PATLITE

New Frontiers in Safety, Security and Comfort
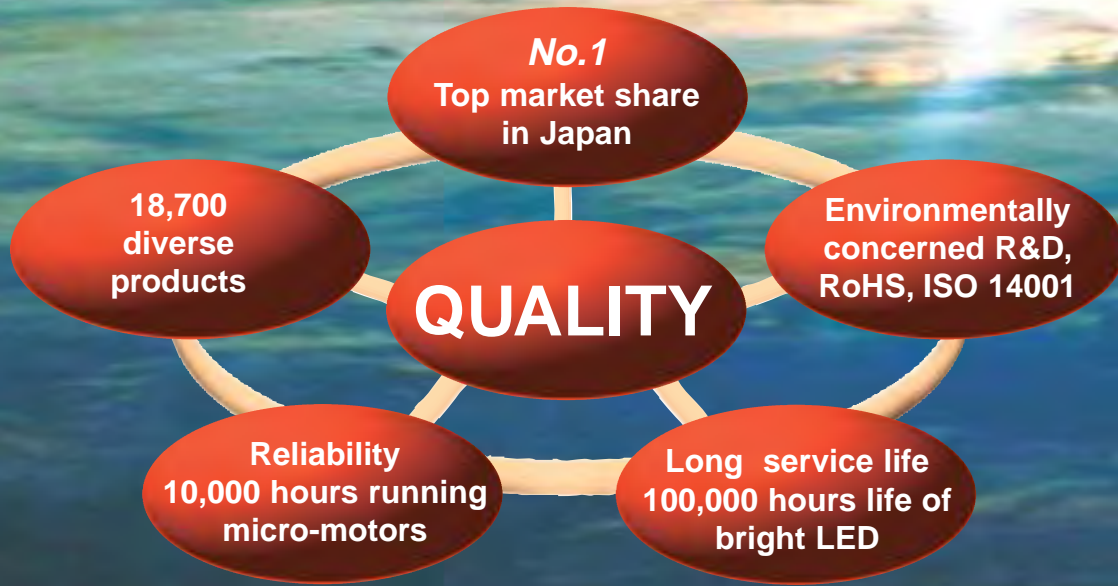
CATALOG

PATLITE

Dedicated to the design and development of visual and audible signaling technology, PATLITE offers the industry's most comprehensive selection of world-class quality rotating warning lights, audible alarms, cube towers, voice synthesizers and signal towers.

QUALITY

- **No.1** Top market share in Japan
- **18,700 diverse products**
- **Environmentally concerned R&D, RoHS, ISO 14001**
- **Reliability 10,000 hours running micro-motors**
- **Long service life 100,000 hours life of bright LED**

Quality Assurance
Not only are the products tested for durability, but PATLITE has been certified as complying with the requirements of ISO 9001.

Audible Alarm Systems
You can select a variety of sound combinations including melody, chime, and alarm, or custom program with voice messages to fit your specific need.

Visual Lighting Systems
PATLITE offers the most extensive product line ranging from large to ultra mini-size, super bright LED or incandescent, pole mount or wall mount.

Hybrid light and audible systems
PATLITE offers a complete line of audible alarms integrated with visual LED or incandescent indicators to increase plant or machine status awareness.

Total Information Technology

*F*or over half a century PATLITE has produced revolving warning lights and a variety of other dependable signal tower lights designed to enhance safety. Throughout our history we have contributed to people's security. Society is now faced with an ever growing volume of increasingly complex data whose management will require more advanced information systems.

We are moving from simple signals to comprehensive systems, from safety and security to information and communication. PATLITE is contributing to a safer, more affluent society through the application of comprehensive and reliable information technology.

Worldwide Sales, Marketing and After Sales Support Network

PATLITE Corp. / Europe
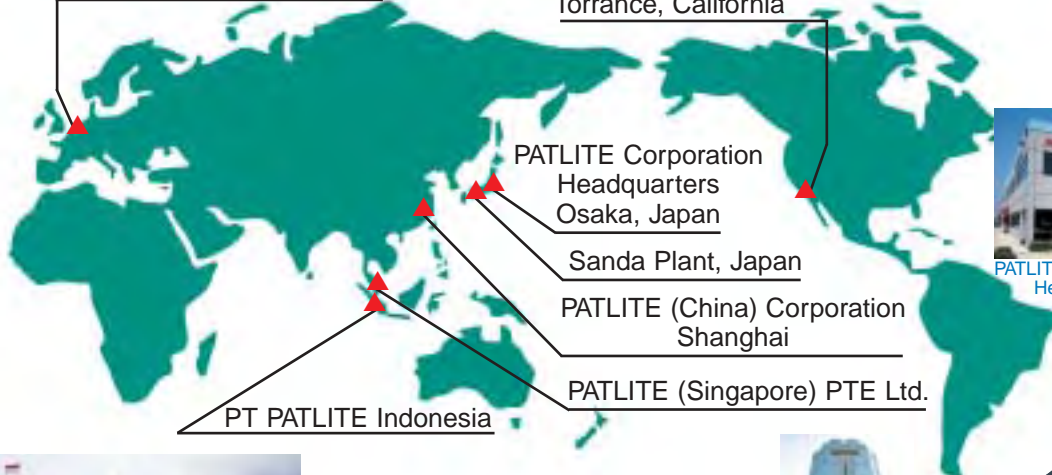
PATLITE Corporation Headquarters, Japan

Sanda Plant

PATLITE Corp./ European office
Rotterdam, the Netherlands

PATLITE (U.S.A.) Corporation
Headquarters
Torrance, California

PATLITE Corporation
Headquarters
Osaka, Japan

Sanda Plant, Japan

PATLITE (China) Corporation
Shanghai

PATLITE (Singapore) PTE Ltd.

PT PATLITE Indonesia

PATLITE (U.S.A.) Corp.
Headquarters

PT PATLITE Indonesia

PATLITE (Singapore) PTE Ltd.

PATLITE (China) Corp.

Vertically Integrated Production for Quality Assurance

We design and manufacture the metallic molds in-house. Using injection machinery attached to these molds, we manufacture plastic materials which enables us to reduce delivery time.

Metal Molding Parts		Machine Processing		
Design with 3-D CAD	Manufacture of metal molding parts	Electrical discharge machine	Machining Center	Injection molding machines

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*D*edicated to the design and development of visual and audible signaling technology, PATLITE offers the industry's most comprehensive selection of signal towers, cube towers, rotating warning lights, voice synthesizers and audible alarms used to indicate machine status!

See PATLITE's
Latest Products at

www.patlite.com

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Rotating Beacons

ø82mm (3.23 in) Round	DC 12V	DC 24V	AC 120V	AC 220V	IP-55* IP-23*	Pre-Assembled Pre-Wired

RU and RS Series Mini-Size

A bright idea for control signals and productivity.

BULB type

CE 12V and 24V only

ø82mm (3.23 in)

■ Colors available: red, yellow, green and blue.

■ *IP Rating: IP-23. RU and RS meet IP-55 with rubber gasket SZ-210.

■ Uses incandescent automobile bulb for longer life.

■ Lenses: Made of shock and heat resistant polycarbonate resin.

■ Integral rotating parabolic reflector makes light visible from a distance.

■ RUP includes 300mm steel pole and bracket (SZ-013), nuts & washers.

■ Rotates 120 times a minute.

■ DC12V and AC220V versions available by special order.

Mini-Size	
RU	Rotating Beacon
RS	Rotating Beacon
RUP	with Pole and Bracket

RU

RS

RUP

With Optional Rubber Gasket SZ-210

With Optional Rubber Gasket SZ-210

MODEL	RATED VOLTAGE	CURRENT DRAW	BULB	No.	ROTATION PER MINUTE	WEIGHT RU/RS	WEIGHT RUP
RU-12	DC12V	0.5A	12V6W	20			
RUP-12	DC12V	0.5A	12V6W	20			
RS-12	DC12V	0.5A	12V6W	20		0.4Kg	0.8Kg
RU-24	DC24V	0.3A	24V6W	21			
RUP-24	DC24V	0.3A	24V6W	21	120		
RS-24	DC24V	0.3A	24V6W	21			
RU-120	AC120V	0.1A	12V6W	20			
RUP-120	AC120V	0.1A	12V6W	20		0.6Kg	1.0Kg
RS-120	AC120V	0.1A	12V6W	20			

Dimensions (mm)

RS **RU** **RUP**

Wiring Diagrams

WIRE LENGTH: 250

Red / Black — 3A — DC24V

Gray / Gray — 1A — AC120V

7
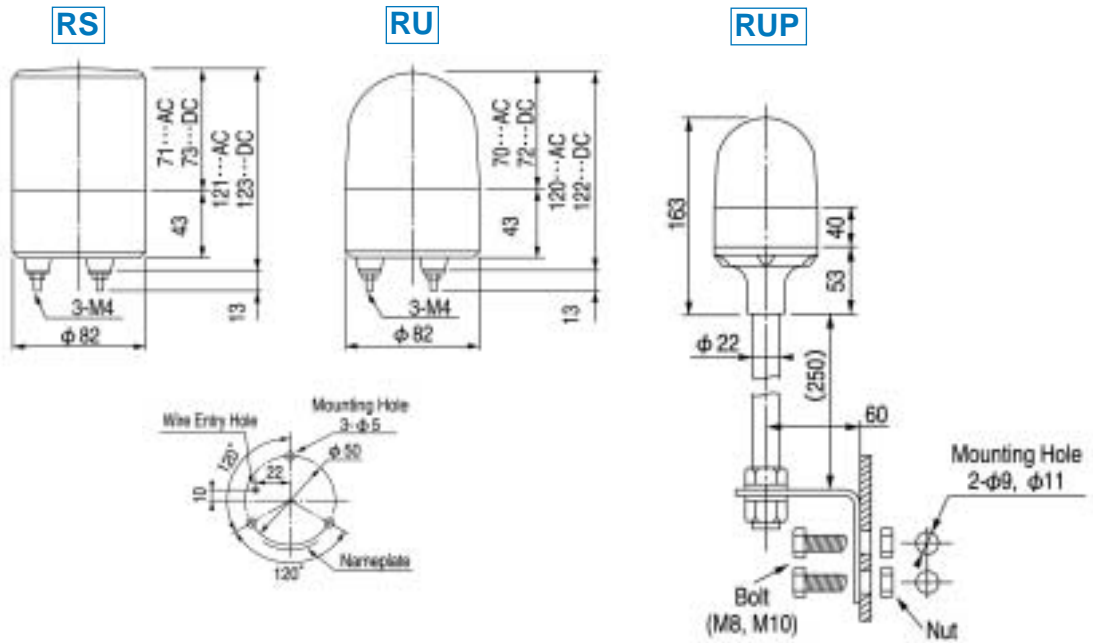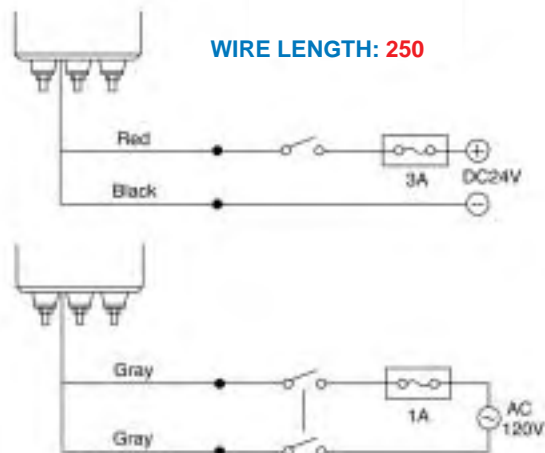
RH-A RK-A

Mini-Size Beacons

The RH-A and RK-A series are versatile, durable & compact revolving warning lights. Terminal block allows easy wiring.

BULB type

c(UL)us   CE

Mini-Size

RH-AUL	Rotating Beacon
RK-AUL	Rotating Beacon
RHB-AUL	with Audible Alarm
RKB-AUL	with Audible Alarm

ø100mm (3.94 in)

- Colors available: red, yellow, green and blue.
- IP-55 rated, and comes with rubber gasket SZ-200A.
- RHB-A and RKB-A have an integral alarm (hi-pitch tone 90dB at 1m) that sounds with light operation.
- Integral rotating parabolic reflector makes the light visible from long distances.
- Rotates 170 times per minute.
- Optional mounting brackets available (SZ-30L, SZ-30T).
- AC240V version available by special order.

RH

Rubber Gasket SZ-200A

RK

Rubber Gasket SZ-200A

MODEL	RATED VOLTAGE	CURRENT DRAW	BULB	No.	ROTATION PER MINUTE	WEIGHT
RH-24AUL	DC24V	0.5A	24V10W	10	170	0.4Kg
RHB-24AUL	DC24V	0.5A	24V10W	10	170	0.4Kg
RK-24AUL	DC24V	0.5A	24V10W	10	170	0.4Kg
RKB-24AUL	DC24V	0.5A	24V10W	10	170	0.4Kg
RH-120AUL	AC120V	0.1A	12V5W	11	170	0.6Kg
RHB-120AUL	AC120V	0.1A	12V5W	11	170	0.6Kg
RK-120AUL	AC120V	0.1A	12V5W	11	170	0.6Kg
RKB-120AUL	AC120V	0.1A	12V5W	11	170	0.6Kg

Dimensions (mm)

φ100

92

146···AC
148···DC

49

3-M5

16

Name Plate

Alarm Position
(Buzzer Type Only)

120°

Ø70

120°

120°

Terminals

Mounting Hole
3 - Ø 6

Wiring Diagrams

For Buzzer type

For Non-Buzzer type

24V
120V
240V

POWER
SUPPLY

24V

LIGHT

POWER
SUPPLY

ALARM

120V
240V

POWER
SUPPLY

ALARM

ø100mm (3.94 in) Round	DC 12V	DC 24V	AC 120V	AC 240V	IP-54* IP-23*	Electronic Alarm: 1	90 dB/m	Pre-Assembled

WH-A
WK-A

Wall Mount Beacons

Colorful wall-mounted rotating beacons in 2 dome styles.

BULB type

CE 12V and 24V only

Wall Mount Beacons

WH-A	Rotating Beacon
WK-A	Rotating Beacon
WHB-A	with Audible Alarm
WKB-A	with Audible Alarm

MODEL	RATED VOLTAGE	BULB	No.	ROTATION PER MINUTE	WEIGHT
WH-12A	DC12V	12V10W	9	170	0.5Kg
WK-12A	DC12V	12V10W	9	170	0.5Kg
WH-24A	DC24V	24V10W	10	170	0.5Kg
WK-24A	DC24V	24V10W	10	170	0.5Kg
WH-120A	AC120V	12V5W	11	170	0.7Kg
WK-120A	AC120V	12V5W	11	170	0.7Kg
WHB-12A	DC12V	12V10W	9	170	0.5Kg
WKB-12A	DC12V	12V10W	9	170	0.5Kg
WHB-24A	DC24V	24V10W	10	170	0.5Kg
WKB-24A	DC24V	24V10W	10	170	0.5Kg
WHB-120A	AC120V	12V5W	11	170	0.7Kg
WKB-120A	AC120V	12V5W	11	170	0.7Kg

WK-A WKB-A

WH-A WHB-A

ø100mm (3.94 in)

- Colors available: red, yellow, green, and blue.
- *WHB-A & WKB-A (upright) meet IP-23, WH-A & WK-A meet IP-54.
- Unique beacon with side mount bracket is perfect for vertical, horizontal or inverted mounting positions.
- Electronic buzzer emits sounds intermittently as the light rotates.
- Main body is made of ABS resin and dome is made of shock and heat resistant polycarbonate resin.
- DC12V and AC240V versions available by special order.

Dimensions (mm)

WH-A

WK-A

Mounting Pitch
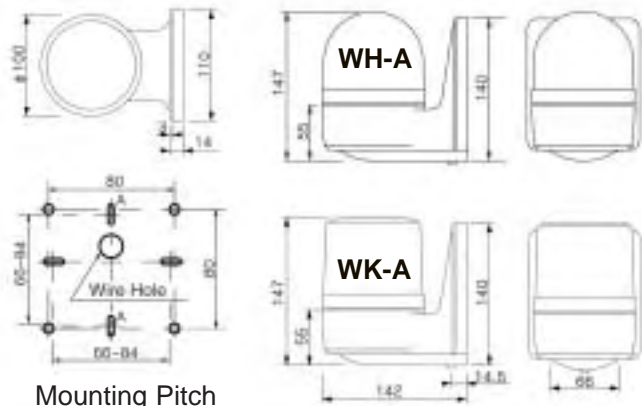
Wiring Diagrams
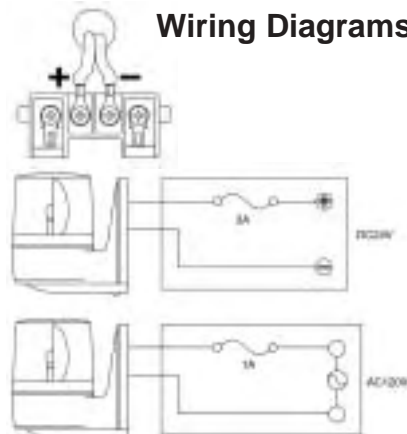
Rotating Beacons

ø100mm (3.94 in) Round	DC 12V	DC 24V	AC 120V	AC 240V	IP-23	Pre-Assembled Pre-Wired

SKH-EA

SKH-EA Series Mini-Size

Mini-size, low cost, rotating warning lights used for a variety of applications.

Mini-Size

SKH-EA   Rotating Beacon

MODEL	RATED VOLTAGE	BULB	No.	ROTATION PER MINUTE	WEIGHT
SKH-12EA	DC12V	12V10W	9		0.4Kg
SKH-24EA	DC24V	24V10W	10	170	
SKH-120EA	AC120V	12V5W	11		0.6Kg

BULB type

CE 12V and 24V only
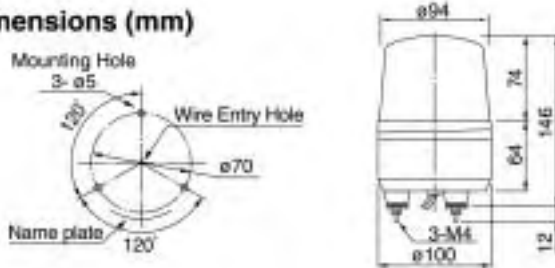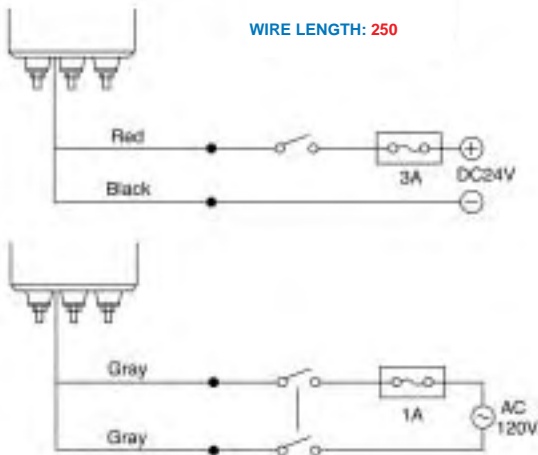
ø100mm (3.94 in)

■ Colored acrylic lenses available in red, yellow, green and blue.

■ Integral rotating parabolic reflector makes the light visible from long distances.

