Indoor LED Signage
IEA Series

Creating an unforgettable in-store experience with custom-fit design

Industry trend

Even as online shopping and e-commerce have taken over, many brick-and-mortar stores continue to thrive by creating distinct, memorable in-store experiences. Physical retail stores that utilize LED signage to create innovative, eye-catching content have found they can both draw in new customers and encourage return visits from their most loyal customers. The market for indoor LED Signage is expected to continue to grow for the foreseeable future. It's no surprise then, that implementing modern in-store LED Signage has not only become common, but really is an essential element in creating an unforgettable in-store experience.

Why Samsung IEA Series

Samsung's IEA Series is designed especially for retail stores, with Samsung's industry-leading picture quality and an intuitive, streamlined content management system allowing store managers to easily and efficiently update display content. The IEA Series displays also feature multiple cabinet sizes giving retailers additional options, providing cost savings and greater flexibility in the design and layout of their displays. This means displays can be custom-fit for their specific space requirements, giving customers a more immersive experience.
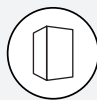
Flexible design

High picture quality

Operational efficiency
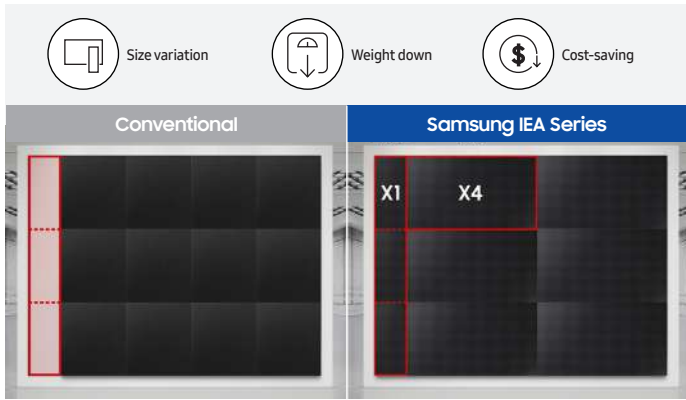
Key features

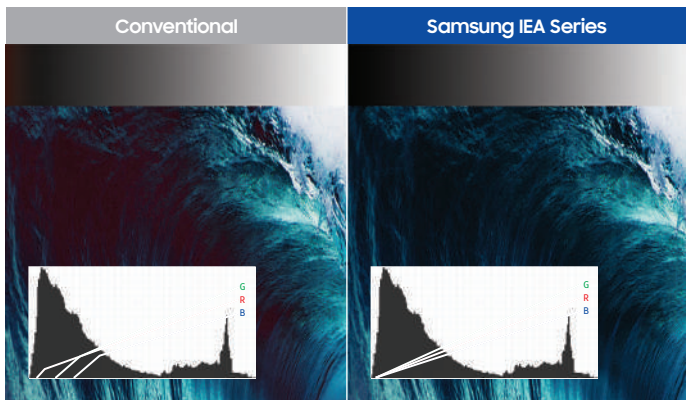Curved   L-Type   Ceiling

Flexible design for any location

The IEA series' advanced design provides flexibility for any indoor retail or other business environment. With support of portrait, landscape, curved, L-shaped and ceiling installations, businesses can have ultimate control to create the ideal display for their space.

Key features

Size variation | Weight down | Cost-saving
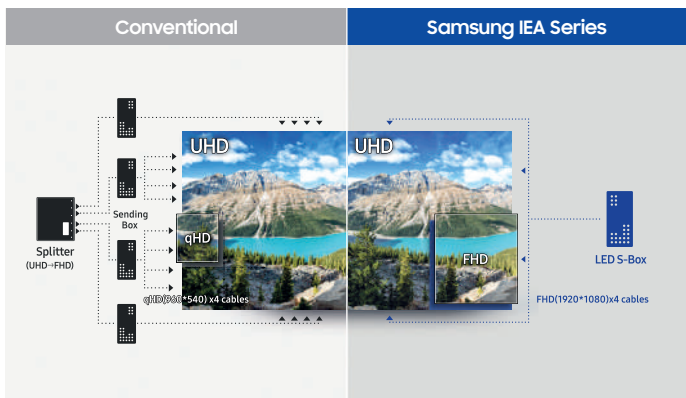
Conventional | Samsung IEA Series

X1 | X4

Easier, cost-saving installation

The IEA Series supports two cabinet types. One version features a larger, lighter screen compared to conventional cabinets, simplifying installation. The other is a quarter of the size and provides more flexibility in design.

