

# isc N-Channel MOSFET Transistor

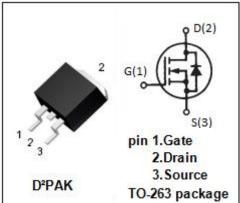
# SKI10297

### **FEATURES**

- Drain Current –I<sub>D</sub>= 34A@ T<sub>C</sub>=25℃
- · Drain Source Voltage-: V<sub>DSS</sub>= 100V(Min)
- Static Drain-Source On-Resistance
- :  $R_{DS(on)} = 28.8 m \Omega$  (Max)
- 100% avalanche tested
- Minimum Lot-to-Lot variations for robust device performance and reliable operation

### DESCRIPTION

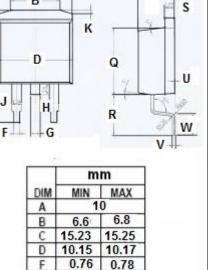
· Designed for use in switch mode power supplies and general purpose applications.



### ABSOLUTE MAXIMUM RATINGS(Ta=25°C)

SYMBOL	PARAMETER	VALUE	UNIT
V <sub>DSS</sub>	Drain-Source Voltage	100	V
V <sub>GS</sub>	Gate-Source Voltage-Continuous	±20	V
ID	Drain Current-Continuous	34	A
I <sub>DM</sub>	Drain Current-Single Pluse	68	А
P <sub>D</sub>	Total Dissipation @T <sub>c</sub> =25°C 90		W
TJ	Max. Operating Junction Temperature 150		°C
T <sub>stg</sub>	Storage Temperature -55		°C

### A В S K D Q C U н



G

Н

.1

K

Q

R

s U

٧

W

1.26

1.4

1.33

0.4 4.6

8.69

5.28

1.26

0.0

0.37

2.80

1.28

1.6

1.35

0.6

4.8 8.71

5.30

1.28

0.2

0.39

2.82

THERMAL CHARACTERISTICS

SYMBOL	PARAMETER	МАХ	UNIT	
R <sub>th j-c</sub>	Thermal Resistance, Junction to Case	1.4	°C/W	

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### **ELECTRICAL CHARACTERISTICS**

#### $T_c=25^{\circ}C$ unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	MAX	UNIT
V(BR)DSS	Drain-Source Breakdown Voltage	V <sub>GS</sub> = 0; I <sub>D</sub> = 0.1mA	100		V
V <sub>GS</sub> (th)	Gate Threshold Voltage	V <sub>DS</sub> = V <sub>GS</sub> ; I <sub>D</sub> = 0.65mA	1.0	2.5	V
R <sub>DS(on)</sub>	Drain-Source On-Resistance	V <sub>GS</sub> = 10V; I <sub>D</sub> = 17.1A		28.8	mΩ
I <sub>GSS</sub>	Gate-Body Leakage Current	V <sub>GS</sub> = ±20V;V <sub>DS</sub> = 0		±100	nA
I <sub>DSS</sub>	Zero Gate Voltage Drain Current	V <sub>DS</sub> = 100V; V <sub>GS</sub> = 0		100	μA
V <sub>SD</sub>	Forward On-Voltage	I <sub>S</sub> = 17.1A; V <sub>GS</sub> = 0		1.5	V

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