

### PRODUCT SPECIFICATION

QTG Series

**Materials** Lens-PC, Housing-ABS, Pole-Al

**Ambient operating temperature** -30°C to +50°C

**Volume** Max.85dB at 1m

**Protection rating** Standard type-IP65, Built-in buzzer type-IP54

**Flashing rate** 60-80/min

**Compliant with RoHS directive**

- Modular LED steady/flashing type signal tower lights
- Excellent visibility from a distance with the use of a special color diffusing lens
- Can select from size selections of Ø50mm, Ø60mm, and Ø70mm to fit your sophisticated application needs
- The addition of modules and change in color arrangement can be achieved without the use of tools by using the Lock-type structure
- QTGA type offers a nifty integrated lens and cover for a simple aesthetically pleasing product
- A variety of Mounting bracket selections for the pole mount type to fit your location and mounting needs
- Standard model and built-in buzzer model can be used by selecting the specifications suitable for the operating environment.
- Available in 2 customized options; sounds buzzer type and high volume(100dB) buzzer type
- Wired type and M12 connector type allow for a customized model that M12 connector can be attached at the end of wires.
- Transistors can be connected and can be operated on PLC directly



#### Each modular color lens can be added without additional tools



QTG model uses a special contact structure for stable operation, the lens modules lock into place by rotating the modular structures together. This allows for easy changes to the color arrangement without any tools. Additional modules can be added.



**1 High volume buzzer(100dB) option can be fitted to the top of the product(Customization).**  
High volume 100dB volume buzzer module fastened to the top of the product provides 360 degree buzzer signal output which cannot be achieved with the single directional buzzer.(Buzzer volume cannot be adjusted)

**2 Integrated cover and lens model(QTGA50 / QTGA60 / QTGA70)**  
QTGA50 / QTGA60 / QTGA70 the sleek lens cover model is made of one piece for a simple unified look.

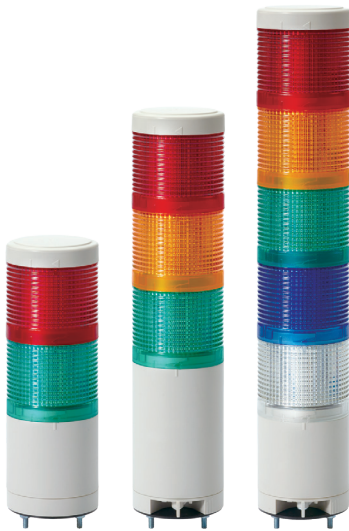
**3 Buzzer volume is adjusted via the volume control lever**  
QTG type volume can be adjusted for each specific working condition with the equipped buzzer volume control lever at the bottom of the product.(-BZ type)

**4 M12 connector attached type(Customization)**  
Pre-wired is standard. Can customize the product with the M12 connector if requested.

**5 Can select from a variety of Mounting brackets option to fit your application needs and build environment**  
There are a variety of Mounting bracket options available depending on cost and installation requirements.

# Ø60mm LED Steady/Flashing Tower Lights

## QTG60ML / QTG60L



QTG60ML Series



QTGA60ML Series



### QTG60ML Ø60mm Direct mount, LED Steady/Flashing

Model number	Layers	Voltage	Certificates	Weight	Color
QTG60ML Steady	1	DC12V		0.26kg	● R-Red
QTG60ML-BZ Steady w/built-in buzzer		DC24V		0.26kg	
		AC110V-220V		0.36kg	
QTG60MLF Steady/Flashing	2	DC12V		0.34kg	● R-Red ● G-Green
QTG60MLF-BZ Steady/Flashing w/ built-in buzzer		DC24V		0.44kg	
	3	DC12V	CE UL	0.43kg	● R-Red ● A-Amber ● G-Green
QTGA60ML Steady		DC24V		0.43kg	
QTGA60ML-BZ Steady w/built-in buzzer		AC110V-220V		0.53kg	
QTGA60MLF Steady/Flashing	4	DC12V		0.51kg	● R-Red ● A-Amber ● G-Green ● B-Blue
QTGA60MLF-BZ Steady/Flashing w/ built-in buzzer		DC24V		0.51kg	
		AC110V-220V		0.61kg	
	5	DC12V		0.59kg	● R-Red ● A-Amber ● G-Green ● B-Blue ○ W-White
		DC24V		0.59kg	
		AC110V-220V		0.69kg	

※ AC type model has a free-voltage range of 100V-240V.