Dynamic Peaking | Inverse Tone Mapping | Color Mapping

Original Image | LED HDR

Clearly refined visuals

LED HDR leverages advanced refinement technologies for true-to-life picture presentation. Dynamic Peaking and Inverse Tone Mapping enhance content to optimum peak brightness levels with improved contrast and without shine, while in-depth Color Mapping ensures an accurate expression of colors.

Conventional | Samsung IEA Series

Accurate color in low brightness arena

Conventional LED displays struggle to present red, green and blue color hues accurately in low grayscale settings. The IEA Series overcomes these challenges through a unique algorithm that maintains R/G/B gradation and delivers precise, detail-rich hues in low-brightness indoor environments.

FACTORY CALIBRATION | ON-SITE CALIBRATION | POST CALIBRATION

Picture Setting
Brightness | Picture Mode
Sharpness | Contrast | Color

Radiant Camera | DSLR Camera | LED Signage Manager
Sub-pixel tuning for uniform brightness and color chromaticity | Convenient on-site-pixel calibration using DSLR camera | Advanced picture setting for optimal viewing experience

Fine-tuned uniformity

Rigorous factory calibration and real-time DSLR camera sub-pixel calibration fine-tune all sub-pixels for uniform brightness and color chromaticity. When coupled with the Samsung LED Signage Manager's advanced picture settings, this enhanced treatment produces excellent presentation.

Conventional | Samsung IEA Series

UHD | UHD
qHD | FHD
Splitter (UHD→FHD) | Sending Box | LED S-Box
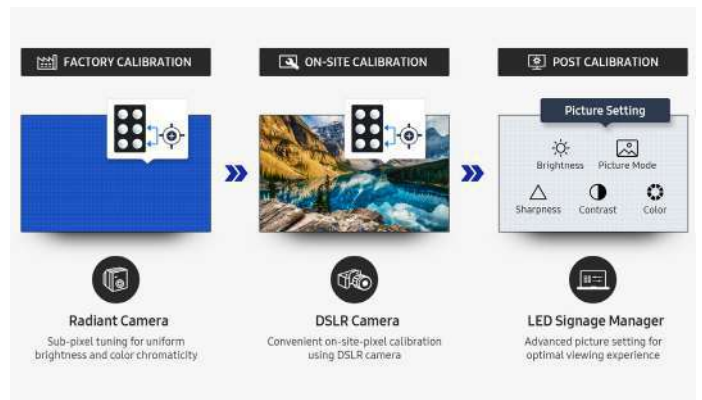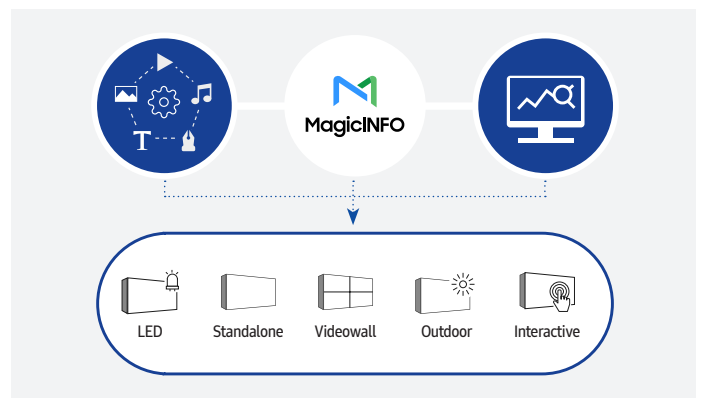qHD(960*540) x4 cables | FHD(1920*1080)x4 cables

Streamlined UHD content delivery

Samsung's compatible S-Box condenses the delivery of compelling content to a single, centralized device. The S-Box transmits UHD content across multiple IEA Series displays without requiring external boxes or splitters, helping businesses enjoy faster and more cost-efficient operations.

MagicINFO

LED | Standalone | Videowall | Outdoor | Interactive

Manage content and devices anywhere

Compatibility with the MagicINFO platform enables IEA Series' users to create, schedule and deploy content across an entire signage network. Users can also monitor and adjust the settings of different display types at the same time and troubleshoot potential performance issues from any location via remote access.