■ Uses automobile bulb for longer life.

■ Contains a spare bulb inside the housing.

■ DC12V and AC240V versions available by special order.

■ Optional mounting brackets available (SZ-30L, SZ-30T).

Dimensions (mm)

Mounting Hole 3- ø5
Wire Entry Hole
ø70
Name plate 120°
120°

ø94
74
146
64
3-M4
ø100
12

Wiring Diagrams

WIRE LENGTH: 250

Red
Black
3A   DC24V

Gray
Gray
1A   AC 120V

Rotating Beacons

ø118mm (4.65 in) Round	DC 12V	DC 24V	AC 100V	AC 120V	AC 240V	Electronic Alarm: 1	IP-23	90 dB/m	Pre-Assembled Pre-Wired

SKH-A

Standard Size

SKH-A	Rotating Beacon
SKHB-A	with Audible Alarm

MODEL	RATED VOLTAGE	BULB	No.	ROTATION PER MINUTE	WEIGHT
SKH-101A	DC12V	12V10W	9		
SKHB-12A	DC12V	12V10W	9		0.4Kg
SKH-102A	DC24V	24V10W	10		
SKHB-24A	DC24V	24V10W	10		
SKH-110A	AC100V	12V5W	11	170	
SKHB-100A	AC100V	12V5W	11		
SKH-112A	AC120V	12V5W	11		0.6Kg
SKHB-120A	AC120V	12V5W	11		
SKH-124A	AC240V	12V5W	11		
SKHB-240A	AC240V	12V5W	11		

SKH-A Series Standard Size

Economic rotating lights, come with one-piece lens and base.

BULB type

CE 12V and 24V only

ø118mm (4.65 in)

■ Colored acrylic lenses available in red, yellow, green and blue.

■ Integral rotating parabolic reflector makes the light visible from long distances.

■ Uses automobile bulb for longer life.

■ SKHB-A has an integral alarm (Hi-pitch tone 90dB/m) that sounds with light operation.

■ 12V, 100V and 240V versions are only available by special order.

■ Optional mounting brackets available (SZ-30L, SZ-30T).

Dimensions (mm)

Wiring Diagrams
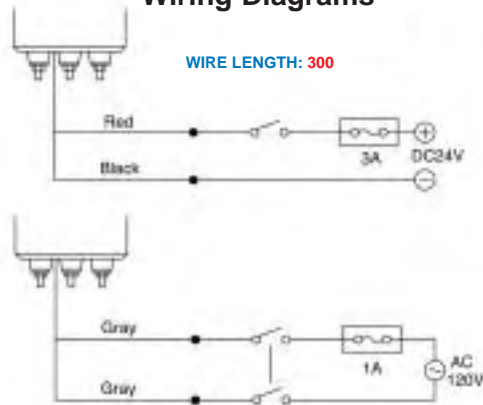
WIRE LENGTH: 300

NEW

SKP-A

Heavy Duty Polycarbonate, medium size with stainless steel clamp

ø138mm (5.43 in)

BULB type

Dimensions (mm)

φ130
119
195
66
16
3-M8
φ138

■ Colors available: red, yellow, green and blue.

■ Dome is made of heat and shock resistant polycarbonate resin.

■ Corrosion-free stainless steel (SUS 304) is used as the dome mounting fixture.

■ DC rotary gear driving system ends uneven rotation due to vibration and assures reliable operation even at low temperature (–30°C).

■ Longer life, higher durability, and energy-saving due to compact motor.

■ DC12V and AC220V versions available by special order.

MODEL	RATED VOLTAGE	CURRENT DRAW	BULB	No.	ROTATION PER MINUTE	WEIGHT
SKP-101A	DC12V	2.6A	12V 35W	56	140	0.8Kg
SKP-102A	DC24V	1.2A	24V 35W	57	140	0.8Kg
SKP-112A	AC120V	0.3A	120V 40W	60	140	1.0Kg
SKP-120A	AC220V	0.13A	220V 30W	63	120	1.0Kg

Mounting Hole
3-φ9
Wire Hole
120°
φ120
Name Plate
120°
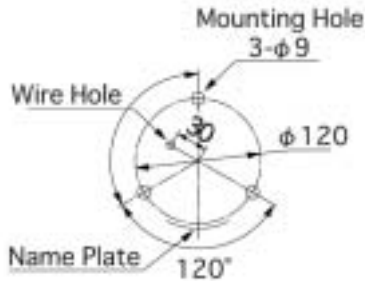
Wire bundle size & length

SKP-101A, 102A : AWG16, 270mm
SKP-112A   : AWG18, 330mm
SKP-120A   : AWG18, 330mm

Rotating Beacons

NEW

SKL-SA *Stainless Steel Body*

ø162mm (6.38 in)

BULB type

Dimensions (mm)

φ150
125
218
76
17
3-M8
φ162

Mounting Hole
3-φ9
120°
Wire Hole
φ140
Name Plate 120°
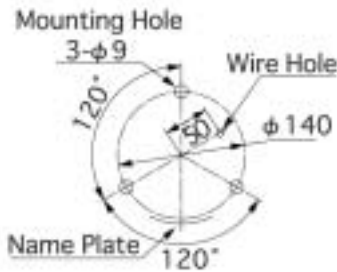
Wire bundle size & length
SKL-101SA, SKL-102SA : AWG16, 230mm
SKL-112SA : AWG18, 260mm
SKL-120SA : AWG18, 260mm

■ Colors available: red, yellow, green and blue.

■ Lenses are made of heat and shock resistant polycarbonate resin.

■ Body is made of perfect corrosion-proof stainless steel (SUS 304).

■ Solid body with superior durability.

■ DC12V and AC220V versions available by special order.

MODEL	RATED VOLTAGE	CURRENT DRAW	BULB	No.	ROTATION PER MINUTE	WEIGHT
SKL-101SA	DC12V	3.0A	12V 35W	56	160	1.4Kg
SKL-102SA	DC24V	1.5A	24V 35W	57		
SKL-112SA	AC120V	0.4A	120V 40W	60	140	1.5Kg
SKL-120SA	AC220V	0.2A	220V 30W	63		

14

SKLB

NEW

Has Alarm Adjustment Switch (externally adjustable)

ø162mm (6.38 in)

BULB type

Dimensions (mm)

φ150
125
218
76
3-M8
φ162
17

- ■ Colors available: red and yellow.
- ■ Lenses are made of heat and shock resistant polycarbonate resin.
- ■ Intermittent buzzer can be turned on and off, and volume can be set to low: 65dB (at 1m), medium: 70dB (at 1m) or high: 80dB (at 1m), with the external switch.
- ■ Buzzer sound: Intermittent "boo-boo" sound.
- ■ AC220V version available by special order.

MODEL	RATED VOLTAGE	CURRENT DRAW	BULB	No.	ROTATION PER MINUTE	WEIGHT
SKLB-112	AC120V	0.4A	120V 40W	60	140	1.8Kg
SKLB-120	AC220V	0.2A	220V 30W	63		

Mounting Hole
3-φ9
120°
Wire Hole
50
φ140
Name Plate 120°
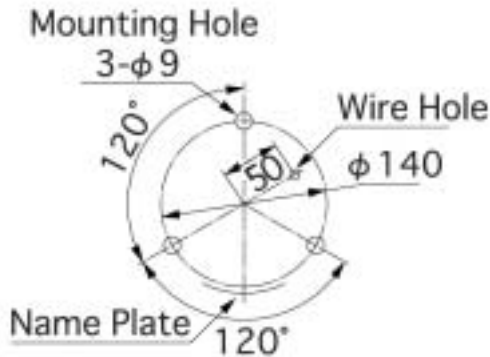
Wire bundle size & length
SKLB-112 : AWG18, 300mm
SKLB-120 : AWG18, 230mm

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KP-A

Large Size Warning Light
Is ideal for extreme temperatures or chemically exposed areas. All plastic and rust free.

ø162mm (6.38 in)

BULB type

- Colors available: red, yellow, green and blue.
- Anti-UV coated body protects from fading, for long term use.
- Stainless steel bolts and nuts protect from rusting.
- Motor operates at extreme low temperatures of -22°F (-30°C).
- Suitable for chemically exposed areas.
- Optional mounting bracket SZ-008 available.
- AC240V version available by special order.
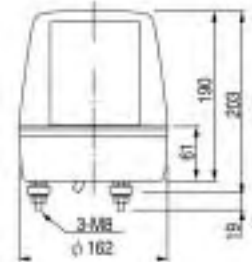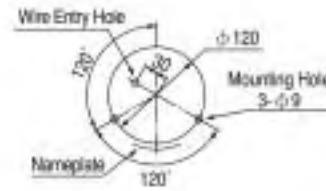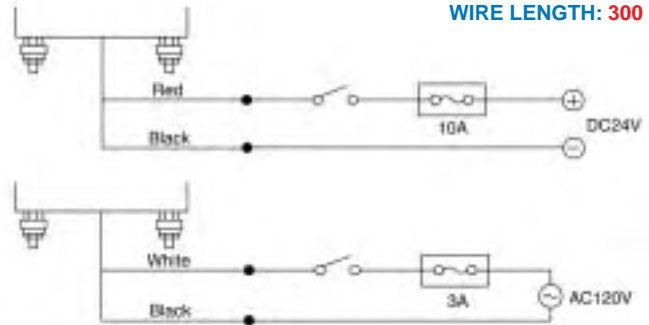
MODEL	RATED VOLTAGE	CURRENT DRAW	BULB	No.	ROTATION PER MINUTE	WEIGHT
KP-24A	DC 24V	1.5A	24V35W	57	160	1.1Kg
KP-120A	AC120V	0.4A	120V40W	60	140	1.2Kg

Dimensions (mm)

Wiring Diagrams

WIRE LENGTH: 300

SKR

Dual Reflector in Acrylic Dome

ø173mm (6.81 in) BULB type

Dimensions (mm)

Mounting Hole
3-φ9
φ140
120°
150
120°
Name Plate   Wire Hole
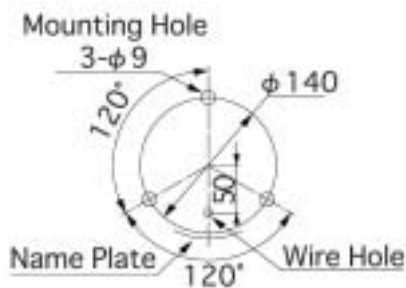
Wire bundle size & length
SKR-212 : AWG18, 250mm
SKR-220 : AWG18, 250mm

- ■ Colors available: red and yellow.
- ■ Dome is made of Acrylic resin with superior weather resistance and light translucence.
- ■ Large, dual-surface reflector emits powerful light.
- ■ Longer life, higher durability, and energy-saving due to compact motor.
- ■ Corrosion-free stainless steel (SUS 304) used for dome mounting fixture.
- ■ AC220V version available by special order.

MODEL	RATED VOLTAGE	CURRENT DRAW	BULB	No.	ROTATION PER MINUTE	WEIGHT
SKR-212	AC120V	0.4A	120V 40W	60	180	1.4Kg
SKR-220	AC220V	0.2A	220V 30W	63		

NEW

KG

ø186mm (7.32 in)

BULB type

CE
12V and 24V only

Large & economical with dual reflector

Dimensions (mm)

ø186
145
205
50
20
3-M8

Mounting Hole
3-ø9
ø140
30°
120°
120°
Wire Hole
Name Plate 120°
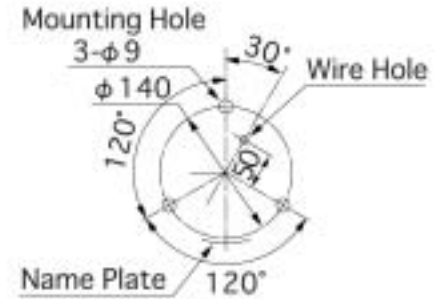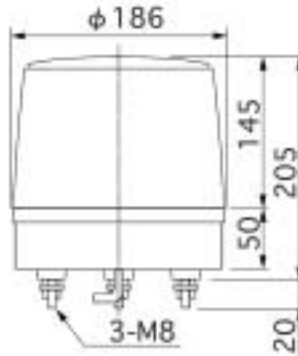
Wire bundle size & length
KG-12/24 : AWG14, 230mm
KG-120 : AWG18, 260mm
KG-200 : AWG18, 260mm

■ Colors available: red and yellow.

■ Lenses made of Polystyrene resin with superior weather resistance and light translucence.

■ Black body and design giving resistance to harsh weather conditions and ultraviolet rays.

■ High durability, robust design and silent operation thanks to unique silicon belt drive system.

■ Longer life and efficient operation with high quality compact motor.

■ Large, dual-surface reflector emits powerful light.

MODEL	RATED VOLTAGE	CURRENT DRAW	BULB	No.	ROTATION PER MINUTE	WEIGHT
KG-12	DC12V	2.7A	12V 35W	56	180	0.7Kg
KG-24	DC24V	1.2A	24V 35W	57	180	0.7Kg
KG-120	AC120V	0.32A	120V 40W	60	180	0.9Kg
KG-200	AC200~240V	0.13A	240V 30W	61	180	0.9Kg

NEW

SKC-A

Large size beacon with dual reflector

Dimensions (mm)

ø187mm (7.36 in)

BULB type

- ■ Colors available: red, yellow, green and blue.
- ■ Lenses are made of Acrylic resin with superior weather resistance and light translucence.
- ■ Large, dual-face reflector emits powerful light.
- ■ Longer life, higher durability, and energy-saving due to unique compact motor.
- ■ Corrosion-free stainless steel (SUS 304) is used as dome mounting fixture.
- ■ Belt-drive rotary mechanism provides extremely quiet and stable rotation.
- ■ AC220V version available by special order.

MODEL	RATED VOLTAGE	CURRENT DRAW	BULB	No.	ROTATION PER MINUTE	WEIGHT
SKC-201A	DC12V	2.6A	12V 35W	56	200	1.7Kg
SKC-202A	DC24V	1.2A	24V 35W	57	200	1.7Kg
SKC-212A	AC120V	0.3A	120V 40W	60	200	1.8Kg
SKC-220A	AC220V	0.13A	220V 30W	63	160	1.8Kg

Wire bundle size & length

SKC-201A, 202A : AWG16, 250mm
SKC-212A : AWG18, 270mm
SKC-220A : AWG18, 270mm

Strobe Beacons

ø100mm (3.94 in) Round	DC 12V	DC 24V	AC 120V	AC 230V	IP-55* IP-23*	Xenon	Pre-Assembled Pre-Wired

KX

Mini-size flashing

With Xenon discharge tube, lamp life is not affected by vibration. Superior visibility.

ø100mm (3.94 in)

Xenon Type Light

c**RU**us

- Colors: red, yellow, green, blue and clear.
- Xenon lamp provides intense flash (night-time visibility 1000m or more).
- *Meets IP-23 (IP-55 with optional rubber gasket SZ-200A).
- Adjustable flash rate: 30~90 flashes per minute.
- 12V and 230V versions available by special order.

MODEL	RATED VOLTAGE	POWER CONSUMPTION	RECOMMENDED FUSE	FLASHES PER MINUTE	WEIGHT
KX-12T	DC12V	8W	125V, 3A	30~90	0.42Kg
KX-24T	DC24V		125V, 1A		
KX-120T	AC120V	4W	250V, 0.5A		0.40Kg

Note: Average power consumption shown. Fuse rating reflects momentary peak current drawn by Xenon lamp.

Dimensions (mm)

Wiring Diagram

FUSE SIZE	
KX-24T	125V, 1A
KX-120T	250V, 0.5A

Black (1)
Black (2)
Green / Yellow
DC24V AC120V
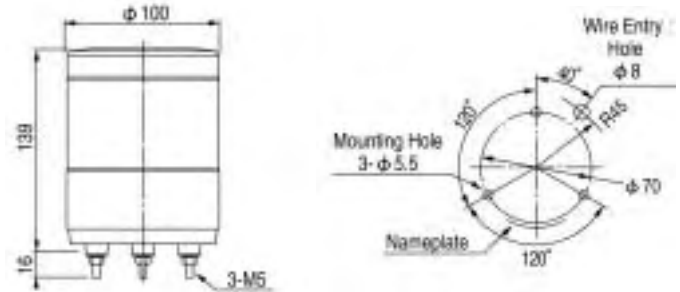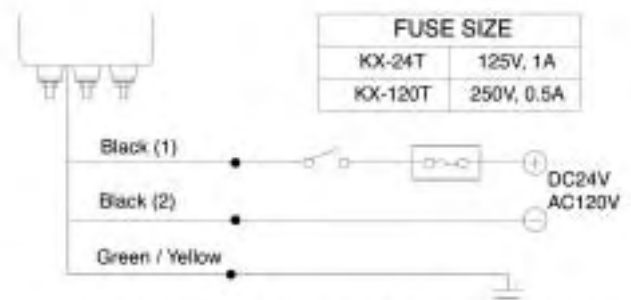
Connect Green/Yellow wire to ground when using AC120V unit.

WIRE LENGTH: 250

20

Large Strobe with ABS body
Good for Marine environments

MODEL	RATED VOLTAGE	CURRENT CONSUMPTION	RECOMMENDED FUSE	FLASHES PER MINUTE	WEIGHT
XP-24	DC24V	0.7A	5A	110	1.3Kg
XP-120	AC120V	0.4A	5A	110	1.2Kg

Note: Average power consumption shown. Fuse rating reflects momentary peak current drawn by Xenon lamp.

Xenon Type Light

ø162mm (6.38 in)

■ Colors available: red, yellow and blue.

■ Large design increases visibility over standard strobe products.

■ Xenon discharge tube provides superior visibility at great distances and is not affected by vibration.

■ Lenses are made of AS resin with superior weather resistance and light translucence.

■ Main body is made of ABS resin with superior resistance to impact and heat.

■ DC12V and AC220V versions available by special order.

Dimensions (mm)

Wiring Diagram

WIRE LENGTH: 300

NEW

ø187mm (7.36 in) Round	DC 12V	DC 24V	AC 120V	AC 220V	Xenon	IP-23	Pre-Assembled Pre-Wired

XM

Large, durable Strobe

MODEL	RATED VOLTAGE	CURRENT DRAW	FLASHES PER MINUTE	WEIGHT
XM-12	DC12V	1.4A	110	2.0Kg
XM-24	DC24V	0.7A		
XM-120	AC120V	0.4A		1.9Kg
XM-220	AC220V	0.2A		

Note: Average power consumption shown. Fuse rating reflects momentary peak current drawn by Xenon lamp.

Xenon Type Light

ø187mm (7.36 in)

- Colors available: red, yellow and blue.
- Dome is made of hard resin with superior resistance to impact.
- Lamp life of Xenon discharge tube is not affected by vibration.
- Newly developed lens offers the brightest light available and improves visibility from all directions.
- Superior visibility. Night-time visibility: 1,000m (3,280 ft.) or more.

