

KDS-7

High-performance, highly scalable
AVoIP streaming solution



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Get a full AVoIP streaming solution for anywhere low-latency, high-quality 4K60 4:2:0 video presentation is required.

The KDS-7 line comprises a full range of encoders and decoders, supports up to 1,000 video sources, enables simple and fast deployment, and easily scales to suit any size network AV installation. Delivering a superb user experience, enterprise IT-grade security and advanced yet intuitive management, KDS-7 is a perfect fit for enterprise, education, homeland security, military or government sites of any size.

Outstanding end-user experience

- **Rich set of inputs and interfaces**
Featuring multiple connectivity options, including USB-C and HDMI, KDS-7 devices support the vast majority of end-user devices. With USB-C connectivity, end-user devices are charged while they are connected, eliminating the need for an additional power cable.
- **Easy-to-use KVM**
Simplified control via keyboard and mouse, with a specially designed widget and navigation among up to 16 screens, with configurable layout.
- **Large-scale video wall controls**
Supports more than 64 screens in different layouts that are easily configurable via the dedicated management device, and switchable in one click using the management device or Kramer Control software.
- **Instantaneous switching**
Optimized for a fast switching time. Switching between streams takes just 1 second or less.

Ideal for large-scale deployments

- **Highly scalable**
The KDS-7 line supports up to 1,000 video sources, suited to the largest installations.
- **State-of-the-art management device**
Advanced management capabilities are provided via the dedicated management device, including multi-device grouping, preset virtual matrix stream routes, group configuration management and role-based access management.
- **Extensive set of management capabilities features**
With open P3K APIs, a front panel LCD screen and an intuitive, embedded web-based user interface, KDS-7 devices provide a rich set of tools for deployment and configuration. This enables audio-visual experiences in any space, large or small, and allows management from anywhere for reliable and flexible operational management.

Robust security

- **Enterprise IT-grade security**
KDS-7 devices comply with IT security requirements, including 802.1x and HTTP-S/TLS.
- **Security certification**
All devices carry OWASP Top 10 certification for web application security.
- **Separate ethernet ports for optimal security and experience**
Physical separation between control and AV data over two separate Ethernet ports ensures IT control and an uninterrupted audio-visual experience.

Simple planning and rollout

- **Cost-effective from day one**
Plug-and-play integration with leading IP network switches, such as Netgear M4250 series, enable deployment in a wide variety of network topologies. There is no need to deal with complex IP packets prioritization or switching setting. Offering easy management, high reliability and adjustable bandwidth control, KDS-7 is extremely cost-effective to maintain over the long term
- **Full product range for any site, any application**
The comprehensive KDS-7 line spans encoders, decoders and auto-switcher encoders in a choice of rack and wall-plate* form factors, as well as a dedicated manager device. The broad set of products within the KDS-7 product line allows quick and cost-effective rollout of AV-enabled spaces of all forms and size. The eight different KDS-7 devices can be combined in any way, with any quantity of decoders, according to the site needs.
- **Integrated with Kramer's complete audio-visual solutions**
The KDS-7 line is part of Kramer's market-leading full AVoIP-based solution. It is pre-integrated with Kramer Control, allowing efficient deployment and control of any space, at a fraction of the time and cost of standalone alternatives. It also works perfectly with KDS-USB2 for AVoIP remote access to any USB peripheral devices, such as webcams

Standalone Encoder

Interface Type	Inputs/Outputs	Function
LCD and Navigation Button	1	Device configuration
USB 2.0	1	Connection to host
HDMI IN 2.0b	1	Uncompressed input signal
HDMI OUT 2.0b	1	Loop through output
1GbE Ethernet RJ-45	1	Configuration port
1GbE PoE Ethernet RJ-45	1	Content streaming port
External Power Supply	1	Optional, 24V/1A power supply, sold separately
Reset Button	1	Factory reset (10 sec) – Reaction is all LEDs blink
3-Pin Terminal Block IR	1	Programmable bidirectional IR transmission; expected voltage for IR receiver – 3.3 V
5-Pin Terminal Block Audio	1	Programmable analog balanced input/output audio
3-Pin Terminal Block RS-232	1	RS232 gateway and path-through

Approximate dimensions: 190.5 mm x 27.4 mm x 142.0mm (W x H x D)



