TOSHIBA 2SK711

TOSHIBA FIELD EFFECT TRANSISTOR SILICON N CHANNEL JUNCTION TYPE

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HIGH FREQUENCY AMPLIFIER APPLICATIONS

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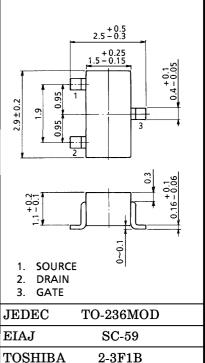
AUDIO FREQUENCY AMPLIFIER APPLICATIONS

• High $|Y_{fs}|$: $|Y_{fs}| = 25 \text{mS (Typ.)}$ • Low C_{iss} : $C_{iss} = 7.5 \text{pF (Typ.)}$

MAXIMUM RATINGS (Ta = 25°C)

CHARACTERISTIC	SYMBOL	RATING	UNIT
Gate-Drain Voltage	$v_{ m GDS}$	-20	V
Gate Current	$^{\mathrm{I}_{\mathrm{G}}}$	10	mA
Drain Power Dissipation	$P_{\mathbf{D}}$	150	mW
Junction Temperature	T_{j}	125	$^{\circ}\mathrm{C}$
Storage Temperature Range	$\mathrm{T_{stg}}$	-55~125	$^{\circ}\mathrm{C}$

Unit in mm



TOSHIBA 2-3: Weight: 0.012g

ELECTRICAL CHARACTERISTICS (Ta = 25°C)

CHARACTERISTIC	SYMBOL	TEST CONDITION	MIN.	TYP.	MAX.	UNIT
Gate Leakage Current	I_{GSS}	$V_{GS} = -15V, V_{DS} = 0V$	_	_	-1.0	nA
Gate-Drain Breakdown Voltage	V (BR) GDS	$V_{DS} = 0V, I_G = -100 \mu A$	-20	_	_	v
Drain Current	I _{DSS} (Note)	$V_{DS}=5V, V_{GS}=0V$	6	_	32	mA
Gate-Source Cut-off Voltage	V _{GS} (OFF)	$V_{DS}=5V$, $I_{D}=1\mu A$	_	_	-2.5	V
Forward Transfer Admittance	$ Y_{fs} $	$V_{DS} = 5V, V_{GS} = 0V, f = 1kHz$	15	25	_	mS
Input Capacitance	$\mathrm{c}_{\mathrm{iss}}$	$V_{DS}=5V$, $V_{GS}=0V$, $f=1MHz$	_	7.5	10	pF
Reverse Transfer Capacitance	$\mathrm{C}_{\mathbf{rss}}$	$V_{\mathrm{DS}} = 5 V$, $I_{\mathrm{D}} = 0 \mathrm{mA}$, $f = 1 \mathrm{MHz}$	_	2	3	pF

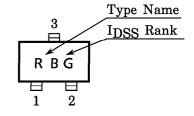
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Note: IDSS Classification

 $GR: 6{\sim}12mA, \quad BL: \ 10{\sim}20mA, \quad V: 16{\sim}32mA$

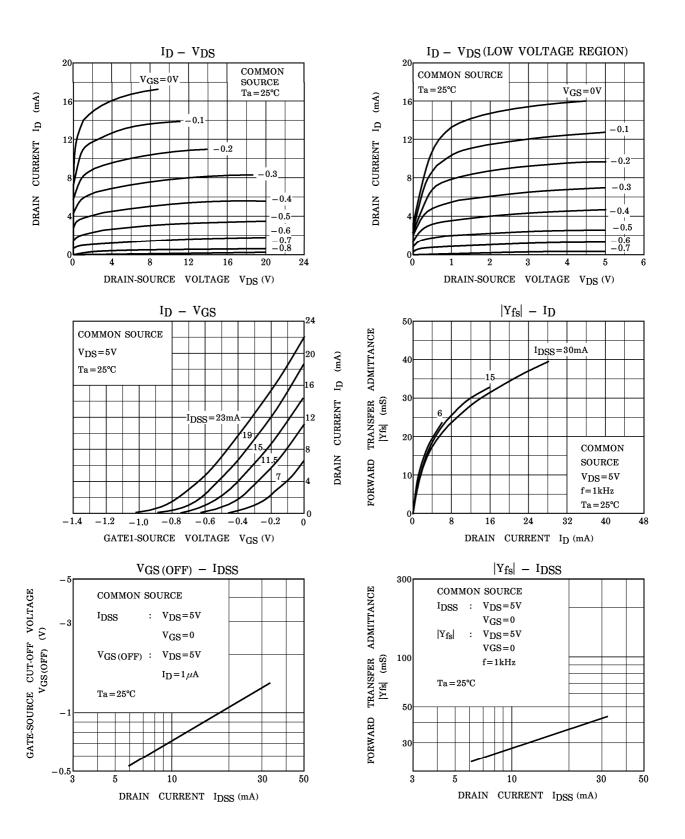
(G) (L) (V)

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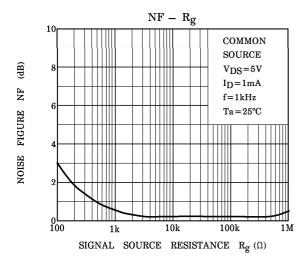


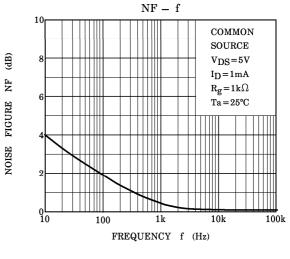
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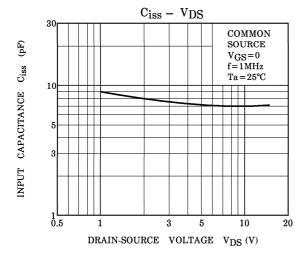
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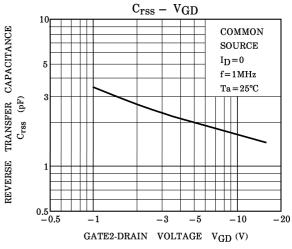


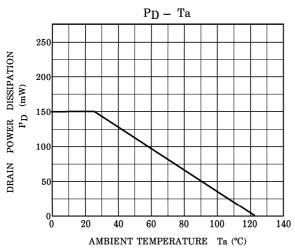
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