Dimensions (mm)

φ166

150

238

88

24

3-M8

φ187

Wire Hole

Name Plate

Mounting Hole 3-φ9

120°

40

φ140

120°

Wire bundle size & length
AWG16, 270mm

LED Beacons

| ø82mm (3.23 in) Round | AC/DC 24V | AC 120V | AC 230V | IP-65* IP-55* IP-23* | Electronic Alarm | 85 dB/m | NPN Open-Collector Compatible | Pre-Assembled Pre-Wired |

PEW PES

Super Mini Size

PEW	Continuous and Flashing
PEW-B	with Audible Alarm
PES	Continuous and Flashing

LED Type Light ℅ᴿᴸ US CE

ø82mm (3.23 in)

- Colors available: red, yellow, green and blue.
- *IP Rating: PEW meets IP-65,
  PES meets IP-23 (IP-55 w/gasket SZ-210).
- Flashing function available in three different flash rates: 60 fpm, 120 fpm, 180 fpm.
- Dome is visible from top and sides.
- PEW-B features 85dB/m adjustable audible alarm with volume control.
- Low power consumption.
- PES: Optional mounting brackets available (SZ-30L, SZ-30T).
- AC230V version available by special order.

MODEL	RATED VOLTAGE	FREQUENCY OF FLASH	SOUND LEVEL (ALARM TYPE ONLY)
PEW-24	AC/DC24V		
PEW-24B	AC/DC24V		
PEW-120	AC120V		
PEW-120B	AC120V	Approx. 60/120/180 times/minute	From 70dB to 85dB (at 1m)
PES-24	AC/DC24V		
PES-24B	AC/DC24V		
PES-120	AC120V		
PES-120B	AC120V		

LED Dome Indicator

Dome shape provides increased visibility and the LEDs provide years of maintenance-free operation.

Dimensions (mm)

PEW

PES
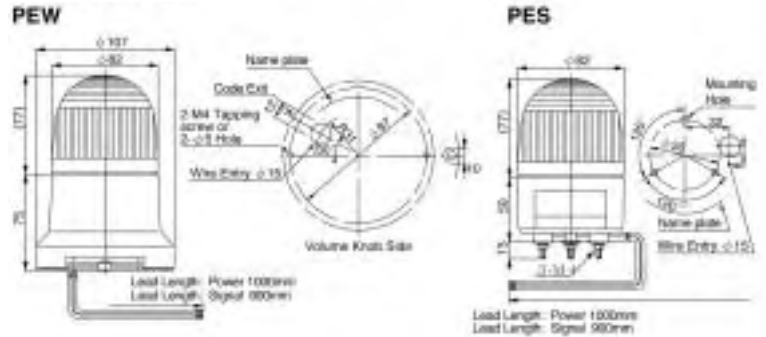
Wiring Diagram

All models have the same wiring scheme.

Light	Red
Flash	Brown
Buzzer	Sky-blue
Common	Yellow
Power	Gray
Power	Black

*Skyblue line exists on buzzer type only.
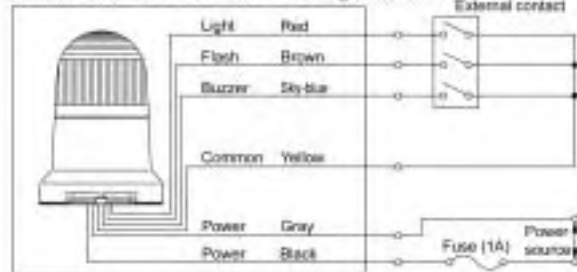
WIRE LENGTH:
PEW: 850
PES: 800

PES / PEW		Module				Alarm (PEW)	Standby	Inrush
		Red	Amber	Green	Blue			
Device Current*	AC/DC24V	55mA	55mA	65mA	65mA	40mA		
Power Consumption*	AC/DC24V	1.2W	1.2W	1.5W	1.5W	1.0W		2.5A
	AC120V	3.0W	3.0W	3.5W	3.5W	2.7W	1.4W	1.0A

*Typical, not guaranteed

PEW **PES**

SB-06

NEW

Solar Battery Powered LED Beacon

High level of brightness with long battery life.

- Operates by Solar Battery.
- Ideal for applications that do not have power sources available.
- LED simulated rotation.
- Color available: red.
- Dome lens is made of heavy duty acrylic.
- Housing is made of stainless steel SUS304.
- Visible from approx. 650 yards away during night time (with clear conditions).
- Model SB-06P operates for approx. 11 days, Model SB-06A operates for approx. 9 days (note: only during night time operation).
- Operation by an external contact is possible.

ø162mm Dome (6.38 in)

Dimensions (mm)

Bird Protector, Stainless Steel
Support, Stainless Steel
Pole, Stainless Steel
120
(427.5)
45°
ø162
(60)
210
33
Body & hook, Stainless Steel
(85.5) 123
Pole Base, aluminum
Mounting screws & nuts, Stainless Steel

Mounting Hole
3-ø9
ø140
120°
Front Side
Pole
120°
Name Plate

Solar Battery
132
237
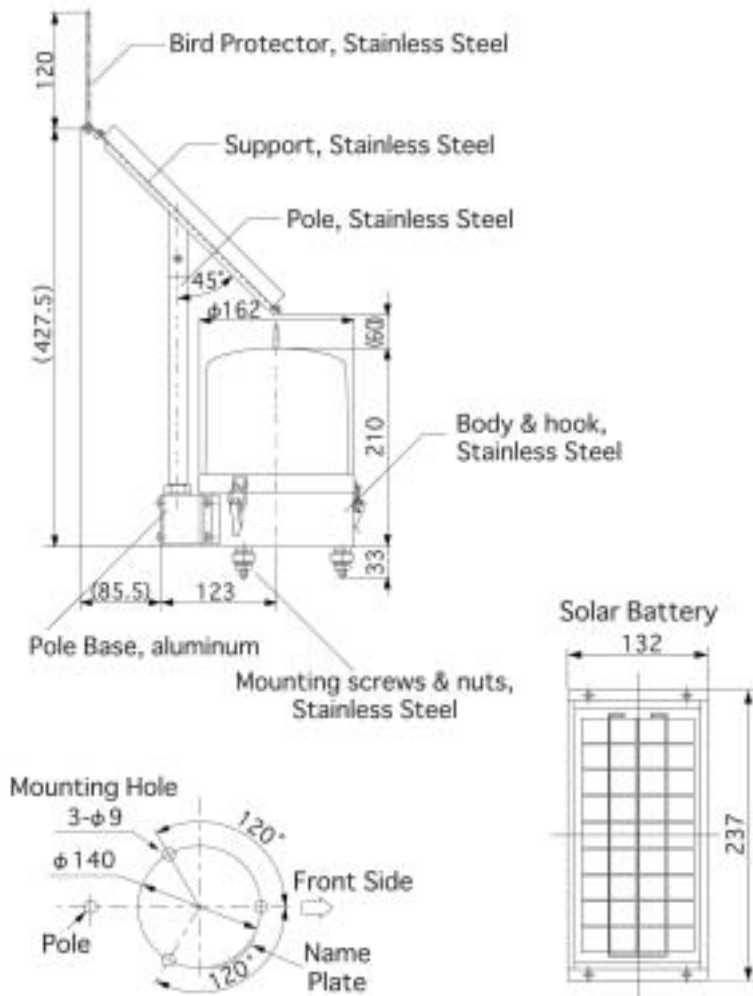
Specifications

MODEL		SB-06A	SB-06P
Solar Battery	Max. output	2.5W	
	Max. output current	0.28A	
	Max. output voltage	8.5V	
Inside Battery	Nominal voltage	6V	
	Nominal current	5.0Ah	4.0Ah
LED		Red LED, 24 pcs. , Flashing speed 100/minute	
Continuous operation without recharge at 77°F		approx. 11 days	approx. 9 days
Continuous operation without recharge at 77°F ★		approx. 6 days ★	approx. 5 days ★
Operating temperature		−22°F to 140°F	5°F to 140°F
Weight		3.8 kg	3.5 kg

★ With 24 hours/day continuous operation by an external contact.
Continuous operation without recharge is subject to ambient condition.

ø71mm (2.8 in) | IP-65F | Pre-Assembled Pre-Wired

CLE

Machine Vision Light

| CLE-24 | Standard Light |
| CLE-24N | Narrow Light |

Specifications

MODEL	CLE-24	CLE-24N
Spot Size	Wide Spot	Narrow Spot
Rated Voltage	DC24V (Either Polarity)	
Power Consumption	3W	3W
Light Source	24 LEDs, White, High Luminosity	
Luminous Intensity @ Optical Center	20 Candela	130 Candela
Installation	Any Direction	
Operating Temp. Range	-24℃ to +60℃ (No Condensation)	
Protection Rating	IP65f	
Vibration	19.6 m/sec² (2G)	
Mass	0.3 kg	
Glass Surface	Frosted	Clear
Recommended Fuse	1A, 125V	

The *CLE Series*
Machine Vision Light
Uses LEDs for illumination

LED Type Light   CE

CLE-24   **CLE-24N**

ø71mm (2.8 in)

■ Designed for the machine tool, process, inspection, and image processing industries.

■ Cold Light System using ultra-bright LEDs.

■ Long life and high reliability even in harsh environments.

■ Low power consumption (3W).

■ Rust, corrosion and oil-proof anodized aluminum body.

■ Lens made of reinforced shock resistant glass for lasting lens transparency.

■ Lens glass is frosted for CLE-24, and is clear for CLE-24N.

■ Meets IP-65f.

■ DC24V only.

Dimensions (mm)

(82)

60

(60)

35

ø71

20   ø7

76.2

POWER CABLE LENGTH: 1360

50±5

1400

CLE

CLE-N

B
A
B

B
A
B

500 mm

500 mm

500 mm

CLE
REFERENCE IRRADIATION PATTERN
(cd = Luminous Intensity in Candela)

B   A   B

CLE-N
REFERENCE IRRADIATION PATTERN
(cd = Luminous Intensity in Candela)

B   A   B

25

ø50mm (2 in) Round	DC 24V	IP-65	85 dB/m	Electronic Alarms: 2	Open-Collector Compatible	Modular

LU5

NEW
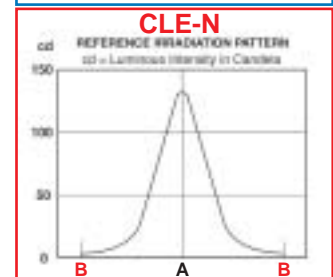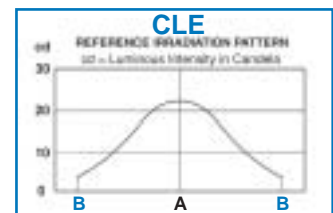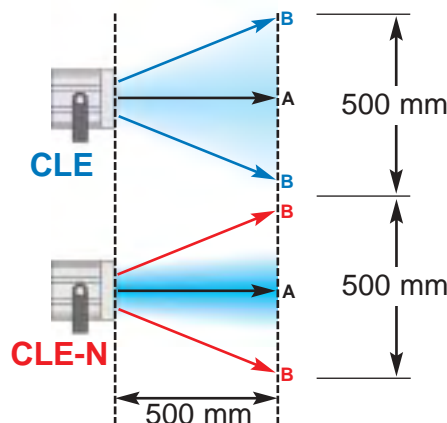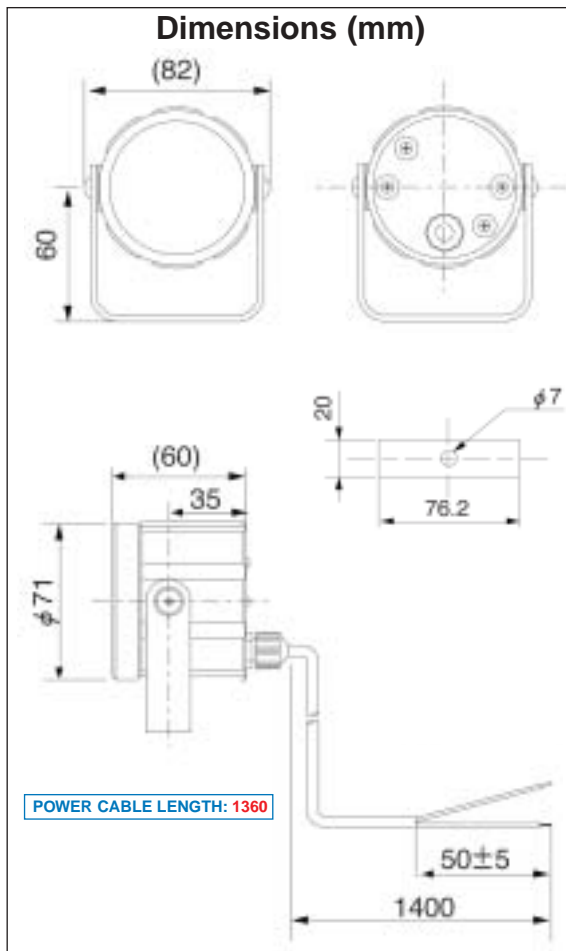
LU5 Series - *Medium size*
Modular System Indicating Light

Perfect for OEMs that offer different multi-stack versions in their machine design.

Direct Mount

LU5 — Continuous Light

LU5-FB — Continuous and Flashing Light with Audible Alarms

LED Type Light   CE   c(UL)us

ø50mm (2 in)

■ Colors available: red, yellow, green, blue and clear.

■ No tools required to assemble.

■ Easy wiring with spring loaded terminal block.

■ NPN or PNP open collector compatible.

■ FB type: Two selectable single-tone alarms, one intermittent and one continuous, with adjustable volume to 85dB (at 1m), and light has 60 flashes per minute.

■ Long lasting, bright LEDs.

■ Once mounted on a machine, the tower can be easily removed from the terminal base for shipping, and re-installed without tools.

} *Terminal Base*

Assembly Required

How to Order:

Base Module (including cap)

Model	Rated Voltage	Alarm / Flash
LU5-02	DC24V	—
LU5-02FB	DC24V	2 Alarms / Flash

LED Module

Model	Color
LU5-E-R	Red
LU5-E-Y	Yellow
LU5-E-G	Green
LU5-E-B	Blue
LU5-E-C	Clear

Dimensions (mm)

※Height (mm)
1 Light : 211
2 Light : 252
3 Light : 293
4 Light : 334
5 Light : 375
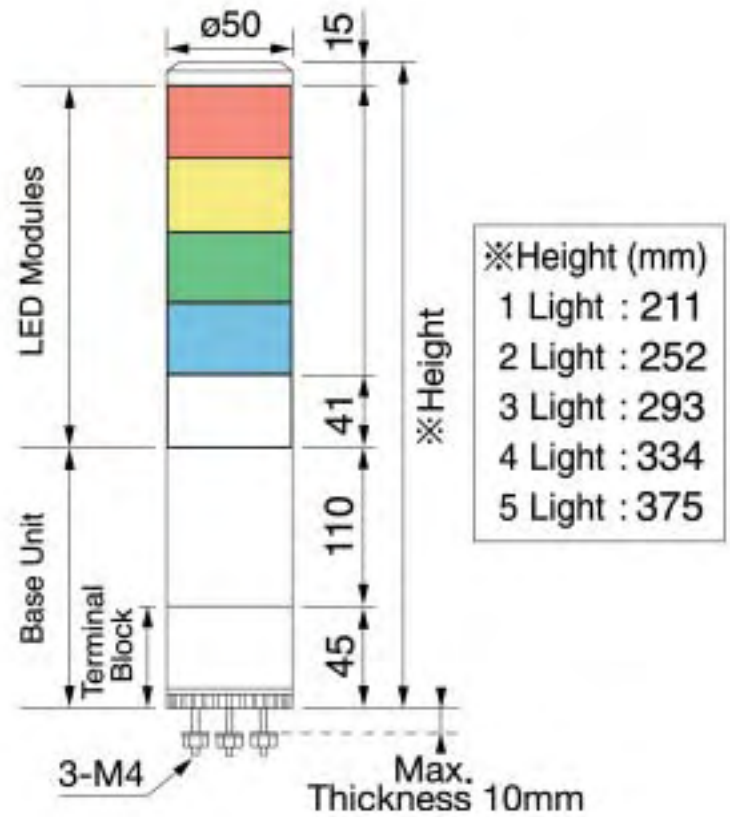
Terminal Diagram

Terminal Wiring Chart

Terminal Number	Corresponding Unit or Operation	Refer to Wiring Diagrams Page 57 Diagrams 1 & 2
CN2-1	Red LED Unit	Light Wire 1
CN2-2	Yellow LED Unit	Light Wire 2
CN2-3	Green LED Unit	Light Wire 3
CN2-4	Blue LED Unit	Light Wire 4
CN2-5	Clear LED Unit	Light Wire 5
CN2-6	Continuous Alarm	Alarm 1
CN2-7	Intermittent Alarm	Alarm 2
CN2-8	Power Supply	Power 1
CN2-9	Flashing Common	Flashing Common
CN2-10	Power Supply	Power 2

Wire Sizes: **CN2-(1-10):** AWG 22-18
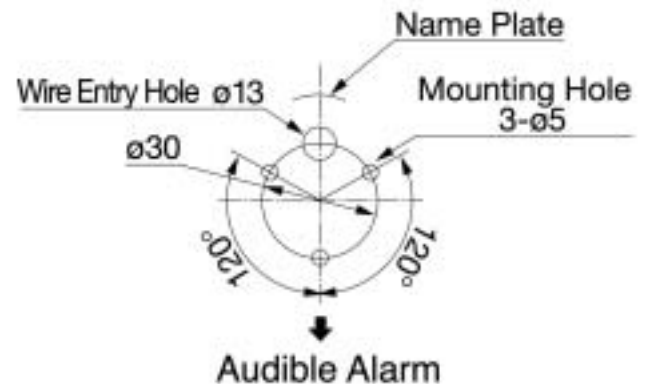
LU5 Series		Module					Alarms	
		Red	Amber	Green	Blue	Clear	Steady	Inrush
Device Current*	DC24V	44mA	44mA	17mA	17mA	17mA	50/24mA	100mA
Power Consumption*	DC24V	1.06W	1.06W	0.41W	0.41W	0.41W	1.2/0.58W	

*Typical, not guaranteed

ø70mm (2.76 in) Round	DC 24V	AC 90~250V	IP-65	NEMA 4,4X,13	90 dB/m	Electronic Alarms: 2	Open-Collector Compatible	Modular

LU7

Direct Mount

LU7   Continuous Light

LU7-FB   Continuous and Flashing Light with Audible Alarms

ø70mm (2.76 in)

LU7 Series - *Large size*
Modular System Indicating Light

Perfect for OEMs that offer different multi-stack versions in their machine design.

LED Type Light   CE   c(UL)us

■ Easy wiring with spring loaded terminal block.

■ NPN or PNP open collector compatible (24V type), and NPN open collector compatible (90-250V type).

■ Available in DC24V and Free-Voltage, AC90 to 250V.

■ FB type: Two selectable single-tone alarms, one intermittent and one continuous, with adjustable volume to 90dB (at 1m), and light has 60 flashes per minute.

■ Pole mount options available: SZ-50L, SZ-50T (see pages 58-59).

■ Long lasting, bright LEDs.

■ LED strobe module available.

