

Rev.E Dec.-2015

TO-220F 塑封 N 沟道 MOS 管 1 N-CHANNEL MOSFET in a TO-220F Plastic Package.
 封装形式 沟道类型 封装材料
 TO-220F N 沟道 塑封

Parameter	Symbol	Rating	Unit
Drain-Source Voltage	V_{DSS}	600	V
Drain Current	$I_D(T_c=25^\circ C)$	2.0	A
Drain Current	$I_D(T_c=100^\circ C)$	1.3	A
Drain Current - Pulsed	I_{DM}	6.0	A
Gate-Source Voltage	V_{GSS}	± 30	V
Single Pulsed Avalanche Energy	E_{AS}	120	mJ
Repetitive Avalanche Energy	E_{AR}	5.4	mJ
Avalanche Current	I_{AR}	2.0	A
Power Dissipation	$P_D(T_c=25^\circ C)$	23	W
Operating and Storage Temperature Range	T_J, T_{STG}	-55 to 150	

Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Drain-Source Breakdown Voltage	BV_{DSS}	$V_{GS}=0V, I_D=250\mu A$	600			V
Zero Gate Voltage Drain Current	I_{DSS}	$V_{DS}=600V, V_{GS}=0V$			1.0	A
		$V_{DS}=480V, T_C=125^\circ C$			100	A
Gate-Body Leakage Current, Forward	I_{GSS}	$V_{GS}=\pm 30V, V_{DS}=0V$			± 0.1	A
Gate Threshold Voltage	$V_{GS(th)}$	$V_{DS}=V_{GS}, I_D=250\mu A$	2.0		4.0	V
Static Drain-Source On-Resistance	$R_{DS(on)}$	$V_{GS}=10V, I_D=1.0A$		4.0	5.0	
Forward Transconductance	g_{FS}	$V_{DS}=40V, I_D=1.0A$		2.05		S
Drain-Source Diode Forward Voltage	V_{SD}	$V_{GS}=0V, I_S=2.0A$			1.4	V
Input Capacitance	C_{iss}	$V_{DS}=25V, V_{GS}=0V, f=1.0MHz$		320	420	pF
Output Capacitance	C_{oss}			35	46	pF
Reverse Transfer Capacitance	C_{rss}			4.5	6.0	pF
Turn-On Delay Time	$t_{d(on)}$	$V_{DD}=300V, I_D=2.0A, R_G=25\Omega$		8.0	30	ns
Turn-On Rise Time	t_r			23	60	ns
Turn-Off Delay Time	$t_{d(off)}$					



