Overview

### HP Thunderbolt G4 Dock - 120W/280W (120W version with USB-C alt mode cable shown)



- 1. (1) Mechanical power button<sup>1</sup>
- 2. (1) USB Type-C 3.2 Gen 2 (10 Gbps) port with data and power out 15W
- 3. (1) USB-C alt-mode cable (delivering up to 100W power)<sup>2</sup>
- 4. (2) USB-A 3.2 Gen 2 (10 Gbps; power output: 7.5W) charging port 1 on each side
- 5. (1) Standard Kensington lock slot
- 1. The dock power button is not functional when connected to non-supported HP notebooks or non-HP notebooks.
- 2. 75W delivery to non-HP laptops.

Overview

#### HP Thunderbolt G4 Dock - 120W/280W (280W version with cable combo shown)



- (2) USB-A 3.2 Gen 2 (10 Gbps; power output: 7.5W) charging port 1 on each side
- (1) 4.5mm power barrel (delivering up to 230W power to host) 5. (1) Mechanical power button
- 3. (1) USB-C alt-mode cable (delivering up to 100W power)<sup>2</sup>
- (1) USB Type-C 3.2 Gen 2 (10 Gbps) port with data and power out 15W
- 1. The dock power button is not functional when connected to non-supported HP notebooks or non-HP notebooks.
- 2. 75W delivery to non-HP laptops.

Overview



- 1. (2) USB-A 3.2 Gen 1 (5 Gbps each) ports
- 2. (2) DisplayPort 1.4 ports
- 3. (1) USB-C 3.2 Gen 2 DisplayPort
- 4. (1) HDMI 2.0 port
- 1. Requires infrastructure that supports 2.5GB Ethernet speeds.

- 5. (1) Thunderbolt 4 port
- 6. (1) Power barrel port (120W or 280W)
- 7. (1) Indicator light
- 8. (1) Ethernet port: 2 internal NIC cards to support 1Gb and 2.5Gb Ethernet<sup>1</sup>

**Technical Specifications** 

Components					
Part Number	HP Thunderbolt 120W G4 Dock - 4J0A2AA HP Thunderbolt 280W G4 Dock w/Combo Cable - 4J0G4AA				
Dimensions (HxWxD)	3.9 x 3.9 x 2.7 in (98 x 98 x 68 mm)				
Weight	120W: 1.68 lbs (762 g) 280W: 1.76 lbs (798.3 g)				
Security	HP Sure Start <sup>1</sup>				
Operating systems <sup>2</sup>	Windows 11 21H2 Windows 10 19H1 Windows 10 19H2 Windows 10 20H1 Windows 10 20H2 Windows 10 21H1 Windows 10 22H2 ChromeOS v92.0.4515.157 Linux Ubuntu 20.04 LTS 5.14 Kernel ThinPro 8.0 Windows 10 IoT Enterprise LTSC 2021 macOS Monterey v12.0 macOS Big Sur 11.5.2				
Systems management	Wired vPRO Management				
Top components	Mechanical power button with LED indicator to power or wake host system <sup>3</sup>				
Front components	(1) USB Type-C® 3.2 Gen 2 (10 Gbps) port with data and power out (15W) 4J0A2AA: (1) USB-C cable to connect to host system (0.8 m cable length) 4J0G4AA: (1) USB-C cable to connect to host system (0.8 m cable length) and (1) 4.5mm power barrel				
Side components	Right side: (1) Kensington Standard Lock Slot (2) USB-A 3.2 Gen 2 (10 Gbps; power output: 7.5W) charging port - 1 on each side				
Back components	<ul> <li>(2) USB-A 3.2 Gen 1 (5 Gbps each) ports</li> <li>(1) HDMI 2.0 port</li> <li>(2) DisplayPort 1.4 ports</li> <li>(1) Power barrel port (120W or 280W)</li> <li>(1) Ethernet port: 2 internal NIC cards to support 1 Gb and 2.5 Gb Ethernet<sup>4</sup></li> <li>(1) USB-C<sup>®</sup> 3.2 Gen 2 DisplayPort</li> <li>(1) Thunderbolt™ 4 port</li> </ul>				
Network manageability features	vPRO (wired) <sup>4</sup> eTag Disconnected Firmware updates PXE Boot Wake on LAN (from the Off, Sleep or Hibernation States <sup>5</sup> ) MAC address pass-through (from the On, Off, Sleep or Hibernation States <sup>6</sup> )				



