

P-Channel Enhancement Mode Field Effect Transistor in a PDFN 3×3A-8L Plastic Package.

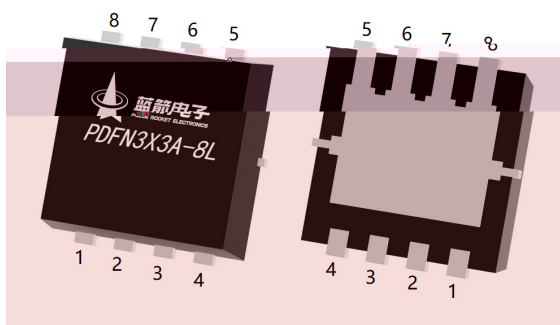
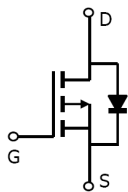
$V_{DS} (V) = -40V$

$I_D = -41A (V_{GS} = \pm 20V)$

$R_{DS(ON)} @ -10V \leq 13.5mR (Typ. 11.6mR)$

HF Product.

Notebook AC-in load switch, Battery protection charge/discharge.



出脚	定义
Pin1	S
Pin2	S
Pin3	S
Pin4	G
Pin5	D
Pin6	D
Pin7	D
Pin8	D

See Marking Instructions.

Parameter			
Continuous	$I_D(T_c=25\text{ }^{\circ}\text{C})$	-41	A
	I_{DM}	-72	A
	V_{GS}	± 20	V
	$P_D(T_c=25\text{ }^{\circ}\text{C})$	30	W
		317.5	mJ
		-31.5	A
		-55 to 150	
	$R_{\theta JA}$	22	/ W
		55	

junction -

Steady-State

$R_{\theta JC}$

Parameter

2



Parameter	Symbol	Test Conditions	Min	Typ	Max	Unit
Turn-On Delay Time	$t_{d(on)}$	$V_{GS}=-10V$ $V_{DS}=-20V$ $R_L=0.75\Omega$ $R_{GEN}=3\Omega$		11		ns
Turn-On Rise Time	t_r			7.8		
Turn-Off Delay Time	$t_{d(off)}$			44		
Turn-Off Fall Time	t_f			18		

