

FEATURES & SPECIFICATIONS

INTENDED USE — The Avante 2x4 is a general lighting luminaire for large spaces including open offices, circulation areas, classrooms, libraries, cafeterias, airport ticketing and wait areas, and numerous other commercial applications. Static or air function available. **Certain airborne contaminants can diminish the integrity of acrylic and/or polycarbonate.** [Click here for Acrylic-Polycarbonate Compatibility table for suitable uses.](#) A typically configured AVL features a Unified Glare Rating (UGR) starting at 18, UGR data available on page 3.

CONSTRUCTION — Housing is gloss white enamel on cold-rolled steel. All edges hemmed or rounded. All shieldings pivot on light traps and swing down for easy access.

Molded light traps prevent light leaks between shielding and end-plates.

All air and screw slot units supplied with screw-on tee bar clips. **Driver access is from below.**

OPTICS — Matte white polyester powder paint finished reflectors provide uniform light distribution.

All diffusers control direct light distribution and glare by shielding LEDs from direct view.

Metal diffuser staggered round holes (MDR) **52% open perforated metal** with .075" diameter holes backed with white acrylic diffuser.

Straight blade louver sides of perforated metal with staggered round holes and solid blade louvered center. Sides and louver backed with white acrylic diffuser.

Acrylic diffuser prismatic lens (ADP) extruded acrylic lens backed with white acrylic diffuser.

ELECTRICAL — Long-life LEDs, coupled with high-efficiency drivers, provide superior quantity and quality of illumination for extended service life. 90% LED lumen maintenance at 60,000 hours (**L90/60,000**). eldoLED driver options deliver choice of dimming range and choice of control, while assuring flicker-free, low-current inrush, 89% efficiency and low EMI.

Networked embedded controls: Networked embedded controls by nLight address the requirements of Luminaire Level Lighting Controls (LLLC). Luminaires with networked embedded controls by nLight are designed, manufactured, tested, and shipped with occupancy, daylight sensors or control devices factory-installed. This simplifies design layouts and reduces total installed cost by eliminates field installation of control devices, while addressing code requirements.

Driver disconnect provided where required to comply with US and Canadian codes.

INSTALLATION — Trims available for standard 1" and 9/16" tee bar or screw slot grids.

Fixtures **can be row mounted end-to-end. Suitable for damp locations.**

Drywall ceiling adapters available.

LISTINGS — CSA certified to meet US and Canadian standards. **IC rated.**

Avante is covered by one or more of the following patents: 5,988,829; 399,586; 411,641; 413,402; 2,212,513; 87,513.

GOVERNMENT PROCUREMENT — BAA — Product with the BAA option qualifies as a domestic end product under the Buy American Act as implemented in the FAR and DFARS. Product with the BAA option also qualifies as manufactured in the United States under DOT Buy America regulations.

BABA — Build America Buy America: Product with the BAA option also qualifies as produced in the United States under the definitions of the Build America, Buy America Act.

Please refer to www.acuitybrands.com/buy-american for additional information.

WARRANTY — 5-year limited warranty. This is the only warranty provided and no other statements in this specification sheet create any warranty of any kind. All other express and implied warranties are disclaimed. Complete warranty terms located at: www.acuitybrands.com/support/warranty/terms-and-conditions

Note: Actual performance may differ as a result of end-user environment and application.

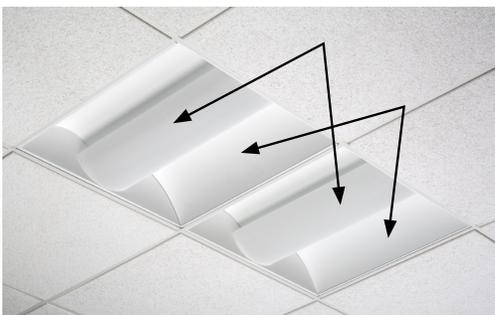
All values are design or typical values, measured under laboratory conditions at 25 °C.

Specifications subject to change without notice.

Avante SE offers tremendous value while providing a similar aesthetic to the first generation LED Avante - now sold as HE version Avante.

