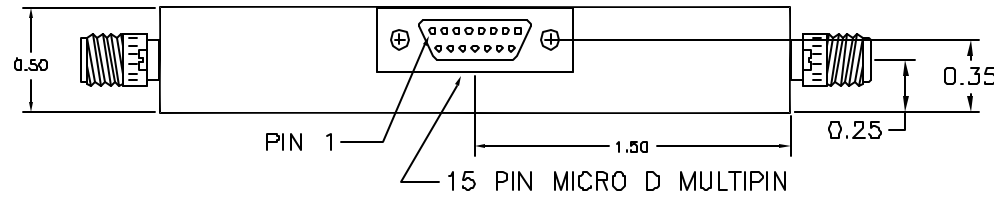


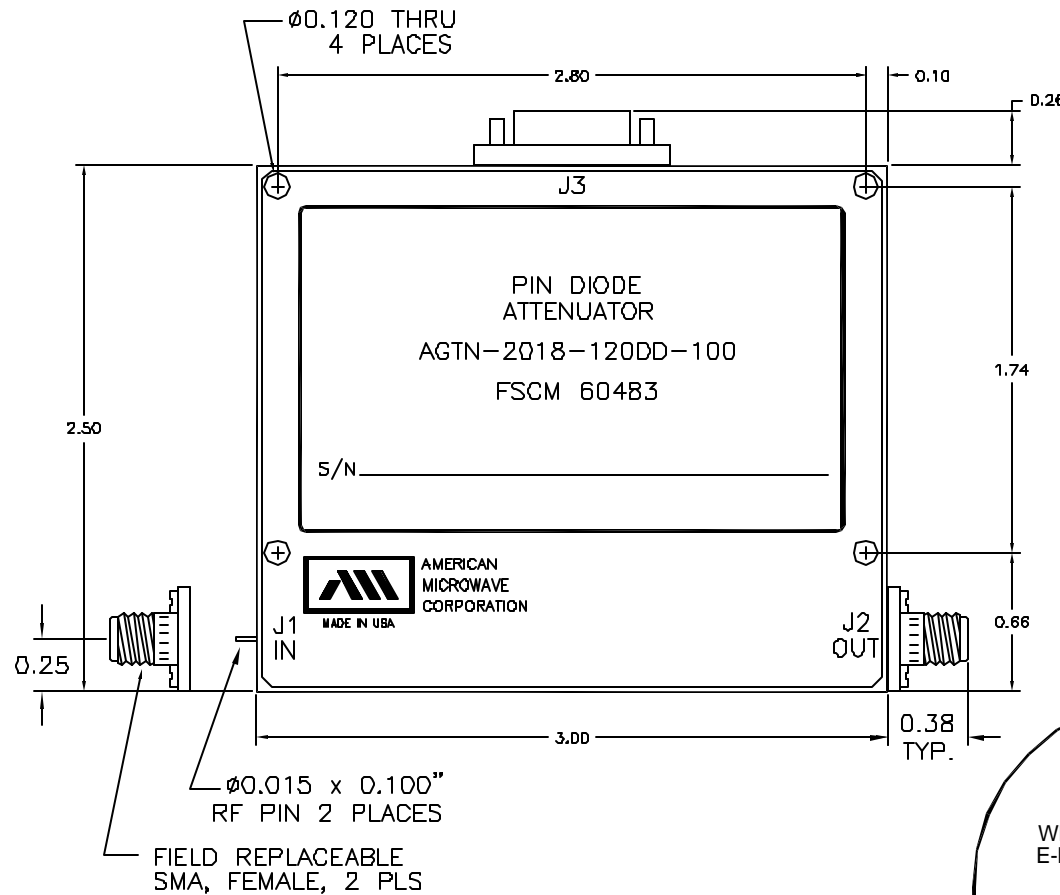
DESCRIPTION

AMC MODEL AGTN-2018-120DD-100 IS A BROAD BAND VARIABLE ATTENUATOR/MODULATOR, CONTROLLED BY 9 BIT POSITIVE TRUE BINARY LOGIC.

