VIAVI
VIAVI Solutions

VIAVI
SmartClass™ OBS-500/550 Optical Broadband Light Sources

High Performance Light Source for PMD, CD
and Attenuation Profile (AP) Measurements

10 GE /40 GE service delivery and 40G /100G network deployments or upgrades are driving fiber characterization test out to field tech support groups. Cost effective solution and fast return on investment are required due to wider test set dispatch. The growing number of projects is driving an increasing demand for higher productivity with better reliability and availability.

The OBS-500/550 combines three applications in one rugged and splash-proofed field solution. Its high output power (OBS-550) and wide wavelength range enable the characterization of any fiber network configuration. In combination with the VIAVI Optical Dispersion Modules (ODM) (MRDISPAP & DISPAP modules for T-BERD/MTS-6000A and -8000 platforms), high performance CD, PMD and AP measurements can be executed.

Key Benefits

- Cost-effective solution, designed for high-performance testing

- SmartClass design for harsh environmental conditions

- Battery-operated, portable field handheld

- High dynamic range for ultra-long haul PMD and CD testing

- Compatible with VIAVI MRDISPAP and DISPAP modules for PMD, CD and AP Measurements

- Covers the SCL bands (1460 – 1640nm)

- OBS-550 version features a high-dynamic mode to test non amplified links of up to 300km for PMD and 260km for CD (in combination with DISPAP module)

- Both versions allow testing through in-line amplifiers/EDFAs

Optical adapters (2150)

Interchangeable optical adapter system

Shock-proof chassis

VIAVI
OBS-550

Heat sink element

OUTPUT

ACTIVE

Select mode:
· High power (OBS-550)
· Broadband

MODE

HD   BB

APPLICATION

AC interface

Select application:
· PMD
· CD
· AP

PMD   SA   CD

BATT

LOW   CHARGE

Battery compartment (back side)

Specifications

Wavelength range	OBS-500 1485 to 1640 nm	OBS-550 1485 to 1640 nm
Output power level	>8 dBm	>16 dBm[1] >8 dBm[2]
Spectral power density	>−46 dBm/0.1 nm	>−46 dBm/0.1 nm (1485 to 1640 nm)[2] >−30 dBm/0.1 nm (1530 to 1610 nm)[1]
State of polarization	Polarized or non-polarized	Polarized or non-polarized[1]
Operating mode indication	LED (no display)	
Optical interface	PC with interchangeable adapter system	
Battery life	2.5 hours[2, 3]	
Power supply	- Four dry batteries Mignon/AA 1.5 V or NiMH rechargeable cells Mignon/AA - AC line operation via separate AC adapter - Nominal range of use 100 to 240 V, 50/60 Hz	

(1) non-polarized for "AP" and "CD" (HD) mode
(2) in broadband (BB) mode
(3) at 20 °C ambient temperature

Temperature	
Operation	−10 °C to +40 °C
Storage	−40 °C to +70 °C

Dimensions and weight

OBS-500/550	
W × H × D	125 × 50 × 260 mm (9.05 × 4.72 × 1.97 in)
Weight	600 g (1.3 lb)

Included with the OBS-500/-550	
2150/00.xx	One interchangeable adapter
2237/90.02	Four NiMH rechargeable cells Mignon/AA
2277/90.01	SNT-121 AC adapter
	Operating manual
2279/90.10	Soft bag

Ordering Information

Ordering number	Description
2279/32	OBS-550 Optical Broadband Source High Power
2279/33	OBS-500 Opitical Broadband Source 1460 to 1625nm

Ordering Information continued

Ordering number	Accessories
2150/00.32	Optical adapter ST type
2150/00.58	Optical adapter SC type
2150/00.51	Optical adapter FC type
2150/00.50	Optical adapter DIN type
2229/90.21	OCK-10 Optical Connector Cleaning Kit
2229/90.07	Optical cleaning tape
2229/90.08	Spare tape for optical cleaning tape
2237/90.02	NiMH cells, Mignon/AA, 1.2 V (4 required per instrument)
2277/90.01	SNT-121A Worldwide compatible AC adapter
K804	USB connection cable
2279/90.10	OBS-500/-550 soft bag

VIAVI Care Support Plans

Increase your productivity for up to 5 years with optional VIAVI Care Support Plans:

- Maximize your time with on-demand training, priority technical application support and rapid service.
- Maintain your equipment for peak performance at a low, predictable cost.

For more Information: go to viavisolutions.com/viavicareplan

Features

*5-year plans only

Plan	Objective	Technical Assistance	Factory Repair	Priority Service	Self-paced Training	5 Year Battery and Bag Coverage	Factory Calibration
BronzeCare	Technician Efficiency	Premium	✓	✓	✓		
SilverCare	Maintenance & Measurement Accuracy	Premium	✓	✓	✓	✓*	✓