

KERUI 16CH-2TB

KERUI 16-Channel 5MP Hybrid 5-in-1 DVR Security Recorder User Manual

Model: 16CH-2TB

1. INTRODUCTION

This manual provides detailed instructions for the installation, operation, and maintenance of your KERUI 16-Channel 5MP Hybrid 5-in-1 DVR Security Recorder. Please read this manual thoroughly before using the product to ensure proper setup and functionality. Keep this manual for future reference.

2. SAFETY INFORMATION

- Ensure the power supply matches the DVR's requirements.
- Do not expose the DVR to water or moisture.
- Avoid placing the DVR in direct sunlight or near heat sources.
- Do not open the DVR casing; refer servicing to qualified personnel.
- Handle the hard drive with care to prevent data loss.

3. PACKAGE CONTENTS

Verify that all items are present in the package:

- 1 x KERUI 16-Channel DVR Recorder
- 1 x 2TB Hard Drive (Pre-installed)
- Power Adapter
- USB Mouse
- User Manual (this document)

4. PRODUCT OVERVIEW

The KERUI 16-Channel DVR is a versatile security recorder supporting various camera types and offering advanced features for surveillance. Below are diagrams illustrating the front and rear panels of the device.



Figure 4.1: Front and Rear Panels of the KERUI 16-Channel DVR. The image shows the DVR unit from the front, highlighting control buttons and USB port, and from the rear, displaying 16 BNC video input ports, audio inputs/outputs, HDMI, VGA, Ethernet, and power connections. A 2TB hard drive is also depicted separately.

