



MODEL NUMBER:

DC1G-100

DUAL DIRECTIONAL COUPLER

DESCRIPTION:

4-Port Dual Directional Coupler employs two, 3-Port Uni-Directional Couplers, internally connected, in tandem, providing measurement of both forward and reverse power. Ideal for simultaneously monitoring a system's forward and reverse power and for reflectometer measurements. Unlike the Bi-Directional Coupler, the directivity of the Dual Directional Coupler is unaffected by the loads on the coupled ports.

FEATURES:

- High Power
- Wide Bandwidths
- Small Size
- Flat Coupling
- Custom Designs Available

SPECIFICATIONS:

PARAMETER	SPECIFICATION
Type	DUAL
Coupling (dB)	40
Start Frequency (MHz)	0.01
Stop Frequency (MHz)	1000
Power (Watts CW)	100
Flatness (+/- dB)	0.5
Insertion Loss (dB)	0.6
VSWR (ML)	1.30:1
Directivity (dB)	20
Size (inches)	5.0 x 2.0 x 1.51

ELECTRICAL SPECIFICATIONS:

PARAMETER	SPECIFICATION
Frequency	0.01 - 1000 MHz
Power	100 W CW
Coupling	40 ± 1.0 dB Max.
Insertion Loss	0.6 dB Max.
Flatness	± 0.5 dB Max.
VSWR (ML)	1.30:1 Max.
Directivity	20 dB Min.

MECHANICAL SPECIFICATIONS:

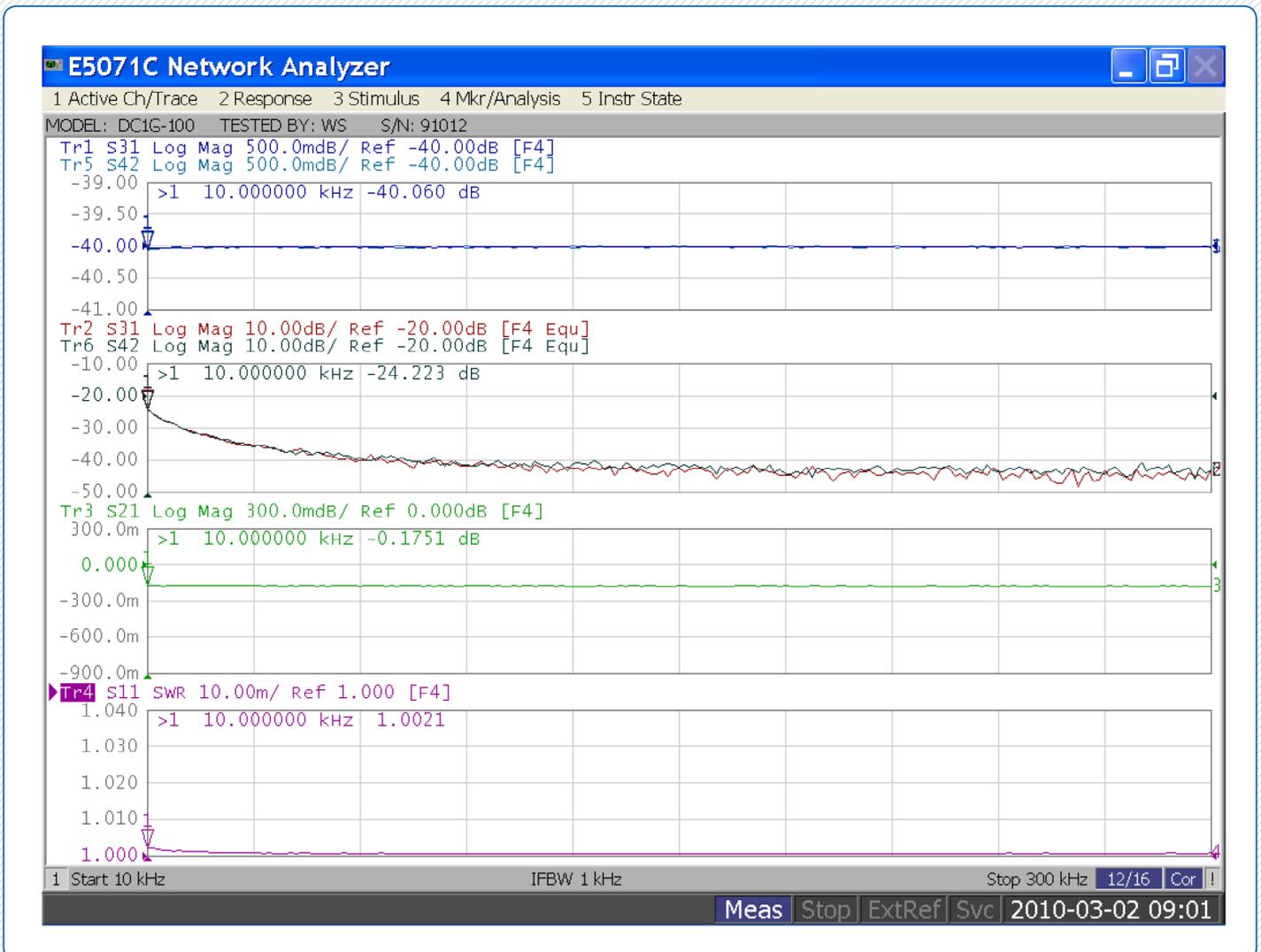
PARAMETER	SPECIFICATION
Type	Connectorized
Material	Aluminum 6061-T6
Surface Finish	Chem. Film Per MIL-DTL-5541F Type I Class 3 (Yellow Iridite) RoHS Compliant Available
Operating Temperature	-55°C to +75°C
Storage Temperature	-60°C to +85°C
Humidity	95% Non-Condensing
Size	5.0 x 2.0 x 1.51"

CONNECTOR CONFIGURATIONS:

MODEL	INPUT (J1)	OUTPUT (J2)	FWD (J3)	REV (J4)
DC1G-100	N Female	N Female	N Female	N Female

PERFORMANCE DATA (SPECIFICATIONS SUBJECT TO CHANGE WITHOUT NOTICE):

Plot 1: Coupling, Plot 2: Directivity, Plot 3: Insertion Loss, Plot 4: VSWR



OUTLINE DRAWING

