

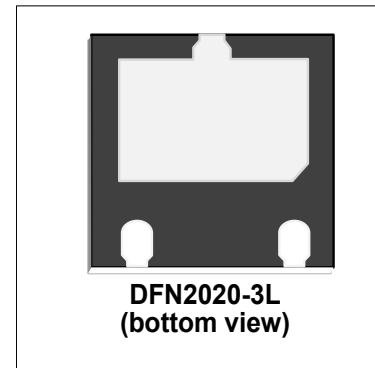


Features

- 4400 Watts Peak Power ($t_p = 8/20\mu s$)
- Fast Response time: Typically <1ns
- Excellent Clamping Capability
- Low Inductance
- Low profile package

IEC Compatibility (EN61000-4)

- IEC 61000-4-2 (ESD) $\pm 30kV$ (air), $\pm 30kV$ (contact)
- IEC 61000-4-4 (EFT) 40A (5/50ns)
- IEC 61000-4-5 (Lightning) 250A (8/20 μs)



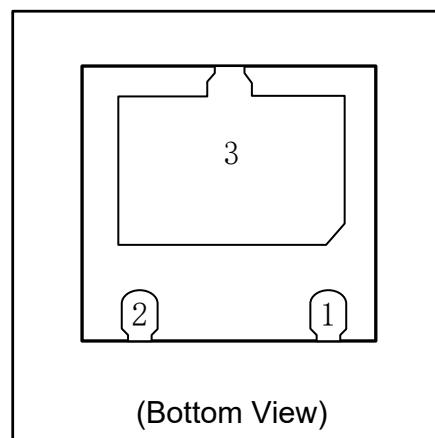
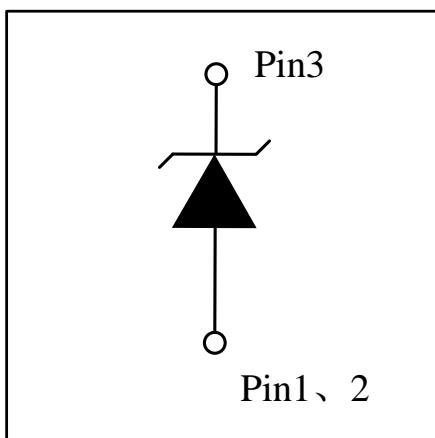
Mechanical Characteristics

- DFN2020-3L package
- Molding compound flammability rating: UL 94V-0
- Marking : Making Code
- Packaging : Tape and Reel per EIA 481
- RoHS Compliant

Applications

- I/O Interfaces
- Power lines
- Automotive and Telecommunication
- Computer & Consumer Electronics
- Industrial Electronics
- Microcontroller Input Protection

PIN Configuration



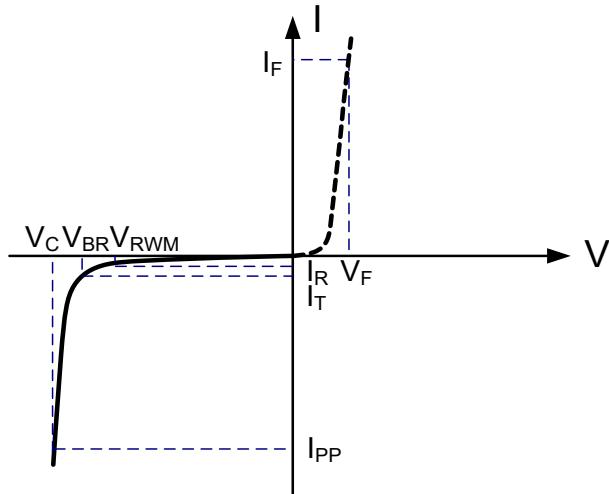


Absolute Maximum Rating

Rating	Symbol	Value	Units
Lead Soldering Temperature	T _L	260(10sec)	°C
Operating Temperature	T _J	-55 to + 125	°C
Storage Temperature	T _{STG}	-55 to +150	°C
Peak Pulse Power ($t_p=8/20\mu s$)	P _{PP}	4400	Watts

Electrical Parameters (T=25°C)

Symbol	Parameter
I _{PP}	Reverse Peak Pulse Current
V _C	Clamping Voltage @ I _{PP}
V _{RWM}	Reverse Stand-Off Voltage
I _R	Reverse Leakage Current @ V _{RWM}
V _{BR}	Breakdown Voltage @ I _T
I _T	Test Current
I _F	Forward Current
V _F	Forward Voltage @ I _F



Electrical Characteristics

DW07P4N3-S						
Parameter	Symbol	Conditions	Minimum	Typical	Maximum	Units
Reverse Stand-Off Voltage	V _{RWM}				7	V
Reverse Breakdown Voltage	V _{BR}	I _T =1mA	8			V
Reverse Leakage Current	I _R	V _{RWM} =7V, T=25 °C			200	nA
Peak Pulse Current	I _{PP}	t _p =8/20μs			250	A
Clamping Voltage ¹	V _C	I _{PP} =1A, t _p =8/20μs		9	12	V
Clamping Voltage ¹	V _C	I _{PP} =150A, t _p =8/20μs		13	15	V
Clamping Voltage ¹	V _C	I _{PP} =250A, t _p =8/20μs		16	18	V
Junction Capacitance	C _j	V _R = 0V, f = 1MHz		1500	1800	pF

Note: Measured from pin 3 to pin 1& pin 2.



