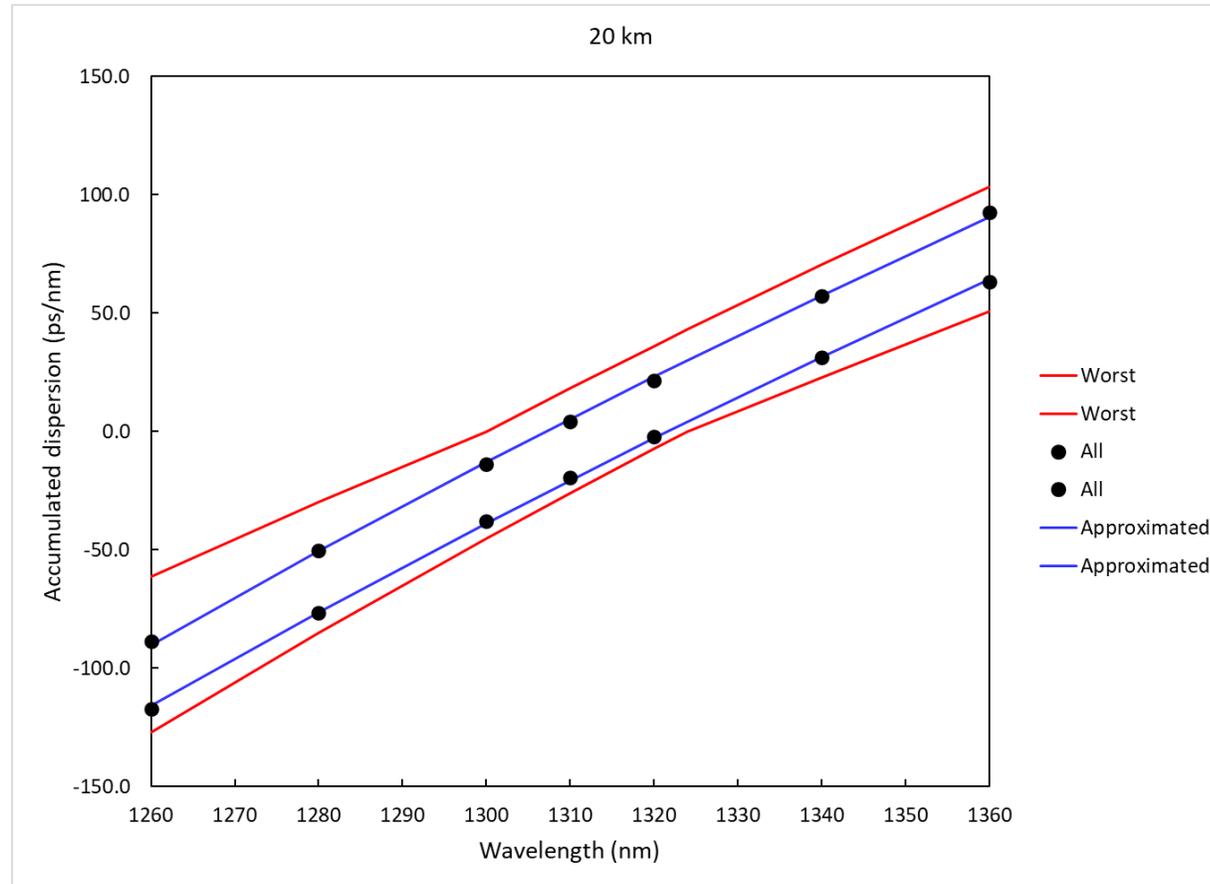
- The 100 Gb/s links are using the 800 GHz channels at 1304.5 and 1309 nm
- The most straightforward way to get to 200 Gb/s would be to find two more channels
- We can try to reuse the LR4 typical LANWDM wavelengths
 - 1294.5 to 1296.6 nm
 - 1299.0 to 1301.1 nm
 - 1303.5 to 1305.6 nm
 - 1308.1 to 1310.2 nm
- Note the use of the 1295 nm channel is not following the fiber channel characteristics, but it is the industry standard

