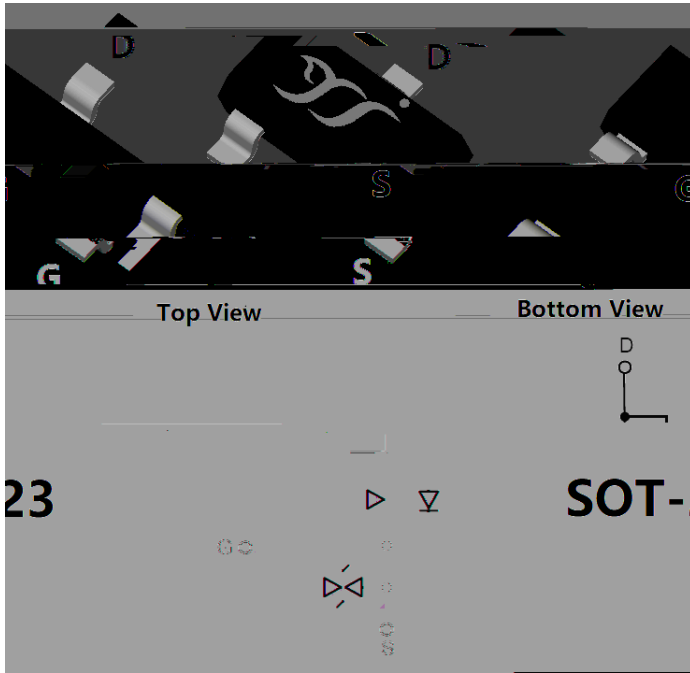




P-Channel Enhancement Mode F



$r_{DS(ON)}$ (at $V_{GS} = 1 - (.) V$) 850 mohm
 $R_{DS(ON)}$ (at $V_{GS} = -2.5V$) 1200 mohm
 $R_{DS(ON)}$ (at $V_{GS} = -1.8V$) 2000 mohm
 ESD Protected Up to 2.0KV (HBM)

General Description

Trench Power LV MOSFET technology
 High Density Cell Design for Low $R_{DS(ON)}$
 High Speed switching

Applications

Interfacing, Logic switch
 Load switch
 Power management

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

Parameter	Symbol	Maximum	Unit
Drain-source Voltage	V_{DS}	-20	V
Gate-source Voltage	V_{GS}	± 12	V
Drain Current	I_D	$T_A = 25^\circ C$ Steady State	-0.5
		$T_A = 70^\circ C$ Steady State	-0.4
Pulsed Drain Current ^A	I_{DM}	-2.6	A
Total Power Dissipation @ $T_A = 25^\circ C$ Steady State	P_D	0.35	W
Thermal Resistance Junction-to-Ambient @ Steady State ^B	R_{JA}	357	/ W
Junction and Storage Temperature Range	T_J, T_{STG}	-55 +150	

					E I 5 B H = H M f	8 9 @ = J 9 F M A C 8 9
YJL3139KA	F2	39KA.	3000	30000	120000	7" reel