※ UL Listed: DC24V

### Light source/buzzer current(based on 1 layer)

Voltage	DC12V	DC24V	AC110V~220V
Light source current(1 layer)	0.105A	0.070A	Max.0.060A
Buzzer current	0.040A	0.075A	Max.0.055A

### Wiring Instructions

- External power line UL1015 AWG18(0.75sq) x 2C 400mm
- External signal line UL1007 AWG22(0.3sq) 400mm
- LED tower light can be wired by using transistor and External Contact

### Customization

- DC24V voltage UL listed product
- M12 connector attached type
- 2 buzzer sound types : Both prolonged (beep, beep) and staccato (beep, beep, beep) buzzer output available
- Wall mount bracket options : Bracket structure allows for threading through the bracket hole or into the wall
- Top high-volume buzzer module mounted (lens limited to 4 stages or less)



Wall mount bracket  
TWS45



Wall mount bracket  
TWA45

### Ordering Specifications

QTG60ML	-	3	-	110/220	-	RAG
[Model number]		[Layers]		[Voltage]		[Color]
QTG60ML		1-1 Layers		12-DC12V		● R-Red
QTG60ML-BZ		2-2 Layers		24-DC24V		● A-Amber
QTG60MLF		3-3 Layers		110/220-AC110V-220V		● G-Green
QTG60MLF-BZ		4-4 Layers				● B-Blue
QTGA60ML		5-5 Layers				○ W-White
QTGA60ML-BZ						
QTGA60MLF						
QTGA60MLF-BZ						



High-volume buzzer module



## QTG60L Ø60mm Pole mount, LED Steady/Flashing

Model number	Layers	Voltage	Certificates	Weight	Color
QTG60L Steady	1	DC12V	CE UL	0.26kg	R-Red
QTG60L-BZ		DC24V		0.26kg	
Steady w/built-in buzzer		AC110V-220V		0.36kg	
QTG60LF Steady/Flashing	2	DC12V		0.34kg	R-Red
QTG60LF-BZ		DC24V		0.34kg	G-Green
Steady/Flashing w/ built-in buzzer		AC110V-220V		0.44kg	
QTGA60L Steady	3	DC12V		0.43kg	R-Red
QTGA60L-BZ		DC24V		0.43kg	A-Amber
Steady w/built-in buzzer		AC110V-220V		0.53kg	G-Green
QTGA60LF Steady/Flashing	4	DC12V		0.51kg	R-Red
QTGA60LF-BZ		DC24V		0.51kg	A-Amber
Steady/Flashing w/ built-in buzzer		AC110V-220V		0.61kg	G-Green
	5	DC12V		0.59kg	B-Blue
		DC24V		0.59kg	
		AC110V-220V		0.69kg	W-White

※ AC type model has a free-voltage range of 100V-240V.

※ UL Listed: DC24V



QTG60L Series

### Light source/buzzer current(based on 1 layer)

Voltage	DC12V	DC24V	AC110V~220V
Light source current(1 layer)	0.105A	0.070A	Max.0.060A
Buzzer current	0.040A	0.075A	Max.0.055A

### Wiring Instructions

- External power line UL1015 AWG18(0.75sq) x 2C 400mm
- External signal line UL1007 AWG22(0.3sq) 400mm
- LED tower light can be wired by using transistor and External Contact

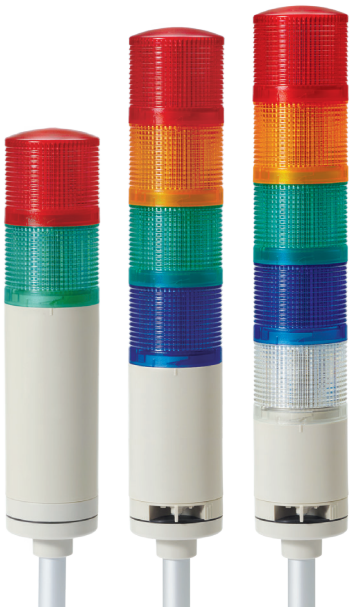
### Mounting bracket

Standard	LB18	LW18	QZ18	SZ18	QL18	SL18
Steel	Steel	ABS	ABS	Al	ABS	Al

※ Please refer to [Tower Light Mounting bracket] on this catalogue for detailed dimensions

