

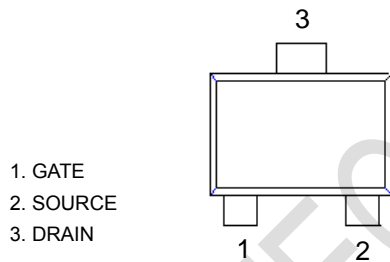
Product Summary

- V_{DS} 60V
- I_D 350mA
- $R_{DS(ON)}$ (at $V_{GS}=10V$) <5 ohm
- $R_{DS(ON)}$ (at $V_{GS}=4.5V$) <4.5 ohm
- ESD Protected:2000V

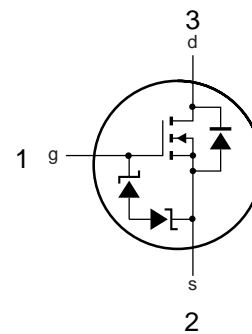
Application

- Load/Power Switching
- Interfacing Switching
- Logic Level Shift

Package and Pin Configuration SOT-723



Circuit diagram



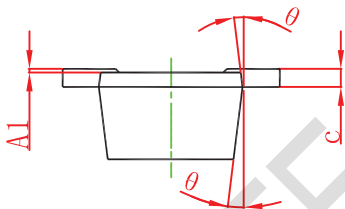
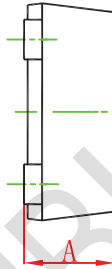
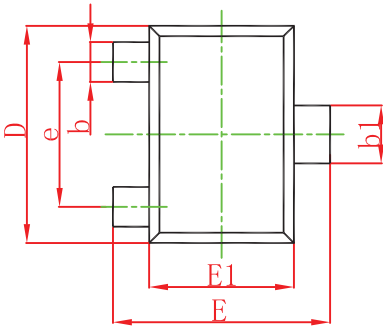
Absolute Maximum Ratings ($T_A=25^\circ\text{C}$ unless otherwise noted)

Parameter	Symbol	Value	Unit
Drain-Source Voltage	V_{DS}	60	V
Gate-Source Voltage	V_{GS}	± 20	V
Continuous Drain Current	I_D	± 350	mA
Power Dissipation	P_D	150	mW
Junction Temperature	T_J	150	$^\circ\text{C}$
Storage Temperature	T_{STG}	-55~ +150	$^\circ\text{C}$

Electrical Characteristics ($T_A = 25^\circ\text{C}$ unless otherwise noted)

Parameter	Symbol	Test Condition	Min	Typ	Max	Unit
Drain -Source Breakdown Voltage	$V_{(BR)DSS}$	$V_{GS} = 0V, I_D = 10\mu A$	60			V
		$V_{GS} = 0V, I_D = 3mA$	60			
Gate Threshold Voltage	$V_{th(GS)}$	$V_{DS} = V_{GS}, I_D = 250\mu A$	1.0	1.85	2.5	V
Gate-Source Leakage Current	I_{GSS}	$V_{DS} = 0V, V_{GS} = \pm 20V$			± 10	μA
Zero gate voltage drain current	I_{DSS}	$V_{DS} = 60V, V_{GS} = 0V$			1	μA
Static Drain- Source On State Resistance	$R_{DS(on)}$	$V_{GS} = 10V, I_D = 500mA$			5	Ω
		$V_{GS} = 4.5V, I_D = 200mA$		1.5	4.3	
Input Capacitance	C_{rss}	$V_{GS} = 10V$			42	pF
Input Capacitance	C_{rss}	$V_{GS} = 0V$			30	
Input Capacitance	C_{rss}	$V_{GS} = 1MHz$			10	
Turn-on delay time	$t_d(on)$	$V_{DD} = 25V, V_{GS} = 10V, R_L = 250\Omega,$ $R_{GS} = 50K, R_{GEN} = 25\Omega$			10	ns
Turn-on delay time	$t_d(on)$				15	

SOT-723 Package Outline Dimensions



Symbol	Dimensions In Millimeters		Dimensions In Inches	
	Min.	Max.	Min.	Max.
A	0.430	0.500	0.017	0.020
A1	0.000	0.050	0.000	0.002
b	0.170	0.270	0.007	0.011
b1	0.270	0.370	0.011	0.015
c	0.080	0.150	0.003	0.006
D	1.150	1.250	0.045	0.049
E	1.150	1.250	0.045	0.049
E1	0.750	0.850	0.030	0.033
e	0.800TYP.		0.031TYP.	
θ	7° REF.		7° REF.	