QUAD TBar

ARON™

Shown: QuadT1-FSQ-AR-BR-CR-DR-...

Project: _____
_____

Type: _____
_____

Notes: _____
_____

The **QUAD** Luminaire features a Patent-Pending mounting system over the intersection of the ceiling grid. The Quad is a modular Downlight fixture that allows for different configurations based on optical and aesthetic requirements.

CCEA Approved · **UL LISTED** · Patent Pending · 5 Year Warranty

Armstrong CEILINGS

Ordering Guide

Important Ordering Notes: For Armstrong Custom Tile Program - please see page 6 and coordinate with EC/GC

QuadT1

| ARON ID		GRID TYPE/SHAPE		QUADRANT A		QUADRANT B		QUADRANT C		QUADRANT D		LUMENS PER QUADRANT	
QuadT1	QUAD TBar	**FSQ**	Flat Grid Square Quadrants	**AR**	Regressed Lens	**BR**	Regressed Lens	**CR**	Regressed Lens	**DR**	Regressed Lens	**125**	125 Lumens per Quadrant
				ASL	Spotlight	**BSL**	Spotlight	**CSL**	Spotlight	**DSL**	Spotlight	**250**	250 Lumens per Quadrant
				ASPK	Speaker	**BSPK**	Speaker	**CSPK**	Speaker	**DSPK**	Speaker	**400**	400 Lumens per Quadrant
		SSSQ	Screw Slot Grid Square Quadrants	**AX**	No Quadrant	**BX**	No Quadrant	**CX**	No Quadrant	**DX**	No Quadrant	**500**	500 Lumens per Quadrant
												750	750 Lumens per Quadrant

**For Spotlight Ordering Guide, please see page 7-8   **For Speaker Ordering Guide, please see page 9-10

BEAM		COLOR / CRI		VOLTAGE (UNV)		DRIVER (DM)		FINISH		OPTIONS	
B1	Narrow	**30K8**	3000K - 80CRI	**UNV**	120 - 277V	**DM**	Factory 0-10V Dim 1%	**W**	White	**E5W**	5W EM Battery
B2	Medium	**35K8**	3500K - 80CRI					**C**	Custom Color	**E10W**	10W EM Battery
B3	Wide	**40K8**	4000K - 80CRI							**CP**	Chicago Plenum
B4	Asymmetric	**30K9**	3000K - 90CRI								
		35K9	3500K - 90CRI								
		40K9	4000K - 90CRI								

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# QUAD TBar

Ordering Instructions
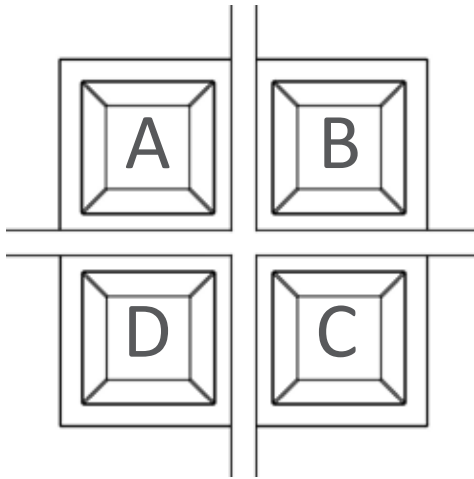
- Match labeled quadrant with corresponding column on ordering guide.

- Notate "R" to use quadrant with regressed lens.
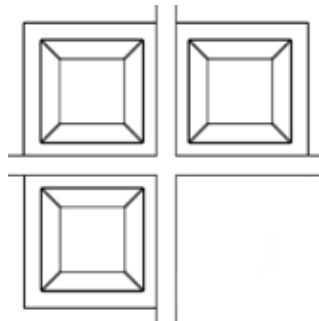
- Notate "X" to omit quadrant from fixture.

Notes:
- Coordinate lighting fixture install with ceiling contractor
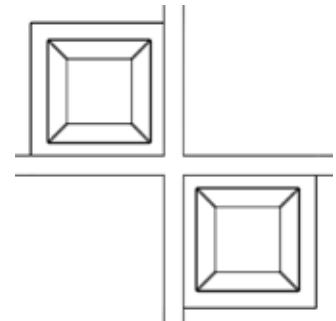- Contact your local Armstrong representative for Made-To-Order ceiling tiles. (See page 6)
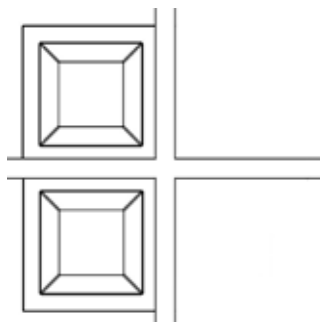
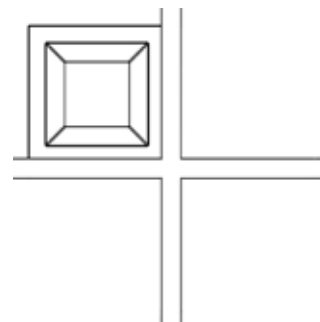## Sample Configurations
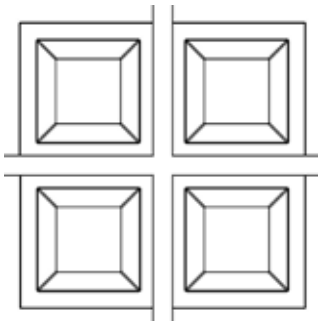
QuadT1-FSQ-AR-BR-CR-DR

