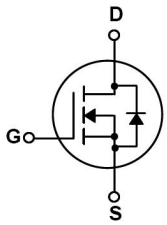
TO-220FL N 700V

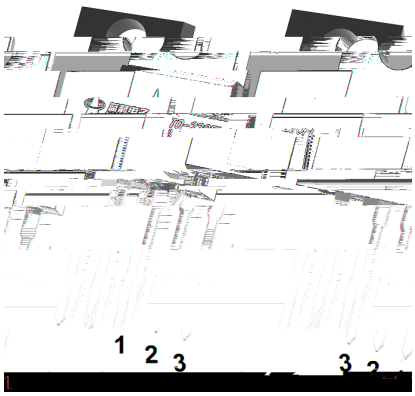
N-CHANNEL 700V Super-Junction Power MOSFET in a TO-220FL Plastic Package.

$R_{DS(on)}$×Qg 100% RoHS

Very low $R_{DS(on)}$×Qg,100% avalanche tested,RoHS compliant, HF product.

For switch mode power supply, uninterruptible power supply, power factor correction.





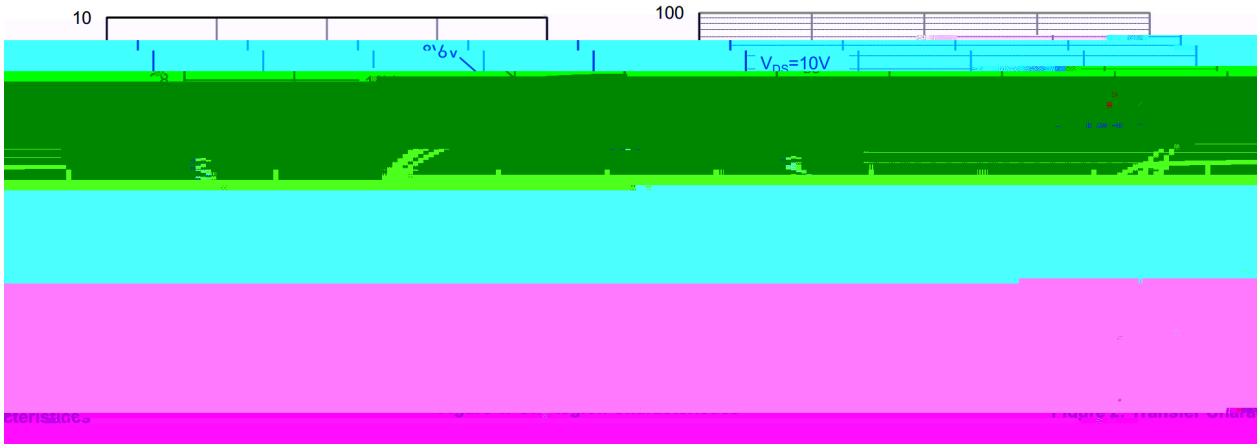
PIN1 G PIN 2 D PIN 3 S

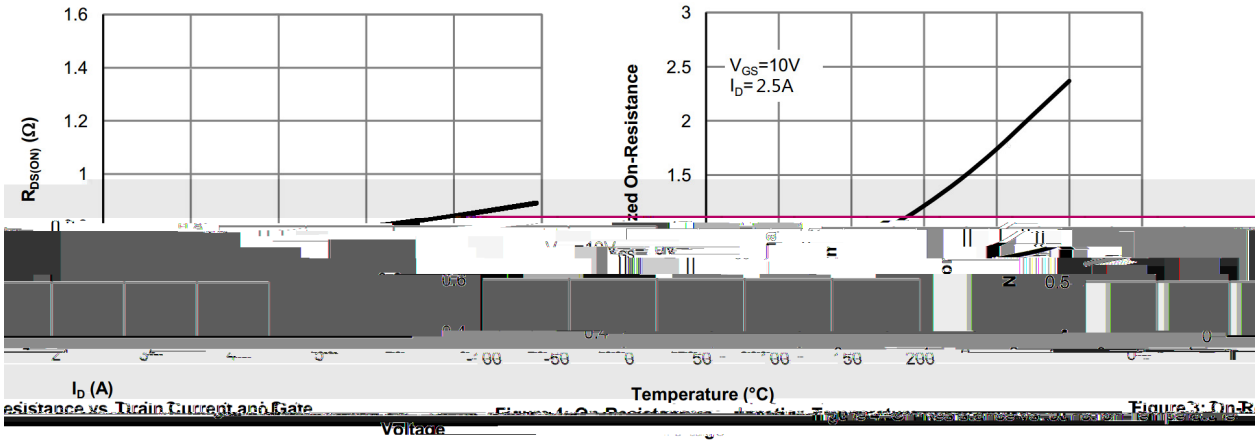
Parameter	Symbol	Rating	Unit
Drain-Source Voltage	V_{DSS}	700	V
Drain Current	I_D(Tc=25)	3.6	A
Drain Current - Pulsed	I_{DM}	14.5	A
Gate-Source Voltage	V_{GS}	±30	V
Single Pulsed Avalanche Energy	E_{AS}	23.7	mJ
Avalanche Current	I_{AS}	2.1	A
Power Dissipation	P_D(Tc=25)	30	W
Operating and Storage Temperature Range	T_J,T_{STG}	-55 to 150	
Junction-to-Case	$R_{\theta JC}$	4.2	/W
Junction-to-Ambient	$R_{\theta JA}$	80	/W