Typical Characteristics

Figure 1: Peak Pulse Power vs. Pulse Time

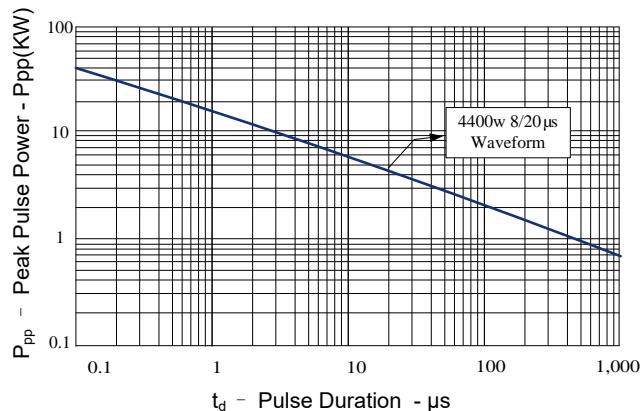


Figure 2: Power Derating Curve

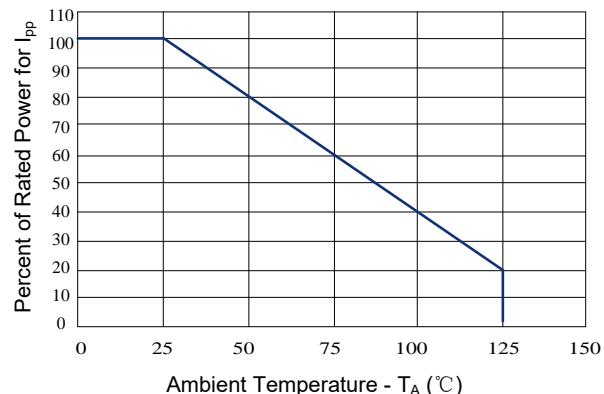


Figure 3: Clamping Voltage vs. Peak Pulse Current

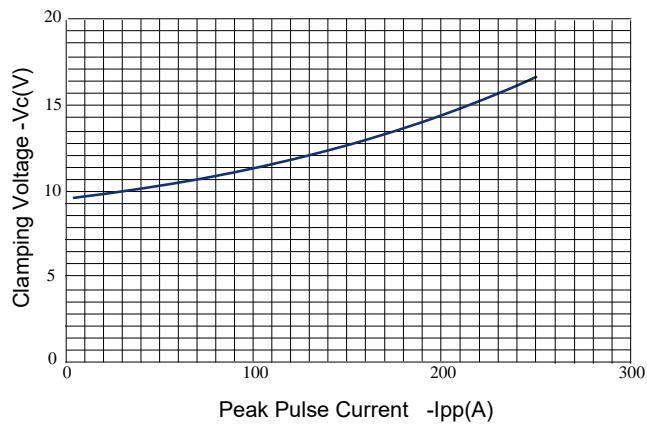


Figure 4: Normalized Junction Capacitance vs. Reverse Voltage

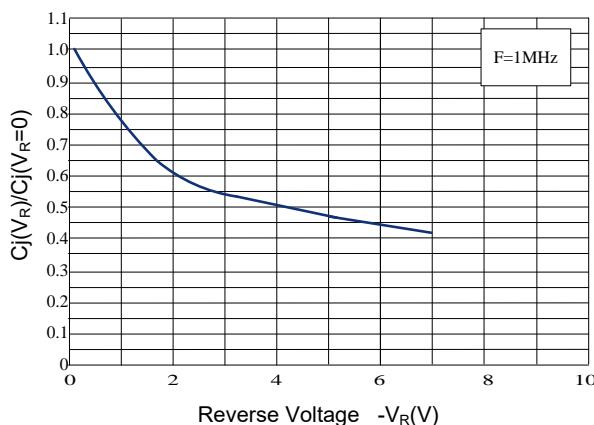
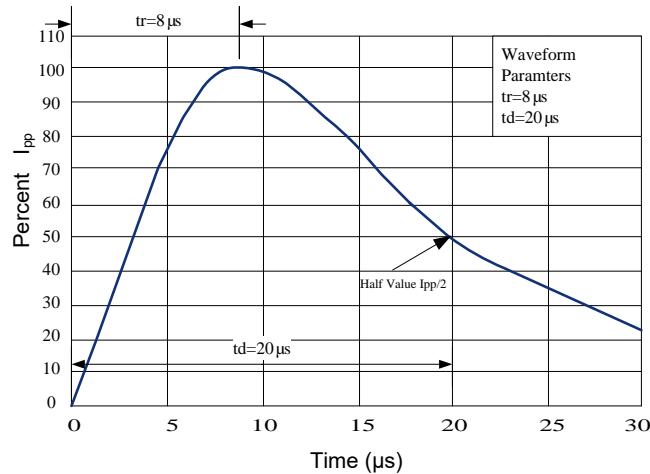


Figure 5: 8/20 μ s Pulse Waveform

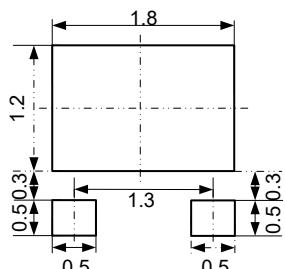




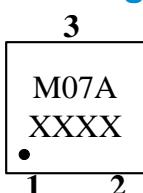
Outline Drawing –DFN2020-3L

PACKAGE OUTLINE			
SYMBOL	MILLIMETER		
	MIN	NOM	MAX
A	0.5	0.55	0.60
A1	0.00	0.02	0.05
b	0.25	0.30	0.35
b1	0.20REF		
c	0.152REF		
D	1.90	2.00	2.10
D2	1.40	1.50	1.60
e	1.30BSC		
E	1.90	2.00	2.10
E2	0.95	1.05	1.15
E3	0.20	0.30	0.40
L	0.35	0.40	0.45
L1	0.20	0.25	0.30
h	0.20REF		
K	0.20	0.30	0.40

Land Pattern



Marking Codes

M07A=Specific Device Code
XXXX=Lot Code

Package Information

Qty: 3k/Reel