Auto-Switcher Encoder

Interface Type	Inputs/ Outputs	Function
LCD and Navigation Button	1	Device configuration
HDMI IN 2.0b	1	Uncompressed input signal
USB-C	1	Video, data and power provider
HDMI OUT 2.0b	1	Loop through output
IGbE Ethernet RJ-45	1	Configuration port (service)
IGbE PoE Ethernet RJ-45	1	Content streaming sort (media)
External Power Supply	1	Optional, 24V/5A power supply, sold separately
Reset Button	1	Factory reset (10 sec) – Reaction is all LEDs blink
3-Pin Terminal Block IR	1	Programmable bidirectional IR transmission; expected voltage for IR receiver – 3.3 V
Terminal Block Audio	1	Programmable analogue balanced input/output audio
RS-232	1	RS232 gateway and path-through
USB Host	1	Connection to host
USB Device	2	Connection to device/power provider

Approximate dimensions: 18.9cm x 14.5cm x 2.76cm (7.4" x 5.7" x 1") W, D, H

Additional information:

- Supports USB hub functionality
- When USB-C is active as a video source, USB-C is also the USB Host device, otherwise USB-B host in the back is active



Standalone Decoder

Interface Type	Inputs/Outputs	Function
LCD and Navigation Button	1	Device configuration
HDMI IN 2.0b	1	HDMI2.0 input signal
HDMI OUT 2.0b	1	HDMI2.0 output signal
IGbE Ethernet RJ-45	1	Configuration Port
IGbE PoE Ethernet RJ-45	1	Content streaming port
External Power Supply	1	Optional, 24V/1A power supply, sold separately
Reset Button	1	Factory reset (10 sec) – Reaction is all LEDs blink
3-Pin Terminal Block IR	1	Programmable bidirectional IR transmission; expected voltage for IR receiver – 3.3 V
Terminal Block Audio	1	Programmable analog balanced audio input/output
RS-232	1	RS232 gateway and path-through
USB Device	2	Connection to device/power provider

Approximate dimensions: 190.5 mm x 27.4 mm x 142.6mm (W x H x D)



Manager

Interface Type	Inputs/ Outputs	Function
LCD and Navigation Button	1	Device configuration
USB 2.0	2	Connection to Kramer Control/power provider
HDMI OUT 1.3	1	Local UI on HDMI Out. 1080P (HDMI 1.3)
1GbE PoE Ethernet RJ-45	1	Configuration port
External Power Supply	1	Optional, 24V/1A power supply, sold separately
Reset Button	1	Factory reset (10 sec) – Reaction is all LEDs blink

Approximate dimensions: 190.5 mm x 27.4 mm x 142.60mm (W x H x D)

* To allow for an easier, cleaner installation, with less rack space, the KDS-7 AVoIP streaming solution includes a rack cage frame for vertical storage of the standalone devices.



For more information:

Wall Plate Decoder

Interface Type	Inputs/ Outputs	Function
LCD and Navigation Buttons	1	Device configuration
HDMI OUT 2.0b	1	Uncompressed output signal
1GbE Ethernet RJ-45	2	Configuration Port
1GbE PoE Ethernet RJ-45	1	Content streaming port
External Power Supply	1	Optional, 20V/1A power supply, sold separately
Reset Button	1	Factory reset (10 sec) – Reaction is all LEDs blink
3-Pin Terminal Block IR	1	Programmable bidirectional IR transmission; expected voltage for IR receiver – 3.3 V
Terminal Block Audio	1	Programmable analog balanced audio input/output
RS-232	1	RS232 gateway and path-through

Approximate dimensions: W, D, H

US: 12.1cm x 4.56cm x 12.1cm (4.8" x 1.8" x 4.8")

EU: 15.1cm x 4.56cm x 8.6cm (5.9" x 1.8" x 3.4")



Wall Plate Auto-Switcher Encoder

Interface Type	Inputs/Outputs	Function
LCD and Navigation Buttons	1	Device configuration
HDMI In 2.0b	1	Uncompressed input signal
USB-C	1	Video, data and power provider
1GbE Ethernet RJ-45	2	Configuration Port
1GbE PoE Ethernet RJ-45	1	Content streaming port
External Power Supply	1	Optional, 20V/1A power supply, sold separately
Reset Button	1	Factory reset (10 sec) – Reaction is all LEDs blink
3-Pin Terminal Block IR	1	Programmable bidirectional IR transmission; expected voltage for IR receiver – 3.3 V
Terminal Block Audio	1	Programmable analog balanced audio input/output
RS-232	1	RS232 gateway and path-through

