

AURA-W121-RK3576

IEI's New generation industrial Panel PC

- IP65-rated front panel with robust aluminum bezel for harsh industrial environments
- Flat-bezel PCAP touch with anti-glare / anti-UV coating for clear visibility in bright areas
- Rockchip RK3576 octa-core SoC with 6 TOPS NPU for edge AI acceleration
- Front-panel hard keys (hotkeys) for quick access to essential controls
- PCAP touch with glove-friendly operation
- Front-facing speakers & integrated camera options, ideal for HMI and vision-assisted applications
- Rich I/O & wide-range power input (10–28V DC) for industrial integration



AURA-W121-RK3576

The AURA RK3576 series is a flat-bezel industrial panel PC designed for factory automation and smart HMI applications. The IP65-rated front panel protects against dust and water, ensuring reliable operation in harsh environments. It integrates an RK3576 octa-core SoC, LPDDR5 memory, and eMMC storage, supporting Android and Debian for flexible deployment.



Front-panel hotkey

The front-panel hotkey lets you easily control brightness, volume, and power on/off.



Rockchip RK3576 SoC

Rockchip RK3576 chip quad-core Cortex A72 & quad-core A53 high-performance SoC, Mali G52 MC3 GPU & 6 TOPS NPU



Anti-glare and Anti-UV PCAP

With anti-glare and anti-UV coating, the 10-point touchscreen can display clearly without reflection.



IP65 rated front panel protection

With the IP65 front panel protection rating, this series is more durable and rugged, ensuring reliable operation in harsh industrial environments.



Built-in Camera

The AURA RK3576 series, equipped with a built-in camera, is perfectly suited for AI facial recognition applications.

