NPN SILICON RF POWER TRANSISTOR

DESCRIPTION:

The **ASI AM80912-015** is designed for avionics applications, including JTIDS. It is housed in a Hermetic Package.

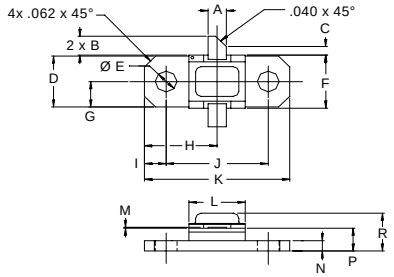
FEATURES:

- Internal Input/Output Matching Network
- P_G = 8.1 dB at 15 W/ 1215 MHz
- ***Omnigold***™ Metalization System
- 28 V Operations
- Common Base configuration

MAXIMUM RATINGS

I_C	1.8 A
V_{CC}	32 V
P_{DISS}	50 W @ T_C = 25 °C
T_J	-65 °C to +250 °C
T_{STG}	-65 °C to +200 °C
θ_{JC}	3.0 °C/W

PACKAGE STYLE .310 2L FLG



DIM	MINIMUM inches / mm	MAXIMUM inches / mm
A	.095 / 2.41	.105 / 2.67
B	.100 / 2.54	.120 / 3.05
C	.050 / 1.27	
D	.286 / 7.26	.306 / 7.77
E	.110 / 2.79	.130 / 3.30
F	.306 / 7.77	.318 / 8.08
G	.148 / 3.76	
H	.400 / 10.16	
I	.119 / 3.02	
J	.552 / 14.02	.572 / 14.53
K	.790 / 20.07	.810 / 20.57
L	.300 / 7.62	.320 / 8.13
M	.003 / 0.08	.006 / 0.15
N	.052 / 1.32	.072 / 1.83
P	.118 / 3.00	.131 / 3.33
R		.230 / 5.84

CHARACTERISTICS T_C = 25 °C

SYMBOL	TEST CONDITIONS	MINIMUM	TYPICAL	MAXIMUM	UNITS
BV_{CBO}	I_C = 10 mA	55			V
BV_{CER}	I_C = 10 mA R_{BE} = 10 Ω	55			V
BV_{EBO}	I_E = 1 mA	3.5			V
I_{CES}	V_{CE} = 28 V V_{BE} = 0 V			2.0	mA
h_{FE}	V_{CE} = 5.0 V I_C = 500 mA	15		150	---
P_G	V_{CC} = 28 V P_{OUT} = 15 W f = 960 - 1215 MHz	8.1	8.9		dB
η_C	P_{IN} = 2.3 W	45	49		%

Pulse format: 6.4 µsec on 6.6 µsec off, repeat for 3.3 ms, Then off for 4.5125 ms
Duty Cycle: Burst 49.2%, overall 20.8%

Specifications are subject to change without notice.