AGENDA

1.WHAT IS ODIN

2.FIVE TALKING POINTS
3.USE CASES

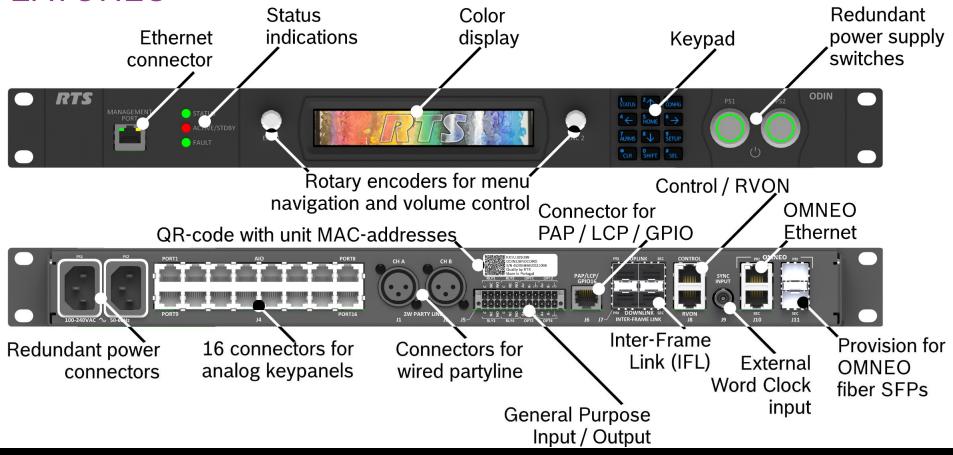
4.SUPPORTING MATERIALS

NEW 1RU MATRIX



- · Two levels of scalability
- Single unit scales from 16 to 128 ports
- Up to eight units can be interconnected for a total of 1024 ports
- Built-in connectors for AIO, Two-Wire, OMNEO, LCP/PAP, GPIO
- Redundant power supplies
- Front panel display with icon-driven GUI

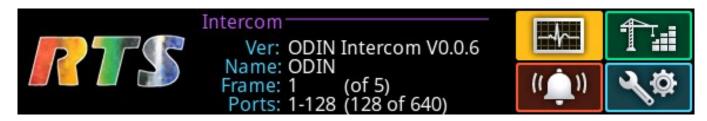
FEATURES





- Front panel color display
 - Modern user interface with icon-based menus
 - Most common configuration and setup tasks can be done through the front panel UI
 - AZ-edit and IP-edit updated to reflect ODIN
 - RJ45 connectors for computer available on front and rear

STATUS, CONFIGURATION, ALARMS, SETUP



- Example screen shows Status highlighted in yellow
- Push knob to select Status



- Turning knob moves cursor from one icon to another
- Name of function is displayed on top bar
- For IP-addresses etc, ODIN uses input-form screens

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FIVE TALKING POINTS









SCALABLE

VERSATILE

USER FRIENDLY ENVIRON-MENTAL **FLEXIBLE**

Grow by adding licenses or more ODINs

Supports OMNEO, AIO, and Two-Wire Icon-based front panel user interface

Less electricity, less space, less cooling Reallocate your ports to any hardware type

AGENDA

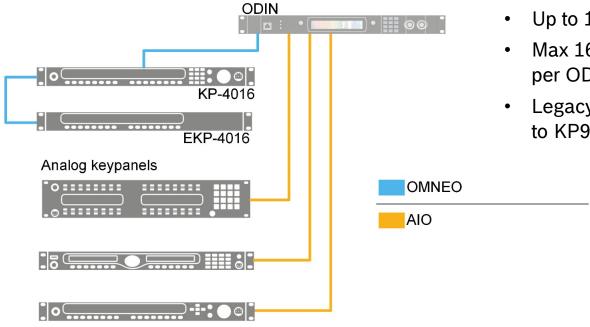
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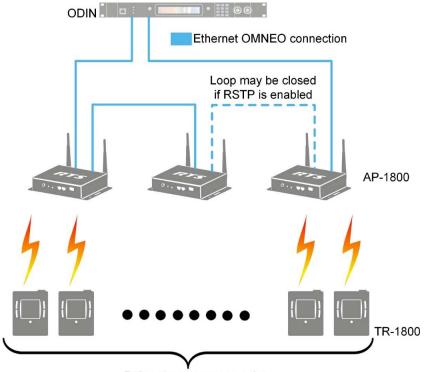
4.SUPPORTING MATERIALS

