

17

MICROWAVE LINKS



PRINCIPALI CARATTERISTICHE:

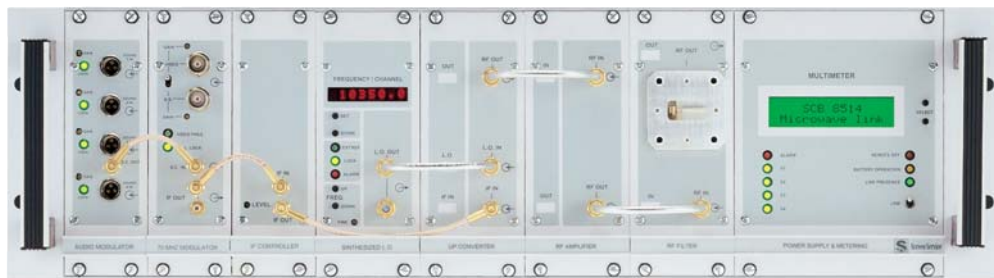
- > Costruzione modulare.
- > Raffreddamento convezionale.
- > Controlli A.G.C. e A.L.C.
- > Disponibili in versione mono o bi-direzionale.
- > Eccellente figura di rumore.
- > Programmazione dell'oscillatore locale dal pannello frontale.
- > Display digitale multifunzione.
- > Basso consumo.
- > Alimentazione da rete o a batterie.

MAIN FEATURES:

- > Modular construction.
- > Convective cooling.
- > AGC and ALC controls.
- > Available in mono or bidirectional version.
- > Excellent noise figure.
- > Programming of local oscillator from front panel.
- > Multifunction digital display.
- > Low power consumption.
- > Mains or battery-fed power supply.

CARACTERÍSTICAS PRINCIPALES:

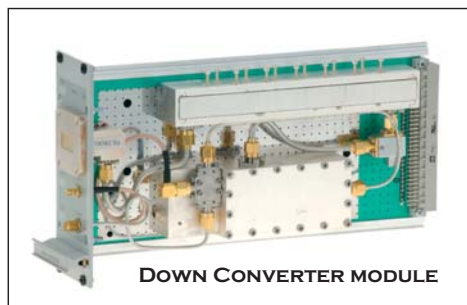
- > Construcción modular.
- > Enfriamiento por convección.
- > Controles A.G.C. y A.L.C.
- > Disponibles en versiones mono o bidireccionales.
- > Excelente figura de ruido.
- > Programación del oscilador local desde el tablero frontal.
- > Display digital multifunciones.
- > Bajo Consumo.
- > Alimentación de corriente alterna (A.C.) o por baterías.



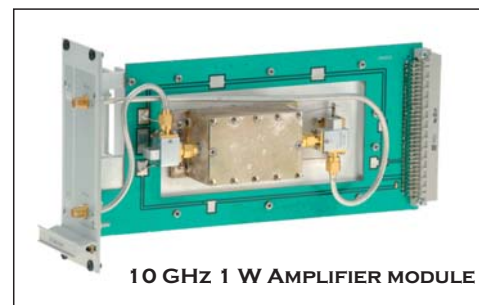
SCB 8514-30 MICROWAVE LINK TRANSMITTER



SCB 8514-RX MICROWAVE LINK RECEIVER



DOWN CONVERTER MODULE



10 GHz 1 W AMPLIFIER MODULE

I ponti microonde della serie SCB sono stati progettati secondo concetti e tecnologie all'avanguardia per il trasporto di segnali televisivi di alta qualità. La costruzione modulare ad alto grado di integrazione permette di alloggiare una qualsiasi delle tre configurazioni disponibili (trasmettitore, ricevitore o ripetitore) in un unico cassetto rack da 3 unità.

Il sistema permette la trasmissione e la ricezione di 1 canale video e fino a 4 canali audio sia per applicazioni punto-punto che per collegamenti in cascata.