### **Technical Specifications**

	WLAN-LAN Switching		
Networking	Supports 1 Gb and 2.5G Ethernet		
Power to system	Up to 100W via USB-C with the 120W version Up to 230W on HP platforms with the 280W version via the combo cable Up to 75W via USB-C on non-HP platforms		
External monitor support	For hosts that support DisplayPort 1.4 with Display Stream Compression:  4x FHD @ 60 Hz  4x QHD @ 60 Hz  4x 4K @ 60 Hz  For hosts that support DisplayPort 1.3/1.4:  4x FHD @ 60 Hz  3x QHD @ 60 Hz  3x QHD @ 60 Hz		
	For hosts that support DisplayPort 1.2: 3x FHD @ 60 Hz 2x QHD @ 60 Hz 1x 4K @ 60Hz		
Power delivery (PD) profiles	PD 3.0: 5V/5A, 9V/5A, 12V/5A, 15V/5A, 20V/5A		
Compatibility	Tested and supported on select HP commercial notebooks. For HP notebook compatibility please visit - https://pcb.inc. hp.com/webapp/#!/us-en and search by notebook.  Tested and supported on the following 3rd party notebooks: Apple MacBook Pro 16 2020 (Intel Coffee Lake), Apple MacBook Air 2020 (Intel Ice Lake), Apple MacBook Pro 13 2020 (M1 chip), Apple MacBook Air 13 2020 (M1 chip), Dell 5300 Chrome Enterprise 2020 (Whiskey Lake), Dell Latitude 7400 2020 (Whiskey Lake), Dell Latitude 7420 2021 (Tiger Lake-U), Lenovo Thinkbook 14 2020 (Ice Lake), Lenovo T14 2020 (AMD Renoir), and Lenovo X1 Carbon G8 Thinkpad 2020 (Whiskey Lake).		
	Tested and supported on the following 3rd party notebooks: Apple MacBook Pro 16 2020 (Intel Coffee Lake), Apple MacBook Air 2020 (Intel Ice Lake), Apple MacBook Pro 13 2020 (M1 chip), Apple MacBook Air 13 2020 (M1 chip), Dell 5300 Chrome Enterprise 2020 (Whiskey Lake), Dell Latitude 5400 2020 (Whiskey Lake), Dell Latitude 7400 2020 (Whiskey Lake), Dell Latitude 7420 2021 (Tiger Lake-U), Lenovo Thinkbook 14 2020 (Ice Lake), Lenovo T14 2020		
Operating voltage and current	Tested and supported on the following 3rd party notebooks: Apple MacBook Pro 16 2020 (Intel Coffee Lake), Apple MacBook Air 2020 (Intel Ice Lake), Apple MacBook Pro 13 2020 (M1 chip), Apple MacBook Air 13 2020 (M1 chip), Dell 5300 Chrome Enterprise 2020 (Whiskey Lake), Dell Latitude 5400 2020 (Whiskey Lake), Dell Latitude 7400 2020 (Whiskey Lake), Dell Latitude 7420 2021 (Tiger Lake-U), Lenovo Thinkbook 14 2020 (Ice Lake), Lenovo T14 2020		
Operating voltage and current Temperature (operating)	Tested and supported on the following 3rd party notebooks: Apple MacBook Pro 16 2020 (Intel Coffee Lake), Apple MacBook Air 2020 (Intel Ice Lake), Apple MacBook Pro 13 2020 (M1 chip), Apple MacBook Air 13 2020 (M1 chip), Dell 5300 Chrome Enterprise 2020 (Whiskey Lake), Dell Latitude 5400 2020 (Whiskey Lake), Dell Latitude 7400 2020 (Whiskey Lake), Dell Latitude 7420 2021 (Tiger Lake-U), Lenovo Thinkbook 14 2020 (Ice Lake), Lenovo T14 2020 (AMD Renoir), and Lenovo X1 Carbon G8 Thinkpad 2020 (Whiskey Lake).		
	Tested and supported on the following 3rd party notebooks: Apple MacBook Pro 16 2020 (Intel Coffee Lake), Apple MacBook Air 2020 (Intel Ice Lake), Apple MacBook Pro 13 2020 (M1 chip), Apple MacBook Air 13 2020 (M1 chip), Dell 5300 Chrome Enterprise 2020 (Whiskey Lake), Dell Latitude 5400 2020 (Whiskey Lake), Dell Latitude 7400 2020 (Whiskey Lake), Dell Latitude 7420 2021 (Tiger Lake-U), Lenovo Thinkbook 14 2020 (Ice Lake), Lenovo T14 2020 (AMD Renoir), and Lenovo X1 Carbon G8 Thinkpad 2020 (Whiskey Lake).  120W: Input 100 to 240V 1.7A 50 to 60Hz. Output is 19.5V at 6.15A 280W: Input 100 to 240V 1.7A 50 to 60Hz. Output is 19.5V at 14.35A		
