### **Product Feature**

- 1. Slim size, height 30mm
- 2. Built-in active PFC function, PF>95%
- 3. -30~+70°C working temperature
- 4. Short circuit/Over load/Over voltage/Over temperature
- 5. High efficiency with PFC
- 6. Remote control switch(optional)
- 7. 3 year warranty









### **Describe**

EN-150-XX-F series is an industrial control power supply with 150W single channel constant-voltage output. The input voltage range is 90-264 VAC, and the output voltage is 12v, 24v. Built in output on/off control and output remote voltage compensation function. It can be applied to various industrial fields such as industrial control system, mechanical and electrical equipment, electronic instruments, industrial automation, etc. The ultra-high efficiency, compact profile design, good heat dissipation, guarantee the long-term stable work of this series of products.

Design meet EN55024\EN61000-4-2,3,4,5,6,8,11\GB17625.1\EN61000-3-2,-3 \EN55022\GB4943\UL1012 standards

# **Application areas**

- Industrial automation machinery
- Mechanical and electrical equipment
- Industrial control system
- Electronic instruments

# **Electrical Specifications**

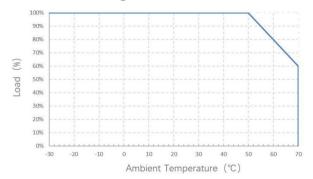
	Model	EN-150-12-F	EN-150-24-F
Input	Voltage range	90 ~ 264VAC	
	AC input	230VAC/0.8A、115VAC/1.6A	
	Efficiency	≥88%	
	Frequency range	47 ~ 63HZ	
	Leakage current	<2mA/240VAC	
	Inrush current	Cold start 60A/230VAC	
	PFC	PF≥0.95	
Output	DC voltage	12V	24V
	Rated current	12.6A	6.3A
	Power	151.2W	151.2W
	Voltage adjust range	11.4 ~ 13.2V	22.8 ~ 26.4V
	Ripple and noise	150mVp-p	
	Set up,rise time	2500ms, 30ms/220VAC, load 100%; 3000ms, 50ms/110VAC, load 100%	



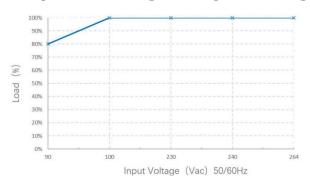
	Hold up time 16ms/ (115VAC/230VAC) load 100%		
	Line regulation	±0.5%	
	Load regulation	±0.5%	
	Output Voltage accuracy	±1.0%	
EMC	EMS	Design refer to:EN55024 ;EN61000-4-2,3,4,5,6,8,11	
	Harmonic	Design refer to:GB17625.1;EN61000-3-2,-3 limited requirements	
	EMC	Design refer to:EN55032, Class B	
Safety	Safety	Design refer to:GB4943/UL62368-1	
	Withstand voltage	I/P-O/P:3KVac/10mA;I/P-CASE:1.5KVac/10mA;O/P-CASE:0.5KVAC/10mA Each testing time:1min	
	Insulation	I/P-O/P:100M ohms; I/P-Case:100M ohms; O/P-Case:100M ohms	
	Over voltage	13.2 ~ 16.2V 26.4 ~ 32.4V	
Protections	(10%loading)	Shut down output voltage; recovers automatically after temperature decreases	
	Over load	$110{\sim}150\%$ rated current. Hiccup mode, recovers automatically after fault condition is removed	
	Over temperature	Shut down output voltage; recovers automatically after temperature decreases	
	Short circuit	Hiccup mode, recovers automatically after fault condition is removed	
Function	Remote control	CN1: < 0~0.8VDC power on,4~10VDC power off	
Environment	Working	-30~70°C 20%~95%RH non-condensing (Refer to Derating Curve)	
	Storage	-40°C~80°C; 10%~95%RH non-condensing	
	Vibration	10~500Hz,2G,10min/1 cycle,60min.each along X,Y, Z axes	
	Impact	20G, last 11mS, 3 impacts along X, y and Z axes	
	Altitude	the ambient temperature derating of 0.6 °C/100m for operating altitude higher than 2000m	
Reliability	MTBF	25°C:250000Hrs, MIL-217 Method	
Other requirements	Dimension	199*99*30 (L*W*H)	
	Weight	0.6Kg/pcs	
	Cooling method	☑ Free air convection □ Fan	
	More options	□ PCB double side conformal coating □ Terminal with cover □ low temp start (-40°C) □ Other	
Notes	*In order to extend the service life, it is recommended to leave 30% more allowance when loading. For example, if the equipment needs 100W power, please choose the power supply over 130W.  *Ripple&noise are measured at 20MHz of bandwidth by using a 12" twisted pair-wire terminated with a 0.1uf & 47uf parallel capacitor.  *All parameters NOT specially mentioned are measured at 230VAC input,rated load and 25°C of ambient temperature.  *the auxiliary heat dissipation of aluminum plate with an area of 400 * 400 * 3mm must be used when full load working.  *The power supply is considered a component which will be installed into a final equipment. The final equipment must be re-confirmed that it still meets EMC directives. All our EMC tests are carried out by mounting samples on metal plates.		



# **Derating Curve**

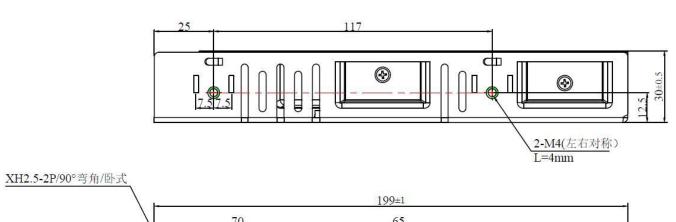


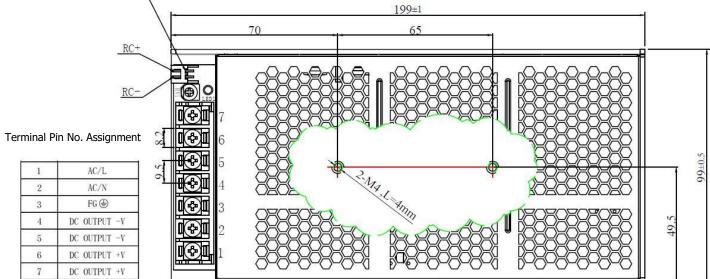
# **Output Derating VS Input Voltage**



Unit:mm

### **Mechanical Specification**





### **DONGGUAN AMCHARD-POWER TECHNOLOGY CO., LTD.**