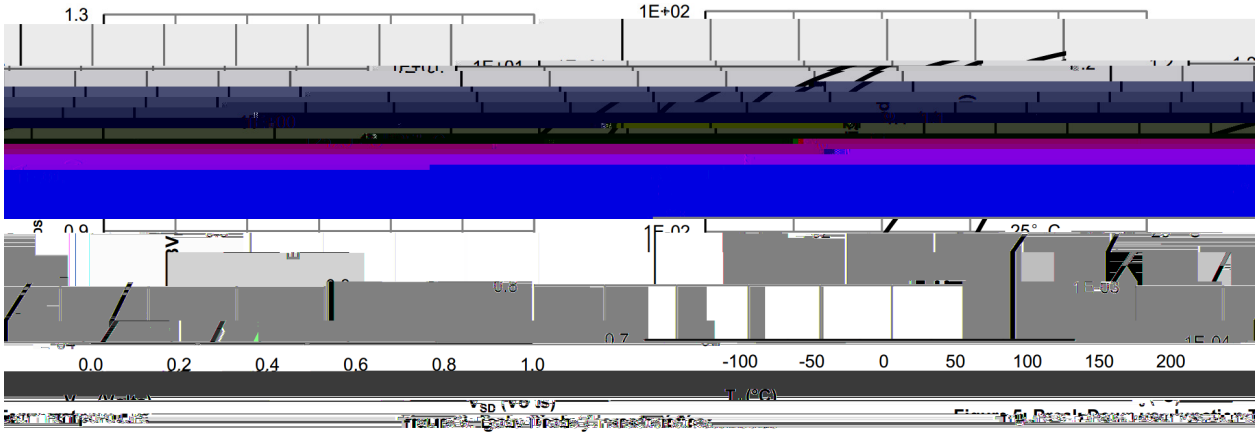
Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Drain-Source Breakdown Voltage	BV_{DSS}	V_{GS}=0V I_D=250μA	700	750		V
Zero Gate Voltage Drain Current	I_{DSS}	V_{DS}=700V V_{GS}=0V				

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Continuous Diode Forward Current	I_S				5.5	A
Total Gate Charge	Q_g	V_{DS}=560V I_D=5.0A V_{GS}=10V		13		nC

