

# NPN SILICON RF POWER TRANSISTOR

**DESCRIPTION:**

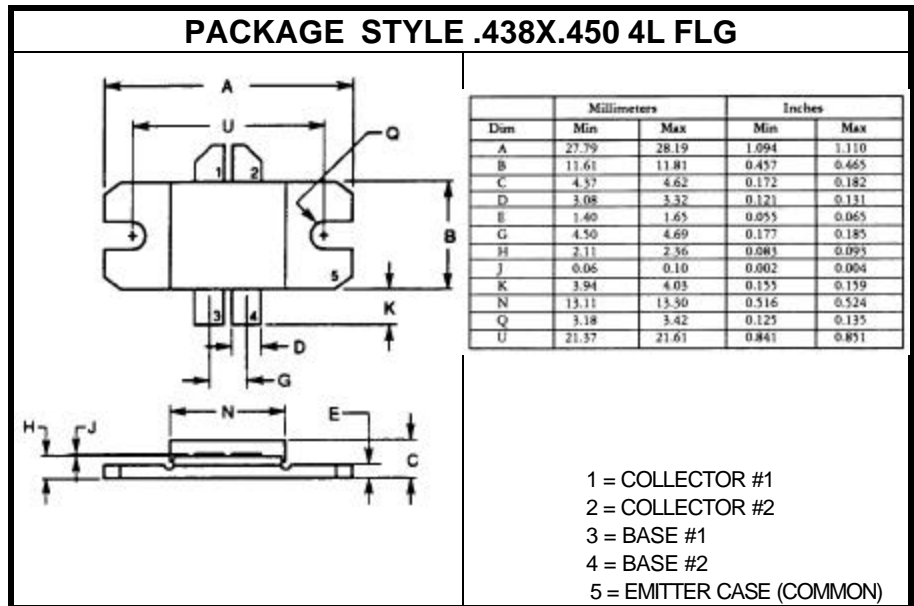
The **SD1489** is a Class AB Push Pull, Device Designed for 28 V, Broadband Applications in the 470 MHz to 860 MHz Spectrum.

**FEATURES INCLUDE:**

- Internal Input Matching
- Common Emitter Configuration
- Emitter Ballasting
- Gold Metelization

**MAXIMUM RATINGS**

<b>I<sub>C</sub></b>	8.0 A
<b>V<sub>CB</sub></b>	45 V
<b>P<sub>DISS</sub></b>	175 W @ T <sub>C</sub> = 25 °C
<b>T<sub>J</sub></b>	-65 °C to +200 °C
<b>T<sub>STG</sub></b>	-65 °C to +150 °C
<b>q<sub>JC</sub></b>	1.0 °C/W


**CHARACTERISTICS** T<sub>C</sub> = 25 °C

SYMBOL	TEST CONDITIONS	MINIMUM	TYPICAL	MAXIMUM	UNITS
<b>BV<sub>CEO</sub></b>	I <sub>C</sub> = 200 mA	30			V
<b>BV<sub>CER</sub></b>	I <sub>C</sub> = 20 mA      R <sub>BE</sub> = 10 Ω	40			V
<b>BV<sub>CBO</sub></b>	I <sub>C</sub> = 50 mA	45			V
<b>BV<sub>EBO</sub></b>	I <sub>E</sub> = 10 mA	3.0			V
<b>I<sub>CEO</sub></b>	V <sub>CE</sub> = 28 V			5.0	mA
<b>h<sub>FE</sub></b>	V <sub>CE</sub> = 5.0 V      I <sub>C</sub> = 3.0 A	10		80	---
<b>C<sub>ob</sub></b>	V <sub>CB</sub> = 28 V      f = 1.0 MHz		70		pF
<b>P<sub>out</sub></b>	V <sub>CE</sub> = 28 V      I <sub>cq</sub> = 2X250 mA      f = 860 MHz	50			W
<b>G<sub>p</sub></b>		6.8			dB
<b>h<sub>C</sub></b>			45		%