

**HighPoint SSD7100/7500/6200 Series & Gigabyte Z390  
Aorus Ultra**

**Compatibility Report**

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## 1. Hardware:

### a. HighPoint Product:

SSD7100, SSD7500, SSD6540, SSD6200 Series

### b. Host Platform or External Device:

Gigabyte Z390 Aorus Ultra

## 2. Compatibility Status:

**Compatible (Boot & Data RAID)**

## 3. Description:

The Gigabyte Z390 Aorus Ultra is capable of supporting HighPoint SSD7000/SSD6200 series NVMe RAID controllers. SSD7500 series controllers can also be used with this platform, but will be unable to operate at full speed, as the systems only provides PCIe 3.0 connectivity. The SSD6540 series NVMe RAID enclosures utilize a PCIe Gen3 x16 NVMe HBA for external connectivity, which appear to be compatible with this platform.

The motherboards uses the Intel® Z390 Express Chipset (Intel Z390 based systems are known to be compatible with HighPoint NVMe products). The motherboard's BIOS includes UEFI support, and provides option ROM settings for UEFI and legacy devices.

## 4. Compatibility Details:

### a. PCIe Host Interface:

The Gigabyte Z390 Aorus Ultra supports PCIe Gen3 (PCIe 3.0), it provides one PCI-E 3.0 x16, 1 PCI-E 3.0 x8, 1 PCI-E 3.0 x4 and 3 x PCI Express x1 slots. SSD7500 PCIe Gen4 series products will be unable to operate at full speed on this motherboard. The motherboard only provides a single PCIe 3.0 x16 (electrical) slot, so it is not recommended to use for cross-sync.

Expansion Slots	
•	1 x PCI Express x16 slot, running at x16 (PCIEX16) * For optimum performance, if only one PCI Express graphics card is to be installed, be sure to install it in the PCIEX16 slot.
•	1 x PCI Express x16 slot, running at x8 (PCIEX8) * The PCIEX8 slot shares bandwidth with the PCIEX16 slot. When the PCIEX8 slot is populated, the PCIEX16 slot operates at up to x8 mode.
•	1 x PCI Express x16 slot, running at x4 (PCIEX4) * The PCIEX4 slot shares bandwidth with the M2P connector. The PCIEX4 slot operates at up to x2 mode when a PCIe SSD is installed in the M2P connector.
•	3 x PCI Express x1 slots (All of the PCI Express slots conform to PCI Express 3.0 standard.)
•	1 x M.2 Socket 1 connector for an Intel® CNVi wireless module only (CNVi)

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## b. Boot RAID Support (NVMe arrays used to boot a system):

**Compatible:** The Gigabyte Z390 Aorus Ultra utilizes a UEFI BIOS. The user guide covers UEFI boot capability and option ROM support, so it can support Bootable RAID configurations.

- ☞ **CSM Support**  
Enables or disables **UEFI** CSM (Compatibility Support Module) to support a legacy PC boot process.
  - ▶ Disabled Disables UEFI CSM and supports UEFI BIOS boot process only.
  - ▶ Enabled Enables UEFI CSM. (Default)
- ☞ **LAN PXE Boot Option ROM**  
Allows you to select whether to enable the legacy option ROM for the LAN controller. (Default: Disabled)  
This item is configurable only when **CSM Support** is set to **Enabled**.
- ☞ **Storage Boot Option Control**  
Allows you to select whether to enable the UEFI or legacy option ROM for the storage device controller.
  - ▶ Do not launch Disables option ROM.
  - ▶ UEFI Enables UEFI option ROM only. (Default)
  - ▶ Legacy Enables legacy option ROM only.This item is configurable only when **CSM Support** is set to **Enabled**.

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## c. Data RAID Support (NVMe arrays used for data storage):

There are no apparent restrictions for data-only storage configurations. However, as the motherboard only provides a single PCIe 3.0 x16 (electrical) slot, cross-Sync is not recommended.

## 5. Manufacturer Reference Material

### a. Product Website:

Link: <https://store.gigabyte.us/>

### b. User Guide:

Link: [https://download.gigabyte.cn/FileList/Manual/mb\\_manual\\_z390-aorus-ultra\\_1001\\_190219\\_e.pdf?v=31a107e50ac5438f9301113d4159a3a4](https://download.gigabyte.cn/FileList/Manual/mb_manual_z390-aorus-ultra_1001_190219_e.pdf?v=31a107e50ac5438f9301113d4159a3a4)