Bridge Rectifier

Features:

- Electrically isolated metal case for maximum heat dissipation
- Surge overload ratings to 400A

Specifications:

No. of Phases	: Single
Repetitive Reverse Voltage Vrrm Max	: 1kV
Forward Current If(AV)	: 15A
Diode Mounting Type	: Quick Connect
No. of Pins	: 4
Body Height Max	: 11.5mm
Diode Type	: Bridge Rectifier, Single Phase
External Depth	: 28.7mm
External Length / Height	: 25.4mm
Fixing Hole Diameter	: 4.9mm
Input Voltage	: 800V
Terminal Type	: 6.35mm × 0.8mm
Termination Type	: Screw

Mechanical Data:

Case	: Metal, electrically isolated
Terminals	: Plated 0.25 inches Faston or wire lead ≤40 mils
Weight	: 1 ounce, 30 grams
Mounting position	: Any

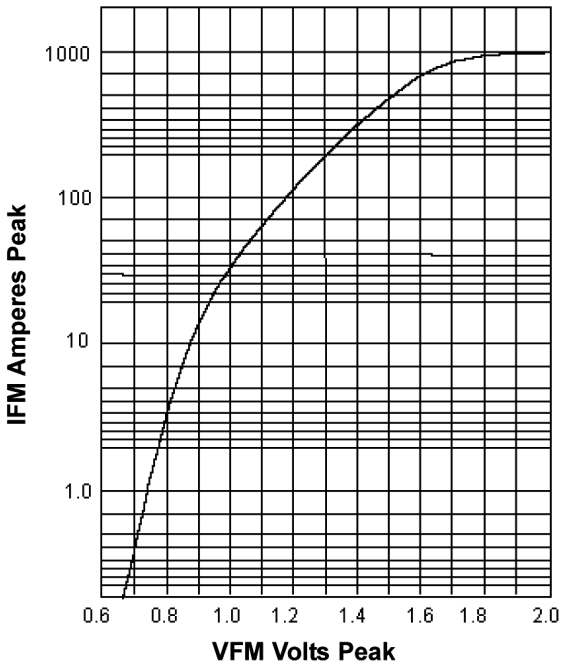
Maximum Ratings and Electrical Characteristics:

Rating at 25°C ambient temperature unless otherwise specified
Single phase, half wave, 60Hz, resistive or inductive load
For capacitive load, derate current by 20%

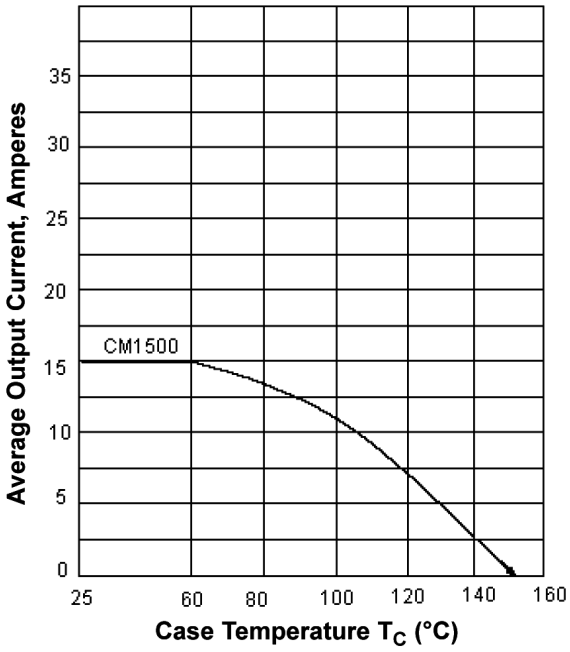
Characteristic	-010	Units
Max. recurrent peak reverse voltage Max. RMS input voltage Max. DC blocking voltage	1,000 800 1,000	V V V
Max. average forward current* for resistive load at T_C = 55°C	15	A
Non-repetitive peak forward surge current at rated load	300	A
Max. forward voltage per bridge element at specified current (I_F = 7.5A)	1.2	V
Max. reverse leakage current at rated DC blocking voltage	10	µA
I2t rating for fusing (t <8.3ms)	374	A^2s
Typical thermal resistance $R_{\theta JC}$	2.5	°C/W
Operating temperature range T_J Storage temperature range T_{STG}	-55 to +150	°C

