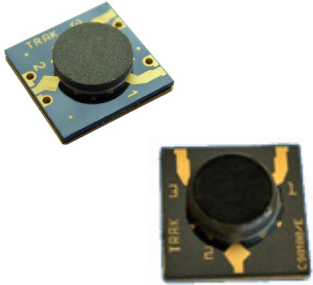


High power microstrip circulators

C89107/H, C85105/D and C90100/J



The C89107/H, C85105/D and C90100/J high power microstrip circulators are designed to be used for ground-based radars. They are intended to be used within a hybrid construction and must be wire bonded into the user's circuit. Some devices are partially magnetically shielded while others are not. If partial magnetic shielding is desired this must be incorporated at the design phase. Note that most devices produced for TRM applications are designed so that their ports are arranged in a Y configuration (devices used in Solid State Power Amplifiers tend to be arranged with their ports arranged in a T configuration). All high-power devices are guaranteed to be unconditionally linear under the worst-case operating conditions.

Specifications

High Power Microstrip	Performance		
Part Number	C89107/H	C85105/D	C90100/J
Function	Circulator	Circulator	Circulator
ICD	B107207	B107303	B108418
Non-operating	-55 to +180C	-55 to +180C	-55 to +180C
Acceptance	-20 to +80C	-20 to +80C	-20 to +80C
Impedance	50 Ohms	50 Ohms	50 Ohms
Operating Frequency	8.9 to 10.7GHz	9.0 to 10.0GHz	9.0 to 10.0GHz
Insertion Loss	0.30dB max	0.60dB	0.45dB max
Return Loss	20dB min	19dB min	20dB min
Isolation	N/A	N/A	N/A
Power handling	10W CW	50W CW	20W CW
Mass	0.5g nom	0.5g nom	0.5g nom
Resistance to case	>1 MOhm	>1 MOhm	>1 MOhm
Port arrangement	Y	Y	Y
Interface	Co-planar waveguide	Co-planar waveguide	Microstrip
Environment	Space, hybrid application	Space, hybrid application	Space, hybrid application