Acer ODK490

Acer Thunderbolt 4 Dock (Model ODK490) User Manual

Comprehensive instructions for setup, operation, and maintenance.

1. Introduction and Overview

The Acer Thunderbolt 4 Dock (Model ODK490) is a versatile 16-in-1 docking station designed to expand the connectivity and display capabilities of your laptop or compatible device. It offers high-speed data transfer, extensive display options, and robust power delivery to streamline your workspace.

Key Features:

- **16-in-1 Connectivity:** Equipped with 3x Thunderbolt 4, 2x HDMI, 2x DisplayPort, 2x USB-A (10Gbps), 2x USB-A (5Gbps), 2.5G Ethernet, SD4.0 card reader, audio/mic port, and USB-C Host (PD 96W).
- **High-Resolution Display:** Supports a single 8K@30Hz display or up to four 4K@60Hz displays.
- **Fast Data Transfer:** Three Thunderbolt 4 ports offer 40Gbps data transfer. Additional USB-A ports provide 10Gbps and 5Gbps speeds.
- **Powerful Charging:** Includes a 160W power adapter, delivering up to 96W Power Delivery to the host laptop.
- **High-Speed Network:** Features a 2.5Gbps Ethernet (RJ45) port for stable and ultra-fast wired internet.
- **Universal Compatibility:** Compatible with Thunderbolt 4, Thunderbolt 3, and DisplayPort Alt Mode enabled laptops and smartphones, including MacBook Pro/Air, Dell XPS, HP, Lenovo, ASUS, and Acer devices.



Figure 1: Acer Thunderbolt 4 Dock (Model ODK490) - Front and back view of the docking station.

Your browser does not support the video tag.

Video 1: Overview of the Acer 8K Thunderbolt 4 Dock, highlighting its 16-in-1 features and capabilities.

2. Setup and Installation

2.1 Package Contents:

Before proceeding, ensure all items are present in the package:

- Acer Thunderbolt 4 Dock (Model ODK490)
- 160W DC Power Adapter
- AC Power Cable
- Thunderbolt 4 Cable
- Cable Holder
- User Manual

2.2 Physical Connection:

1. Connect the 160W DC Power Adapter to the 'DC IN 20V' port on the rear of the docking station.
2. Plug the AC Power Cable into the power adapter and then into a wall outlet.
3. Connect one end of the provided Thunderbolt 4 cable to the 'USB-C Host (PD 96W)' port on the front of the docking station.
4. Connect the other end of the Thunderbolt 4 cable to a Thunderbolt 4, Thunderbolt 3, or DisplayPort Alt Mode enabled USB-C port on your laptop.
5. Press the power button on the front of the docking station to turn it on. The LED indicator will illuminate.

2.3 DisplayLink Driver Installation (for Multi-Monitor Functionality):

For full multi-display functionality, especially on macOS, it is essential to install the official DisplayLink driver. Ensure your laptop's USB-C port supports DP Alt Mode for optimal performance with four 4K@60Hz monitors.

1. Visit the official DisplayLink website: synaptics.com/products/displaylink-usb-graphics/downloads
2. Navigate to the 'Downloads' section and select the correct DisplayLink Manager application version for your operating system (Windows, macOS, Android, Chrome OS, Ubuntu).
3. Download and install the driver following the on-screen instructions.
4. For macOS users, you may need to grant 'Screen Recording' permission to the DisplayLink Manager in your system's Privacy & Security settings for the driver to function correctly.