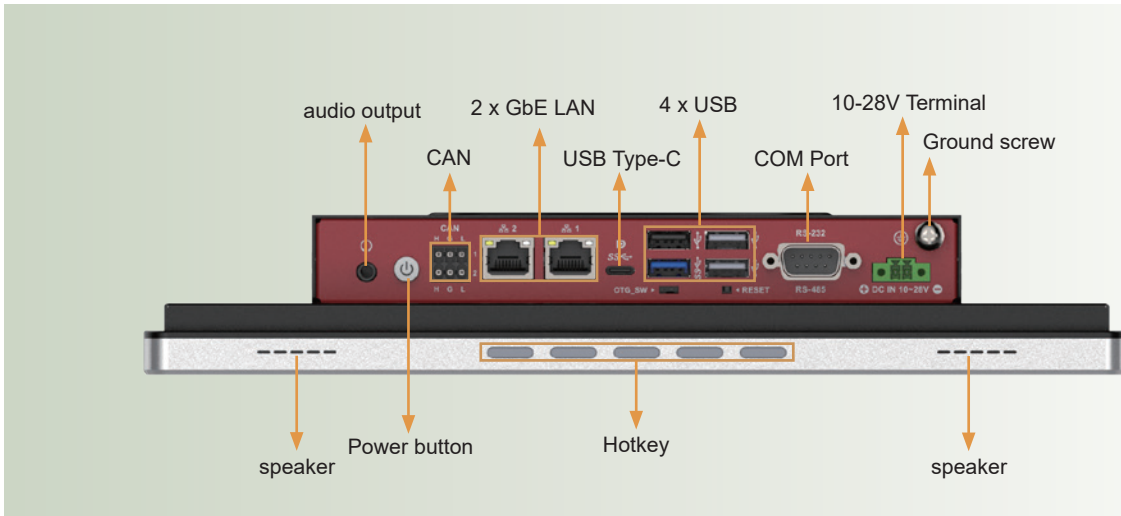


Front Speakers

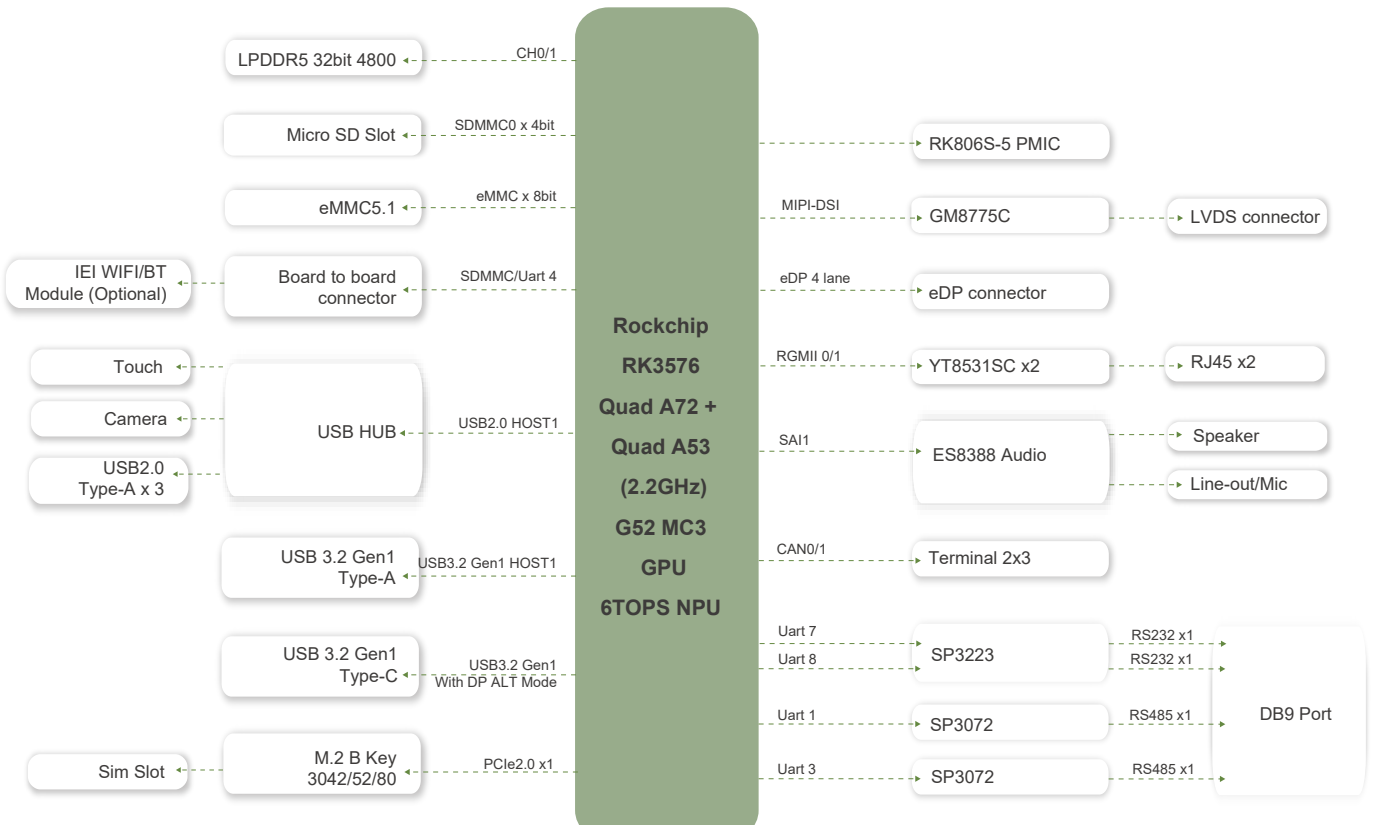
The speakers are positioned at the front to guarantee clear sound delivery, even when panel-mounted.



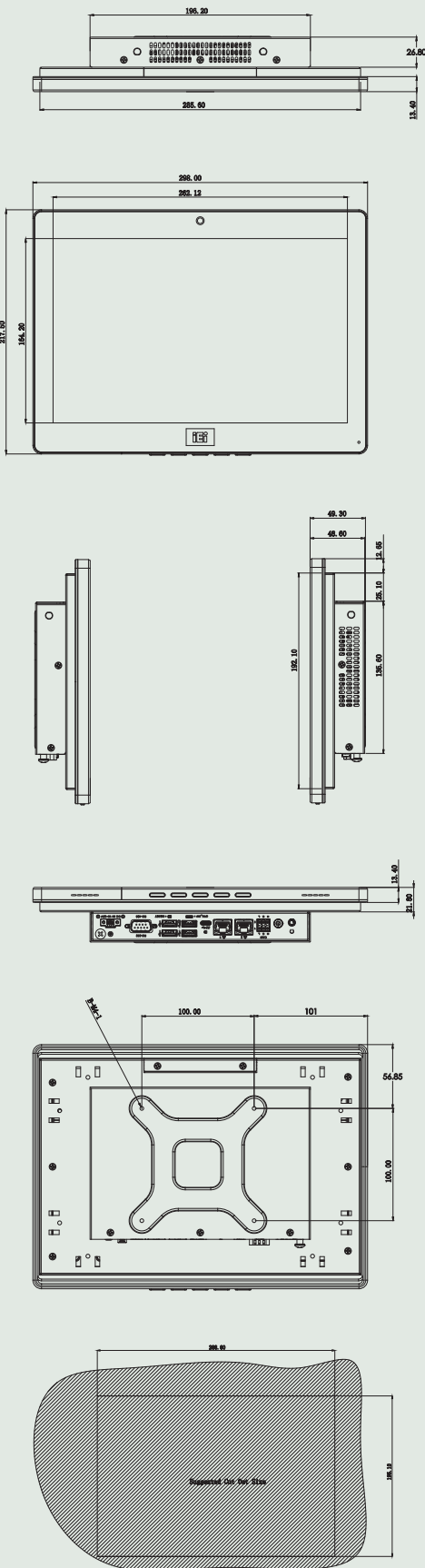
Fully Integrated I/O



Block Diagram



Dimensions (Unit: mm)