Temperature (operating) Relative humidity noncondensing	Tested and supported on the following 3rd party notebooks: Apple MacBook Pro 16 2020 (Intel Coffee Lake), Apple MacBook Air 2020 (Intel Ice Lake), Apple MacBook Pro 13 2020 (M1 chip), Apple MacBook Air 13 2020 (M1 chip), Dell 5300 Chrome Enterprise 2020 (Whiskey Lake), Dell Latitude 5400 2020 (Whiskey Lake), Dell Latitude 7400 2020 (Whiskey Lake), Dell Latitude 7420 2021 (Tiger Lake-U), Lenovo Thinkbook 14 2020 (Ice Lake), Lenovo T14 2020 (AMD Renoir), and Lenovo X1 Carbon G8 Thinkpad 2020 (Whiskey Lake).  120W: Input 100 to 240V 1.7A 50 to 60Hz. Output is 19.5V at 6.15A 280W: Input 100 to 240V 1.7A 50 to 60Hz. Output is 19.5V at 14.35A 0° C to 35° C (32° F to 95° F)		
Temperature (operating) Relative humidity noncondensing (operating) Maximum altitude unpressurized	Tested and supported on the following 3rd party notebooks: Apple MacBook Pro 16 2020 (Intel Coffee Lake), Apple MacBook Air 2020 (Intel Ice Lake), Apple MacBook Pro 13 2020 (M1 chip), Apple MacBook Air 13 2020 (M1 chip), Dell 5300 Chrome Enterprise 2020 (Whiskey Lake), Dell Latitude 5400 2020 (Whiskey Lake), Dell Latitude 7400 2020 (Whiskey Lake), Dell Latitude 7420 2021 (Tiger Lake-U), Lenovo Thinkbook 14 2020 (Ice Lake), Lenovo T14 2020 (AMD Renoir), and Lenovo X1 Carbon G8 Thinkpad 2020 (Whiskey Lake).  120W: Input 100 to 240V 1.7A 50 to 60Hz. Output is 19.5V at 6.15A 280W: Input 100 to 240V 1.7A 50 to 60Hz. Output is 19.5V at 14.35A  0° C to 35° C (32° F to 95° F)  10 % to 90 %		
Temperature (operating) Relative humidity noncondensing (operating) Maximum altitude unpressurized (operating)	Tested and supported on the following 3rd party notebooks: Apple MacBook Pro 16 2020 (Intel Coffee Lake), Apple MacBook Air 2020 (Intel Ice Lake), Apple MacBook Pro 13 2020 (M1 chip), Apple MacBook Air 13 2020 (M1 chip), Dell 5300 Chrome Enterprise 2020 (Whiskey Lake), Dell Latitude 5400 2020 (Whiskey Lake), Dell Latitude 7400 2020 (Whiskey Lake), Dell Latitude 7420 2021 (Tiger Lake-U), Lenovo Thinkbook 14 2020 (Ice Lake), Lenovo T14 2020 (AMD Renoir), and Lenovo X1 Carbon G8 Thinkpad 2020 (Whiskey Lake).  120W: Input 100 to 240V 1.7A 50 to 60Hz. Output is 19.5V at 6.15A 280W: Input 100 to 240V 1.7A 50 to 60Hz. Output is 19.5V at 14.35A  0° C to 35° C (32° F to 95° F)  10 % to 90 %		
Temperature (operating) Relative humidity noncondensing (operating) Maximum altitude unpressurized (operating) Cable length	Tested and supported on the following 3rd party notebooks: Apple MacBook Pro 16 2020 (Intel Coffee Lake), Apple MacBook Air 2020 (Intel Ice Lake), Apple MacBook Pro 13 2020 (M1 chip), Apple MacBook Air 13 2020 (M1 chip), Dell 5300 Chrome Enterprise 2020 (Whiskey Lake), Dell Latitude 5400 2020 (Whiskey Lake), Dell Latitude 7400 2020 (Whiskey Lake), Dell Latitude 7420 2021 (Tiger Lake-U), Lenovo Thinkbook 14 2020 (Ice Lake), Lenovo T14 2020 (AMD Renoir), and Lenovo X1 Carbon G8 Thinkpad 2020 (Whiskey Lake).  120W: Input 100 to 240V 1.7A 50 to 60Hz. Output is 19.5V at 6.15A 280W: Input 100 to 240V 1.7A 50 to 60Hz. Output is 19.5V at 14.35A  0° C to 35° C (32° F to 95° F)  10 % to 90 %  15 m to 3,048 m (- 50 ft to 10,000 ft)		
Temperature (operating) Relative humidity noncondensing (operating) Maximum altitude unpressurized (operating) Cable length Security slot type	Tested and supported on the following 3rd party notebooks: Apple MacBook Pro 16 2020 (Intel Coffee Lake), Apple MacBook Air 2020 (Intel Ice Lake), Apple MacBook Pro 13 2020 (M1 chip), Apple MacBook Air 13 2020 (M1 chip), Dell 5300 Chrome Enterprise 2020 (Whiskey Lake), Dell Latitude 5400 2020 (Whiskey Lake), Dell Latitude 7400 2020 (Whiskey Lake), Dell Latitude 7420 2021 (Tiger Lake-U), Lenovo Thinkbook 14 2020 (Ice Lake), Lenovo T14 2020 (AMD Renoir), and Lenovo X1 Carbon G8 Thinkpad 2020 (Whiskey Lake).  120W: Input 100 to 240V 1.7A 50 to 60Hz. Output is 19.5V at 6.15A 280W: Input 100 to 240V 1.7A 50 to 60Hz. Output is 19.5V at 14.35A  0° C to 35° C (32° F to 95° F)  10 % to 90 %  15 m to 3,048 m (- 50 ft to 10,000 ft)  0.8 m  Standard Kensington lock slot		



