

RoHS Compliant Product
A suffix of "-C" specifies halogen & lead-free

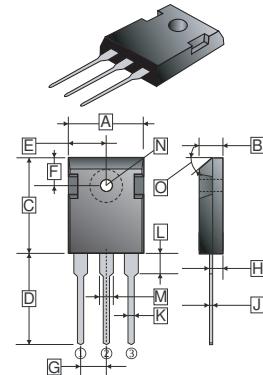
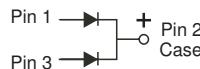
TO-247

FEATURES

- Low forward voltage drop
- High current capability
- High reliability
- High surge current capability
- Epitaxial construction

MECHANICAL DATA

- Case: Molded plastic
- Epoxy: UL94V-0 rate flame retardant
- Lead: Lead solderable per MIL-STD-202 method 208 guaranteed
- Polarity: As Marked
- Mounting position: Any
- Weight: 6.1 grams (Approximately)



REF.	Millimeter		REF.	Millimeter	
	Min.	Max.		Min.	Max.
A	15.38	16.20	H	1.98	REF.
B	4.20	5.36	J	0.45	0.85
C	20.63	22.38	K	2.80	3.10
D	-	21.50	L	-	4.50
E	7.87	8.13	M	2.92	3.23
F	4.32	7.20	N	3.25 Ø	3.65 Ø
G	5.20	5.70	O	30°	

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating 25°C ambient temperature unless otherwise specified.

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

For capacitive load, derate current by 20%.

TYPE NUMBER	SYMBOL	VALUES	UNITS
Maximum Recurrent Peak Reverse Voltage	V_{RRM}	100	V
Working Peak Reverse Voltage	V_{RSM}	100	V
Maximum DC Blocking Voltage	V_{DC}	100	V
Maximum Average Forward Rectified Current, See Fig. 1	I_F	20	A
Per Leg		40	
Per Device			
Peak Forward Surge Current, 8.3 ms single half sine-wave Superimposed on rated load (JEDEC method)	I_{FSM}	250	A
Maximum Instantaneous Forward Voltage ($I_F=20$ A, $T_A = 25^\circ\text{C}$, per leg)	V_F	0.87	V
Maximum Instantaneous Forward Voltage ($I_F=20$ A, $T_A = 125^\circ\text{C}$, per leg)		0.70	
Maximum DC Reverse Current at Rated DC Blocking Voltage	I_R	0.05 12	mA
$T_A = 25^\circ\text{C}$			
$T_A = 125^\circ\text{C}$			
Typical Junction Capacitance (Note 1)	C_J	500	pF
Typical Thermal Resistance (Note 2)	$R_{\theta JA}$	2.0	°C / W
Voltage Rate of Change (Rated V_R)	dv / dt	10000	V / μs
Operating Temperature Range	T_J	-50 ~ +150	°C
Storage Temperature Range	T_{STG}	-65 ~ +175	°C

NOTES:

1. Measured at 1MHz and applied reverse voltage of 5.0V D.C.
2. Thermal Resistance Junction to Case.

RATINGS AND CHARACTERISTIC CURVES

