

# Miniature Quadrature Hybrid Couplers



RLC Electronics' Miniature 3 dB 90° Hybrid Couplers offer superior performance over the frequency range of 500 MHz to 18 GHz. These devices exhibit exceedingly high isolation with low VSWR. Stripline construction incorporating precision etch-

ing and tightly controlled material tolerances, ensures extraordinary reproducibility of electrical parameters as well as excellent phase and amplitude tracking. All units are packaged in lightweight solid aluminum cases with convenient mounting holes.

## Specifications

H<sup>-1-2</sup>

Model Number	Frequency Range (GHz)	Isolation (Min.)	VSWR (Max.)	AMPLITUDE BALANCE (dB)	LOSS Max. (dB)
H-0510-	50 – 1.00	25	1.25	±.50	.25
H-1020-	1.00 – 2.00	25	1.25	±.50	.25
H-1530-	1.50 – 3.00	25	1.25	±.50	.25
H-2040-	2.00 – 4.00	20	1.25	±.50	.30
H-3060-	3.00 – 6.00	20	1.25	±.50	.35
H-4080-	4.00 – 8.00	18	1.30	±.50	.40
H-5965-	5.90 – 6.50	20	1.25	±.25	.40
H-7011-	7.00 – 11.00	16	1.35	±.50	.50
H-8012-	8.00 – 12.40	16	1.35	±.50	.50

**Impedance:** 50 ohms

**Connector Type:** SMA Female

**Power:** 100 watts average 5KW peak

**Temperature:** -55° to +85° C

**Phase Tracking:** ±3° typical

**Environment:** MIL-E-5400, Class 1A

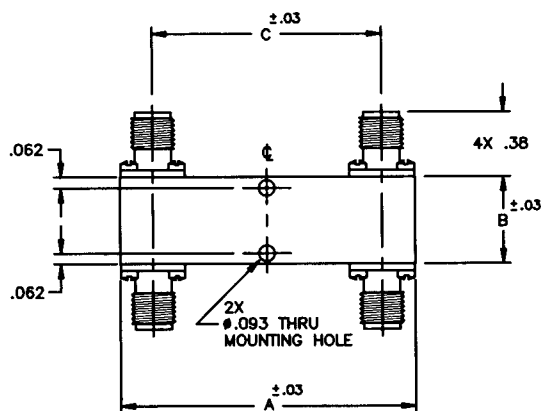
To designate the hybrid desired use:

(1) 0510, 1020, etc. for model number

(2) T for built in 2 watt termination, U for no termination

Example: H-2040-T a 2 to 4 GHz frequency band, internal termination

## Outline Drawing



H-1020 SHOWN

Tolerances unless otherwise specified are: .xx ±.02, .xxx ±.005

MODEL	A	B	C
H-0510	3.01	.50	2.56
H-1020	1.70	.50	1.32
H-1530	1.34	.50	.96
H-2040	1.04	.50	.66
H-3060	.86	.50	.48
H-4080	.82	.50	.44
H-5965	.82	.50	.44
H-7011	.82	.50	.44
H-8012	.82	.50	.44

Width of all units .38 in.

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