

NPN RF POWER TRANSISTOR

DESCRIPTION:

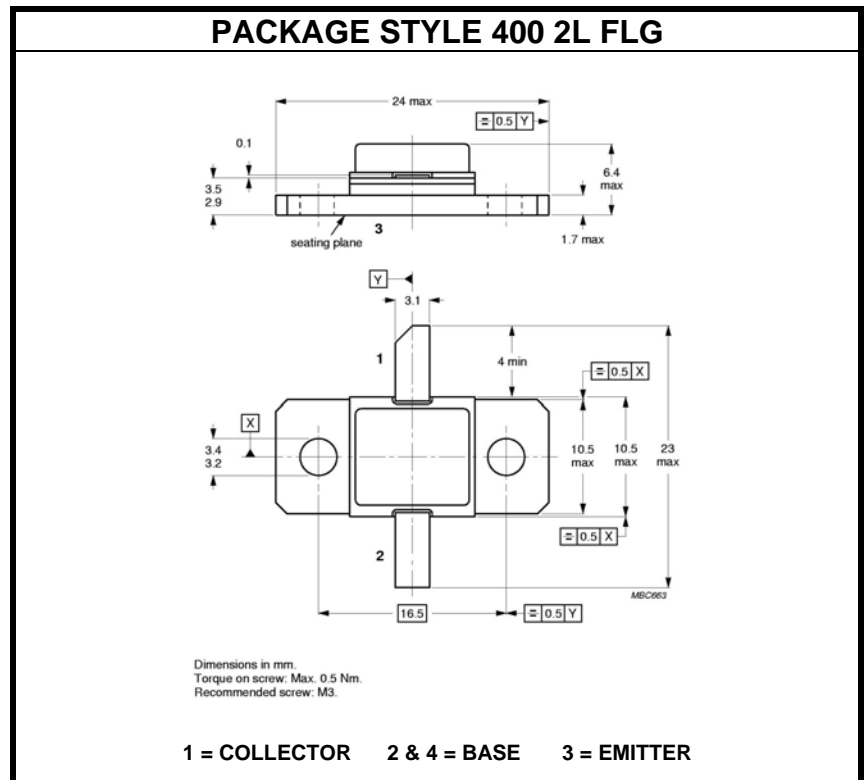
The **AM82731-012** is a Common Base Device Designed for Pulsed S-Band Pulse output and driver Radar Amplifier Applications.

FEATURES INCLUDE:

- Input/Output Matching
- Gold Metallization
- Emitter Ballasting

MAXIMUM RATINGS

| | |
|-------------------------|-------------------------------|
| I_C | 2.0 A |
| V_{CC} | 46 V |
| P_{DISS} | 50 W @ T _C ≤ 50 °C |
| T_J | -65 °C to +250 °C |
| T_{STG} | -65 °C to +200 °C |
| θ_{JC} | 4.0 °C/W |


CHARACTERISTICS T_C = 25 °C

| SYMBOL | TEST CONDITIONS | MINIMUM | TYPICAL | MAXIMUM | UNITS |
|-------------------------|---|---------|---------|---------|-------|
| BV_{CBO} | I _C = 7.0 mA | 55 | | | V |
| BV_{CER} | I _C = 7.0 mA R _{BE} = 10 Ω | 55 | | | V |
| BV_{EBO} | I _E = 1.0 mA | 3.5 | | | V |
| I_{CES} | V _{CE} = 40 V | | | 0.5 | mA |
| h_{FE} | V _{CE} = 5 V I _C = 600 mA | 30 | | 300 | --- |
| P_{OUT} | V _{CC} = 40 V P _{IN} = 3.0 W f = 2.7 to 3.1 GHz | 12 | | | W |
| η_C | | 30 | | | % |
| P_G | | 6.0 | | | dB |

Note: Pulse Width = 100 μS
Duty Cycle = 10%