

Features

- Plastic package has Underwriters Laboratory Flammability Classification 94V-0
Flame Retardant Epoxy Molding Compound
- Low forward voltage, high current capability.
- Low power loss, high efficiency
- High surge capability
- Ultra fast recovery time, high voltage.
- In compliance with EU RoHS

Mechanical Data

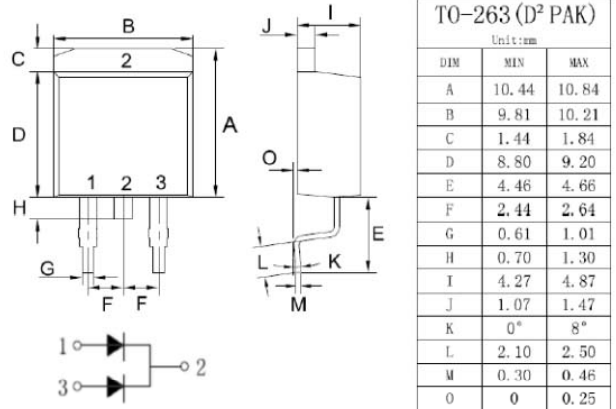
Case: TO-263 molded plastic

Terminals: Plated Leads Solder able per MIL-STD-750, Method 2026

Polarity: As marked

Mounting Position: Any

TO-263 (D² PAK)



Maximum Ratings and Electrical Characteristics

Ratings at 25°C ambient temperature unless otherwise specified.

Single phase, half wave, 60 Hz, resistive or inductive load

For capacitive load, derate current by 20%

PARAMETER	SYMBOL	MURB 1010CT	MURB 1020CT	MURB 1030CT	MURB 1040CT	MURB 1050CT	MURB 1060CT	UNITS
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	100	200	300	400	500	600	V
Maximum RMS Voltage	V_{RMS}	70	140	210	280	350	420	V
Maximum DC Blocking Voltage	V_{DC}	100	200	300	400	500	600	V
Maximum Average Forward (See Figure 1)	$I_{F(AV)}$	10						A
Peak Forward Surge Current : 8.3ms single half sine-wave superimposed on rated load(JED EC method)	I_{FSM}	90						A
Forward Voltage Drop $T_A=25^{\circ}C$ @ $I_F=10A$	V_F	1.0		1.3		1.7		V
Maximum DC Reverse Current at $T_J=25^{\circ}C$ Rated DC Blocking Voltage $T_J=100^{\circ}C$	I_R	10 500						μA
Typical Junction Capacitance (Note1)	C_j	170				130		pF
Maximum Reverse Recovery Time (Note2)	t_{rr}	35						ns
Typical Thermal Resistance (Note)	R_{QJC}	3.5						$^{\circ}C/W$
Operating Junction and Storage Temperature Range	T_J, T_{STG}	-55 to +155						$^{\circ}C$

NOTES:

1. Measured at 1 MHz and applied reverse voltage of 4.0 VDC.
2. Reverse Recovery Test Conditions: $I_F=0.5A$, $I_R=1A$, $I_{rr}=0.25A$.
3. Thermal resistance from Junction to case.

RATINGS AND CHARACTERISTIC CURVES

