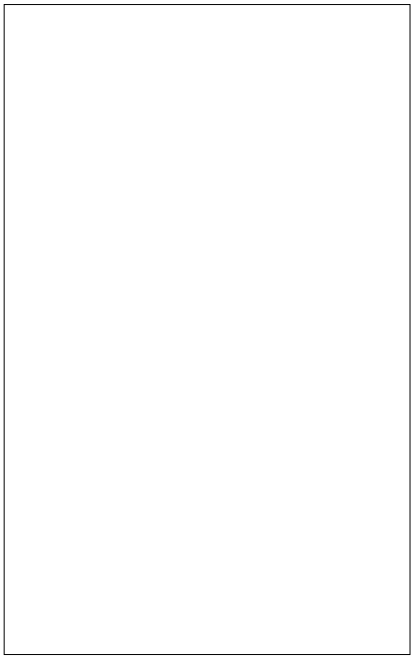
JCT825CH 25A SCR

Rev.A.1.1

DESCRIPTION:

With high ability to withstand the shock loading of large current, JCT825CH SCR provides high dV/dt rate with strong resistance to electromagnetic interference.It is especially



Peak gate power	P_{GM}	20	W
Peak pulse voltage (T_j=25 ; non-repetitive,off-state;FIG.7)	V_{pp}	0.5	kV

ELECTRICAL CHARACTERISTICS (T_j=25 unless otherwise specified)

Symbol	Test Condition	Value			Unit
		MIN.	TYP.	MAX.	
I_{GT}	V_D=12V R_L=33Ω	-	-	20	mA
V_{GT}		-	-	1	V
V_{GD}	V_D=V_{DRM} T_j=150 R_L=3.3kΩ	0.2	-	-	V
I_L	I_G=1.2I_{GT}	-	-	70	mA
I_H	I_T=500mA	-	-	60	mA
dV/dt	V_D=540V Gate Open T_j=125	00	-	-	V/μs
	V_D=540V Gate Open T_j=150	500	-	-	
t_{on}	I_G=20mA I_A=200mA I_R=20mA T_j=25	-	2	-	μs
t_{off}		-	50	-	

STATIC CHARACTERISTICS

Symbol	Parameter		Value(MAX.)	Unit
V_{TM}	I_{TM}=50A t_p=380μs	T_j=25	1.5	V
V_{TO}	Threshold voltage	T_j=150	0.7	V
R_D	Dynamic resistance	T_j=150	18	mΩ
I_{DRM}	V_D=V_{DRM} V_R=V_{RRM}	T_j=25	5	μA
I_{RRM}		T_j=150	8	mA

THERMAL RESISTANCES

Symbol	Parameter	Value	Unit
$R_{th(j-c)}$	junction to case (DC)	0.3	/W
$R_{th(j-a)}$	junction to ambient (DC)	60	/W

FIG.1: Maximum power dissipation versus RMS on-state current

FIG.2: RMS on-state current versus case temperature

ORDERING INFORMATION

Order code	Voltage V_{DRM}/V_{RRM} (V)	IGT(mA)	Package	Base qty. (pcs)	Delivery mode
JCT825CH	800	20	TO-220C	50	Tube

Document Revision History

Date	Revision	Changes
Jun.15, 2023	A.	

PACKAGE MECHANICAL DATA



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