

### FEATURES

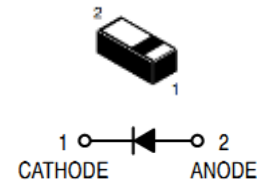
- Low forward voltage drop
- Small power mold type
- Low IR
- Small current rectification

### APPLICATIONS

- Low voltage rectification
- High efficiency Buck and Boost DC-to-DC conversion
- Switch mode power supply
- LED or Keypad backlight for mobile application
- Low power consumption applications
- Ultra high-speed switching
- Reverse Voltage and Current Protection
- Clamping & Protection

### MARKETS

- Mobile Handsets
- MP3 Players
- Digital Camera and Camcorders
- Notebook PCs & PDAs
- GPS



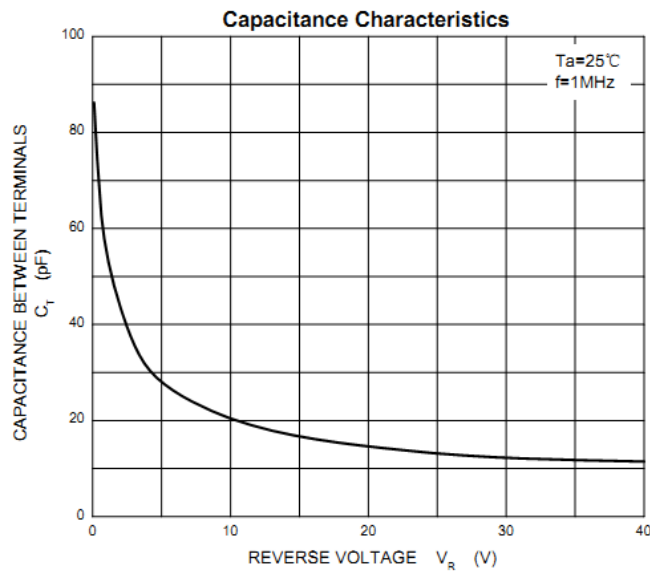
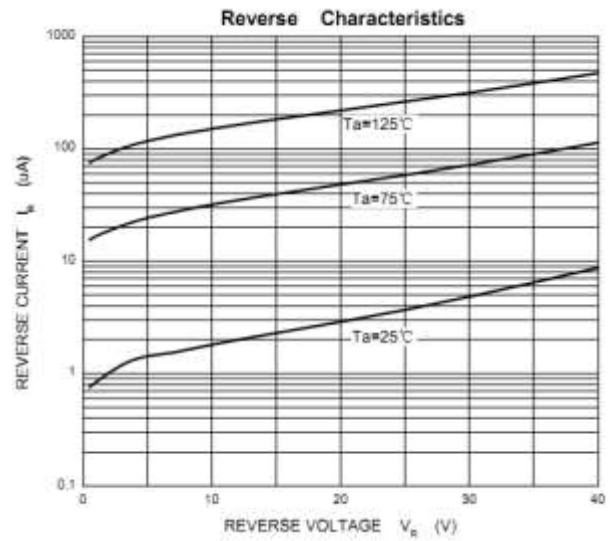
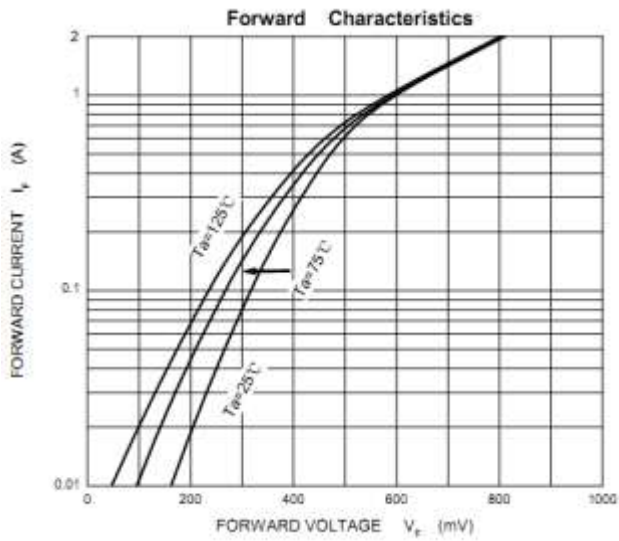
### MAXIMUM RATINGS (Ta=25°C unless otherwise noted )

