



TLP-3C 2M Transmission Analyzer

- Full-featured measurements to 2M, Datacom
- Smart navigation mode and multi-language displays
- Extensive error and alarm generation, detection and indication
- Histograms analysis of alarm and error events
- Save/Recall of up to 7 user-defined setups and 70 sets of results
- Built-in Li rechargeable battery and smart charger circuit
- Ungradable software via an integrated RS232C interface
- Test results uploaded, conserved and printed by PC Manager software

Items	Specifications	
2M	Internal Clock	2048kb/s ± 10 ppm
	Frequency Deviation	± 999 ppm
	Line Interface	75 Ω (Unbalanced), 120 Ω (Balanced); High Input Impedance >2KW
	Line Code	HDB3, AMI
	Framing	Unframed, PCM30, PCM30CRC, PCM31, PCM31CRC
	Receive Sensitivity	>-43dB
	Tx Clock Source	Internal, Interface and External 2MHz clock or signal
	Pulse Mask Measurement	Comply with G.703
	Jitter Measurement	Comply with O.172
	Frequency Measurement	Accuracy: ± 1 Hz
	Offset Measurement	Accuracy: ± 1 ppm
		Range: -999ppm~+999ppm
2M	VF Injection	Frequency: 200MHz~3400MHz, Step: 10Hz
		Level: -60dBm~+3dBm
	VF Measurement	Frequency: 200MHz~3400MHz
		Accuracy: ± 1 Hz
		Level range: -60dBm~+3.14dBm
		-60dBm~-21dBm, accuracy: ± 2.87 dBm
		-20dBm~+3.14dBm, accuracy: ± 0.21 dBm
	Delay Measurement	Accuracy: ± 1 us
G.703 CO	Line Rate	64kb/s ± 1000 ppm
	Line Interface	120 Ω , Balanced
	Line Code	AMI

Items	Specifications	
Datacom	Line Interface	V.24, V.35, V.36, X.21, RS-449, RS-485, EIA-530, EIA-530A
	Data Rate	ASYN: C300, 600bit/s, 1.2, 2.4, 4.8, 7.2, 9.6, 19.2, 38.4kb/s
		SYNC: C300, 600bit/s, 1.2, 2.4, 4.8, 7.2, 9.6, 19.2, 38.4kb/s
		N×64kb/s (N=1~32), 4M, 8Mkb/s
Test Patterns	PRBS	$2^{23}-1$, $2^{20}-1$, $2^{15}-1$, $2^{11}-1$, 2^9-1 , 2^6-1
	Fixed Code	1111, 0000, 1010
	16-BIT	User Programmable Word
LED Alarm Indicators	Signal Loss, AIS, Frame Loss, MFrame Loss, Pattern Loss, Remote Alarm, Error, Clock Slip.	
Error Injection	Type: BIT, FAS, CRC4, CODE, E-BIT	
	Single, Fixed Rate: 10^{-2} , 10^{-3} , 10^{-4} , 10^{-5} , 10^{-6} , 10^{-7}	
Performance Analysis	ITU-T G.821, G.826 and M.2100	
Display	320×240 pixel backlit monochromatic LCD	
Serial Port	RS-232C	
Rechargeable Batteries	5×1.2V AA NiMH batteries, continuous working for 6 hours	
Recharge Time	Approx. 2 hours	
AC Power Adapter	Input: 100V~240VAC, 50/60Hz Output: 12VDC/1.5A	
Test Manager Pro	WIN98/ME/NT/2000/XP	
Dimensions	L×W×H (200mm×160mm×45mm)	
Operating Temperature	0°C~50°C	
Storage Temperature	-20°C~+70°C	
Humidity	5%~95% non-condensing	

Standard Items	Quantity	Standard Items	Quantity
TLP-3C 2M Transmission Analyzer	1pc	Simulation software	1pc
75Ω BNC/L9 E1 test cable	2pcs	Carrying case	1pc
BNC/BNC cable	1pc	User's manual	1pc
RS232 serial upgrading cable	1pc	Warranty card	1pc
DATA converting line (36PIN to 44PIN)	1pc	Certificate of conformity	1pc
X.21 testing line	1pc	V.35 testing line	1pc
V2.4 testing line	1pc	V.11 testing line	1pc
AC adapter	1pc		
Optional Items	Quantity	Optional Items	Quantity
120 testing line	2pcs	64K testing lines	1pc