

# U060 LIGHTWAY INGROUND

## Product Installation Guide



**WARNING:**  
THE SAFETY OF THIS FIXTURE IS GUARANTEED ONLY IF YOU COMPLY WITH THESE INSTRUCTIONS

**ON**  
**OFF**

MAKE SURE THE POWER IS OFF DURING INSTALLATION

# IP67

## 1 Installation Conditions

**40°C**

THE LOW SURFACE TEMPERATURE (40°C) IMPOSE NO LIMITS ON INSTALLATION

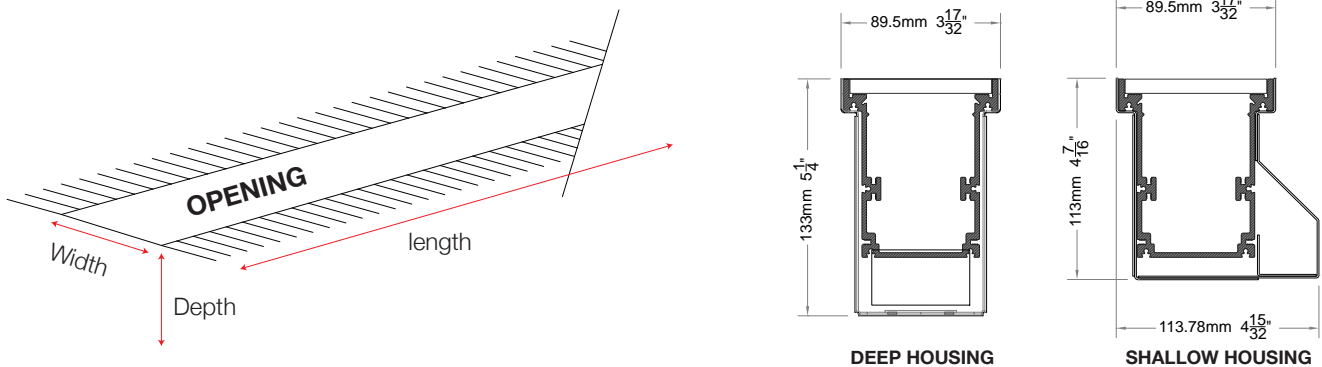
CAUTION  
SLIPPING HAZARD

**15 000 N**

THE FITTINGS HAVE BEEN DESIGNED AND TESTED TO WITHSTAND A STATIC LOAD OF 10000 N (BASED ON THE OUTER CASING) FOR INSTALLATION EXCLUSIVELY IN PEDESTRIAN OR BICYCLE AREAS

