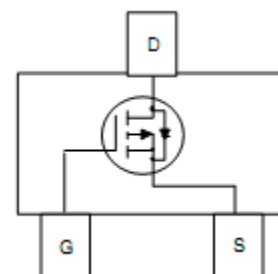


**P-Channel Enhancement-Mode MOS FETs**


SOT-23

**■ MAXIMUM RATINGS**

Characteristic	Symbol	Max	Unit
Drain-Source Voltage	$BV_{DSS}$	-30	V
Gate- Source Voltage	$V_{GS}$	$\pm 20$	V
Drain Current (continuous)	$I_D$	-2.2	A
Drain Current (pulsed)	$I_{DM}$	-16	A
Total Device Dissipation $T_A=25^\circ\text{C}$	$P_D$	1000	mW
Junction	$T_J$	150	$^\circ\text{C}$
Storage Temperature	$T_{stg}$	-55to+150	$^\circ\text{C}$

**ELECTRICAL CHARACTERISTICS**

 (T<sub>A</sub>=25°C unless otherwise noted 25°C)

Characteristic	Symbol	Min	Typ	Max	Unit
Drain-Source Breakdown Voltage (I <sub>D</sub> = -250uA, V <sub>GS</sub> =0V)	BV <sub>DSS</sub>	-30	—	—	V
Gate Threshold Voltage (I <sub>D</sub> = -250uA, V <sub>GS</sub> = V <sub>DS</sub> )	V <sub>GS(th)</sub>	-1.4	—	-2.4	V
Diode Forward Voltage Drop (I <sub>S</sub> = -1A, V <sub>GS</sub> =0V)	V <sub>SD</sub>	—	—	-1	V
Zero Gate Voltage Drain Current (V <sub>GS</sub> =0V, V <sub>DS</sub> = -24V) (V <sub>GS</sub> =0V, V <sub>DS</sub> = -24V, T <sub>A</sub> =55°C)	I <sub>DSS</sub>	—	—	-1 -5	uA
Gate Body Leakage (V <sub>GS</sub> =±12V, V <sub>DS</sub> =0V)	I <sub>GSS</sub>	—	—	±100	nA
Static Drain-Source On-State Resistance (I <sub>D</sub> = -2.2A, V <sub>GS</sub> = -10V)	R <sub>DS(ON)</sub>	—	—	130	mΩ
Static Drain-Source On-State Resistance (I <sub>D</sub> = -2A, V <sub>GS</sub> = -4.5V)	R <sub>DS(ON)</sub>	—	—	200	mΩ
Input Capacitance (V <sub>GS</sub> =0V, V <sub>DS</sub> = -15V, f=1MHz)	C <sub>ISS</sub>	—	954	—	pF
Output Capacitance (V <sub>GS</sub> =0V, V <sub>DS</sub> = -15V, f=1MHz)	C <sub>OSS</sub>	—	115	—	pF
Turn-ON Time (V <sub>DS</sub> = -15V, V <sub>GS</sub> = -10V, R <sub>GEN</sub> =6Ω)	t <sub>(on)</sub>	—	6.3	—	ns
Turn-OFF Time (V <sub>DS</sub> = -15V, V <sub>GS</sub> = -10V, R <sub>GEN</sub> =6Ω)	t <sub>(off)</sub>	—	38.2	—	ns

Pulse Width ≤ 300 μs; Duty Cycle ≤ 2.0%