

**Errata: CS5460 Rev. A**

(Reference CS5460 Data Sheet revision DS279PP3 dated APR '99)

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**1. Power Supply Rejection PSRR (x10 gain ranges)**

**Specified** 70 dB at Gains x10 and x50

**New Spec.** 56 dB at Gain x10 and 70 dB at Gain x50

**Comments** The CS5460 Data Sheet will be revised to indicate the different PSRR at the different gain settings.

**2. CPUCLK Duty Cycle**

**Specified** No specification.

**New Spec.** To maintain a 40% to 60% duty cycle on CPUCLK, a 45% to 55% duty cycle from an external clock is required.

**Comments** The CS5460 Data Sheet will be revised to indicate this requirement.

**3. IEC Compliance**

**Specified** The CS5460 complies with IEC 521/1036.

**New Spec.** The CS5460 complies with IEC 687/1036.

**Comments** The CS5460 Data Sheet will be revised to indicate the correct compliance.

**4. SCLK High-level and Low-level Input Voltages, Respectively**

**Specified** 0.6 VD+ Minimum and 0.3 VD+ Maximum, respectively.

**New Spec.** 0.8 VD+ Minimum and 0.2 VD+ Maximum, respectively.

**Comments** The CS5460 Data Sheet will be revised to indicate the correct limits.

## 5. Voltage Channel Noise (Referred to Input)

**Specified** 250  $\mu\text{V}$  Maximum

**Rev. A** 350  $\mu\text{V}$  Maximum

**Comments** The CS5460 will meet this specification in future revisions. The Current Channel has over 90% of the noise budget for the low-rate measurements and, therefore, the impact of the Voltage Channel noise will be virtually unnoticed in Energy and  $V_{\text{RMS}}$  measurements.

## 6. $V_{\text{RMS}}$ and $I_{\text{RMS}}$ Calculations overflow

**Specified** Internal Registers in the Power Calculation Engine should have enough range with maximum inputs and cycle count,  $N = 4000$ .

**Rev. A**  $V_{\text{RMS}}$  and  $I_{\text{RMS}}$  Internal Registers overflow when inputs exceed 50% of full-scale and  $N = 4000$ .

**Comments** The CS5460 will meet this specification in future revisions. When setting  $N = 4000$ , the gain calibration registers can be set to 0.5 to prevent overflow. RMS values of 0.5 will represent a full-scale input. This has minimal impact on accuracy or dynamic range.

## 7. Power Supply Configuration $V_A = \pm 2.5\text{V}$ ; $V_{D+} = +3\text{V}$ ; $DGND = 0\text{V}$

**Specified** Internal or external clock.

**Rev. A** Internal clock mode only for supply configuration  $V_A = \pm 2.5\text{V}$ ;  $V_{D+} = +3\text{V}$ ;  $DGND = 0\text{V}$ .

**Comments** The CS5460 will meet this specification in future revisions. External clock can be used with  $V_{A+} = +3\text{V}$ ;  $V_{A-} = -2\text{V}$ ;  $V_{D+} = +3\text{V}$ ;  $DGND = 0\text{V}$ .

## 8. Power Consumption in Sleep Mode

**Specified** 10  $\mu\text{W}$  Typical

**Rev. A** 15  $\mu\text{W}$  Typical and 50  $\mu\text{W}$  Maximum

**Comments** The CS5460 will meet this specification in future revisions.

## 9. Internal Reference Temperature Coefficient

**Specified** 60  $\text{ppm}/^\circ\text{C}$

**Rev. A** 100  $\text{ppm}/^\circ\text{C}$

**Comments** The CS5460 will meet this specification in future revisions.

## 10. VREFOUT Load Regulation

**Specified** 6 mV Typical and 10 mV Maximum

**Rev. A** 8 mV Typical and 12 mV Maximum

**Comments** The CS5460 will meet this specification in future revisions.

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If there are any questions concerning this information, please contact the Crystal Power Measurement team. For questions contact any of the team members or send email to [powermeter@crystal.cirrus.com](mailto:powermeter@crystal.cirrus.com). Visit our web site <http://www.crystal.com> or call our literature department at +1 (800) 888-5016 ext. 3594 or +1 (512) 912-3594 for data sheets and application notes.

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