

### 1. Safety Instructions

- For enclosed and L frame type of power supply, to ensure sufficient convection cooling, always maintain a distance of  $\geq 50\text{mm}$  from all surfaces while the device is in operation.
  - For open frame type of power supply, please ensure the mounted device is kept at  $\geq 8\text{mm}$  safety distance for D1 from other components and equipments (Refer to Fig. 3.1). Please insert an insulation sheet between the system and product, if the safety distance is  $< 8\text{mm}$  for D2 (Refer to Fig. 3.2).
  - The device is not recommended to be placed on low thermal conductive surface, for example, plastics.
  - Note that the enclosure of the device can become very hot depending on the ambient temperature and load of the power supply. Do not touch the device while it is in operation or immediately after power is turned OFF. Risk of burning!
  - Do not touch the terminals while power is being supplied. Risk of electric shock.
  - Prevent any foreign metal, particles or conductors to enter the device through the openings during installation. It can cause: Electric shock; Safety Hazard; Fire; Product failure
  - Battery need to be protected from short circuit while installation & servicing. Danger of explosion.
  - Signal connector should not interact with AC Input.
  - Warning: The power supply must be mounted by metal screws onto a grounded metal surface. When connecting the device, secure Earth connection before connecting L and N. When disconnecting the device, remove L and N connections before removing the Earth connection.
- For open frame type of installation, ensure the power supply's Protective Earthing (marked Ⓑ in Fig. 3.1) is connected to the system's Protective Earthing (PE). It is also recommended that the input FG (Fig. 1, ①) be connected to the system's PE.

### 2. Device Descriptions

► PJU-60W (Refer to Fig. 1)

- ① Input connector
- ② Output connector
- ③ DC voltage adjustment potentiometer
- ④ DC OK control LED (Green)
- ⑤ Signal connector (for PJU-□V60W□B□□ only)