### Ordering Specifications

QTG60L	-	3	-	110/220	-	RAG	-	LW18
[Model number]		[Layers]		[Voltage]		[Color]		[Bracket]
QTG60L		1-1 Layers		12-DC12V		R-Red		None-Standard
QTG60L-BZ		2-2 Layers		24-DC24V		A-Amber		Bracket
QTG60LF		3-3 Layers		110/220-AC110V-220V		G-Green		-LB18 -LW18
QTG60LF-BZ		4-4 Layers				B-Blue		-QZ18 -SZ18
QTGA60L		5-5 Layers				W-White		-QL18 -SL18
QTGA60L-BZ								
QTGA60LF								
QTGA60LF-BZ								



QTGA60L Series

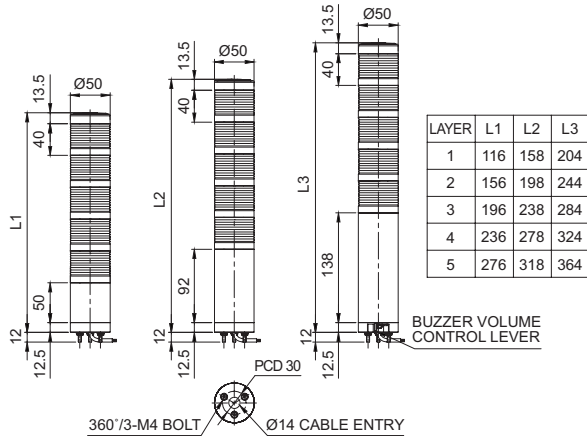
### Customization

- 2 buzzer sound types : Both prolonged(beep, beep) and staccato(beep, beep, beep) buzzer output available
- DC24V voltage UL listed product
- M12 connector attached type
- Customized pole length available
- Top high-volume buzzer module mounted (lens limited to 4 stages or less)

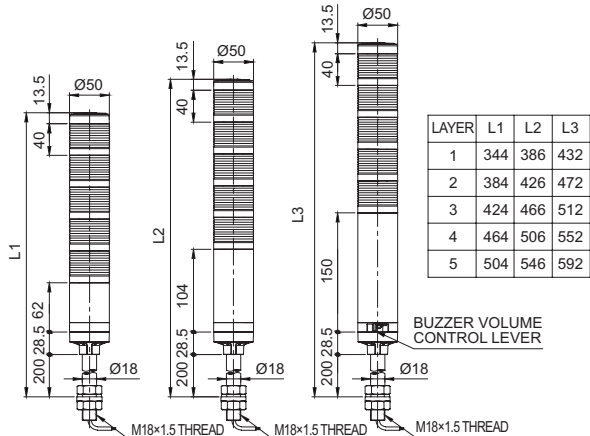
## Technical Diagram

Units : mm

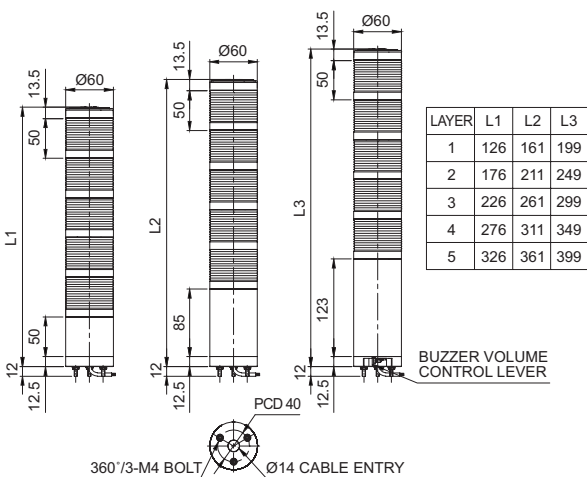
- QTG50ML-DC
- QTG50MLF-DC
- QTG50ML-BZ-DC
- QTG50ML-AC
- QTG50MLF-BZ-DC
- QTG50MLF-AC
- QTG50ML-BZ-AC
- QTG50MLF-BZ-AC



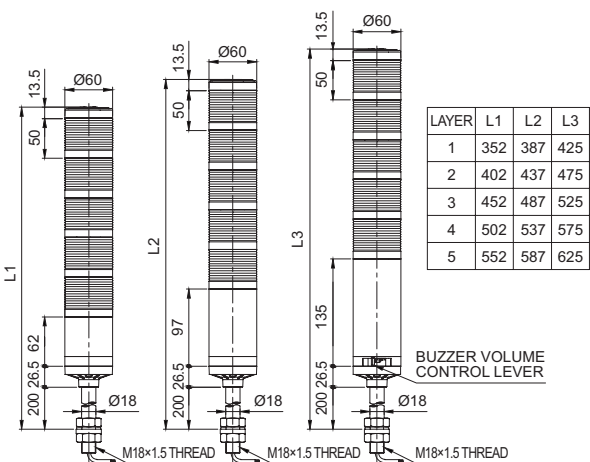
- QTG50L-DC
- QTG50LF-DC
- QTG50L-BZ-DC
- QTG50L-AC
- QTG50LF-BZ-DC
- QTG50LF-AC
- QTG50L-BZ-AC
- QTG50LF-BZ-AC



