

GRS-5505 (47~862MHz & 950~5450MHz)

CATV & 4 SAT-IF Optical Receiver

PRODUCT DESCRIPTION

GRS-5505, a kind of high performance 4-band SAT – IF O/E converter which is compatible with CATV (include DAB, DTT, FM). It adopts the technology of frequency division multiplexing, can receive the 950~5450MHz (4 SAT-IF overlay) and 47~862MHz (CATV) optical signal that transmitted by one fiber.

GRS-5505/WD, GRS-5505/WF, can be compatible with any FTTx PON, to realize internet, Full-Band SAT-TV & CATV Triple-play network and FTTH.

GRS-5505 the forepart of the satellite antenna adopt satellite full-channel overlay LNB, such as TOL32, TWL01 and HDS-55A optical transmitter.



PRODUCT FEATURES

- ▶ Adopt one fiber to transmit Full-channels direct-broadcast satellite TV and CATV signal with high quality
- ▶ GRS-5505 (Can connect 5*N multi-way satellite switch, and serve for multi-users)

MAIN APPLICATION

- ▶ FTTH for DBS
- ▶ Triple-play Overlay DVB-S
- ▶ 4 SAT - IF overlay/ cleavage overlay optical fiber links

TECHNICAL INDEX

Performance			Index			Supplement	
			Min.	Typ.	Max.		
Optical feature	CATV Work Wavelength	(nm)	1260		1620	GRS-5505	
			1540		1563	GRS-5505/WF, GRS-5505/WD	
	Pass Wavelength	(nm)	1310, 1490			GRS-5505/WD	
	Channel Isolation	(dB)	40				
	Responsibility	(A/W)	0.85			1310nm	
			0.9			1550nm	
	Receiver Power	(dBm)	-15				
	Optical Return Loss	(dB)	40	45		FC/PC, SC/PC	
			55	60		FC/APC, SC/APC	
Optical Fiber Connector			SC/APC		Optional FC/APC, SC/PC, FC/PC		
Frequency feature	Reception Frequency Range	4 SAT-IF	(MHz)	950		5450	
		VL Converted		950		1950	
		VH Converted		1950		3000	
		HL Converted		3300		4400	
		HH Converted		4400		5450	
	Frequency Range Output	VL	(MHz)	950		1950	
		VH		1100		2150	
		HL		950		1950	
		HH		1100		2150	
	Gain Ripple Across Band		(dB)	-3.0		+3.0	
	Gain Ripple Across 40MHz		(dB)	-0.5		+0.5	
	Channel Isolation		(dB)		30		
	In Band Spurious Power		(dB)	-25			
	Out Band Spurious Power		(dB)			-60	
	Gain Range		(dB)	-1.0		36	
	Output Level		(dBm)	-65		-25	
	Integrated Phase Noise		(dB)		4.0		1KHz~13KHz
	OIP3		(dB)	+10			
	Output Return Loss		(dB)		10		
	Output Impedance		(Ω)		75		
RF Number of Connector Output				4			
RF Connector			F-Female				
TV RF feature	Working Frequency	CATV	(MHz)	47		862	
		DAB		213		230	
		DTT		470		854	
		FM		88		108	
	Flatness in Band		(dB)	-0.75		+0.75	
	Output Level		(dBμV)		70		Pin=-12dBm
	Output Impedance		(Ω)		75		
	Number of Output Out		(ps)		1		
	Return Loss		(dB)	14			
	RF port			F-Female			
	Analog TV Feature	Test channel	(CH)	59CH(PAL-D)			
		OMI	(dB)		3.8		
		CNR1	(dB)		53.5		Pin=0dBm
		CNR2	(dB)		45.2		Pin=-8dBm
		CTB	(dB)			-65	Pin:+3~-8dBm
		CSO	(dB)			-62	Pin:+3~-8dBm
		Digital TV Feature	OMI	(dB)		4.3	
MER	(dB)		36			Pin=-13dBm	
BER	(dB)				1.0E-9	Pin:+3~-13dBm	
General feature	Power Supply (DC)		(V)		+18		
	Power Consume		(mA)			300	
	External Power Supply Input Voltage		(V)	90		265	
	Operating Temp.		(℃)	-30		+60	
	Storage Temp.		(℃)	-40		+70	
	Size		(mm)	143 ×167×27			(W)x(D)x(H)

MODEL EXPLANATION

GRS		55		0	5	/	□□		-	□□		
SAT receiver (O/E convertor)		Work bandwidth		Satellite multi-switch		RF number of outputs		Optical connector		CWDM		
55		950~5450 MHz		0	Without		5	4 way satellite 1 Way CATV	SA	SC/APC	NC	Without
				4	With 4 × 4 Multiswitch				FP	FC/APC	WD	Build-in CWDM
						4	4 satellite outputs	SU	SC/UPC	WF	Build-in Filter	
								FP	FC/UPC			