

## 350W Audio-Grade PSU



### INPUT

|                 |                     |               |
|-----------------|---------------------|---------------|
| AC Input        |                     | 110 or 220VAC |
| Efficiency      | Full load at 230Vac | 85% typical   |
| Input Frequency |                     | 47-63 Hz      |
| Input Current   | Full load at 115Vac | 7Arms, max    |

### OUTPUT

|  |                      |                  |        |
|--|----------------------|------------------|--------|
| Voltage Set Point                        | V1 (+50V)            | ± 1.5%           |        |
|  | V2 (+12V)            | ± 3%             |        |
|  | V3 (+5V)             | ± 3%             |        |
| Line Regulation                          | 90-132 & 180-264VAC  | ±1.0% of all o/p |        |
|  | Load Regulation      | V1 (+50V)        | ± 1.0% |
|  |                      | V2 (+12V)        | ± 3.5% |
| V3 (+5V)                                 |                      | ± 2.00%          |        |
| Transient Response<br>(V1 only)          | Min Load to 50% load |                  |        |
|  | Voltage Excursion    | ± 4%, max        |        |
|  | Recovery time        | ≤ 1ms            |        |
| Short Circuit Protection<br>(V2,V3 Only) | Auto Recovery        | self protected   |        |
| Ripple and Noise                         | V1 (+50V)            | 100mV            |        |
|  | V2 (+12V)            | 200mV            |        |
|  | V3 (+5V)             | 50mV             |        |

\* See table for output voltages

### ENVIRONMENTAL

|                       |                       |              |
|-----------------------|-----------------------|--------------|
| Operating Temperature |                       | 0°C to +45°C |
| Storage Temperature   |                       | -40 to 85°C  |
| Relative Humidity     | Non Condensing        | 95% max      |
| MTBF                  | Bell core STD. TR0322 | 100,000 HRS. |

### EMC AND SAFETY

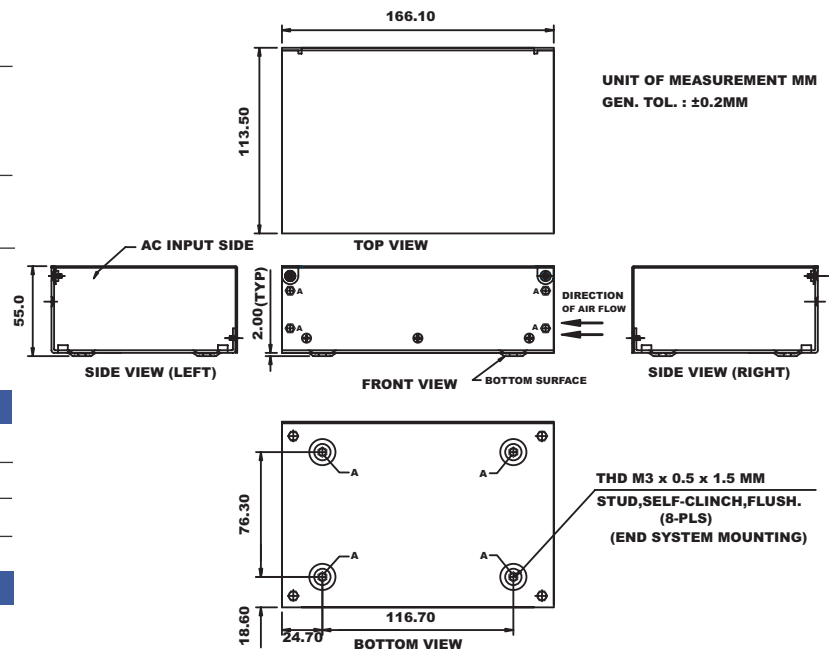
|                  |  |  |
|------------------|--|--|
| EMI              | CISPR55022 Level B & FCC 47 CFR Part 15, Level B   |  |
| EMC              | EN61000-4-2 (Level 3), EN61000-4-4 (Level 3), EN61000-4-5 (Level 3), EN61000-3-2*(class A) |  |
| Agency Approvals | C-UL-US, Nemko, CB, CCC, CE *  |  |
| Safety Standards | UL6500 / EN60065   |  |

| Model Number                            | Output | Nom Vout | Continuous Current MIN | Continuous Current MAX |
|---|--------|----------|------------------------|------------------------|
| CEL-22-AMPC350-3004                     | V1     | +50V     | 0A                     | 6A                     |
| (D2-0CX035001-04000B)                   | V2     | +12V     | 0A                     | 0.5A                   |
| 110V/220V, Non <sup>®</sup> THX Version | V3     | +5V      | 0A                     | 1A                     |
| CEL-22-AMPC350-3005                     | V1     | +50V     | 0A                     | 6A                     |
| (D2-CXT035001-05000B)                   | V2     | +12V     | 0A                     | 0.5A                   |
| 110V/220V, THX Version                  | V3     | +5V      | 0A                     | 1A                     |

\* For compliance with EN61000-3-2, need to install harmonic choke, Celetronix P/N : CEL-22-000000002622, in end-system

### MECHANICAL

|                             |                      |                     |
|-----------------------------|----------------------|---------------------|
| <b>Connector Details</b>    |                      |                     |
| I/P & O/P Connector J1 & J2 | Molex P/N.:          | 26-48-1085 or Equi. |
| O/P Connector (J4)          | Molex P/N.:          | 26-48-1045 or Equi. |
| Control Connector (J3)      | AMP Inc P/N.:        | 64056-4 or Equi.    |
| Fan Control Signal (J5/J7)  | AMP Inc. P/N.:       | 64056-2 or Equi.    |
| Temp. Sensor Signal (J6)    | AMP Inc. P/N.:       | 64056-3 or Equi.    |
| Size (mm)                   | 166.1 X 113.5 X 55.0 |                     |
| Weight                      | 775Gms. (Approx.)    |                     |