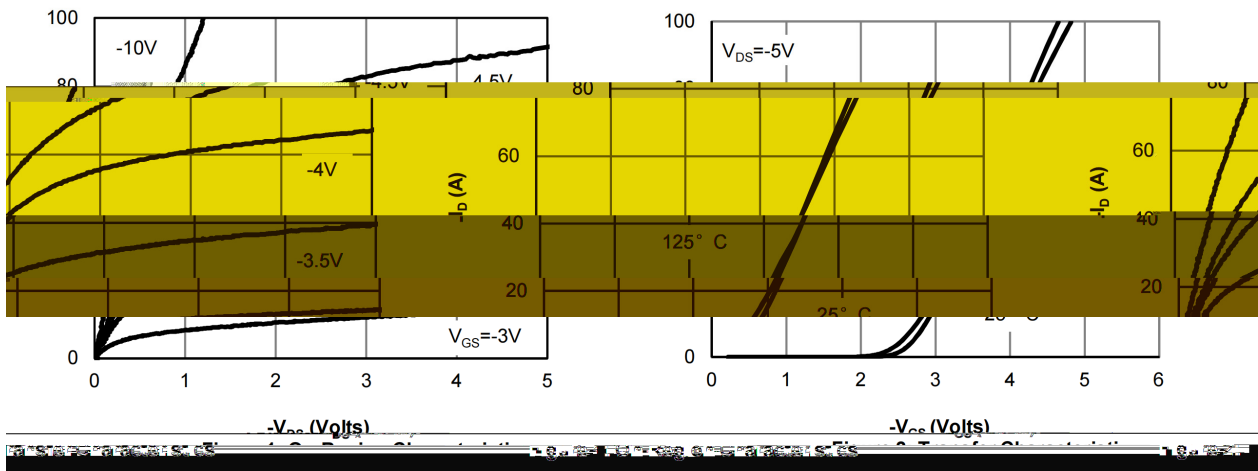


Figure 3: On-Resistance vs. Drain Current and Gate Voltage

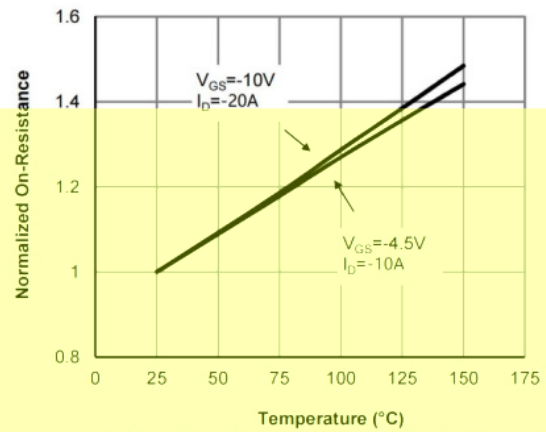


Figure 4: On-Resistance vs. Junction Temperature

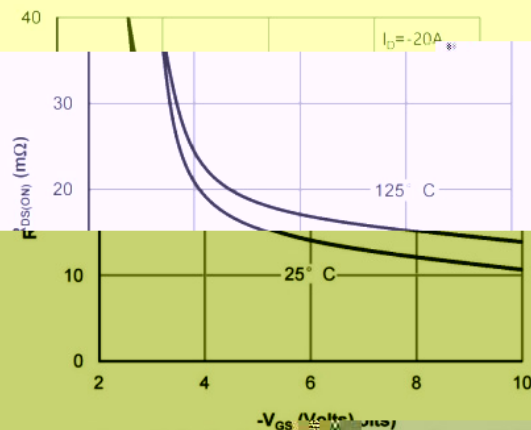


Figure 5: On-Resistance vs. Gate-Source Voltage

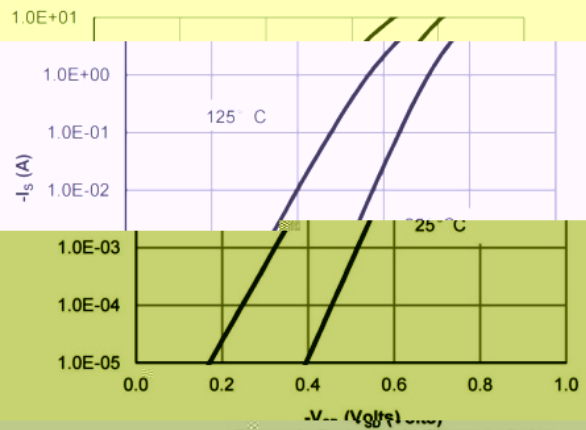
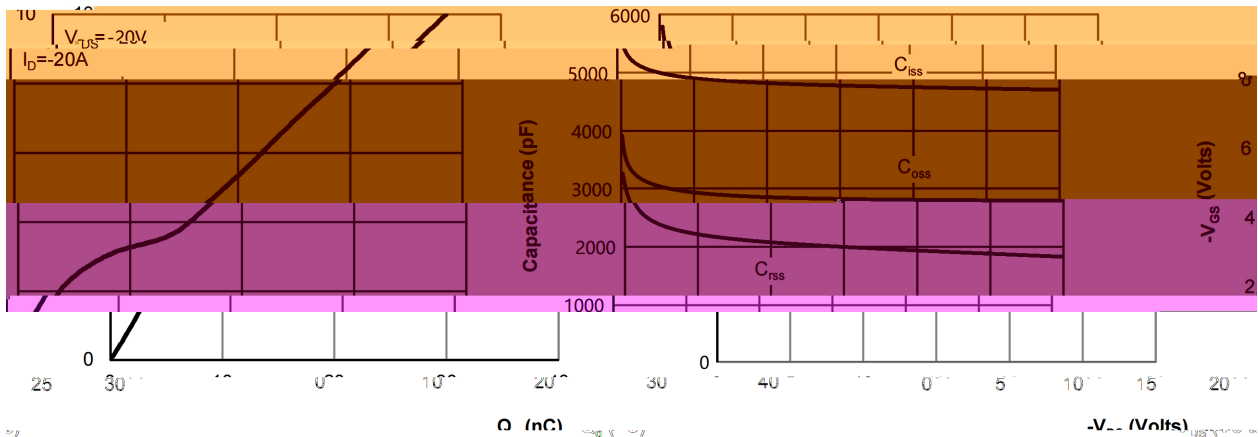


Figure 6: Body-Diode Characteristics

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Characteristics Figure 7: Gate-Charge Characteristics Figure 8: Capacitance Characteristics