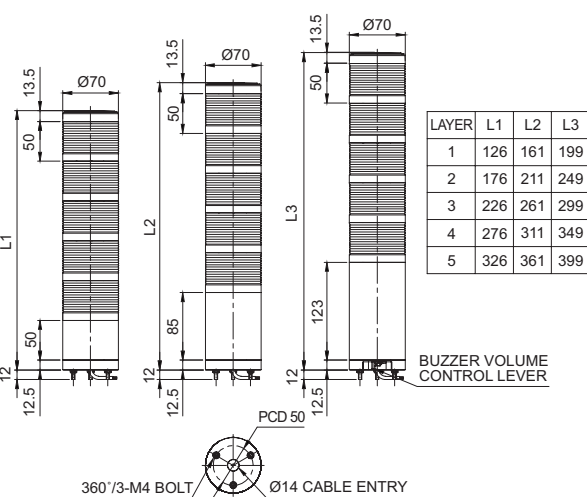
- QTG60ML-DC
- QTG60MLF-DC
- QTG60ML-BZ-DC
- QTG60ML-AC
- QTG60MLF-BZ-DC
- QTG60MLF-AC
- QTG60ML-BZ-AC
- QTG60MLF-BZ-AC



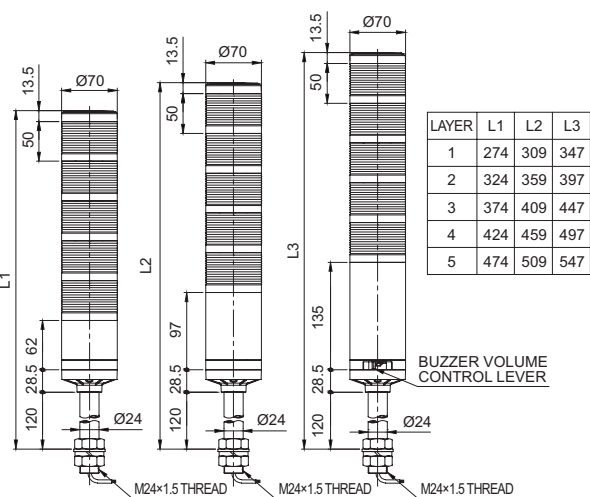
- QTG60L-DC
- QTG60LF-DC
- QTG60L-BZ-DC
- QTG60L-AC
- QTG60LF-BZ-DC
- QTG60LF-AC
- QTG60L-BZ-AC
- QTG60LF-BZ-AC



- QTG70ML-DC
- QTG70MLF-DC
- QTG70ML-BZ-DC
- QTG70ML-AC
- QTG70MLF-AC
- QTG70ML-BZ-AC
- QTG70MLF-BZ-AC
- QTG70MLF-BZ-DC



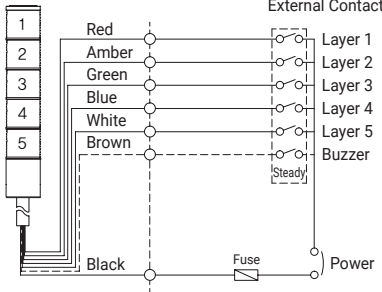
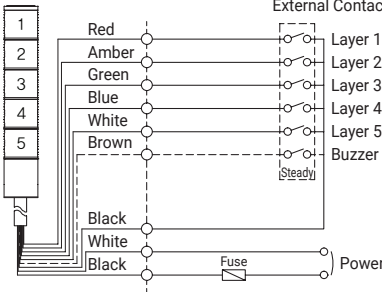
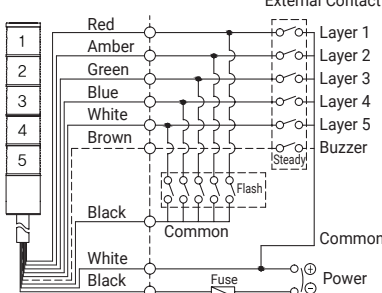
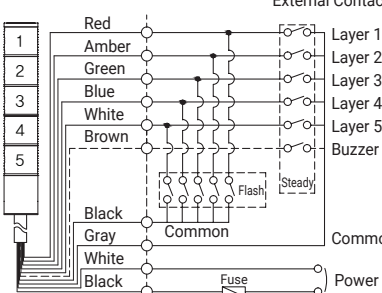
- QTG70L-DC
- QTG70LF-DC
- QTG70L-BZ-DC
- QTG70L-AC
- QTG70LF-AC
- QTG70L-BZ-AC
- QTG70LF-BZ-AC
- QTG70LF-BZ-DC