Typical Performance Characteristics

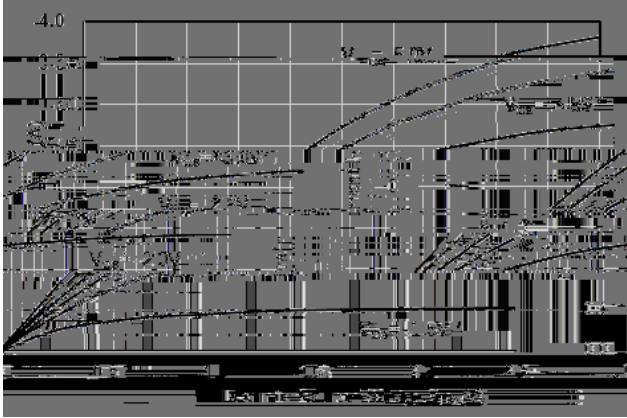


Figure1. Output Characteristics

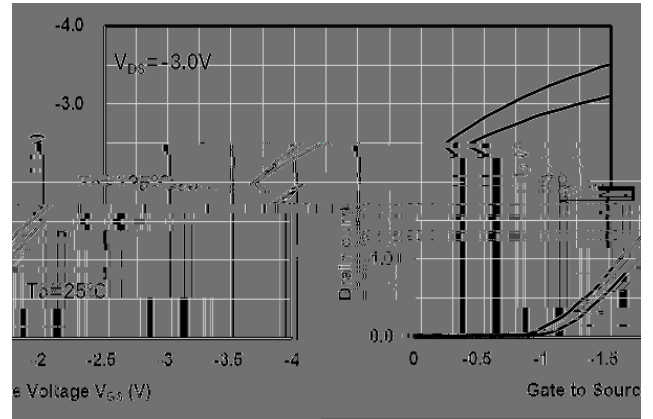


Figure2. Transfer Characteristics

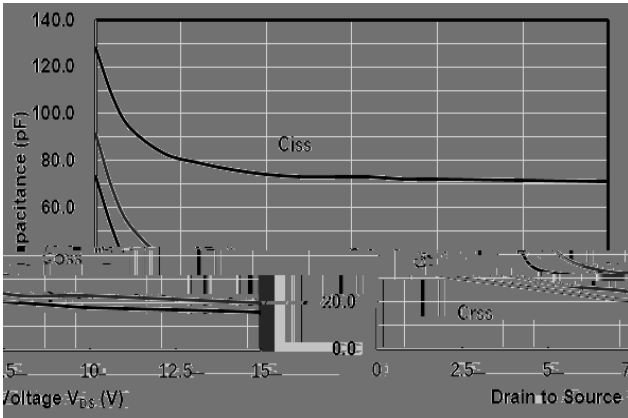


Figure3. Capacitance Characteristics

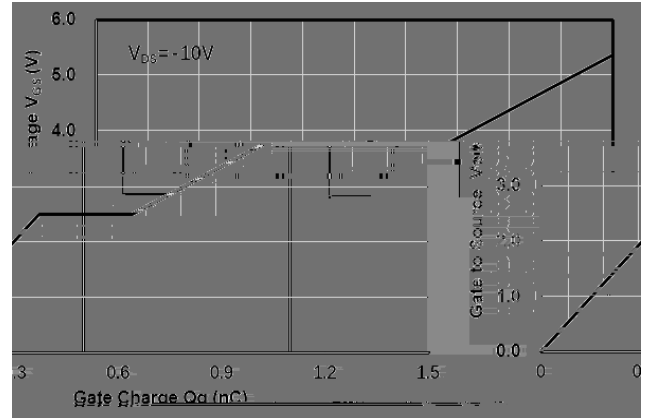


Figure4. Gate Charge

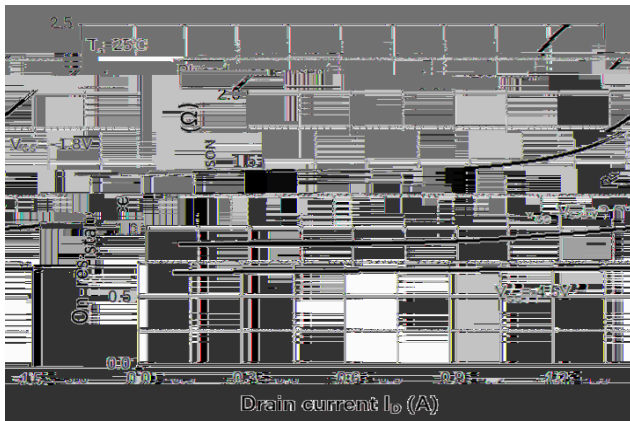


Figure5. Drain-Source on Resistance

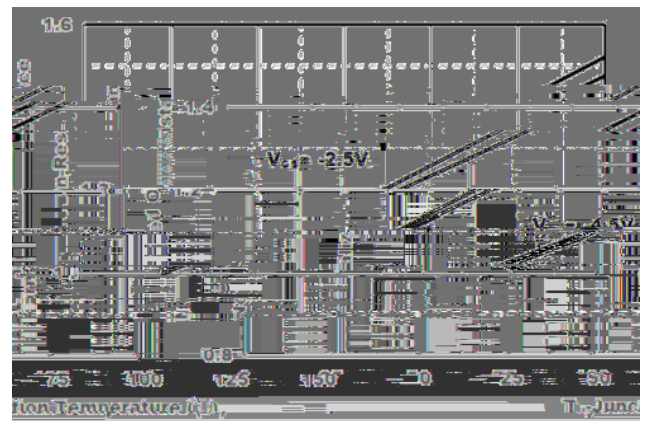


Figure6. Drain-Source on Resistance

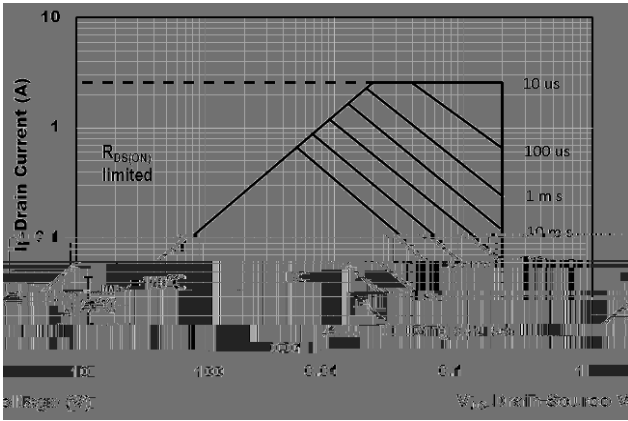


Figure7. Safe Operation Area



Figure8. Switching wave



YJL3139KA

SOT-23 Package information





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