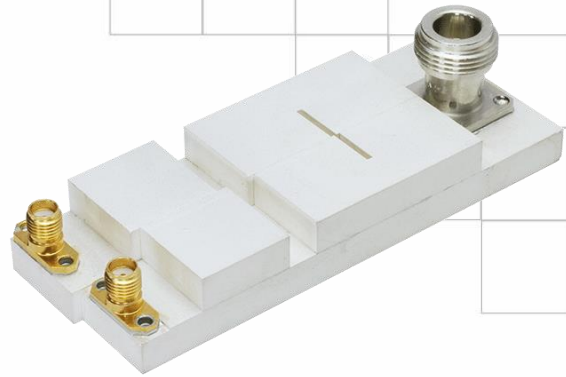


CMD007C - PRELIMINARY

Band 7 CMD Series Duplexer

Features

- Close-in rejection for 3GPP emissions compliance
- Low Loss with High Rejection
- Superior power handling and reliability
- Part of the CMD family of Metro-cell duplexers
- Available for either PCB mounting or with various connectors including SMA, SMP-Max, and other options.



Part Dimensions: ESTIMATE <100.5 x <40 x <14.5 mm • <175 g
Materials: Ag plated ceramic block

Applications

- Wireless Infrastructure applications
- High-performance carrier-grade active antennas and outdoor Metro-cells for 4-10W at the antenna port.
- Wide-band DAS, Repeaters, or small-cells requiring multi-channel or carrier aggregation

Description

Ceramic waveguide duplexer based on ClearPlex technology supports FDD frequency bands. Provides superior rejection, insertion loss, reliability, as well as both peak and average power handling compared to other duplexer technologies. Performance is comparable to compact Air Cavity in dramatically smaller size.

Electrical Specifications

Parameter	Frequency (MHz)	Typical at 25°C	Spec. at 25°C	Spec. over -40°C to +85°C
Nominal Impedance	-	50 ohms	-	-
Average Input Power	-	-	-	20.0 Watt max
Peak Input Power	-	-	-	200 Watt max
Passive Intermodulation (2x 5W)	-	-	-	-110 dBm
Lightning Surge Handling at Ant port	-	-	-	> 10 kA (TBC)

Antenna to UL Response

Passband Insertion Loss (10 MHz avg)	2500 - 2570		1.9 dB max
Passband Return Loss	2500 - 2570		16 dB min
Attenuation:	2620 - 2690		80 dB min

DL to Antenna Response

Passband Insertion Loss (10 MHz avg)	2620 - 2690		1.9 dB max
Passband Return Loss	2620 - 2690		16 dB min
Attenuation:	2500 - 2570		82 dB min

DL to UL Response

Attenuation for UL band	2500 - 2570		82 dB min
Attenuation for Transition band	2570 - 2620		55 dB min
Attenuation for DL band	2620 - 2690		80 dB min

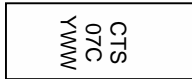
Note: CTS tests each unit to the critical specifications above. Subsequent audits may deviate due to repeatability among different test systems which shall not exceed these allowances.

Specification Allowance	
Insertion Loss	0.1 dB
Return Loss	1.0 dB
Attenuation	1.0 dB

Mechanical Drawing

PCB Layout (Top-Down View)

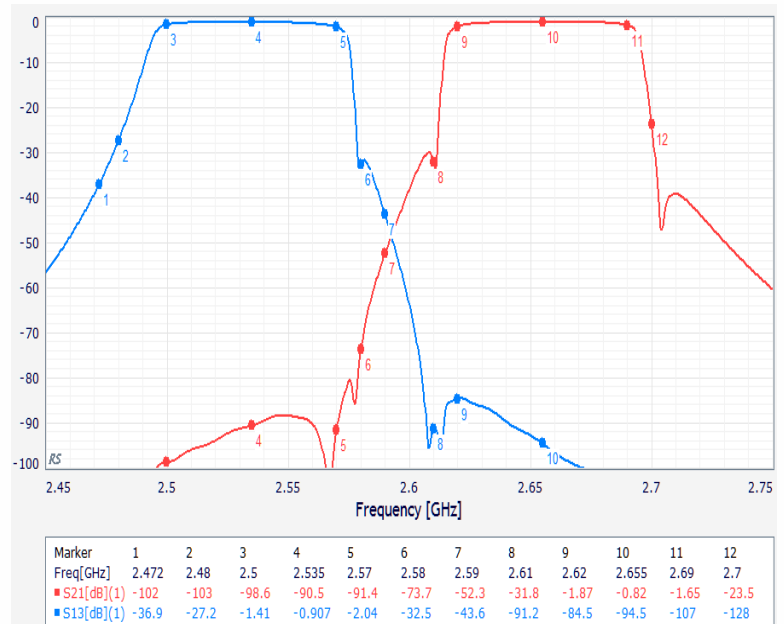
Packaging and Marking



Product is shipped in Pre-formed foam trays

The trays have xx slots each with one filter per slot. Boxes are packed with 12 Trays per box for a total of xx filters per box.

Electrical Response





Electrical Specifications – Supplemental Spectrum Specifications

Parameter	Frequency (MHz)	Typical at 25°C	Spec. at 25°C	Spec. over -40°C to +85°C
Antenna to UL Response				
Attenuation:	1 - 2200			65 dB min
	2200-2400			55 dB min
	2400 - 2472	35 dB		30 dB min
	2472 - 2480	25 dB		20 dB min
	2580 - 2620	32 dB		30 dB min
	2690 - 3550?			65 dB min?
DL to Antenna Response				
Attenuation:	1 - 2500			65 dB min
	2570- 2610	30 dB		27 dB min
	2700 - 2720	20 dB		15 dB min
	2720 - 2800	38 dB		35 dB min
	2800 - 2900			55 dB min
	2900 - 3550?			65 dB min?