

# JVC

# DLA-RS4500

Native 4K D-ILA Projector with  
BLU-Escent Laser Light Engine

## REFERENCE SERIES

## 4K



## BLU-Escent

JVC's DLA-RS4500 native 4K projector combines JVC's new 4096 X 2160 D-ILA devices and "BLU-Escent" Laser phosphor light source to become the worlds first THX 4K certified projector. This flagship model features HDR compatibility, a new high-resolution lens developed specifically for 4K applications, and a new Cinema Filter for a wide color gamut. This projector needs to be experienced to be believed!

- BLU-Escent (Laser Diode/Phosphor) Light Source
- $\infty : 1$  Dynamic Contrast Ratio
- Three 0.69 inch 4K D-ILA (4096 x 2160) Devices
- 18 Element, 16 Group All Glass 100mm Diameter Zoom Lens
- 4K (4096 x 2160) Projected Image
- Two 18Gbps HDMI/HDCP 2.2 Compatible Inputs
- THX® 4K\* Display Certified
- ISF (Imaging Science Foundation) Licensed
- MPC w/Auto Mode scales HD video to 4K, and can be used to fine tune Native 4K signals (up to 4K60P 4:4:4)
- HDR (High Dynamic Range) Compatible w/HDR10 and Hybrid Log Gamma and SMPTE 2086
- Motion Enhance (2D, 3D, 4K) w/Upgraded Clear Motion Drive
- Over 100% DCI P3 color space and over 80% coverage of the BT.2020 color gamut
- 1.4 to 2.8:1 Motorized Zoom Lens w/ $\pm 100\%$  Vertical Offset and  $\pm 43\%$  Horizontal (with 16:9 throw)
- New Installation Function Memorizes 10 Positions for Lens, Screen & Masking Settings
- Control: Control4 SDDP / LAN / RS-232C / IR / 12V Screen Trigger Output / 3D Sync Output
- 5 Year Warranty

\* The RS4500 is undergoing rigorous THX laboratory testing to become the very first (or world's first) THX Certified 4K projector.

Note: Optional Active 3D Glasses (PK-AG3) and RF Emitter (PK-EM2) are required for viewing images in 3D.



## D-ILA® Native 4K D-ILA Device 0.69 inch

The DLA-RS4500 employs the world's smallest Native 4K D-ILA device (.69" diagonal) realizing 4096 x 2160 pixel images. It utilizes vertical orientation technology and a planarization technique that reduces light scattering and light diffraction over previous devices. The result is extremely high native contrast ratios with smooth, detailed pictures without visible pixel structure even on large screens.

## BLU-Escent

JVC's proprietary 2nd generation "BLU-Escent" Laser Phosphor light engine uses Blue Laser diodes, stationary inorganic phosphor and JVC's proprietary color management system. "BLU-Escent" enables 3,000 lumen light output and 20,000 hour long life illumination. Increased brightness ensures compatibility with larger screen sizes over 200 inches, and improved HDR performance, bringing greater depth and dimensionality to home theater screens.

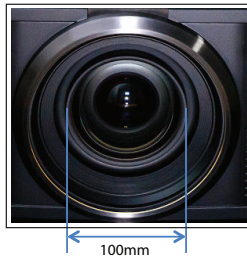


- Equipped with 6 banks of 8 laser diodes, (48 total laser diodes) creating a maximum brightness of 3,000lm.
- BLU-Escent's 48 Laser diodes provide a built in redundancy system to produce a high quality bright image over 20,000 hours.

## 4K High Resolution Lens Dedicated for 4K

An 18 element, 16 group all glass lens and full aluminum lens barrel has been specially engineered for the DLA-RS4500's 4K performance. Chromatic aberration and color fringing are minimized even when utilizing lens shift, resulting in precise projection of 4K content. A new 100mm diameter lens is used for increased efficiency, projecting 4K resolution to every corner of the screen. This compares to 65mm diameter designs used in other JVC projectors. This lens allows a wide shift range of  $\pm 100\%$  vertical,  $\pm 43\%$  horizontal.