BASIC USE CASE 1: KEYPANELS



- Each keypanel uses a port
- Up to 128 ports
- Max 16 analog keypanels per ODIN
- Legacy keypanels all the way back to KP96-7 are supported

BASIC USE CASE 2: ROAMEO



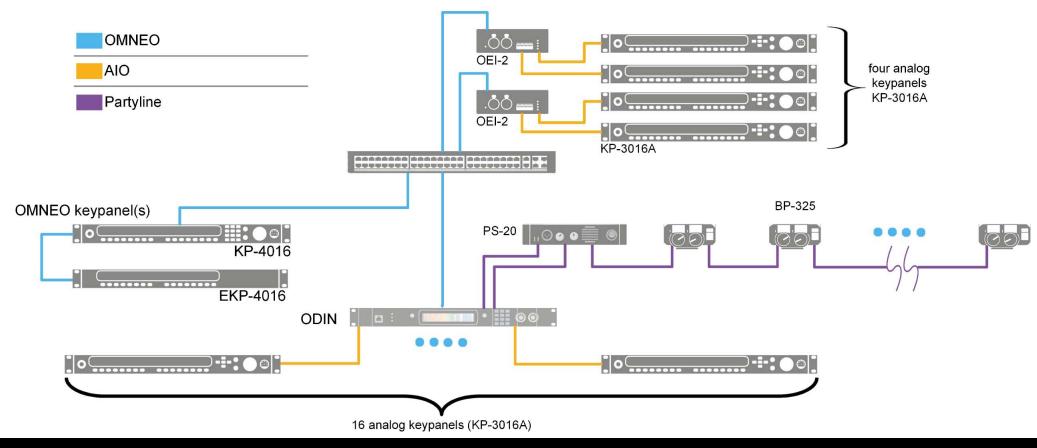
Beltpacks per access point:

using DECT wideband speech codec G.722, full: max 5, recommended 4

using DECT narrowband speech codec G.726, full: max 10, recommended 8

- Supports ROAMEO wireless matrix system
- ROAMEO is DECT-based, no frequency issues

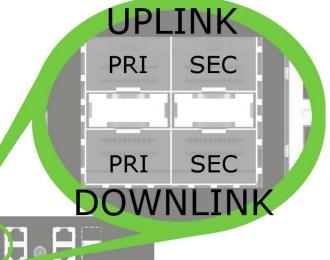
MIXED USE CASE: AIO, OMNEO, TWO-WIRE



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EXPANDING ODIN: USING THE INTER-FRAME LINK (IFL) (I)

- · The provision for SFPs is on the rear of the unit
- In stand-alone mode, the IFL is not used at all

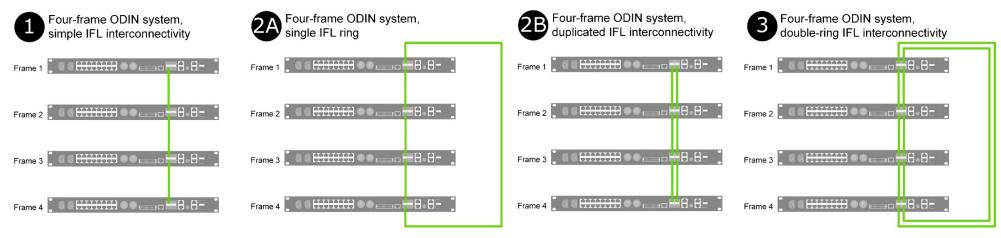




- To connect two ODINs (for a total of 256 ports), each unit must have at least one SFP.
- On unit 1, SFP is plugged into DOWNLINK; on unit 2, SFP is plugged into UPLINK
- Primary and Secondary are equivalent but each one is a backup for the other

EXPANDING ODIN: USING THE INTER-FRAME LINK (IFL) (II)