**IK 10**

### PREPARE THE GROUND CONDITIONS ACCORDING TO THE DIMENSION TABLE



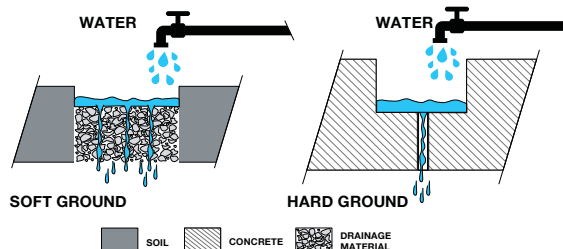
\*SHALLOW HOUSING NOT SUITABLE FOR CONTINUOUS RUNS OF BAFFLED WALLGRAZER

Housing Sizes		Housing Type					
		Deep			Shallow		
		Length	Width	Depth	Length	Width	Depth
<b>UL System</b>	1 ft	1 ft-0 <sup>19/32</sup> in	3 <sup>21/32</sup> in	5 <sup>29/32</sup> in	1 ft-2 <sup>49/64</sup> in	4 <sup>1/4</sup> in	4 <sup>29/64</sup> in
	2 ft	2 ft-0 <sup>11/64</sup> in	3 <sup>21/32</sup> in	5 <sup>29/32</sup> in	2 ft-2 <sup>11/32</sup> in	4 <sup>1/4</sup> in	4 <sup>29/64</sup> in
	3 ft	2 ft-11 <sup>3/4</sup> in	3 <sup>21/32</sup> in	5 <sup>29/32</sup> in	3 ft-1 <sup>29/32</sup> in	4 <sup>1/4</sup> in	4 <sup>29/64</sup> in
	4 ft	3 ft-11 <sup>21/64</sup> in	3 <sup>21/32</sup> in	5 <sup>29/32</sup> in	4 ft-1 <sup>31/64</sup> in	4 <sup>1/4</sup> in	4 <sup>29/64</sup> in
	5 ft	4 ft-10 <sup>57/64</sup> in	3 <sup>21/32</sup> in	5 <sup>29/32</sup> in	5 ft-1 <sup>1/16</sup> in	4 <sup>1/4</sup> in	4 <sup>29/64</sup> in
<b>CE System</b>	30 cm	320 mm	93 mm	133 mm	375 mm	108 mm	113 mm
	60 cm	614 mm	93 mm	133 mm	669 mm	108 mm	113 mm
	90 cm	908 mm	93 mm	133 mm	963 mm	108 mm	113 mm
	120 cm	1202 mm	93 mm	133 mm	1257 mm	108 mm	113 mm
	150 cm	1496 mm	93 mm	133 mm	1551 mm	108 mm	113 mm

### WARNING

FAILURE TO PROVIDE PROPER DRAINAGE WILL VOID PRODUCT WARRANTY

A PROPER WATER DRAINAGE SYSTEM IS REQUIRED WITH A MINIMUM RATE OF 0.087 GAL (0.33 LITER) PER MINUTE PER METER ACCORDING TO THE TABLE:



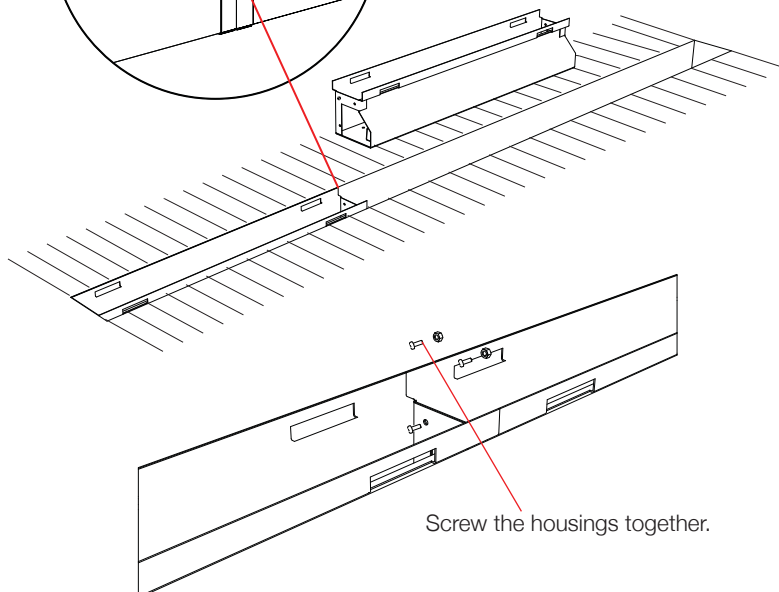
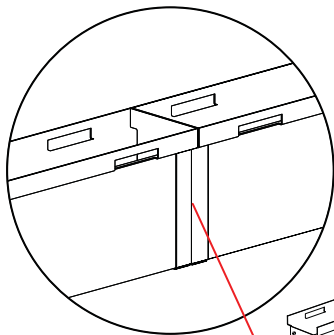
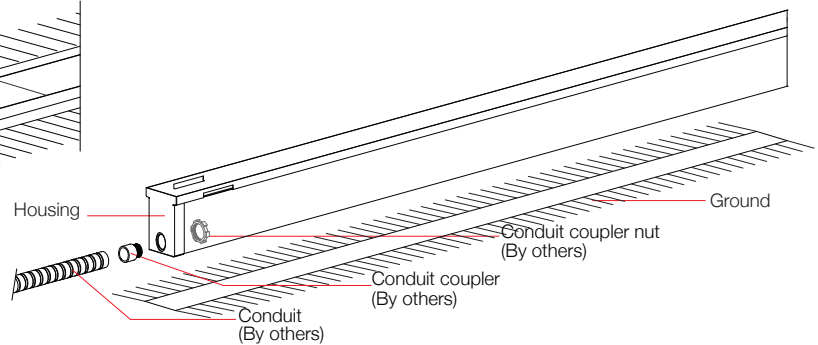
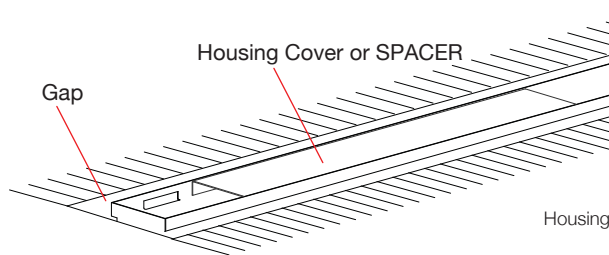
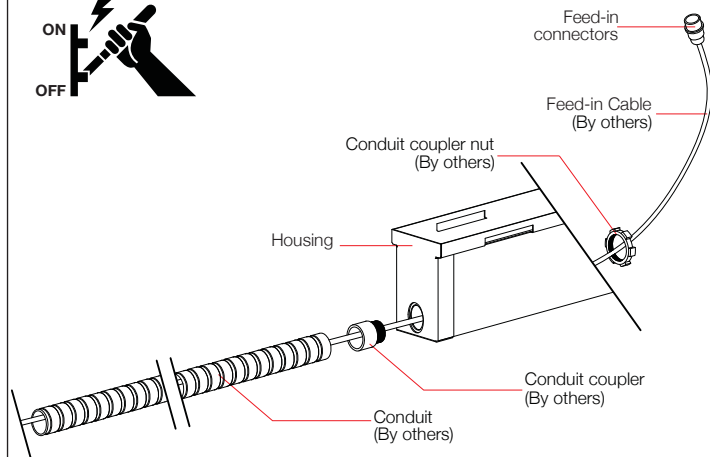
Length	Minimum Drainage Rate
1 ft (30cm)	0.026 gal/min (0.1 l/min)
2 ft (60cm)	0.053 gal/min (0.2 l/min)
3 ft (90 cm)	0.079 gal/min (0.3 l/min)
4 ft (120 cm)	0.105 gal/min (0.4 l/min)
5 ft (150 cm)	0.132 gal/min (0.5 l/min)

