ZK431ST

Optoma ZK431ST: Compact 4K UHD 4,100 Lumen Short Throw Laser Business and Education Projector



The Optoma ZK431ST makes True 4K UHD short throw projection accessible for budget-conscious education and corporate buyers. At 4,100 lumens, the ZK431ST delivers bright, vivid visuals in classrooms and conference rooms with moderate ambient light. DuraCore laser technology provides up to 30,000 hours of maintenance-free operation, eliminating the cost and disruption of lamp replacements. Four-corner correction, keystone adjustment, 360° projection capability, and Optoma Smart App compatibility make installation and alignment straightforward.

Crisp 4K from wall to wall: Native 4K UHD (3840×2160) makes text, data, and imagery sharp and readable across screen sizes up to 300"

• Project big from tight spaces: 0.496:1 short throw lens fills the screen (30-300") from about 2-11 feet away—no more crowded rooms or presenter shadows

• Bright enough for real classrooms: 4,100 lumens keep images clear and vibrant in rooms with controlled to moderate ambient light

• No lamps. No maintenance. 30,000 hours: DuraCore laser technology means zero replacement costs and no unexpected downtime

• Install anywhere: Four-corner correction, ±15° keystone adjustment, and 360° projection flexibility handle virtually any room layout

• Smart setup from your phone: The Optoma Smart Control App guides screen alignment and gives full projector control from a mobile device

Specification

Display

Technology	DLP®
Resolution	4K UHD (3840x2160)
Brightness	4,100 Lumens
Contrast ratio	300,000:1
Contrast ratio (Dynamic)	2,000,000:1
Native aspect ratio	16:9
Aspect ratio - compatible	4:3, 16:9, 16:10, Full, Auto, Native
Keystone correction - horizontal	+/-15°
Keystone correction - vertical	+/-15°
Horizontal scan rate	15~150 KHz
Vertical scan rate	24~240 Hz
Uniformity	75%
Screen size	30"~300"

Light source

Light source type	Laser
Light source life	30,000 hours (Eco mode)

Optical

Throw ratio	0.496
Projection distance	12.99" ~ 129.92"
Zoom	n/a
Zoom type	n/a
Focal length	7.51mm
Native offset	114%
Lens shift	n/a

Connectivity

Connections- Inputs	2 x HDMI 2.0, 1 x VGA In,
Connections - Outputs	2 x USB-A 2.0, 1 x 3D sync out, 1 x Audio 3.5mm
Connections - Control	1 x RJ45, 1 x RS232, 1 x 12V trigger

Specification

General

Noise level	29 dB(A)
PC compatibility	VGA,SVGA,XGA,720p,WXGA,SXGA,SXGA+,UXGA,1080p,WUXGA
2D compatibility	NTSC,PAL,SECAM,SDTV,HDTV,UHD
3D compatibility	Supports all HDMI 1.4a mandatory 3D formats (Frame pack, side-by-side, top-bottom) and up converts frame rate from 60Hz to 120Hz or 24Hz to 144Hz
Security	Security bar, Kensington Lock, Password protected interface
OSD / display languages	27 languages: Arabic, Czech, Danish, Dutch, English, Farsi, Finnish, French, German, Greek, Hungarian, Indonesian, Italian, Japanese, Korean, Norwegian, Polish, Portuguese, Romanian, Russian, Simplified Chinese, Spanish, Swedish, Thai, Traditional Chinese, Turkish, Vietnamese
24/7 operation	Yes
360° operation	Yes
Operating conditions	Max Temperature(operating): 0 ~ 40°C; Tolerance +/- 2°C, Max Altitude(operating): 10,000 ft., for 0°C~30°C, Max humidity(operating): 80% RH, non-condensing
Remote control	Business remote control
Speaker count & Watts per speaker	1 x 15W
Input lag	4K/ 60Hz: 16.7 ms 1080P/ 60Hz: 16.7 ms 1080P/ 120Hz: 8.6 ms
In the box	AC power cord Remote control 2 x AAA batteries Quick start user manual

Networking

LAN control	Yes
24/7 operation	Yes
360° operation	Yes

Power

Power supply	AC 100 ~ 240 V, 50 ~ 60 Hz
Power consumption (standby)	≤0.5 W
Power consumption (eco mode)	125 W@110VAC 124 W@220VAC
Power consumption (bright mode)	178 W @110VAC 176 W @220VAC

Weight and dimensions

Dimensions (W x D x H)	W/o feet: 216 x 274 x 108.5mm (10.8 x 8.5 x 4.3 inches) With feet: 216 x 274 x 114mm (10.8 x 8.5 x 4.5 inches)
Gross weight	4.3 kg / 9.4 lbs
Net weight	2.9 Kg / 6.3 lbs

Applicable software

Optoma Management Suite	Yes
Optoma Smart Control App	Yes