

### Overview

## HP Thunderbolt™-3 Dual Port PCIe I/O Card

### Models

HP Thunderbolt™-3 Dual Port PCIe I/O Card

3JU05AA

### Introduction

This Thunderbolt™ 3 card enables fast data transfer from external peripherals such as external hard disks, digital cameras and video cameras. It features two external Thunderbolt™ output ports, two DisplayPort™ input ports and one internal GPIO header.

Thunderbolt™ 3 technology is a transformational high-speed, multi-protocol I/O that provides unmatched performance over USB-C™ I/O technologies with up to 40Gbps transfer speeds\*. It provides flexibility and simplicity by supporting both data (PCIe) and video (DisplayPort™) on a single cable connection that can daisy-chain up to six devices.

The HP Thunderbolt™ 3 Dual Port PCIe I/O Card is backward compatible to allow your Thunderbolt™ 2 devices (compatible adapter required).

Thunderbolt™ 3 technology dramatically increases the data transfer rate enabling faster backup, editing and file sharing, significantly reducing the time to complete key tasks. Thunderbolt™ 3 technology was specifically designed with inherently low latency and highly accurate time synchronization capabilities. These features enable extremely accurate audio and video creation, playback and editing that no other standard interconnect technology can match.

\*Maximum speed requires DisplayPort™ and PCIe aggregation.

### Performance

The HP Thunderbolt™ 3 Dual Port PCIe I/O Card performs with data rates of up to 40 Gb/s\*.

\*Maximum speed requires DisplayPort™ and PCIe aggregation.

**NOTE:** Actual performance will be lower based on protocol overhead and the peripherals attached.

### Key Benefits

Data transfer between digital electronic devices that support the Thunderbolt™, Thunderbolt™ 2 and Thunderbolt™ 3 standards.

- Up to 40Gbps\*, dual channel data transfer
- Data & Video on single cable with support for USB, PCI Express and DisplayPort™
- Daisy chain up to six devices
- Compatible with existing DisplayPort™ devices
- Low latency with highly accurate time synchronization
- Uses native PCIe and DisplayPort™ protocol software drivers
- Up to 15W of power over USB-C™ for bus-powered devices

\*Maximum speed requires DisplayPort™ and PCIe aggregation.

### Compatibility

The HP Thunderbolt™ 3 Dual Port PCIe I/O Card is compatible with the HP Z4 G4, Z6 G4 and Z8 G4 Workstations.

**NOTE:** Not all models are available in all regions.

### Overview

The HP Thunderbolt™ 3 Dual Port PCIe I/O Card requires a DisplayPort™ input to enable downstream DisplayPort™ devices on the Thunderbolt™ daisy chain.

The HP Thunderbolt™ 3 Dual Port PCIe I/O Card is offered as a Certified System Solution with the compatible workstation platforms and select graphics cards only. Additional cards may perform well, but have not been fully tested to the full standards to confirm a Certified System Solution.

Z8 G4: NVIDIA® P2000, P4000, P5000, and AMD WX7100

Z6 G4: NVIDIA® P2000, P4000, P5000, and AMD WX7100

Z4 G4: NVIDIA® P2000, P4000, P5000, and AMD WX7100

\* Denotes double-wide card

The HP Thunderbolt™ 3 PCIe Card has specific PCIe slot requirements for correct operation.

Z8 G4: slot #1

Z6 G4: slot #6

Z4 G4: slot #4

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### Service and Support

The HP Thunderbolt™ 3 Dual Port PCIe I/O Card has a one-year Limited Warranty or the remainder of the warranty of the HP supported product in which it is installed. Technical support is available seven days a week, 24 hours a day, by phone, as well as online support forums. Certain restrictions and exclusions apply.

### Technical Specifications

<b>Data Transfer Rate</b>	Supports up to 40 Gb/s (40,000 Mb/s)*
<b>Devices Supported</b>	Thunderbolt™, Thunderbolt™ 2 and Thunderbolt™ 3 certified for Windows devices
<b>Bus Type</b>	PCIe card, full height PCIe slots
<b>Ports</b>	Two Thunderbolt™ 3 external USB type-C output connectors (Rear) Two full size DisplayPort™ input connectors (Rear)
<b>Internal Connectors</b>	One 2x5-Pin header connector
<b>System Requirements</b>	Genuine Windows 10 Professional 64-bit, available dedicated PCH PCIe slot.
<b>Temperature - Operating</b>	50° to 131° F (10° to 55° C)
<b>Temperature - Storage</b>	-22° to 140° F (-30° to 60° C)
<b>Relative Humidity - Operating</b>	20% to 80%
<b>Compliances</b>	FCC Part 15B, cULus 60950, CE Mark EN55022B(1995)/EN55024-1998 STD, Taiwan BSMI CNS13438, Korea MIC
<b>Operating Systems Supported</b>	Genuine Windows 10 Professional 64-bit.
<b>Kit Contents</b>	HP Thunderbolt™ 3 Dual Port PCIe I/O Card, 2- DisplayPort™ cables, GPIO (General-Purpose Input/Output) cables, Installation documentation and warranty card.

\*Maximum speed requires DisplayPort™ and PCIe aggregation.

### Summary of Changes

Date of change:	Version History:		Description of change:
	From v1 to v2		

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