

- 5 Year Warranty
- High Power Density
- SEMI F47 Compliant (high line AC)
- Universal Input (85 - 265VAC)
- High Efficiency
- RoHS Compliant Design

**Key Market Segments & Applications**

Factory Automation:  
 Test & Measurement:  
 Automated Service  
 Broadcast and Communications  
 Display Systems  
 Semiconductor Manufacturing Equipment

# HWS1500 Series

## Single Output Industrial Power Supplies

**HWS1500 Features and Benefits**

**Features**

- 5 Year Warranty
- High Efficiency
- Wide Range AC Input

**Benefits**

- Lower Cost of Ownership
- Easier System Cooling
- Supports Global Use

**Specifications**

MODEL		HWS1500
ITEMS		
Input Voltage range	-	85 - 265VAC (47 - 63Hz)
Input Current (Typ)	(1) A	19/10
Inrush Current	(1) A	20 / 40
Power Factor	-	Meets EN61000-3-2
Temperature Coefficient	-	<0.02%/°C
Overcurrent Protection	-	>105%
Overvoltage Protection	V	Typically 125 - 145% (Recycle AC or remote on/off to reset)
Hold Up Time (Typ)	ms	20
Leakage Current (max)	mA	<1.5mA at 230VAC 60Hz
Remote Sense	-	Yes
Indicator	-	Green LED = ON
Remote on/off	-	Yes (Isolated from output)
Parallel operation	-	Single wire connection (up to 5 units)
DC Good	-	Yes
Remote Adjust (PV)	-	1-6V external voltage adjusts output 20-120% of nominal (20-110% 48V model)
Operating Temperature	-	-10°C to +70°C, derate linearly to 50% load from 50°C to 70°C (3)
Storage Temperature	-	-30 to +85°C
Humidity (non condensing)	-	10 - 90%RH
Cooling	-	Internal fan
Withstand Voltage	-	Input to Ground 2kVAC, Input to Output 3kVAC, Output to Ground 500VAC for 1 min.
Isolation Resistance	-	>100M at 25C & 70%RH, Output to Ground 500VDC
Vibration (non operating)	-	10 - 55Hz (1 minute sweep), 19.6m/s <sup>2</sup> constant X, Y, Z 1 hour
Shock	-	< 196.1 m/s <sup>2</sup>
Safety Agency Approvals	-	UL60950-1, CSA60950-1, EN60950-1, EN50178, CE Mark
Line Dip	-	Complies with SEMI F47 (200VAC line only)
Conducted & Radiated EMI	-	EN55011 / EN55022-A, FCC-A, VCCI-A
Recommended EMI Filter	-	MC1230
Immunity	-	Built to meet IEC61000-4-2 (Level 2,3), -3, (Level 3), -4 (Level 3), -5 (Level 3,4), -6 (Level 3), -8 (Level 4), -11
Weight (Typ)	g	3800
Size (WxHxD)	mm	280 x 126.5 x 82
Warranty	yrs	Five Years

Notes: (1) 100/200VAC (2) Start up at -20°C (3) HWS1500 with 85VAC input: -10 to 50°C derate to 80% load, derating linearly to 40% load from 50°C to 70°C (4) For EN60601-1 see options

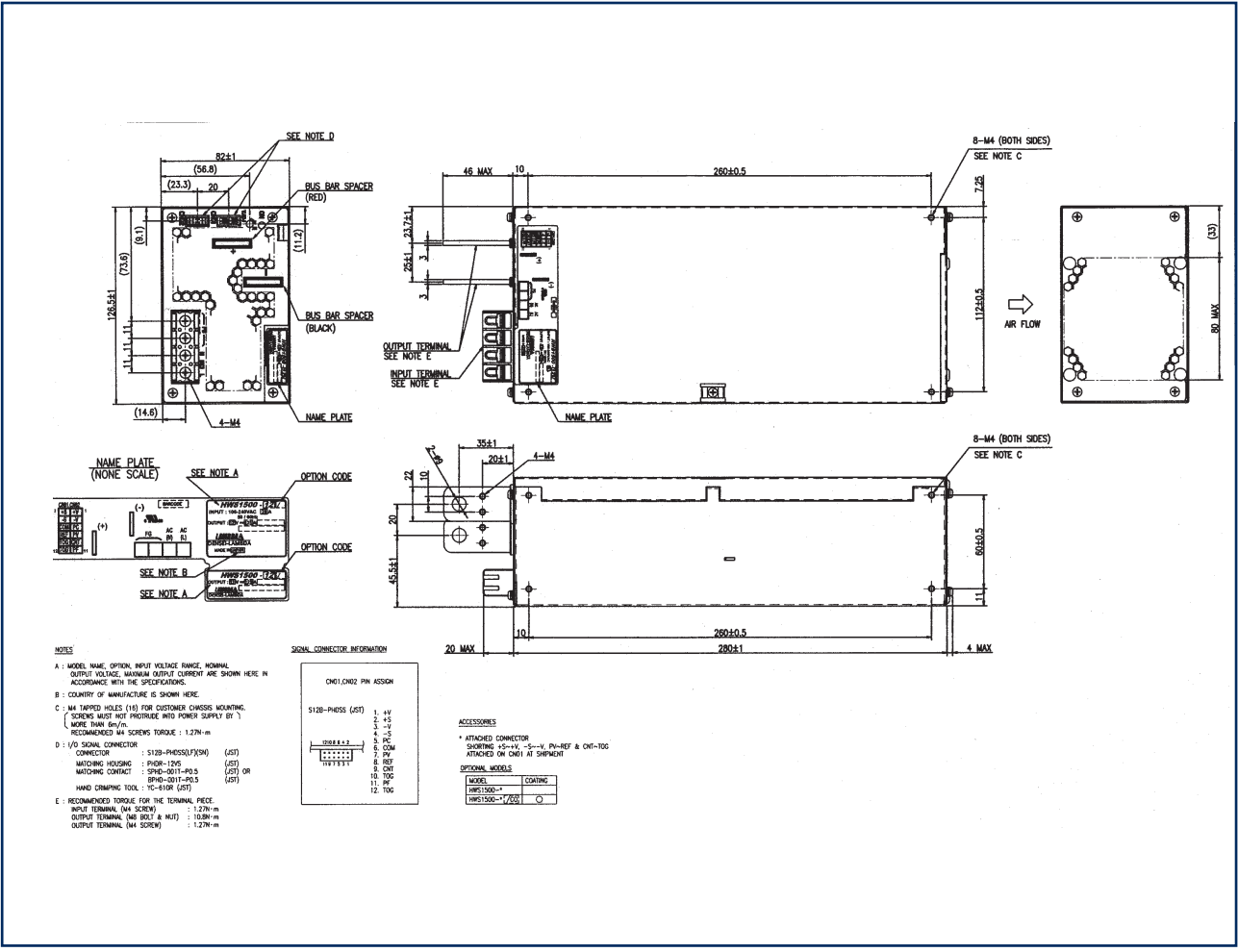
<b>Models</b>								
Model	Voltage	Adjust Range	Max Curr. A	Peak Curr. A(2)	Load Reg mV	Line Reg mV	Ripple Noise mV	Eff. typ % (1)
HWS1500-12	12V	9.6-14.4	125	-	72	48	150	82/85
HWS1500-15	15V	12.0-18.0	100	-	90	60	150	83/87
HWS1500-24	24V	19.2-28.8	65/70 <sup>(1)</sup>	105	144	96	200	84/88
HWS1500-48	48V	38.4-52.8	32	-	288	192	200	86/90

