Single Pulse Avalanche Energy (L=0.5mH, VGS=10V, Rg=25	E_{AS}	1200	mJ
Single Pulse Avalanche Energy (L=0.1mH,VGS=10V,Rg=25	E_{AS}	661	mJ

●Thermal resistance

Parameter	Symbol	Min.	Typ.	Max.	Unit
Thermal resistance, junction - case	R_{thJC}	-	-	0.9	° C/W
Thermal resistance, junction - ambient	R_{thJA}	-	-	36	° C/W
Soldering temperature, wave soldering for 10s	T_{sold}	-	-	265	° C

●Electronic Characteristics

Parameter	Symbol	Condition	Min.	Typ	Max.	Unit
Drain-Source Breakdown Voltage	BV_{DSS}	V_{GS} =0V, I_D =250uA	40			V
Gate Threshold Voltage	$V_{GS(TH)}$	V_{GS} =V_{DS}, I_D =250uA	1.4		2.5	V
Drain-Source Leakage Current	I_{DSS}	V_{DS}=40V, V_{GS} =0V			1.0	uA
Gate- Source Leakage Current	I_{GSS}	V_{GS}=±20V, V_{DS} =0V			100	nA
Static Drain-source On Resistance		V_{GS}=10V, I_D=100A				
		V_{GS}=4.5V, I_D=70A				
Forward Transconductance	g_{FS}	V_{DS} =25V, I_D=50A				
Source-drain voltage	V_{SD}	Is=100A				

●Dynamic Characteristics

Parameter	Symbol	Condition	Min.	Typ	Max.	Unit
Input capacitance	Ciss	f = 1MHz, V_{DS}=25V	-	6250	-	pF
Output capacitance	Coss		-	1760	-	
Reverse transfer capacitance	Crss		-	100	-	
Gate Risistance	R_g	f = 1MHz		1.6		
Total gate charge	Qg	V_{DD} =20V I_D = 20A				

