

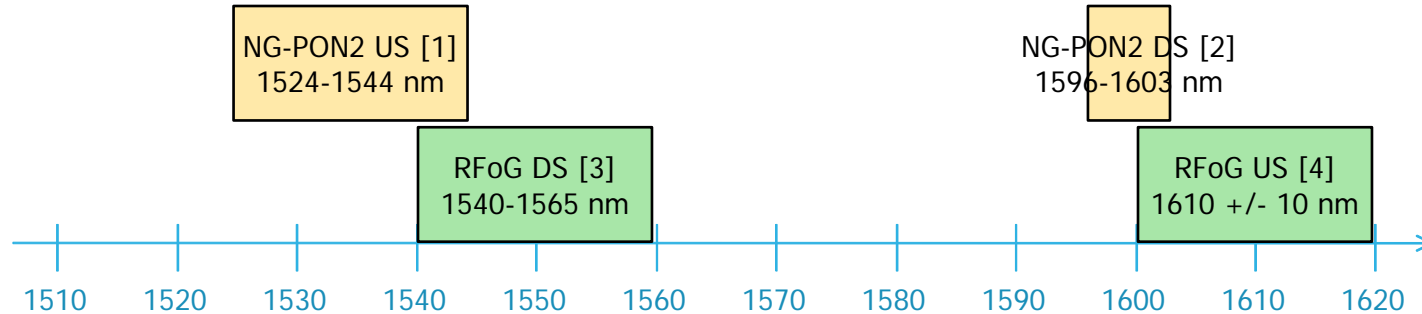


NG-PON2 and RFoG wavelength overlaps

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RFoG and NG-PON2 wavelength overlaps



[1] ITU-T G.989.2 TWDM PON upstream, wide range. Reduced and narrow ranges extend to -1540 nm.

[2] ITU-T G.989.2 TWDM PON downstream.

[3] SCTE 174 spec for R-ONU receiver wavelength range. (IEC CD60728-14 narrows the range to 1540-1560 nm). Both SCTE 174/ IEC CD60728-14 say “Blocking filters may... be required if an optical carrier at 1530 nm is used in the same fibre.” Therefore they already assume that receivers will have significant responsivity down to at least 1530 nm

[4] SCTE 174/ IEC CD60728-14 spec for R-ONU transmit wavelength range. This is the 1610 nm option “to allow the same PON to be used for RFoG and GPON or EPON applications.”

RFoG and NG-PON2 co-existence appears to require more study.