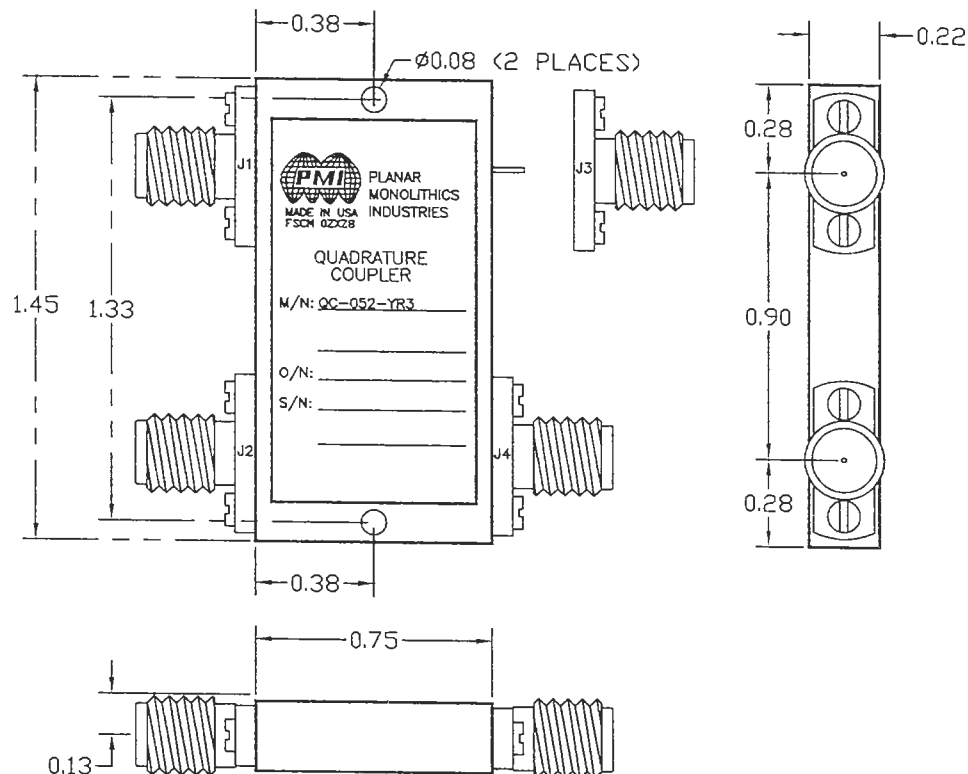


DESCRIPTION:

PMI'S QC-052-YR3 IS A 3dB, 90 DEGREE QUADRATURE COUPLER THAT WHEN A SIGNAL IS APPLIED TO ANY PORT WILL SPLIT EQUALLY BETWEEN THE PORTS ON THE OTHER SIDE WITH THE ADJACENT PORT REMAINING ISOLATED. THE PHASE RELATIONSHIP IS 0° TO THE PORT DIRECTLY OPPOSITE AND -90° TO THE PORT ON THE DIAGONAL.

SPECIFICATIONS:

- FREQUENCY RANGE: 0.5 TO 2.0 GHz
- RF INPUT POWER HANDLING: 10 WATT CW
- AMPLITUDE BALANCE: ± 2.5 dB MAXIMUM
- PHASE BALANCE: $90^\circ \pm 2.5^\circ$ MAXIMUM
- ISOLATION: 18 dB MINIMUM
- VSWR (ALL PORTS): 1.5:1 MAXIMUM
- WEIGHT: 1.0 OUNCE TYPICAL
- SIZE: 1.45" X 0.75" X 0.22"



PATH TABLE

	J1	J2	J3	J4
J1	INPUT	-3dB/-90°	-3dB/0°	ISOLATED
J2	-3dB/-90°	INPUT	ISOLATED	-3dB/0°
J3	-3dB/0°	ISOLATED	INPUT	-3dB/-90°
J4	ISOLATED	-3dB/0°	-3dB/-90°	INPUT

ENVIRONMENTAL RATINGS:

- TEMPERATURE: -55°C TO +85°C (OPERATING)
..... -65°C TO +125°C (STORAGE)
- HUMIDITY: MIL-STD-202F, METHOD 103B COND. B
- SHOCK: MIL-STD-202F, METHOD 213B COND. B
- VIBRATION: MIL-STD-202F, METHOD 204D COND. B
- ALTITUDE: MIL-STD-202F, METHOD 105C COND. B
- TEMPERATURE CYCLE: MIL-STD-202F, METHOD 107D COND. A

NOTE: SPECIFICATIONS WILL VARY OVER OPERATING TEMPERATURE
NOTE: THE ABOVE SPECIFICATIONS ARE SUBJECT TO CHANGE OR REVISION

ALL DIMENSIONS ARE IN INCHES
TOLERANCES:
X.XX ± 0.010
X.XXX ± 0.005

REVISIONS			
ZONE	REV.	DESCRIPTION	DATE
-	-	ORIGINAL RELEASE	6/5/03

M/N = MANUFACTURER PART NUMBER
O/N = OPTION NUMBER
S/N = SERIAL NUMBER

PART NO.		PLANAR MONOLITHICS INDUSTRIES FREDERICK, MARYLAND	
APPROVALS		DATE	
DRAWN <i>KAB</i>		6/5/03	
REDRAWN <i>JDT</i>		8/10/04	
ISSUED <i>DA</i>		9/3/04	
TITLE		PRODUCT FEATURE QC-052-YR3 0.5 TO 2.0 GHz MINIATURE QUADRATURE COUPLER	
SIZE	FSCM NO.	DWG NO.	REV.
A	02XZ8	100-4510-2	-
SCALE N:S		SHEET 1 of 3	