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**⚠ WARNING:**

Shock hazard. Serious injury or death may occur. Turn Off power before servicing or installing. Wire according to local and national codes. This product shall be installed by a qualified electrician



**2 Cables and Conduit Installation**

Locate Housing hole(s). (Please note that continuous runs intermediate housing have holes at both ends for daisy-chain configurations).

Lay down conduits. Tighten conduits loosely to the housing using couplers.

Use conduits and couplers that are appropriate for your installation.

Run the leader cable through conduits. Run jumper cables through the conduits. Leave enough cable length inside the housing to allow easy access from the top of the Housing.

**Connect Feed-in Connector to Leader Feed-in Cable as per the instructions provided on Page 4. Provide power and test connections. See Wiring Details on Page 3 & 4 for reference.**

Once the electrical connections have been tested, secure conduits and couplers tightly.

Make sure sealing caps are installed on all opened connectors.

**3 Housing Installation**

When installed in an existing slab, make sure to leave at least a 1" (25mm) gap around the housing to secure housing by pouring mortar and filling the gap.

For installation in soft ground or dirt, leave 3" to 4" gap around the housing to secure with concrete.

Before Laying the housing in the ground make sure to cover it with the temporary pouring SPACER (Housing Cover) provided with housing. Prevent any debris from getting into the housing.

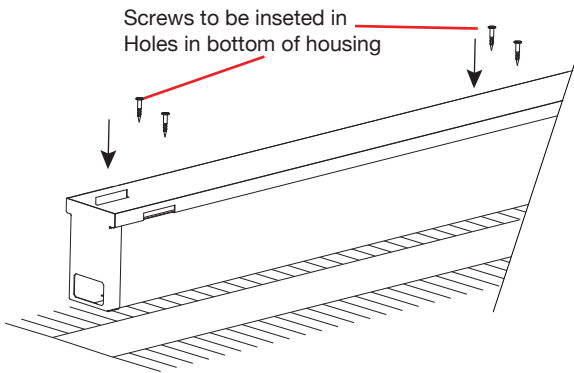
The same above steps apply to **the shallow housing** as shown in figures on the left.