### Wiring Instructions(using External Contact)

· In case of wiring with External Contacts, refer to the wiring diagrams below according to your product's type and voltage setting.

Wiring Instructions		Wiring Instructions	
DC Steady		AC Steady	
<p>QTG50ML QTG50L QTG60ML QTG60L QTG70ML QTG70L QTC50ML QTC50L QTC60ML QTC60L QTC70ML QTC70L QTR50ML QTR50L QTR60ML QTR60L QTR70ML QTR70L</p>	 <p>· QTG(A) □□ (M)L - Buzzer same wiring instruction · QTC(A) □□ (M)L - Buzzer same wiring instruction · QTR(A) □□ (M)L - Buzzer same wiring instruction · QTG □□ L · QTC □□ L · QTR □□ L</p> <p>└ Lens diameter 50(50mm): QTR50(M)L 60(60mm): QTR60(M)L 70(70mm): QTR70(M)L</p>	<p>QTG50ML QTG50L QTG60ML QTG60L QTG70ML QTG70L QTC50ML QTC50L QTC60ML QTC60L QTC70ML QTC70L QTR50ML QTR50L QTR60ML QTR60L QTR70ML QTR70L</p>	 <p>· QTG(A) □□ (M)L - Buzzer same wiring instruction · QTC(A) □□ (M)L - Buzzer same wiring instruction · QTR(A) □□ (M)L - Buzzer same wiring instruction · QTG □□ L · QTC □□ L · QTR □□ L</p> <p>└ Lens diameter 50(50mm): QTR50(M)L 60(60mm): QTR60(M)L 70(70mm): QTR70(M)L</p>
DC Steady/ Flashing		AC Steady/ Flashing	
<p>QTG50MLF QTG50LF QTG60MLF QTG60LF QTG70MLF QTG70LF QTC50MLF QTC50LF QTC60MLF QTC60LF QTC70MLF QTC70LF QTR50MLF QTR50LF QTR60MLF QTR60LF QTR70MLF QTR70LF</p>	 <p>· QTG(A) □□ (M)LF - Buzzer same wiring instruction · QTC(A) □□ (M)LF - Buzzer same wiring instruction · QTR(A) □□ (M)LF - Buzzer same wiring instruction · QTG □□ LF · QTC □□ LF · QTR □□ LF</p> <p>└ Lens diameter 50(50mm): QTR50(M)LF 60(60mm): QTR60(M)LF 70(70mm): QTR70(M)LF</p>	<p>QTG50MLF QTG50LF QTG60MLF QTG60LF QTG70MLF QTG70LF QTC50MLF QTC50LF QTC60MLF QTC60LF QTC70MLF QTC70LF QTR50MLF QTR50LF QTR60MLF QTR60LF QTR70MLF QTR70LF</p>	 <p>· QTG(A) □□ (M)LF - Buzzer same wiring instruction · QTC(A) □□ (M)LF - Buzzer same wiring instruction · QTR(A) □□ (M)LF - Buzzer same wiring instruction · QTG □□ LF · QTC □□ LF · QTR □□ LF</p> <p>└ Lens diameter 50(50mm): QTR50(M)LF 60(60mm): QTR60(M)LF 70(70mm): QTR70(M)LF</p>

· DC steady type cable specification: External power line/External signal line UL1007 AWG22(0.3sq) 400mm

· AC steady, AC/DC steady/flashing type cable specification: External power line UL1015 AWG18(0.75sq) x 2C 400mm

External signal line UL1007 AWG22(0.3sq) 400mm

## Wiring Instructions(using transistor)

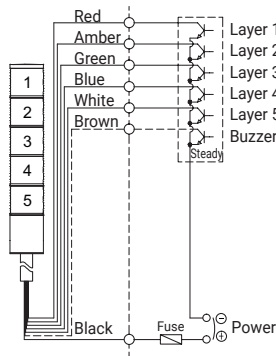
· In case of wiring with transistors, please select the proper transistor type : either NPN or PNP based on the source voltage setting.

