



# ARGUS

COMMERCIAL LED LIGHTING SOLUTIONS

## Energy Efficiency & Energy Costs

LEDs use less power (watts) per unit of light generated (lumens). LEDs help reduce greenhouse gas emissions from power plants and lower electric bills



Light Emitting Diodes (LEDs)



Incandescent Light Bulbs



Compact Fluorescent (CFLs)

Life Span (average)	50,000 hours	1,200 hours	8,000 hours
Watts of electricity used = 60 watt bulb.	6 - 8 watts	60 watts	13-15 watts
Kilo-watts of electricity used = 30 Incandescent Bulbs per year equivalent	329 KWh/yr.	3285 KWh/yr.	767 KWh/yr.
Annual Operating Cost = 30 Incandescent Bulbs per year equivalent	\$32.85/year	\$328.59/year	\$76.65/year

## Environmental Impact

Contains the TOXIC Mercury	NO	NO	Yes - Mercury is very toxic to your health and the environment
RoHS Compliant	YES	YES	No - contains 1mg-5mg of Mercury and is a major risk to the environment
Carbon Dioxide Emissions = 30 bulbs per year Lower energy consumption decreases: CO2 emissions, sulfur oxide & high-level nuclear waste.	451 pounds/year	4500 pounds/year	1051 pounds/year

## Important Facts

Sensitivity to low temperatures	None	Some	Yes - may not work under negative 10 degrees Fahrenheit or over 120 degrees Fahrenheit
Sensitive to humidity	No	Some	Yes
On/off Cycling - Switching a CFL on/off quickly, in a closet for instance, may decrease the lifespan of the bulb.	No Effect	Some	Yes - can reduce lifespan drastically
Turns on instantly	Yes	Yes	No - takes time to warm up
Durability	Very Durable - LEDs can handle jarring and bumping	Not Very Durable - glass or filament can break easily	Not Very Durable - glass can break easily
Heat Emitted	3.4 btu's/hour	85 btu's/hour	30 btu's/hour
Failure Modes	Not typical	Some	Yes - may catch on fire, smoke, or emit an odor

## Light Output

Lumens	Watts	Watts	Watts
450	4-5	40	9-13
800	6-8	60	13-15
1,100	9-13	75	18-25
1,600	16-20	100	23-30
2,600	25-28	150	30-55