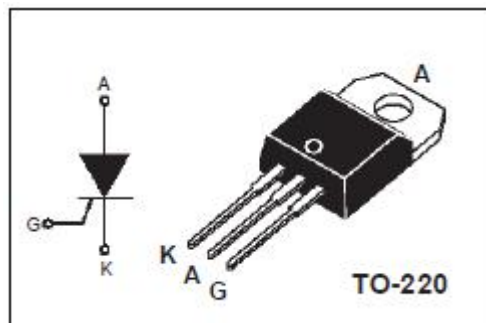


isc Thyristors

BT152-600R

APPLICATIONS

- It is suitable to fit all modes of control found in applications such as overvoltage crowbar protection, motor control circuits in power tools and kitchen aids, in-rush current limiting circuits, capacitive discharge ignition, voltage regulation circuits etc.
- Minimum Lot-to-Lot variations for robust device performance and reliable operation

ABSOLUTE MAXIMUM RATINGS($T_a=25^{\circ}\text{C}$)

SYMBOL	PARAMETER	MIN	UNIT
V_{DRM}	Repetitive peak off-state voltage	600	V
V_{RRM}	Repetitive peak reverse voltage	600	V
$I_{\text{T(AV)}}$	Average on-state current	13	A
$I_{\text{T(RMS)}}$	RMS on-state current	20	A
I_{TSM}	Surge non-repetitive on-state current $T_P=10\text{ms}$	200	A
$P_{\text{G(AV)}}$	Average gate power dissipation over any 20 ms period	0.5	W
T_j	Operating junction temperature	-40~125	$^{\circ}\text{C}$
T_{stg}	Storage temperature	-40~150	$^{\circ}\text{C}$

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ELECTRICAL CHARACTERISTICS (T_C=25°C unless otherwise specified)

SYMBOL	PARAMETER	CONDITIONS	MIN	MAX	UNIT
I _{RRM}	Repetitive peak reverse current	V _{RM} =V _{RRM} , R _{GK} = 220 Ω ,		5	μ A
				2	mA
I _{DRM}	Repetitive peak off-state current	V _{DM} =V _{DRM} , R _{GK} = 220 Ω		5	μ A
				2	mA
V _{TM}	On-state voltage	I _{TM} = 40A		1.75	V
I _{GT}	Gate-trigger current	V _D = 12 V; I _T = 0.1 A		32	mA
V _{GT}	Gate-trigger voltage	V _D = 12 V; I _T = 0.1 A		1.5	V
R _{th(j-c)}	Thermal resistance	Junction to case		1.1	°C/W

NOTICE:

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