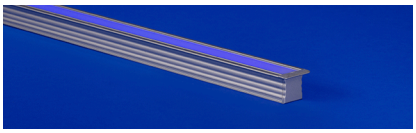
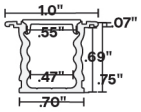
ESSENTIALS FLUR™-FLAT (01) RGBW HIGH EFFICACY

24VDC Linear Fixtures - Recessed





- Deep flanged recessed fixture
- Choose from diffused, polar, or frosted lens options for varying diode visibility and beam angles
- Stainless steel mounting clips
- Features painted end caps to match extrusion finish
- Red, Green, and Blue LED paired with a specifiable white LED allow for color changing applications
- 21 diodes per 2" cutpoint allowing for minimal diode visibility

INFORMATION REQUIRED FOR LIGHTING SCHEDULE

1 PRODUCT	2 WATTS/ FT	3 CCT	4 RATED	5 EFFICIENCY	6 LENS

ADDITIONAL INFORMATION REQUIRED TO ORDER

7 WIRE INPUT/ OUTPUT	8 CONNECTOR/ WIRE IN	9 CONNECTOR/ WIRE OUT	10 WIRE COLOR	11 WIRE TYPE	12 MOUNTING	13 FINISH	14 LENGTH (IN)	15 EXACT/ OPTIMAL
					SST			

Sample Part Number: **FL1RGBW-4.0HE-30-DRY-WO-DF-P1-BW-BW-BK-CL2-SST-BK-48"-E**

1 PRODUCT

FL1RGBW
See following pages for compatible power supplies.

FL1RGBW

2 WATTS/FT

4.0HE 4.0W/ft HE

8.0HE 8.0W/ft HE

3 CCT

27	RGBW-2700K
30	RGBW-3000K
35	RGBW-3500K
40	RGBW-4000K

27	RGBW-2700K
30	RGBW-3000K
35	RGBW-3500K
40	RGBW-4000K

4 RATED

DRY	IP20
DMP	IP54

DRY	IP20

5 EFFICIENCY

STD	Standard
WO	White Optics

WhiteOptics - Internal coating, greater lumen output

6 LENS

DF	Diffused
PR	Polar
FR	Frosted

For representation of LED visibility, see Diode Visibility section on following pages. For beam angles, see Photometric Performance section on following pages

7 WIRE INPUT/OUTPUT

SINGLE (Input only)

S1	End Feed
S2	Bottom Feed

PASS THROUGH (Input/output)

P1	End Feed
P2	Bottom Feed

For continuous mounting, consider bottom feed.

8 CONNECTOR/WIRE IN

BW	Bare Wire (Standard 24")
CON6	Connector 6"
CON24	Connector 24"

BW	Bare Wire (Standard 24")
CON6	Connector 6"
CON24	Connector 24"

BW: Standard length is 24", Max length is 120". Request custom length by writing in part number next to BW (example: BW48)

9 CONNECTOR/WIRE OUT

CLS	Closed End (No feed)

BW	Bare Wire (Standard 24")
CON6	Connector 6"
CON24	Connector 24"

BW: Standard length is 24", Max length is 120". Request custom length by writing in part number next to BW (example: BW48)

10 WIRE COLOR

WH	White
BK	Black

11 WIRE TYPE

CL2	Class 2
CL2P	Plenum Rated

CL2P only available with bare wire leads (BW)

12 MOUNTING

SST	Stainless Steel

13 FINISH

ST	Satin
BK	Black
CU	Custom

Custom finishes require a longer lead time, consult factory

14 LENGTH (IN)

Minimum length is 12", maximum length is 98" not including end caps. Contact us for lengths under 12".

15 EXACT/OPTIMAL

O	Optimal Illumination
E	Exact Specified Length

Exact fixtures match the exact length you specify, but they may have dim spots at the ends. Optimal fixtures are slightly shorter than the length specified, but provide full illumination from end to end. See Exact/Optimal Fixture Length charts.

© 2026 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTLlighting | www.QTLlighting

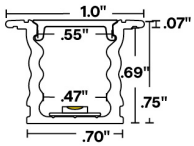
Specification subject to change. Rev-05-07-26

5 year warranty | Field modifications void warranty | Data subject to change, all data has +/- 5% tolerance | Compatible for use with QTL power supplies | Patent # D798,471 S

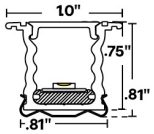
ESSENTIALS FLUR™-FLAT (01) RGBW HIGH EFFICACY

24VDC Linear Fixtures - Recessed

1 PRODUCT - DIMENSIONS



Profile



Profile with stainless steel mounting clip and mounting tray

2 DELIVERED LUMENS

[Calculated L70 = 70000 hrs]
Tested with FL1RGBW-**-30-DRY-STD

	4.0HE W/FT								8.0HE W/FT							
	Red		Green		Blue		3000K		Red		Green		Blue		3000K	
	LM/FT	WAVELENGTH	LM/FT	WAVELENGTH	LM/FT	WAVELENGTH	LM/FT	CRI	LM/FT	WAVELENGTH	LM/FT	WAVELENGTH	LM/FT	WAVELENGTH	LM/FT	CRI
FR	26	629	101	516	22	465	62	97	62	629	133	516	32	465	189	97
PR	22	629	83	516	18	465	51	97	52	629	109	516	26	465	155	97
DF	16	629	61	516	13	465	38	97	38	629	80	516	19	465	116	97

[Calculated L70 = 70000 hrs]
Tested with FL1RGBW-**-30-DRY-WO

	4.0HE W/FT								8.0HE W/FT							
	Red		Green		Blue		3000K		Red		Green		Blue		3000K	
	LM/FT	WAVELENGTH	LM/FT	WAVELENGTH	LM/FT	WAVELENGTH	LM/FT	CRI	LM/FT	WAVELENGTH	LM/FT	WAVELENGTH	LM/FT	WAVELENGTH	LM/FT	CRI
FR	29	629	112	516	24	465	69	97	69	629	147	516	34	465	210	97
PR	25	629	95	516	20	465	58	97	60	629	125	516	29	465	177	97
DF	19	629	73	516	16	465	45	97	45	629	96	516	23	465	137	97

6 DIODE VISIBILITY



DF - Diffused lens

PR - Polar lens

FR - Frosted lens

PHOTOMETRIC PERFORMANCE

Nominal beam spread shown, beam spread varies based on light engine. For more detailed information, see photometric data.