QuadT1-FSQ-AR-BR-CX-DR

QuadT1-FSQ-AR-BX-CR-DX

QuadT1-FSQ-AR-BX-CX-DR

QuadT1-FSQ-AR-BX-CX-DX

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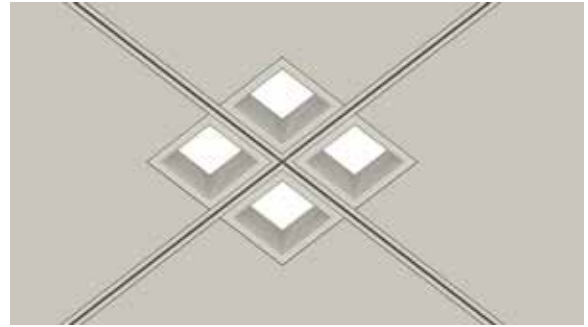
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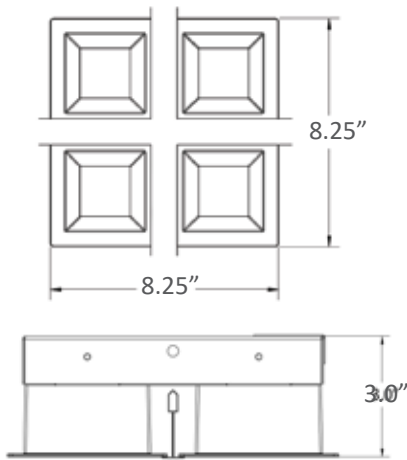
Housing Types

Flat Housing
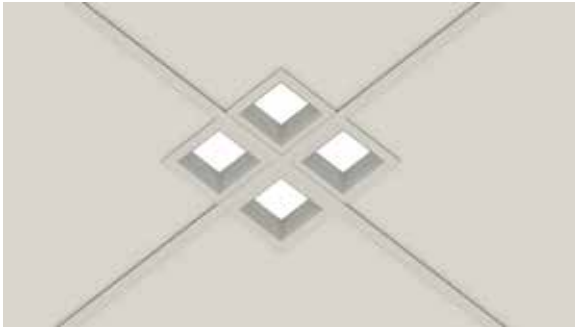
- Notate "FSQ" in Ordering Guide
- Designed for Flat 9/16" & 15/16" Grids

Screw Slot Housing

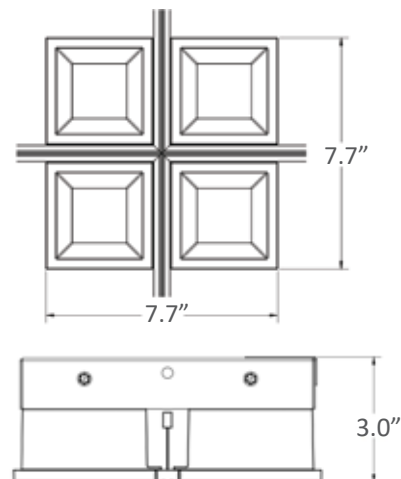- Notate "SSSQ" in Ordering Guide
- Designed for Dimensional 9/16" Grids

Dimensions

8.25"
8.25"
3.0"

Flat Housing

7.7"
7.7"
3.0"

Screw Slot Housing

Construction

- Cast Aluminum housing
- Powder coated paint
- Galvanized sheet metal components
- Mate with Flat 15/16", 9/16" and Dimensional 9/16" TBars

Optical

- Symmetric and asymmetric distributions
- Coated Acrylic light guide
- Coated Acrylic diffuser
- Minimum 80 or 90 CRI
- 3000K, 3500K, 4000K
- ≤ 3 SDCM