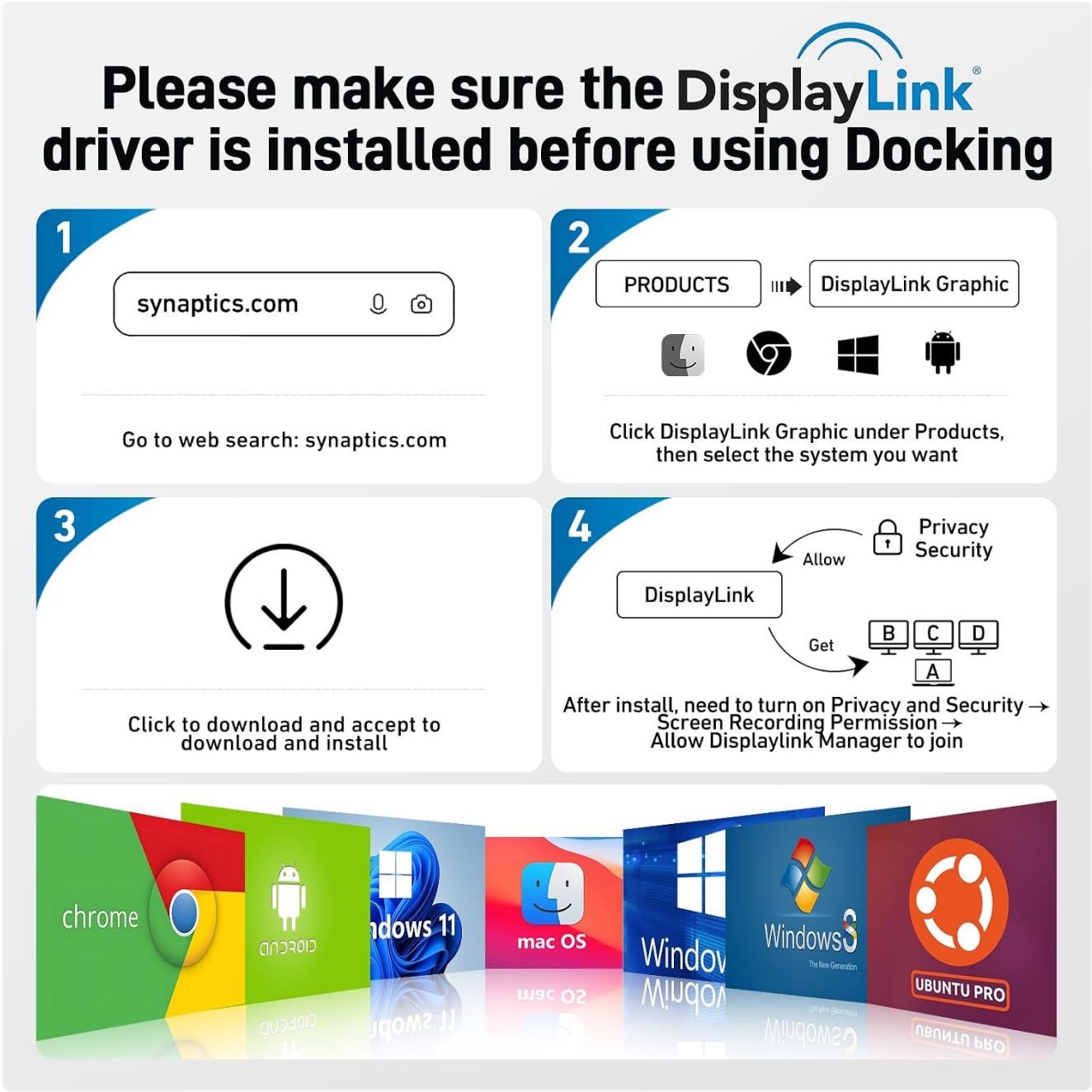


Figure 2: DisplayLink driver installation steps for various operating systems.

Your browser does not support the video tag.

Video 2: Detailed guide on how to download and install the DisplayLink driver for macOS.

3. Operating Instructions

3.1 Port Overview:

The Acer Thunderbolt 4 Dock provides a comprehensive array of ports:



Figure 3: Detailed diagram of all 16 ports on the Acer Thunderbolt 4 Dock.

- **Front Ports:**
  - Audio/Mic Port (3.5mm): For headphones or microphones.
  - SD 4.0 Card Slot: High-speed memory card access (up to 312MB/s).
  - USB-A Port (10Gbps): For high-speed peripherals.
  - USB-C Host (PD 96W): Connects to your laptop, providing power and data.
  - Power Switch: To turn the dock on/off.
- **Rear Ports:**
  - Input DC 20V/8A (160W): Power input for the dock.
  - 3x Thunderbolt 4 Ports (40Gbps, 15W, Video): For high-speed data, video output, and charging.
  - USB-A Port (10Gbps): Another high-speed USB-A port.
  - 2x USB-A Ports (5Gbps): Standard USB-A ports.
  - 2.5G Ethernet Port: For wired network connection.
  - 2x DisplayPort 1.2: For video output.

- 2x HDMI 2.0: For video output.