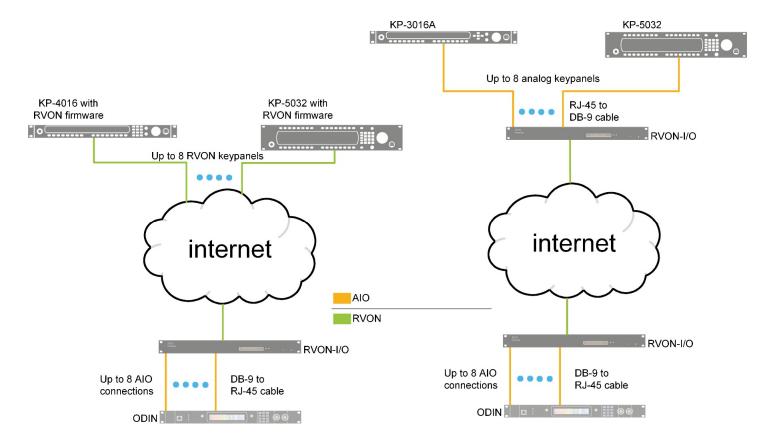
Optical fiber (Inter-Frame Link)



- IFL is a bidirectional link with a signaling rate of about 2 Gbit/s
- Turns multiple units into a single matrix with up to 1024 ports
- The level of redundancy can be user configured. Option 1 has no redundancy, options 2A and 2B intermediate, and option 3 the highest (double ring architecture)
- SFPs are sold separately single and multi-mode versions available

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MIXED USE CASE: ODIN WITH EXTERNAL RVON-IO



RTS MATRIX LINEUP

Attribute	ADAM	ADAM-M	ODIN	Cronus	Zeus III	Zeus III LE+
Port Capacity Single Frame	272	128	128	32	32	16
Takes expansion cards	Yes	Yes	No	Yes	No	No
Max ports, expanded system	880 (Full OMNEO ¹)	512 (Full OMNEO ¹)	1024 ²	128	NA	NA
Rack Units Single Frame	7	3	1	2	1	1
Redundant Power Supplies	Yes	Yes	Yes	Yes	Yes	Yes
Redundant Controllers	Yes	Yes	No	No	No	No
Bus Expansion	Yes (TBX)	Yes (TBX)	Yes (IFL ⁴)	Yes (4x Cronus ³)	No	No
Link Method	Single or Multi Mode Fiber	Single or Multi Mode Fiber	Single or Multi Mode Fiber	Coax/Fiber	NA	NA
Cable Length, Single Mode	40 km (TBX)	40 km (TBX)	15 km ⁵ (IFL)	Fiber (SM) 15 km, Coax 90 m	NA	NA
Cable Length, Multi Mode	550 m (TBX)	550 m (TBX)	500 m (IFL)		NA	NA
Front-panel display	No	No	Yes	Yes	No	No
Display type	NA	NA	TFT, color, icon- based	LCD, B/W, text	NA	NA
Audio Bits	24	24	24	24	24	24
OMNEO Audio	Yes	Yes	Yes	No	No	No
Trunking Support	Yes	Yes	Yes	Yes	Yes	Yes
Matrix PC Connection	Ethernet, Serial	Ethernet, Serial	Ethernet ⁶	Ethernet, Serial, USB	Ethernet, Serial, USB	Ethernet, Serial, USB
Field-upgradeable firmware	Yes	Yes	Yes	Yes	Yes	Yes
Integrated Partyline Interface	No	No	Yes (2)	No	Yes (2)	Yes (2)
General Purpose Outputs	External GPIO-16	External GPIO-16	4	4	2	2
General Purpose Inputs	External GPIO-16	External GPIO-16	4	4	8	8
Footnotes	1 Uses OMI-64 cards			4 IFL is Inter-Frame Link		

