

**SIDA61A SERIES**

**60W Desktop Power Supply for Industrial Equipment**

- Wide Operating Voltage 90 to 264 VAC, 47 to 63Hz
- IEC-320-C14 input inlet
- Optional Output Connector(See appendix)
- Single Output
- Class I system
- Energy Efficiency DoE VI, CoC v5(tier2)
- **Operating Temperature: -20 ~ +70°C**

**5 Year Warranty**
**Approvals:**
**Single Output**

| Model Number | Output Voltage | Max. Output Current | Total Regulation | Max. Output Power |
|--------------|----------------|---------------------|------------------|-------------------|
| SIDA61A -S05 | 12 ~ 13 VDC    | 5.00 ~ 4.61 A       | ±5%              | 60W               |
| SIDA61A -S06 | 13 ~ 16 VDC    | 4.61 ~ 3.75 A       | ±5%              | 60W               |
| SIDA61A -S07 | 16 ~ 21 VDC    | 3.75 ~ 2.85 A       | ±5%              | 60W               |
| SIDA61A -S08 | 21 ~ 27 VDC    | 2.85 ~ 2.22 A       | ±3%              | 60W               |
| SIDA61A -S09 | 27 ~ 33 VDC    | 2.22 ~ 1.81 A       | ±3%              | 60W               |
| SIDA61A -S10 | 33 ~ 40 VDC    | 1.81 ~ 1.50 A       | ±2%              | 60W               |
| SIDA61A -S11 | 40 ~ 48 VDC    | 1.50 ~ 1.25 A       | ±2%              | 60W               |

SIDA61A-S05~S07 are required to use AWG#16/4FT output cable.

SIDA61A-S08~S11 are required to use AWG#18/4FT output cable.

