

EB-PQ2220B

20,000-Lumen 4K 3LCD Laser Projector



Product shown with lens.
Lens sold separately.

The world's smallest and lightest 20,000-lumen 4K projector



The world's smallest and lightest 20,000-lumen 4K projector¹ — produces incredibly bright images with a light, compact and energy efficient design

Incredible color — Epson 3-chip 3LCD technology produces 20,000 lumens of equal white and color brightness²

4K resolution on-screen — leverages Epson's 4K Crystal Motion technology, thermo-controlled panel and double micro-lens array for crystal clear image quality that fully realizes 4K resolution (3840 x 2160)

Robust, high-reliability design — virtually maintenance-free 20,000-hour laser light source³; IP5X-rated hermetically sealed optical and light source module for high dust resistance; filterless cabinet; optimized liquid cooling system

Stunning image quality — high native contrast ratio for deep blacks; 50 percent improvement over the already high contrast ratio found with the current Epson EB-PU Series; frame interpolation for fast moving objects; HDR support⁴ and scene adaptive gamma correction

Simplified installation — 9 optional powered lenses (sold separately) including ultra short throw .35 throw lens with a unique zero offset design for installation flexibility; projector compatible with existing Epson lens family

Enhanced connectivity — HDMI[®] two in and one out; 12G-SDI in/out for daisy chaining and signal monitoring; features automatic input switching when input signal is disrupted

Versatile power source options — requires 220 V power for full brightness; can operate at 16,000 lumens from a standard 120 V power source for setup and installation

Low latency performance and high frame rate support — high speed graphics chip and panel drive technology enable high frame rate 4K playback

Optional attachable PixAlign™ external camera — access powerful automated tools including edge blending assist⁵, stacking assist function⁵, auto color calibration⁶ and screen matching⁶ with or without a connected PC and router

Specifications

Projection System High-aperture Epson 3-chip 3LCD technology

Projection Method Front/rear/ceiling mount

Driving Method Poly-Silicon TFT Active Matrix

Pixel Number 2,073,600 pixels (1920 x 1080) x 3 chips

Signal Input Maximum Display Resolution: 4096 x 2160 pixels (resizing display)

Native Resolution 1080p with 4K Crystal Motion (1920 x 1080 x 4)

Resolution on Screen 4K UHD (3840 x 2160)

Aspect Ratio Supports 4:3, 16:10, 16:9*, 21:9*
* With vertical image shift control within letterbox area.

Pixel Arrangement Cross stripe

Color Brightness² Color Light Output: 20,000 lumens

White Brightness² White Light Output: 20,000 lumens

Contrast Ratio Up to 5,000,000:1 (Dynamic Contrast: On)

Brightness Uniformity (Typical) 85%

Color Reproduction Up to 1.07 billion colors

Keystone Correction Vertical: ±45 degrees; Horizontal: ±30 degrees

Illumination Technology Laser Phosphor

Light Source Life³
20,000 hours (Normal Mode)
30,000 hours (Extended Mode)

Projection Lens (Standard)

Visit www.epson.com for information on optional lenses.

Standard Lens ELPLM15 (sold separately)

Type Powered shift/focus/zoom

F-Number 2.0 – 2.1

Focal Length 14.8 mm – 17.7 mm

Zoom Ratio Optical Zoom: 1.0 – 1.6

Throw Ratio Range 1.52 – 2.47

Lens Shift Vertical: ±60%; Horizontal: ±18%

Other Features

Operating Temperature 32 °F to 122 °F (0 °C to 50 °C)

Power Supply Voltage 100 – 120 V AC +/- 10%, 50/60 Hz,
200 – 240 V AC +/- 10%, 50/60 Hz

Power Consumption (220-240 V)
1,431 W (Normal/Custom)

975 W (Quiet/Extended)
2.0 W Standby (Network Standby)

0.5 W Standby (Energy Saving)

Fan Noise 48 dB (Normal Mode); 39 dB (Eco Mode)

IP Rating IP5X⁷

Security Security cable hole, lens lock, Kensington® lock provision, wireless LAN unit lock

Video I/O

Input Signal Input Video Signal (HDMI and HDBaseT® ports): 480i/480p/576i/576p/720p/1080i/1080p/3840 x 2160/4096 x 2160

Auto Power On Signal Detection on HDMI/Plug-In Detection (HDMI)

Sleep Mode Yes (with timer)

HDMI CEC Control Yes

Interfaces

12G-SDI In/Out
HDMI (HDCP 2.3) x 2/HDMI Out x 1
HDBaseT x 1
Variable Audio Out: Mini Stereo x 1
USB Type-B x 1
USB Type-A x 2 (5 V, 2.0 A)
USB Type-A for Wireless LAN (optional)
Serial: RS-232c x 1 (9-pin)
Remote Stereo Mini
Network: RJ-45

