

Remarkable graphics power, entirely fanless

Just 3.6 cm thin, with dual-core processor and AMD Radeon™ HD 7450 graphics card – but completely fanless. Ideal for when low-noise operation is essential – enjoy full-HD movies and 3D content with a minimum of background noise. The XS35GS V3L features two monitor outputs (one of which is an HDMI interface) to connect two screens simultaneously. Despite its compact size, there is still space for two drives in the case.

Barebone XS35GS V3L

Slim PC



Feature Highlights

Chassis	<ul style="list-style-type: none"> • Slim 1.5 litre chassis • Dimensions: 25.2 x 16.2 x 3.85 cm • Hole for the Kensington Lock • Optional: VESA75/100 mounting kit PV01
Operating system	<ul style="list-style-type: none"> • Without operating system • Compatible with Windows 7 / 8 (32/64 bit)
CPU	<ul style="list-style-type: none"> • Intel Atom D2550 Dual Core (1.86 GHz)
Chipset	<ul style="list-style-type: none"> • Intel NM10 Express Chipset
Graphics	<ul style="list-style-type: none"> • AMD Radeon HD 7450, 512MB DDR3 [7] • DirectX 11, Shader Model 5.0
Memory	<ul style="list-style-type: none"> • 2x SO-DIMM socket (204 pins) • Supports max. 4GB DDR3-1066 • Supports DDR3-1333/1600 at 1066MHz
Storage	<ul style="list-style-type: none"> • Supports one optical slimline drive • Supports one 2.5" SATA hard disk or SSD • With SD card reader
Connectors and WLAN	<ul style="list-style-type: none"> • HDMI v1.3 • D-Sub VGA • 5x USB 2.0 (1x front, 4x rear) • 2x Audio (mic, head phone) • Gigabit-LAN • WLAN 802.11 b/g/n
Power supply	<ul style="list-style-type: none"> • External 40W fanless power supply
Applications	<ul style="list-style-type: none"> • Basic and Home-Media

Updated graphics since 2014:
AMD Radeon HD 7450



Images are only for illustration purposes. The optical drive is not included.



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Shuttle Barebone XS35GS V3L - Product Features



Slim and stylish

Designed as a space-saver, this sleek 1.5 litre nettop PC only measures 3.8cm in width. It maximizes space whether it is placed upright using its stylish stand or affixed to the back of a display with the optional VESA mounting kit (PV01). Due to its small size and flexible design, this practical nettop offers exceptional functionality and is well-suited for home users, small offices, reception areas, classrooms, libraries, showrooms, call centres, public institutions and more.



Fanless and quiet

The Shuttle Barebone XS35GS V3L comes totally fanless making it perfect to be used in noise-sensitive environments such as living rooms, hospitals, libraries etc. As an additional benefit, fanless cases rarely gather dust on the inside and stay cleaner than others. So it's not only quiet and low in energy use, but also dust-free and virtually maintenance free.

The Atom processor integrates the memory controller

Shuttle XS35GTAV3 is equipped with Intels Atom processor D2550 (1.86 GHz, codenamed Cedarview). It comes with both the memory controller and graphics core on-die which helps to keep heat dissipation and memory latency low. The CPU is connected to the Southbridge NM10, codenamed Tiger Point.

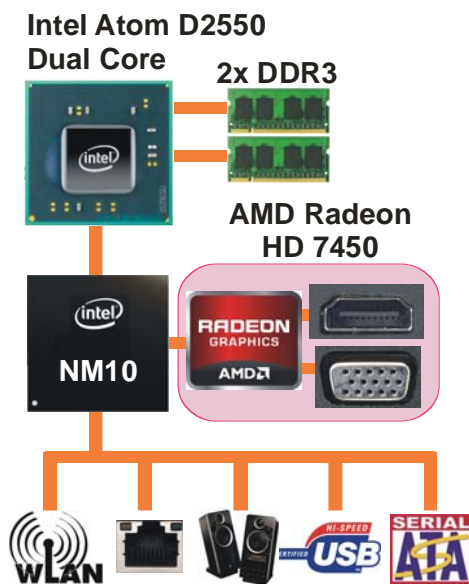
Dual Core. Do more.