/ Electrical Characteristic Curve







/ Electrical Characteristic Curve

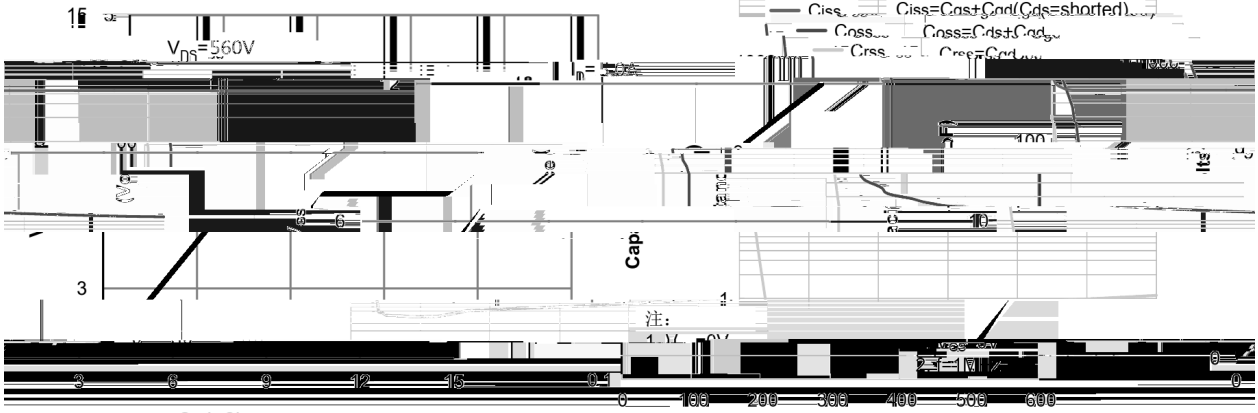
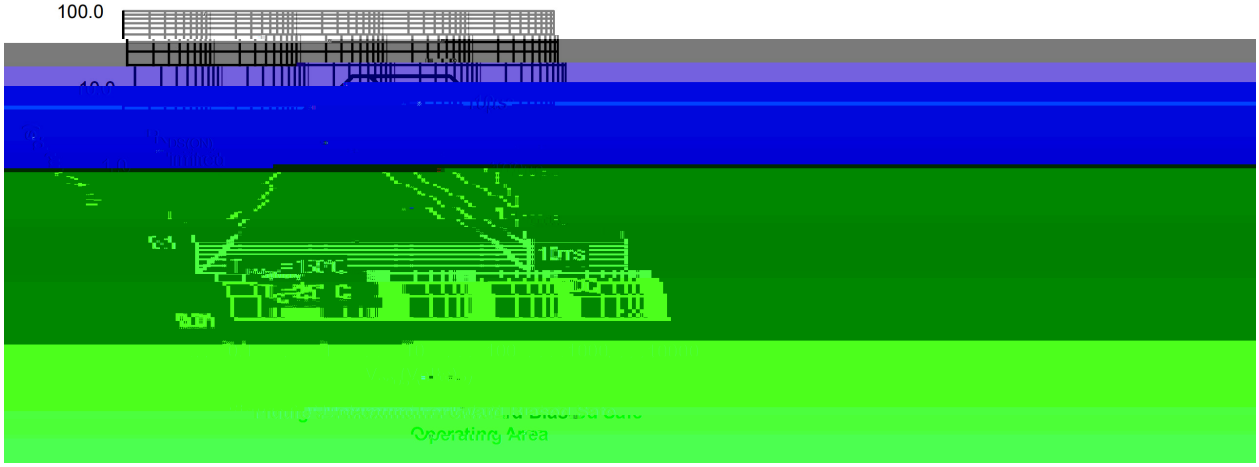
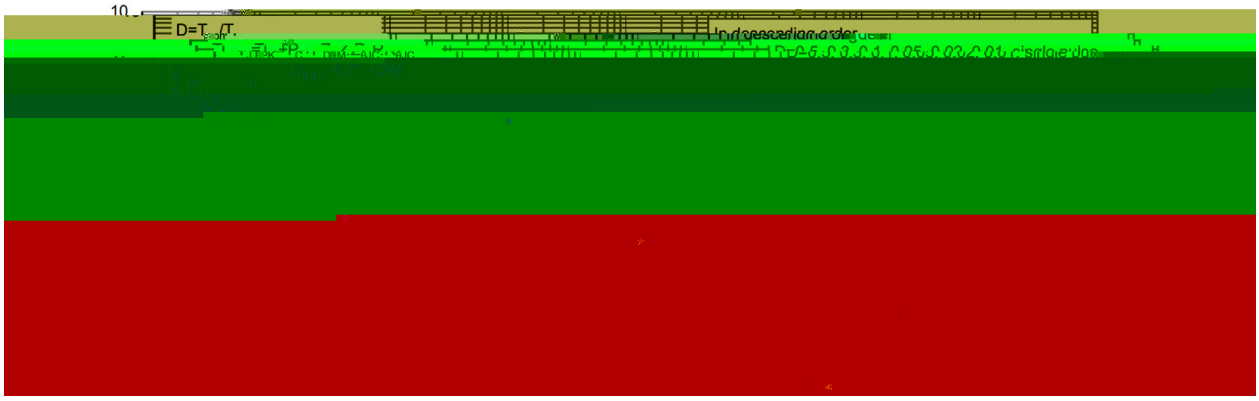


Figure 7: Gate-Charge Characteristics

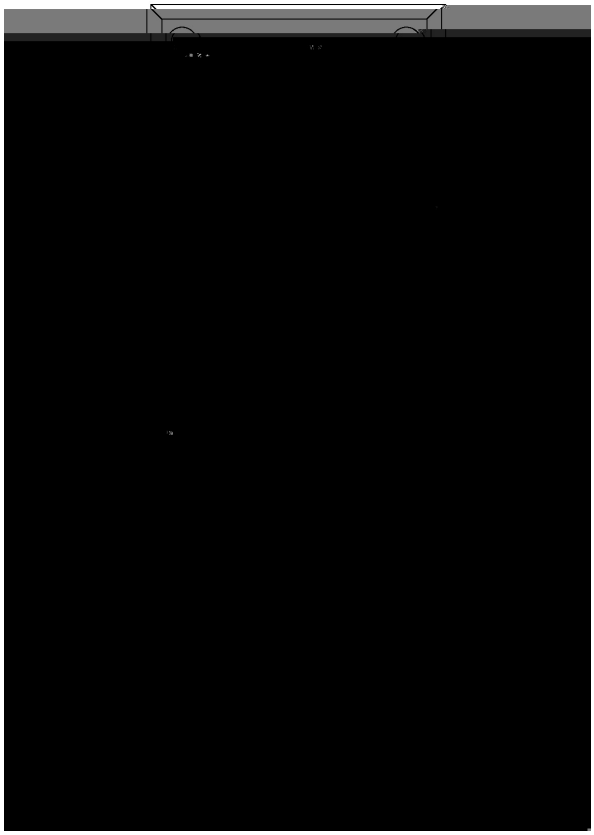
Figure 8: Capacitance Characteristics





BRFL70R900C

/ Marking Instructions



BR

70R900C

****

Note:

BR:	Company Code
70R900C:	Product Type Code
****:	Lot No. Code, code change with Lot No