

Emergency exits and escape routes lighting: Cortem Group LFED and LFEE series Ex lighting fixtures

Emergency lighting means illumination designed to operate when the ordinary one is missing. This is one of the main principals of plants safety to allow the evacuation of people in case of danger, or even, more simply, to allow operators, to move, in case of electrical failure and black out.



The emergency lighting is divided, depending on the purpose, in:

- a) reserve lighting;
- b) safety lighting.

The reserve lighting allows continuing the activities when the ordinary lighting is missing. It can be used for escape routes and emergency if it meets the relevant requirements.

Safety lighting is expected to allow the safe evacuation of an area or finish a potentially dangerous or vital ongoing process before leaving the room.

The safety lighting is subdivided into:

- lighting of emergency exits and streets: security lighting that ensures that escape routes are effectively identified and used safely when a place is busy. Safety lighting must illuminate the emergency way so that it can easily be followed up to the emergency exit, which must be easily identifiable.
- no-panic lighting: security lighting that works to avoid panic and that allows people to reach the place where the escape routes can be identified.
- lighting of high-risk areas: security lighting that works for the safety of the people involved in potentially hazardous processes or situations where it's necessary to activate a procedure to end the process for the safety of operators.



In systems installed in areas with the presence of a potentially explosive atmosphere, this type of system has several further critical issues compared to a system installed in a safe area.

Cortem Group designed two new emergency lighting fixtures series for lighting and identifying emergency exits or escape routes in the event of danger: the LFED series with 'Ex db op is' method of protection and the LFEE series with 'Ex db eb mb op is' method of protection.

The explosion-protected LFED series emergency lighting fixtures consists of a low copper content aluminium alloy enclosure while the increased safety LFEE series emergency lighting fixtures consists of an AISI 316L stainless steel box. They feature a tempered glass or UV-resistant

polycarbonate window printed with a pictogram and a resin LED strip light positioned at the distance necessary to guarantee 'Ex op is' protection.

The emergency versions are fitted with a high-brightness LED indicator light that monitors battery operation and notifies the user in the event of a fault. It switches on automatically if there is a power failure and lasts between 3 and 5 hours for the LFED series, depending on the capacity of the chosen batteries, and up to 6 hours for the LFEE series. The red LED switches off to indicate that the batteries need replacing either because of a fault in the emergency circuit or because they are flat.

For further details visit:
www.cortemgroup.com