45°

© 2026 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTLlighting | www.QTLlighting

ESSENTIALS FLUR™-FLAT (01) RGBW HIGH EFFICACY

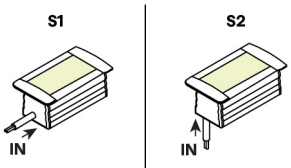
24VDC Linear Fixtures - Recessed

TEMPERATURE RATINGS

		4.0 HE W/FT		8.0 HE W/FT	
		Min	Max	Min	Max
DRY	Ambient Operating Temp - Recessed	-4°F	115°F	-4°F	95°F
	Ambient Operating Temp - Surface	**	**	**	**
DMP	Ambient Operating Temp - Recessed	-4°F	115°F	—	—
	Ambient Operating Temp - Surface	**	**	—	—

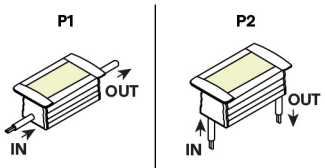
7 WIRE INPUT/OUTPUT

SINGLE (Input only)



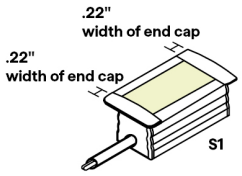
End Feed | Bottom Feed

PASS THROUGH (Input/Output)

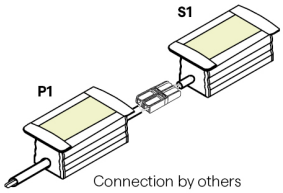


End Feed | Bottom Feed

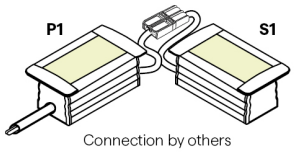
CONFIGURATION OPTIONS



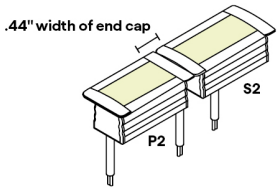
Single End Feed



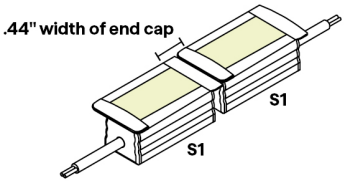
Non-Continuous End Feed



Non-Continuous Corner Feed



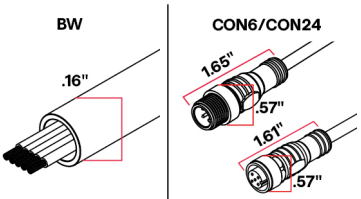
Non-Continuous Bottom Feed



Non-Continuous End to End Feed

8/9 CONNECTOR/WIRE – IN/OUT

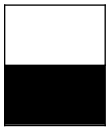
Connector/Wire In or Out not needed to specify product. Standard configuration is BW for Wire In and CLS for Wire out



Bare Wire 24"
22 AWG

6" or 24" Overall
Wire Connector | 24 AWG
IP67 Rated, UL Listed

10 WIRE COLOR



White

Black

© 2026 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTLlighting | www.QTLlighting

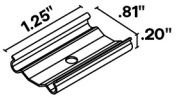
Specification subject to change. Rev-05-07-26

ESSENTIALS FLUR™-FLAT (01) RGBW HIGH EFFICACY

24VDC Linear Fixtures - Recessed

12 MOUNTING

SST



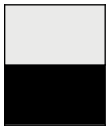
Stainless Steel Clip

2 clips provided for 4' or less; 4 clips provided for greater than 4'

To order separately use SST-01

Each clip comes with a #4 x 5/8" Flat Head SS

13 FINISH



Satin

Black

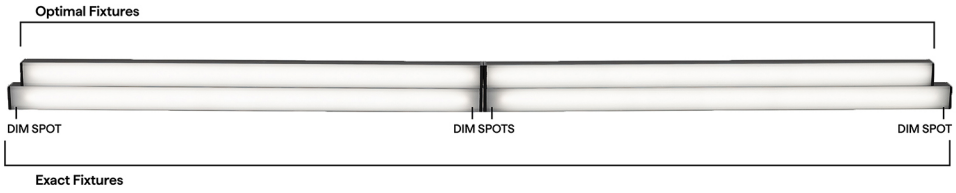
Custom finishes require a longer lead time, consult factory

14 EXACT/OPTIMAL FIXTURE LENGTH

E/O Length Calculator →

E/O Explained →

Exact fixtures are the exact length specified. Optimal fixtures' length is rounded down based on LED cut points to allow the fixture to be illuminated end to end. For runs with multiple fixtures that need to fill a specific length, it's recommended to order all optimal fixtures with an exact fixture at the end of the run.



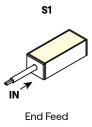
© 2026 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTL.lighting | www.QTL.lighting

ESSENTIALS FLUR™-FLAT (01) RGBW HIGH EFFICACY

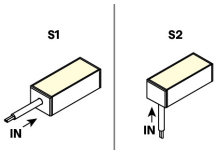
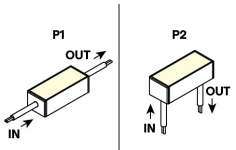
24VDC Linear Fixtures - Recessed

RGBW-HE DRY DMP LENGTHS BY INCH

EXACT LENGTH

Requested Length	Potential dim spot on either end of a S1 fixture 
12"	1"
13"	0.5"
14"	1"
15"	0.5"
16"	1"
17"	0.5"
18"	1"
19"	0.5"
20"	1"
21"	0.5"
22"	1"
23"	0.5"
24"	1"
36"	1"
48"	1"
60"	1"
72"	1"
84"	1"
96"	1"

OPTIMAL LENGTH

Requested Nominal Length	S1 & S2  End Feed / Bottom Feed	P1 & P2  End Feed / Bottom Feed
12"	10.51"	10.86"
13"	12.51"	12.86"
14"	12.51"	12.86"
15"	14.51"	14.86"
16"	14.51"	14.86"
17"	16.51"	16.86"
18"	16.51"	16.86"
19"	18.51"	18.86"
20"	18.51"	18.86"
21"	20.51"	20.86"
22"	20.51"	20.86"
23"	22.51"	22.86"
24"	22.51"	22.86"
36"	34.51"	34.86"
48"	46.51"	46.86"
60"	58.51"	58.86"
72"	70.51"	70.86"
84"	82.51"	82.86"
96"	94.51"	94.86"

COMPATIBLE POWER SUPPLIES

See power supplies cut sheets for more information. Data subject to change, all data has +/- 5% tolerance.