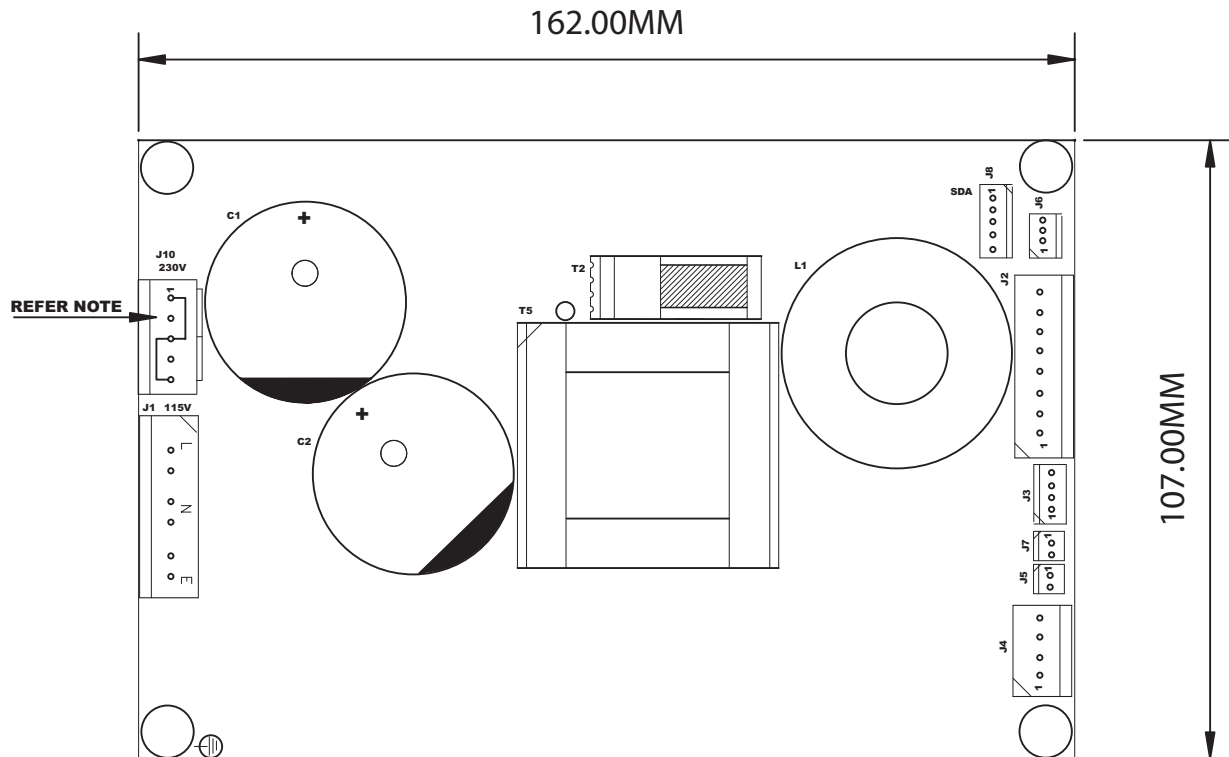
Cooling 350 – 400 LFM air flow is required for cooling the PSU ( To be provided at the end system by the customer. ) Refer diagram for airflow direction.





### INPUT & OUTPUT CONNECTOR

|  |   |   |  |   |  |  |   |
|--|---|---|--|---|--|--|---|
| <b>J1</b><br>Pin 1: Line<br>Pin 2: Line<br>Pin 3: NC<br>Pin 4: Neutral | Pin 5: Neutral<br>Pin 6: NC<br>Pin 7: Earth<br>Pin 8: Earth | <b>J2</b><br>Pin 1: +50VDC<br>Pin 2: +50VDC<br>Pin 3: +50VDC<br>Pin 4: +50VDC | Pin 5: GND<br>Pin 6: GND<br>Pin 7: GND<br>Pin 8: GND | <b>J3</b><br>Pin 1: NC<br>Pin 2: CTL +<br>Pin 3: AMPCTL<br>Pin 4: GND/CTL - | <b>J4</b><br>Pin 1: +12VDC<br>Pin 2: +5VDC<br>Pin 3: GND<br>Pin 4: GND | <b>J5 / J7</b><br>Pin 1: FAN (+VE)<br>Pin 2: FAN (-VE) | <b>J6</b><br>Pin 1: SCL<br>Pin 2: SDA<br>Pin 3: GND |
|--|---|---|--|---|--|--|---|



- \* SHORT PIN 1 OF J10 & PIN 3 OF J10 FOR 220V INPUT
- \*\* SHORT PIN 3 OF J10 & PIN 5 OF J10 FOR 110V INPUT

Note for CX350: Due to the dynamic characteristics of a demanding multi-channel audio environment, the D2audio CX350 audio-Grade power supply has been designed to deliver very high peak current. This unique capability will avoid the possibility of current limiting during the normal occurrences of extreme volume levels on multiple channels simultaneously.

Note for CXT350: Due to the demanding requirements of a THX Ultra2 and THX select based multi-channel audio environment, the D2audio CXT350 Audio Grade power supply has been designed to deliver very high peak currents and voltages for extended periods of time. This unique capability will avoid the possibility of current limiting or thermal cycling during the required THX-level testing for extreme speaker load conditions on multiple audio channels simultaneously.

