

# isc Thyristors

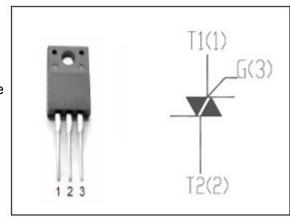
## BCR12PM-12LA

### **DESCRIPTION**

- · With TO-220F packaging
- Operating in 3 quadrants
- · High commutation capability
- Minimum Lot-to-Lot variations for robust device performance and reliable operation

### **APPLICATIONS**

- · Solid state relays; heating and cooking appliances
- · Switching applications



## ABSOLUTE MAXIMUM RATINGS(Ta=25℃)

SYMBOL	PARAMETER			UNIT
$V_{DRM}$	Repetitive peak off-state voltage			V
V <sub>RRM</sub>	Repetitive peak reverse voltage	600	V	
I <sub>T(RSM)</sub>	Average on-state current @Tc=113°C			A
I <sub>TSM</sub>	Surge non-repetitive on-state current	e on-state current 60HZ		
$P_{G(AV)}$	Average gate power dissipation ( over any 20 ms period )   @Tc=150 $^{\circ}$ C			W
Tj	Operating junction temperature			$^{\circ}$
T <sub>stg</sub>	Storage temperature			$^{\circ}$



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### **ELECTRICAL CHARACTERISTICS (Tc=25℃ unless otherwise specified)**

SYMBOL	PARAMETER	CONDITIONS			MIN	MAX	UNIT
I <sub>RRM</sub>	Repetitive peak reverse current	V <sub>R</sub> =V <sub>RRM</sub> Rated;	Tj=25℃;			50	μ <b>Α</b>
$I_{DRM}$	Repetitive peak off-state current	V <sub>D</sub> =V <sub>DRM</sub> Rated;	Tj=150℃			2000	
$V_{TM}$	On-state voltage	I <sub>T</sub> =20A				1.6	V
I <sub>GT</sub>	Gate-trigger current	V <sub>D</sub> =6V;R <sub>L</sub> =6 Ω ;RG=330 Ω II			30		
				II		30	mA
		III				30	
V <sub>GT</sub>	Gate-trigger voltage	V <sub>D</sub> =6V;R <sub>L</sub> =6 Ω ;RG=330 Ω				1.5	V
Rth (j-c)	Junction to case	Half cycle				3.5	°C/W

### **NOTICE:**

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