

TEST REPORT

ON

0.05 TO 2.0 GHz

**SINGLE POLE DOUBLE THROW
REFLECTIVE SWITCH MODULE**

AMC MODEL No:

SWN-218-2DR

OPTION 50M2, HPR2W, ISO60DB, PLUS15V, B02

Serial Number: 2MS312052

**DESIGNED
BY
R. Afable**

**TESTED
BY
R. Elad**

**REPORTED
BY
E. Elder**

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AMERICAN MICROWAVE CORPORATION., 7311-G Grove Road, Frederick, MD 21704
Tel: 301-662-4700 • Fax: 301-662-4938 • Email: sales@americanmicrowavecorp.com
Website: <http://www.americanmicrowavecorp.com>

ISO9001 : 2000 CERTIFIED

JDT ✕ *BR PA*
DRH *lc* *ESC* *JKM*

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**SINGLE POLE DOUBLE THROW
REFLECTIVE SWITCH MODULE
AMC MODEL No: SWN-218-2DR
OPTION 50M2, HPR2W, ISO60DB, PLUS15V, B02**

FEATURES:

- **0.05 TO 2.0 GHz FREQUENCY RANGE**
- **2.0 MAXIMUM LOW INSERTION LOSS**
- **60 dB MINIMUM HIGH ISOLATION**
- **DESIGNED FOR BROAD BAND**
- **DESIGNED FOR HIGH POWER CAPABILITIES**
- **± 15V POWER SUPPLIES**

SPECIFICATIONS:

- | | | |
|------------------|---|----------------------------------------------------------------------------|
| ● FREQUENCY | : | 0.05 TO 2.0 GHz |
| ● INSERTION LOSS | : | 2.0 dB MAXIMUM, 1.5 dB TYPICAL |
| ● ISOLATION | : | 60 dB MINIMUM, 70 dB TYPICAL |
| ● VSWR | : | IN / OUT: 1.5:1 |
| ● SPEED | : | RISE: 10 nS MAXIMUM |
| | : | FALL: 10 nS MAXIMUM |
| | : | DELAY ON: 10 nS TYPICAL, 20 nS MAXIMUM |
| | : | DELAY OFF: 10 nS TYPICAL, 20 nS MAXIMUM |
| ● POWER INPUT | : | 0.5 WATTS AVERAGE POWER MAXIMUM WITH
20% DUTY CYCLE, 2 WATTS PEAK POWER |
| ● CONNECTORS | : | |
| RF | : | SMA FEMALE |
| CONTROL | : | SOLDER PIN |
| ● SIZE | : | 1.20" (L) x 1.00" (W) x 0.50" (H) |
| ● WEIGHT | : | 1.5 OUNCE TYPICAL |

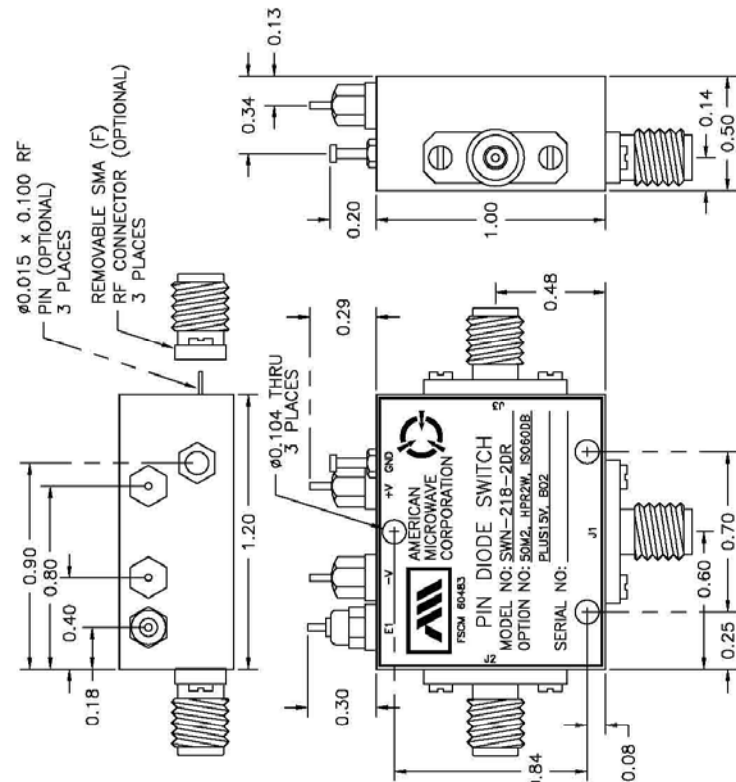
PRODUCT FEATURE

ZONE	REV.	DESCRIPTION	DATE	APPROVED
		ORIGINAL RELEASE JOB# 309166PE	10/20/03	

DESCRIPTION:
 AMC MODEL SWN-218-2DR, OPTION: 50M2, HPR2W, ISO60DB, PLUS15V, B02 IS A SINGLE POLE TWO THROW REFLECTIVE SWITCH MODULE WITH VERY LOW INSERTION LOSS, HIGH ISOLATION AND WITH INTEGRAL TTL DRIVER, DESIGNED FOR BROAD BAND OPERATIONS AND HIGH POWER CAPABILITIES.