Specifications

Model		IEA			
		IE015A	**IE020A**	**IE025A**	**IE040A**
		LH015IEACLS	LH020IEACLS	LH025IEACLS	LH040IEACLS
Physical Parameter	Pixel Pitch	1.5mm	2.0 mm	2.5 mm	4.0 mm
	Pixel Configuration	1 red, 1 green, 1 blue	1 red, 1 green, 1 blue	1 red, 1 green, 1 blue	1 red, 1 green, 1 blue
	Configuration (LxH, per cabinet)	640 x 360 pixels	480 x 270 pixels	384 x 216 pixels	240 x 135 pixels
	Diode Type	Surface Mount Device (SMD)	Surface Mount Device (SMD)	Surface Mount Device (SMD)	Surface Mount Device (SMD)
	Dimensions (mm, LxHxD, per cabinet)	960 x 540 x 79.5 mm	960 x 540 x 79.5 mm	960 x 540 x 79.5 mm	960 x 540 x 79.5 mm
	Dimensions (inch, per cabinet)	43.3 x 3.13 inch	43.3 x 3.13 inch	43.3 x 3.13 inch	43.3 x 3.13 inch
	No. of Modules (WxH, per cabinet)	4 x 3	4 x 3	4 x 3	4 x 3
	Weight (per cabinet/per m²)	11.8 kg / 22.8 kg	12.4 kg / 23.9 kg	10.8 kg / 20.8 kg	10.8 kg / 20.8 kg
Optical Parameter	Brightness (Peak/Max) [1]	1,000 nit / 500 nit	1,000 nit / 500 nit	1,000 nit / 500 nit	800 nit / 500 nit
	Contrast Ratio [2]	6,000:1	7,500:1	5,000:1	5,000:1
	HDR Compatibility	LED HDR / HDR10+ support / Multi-link HDR	LED HDR / HDR10+ support / Multi-link HDR	LED HDR / HDR10+ support / Multi-link HDR	LED HDR / HDR10+ support / Multi-link HDR
	Viewing Angle - Horizontal	150°	150°	150°	150°
	Viewing Angle - Vertical	150°	150°	150°	150°
	Bit Depth	16 bit (Internal processing 18bit)	16 bit (Internal processing 18bit)	16 bit (Internal processing 18bit)	16 bit (Internal processing 18bit)
	Color Temperature - Default	6,500K	6,500K	6,500K	6,500K
	Color Temperature - Adjustable	2,800 ~ 10,000K (use S/BOX)	2,800 ~ 10,000K (use S/BOX)	2,800 ~ 10,000K (use S/BOX)	2,800 ~ 10,000K (use S/BOX)
Electrical Parameter	Video Rate	50/60 Hz	50/60 Hz	50/60 Hz	50/60 Hz
	Input Power Range	100~240 VAC, 50/60 Hz	100~240 VAC, 50/60 Hz	100~240 VAC, 50/60 Hz	100~240 VAC, 50/60 Hz
	Power Consumption - Max	367 (W/m²) / 190 (W/Cabinet)	367 (W/m²) / 190 (W/Cabinet)	347 (W/m²) / 180 (W/Cabinet)	347 (W/m²) / 180 (W/Cabinet)
	Power Consumption - Typ	203 (W/m²) / 105 (W/Cabinet)	203 (W/m²) / 105 (W/Cabinet)	116 (W/m²) / 60 (W/Cabinet)	116 (W/m²) / 60 (W/Cabinet)
	Heat Generation - Max	1,251 (BTU/m²) / 648 (BTU/Cabinet)	1,251 (BTU/m²) / 648 (BTU/Cabinet)	1,185 (BTU/m²) / 614 (BTU/Cabinet)	1,185 (BTU/m²) / 614 (BTU/Cabinet)
	Heat Generation - Typ	691 (BTU/m²) / 358 (BTU/Cabinet)	691 (BTU/m²) / 358 (BTU/Cabinet)	395 (BTU/m²) / 205 (BTU/Cabinet)	395 (BTU/m²) / 205 (BTU/Cabinet)
	Refresh Rate	3,840 Hz	3,840 Hz	3,840 Hz	3,840 Hz
Operational Parameter	Power Redundancy	N/A	N/A	N/A	N/A
	Working Temperature / Humidity	0°C~40°C / 10~80%RH	0°C~40°C / 10~80%RH	0°C~40°C / 10~80%RH	0°C~40°C / 10~80%RH
	Storage Temperature / Humidity	-20°C~45°C / 5~95%RH	-20°C~45°C / 5~95%RH	-20°C~45°C / 5~95%RH	-20°C~45°C / 5~95%RH
	IP Rating	IP20	IP20	IP20	IP20
	LED Lifetime	100,000 hours	100,000 hours	100,000 hours	100,000 hours
Connectivity	Controller	SNOW-JMU, SNOW-RAF	SNOW-JMU, SNOW-RAF	SNOW-JMU, SNOW-RAF	SNOW-JMU, SNOW-RAF
	Connectivity	HDBT	HDBT	HDBT	HDBT
Certification	Safety	62368-1, 60950-1	62368-1, 60950-1	62368-1, 60950-1	62368-1, 60950-1
	EMC	Class A	Class A	Class A	Class A
Service	Service	Front	Front	Front	Front
Features	Operating System	Tizen	Tizen	Tizen	Tizen
	MagicINFO	Yes	Yes	Yes	Yes
	Sensor	Temperature	Temperature	Temperature	Temperature
	Other	Eco Image Enhancer	Eco Image Enhancer	Eco Image Enhancer	Eco Image Enhancer
Accessories	Accessories	Frame kit	Frame kit	Frame kit	Frame kit
Package	Box Dimension (mm, WxHxD)	1,119 x 206 x 699 mm	1,119 x 206 x 699 mm	1,119 x 206 x 699 mm	1,119 x 206 x 699 mm
	Package Weight (kg, per cabinet)	16.5 kg	16.5 kg	16.5 kg	16.5 kg
Special Installation	Curve (Concave/Convex)	12000R / N/A	12000R / N/A	12000R / N/A	12000R / N/A
	L-shape	N/A	N/A	N/A	N/A
	Ceiling / Incline [3]	Up to Forward 90º (Ceiling)	Up to Forward 90º (Ceiling)	Up to Forward 90º (Ceiling)	Up to Forward 90º (Ceiling)
	Rotation	Yes (90º clockwise)	Yes (90º clockwise)	Yes (90º clockwise)	Yes (90º clockwise)