Electrical

- Integral high efficiency driver
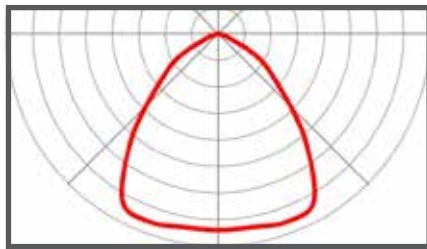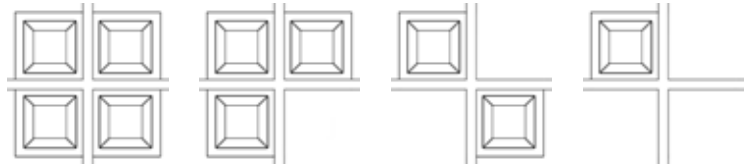- 0-10V dimming (1%) standard
- Class 2
- Optional remote battery pack

Weight

4Q = 10 lbs
3Q = 8.5 lbs
2Q = 7.0 lbs
1Q = 5.5 lbs

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Beam Options

4, 3, 2D, 1 Quadrant Configurations

B1 - Narrow
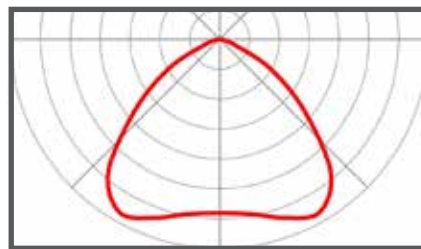
B2 - Medium
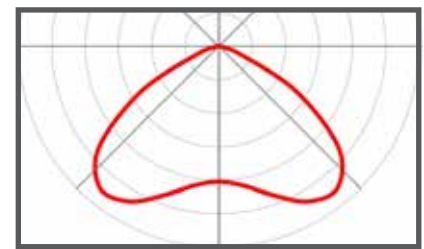
B3- Wide

2 Quadrant Parallel
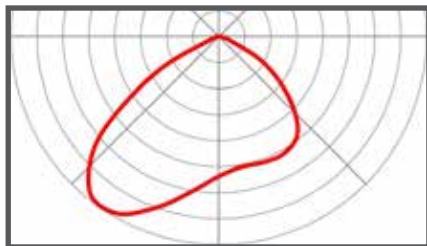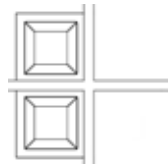
B4- Asymmetric

Fixture Wattages

Lumens/Quadrant	Watts/Quadrant
125	1.53
250	3.0
500	6.0
750	9.0

Lumens/Fixture	Watts/Fixture
750	9.0
1000	12.0
1500	18.1
2000	24.1
2500	30.1
3000	35.8

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Model Tested: QuadT1-FSQ-AR-BR-CR-DR-400-B2-35K8-UNV-DM-W

Polar Candela Distribution

- ■ - 0° H
- ■ - 90° H
- ■ - 22.5° H
- ■ - 45° H
- ■ - 67.5° H
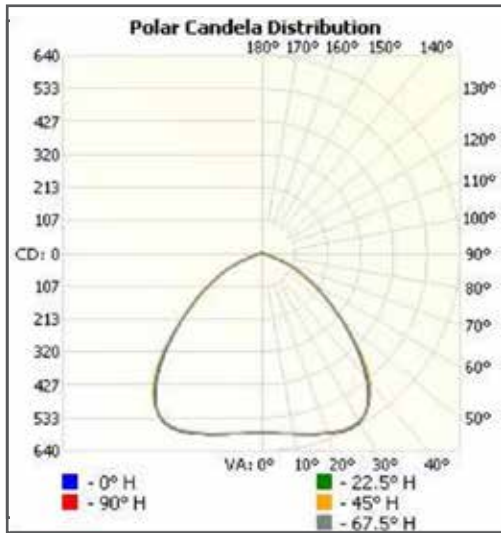
Configuration: 4 Quadrant
Lumens/Quadrant: 403
Total Lumens: 1613
Input Watts: 19.77 W
Efficacy: 81.6 lm/W

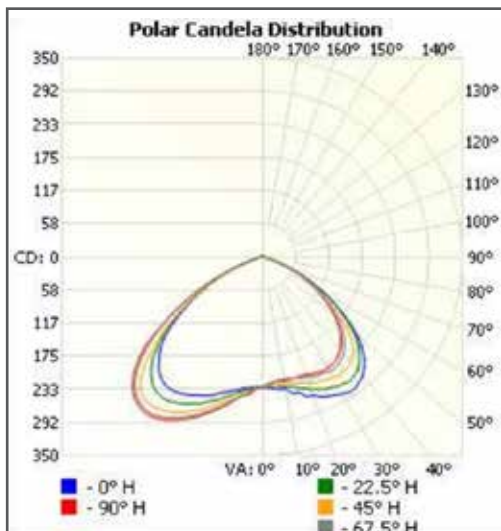| Vertical Angle	Horizontal Angles				
	0	22.5	45	67.5	90
0	582	582	582	582	582
5	585	585	585	584	585
10	594	593	593	592	593
15	606	606	604	604	606
20	620	620	618	619	621
25	633	632	629	631	633
30	631	629	628	629	632
35	598	598	602	600	599
40	526	530	543	532	528
45	433	437	451	441	437
50	337	340	340	344	340
55	250	256	249	259	253
60	180	189	177	187	182
65	122	124	121	127	122
70	59	67	70	69	60
75	21	22	27	22	21
80	11	11	11	11	11
85	3	3	3	3	3
90	0	0	0	0	0