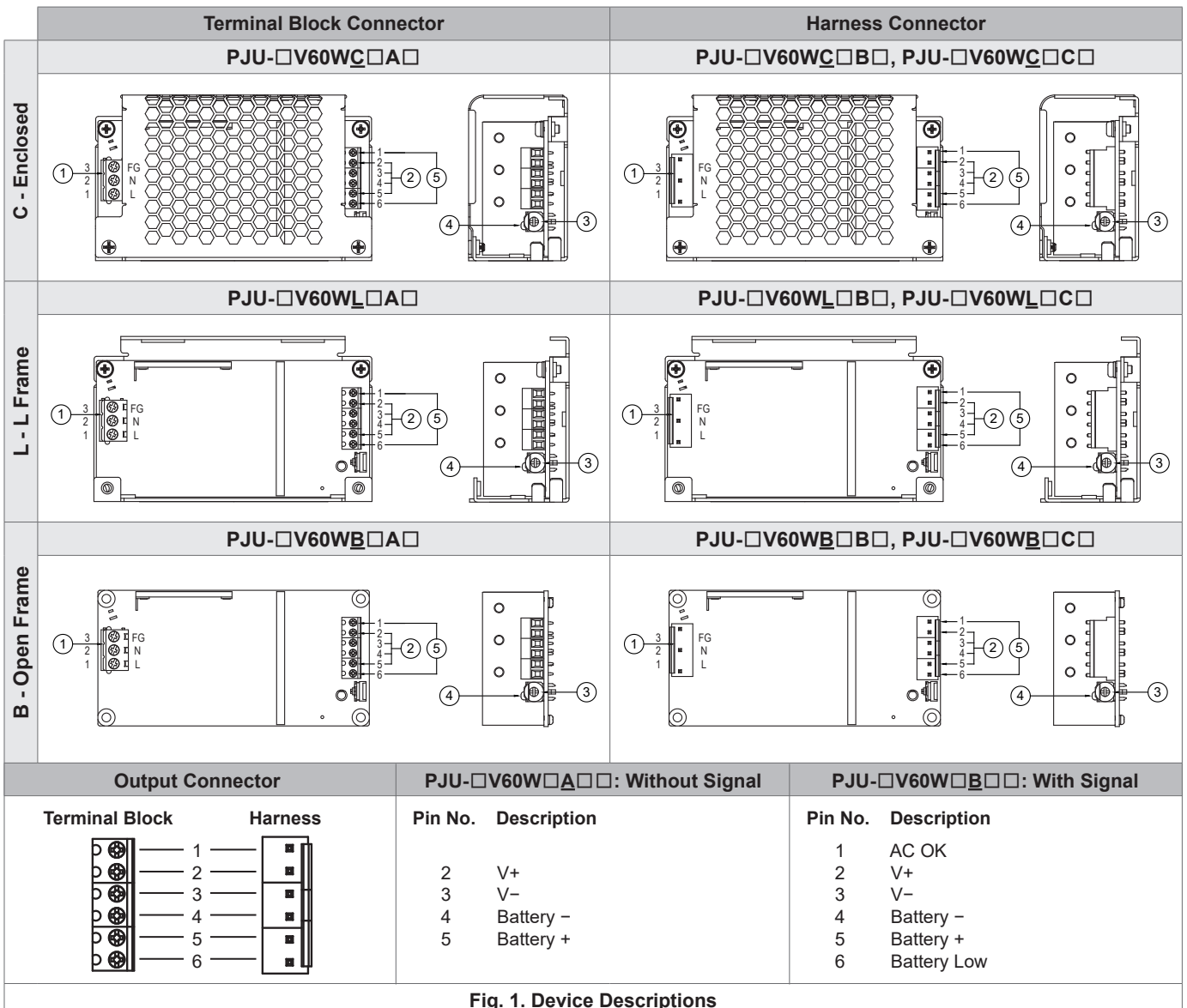


Fig. 1. Device Descriptions

\*Please note that all images are for illustrative purposes only, and do not necessarily represent the exact products.

### 3. Installation of the Device

► PJU-60W□□□□ / PJU-60W□□□□: Enclosed / L Frame (Refer to Fig. 2.1, 2.2)

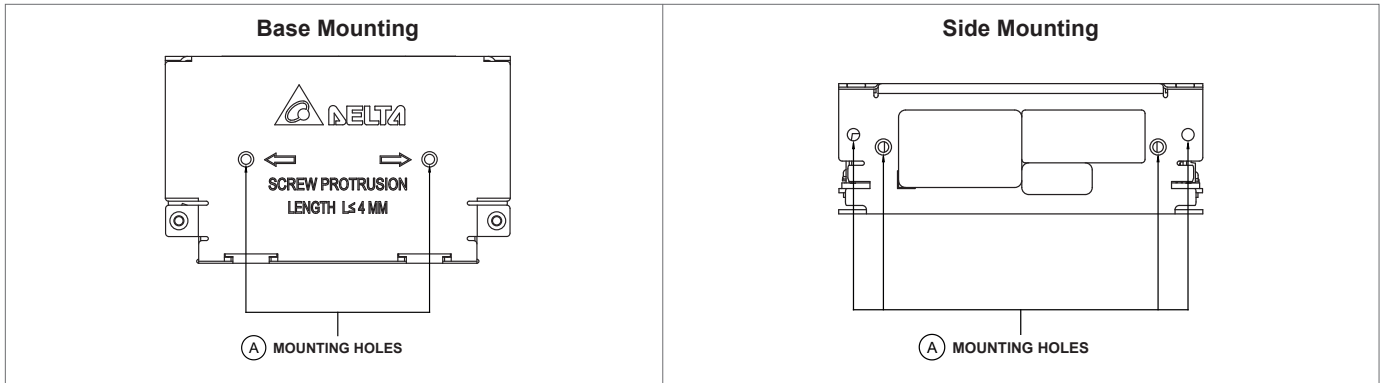


Fig. 2.1. Mounting Hole Locations

- The power supply shall be mounted on a sturdy heat conducting surface with minimum of 2 mounting holes (Fig. 2.1, (A)) for base mounting or side mounting. Use M3 screws only. The screw penetration into the chassis must be 3.5-4mm. For the other mounting holes without screw threads, please use suitable screw and nut.
- Recommended mounting tightening torque: 4~8 Kgf.cm.