L'eccellente purezza spettrale degli oscillatori di conversione conferisce a questi apparati un ottimo rapporto segnale/rumore sia in trasmissione che in ricezione.

I ponti microonde della serie SCB sono disponibili in diverse gamme di frequenza da 1.4 a 24 GHz e con diverse potenze d'uscita sia in versione da interni che in versione con testata RF esterna; in quest'ultimo caso la testata esterna è collegata alla console interna tramite un unico cavo coassiale nel quale transitano il segnale I.F. e l'alimentazione. Per collegamenti particolarmente difficili sono inoltre disponibili una serie di amplificatori esterni a stato solido anche di alta potenza.

The SCB series microwave links have been designed according to cutting-edge concepts and technologies for the transmission of high-quality television signals.

The modular construction with its high degree of integration enables any of the three configurations available (transmitter, receiver or transposer) to be housed in a single 3-unit rack.

The system allows the transmission and reception of 1 video and up to 4 audio channels for both point-to-point applications and multi-hop connections.

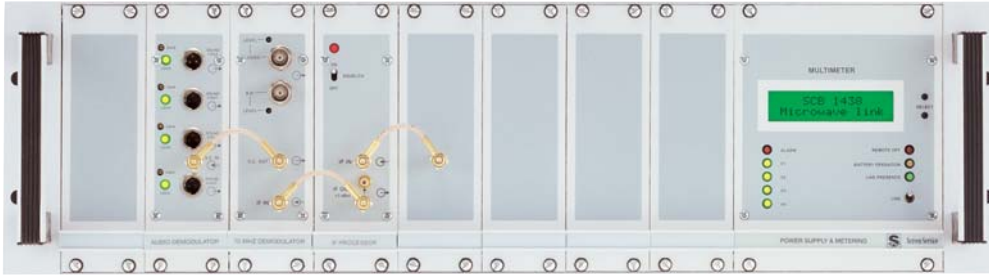
The excellent spectral purity of the conversion oscillators endows these units with an excellent signal/noise ratio both in transmission and reception.

The SCB series microwave links are available in different frequency ranges from 1.4 to 24 GHz and with different output powers in both the internal and external RF head series; in the latter case, the external head is connected to the internal console by a single coaxial cable through which pass both the I.F. signal and the power supply.

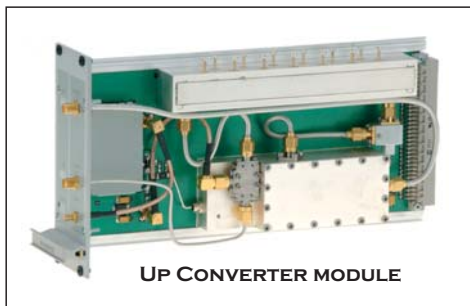
For particularly difficult connections, a series of external solid-state amplifiers, including high-power ones, is also available.



SCB 702M MICROWAVE LINK MODULATOR



SCB 702D MICROWAVE LINK DEMODULATOR



UP CONVERTER MODULE

MODEL-SPECIFIC DATA

Model	Output frequency band	Available output power (dBm)
SCB 1438	1.4 - 3.8 GHz	34, 39, 44, 47, 50, 53, 56
SCB 3872	3.8 - 7.2 GHz	30, 40, 43, 46, 49, 52
SCB 7285	7.2 - 8.5 GHz	30, 41, 44, 47, 50
SCB 8514	8.5 - 14.5 GHz	30, 37, 40, 43, 46, 49
SCB 1719	17 - 19 GHz	13, 17, 27
SCB 2123	21 - 23.6 GHz	17, 20, 26

*Other features and frequencies available on request.
Specifications and characteristics are subject to change without notice.*

Los enlaces de microondas de la serie SCB se concibieron en base a conceptos y tecnologías punta empleados en el transporte de señales televisivos de alta calidad.