Shuttle always uses the dual-core variant of Intel's Atom processors and thus integrates the Atom D2550. This boosts the system performance significantly with particular regards to multi-threaded applications.

AMD Radeon HD 7450 graphics [7]

Even with the small size, the Shuttle Barebone XS35GS V3L is equipped with AMD Radeon HD 7450 graphics for a power-packing slim PC that's unmatched in size and performance – and is made for more than just entertainment. Key benefits are:

- Better Performance for 3D rendering and video playback
- Digital 7.1 channel audio output over HDMI
- Supports DirectX 11 and Shader Model 5.0
- Ready to take on games





Highly energy-saving

The XS35GS V3L barely consumes, depending on system load, about 19~27 Watts. Running the device*) 5 days a week for eight hours a day, the annual consumption would amount to approx. 60kWh which would mean just 12 Euros on the power bill (20 Euro ct/kWh) - way less than a conventional desktop PC draws.

*) Based on a configuration with 4GB of memory, 500GB hard disk, DVD drive and Windows 7



What does "Barebone" mean?

Shuttle's barebones line such as the XS35GS V3L is targeted at experienced users seeking to build a complete system to meet their individual requirements. The bulk of components is yet built in, simply the following hardware is to be installed upon purchase in this case:

- One 6.35 cm/2.5" Serial ATA hard disk or Solid State Disk (SSD)
- One or two DDR3 SO-DIMM memory modules (204 pins), max. 4 GB
- USB keyboard and USB mouse
- Optional: Slim-line optical drive (12.7mm height, DVD/Blu-ray, slimline format)
- Operating system: Windows 7 or Windows 8, 32 or 64 bit



Two monitor support with HDMI (DVI) and D-Sub/VGA

The AMD Radeon HD 7450 graphics card supports multiple display support on up to two separate monitors via HDMI (DVI through optional adapter) and D-Sub/VGA. This improves the capabilities and productivity of the user by allowing them to spread multiple windows over two monitors and view them simultaneously.



XS35GS V3L supports Blu-ray

The XS35GS V3L with AMD Radeon HD 7450 graphics offers a plus in performance - experience videos and Blu-ray *) movies at full-HD 1080p quality. The Shuttle Barebone XS35GS V3L even takes on games. Benefit from an increase in performance when playing and converting videos, editing images and working with different applications at once. With AMD Radeon HD 7450 you get the maximum out of Windows 7.

*) Slim-line Blu-ray drive and appropriate software required



SD card reader

The built-in SD card reader at the front side makes it easy to transfer files from your camera so you can share videos and photos on your XS35GS V3L with ease.



Kensington Lock

This is a small, metal-reinforced hole as part of an anti-theft system. As known from notebooks, this Mini-PC can also be safely locked by tying it to a solid object.
(The lock-and-cable apparatus is not included.)



Optional second hard disk (Accessory PHD2N)

The optional accessory PHD2N supports a second 2.5" hard disk. Please note, that the bay for the optical drive will be occupied then.



Tiny power adapter

The external 40W power adapter is virtually noiseless and can easily be hidden behind the desk thanks to its tiny dimensions.
Dimensions: 89.5 x 37 x 26.5 mm (LWH) = 88ml



Easy installation

Remove just one screw to unmount the two chassis covers.



Optional VESA mount (Accessory PV01)

Its optional VESA75/100 wallmount allows it to be installed on to walls or just affixed on the rear side of a monitor which is particularly interesting for the industry segment, company buildings and public institutions.



24/7 nonstop operation

Shuttle XS35GS V3L is officially approved for 24/7 permanent operation. Thanks to its low power consumption and completely passively cooling, this PC runs highly reliable making it perfectly suitable for digital signage and POI/POS applications.