SPECIFICATIONS:

- FREQUENCY: 0.05 GHz TO 2.0 GHz
- INSERTION LOSS: 2.0 dB MAXIMUM
1.5 dB TYPICAL
- ISOLATION: 60 dB MINIMUM
70 dB TYPICAL
- VSWR: IN/OUT: 1.5:1
- SPEED: RISE: 10ns MAXIMUM
FALL: 10ns MAXIMUM
DELAY ON: 10ns TYPICAL, 20ns MAXIMUM
DELAY OFF: 10ns TYPICAL, 20ns MAXIMUM
- POWER INPUT: 0.5 WATTS AVERAGE POWER MAXIMUM WITH 20% DUTY CYCLE
2 WATTS PEAK POWER
- CONTROL: TTL LOGIC "0"= J1-J2 ON "1"= J1-J3 ON
- POWER SUPPLY: +15V @ 100 mA MAXIMUM
-15V @ 75mA MAXIMUM
- CONNECTORS: SMA FEMALE
REF. CONTROL: SOLDER PIN
- SIZE: 1.20" (L) x 1.00" (W) x 0.50" (H)
- WEIGHT: 1.5 OUNCE TYPICAL



ENVIRONMENTAL RATINGS:

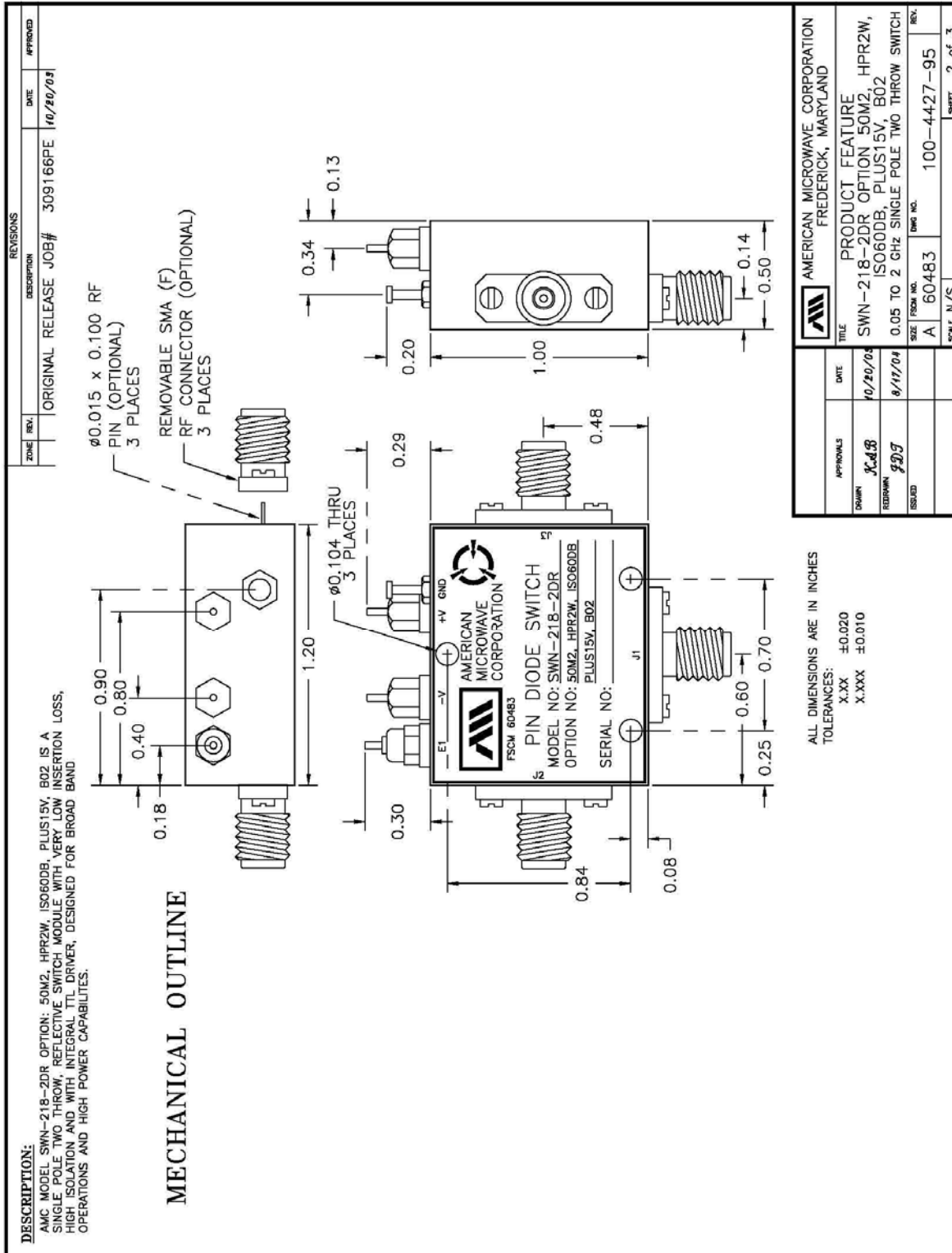
- TEMPERATURE: -55°C TO +85°C (OPERATING)
-55°C TO +25°C (STORAGE)
- HUMIDITY: MIL-STD-202F, METHOD 103B COND. B
- SHOCK: MIL-STD-202F, METHOD 213B COND. B
- VIBRATION: MIL-STD-202F, METHOD 2040 COND. B
- ALTITUDE: MIL-STD-202F, METHOD 105C COND. B
- TEMPERATURE CYCLE: MIL-STD-202F, METHOD 107D COND. A