### **Technical Specifications**

- 1. HP Sure Start on HP Thunderbolt G4 dock supports firmware integrity verification and recovery it does not include real-time and runtime protections or Microsoft SCCM integration typically found on HP Sure Start in HP notebooks.
- 2. Operating systems supported: Windows 10 19H1 and up, Win 10 IoT Enterprise LTSC 2021, Windows 11 21H2 and up, ChromeOS M101 and up, Ubuntu Linux 20.04 LTS with 5.14 kernel, ThinPro OS 8.0 and MacOS Big Sur 12.1. Not all features work with all operating systems, ask your sales representative about compatibility with your PC. Linux testing currently underway and expected to be completed after launch.
- 3. The dock power button is not functional when connected to non-supported HP notebooks or non-HP notebooks.
- 4. Requires infrastructure that supports 2.5 GB Ethernet speeds.
- 5. Your computer might support Wake on LAN from the Off, Sleep or Hibernate States, or only when the computer is On or in Sleep.
- 6. Your computer might support MAC address pass-through the On, Off, Sleep or Hibernate States, or only when the computer is On or in Sleep. Thunderbolt™ host systems require Thunderbolt™ software (minimum SW17.x).

Ethernet drivers need to be installed separately on non-HP Windows systems for headset auto switching functionality. Drivers available on HP website.

For MAC PCs, HP does not provide ethernet and audio drivers.

Firmware updates on Window-based host systems only.

