



BENEFITS

- .perfect S and \bar{S} synchronisation
- .real time BER optimization
- .easy to implement

FEATURES

- .outputs perfectly balanced
- .ultra-fast option available
- .PM option available
- .large range of FSR available (2,5 to 1000 GHz)

APPLICATIONS

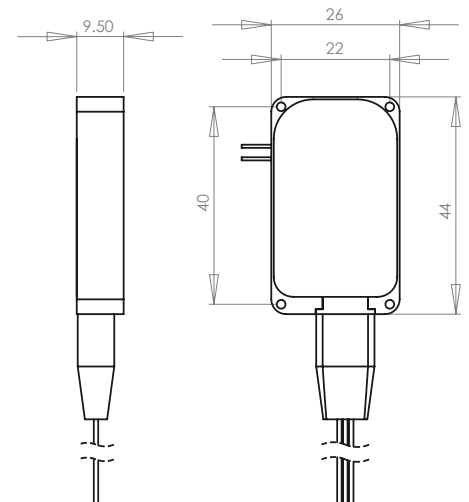
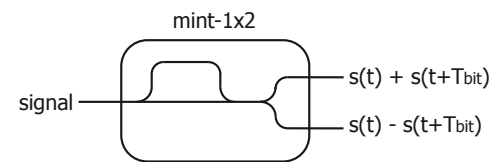
- .DPSK signal demodulation
- .DQPSK demodulation
- .OFDM

mint-1x2 is a DLI (Delay Line Interferometer) where the delay corresponds to one bit duration. Outputs are dedicated to be connected to balanced photodiodes.

Kylia provides custom-design interferometers following specific requirements such as:

- multi-wave mixing interferometers
- interferometers for spatial applications
- any homodyne or heterodyne optical design

parameter	unit	low voltage	ultra-fast
frequency range	THz	191 to 197	
free spectral range (FSR)	GHz	10 to 1000 (shorter FSR on request)	
FSR error	%FSR	< 1	
insertion loss (including connectors)	dB	< 2.0	
IL uniformity	dB	< 0.5	
extinction ratio	dB	> 18	
polarization dependent loss (PDL)	dB	< 0.3	
return loss	dB	> 35	
polarization dependent frequency shift (PDFS)	% FSR	< 1.5	
optical path difference between the two receiving ports (skew)	ps	< 1.0	
ER attenuation (option)	dB	0-60	
IL attenuation (option)	dB	0-60	
tuning time constant [0% to 50%]	s	< 1.0	0.1
tuning range	deg	> 360	
tuning voltage	V	0 to 4	0 to 60
power consumption	W	< 0.5	0.001
maximum input optical power	mW	300	
operating temperature range	°C	0 to +70	
storage temperature range	°C	-40 to +85	
standard package dimensions	mm	44 x 26 x 9.5 for FSR > 20 GHz 100 x 55 x 16 for FSR < 20 GHz	
fiber type		Coreguide SMF-28 with 900µm loose tube	



all specifications are guaranteed over the operating temperature range and for all states of polarization

ordering information

mint-1x2 -

phase tuning option



L: low voltage
U: ultra fast

FSR in GHz



input connector



FCPC
FCAPC
SCPC
SCAPC
LC

outputs connectors



FCPC
FCAPC
SCPC
SCAPC
LC

ER option



IL option