² Eight units, interconnected with optical fiber

⁵ Up to 40 km available, depending on SFP

³ Requires linking license

⁶ Connectors available on front and rear

THE COMPETITION

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Riedel Tango		Kroma / AEQ CrossNet	RTS ODIN	
Form factor	1.5 RU	1 RU	1 RU	
Redundant power	yes	no	yes	
Power consumption (W)	≤ 200	Not available	47	
Front display	yes, TFT B/W	yes, LCD	yes, TFT color	
ront disp. dim's WxH (mm)	48.3 x 35.6	47.2 x 17.8	120.1 x 18.9	
Front disp. dim's WxH (inches)	1.90 x 1.40	1.86 x 0.70	4.73 x 0.74	
ront display GUI type	Text menus	Text menus	Graphical icons & input forms 128 ⁽³⁾ non-blocking	
Max ports single unit	80 ⁽¹⁾ blocking	168 ⁽²⁾ non-blocking		
Scalability?	no	no	yes, up to 8 x 128 ports (1024 ports)	
Dante ports?	no	yes, 128	yes, 128 ⁽⁴⁾ yes ⁽⁶⁾	
AES67?	ves ⁽⁵⁾	yes		
Other?	yes, AVB (high bandwidth)	yes, 8x KROMA digital ⁽⁷⁾	RVON ⁽⁶⁾⁽⁷⁾	
wo-wire analog partyline?	no	no	yes, 2 ⁽⁸⁾	
Built-in TIF?	no [TBC]	yes ⁽⁹⁾	no	
External Sync?	Word Clock in/out (2 x coax, daisy chained)	Word Clock (via RJ45 input)	Word Clock in (coax input) ⁽¹⁰⁾	
Digital PL ports?	yes, 2 ⁽¹¹⁾	no	yes, OMNEO	
Option card?	yes	yes	no	
Analog (AIO) ports	8	12	16	
GPIO?	yes, 10	yes, 16 ⁽¹²⁾	yes, 8 ⁽¹³⁾	
Ethernet ports RJ45	2	2	2	
Fiber ports (SFP)	0	0	2	
/oice over IP (VoIP)?	no	yes, 20 ⁽¹⁴⁾	yes ⁽⁶⁾ , 16 RVON ⁽⁷⁾ channels	
Capacity steps?	1	5 ⁽¹⁵⁾	8 ⁽¹⁶⁾	
Other features	Front USB for PC to configure internal matrix	Built-in keypanel ⁽¹⁷⁾	Front management port RJ45	
		Up to 20 WiFi KPs ⁽¹⁸⁾		
Footnotes	0 Delec's 1RU matrix products have been discontinued	7 For G.711 / G.729AB codecs	13 Terminal block connector with 4 GPI and 4 GPO; matching connector included	
	1 80 in, 40 out (asymmetrical, blocking)	8 Plus one dedicated Stage Announce output	14 KROMA's proprietary AoIP protocol	
	2 128 of which are Dante	9 Requires a SIM-card	15 Port counts of 40, 72, 104, 136, or 168 available; requires additional HW cards	
	Total port budget can be allocated to any hardware type supported by device	10 Multiple units are synchronized via the Inter-Frame Link connection		
	4 OMNEO	11 For Performer digital partyline system	17 Features a four-key pushbutton panel on front	
	5 Ravenna	12 Unit has two 15-pin D-connectors with a total of 8 GPI and 8 GPO	18 Supports KROMA's WiFi keypanel system; WiFi acce points req'd	
	6 Future FAM release			

6 Future F/W release

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MATERIALS TO SUPPORT YOU (I)

ltem	Description	Format
Announcement To Regions	Short description. Ordering info. Product descriptions intended for price sheets.	PDF
Photos	High-res photos of back, front, fans. Perspective views from left and right.	JPG
Sales presentation	This powerpoint	PPT
Marketing Briefing	Internal document. Provides in-depth information.	PDF
Application Notes (x4)	ODIN-specific Application Notes	PDF
Battle card	Comparison of ODIN, Tango, and CrossNet	XLS / PDF

MATERIALS TO SUPPORT YOU (II)

Item	Description	Format
Five talking points	The talking points shown earlier	PDF
Product video	Computer-animated video with voice-over, to show off the features	MP4
Brand video	RTS brand video, what we're all about	MP4
Leaflet	Product leaflet for ODIN	PDF
Exhibition material	Graphics for ODIN, intended for exhibitions	
Architect & Engineers specifications	A&E spec intended for specifying a compact IP-based matrix	Word

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THANK YOU