(HE) high efficiency Avante is pictured on the right. Notice both the reflector and diffuser are fully illuminated. If looking to match existing first generation Avante fixtures select this version.

SE (standard efficiency) version pictured left



Catalog Number
Notes
Type

Avante
Direct/Indirect Lighting

AVL



eldoLED®

iota™

Patent No.: US D680,254 S

DIMENSIONS

All dimensions are inches (centimeters) unless otherwise specified.

	Specifications
Length 1X4, 2X4:	47 3/4" (121.3)
Length 2X2:	23-3/4" (60.3)
Width 2X2, 2X4:	23-3/4" (60.3)
Width 1X4:	11-3/4" (29.8)
Depth:	5-1/2" (14.0)

A+ Capable Luminaire

This item is an A+ capable luminaire, which has been designed and tested to provide consistent color appearance and out-of-the-box control compatibility with simple commissioning.

- All configurations of this luminaire meet the Acuity Brands' specification for chromatic consistency
- This luminaire is part of an A+ Certified solution for nLight® control networks when ordered with drivers marked by a shaded background*
- This luminaire is part of an A+ Certified solution for nLight control networks, providing advanced control functionality at the luminaire level, when selection includes driver and control options marked by a shaded background*

To learn more about A+, visit www.acuitybrands.com/aplus.

*See ordering tree for details

AVL Direct/Indirect Lighting



A+ Capable options indicated by this color background.

ORDERING INFORMATION

Lead times will vary depending on options selected. Consult with your sales representative

Example: 2AVL4 40LSE MDR EZ1 LP835

2AVL4										
Series	Lumens ‡	Trim type		Air function		Diffuser		Voltage		
AVL4 AV LED 1X4 ‡	18L 1800 lumens 25L 2500 lumens	(blank) Grid trim ST Screw slot	(blank) Static (no air function) A Air return/Supply	ADP Acrylic diffuser, linear prismatic lens ‡ MDR Metal diffuser, round holes	(blank) MVOLT (120 - 277V) 347 347V ‡					
2AVL2 AV LED 2X2	Standard Efficiency 20LSE 2000 lumens 30LSE 3000 lumens 40LSE 4000 lumens	High Efficiency 20LHE 2000 lumens 30LHE 3000 lumens 40LHE 4000 lumens								
2AVL4 AV LED 2X4	Standard Efficiency 30LSE 3000 lumens 40LSE 4000 lumens 50LSE 5000 lumens	High Efficiency 30LHE 3000 lumens 40LHE 4000 lumens 50LHE 5000 lumens								

Driver	Color temperature	Controls	Options
EZ1 eldoLED dims to 1% (0-10 volt dimming)	LP830 3000 K LP835 3500 K	(blank) No controls N80 nLight® with 80% lumen management	BDP Disconnect Plug JP10 Palletized job pack, qty. 10
GZ1 Dims to 1% (0-10V dimming) ‡	LP840 4000 K LP850 5000 K	N80EMG nLight® with 80% lumen management. For use with generator supply EM power	Restriction Note: Not available with 2X4
GZ10 Dims to 10% (0-10V dimming) ‡		N100 nLight® without lumen management N100EMG nLight® without lumen management. For use with generator supply EM power	E7W 7W Emergency battery pack, constant power, Certified in CA Title 20 MAEDBS, User selectable Self-Diagnostic, AC Activate with Integral Test Switch (LINK) ‡
		NLTAIR2 RIO nLight AIR radio module without sensors ‡ NLTAIR2 RIOEM nLight AIR radio module less sensor, with UL924 Emergency Operation, via power interrupt detection ‡	E10W 10W Emergency battery pack, constant power, Certified in CA Title 20 MAEDBS, User selectable Self-Diagnostic, AC Activate with Integral Test Switch (LINK) ‡
			PWS1836 6' pre-wire 3/8" diameter, 18 gauge, 1 circuit PWS1846 6' pre-wire 3/8" diameter, 18 gauge, 2 circuit PWS1846 Two cables: one 6' prewire, 3/8" diameter, 18 gauge, 2 circuits; one 6' pre-wire, 3/8" diameter, 18 gauge PWSLV 6' pre-wire, 3/8" diameter, 18 gauge PWS1856LV 6' pre-wire, 3/8" diameter, 18 gauge, 1 circuit w/ low voltage wires CP Chicago plenum ‡ BAA Buy America(n) Act and/or Build America Buy America Qualified

