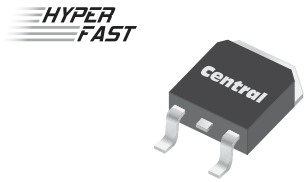
CHD8-06

SURFACE MOUNT SILICON
HYPERFAST
POWER RECTIFIER
8.0 AMP, 600 VOLT



DPAK CASE

Central Semiconductor Corp.

www.centralsemi.com

DESCRIPTION:

The CENTRAL SEMICONDUCTOR CHD8-06 is a high voltage silicon HyperFast power rectifier designed for extremely fast switching applications.

MARKING: FULL PART NUMBER

APPLICATIONS:

- Power factor correction
- Motor control

FEATURES:

- High current capability
- High surge capacity
- HyperFast recovery time (22ns TYP)
- High voltage

MAXIMUM RATINGS: (T_A=25°C unless otherwise noted)

	SYMBOL		UNITS
Peak Repetitive Reverse Voltage	V_{RRM}	600	V
DC Blocking Voltage	V_R	600	V
RMS Reverse Voltage	$V_{R(RMS)}$	420	V
Average Forward Current (T_L=100°C)	I_O	8.0	A
Peak Forward Surge Current, tp=8.3ms	I_{FSM}	70	A
Operating and Storage Junction Temperature	T_J, T_{stg}	-65 to +175	°C
Thermal Resistance	Θ_{JL}	5.0	°C/W

ELECTRICAL CHARACTERISTICS: (T_A=25°C unless otherwise noted)

SYMBOL	TEST CONDITIONS	TYP	MAX	UNITS
I_R	V_R=600V		10	μA
I_R	V_R=600V, T_A=150°C		500	μA
V_F	I_F=8.0A	1.9	2.2	V
C_J	V_R=4.0V, f=1.0MHz	26	35	pF
t_{rr}	I_F=8.0A, V_R=400V, di/dt=200A/μs	22	25	ns

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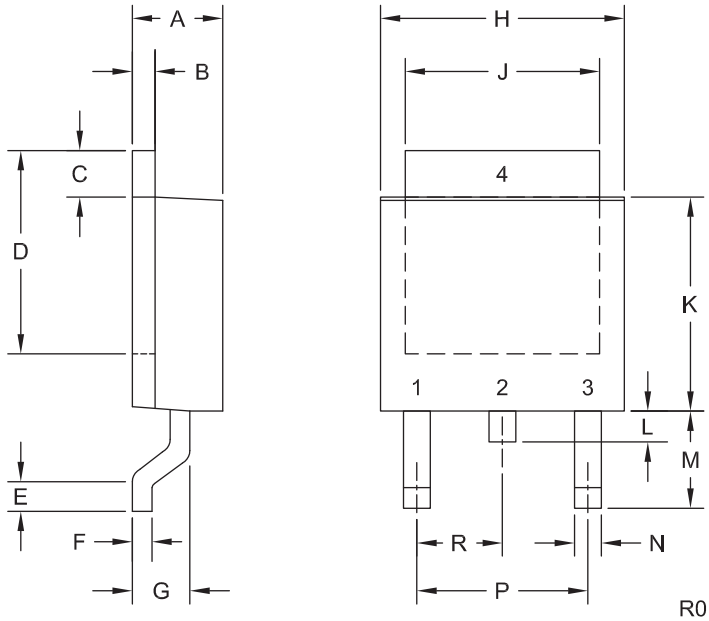
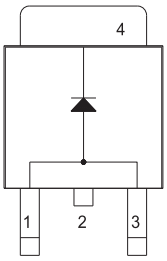
DPAK CASE - MECHANICAL OUTLINE



LEAD CODE:
1) Anode
2) Cathode
3) Anode
4) Cathode
Pin 2 is common to the tab (4)

MARKING: FULL PART NUMBER



DIMENSIONS				
	INCHES		MILLIMETERS	
SYMBOL	MIN	MAX	MIN	MAX
A	0.083	0.108	2.10	2.75
B	0.016	0.032	0.40	0.81
C	0.035	0.063	0.89	1.60
D	0.203	0.228	5.15	5.79
E	0.020	-	0.51	-
F	0.018	0.024	0.45	0.60
G	0.051	0.071	1.30	1.80
H	0.248	0.268	6.30	6.81
J	0.197	0.217	5.00	5.50
K	0.209	0.245	5.30	6.22
L	0.025	0.040	0.64	1.02
M	0.090	0.115	2.30	2.91
N	0.012	0.045	0.30	1.14
P	0.180		4.60	
R	0.090		2.30	

