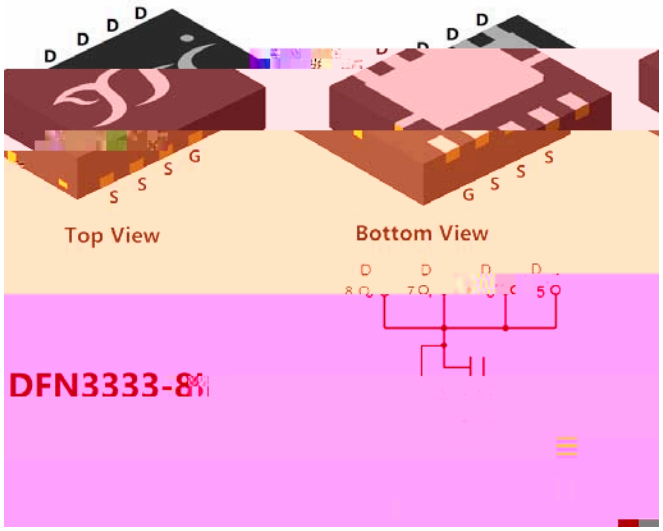
RoHS
COMPLIANT



- Excellent package for heat dissipation
- High density cell design for low $R_{DS(ON)}$
- Part no. with suffix "Q" means AEC-Q101 qualified

- Power switching application
- Uninterruptible power supply
- DC-DC convertor
- 12V Automotive systems

■ (T_A=25 unless otherwise noted)

Drain-source Voltage		V_{DS}	40	V
Gate-source Voltage		V_{GS}	± 20	V
Drain Current	T_C=25	I_D	69	A
	T_C =100		48	
	T_A=25		12	
	T_A =100		8.6	
Pulsed Drain Current [A]		I_{DM}	276	A
Avalanche energy [B]		EAS	81	mJ
Total Power Dissipation [C]	T_C=25	P_D	42	W
	T_C=100		21	
	T_A=25		2.2	
	T_A =100		1.1	
Junction and Storage Temperature Range		T_J ,T_{STG}	-55 +175	

■

Thermal Resistance Junction-to-Ambient [D]	Steady-State	$R_{\theta JA}$	55	66	/W
Thermal Resistance Junction-to-Case	Steady-State	$R_{\theta JC}$	2.9	3.5	

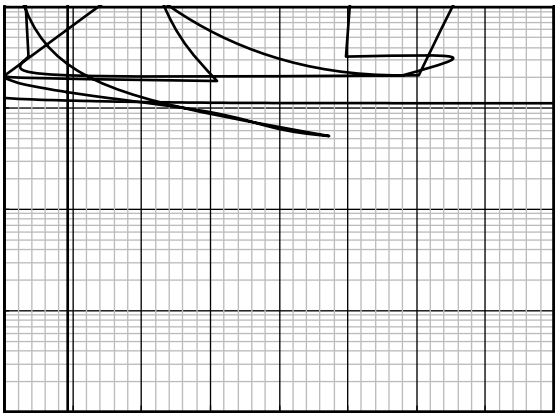
■ (Example)

YJQ69G04HHQ	F1	Q69G04H	5000	10000	100000	13“ reel

■ (T_J=25 unless otherwise noted)

