NANO PC







PROCESSOR	AMD Ryzen™ R7-8845H, AMD Ryzen™ R9-8945H, TDP 45W			
MEMORY	2 x 262 pin DDR5 SODIMM slots, 32 GB per DIMM (Max 64 GB)			
VIDEO GRAPHICS	AMD Radeon™ 780M (features depends on processor)			
VIDEO OUTPUT	HDMI 2.0b x 2, DisplayPort 1.4 (Type-C) x 2, supports quadruple video outputs			
AUDIO	Realtek ALC269-VC3, digital multi-channel audio output via HDMI and DisplayPort (USB-C)			
ETHERNET	Built-in RealTek RTL8125B 10/100/1000/2500 Mbps supported	M.2 2230 E key slot for Wi-Fi 6E and Bluetooth 5.3 Dual 2.5 GbE LAN		
STORAGE INTERFACE	M.2 2280 NVMe SSD (PCIe Gen 4 x4) x 1 (up to 2 TB) SD card reader supports cards of 24 x 32 mm size, supports Micro SD with appropriate adapter (not included)			
FRONT PANEL	(1) Power Button (1) Power LED	(4) USB 3.2 Gen 2 (1) 3.5 mm headphone + MIC in combo jack		
BACK/SIDE PANEL	(2) HDMI 2.0 (1) USB 2.0 (1) USB 3.2 Gen 2 (2) USB 4.0 Type-C (w/ DP and power delivery)*	(2) RJ45 LAN port(1) DC-in jack(1) SD Card Reader(1) Kensington Lock		
DIMENSIONS	5.6(L) x 5.2(W) x 2.16(H) inches			
POWER	Input: 100 - 240V AC, 120W Power Adapter Output: 19V, 6.32A			
OPERATING TEMPERATURE	0°C - 40°C, relative humidity range: 10-90% (non-condensing)			
ACCESSORIES	Quick Guide Power adapter Power cord	VESA mount VESA mount screws M.2 SSD thermal KIT pack		
EXPANSION SLOT	M.2 2230 E key, M.2 2280 M key (w/ PCle Gen4)			
OS SUPPORT	Windows 11, Linux 64 bit			
CERTIFICATION	BSMI, CB, CE, CEC, FCC, RCM, UL, VCCI, RoHS compliance			

^{*}DisplayPort 1.4 output, PD max. 5V/3A for power delivery

 $\begin{tabular}{ll} \textbf{BIOS DOWNLOADS:} & $https://global.shuttle.com/products/productsDownload?pn=NA10H \\ \textbf{SUPPORT LIST:} & $https://global.shuttle.com/products/productsSupportList?pn=NA10H \\ \end{tabular}$

FAQ LIST: http://global.shuttle.com/support/faq

PRODUCT WARRANTY: https://www.shuttlecomputers.com/warrantypolicies



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CHASSIS	Barebone PC with black plastic chassis Kensington lock slot on one side of chassis Dimensions: 5.2 (L) x 5.6 (W) x 2.16 (H) inches (2.27 height w/ rubber feet) Weight: 1.76 LBS (net) / 3.75 LBS (gross)
POWER SUPPLY	External 120W power adapter (fanless) AC input voltage: 100 - 240V, 50 - 60 Hz, max 1.4A Output: 19V DC 6.32A
OPERATING SYSTEM	The system comes without an operating system installed. Compatibility: Windows 11, Linux 64 bit
PROCESSOR SUPPORT	AMD Ryzen™ R7-8845H, AMD Ryzen™ R9-8945H, 4nm Zen 4 architecture, 8 cores/16 threads Ryzen AI NPU integrated with 16 TOPS performance for a total AI performance of 39 TOPS Max supported processor power consumption (TDP): 35 - 54W configurable TDP [1]* Supported extensions: AES, AMD-V, AVX, AVX2, AVX512, FMA3, MMX-plus, SHA, SSE, SSE2, SSE3, SSE4.1, SSE 4.2, SSE4A, SSSE3, x86-64 System on chip processor (SoC) with integrated graphics processor Maximum Tjunction Temperature (Tjmax): 100 °C
COOLING	Heat-pipe cooling system with dual fan for optimal airflow: 1) Processor fan 80 mm 2) Chassis fan (bottom) 60 mm Supports temperature-controlled RPM fan speed [1]*
MEMORY SUPPORT	2 x 262 pin SODIMM slots, Supports Dual Channel mode Supports DDR5 5600 MHz, SDRAM at 1.1V Supports a max. of 32GB per DIMM, up to 64GB max Supports two unbuffered DIMM module (no ECC or registered)
M.2 SSD SLOT	M.2 2280M slot for SSD cards in M.2 form factor Supports PCle Gen4 x4 with NVMe (no SATA) Supports M.2 cards with a width of 22 mm and a length of 80 mm Supports M.2 cards with M key or BM key
AUDIO	Realtek ALC269-VC3 audio controller 3.5 mm / 4-pole combo audio connector (combines Line-out and MIC input) Can be used for headphones/headsets with 3- or 4-pole jack plug [2]* Digital multi-channel audio output: via HDMI and DisplayPort (USB-C)
NETWORK	Two RJ45 ports with 2 status LEDs each Ethernet Controller: Realtek RTL8125B Supports 10/100/1000/2500 Mb/s operation (max 2.5 Gb/s) Supports WAKE ON LAN (WOL) Supports network boot by Preboot eXecution Environment (PXE)
	M.2 2230E slot supports WLAN expansion cards PCI-Express X1 and USB 2.0 Supports M.2 cards with a width of 22 mm and a length of 30 mm (Type 2230) PC comes with two pre-installed internal WLAN antennas with I-PEX4/MHF-IV connectors
INTEGRATED GRAPHICS	AMD Radeon™ 780M graphics engine Graphics cores: 12 CPU clock: 2700 MHz Supports up to four independent screens with up to 4K/60Hz (Ultra HD 3840x2160 resolution): -HDMI 2.0b x 2 -USB4 Type-C with DisplayPort 1.4 x 2
HARDWARE TPM	Hardware TPM: Supports DTPM 2.0 with Infineon SLB9670VQ2.0 The TPM function can be deactivated in the BIOS setup
UEFI FIRMWARE (BIOS)	AMI UEFI Firmware (BIOS) Supports resume after power failure Supports Wake-on-LAN (WOL) and Power on by real time clock (RTC)