Accessories: Order as separate catalog number.	
DGA24	2X4 Drywall ceiling adaptor, unit installation.
DGA22	2X2 Drywall ceiling adaptor, unit installation.
DGA14	1X4 Drywall ceiling adaptor, unit installation. Use G trim plus DGA accessory for fixture trim flange and fixture support in plaster or plasterboard ceilings.
RK8BDP 2P U	Disconnect Plug (BDP), 2 Pole, Package of 1
RK8BDP 3P U	Disconnect Plug (BDP), 3 Pole, Package of 1
RK8BDP 2P J10	Disconnect Plug (BDP), 2 Pole, Package of 10
RK8BDP 2P J40	Disconnect Plug (BDP), 2 Pole, Package of 40

‡ Option Value Ordering Restrictions	
Option value	Restriction
AVL4	Air Handling, MDR, & NLTAIR2 options not available with 1X4.
347	Not available with E7W or E10W options.
GZ1, GZ10	Not available with any Controls options.
NLTAIR2 RIO	MDR diffuser only. See UL 924 Sequence of Operation chart on page 3. When combined with the EZ1 option, can be used as a normal power sensing device for nLight AIR devices and luminaires with EM emergency options.
NLTAIR2 RIOEM	See UL924 Sequence of Operation chart on page 3.
CP	Not available with N80, N80EMG, N100, N100EMG, PWS1836, PWS1846, PWS1846 PWSLV or PWS1856LV.

Performance Data 2X4			
Lumen Package	Lumens	Input Watts	LPW
2AVL4 30LSE MDR LP830	2802	36	78
2AVL4 30LSE MDR LP835	2906	36	81
2AVL4 30LSE MDR LP840	3009	36	84
2AVL4 30LSE MDR LP850	3009	36	84
2AVL4 30LHE MDR LP830	2984	30	98
2AVL4 30LHE MDR LP835	3094	30	102
2AVL4 30LHE MDR LP840	3205	30	105
2AVL4 30LHE MDR LP850	3205	30	105
2AVL4 40LSE MDR LP830	3870	47	81
2AVL4 40LSE MDR LP835	4014	47	85
2AVL4 40LSE MDR LP840	4157	47	88
2AVL4 40LSE MDR LP850	4157	47	88
2AVL4 40LHE MDR LP830	3935	41	96
2AVL4 40LHE MDR LP835	4080	41	100
2AVL4 40LHE MDR LP840	4226	41	103
2AVL4 40LHE MDR LP850	4226	41	103
2AVL4 50LSE MDR LP830	4771	62	78
2AVL4 50LSE MDR LP835	4948	62	80
2AVL4 50LSE MDR LP840	5125	62	83
2AVL4 50LSE MDR LP850	5125	62	83
2AVL4 50LHE MDR LP830	4870	50	97
2AVL4 50LHE MDR LP835	5051	50	100
2AVL4 50LHE MDR LP840	5231	50	104
2AVL4 50LHE MDR LP850	5231	50	104

How to Estimate Delivered Lumens in Emergency Mode

Use the formula below to estimate the delivered lumens in emergency mode

$$\text{Delivered Lumens} = 1.25 \times P \times \text{LPW}$$

P = Output power of emergency driver. P = 10W for E10WLCP option.

LPW = Lumen per watt rating of the luminaire. This information is available on the AVL luminaire spec sheet.

LPW = Lumen per watt rating of the luminaire. LPW information available in Performance Data section.

UL924 Sequence of Operation

The below information applies to all nLight AIR devices with an EM option.

- EM devices will remain at their high-end trim and ignore wireless lighting control commands, unless a normal-power-sensed (NPS) broadcast is received at least every 8 seconds.
- Using the CLAIRITY+ mobile app, EM devices must be associated with a group that includes a normal power sensing device to receive NPS broadcasts.
- Only non-emergency rPP20, rLSXR, rSBOR, rSDGR, and nLight AIR luminaires with version 3.4 or later firmware can provide normal power sensing for EM devices. See specification sheets for control devices and luminaires for more information on options that support normal power sensing.