Hybrid 5-IN-1 DVR

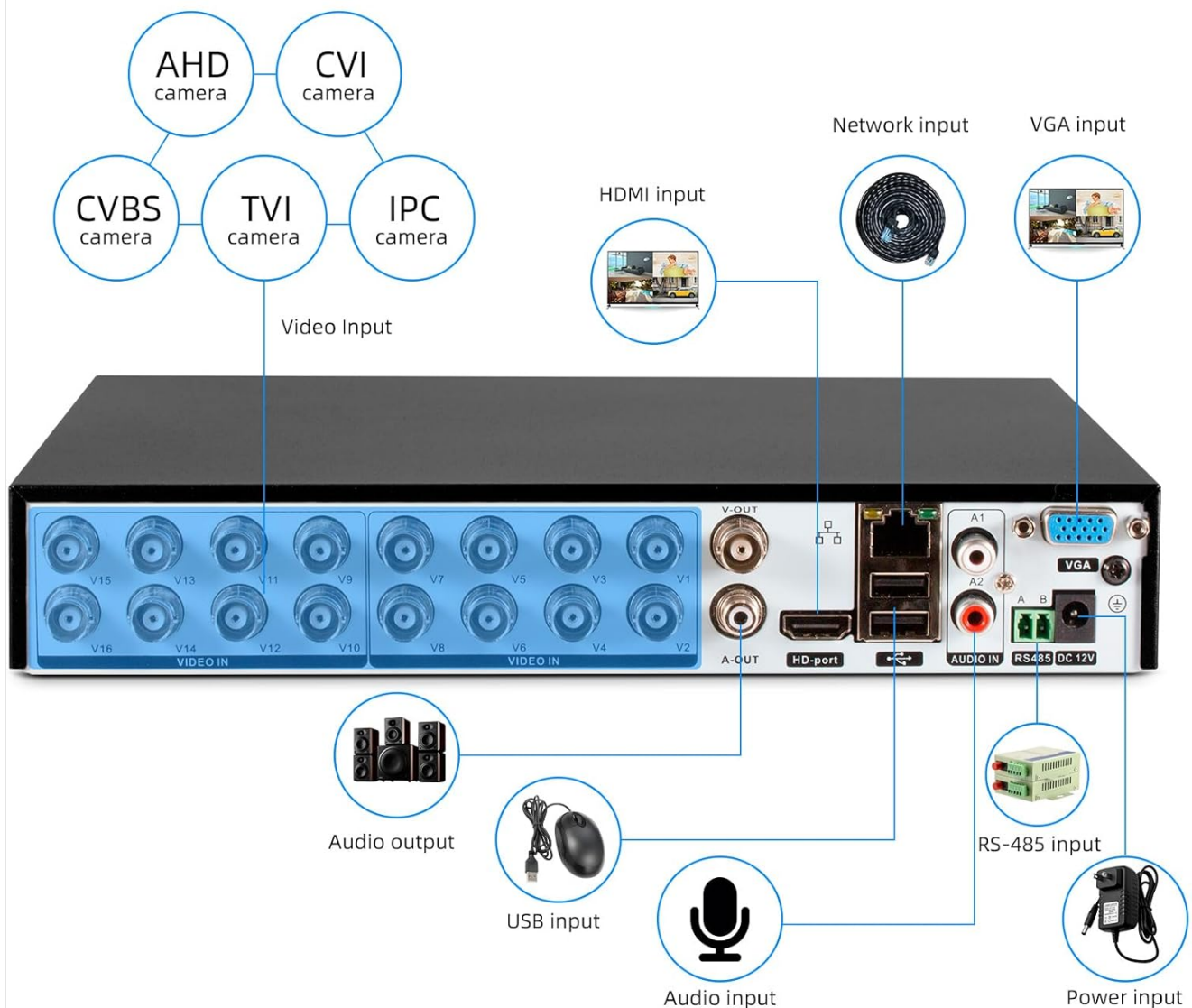


Figure 4.2: Hybrid 5-in-1 DVR Connectivity. This diagram illustrates the various input and output ports on the DVR's rear panel, including video inputs (AHD, CVI, CVBS, TVI, IPC cameras), HDMI output, VGA output, network input, audio input/output, USB input, RS-485 input, and power input. It highlights the DVR's compatibility with multiple camera types.

4.1 Front Panel

- **Power Indicator:** Lights up when the DVR is powered on.
- **Alarm Indicator:** Lights up when an alarm event is triggered.
- **REC Indicator:** Lights up when recording is active.
- **Control Buttons:** Navigation and menu selection.
- **USB Port:** For mouse connection or USB backup devices.

4.2 Rear Panel

- **Video In (BNC):** 16 channels for AHD/TVI/CVI/CVBS analog cameras.
- **Video Out (VGA/HDMI):** Connect to a monitor or TV.
- **Audio In/Out (RCA):** For audio input from microphones and output to speakers.
- **Ethernet (RJ45):** For network connection and IP camera input.

- **USB Ports:** Additional USB ports for peripherals.
- **RS485:** For PTZ camera control.
- **DC 12V:** Power input.

5. SETUP

5.1 Physical Connections

1. **Connect Cameras:** Connect your AHD/TVI/CVI/CVBS analog cameras to the "VIDEO IN" BNC ports (V1-V16) on the rear panel. For IP cameras, ensure they are on the same network as the DVR.
2. **Connect Monitor:** Connect a monitor to the DVR using either the VGA or HDMI port.
3. **Connect Mouse:** Plug the USB mouse into one of the USB ports on the front or rear panel.
4. **Connect Network:** Connect an Ethernet cable from your router/switch to the RJ45 "LAN" port on the DVR.
5. **Connect Power:** Connect the provided power adapter to the "DC 12V" input on the DVR, then plug it into a power outlet. The DVR will power on automatically.

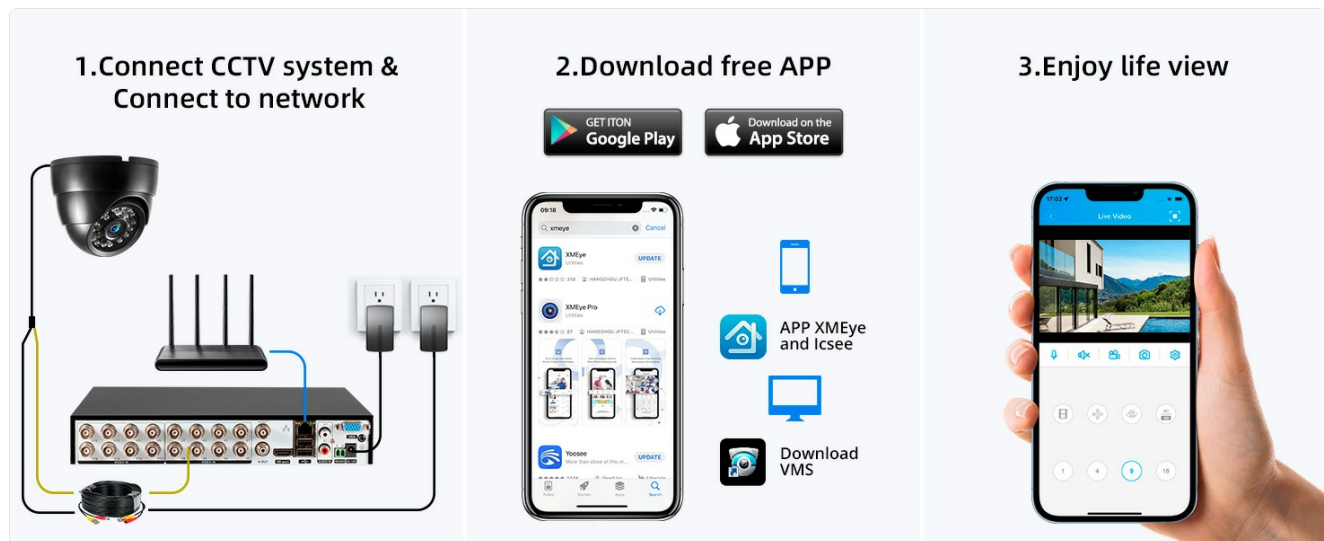


Figure 5.1: Basic DVR System Connection. This image illustrates the connection process: a CCTV camera connected to the DVR, the DVR connected to a router via Ethernet, and the DVR connected to a power source. It also shows the steps for downloading the mobile app and viewing live footage.