Certain features are not functional on non-HP supported nor non-HP notebooks:

- Power button to turn on or wake the system.
- Wake on LAN from warm and cold dock.
- Wake on LAN from \$4/\$5.
- MAC Address pass-through SO, S3, S4, S5 warm and cold dock.



**Technical Specifications** 

	HP Thunde	rbolt™ G4 Dock video resolution specifications
	resolution and sup	port is dependent on the maximum capability of the notebook.
(All Thunderbolt resolu  Host Specification	itions assume at lea	nst dual DP streams. All high resolution mode resolutions assume 4 DP streams)
nost specification		Dual 4K @30Hz or dual 4K UHD @ 60Hz or (1) 6k TBT running multple tiles
DP 1.2 Thunderbolt™ host:		Triple displays: (3) 2.5k @30Hz
		Quad displays: (3) 2.5k @30Hz + (1) FHD @ 30Hz
		Single display: (1) 4K DCI @ 30Hz
	Multi-function mode	Dual display: (1) 4K DCI @ 30Hz + (1) FHD @ 30Hz
		Triple displays: (3) FHD @30Hz
DP 1.2 USB-C host:		Single display: (1) 4K DCI @60Hz
	High resolution	Dual displays: (2) 4K DCI @ 30Hz
	mode	Triple displays: (3) 2.5k @30
Host Specification		
		Single display: (1) 4K DCI @60Hz
DP 1.3/1.4 Thunderbolt		Dual displays: (2) 4K UHD @60Hz
host:		Triple displays: (2) 5K single cable@30Hz + (1) 2.5K@30Hz or (3) 4K DCI @ 30Hz
	Multi-function mode	Single display: (1) 5k Ultra Wide @60Hz or (1) 4K DCI @ 60Hz
		Triple displays: (3) 2.5K@ 30Hz
DP 1.3/1.4 USB-C host:		Single display: (1) 5k Ultra Wide (5120X1440) @ 60Hz or (1) 8k single cable @ 30Hz
	High resolution mode	Dual displays: (2) 4K UHD @60Hz or (2) 4K DCI @ 30Hz
		Triple displays: (3) 4K DCI @ 30Hz
Host Specification		
		Single display: up to (1) 8K Thunderbolt with multiple tiles @ 60Hz
DP 1.4 with DSC		Dual displays: (2)4K DCI @ 60Hz or
Thunderbolt host:		Triple displays: (3) 4K@ 60Hz up to (2) 5K single cable @30Hz + (1) 4K UHD @30Hz
		Quad displays: (4) 4K DCI @ 60Hz
		Single display: (1) 4K DCI @ 60Hz up to (1) 8K single cable @ 30Hz
	Multi-function mode	Dual displays: (2) 4K DCI @ 60 Hz up to (1) 5K dual cable + (1) 4K
DP 1.4 with DSC USB-C host:		Triple displays: (3) 4K DCI @ 30Hz or (3) 4K UHZ @ 60Hz up to (2) 5K single
		cable@30Hz + (1) 4KUHD @30Hz
		Single display: upto (1) 8K dual @ 60Hz
	High resolution mode	Dual displays: (2) 4K DCI @ 60Hz or up to (2) 5K single cable + (1) 4K UHD@ 60 Hz
		Triple displays: (3) 4K DCI @ 60Hz up to (2) 5K single cable + (1) 4K UHD



Summary of changes

Date of change	Version		Description of change
June 7, 2022	V1 to V2	Update	Call outs and tables generally corrected
June 15, 2022	V1 to V2	Removal	Dual displays: (2) 4K UHD @60Hz removed from DP 1.3/1.4 USB-C
			host Multi-function mode specs
June 27, 2022	V2 to V3	Correction	(2) USB-A 3.2 Gen 1in side components row corrected to 10 Gbps
August 10, 2022	V3 to V4	Update	General update
November 15, 2022	V4 to V5	Update	External monitor support, Operating systems updated / Compatibilty
			added.
	V5 to V6		
	V6 to V7		
	V7 to V8		
	V8 to V9		
	V9 to V10		
	V10 to V11		
	V11 to V12		
	V12 to V13		
	V13 to V14		
	V14 to V15		

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