



# COLOSSUS<sup>TM</sup>

*Excellence inside*

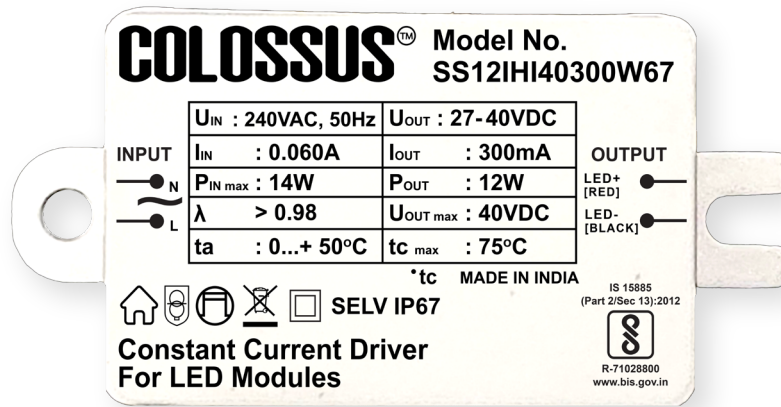
**DATASHEET**

---

**SS12IHI40300W67**



Version: 01



<https://colossusworld.com/>

\*Image is for viewing purpose. Technical Data not to be drawn from above image.

### Approval Markings:



### Product Description

- Constant current driver for led modules
- Input voltage 240VAC
- High efficiency >85%(@100% Load)
- Power factor >0.98,THD<10%(@100%Load)
- For use in combination with luminaries of protection class II.
- Protection against Abnormal Operating Conditions Like Input Over Voltage Protection, Under Voltage Protection, Short Circuit Protection, Open Voltage Protection, Overload Protection.
- Surge protection 4KV
- Nominal Life Time: 30,000 hours @  $t_c \leq t_{c\max}$
- Driver is suitable for use in Dry & Damp locations

### Functions

- Application oriented operation for maximum compatibility

### Applications



Office

Shops

House

## Technical Data

### Mains Voltage Supply

|   |   |
|---|---|
| Rated Voltage Range                     | 240VAC                                      |
| Rated Frequency                         | 50/60 Hz                                    |
| Max. Admissible Input Voltage Range(AC) | 175-265VAC                                  |
| Total Harmonic Distortion (THD)         | <10% (@Full Load)                           |
| Mains Voltage Withstanding Capacity     | 440VAC for 2hrs (with overvoltage shutdown) |

### Output Data

#### Constant current

|                          |     |
|--------------------------|-----|
| Output Current Tolerance | ±5% |
| Max Starting Time        | <1s |

### Interface And Dimming Operation

|                   |      |
|-------------------|------|
| Dimming Interface | None |
|-------------------|------|

### Power Factor

|                   |       |
|-------------------|-------|
| 240V(@ Full Load) | >0.98 |
|-------------------|-------|

### Efficiency(typ.)

|           |      |
|-----------|------|
| Full Load | >85% |
|-----------|------|

### Protections

|                                |             |
|--------------------------------|-------------|
| Open Circuit                   | <50VDC      |
| Output Short Circuit Operation | YES         |
| Input Over Voltage Cutoff      | 300VAC ±10% |
| Input Under Voltage Cutoff     | 100VAC ±10% |

### Connection Wires

|                    |  |
|--------------------|--|
| Type               | Solid or Stranded Wire                   |
| Wire Cross Section | 0.75mm <sup>2</sup> - 1.5mm <sup>2</sup> |
| Wire Length        | 180mm (±15mm)                            |

### Wire Lengths

|                                |     |
|--------------------------------|-----|
| Max. Wire Length To Led Module | <1m |
|--------------------------------|-----|

### Protection

|              |      |
|--------------|------|
| Surge        | 4kV  |
| High Voltage | 440V |

### Temperatures (Operation)

| Model No.       | Ambient( $t_a$ ) | Case ( $t_c$ ) |
|-----------------|------------------|----------------|
| SS12IHI40300W67 | 0°C... +50°C     | Max + 75°C     |

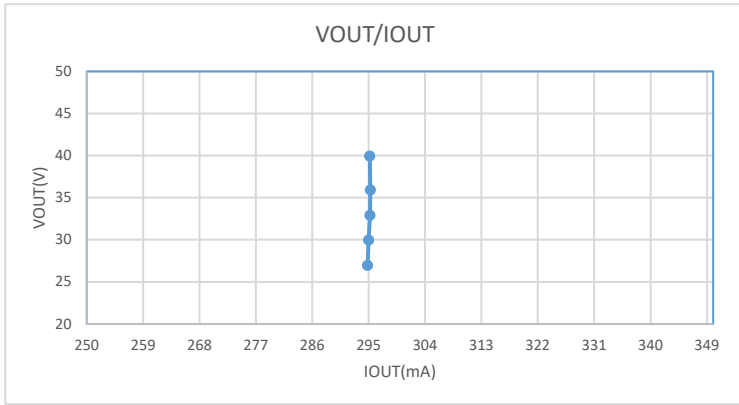
### Product Specifications

| Model No.       | Input Current (max) | Input Power (max) | THD  | Power Factor | Efficiency | Output Current | Output Voltage | Output Power (max) |
|-----------------|---------------------|-------------------|------|--------------|------------|----------------|----------------|--------------------|
| SS12IHI40300W67 | 60mA                | 14W               | <10% | >0.98        | >85%       | 300mA          | 27-40V         | 12W                |