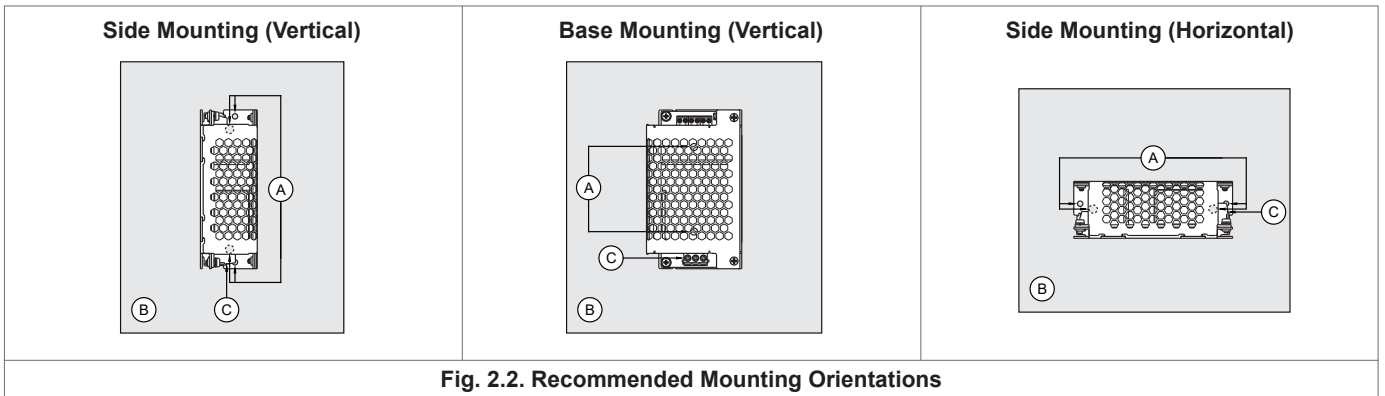


Fig. 2.2. Recommended Mounting Orientations

- (A) Mounting holes for enclosed and L frame type of power supply.
- (B) This surface belongs to customer's end system or panel where the power supply is mounted.
- (C) Input connector

► PJU-60W□□□□: Open Frame (Refer to Fig. 3.1, Fig. 3.2)