Conditions for permanent use:

- Ambient temperature while under load: 5-35°C
- Air humidity while under load: 10-90% (not condensing)
- Free circulation of air amongst the PC must be guaranteed
- Ventilation holes must be clear
- If a hard disk is installed, this must also be approved for permanent operation by its manufacturer (max. one hard disk)



Note on operating position

Please make sure the system is always placed upright using either its stand or the optional VESA mount. Ventilation holes must not be blocked to ensure sufficient cooling.

Shuttle Barebone XS35GS V3L Specifications

<i>Fanless and silent</i>	<p>Passive cooling, no fan noise at all Perfect to be used in noise-sensitive environments Fanless, dust-free and thus virtually maintenance-free</p>
<i>Efficiency</i>	<p>Low power consumption: Power consumption: ca. 19W (idle mode) and ca. 27W (full load)</p>
<i>Chassis</i>	<p>Dimensions without Stand: 25.2 x 16.2 x 3.85 cm (DxHxW) Weight: 2.1 kg net, 2.8 kg gross Hole for the Kensington Lock at the back panel Optional accessory: 75mm and 100mm VESA mounting kit (PV01)</p>
<i>Operation System</i>	<p>This system comes without operating system. It is compatible with Windows 7 and Windows 8 (32 or 64 bit)</p>
<i>Processor</i>	<p>Intel Dual Core Atom processor D2550 (Codename: Cedarview) Intel Hyper-Threading technology: 2-threads per core 32 nm manufacturing process, Micro-FCBGA11 package Intel 64 architecture, Core clock: 1.86 GHz L2 Cache: 1024kB , TDP: max. 10W Supports SSE2, SSE3, SSSE3, Execute Disable Bit Integrated North Bridge with controller for memory and graphics</p>
<i>Cooling</i>	<p>Passive, completely fanless cooling through convective heat transfer Warning: Please make sure the system is always placed upright using either its stand or the optional VESA mount. Ventilation holes must not be blocked to ensure sufficient cooling.</p>
<i>Chipset</i>	<p>Intel® NM10 Express Chipset (south bridge) Platform Controller Hub (PCH) Code name: Tiger Point</p>
<i>BIOS</i>	<p>AMI BIOS in a 8Mbit Flash ROM supports PnP, ACPI 2.0 Supports Power fail resume / AC power on state / always on / always off Supports Wake-on-LAN (WOL) from S3, S3, S5 ACPI states Supports Unified Extensible Firmware Interface (UEFI)</p>
<i>Memory</i>	<p>2x SO-DIMM slots with 204 pins Supports two modules DDR3-1066 (PC3-8500) DDR3-1333 is supported at DDR3-1066 clock rate Supported maximum capacity: 4 GB</p>
<i>Optical drive (opt.)</i>	<p>Support an optical DVD or Blu-ray slim-line drive Serial ATA interface, 12.7mm height, Slimline SATA connector</p>