■ Once mounted on a machine, the tower can easily be removed from the terminal base for shipping, and re-installed without tools.
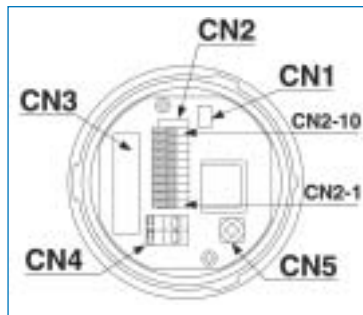
} Terminal Base

Assembly Required

PATLITE

How to Order:

Base Module (including cap)

Model	Rated Voltage	Alarm / Flash
LU7-02	DC24V	—
LU7-02FB	DC24V	2 Alarms / Flash
LU7-M2	AC90~250V	—
LU7-M2FB	AC90~250V	2 Alarms / Flash

LED Module

Model	Color
LU7-E-R	Red
LU7-E-Y	Yellow
LU7-E-G	Green
LU7-E-B	Blue
LU7-E-C	Clear
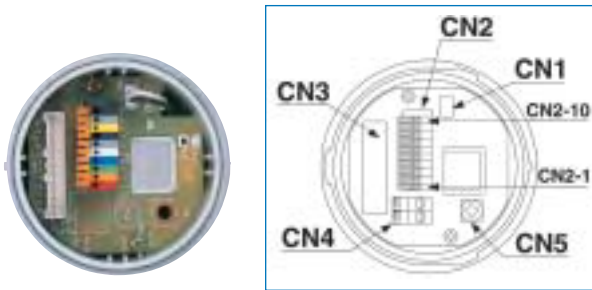
Dimensions (mm)

※Height (mm)
1 Light : 211
2 Light : 252
3 Light : 293
4 Light : 334
5 Light : 375
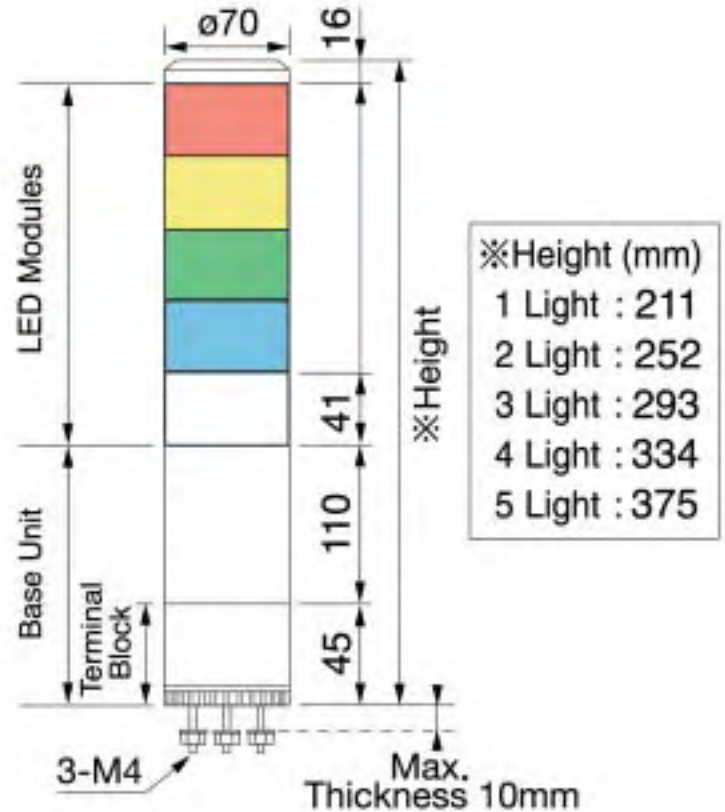
Terminal Diagram

Terminal Wiring Chart

Terminal Number	Corresponding Unit or Operation	Ref: Wiring Diagrams (Page 57)	
		Diagrams 1 & 2	Diagram 3
CN2-1	Red LED Unit	Light Wire 1	Light Wire 1
CN2-2	Yellow LED Unit	Light Wire 2	Light Wire 2
CN2-3	Green LED Unit	Light Wire 3	Light Wire 3
CN2-4	Blue LED Unit	Light Wire 4	Light Wire 4
CN2-5	Clear LED Unit	Light Wire 5	Light Wire 5
CN2-6	Continuous Alarm	Alarm 1	Alarm 1
CN2-7	Intermittent Alarm	Alarm 2	Alarm 2
CN2-8	Power Supply	Power 1	Continuous Common
CN2-9	Flashing Common	Flashing Common	Flashing Common
CN2-10	Power Supply	Power 2	N / A
CN4-1	High Voltage Supply	N / A	Power 1
CN4-2	High Voltage Supply	N / A	Power 2
CN5	Earth Ground	N / A	Earth Ground

Wire Sizes: CN2-(1-10): AWG 26-20, UL1007, UL1430
CN4-1, CN4-2: AWG 18-16, UL1015
CN5: AWG 18-14, UL1015

LU7 Series		Module					Alarms		Standby
		Red	Amber	Green	Blue	Clear	Steady	Inrush	
Device Current*	DC24V	52mA	52mA	42mA	42mA	42mA	50/24mA	100mA	
Power Consumption*	DC24V	1.25W	1.25W	1.0W	1.0W	1.0W	1.2/0.58W		
	AC90V	10W Max. (5 Colors + Alarm)					1.8/1.3W		0.4W
	AC250V								0.9W

*Typical, not guaranteed

Tower Lights

WE

WE Series *Wall mounted Indicator*
Ultra-Slim Signal Lights that offer seamless integration with equipment

Wall Mount

WE-T	**Continuous Light**
WE-TFB	**Continuous and Flashing Light with Audible Alarms**
WEP-T	**Continuous Light**
WEP-TFB	**Continuous and Flashing Light with Audible Alarms**

37.5mm Profile (1.5 in)

WE
Chrome Cover

WEP
Cream Color Cover

LED Type Light   CE   c **UL** US

- Ultra-slim profile.
- Light colors are available in red, yellow, green, blue and clear.
- Cover is available in 2 finishes: chrome plate and cream color.
- UL component recognized, CE compliant and meets IP-65 standards (IP-54 for "FB" types).
- "FB" versions feature a flashing circuit (60 flashes/minute) and 2 selectable single-tone, intermittent alarms with volume 90dB (at 1m).
- Available in 3, 4 or 5 light styles.
- Mounting: Vertical or Horizontal positions.
- NPN and PNP open collector transistor compatible.
- DeviceNet and As-i versions are available.
- Has LED lights for long life, low power consumption and low maintenance.

Conventional Design   Model WE/WEP
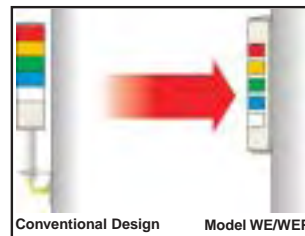
IP-65 construction is safe for wash-down environments.

Available with DeviceNet or As-i

STYLE	MODEL	RATED VOLTAGE
3 LIGHT	WE-302T-RYG	AC/DC24V
	WE-302T-RYB	
	WE-302T-RYC	
	WEP-302T-RYG	AC/DC24V
	WEP-302T-RYB	
	WEP-302T-RYC	
	WE-302TFB-RYG	AC/DC24V
	WE-302TFB-RYB	
	WE-302TFB-RYC	
	WEP-302TFB-RYG	AC/DC24V
	WEP-302TFB-RYB	
	WEP-302TFB-RYC	
4 LIGHT	WE-402T-RYGB	AC/DC24V
	WE-402T-RYGC	
	WE-402T-CYGB	
	WEP-402T-RYGB	AC/DC24V
	WEP-402T-RYGC	
	WEP-402T-CYGB	
	WE-402TFB-RYGB	AC/DC24V
	WE-402TFB-RYGC	
	WE-402TFB-CYGB	
	WEP-402TFB-RYGB	AC/DC24V
	WEP-402TFB-RYGC	
	WEP-402TFB-CYGB	
5 LIGHT	WE-502T-RYGBC	AC/DC24V
	WEP-502T-RYGBC	
	WE-502TFB-RYGBC	AC/DC24V
	WEP-502TFB-RYGBC	

Dimensions (mm)

	A	B
3-stack:	176	150
4-stack:	206	180
5-stack:	236	210

90

37.5

20

30
30
30
30

A

**WIRE LENGTH:
WE/WEP: 1000**

Bracket Foot Print

74

8.5

ø12
Wire Entry Hole

B

4 – ø4.2
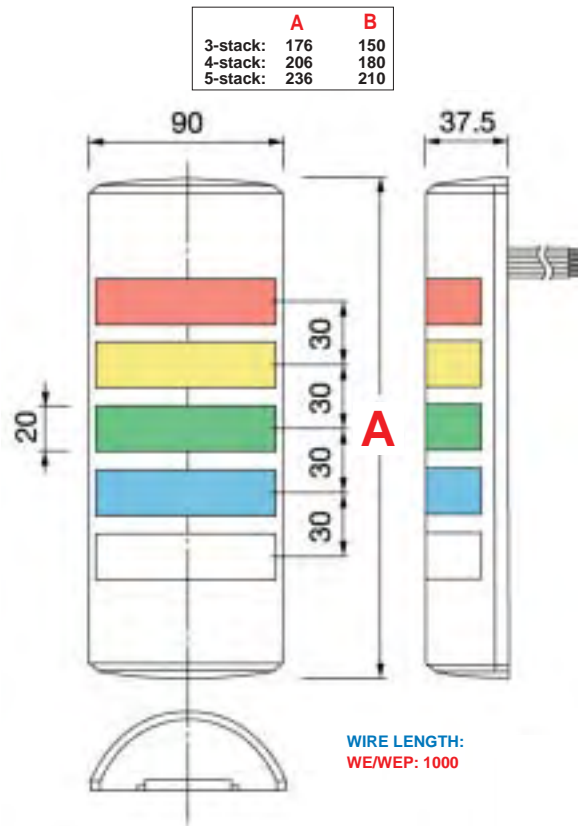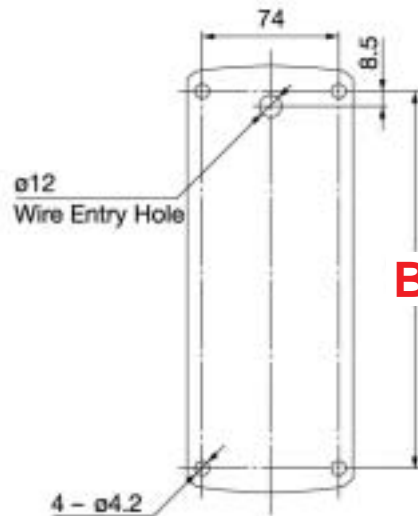
How to Order (Example)

WEP - 5 02TFB - RYGBC

Cover Type:
WE: Chrome Cover
WEP: Cream Color Cover

Light Style:
3: 3 Light
4: 4 Light
5: 5 Light

Rated Voltage:
02: AC/DC24V

Type:
Flashing/Buzzer or Continuous (no FB shown)

Color:
R: Red
Y: Yellow
G: Green
B: Blue
C: Clear
(Top to Bottom)

LU7 Series		Module					Alarms		Standby
		Red	Amber	Green	Blue	Clear	Steady	Inrush	
Device Current*	DC24V	52mA	52mA	42mA	42mA	42mA	90/24mA	100mA	
Power Consumption*	DC24V	1.25W	1.25W	1.0W	1.0W	1.0W	1.2/0.58W		
	AC90V	10W Max. (5 Colors + Alarm)					1.8/1.3W		0.4W
	AC250V								0.3W

*Typical, not guaranteed

Profile View-Actual Size

Tower Lights

| 80mm (3.15 in) Profile | AC/DC 24V | AC 90~250V | IP-65* | 90 dB/m | Electronic Alarms: 2 | Open-Collector 24V | Pre-Assembled Pre-Wired |

WME

WME Series *Wall Mounted Indicator*

Solves your space problems! Designed for easy mounting to save you both time and money.

LED Type

WME-A — Continuous Light

WME-AFB — Continuous and Flashing Light with Audible Alarms

LED Type Light

CE   c**RU**us

80mm Profile (3.15 in)

■ Light colors are available in red, yellow, green, blue and clear.

■ UL component recognized, CE compliant and meets IP-65 standards ("FB" version, upright only).

■ "FB" version features a flashing circuit (60 flashes/minute) and 2 selectable single-tone, intermittent alarms with volume 90dB (at 1m).

■ Mounting: Vertical or Horizontal positions to either front panel or from ceilings.

■ NPN and PNP open collector transistor compatible (DC24V only).

■ Has LED lights for long life, low power consumption and low maintenance.

■ 1 stack versions available only by special order.

Conventional Design   **Model WME**
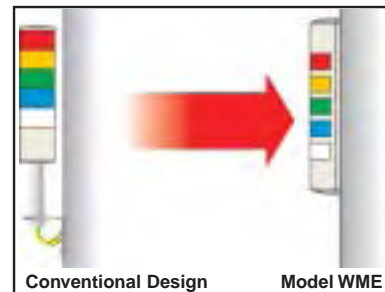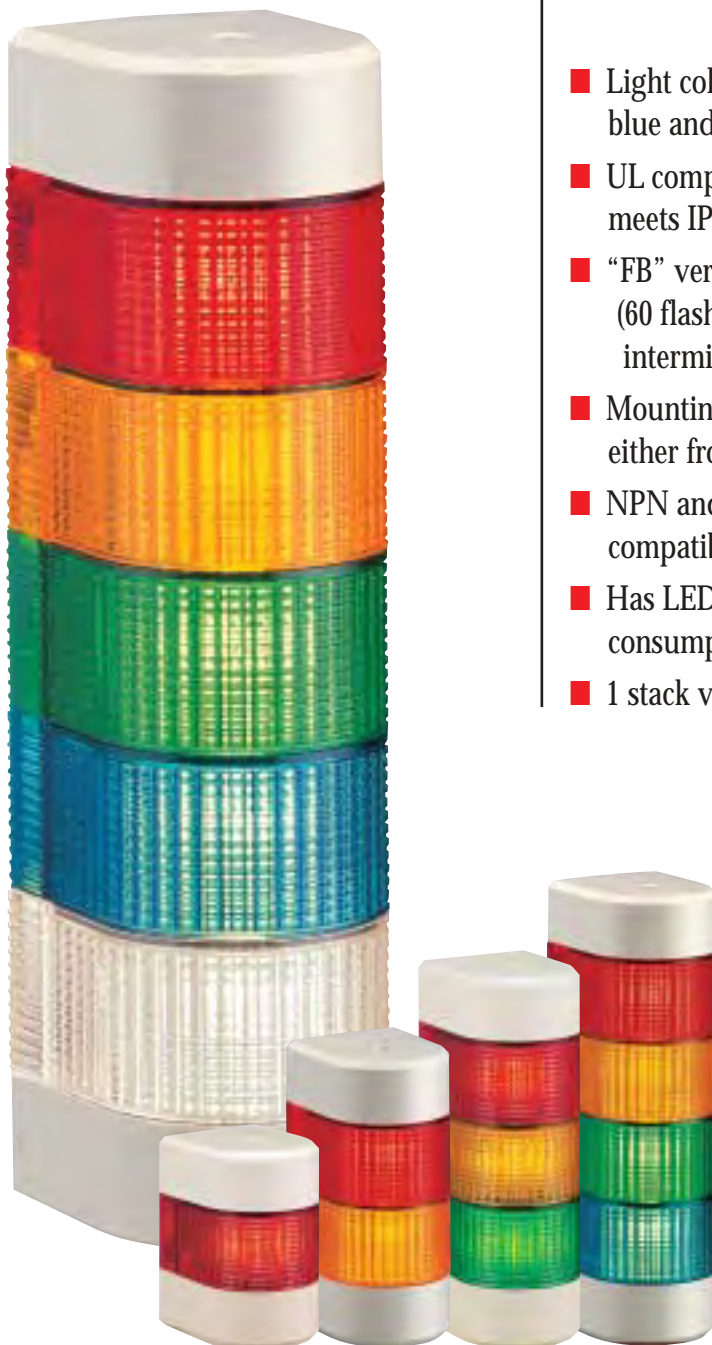
Dimensions (mm)

STYLE	MODEL	RATED VOLTAGE
1 LIGHT	WME-102A	AC/DC24V
	WME-102AFB	
	WME-1M2A	AC90~250V
	WME-1M2AFB	
2 LIGHT	WME-202A	AC/DC24V
	WME-202AFB	
	WME-2M2A	AC90~250V
	WME-2M2AFB	
3 LIGHT	WME-302A	AC/DC24V
	WME-302AFB	
	WME-3M2A	AC90~250V
	WME-3M2AFB	
4 LIGHT	WME-402A	AC/DC24V
	WME-402AFB	
	WME-4M2A	AC90~250V
	WME-4M2AFB	
5 LIGHT	WME-502A	AC/DC24V
	WME-502AFB	
	WME-5M2A	AC90~250V
	WME-5M2AFB	

※ Height
1 Light : 106
2 Light : 147
3 Light : 188
4 Light : 229
5 Light : 270
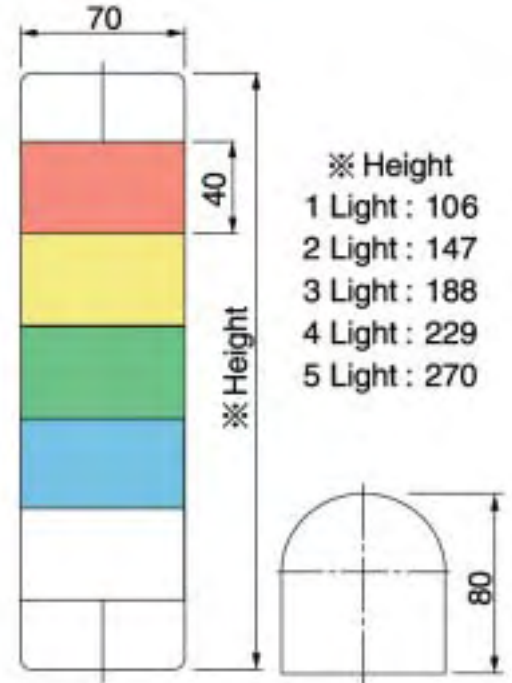
How to Order (Example)

WME - 5 02AFB - RYGBC

Type:
WME

Light Style:
1: 1 Light
2: 2 Light
3: 3 Light
4: 4 Light
5: 5 Light

Rated Voltage:
02: AC/DC24V
M2: AC90~250V

Type:
Flashing/Buzzer or Continuous (no FB shown)

Color:
R: Red
Y: Yellow
G:Green
B: Blue
C: Clear
(Top to Bottom)

Bracket Mounting Hole φ4

Wire Entry Hole φ16

Above dimensions are bracket foot print.
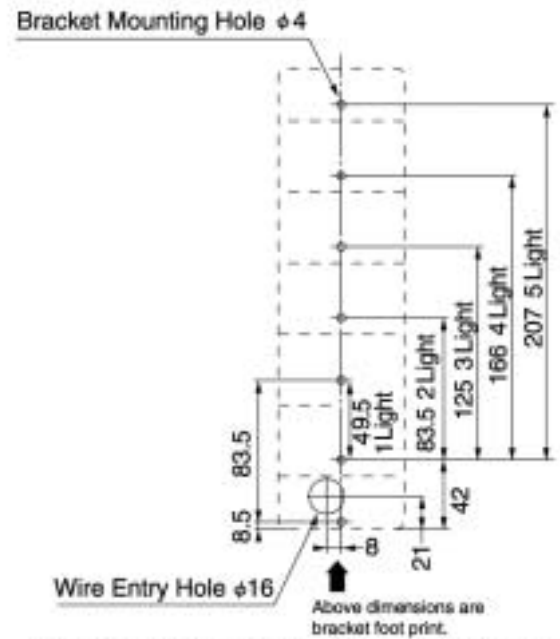
Lead Wire Length: Approx 1,000mm from Entry Hole

WME-A Series		Module					Alarms		Standby
		Red	Amber	Green	Blue	Clear	Steady	Inrush	
Device Current*	DC24V	23mA	27mA	18mA	39mA	39mA	40mA	250mA	
Power Consumption*	AC/DC24V	0.7W	0.7W	0.6W	0.6W	0.6W	1.0W	6.0W	
	AC120V	1.1W	1.1W	1.1W	1.5W	1.0W	1.4W		0.6W
	AC240V	1.4W	1.4W	1.4W	2.0W	2.0W	1.8W		0.9W

*Typical, not guaranteed

Tower Lights

80mm (3.15 in) Profile	AC/DC 24V	AC 120V	AC 230V	IP-65*	80 dB/m	Electronic Alarm: 1	Open-Collector 24V	Pre-Assembled Pre-Wired

WM

WM Series **Wall Mounted Indicator**
Solves your space problems! Designed for easy mounting to save you both time and money.