5.2 Initial Configuration

Upon first boot, the DVR will guide you through an initial setup wizard. Follow the on-screen prompts to:

- Set up a strong password for the administrator account.
- Configure date and time settings.
- Adjust network settings (DHCP is usually sufficient for most home networks).
- Verify hard drive status. The 2TB hard drive is pre-installed.

Note: It is crucial to set a strong password to protect your system from unauthorized access.

5.3 Hard Drive Management

The DVR comes with a pre-installed 2TB hard drive. This drive is essential for recording video footage. Ensure it is recognized and formatted by the system during initial setup. If you need to expand storage, the DVR supports up to 14TB external HDD.

Expandable Capacity

Worry-Free Backup



Figure 5.3: DVR with Pre-installed 2TB HDD and Expandable Capacity. This image shows the DVR unit with an overlay indicating a pre-installed 2TB HDD and the capability to support up to 14TB external HDD for expanded storage.

6. OPERATING THE DVR

6.1 Live View

After successful setup, the DVR will display the live feed from connected cameras on the monitor. You can switch between single-camera view and multi-camera grid views using the on-screen interface or mouse controls.



Non-stop Recording

Record every second for maximum security

Supports 16 channel live screen



Figure 6.1: 16-Channel Live Screen Display. This image shows a monitor displaying a 16-channel grid view of various surveillance scenes, indicating the DVR's capability for non-stop recording and simultaneous live monitoring of multiple cameras.

6.2 Recording

The DVR supports 24/7 continuous recording and motion-triggered recording.

- **Continuous Recording:** Records footage constantly. This is the default setting.
- **Motion Detection Recording:** Records only when motion is detected in the camera's view. This saves storage space. Configure motion detection zones and sensitivity in the DVR's menu.

The DVR utilizes H.265+ video compression, which significantly reduces file size while maintaining video quality, allowing for longer recording times compared to H.264 systems.

Advanced H.265+ Video Compression



Smooth
viewing



Reduced
memory space



H.265+

H.264

Fluency

100%

Fluency

100%

Storage Space

100%

Storage Space

100%

Figure 6.2: H.265+ vs. H.264 Video Compression. This graphic compares H.265+ and H.264 compression, showing that H.265+ offers 100% fluency and 100% storage space efficiency compared to H.264, which is depicted with lower fluency and higher storage consumption.

6.3 Playback

To review recorded footage:

1. Access the "Playback" menu from the DVR's main interface.
2. Select the desired camera channel and date/time range.
3. Use the timeline to navigate through recorded events. The smart playback feature helps locate human/vehicle events quickly.

AI Motion Face Detection



Figure 6.3: Advanced Smart Playback. This image shows a timeline interface for reviewing recorded footage, with markers indicating events like a person walking by or a vehicle passing, demonstrating the time-saving playback feature.

6.4 Remote Access

The KERUI DVR supports remote viewing via mobile applications (XMEye, Icsee) and PC software (VMS).

1. **Mobile App:** Download "XMEye" or "Icsee" from the App Store (iOS) or Google Play Store (Android). Register an account and add your DVR using its serial number or QR code.
2. **PC Software:** Download the VMS software from the KERUI support website. Install and add your DVR to view footage on your computer.

Remote access allows you to monitor your property anytime, anywhere, and receive intelligent alarm notifications.

Advanced Smart Playback

Never miss any wonderful moment!



Figure 6.4: Free & Easy Remote Access. This image depicts various devices (smartphones, laptops, desktops) accessing live video feeds from the DVR, with logos for App Store, Google Play, XMEye, Icsee, and VMS, illustrating the remote monitoring capabilities.

6.5 Intelligent Alarm System

The DVR features human detection and motion detection capabilities. When an event is detected, the system can:

- Trigger an alarm.
- Send push notifications to your mobile phone via the app.
- Send email alerts.

Configure these settings in the DVR's alarm management menu.

Free & Easy remote access

Monitor Your Property Anytime, Anywhere



Figure 6.5: AI Motion Face Detection. This image shows a surveillance scenario where two individuals are detected by the system, with bounding boxes around them. It highlights features like app push notifications, email alerts, and 99% accuracy for motion detection alarms via the XMEye app.

