

Technology Developed, Demonstrated, Promoted and Transferred

SOLAR EMERGENCY LIGHT

A 0.5 watt LED solar emergency light with mobile charging facility has been innovated. This light can provide the lumen of 210 lux, Backup of more than 28 hours along with LI-ION battery and the facility of AC and solar Charging. The weight of the light is 120 gram. We have also developed a circuit for mobile charging direct from Solar PV cell. This light is powered by solar energy using solar cells that convert solar energy (sunlight) directly to electricity. The electricity is stored in batteries and used for the purpose of lighting whenever required. These systems are useful in non-electrified rural areas and reliable for emergency lighting system for important domestic, commercial and industrial applications. This light can also be charged in the ambient light. The feasible study shows that it can work 0 degree temperature. intensity of Lumina



12 hours this light lumine and up to 16 120 lux and after 20 days this light can be watt panel in 4 hours panel in three hours. available this light ambient light within mobile can be hours in sunny days ambient light. Due to be used indoor as in transit. This light product in

degree up to 60 The study of shows that up to provides 210 lux hours it provides hours 60 lux, During the sunny charged with 5 and With 3 watt If no sun is can be charged in 10 hours. The charged in 2 and 5 hours by portability it can well outdoor and is a good utility

rural/urban/mountains.

Home lighting System is powered by solar energy using solar cells that convert solar energy (sunlight) directly to electricity. The electricity is stored in batteries and used for the purpose of lighting whenever required. These systems are useful in non-electrified rural areas and as reliable emergency lighting system for important domestic, small houses, shopkeepers etc.

SOLAR HOME LIGHT SYSTEM (150 WATT)	
Features: <ul style="list-style-type: none"> ➤ 100 Watt solar panel with 10 ft lead 	Technical Specification: <ul style="list-style-type: none"> ➤ Type of Luminary -LED Rated Power

Uttarakhand State Council For Science & Technology

Department of Science & Technology, Govt. of Uttarakhand



- Watt two led bulb an/one tv/laptop/2 DC Fan
- 50 Ah 12 volt dry battery
- AC charger
- Multi mobile charger lead
- 10 hours BACKUP
- 1 year warranty for system
- 10 years warranty for solar panel

of Luminary 3 Watt

- Input operating Voltage- 12V DC
- Nominal Input Voltage -11 to 14Volts
- DC Range Battery fully/trickle charging -14.40Volts + / - 0.2V
- Battery Deep discharge cut off -11.20V + / - 0.2 V

Free energy- solar, No climate change, No pollution, No heat effect, No global warming

