

# 525N | Intelligent Optical Loss Test Set (iOLTs)



525N		Job ID: 20145-KTR	LINK LOSS SUMMARY REPORT					
Customer: _____		Date: 3/19/2012	Cable ID: 1010254					
Definable: _____								
Cable Information		Cable ID: 1010254		Site A: Closet 32		Site B: Closet 33		
Manufacturer: Lucant		Connector Type: ST		Operator A: Peter		Operator B: Santosh		
Length: 254 meters		Definable: _____						
Site Information								
Closet 32				Closet 33				
← 254 meters →								
Measurement Results								
1510nm				1550nm				
Loss A-B (dB)	Loss B-A (dB)	Average (dB)	ORL A-B (dB)	Loss A-B (dB)	Loss B-A (dB)	Average (dB)	ORL A-B (dB)	
10	10	10	10	10	10	10	10	
Reference Data								
Fiber ID	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
2	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
3	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
4	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
5	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
6	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
7	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
8	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
9	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
10	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
11	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
12	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
13	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
14	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
15	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
16	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
17	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
18	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
19	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
20	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
21	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
22	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
23	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
24	10.12	10.18	10.15	55.24	10.12	10.18	10.15	55.56
	x	x	x	x	x	x	x	x
Thresholds								
Link Loss		Return Loss		50 dB				
@1300nm: 15 dB								
@1550nm: 12 dB								
Information								
Serial Number of Tester @ Site A		Serial Number of Tester @ Site B		Firmware Version				

## APPLICATIONS:

Characterizing the insertion loss and return loss of your fiber has never been so easy! Testing fiber optic cable in the field is a time consuming and complicated process. The 525N simplifies acceptance testing by automating the measurement process, informing the user of PASS/FAIL condition on fiber under test based on user set thresholds. The 525N automatically assigns a fiber ID saving the test result to internal memory.

The 525N's advanced engineering has simplified the measurement process to 4 simple steps:

1. Set-up: Menus to select type of measurement, wavelength(s), locations, user names, and insertion loss and return loss PASS/FAIL thresholds.
2. Perform reference measurement between units. (Only required once)
3. Press AUTOTEST and the instrument automatically performs bi-directional measurements, informs user of average loss, margin from threshold, and PASS/FAIL indicator. The test result is automatically stored to internal memory.
4. Once back in the office the user can download the measurements from the 525N via RS232 port to the Report Writer. The user can review the test results and print custom fiber or complete cable verification reports.

The 525N is housed in a rugged rubberized protective shell that can stand up to the rigors of the outside plant environment. The large backlit screen and sealed membrane panel enable the 525N to be used in the harshest of locations. The 525N is powered by internal rechargeable batteries providing a continuous 8 hours of operation on a full charge.

## FEATURES:

- Automated bi-directional testing
- Test End-to-End Loss and Return Loss
- One button AUTOTEST
- Single mode and Multi-mode
- Optical Power Meter
- Optical Return loss meter
- 55dB measurement range
- Stores over 1500 measurements
- Rechargeable batteries
- Rugged package

# 525N | Intelligent Optical Loss Test Set (iOLTs)

The 525 Report Writer generates professional reports detailing the tests performed on the 525N instrument. The 525 Report Writer generates cable reports, detailing all fibers tested in that cable and fiber reports, a report on a singular fiber. The report is split into four sections Customer Information, Cable Information, Site information, Measurement Results. The user can customize the report for their own company by placing a graphic in the upper right hand corner.

Downloading the test data from the 525N is a simple process.

1. Connect the RS-232 data cable the instrument and the computer.
2. Start the Report Writer application on your computer.
3. Click the download button and the application will ask you which folder you would like to store the data.