v7\SLFDO (OHFWULFDO DQG 7KHUPDO &KDUDFWHULVWLFV 'LDJUDPV

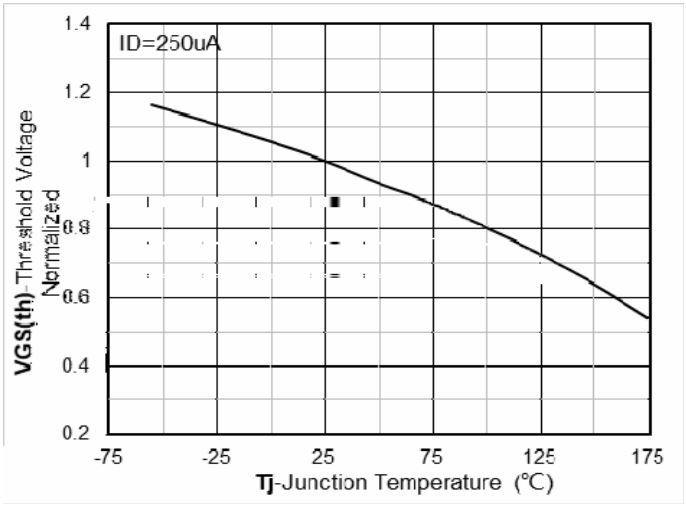
)LJXUH 2XWSXW &KDUDFWHULVWLFV)LJXUH 7UDQVIHU &KDUD



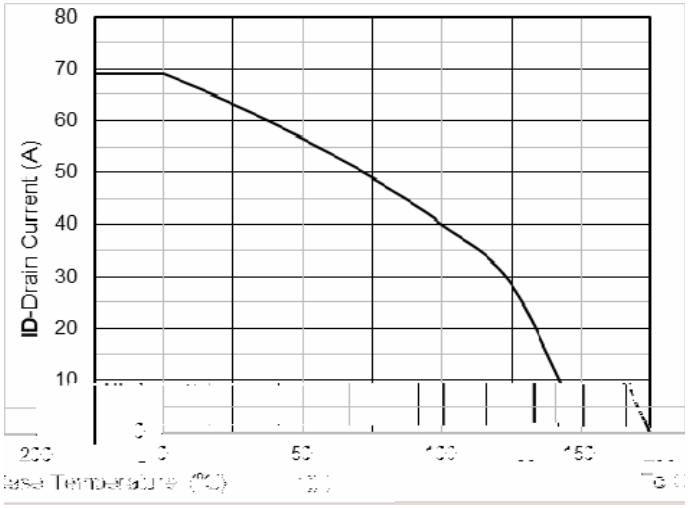
)LJXUH &DSDFLWDQFH &KDUDFWHULVWLFV)LJXUH *DWH &

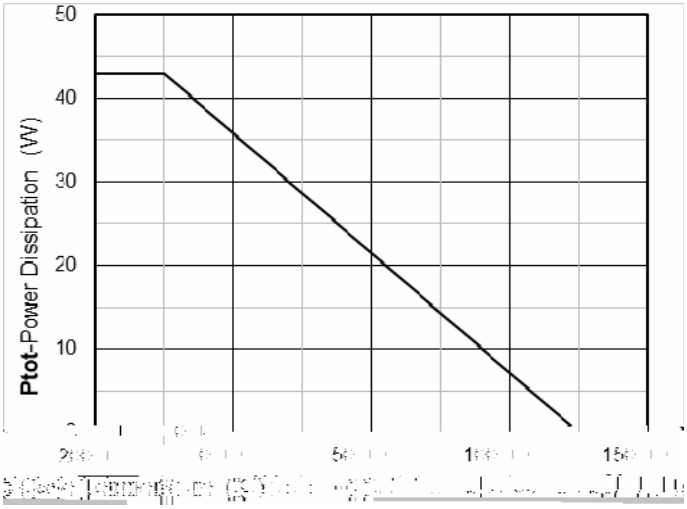
)LJXUH 2Q 5HVLVWDQFH YV *DWH WR 6RXUFH &XUUHQW)LJXUH *DWH &KDUJH YV 5HVLVWDQFH

F ŔDS(on) VS Dra5 M ɣ ɀ ent F F ᴰʿḫ ƥ ᴰ ҿM ɣ ×icsofeverse de ҿe



F ʿ ʿ ʿ !wn voltage] ḍ do F ʿ 10. N ᴰ א ƥ ˬ Ж ʿ





F ʿ ʿ ʿ } l ɲ ᵐ M ҿ Ж K ipate ɲ MMMMM ʿ ʿ ʿ ʿ sipate

)LJXUH 0D[LPH[QW7UKQVLDO ,PSHGDQFH)LJXUH 6DIH 2SHUDWL