

Panasonic®

Owner's Manual <Quick Start Guide>

4K Video Camera

Manuel d'utilisation <Guide de prise en main rapide>

Caméra vidéo 4K

Model No. / Modèle

HC-X2/HC-X20



Please read these instructions carefully before using this product, and save this manual for future use.

Veuillez lire attentivement les présentes instructions avant d'utiliser ce produit, et conserver ce manuel pour utilisation ultérieure.

More detailed operating instructions are available in "Owner's Manual <Complete Guide>" (HTML format/PDF format). This can be viewed with a PC or smartphone.

Un manuel d'utilisation plus détaillé est disponible en "Manuel d'utilisation <Guide complet>" (Format HTML/format PDF). Il peut être visionné à l'aide d'un PC ou d'un smartphone.

<https://panasonic.jp/support/video/oi/X2/index.html>



Register online at <http://shop.panasonic.com/support/register> (U.S. customers only)

If you have any questions, visit :

U.S.A. : <http://shop.panasonic.com/support>

Canada : www.panasonic.ca/english/support

Pour toute assistance supplémentaire, visiter :

www.panasonic.ca/french/support

Safety Precautions

Dear Customer,

Thank you for choosing Panasonic!

You have purchased one of the most sophisticated and reliable products on the market today. Used properly, we're sure it will bring you and your family years of enjoyment. Please take time to fill in the information on the right.

The serial number is on the tag located on the back of your camera. Be sure to **retain this manual** as your convenient camera information source.

Date of Purchase _____

Dealer Purchased From _____

Dealer Address _____

Dealer Phone No. _____

Model No. _____

Serial No. _____

U.S.A./CANADA CONSUMERS: ATTENTION:



A lithium ion battery that is recyclable powers the product you have purchased. Please call 1-800-8-BATTERY for information on how to recycle this battery.

WARNING:

To reduce the risk of fire, electric shock or product damage,

- Do not expose this unit to rain, moisture, dripping or splashing.
- Do not place objects filled with liquids, such as vases, on this unit.
- Use the recommended accessories.
- Do not remove covers.
- Do not repair this unit by yourself. Refer servicing to qualified service personnel.

CAUTION!

To reduce the risk of fire, electric shock or product damage,

- Do not install or place this unit in a bookcase, built-in cabinet or in another confined space. Ensure this unit is well ventilated.
- Do not obstruct this unit's ventilation openings with newspapers, tablecloths, curtains, and similar items.
- Do not place sources of naked flames, such as lighted candles, on this unit.

Certification and Compliance

See Camera for the certification and compliance mark specific to that device.

- 1 Press the <MENU> button.**
- 2 Select the [OTHERS] menu.**
- 3 Select the [APPROVED REGULATION] menu.**

THE FOLLOWING APPLIES ONLY IN THE U.S.A.

FCC Note:

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

FCC Caution:

- Any unauthorized changes or modifications to this equipment would void the user's authority to operate this device.
- To assure continued compliance, follow the attached installation instructions and use only shielded interface cables with ferrite core when connecting to computer or peripheral devices.

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

Supplier's Declaration of Conformity

Trade Name:	Panasonic
Model No.:	HC-X2/HC-X20
Responsible Party:	Panasonic Corporation of North America Two Riverfront Plaza, Newark, NJ 07102-5490
Support Contact:	http://shop.panasonic.com/support

THE FOLLOWING APPLIES ONLY IN CANADA.

CAN ICES-003(B) / NMB-003(B)

THE FOLLOWING APPLIES ONLY IN THE U.S.A.

Contains FCC ID: VPYLB1JS955

This transmitter must not be co-located or operated in conjunction with any other antenna or transmitter.

This equipment complies with FCC radiation exposure limits set forth for an uncontrolled environment and meets the FCC radio frequency (RF) Exposure Guidelines as this equipment has very low levels of RF energy.

THE FOLLOWING APPLIES ONLY IN CANADA.

Contains IC: 772C-LB1JS955

This device contains licence-exempt transmitter(s)/receiver(s) that comply with Innovation, Science and Economic Development Canada's licence-exempt RSS(s). Operation is subject to the following two conditions:

- (1) This device may not cause interference.
- (2) This device must accept any interference, including interference that may cause undesired operation of the device.

The available scientific evidence does not show that any health problems are associated with using low power wireless devices. There is no proof, however, that these low power wireless devices are absolutely safe. Low power Wireless devices emit low levels of radio frequency energy (RF) in the microwave range while being used. Whereas high levels of RF can produce health effects (by heating tissue), exposure of low-level RF that does not produce heating effects causes no known adverse health effects. Many studies of low-level RF exposures have not found any biological effects. Some studies have suggested that some biological effects might occur, but such findings have not been confirmed by additional research. HC-X2/ HC-X20 (HMN is 1JS2099) has been tested and found to comply with ISED radiation exposure limits set forth for an uncontrolled environment and meets RSS-102 of the ISED radio frequency (RF) Exposure rules.

