

DS-540

The Next-Generation KDS Box PC with Intel® Processor



Features

- Intel® Processor N150 (Twin Lake)
- Fanless Kitchen Display System Box PC
- 3 Independent Display: HDMI + USB-C + VGA
- Versatile I/O: 1 x LAN, 4 x USB, 2 x COM
- Suitable for No outdoor: 0 to 60°C operating temperature and 12-24V wide voltage
- Equipped with firmware TPM (fTPM) by default; discrete TPM 2.0 available as a BOM option based on project request
- USB-C with DP Alt Mode and USB Data(One-Cable Solution)

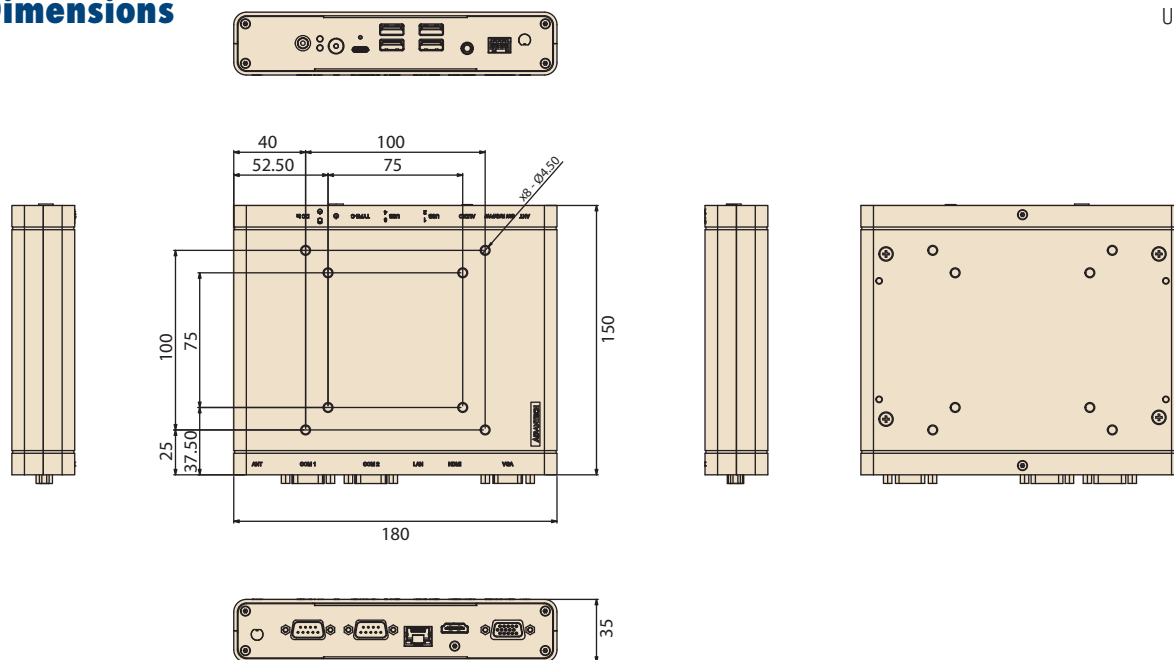
Trellix Acronis WISE-PaaS/SignageCMS WISE-DeviceOn

Specifications

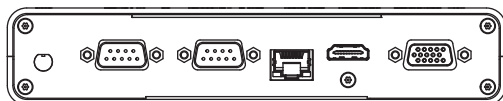
Model Name	DS-5400F-U0A1E	
Processor System	CPU	Intel® Processor N150(Twin Lake)
	Frequency	1.5GHz
	Max. Frequency	3.6 GHz
	Core	4
	CPU TDP	6W
	System Chipset	Integrated in CPU
Memory	Technology	DDR5 4800Mhz
	Max. Capacity	16GB
	Socket	Single Slot Pin-262 SO-DIMM
Thermal Solution	Fanless	
Display	Graphics Engine	Intel® UHD Graphics
	HDMI Port	1 x HDMI 2.1 (TMDS), up to 3840 × 2160 @ 60 Hz
	USB-C Port	1 x USB Type-C (DP Alt Mode), up to 3840 × 2160 @ 60 Hz
	VGA Port	1 x VGA, up to 1920 × 1200 @ 60 Hz (WUXGA)
	Multi-Display Support	Supports 3 independent displays (HDMI + USB Type-C + VGA)
	CEC	BOM Option (By project support)
I/O Interfaces	Ethernet	1 x RTL8125K-CG (2.5GbE)
	USB	4 x USB 3.2 Gen 2 , 5V/0.9A 1 x USB-C: Support 1 x DP 1.4a 4K 60Hz + 1 x USB 3.2 Gen2, 5V/3A
	Serial Ports	2 x 5V/12V Powered COM (RS-232, DB9), (Setting via jumpers; default: 0V)
	Audio	3.5mm Audio Jack with jack detection (Line-in/out or Mic-in)
	Remote Switch	1x (Reset, Ground, Power on, and Watchdog output signal)
	LED Indicators	1 x Power, 1 x Storage Access
Expansion	M.2	M.2 2242 M-Key (SATA/PCIe) M.2 2230 E-Key for Wi-Fi/Bluetooth Module
Power Requirement	Power Management	ACPI 3.0
	Input Voltage	12 - 24V DC-in (ATX/AT mode)
Trusted Platform Module	TPM2.0	fTPM 2.0, Default TPM 2.0 (NPCT764AABYX), BOM option by project support
Watchdog Timer	Output	Interrupt, system reset
	Interval	255-level timer interval, setup by software
Physical Characteristics	Mounting	Wall Mount/VESA Mount
	Dimensions (W x D x H)	180 x 150 x 35 mm
	Weight	1.2kg
Environment	Operating Temperature	0 ~ 60°C / 32° ~ 140°F (with 0.7m/s air flow)
	Relative Humidity	95% @ 40°C (non-condensing), operating
Operating System	Operating System	Windows 11 IoT
	Linux	ubuntu 24.04
Certifications	EMC	CE/FCC Class B, BSMI, CCC
	Safety	UL, CB, BSMI, UKCA, CCC

