Jan. 2024

# IT/IP Platform "KAIROS"

Broadcast and Professional AV

# KAIROS

Next Gen Kairos Core 200 and 2000 Mainframes Achieve Unprecedented Innovation for Live Video



# Three New Models Added to Kairos Core Lineup

The KAIROS lineup has been further expanded with three new mainframes: the midrange Kairos Core 200 (AT-KC200), the high-end Kairos Core 2000 (AT-KC2000) offering unmatched performance, and the Kairos Core 2000 (AT-KC2000S1) for expanded video input/output performance.

# Significantly Improved Functionality and Performance

Video-processing performance, media storage capacity and the number of inputs/outputs (I/O) have been significantly upgraded.

The Kairos Core 2000 offers 30% greater video processing capability (vs. AT-KC1000) making it ideal for large-scale, extra-expressive production of live video.

# **Supports Diverse Signals and Multiple Channels**

Kairos Core 200/2000 supports a variety of input and output signals, including SDI\*, ST 2110, NDI\*, and SRT. Its also support ST 2022-7 redundancy, which duplicates the network for operational reliability. Redundancy without halving the number of inputs; the AT-KC2000S1 also does not halve both of inputs and outputs.

\*Requires Kairos Software Version 1.6 (FY2023 Q4) or later.

• NDI® is a registered trademark of NewTek, Inc. in the United States and other countries.

AT-KC200 Kairos Core 200 (Main Frame)



AT-KC2000 AT-KC2000S1

Kairos Core 2000 (Main Frame)



# Next Gen KAIROS for Extra-innovative Live-video Production

## AT-KC200

Kairos Core 200 (Main Frame)



**New Midrange KAIROS** with Increased Functionality and Performance

# Many More I/Os, Including SDI

AT-KC200/KC2000: Doubled the number of ST 2110 output of HD 3G/4K video (vs. AT-KC1000)\*1

AT-KC2000S1: HD 3G/4K video inputs doubled for each format, enabling highly flexible input/output.\*1 AT-KC200/KC2000/AT-KC2000S1: Compatible with SDI I/O Board (optional AT-KC20M1).\*1

Also, multiviewer output expanded to 4 channels.

#### **Upgraded Video-processing Performance**

AT-KC200: 50% greater video processing capability (vs. AT-KC100).

AT-KC2000/KC2000S1: 30% greater video processing capability (vs. AT-KC1000).

## AT-KC2000/KC2000S1

Kairos Core 2000 (Main Frame)



High-end KAIROS for Next-gen Live-video **Production Featuring Unmatched Performance Like Never Before** 

#### Much More Internal Storage

AT-KC200: 1.3x more for the RAM player, 5x more for the clip player, and 9x more for still images (vs. AT-KC100) AT-KC2000/KC2000S1: 1.5x more for the RAM player, over 4x more for the clip player, and over 2x more for still images (vs. AT-KC1000)

### Improved Reliability and Operability

The new chassis' low-speed fans combine quiet operation with high throughput.

ST 2022-7 network redundancy ensures improved reliability in the event of a network failure, and redundancy is possible without halving the number of inputs. Furthermore, the AT-KC2000S1 has no halving of both the number of inputs and outputs.

#### **Major Specifications**

Model Number	AT-KC200	AT-KC2000	AT-KC2000S1		
Power Requirement	AC100-127V/200-240V, 50/60Hz, 10A/5A, Redundant				
Weight	Approx. 17 kg / 37.47 lb without accessories & options				
Dimensions (W x H x D)	430 mm x 176 mm x 505 mm / 16-15/16" x 6-15/16" x 19-7/8" (4RU)				
Agile Input Routing Support	Yes				
HD 1.5G I/O	64 in x 40 out *1				
HD 3G I/O	32 in x 40 out *1		64 in x 40 out *1		
4K 12G I/O	8 in x 10 out *1		16 in x 10 out *1		
ST 2110	QSFP28 x 2, 100 GbE		QSFP28 x 4, 100 GbE		
SDI	Supported with optional AT-KC20M1 SDI I/O Board (see right column for details)*1				
NDI®*2 (HD only)	2 in/2 out, Audio 16 ch				
RTP/SRT/RTMP/RTSP	8 in/2 out (only input for RTSP)	16 in/4 out (only input for RTSP)			
RAM Player	8 ch, 32 GB, Uncompressed	8 ch, 96 GB, Uncompressed			
Clip Player	2 ch, 400 GB, Compressed	2 ch, 850 GB, Compressed			
Still Store	up to 4K, 7 GB	up to 4K, 32 GB			
Audio Player	4 ch, 400 GB, Compressed*3	4 ch, 850 GB, Compressed*3			
Multiviewer	4 ch, Max. 36 PiP				
CANVAS Function	up to 8K, 32 Megapixels	up to 12K, 66 Megapixels			
ST 2022-7 Redundancy	Yes, Inputs not halved*1 / outputs halved Yes, Inputs/outputs not halved*				
PTP Support	Yes				
LAN	2 ports, 1 GbE				

<sup>\*1:</sup> Requires software Version 1.6 (FY2023 Q4) or later. \*2: NDI\* is a registered trademark of NewTek, Inc. in the United States and other countries.

# New Options to Expand the KAIROS System

## **Optional Hardware**

# AT-KC20M1

SDI I/O Board

SDI (micro BNC) input/output is possible by installing the SDI I/O Board in a slot on the back of the Kairos Core 200/2000 mainframe, enabling 8 inputs/4 outputs and Ref In/Out on a single board. Up to four boards can be installed in one Kairos Core unit for a maximum 32 inputs/16 outputs (HD/FHD).





AT-KC20M1 SDI input/output board and its installation example

Note: Scheduled to be released in FY2023 4O.

Compatible with AT-KC200, AT-KC2000 and AT-KC2000S1, Requires software Version 1.6 or later.

## SDI Inputs and Outputs of Kairos Core 200/2000

	AT-KC200	AT-KC2000	AT-KC2000S1
Maximum SDI boards mount	Max. 4 units		Max. 2 units
HD/FHD Maximum I/O	32 in x 16 out		16 in x 8 out
4K Maximum I/O	16 in x 8 out		8 in x 4 out

## **Optional Software**

## AT-SFCM10

Kairos Core Manager

This optional software, which runs on a PC networked to KAIROS, enables intuitive GUI-based operation for backup, media synchronization, data transfer, etc. using multiple Kairos Core units.

Note: Scheduled to be released in FY2023 4Q. Compatible with AT-KC200, AT-KC2000, AT-KC2000S1, AT-KC100 and AT-KC1000. Require software upgrades.

Operating system requirements: Windows 10 or 11. Kairos Core Manager may be used with one or two Kairos Core units free of charge,



AT-SFCM10 Kairos Core Manager operation screen This screen shot is under development.

#### Panasonic Connect Co., Ltd.

2-15 Matsuba-cho, Kadoma, Osaka 571-8503 Japan

or with a purchased license for additional units.





Specifications are subject to change without notice

please visit Panasonic web site https://pro-av.panasonic.net/en/qr/

Factories of Panasonic Connect Co., Ltd., have received ISO14001:2015-the Environmental Management System certification. (Except for 3rd party's peripherals.)

SP-KC2PREWEB6 202401Z

<sup>\*3:</sup> Share capacity with clip player.