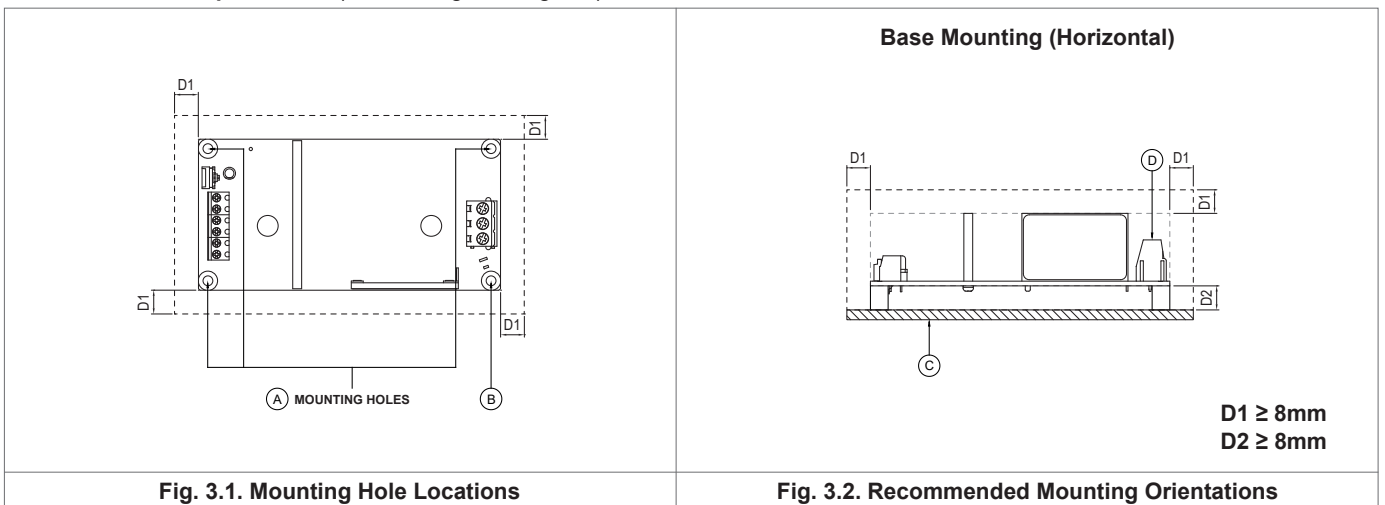


Fig. 3.1. Mounting Hole Locations

Fig. 3.2. Recommended Mounting Orientations

- (A) Mounting holes for open frame type of power supply. <sup>(1)</sup>
- (B) Mounting hole should be connected to the system's protective earthing (PE). <sup>(1)</sup>
- (C) This surface belongs to customer's end system or panel where the power supply is mounted.
- (D) Input connector

Note (1): 4 × Ø3.30 Mounting Holes; Ø6 Max Dimension of Screw Head and Stand-off. Recommended mounting torque for tightening: 4~8 Kgf.cm.

4. Connection

Connector Type	Specifications				PJU-13V60W	PJU-27V60W
Terminal Block Connector <sup>(2)</sup>	DECA	Input (CN1)	Stranded or Solid Wire Size	mm <sup>2</sup>	0.32-3.3	0.21-3.3
				AWG	22-12	24-12
			Torque	Kgf.cm	8.0	8.0
		lb in		7.0	7.0	
		Output (CN2) - without Pin No. 1, 6	Stranded or Solid Wire Size	mm <sup>2</sup>	0.32-1.3	0.21-1.3
				AWG	22-16	24-16
	Torque		Kgf.cm	2.3	2.3	
		lb in	2.0	2.0		
	Output & Signal (CN2)	Stranded or Solid Wire Size	mm <sup>2</sup>	0.32-1.3	0.21-1.3	
			AWG	22-16	24-16	
		Torque	Kgf.cm	2.3	2.3	
			lb in	2.0	2.0	
Harness Connector	JST	Input (CN1)	Header (Board Mounting)	B3P5-VH(LF)(SN)		
			Mating Connector	VHR-5N		
			Terminal	SVH-21T-P1.1		
			AWG	22-18		
		Output (CN2) - without Pin No. 1, 6	Header (Board Mounting)	B4P-VH(LF)(SN)		
			Mating Connector	VHR-4N		
			Terminal	SVH-21T-P1.1		
			AWG	22-18		
		Output & Signal (CN2)	Header (Board Mounting)	B6P-VH(LF)(SN)		
			Mating Connector	VHR-6N		
			Terminal	SVH-21T-P1.1		
			AWG	22-18		
	Molex	Input (CN1)	Header (Board Mounting)	26-62-4051		
			Mating Connector	26-03-3051		
			Terminal	08-52-0113		
			AWG	20-18		
		Output (CN2) - without Pin No. 1, 6	Header (Board Mounting)	26-60-4040		
			Mating Connector	26-03-3041		
			Terminal	08-52-0113		
			AWG	20-18		
		Output & Signal (CN2)	Header (Board Mounting)	26-60-4060		
			Mating Connector	26-03-3061		
			Terminal	08-52-0113		
			AWG	20-18		

