


**Features :**

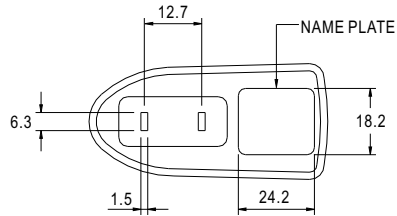
- Universal AC input / Full range
- No load power consumption <0.3W
- ENERGY STAR compliant for 5 ~ 48V
- Meet EISA 2007 (Energy Independence and Security Act) for 5 ~ 48V
- 2 pole USA plug
- Class II power (without earth pin)
- Full output 3~48V safety approval
- Protections: Short circuit / Overload / Over voltage
- Pass LPS
- Fully enclosed plastic case
- Approvals: UL / CUL / CB / FCC / CE
- 2 years warranty


**SPECIFICATION**

| ORDER NO.                 |                                     | GS06U-0P1J                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             | GS06U-1P1J | GS06U-11P1J | GS06U-2P1J | GS06U-3P1J | GS06U-4P1J | GS06U-5P1J | GS06U-6P1J | GS06U-8P1J |
|---------------------------|-------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------|-------------|------------|------------|------------|------------|------------|------------|
| OUTPUT                    | SAFETY MODEL NO.                    | GPSU06U-0                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              | GPSU06U-1  | GPSU06U-1-1 | GPSU06U-2  | GPSU06U-3  | GPSU06U-4  | GPSU06U-5  | GPSU06U-6  | GPSU06U-8  |
|                           | DC VOLTAGE <b>Note.2</b>            | 3.3V                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   | 5V         | 7.5V        | 9V         | 12V        | 15V        | 18V        | 24V        | 48V        |
|                           | RATED CURRENT                       | 1.21A                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  | 1.00A      | 0.8A        | 0.66A      | 0.5A       | 0.4A       | 0.33A      | 0.25A      | 0.125A     |
|                           | CURRENT RANGE                       | 0 ~ 1.21A                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              | 0 ~ 1.00A  | 0 ~ 0.8A    | 0 ~ 0.66A  | 0 ~ 0.5A   | 0 ~ 0.4A   | 0 ~ 0.33A  | 0 ~ 0.25A  | 0 ~ 0.125A |
|                           | RATED POWER                         | 4W                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     | 5W         | 6W          | 6W         | 6W         | 6W         | 6W         | 6W         | 6W         |
|                           | RIPPLE & NOISE (max.) <b>Note.3</b> | 50mVp-p                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                | 50mVp-p    | 80mVp-p     | 80mVp-p    | 100mVp-p   | 120mVp-p   | 150mVp-p   | 180mVp-p   | 200mVp-p   |
|                           | VOLTAGE ADJ. RANGE                  | 3 ~ 5V                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 | 5 ~ 6V     | 6 ~ 8V      | 8 ~ 11V    | 11 ~ 13V   | 13 ~ 16V   | 16 ~ 21V   | 21 ~ 27V   | 33 ~ 48V   |
|                           | VOLTAGE TOLERANCE <b>Note.4</b>     | ±5.0%                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  | ±5.0%      | ±5.0%       | ±5.0%      | ±3.0%      | ±3.0%      | ±3.0%      | ±2.0%      | ±2.0%      |
|                           | LINE REGULATION <b>Note.5</b>       | ±1.0%                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  | ±0.5%      | ±0.5%       | ±0.5%      | ±0.5%      | ±0.5%      | ±0.5%      | ±0.5%      | ±0.5%      |
|                           | LOAD REGULATION <b>Note.6</b>       | ±5.0%                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  | ±5.0%      | ±5.0%       | ±5.0%      | ±3.0%      | ±3.0%      | ±3.0%      | ±2.0%      | ±2.0%      |
| SETUP, RISE, HOLD UP TIME |                                     | 1000ms, 50ms, 12ms at full load                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |            |             |            |            |            |            |            |            |
| INPUT                     | VOLTAGE RANGE                       | 90 ~ 264VAC 127 ~ 370VDC                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |            |             |            |            |            |            |            |            |
|                           | FREQUENCY RANGE                     | 47 ~ 63Hz                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |            |             |            |            |            |            |            |            |
|                           | EFFICIENCY (Typ.) <b>Note.7</b>     | 55%                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    | 67%        | 72%         | 74%        | 76%        | 77%        | 78%        | 80%        | 82%        |
|                           | AC CURRENT                          | 0.2A / 100VAC                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |            |             |            |            |            |            |            |            |
|                           | INRUSH CURRENT (max.)               | 50A / 230VAC                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |            |             |            |            |            |            |            |            |
| PROTECTION                | OVERLOAD                            | >105% rated output voltage power for 3.3 ~ 5V ; >110% rated output power for 7.5 ~ 48V<br>Protection type : Hiccup mode, recovers automatically after fault condition is removed                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |            |             |            |            |            |            |            |            |
