Product Summary

V_{DS1} =30V
V_{DS2} =30V
$R_{DS(ON)1}$ =6.2mΩ
$R_{DS(ON)2}$ =4.5mΩ
I_{D1} =50A
I_{D2} =60A

The ZMD68301N combines advanced trench MOSFET technology with a low resistance package to provide extremely low $R_{DS(ON)}$.

Trench technology

$_{DS(ON)}$ to minimize conductive loss

Dual DIE in one package

DC/DC Converters in Computing

Isolated DC/DC Converters in Telecom and Industrial

Part NO.	ZMD68301N
Marking2( )]TJETQQ EMC 1143 494.83 211.94 120.98 0.137 063.9.261ZMD68301	]TJETn-US)>BDC 834.63

T_C =25 Q1

Parameter	**Symbol**	Rating	Unit
Drain-Source Voltage	V_{DS}	30	V
Gate-Source Voltage	V_{GS}	±20	V
Continuous Drain Current	$I_{D@}$TC=25℃	50	A
	$I_{D@}$TC=75℃	38	A
	$I_{D@}$TC=100℃	31.5	A
Pulsed Drain Current	I_{DM}	120	A
Total Power Dissipation(TC=25℃)	P_D@TC=25℃	60	W
Total Power Dissipation(TA=25℃)	P_D@TA=25℃	1.8	W
Operating Junction Temperature	T_J	-55 to 150	℃
Storage Temperature	T_{STG}	-55 to 150	℃
Single Pulse Avalanche Energy@L=0.1mH	E_{AS}	45	mJ
Avalanche Current@L=0.1mH	I_{AS}	30	A

Thermal resistance(Q1)

Parameter	Symbol	Min.	Typ.	Max.	Unit

(Q2)

Parameter	Symbol	Condition	Min.

Channel characteristics curve(Q1)