### Wiring Instructions

#### DC Steady

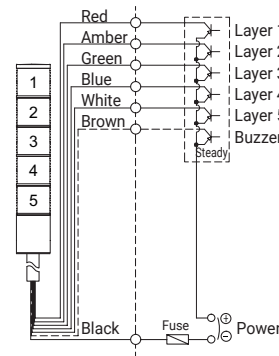
QTG50ML  
QTG50L  
QTG60ML  
QTG60L  
QTG70ML  
QTG70L  
QTC50ML  
QTC50L  
QTC60ML  
QTC60L  
QTC70ML  
QTC70L  
QTR50ML  
QTR50L  
QTR60ML  
QTR60L  
QTR70ML  
QTR70L

External Transistor



- QTG(A) □□ (M)L - Buzzer same wiring instruction
- QTC(A) □□ (M)L - Buzzer same wiring instruction
- QTR(A) □□ (M)L - Buzzer same wiring instruction
- QTG □□ L
- QTC □□ L
- QTR □□ L
- └ Lens diameter 50(50mm): QTR50(M)L  
60(60mm): QTR60(M)L  
70(70mm): QTR70(M)L

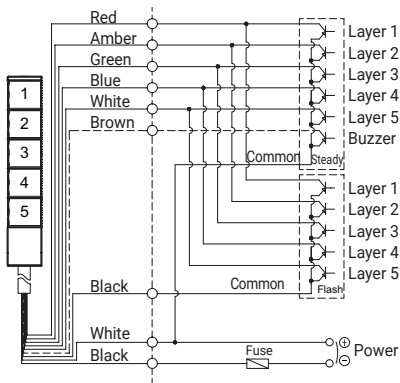
External Transistor



#### DC Steady/ Flashing

QTG50MLF  
QTG50LF  
QTG60MLF  
QTG60LF  
QTG70MLF  
QTG70LF  
QTC50MLF  
QTC50LF  
QTC60MLF  
QTC60LF  
QTC70MLF  
QTC70LF  
QTR50MLF  
QTR50LF  
QTR60MLF  
QTR60LF  
QTR70MLF  
QTR70LF

External Transistor

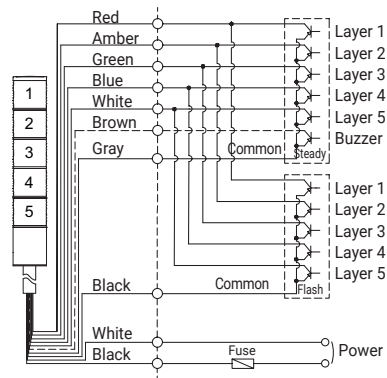


- QTG(A) □□ (M)LF - Buzzer same wiring instruction
- QTC(A) □□ (M)LF - Buzzer same wiring instruction
- QTR(A) □□ (M)LF - Buzzer same wiring instruction
- QTG □□ LF
- QTC □□ LF
- QTR □□ LF
- └ Lens diameter 50(50mm): QTR50(M)LF  
60(60mm): QTR60(M)LF  
70(70mm): QTR70(M)LF

#### AC Steady/ Flashing

QTG50MLF  
QTG50LF  
QTG60MLF  
QTG60LF  
QTG70MLF  
QTG70LF  
QTC50MLF  
QTC50LF  
QTC60MLF  
QTC60LF  
QTC70MLF  
QTC70LF  
QTR50MLF  
QTR50LF  
QTR60MLF  
QTR60LF  
QTR70MLF  
QTR70LF

External Transistor



- QTG(A) □□ (M)LF - Buzzer same wiring instruction
- QTC(A) □□ (M)LF - Buzzer same wiring instruction
- QTR(A) □□ (M)LF - Buzzer same wiring instruction
- QTG □□ LF
- QTC □□ LF
- QTR □□ LF
- └ Lens diameter 50(50mm): QTR50(M)LF  
60(60mm): QTR60(M)LF  
70(70mm): QTR70(M)LF

· DC steady type cable specification: External power line/External signal line UL1007 AWG22(0.3sq) 400mm

· AC steady, AC/DC steady/flashing type cable specification: External power line UL1015 AWG18(0.75sq) x 2C 400mm  
External signal line UL1007 AWG22(0.3sq) 400mm