Zonal Lumens		
Zone	Lumens	% Luminaire
0-10	56.1	3.5
10-20	172.0	10.7
20-30	291.1	18.0
30-40	370.9	23.0
40-50	338.0	20.9
50-60	229.2	14.2
60-70	122.3	7.6
70-80	29.9	1.9
80-90	4.4	0.3

Model Tested: QuadT1-FSQ-AR-BX-CX-DR-400-B4-35K8-UNV-DM-W

Polar Candela Distribution

- ■ - 0° H
- ■ - 90° H
- ■ - 22.5° H
- ■ - 45° H
- ■ - 67.5° H

Configuration: 2 Quadrant Parallel
Lumens/Quadrant: 422
Total Lumens: 845
Input Watts: 9.76 W
Efficacy: 86.6 lm/W

Vertical Angle	Horizontal Angles				
	0	22.5	45	67.5	90
0	229	229	229	229	229
5	232	225	227	223	221
10	236	233	226	223	219
15	247	239	229	221	220
20	260	248	237	225	221
25	271	257	241	230	226
30	279	264	244	234	227
35	283	267	244	231	223
40	273	260	241	221	212
45	253	240	225	202	194
50	218	210	190	174	168
55	170	166	146	140	134
60	122	120	105	104	100
65	76	76	68	68	67
70	33	38	38	37	34
75	13	13	16	14	14
80	7	7	7	8	8
85	2	2	2	3	3
90	0	0	0	0	0

Zonal Lumens		
Zone	Lumens	% Luminaire
0-10	22.3	2.6
10-20	70.5	8.3
20-30	125.3	14.8
30-40	177.5	21
40-50	197.1	23.3
50-60	155.2	18.4
60-70	77.3	9.1
70-80	17.2	2
80-90	2.9	0.3

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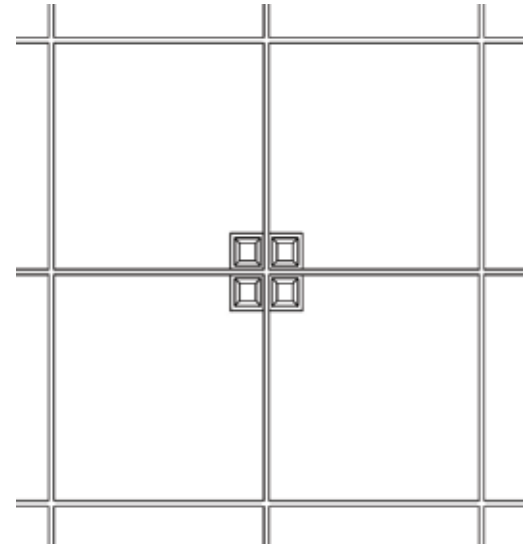**ARON**

QUAD TBar

Armstrong CEILINGS — **ARON™**

Made-To-Order Tile Guide

Pre-cut tiles made-to-order through your Armstrong rep

Coordinate with EC and GC for ordering tiles

24"x24" Quad Notched Tiles

| Armstrong Tile Style	Tile Lay	Armstrong Tile Number	ARON Fixture	ARON Precut Tile Number
Ultima/ Ultima High NRC	Square	1940	QUAD Square	1940-QSQ
Ultima/ Ultima High NRC	Tegular	1941	QUAD Square	1941-QSQ
Lyra PB	Square	8372PB	QUAD Square	8372PB-QSQ
Optima PB	Tegular	3354	QUAD Square	3354-QSQ
Optima PB	Square	3352	QUAD Square	3352-QSQ
Cala	Tegular	2824	QUAD Square	2824-QSQ

GC to Coordinate with EC and Armstrong Rep for ordering with ARON tile codes

Save on Install Time and Hastle - for any questions please contact rob.aronchick@aronlighting.com