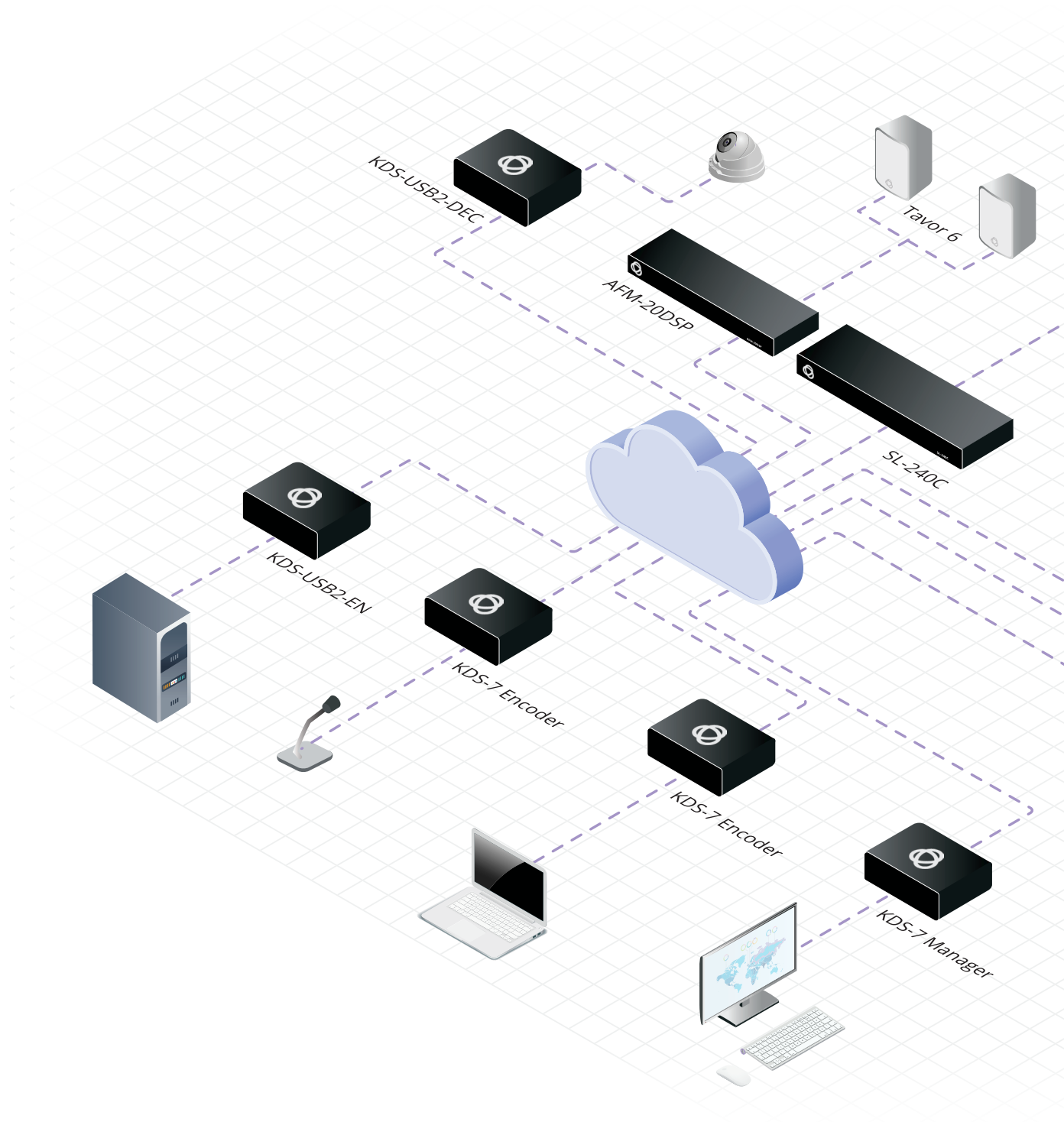
Approximate dimensions: W, D, H

US: 12.1cm x 4.56cm x 12.1cm (4.8" x 1.8" x 4.8")

