

Title (en)  
Lighting system

Title (de)  
Beleuchtungssystem

Title (fr)  
Système d'éclairage

Publication  
**EP 1865756 A1 20071212 (EN)**

Application  
**EP 06388040 A 20060606**

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Abstract (en)

The present invention relates to a lighting system. The system comprises a pair of power supply lines, a plurality of light sources connected to said pair of supply lines, a monitoring unit, and an alert receiving unit communicating with said monitoring unit. The pair of power supply lines may constitute a supply line and a return line. The supply line and said return line are connected to said plurality of light sources and through said monitoring unit, the pair of power supply lines providing electrical power to said plurality of light sources. The monitoring unit may comprise a voltage measuring circuit measuring the voltage across said pair of power supply lines. The monitoring unit may further comprise a current measuring circuit measuring the current flowing through said supply line or said return line in response to the electrical power provided to said plurality of light sources. The monitoring unit defines a first time frame and a first point of time during said first time frame, during said first time frame a first steady state situation for said plurality of light sources is achieved. The monitoring unit measures at said first point of time a first voltage level by means of the voltage measuring circuit and the monitoring unit measuring at the first point of time a first current level by means of the current measuring circuit. The monitoring unit determining a first load resistance representing the active load resistance for the plurality of light sources being active during the first time frame based on the first voltage level and the first current level, the monitoring unit defining a second time frame and a second point of time during the second time frame, during the second time frame a second steady state situation for the plurality of light sources is achieved. The second time frame being defined to take place after the first time frame has expired. The monitoring unit measuring at the second point of time a second voltage level by means of the voltage measuring circuit, and a second current level by means of the current measuring circuit, the monitoring unit determining a second load resistance representing the active load resistance for the plurality of light sources being active during the second time frame based on the second voltage level and the second current level. The monitoring unit generates a first alert message provided the difference between the first and second load resistance exceeds a first specific threshold constituting a first alert criterion. The monitoring unit still further comprises a communication unit for sending the first alert message to the alert receiving unit, and the alert receiving unit acting or alerting in response to the reception of the first alert message.

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Citation (search report)

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