

Parameter	Symbol	Rating	Unit
Drain-Source Voltage	V_{DS}	700	V
Gate-Source Voltage	V_{GS}	± 30	V
Drain Current	$I_D(T_c=25^\circ\text{C})$	4.0	A
Drain Current	$I_D(T_c=100^\circ\text{C})$	2.5	A
Drain Current - Pulsed	I_{DM}	16	A
Single Pulsed Avalanche Energy	E_{AS}	260	mJ
Power Dissipation	P_{tot}	36	W
Junction Temperature Range	T_j	150	
Storage Temperature Range	T_{stg}	-55~150	
Junction-to-Case	$R_{\theta JC}$	3.47	/W
Junction-to-Ambient	$R_{\theta JA}$	62.5	/W

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Drain-Source Breakdown Voltage	BV_{DSS}	$V_{GS}=0V$ $I_D=250\mu A$	700			V
Breakdown Voltage Temperature Coefficient	$\Delta BV_{DSS} / \Delta T_j$	$I_D=250\mu A$ Referenced to 25		0.65		V/
Gate Threshold Voltage	$V_{GS(th)}$	$V_{GS}=V_{DS}$ $I_D=250\mu A$	2.0		4.0	V
Zero Gate Voltage Drain Current	I_{DSS}	$V_{DS}=700V$ $V_{GS}=0V$ $T_j=25$			1	μA
		$V_{DS}=560V$ $V_{GS}=0V$ $T_j=125$			10	μA
Forward Transconductance	g_{FS}	$V_{DS}=40V$ $I_D=2.0A$		4.0		S
Gate-Body Leakage Current Forward	I_{GSS}	$V_{GS}=\pm 30V$			± 100	nA
Static Drain-Source On-Resistance	$R_{DS(on)}$	$V_{GS}=10V$ $I_D=2.0A$		1.93	2.2	Ω
Input Capacitance	C_{iss}	$V_{GS}=0V$ $V_{DS}=25V$ $V_F=1.0MHz$		520		pF
Turn-Off Delay Time	$t_{d(off)}$	$V_{DD}=350V$ $I_D=4.0A$ $R_G=25\Omega$		25		ns

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Total Gate Charge	Q_g	$I_D=4.0A$ $V_{DS}=560V$ $V_{GS}=10V$		17.4		nC
Gate-to-Source Charge	Q_{gs}			4.8		nC
Gate-to-Drain Charge	Q_{gd}			5.4		nC
Continuous Diode Forward Current	I_S				4.0	A
Diode Forward Voltage	V_{SD}	$I_S=4.0A$ $V_{GS}=0V$ $T_j=25$			1.4	V
Reverse Recovery Time	t_{rr}	$I_f=4.0A$ $T_j=25$ $di/dt=100A/\mu s$		250		nS
Reverse Recovery Charge	Q_{rr}			1.5		uC

① $+Q_{rwhv}=$

② $\chi \dot{\chi} \quad K \dot{y} \chi \quad \omega \propto J \square \text{ 卅 } \cup$

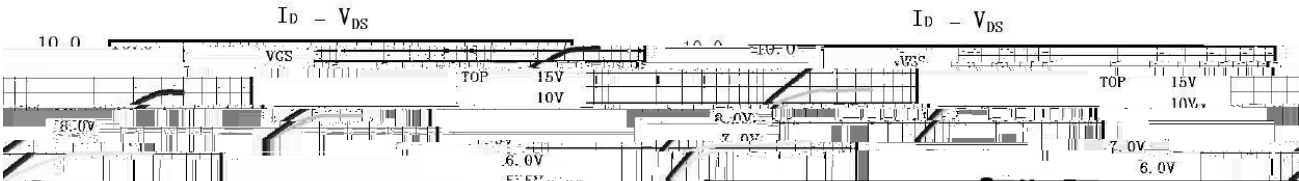
Repetitive rating: Pulse width limited by maximum junction temperature

③ $\chi \cdot \quad \dot{D} \quad J \square @58 \uparrow /Y_{GG}@83Y/0@63 \text{ p K/U}_J @58F/L_{DV}@713D$

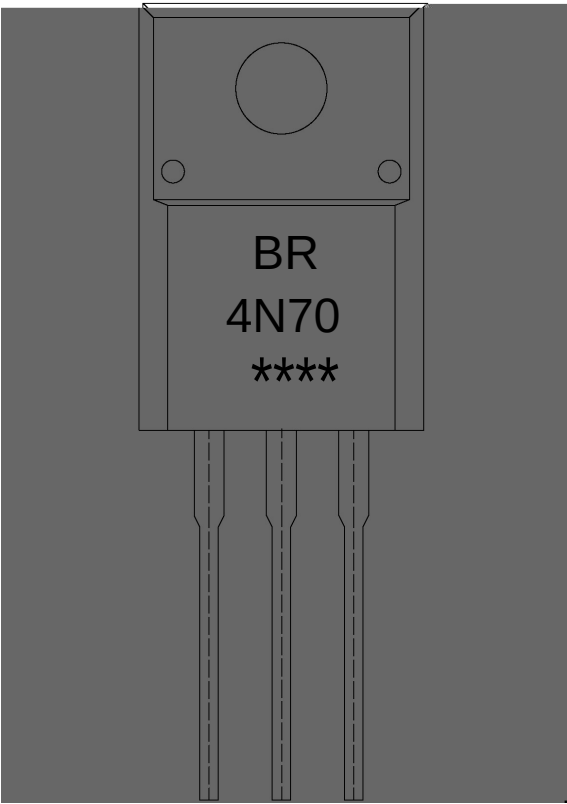
Starting $T_j=25 \uparrow$, $V_{DD}=50V$, $L=30mH$, $R_G=25\Omega$, $I_{AS}=4.0A$

④ $\chi \dot{\chi} \quad \text{卩} : \chi \dot{\chi} \quad K \dot{y} \vee 633Pv \quad \text{卩} \quad \text{卩} \vee 5 \beta$

Pulse Test: Pulse width $\leq 300\mu s$, Duty cycle $\leq 2\%$







公司代码	BR	公司代码
4N70	4N70	产品型号
----	----	批次号
Note:		
BR:	Company Code	
4N70:	Product Type.	
****:	Lot No. Code, code change with Lot No.	



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- 1 ǐ 𐀀 □ ŷ 25 Ĳ 150 † ǐ `H 𐀀 60 Ĳ 90sec;
- 2 Š Œ □ ŷ 255 ° 5 † ǐ `H 𐀀 `Y 𐀀 𐀀 5 ° 0.5sec;
- 3 ǐ 𐀀 , 𐀀 𐀀 ŷ 𐀀 2 Ĳ 10 † /sec.

- Note:
- 1.Preheating:25~150 † , Time:60~90sec.
- 2.Peak Temp.:255 ° 5 † , Duration:5 ° 0.5sec.
3. Cooling Speed: 2~10 † /sec.

□ ŷ χ 270 ° 5 † `H 𐀀 χ 10 ° 1 sec. Temp.:270±5 Time:10±1 sec

“Q 𐀀 𐀀 𐀀 / BULK

Package Type	Units					Dimension		
	Units/Bag	Bags/Inner Box	Units/Inner Box	Inner Boxes/Outer Box	Units/Outer Box	Bag	Inner Box	(unit mm ³) Outer Box