Dimensions (W x D x H)

Excluding Feet 23.1" x 19.4" x 7.3" (586 mm x 492 mm x 185 mm)
Weight 64.3 lb (29.2 kg)

Remote Control

Features Power, Source Search Selection, Lens Shift/Zoom/Focus, Test Pattern Selection, Shutter, Freeze, ID, Color Mode, Number, E-Zoom, Volume, Menu, Enter, ESC, Pointer Functions, Blend Guides, Multi-Projection, Color Tone Adjust and Memory

Operating Angle
Front: Right/Left: 60 to +60; Upper/Lower: +30 to 30 degrees
Rear: Right/Left: 30 to +30; Upper/Lower: +40 to +5 degrees

Operating Distance 98 ft

Eco Features

RoHS compliant
End-of-life options available⁸
Epson America, Inc. is a SmartWay® Transport Partner⁹

Limited Warranty and Service

Warranty Three-year limited or 20,000 hours, whichever comes first, in the U.S. and Canada

Service Toll-free telephone support, Monday through Friday

Epson ConnectionSM
Pre-Sales Support (U.S. and Canada): 800-463-7766
Website: www.epson.com

Epson PreferredSM Plus Extended Service Plan

3-Year Upgrade to Next-Business-Day Whole Unit Exchange¹⁰ for Years 1-3 EPPPRJPQ3
5-Years Next-Business-Day Whole Unit Exchange¹⁰ for Years 1-5 EPPPRJPQ20E5
Other extended service plans may be available.



What's Included

EB-PQ2220B projector, two cables (220 V – 240 V power cable x 1 and 100 V – 120 V power cable x 1), remote control with 2 batteries, cable cover, quick reference guide and warranty sheet

Ordering Information

EB-PQ2220B	V11HB05820
Ultra Short Throw Lens (ELPLX02S)	V12H004X0B
Ultra Short Throw Lens – White (ELPLX02WS)	V12H004Y0B
Short Throw #1 Zoom Lens (ELPLU03S)	V12H004UA3
Short Throw #2 Zoom Lens (ELPLU04)	V12H004U04
Wide Throw #2 Zoom Lens (ELPLW06)	V12H004W06
Wide Throw #3 Zoom Lens (ELPLW08)	V12H004W08
Middle Throw #2 Zoom Lens (ELPLM15)	V12H004M0F
Middle Throw #3 Zoom Lens (ELPLM10)	V12H004M0A
Middle Throw #4 Zoom Lens (ELPLM11)	V12H004M0B
Long Throw Zoom Lens (ELPLL08)	V12H004L08
Rigging Frame (ELPMB59)	V12H996A01
Wireless LAN Module (ELPAP11)	V12H005A02
Projector Ceiling Mount (ELPMB67)	V12HA54010
Suspension Adapter (ELPPF15)	V12HA55010
PixAlign Camera (ELPEC01)	V12HA46010

1 Comparison based on 4K projectors rated at 20,000 lumens. Lumens, resolution, size and weight based on the manufacturers' online specifications and industry-available data as of October 2023.
2 Color brightness (color light output) and white brightness (white light output) will vary depending on usage conditions. Color light output measured in accordance with IDMS 15.4; white light output measured in accordance with ISO 21118. | 3 No required maintenance for the light source for up to 20,000 hours (Normal Mode), 30,000 hours (Extended Mode). Approximate time until brightness decreases 50% from first usage. Measured by acceleration test assuming use of 0.04 - 0.20 mg/m3 of particulate matter. Time varies depending on usage conditions and environment. Replacement of parts other than the light source may be required in a shorter period. | 4 HDR performance available with select third-party devices. For more information, see www.epson.com/hdrcompatibility | 5 Requires Epson external camera for each projector and may require Epson Projector Professional Tool app. | 6 Using separate camera for each projector. | 7 IP5X-certified optical engine and laser light source module in accordance with IEC standard 60529. | 8 For convenient and reasonable recycling options, visit www.epson.com/recycle | 9 SmartWay is an innovative partnership of the U.S. Environmental Protection Agency that reduces greenhouse gases and other air pollutants and improves fuel efficiency. | 10 Product comes with a 3-year limited warranty with the option to purchase extended service plans up to a total of 5 years of continuous coverage. Extended service plan must be purchased within 90 days of hardware purchase. See individual service plan for details. Expedited shipping not available in all areas. Orders must be placed and processed by 1 p.m. Pacific Time, Monday through Friday, excluding holidays.

See the latest innovations from Epson Business Solutions at www.epson.com/forbusiness