REVISIONS				
ZONE	REV.	DESCRIPTION	DATE	APPROVED
	A	ORIGINAL RELEASE	11/11/07	
	B	SEE ECN # 05-057	8/18/08	



MECHANICAL OUTLINE



AMERICAN MICROWAVE CORPORATION

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 ISO 9001:2000 CERTIFIED



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

APPROVALS		DATE	TITLE			
DRAWN	<i>RLS</i>	11/11/07	MECHANICAL OUTLINE			
MODIFIED	<i>PLAC</i>	8/18/08	AGTN-2018-120DD-100			
ISSUED			2-18 GHz, PROGRAMMABLE VARIABLE ATTENUATOR			
			SIZE	FSCM NO.	DWG NO.	REV.
			A	60483	100-4259	B
			SCALE	N:S	SHEET	2 OF 4

DESCRIPTION

AMC MODEL AGTN-2018-120DD-100 IS A BROAD BAND VARIABLE ATTENUATOR/MODULATOR, CONTROLLED BY 9 BIT POSITIVE TRUE BINARY LOGIC.

SPECIFICATIONS

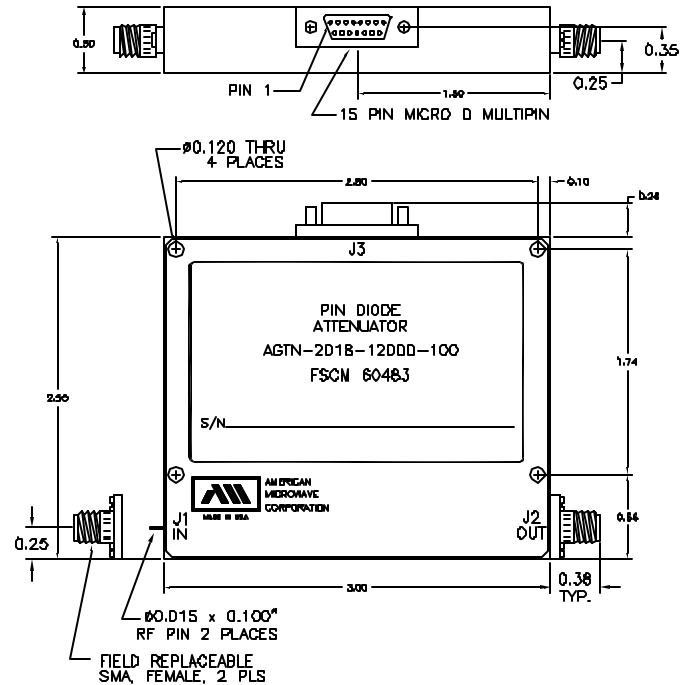
- FREQUENCY RANGE: 2.0 TO 18.0 GHz MINIMUM
- INSERTION LOSS: 11.0 dB MAXIMUM (10.5 dB TYPICAL)
- ATTENUATION FLATNESS
(± dB MAXIMUM): 0-30 dB ± 1.0 dB MAXIMUM
30-40 dB ± 1.5 dB MAXIMUM
40-50 dB ± 2.5 dB MAXIMUM
50-60 dB ± 4.0 dB MAXIMUM
60-80 dB ± 7.5 dB MAXIMUM
80-120 dB ± 13.0 dB MAXIMUM
- ATTENUATION ACCURACY: 0-20 dB ± 2.5 dB MAXIMUM
20-30 dB ± 1.5 dB MAXIMUM
30-50 dB ± 1.5 dB MAXIMUM
50-80 dB ± 2.0 dB MAXIMUM
80-120 dB ± 2.5 dB MAXIMUM
- SWITCHING TIME: < 1 μSec
- VSWR: 2.2:1 MAXIMUM
- RF POWER RATINGS:
OPERATING: +20 dBm CW MAXIMUM
+10 dBm (0.3 GHz OR BELOW)
SURVIVAL: +30 dBm CW MAXIMUM
+27 dBm (0.3 GHz OR BELOW)
- CONTROL: 9 BIT TRUE BINARY LOGIC
- POWER SUPPLY: +12 VDC @ 375 mA MAXIMUM
-12 VDC @ 50 mA MAXIMUM
- CONNECTORS:
RF INPUT/OUTPUT: SMA FEMALE
POWER AND CONTROLS: 15 PIN MICRO-D SUBMINIATURE (MALE)
MATING CONNECTOR FURNISHED
- SIZE: 3.00" x 2.50" x 0.50"

