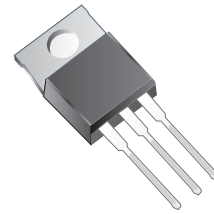


C3045CT-G

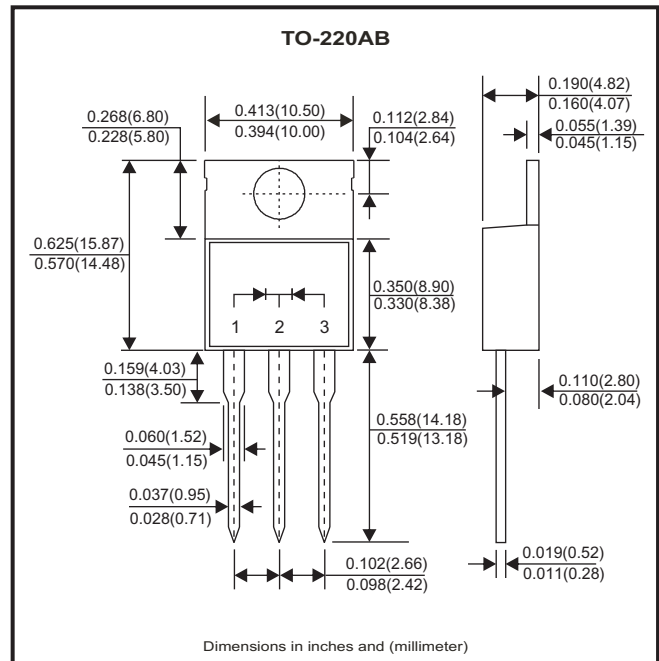
Voltage: 45 V
Current: 30 A
RoHS Device


Features

- Low forward voltage drop
- Excellent high temperature stability
- Fast switching capability

Mechanical Data

- Epoxy: UL 94-V0 rate flame retardant.
- Case: JEDEC TO-220AB, molded plastic body.
- Polarity: Solder plated, Solderable per MIL-STD-750, Method 2026.
- Polarity: As marked on the body.
- Mounting position: Any
- Weight: 2.25 grams(Approx.).



Maximum Rating and Electrical Characteristics

Ratings at 25°C ambient temperature unless otherwise specified.
 Single phase, half wave, 60Hz, resistive or inductive load.
 For capacitive load derate current by 20%.

Parameter	Conditions	Symbol	Value	Unit
Peak repetitive reverse voltage		V_{RRM}	45	V
Working peak reverse voltage		V_{RWM}	45	V
DC blocking voltage		V_{RM}	45	V
Forward rectified current (total device)		I_o	30	A
Forward surge current (per diode)	8.3ms single half sine-wave superimposed on rate load (JEDEC method)	I_{FSM}	150	A
Peak repetitive reverse surge current (per diode)	2us - 1KHz	I_{RRM}	2	A
Thermal resistance (1) (per diode)	Junction to Case	$R_{\theta JC}$	2	°C/W
Operating temperature range		T_J	-65 to +150	°C
Storage temperature range		T_{STG}	-65 to +150	°C

Parameter	Conditions	Symbol	Min.	Typ.	Max.	Unit
Forward voltage drop (per diode)	$I_F = 15A, T_J = 25^\circ C$	V_F			550	mV
	$I_F = 15A, T_J = 125^\circ C$				500	
Reverse current (per diode)	$V_R = V_{RRM}, T_J = 25^\circ C$	I_R			0.5	mA
	$V_R = V_{RRM}, T_J = 125^\circ C$				100	

NOTES:

1. Thermal resistance from junction to case per leg, with heatsink size(1.35" x 0.95" x 0.18") Al-plate.

Company reserves the right to improve product design , functions and reliability without notice.

Rating and Characteristic Curves (C3045CT-G)

Fig.1 - Instantaneous Forward Characteristics (per diode)

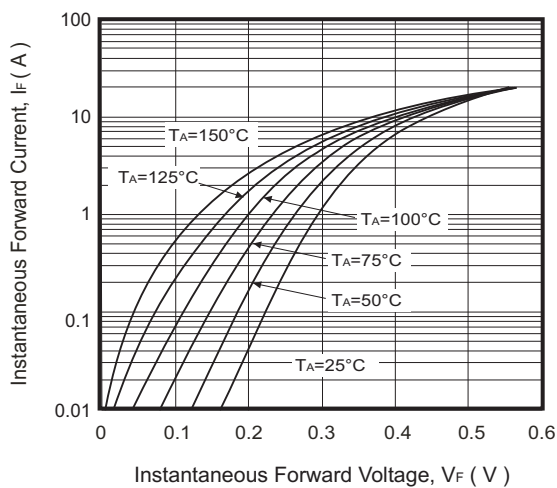


Fig.2 - Forward Current Derating Curve (Per Diode)

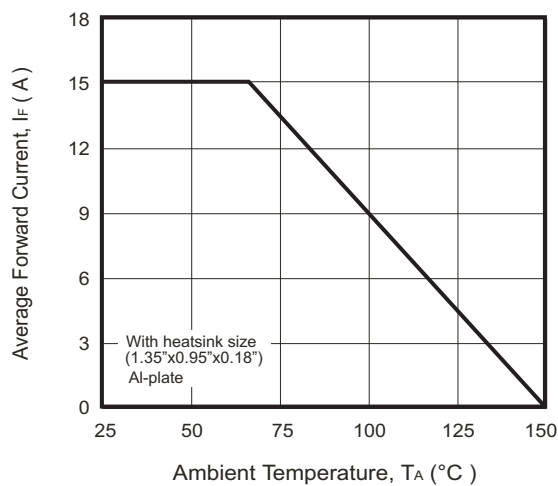
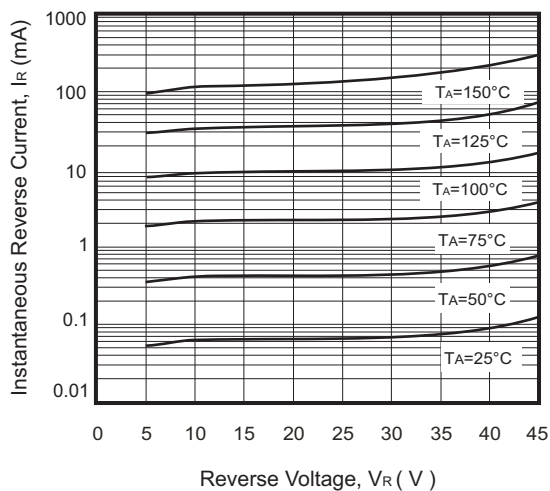
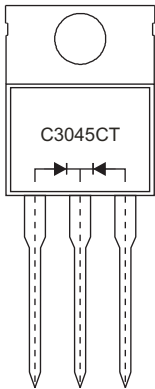


Fig.3 - Reverse Characteristics (per diode)



Marking Code

Part Number	Marking code
C3045CT-G	C3045CT



Standard Packaging

Case Type	TUBE PACK		
	TUBE (pcs)	BOX (pcs)	CARTON (pcs)
TO-220AB	50	1,000	5,000