10 km CD limits for 0.01% confidence



1294 nm min CD = -26.8 ps/nm
1310 nm max CD = 4.4 ps/nm

20 km CD limits for 0.01% confidence

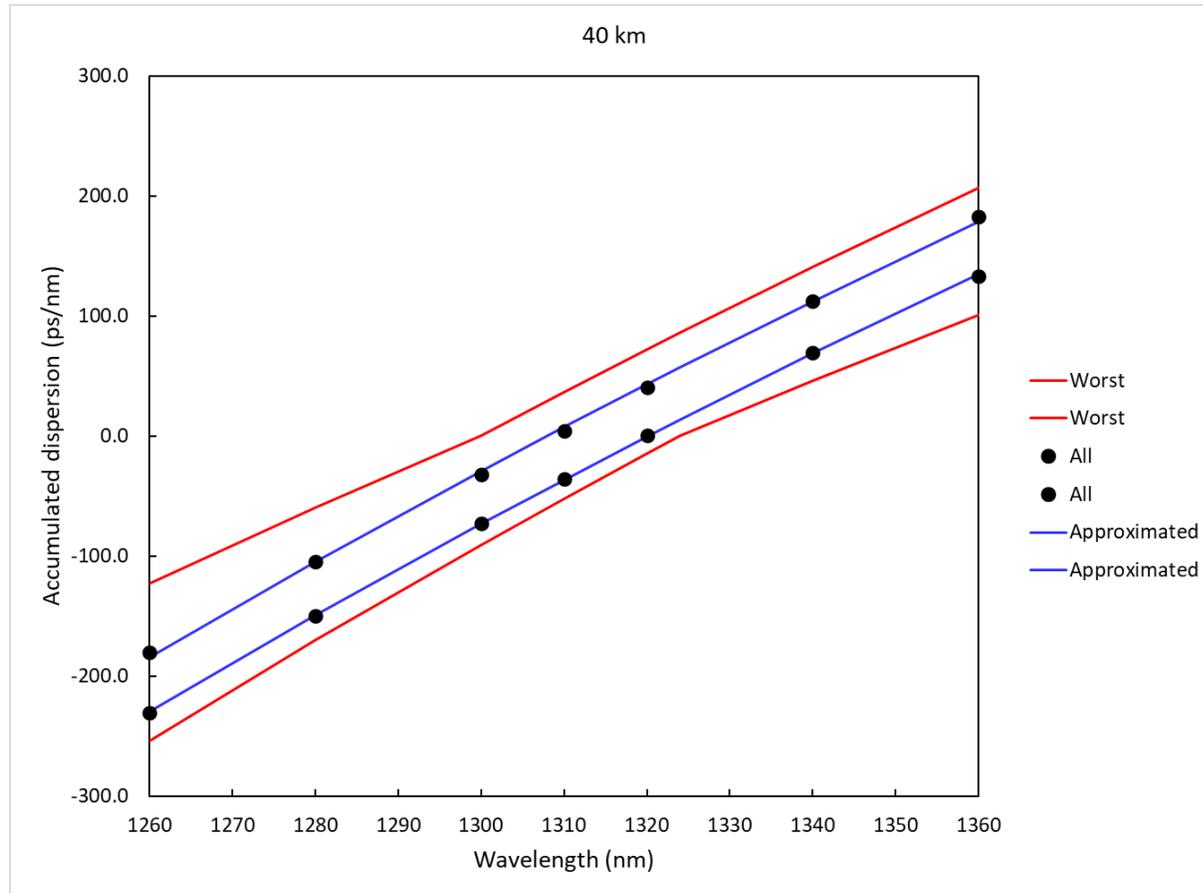


1294 nm min CD = -51.5 ps/nm
1310 nm max CD = 6.7 ps/nm

Motion Y

- Move to adopt the use of 2x100 Gb/s per channel for the 200 Gb/s BR10 and BR20 objectives, using the LANWDM standard wavelengths
- M: Frank Effenberger
S:
(Technical $\geq 75\%$)
Results: Y: / N: / A:

40 km CD limits for 0.01% confidence



1294 nm min CD = -97 ps/nm
1310 nm max CD = 6.3 ps/nm

-60 ps/nm = 1304 nm
+30 ps/nm = 1316.5 nm

Options for 40 km wavelength plan

- Sticking with the usual Ethernet wavelengths isn't possible
- Option #1: Move to a 400 GHz grid
 - 1304.6, 1306.85, 1309.1, 1311.4 nm
 - Tolerance is reduced by 50%: ± 100 GHz
- Option #2: Change to 50 Gb/s per wavelength
 - Need to use ER8 wavelength plan (1273.5 to 1309.1 nm)
 - Dispersion range is -183 to 6.3 ps/nm
- Option #3: would be to abandon the objective

Straw poll

- What options are of interest for the 200G BR40 objective?
 - Vote for as many as you like
- Option 1: 400 GHz spacing Support:
- Option 2: 4x50 Gb/s, using LR8 wavelengths Support:
- Option 3: Drop the 200G BR40 objective Support:

Thank you

Any questions?