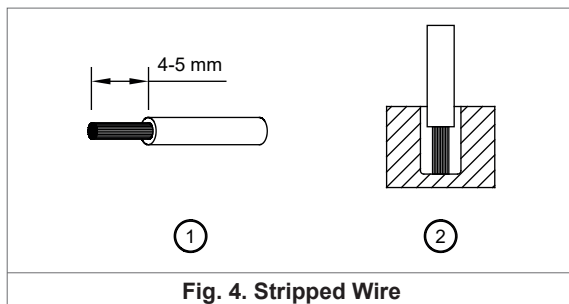


Fig. 4. Stripped Wire

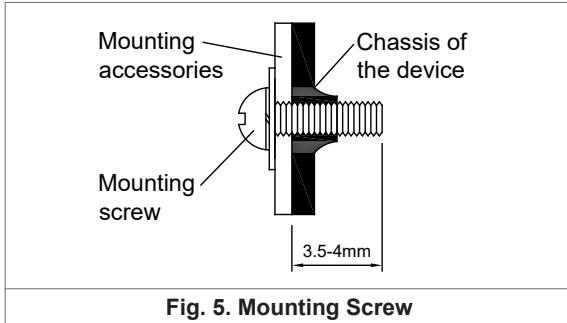
**Note (2): Terminal Block Connector**

To secure reliable and shock proof connections, the stripping length should be 4-5mm (see Fig. 4, ①). Please ensure that the wires are fully inserted into the connecting terminals as shown in Fig. 4, ②. All wire strands must be fully inserted into the terminals with the screws securely fastened in order to ensure safety and maximum contact.

5. Battery Information

	PJU-13V60W	PJU-27V60W
Battery Capacity	3.2AH - 15AH	3.2AH - 7.2AH
Battery Cut-off Voltage	11V ± 0.5V	22V ± 1V

6. Installation of Mounting Accessories (Refer to Fig. 5)

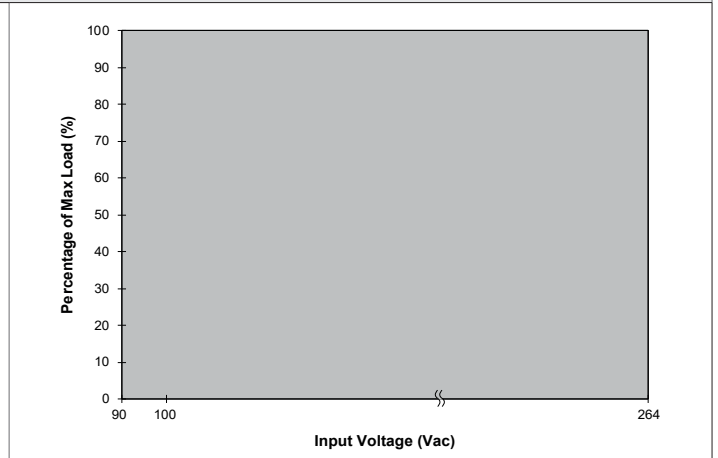
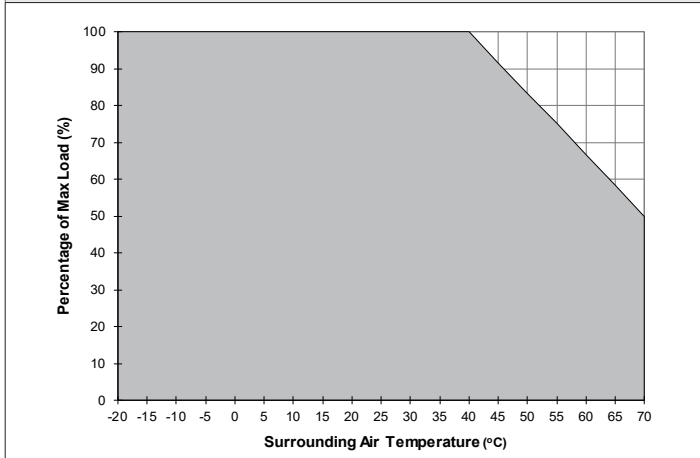


- Only use M3 screw 3.5-4mm through the base or side mounting holes. This is to keep a safety distance between the screw and internal components.
- Recommended mounting tightening torque: 4~8 Kgf.cm.

