

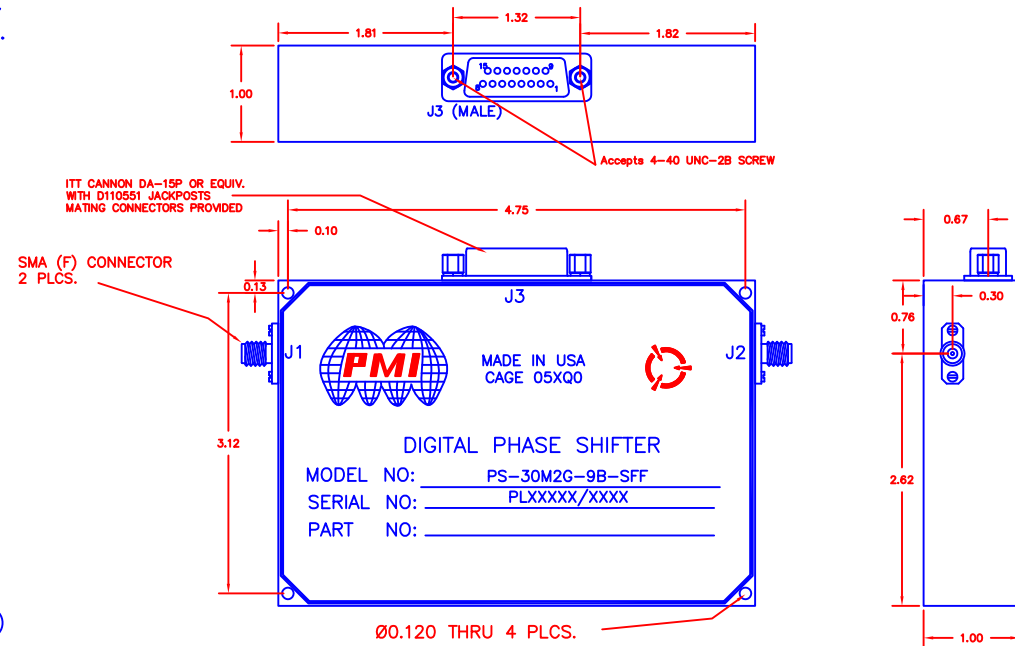
**DESCRIPTION**

PMI MODEL NUMBER PS-30M2G-9B-SFF IS A 0.03 TO 2.0 GHz DIGITALLY CONTROLLED ANALOG PHASE SHIFTER WITH CAPABILITY FOR PHASE SHIFTING FROM 0° TO 360°. THE UNIT CONSISTS OF AN ANALOG PHASE SHIFTER AND A DIGITAL-TO-ANALOG CONVERTER. NINE LOGIC INPUT LINES ALLOW 512 DISCRETE VALUES OF PHASE.

REVISIONS				
ZONE	REV.	DESCRIPTION	DATE	APPROVED
	—	PRELIMINARY	6/29/22	

**SPECIFICATIONS**

- FREQUENCY RANGE: 0.03 TO 2.0 GHz
- CONTROL: 9 BIT TTL
- INSERTION LOSS: 13dB MAX
- PHASE SHIFT: 360° TYP
- AMPLITUDE ERROR: ±1.0 dB TYP.
- PHASE SHIFT ERROR: ±10° TYP.
- SWITCHING SPEED: 500 nsec MAX.
- POWER SUPPLY
  - +V: +15V @ 250 mA
  - V: -15V @ 20 mA
- SIZE: 4.95" X 3.38" X 1.00"
- CONNECTORS (RF): SMA FEMALE
- CONNECTOR (CONTROL): 15 PIN SUBMINIATURE D (MALE)
- TEMPERATURE: 0°C TO +50° C
- FINISH: BLUE EPOXY POLIMIDE COATING IAW MIL-C-22750,TYPE I OVER EPOXY POLIMIDE PRIMER IAW MIL-P-23377, TYPE I, CLASS 1 OR 3.



ELECTRICAL CONNECTOR PIN ASSIGNMENTS	
PIN LETTER	FUNCTION
1	LOGIC INPUTS (LSB)
2	LOGIC INPUTS
3	LOGIC INPUTS
4	LOGIC INPUTS
5	LOGIC INPUTS
6	LOGIC INPUTS
7	LOGIC INPUTS
8	LOGIC INPUTS
9	LOGIC INPUTS (MSB)
10	NC
11	NC
12	NC
13	+ 15 VDC
14	- 15 VDC
15	GROUND

ALL DIMENSIONS ARE IN INCHES  
 TOLERANCES:  
 X.XX ±0.020  
 X.XXX ±0.010

PMI CONFIDENTIAL AND PROPRIETARY

**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

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APPROVALS		DATE	TITLE			
DRAWN <i>gpf</i>		6/29/22	PRODUCT FEATURE PS-30M2G-9B-SFF 0.03-2.0GHz, 0°-360° PHASE SHIFTER			
MODIFIED			SIZE	FSCM NO.	DWG NO.	REV.
ISSUED			A	05XQ0	PRELIMINARY	—
			SCALE	N:S	SHEET 1 OF 1	