Bulb Type

WM-T — Continuous Light

WM-TFB — Continuous and Flashing Light with Audible Alarm

80mm Profile (3.15 in)

■ Light colors are available in red, yellow, green, blue and clear.

■ UL component recognized, CE compliant and meets IP-65 standards ("FB" version, upright only).

■ "FB" versions feature a flashing circuit (60 flashes/minute) and 1 alarm with an alternating 2-tone and volume 80dB (at 1m).

■ Mounting: Vertical or Horizontal positions to either front panel or from ceilings.

■ NPN and PNP open collector transistor compatible (DC24V only).

■ AC230V version available by special order.

Conventional Design — **Model WM**

Dimensions (mm)

STYLE	MODEL	RATED VOLTAGE	BULB	No.
2 LIGHT	WM-202T	AC/DC24V	28V 11W	39
	WM-202TFB			
	WM-212T	AC120V	140V 13W	49
	WM-212TFB			
3 LIGHT	WM-302T	AC/DC24V	28V 11W	39
	WM-302TFB			
	WM-312T	AC120V	140V 13W	49
	WM-312TFB			
4 LIGHT	WM-402T	AC/DC24V	28V 11W	39
	WM-402TFB			
	WM-412T	AC120V	140V 13W	49
	WM-412TFB			
5 LIGHT	WM-502T	AC/DC24V	28V 11W	39
	WM-502TFB			
	WM-512T	AC120V	140V 13W	49
	WM-512TFB			

70
40
※ Height
80

※ Height
2 Light : 147
3 Light : 188
4 Light : 229
5 Light : 270

How to Order (Example)

WM - 5 02TFB - RYGBC

Model: WM

Light Style:
2: 2 Light
3: 3 Light
4: 4 Light
5: 5 Light

Rated Voltage:
02: AC/DC24V
12: AC120V

Type:
Flashing/Buzzer
or Continuous
(no FB shown)

Color:
R: Red
Y: Yellow
G:Green
B: Blue
C: Clear
(Top to Bottom)

Bracket Mounting Hole φ4

83.5
83.5 2Light
125 3Light
166 4 Light
207 5 Light
42
8.5
8
21

Wire Entry Hole φ16

Above dimensions are bracket foot print.

Lead Wire Length: Approx 1,000mm from Entry Hole

WM Series		Bulb	Color / Position					Alarm
		T20 / BA15D	Red	Amber	Green	Blue	Clear	
Current / Power Consumption*	AC/DC24V	24V / 11W	0.46A	0.46A	0.46A	0.46A	0.46A	0.02A
			11W	11W	11W	11W	11W	0.5W
	AC120V	140V / 13W	0.1A	0.1A	0.1A	0.1A	0.1A	0.025A
			10W	10W	10W	10W	10W	2.0W
	AC230-240V	250V / 1W	0.04A	0.04A	0.04A	0.04A	0.04A	0.025A
			8W	8W	8W	8W	8W	4.0W

*Typical, not guaranteed

Tower Lights

| ⊠82mm (3.23 in) Square | DC 12V | DC 24V | AC 120V | AC 220V | IP-23 | Electronic Alarm: 1 | 85 dB/m | Pre-Assembled Pre-Wired |

KJS
KJSB

Rotating Cube Tower

Mirrored parabolic reflector increases visibility on this slim rotating beacon.

Slim Size

KJS	Rotating Beacon
KJSB	with Audible Alarm

STYLE	MODEL	RATED VOLTAGE	WATTAGE	BULB	No.	WEIGHT
1 LIGHT	KJS-102 KJSB-102	DC24V	12W	24V 10W	10	0.5Kg
	KJS-112 KJSB-112	AC120V	8W	12V 5W	11	0.7Kg
2 LIGHT	KJS-202 KJSB-202	DC24V	24W	24V 10W	10	0.8Kg
	KJS-212 KJSB-212	AC120V	16W	12V 5W	11	1.2Kg
3 LIGHT	KJS-302 KJSB-302	DC24V	35W	24V 10W	10	1.2Kg
	KJS-312 KJSB-312	AC120V	23W	12V 5W	11	1.6Kg

How to Order (Example)

KJS B- 3 02 - RYG

Model:

Type: Buzzer version if B shown

Light Style:
1: 1 Light
2: 2 Light
3: 3 Light

Rated Voltage:
02: DC24V
12: AC120V

Color:
R: Red
Y: Yellow
G: Green
B: Blue
(Top to Bottom)

⊠82mm (3.23 in)

BULB type

- Colors available: red, yellow, green and blue.
- Integral rotating parabolic reflector makes the light visible from a distance. KJS/KJSB rotates 160 times/minute.
- Lenses can be arranged in any combination desired.
- Each light can be operated separately.
- KJSB has an integral alarm that sounds intermittently.
- KJS/KJSB: Optional mounting brackets available: (SZ-30L, SZ-30T) & SZ-007.
- DC12V and AC220V versions available by special order.

Dimensions (mm)

□82

3 Light 339
2 Light 256
1 Light 173
17

Wire Ø9

5
Wire Entry Hole Ø12
Mounting Hole 3 Ø5
120°
5
Name plate
Ø70
120°

Wiring Diagrams

		Outer Contact
3	Red	
2	Yellow	
1	Blue	
Alarm	Gray	
Alarm	Gray	
Alarm	Gray	
RETURN	Brown	
	White	⊕ POWER
	Black	⊖ SUPPLY (DC)

(Note) Gray lead wires do not exist in KJS type.

WIRE LENGTH: 250

Open collector NPN transistor

Red, Yellow, Blue, Gray

RETURN Brown
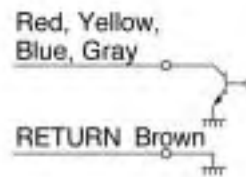
Transistor Capacity (NPN)	
Model	KJS (KJSB)
Current Capacity	Ic≥50mA (Ic≥400mA)
Withstand Voltage	Vc≥45V

KJS / KJSB Series		Bulb	Color / Position				Alarm
		G18 / BA15S	Red	Amber	Green	Blue	
Power Consumption*	DC12V	12V / 10W	5W	5W	5W	5W	0.3W
	DC24V	24V / 10W	11.5W	11.5W	11.5W	11.5W	1.0W
	AC120V	12V / 5W	7.5W	7.5W	7.5W	7.5W	0.5W
	AC220V	12V / 5W	7.5W	7.5W	7.5W	7.5W	0.5W

*Typical, not guaranteed

Tower Lights

KJ KJB

Rotating Cube Tower

Larger beacon uses mirrored parabolic reflector for increased visibility.

Standard Size

KJ	Rotating Beacon
KJB	with Audible Alarm

STYLE	MODEL	RATED VOLTAGE	WATTAGE	BULB	No.	WEIGHT
1 LIGHT	KJ-102 / KJB-102	DC24V	12W	24V 10W	10	1.0Kg
1 LIGHT	KJ-112 / KJB-112	AC120V	7W	12V 5W	11	1.2Kg
2 LIGHT	KJ-202 / KJB-202	DC24V	23W	24V 10W	10	1.5Kg
2 LIGHT	KJ-212 / KJB-212	AC120V	13W	12V 5W	11	2.0Kg
3 LIGHT	KJ-302 / KJB-302	DC24V	34W	24V 10W	10	2.0Kg
3 LIGHT	KJ-312 / KJB-312	AC120V	18W	12V 5W	11	2.5Kg
4 LIGHT	KJ-402 / KJB-402	DC24V	48W	24V 10W	10	2.5Kg
4 LIGHT	KJ-412 / KJB-412	AC120V	26W	12V 5W	11	3.0Kg

How to Order (Example)

KJ B- 4 02 - RYGB

Model:

Type: Buzzer version if B shown

Light Style:
1: 1 Light
2: 2 Light
3: 3 Light
4: 4 Light

Rated Voltage:
02: DC24V
12: AC120V

Color:
R: Red
Y: Yellow
G: Green
B: Blue
(Top to Bottom)

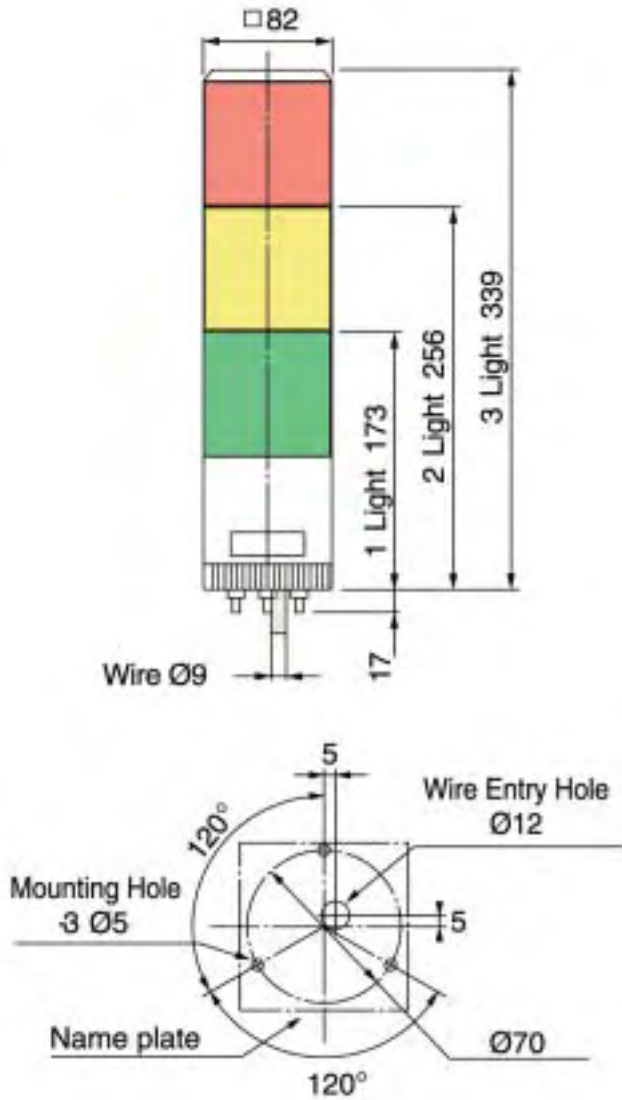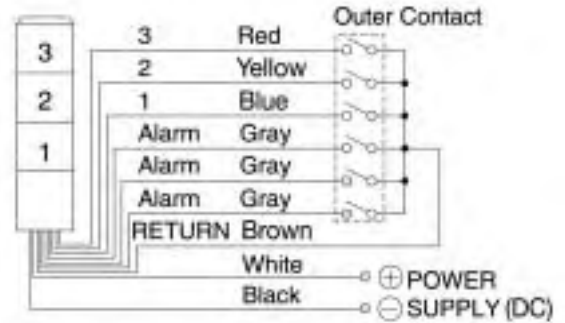### ⌀116mm (4.57 in)

- Colors available: red, yellow, green and blue.
- Integral rotating parabolic reflector makes the light visible from a distance. KJ/KJB rotates 130 times/minute.
- Lenses can be arranged in any combination desired.
- Each light can be operated separately.
- KJB has an integral alarm that sounds intermittently.
- AC220V version available by special order.

Dimensions (mm)
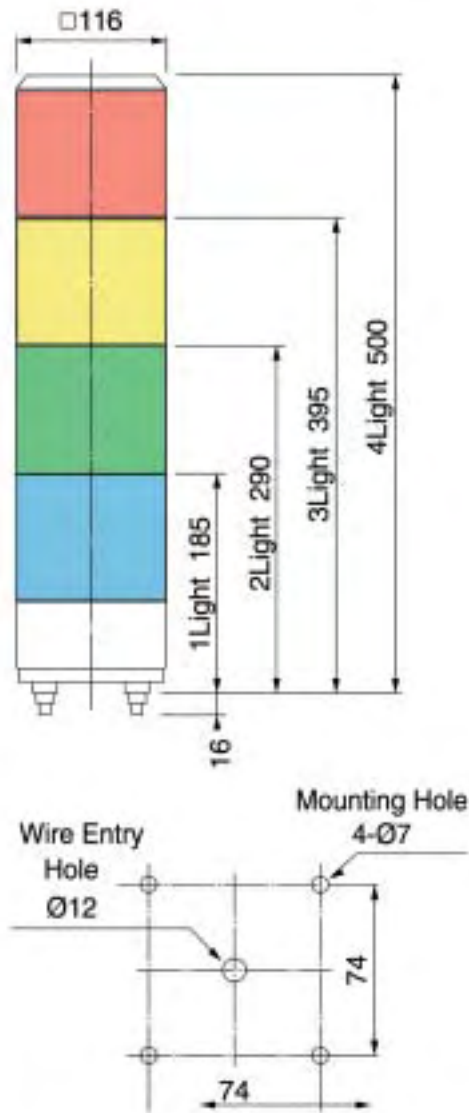
Wiring Diagrams

(DC24V)
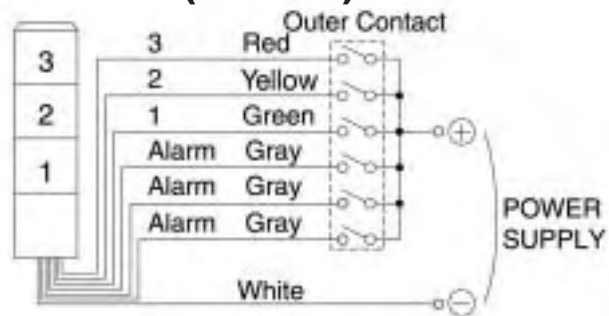
WIRE LENGTH: 250

(AC120V, AC220V)
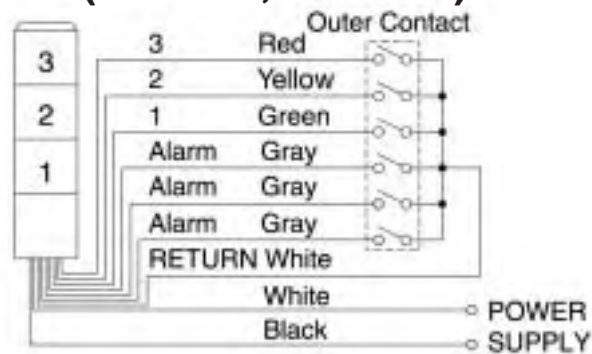
(Note) Gray lead wires do not exist in KJ type.

KJ / KJB Series		Bulb	Color / Position				Alarm
		G18 / BA15S	Red	Amber	Green	Blue	
Current Consumption*	DC24V	24V / 10W	0.5A	0.5A	0.5A	0.5A	0.06A
	AC120V	12V / 5W	0.05A	0.05A	0.05A	0.05A	0.01A
	AC220V	12V / 5W	0.02A	0.02A	0.02A	0.02A	0.005A

*Typical, not guaranteed

ø100mm (3.94 in) Round	AC/DC 24V	AC 120V	AC 220V	IP-53	102 dB/m	Open-Collector 24V	Pre-Assembled Pre-Wired

LGEH

Indicating Light with Horn

The LGEH Series is a large horn and signal tower combination that supplies greater sound and visibility.

Horn/Signal Tower

LGEH-FKA	**Alarm** Comes with 8 alarm sounds
LGEH-FL	**Chime:** Comes with 6 melodies and 2 chimes Choose from Sound Types: F, Q, S
LGEH-FM	**Melody:** Comes with 8 melodies Choose from Sound Types: G, H, P
LGEH-FV	**Voice Synthesizer** Can replay 4 messages with 64 sec. of total program time

LED Type Light

ø100mm (3.94 in)

■ Colors available: red, yellow, green, blue and clear.

■ IP Rating: IP-53.   ■ Stacking: 1 to 4 lights.

■ LED light is effectively diffused to create a full and brilliant color with a triple reflection system.

■ Large diameter signal tower is visible from great distances (lens dimension is 100mm x 50mm).

■ Lenses are made of heat & shock resistant polycarbonate resin.

■ LSI digital voice synthesizer assures continuous high quality sound reproduction for the life of the system.

■ Maximum output level of 102dB/m with an adjustable volume.

■ Auxiliary output allows connection to an external amplifier.

■ 220V version is only available by special order.

NOTE: See Page 56 for the Sound Type Selection Chart.