Fig. 5. Mounting Screw

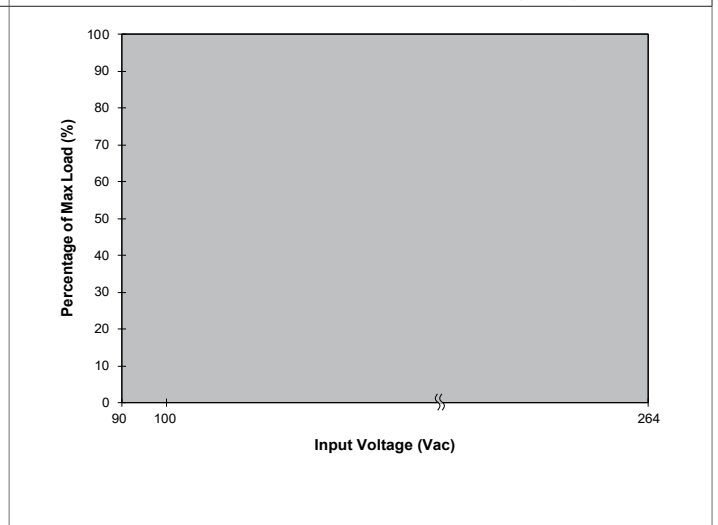
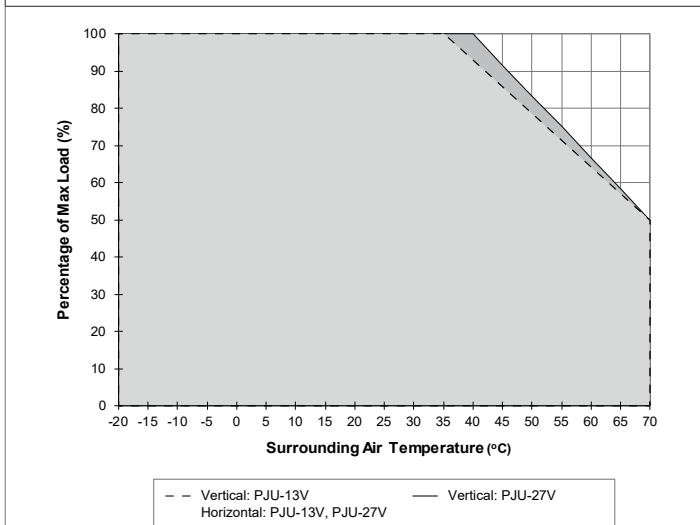
7. Power Derating Curve

**Enclosed / L Frame**  
**PJU-13V60W / PJU-27V60W**



**Fig. 6.1-1. Base Mounting:**  
PJU-13V & PJU-27V (Vertical): > 40°C derate power by 1.67% / °C

**Fig. 6.1-2. Base Mounting (Vertical):**  
Power will not de-rate for the entire input voltage range

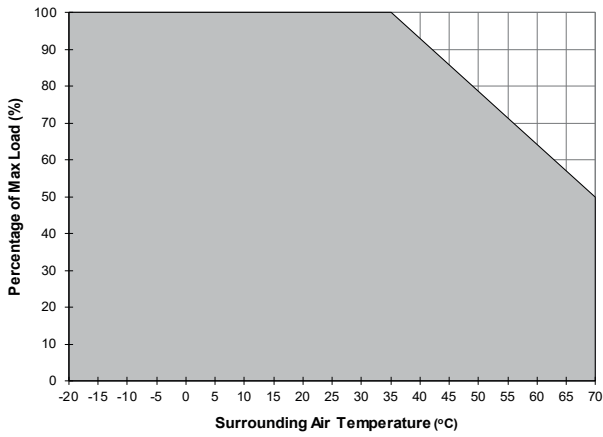


**Fig. 6.2-1. Side Mounting:**  
PJU-13V (Vertical & Horizontal): > 35°C derate power by 1.43% / °C  
PJU-27V (Vertical): > 40°C derate power by 1.67% / °C  
PJU-27V (Horizontal): > 35°C derate power by 1.43% / °C

