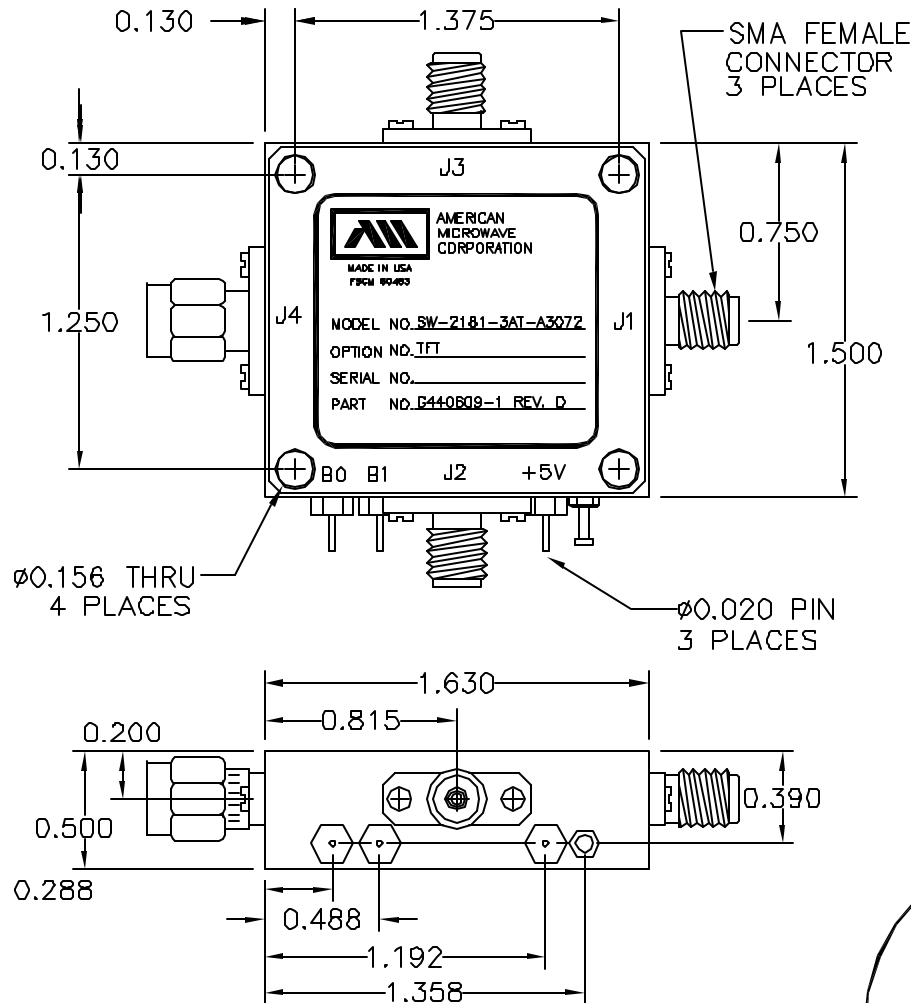


**DESCRIPTION**

AMC MODEL SW-2181-3AT-A3072 OPTION: TFT IS AN ABSORPTIVE/NON REFLECTIVE SINGLE POLE THREE THROW SWITCH MODULE WITH INTEGRAL TTL DRIVER, DESIGNED TO OPERATE WITH A SINGLE POSITIVE SUPPLY VOLTAGE.

| REVISIONS |      |                                   |         |          |
|-----------|------|-----------------------------------|---------|----------|
| ZONE      | REV. | DESCRIPTION                       | DATE    | APPROVED |
|           |      | - ORIGINAL RELEASE JOB# 509218X-1 | 9/22/05 |          |



**MECHANICAL OUTLINE**

| TRUTH TABLE |    |         |
|-------------|----|---------|
| B1          | B0 | RF PATH |
| 0           | 1  | J4-J1   |
| 1           | 0  | J4-J2   |
| 1           | 1  | J4-J3   |

**AMERICAN MICROWAVE CORPORATION**

7311-G GROVE ROAD  
FREDERICK, MARYLAND 21704 USA  
TEL: 301-662-4700 FAX: 301-662-4938  
WEBSITE: [www.americanmicrowavecorp.com](http://www.americanmicrowavecorp.com)  
E-MAIL: [sales@americanmicrowavecorp.com](mailto:sales@americanmicrowavecorp.com)  
ISO 9001:2000 CERTIFIED