Type of Model

TYPE OF MODEL	MODEL	RATED VOLTAGE
1 LIGHT	LGEH-102F	AC/DC24V
	LGEH-112F	AC120V
	LGEH-120F	AC220V
2 LIGHT	LGEH-202F	AC/DC24V
	LGEH-212F	AC120V
	LGEH-220F	AC220V
3 LIGHT	LGEH-302F	AC/DC24V
	LGEH-312F	AC120V
	LGEH-320F	AC220V
4 LIGHT	LGEH-402F	AC/DC24V
	LGEH-412F	AC120V
	LGEH-420F	AC220V

How to Order (Example)

LGEH - 4 02 F L - RYGB

Model / Light Style: 1: 1 Light, 2: 2 Light, 3: 3 Light, 4: 4 Light / Series Number / Sound Type / Color: R: Red, Y: Yellow, G: Green, B: Blue, C: Clear (Top to Bottom)

Rated Voltage: 02: AC/DC24V, 12: AC120V, 20: AC220V

Dimensions (mm)

Height (mm): 1 Light: 274, 2 Light: 336, 3 Light: 397, 4 Light: 459
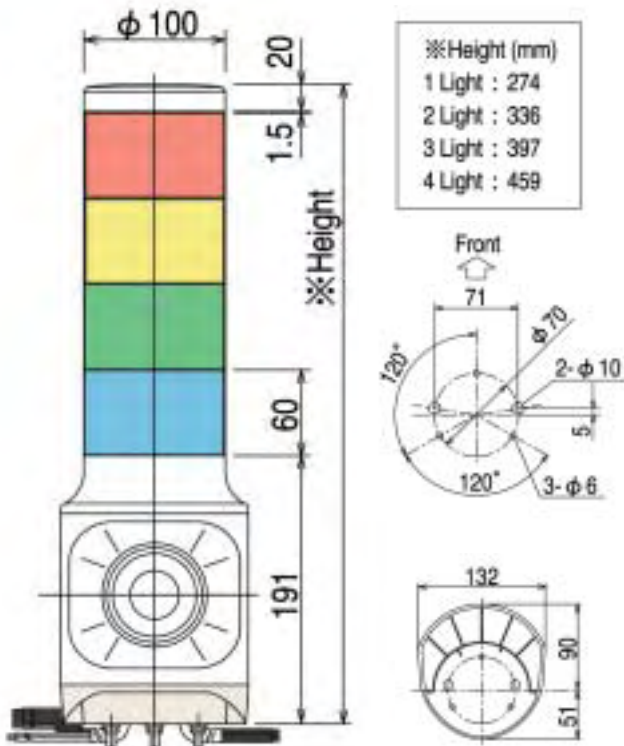
Wiring Diagram in Direct Power Connection

FM, FKA, FL types — WIRE LENGTH: 300
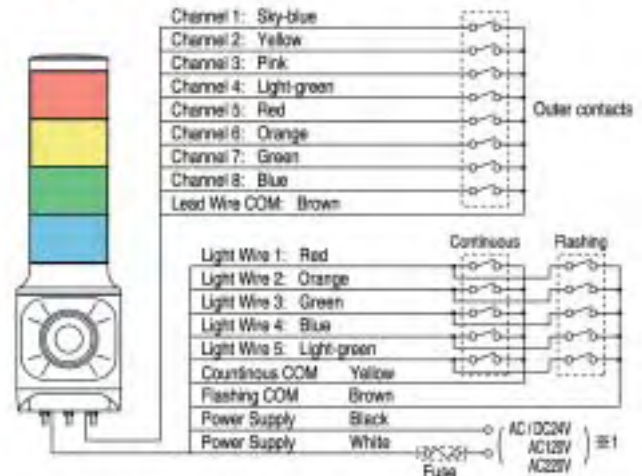
FV type
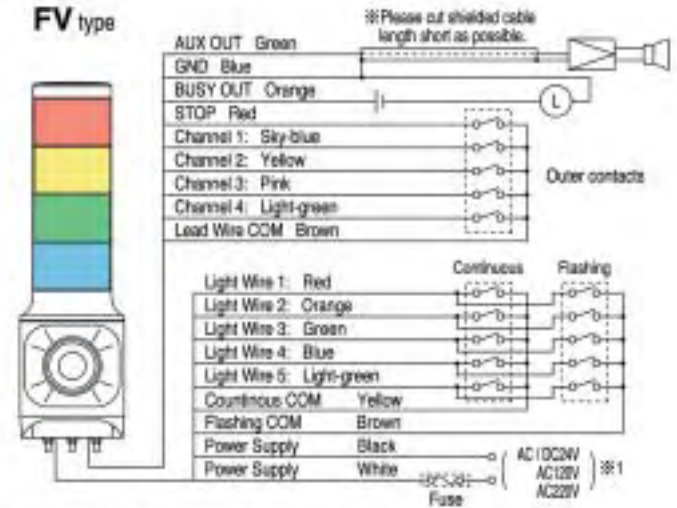
NPN transistor (24V only)
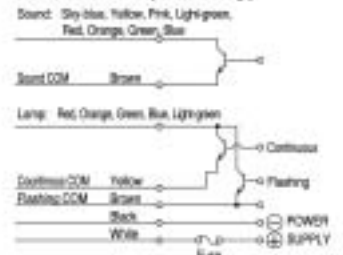
LGEH Series		Module					Sound	
		Red	Amber	Green	Blue	Clear	-FKA/-FL/-FM	-FV
Power Consumption	DC24V	2W	2W	2W	2W	2W	7W	12W
	AC120V	3W	3W	3W	3W	3W	8W	9W
	AC220V	3W	3W	3W	3W	3W	8W	9W

*Typical, not guaranteed

Audible Hybrids

⌀100mm (3.94 in) Round	AC/DC 24V	AC 120V	AC 220V	IP-53	102 dB/m	Open-Collector 24V	Pre-Assembled Pre-Wired

LGH

Horn/Signal Tower

LGH-FK

Alarm
Comes with 8 alarm sounds

Indicating Light with Horn

The LGH Series is a large horn and signal tower combination that supplies greater sound and visibility.

BULB type

ALARM

⌀100mm (3.94 in)

- Colors available: red, yellow, green, blue and clear.
- IP Rating: IP-53.   ■ Stacking: 1 to 5 lights.
- Large diameter signal tower is visible from great distances (lens dimension is 100mm x 50mm).
- Lenses are made of heat & shock resistant polycarbonate resin.
- LSI digital voice synthesizer assures continuous high quality sound reproduction for the life of the system.
- Maximum output level of 102dB/m with an adjustable volume.
- Auxiliary output allows connection to an external amplifier.
- 220V version is only available by special order.

TYPE OF MODEL	MODEL	RATED VOLTAGE	BULB	No.	WEIGHT
1 LIGHT	LGH-102FK	AC/DC24V	28V 20W	50	1.7kg
	LGH-112FK	AC120V	140V 20W	52	1.8kg
	LGH-120FK	AC220V	250V 20W	53	1.8kg
2 LIGHT	LGH-202FK	AC/DC24V	28V 20W	50	1.8kg
	LGH-212FK	AC120V	140V 20W	52	1.9kg
	LGH-220FK	AC220V	250V 20W	53	1.9kg
3 LIGHT	LGH-302FK	AC/DC24V	28V 20W	50	2.0kg
	LGH-312FK	AC120V	140V 20W	52	2.0kg
	LGH-320FK	AC220V	250V 20W	53	2.0kg
4 LIGHT	LGH-402FK	AC/DC24V	28V 20W	50	2.1kg
	LGH-412FK	AC120V	140V 20W	52	2.1kg
	LGH-420FK	AC220V	250V 20W	53	2.1kg
5 LIGHT	LGH-502FK	AC/DC24V	28V 20W	50	2.1kg
	LGH-512FK	AC120V	140V 20W	52	2.2kg
	LGH-520FK	AC220V	250V 20W	53	2.2kg

How to Order (Example)

LGH - 5 02 FKA - RYGBC

Model

Light Style:
1: 1 Light
2: 2 Light
3: 3 Light
4: 4 Light
5: 5 Light

Series and Sound Type

Rated Voltage:
02: AC/DC24V
12: AC120V
20: AC220V

Color:
R: Red
Y: Yellow
G:Green
B: Blue
C: Clear
(Top to Bottom)

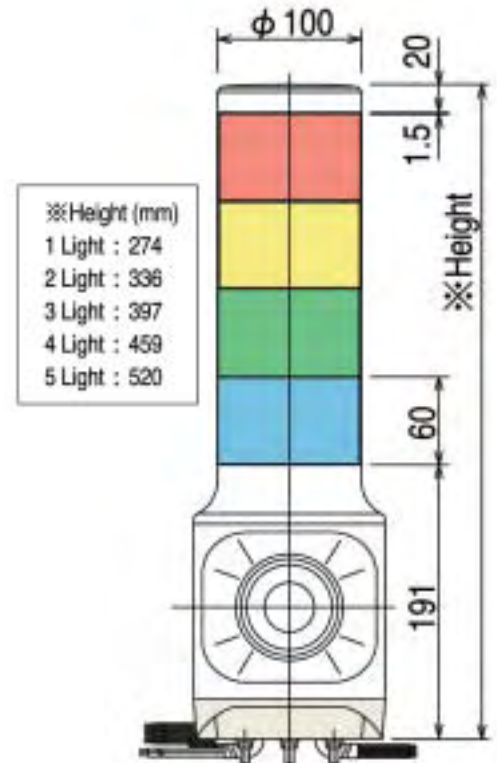## Dimensions (mm)

※Height (mm)
1 Light : 274
2 Light : 336
3 Light : 397
4 Light : 459
5 Light : 520

φ 100 · 20 · 1.5 · 60 · 191 · ※Height

Front
71 · 120° · 120° · φ70 · 2-φ10 · 3-φ6 · 5
132 · 90 · 51

Wiring Diagram in Direct Power Connection

WIRE LENGTH: 300

Channel 1: Sky-blue
Channel 2: Yellow
Channel 3: Pink
Channel 4: Light-green
Channel 5: Red
Channel 6: Orange
Channel 7: Green
Channel 8: Blue
Lead Wire COM: Brown

Outer contacts

Light Wire 1: Red
Light Wire 2: Orange
Light Wire 3: Green
Light Wire 4: Blue
Light Wire 5: Light-green
Countinous COM   Yellow
Flashing COM   Brown
Power Supply   Black
Power Supply   White

Continous   Flashing

Fuse (AC / DC24V / AC120V / AC220V) ※1

LGH-KA Series	Bulb	Color / Position					Sound
	T20 / BA15D	Red	Amber	Green	Blue	Clear	
Power Consumption*	AC/DC24V	28V / 20W	2W	2W	2W	2W	2W	12W
	AC120V	140V / 20W	3W	3W	3W	3W	3W	9W
	AC220V	250V / 20W	3W	3W	3W	3W	3W	9W

*Typical, not guaranteed

WG

Wall Mount Voice Synthesizer with LED signal light

- Colors available: red, yellow, green and blue.
- Alarming/warning guidance system with voice messages and flashing LED light.
- Effective for audio/visual guidance at public facilities such as train platforms, bathrooms, etc.
- Pre-recorded with custom programming available at PATLITE.
- High quality sound with a max. output of 90dB/m provide clear messages, even in a crowd.
- 3 message channels for various applications. One channel has priority for emergency/security purposes.
- Has 3 messages for a total of 32 seconds.
- NPN open collector transistor compatible.
- Not field recordable.

LED
Type Light

VOICE

ALARM

MODEL	WG-03TT
Rated Voltage	AC120V, 50~60Hz
Sound pressure level	90dB (at 1m) adjustable
Audio file	MPEG1-Audio Layer 3 (MP3)
Bit rate	64kbit/s
Audio memory capacity	2Mbit (32 seconds message in total when recorded at bit rate 64kbit/s)
Message combination	Max. 16 phrases
Interface for data modification	Multimedia card interface (use FV-MC)
Mounting place	Indoor only
Weight	600g±10%
Dimensions	240(H)x119(W)x65(D)

WG-03TT-B

WG-03TT (No LED)

WG-03TT-G

WG-03TT-R

WG-03TT-Y

Dimensions (mm)

LED
Visual
Indication
(or sound
output for
"sound only"
version)

Voice
Output

52
240

(19.8)
65

119

Channel 1 (example)

(Normal Status) Makes a
"ding-ding" sound.

Channel 2 (example)

*Ladies' room to the left,
Gentlemen to the right.*
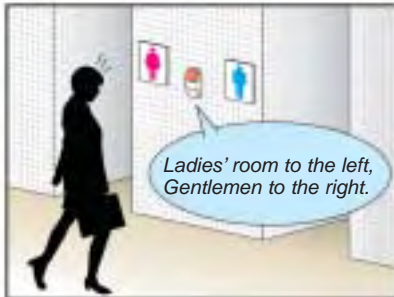
Voice gives instructions at
entrance of public bathroom.

Emergency Channel (example)

*Emergency!
Notify Attendant
immediately!*

Voice gives instructions for
emergency situations.
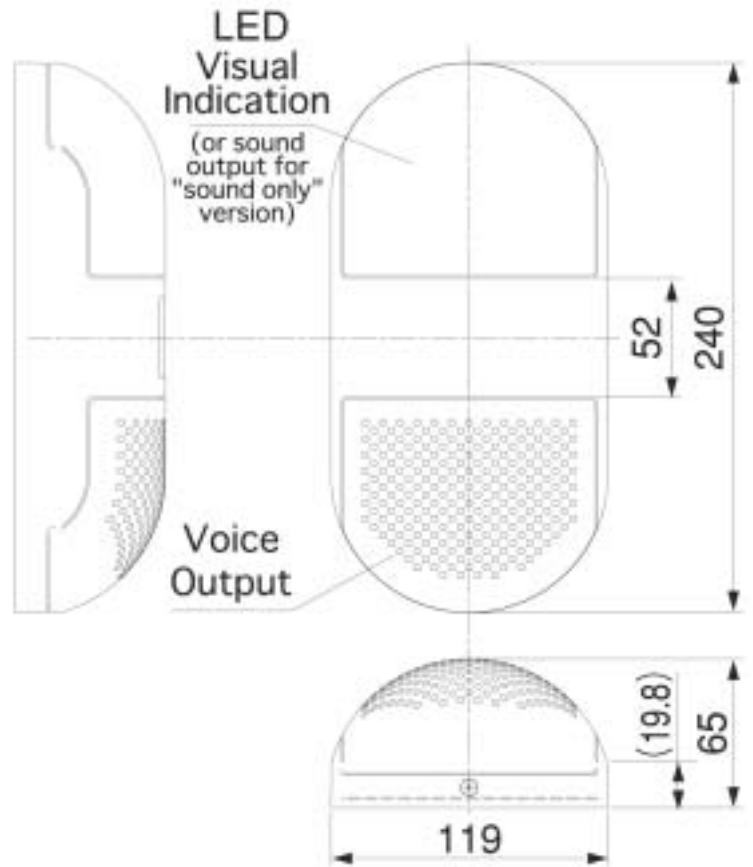
Messages can be chosen from
the Command Library with
custom programming
available at PATLITE.

162mm (6.38 in) Dome	AC/DC 24V	AC 120V	AC180 ~240V	IP-23	105 dB/m	Open-Collector 24V	Pre-Assembled Pre-Wired

RT

Alarm with Rotating Light

RT-KA	**Alarm** Comes with 8 alarm sounds
RT-L	**Chime:** Comes with 6 melodies and 2 chimes Choose from Sound Types: F, Q, S
RT-VS	**Voice Synthesizer** Can replay 4 messages with 64 sec. of total program time

BULB type

Alarm with Large Rotating Light

The RT Series is a large horn and rotating light combination for increased plant floor coverage.

ø162mm Dome (6.38 in)

■ Colors available: red, yellow, green and blue.

■ Adjustable volume control: Max. 105dB/m.

■ Lenses are made of acrylic resin.

■ NPN open collector transistor compatible.

■ RT-VS requires message programming from the command library (free) or custom messages (optional).

■ Clear, distortion-free playback.

■ Eight Outputs: RT-L & RT-K.

■ Four Outputs: RT-VS.

■ Optional mounting bracket: SZ-008.

■ 220V version is available by special order.

TYPE OF MODEL	MODEL	RATED VOLTAGE	BULB (G18BA15S)	No.	VOLUME	WEIGHT
Voice Synthesizer	RT-24VS	AC/DC24V	24V20W	6	Max. 105dB/m	2.0kg
	RT-120VS	AC120V	12V15W	5		2.3kg
Chime Phone	RT-24L	AC/DC24V	24V20W	6	Max. 105dB/m	2.0kg
	RT-120L	AC120V	12V15W	5		2.3kg
Alarm Sound	RT-24KA	AC/DC24V	24V20W	6	Max. 105dB/m	2.0kg
	RT-120KA	AC120V	12V15W	5		2.3kg

Dimensions (mm)

162
260
128
200
Front

Top View
Mounting Hole
3-φ9
Wire Entry Hole φ15
50
φ140
120
120

Wiring Diagram

RT-KA, RT-L

Outer contacts
Revolving Light: Red
Channel 1: Sky-blue
Channel 2: Yellow
Channel 3: Pink
Channel 4: Light-green
Channel 5: Purple
Channel 6: Orange
Channel 7: Green
Channel 8: Blue
COM   Brown
White
Black   POWER SUPPLY
Fuse   5A   (24V AC/DC: Black ⊖)

RT-VS

Outer contacts
Revolving Light: Red
Channel 1: Sky-blue
Channel 2: Yellow
Channel 3: Pink
Channel 4: Light-green
STOP   Blue
COM   Brown
White   POWER SUPPLY
Black   (24V AC/DC: Black ⊖)
Fuse
AC/DC 24V- 3A : AC120V/220V-1A

WIRE LENGTH: 250

NOTE: See Page 56 for the Sound Type Selection Chart.

Audible Alarms

133mm (5.24 in) Square	AC/DC 24V	AC 120V	AC 120V	90 dB/m	Panel or Wall Mount	16 Second messages	Open-Collector	Pre-Assembled Pre-Wired

PVB Series Playback Only

Is perfect for use in noisy environments and can replay messages up to 16 seconds long.

Playback Only

PVB-04 — Voice Synthesizer

Dimensions (mm)

Mounting Pitch

For panel mount application, cut square hole to 130mm.

Wiring Diagram

AC230V, AC/DC24V, AC120V — POWER INPUT

External Amplifier, Shielded Wire, DC24V
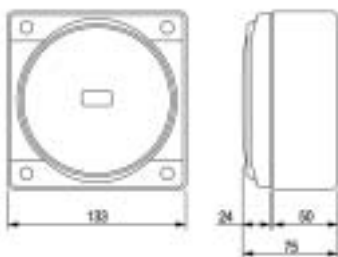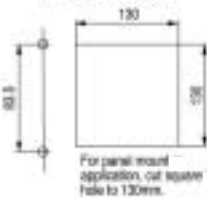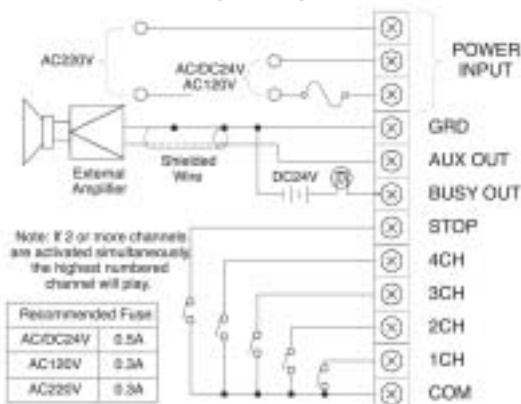
GRD, AUX OUT, BUSY OUT, STOP, 4CH, 3CH, 2CH, 1CH, COM

Note: If 2 or more channels are activated simultaneously, the highest numbered channel will play.

Recommended Fuse	
AC/DC24V	0.5A
AC120V	0.3A
AC230V	0.3A

TERMINALS PROVIDED

133mm square (5.24 in)

■ High volume, maximum 90dB at 1m.

■ NPN open collector permits direct connection to a PLC.

■ Integral volume control to match a range of environments.

■ Up to 4 messages for a total of 16 seconds can be set.

■ Two mounting options: Wall mount or Panel mount.

■ Replaying message may be stopped by "stop" input.

■ The playback start signal is input from a switch on an external device. If the signal is received once, the message will be played once; and if the signal is continued, the message will be repeated.

■ High volume replay using an optional 30W amplifier (PVA-30=30W) is available.

MODEL	RATED VOLTAGE	CHANNEL	MAX MESSAGE TIME	WATTAGE	OPERATING TEMPERATURE RANGE	VOLUME	WEIGHT
PVB-04JS	AC/DC 24V	4	16 SEC.	7W/5W	-10°C~ +55°C	Max. 90dB/m	0.8Kg
PVB-04TS	AC 120V			7W			1.0Kg

220V version available by special order.