DIM TO LEVEL	INDOOR
	RGBW, RGBW-HE
0.1%	QT-CAB-eLED+DALI-DT8 QT-CAB-eLED+DMX QTM-eLED+DALI-DT8 QTM-eLED+DMX QZ-DMX
1%	QZ-DALI-DT8
10%	Non-Dim Power Supply with RGBW App Dongle

DIMMING PROTOCOL	INDOOR
	RGBW, RGBW-HE
DMX	QTM-eLED+DMX QZ-DMX
DALI-2: DT8	QT-CAB-eLED+DALI-DT8 QTM-eLED+DALI-DT8 QZ-DALI-DT8
SCENE App Dimmed	Non-Dim Power Supply with RGBW App Dongle

© 2026 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTL.lighting | www.QTL.lighting

ESSENTIALS FLUR™-FLAT (01) RGBW HIGH EFFICACY

24VDC Linear Fixtures - Recessed

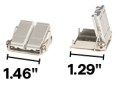
COMPATIBLE MOUNTING ACCESSORIES

HINGE - HMB-M



Adjustable mounting bracket - Medium

HINGE - HMB-L



Adjustable mounting bracket - Large

HINGE - HMB-XL



Adjustable mounting bracket - XLarge

Q-PIVOT



Small mounting accessory

Q-ANGLE



Adjustable mounting accessory

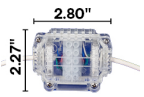
VHB



Double sided mounting tape

COMPATIBLE WIRING ACCESSORIES

Q-mini-J5



UL Listed, miniature junction box, DRY/DMP (WET rated with silicone)

COMPATIBLE CONTROL ACCESSORIES

SCENE APP DONGLE



Wi-Fi or Bluetooth Connectivity

iQ-DMX-STICK-GA2



DMX controller for changing color & dimming

iQ-DMX-STICK-DE3



DMX controller for changing color & dimming

COMPATIBLE APPS

NFC APP

Q-NFC

Read and write DMX addresses and adjust voltage

© 2026 QTL. All rights reserved

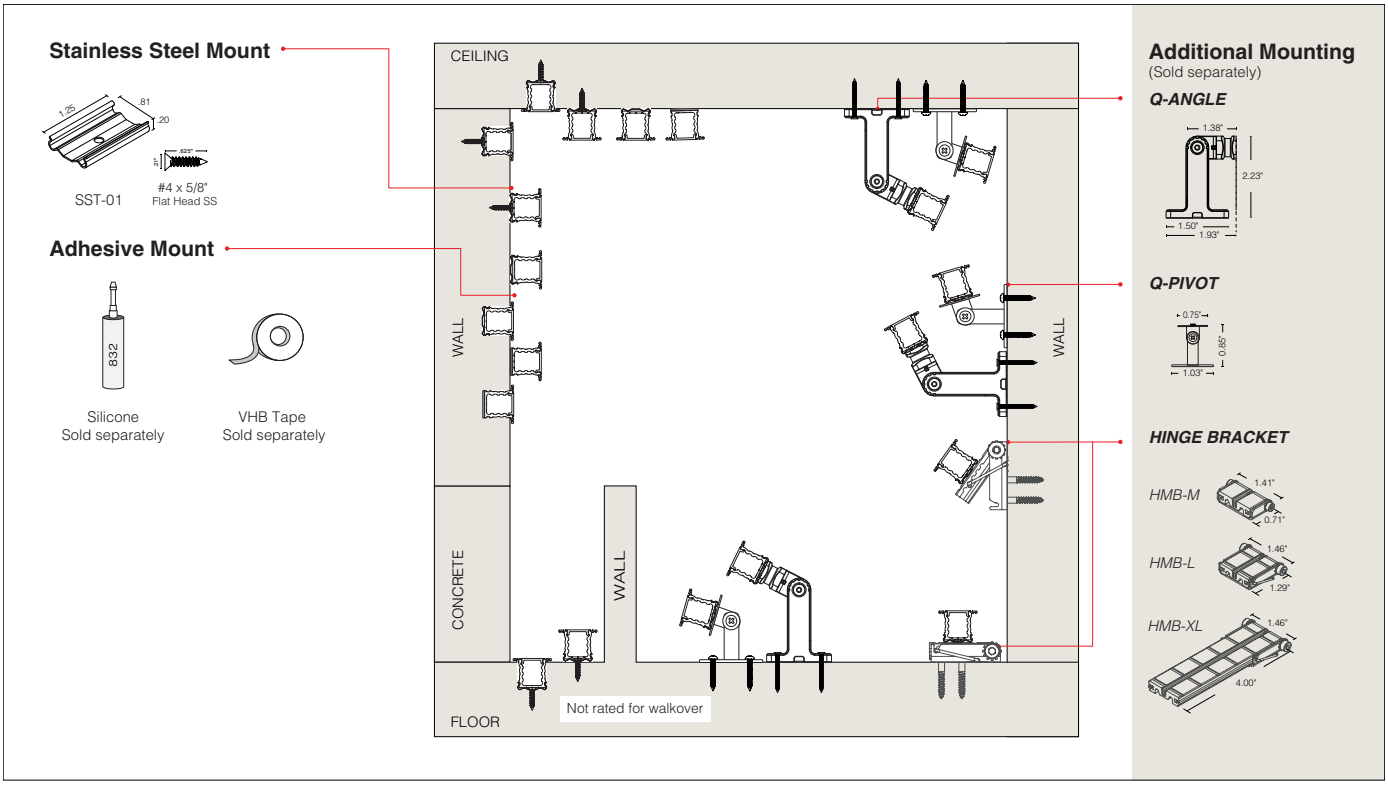
ESSENTIALS FLUR

Linear Fixture Installation Instructions

ATTENTION: Please read all instructions BEFORE installation

- Product to be installed by a licensed electrician - Field modifications void warranty
- Use only with Class 2 power supply unit — Warranty only valid with QTL power supplies
- Surface mount or recessed in millwork
- Suitable for installation in storage area of a clothes closet when assembled as a finished fixture up to 4W/ft at QTL facility
- Not rated for walkover
- Input Voltage: 24VDC
- Diagrams for representation only and not to scale.

