Ordering number:EN4634

N-Channel Enhancement Silicon MOSFET

2SK1839

Analog Switch Applications

Features

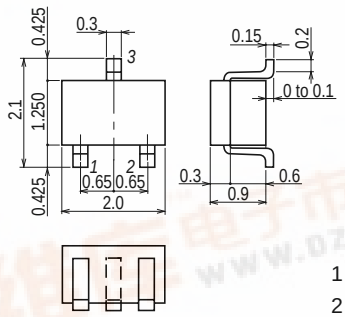
- Ultrasmall-sized package permitting 2SK1839-applied sets to be made small and slim.
- Large $|y_{fs}|$.
- Enhancement type.
- Low ON resistance.

Package Dimensions

unit:mm

2057A

[2SK1839]



1 : Gate
2 : Drain
3 : Source
SANYO : MCP

Specifications

Absolute Maximum Ratings at Ta = 25˚C

Parameter	Symbol	Conditions	Ratings	Unit
Drain-to-Source Voltage	V_{DSS}		30	V
Gate-to-Source Voltage	V_{GSS}		±12	V
Drain Current (DC)	I_D		100	mA
Drain Current (pulse)	I_{DP}		300	mA
Allowable Power Dissipation	P_D		150	mW
Channel Temperature	Tch		125	˚C
Storage Temperature	Tstg		–55 to +125	˚C

Electrical Characteristics at Ta = 25˚C

Parameter	Symbol	Conditions	Ratings			Unit
			min	typ	max	
Drain-to-Source Breakdown Voltage	$V_{(BR)DSS}$	I_D=10μA, V_{GS}=0	30			V
Zero-Gate Votlage Drain Current	I_{DSS}	V_{DS}=15V, V_{GS}=0			1	μA
Gate-to-Source Leakage Current	I_{GSS}	V_{GS}=±10V, V_{DS}=0		0.01	±10	nA
Cutoff Voltage	$V_{GS(off)}$	V_{DS}=10V, I_D=100μA	0.3	0.9	1.5	V
Forward Transfer Admittance	| yfs |	V_{DS}=10V, I_D=50mA, f=1kHz	25	50		mS
Static Drain-to-Source On-State Resistance	$R_{DS(on)}$	V_{GS}=10V, I_D=10mA		15	25	Ω
Input Capacitance	Ciss	V_{DS}=10V, V_{GS}=0, f=1MHz		12		pF
Output Capacitance	Coss	V_{DS}=10V, V_{GS}=0, f=1MHz		4		pF
Reverse Transfer Capacitance	Crss	V_{DS}=10V, V_{GS}=0, f=1MHz		0.4		pF

Marking : JJ

Electrical Connection