DLA-RS4500 lens



## Latest HDMI, HDCP compatibility

### HDMI

- Dual Full Speed, Full Spec 18GBPS HDMI w/HDR
- Compatible with highest quality native 4K signals such as 4K60p 4:4:4, 4K60p 4:2:2/36bit and 4K24p 4:4:4/36bit

### HDCP2.2

- Content protection required by all leading Hollywood Studios
- Compatible with highest quality 4K sources, including Ultra HD Blu-ray and Netflix 4K

### 4K Compatibility Chart

Frame Rate [Hz]	V[Line]	H[Pixel]	Compatible: ✓						Compatible (Needs 18Gbps): ✓										
			RGB/YCbCr4:4:4			YCbCr4:2:2			YCbCr4:2:0										
			8bit	10bit	12bit	8bit	10bit	12bit	8bit	10bit	12bit								
4K (3840x2160)	2160	3840	23.98 / 24	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	
			25	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
			29.97 / 30	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
			50	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
			59.94 / 60	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
4K (4096x2160)*	2160	4096	23.98 / 24	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	
			25	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
			29.97 / 30	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
			50	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
			59.94 / 60	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

#### Notes about viewing 3D video content

- The optional 3D Synchro Emitter and 3D glasses are required to view 3D images from the D-ILA projectors. 3D video software (3D media or output of 3D broadcasts) and a 3D-compatible video player are also required.
- Perception of 3D images will vary with individual viewers.
- Stop viewing 3D images immediately if any discomfort such as headaches, dizziness, eye fatigue, etc. occurs.
- Viewing of 3D images by children under the age of five is not recommended.
- Read the Safety Precautions in the User Manual carefully before viewing any 3D source.

**About THX.** Founded by legendary filmmaker George Lucas in 1983, THX and their partners provide premium entertainment experiences in the cinema, in the home and on the go. THX develops audio-video and environmental designs, technologies, products and specifications to ensure an artist's vision is truthfully delivered to audiences worldwide. For more information on THX please visit [www.thx.com](http://www.thx.com).

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## HDR (High Dynamic Range) Compatible

HDR content such as UHD Blu-ray discs incorporate extended dynamic range, 10bit color and wide BT.2020 color gamut. This demands exceptional specifications and exacting performance from display devices. The new DLA-RS4500, employs high native contrast ratio with BT.709 and Digital Cinema Initiative (DCI) color gamut with BT.2020 color mapping, dynamic light source control and high brightness let you experience a full complement of HDR content.

Hybrid Log-Gamma is an additional HDR Gamma mode that is used for live broadcast or streaming events.

General Cinema Image



DLA-RS4500 HDR Compatible Image



## Control4 Home Automation

All JVC Reference Series projectors for 2016 are Control4 SDDP (Simple Device Discovery Protocol) software certified so they can easily be integrated into a Control4 home automation system.

## Optional Equipment



PK-EM2  
RF 3D Synchro  
Emitter



PK-AG3  
RF 3D Glasses  
Battery-operated

## Specifications

		DLA-RS4500
Imaging Device	0.69 inch 4K D-ILA (4096 X 2160) x3	
4K	Native	
Resolution	4096 x 2160 D-ILA	
Lens	2X Motorized Zoom & Focus, 1.4 to 2.8 Throw Distance Range Throw distance=Screen width X1.4 (Min.), Screen width X2.8 (Max.)	
Lens Shift	Motorized Shift $\pm 100\%$ Vertical and $\pm 43\%$ Horizontal	
Light Source	2nd generation "BLU-Escent" Laser Phosphor light engine (3,000 lumen light output and 20,000 hour long life illumination)	
Contrast Ratio	Dynamic: $\infty:1$	
Input Terminals	HDMI	2 (Full Speed 18Gbps HDMI/HDCP 2.2 Compatible w/HDR)
	USB	For firmware updates only
Output Terminals	3D Sync	1 (Mini DIN 3pin)
	Trigger	1 (Mini jack, DC12V/100mA)
Control Terminals	RS-232C	1 (D-sub 9pin)
	LAN (RJ-45)	1
Digital Video Signal	480p, 576p, 720p/50 Hz, 720p/60 Hz, 1080i/50 Hz, 1080i/60 Hz, 1080p/24 Hz, 1080P/25 Hz, 1080P/30 Hz, 1080p/50 Hz, 1080p/60 Hz, 2K(2048/24,25,30,50,60), 4K(3840/24,25,30,50,60), 4K(4096/24,25,30,50,60)	
3D Signal	Frame Packing	720p/50 Hz, 720p/60 Hz, 1080p/24 Hz
	Side-by-Side	1080i/60 Hz, 1080p/60 Hz, 1080i/50 Hz, 1080p/50 Hz, 1080p/24 Hz, 720p/50 Hz, 720p/60 Hz
	Top-and-Bottom	720p/50 Hz, 720p/60 Hz, 1080p/24 Hz
PC Input Signal Format	HDMI	VGA, SVGA, XGA, WXGA, FWXGA, WXGA+, SXGA, WXGA++, WSXGA+, WUXGA
Dimensions	(WxHxD-inches)	19.69 x 8.46 x 28.35 w/o legs
Weight (net)	(lbs)	85.9