METHODS OF INSTALLATION:



Surface Mounting Methods

- VHB Mount (page 4-5)
- Silicone Mount (page 6)
- Screw Mount (page 7)

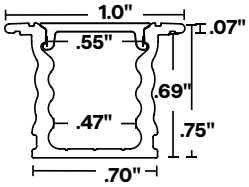
Recessed Mounting Methods

- VHB Mount : Millwork (page 8)
- Silicone Mount : Millwork (page 9)
- Screw Mount : Millwork (page 10)

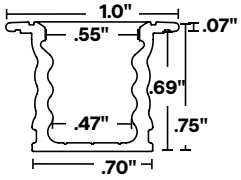
© 2024 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTL.lighting | QTL.lighting

ESSENTIALS FLUR

Linear Fixture Installation Instructions



FLUR-01

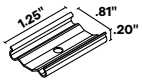


FLUR-03

COMPONENTS & HARDWARE

Alternate screw lengths can be used in installation as long as the screw diameter size is consistent with the included screw diameter size

STAINLESS STEEL CLIP



SST-01

Included	
	Flat Head Screw #4x5/8"

- 2 clips provided for 4' or less; 4 clips provided for greater than 4'

ACCESSORIES SOLD SEPARATELY

HINGE BRACKET; sold individually

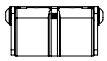
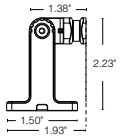


Image shows HMB-M

HMB-M
HMB-L
HMB-XL

Included
• 3/4" long mount screw
• 1/4" #4 clip mount screw

Q-ANGLE; sold in pairs



Q-ANGLE

Included
• 4 SS #6x1.25" Flat head wood screws
• 2 SS 4-40 Flat head clip screws
• 2 SS 6-32 Fillister screws

Q-PIVOT; sold in pairs

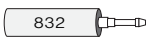


Q-PIVOT

Included
• SS #4-40x3/16 Flat head screws
• 2 #4x3/4 Pan Head screws

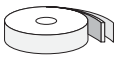
ADHESIVE SOLD SEPARATELY

SILICONE



DOWSIL 832

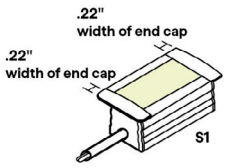
VHB TAPE; sold in 15' increments



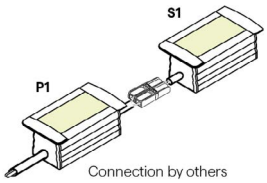
TAPE-VHB-IP20

© 2024 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTL.lighting | QTL.lighting

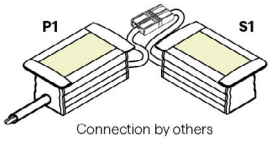
CONFIGURATION OPTIONS



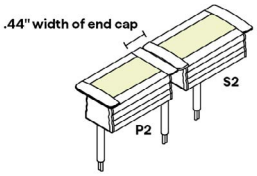
Single End Feed



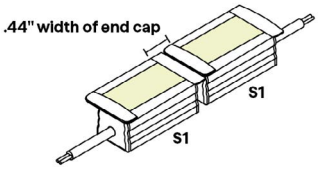
Non-Continuous End Feed



Non-Continuous Corner Feed



Continuous Bottom Feed



Continuous End to End Feed

Review wire method to ensure clean installation prior to mounting finished Fixture.

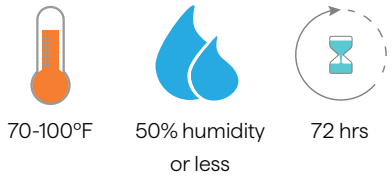
NOTE: Additional wire methods include:
S1 & S2: Connector/Wire Input only
P1 & P2: Connector/Wire Input and Output

© 2024 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTL.lighting | QTL.lighting

SURFACE MOUNTING METHOD

SURFACE PREPARATION

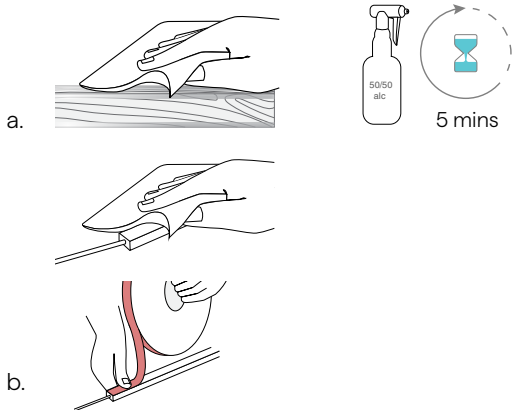
1



Temperature and environmental concerns:

- Ideal application environment is 70-100°F in 50% humidity or less.
- Minimum application temperature: 50°F
- This temperature and humidity should be maintained for 72 hours after application for maximum bond strength.

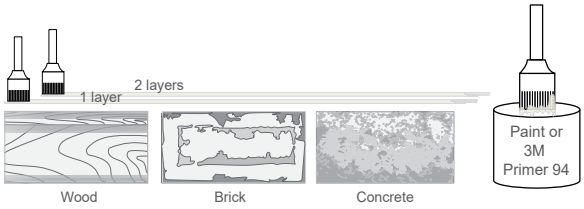
2



a. Using a 50/50 alcohol mix, thoroughly clean the backside of the fixture and the surface area where fixture will be installed. Allow 5 minutes to dry.

b. Peel back 0.5" of the VHB tape's protective film on one end and use firm pressure to adhere it to the desired surface, avoiding air bubbles. Continue peeling the film and adhering the tape in small sections until the entire length is installed.

3



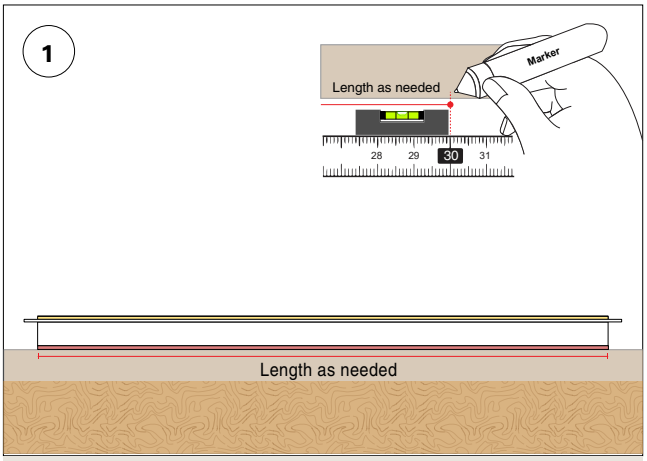
For porous materials (Wood, Brick, Concrete etc.) apply two layers of paint or primer to the surface. This will help create a better bonding surface for these materials. These can be purchased from a local hardware store.