Specifications

Model Name	AURA-W121-RK3576
LCD Size	12.1"(16:10)
Brightness (cd/m ²)	500
Resolution	1280 x 800
Contrast Ratio	1200:1
LCD Color	16.7M
Viewing Angle (H-V)	178°/178°
Backlight MTBF (hrs)	50000
Touch Screen	PCAP with USB interface (anti-UV/AG coating)
Touch Controller	Capacitive:ILITEK
CPU	Rockchip RK3576 (Quad Cortex-A72 and quad Cortex-A53, 6 TOPS NPU)
Memory	8GB LPDDR5, up to 16GB
Ethernet	2 x RJ45 By YT8531C
Expansion	1 x board to board connector(Only supports IEL wireless modules) 1 x M.2 B Key 3042/52/80 (PCIe Gen2 x1,USB2.0) 1 x On-board SIM card socket (hinge type) for M.2 B key
I/O Ports and Switches	2 x RS232 & 2 x 485 By 1 x DB9 1 x USB Type-C (USB 3.2 Gen1 + DisplayPort Alt Mode) 3 x USB 2.0 Type-A 1 x USB 3.2 Gen1 Type-A 2 x CAN 2.0 (6-pin terminal block) 1 x 3-pin terminal block
Audio	1 x Mic in & Line out 2 x internal 2W speaker
Storage	64GB eMMC NAND FLASH 1 x SD Slot
Camera	720P Wide Angle Fixed Focus
Hot Key	5-key Hot Key
Construction Material	Aluminum front frame and sheet metal rear cover
Mounting	Panel Mount,Rack Mount,VESA 100
System LED light	1 x Power button 1 x Reset button 1 x System LED (Orange)
Enclosure Color	Black
Dimensions (LxWxH) (mm)	298 x 217.50 x 49.30
Cutout Dimensions	288.60 x 195.10
Weight (kg)	2.26kg / 3.9kg
Operating Temperature	-10°C ~ 60°C
Storage Temperature	-20°C ~ 70°C
Humidity	10% to 95%@40°C (non-condensing) (50%@60°C)
Vibration	MIL-STD-810H 514.8C-I with SSD
Shock	IEC68-2-27 half-sine, 5G, 11ms, 100 shocks with SSD
IP Level	IP65 compliant front panel
Safety & EMC	CE/FCC
Power Input	10-28V DC
Power Consumption	12V@2.17A (Rockchip® RK3576 with 8GB Memory, 64GB eMMC,Debian OS)
OS	Android 14 /Debian 12

Ordering Information

AURA-W121-RK3576-CFA-R10	12.1" 500 cd/m ² 1280x800 Panel PC with Rockchip RK3576, 8GB LPDDR5, 64GB eMMC, 2xRJ45, CAN, COM, USB Type-C, black, 10-28V DC input, PCAP touch, Android 14, R10
AURA-W121-RK3576-CFD-R10	12.1" 500 cd/m ² 1280x800 Panel PC with Rockchip RK3576, 8GB LPDDR5, 64GB eMMC, 2xRJ45, CAN, COM, USB Type-C, black, 10-28V DC input, PCAP touch, Debian 12, R10

Options

Item	Part No	Description
Stand	STAND-C19-R10	VESA 100x100mm/75x75mm PPC/Monitor Stand, support up to 15kg, Black color
Stand	STAND-A21-R10	VESA 75x75mm/100x100mm PPC/Monitor Stand, support from 6 KG to ~12 KG, Black
Wall Mount	AFLWK-19B	Wall mounting kit with lock
Power Adapter	63040-010060-211-RS	Adapter Power:FSP:FSP060-DHAN3:9NA0608097;-Vin:90~264VAC;60W;Dim:62.0*110*31.5mm;Plug:7.5mm;Cable=1200mm;Erp(NO LOAD 0.21W);Vout:12VDC;Φ2.5/Φ5.5/lock
Power Cord	32702-003600-100-RS (EU)	POWER CORD:EUROPEAN CODE(VDE); 1000mm; (A)PLUG:LT-322(16A 250V); (B) CONNECTOR:LT-501(10A 250V)
DC Power Cable	32102-045700-100-RS	DC POWER CABLE; 200mm; (A)DC JACK 5.5*2.5; (B)TERMINAL BLOCK 2P P=3.5 180°
WiFi Module	iWB-AP6275SDSR-EA-R10	WiFi+Bluetooth Module, AP6275SDSR, 2T2R, 802.11 a/b/g/n/ac/ax Wi-Fi + BT 5.3; with external WiFi 6 antenna, FCC/CE/TELEC/NCC

Packing List

Item	Part No	Q'ty
Panel Mount Kit	19XM0SFE0-0004601-000-RS	8
TERMINAL BLOCKS 1x2	33502-000203-RS	1
TERMINAL BLOCKS 2x3	33502-000672-RS	1
Screw pack	44033-040062-RS	1