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<p><i>Hard disk drive or SSD</i></p>	<p>Supports one Serial ATA hard disk (5400 / 7200 rpm) or one SATA SSD drive in 6.35cm/2.5" format The SATA 2.0 interface supports up to 300MB/s data transfer speed Supports a drive with 9.5mm height (12.5mm is not supported) Supports Unified Extensible Firmware Interface (UEFI)</p>
<p><i>AMD Graphics Card</i></p>	<p>AMD Radeon™ HD 7450 graphics processor (Codename "Caicos") Dedicated 3D graphics card VRAM: 512MB DDR3 (no shared memory) 40nm technology Supports DirectX 11, Shader Model 5.0, OpenGL 4.1 Unified Video Decoder (UVD 3) dedicated video playback accelerator Supports full HD decode (1080i/p) Support for up to 2 simultaneous displays: 1) Digital HDMI™, max. resolution: 1920x1200 2) Analog D-Sub VGA, max. resolution: 2048x1536 Supports Extended Desktop Mode and Clone Mode Supports Blu-ray play back in combination with an optional slim-line Blu-ray drive and appropriate software Integrated HD audio controller for 7.1 Surround Sound via HDMI. Supports AC-3, AAC, Dolby TrueHD and DTS Master Audio formats.</p>
<p><i>Integrated Audio</i></p>	<p>Integrated Audio IDT92HD81 Audio Codec with Azalia support Two analog audio connectors (3.5mm): 1) Line out (head phone) 2) microphone input Supports digital 7.1 HD audio via the HDMI port.</p>
<p><i>Card Reader</i></p>	<p>Integrated card reader supports SD, SDHC and SDXC memory flash cards</p>
<p><i>Wired Network</i></p>	<p>RJ45 connector supports Gigabit LAN at 10/100/1000 Mbit/sec. Network controller Realtek RTL8411 Supports Wake-on-LAN (WOL) from S3, S3, S5 ACPI states</p>
<p><i>Wireless Network</i></p>	<p>Supports IEEE 802.11b/g/n, max. 150Mbps up-/downstream Security: WPA/WPA2(-PSK), WEP 64/128bit, IEEE 802.11x/i Half size Mini-PCIe-Card</p>
<p><i>Connectors</i></p>	<p>HDMI v1.3 digital video and audio output D-Sub/ VGA analog video (15 pin) 5x USB 2.0 (1x front, 4x rear) Gigabit network (LAN, RJ45) Audio Line-out (head phone) Microphone input DC input for the external power adapter</p>
<p><i>LEDs and buttons</i></p>	<p>Power button Power LED (white) Hard disk LED (blue)</p>

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Power supply	External 40W AC/DC power adapter (fanless), 19V / 2.1A AC Input: 100~240V AC, 50~60Hz, Automatic voltage adjust Dimensions: 89.5 x 37 x 26.5 mm (LWH) DC Connector: 5.5/2.5mm (outer/inner diameter)
Optional accessories	- VESA mount made of metal (PV01) - Adapter for second 2.5" drive instead of optical drive (PHD2N)
24/7 nonstop operation	This device is approved for 24/7 permanent operation. Requirements: - Free circulation of air amongst the PC must be guaranteed. - Ventilation holes must be clear. - If a hard disk is installed, this must also be approved for permanent operation by its manufacturer (max. one hard disk)
Environmental spec.	Operating temperature range: 0~35°C Relative humidity range: 10~90% (non-condensing)
Certification and Compliance	EMI: CE, FCC, BSMI, C-Tick, CCC Safety: CB, BSMI, ETL Other compliances: RoHS, Eup Lot6 This device is classed as a technical information equipment (ITE) in class B and is intended for use in living room and office. The CE-mark approves the conformity by the EU-guidelines: - EMV-guideline 89/336/EEG electromagnetic tolerance - LVD-guideline 73/23/EEG use of electric devices within certain voltage-limits

Comparison: Shuttle Slim-PC Barebone PC XS35/XS36 Series

Model	Graphics	HDMI	DVI	D-Sub	RS232	WOL	ODD [4]	Atom Processor	Memory	LAN
XS35	Intel GMA3150	-	-	Yes	-	-	Yes	D510 (1.66 GHz)	Max. 2GB DDR2-800 [6] 1x SO-DIMM	100
XS35GT	NVIDIA ION2	Yes	-	Yes	-	-	Yes		D525 (1.80 GHz)	Max. 4GB DDR3-800 [6] 1x SO-DIMM
XS35V2	Intel GMA3150	-	-	Yes	-	-	Yes			
XS35GT V2	NVIDIA ION2	Yes	-	Yes	-	-	Yes			
XS35GTA V2	ATI Mobility Rad. HD 5430	Yes	-	Yes	-	-	Yes			
XS35GS V2	ATI Radeon HD 7410M	Yes	-	Yes	-	-	Yes	Without "L": D2700 (2.13 GHz) "L"-version: [5] D2550 (1.86 GHz)	Max. 4GB DDR3-1066 [6] 2x SO-DIMM	Giga
XS35V3(L)	Intel GMA3650 [2]	Yes	-	Yes	-	Yes [3]	Yes			
XS35GTA V3 [1]	ATI Radeon HD 7410M/7450[7]	Yes	-	Yes	-	Yes [3]	Yes			
XS35GS V3L	ATI Radeon HD 7410M/7450[7]	Yes	-	Yes	-	Yes [3]	Yes	D2550 (1.86 GHz)	2x SO-DIMM	Giga
XS36V(L)	Intel GMA3650 [2]	Yes	Yes	Yes	2x	Yes [3]	-			

[1] XS35GTAV3 is also called XS35GS V3 outside EU.