OPTIONS:

- A01: TWO SMA MALE RF CONNECTORS
- A02: J1 SMA MALE, J2 SMA FEMALE
- A03: MOUNTING SURFACE UNPAINTED
- A04: ANALOG CONTROLLED UNIT OF 20 dB/VOLT. PIN 2 IS USED AS CONTROL (OTHER CONTROL VOLTAGES AVAILABLE). FOR SOLDER PIN UNITS REFER TO DATA SHEET AGTN-2018-120D-100
- A05: ±15 VDC POWER SUPPLY
- A06: 0-30 dB RANGE
FLATNESS: 0-15 dB: ± 0.5 dB ACCURACY: 0-10 dB: ± 2.5 dB
15-20 dB: ± 1.0 dB 10-20 dB: ± 1.5 dB
20-25 dB: ± 1.5 dB 20-30 dB: ± 1.5 dB
25-30 dB: ± 2.0 dB
- A07: EXTENDED FREQUENCY RANGE UNITS AND OPTIONS
200M18 OPTION: EXTENDED BANDWIDTH (200 MHz TO 18 GHz)
300M18 OPTION: EXTENDED BANDWIDTH (300 MHz TO 18 GHz)
10M18 OPTION: EXTENDED BANDWIDTH (10 MHz TO 18 GHz) WITH SLOWER SPEED REFER TO DATA SHEETS AGT-2018-120DD-100 (DIGITAL CONTROL) OR AGT-2018-120D-100 (SOLDER PIN ANALOG CONTROLLED).
- 219 OPTION: EXTENDED BANDWIDTH (2 GHz TO 19 GHz)
- A08: 8 BIT TRUE BINARY LOGIC
- A09: FREQUENCY BAND OF 2 TO 18 GHz
- A10: 10 BIT TRUE BINARY LOGIC
- A11: 11 BIT TRUE BINARY LOGIC
- A12: 12 BIT TRUE BINARY LOGIC
- A13: FREQUENCY BAND OF 10 MHz TO 2 GHz REFER TO DATA SHEET AGT-2000-120D-100 (SLIM LINE), FOR DIGITAL VERSION REFER TO DATA SHEET AGT-2000-120DD-100 (SLIM LINE)
- A14: LATCHING STROBE (NOT AVAILABLE WITH OPTION A12)
- SC5: SPECIAL CUSTOMER SPECIFICATIONS

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

REVISIONS				
ZONE	REV.	DESCRIPTION	DATE	APPROVED
	A	ORIGINAL RELEASE	11/11/87	
	B	SEE ECN # 05-057	8/18/05	



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

ENVIRONMENTAL RATINGS:

- TEMPERATURE: -55°C TO +125°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

