

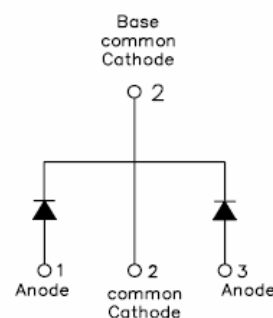
MUR2030CT ULTRAFAST PLASTIC RECTIFIER

Applications:

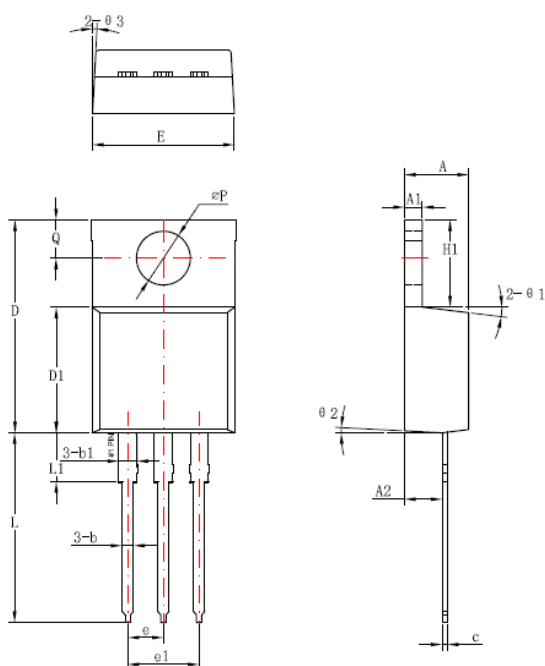
- Switching Power Supply
- Power Switching Circuits
- General Purpose

Features:

- Ultra-Fast Switching
- High Current Capability
- Low Reverse Leakage Current
- High Surge Current Capability
- Plastic Material has UL Flammability Classification 94V-0
- This is a Pb – Free Device
- All SMC parts are traceable to the wafer lot
- Additional testing can be offered upon request

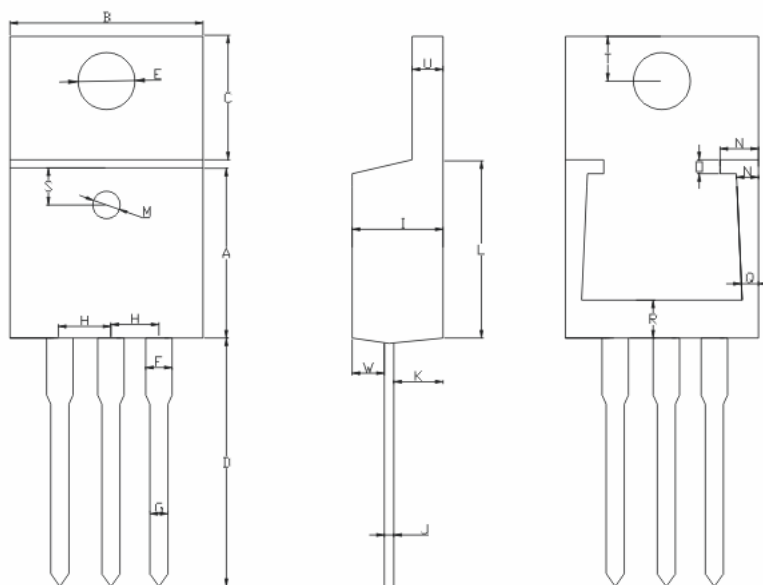


Mechanical Dimensions: In mm



Symbol	Dimensions in millimeters		
	Min	Typical	Max
A	4.42	4.57	4.72
A1	1.17	1.27	1.37
A2	2.59	2.69	2.89
b	0.71	0.81	0.96
b1		1.27	
c	0.36	0.38	0.61
D	14.94	15.24	15.54
D1	8.85	9.00	9.15
E	10.01	10.16	10.31
e		2.54	
e1		5.06	
H1	6.04	6.24	6.44
L	12.7	13.56	13.78
L1		3.5	
ΦP	3.74	3.84	4.04
Q	2.54	2.74	2.94
Θ1		7°	
Θ2		3°	
Θ3		4°	

OPTION1

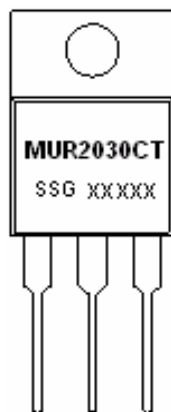


A: 8.5 ± 0.5	B: 9.5 ± 0.5	C: 6.4 ± 0.5	D: 14.1 ± 1
E: 3.84 ± 0.03	F: 1.27 ± 0.03	G: 0.85 ± 0.10	H: 2.54 ± 0.025
I: 4.6 ± 0.5	J: 0.38 ± 0.015	K: 2.75 ± 0.25	L: 9.0 ± 0.5
M: 1.5 ± 0.05	N: 1.8 ± 0.05	O: 0.5 ± 0.05	P: 1.2 ± 0.05
Q: 0.9 ± 0.05	R: 3.2 ± 0.05	S: 1.55 ± 0.05	T: 2.8 ± 0.15
U: 1.27 ± 0.05	W: 1.27 ± 0.03		

OPTION 2 (SR)

TO-220AB

Marking Diagram:



Where XXXXX is YYWWL

MUR = Device Type
 20 = Forward Current (20A)
 30 = Reverse Voltage (300V)
 CT = Configuration
 SSG = SSG
 YY = Year
 WW = Week
 L = Lot Number

Cautions: Molding resin
 Epoxy resin UL:94V-0

Ordering Information:

Device	Package	Shipping
MUR2030CT	TO-220AB (Pb-Free)	50pcs / tube

For information on tape and reel specifications, including part orientation and tape sizes, please refer to our Tape and Reel Packaging Specification.

Maximum Ratings:

Characteristics	Symbol	Condition	Max.	Units
Peak Inverse Voltage	V_{RWM}	-	300	V
Max. Average Forward	$I_{F(AV)}$	50% duty cycle @Tc=95°C, rectangular wave form	20	A
Max. Peak One Cycle Non-Repetitive Surge Current	I_{FSM}	50Hz, Half Sine wave	125	A



Electrical Characteristics:

Characteristics	Symbol	Condition	Max.	Units
Max. Forward Voltage Drop (Per leg)*	V _{F1}	@ I _F =10A, Pulse, T _J = 25°C	1.5	V
	V _{F2}	@ I _F =10A, Pulse, T _J = 125°C	1.4	V
Max. Reverse Current (Per leg)*	I _{R1}	@V _R = rated V _R T _J = 25°C	10	μA
	I _{R2}	@V _R = rated V _R T _J = 125°C	500	μA
Max. Reverse Recovery Time (Per leg)*	t _{rr}	I _F =500mA, I _R =1A, and I _{rm} =250mA	35	ns

* Pulse width < 300 μs, duty cycle < 2%

Thermal-Mechanical Specifications:

Characteristics	Symbol	Condition	Specification	Units
Max. Junction Temperature	T _J	-	-55 to +150	°C
Max. Storage Temperature	T _{stg}	-	-55 to +150	°C
Maximum Thermal Resistance Junction to Case (Per Leg)	R _{θJC}	DC operation	1.5	°C/W
Approximate Weight	wt	-	2.0	g
Case Style		TO-220AB		



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