3.2 Display Configuration:

The dock supports various display setups:

- **Single Display:** Up to 8K@30Hz via a Thunderbolt 4 port.
- **Quad Display:** Up to four 4K@60Hz displays. Ensure your laptop supports DP Alt Mode and has sufficient bandwidth.
- **DisplayLink Modes:** Supports Extend Mode (ABCD/ABCDE) and Mirror Mode (AAAAA) for Windows and macOS (with DisplayLink driver).



Figure 4: Quad 4K@60Hz display setup with the Acer Thunderbolt 4 Dock.

Your browser does not support the video tag.

Video 3: Instructions on how to connect 1 to 4 displays using the Acer 16-in-1 Thunderbolt 4 dock.

3.3 Data Transfer:

Utilize the various high-speed ports for efficient data transfer:

- **Thunderbolt 4:** Up to 40Gbps for ultra-fast file transfers.
- **USB-A 3.2:** 2x ports supporting 10Gbps.
- **USB-A 3.0:** 2x ports supporting 5Gbps.
- **SD 4.0 Card Reader:** Transfer speeds up to 312MB/s.

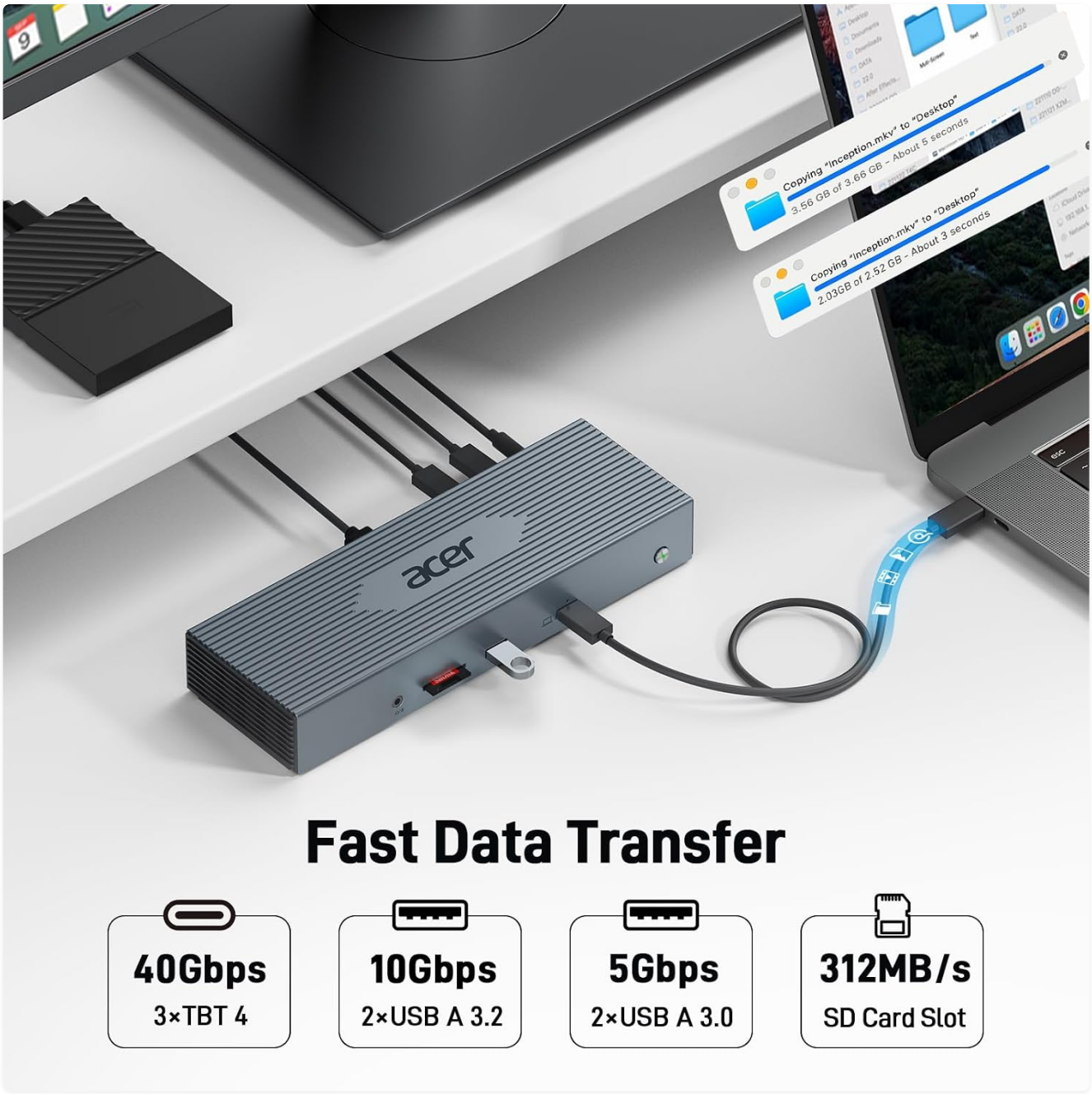


Figure 5: Fast data transfer capabilities of the docking station.

