

Isc N-Channel MOSFET Transistor

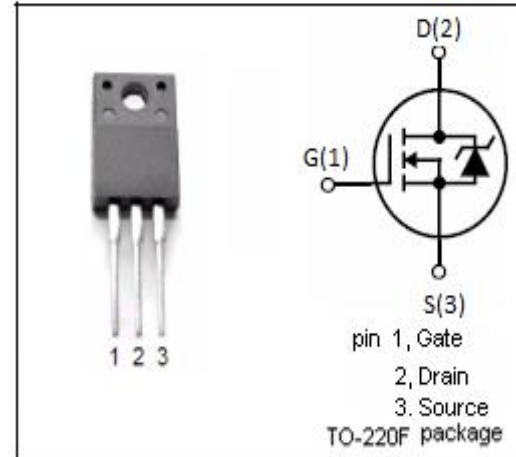
IRFI4228

• FEATURES

- With TO-220F package
- Low input capacitance and gate charge
- Low gate input resistance
- Reduced switching and conduction losses
- 100% avalanche tested
- Minimum Lot-to-Lot variations for robust device performance and reliable operation

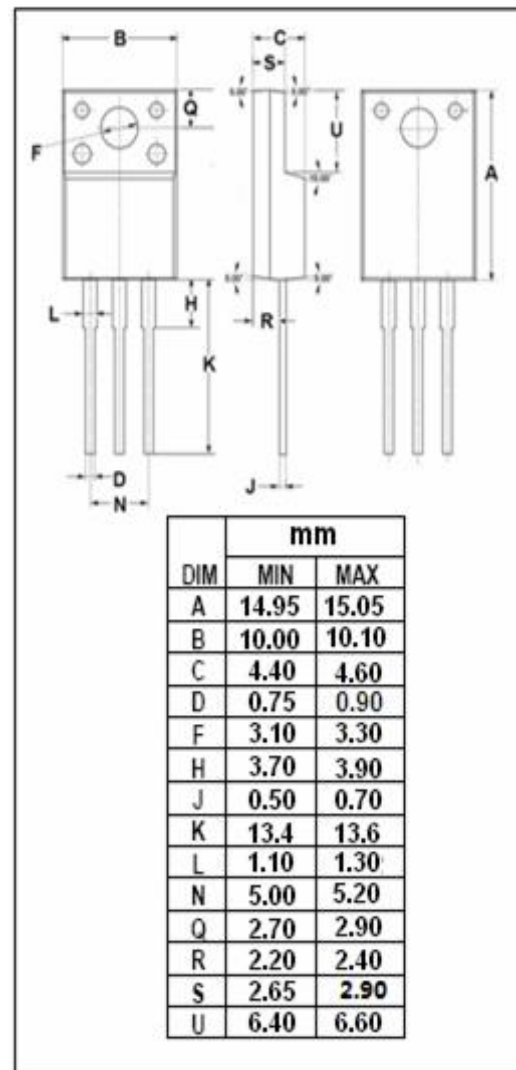
• APPLICATIONS

- Switching applications



• ABSOLUTE MAXIMUM RATINGS(T_a=25°C)

SYMBOL	PARAMETER	VALUE	UNIT
V _{DSS}	Drain-Source Voltage	150	V
V _{GSS}	Gate-Source Voltage	±30	V
I _D	Drain Current-Continuous @T _c =25°C (V _{GS} at 10V) T _c =100°C	34 21	A
I _{DM}	Drain Current-Single Pulsed	130	A
P _D	Total Dissipation @T _c =25°C	46	W
T _j	Max. Operating Junction Temperature	150	°C
T _{stg}	Storage Temperature	-40~150	°C



• THERMAL CHARACTERISTICS

SYMBOL	PARAMETER	MAX	UNIT
R _{th(ch-c)}	Channel-to-case thermal resistance	2.73	°C/W
R _{th(ch-a)}	Channel-to-ambient thermal resistance	65	°C/W

Isc N-Channel MOSFET Transistor**IRFI4228****ELECTRICAL CHARACTERISTICS** $T_C=25^\circ\text{C}$ unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	TYP	MAX	UNIT
BV_{DSS}	Drain-Source Breakdown Voltage	$V_{GS}=0V; I_D=0.25mA$	150			V
$V_{GS(th)}$	Gate Threshold Voltage	$V_{DS}=V_{GS}; I_D=0.25mA$	3.0		5.0	V
$R_{DS(on)}$	Drain-Source On-Resistance	$V_{GS}=10V; I_D=20A$		12.2	16	$m\Omega$
I_{GSS}	Gate-Source Leakage Current	$V_{GS}=\pm 20V; V_{DS}=0V$			± 0.1	μA
I_{DSS}	Drain-Source Leakage Current	$V_{DS}=150V; V_{GS}=0V; T_j=25^\circ\text{C}$ $V_{DS}=150V; V_{GS}=0V; T_j=125^\circ\text{C}$			20 1000	μA
V_{SDF}	Diode forward voltage	$I_{SD}=20A, V_{GS}=0V$			1.3	V

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