For continuous runs place housings end-to-end making sure no debris falls between the consecutive housings.

Once the housings are placed in proper locations, secure them together with the screws and nuts provided with housings. Make sure there are no gaps between the housings

Follow instructions on next page for correct leveling of housing in ground

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**Step 3 (Continued)**

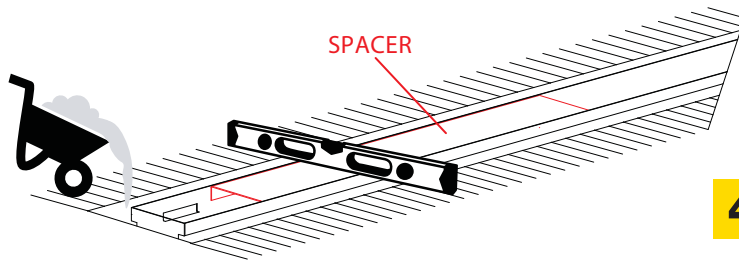
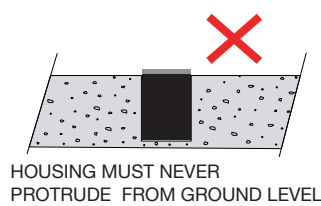
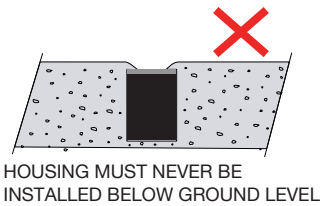
When installed in a hard surface (Concrete for example), housing must be anchored with an anchoring system compatible with the surface material. Screws are fastened through the holes in the bottom of the housing.

Housing must be leveled and flush with finished floor level. **Failure to do so will void the product warranty.**

The same above steps apply to **the shallow housing**. Dimensions of both housing options are shown on page 1.

It is imperative to use the Housing Cover (Spacer) during the whole installation process, especially at the time of pouring concrete around the housing or filling the gap around the housing with infill material. The Spacer will prevent the housing aperture to be damaged, deformed or to buckle under the weight of the infill. **Failure to use the Spacer can cause the fixture not to fit in place when installed in the housing.**

Pour concrete around the Housing. Then clean the top of the Housing to remove any excess concrete that may prevent cover removal. Concrete should be flush with the top of the blackout

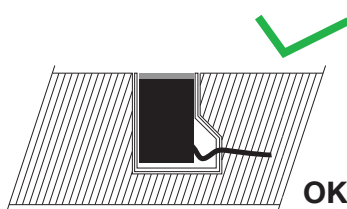
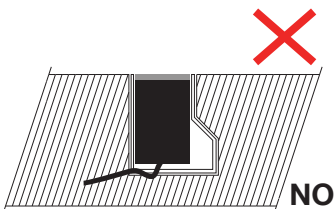