Rating and Characteristics Curves:

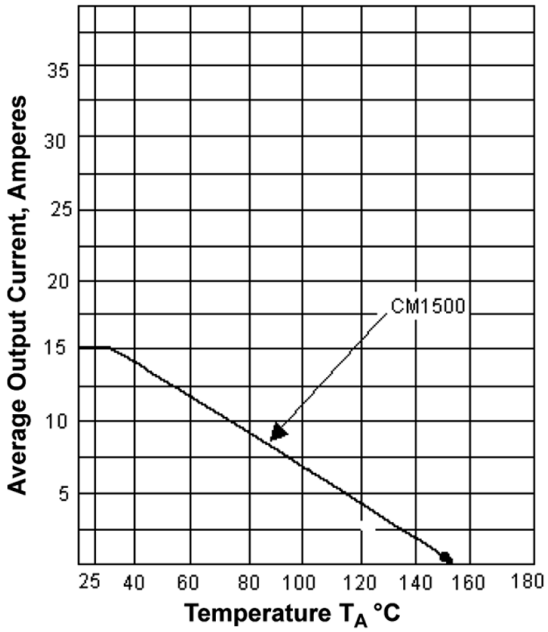
Typical Instantaneous Forward Characteristics at T_J = 25°C



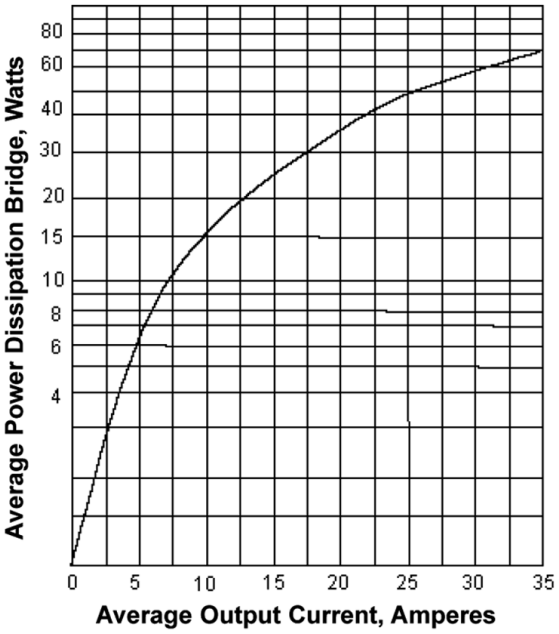
Output Current VS. Case Temperature Resistive or Inductive Load T_J = 150°C

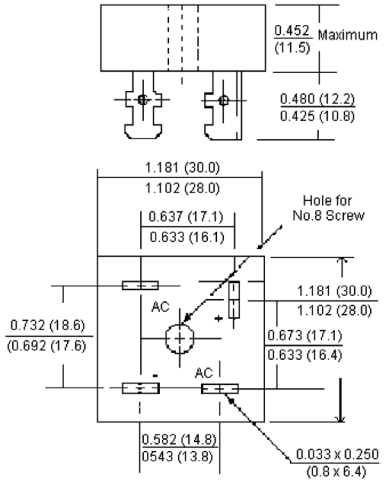


Output Current VS. Ambient Temperature Resistive or Inductive Load Bridge Mounted on a 8 Inches x 8 Inches Aluminium Plate 25 Inches Thick



Power Dissipation VS. Average Output Current Resistive or Inductive load, T_J = 150°C





Dimensions : Millimetres

Part Number Table

Description	Part Number
Bridge Rectifier, 15A, 1,000V	CM15010