3.4 Power Delivery and Charging:

The dock provides robust power management:

- **Host Charging:** The USB-C Host port delivers up to 96W Power Delivery (PD) to charge the connected laptop. Ensure your laptop's USB-C port supports the PD protocol.
- **Peripheral Charging:** Thunderbolt 4 ports provide up to 15W, and USB-A ports provide up to 12W for connected devices.



Figure 6: 160W Power Adapter and simultaneous high-speed charging.

4. Specifications

Feature	Detail
Product Dimensions	9.55 x 3.15 x 1.55 inches
Item Weight	3.56 pounds
Item Model Number	ODK490
Brand	Acer
Color	Grey

Hardware Interface	3.5mm Audio, DisplayPort, Ethernet, HDMI, Thunderbolt 4, USB 3.2 Gen 2, USB Docking Station
Compatible Devices	All Laptops and Smartphones with Thunderbolt 4, Thunderbolt 3, DisplayPort Alternate Mode (DP Alt Mode) supporting Display, Charging, Data Transfer Protocol. Examples: MacBook Pro/Air, HP ProBook, EliteBook, Spectre x360 series, Dell XPS 13/15/17, Dell Latitude, Dell Inspiron, Lenovo ThinkPad, IdeaPad, Yoga, Microsoft Surface Pro 7/8/9, ASUS, Acer, Galaxy S23, and more.
Total USB Ports	4
Number of Ports	16
Total HDMI Ports	2
Wattage	160.0
UPC	195133190534

5. Troubleshooting

- **No Display Output:**
  - Ensure the DisplayLink driver is installed and updated, especially for macOS.
  - Verify your laptop's USB-C port supports DisplayPort Alt Mode.
  - Check all cable connections (Thunderbolt 4, HDMI, DisplayPort) are secure.
  - Confirm the docking station is powered on (LED indicator should be lit).
  - Restart your laptop and the docking station.
- **Charging Issues:**
  - Ensure your laptop's USB-C port supports Power Delivery (PD) for high-speed charging.
  - If the dock loses power, re-press the power button to restart it.
- **Intermittent Connectivity:**
  - Use the provided high-quality Thunderbolt 4 cable.
  - Avoid using uncertified or damaged cables.
  - Ensure the dock is placed on a stable surface with adequate ventilation.
- **Ethernet Not Working:**
  - Check the Ethernet cable connection to both the dock and your router/modem.
  - Verify network settings on your computer.

6. Maintenance

To ensure the longevity and optimal performance of your Acer Thunderbolt 4 Dock, follow these maintenance guidelines:

- **Cleaning:** Use a soft, dry cloth to clean the exterior of the docking station. Avoid liquid cleaners or abrasive materials.

- **Ventilation:** Ensure the dock is placed in a well-ventilated area to prevent overheating. Do not block the ventilation grilles.
- **Storage:** When not in use for extended periods, store the dock in a cool, dry place away from direct sunlight and extreme temperatures.
- **Cable Management:** Organize cables to prevent tangling and damage. Avoid sharp bends or excessive tension on the cables.

7. Warranty and Support

The Acer Thunderbolt 4 Dock (Model ODK490) comes with a**12-month limited warranty**. Free technical support is available during the warranty period.

Contact Information:

- **Phone:** (978)230-8895 (US)
- **Email:** support@neweasetech.net
- **Service Hours:** Mon-Fri: 9am-5pm (EST)

Ask a question about this manual

Ask about setup, troubleshooting, compatibility, parts, safety, or missing instructions. Manuals+ will review the question and use this page's manual context to help answer it.

Name

Anonymous

Email

you@example.com

After a successful submission, we securely hash the supplied account or form email before sending it to Microsoft Advertising for conversion attribution. Privacy details.

Question

Example: How do I reset this device or fix this error?

Details

Model number, symptoms, what you tried, or the section of the manual you are using.

Submit question