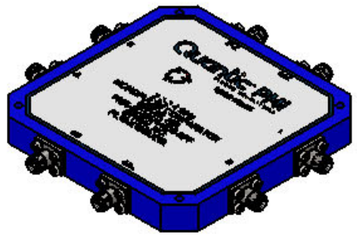
ZONE	REV.	DESCRIPTION	DATE	APPROVED
	A1	ORIGINAL RELEASE	5/10/2024	
	B2	ECN # 25-0107	4/3/2025	
	B3	ECN # 25-0121	4/21/2025	

DESCRIPTION:

PMI MODEL NO. PMC-2D22D4-6D8-SFF IS A MONOPULSE COMPARATOR THAT OPERATES OVER THE FREQUENCY RANGE OF 2.2 TO 2.4 GHz. IT HAS A MAXIMUM INSERTION LOSS OF 6.8 dB AND A MINIMUM ISOLATION OF 20 dB. THIS MODEL IS OUTFITTED WITH SMA FEMALE CONNECTORS.



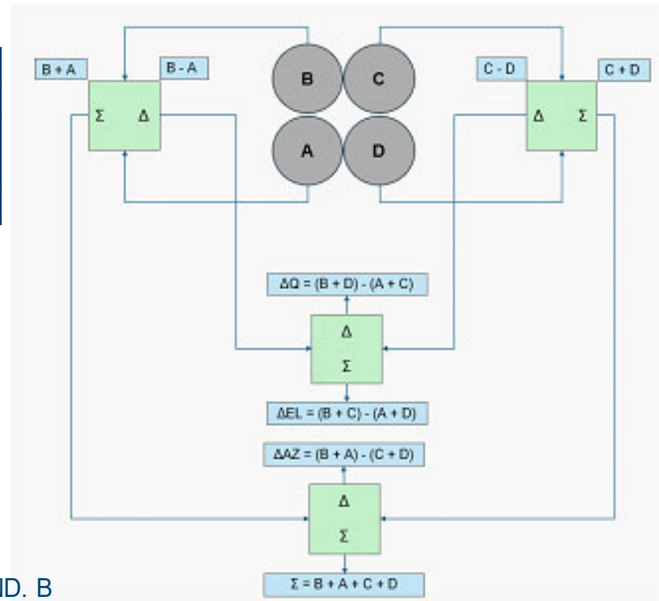
SPECIFICATIONS:

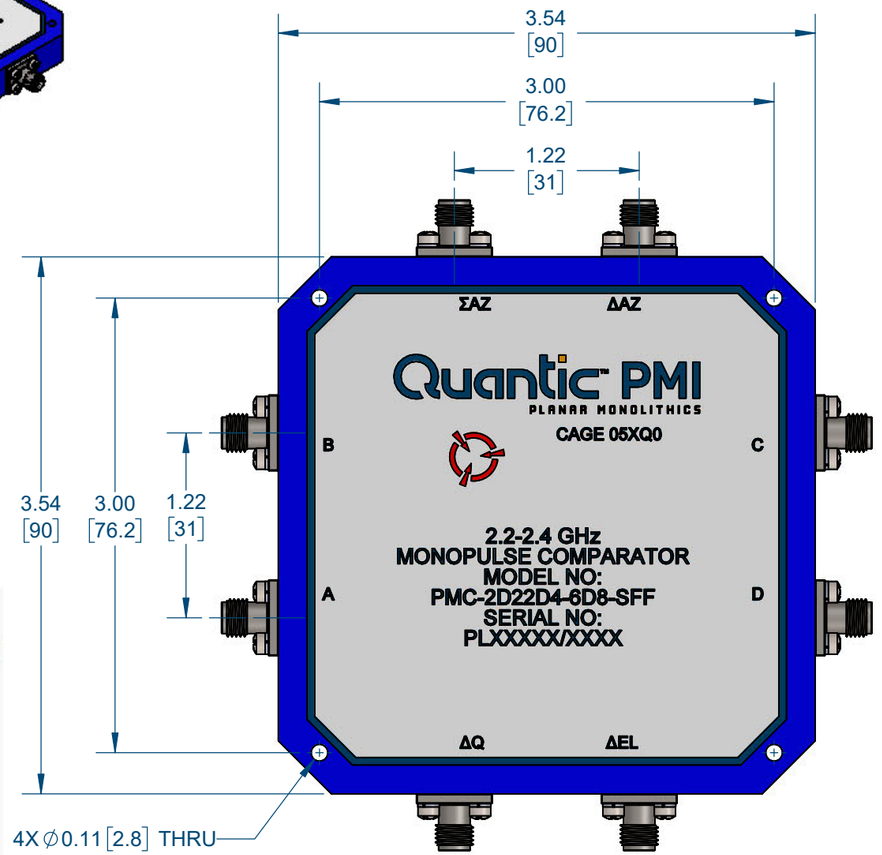
- FREQUENCY RANGE:..... 2.2 GHz TO 2.4 GHz
- INSERTION LOSS:..... 6.8 dB MAX.
- INSERTION LOSS WITHOUT 6 dB NOMINAL SPLIT:... 0.8 dB MAX.
- AMPLITUDE BALANCE:..... ±0.5 dB MAX.
- PHASE BALANCE:..... ±5° MAX.
- ISOLATION:..... 20 dB MIN.
- VSWR:..... 1.3:1 TYP.
  1.5:1 MAX.
- POWER HANDLING:..... AVERAGE: 10 W MAX.
  PEAK: 0.1 kW MAX.
- IMPEDANCE:..... 50 Ω
- CONNECTORS:..... SMA FEMALE
- FINISH:..... PAINTED BLUE

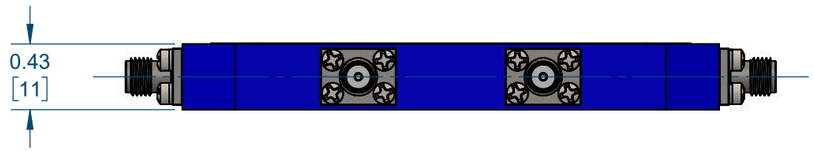
TABLE 1: PHASE OFFSET FOR EACH PORT IN REFERENCE TO NORMALIZED A TO ΣAZ

	ΣAZ	ΔAZ	ΔQ	ΔEL
INPUT A	0	-90	180	90
INPUT B	0	-90	0	-90
INPUT C	0	90	180	-90
INPUT D	0	90	0	90

BLOCK DIAGRAM:







ENVIRONMENTAL RATINGS:

- TEMPERATURE:..... -55°C TO +85°C (OPERATING)
  -65°C TO +125°C (STORAGE)
- OPERATING HUMIDITY:..... UP TO 90%, NON-CONDENSING
- SHOCK:..... MIL-STD-202, METHOD 213B COND. B
- VIBRATION:..... MIL-STD-202, METHOD 204D COND. B
- ALTITUDE:..... MIL-STD-202, METHOD 105C COND. B
- TEMPERATURE CYCLE:..... MIL-STD-202, METHOD 107D COND. A

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

PMI CONFIDENTIAL AND PROPRIETARY

UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES
TOLERANCES ARE:
FRACTIONS ± DECIMALS .XX ± 0.010 .XXX ± 0.005 ANGLES ±

MATERIAL:
FINISH:
NEXT ASSY | USED ON
APPLICATION

PART NO.

APPROVALS	DATE
DRAWN D. Hoschar	5/10/2024
REDRAWN	
ISSUED	

Quantic PMI
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ISO 9001 CERTIFIED

TITLE: Outline
PMC-2D22D4-6D8-SFF

SIZE	FSCM NO.	DWG NO.	REV.
B	05XQ0	27048400	B3

SCALE 1:1 SHEET 1 OF 1