The regulation and efficiency will be changed by modified output cable

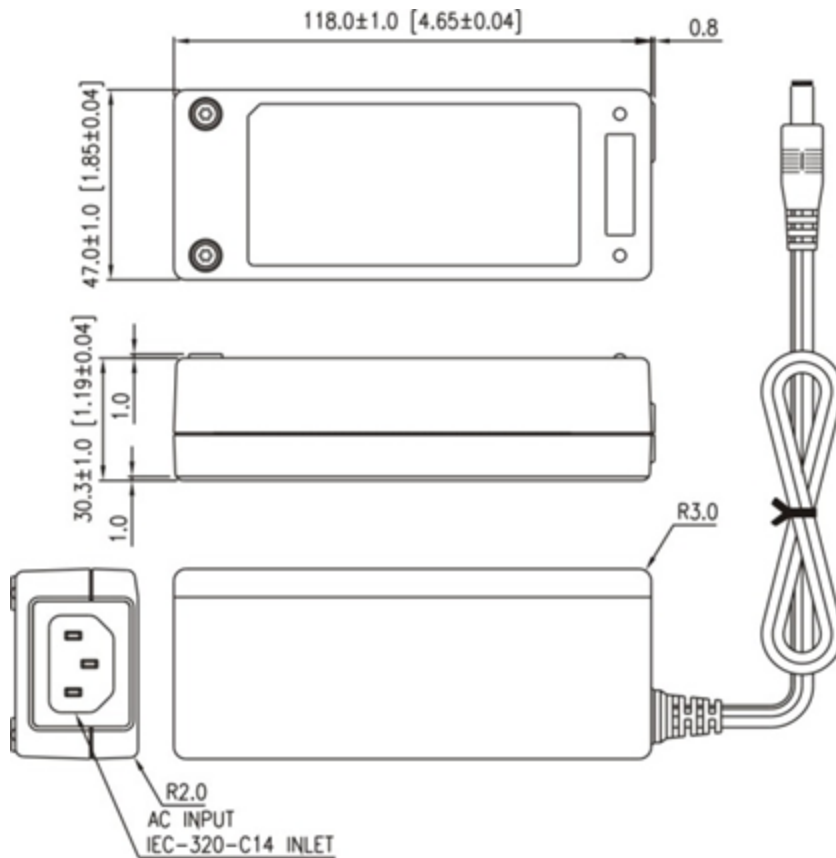
**Electrical Characteristics**

| Parameter                            | Test Conditions  | Min. | Typ. | Max.  | Unit  |
|--------------------------------------|--|------|------|-------|-------|
| Safety Approvals Input Voltage Range | Safety Approval & Specification in Label                     | 100  |      | 240   | VAC   |
| Operate Voltage Range                | Derate linearly from 100% load at 90VAC to 80% load at 80VAC | 80   |      | 275   | VAC   |
| Input Frequency                      | Sine wave  | 47   |      | 63    | Hz    |
| Output Power Range                   | See Rating Chart   |      |      | 60    | W     |
| Low Line Input Current               | Full load, Vin=100VAC  |      | 1.4  |       | A     |
| High Line Input Current              | Full load, Vin=240VAC  |      | 0.8  |       | A     |
| High Line Input Inrush Current       | Full load, 25°C, Cool start, Vin=240VAC                      |      |      | 110   | A     |
| Safety Ground Leakage Current        | Vin=240VAC, Fi=60Hz  |      |      | 0.75  | mA    |
| Efficiency                           | Full Load, Vin=230VAC  |      |      | 89    | %     |
| Line Regulation                      | Full Load, Vin=100~120VAC                                    |      |      | 1     | %     |
| Load Regulation                      | Vin=230VAC, 10~90% Load Change at Condition                  |      |      | 5     | %     |
| Over Load Protection                 | Recovers automatically after fault condition is removed      | 110  |      | 150   | %     |
| Time of Transient Response           | Io=Full Load to Half Load, Vin=110VAC                        |      |      | 4     | ms    |
| Hold-Up Time                         | Full Load, Vin=100VAC  |      |      | 10    | ms    |
| Start Up Time                        | Full Load, Vin=100~240VAC                                    |      |      | 3     | s     |
| Ripple & Noise (Peak to Peak)        |  |      |      | 1     | %     |
| Temperature Coefficient              | Full Load, Vin=100~240VAC                                    |      |      | ±0.04 | %/°C  |
| Dielectric Withstanding Voltage(P-S) | Primary to Secondary   |      |      | 4242  | VDC   |
| Dielectric Withstanding Voltage(P-G) | Primary to PE  |      |      | 2652  | VDC   |
| EMC Emission                         | Compliance to EN55022(CISPR22)                               |      |      | B     | Class |

### Environmental

| Parameter                      | Test Conditions  | Min. | Typ. | Max. | Unit |
|--------------------------------|--|------|------|------|------|
| Operating Temperature          | Derate linearly from 100% load at 40 to 50% load at 70     | -20  |      | 70   | °C   |
| Storage Temperature            | 10~95% RH  | -40  |      | 85   | °C   |
| Operating Humidity             | non-condensing   | 0    |      | 95%  | RH   |
| Storage Humidity               |  | 0    |      | 95%  | RH   |
| Electro Static Discharge       | Air Discharge, IEC61000-4-2                                |      |      | 8    | KV   |
| Electro Static Discharge       | Contact Discharge, IEC61000-4-2                            |      |      | 6    | KV   |
| Mean Time Between Failure      | Operation Temperature at 25 , Calculated per MIL-HDBK-217F | 100K |      |      | h    |
| Operating Altitude (Elevation) | All Condition  |      |      | 2000 | m    |
| Vibration                      | 10~500Hz,10min./1cycle, 60min.each along X, Y, Z axes      |      |      | 5    | G    |
| Surge Voltage                  | Line-Neutral   |      |      | 1    | KV   |
| Surge Voltage                  | Line-PE & Neutral-PE                                       |      |      | 2    | KV   |

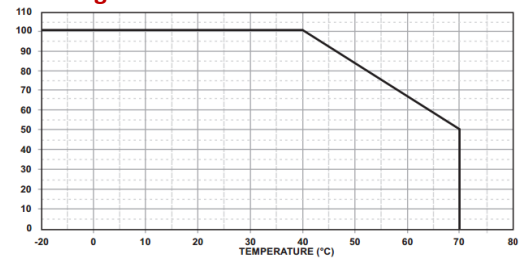
### Mechanical Diagram and Technical Chart



**Note:**

1. Dimensions are shown in mm & inch
2. Weight: approx. 340g
3. Optional output connector.

**Derating Chart:**



1. Operating Temperature: -20 to 70°C
2. Derate linearly from 100% load at 40°C to 50% load at 70°C