MATERIALS	SUGGESTED EPOXIES
Concrete, Stone, Cinderblock, Metal, and Brick	Loctite Metal and Concrete Two-Part Epoxy
ABS, Fiberglass, Plastic, and PVC	Loctite Plastic Two-Part Epoxy
Tile, Wood, Ceramic, Glass, or Metal	Loctite Clear Two-Part Epoxy
All Purpose	Strong Stik

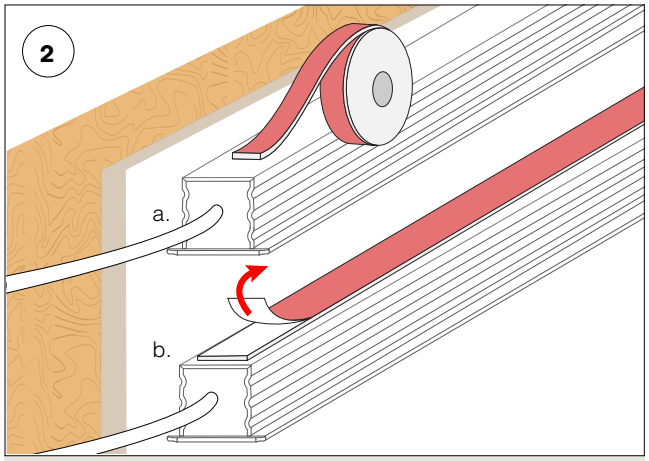
© 2024 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTL.lighting | QTL.lighting

SURFACE MOUNTING METHOD: **VHB ADHESIVE MOUNT**

BEFORE installation, the surface must be thoroughly cleaned and dried for maximum bond strength.

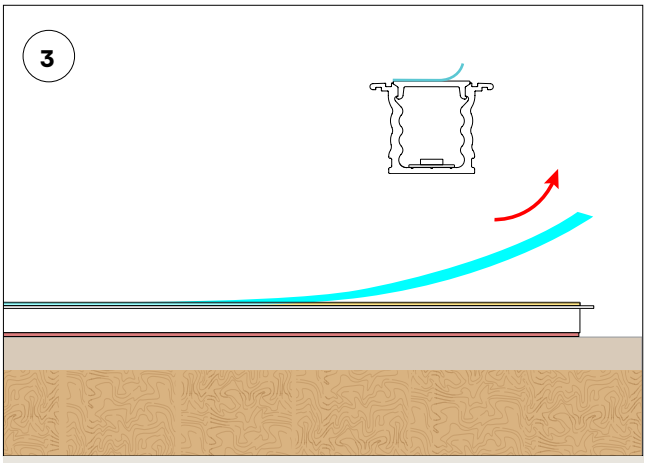


Determine the FLUR fixture(s) location and positioning on desired surface before adhering Fixture to surface. Make any necessary reference markings to indicate fixture placement.



a. To adhere the VHB adhesive, peel the white film back while evenly applying the tape to the mounting side of the fixture. The red side should be visible.

b. Remove the red film and position fixture in place according to your previous reference marking(s).



Remove protective film from the surface of the fixture's lens.

NOTES: *EPOXY ALTERNATIVE: For improved bonding strength, apply a small amount of epoxy at each end. Refer to table on* page 4 *for suggested epoxies. These can be purchased at a local hardware store. Please follow all manufacturer instructions for suggested epoxy.*

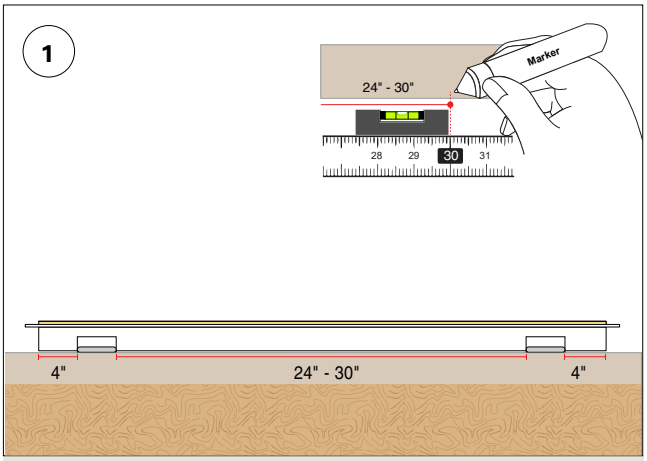
© 2024 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTL.lighting | QTL.lighting

ESSENTIALS FLUR

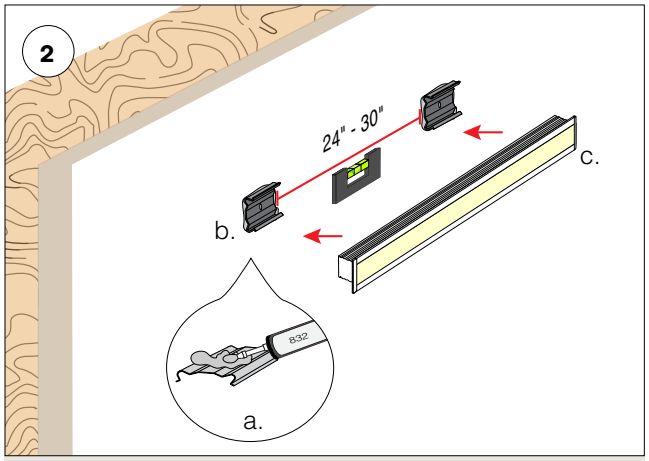
Linear Fixture Installation Instructions

SURFACE MOUNTING METHOD: **SILICONE**

- 2 clips provided for 4' or less; 4 clips provided for greater than 4'



Determine the FLUR fixture(s) location and positioning on desired surface; evenly distribute clips. Make any necessary reference markings to indicate where each clip is to be secured in place. Recommended every 24" - 30".

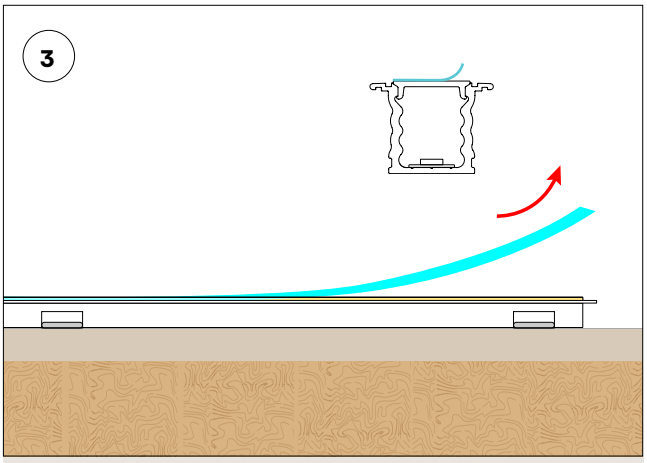


a. Coat the back of the clip with silicone adhesive and firmly press on to the marked reference points.

b. Wait for silicone adhesive to cure completely before snapping fixture into place.

b. Snap fixture onto clips.