(1) Peak value according to IDMS (Information Display Measurement Standard)
(2) Measured under 10lux light. Contrast in darkroom exceeds 1000000:1
(3) For ceiling installation, screen should be installed at least 1.8m height with no vibration

Specifications

Model		IEA-F			
		IE015A-F	IE020A-F	IE025A-F	IE040A-F
		LH015IEACFS	LH020IEACFS	LH025IEACFS	LH040IEACFS
Physical Parameter	Pixel Pitch	1.5 mm	2.0 mm	2.5 mm	4.0 mm
	Pixel Configuration	1 red, 1 green, 1 blue	1 red, 1 green, 1 blue	1 red, 1 green, 1 blue	1 red, 1 green, 1 blue
	Configuration (LxH, per cabinet)	160 x 360 pixels	120 x 270 pixels	96 x 216 pixels	60 x 135 pixels
	Diode Type	Surface Mount Device (SMD)	Surface Mount Device (SMD)	Surface Mount Device (SMD)	Surface Mount Device (SMD)
	Dimensions (mm, LxHxD, per cabinet)	240 x 540 x 81 mm	240 x 540 x 81 mm	240 x 540 x 81 mm	240 x 540 x 81 mm
	Dimensions (inch, per cabinet)	23.3 x 3.18 inch	23.3 x 3.18 inch	23.3 x 3.18 inch	23.3 x 3.18 inch
	No. of Modules (WxH, per cabinet)	1 x 3	1 x 3	1 x 3	1 x 3
	Weight (per cabinet/per m²)	3.2 kg / 24.7 kg	3.2 kg / 24.7 kg	3.2 kg / 24.7 kg	3.2 kg / 24.7 kg
Optical Parameter	Brightness (Peak/Max) [1]	1,000 nit / 500 nit	1,000 nit / 500 nit	1,000 nit / 500 nit	800 nit / 500 nit
	Contrast Ratio [2]	6,000:1	7,500:1	5,000:1	5,000:1
	HDR Compatibility	LED HDR / HDR10+ support / Multi-link HDR	LED HDR / HDR10+ support / Multi-link HDR	LED HDR / HDR10+ support / Multi-link HDR	LED HDR / HDR10+ support / Multi-link HDR
	Viewing Angle - Horizontal	150°	150°	150°	150°
	Viewing Angle - Vertical	150°	150°	150°	150°
	Bit Depth	16 bit (Internal processing 18bit)	16 bit (Internal processing 18bit)	16 bit (Internal processing 18bit)	16 bit (Internal processing 18bit)
	Color Temperature - Default	6,500K	6,500K	6,500K	6,500K
	Color Temperature - Adjustable	2,800 ~ 10,000K (use S/BOX)	2,800 ~ 10,000K (use S/BOX)	2,800 ~ 10,000K (use S/BOX)	2,800 ~ 10,000K (use S/BOX)
Electrical Parameter	Video Rate	50/60 Hz	50/60 Hz	50/60 Hz	50/60 Hz
	Input Power Range	100~240 VAC, 50/60 Hz	100~240 VAC, 50/60 Hz	100~240 VAC, 50/60 Hz	100~240 VAC, 50/60 Hz
	Power Consumption - Max	463 (W/m²) / 60 (W/Cabinet)	463 (W/m²) / 60 (W/Cabinet)	463 (W/m²) / 60 (W/Cabinet)	463 (W/m²) / 60 (W/Cabinet)