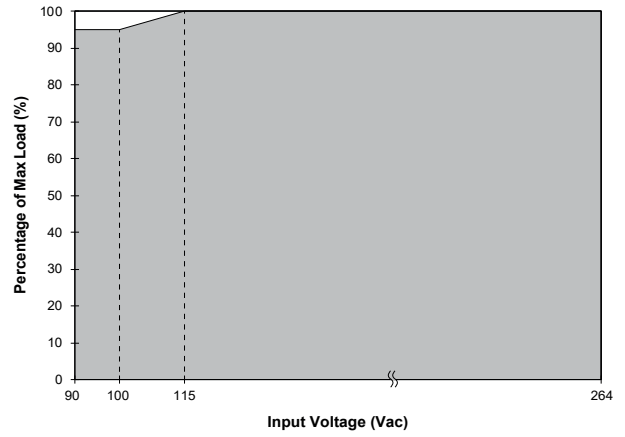
**Fig. 6.2-2. Side Mounting (Vertical & Horizontal):**  
Power will not de-rate for the entire input voltage range

Open Frame

PJU-13V60W

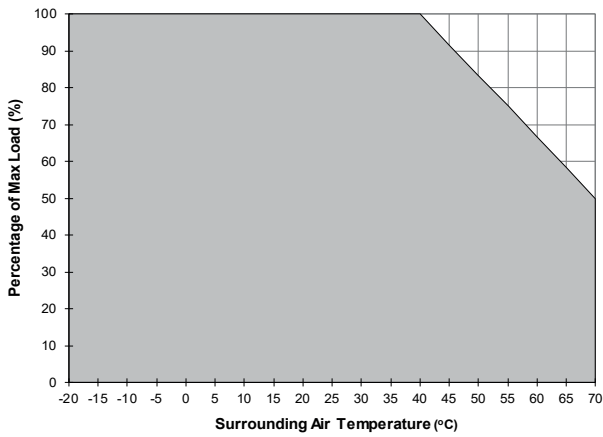


**Fig. 7.1-1. Base Mounting (Horizontal):**  
> 35°C derate power by 1.43% / °C

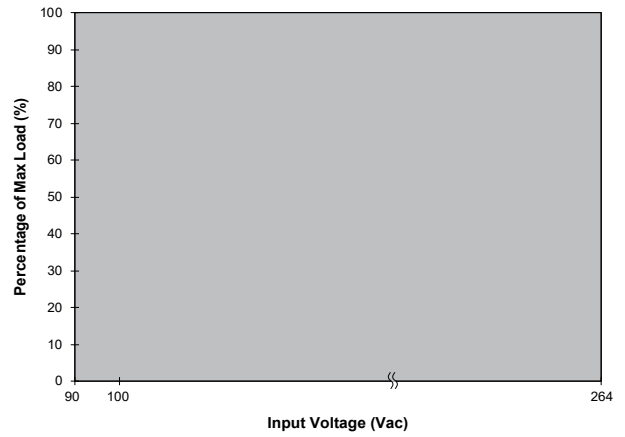


**Fig. 7.1-2. Base Mounting (Horizontal):**  
Output derating is required at 90-115Vac

PJU-27V60W



**Fig. 7.2-1. Base Mounting (Horizontal):**  
> 40°C derate power by 1.67% / °C



**Fig. 7.2-2. Base Mounting (Horizontal):**  
Power will not de-rate for the entire input voltage range

**Manufacturer:**

Delta Electronics (Thailand) PCL.  
909 Pattana 1 Rd., Muang,  
Samutprakarn, 10280 Thailand

**Authorized Representative:**

Delta Greentech (Netherlands) B.V.  
Zandsteen 15, 2132 MZ Hoofddorp,  
The Netherlands