Lumen Package	UGR Values of AVL 2x4 @ 80CRI and 3500K (70% 50% 20% reflectance using a 4H x 8H room size)			
	ADP		MDR	
	Crosswise	Endwise	Crosswise	Endwise
3000LSE	18	19.9	16	17.4
3000LHE	19.1	21.2	16.4	19.1
4000LSE	19.1	21.1	17.1	18.5
4000LHE	20.1	22.2	17.4	20.1
5000LSE	19.9	21.8	17.8	19.2
5000LHE	20.8	22.9	18.1	20.8

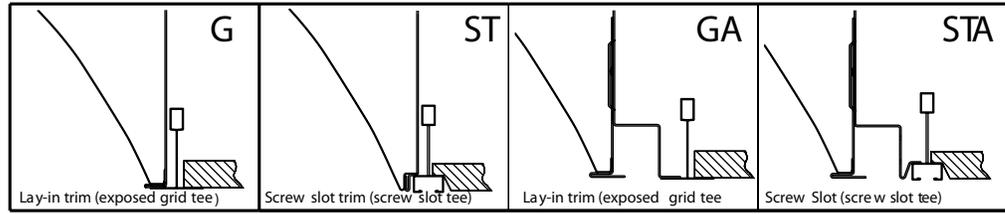
UGR varies based on luminaire options and is affected by application dependent parameters. Numbers depicted here are considered "Luminaire-UGR and/or "Point-UGR" values. To determine a more precise maximum UGR value ("Application-UGR"), a full lighting design layout should be completed with the selected luminaire configuration for each application

Performance Data 2X2			
Lumen Package	Lumens	Input Watts	LPW
2AVL2 20LSE MDR LP830	2028	22	92
2AVL2 20LSE MDR LP835	2063	22	94
2AVL2 20LSE MDR LP840	2098	22	95
2AVL2 20LSE MDR LP850	2098	22	95
2AVL2 20LHE MDR LP830	2052	20	101
2AVL2 20LHE MDR LP835	2087	20	102
2AVL2 20LHE MDR LP840	2122	20	104
2AVL2 20LHE MDR LP850	2122	20	104
2AVL2 30LSE MDR LP830	3055	34	89
2AVL2 30LSE MDR LP835	3108	34	91
2AVL2 30LSE MDR LP840	3160	34	92
2AVL2 30LSE MDR LP850	3160	34	92
2AVL2 30LHE MDR LP830	3035	31	99
2AVL2 30LHE MDR LP835	3087	31	100
2AVL2 30LHE MDR LP840	3140	31	102
2AVL2 30LHE MDR LP850	3140	31	102
2AVL2 40LSE MDR LP830	4062	48	84
2AVL2 40LSE MDR LP835	4132	48	85
2AVL2 40LSE MDR LP840	4202	48	87
2AVL2 40LSE MDR LP850	4202	48	87
2AVL2 40LHE MDR LP830	4069	41	99
2AVL2 40LHE MDR LP835	4139	41	101
2AVL2 40LHE MDR LP840	4209	41	103
2AVL2 40LHE MDR LP850	4209	41	103

Performance Data 1X4			
Lumen Package	Lumens	Input Watts	LPW
AVL4 18L MDR LP830	1757	20	90
AVL4 18L MDR LP835	1788	20	91
AVL4 18L MDR LP840	1818	20	93
AVL4 18L MDR LP850	1818	20	93
AVL4 25L MDR LP830	2400	27	90
AVL4 25L MDR LP835	2441	27	92
AVL4 25L MDR LP840	2483	27	93
AVL4 25L MDR LP850	2483	27	93

MOUNTING DATA

Ceiling Type	Appropriate Trim Type
Exposed grid tee (1" and 9/16")	G
Concealed grid tee	G
Screw slot	ST
Plaster or plasterboard	G*



*DGA accessory available to provide ceiling trim flange and fixture support for plaster or plasterboard ceiling. Recommended rough-in dimensions for DGA installation is 24-3/4" x 48-3/4" (Tolerance is +1/8", -0").