7. MAINTENANCE

- **Regular Cleaning:** Keep the DVR free from dust. Use a soft, dry cloth to clean the exterior. Do not use liquid cleaners.
- **Hard Drive Health:** Periodically check the hard drive status in the DVR's menu to ensure it is functioning correctly. Back up important footage regularly.
- **Firmware Updates:** Check the KERUI official website for any available firmware updates. Follow the instructions carefully to update the DVR's software, which can improve performance and add new features.
- **Password Security:** Change your DVR password periodically to maintain security.

8. TROUBLESHOOTING

Problem	Possible Cause	Solution
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Problem	Possible Cause	Solution
No video display on monitor.	Loose video cable, incorrect input selected on monitor, DVR not powered on.	Check VGA/HDMI cable connections. Ensure monitor is on correct input. Verify DVR power.
Cameras not showing video.	Camera power issue, faulty cable, incompatible camera type.	Check camera power supply. Inspect BNC cables. Ensure cameras are compatible (AHD/TVI/CVI/CVBS/IP). Refer to compatibility notes in product specifications.
Cannot access DVR remotely.	Network issue, incorrect app settings, firewall blocking.	Verify DVR has internet access. Check app settings (device ID, password). Ensure router firewall is not blocking ports (if manual port forwarding is used).
No recording.	Hard drive not initialized/formatted, recording schedule not set, hard drive full.	Check hard drive status in DVR menu. Ensure recording schedule is active. Format hard drive if necessary (this will erase all data).

9. SPECIFICATIONS

- **Brand:** KERUI
- **Model:** 16CH-2TB
- **Number of Channels:** 16
- **Connectivity Technology:** Wired
- **Video Capture Resolution:** 1080p (supports up to 5MP input)
- **Special Features:** 24/7 Recording, Human Detection, Remote Access
- **Memory Storage Capacity:** 2 TB (pre-installed)
- **Compatible Devices:** AHD/TVI/CVI/CVBS/IP Analog Cameras
- **Frame Rate:** 20fps (for 5MP), 15fps (for 4MP/1080P)
- **Recording Mode:** Continuous, Motion Detection
- **Hardware Interface:** Ethernet, BNC, RJ45
- **Video Input:** BNC, RJ45
- **Item Weight:** 2.61 pounds
- **Package Dimensions:** 10 x 8.54 x 1.57 inches

Compatibility Note: When connecting cameras, ensure compatibility based on the following parameters:



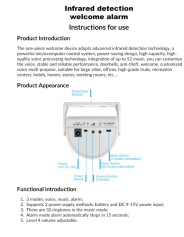
- DVR supports 16*5MP@20fps (frame rate not exceeding 20, resolution not exceeding 5MP, 6-in-1 camera types).
- DVR supports 16*4MP@15fps (frame rate not exceeding 15, resolution not exceeding 4MP, 6-in-1 camera types).
- DVR supports 16*1080P@15fps (XVI) (frame rate not exceeding 15, resolution not exceeding 1080P, 6-in-1 camera types).

10. WARRANTY AND SUPPORT

For warranty information and technical support, please refer to the official KERUI website or contact their customer service. Keep your purchase receipt as proof of purchase.

For further assistance, you may visit the [KERUI Store](#) on [Amazon](#).

Related Documents - 16CH-2TB

	<p>Smart WiFi PT Indoor Camera JS-K259 - Features and Specifications</p> <p>Explore the features and technical specifications of the KERUI JS-K259 Smart WiFi PT Indoor Camera, including its 5MP HD video, intelligent auto-tracking, 2.4GHz WiFi, local and cloud storage options, and included accessories.</p>
	<p>KERUI M116-2E Wireless Infrared Pet-Immunity Detector User Manual</p> <p>User manual for the KERUI M116-2E Wireless Infrared Pet-Immunity Detector. Features include pet immunity, adjustable detection distance, RF alarm signal, and easy installation. Learn about installation, operation, and technical specifications.</p>
	<p>Guía Completa de la Alarma Kerui W18: Instalación y Configuración</p> <p>Descubre cómo instalar, configurar y usar tu sistema de alarma Kerui W18. Aprende sobre sus funciones WiFi, GSM, sensores y modos de operación para una seguridad integral en el hogar.</p>
	<p>KERUI M520 F55 User Manual Overview and FCC Statement</p> <p>An overview of the KERUI M520 F55 user manual, which includes Chinese instructions and diagrams, alongside the full FCC compliance statement in English.</p>
	<p>KERUI WD61 Water Leak Detector User Manual</p> <p>User manual for the KERUI WD61 Water Leak Detector, detailing its features, installation, usage, and specifications. Learn how to set up and use this device to detect water leaks and receive alerts.</p>
	<p>KERUI M5 Infrared Detection Welcome Alarm User Manual</p> <p>User manual for the KERUI M5 Infrared Detection Welcome Alarm. Learn about its features, installation, operation, and technical specifications for home, shop, and office security.</p>