Fig.1 Gate-Charge Characteristics

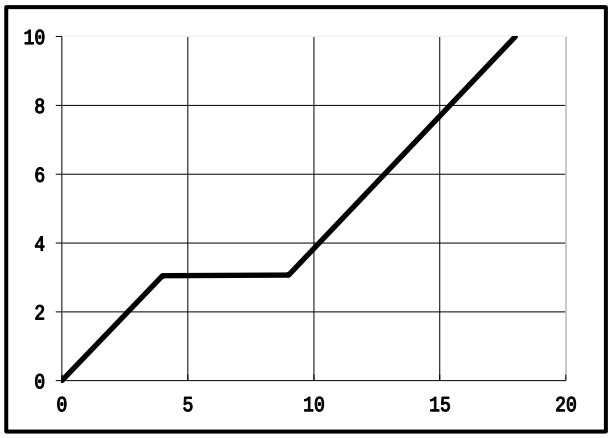


Fig.2 Capacitance Characteristics

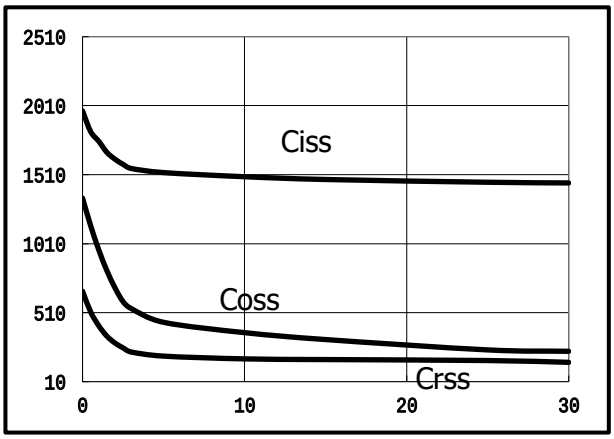


Fig.3 Power Dissipation

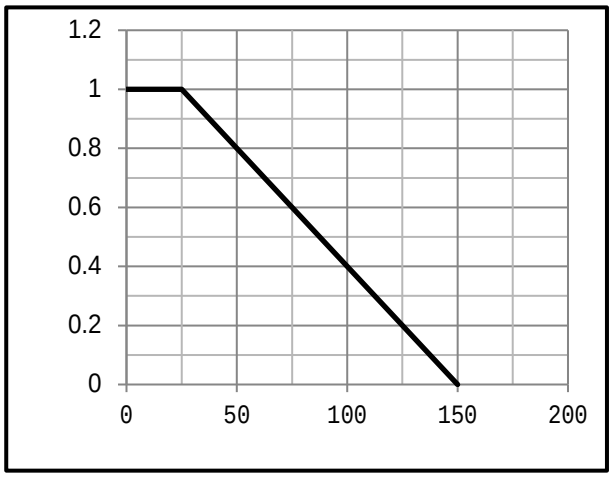


Fig.4 Typical output Characteristics

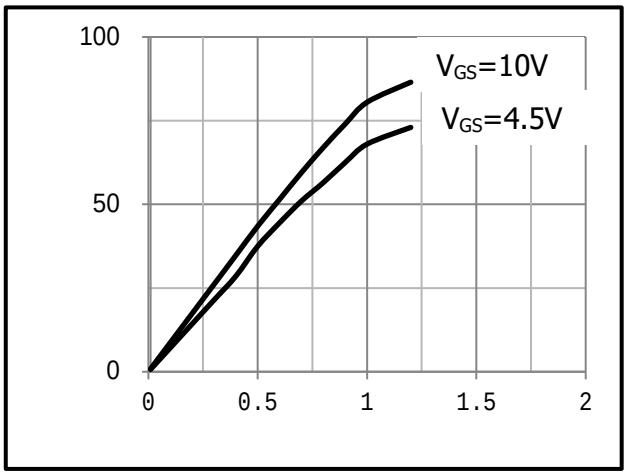


Fig.5 Threshold Voltage V.S Junction Temperature

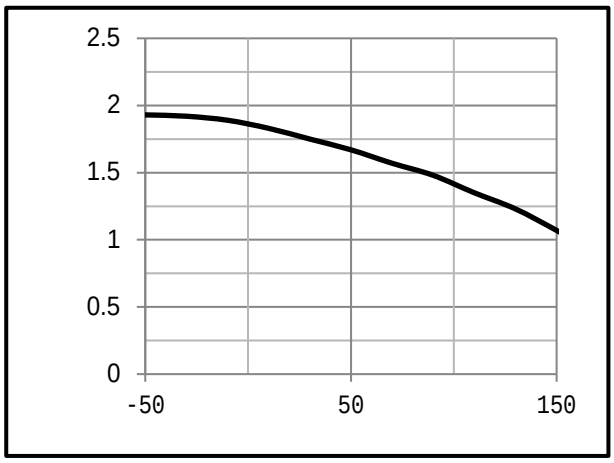
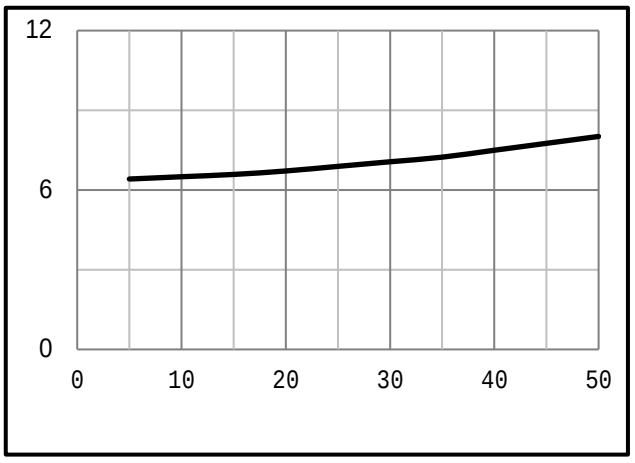


Fig.6 Resistance V.S Drain Current



sions DFN5×6

Unit mm