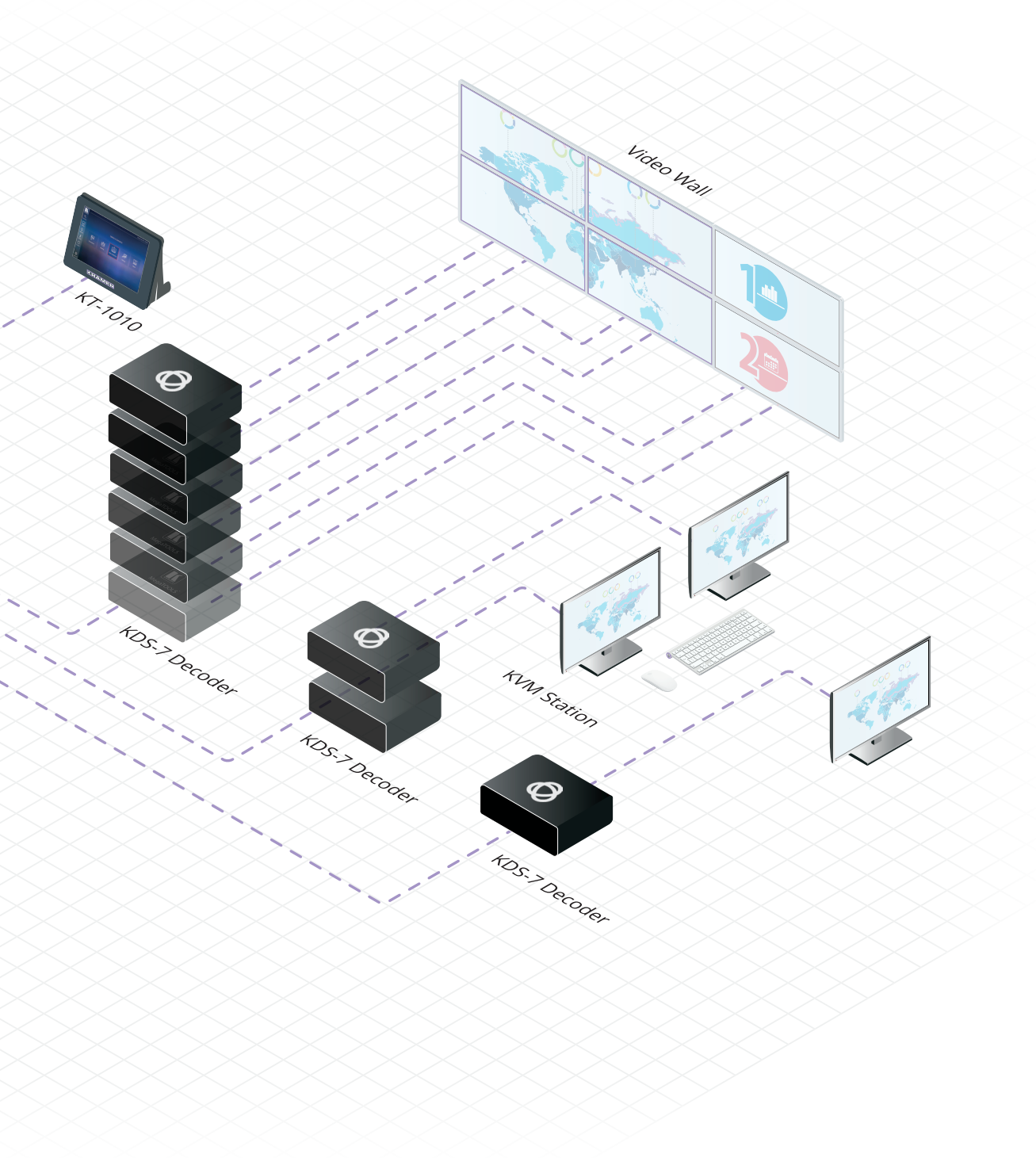
EU: 15.1cm x 4.56cm x 8.6cm (5.9" x 1.8" x 3.4")