Su construcción modular, con un grado de integración muy elevado, permite alojar cualquiera de las tres configuraciones disponibles (transmisor, receptor o repetidor) en un solo bastidor de 3 unidades. El sistema permite la transmisión y recepción de 1 canal vídeo y hasta 4 canales audio tanto para aplicaciones punto a punto como para conexiones en cascada. La excelente pureza de espectro de los osciladores de conversión confiere a estos aparatos una relación señal/ruido óptima, tanto en transmisión como en recepción.

Los enlaces de microondas de la serie SCB están disponibles con diferentes gamas de frecuencia, desde 1.4 hasta 24 GHz y con distintas potencias de salida, ya sea en la versión para interiores, que en la versión con cabeza RF exterior; en este caso la cabeza exterior está enlazada con la consola interior mediante un solo cable coaxial por el que transitan la señal I.F. y la alimentación.

Para conexiones muy difíciles están a disposición una serie de amplificadores exteriores de estado sólido de gran potencia.

SCB SERIES MICROWAVE LINK (INDOOR VERSION)



SCB SERIES MICROWAVE LINK (OUTDOOR VERSION)



MICROWAVE LINKS

TECHNICAL CHARACTERISTICS

TRANSMITTER

Frequency stability	±5 ppm
Return loss	> 23 dB
Spurious emissions	< -65 dB

RECEIVER

Noise figure	< 5 dB
Frequency stability	±5 ppm
RF selectivity	<-20 dB @ ±20 MHz
Return loss	> 23 dB
A.G.C. dynamic	> 50 dB
Receiver threshold	Better than -80 dBm

INTERMEDIATE FREQUENCY

I.F. frequency	70 MHz (115 or 140 MHz optional)
Modulation	FM
I.F. output level	0 dBm, 75 Ω
I.F. input level	0 dBm, 75 Ω
Return loss	> 23 dB
I.F. bandwidth	28 MHz

VIDEO PERFORMANCES (single hop at RCL = -40 dBm)

Frequency deviation	8 MHz p.p.
Amplitude frequency response (300 Hz to 5.5 MHz)	±0.5 dB
Emphasis	CCIR Rec. 405 or FCC
2T	< 1%
Differential phase	2° typ.
Differential gain	< 1%
Sync compression or expansion	< 1%
Chroma / luma gain	±0.3 dB
Chroma / luma delay	15 ns typ.
S/N ratio (noise weighted, 100 kHz to 5 MHz)	> 68 dB
In / Out level	1 V pp, 75 Ω (adjustable)

AUDIO PERFORMANCES

Sub-carriers frequency (CCIR)	7.500, 8.590, 7.020, 8.065 MHz
Sub-carriers frequency (FCC)	6.200, 7.500, 6.800, 8.300 MHz
Deviation	±75 kHz
S/N ratio @ nominal deviation	> 65 dB
Bandwidth	30 Hz - 14 kHz
Distortion	< 0.5% @ 1 kHz
Emphasis	25 μs / 50 μs / 75 μs / flat
In / Out level	0 dBm, 600 Ω (adjustable)

GENERAL

System capacity	1 Video + 4 audio
Operating temperature	-10°C to +45°C
Maximum relative humidity	90%, non condensing
Maximum operating altitude	2500 m a.s.l. (> 2500 m on request)
Power supply	90 to 264 V AC, 48 V DC (16-32 V DC optional)



Screen Service

SCREEN SERVICE

BROADCASTING TECHNOLOGIES SpA
Via G. Di Vittorio, 17 - 25125 Brescia - Italy
Tel. +39 030 3582225 Fax +39 030 3582226
info@screen.it - www.screen.it

SCREEN SERVICE AMERICA LLC

6095 NW 167th Street, Suite D-10, Miami, FL 33015
Phone +1 (305) 826-2212 - Fax +1 (305) 826-2290
USA Toll Free 1-888-522-0012
info@screenservice.net - www.screenservice.net

*Specifications
and characteristics
are subject to
change
without notice.*