Symbol	Parameter	Value	Unit
V <sub>RRM</sub>	Peak Repetitive Reverse Voltage	40	V
V <sub>RWM</sub>	Working Peak Reverse Voltage		
V <sub>R(RMS)</sub>	RMS Reverse Voltage	28	V
I <sub>O</sub>	Average Rectified Output Current	1	A
I <sub>FSM</sub>	Non-repetitive Peak Forward Surge Current @ t≤8.3ms	30	A
P <sub>D</sub>	Power Dissipation	150	mW
R <sub>θJA</sub>	Thermal Resistance from Junction to Ambient	833	°C/W
T <sub>j</sub>	Junction Temperature	125	°C
T <sub>stg</sub>	Storage Temperature	-55~+150	°C

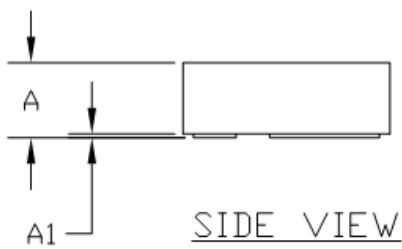
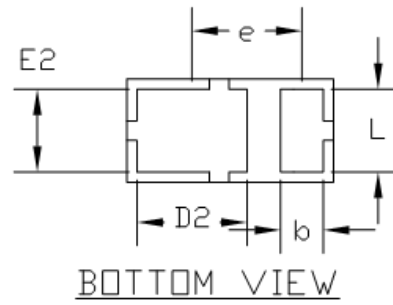
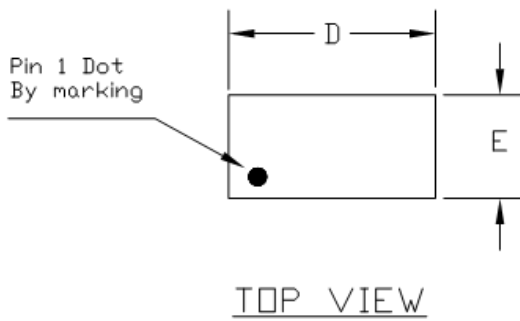
### ELECTRICAL CHARACTERISTICS (Ta=25°C unless otherwise specified)

Parameter	Symbol	Test conditions	Min	Typ	Max	Unit
Reverse voltage	V <sub>(BR)</sub>	I <sub>R</sub> =10μA	40			V
Reverse current	I <sub>R</sub>	V <sub>R</sub> =40V			50	μA
Forward voltage	V <sub>F</sub>	I <sub>F</sub> =1.0A			0.53	V
Diode capacitance	C <sub>d</sub>	V <sub>R</sub> =1V; f=1MHz; T <sub>j</sub> =25°C		50		pF
		V <sub>R</sub> =10V; f=1MHz; T <sub>j</sub> =25°C		20		pF
Reverse recovery time	t <sub>rr</sub>	I <sub>F</sub> =I <sub>R</sub> =10mA; R <sub>L</sub> =100Ω; I <sub>R</sub> (meas)=1mA		15		nS

### Typical Characteristics



### DFN 1.6X0.8-2L Package Outline Dimensions



COMMON DIMENSIONS(MM)			
PKG.	UT: UTRIAL THIN		
REF.	MIN.	NDM.	MAX.
A	0.50	0.55	0.60
A1	0.00	-	0.05
A3	0.15 REF.		
D	1.55	1.60	1.65
E	0.75	0.80	0.85
D2	0.75	0.85	0.95
E2	0.54	0.64	0.74
L	0.54	0.64	0.74
b	0.28	0.33	0.41
e	0.85 BSC		

Lead finish: NiPdAu

### DFN 1.6X0.8-2L Suggested Pad Layout

