

PASSIVE COMPONENTS

1x2 / 2x2 Fused Biconical Taper Coupler

Fused coupler available in nine split ratios from 50/50 to 1/99, at 1310 and 1550 nm.



Key Features

- Nine split ratios: 1/99 through 50/50
- Single and dual wavelength versions
- Available at 1310 nm, 1550 nm and combinations
- Passive — no power required
- Low excess loss

Applications

- Optical power tap and monitoring
- Signal splitting and combining
- Feedback paths for laser power control
- Test and instrumentation

Overview

A fused biconical taper coupler splits light between two outputs at a ratio set during manufacture. Nine standard ratios are available, from an even 50/50 down to 1/99 for tap monitoring, where only a percent of the signal is diverted to a photodiode.

Single and dual wavelength versions are built: 1310 nm, 1550 nm, 1310 and 1550 nm together, or 1310/1490 with 1550 nm. Insertion loss depends on the ratio chosen, running from 3.60 dB on an even split to 22.20 dB on the tap leg of a 1/99.

Specifications

Optical Performance

PARAMETER	VALUE	UNIT	CONDITIONS
Coupling Ratio	1/99, 2/98, 3/97, 5/95, 10/90, 20/80, 30/70, 40/60, 50/50		
Operating Wavelength	1310, 1550, 1310 & 1550, 1310/1490 & 1550	nm	
Insertion Loss	3.60 – 22.20	dB	Depends on coupling ratio

Order or request a quote

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