

isc N-Channel MOSFET Transistor

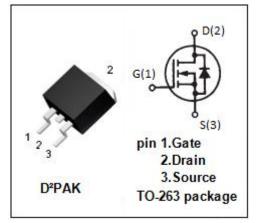
IXFA12N65X2

FEATURES

- · With low gate drive requirements
- · Easy to drive
- 100% avalanche tested
- Minimum Lot-to-Lot variations for robust device performance and reliable operation

APPLICATIONS

· Switching applications



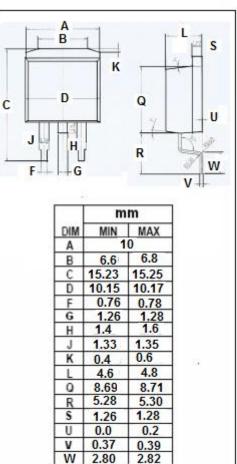
• ABSOLUTE MAXIMUM RATINGS(Ta=25°C)

SYMBOL	PARAMETER	VALUE	UNIT
V _{DSS}	Drain-Source Voltage	650	V
V _{GSS}	Gate-Source Voltage ±3		V
ID	Drain Current-Continuous 12		А
I _{DM}	Drain Current-Single Pulsed	24	А
P _D	Total Dissipation	180	W
Tj	Operating Junction Temperature	erating Junction Temperature -55~150	
T _{stg}	Storage Temperature	-55~150	°C

THERMAL CHARACTERISTICS

SYMBOL	PARAMETER	MAX	UNIT
Rth(ch-c)	Channel-to-case thermal resistance	0.69	°C /W

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2.80

2.82

isc website: www.iscsemi.cn



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ELECTRICAL CHARACTERISTICS

$T_{\texttt{C}}\text{=}25^{\circ}\!\!\!\mathbb{C}$ unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	ТҮР	MAX	UNIT
BV _{DSS}	Drain-Source Breakdown Voltage	V _{GS} =0V; I _D = 0.25mA	650			V
V _{GS(th)}	Gate Threshold Voltage	V _{DS} =±30V; I _D =0.25mA	3.0		5.0	V
R _{DS(on)}	Drain-Source On-Resistance	V _{GS} = 10V; I _D =6A			310	mΩ
lgss	Gate-Source Leakage Current	V _{GS} = ±30V;V _{DS} = 0V			±0.1	μ Α
I _{DSS}	Drain-Source Leakage Current	V _{DS} = 650V; V _{GS} = 0V;@Tc=25℃ Tc=125℃			10 500	μ Α
VSDF	Diode forward voltage	I _{SD} =12A, V _{GS} = 0 V			1.4	V

NOTICE:

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