The key findings of failures in the lighting test

Xin Hongzheng

UNEP Collaborating Centre for Energy Efficient Lighting

Content

- Light Source
- Luminaires

- Safety
- Performance

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Light Source – Safety

-Marking (light source, package)*

- Interchangeability*

-Bending moment *

-Protection against electrical shock

-Insulation resistance and electric strength

- Mechanical strength*

-cap temperature rise

-Resistance to heat

-Resistance to flame and ignition

-Fault conditions

-Disturbance voltage, Radiated electromagnetic disturbances

-Harmonic current*

-Blue light hazard*

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Light Source - Performance

- Electrical parameter (Voltage, Current, Power, Power factor*)
- Photometric parameter (Luminous flux*, Light distribution*)
- Colorimetric parameter (SDCM*, CRI*, CCT, Color uniformity*)
- Luminous efficacy*
- Initial failure*

+ maintenance (luminous maintenance*, color shift)

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Luminaires- Safety

-Marking*

-Construction*

-Creepage distances and clearances

-Provision for earthing*

-Terminals

-External and Internal wiring*

-Protection against accidental contact with live parts

-Thermal endurance

- IP testing*

-Insulation resistance and Electric strength

-Resistance to heat , fire and impression*

-Harmonic current, Disturbance voltage, Radiated electromagnetic disturbances *

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Luminaires- Performance

- Electrical parameter (Voltage, Current, Power, Power factor)
-Photometric parameter (Luminous flux*, Light distribution*)
-Colorimetric parameter (SDCM, CRI, CCT, Color uniformity*)
- Luminous efficacy
- Initial failure*
-Applied working condition (Voltage, Temperature)
+maintenance (luminous maintenance*, color shift)

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