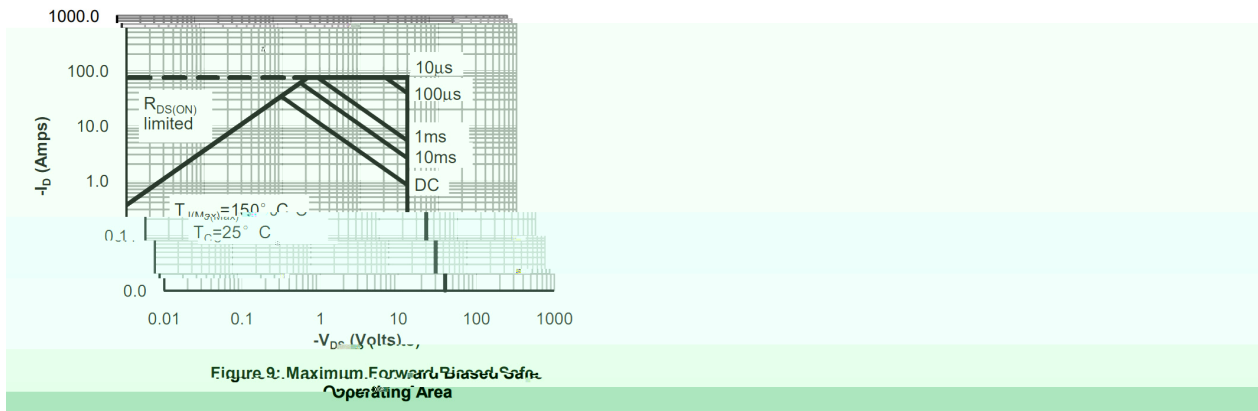


Figure 9: Maximum Forward Bias Safe Operating Area

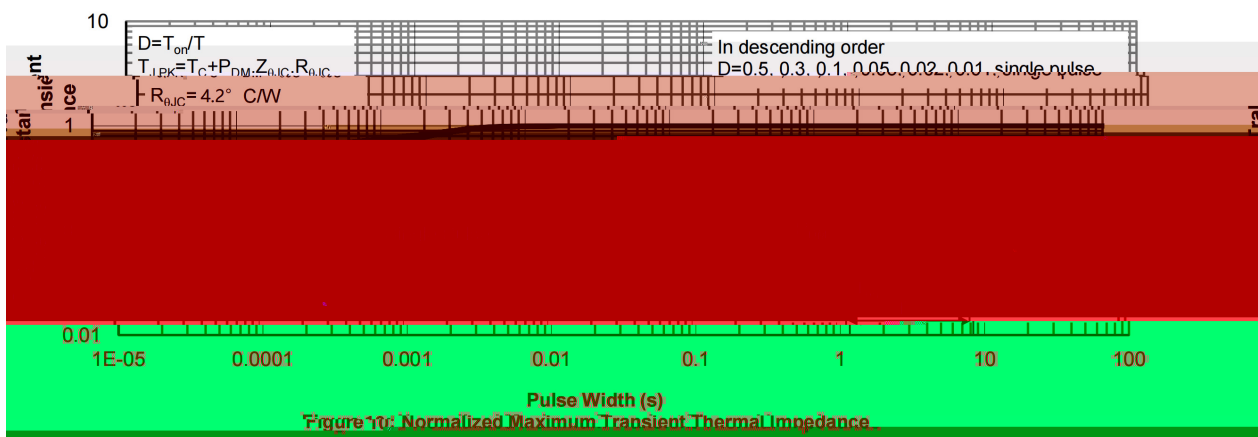
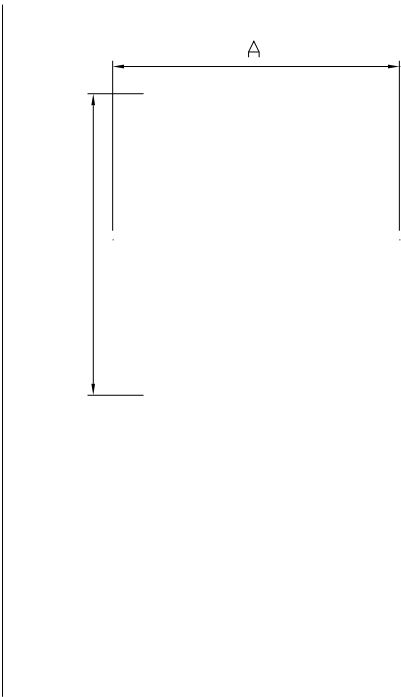