[2] Intel offers sophisticated graphics driver for the integrated Intel GMA3650 graphics only for Windows 7 32 bit. Linux can be used in standard mode without video and 3D acceleration. (date Oct. 2012)

[3] Supports Wake-on-LAN (WOL), Power fail resume (always on/off) and Resume by RTC Alarm

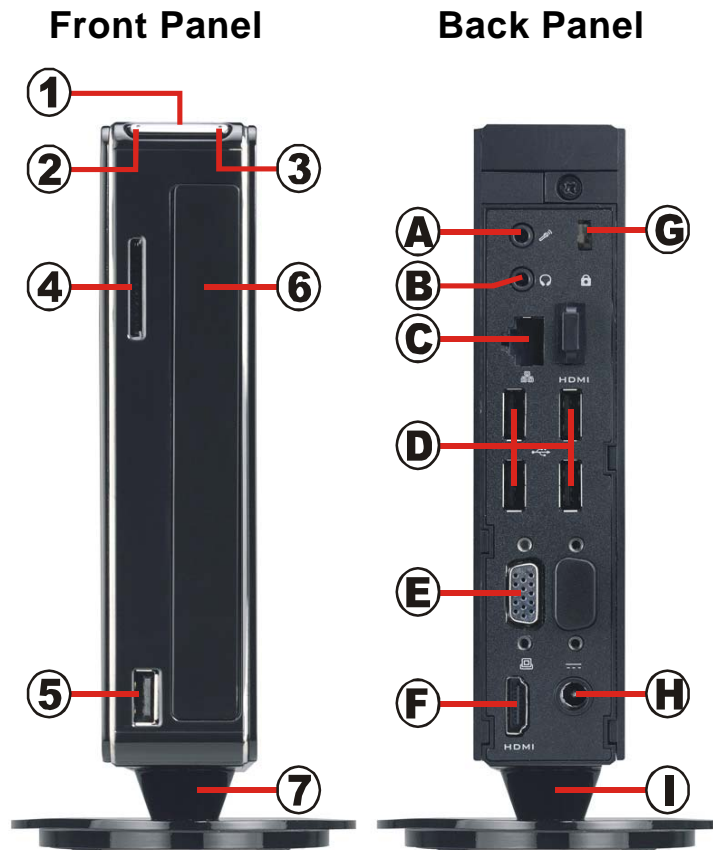
[4] "ODD" means 5.25" bay for an optical drive in slim-line format

[5] In 2012, Intel phased out the Atom D2700 processor and introduced the D2550 as its successor. This new model comes with a slightly reduced clock rate, while any other features are maintained.

[6] DDR3-1333 is supported at DDR3-1066 or DDR3-800 clock rate, respectively.

[7] XS35GSV3L: in the beginning of 2014, the GPU was updated from HD 7410M to HD 7450.

Shuttle Barebone XS35GS V3L – Connectors



- 1 Power button
- 2 Power LED
- 3 Hard disk LED
- 4 SD card reader
- 5 USB connector
- 6 Bay for the optical slimline drive *)
- 7 Vertical stand

- A Microphone input
- B Head phone output (Line out)
- C Gigabit LAN connector (RJ45)
- D 4x USB connectors
- E D-Sub/VGA connector
- F HDMI connector
- G Hole for the Kensington-Lock
- H Connector for the power adapter
- I Vertical stand

*) Note: The optical drive is not included.



Warning:
Please make sure the system is always placed upright using either its stand or the optional VESA mount. Ventilation holes must not be blocked to ensure sufficient cooling.



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