■ Concerning the AC adaptor

AC adaptor

This AC adaptor operates on AC between 100 V and 240 V.

But

- In the U.S.A. and Canada, the AC adaptor must be connected to a 120 V AC power supply only.
- When connecting to an AC supply outside of the U.S.A. or Canada, use a plug adaptor to suit the AC outlet configuration.
- When connecting to a supply of greater than AC 125 V, ensure the cord you use is suited to the voltage of the AC supply and the rated current of the AC adaptor.
- Contact an electrical parts distributor for assistance in selecting a suitable AC plug adaptor or AC cord set.

The power plug is the disconnecting device. Install this unit so that the power plug can be unplugged from the socket outlet immediately.

This unit is intended for use in moderate climates.

■ Concerning the battery

Battery pack (Lithium ion battery pack)

- Use the specified unit to recharge the battery pack.
- Do not use the battery pack with equipment other than the specified unit.
- Do not get dirt, sand, liquids, or other foreign matter on the terminals.
- Do not touch the plug terminals (+ and -) with metal objects.
- Do not disassemble, remodel, heat or throw into fire.

If any electrolyte should come into contact with your hands or clothes, wash it off thoroughly with water.

If any electrolyte should come into contact with your eyes, never rub the eyes. Rinse eyes thoroughly with water, and then consult a doctor.

Warning

Risk of fire, explosion and burns. Do not disassemble, heat above 60 °C (140 °F) or incinerate.

CAUTION

- Danger of explosion if battery is incorrectly replaced. Replace only with the type recommended by the manufacturer.
- When disposing of the batteries, please contact your local authorities or dealer and ask for the correct method of disposal.

■ Product Identification Marking

Product	Location
4K Video Camera	Bottom
AC adaptor	Bottom
Battery charger	Bottom

Cautions for use

Keep this unit as far away as possible from electromagnetic equipment (such as microwave ovens, TVs, video games etc.).

- If you use this unit on top of or near a TV, the pictures and/or sound on this unit may be disrupted by electromagnetic wave radiation.
- Do not use this unit near cell phones because doing so may result in noise adversely affecting the pictures and/or sound.
- Recorded data may be damaged, or pictures may be distorted, by strong magnetic fields created by speakers or large motors.
- Electromagnetic wave radiation generated by microprocessors may adversely affect this unit, disturbing the pictures and/or sound.
- If this unit is adversely affected by electromagnetic equipment and stops functioning properly, turn this unit off and remove the battery or disconnect AC adaptor. Then reinsert the battery or reconnect AC adaptor and turn this unit on.

Do not use this unit near radio transmitters or high-voltage lines.

If you record near radio transmitters or high-voltage lines, the recorded pictures and/or sound may be adversely affected.

When this unit is turned on, do not use it in direct contact with the skin for a long period of time.

- When using this unit for a long period of time, use a support such as a tripod. Low temperature burns may result if any high temperature part of this unit or hot air from the ventilation openings on the front side of the hand strap of this unit is in direct contact with the skin for a long period of time.

Caution regarding the lens and the viewfinder

- Do not aim the lens or the viewfinder at the sun or strong light. Doing so may cause the unit to malfunction.

Before using the unit

The date and time have not been set at the time of purchase. Before use, make sure you set the clock and time zone so that date and time information is correctly recorded. (→ 22)

- When using this product during rain or snow or when at the beach, be careful that water, sand and/or dust do not get inside the camera.
- Clips recorded with devices other than this unit are not supported by this unit.
- Hold the handle or grip when carrying the camera, and handle it carefully.

- If you prepare to record important images, always shoot some advance test footage to verify that both pictures and sound are being recorded normally.

Battery

- Always remove the battery from the unit after use.

LCD monitor and viewfinder

- The LCD monitor and viewfinder are managed with high precision so that at least 99.99 % of the dots are effective pixels and 0.01 % or less are invalid pixels and always lit. This is not a malfunction and it has no effect whatsoever on the recorded images.

Memory cards

The SD cards can be used with the camera.

- Do not perform the following operations when accessing the memory card (the card 1 access lamp/card 2 access lamp is flashing in orange).
 - Removing the memory card
 - Disconnecting battery or the AC adaptor without turning off the main unit
 - Apply vibration or impact
- Keep the memory card out of reach of children to prevent swallowing.




❖ Speed Class during shooting

The memory card to use differs depending on the file format and the recording format.

Use memory cards compatible with the Speed Class or UHS Speed Class.