**HOUSING SPACER SHOULD BE USED DURING INSTALLATION TO AVOID HOUSING APRETURE BEING DEFORMED BY ACCIDENT**

**4**

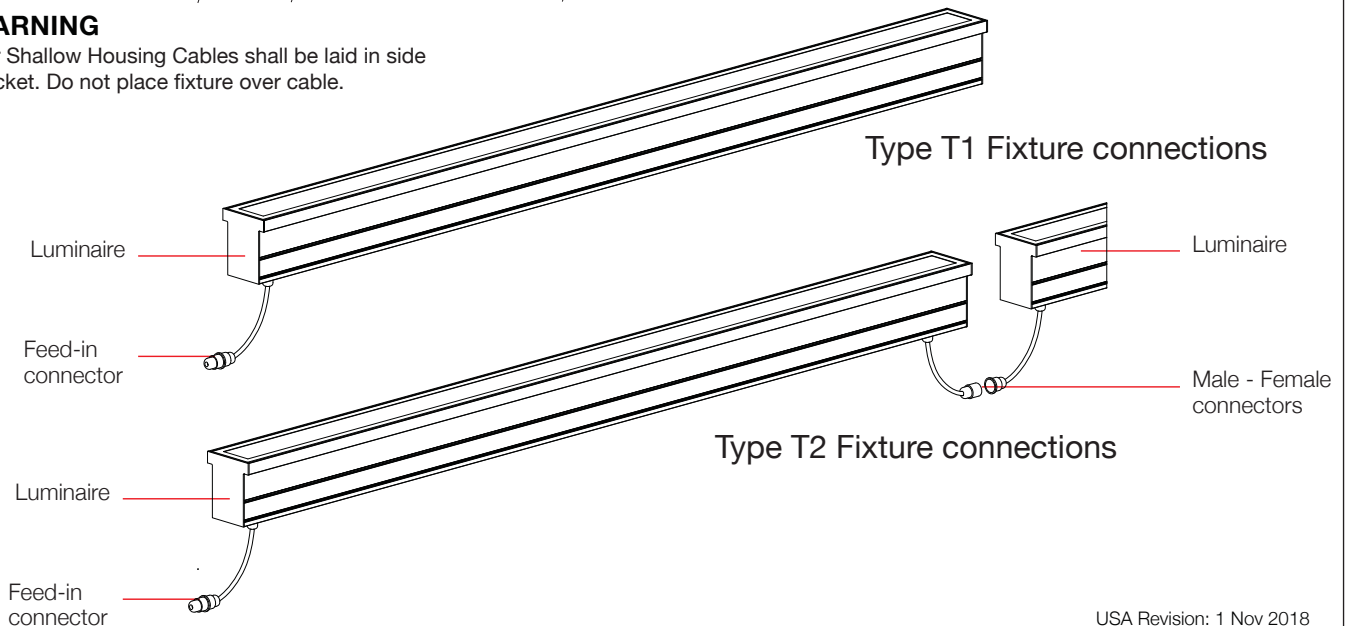
Refer to next page for wiring instructions. Follow carefully wiring diagram for various dimming protocols.

Before beginning the wiring process, double check the type of connection specified. **T1 Type fixture only have an input, and cannot be used for daisy chained fixtures. CONTINUOUS RUNS, Type T2 fixtures have though wiring and are meant to be daisy chained.**



**WARNING**

For Shallow Housing Cables shall be laid in side pocket. Do not place fixture over cable.



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**4** Wiring Instructions (Continued)

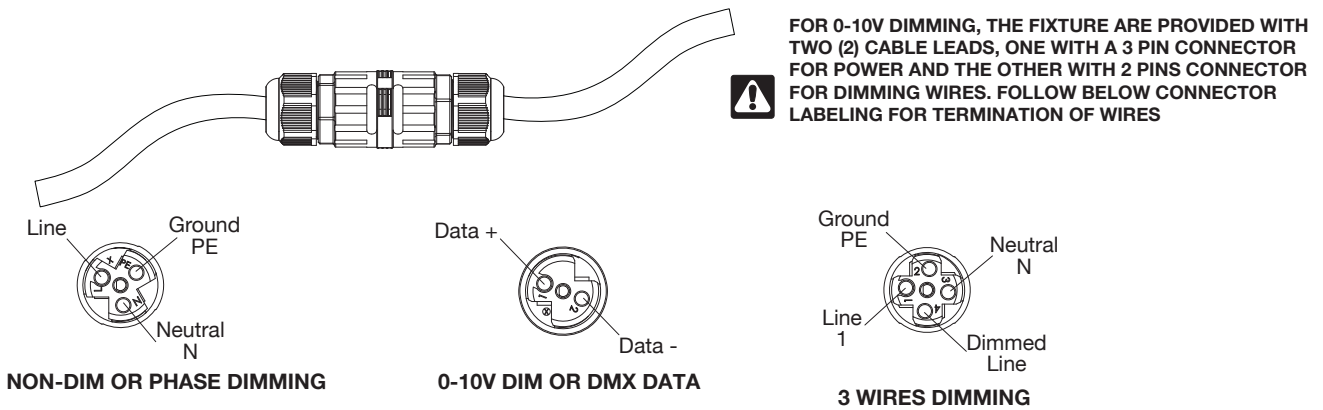
WIRING COLOR CODES								
	GROUND	LINE	NEUTRAL	DIMMED LINE	0-10V +	0-10v -	DALI +	DALI -
<b>UL System</b>	GREEN	BLACK	WHITE	ORANGE	RED	GREY	RED	ORANGE
<b>CE System</b>	YELLOW / GREEN	BROWN	BLUE	N/A	RED	BLACK	RED	BLACK

