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TECHNICAL DATA SHEET

P-CHANNEL J-FET Equivalent To MIL-PRF-19500/296

DEVICES

2N2609

LEVELS

MQ = JAN Equivalent

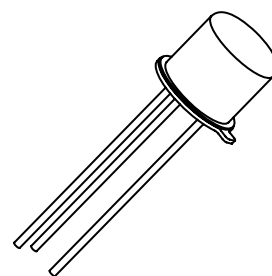
ABSOLUTE MAXIMUM RATINGS ($T_C = +25^\circ\text{C}$ unless otherwise noted)

Parameters / Test Conditions	Symbol	Value	Unit
Gate-Source Voltage	V_{GSS}	30	V
Power Dissipation ⁽¹⁾ $T_A = +25^\circ\text{C}$	P_D	300	mW
Operating Junction & Storage Temperature Range	T_{op}, T_{stg}	-65 to + 200	$^\circ\text{C}$

(1) Derate linearly 1.71 mW/ $^\circ\text{C}$ for $T_A > +25^\circ\text{C}$.

ELECTRICAL CHARACTERISTICS ($T_A = +25^\circ\text{C}$, unless otherwise noted)

Parameters / Test Conditions	Symbol	Min.	Max.	Unit
Gate-Source Breakdown Voltage $V_{DS} = 0, I_G = 1.0\mu\text{A dc}$	$V_{(BR)GSS}$	30		Vdc
Gate Reverse Current $V_{DS} = 0, V_{GS} = 30\text{V dc}$ $V_{DS} = 0, V_{GS} = 15\text{V dc}$	I_{GSS}		30 22.5	ηA
Drain Current $V_{GS} = 0\text{V dc}, V_{DS} = 5.0\text{V dc}$	I_{DSS}	-2.0	-10.0	mA
Gate-Source Cutoff Voltage $V_{DS} = 5.0\text{V}, I_D = 1.0\mu\text{A dc}$	$V_{GS(off)}$	0.75	6.0	Vdc
Magnitude of Small-Signal, Common-Source Short-Circuit Forward Transfer Admittance $V_{GS} = 0, V_{DS} = 5.0\text{V dc}, f = 1.0\text{kHz}$	$ Y_{fs2} $	2,000	6,250	μmho
Small-Signal, Common-Source Short-Circuit Input Capacitance $V_{GS} = 0, V_{DS} = 5.0\text{V dc}, f = 1.0\text{MHz}$	C_{iss}		10	pF
Common-Source Spot Noise Figure $V_{GS} = 0, V_{DS} = 5.0\text{V dc}, f = 1.0\text{kHz}$ $B_W = 16\%, R_G = 1.0\text{ megohms}$ $e_{gen} = 1.82\text{mV dc}, R_L = 220\Omega$	NF		3.0	dB



TO-18
(TO-206AA)