Turn-Off Delay time

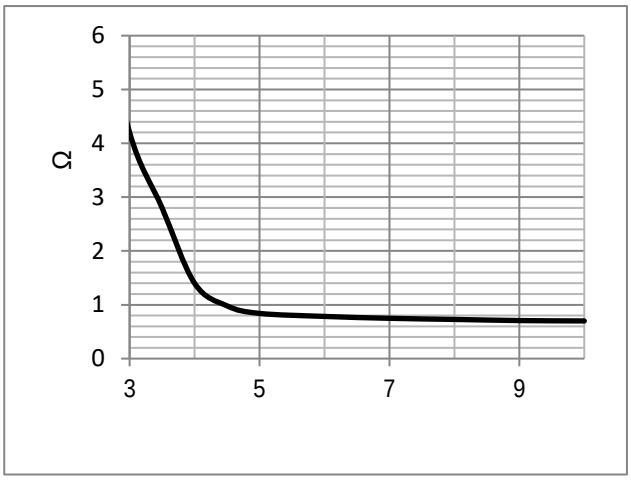


Fig.7 Gate Charge Characteristics

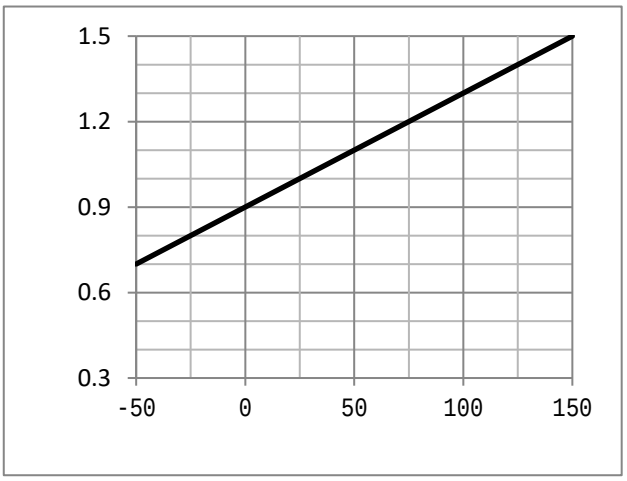


Fig.8 Capacitance vs Vds

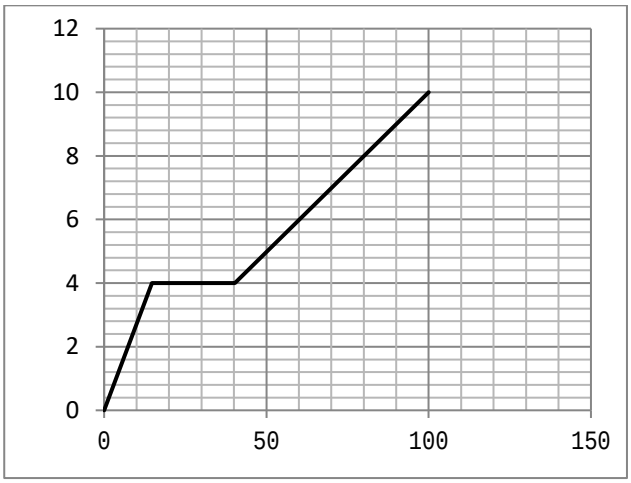


Fig.9

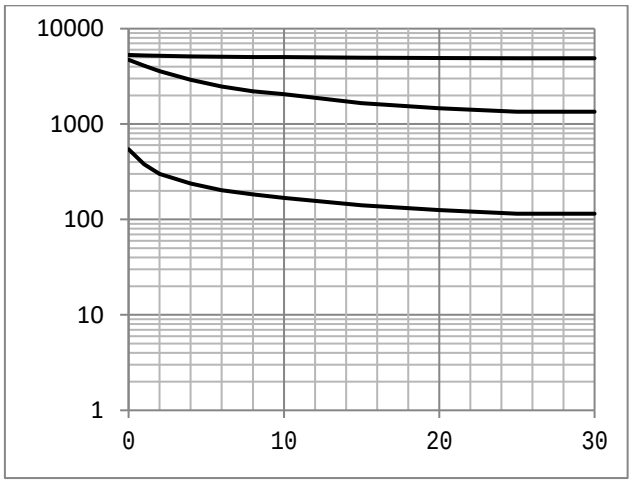


Fig.10

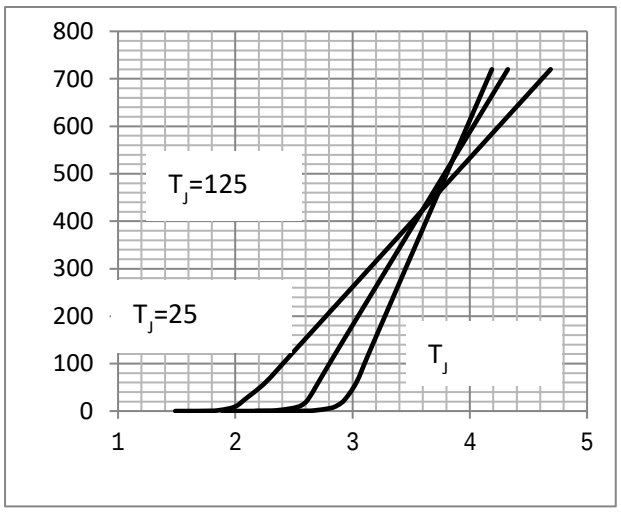


Fig.11 SOA Maximum Safe Operating Area