Figure 10: Normalized Maximum Transient Thermal Impedance

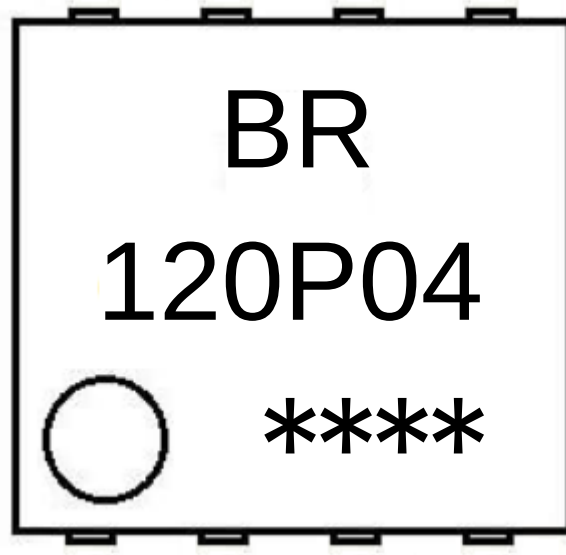
PDFN3X3A-8L

Unit:mm



Dimensions In Millimeterer			
Symbol	MIN	TYP	MAX
A	3.20	3.30	3.40
A1	3.10	3.15	3.20
B	3.20	3.30	3.40
B1	2.95	3.00	3.05

Rev.00 202011



BR

120P04

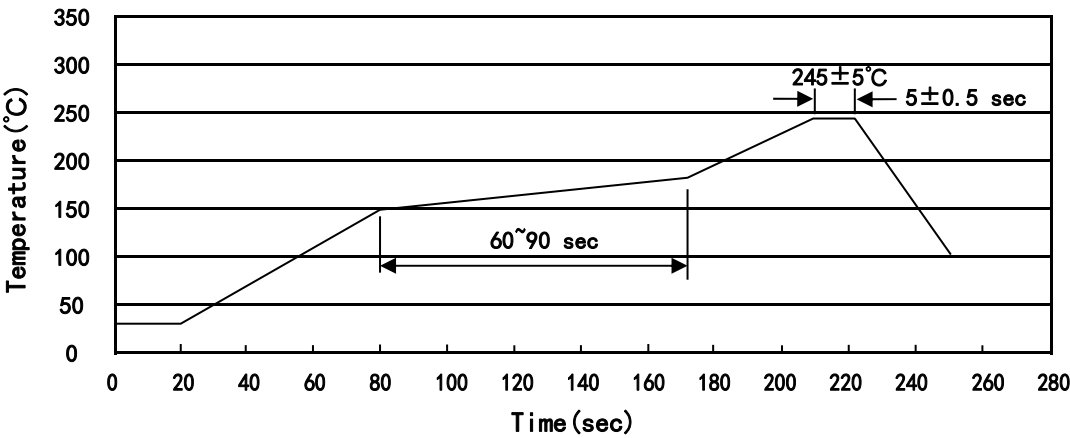
Note:

BR: Company Code

120P04: Product Type Code

*****: Lot No. Code, code change with Lot No

Temperature Profile for IR Reflow Soldering(Pb-Free)



Note:

- | | | | | | |
|---|-----|-----|----|---------|---|
| 1 | 150 | 180 | 60 | 90sec; | 1.Preheating:150~180 , Time:60~90sec. |
| 2 | 245 | 5 | 5 | 0.5sec; | 2.Peak Temp.:245 5 , Duration:5 0.5sec. |
| 3 | | 2 | 10 | /sec. | 3. Cooling Speed: 2~10 /sec. |

260 5 10 1 sec. Temp.:260 5 Time:10 1 sec

/ REEL

Package Type	Units					Dimension (unit mm ³)		
	Units/Reel	Reels/Inner Box	Units/Inner Box	Inner Boxes/Outer Box	Units/Outer Box	Reel	Inner Box	Outer Box
PDFN 3 S 3A-8L	5,000	2	10,000	6	60,000	13 = ×12	360×360×50	380×335×366