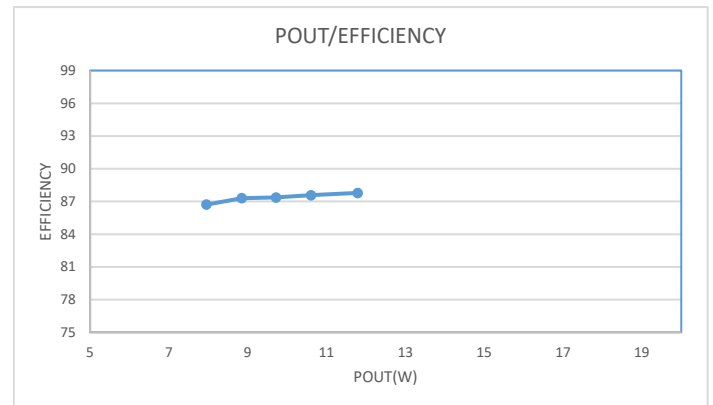
All specifications with 240 VAC are nominal operation and 100% load.

### Graphs

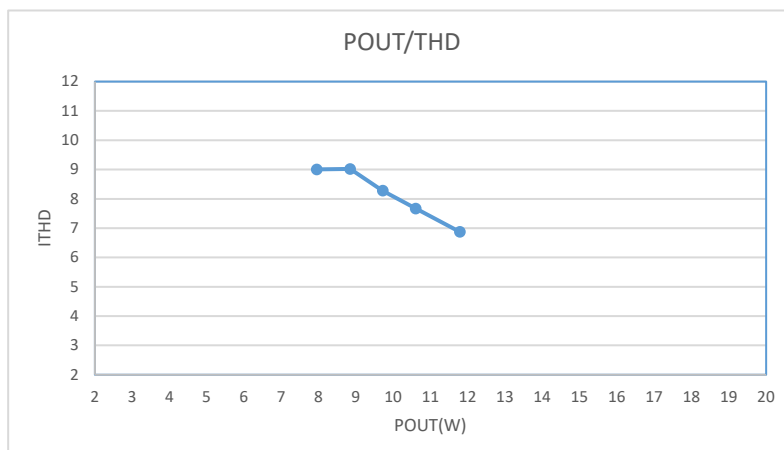
Operating Window



Efficiency Vs Output Power



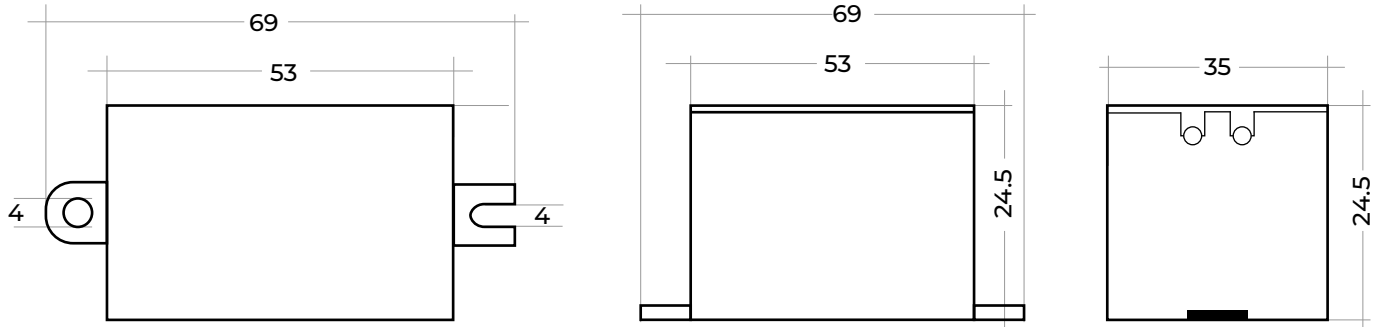
THD Vs Output Power



## Housing Properties

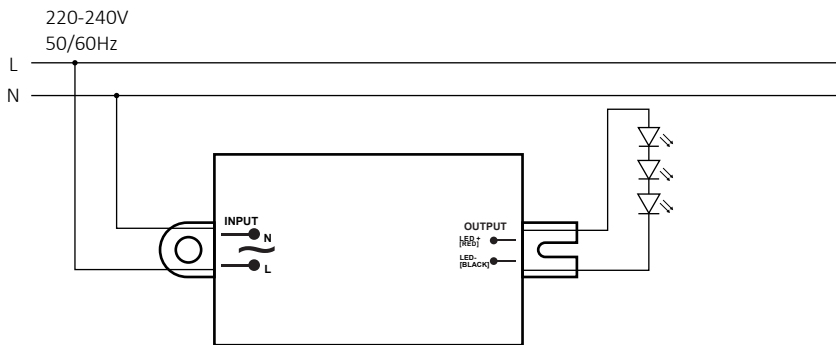
|                      |                      |
|----------------------|----------------------|
| Degree of protection | IP67                 |
| Casing               | Polycarbonate, White |

## Housing Dimensions



|                   |              |
|-------------------|--------------|
| <b>Dimensions</b> | 69x35x24.5mm |
| <b>Tolerance</b>  | ± 1mm        |
| <b>Weight</b>     | 50 gm        |

## Wiring Diagrams



## Expected Lifetime

|                 |              |
|-----------------|--------------|
| <b>Lifetime</b> | 30,000 hours |
| <b>Warranty</b> | 3 years      |

## Logistics Data

|                    |                 |
|--------------------|-----------------|
| <b>Model No.</b>   | SS12IHI40300W67 |
| <b>Weight (gm)</b> | 50 gm           |