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

| APPROVALS |            | DATE    | TITLE  |       |              |
|-----------|------------|---------|--|-------|--------------|
| DRAWN     | <i>FDS</i> | 9/22/05 | MECHANICAL OUTLINE<br>SW-2181-3AT-A3072<br>OPTION: TFT |       |              |
| CHECKED   |            |         | 2.7-2.9 GHz, SINGLE POLE THREE THROW SWITCH            | SIZE  | REV.         |
| ISSUED    |            |         | A  | 60483 | 100-7497     |
|           |            |         | SCALE N:S  |       | SHEET 2 OF 4 |

## DESCRIPTION

AMC MODEL SW-2181-3AT-A3072 OPTION: TFT IS AN ABSORPTIVE/NON REFLECTIVE SINGLE POLE THREE THROW SWITCH MODULE WITH INTEGRAL TTL DRIVER, DESIGNED TO OPERATE WITH A SINGLE POSITIVE SUPPLY VOLTAGE.

## SPECIFICATIONS

- FREQUENCY RANGE: ..... 2.7 TO 2.9 GHz
- INSERTION LOSS: ..... 2.0 dB MAXIMUM
- ISOLATION: ..... 80 dB MINIMUM
- RETURN LOSS: ..... -16 dB
- RISE TIME: ..... 500 nSec MAXIMUM
- FALL TIME: ..... 500 nSec MAXIMUM
- DELAY ON: ..... 1 uSec MAXIMUM
- DELAY OFF: ..... 1 uSec MAXIMUM
- RF POWER HANDLING: ..... 1 WATT CW MAXIMUM
- CONTROL: ..... TTL COMPATIBLE, UNIT LOAD  
3 INDIVIDUAL CONTROLS  
(SEE TRUTH TABLE)
- POWER SUPPLY: ..... +5V ±5% @ 200 mA MAXIMUM
- CONNECTORS:  
RF INPUT: ..... SMA MALE  
RF OUTPUT: ..... SMA FEMALE  
POWER/CONTROL: ..... SOLDER PIN
- SIZE: ..... 1.63" (L) x 1.50" (W) x 0.50" (H)

| TRUTH TABLE |    |         |
|-------------|----|---------|
| B1          | B0 | RF PATH |
| 0           | 1  | J4-J1   |
| 1           | 0  | J4-J2   |
| 1           | 1  | J4-J3   |

## OPTIONS:

- TFT: ..... THREADED FEEDTHRU DESIGN

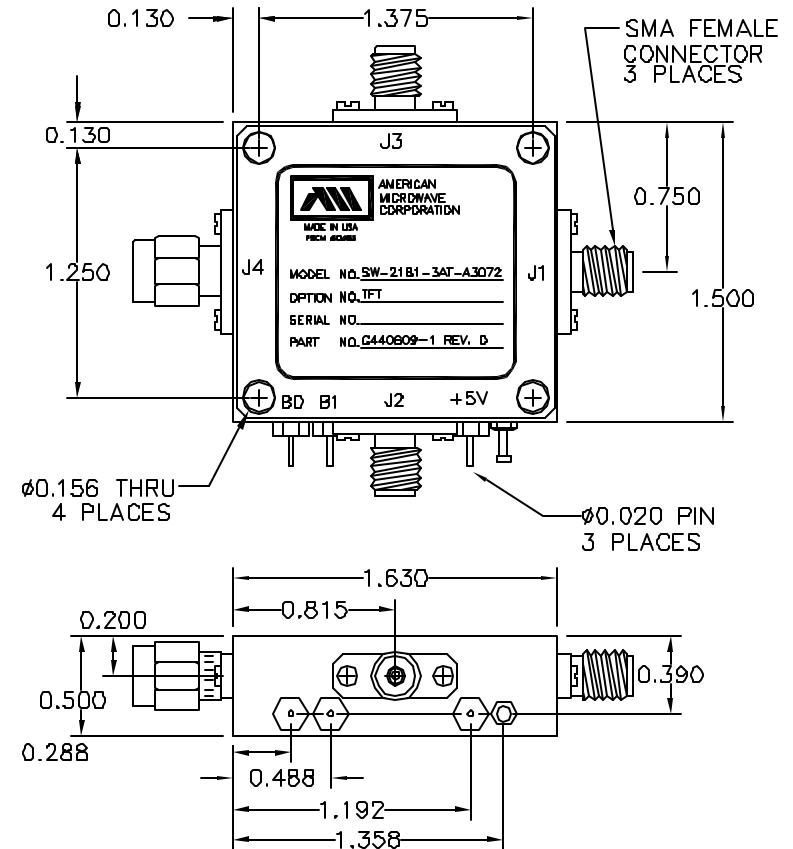
## ENVIRONMENTAL RATINGS:

- 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:  
XXX ±0.020  
X.XXX ±0.010

| REVISIONS |      |                                 |         |          |
|-----------|------|---------------------------------|---------|----------|
| ZONE      | REV. | DESCRIPTION                     | DATE    | APPROVED |
|           | -    | ORIGINAL RELEASE JOB# 509218X-1 | 9/22/05 |          |



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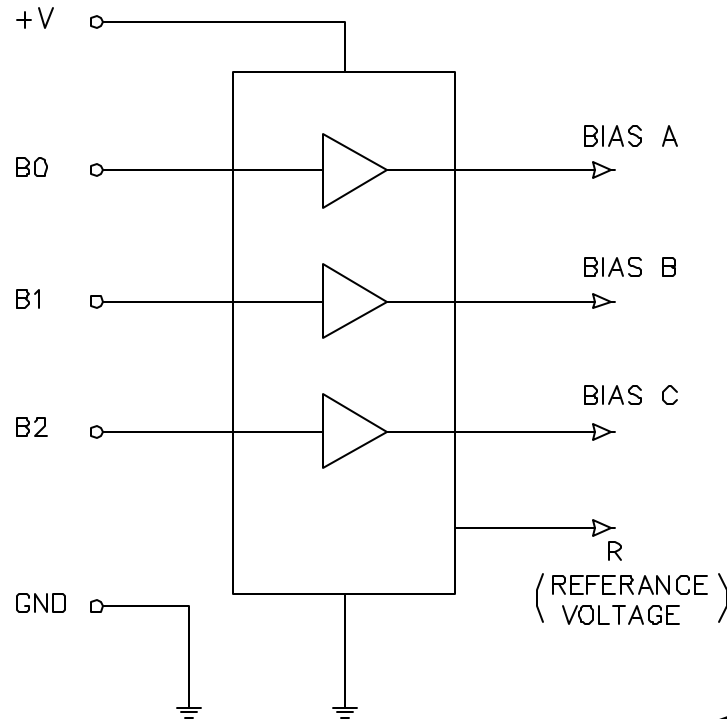
| APPROVALS |            | DATE    | TITLE   |          | REV.         |
|-----------|------------|---------|---|----------|--------------|
| DRAWN     | <i>FDS</i> | 9/22/05 | PRODUCT FEATURE<br>SW-2181-3AT-A3072<br>OPTION: TFT |          | -            |
| CHECKED   |            |         | SIZE  | FSCH NO. | DWG NO.      |
| ISSUED    |            |         | A   | 60483    | 100-7497     |
|           |            |         | SCALE   | N:S      | SHEET 1 OF 4 |

**DESCRIPTION**

AMC MODEL SW-2181-3AT-A3072 OPTION: TFT IS AN ABSORPTIVE/NON REFLECTIVE SINGLE POLE THREE THROW SWITCH MODULE WITH INTEGRAL TTL DRIVER, DESIGNED TO OPERATE WITH A SINGLE POSITIVE SUPPLY VOLTAGE.

| REVISIONS |      |                                 |         |          |
|-----------|------|---------------------------------|---------|----------|
| ZONE      | REV. | DESCRIPTION                     | DATE    | APPROVED |
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**FUNCTIONAL BLOCK DIAGRAM**



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|           |  |       |          |   |        |
|-----------|--|-------|----------|---|--------|
| APPROVALS |  | DATE  |          | TITLE                                       |        |
| DRAWN     |  | DATE  |          | FUNCTIONAL BLOCK DIAGRAM                    |        |
| CHECKED   |  | DATE  |          | SW-2181-3AT-A3072                           |        |
| ISSUED    |  | DATE  |          | OPTION: TFT                                 |        |
|           |  |       |          | 2.7-2.9 GHz, SINGLE POLE THREE THROW SWITCH |        |
|           |  | SIZE  | FSCM NO. | DWG NO.                                     | REV.   |
|           |  | A     | 60483    | 100-7497                                    | -      |
|           |  | SCALE | N:S      | SHEET                                       | 3 OF 4 |