	Power Consumption - Typ	309 (W/m²) / 40 (W/Cabinet)	309 (W/m²) / 40 (W/Cabinet)	154 (W/m²) / 20 (W/Cabinet)	154 (W/m²) / 20 (W/Cabinet)
	Heat Generation - Max	1580 (BTU/m²) / 205 (BTU/Cabinet)	1580 (BTU/m²) / 205 (BTU/Cabinet)	1580 (BTU/m²) / 205 (BTU/Cabinet)	1580 (BTU/m²) / 205 (BTU/Cabinet)
	Heat Generation - Typ	1053 (BTU/m²) / 137 (BTU/Cabinet)	1053 (BTU/m²) / 137 (BTU/Cabinet)	527 (BTU/m²) / 68 (BTU/Cabinet)	527 (BTU/m²) / 68 (BTU/Cabinet)
	Refresh Rate	3,840 Hz	3,840 Hz	3,840 Hz	3,840 Hz
Operational Parameter	Power Redundancy	N/A	N/A	N/A	N/A
	Working Temperature / Humidity	0°C~40°C / 10~80%RH	0°C~40°C / 10~80%RH	0°C~40°C / 10~80%RH	0°C~40°C / 10~80%RH
	Storage Temperature / Humidity	-20°C~45°C / 5~95%RH	-20°C~45°C / 5~95%RH	-20°C~45°C / 5~95%RH	-20°C~45°C / 5~95%RH
	IP Rating	IP20	IP20	IP20	IP20
	LED Lifetime	100,000 hours	100,000 hours	100,000 hours	100,000 hours
Connectivity	Controller	SNOW-JMU, SNOW-RAF	SNOW-JMU, SNOW-RAF	SNOW-JMU, SNOW-RAF	SNOW-JMU, SNOW-RAF
	Connectivity	HDBT	HDBT	HDBT	HDBT
Certification	Safety	62368-1, 60950-1	62368-1, 60950-1	62368-1, 60950-1	62368-1, 60950-1
	EMC	Class A	Class A	Class A	Class A
Service	Service	Front	Front	Front	Front
Features	Operating System	Tizen	Tizen	Tizen	Tizen
	MagicINFO	Yes	Yes	Yes	Yes
	Sensor	Temperature	Temperature	Temperature	Temperature
	Other	Eco Image Enhancer	Eco Image Enhancer	Eco Image Enhancer	Eco Image Enhancer
Accessories	Accessories	Frame kit	Frame kit	Frame kit	Frame kit
Package	Box Dimension (mm, WxHxD)	653 x 148 x 354 mm	653 x 148 x 354 mm	653 x 148 x 354 mm	653 x 148 x 354 mm
	Package Weight (kg, per cabinet)	4.9 kg	4.9 kg	4.9 kg	4.9 kg
Special Installation	Curve (Concave/Convex)	3000R / 3000R	3000R / 3000R	3000R / 3000R	3000R / 3000R
	L-shape	Yes	Yes	Yes	Yes
	Ceiling / Incline [3]	Up to Forward 90º (Ceiling)	Up to Forward 90º (Ceiling)	Up to Forward 90º (Ceiling)	Up to Forward 90º (Ceiling)
	Rotation	Yes (90º clockwise)	Yes (90º clockwise)	Yes (90º clockwise)	Yes (90º clockwise)

(1) Peak value according to IDMS (Information Display Measurement Standard)
(2) Measured under 10lux light. Contrast in darkroom exceeds 1000000:1
(3) For ceiling installation, screen should be installed at least 1.8m height with no vibration

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LED Signage

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