



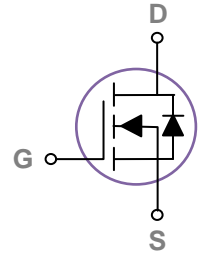
Features

- Die in 8" Wafer Form
- 100V , N-Channel , NGD
- $R_{DS(ON)}=155m\Omega$ (Max.) @ $V_{GS}=10V$

Die Description

Applications

- Networking
- LED Lighting Application
- Power Tools
- DC-DC Power Management



Parameter	Parameter	Rating	CHIP DRAWING
Die Size (with SL)	1260 X 960	um ²	
Gate Pad Size	120 X 120		
Source Pad Size	Full Metalized Source Region		
Scribe Line Size	60	um	
Wafer size	200	mm	
Wafer Thickness	6 (±0.6)	mil	
Top Metallization	4um , Al-Cu		
Back Metallization	Ti/Ni/Ag		
Gate Bond Wire	1.0 mil Au or Cu x 1		
Source Bond Wire	12 mil Al x 2		
Estimated Gross Die	24,000		

Absolute Maximum Ratings $T_c=25^\circ\text{C}$ unless otherwise noted

Symbol	Parameter	Rating	Unit
V_{DSS}	Drain-Source Voltage	100V	V
V_{GSS}	Gate-Source Voltage	±20V	V
T_J	Operating Junction Temperature Range	-50 to 150°C	°C
T_{STG}	Storage Temperature Range	-50 to 150°C	°C

Electrical Characteristics ($T_J=25^\circ\text{C}$, unless otherwise noted)

Symbol	Parameter	Conditions	Min.	Typ.	Max.	Unit
BV_{DSS}	Drain-Source Breakdown Voltage	$V_{GS}=0V, I_D=250\mu A$	100	---	---	V
I_{DSS}	Drain-Source Leakage Current	$V_{DS}=100V, V_{GS}=0V, T_J=25^\circ\text{C}$	---	---	1	uA
		$V_{DS}=80V, V_{GS}=0V, T_J=125^\circ\text{C}$	---	---	10	uA
I_{GSS}	Gate-Source Leakage Current	$V_{GS}=\pm 20V, V_{DS}=0V$	---	---	±100	nA
$R_{DS(ON)}$	Static Drain-Source On-Resistance	$V_{GS}=10V, I_D=8A$	---	'---	155	mΩ
		$V_{GS}=4.5V, I_D=6A$	---	'---	160	mΩ
$V_{GS(th)}$	Gate Threshold Voltage	$V_{GS}=V_{DS}, I_D=250\mu A$	1	1.8	2.5	V

Note : 1. The data tested by pulsed , pulse width $\leq 300\mu s$, duty cycle $\leq 2\%$.
2. R_{DS(ON)} calculated by TO252 Package Type