Return loss module specifications

All modules require angled contact (8°) at input and output connectors

	81610A	
Source	external input only [1]	
Sensor element	InGaAs	
Fiber type	Standard single-mode 9 / 125 μm	
External input	max input power: 10 dBm min input power: 0 dBm damage input power: 16 dBm	
Wavelength range for external input	1250 nm to 1640 nm	
Dynamic range	70 dB	
Relative uncertainty of [2] Return Loss (RL)	with broadband source	with Agilent FP sources
• RL ≤55 dB		typ. < ± 0.5 dB
• RL ≤60 dB	<±0.25 dB	typ. < ± 1.0 dB
• RL ≤65 dB	<±0.3 dB	typ. < ± 2.0 dB
• RL ≤70 dB	<±0.65 dB < ± 1.7 dB	
Total uncertainty	add ± 0.2 dB	add typ. ± 0.2 dB
Dimensions (H x W x D)	75 mm x 32 mm x 335 mm (2.8″ x 1.3″ x 13.2″)	
Weight	0.6 kg	
Recommended Recalibration period	2 years	
Operating temperature	10 to 40°C	
Humidity	Non-condensing	
Warm-up time [5]	20 minutes	

[1] Insertion Loss is in the range of 7dB.

[2] Averaging time 1s,
calibration prior to measurement,
constant temperature,
broadband source: Agilent 83438A
FP Sources: Agilent 81650A, 81651A, 81654A with active Coherence Control.
Reference Cable 81610CC used for total uncertainty
Length of measurement patch cord ≤ 2m, angled connector in optimal optical conditions

[3] Warm-up time 60 min, if previously not stored at the same temperature.

Reference Cable Specification

To connect to Return Loss Modules the cable requires connector Interface 81000SI DIN47256/4108

	81610CC Reference cable
Return loss	as printed on cable
Return loss uncertainty	±0.2 dB[1]
Wavelengths	1310 and 1550 nm ± 15 nm

[1] Clean reference reflector in perfect optical condition
(Do not use with contact-type connectors)