NOTE: Cure time is dependent on the type of silicone adhesive used. Refer to silicone product manufacturer for accurate drying time.



Remove protective film from the surface of the fixture's lens.

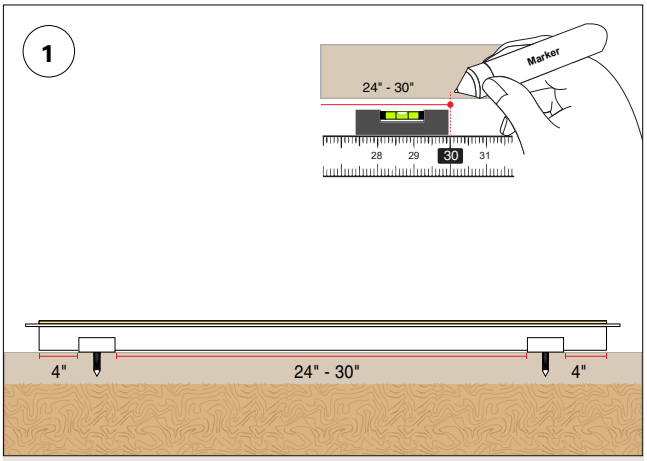
© 2024 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTL.lighting | QTL.lighting

ESSENTIALS FLUR

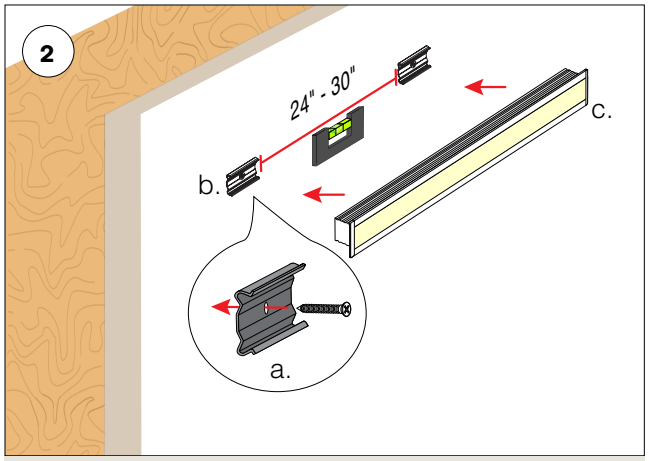
Linear Fixture Installation Instructions

SURFACE MOUNTING METHOD: **SCREW MOUNT**

- 2 clips provided for 4' or less; 4 clips provided for greater than 4'



Determine the FLUR fixture(s) location and positioning on desired surface; evenly distribute clips. Make any necessary reference markings to indicate where each clip is to be secured in place. Recommended every 24" - 30".

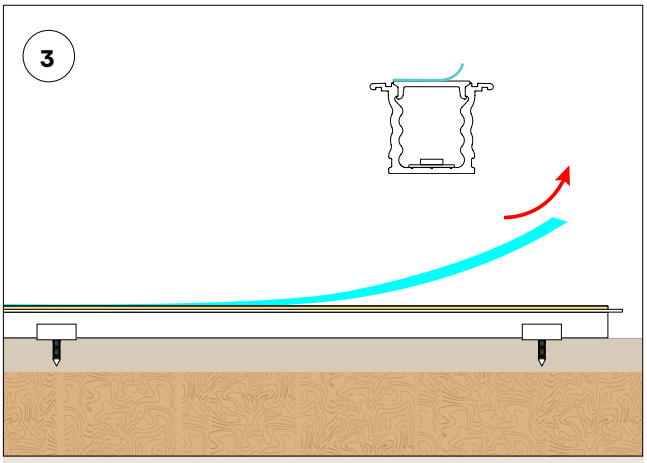


a. Secure clips using the #4 flat head screw provided.

b. Ensure the screw head is flush with the clip's base.

c. Snap fixture onto clips.

NOTE: Flat head screw type is dependent on surface/application material. Alternative flat head screws may be required. Refer to the surface material manufacturer for suggested screw type.

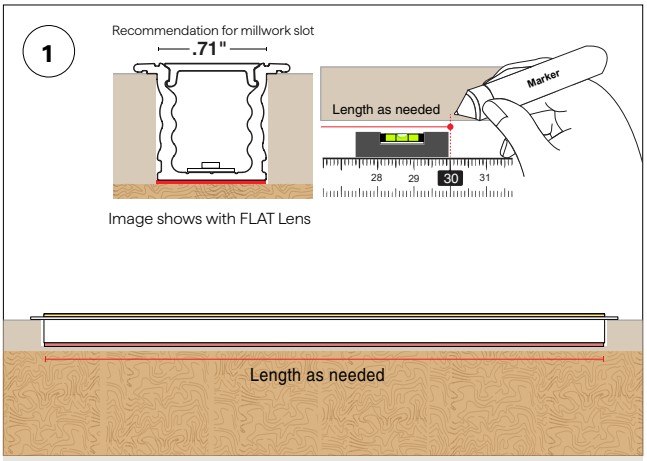


Remove protective film from the surface of the fixture's lens.

© 2024 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTL.lighting | QTL.lighting

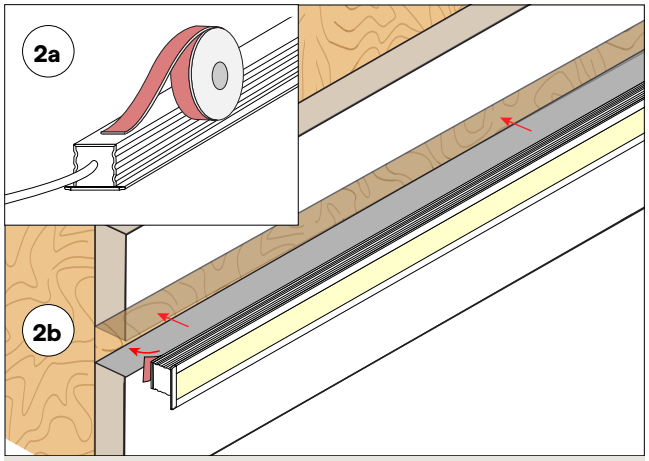
SURFACE MOUNTING METHOD: **MILLWORK VHB ADHESIVE MOUNT**

BEFORE installation, the surface must be thoroughly cleaned and dried for maximum bond strength. **(page 4)**