Audible Alarms

133mm (5.24 in) Square	AC/DC 24V	AC 120V	AC 220V	90 dB/m	Panel or Wall Mount	60 Seconds	Open-Collector Compatible	Pre-Assembled

EVB Series
Self-Recordable Annunciator

The EVB Series is a box design with easy self-recording.
Record up to 4 messages with 60 seconds total recording time.
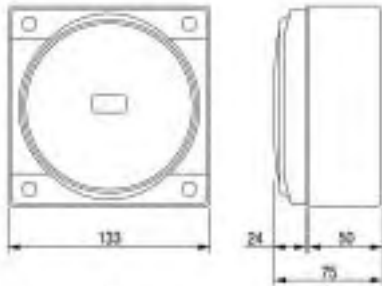
Self-Recordable Voice Annunciator
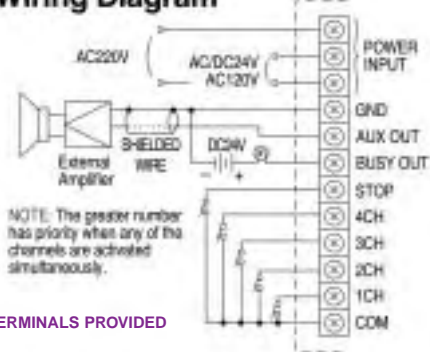
EVB-04   Voice Synthesizer

MODEL	RATED VOLTAGE	CHANNEL	MAX MESSAGE TIME	WATTAGE	OPERATING TEMPERATURE RANGE	VOLUME	WEIGHT
EVB-04JF	AC/DC 24V	4	60 SEC.	9W	-10°C~ +55°C	Max. 90dB/m	0.8Kg
EVB-04TF	AC 120V						1.0Kg

220V version is available by special order.

Dimensions (mm)

133   24   50   75

Wiring Diagram

AC220V
AC/DC24V
AC120V

External Amplifier
SHIELDED WIRE   DC24V

POWER INPUT
GND
AUX OUT
BUSY OUT
STOP
4CH
3CH
2CH
1CH
COM

NOTE: The greater number has priority when any of the channels are activated simultaneously.

TERMINALS PROVIDED

Mounting Pitch

130
63.5
130

For panel mount application, cut square hole to 130mm.

REC/PLAY Switch

Microphone Input

Hexagon Bolt

Indicating Lamp

Operating Lamp

Microphone (Optional)

133mm square (5.24 in)

- Program in the field with optional microphone (MC-EV).
- High quality voice synthesizer replays up to 4 messages with 60 seconds of total program time.
- Maximum output level of 90dB/m with an adjustable volume.
- NPN open collector transistor compatible.
- Two mounting options: wall mount or panel mount.
- Auxiliary output allows connection to external amplifier.
- Easy recording and playback.
- NPN open collector permits direct connection to a PLC.
- Using BUSY terminals, a revolving light or display can be operated during voice output.

49

AC/DC 24/24V	DC 48V	AC90 ~132V	AC180 ~260V	IP-53	105 dB/m	64 Sec.	Open-Collector	Pre-Assembled Pre-Wired

PVW Series *Playback Only*

Is perfect for use in noisy environments and can replay messages up to 64 seconds long.

## Playback Only

PVW-04 / 15 **Voice Synthesizer**

MODEL	RATED VOLTAGE	POWER CONSUMPTION	VOLUME	WEIGHT
PVW-04JF	AC/DC12/24V	12W	Approx. 105dB (at 1m)	1.3kg
PVW-04DF	DC48V	10W		1.3kg
PVW-04KF	AC90–132V	18W		1.4kg
PVW-04QF	AC180–260V	18W		1.4kg
PVW-15JF	AC/DC12/24V	12W	Approx. 105dB (at 1m)	1.3kg
PVW-15DF	DC48V	10W		1.3kg
PVW-15KF	AC90–132V	18W		1.4kg
PVW-15QF	AC180–260V	18W		1.4kg

48V and 220V versions available by special order.

Dimensions (mm)

Wiring Diagram

WIRE LENGTH: **400**
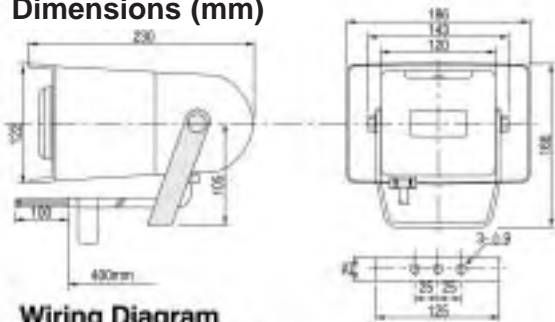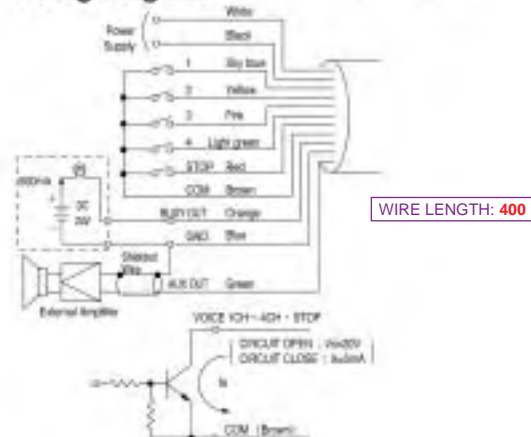
- ■ Meets IP-53.
- ■ Anti-corrosive stainless steel bracket.
- ■ Clear sound with original wide horn style.
- ■ High volume, maximum 105dB at 1m.
- ■ NPN open collector permits direct connection to a PLC.
- ■ Internal adjustable volume control to match a range of environments.
- ■ PVW-04: Up to 4 messages for a total of 64 seconds can be set.
- ■ PVW-15: Up to 15 messages for a total of 64 seconds can be set.
- ■ Clear sound from voice synthesizers is given by the high bit rate (ADPCM 64 kbit/s).
- ■ Available with optional extension amplifier (PVA-30=30W) connected to AUX OUT.
- ■ Replaying message may be stopped by "stop" input.
- ■ The playback start signal is input from a switch on an external device. If the signal is received once, the message will be played once; and if the signal is continued, the message will be repeated.

AC/DC 12/24V	AC90 ~132V	AC180 ~260V	IP-53	105 dB/m	60 Seconds	Open-Collector	Pre-Assembled Pre-Wired

EVW

EVW Series *Recording and Playback*

The EVW Series has easy recording with attached microphone. Record up to 4 messages with 60 seconds total recording time.
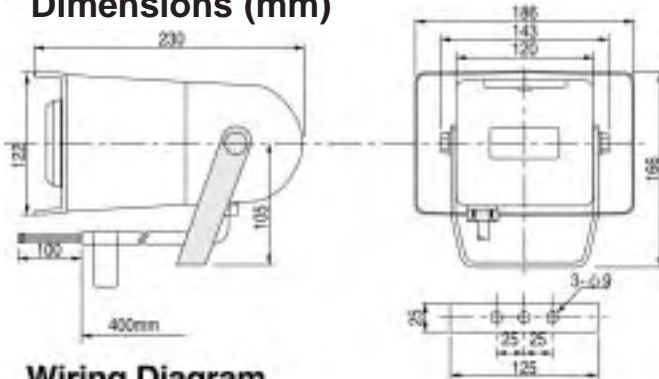
Recording and Playback

EVW-04   Voice Synthesizer

MODEL	RATED VOLTAGE	POWER CONSUMPTION	VOLUME	WEIGHT
EVW-04JF	AC/DC12/24V	12W	105dB (at 1m)	1.2kg
EVW-04KF	AC90~132V	18W		1.4kg
EVW-04QF	AC180~260V	18W		1.4kg

220V version is available by special order.

Microphone (Optional)

Dimensions (mm)

Wiring Diagram

WIRE LENGTH: **400**
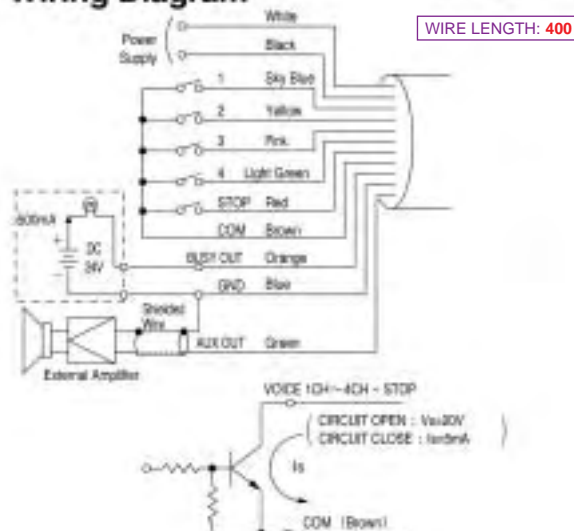
- ■ Easy recording and playback with optional microphone (MC-EV).
- ■ Meets IP-53 for washdown requirements.
- ■ Anti-corrosive stainless steel bracket.
- ■ Clear sound with original wide horn style.
- ■ High quality voice synthesizer replays up to 4 messages with 60 seconds of total program time.
- ■ High volume, maximum 105dB at 1m, adjustable.
- ■ NPN open collector permits direct connection to a PLC.
- ■ Auxiliary output allows connection to external amplifier.

Concept of Horn Configuration

■ Conventional type   ■ Wide Horn Type

Large and wide range of clear sound can be output, because total length of horn became longer by moving the driving unit further forward than conventional type.

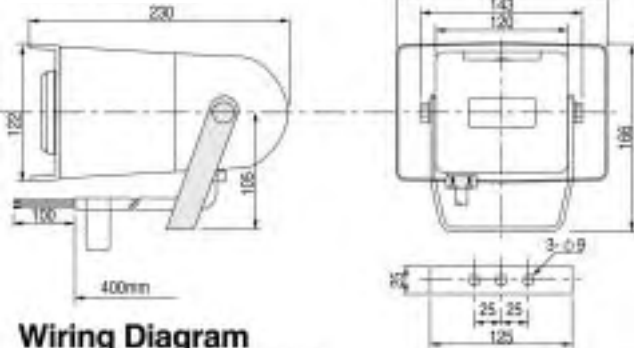| AC/DC 12/24V	DC 48V	AC90 ~132V	AC180 ~260V	IP-65	105 dB/m	Open-Collector	Pre-Assembled Pre-Wired
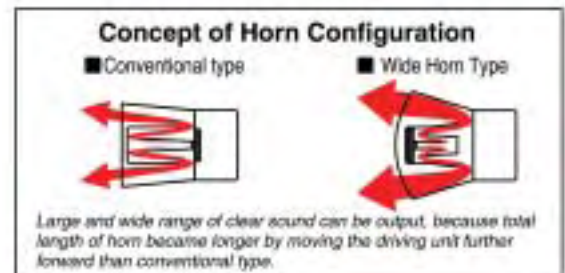
EW

EW Series Horn Style Alarm

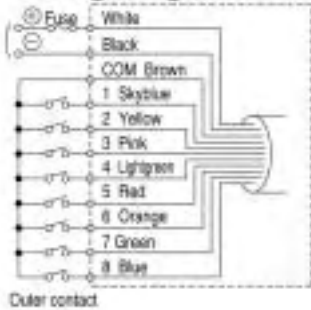*The EW Series with large volume, is perfect for use in noisy factories.*

Horn Style Alarm

EW-KA	**Alarm**
EW-L	**Chime** Choose from Sound Types: F, Q, S
EW-M	**Melody** Choose from Sound Types: G, H, P

- Meets IP-65.
- NPN open collector permits direct connection to a PLC.
- EW-K: has 8 distinctive alert sounds.
- EW-L: has 6 melodies and 2 chime sounds.
- EW-M: has 8 different world familiar melodies.
- Integral volume control.
- Universal mounting bracket permits easy installation in any location.
- LSI digital synthesizer assures continuous high quality sound reproduction for the life of the system.

Dimensions (mm)

230
188
143
120
122
105
400mm
3-∅9
35
25 25
125

WIRE LENGTH: 400

Wiring Diagram

Fuse | White
Black
COM Brown
1 Skyblue
2 Yellow
3 Pink
4 Lightgreen
5 Red
6 Orange
7 Green
8 Blue
Outer contact

Fuse Capacity

Voltage	Fuse
12V	1A
24V	0.5A
48V	0.3A
100V	0.3A
220V	0.15A

NOTE: See Page 56 for the Sound Type Selection Chart.

Concept of Horn Configuration

- Conventional type
- Wide Horn Type

Large and wide range of clear sound can be output, because total length of horn became longer by moving the driving unit further forward than conventional type.
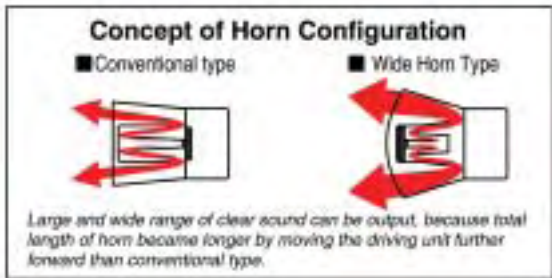
MODEL	RATED VOLTAGE	POWER CONSUMPTION	VOLUME	WEIGHT
EW-24M	AC/DC12/24V	8W		1.2kg
EW-48M	DC48V	10W		1.2kg
EW-100M	AC90~132V	12W		1.4kg
EW-220M	AC180~260V	13W		1.4kg
EW-24L	AC/DC12/24V	8W		1.2kg
EW-48L	DC48V	10W	Max. 105dB (at 1m)	1.2kg
EW-100L	AC90~132V	12W		1.4kg
EW-200L	AC180~260V	13W		1.4kg
EW-24K	AC/DC12/24V	8W		1.2kg
EW-48K	DC48V	10W		1.2kg
EW-100K	AC90~132V	12W		1.4kg
EW-200K	AC180~260V	13W		1.4kg

48V and 180~260V versions available by special order.

AC/DC 12/24V	DC 48V	AC90 ~132V	AC180 ~260V	IP-65	105 dB/m	Open-Collector	Pre-Assembled Pre-Wired

EWS

EWS Series Horn Style Alarm
The EWS Series with large volume, is perfect for use in noisy factories.

Horn Style Alarm

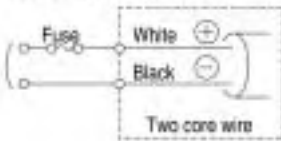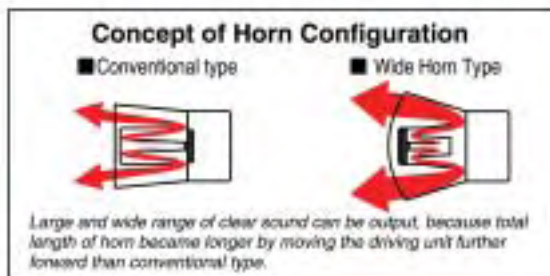| EWS-KA	Alarm
EWS-L	Chime Choose from Sound Types: F, Q, S
EWS-M	Melody Choose from Sound Types: G, H, P

Dimensions (mm)
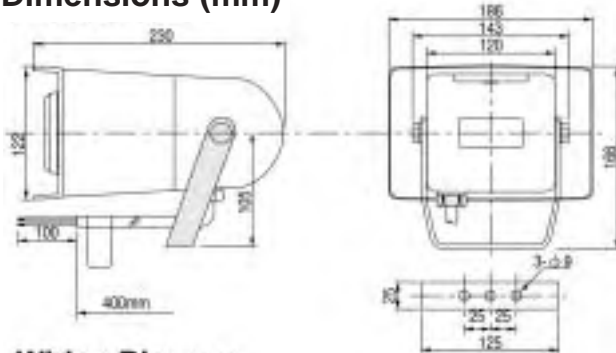
Wiring Diagram

■ Fuse Capacity

Voltage	Fuse
12V	1A
24V	0.5A
48V	0.3A
100V	0.3A
220V	0.15A

WIRE LENGTH: **400**

Sound selection is made by dip switch selection (Caution) polarity of power supply in case of DC.

NOTE: See Page 56 for the Sound Type Selection Chart.

Concept of Horn Configuration
■ Conventional type   ■ Wide Horn Type

Large and wide range of clear sound can be output, because total length of horn became longer by moving the driving unit further forward than conventional type.

- ■ Meets IP-65.
- ■ NPN open collector permits direct connection to a PLC.
- ■ EWS-K: has 8 distinctive alert sounds.
- ■ EWS-L: has 6 melodies and 2 chime sounds.
- ■ EWS-M: has 8 different world familiar melodies.
- ■ Integral volume control.
- ■ Universal mounting bracket permits easy installation in any location.
- ■ LSI digital synthesizer assures continuous high quality sound reproduction for the life of the system.
- ■ EWS: Select one sound by dip switch from 8 pre-installed sounds.

MODEL	RATED VOLTAGE	POWER CONSUMPTION	VOLUME	WEIGHT
EWS-24M	AC/DC12/24V	8W		1.2kg
EWS-48M	DC48V	10W		1.2kg
EWS-100M	AC90~132V	12W		1.4kg
EWS-220M	AC180~260V	13W		1.4kg
EWS-24L	AC/DC12/24V	8W		1.2kg
EWS-48L	DC48V	10W	Max. 105dB (at 1m)	1.2kg
EWS-100L	AC90~132V	12W		1.4kg
EWS-200L	AC180~260V	13W		1.4kg
EWS-24K	AC/DC12/24V	8W		1.2kg
EWS-48K	DC48V	10W		1.2kg
EWS-100K	AC90~132V	12W		1.4kg
EWS-200K	AC180~260V	13W		1.4kg

48V and 180~260V versions available by special order.

Audible Alarms

| 108mm (4.25 in) Square | AC/DC 24V | AC 120V | AC200 ~240V | IP-34 | 85 dB/m | Panel or Wall Mount | Open-Collector | Pre-Assembled Pre-Wired |

BT Series Audible Alarm

The BT Series, with voice, melody, chime and alarm capability, has variable audible control. Includes a compact, but loud speaker.

Alarm

BT-KA   Alarm
• BT-KA has 8 distinctive alert sounds.

Chime

BT-L   Chime Phone
• BT-L has 6 melodies and 2 chime sounds.
• Choose from F, Q, or S type combinations.

Melody

BT-M   Melody Phone
• BT-M has 8 different popular melodies.
• Choose from G, H, or P type combinations.

Voice Synthesizer

BT-V   Signal Voice
• BT-V is a programmable voice unit that can replay up to 4 messages with 64 sec. of total program time.
• Produces a clear 64Kbit/sec. sound
• Select voice messages, alarms, chimes and melodies from our command library.
• Custom message programming is also available.

108mm square (4.25 in)
■ Meets IP-34 rating.
■ NPN open collector transistor compatible.
■ One-shot contact closure (>100mS) replays selected channel one time only (BT-V).
■ Continuous contact closure replays selected channel repeatedly.
■ Mounts anywhere with 3 position bracket.
■ Moisture proof structure, suitable for moist environments.

NOTE: See Page 56 for the Sound Type Selection Chart.

Dimensions (mm)
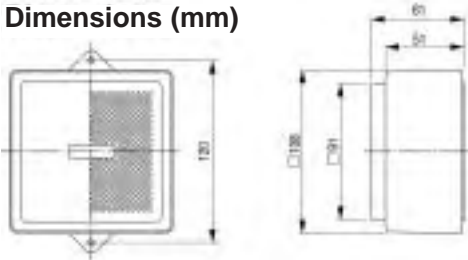
Wiring Diagram
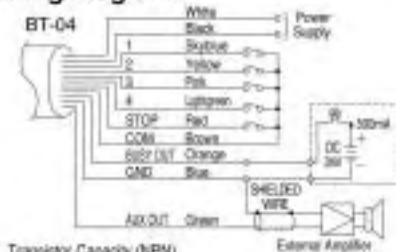
BT-04

Transistor Capacity (NPN)

Model	BT-04
Current Capacity	Ic≥100mA
Withstand Voltage	Vc≥28V
Signal line current	3mA

WIRE LENGTH: 400

BT-M, KA, L

BT has a 3 Position Mounting Bracket:

Install directly to the panel enclosure w/ detachable mount

Permanent tamper-free mount

Flush mount for concealed look

BT-KA: Has 8 distinctive alert sounds.