Illustration of typical AVoIP system

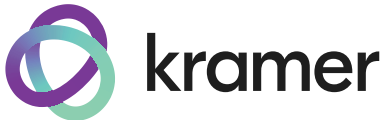
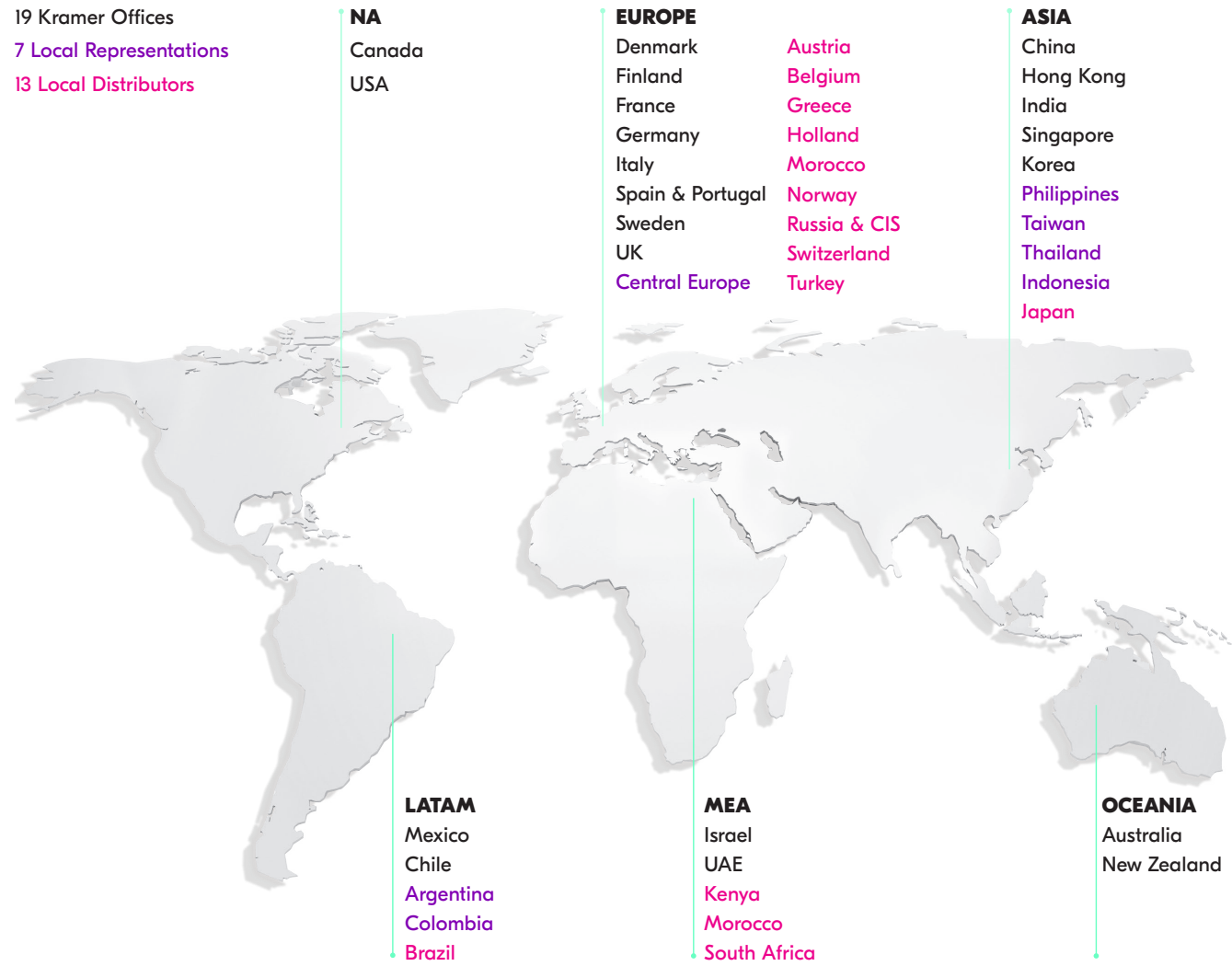


deployment with KDS-7 product line



About Kramer

Kramer audio-visual experiences power creativity, collaboration, and engagement. From AVSM to advanced cloud-based communication, collaboration and control solutions, Kramer creates audio-visual experiences that are more engaging, more inclusive and more connected than ever before. Headquartered in the heart of Startup Nation - Tel Aviv, Israel with locations around the world, Kramer's audio-visual experts are designing the future of engagement technology. Physical and digital boundaries have blurred. But no matter how hybrid our world becomes, our desire for real, human connection will never cease. Kramer's intuitive, seamless technology breaks down walls, bridges gaps, and makes people feel closer together even when they're far apart.



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