Dimensions

Unit: mm



Front View

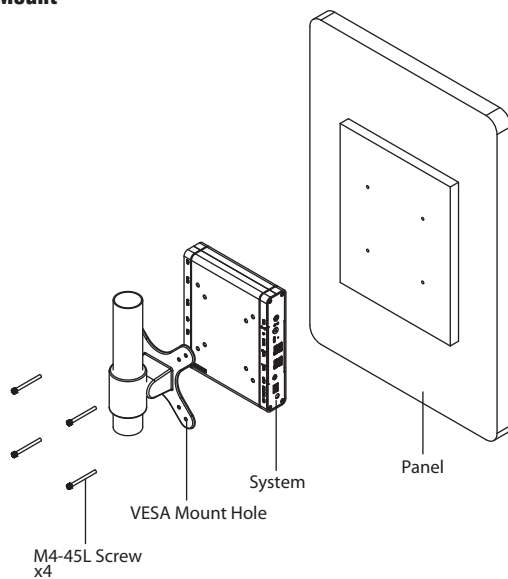


Rear View

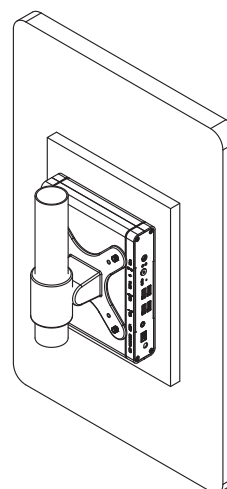


Installation Scenarios

VESA Mount



Wall Mount



Ordering Information

Part No.	CPU	TDP	RAM	Display	LAN	USB	COM (RS-232)	M.2	Power Input	TPM 2.0	Made In
DS-5400F-U0A1E	N150	6W	Up to 16GB	1 x HDMI 1 x USB-C 1 x VGA	1 x RTL8125K-CG (2.5G)	4 x USB 3.2 Gen 2 1 x USB-C: Support DP 1.4a + USB 3.2 Gen 2	2 x COM: RS-232 (Powered)	1 (SATA/PCIex2)	12-24V DC-IN	N	China
DS-5400F-U0A1U										N	Taiwan

Note: RAM / Storage and Operating System bundled by request

Packing List

Part Number	Description
-	1 x DS-540
96PSA-A65W19V1-4	1 x 19V Power adapter
1990024884N000	1 x Thermal PAD for SSD
1990027162N010	1 x Thermal PAD for WiFi
1990020763S010	1 x Thermal PAD for Memory

RAM and Storage

Part Number	Description
SQR-SD5S8G5K6SNGA	RAM DDR5 4800 8GB W.T. (Samsung)
SQR-SD5116G5K6SNPB	RAM DDR5 4800 16GB W.T. (Samsung)
SQR-SD5116G5K6HNAG	RAM DDR5 4800 8GB W.T. (Hynix)
SQR-SD5132G5K6HNAG	RAM DDR5 4800 16GB W.T. (Hynix)
SQR-SD5N16G5K6SNPB	262pin SODIMM DDR5 5600 16G(Samsung)
SMI-SD5V16GN56-CB	Semi Ind DDR5 5600 16GB 0 ~85
SQF-C4MV2-128GDEDM	Storage M.2 NVMe 2242 TLC 128GB W.T.
SQF-C4MV2-256GDEDM	Storage M.2 NVMe 2242 TLC 256GB W.T.
SQF-C4MV2-512GDEDM	Storage M.2 NVMe 2242 TLC 512GB W.T.
SQF-C4MV4-1TDSDM	Storage M.2 NVMe 2242 TLC 1TB W.T.
SQF-S4BV1-128GDSBM	Storage M.2 SATA 2242 TLC 128GB W.T.
SQF-S4BV1-256GDSBM	Storage M.2 SATA 2242 TLC 256GB W.T.
SQF-S4BV2-512GDSBM	Storage M.2 SATA 2242 TLC 512GB W.T.
SQF-S4BV2-1TDSBM	Storage M.2 SATA 2242 TLC 1TB W.T.

Note: RAM and storage listed in the table are wide temp. version. Standard temp. options are also available by request.

Embedded OS

Part Number	Description
20706WLE1S0097	Win11 IoT LTSC EN, 64b Entry
20706U24DS0041	Ubuntu Desktop 64b 24.04
20706U24ES0006	Ubuntu Pro 64b 24.04

Power Cord

Part Number	Description
1700001524	3-pin power cord (US)
170203183C	3-pin power cord (EU)
170203180A-01	3-pin power cord (UK)
1700008921	3-pin power cord with PSE (Japan)
1700019146	3-pin power cord (CCC)
1700018553	3-pin power cord (AU)
1700024849-01	3-pin power cord (TW)

Optional Items

Part Number	Description
1960056999T301	DS-540 VESA Mount
AMK-V025E	DS-540 Mounting Kit (VESA/Pole Mount Bracket/Adapter Kit)
EWM-W179M201E	Wi-Fi 6 (IEEE 802.11ax, 2.4GHz/5GHz) + Bluetooth
1751000648-01	1 x Cable Ant. 100mm (usage:1 pcs)
1751000635-01	1 x Cable Ant. 200mm (usage:1 pcs)
1751000460-01	2 x Antenna

Note: If Wi-Fi is required, the package must include the module, antenna, and antenna cable.