*Below ceiling view

24"x48" Quad Notched Tiles

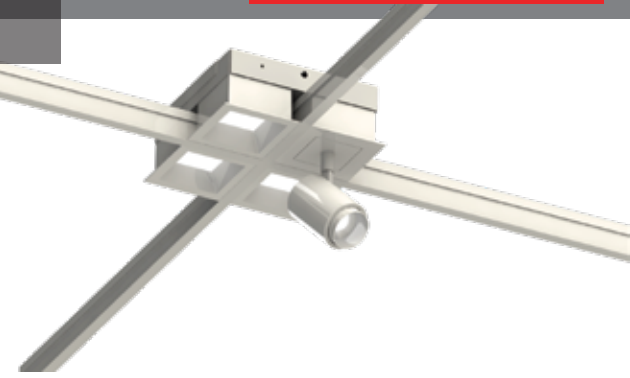| Armstrong Tile Style	Tile Lay	Armstrong Tile Number	ARON Fixture	Con figuration	ARON Precut Tile Number
Ultima/ Ultima High NRC	Square	1943	QUAD Square	NE/SW	1943-QSQ-NESW
Ultima/ Ultima High NRC	Tegular	1944	QUAD Square	NE/SW	1944-QSQ-NESW
Ultima/ Ultima High NRC	Square	1943	QUAD Square	NW/SE	1943-QSQ-NWSE
Ultima/ Ultima High NRC	Tegular	1944	QUAD Square	NW/SE	1944-QSQ-NWSE
Lyra PB	Square	8373PB	QUAD Square	NE/SW	8373PB-QSQ-NESW
Lyra PB	Tegular	8373PB	QUAD Square	NW/SE	8363PB-QSQ-NWSE
Optima PB	Square	3353	QUAD Square	NE/SW	3353-QSQ-NESW
Optima PB	Tegular	3252	QUAD Square	NE/SW	3252-QSQ-NESW
Optima PB	Square	3353	QUAD Square	NW/SE	3353-QSQ-NWSE
Optima PB	Tegular	3252	QUAD Square	NW/SE	3252-QSQ-NWSE
Calla	Tegular	2825	QUAD Square	NE/SW	2825-QSQ-NESW
Calla	Tegular	2825	QUAD Square	NW/SE	2825-QSQ-NWSE
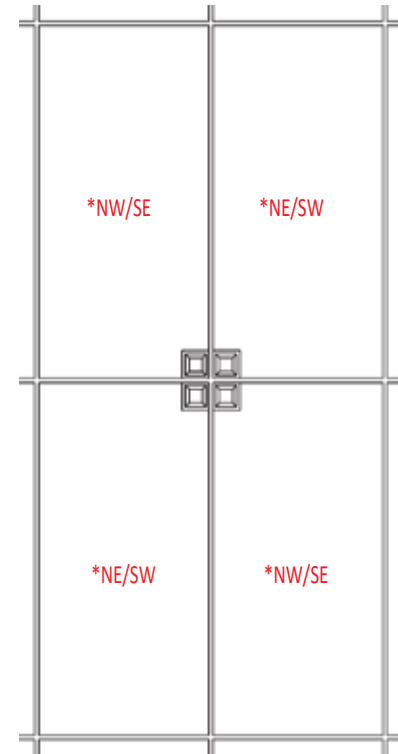
GC to Coordinate with EC and Armstrong Rep for ordering with ARON tile codes

Save on Install Time and Hastle - for any questions please contact rob.aronchick@aronlighting.com

*NW/SE   *NE/SW

*NE/SW   *NW/SE

*Below ceiling view

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QUAD TBar

Spotlight Ordering Guide

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PRODUCT ID		CCT		LUMENS		FINISH		DIMMING	
Spotlight - Field Adj	SP01	27K9 30K9 35K9 40K9	2700K - 90CRI 3000K - 90CRI 3500K - 90CRI 4000K - 90CRI	1000 1500 2000	lumens lumens (12W) lumens	W BLK SLV	White Black Silver	STD DM	No Dim 0-10V Dimming

General / Dimensions:

Light Output: 1000lm, 1500lm, 2000lm

Material: Die Cast aluminum Casing, Powder Coat Finish

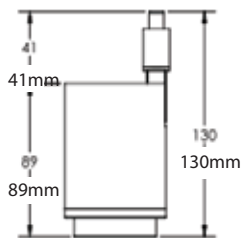Aiming: 350° Horizontal Coverage and 90° Vertical Rotation

Integral Driver

Applications: Retail, Corridor, Accent Lighting, Restaurants, Commercial

Limited Warranty: 5 years

LED Type: CREE CMA 1300 lm Chip

Dimensions:

41mm
89mm
130mm
⌀58mm

Description

The QUAD Tbar Spotlight offers a unique solution to grid mounted accent lighting. Easily mount the fixture with or without other downlight quadrants at the intersection of any TBar grid system. There are multiple configurations available, with the ability to have 4 spotlights in 1 fixture.