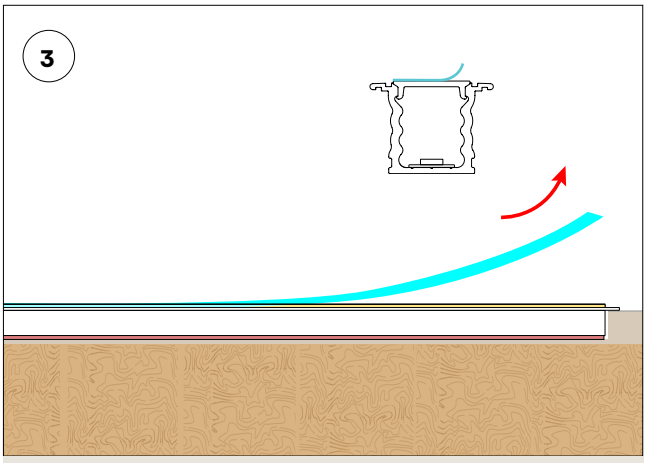
Determine the FLUR fixture(s) location and positioning on desired surface before adhering fixture to surface. Make any necessary reference markings to indicate fixture placement.

NOTE: Depth of the channel in the millwork is dependent on overall height.



a. To adhere the VHB adhesive, peel the white film back while evenly applying the tape to the mounting side of the fixture. The red side should be visible.

b. Remove the red film and position fixture in place according to your previous reference marking(s).



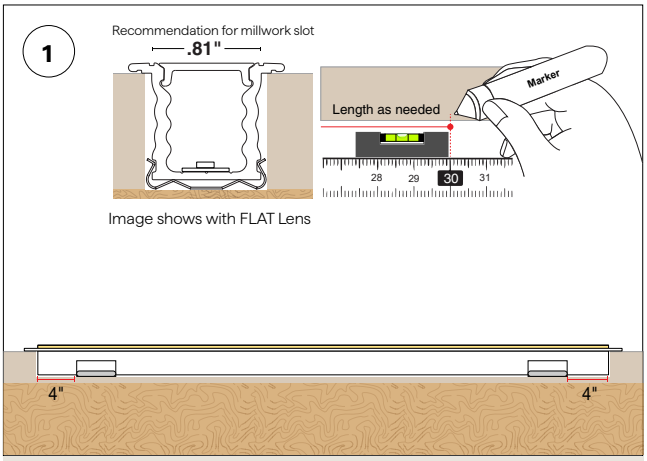
Remove protective film from the surface of the fixture's lens.

NOTES: *EPOXY ALTERNATIVE: For improved bonding strength, apply a small amount of epoxy at each end. Refer to table on* page 4 *for suggested epoxies. These can be purchased at a local hardware store. Please follow all manufacturer instructions for suggested epoxy.*

© 2024 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTL.lighting | QTL.lighting

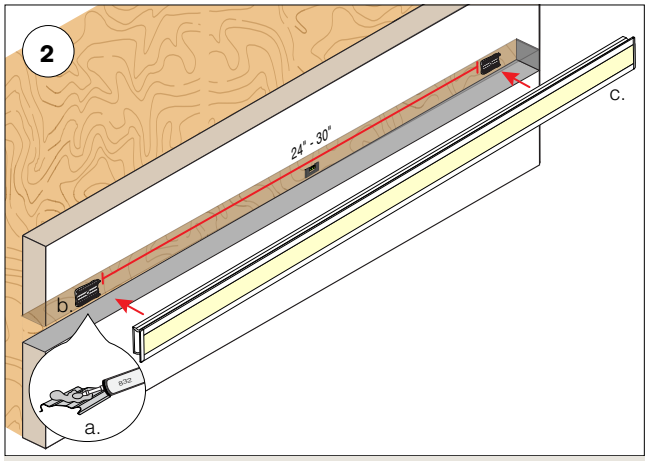
RECESSED MOUNTING METHOD: **MILLWORK SILICONE**

- Apply silicone in well ventilated area



Determine the FLUR fixture(s) location and positioning on desired surface; evenly distribute clips. Make any necessary reference markings to indicate where each clip is to be secured in place. Recommended every 24" - 30".

NOTE: Depth of the channel in the millwork is dependent on overall height.

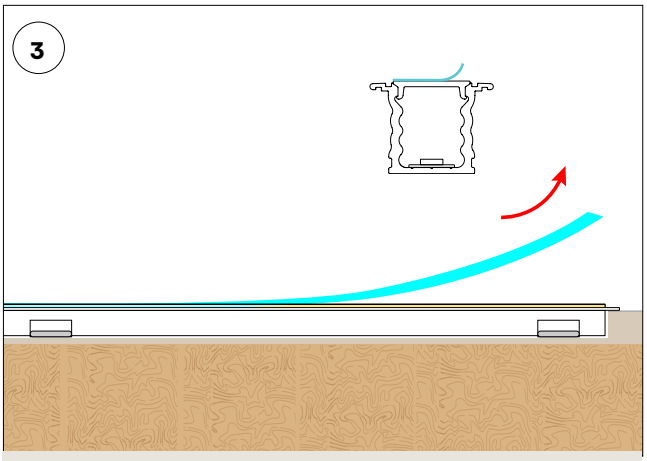


a. Coat the back of the clip with silicone adhesive and firmly press on to the marked reference points.

b. Wait for silicone adhesive to cure completely before snapping fixture into place.

b. Snap fixture onto clips.

NOTE: Cure time is dependent on the type of silicone adhesive used. Refer to silicone product manufacturer for accurate drying time.

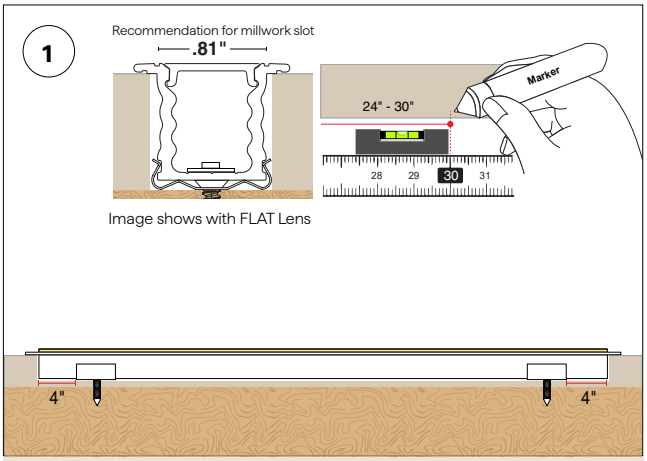


Remove protective film from the surface of the fixture's lens.