|                           | OVER VOLTAGE                        | >120% rated output voltage<br>Protection type : Clamp by zener diode                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |            |             |            |            |            |            |            |            |
|                           | WORKING TEMP.                       | 0 ~ +40°C (Refer to output load derating curve)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |            |             |            |            |            |            |            |            |
| ENVIRONMENT               | WORKING HUMIDITY                    | 20% ~ 90% RH non-condensing                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |            |             |            |            |            |            |            |            |
|                           | STORAGE TEMP., HUMIDITY             | -20 ~ +85°C, 10 ~ 95% RH                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |            |             |            |            |            |            |            |            |
|                           | TEMP. COEFFICIENT                   | ±0.03% / °C (0 ~ 50°C)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |            |             |            |            |            |            |            |            |
|                           | VIBRATION                           | 10 ~ 500Hz, 2G 10min./1cycle, period for 60min. each along X, Y, Z axes                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |            |             |            |            |            |            |            |            |
| SAFETY & EMC<br>(Note. 8) | SAFETY STANDARDS                    | UL60950-1, CSA22.2 approved                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |            |             |            |            |            |            |            |            |
|                           | WITHSTAND VOLTAGE                   | I/P-O/P:4242VDC                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |            |             |            |            |            |            |            |            |
|                           | ISOLATION RESISTANCE                | I/P-O/P:100M Ohms / 500VDC / 25°C / 70% RH                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |            |             |            |            |            |            |            |            |
|                           | EMI CONDUCTION & RADIATION          | Compliance to EN55022 class B, FCC part 15 Class B                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     |            |             |            |            |            |            |            |            |
|                           | HARMONIC CURRENT                    | Compliance to EN61000-3-2,3                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            |            |             |            |            |            |            |            |            |
| OTHERS                    | EMS IMMUNITY                        | Compliance to EN61000-4-2,3,4,5,6,11, light industry level, criteria A                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |            |             |            |            |            |            |            |            |
|                           | MTBF                                | 500Khrs min. MIL-HDBK-217F(25°C)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |            |             |            |            |            |            |            |            |
|                           | DIMENSION                           | 32*66*42.5mm (L*W*H)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |            |             |            |            |            |            |            |            |
|                           | PACKING                             | 100g ; 110pcs / 12Kg / CARTON                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |            |             |            |            |            |            |            |            |
| CONNECTOR                 | PLUG                                | Standard type P1J: 2.1φ * 5.5φ * 11mm, turning fork type center positive for stock ; Other type available by customer requested                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |            |             |            |            |            |            |            |            |
|                           | CABLE                               | Standard type 20Awg UL1185 6ft for stock ; Other type available by customer requested                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |            |             |            |            |            |            |            |            |
| NOTE                      |                                     | 1.All parameters are specified at 115VAC input, rated load, 25°C 70% RH ambient.<br>2.DC voltage: The output voltage set at point measure by plug terminal & 50% load.<br>3.Ripple & noise are measured at 20MHz by using a 12" twisted pair terminated with a 0.1uf & 47uf capacitor.<br>4.Tolerance: includes set up tolerance, line regulation, load regulation.<br>5.Line regulation is measured from low line to high line at rated load.<br>6.Load regulation is measured from 0% to 100% rated load<br>7.Efficiency is measured at 115VAC.<br>8.The power supply is considered as an independent unit, but the final equipment still need to re-confirm that the whole system complies with the EMC directives. |            |             |            |            |            |            |            |            |