The recording may stop suddenly when a memory card not compatible with the required Speed Class is used.

Speed Class and UHS Speed Class are the speed specification regarding continuous writing. Check the display on the label and other information on the memory card.

File format	Recording bit rate or recording function	Supported memory cards and Speed Classes	Example of card display
MOV/MP4	200 Mbps, 150 Mbps, 100 Mbps, Super slow recording, VFR recording	<ul style="list-style-type: none"> SDXC memory card with UHS Speed Class 3 	
	72 Mbps, 50 Mbps	<ul style="list-style-type: none"> SDXC memory card with UHS Speed Class 1 or better SDXC memory card with Speed Class 10 	
AVCHD	All	<ul style="list-style-type: none"> SDHC/SDXC memory card with Speed Class 4 or better 	

Using commercially-available products

- When using a commercially-available USB cable, use a USB Type-C cable that conforms with USB3.1 and that is a shielded product with a ferrite core. We recommend using a cable that is within 1.5 m (approx. 4.9 feet) where possible.
- Use a commercially-available Premium High Speed HDMI cable.
- Use a commercially-available 5C-FB or equivalent double-shielded cable for the BNC cable.
- For the cable that connects to the <LAN> terminal, use the one below.
 - LAN cable (STP (Shielded Twisted Pair), category 5e or above, maximum 100 m (approx. 328 feet))
- You can remotely control some of the camera's functions by connecting a remote control unit (commercially-available) to the <REMOTE> terminal.

About using a headphone

- Excessive sound pressure from earphones and headphones can cause hearing loss.
- Listening at full volume for long periods may damage the user's ears.

Exemption of liability

Panasonic is not liable in any way regarding following.

- 1 Incidental, special, or consequential damages caused directly or indirectly by the unit
- 2 Damages, breakage of the unit, etc., caused by misuse or carelessness of the customer
- 3 When disassembly, repair, or modification of the unit is performed by the customer
- 4 Inconveniences, damnification, or damages by not being able to record and/or display the video due to any reasons including failure or malfunction of the unit and recording media
- 5 Inconveniences, damnification, or damages resulting from malfunction of the system combining with any third party equipment
- 6 A liability claim or any claim for a privacy violation by an individual or a group that was the subject of the video that the customer has shot (including recording) that became public by any reason (including using with the network user authentication turned OFF)
- 7 The registered information is lost due to any reason (including initializing this unit because the authentication information such as user name or password is forgotten)



Be careful with regard to copyrights

Under copyright law, you may not use the images and audio you have recorded for other than personal enjoyment without the permission of the copyright holder.

How to read this document

Models described in this owner's manual

- The illustrations of the products, menu screens, etc., may differ from the actual items. Unless specifically stated otherwise, screen depictions and illustrations of the unit are of HC-X2.
- Not all models may be available depending on the region of purchase.
- Model numbers are abbreviated as follows in this owner's manual:

Model number	Abbreviation used in this owner's manual	
HC-X2		[X2]
HC-X20		[X20]

Conventions used in this manual

- Words and phrases in [] brackets indicate content displayed in the LCD monitor.
- Words and phrases in < > brackets indicate design text used on this unit, such as button names.

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Preparations before recording

Accessories

Check the accessories before using this unit.

Product numbers correct as of August 2022. These may be subject to change.

Battery pack

AG-VBR59

(This is referred to as battery pack or battery in this document.)

Battery charger

AG-BRD50^{*1}

AC adaptor

SAE0011D

AC cable

- For AC adaptor
K2CA2YY00259

Lens hood^{*2}

X2 1YE19R12S1Z

X20 1YE4R12S0Z

Eye cup

DVYE1237Z

INPUT terminal cap

(x2)

VJF1468



1AC2HCX2500Y

Microphone holder



Microphone holder mounting screws^{*3}



1PP1HCX2500Y

- Length 12 mm (0.47 ") (x2)

^{*1} The AG-BRD50 is available for purchase as an optional accessory package containing a battery charger, AC adaptor, and AC cable.

Individual battery chargers are sold under the model number SAB0002A. Contact your dealer to purchase them.

^{*2} Pre-attached to the main unit.

^{*3} The microphone holder mounting screws are supplied with the microphone holder.

- Appropriately discard the AC cable cap (if attached) and packing materials after taking the product out.
- Keep the microphone holder mounting screws and INPUT terminal cap out of reach of children to prevent swallowing.

Description of parts

For "Description of parts", refer to "Owner's Manual <Complete Guide>".

https://panasonic.jp/support/av/cam/x2e_01.html



Attaching accessories

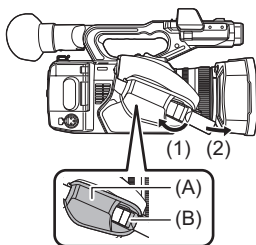
Adjusting the grip belt

- Adjust the grip belt so that it fits the size of your hand.
- If the buckle is difficult to tighten, move the pad forward and tighten the buckle again.

