



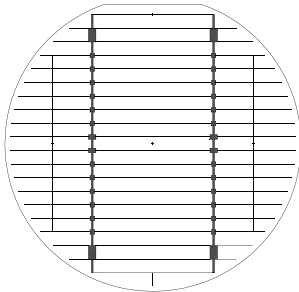
**Udhaya Semiconductors Limited**

An ISO 9001:2000 company

## M Series Solar Cells

Model- USC M100R

**USC M100R**



USL manufactures high performance low-cost silicon solar cells that are designed for terrestrial applications. These solar cells have screen-printed silver front side and screen-printed silver-aluminum back side for better soldering. Textured front surface makes it possible to collect maximum sunlight and hence improved performance.

### Electrical & Mechanical Specifications:

Power Output (Pmax)	1.00Wp to 1.09Wp	0.90Wp to 0.99Wp	0.80Wp to 0.89Wp
Short Circuit Current (Isc)	2.11 2.30 A	1.91 2.19 A	1.70 1.90
Open Circuit Voltage (Voc)	0.583 V	0.583 V	<b>0.569 V</b>
Current at Maximum Power (Impp)	<b>2.10 - 2.29 A</b>	<b>1.90 - 2.09 A</b>	<b>1.69 - 1.89 A</b>
Voltage at Maximum Power (Vmpp)	<b>0.475 V</b>	<b>0.472 V</b>	<b>0.472 V</b>
Fill Factor	0.64 0.74		
Cell size	DIA 100mm		
Thickness	330 + 50 Mic.		
Cell Area (cm <sup>2</sup> )	78.00		
Type	MONO CRYSTALLINE SILICON		
Efficiency	12 14 %		

These data represent the performance of typical modules as measured at their output terminals, and do not include the effect of such additional equipment as diodes or cables. The data are based on measurements made in accordance with ASTM E1036 corrected to SRC (Standard Reporting Conditions, also known as STC or Standard Test Conditions), which are:

- Illumination of 1kW/m<sup>2</sup> (1 sun) at spectra; distribution of AM 1.5 (ASTM E892 global spectral irradiance);
- Cell temperature of 25°C

During the stabilization process, which occurs during the first few months of deployment, module power may decrease approximately 3% from typical Pmax