**LINE-TO-LINE CONNECTOR:**

When Provided with Line-to-Line Connectors, fixtures will be Type 2 (Daisy chained) as show on page 3 and will have an Input cable and an Output cable with specific length. **These Cables shall be connected and terminated On-site.**

Line-to-Line Connectors will have a separate instruction manual included in the fixture's packaging, giving detailed instructions on how to connect the leads properly. This step requires following the below wire labeling closely to prevent any damage to the fixtures.

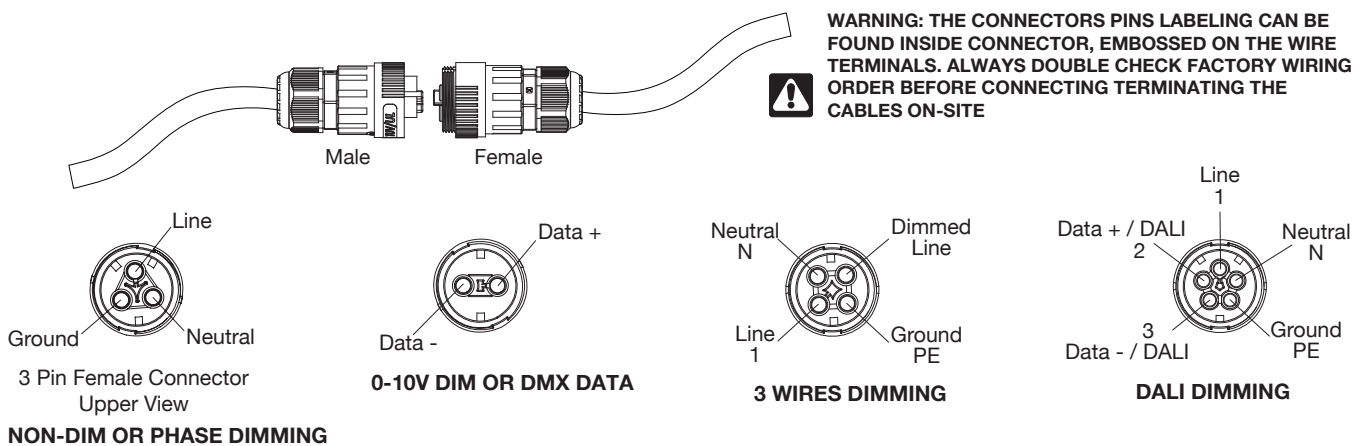
**FAILURE TO FOLLOW THE WIRING COLOR CODING AND CONNECTORS PIN LABELING WILL VOID THE FIXTURES WARRNTY**



**MALE / FEMALE CONNECTOR:**

When fixtures are ordered for continuous runs, (Daisy Chained), fixtures will be provided with MALE / FEMALE Connectors. Connectors are factory installed on Input and Output cables leads.

**FAILURE TO FOLLOW THE WIRING COLOR CODING AND CONNECTORS PIN LABELING WILL VOID THE FIXTURES WARRNTY**



**Wiring Instructions for continuous runs (Daisy Chained Fixtures)**

		Electrical information										
System	Voltage	Max daisy chain length (A minimum of 18 AWG or 0.75 <sup>2</sup> mm is required)										
		L1	L2	L3	L4	L5	P1	P2	P3	M1	M2	M3
UL	120VAC - 60 Hz	135 ft	100 ft	70 ft	50 ft	36 ft	70 ft	50 ft	36 ft	54 ft	38 ft	27 ft
CE	220VAC - 50/60 Hz	62 m	45 m	33 m	23 m	17 m	33 m	23 m	17 m	25 m	18 m	13 m

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