

250 Watts

- US DoE Energy efficiency level VI
- EU CoC Tier 2 requirements, ErP stage 2
- EN55032 Level B conducted & radiated
- Class I –C14
- Single outputs 12 to 56V
- 5 Year warranty



The EDA250 range of external AC-DC power adapters are compliant with the latest energy efficiency Level VI standard, CoC tier 2 and ErP stage 2. The units offer 240-250 watts of output power with output voltages available between 12 and 56VDC. The range is reliable, cost competitive, and comes with an impressive FIDUS 5 year warranty.

Dimensions:

3.70 x 8.30 x 1.71" (94 x 204 x 43.5mm)

Models & Ratings

| Model Number | Output Power | Output voltage | Output Current |
|--------------|--------------|----------------|----------------|
| EDA25012-C14 | 240W | 12V | 20.00A |
| EDA25019-C14 | 250W | 19V | 13.20A |
| EDA25024-C14 | 250W | 24V | 10.40A |
| EDA25048-C14 | 250W | 48V | 5.20A |
| EDA25056-C14 | 250W | 56V | 4.48A |

Notes

1. Alternative output connectors available for production quantities. Contact sales for details
3. For UK/ US/ EU mains power cable please order UK-C14, US-C14 or EU-C14 separately

Key specifications

| Parameter | Minimum | Typical | Maximum | Units | Notes & Conditions |
|-----------------------|--|---------|---------|-------|--|
| AC Input range | 90 | | 264 | VAC | No derating |
| Operating temperature | 0 | | 60/70 | °C | 60°C for 12V models and 70°C for others. See derating curve page 2 |
| Efficiency | 88 | | | % | |
| Dimensions | 3.70 x 8.30 x 1.71" (94 x 204 x 43.5mm) | | | | |
| EMC | EN55032 Level B Conducted and Radiated. EN61000-3 and EN61000-4, harmonics, flicker, surge, EFT, ESD, conducted and radiated | | | | |

Safety Approvals

| | Safety standard | Notes & Conditions |
|----------------------------|---------------------------------------|--|
| UL | UL 60950-1: 2nd edition, UL62368-1 | |
| CB | IEC 60950-1:2005 /A2:2013, IEC62368-1 | PSE, BSMI, RCM CCC |
| TUV | EN60950-1:2006 /A2:2013, EN62368-1 | |
| CE | | 2011/65/EU RoHS Directive and 2014/35/EU Low voltage directive |
| Equipment protection class | | Class I |

Input

| Parameter | Minimum | Typical | Maximum | Units | Notes & Conditions |
|---------------------|---------|---------|---------|-------|---|
| Input voltage | 90 | | 264 | VAC | No derating |
| Input frequency | 47 | | 63 | Hz | |
| Power factor | | | | | EN61000-3-2 class A compliant |
| Input current | | | 3.3 | A | |
| Inrush current | | | 120 | A | High line. Full load, 25°C cool start, Vin=230VAC |
| No load input power | | | 0.21 | W | 230VAC |

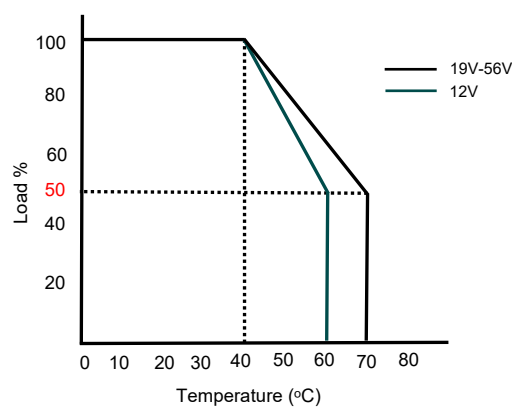
Output

| Parameter | Minimum | Typical | Maximum | Units | Notes & Conditions |
|-----------------------------|---------|---------|---------|--------|---|
| Output voltage | 12 | | 56 | VDC | 56V unit also available on request |
| Setpoint accuracy | | | ±5 | % | |
| Total regulation | | | ±5 | % | Includes set accuracy, line & load regulation. |
| Minimum load | 0 | | | % | |
| Transient response | | 0.5 | | ms | 50% load change |
| Ripple & Noise | | | 1 | %Pk-Pk | All models measured with 10uF and 0.1uf capacitor. 20 MHz bandwidth |
| Hold up time | 10 | | | ms | At full load |
| Overload protection | | | 150 | % | Automatic recovery |
| Short circuit protection | | | | | Automatic recovery |
| Over voltage protection | | | 150 | % | Latch off reset |
| Over temperature protection | | | | | Latch off reset |