## Mechanical Specification

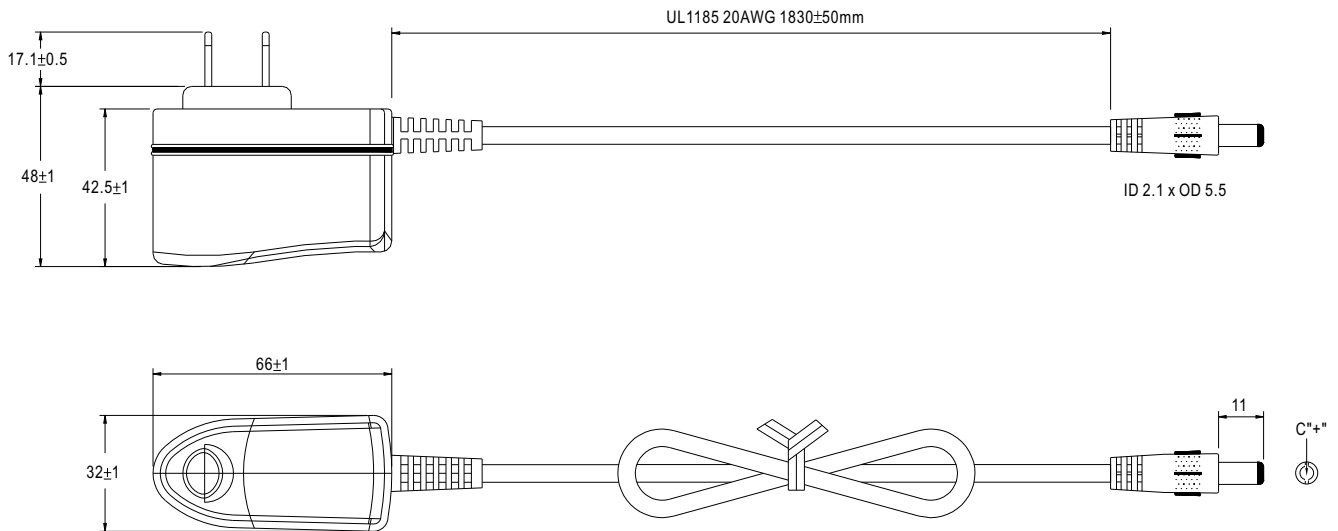
Unit:mm



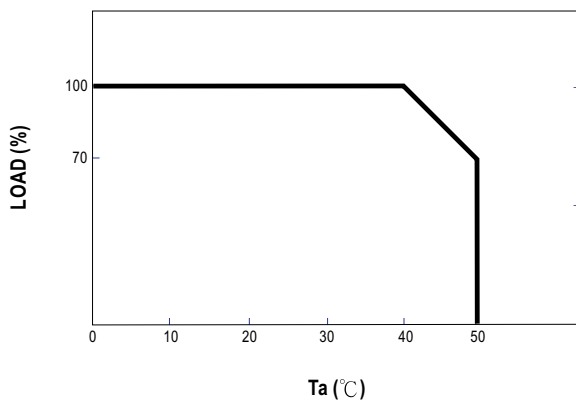
## Plug Assignment

Standard plug: P1J (option)

| P1J    |        |
|--------|--------|
| P/N    | OUTPUT |
| CENTER | +      |



## Derating Curve



## Static Characteristics