## SPECIFICATIONS:

	<b>525N-30</b> <b>850/1300nm Multimode</b>	<b>525N-60</b> <b>1310/1550nm Singlemode</b>
<b>Power Meter</b>		
Detector Type	InGaAs	InGaAs
Display Range	+10dBm to -70dBm	+10dBm to -70dBm
Calibrated Wavelengths	850, 980, 1300, 1310, 1550, 1480,1625	850, 980, 1300, 1310, 1550, 1480,1625
Absolute Accuracy	±0.25dB	±0.25dB
Resolution	0.01dB	0.01dB
Measurement Units	dBm, dB	dBm, dB
Connector Type	UCI-UPC flat polish adapter 62.5/125 MM	UCI-UPC flat polish adapter 9/125 SM
<b>Source</b>		
Center Wavelength	850nm ±30nm    1300nm ±30nm	1310nm ±30nm    1550nm ±30nm
Spectral Width	<170                      <170	<5                              <5
Output Power	> -21 dBm              > -21 dBm	> -10 dBm              > -10 dBm
Output Stability	±0.10 dB/8 hours    ±0.10 dB/8 hours	±0.15 dB/8 hours    ±0.15 dB/8 hours
Connector Type	UCI-UPC flat polish adapter 62.5/125 MM	UCI-UPC flat polish adapter 9/125 SM
<b>Insertion Loss</b>		
Test Port Measurement Range	25 dB	60 dB
Calibrated Wavelengths	850, 1300nm	1310, 1550nm
<b>Return Loss</b>		
Measurement Range	n/a	10 to 45dB
Accuracy	n/a	0.5dB
<b>General Descriptions</b>		
Display Type	Graphics Liquid Crystal Display w/Backlight	Graphics Liquid Crystal Display w/Backlight
Fiber Type	Singlemode 9/125 um	Multimode 62.5/125 um
Standard Connector Type	FC, SC	FC, SC
Laser Classification	Class 1 CFR 1040	Class 1 CFR 1040
Operating Temperature	0°C to +50°C	0°C to +50°C
Storage Temperature	-20°C to +60°C	-20°C to +60°C
Relative Humidity	0 to 95% RH non-condensing	0 to 95% RH non-condensing
Size	19.3 X 10.9 X 5.8 cm (7.6 X 4.3 X 2.3in)	19.3 X 10.9 X 5.8 cm (7.6 X 4.3 X 2.3in)
Weight	1.0kg (2.2lbs)	1.0kg (2.2lbs)
Power	Internal rechargeable NiMH	Internal rechargeable NiMH
Battery Life	> 8 hours	> 8 hours

## ORDERING INFORMATION

**525N-30** 850/1300nm Multi-mode Optical Loss Test Set - The 525N comes with hard carrying case, instruction manual, warranty registration card, RS-232 data transfer cable, Report Writer software, mandrel, AC adapter/charger, and All-in one connector-cleaning tool.

**525N-60** 1310/1550nm Single mode Optical Loss Test Set - The 525N comes with hard carrying case, instruction manual, warranty registration card, RS-232 data transfer cable, Report Writer software, mandrel, AC adapter/charger, and All-in one connector-cleaning tool.

### Accessories

1020  
1030  
1062  
APC-10  
ASC-10  
ATS-16  
2K3K-101-01  
6K6K-101-01  
2K2K-101-01  
2K2K-106-01  
6K6K-106-01  
3K3K-106-01  
945  
NTT/FC-PC Snap-On Connector Adapter  
AT&T/ST-PC Snap-On Connector Adapter  
NTT/SC-PC Snap-On Connector Adapter  
NTT/FC-PC Universal Connector Adapter  
NTT/SC-PC Universal Connector Adapter  
AT&T/ST-PC Universal Connector Adapter  
FC/PC to FC/PC Single mode (9/125) patch cord  
SC/PC to SC/PC Single mode (9/125) patch cord  
ST/PC to ST/PC Single mode (9/125) patch cord  
FC/PC to FC/PC Multi-mode (62.5/125) patch cord  
SC/PC to SC/PC Multi-mode (62.5/125) patch cord  
ST/PC to ST/PC Multi-mode (62.5/125) patch cord  
All in One Cleaning Tool