(1) 100/200VAC  
 (2) 200-265VAC Input, 10s maximum on time with 35% duty cycle.

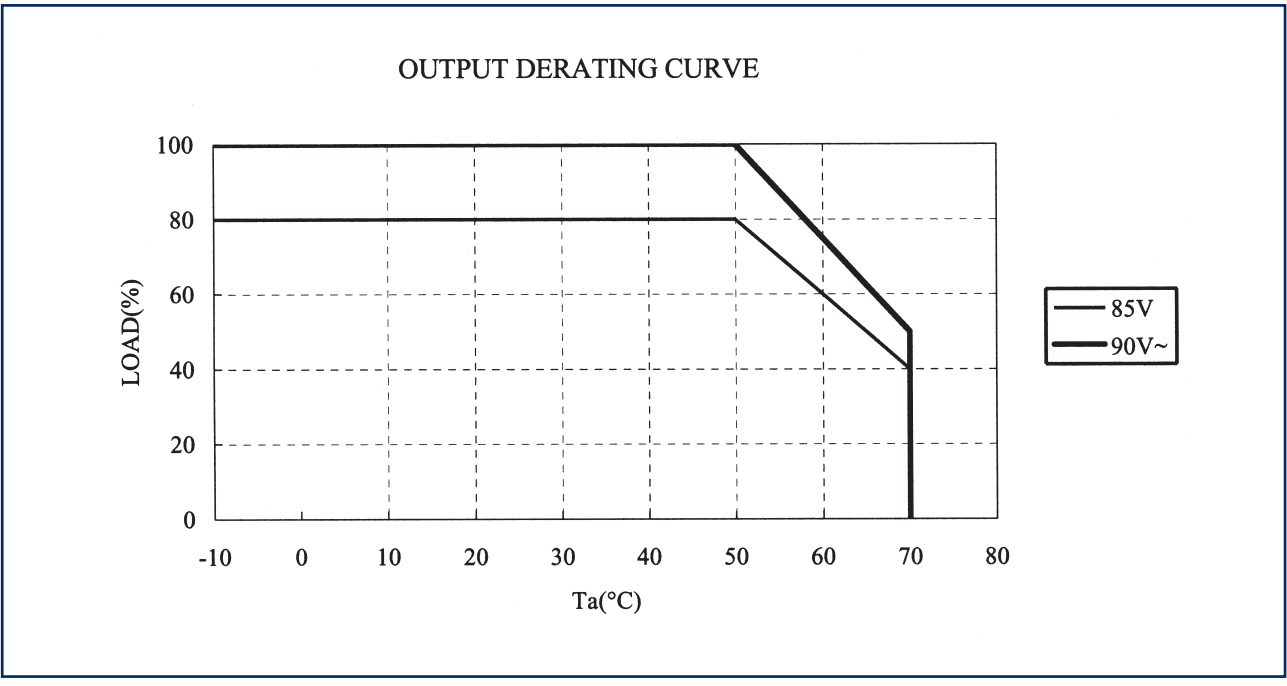
<b>Options</b>	
Suffix	Description
/HD	See HWS50-1500/HD Datasheet for details, -40 to +71 (74)°C operation, conformally coated PCBs
/ME	See HWS30-600/ME Datasheet for details of UL60601-1, EN60601-1 medically approved models.

Visit  
[www.lambda-europe.com/hws](http://www.lambda-europe.com/hws)  
 for more information  
 on the RoHS Compliant  
 HWS Series

# HWS1500 Outline Drawing



# Derating Graph



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