

GUARDIAN 'Infinity' LED Luminaire

Aquamax T8 24W 5Ft

Energy Efficient LED Lighting for Frozen Food and Chiller Cold rooms

Refrigeration lighting technology enters a new era with the advent of the **GUARDIAN LED Tube** range for supermarket cold rooms and cases.

More than sixty percent of the energy costs of powering the lighting in frozen food applications can be saved every year by using **GUARDIAN** products to replace existing fluorescent tubes and ballasts.

Maintenance costs are virtually eliminated since the life expectancy of LED tubes is more than three times greater than the fluorescent tubes they replace.

When installed in supermarket cold rooms **Aquamax LED T8 24W 5 Ft luminaires** provide:-

- **Annual Energy Savings of more than 60%** of freezer and chiller lighting carbon footprint and costs by :-
 - Improved efficiency when lights are on.
 - Switching off lights every night or when not in use.
 - Dimming down to acceptable lighting levels.
 - Reducing the refrigeration cooling load required.
- **Reliable startup of LED lighting** in freezer rooms after being switched off in low temperatures.
- **Maintained Luminaire energy reductions of 75%** achieved by fitting a Guardian 5W LED Emergency Bulkhead adjacent to the Aquamax 24W luminaire.
- **Further energy savings in frozen food cold rooms** by using a local PIR proximity detector to switch the 230vac supply to all LED tubes on and off.
- **Energy & Maintenance payback in less than 3 years.**
- **Life expectancy >10 years** for LED tube & electronics.

L 1575mm x W 100mm x H 95mm



Aquamax LED T8 24W 5Ft

fitted with Guardian LED tube LED T8 24W 860 M 1500

The **GUARDIAN LED Luminaire** is an industrial, IP65, 5 foot, ceiling mounted light fitting suitable for reliably illuminating refrigerated cold rooms. It includes a single Guardian LED tube model **LED T8 24W 860 M 1500** plus all necessary fixing screws, stainless steel clips, connectors and wiring.

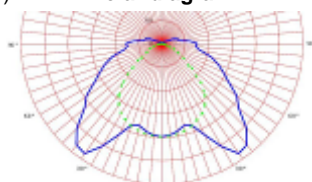
Advanced LED chip design, smart power control and compact packaging of Guardian **LED Luminaires and Tubes** sets a new standard in LED brightness, energy efficiency and ease of installation in supermarket cold room applications.

After being switched OFF when not in use, all LED tubes reliably switch ON again at low temperatures. Automatic PIR sensor control dramatically reduces the cost and carbon footprint of powering the lighting in frozen food and chiller cold rooms.

Guardian **LED luminaires and tubes** are environmentally friendly, made of plastic, lead free, contain no other harmful elements and provide a cool, modern look for the illumination of frozen food products in retail stores.

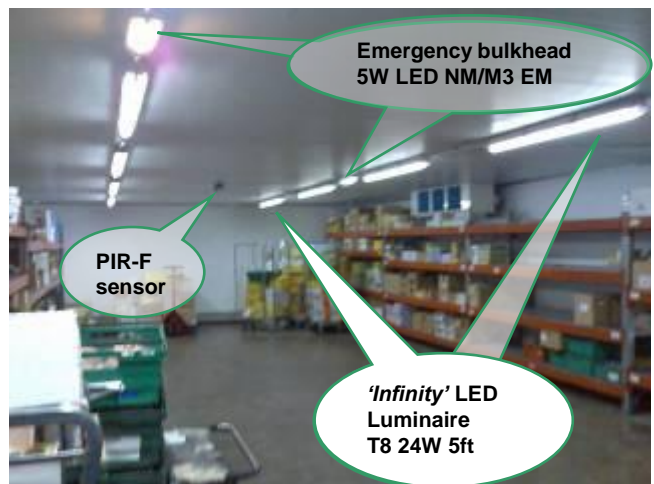
- **Luminous Flux** 2100 lumens (-30C to +40C)
- **Efficiency** 101.7%
- **Power** 24 Watt
- **Mains Supply** 200vac -260vac 50Hz PF 0.99
- **Size** L 1575mm x W 100mm x H 95mm
- **Weight** 4 Kg
- **Rating** IP65
- **Fixture** Ceiling Mounted T8 luminaire with stainless steel clips.
- **LED Tube** 1 x LED T8 24W 860 M 1500
- **LED Colour** Daylight (860)

Polar diagram



A smart feature of the LED Lamps is that there is no in-rush current when power is first applied thereby improving reliability and reducing stress on group fuses and cables.

APPROVALS
EN 55015 : 2006
EN 62031 : 2008



Coldroom with LED luminaires, switched by PIR sensors, with maintained-mode lighting using LED Emergency bulkheads.