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

APPROVALS	DATE	TITLE	DRAWN	REV.
KAB	10/20/03	AMERICAN MICROWAVE CORPORATION FREDERICK, MARYLAND		
JDS	6/11/04	PRODUCT FEATURE SWN-218-2DR OPTION 50M2, HPR2W, ISO60DB, PLUS15V, B02 0.05 TO 2 GHz SINGLE POLE TWO THROW SWITCH		
		SIZE: FROM NO. A 60483	DWG NO. 100-4427-95	SHEET 1 of 3

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

OUTLINE DRAWING

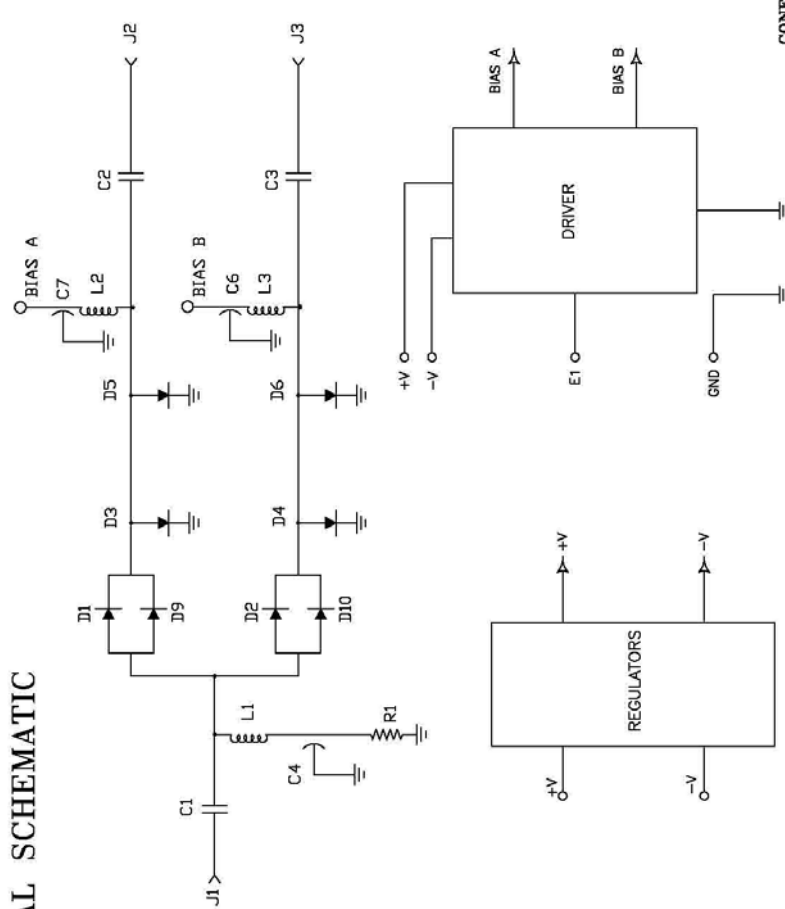


FUNCTIONAL SCHEMATIC

REVISIONS		DATE	APPROVED
ZONE	REV.	DESCRIPTION	
		ORIGINAL RELEASE JOB# 309168FE	10/20/03
		CUSTOMER: LOCKHEED MARTIN, CA	

DESCRIPTION:
 AMC MODEL SWN-218-2DR OPTION: 50M2, HPR2W, ISO60DB, PLUS15V, B02 IS A SINGLE POLE TWO THROW, REFLECTIVE SWITCH MODULE WITH VERY LOW INSERTION LOSS, HIGH ISOLATION AND WITH INTEGRAL TTL DRIVER, DESIGNED FOR BROAD BAND OPERATIONS AND HIGH POWER CAPABILITIES.

FUNCTIONAL SCHEMATIC



CONFIDENTIAL AND PROPRIETARY

AMERICAN MICROWAVE CORPORATION FREDERICK, MARYLAND		PRODUCT FEATURE	
DATE	10/20/03	SWN-218-2DR OPTION 50M2, HPR2W, ISO60DB, PLUS15V, B02	
APPROVALS	XC48	0.05 TO 2 GHz SINGLE POLE TWO THROW SWITCH	
DESIGN	JDJ	SIZE / FROM NO.	A / 60483
ISSUED		DRW. NO.	100-4427-95
		SCALE	N/S
		SHEET	3 of 3

