

Blackmagic Design CINECAMPOCHDEF6K2

Blackmagic Design Pocket Cinema Camera 6K G2 Instruction Manual

Model: CINECAMPOCHDEF6K2

1. INTRODUCTION

This manual provides essential information for the setup, operation, and maintenance of your Blackmagic Design Pocket Cinema Camera 6K G2. Please read this manual thoroughly before using the camera to ensure proper handling and optimal performance. This camera is designed for professional digital film production, offering advanced features for high-quality video capture.

2. SAFETY INFORMATION

- **Power Supply:** Use only the specified power supply and battery. Incorrect power sources can damage the camera or cause fire.
- **Water and Moisture:** Do not expose the camera to water or high humidity. This camera is not waterproof.
- **Temperature:** Operate the camera within the recommended temperature range (typically 0°C to 40°C / 32°F to 104°F). Avoid extreme heat or cold.
- **Handling:** Handle the camera with care. Avoid dropping or subjecting it to strong impacts.
- **Lens Attachment:** Always ensure the camera is powered off when attaching or detaching lenses to prevent damage to the sensor or lens mount.
- **Cleaning:** Use a soft, dry cloth for cleaning. For the sensor, use specialized cleaning kits and follow manufacturer guidelines.

3. PACKAGE CONTENTS

Verify that all items are present in your package:

- Blackmagic Design Pocket Cinema Camera 6K G2 Body
- DaVinci Resolve Studio Activation Key
- Lens Turret Dust Cap

- Camera Strap
- 30W Power Supply with Locking Connector and International Adapters
- NP-F570 Battery
- NP-F Series Battery USB Charger

4. CAMERA OVERVIEW

The Blackmagic Design Pocket Cinema Camera 6K G2 features a compact design with a Super 35 sensor and an active EF/EF-S lens mount. It includes a large, bright adjustable tilt 5-inch LCD display for monitoring and menu navigation.



Figure 4.1: Angled front view of the Blackmagic Design Pocket Cinema Camera 6K G2, showing the lens mount and grip.



Figure 4.2: Front view of the camera, highlighting the EF/EF-S lens mount and Super 35 sensor.

4.1. Connections and Ports

The camera offers various connectivity options for audio, video output, and data transfer.



Figure 4.3: Detailed view of the camera's side panel, showing various input/output ports.

- **Microphone Input:** Connect consumer microphones or a timecode master clock.
- **3.5mm Headphone Output:** Supports consumer headphones for audio monitoring.
- **Full Size HDMI Connector:** Outputs 1080p up to 60fps as clean feed or with camera data.

- **USB Expansion Port (USB-C):** For recording to external SSD storage or connecting focus demands.
- **12V DC Power:** Main power supply input or for external batteries.
- **XLR Audio Connection:** Two professional balanced Mini XLR audio inputs with phantom power support.



Figure 4.4: Side view of the camera, illustrating the arrangement of the various ports.

4.2. Rear Panel and Controls

The rear panel features the tilting LCD touchscreen and essential control buttons.



Figure 4.5: Rear view of the camera displaying the menu interface on the 5-inch LCD screen.



Figure 4.6: Angled rear view showing the camera's LCD screen tilted for flexible viewing angles.

5. SETUP

5.1. Battery Installation and Charging

1. Open the battery compartment cover located on the bottom of the camera.
2. Insert the NP-F570 battery, ensuring correct orientation. Close the cover securely.
3. To charge, connect the included NP-F series battery USB charger to a power source and attach the battery. Alternatively, connect the camera to the 30W power supply with the battery installed.

5.2. Lens Attachment

1. Ensure the camera is powered off.
2. Remove the lens turret dust cap from the camera body and the rear cap from your EF/EF-S compatible lens.
3. Align the red or white index mark on the lens with the corresponding mark on the camera's lens mount.
4. Gently insert the lens into the mount and rotate it clockwise until it clicks into place.

5.3. Media Card Insertion

The camera supports SD/UHS-II and CFast 2.0 cards, as well as external SSDs via USB-C.

1. Locate the SD card slot and CFast 2.0 card slot on the camera body.
2. Insert the appropriate card into its slot until it clicks. Ensure the card is correctly oriented.
3. For external SSD recording, connect a compatible SSD to the USB-C port.

5.4. Powering On/Off

Press and hold the power button located on the top of the camera until the screen illuminates or turns off.

6. OPERATING THE CAMERA

6.1. Basic Recording

To begin recording, press the red record button on the top of the camera. Press it again to stop recording.



Figure 6.1: Camera menu displaying recording settings such as project frame rate and preferred media.

- **Frame Rates and Resolution:** Navigate the menu on the LCD to select desired frame rates (e.g., 24 fps, 60 fps) and resolutions (up to 6K).
- **File Formats:** The camera supports industry-standard formats like Apple ProRes (up to 4K) and 12-bit Blackmagic RAW. Select your preferred format in the recording settings.

6.2. Focusing and Exposure

- **Focus:** Use the lens's manual focus ring or electronic focus controls if available. The LCD offers focus assist tools.
- **ISO:** Adjust the dual gain ISO up to 25,600 to manage sensitivity in various lighting conditions.
- **Aperture and Shutter Speed:** Control these settings via the camera's physical dials or the touchscreen interface to achieve desired exposure and depth of field.

6.3. Audio Recording

The camera includes a built-in stereo microphone. For professional audio, utilize the mini XLR or 3.5mm inputs for external microphones.

