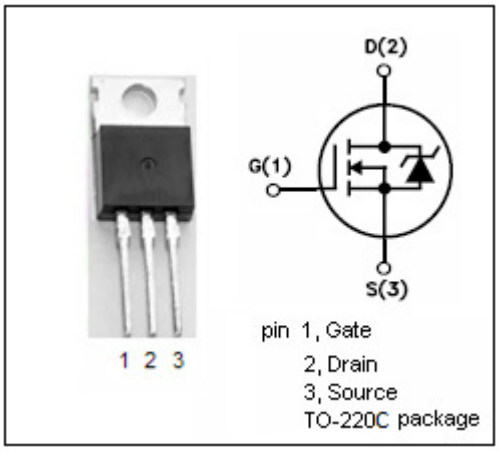
isc N-Channel Mosfet Transistor 12N65

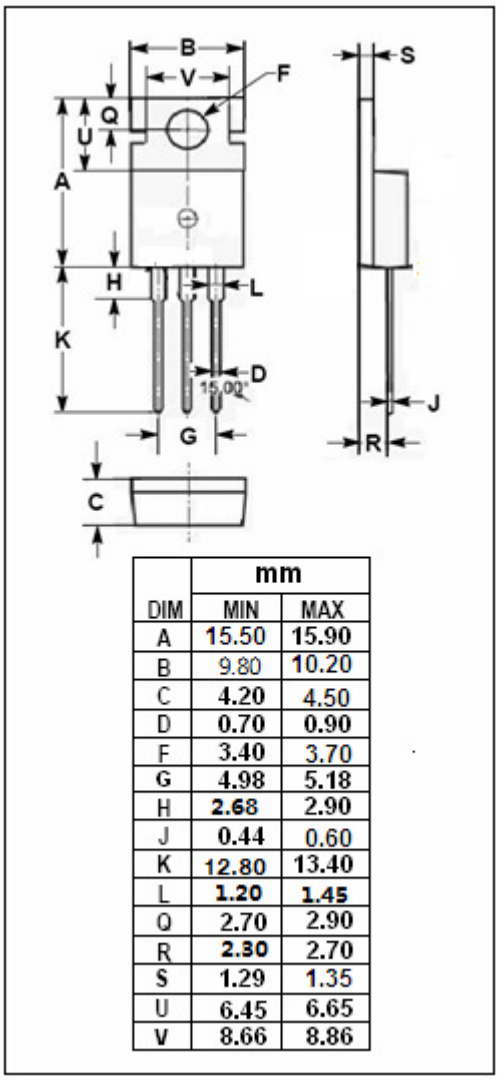


• FEATURES

- Drain Current $-I_D$= 12A@ T_C=25℃
- Drain Source Voltage-
  : V_{DSS}= 650V (Min)
- Static Drain-Source On-Resistance
  : $R_{DS(on)}$ = 0.85Ω (Max)
- Avalanche Energy Specified
- Fast Switching
- Simple Drive Requirements

• DESCRITION

- Designed for high efficiency switch mode power supply.



DIM	mm MIN	mm MAX
A	15.50	15.90
B	9.80	10.20
C	4.20	4.50
D	0.70	0.90
F	3.40	3.70
G	4.98	5.18
H	2.68	2.90
J	0.44	0.60
K	12.80	13.40
L	1.20	1.45
Q	2.70	2.90
R	2.30	2.70
S	1.29	1.35
U	6.45	6.65
V	8.66	8.86

• ABSOLUTE MAXIMUM RATINGS(T_a=25℃)

SYMBOL	PARAMETER	VALUE	UNIT
V_{DSS}	Drain-Source Voltage	650	V
V_{GS}	Gate-Source Voltage-Continuous	±30	V
I_D	Drain Current-Continuous	12	A
I_{DM}	Drain Current-Single Plused	48	A
P_D	Total Dissipation @T_C=25℃	225	W
T_j	Max. Operating Junction Temperature	150	℃
T_{stg}	Storage Temperature	-55~150	℃

• THERMAL CHARACTERISTICS

SYMBOL	PARAMETER	MAX	UNIT
$R_{th\ j\text{-}c}$	Thermal Resistance, Junction to Case	0.56	℃/W
$R_{th\ j\text{-}a}$	Thermal Resistance, Junction to Ambient	62.5	℃/W

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ELECTRICAL CHARACTERISTICS

T_C=25℃ unless otherwise specified

SYMBOL	PARAMETER	CONDITIONS	MIN	MAX	UNIT
$V_{(BR)DSS}$	Drain-Source Breakdown Voltage	V_{GS}= 0; I_D= 0.25mA	650		V
$V_{GS(th)}$	Gate Threshold Voltage	V_{DS}= V_{GS}; I_D= 0.25mA	2	4	V
$R_{DS(on)}$	Drain-Source On-Resistance	V_{GS}= 10V; I_D= 6.0A		0.85	Ω
I_{GSS}	Gate-Body Leakage Current	V_{GS}= ±30V; V_{DS}= 0		±100	nA
I_{DSS}	Zero Gate Voltage Drain Current	V_{DS}= 650V; V_{GS}= 0		1	μA
V_{SD}	Forward On-Voltage	I_S= 12A; V_{GS}= 0		1.4	V

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