

rf/microwave instrumentation

DC7154A, M1 through M5 DC7154, M1, M2 Dual Directional Coupler 0.7-4.2GHz

The Model DC7154A is a dual directional coupler with excellent frequency range and power handling capability. The wide range assures flexibility in coupling medium power amplifiers to oscilloscopes, voltmeters, power meters, spectrum analyzers and other measuring instruments. The dual directional design allows the user to monitor both forward and reflected power, a much needed characteristic in RF susceptibility testing for amplifier overdrive protection, field control and load protection. Low insertion loss allows efficient coupling to the load.

The Model DC7154A is uniquely suited for use with our "S" series power amplifiers, other amplifiers operating within this frequency and power range, and our PM2000 Series power meters.

SPECIFICATIONS

FREQUENCY RANGE	0.7–4.2GHz	
POWER (Maximum Watts)	See Model Configurations	
COUPLING FACTOR	50 dB \pm 1.3 dB (includes flatness)	
FLATNESS	± 0.8dB	
DIRECTIVITY Typical Minimum		
INSERTION LOSS	0.4 dB maximum	
IMPEDANCE (Main Line)	50 ohms, VSWR 1.25:1 maximum	
CONNECTORS Main Line Coupled		
WEIGHT	0.29 kg (0.64 lbs)	
SIZE (WxHxD)	3.2 x 6.3 x 10.9 cm (1.3 x 2.5 x 4.3 in)	
EXPORT CLASSIFICATION	EAR99	

Model Configurations

Model Number	Main Line J1/J2	Coupler Connectors J3/J4	Power (Watts CW)
DC7154A	N(M)/N(F)	N(F)/N(F)	400
DC7154AM1	7-16 (M)/7-16 (F)	N(F)/N(F)	700
DC7154AM2	N(M)/N(F)	SMA(F)/SMA(F)	400
DC7154AM3	7-16 (M)/7-16 (M)	SMA(F)/SMA(F)	700
DC7154AM4	7-16 (F)/7-16 (F)	SMA(F)/SMA(F)	700
DC7154AM5*	7-16 (M)/7-16 (F)	N (F)/N(F)	700
DC7154	N(F)/N(F)	SMA(F)/SMA(F)	400
DC7154M1	N(F)/N(F)	N(F)/N(F)	400
DC7154M2	7-16 (F)/7-16 (F)	N(F)/N(F)	700

^{*}DC7154AM5 includes A2LA accredited calibration.