MODEL	RATED VOLTAGE	POWER CONSUMPTION	VOLUME	WEIGHT
BT-24KA	AC/DC24V	3.5W	Max. 85dB/m	0.43kg
BT-120KA	AC120V	3W		0.5kg

BT-L: 6 melodies and 2 chime sounds. Choose from F, Q, or S types.

MODEL	RATED VOLTAGE	POWER CONSUMPTION	VOLUME	WEIGHT
BT-24L	AC/DC24V	3.5W	Max. 85dB/m	0.43kg
BT-120L	AC120V	3W		0.5kg

BT-M: 8 different popular melodies. Choose from G, H, or P types.

MODEL	RATED VOLTAGE	POWER CONSUMPTION	VOLUME	WEIGHT
BT-24M	AC/DC24V	3.5W	Max. 85dB/m	0.43kg
BT-120M	AC120V	3W		0.5kg

BT-V: Select voice messages.

MODEL	RATED VOLTAGE	POWER CONSUMPTION	VOLUME	WEIGHT
BT-24V	AC/DC24V	7W	Approx. 85dB/m	0.43kg
BT-120V	AC120V	4W		0.5kg

NOTE: 100V AC, 220V AC versions available by special order.

Audible Alarms

108mm (4.25 in) Square	AC/DC 24V	AC 120V	Panel or Wall Mount	Open-Collector	Pre-Assembled

EB-K, EB-L EMB, ESB ETB-B

EB, EMB, ESB & ETB Series
Box Style Alarms, Wall or Panel Mounts

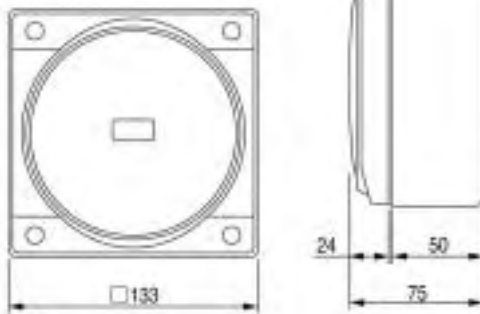*The EB, EMB, ESB and ETB Series have a simple box design that fits with various types of machinery.*

Box Style Alarm

EB-K	8 Output	Alarm
EB-L	8 Output	Chime Choose from Sound Types: F, Q, S
EMB	8 Output	Melody Choose from Sound Types: G, H, P
ESB	1 Output	Alarm
ETB-B	4 Output	Alarm

Dimensions (mm)

□133

24 50
75

Wiring Diagram

220V AC
24V AC/DC
100V AC

POWER INPUT
COM
1
2
3
4
5
6
7
8

Outer contact

TERMINALS PROVIDED

Mounting Pitch
83.5

ESB has 1 output.

130
130

For panel mount application, cut square hole to 130mm. Panel thickness must be 5mm or less.

133mm (4.25 in) square

■ LSI digital synthesizer assures continuous high quality sound reproduction for the life of the system.

■ Two mounting options: wall or panel mount.

■ Units are operated by a continuous contact closure and replay selected channel repeatedly.

■ **EB-K** has 8 distinctive alert sounds.

■ **EB-L** has 6 melodies and 2 chimes.

■ **EMB** has 8 different popular melodies.

■ **ESB** has 1 output, alarm.

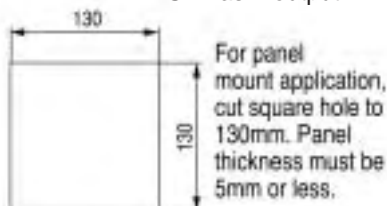■ **ETB-B** has 4 different alarm sounds.
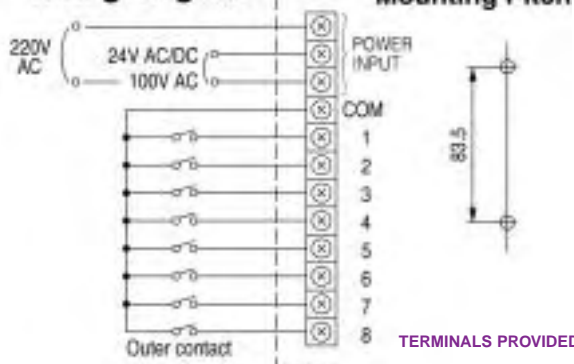
MODEL	RATED VOLTAGE	POWER CONSUMPTION	VOLUME	WEIGHT
EB-24KA	AC/DC24V	6W	Max. 95dB/m	0.7kg
EB-120KA	AC120V	7W		0.9kg
EB-24L	AC/DC24V	6W		0.7kg
EB-120L	AC120V	7W		0.9kg
EMB-24	AC/DC24V	6W	Max. 90dB/m	0.7kg
EMB-120	AC120V	7W		0.9kg
ESB-24P	AC/DC24V	4W	Max. 93dB/m	0.7kg
ESB-120P	AC120V	5W		0.9kg
ETB-24B	AC/DC24V	6W	Max. 95dB/m	0.7kg
ETB-120B	AC120V	7W		0.9kg

AC220V version available by special order.

PATLITE offers a variety of audible products with: ALARMS (such as KA or KD), MELODIES/CHIMES (such as LF or LQ) and MELODIES (such as MG or MH). For ordering, choose the Product and the Alarm type in the tables below.   **(Example: EMB H-Type)**

Model Ch	ESB	ETB
1	Stutter (1 sound)	Stutter
2		Chime
3		Beep
4		Yelp

BT / EW / EWS / LGEH-F / LGH-F *

Ch	KA-Type	LF-Type	LQ-Type	LS-Type	MG-Type	MH-Type	MP-Type
1	Beep	Fur Elise	Mary Had a Little Lamb	Amaryllis	Runner	Happy Birthday	She Wore a Yellow Ribbon
2	Stutter	Maiden's Prayer	Camptown Races	Symphony No. 40	I Want to Take Care of You	Mickey Mouse Club March	My Darling Clementine
3	Bell	Minuet	Cuckoo	Silent Lakeside	Listening to Olivia	It's a Small World	The Yellow Rose of Texas
4	Yelp	Annie Laurie	Blacksmith In the Village	Mountain Musician	September	Forest Bear	Yankee Doodle
5	Rapid Hi-Lo	London Bridge is Falling Down	On the Avignon Bridge	Romance De Amour	Saturday Lovers	Cha Cha Toy	When the Saints Go Marching In
6	Melody Chime	Holdiridia	Ob-La-Di, Ob-La-Da	Petrouchka	Autumn	Is There a Kid Like This?	Londonderry Air
7	Synthesized Piano		Chime		Surf Heaven, Ski Heaven	Schubert's Lullaby	Havah Nagilah
8	Synthesized Bell		Call Sign		Color / White Blend	Rudolf the Red-Nosed Reindeer	Jamaica Farewell

*LGH-F is available for KA type only.

EB / RT

Ch	KA-Type	LF-Type	LQ-Type	LS-Type
1	Beep	Fur Elise	Mary Had a Little Lamb	Amaryllis
2	Stutter	Maiden's Prayer	Camptown Races	Symphony No. 40
3	Bell	Minuet	Cuckoo	Silent Lakeside
4	Yelp	Annie Laurie	Blacksmith in the Village	Mountain Musician
5	Rapid Hi-Lo	London Bridge is Falling Down	On the Avignon Bridge	Romance De Amour
6	Melody Chime	Holdiridia	Ob-La-Di, Ob-La-Da	Petrouchka
7	Synthesized Piano		Chime	
8	Synthesized Bell		Call Sign	

EMB

Ch	G-Type	H-Type	P-Type
1	Runner	Happy Birthday	She Wore a Yellow Ribbon
2	I Want to Take Care of You	Mickey Mouse Club March	My Darling Clementine
3	Listening to Olivia	It's a Small World	The Yellow Rose of Texas
4	September	Forest Bear	Yankee Doodle
5	Saturday Lovers	Cha Cha Toy	When the Saints Go Marching In
6	Autumn	Is There a Kid Like This?	Londonderry Air
7	Surf Heaven, Ski Heaven	Schubert's Lullaby	Havah Nagilah
8	Color / White Blend	Rudolf the Red-Nosed Reindeer	Jamaica Farewell

Refer to the tables and wiring diagrams below, to determine wiring, wire colors and voltages available

(!) Please Note: Light wire colors correspond to LED module colors, except that the Orange Wire is used for the Yellow Light.

Diagram #1— Continuous Only

DIAGRAM #1		WIRE COLORS
Continuous Towers	Rated Voltage	Power 1
WM	24 / 120	Yellow
WE, WEP, WME-A	24	Yellow
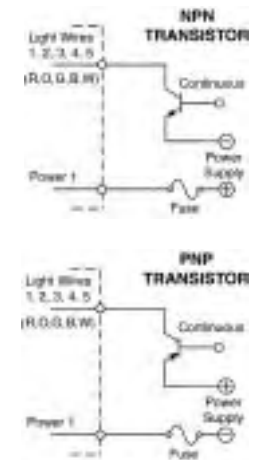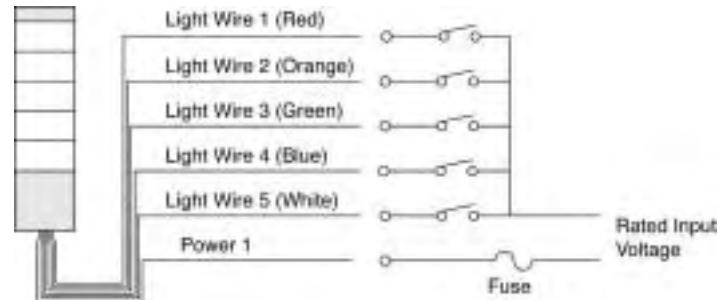
Diagram #2— Continuous and Flashing with Alarm(s)

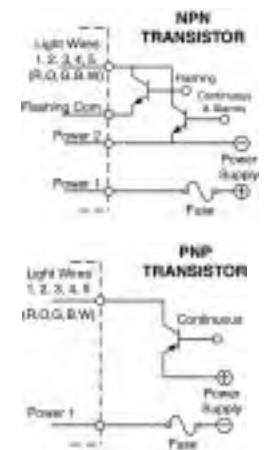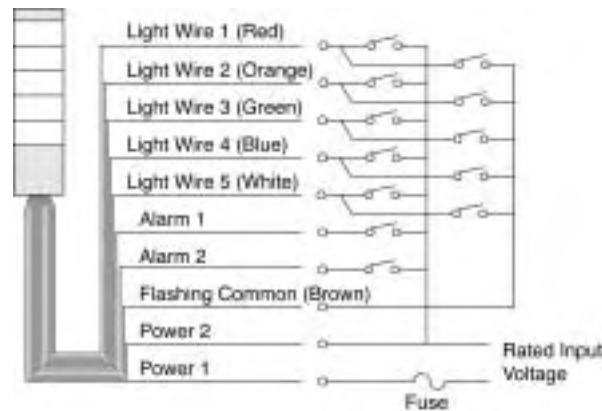| DIAGRAM #2		WIRE COLORS	
Continuous and Flashing with Alarm(s)	Rated Voltage	1. Power 1 2. Power 2	1. Alarm 1 2. Alarm 2
WM-FB	24 / 120	1. Yellow 2. Gray	1. Sky Blue 2. None
WE-FB, WEP-FB, WME-AFB	24	1. Yellow 2. Gray	1. Purple 2. Sky Blue

Diagram #3— Continuous or Continuous and Flashing with Alarm(s)

DIAGRAM #3		WIRE COLORS	
Continuous or Continuous and Flashing with Alarm (s)	Rated Voltage	1. Power 1 2. Power 2	1. Alarm 1 2. Alarm 2
WME-A	120	1. Black 2. Gray	1. None 2. None
WME-AFB	120	1. Black 2. Gray	1. Purple 2. Sky Blue

WME-A Series: Continuous Only version does not include the Flashing Common (Brown) wire.

WME-A: Free-Voltage version (AC90-250V model) includes ground wire (Green/Yellow).
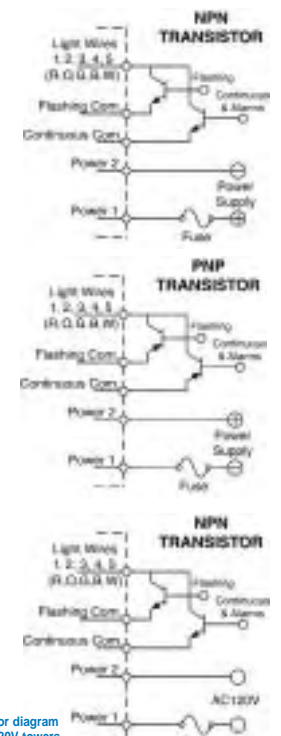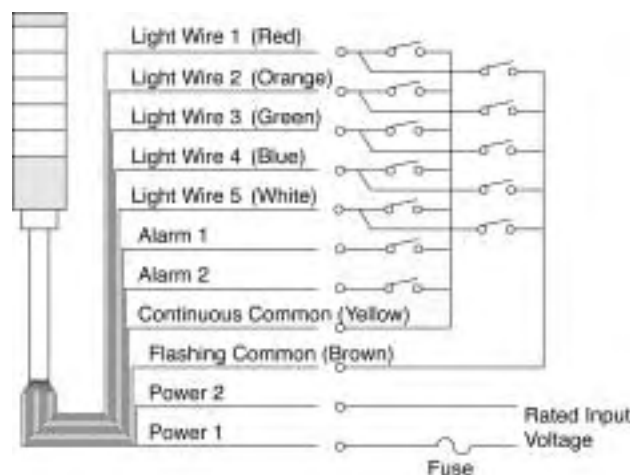
NOTES:
1. Transistors, switches and fuses shown are to be supplied by the customer.
2. Fuse rating is 1A (WM-24V model has a 3A fuse).
3. The WM Series has a fuse installed internally.
4. Never connect Brown to Gray.
5. Open-collector transistor control is for DC24V or AC120V units except where noted.
6. All 5 light wires are supplied even if not all colors are used, except for the following: WE / WEP and WM Series.

This transistor diagram is for all AC120V towers except the WM / WME-A Series.

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Mounting Poles & Brackets (mm)

SZ-50L SZ-50T
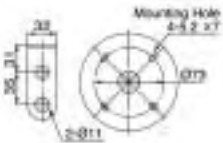
SZ-30L SZ-30T
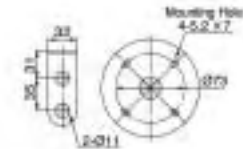
ST-1000MM
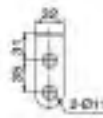
Mounting Brackets (mm)

SZ-010 (22mm)
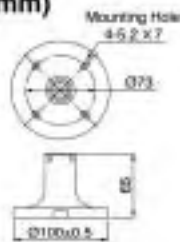
SZ-016 (22mm)
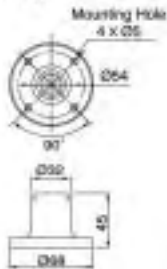
SZ-017 (22mm)
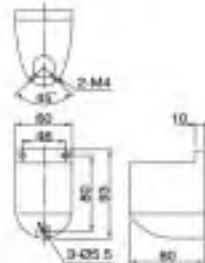
SZ-020 (22mm)
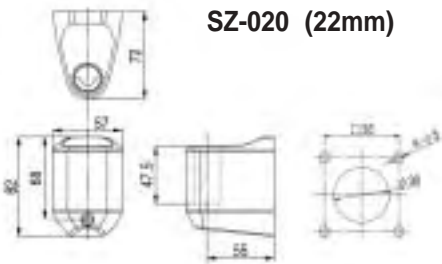
Rubber Gaskets (mm)

SZ-200A

SZ-210

SZ-904 3/4" NPT Adapter
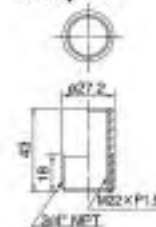
MODEL	PRODUCT
SZ-50L, SZ-50T	LU7
SZ-30L, SZ-30T	KJS, KX-T, PES, RU, RS, RH-AUL, RK-AUL, SKH-A, SKH-EA
SZ-010, SZ-016, SZ-017 SZ-020, SZ-904	RUP, SZ-30L, SZ-30T, SZ-50L, SZ-50T
SZ-200A	KX-T, RH-AUL, RK-AUL, SKH-EA
SZ-210	PES, RU, RS

Mounting Brackets (mm)

SZ-013

(Pole is not included)

MODEL	PRODUCT
SZ-013	RUP, SZ-30L, SZ-30T, SZ-50L, SZ-50T

SZ-007

MODEL	PRODUCT
SZ-007	KJS, KX-T, LU7, PES, PEW, RH-AUL, RK-AUL, RU, RS, SKH-A, SKH-EA

SZ-008

MODEL	PRODUCT
SZ-008	KG, KJ, KP-A, LGEH, LGH, RT, SB-06, SKC, SKL-SA, SKLB, SKP-A, SKR, XP

Replacement Bulbs

TYPE	BULB No.	WATTAGE	PART No.
G18/BA15S	5	12V15W	LMP-0071
	6	24V20W	LMP-0072
	9	12V10W	LMP-0099
	10	24V10W	LMP-0100
	11	12V5W	LMP-0093
T20/E12	7	12V10W	LMP-0097
	8	12V5W	LMP-0091
	12	30V10W	LMP-0098
	13	24V5W	LMP-0060
	14	110V10W	LMP-0094
	15	140V10W	LMP-0066
	16	140V5W	LMP-0061
	17	110V15W	LMP-0119
	18	220V15W	LMP-0120
	19	240V10W	LMP-0053
G14/BA9S	20	12V6W	LMP-0116
	21	24V6W	LMP-0117
	22	140V3W	LMP-0121
T10/E10	23	140V5W	LMP-0125
	24	110V5W	LMP-0110
	26	240V5W	LMP-0112
	27	12V0.11A	LMP-0113
	28	24V0.11A	LMP-0108
T20/BA15D	39	28V11W	LMP-0226
	40	110V12W	LMP-0211
	41	250V11W	LMP-0225
	49	140V13W	LMP-0214

TYPE	BULB No.	WATTAGE	PART No.
T20/BA15D	50	28V20W	LMP-0328
	52	140V20W	LMP-0314
	53	250V20W	LMP-0325
RP35/BA15S	56	12V35W	LMP-0004
	57	24V35W	LMP-0005
RP35/BA15D	60	120V40W	LMP-0092
	61	240V30W	LMP-0052
	62	48V35W	LMP-0006
	63	220V30W	LMP-0007
T10/BA15S	70	12V55W	LMP-0079
	71	24V70W	LMP-0080

LED-Lamps

TYPE		COLOR	VOLTAGE	PART NO.
For: LGH-FKA (24V type) BA15D		RED	24V	DE24D-R
		YELLOW	24V	DE24D-Y
		GREEN	24V	DE24D-G
		BLUE	24V	DE24D-B
		CLEAR	24V	DE24D-C

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Head Office, Japan

Technical Center, Japan

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