

# HiTRON

## **PCB-MOUNT UNIVERSAL INPUT AC-DC POWER SUPPLIES ENCAPSULATED MODULES 15-WATTS SINGLE OUTPUT HAM15S SERIES**



### **FEATURES:**

- ON-BOARD AC/DC MODULAR POWER SUPPLIES
- WIDE INPUT VOLTAGE FOR THE WORLD WIDE USE
- COMPACT IN SIZE
- DESIGNED TO MEET UNIVERSAL SAFETY STANDARDS
- EMI MEET CISPR PUB.22 / FCC CLASS B
- CE MARKING COMPLIANCE

### **SPECIFICATION**

#### **INPUT SPECIFICATION**

**Input Voltage:** 90-264Vac. (Or 110-340Vdc).  
**Input Frequency:** 47-63 Hz. or DC.  
**Input Current:** 0.32A @115Vac./0.15A @230Vac.  
**Inrush Current:** 32.5A peak @230Vac.  
**Input Fuse:** Use external fuse. 1.0A/250Vac. for primary fuse is suggested  
**Dielectric Withstand:** Meet IEC950  
   3,000Vac-Output/Input.  
   1,500Vac-Input/GND.  
   500Vac-Output/GND.  
**EMI:** Meet CISPR PUB.22 / FCC Class B.  
**Hold-up time:** 20mS @115Vac, 120mS @230Vac.  
**Earth Leakage:** Less than 3.5mA @230Vac.

#### **OUTPUT SPECIFICATION**

**Output Voltage:** See Ratings Chart.  
**Output Current:** See Ratings Chart.  
**Output Wattage:** Typ. 15Watts.  
**Output Indicator:** LED  
**Line Regulation:** ±0.1% typ.  
**Load Regulation:** ±1.0% typ.  
**Noise & ripple:** Typ. 1.0% peak to peak.  
**OVP:** Built-in on main output.  
**Adjustability:** From -10% of main output till OVP  
**Short Circuit Protection:** Power fold back, self-recovering.  
**Overload Protection:** About 130% of overrange foldback type.

#### **GENERAL SPECIFICATION**

**Efficiency:** Typ. 72%  
**Switching Frequency:** 83K Hz.  
**Circuit Topology:** Fixed Frequency Flyback circuit.  
**Transient Response:** Output voltage returns in less than 3mS following a 50% load change.  
**Case:** Impact resistant thermo-plastic enclosure.  
**Weight:** 120.0g (4.23 Oz).  
**Power Density:** 3.76 Watts. / Cubic inch.  
**Safety Standard:** EN60950/ UL1950 Class I.

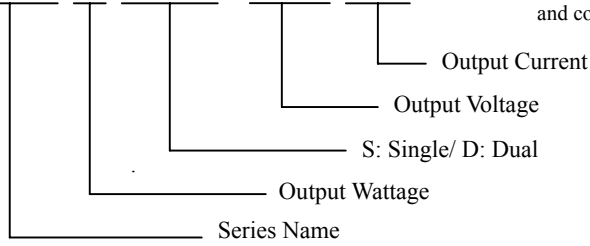
**Operating Temperature:** -25 to +71°C range. -10°C to +50°C without derating. Derating linearly 2.5%/°C from +50°C @F-L to +71°C @ H-L. (Refer to Derating Chart.)  
**Storage Temperature:** -40°C to +85°C.  
**Temperature Coefficient:** 0.02% /°C.  
**Humidity:** Up to 95%RH, Non-condensing.  
**Cooling:** Convection cooling for +50°C @ full load. At least 100LFM moving air is recommended for full load >+50°C in a confined area.  
**Commercial Grade only.**

Note: (1) All measurements are at nominal input, full load, and +25°C unless otherwise specified.

(2) Load Regulation measured from Full-Load (F-L) to Half-Load (H-L) at nominal input and others loaded at half load.

**MODEL NO. DESCRIPTION: HAM 15 S - XXX YYY**

Remark: Please specify the V/A ratings and consult for Model No



**OUTPUT VOLTAGE/ CURRENT RATINGS CHART**

**SINGLE OUTPUT**

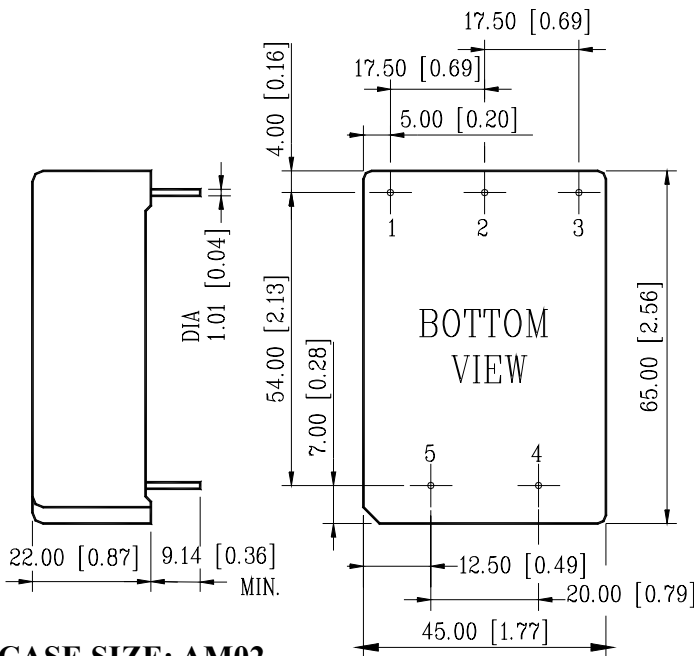
MODEL NO.	VO1 @ ★		
	TYP.	VOLT.	PEAK
HAM15S-180083	0.83A	18.0V	1.00A
HAM15S-240062	0.62A	24.0V	0.74A
HAM15S-360041	0.41A	36.0V	0.50A
HAM15S-480031	0.31A	48.0V	0.37A

Symbols: "★" OVP built-in. "@@" Adjustable.

Note: Peak output, less than 60 Sec. with duty cycle <10%.

**MECHANICAL DIMENSIONS: MM [INCHES]**

**Weight:** 120.0g (4.23 Oz).



**CASE SIZE: AM02**

**PIN ASSIGNMENT**

PIN NO.	SINGLE
PIN #1.	AC-GROUND
PIN #2.	AC-NEUTRAL
PIN #3.	AC-LINE
PIN #4.	+ VO1
PIN #5.	DC-COM

**DERATING CHART**