Our spotlight solution offers a field adjustable beam angle, 14-50°, with high CRI. Available in 2700K-4000K. Obtain the perfect aim illumination angle for any solution with full horizontal rotation and up to 90° verticle adjustability.

No more track needed - just drop the fixture on the TBar.

Example Product Codes:

Page 1 QUAD Fixutre Product Code:

QUADT1-FSQ-AR-BR-CSL-DSL-500-B2-35K8-UNV-DM-W

Page 7 Spotlight Product Code:

(qty:2) SP01-35K9-1500-W-ND

Page 1 QUAD Fixutre Product Code:
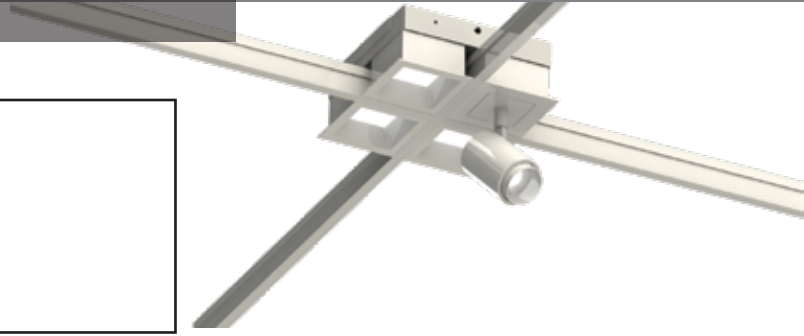
QUADT1-FSQ-ASL-BX-CX-DX-500-B2-35K8-UNV-DM-W

Page 7 Spotlight Product Code:

(qty:1) SP01-40K90-1500-W-ND

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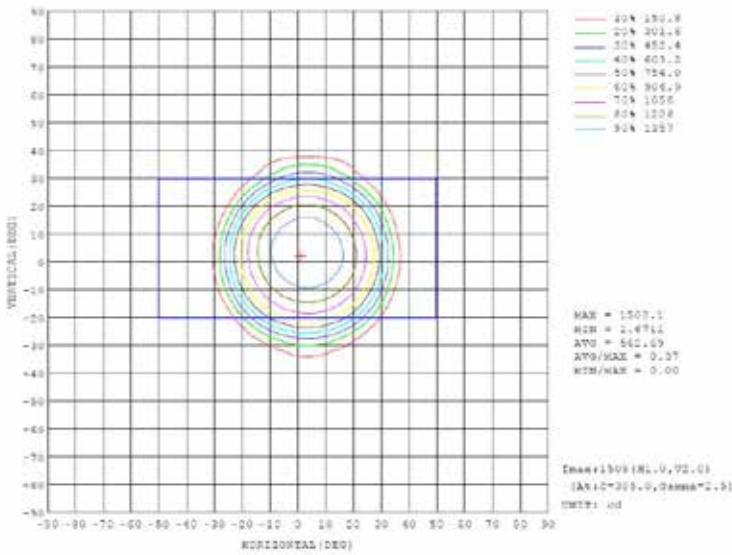Designed and Manufactured in the USA

