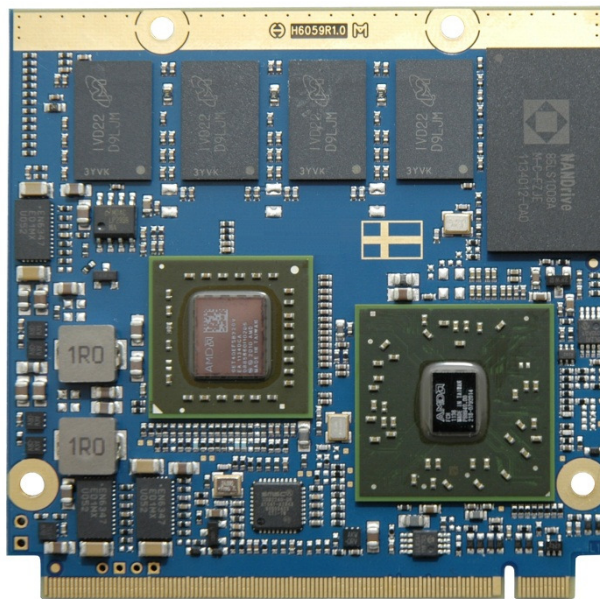


The H6059 is a compact (70mm x 70mm) high-performance, low power COM module based on the AMD Embedded G-series APUs with single or dual X86 cores and the A55E embedded chipset. The APUs have the powerful Radeon 6250 GPU built in. The Qseven form factor makes H6059 a legacy free module with a full range of contemporary low voltage differential serial interfaces such as PCI Express and USB 2.0 and display interfaces such as DisplayPort, HDMI, DVI and LVDS. BIOS supports legacy Super I/O on the carrier board.

Qseven modules are defined for low cost and ruggedness, with an MXM type edgecard connector interfacing the carrier board. H6059 has soldered memory and optional on-board SSD. H6059 is available in a version for Industrial operating temperature range.



## Features

- AMD Embedded G-Series APU
- Soldered DDRIII DRAM
- Industrial temperature range option
- Onboard NANDrive Flash SSD
- 2 x SATA ports
- 4 x PCIe ports
- Gigabit Ethernet
- 8 x USB 2.0 Ports
- LVDS, DisplayPort, DVI/HDMI
- HD Audio
- RTC
- Fully RoHS compliant
- Windows XP Embedded, Windows 7, Windows 7 Embedded, Windows XP, Windows XP Professional, Windows Vista and Linux supported

## Technical Specifications

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<b>APU (CPU+GPU)</b>	AMD G-Series APU, single or dual core with built-in GPU. - T16R (615MHz, 4.5W TDP) - T40R (1.0GHz, 5.5W TDP) - T40E (1.0GHz, 6.4W TDP)	<b>Integrated Graphics</b>	Integrated 2D/3D/MPEG hardware acceleration with UMA memory GPU: AMD Radeon HD 6250
<b>Chipset</b>	A55E	<b>Ethernet</b>	Intel 82583 Gbit controller
<b>Memory</b>	Soldered DDRIII RAM 1GB/2GB/4GB	<b>Serial Interface</b>	I2C/SM Bus interface
<b>Onboard SSD</b>	SATA BGA NAND SSD 0-32 GB	<b>BIOS</b>	Phoenix SecureCore Tiano UEFI
<b>SATA</b>	2 x SATA ports	<b>Display interface</b>	18-bit LVDS, Displayport, DVI/HDMI
<b>Battery management</b>	Support for Smart battery implementation on carrier board	<b>Audio</b>	Support for HDA audio codec on carrier board
<b>Power management</b>	ACPI 3.0b compliant Support for S3 and S4	<b>Power</b>	+5V +/-5%
<b>Serial Port</b>	Support for Super I/O on carrier board	<b>Operating Temperature</b>	Standard: 0 °C to +60 °C Industrial Temp.: -40 °C to +85 °C (Options with T40E)
<b>SDIO</b>	1 x SDIO port	<b>Humidity</b>	10 to 90% (operating) 5 to 95% (storage)
<b>USB</b>	8 x USB 2.0 EHCI compliant ports	<b>Dimensions</b>	70mm x 70mm
<b>PCIe ports</b>	4 ports for PCIe x1		
<b>LPC bus</b>	1 x LPC		

## Options

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**H6059-01:** Qseven module with AMD G-series APU T40E, 2GB DDR3, 8GB SATA Flash SSD  
**H6059-02:** Qseven module with AMD G-series APU T40R, 1GB DDR3, 2GB SATA Flash SSD  
**H6059-03:** Qseven module with AMD G-series APU T16R, 1GB DDR3, 2GB SATA Flash SSD  
**H6059-05:** Qseven module with AMD G-series APU T40E, Industrial temp., 2GB DDR3, No SSD  
**H6059-06:** Qseven module with AMD G-series APU T40E, Industrial temp., 2GB DDR3, 8GB SATA Flash SSD  
**H4103:** Reference carrier board for Qseven modules

Additional versions can be offered based on customization of the existing H6059.

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