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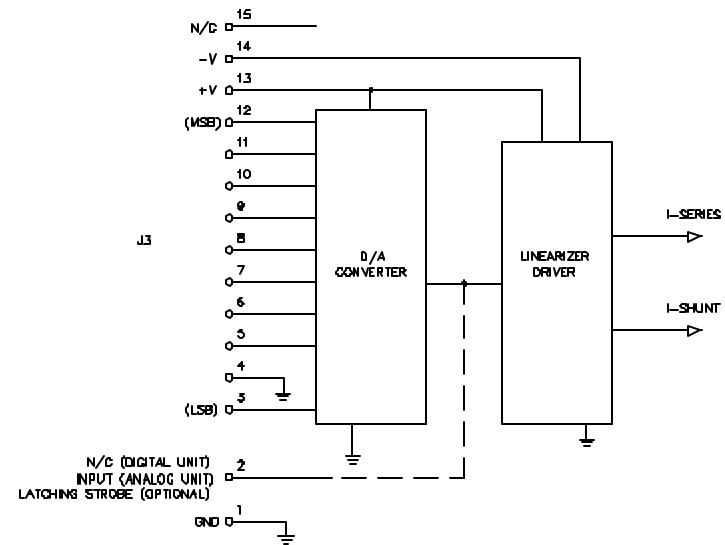
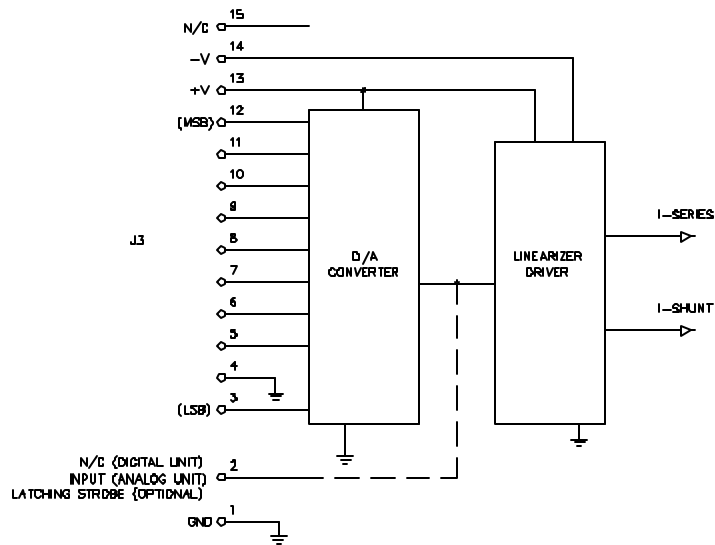
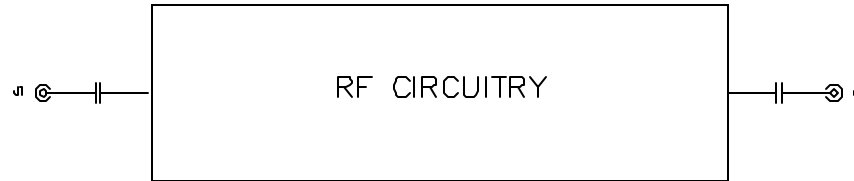
APPROVALS		DATE	TITLE		
DRAWN: <i>RLS</i>		11/11/87	PRODUCT FEATURE		
MODIFIED: <i>PLA</i>		8/18/05	AGTN-2018-120DD-100		
ISSUED:			SIZE	FSCM NO.	DWG NO.
			A	60483	100-4259
			SCALE	N:S	SHEET 1 OF 4
					REV. B

DESCRIPTION

AMC MODEL AGTN-2018-120DD-100 IS A BROAD BAND VARIABLE ATTENUATOR/MODULATOR, CONTROLLED BY 9 BIT POSITIVE TRUE BINARY LOGIC.

REVISIONS				
ZONE	REV.	DESCRIPTION	DATE	APPROVED
	A	ORIGINAL RELEASE	11/11/07	
	B	SEE ECN # 05-057	8/18/05	

BLOCK DIAGRAM



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APPROVALS		DATE	TITLE	
DRAWN <i>RLS</i>		11/11/07	FUNCTIONAL BLOCK DIAGRAM	
MODIFIED <i>PLAC</i>		8/18/05	AGTN-2018-120DD-100	
ISSUED			2-18 GHz, PROGRAMMABLE VARIABLE ATTENUATOR	
SIZE	FSCHM NO.	DWG NO.		
A	60483	100-4259		
SCALE N:S		SHEET		3 OF 4
		REV.		B