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QUAD TBar

Spotlight Ordering Guide

Photometric and Performance Data

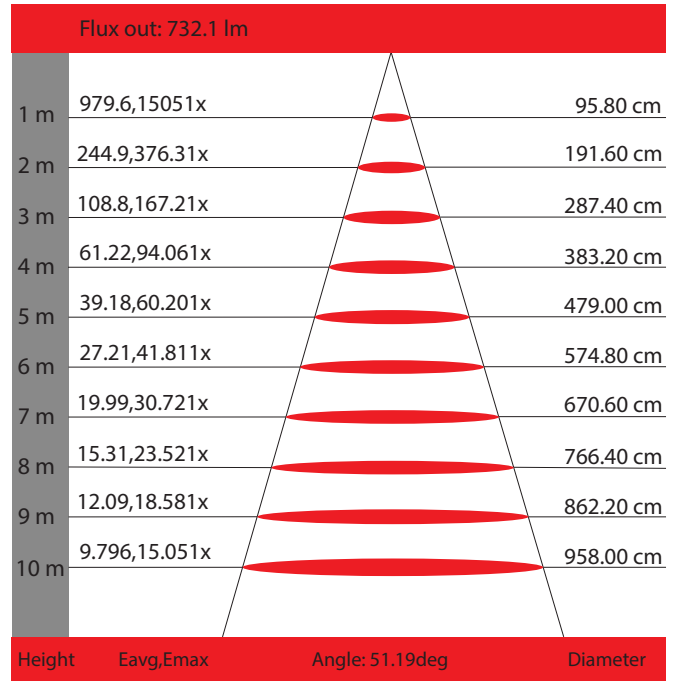Input Voltage: 220

Wattage: 15W

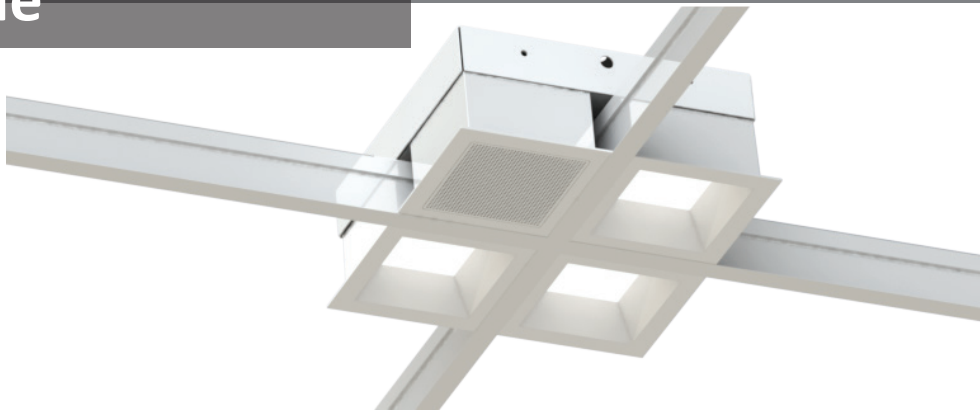Efficiency: 64.14 lm/W

Current: 710mA

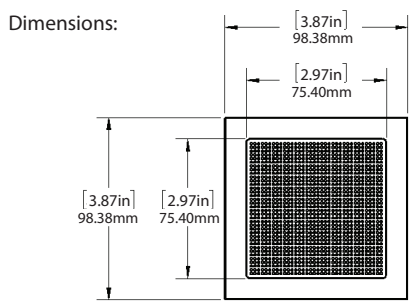## Polar Candela Distribution

Illuminance Cone Distribution

Flux out: 732.1 lm		
1 m	979.6,15051x	95.80 cm
2 m	244.9,376.31x	191.60 cm
3 m	108.8,167.21x	287.40 cm
4 m	61.22,94.061x	383.20 cm
5 m	39.18,60.201x	479.00 cm
6 m	27.21,41.811x	574.80 cm
7 m	19.99,30.721x	670.60 cm
8 m	15.31,23.521x	766.40 cm
9 m	12.09,18.581x	862.20 cm
10 m	9.796,15.051x	958.00 cm
Height	Eavg,Emax	Angle: 51.19deg	Diameter

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Speaker Addons	
	ARON PO ID
Sub:	SB-01
Receiver:	RE-01
Mixer:	MIX-01

General / Dimensions:

Broad Coverage Pattern: 160°

Material: Die Cast aluminum Casing, Powder Coat Finish

Driver: 60 mm (2.5 in) mid/high driver with butyl rubber surround
16-ohm allows for parallelling of multiple units on
a low-Z amplifier

Applications: Retail, Corridor, Restaurants, Commercial

Grill: Many options in color and dimension for a reveal or flush aesthetic

Sub: Designed to be paired with 40CS/T subwoofer-satellite system

Dimensions:

$\begin{bmatrix} 3.87in \\ 98.38mm \end{bmatrix}$

$\begin{bmatrix} 2.97in \\ 75.40mm \end{bmatrix}$

$\begin{bmatrix} 3.87in \\ 98.38mm \end{bmatrix}$ $\begin{bmatrix} 2.97in \\ 75.40mm \end{bmatrix}$

Description

The QUAD Tbar Speaker offers a unique solution to grid mounted
sound solutions. Easily mount the speaker with or without other downlight
quadrants at the intersection of any TBar grid system. There are multiple
configurations available, recommended to have one speaker in one fixture..

No more need for cluttered ceilings at the center of the tile -
just drop the fixture and speaker on the TBar. Only a single dropdown required
for these various technologies!

Our speaker partner, JBL, is well renowned within the sound industry.
This integrated partnership pairs great light quality with equally competitive
sound quality in quite a small form factor.

Example Product Codes:
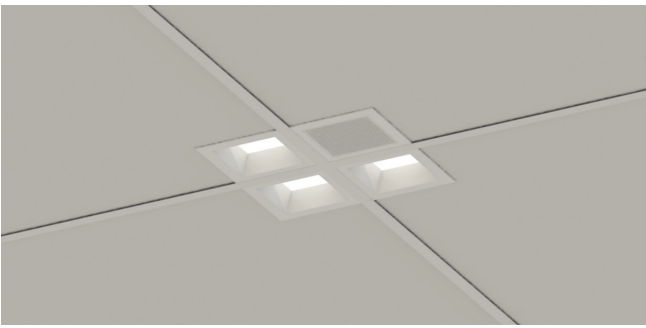
Page 1 QUAD Fixutre Product Code:

QUADT1-FSQ-ASPK-BR-CR-DR-500-B2-35K8-UNV-DM-W

Page 1 QUAD Fixutre Product Code:

QUADT1-FSQ-ASPK-BX-CX-DX-500-B2-35K8-UNV-DM-W

*Subwoofer, Receiver, and Mixer Available

ARON Lighting reserves the right to make any design changes for continuous improvement which will not affect the overall appearance, performance or pricing.