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FRONT PANEL CONNECTORS	USB 3.2 Gen 2 type A x 4 (max 10 Gb/s) (Note: left USB supports power in S5/off mode) Audio combo port (MIC/headphone) [2]*	Power Button Power indicator (Blue LED)		
BACK PANEL CONNECTORS	HDMI 2.0 x 2 USB4 Type-C x 2 (DisplayPort 1.4 and PD power delivery, max 5V/3A) USB 3.2 Gen 2 Type-A x 1 (max 10 Gb/s)	USB 2.0 x 1 2.5 Gigabit LAN (RJ45) x 2 DC-input connector for external power adapter		
INCLUDED ACCESSORIES	Quick installation guide External 120W power adapter Driver download can be found on global site	VESA mount (75/100mm standard w/ screws) Heat sink with two thermal pads for M.2 SSD card		
ENVIRONMENTAL CRITERIA	Operating temperature: 0 - 40°C [2]*	Humidity: 10 - 90% (non-condensing)		
CERTIFICATIONS	EMI: BSMI, CE, FCC Safety: CB IEC60950/62368, cTUVus, BSMI	Other: RoHS, Energy Star, ErP		
	This model is classed as a technical information equipment (ITE) in class B and is intended for use in living and offices. The CE mark approves conformity by the EU directives: (1) 2004/108/EC relating to electromagnetic compatibility (EMC) (2) 2006/95/EC relating to Electrical Equipment designed for use within certain voltage limits (LVD) (3) 2009/125/EC relating to eco-design requirements for energy related products (ErP)			

[1] CONFIGURABLE FAN SPEED AND POWER CONSUMPTION OF THE PROCESSOR

In the BIOS setup, there is a "Fan Mode" option on the "Advanced" page to configure the fan control, which also has an effect on the maximum power consumption of the processor. The default setting "Normal Mode" offers a good balance between performance, temperature and fan speed. The "Fan Mode" setting also defines the upper limits for the average power dissipation (cTDP) and short-term power dissipation in turbo mode (Turbo TDP):

Fan Mode Setting	CPU Performance	Fan Speed	cTDP	Turbo TDP
Performance Mode	Maximum	High	54W	65W
Normal Mode	High	Medium	45W	65W
Silent Mode	Medium	Low	35W	50W

[2] AUDIO CONNECTOR

The 3.5 mm audio jack on the front panel of this device supports both: headphones with a 3-pole connector and also headsets (with microphone) with a 4-pole connector. Headsets with separate connectors for headphones and microphone will require an appropriate adapter, if the microphone should also be used.

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Front View



- 1 USB 3.2 Gen 2 Type A x 4 (left port delivers 0.9A/5V even in S5/Off mode)
- 2 3.5 mm Audio combo port (supports headphones & headsets w/ MIC)
- 3 Power Button

Back View



- A DC power input
- **B** USB 4.0 (Type-C) x 2 (max 40 Gb/s) **E** USB 3.2 Gen 2 (max 10 Gb/s) w/ DisplayPort/Power Delivery
- C HDMI 2.0 x 2

- **D** Dual 2.5 GbE LAN
- **F** USB 2.0





SD Card Reader and Kensington Lock hole on the side

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AI-DRIVEN PERFORMANCE WITH AMD RYZEN PROCESSOR

Advanced Zen 4 architecture drives productivity across diverse scenarios, speeding up complex calculations and enabling real-time modeling in scientific simulations. Al-enhanced tools accelerate video editing and 3D rendering, reducing production time.



QUAD DISPLAY SUPPORT

The NA10H's powerful display capabilities is suitable for various visual experiences. In digital signage, create attention grabbing multi-screen displays. For financial trading, monitor multiple data streams simultaneously. In design studios, expand your workspace across high-resolution monitors for seamless creativity.



HIGH-SPEED DATA TRANSFER

Advanced connectivity options enable smooth data transfer and communication across various applications. Manage multiple devices efficiently in IoT environments, ensure low-latency data processing for edge computing, and leverage rapid data transmission for split-second decision-making.



COMPACT VERSATILITY

With a 1-liter form factor, the NA10H provides a space saving design with flexible mounting and robust adaptability for 24/7 reliability for any industry.



ADVANCED COOLING

Maintain high performance even under heavy loads with an efficient heat pipe cooling system and strategically placed fans. Ideal for 24/7 surveillance systems, data centers, and content creators.

For more information on all products, please contact us at sales@us.shuttle.com or 626.820.9000