6.4. Monitoring



Figure 6.2: Rear view of the camera displaying live footage with overlays on the LCD screen.

The 5-inch LCD display provides a clear view of your footage and camera settings. It can be tilted for better viewing angles. An external monitor can be connected via the HDMI port.

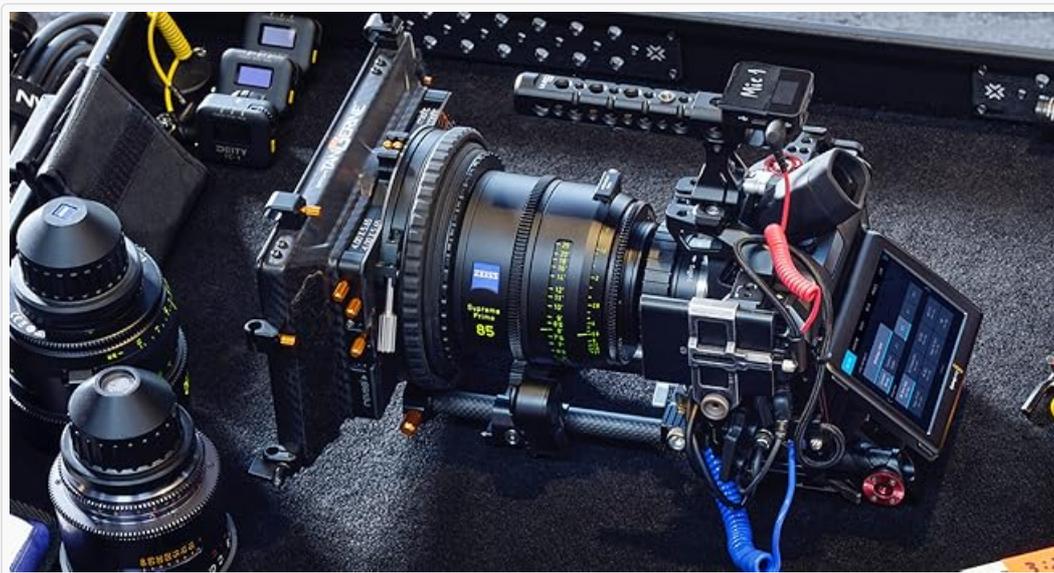


Figure 6.3: The camera's tilting LCD screen in an operational setup, demonstrating its flexibility.

6.5. DaVinci Resolve Studio

Your camera includes an activation key for DaVinci Resolve Studio. This software is a comprehensive solution for editing, color correction, visual effects, and audio post-production. Install and activate it on your computer to process your Blackmagic RAW and ProRes footage.

7. MAINTENANCE

7.1. Cleaning

- **Camera Body:** Wipe with a soft, dry, lint-free cloth. Do not use harsh chemicals or solvents.
- **Lens:** Use a lens brush or air blower to remove dust, then gently clean with a lens cleaning solution and microfiber cloth.
- **Sensor:** Sensor cleaning should be performed with extreme care using a specialized sensor cleaning kit. If unsure, consult a professional.

7.2. Firmware Updates

Periodically check the Blackmagic Design website for firmware updates. Updates can improve performance, add features, and fix bugs. Follow the instructions provided by Blackmagic Design carefully during the update process.

7.3. Storage

When not in use, store the camera in a cool, dry place, away from direct sunlight and extreme temperatures. Use a protective case to prevent dust and physical damage.

8. TROUBLESHOOTING

Problem	Possible Cause	Solution
Camera does not power on	Battery depleted or incorrectly installed; power cable loose.	Charge battery, ensure correct installation. Check power cable connection.
Recording stops unexpectedly	Media card full or too slow; battery low.	Use a faster card (UHS-II, CFast 2.0), free up space, or replace/charge battery.
Poor image quality	Incorrect exposure settings; dirty lens/sensor.	Adjust ISO, aperture, shutter speed. Clean lens or sensor.
No audio recording	Microphone not connected or configured correctly; audio levels too low.	Check microphone connections and camera audio settings. Adjust input levels.

9. SPECIFICATIONS

Key technical specifications for the Blackmagic Design Pocket Cinema Camera 6K G2:



Figure 9.1: Dimensions of the Blackmagic Design Pocket Cinema Camera 6K G2.

Feature	Detail
Model Number	CINECAMPOCHDEF6K2
Sensor Size	Super 35
Native Resolution	6144 x 3456
Dynamic Range	13 Stops
Dual Gain ISO	Up to 25,600
Lens Mount	Active EF/EF-S
Screen Size	5 Inches (Adjustable Tilt LCD)
Storage Media	SD/UHS-II, CFast 2.0, External SSD via USB-C
Video Capture Resolution	6K
Video Capture Format	Apple ProRes, Blackmagic RAW
Audio Format	WAV, BWF
Connectivity	HDMI, USB-C, 3.5mm Audio, Mini XLR Audio, 12V DC
Item Weight	3.8 pounds
Product Dimensions	9.1 x 9.1 x 9.1 inches
Battery	1 Lithium Ion (NP-F570 included)

10. WARRANTY AND SUPPORT

For detailed warranty information and technical support, please refer to the official Blackmagic Design website or

contact their customer service. Keep your proof of purchase for warranty claims.

Online Resources: Visit www.blackmagicdesign.com/support for drivers, manuals, and FAQs.