DPAK (REV: R0)

R3 (31-August 2016)

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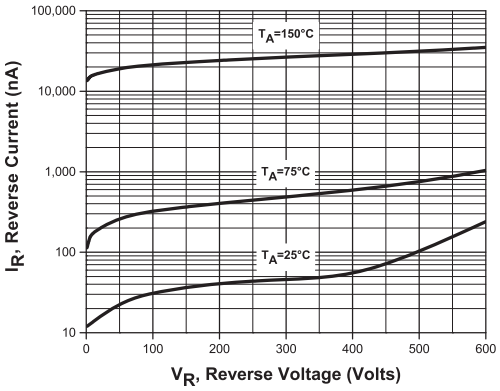
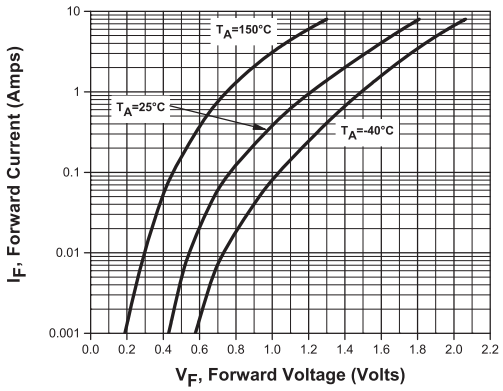
TYPICAL ELECTRICAL CHARACTERISTICS

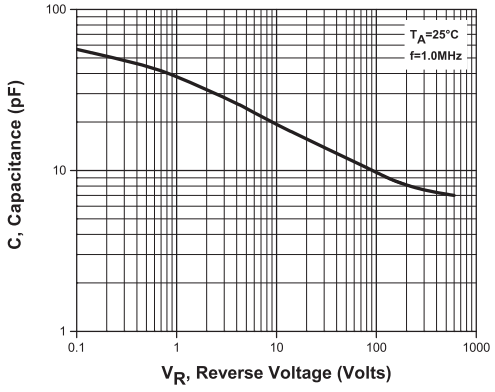
Leakage Current



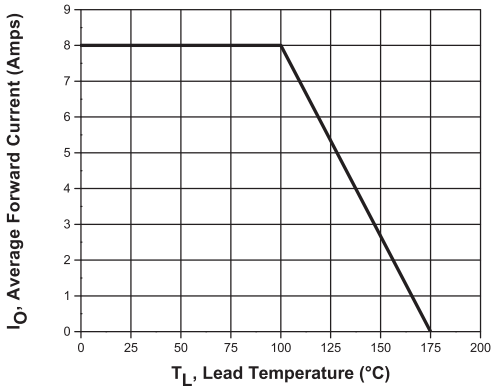
Forward Voltage



Capacitance



Current Derating



OUTSTANDING SUPPORT AND SUPERIOR SERVICES

PRODUCT SUPPORT

Central's operations team provides the highest level of support to insure product is delivered on-time.

- Supply management (Customer portals)
- Inventory bonding
- Consolidated shipping options
- Custom bar coding for shipments
- Custom product packing

DESIGNER SUPPORT/SERVICES

Central's applications engineering team is ready to discuss your design challenges. Just ask.

- Free quick ship samples (2nd day air)
- Online technical data and parametric search
- SPICE models
- Custom electrical curves
- Environmental regulation compliance
- Customer specific screening
- Up-screening capabilities
- Special wafer diffusions
- PbSn plating options
- Package details
- Application notes
- Application and design sample kits
- Custom product and package development

REQUESTING PRODUCT PLATING

1. If requesting Tin/Lead plated devices, add the suffix " TIN/LEAD" to the part number when ordering (example: 2N2222A TIN/LEAD).
2. If requesting Lead (Pb) Free plated devices, add the suffix " PBFREE" to the part number when ordering (example: 2N2222A PBFREE).

CONTACT US

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