Environmental

| Parameter | Minimum | Typical | Maximum | Units | Notes & Conditions |
|-----------------------|---------|---------|---------|-------|---|
| Operating temperature | 0 | | 60/70 | °C | 60°C for 12V models and 70°C for others. See derating curve below |
| Storage temperature | -20 | | 80 | °C | |
| Cooling | | | | | Convection cooled |
| Operating Humidity | 20 | | 80 | % RH | |
| Storage Humidity | 10 | | 90 | % RH | |

Derating curve



General

| Parameter | Minimum | Typical | Maximum | Units | Notes & Conditions |
|-----------------------|-----------------------|---------|---------|-------------------|-------------------------|
| Efficiency | 88 | | | % | |
| Isolation | Input to Output: 3000 | | | VAC | For 1 minute |
| Insulation resistance | | 10 | | MOhm | 500Vdc |
| Power density | | | 4.76 | W/In ³ | |
| MTBF | 300 | | | kHrs | As per Telcordia SR-332 |
| Weight | | 1040 | | g | |

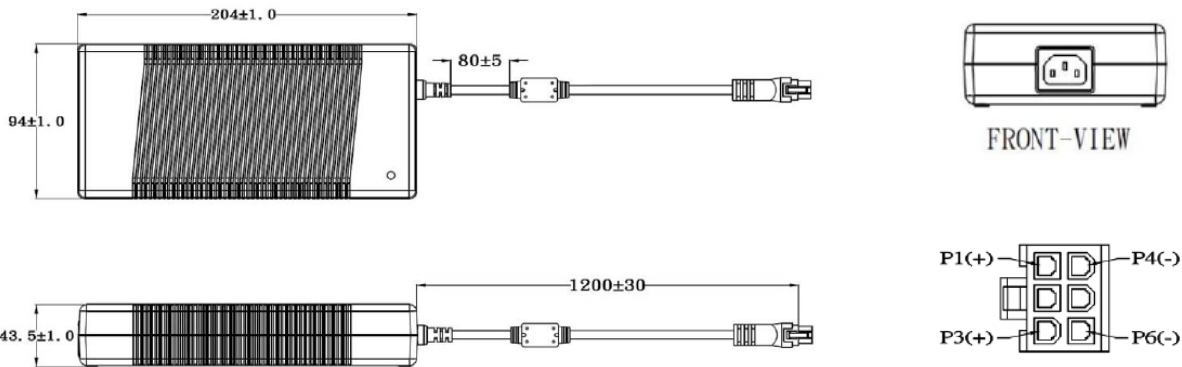
EMC: Emissions

| | Standard | Test level | Criteria | Notes & Conditions |
|------------------|-------------|------------|----------|--------------------|
| Conducted | EN55032 | B | | |
| Radiated | EN55032 | B | | |
| Harmonic current | EN61000-3-2 | Class A | | |
| Voltage flicker | EN61000-3-3 | | | |

EMC: Immunity

| | Standard | Test level | Criteria | Notes & Conditions |
|------------------------|--------------|---|----------|---|
| ESD | EN61000-4-2 | 2,3 | A | Contact: 4kV, Air: 8kV |
| Radiated | EN61000-4-3 | 2 | A | 3V/m |
| EFT | EN61000-4-4 | 2 | A | 1kV |
| Surges | EN61000-4-5 | Installation Class 3 | A | Line to Neutral 1kV, Line/Neutral to PE 2kV |
| Conducted | EN61000-4-6 | 2 | A | 3Vrms |
| PFMF | EN61000-4-8 | 1 | A | 1A/m |
| Dips and interruptions | EN61000-4-11 | >95% interruption 250 periods, >95% dip 0.5 periods, 30% dip 25 periods. Perf criteria: B,A,A | | |

Mechanical Details



For UK/ US/ EU mains power cable please order UK-C14, US-C14 or EU-C14 separately

Notes

- All dimensions in mm
- Output connector : Molex 6 pin mini fit
- Negative DC output is PE tied, For floating DC output please contact sales
- Output cable for UL2095 / UL2464 / 12V 16AWG and AWG18 for other voltages