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QUAD TBar

Speaker Ordering Guide

Specifications and Performance Data

System:

Frequency Range (-10 dB): 140 Hz - 20 kHz

Frequency Response (± 3 dB): 180 Hz - 17 kHz lm/W

Power Capacity: 30W Continuous Program Power
15W Continuous Pink Noise

Nominal Sensitivity (2.83V/1m): 82 dB

Nominal Coverage Angle: 160° conical coverage

Directivity Factor (Q): 6.6

Directivity Index (DI): 6.8 dB

Rated Maximum SPL: 94 dB @ 1m (3.3 ft) average, 114 dB peak

Rated Impedance: 16 ohms

Transducer
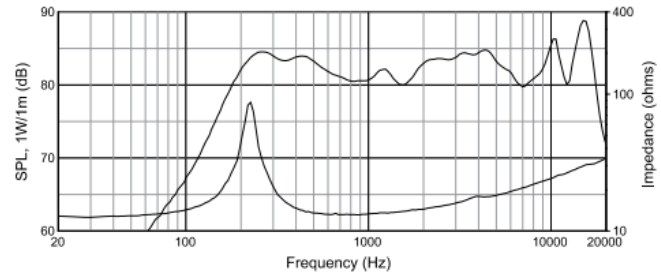
Driver: 60 mm (2.5 in) with polypropylene cone, butyl rubber surround, copper-clad coil, vented aluminum former
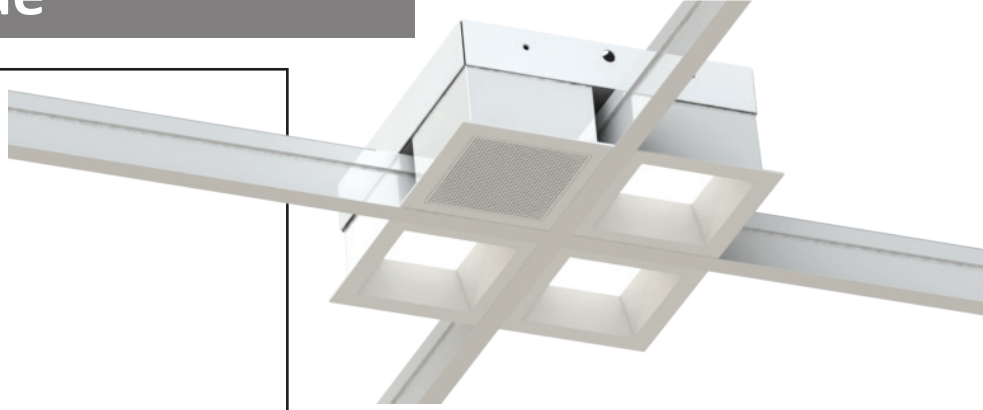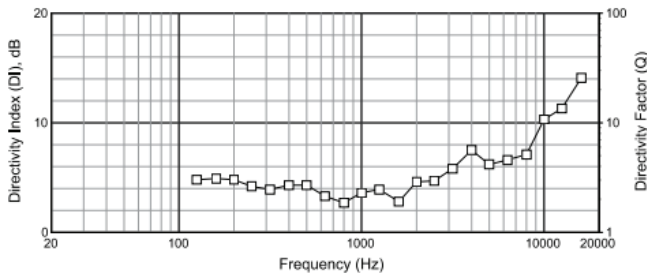
Beamwidth:
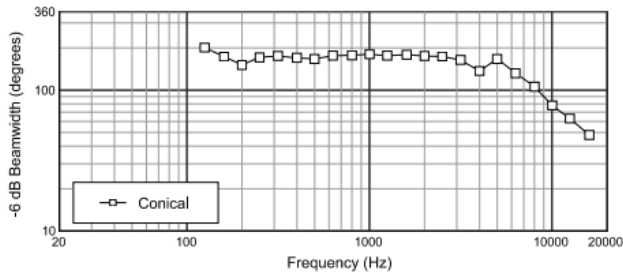
Frequency Response:

Half-space (2pi, mounted in ceiling)

Directivity Index:

Off-Axis Frequency Response:

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