© 2024 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTL.lighting | QTL.lighting

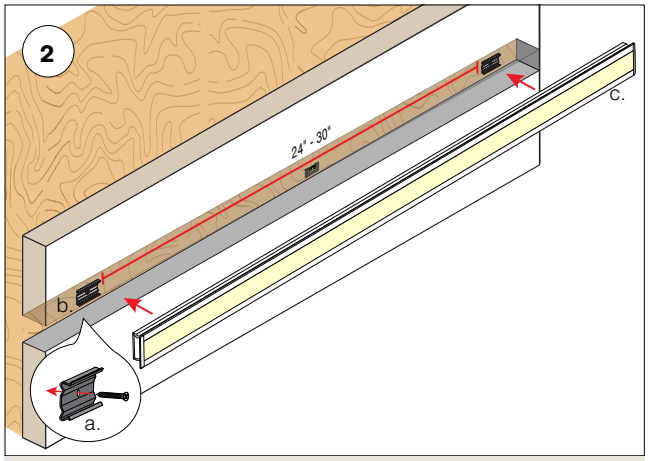
RECESSED MOUNTING METHOD: **MILLWORK SCREW MOUNT**

- 2 clips provided for 4' or less; 4 clips provided for greater than 4'



Determine the FLUR fixture(s) location and positioning on desired surface; evenly distribute clips. Make any necessary reference markings to indicate where each clip is to be secured in place. Recommended every 24" - 30".

NOTE: Depth of the channel in the millwork is dependent on overall height.

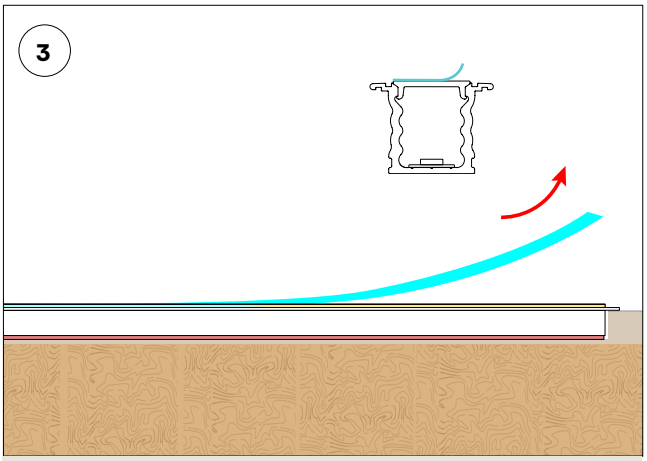


a. Mount the #4 flat head screw into the clip.

b. Ensure the screw head is flush with the clip's base.

c. Snap the fixture onto the clips.

NOTE: If surface application requires a longer screw, the screw size must be a #4 Flat Head. Flat head screw type is dependent on surface/application material. Alternative flat head screws may be required. Refer to the surface material manufacturer for suggested screw type.



Remove protective film from the surface of the fixture's lens.

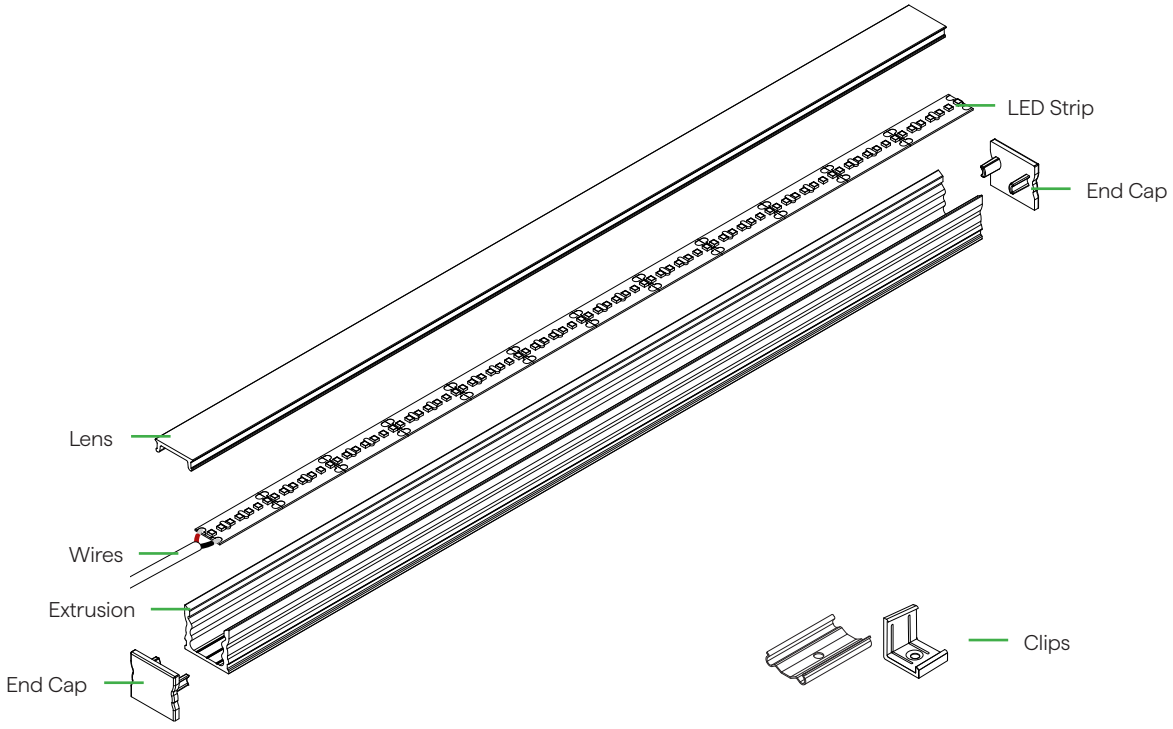
© 2024 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTL.lighting | QTL.lighting

MATERIAL RECYCLING

LINEAR FIXTURES/EXTRUSIONS

You may be done with your products, but chances are they still have more to give. Follow these instructions to break down and sort recyclable components. Check with local recycling collection to ensure they accept the materials listed below.

Additionally, Q-Tran offers a Takeback Program. Contact factory for information.



7	E	41	40
Lens Plastic End Caps Plastic Clips	LED Strip Wires	Extrusion Metal End Caps	Stainless Steel Clips

© 2024 QTL. All rights reserved | 155 Hill St. Milford, CT 06460 | 203-367-8777 | sales@QTL.lighting | QTL.lighting