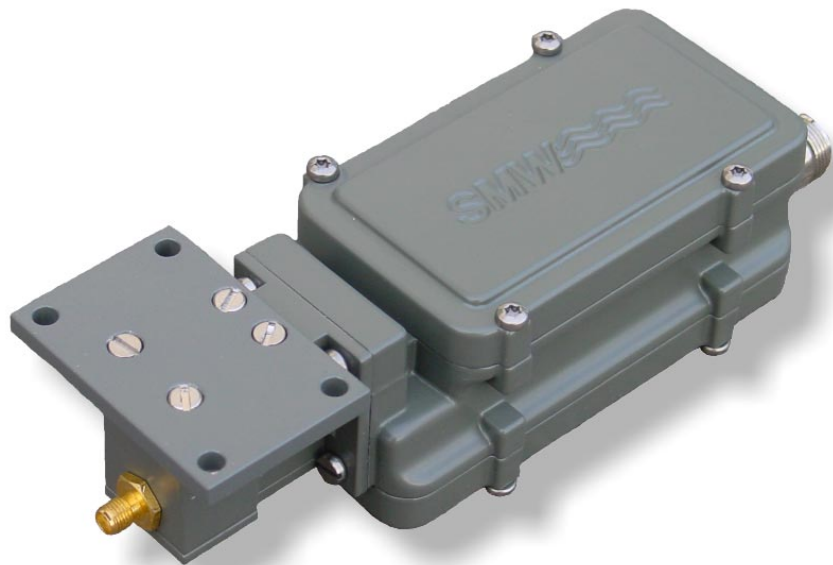


SMW Block Downconverters (BDC)



SMA-input and L-band out

The main application for the BDC is to convert a Ku-band signal from an LNA to L-band. The input is a SMA-connector and the output N- or F-connector.

The standard LOs are 9.75, 10.0, 10.25, 10.75 or 11.3 GHz, all models with Low Phase Noise and wide frequency ranges. Comes standard with 20 dB gain, but can be customized by request (min. 10 dB typ.). To limit the drift of frequency, over temperature, the LO-stability is +/- 25 or +/- 10 kHz.

Options include RF-shielding, Separate DC power input or customized LO.

All our converters are individually hand tuned to get the very best performance available for each unit. Quality and long term reliability is also essential. Therefore are all products tested according to a very extensive test program, which includes heating, cooling, water-proof testing and rigorous electrical testing. The very high reliability allows 2 Year Warranty.

Swedish Microwave was founded 1986 and, within Europe, is the oldest manufacturer of LNBS. In the standard product range we have DRO-LNBS, PLL-LNBS, LNAs, Block Downconverters (BDC), Up- & Down Converters, Quattro LNBS, Twin LNBS, Ortho mode transducers (OMT), Line Amplifiers and Feed horns.

Swedish Microwave is today one of the leading manufacturers of microwave components needed for satellite receiving equipment and other industrial products.

Specification SMW Block Downconverter (BDC)

SMW BDC +/- 25 kHz	9.75 GHz	10.0 GHz	10.25 GHz	10.75 GHz	11.3 GHz
Frequency range	10.7-11.8 GHz	10.95 - 12.1 GHz	11.2 - 11.7 GHz	11.7 - 12.75 GHz	12.25 - 12.75 GHz
LO frequency	9.75 GHz	10.0 GHz	10.25 GHz	10.75 GHz	11.3 GHz
Output frequency	950 - 2050 MHz	950 - 2100 MHz	950 - 1450 MHz	950 - 2000 MHz	950 - 1450 MHz

General Specification

LO stability (over temp.)	+/- 25 kHz (option +/- 10 kHz)
Gain	20 dB typ. (customed gain by request, min. 10 dB)
Gain variation within 30 MHz	+/- 0.4 dB
LO Phase noise typical	-70 dBc @ 1 kHz -85 dBc @ 5 kHz -90 dBc @ 10 kHz -110 dBc @ 100 kHz -120 dBc @ >1 MHz
LO radiation	-60 dBm
Image rejection	40 dB min
1 dB gain compression point	+5 dBm
Input	SMA-connector
Output	F-connector 75 ohm or N-connector 50 ohm
Output VSWR	2.1:1 max
DC power	12 - 24 V 250 mA max
Operating temperature	-30 to +60°C (-30 to +70°C for LO stab. +/- 10 kHz)
Dimensions	190 x 60 x 54.7 mm
Weight	712 g (F-connector) 728 g (N-connector)
Options	LO stability +/- 10 kHz over the temp. -10° to +70°C RF-shielding Sep. DC power supply Customized gain Specified LO. Min. 50-100 pcs

