TOSHIBA 2SK1529

TOSHIBA FIELD EFFECT TRANSISTOR SILICON N CHANNEL MOS TYPE

2 S K 1 5 2 9

HIGH POWER AMPLIFIER APPLICATION

• High Breakdown Voltage : V_{DSS}=180V

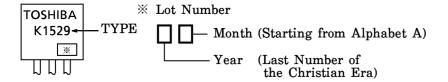
• High Forward Transfer Admittance : |Yfs|=4.0S (Typ.)

• Complementary to 2SJ200

MAXIMUM RATINGS (Ta = 25°C)

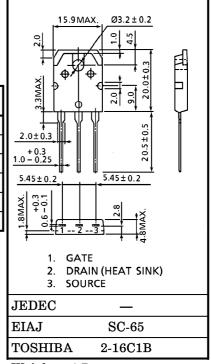
CHARACTERISTIC	SYMBOL	RATING	UNIT
Drain-Source Voltage	$v_{ m DSS}$	180	V
Gate-Source Voltage	v_{GSS}	±20	V
Drain Current	$I_{\mathbf{D}}$	10	Α
Drain Power Dissipation (Tc=25°C)	$P_{\mathbf{D}}$	120	W
Channel Temperature	T_c	150	°C
Storage Temperature Range	$\mathrm{T_{stg}}$	-55~150	°C

MARKING



ELECTRICAL CHARACTERISTICS (Ta = 25°C)

INDUSTRIAL	APPLICA	TI	SNC
	Unit	in	mm



Weight: 4.7g	W	eig	ht	:	4.7	g
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CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
Drain Cut-off Current	$I_{ m DSS}$	$V_{DS} = 180V, V_{GS} = 0$	_	_	1.0	mA
Gate Leakage Current	$I_{ m GSS}$	$V_{DS}=0, V_{GS}=\pm 20V$	_	_	±0.5	μ A
Drain-Source Breakdown Voltage	V _{(BR)DSS}	$I_D=10$ mA, $V_{GS}=0$	180	_	_	V
Drain-Source Saturation Voltage	V _{DS} (ON)	$I_{D} = 6A, V_{GS} = 10V$	_	2.5	5.0	V
Gate-Source Cut-off Voltage (Note)	V _{GS (OFF)}	$V_{DS} = 10V, I_D = 0.1A$	0.8	_	2.8	V
Forward Transfer Admittance	Y _{fs}	V_{DS} =10V, I_{D} =3A	_	4.0	_	S
Input Capacitance	C_{iss}	$V_{DS} = 30V, V_{GS} = 0, f = 1MHz$	_	700	_	pF
Output Capacitance	Coss	$V_{DS} = 30V, V_{GS} = 0, f = 1MHz$		150	_	pF
Reverse Transfer Capacitance	$\mathrm{C}_{\mathrm{rss}}$	$V_{ m DS}\!=\!30{ m V},V_{ m GS}\!=\!0,{ m f}\!=\!1{ m MHz}$	_	90	_	pF

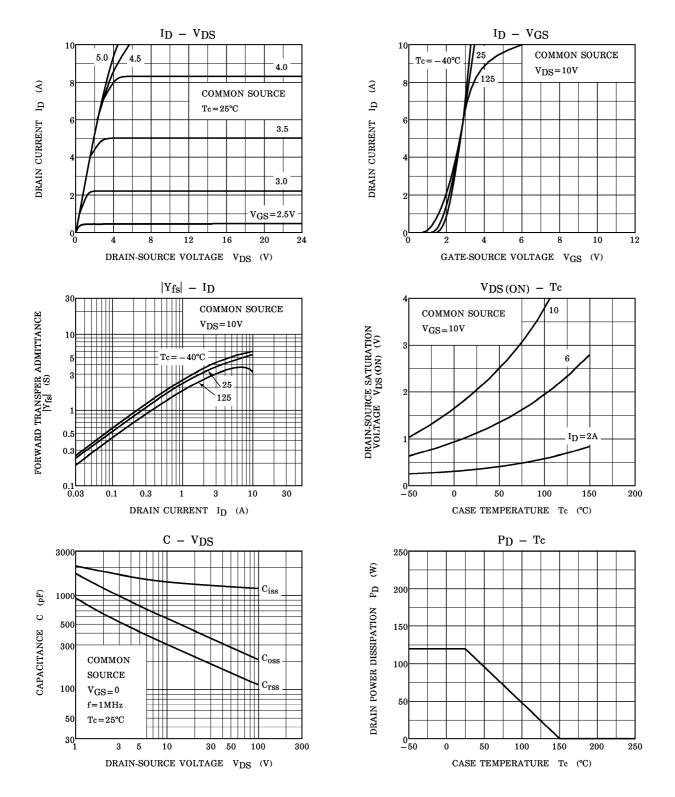
(Note) $V_{GS (OFF)}$ Classification $0:0.8\sim1.6$

 $Y: 1.4 \sim 2.8$

This transistor is an electrostatic sensitive devide. Please handle with caution.

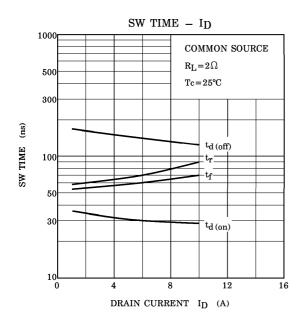
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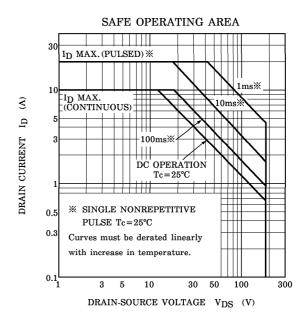
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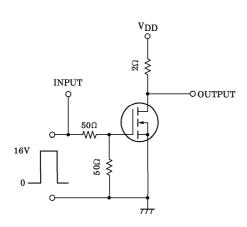
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SWITCHING TIME TEST CIRCUIT



WAVEFORMS