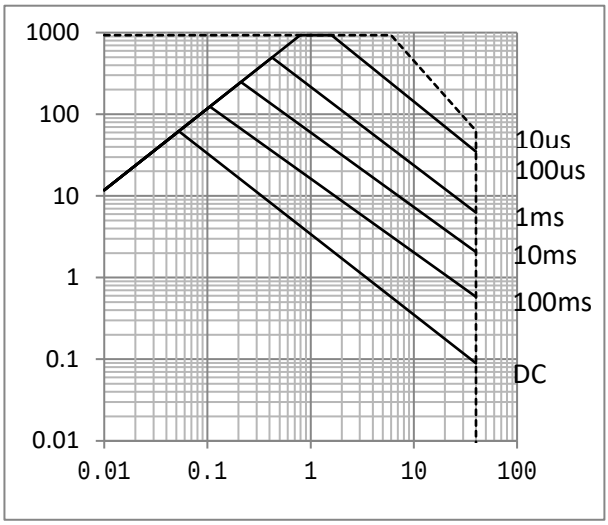


Fig.12 ID-Junction Temperature

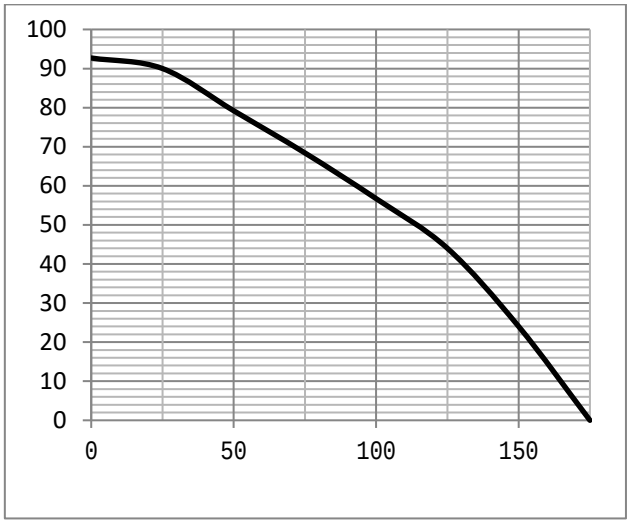


Fig.13

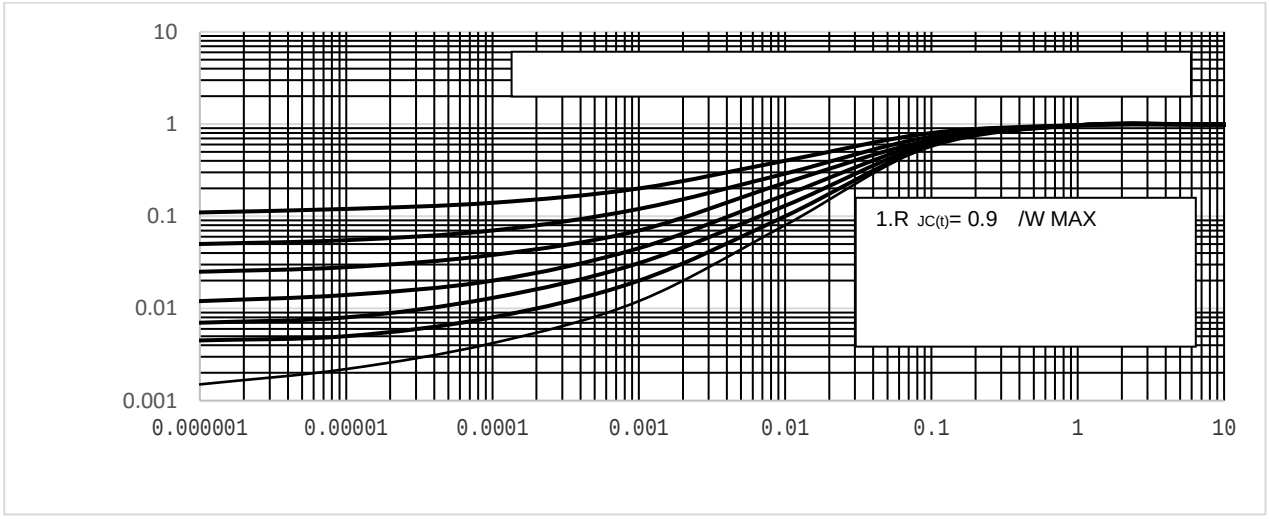


Fig.14 Switching Time Measurement Circuit

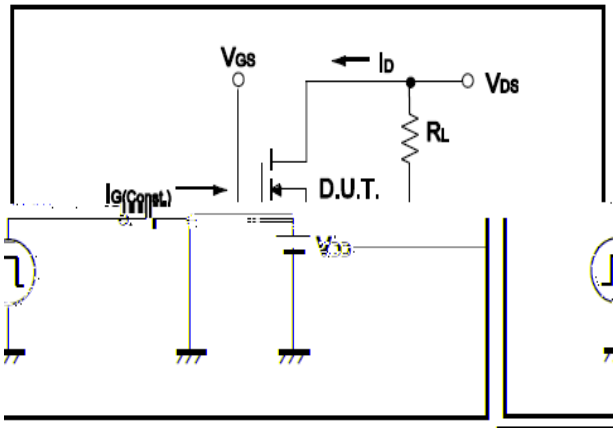


Fig.15 Gate Charge Waveform

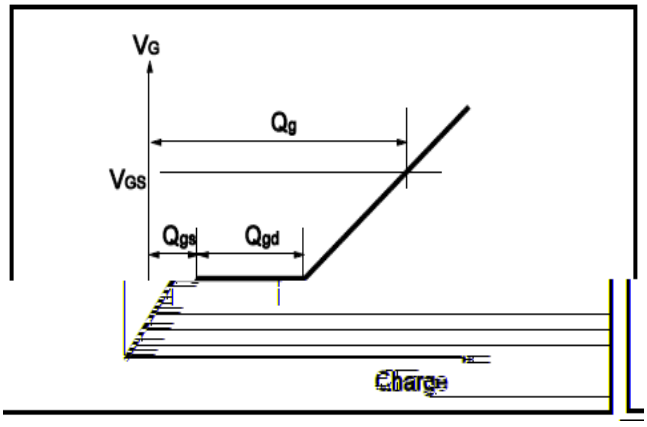


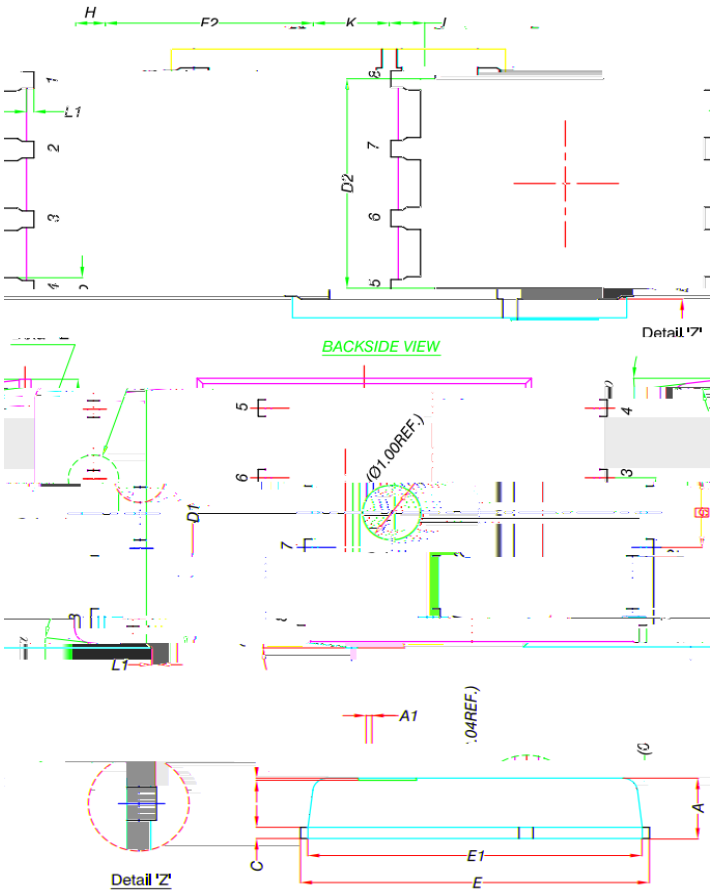
Fig.16 Resistive Switching Test Circuit

Fig.17 Resistive Switching Test Waveform

Fig.18

●Dimensions DFN5×6

Unit mm



DIM.	MILLIMETERS		
	MIN.	NOM.	MAX.
A	0.90	1.00	1.10
A1	0	-	0.05
b	0.33	0.41	0.51
C	0.20	0.25	0.30
D1	4.80	4.90	5.00
D2	3.61	3.81	3.96
	5.70	5.75	5.80
E2	3.38	3.58	3.78
e		1.27 BSC	
H	0.41	0.51	0.61
K		1.10	
	0.51		
	0.20	0.06	