(A) Pad

(B) Buckle

- 1 Open the buckle.**
- 2 Pull the end of the belt.**



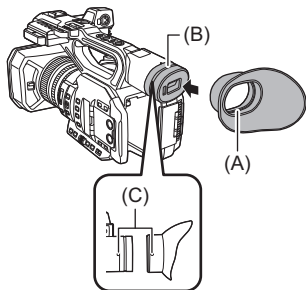
Attaching the eye cup

- 1 Align the mounting mark on the eye cup with the mounting mark on the eye cup mount.**

(A) Ridge

(B) Groove

(C) Mounting mark



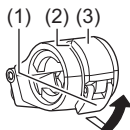
2 Attach the eye cup so that the ridge inside it is aligned with the groove on the eye cup mount.

Push the eye cup in until it reaches the mounting mark.

Attaching the external microphone

1 Open the microphone holder.

Open buckle (1), and detach fitting (2) from hook (3).

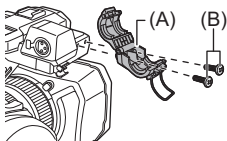


2 Attach the microphone holder to the microphone holder mounting section.

(A) Microphone holder

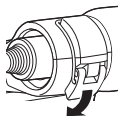
(B) Microphone holder mounting screws

- Attach using a commercially-available screwdriver.
- There will be some rubbing noises with the rubber when screwing in the microphone holder mounting screws, but please ensure they are done up tightly.



3 Attach the external microphone to the microphone holder, then close the buckle to secure the external microphone.

Attach the fitting to the hook and close the buckle in the direction indicated by the arrow.



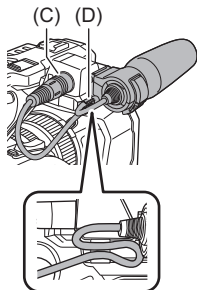
4 Connect the microphone cable to the <AUDIO INPUT1> terminal.

(C) <AUDIO INPUT1> terminal

(D) Microphone cable clamp

When wiring the microphone cable, use the microphone cable clamp of this unit.

- Remove the microphone cable from the <AUDIO INPUT1> terminal while pushing the lever.



Power supply

A battery or the supplied AC adaptor can be used as the power supply for the unit.

- The unit is compatible to following batteries. (As of August 2022)
 - AG-VBR59 (supplied/optional, supports quick charging)
 - AG-VBR89/AG-VBR118 (optional, supports quick charging)
- Use the supplied AC adaptor. Do not use the AC adaptor of another device.
- The supplied AC cable is dedicated for this unit. Do not use with any other device. Also, do not use AC cable from other device on this unit.

❖ Charging the battery

The battery is not charged at the time of purchase. Use only after charging sufficiently. It is recommended that you have one extra battery.

- It is recommended to perform charging of the battery in a location with ambient temperature of 10 °C to 30 °C (50 °F to 86 °F) (same for the battery temperature).

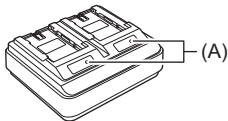
About the Battery Charger

This unit can charge two battery packs simultaneously and supports quick charging batteries.

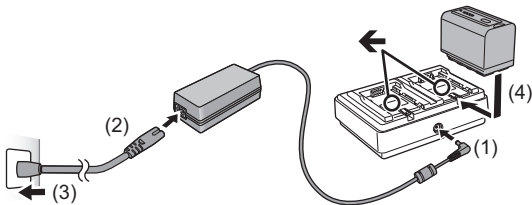
(A) CHARGE indicators <CHARGE1/CHARGE2>

Indicate the charge status as follows.

Indicator	Charge status
Lit green	Quick charging is in progress.
Lit orange	Normal charging is in progress.
Blinking orange	Charging has stopped due to an error.
Off	Charging is complete, or a battery pack is not inserted.



❖ Charging the battery



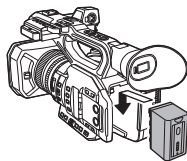
- 1 Connect the DC plug of the AC adaptor to the DC IN 12 V connector of battery charger.**
- 2 Connect the AC mains lead to the AC adaptor.**
 - Perform step (2) first, and then step (3). Insert the AC mains lead all the way in until it stops.
- 3 Insert the battery into the battery charger.**
 - Slide the battery horizontally into the battery charger along the "←" mark.
 - The corresponding CHARGE indicator lights and charging starts.
 - The CHARGE indicator turns off when charging is complete. Slide the battery to remove it.

- Do not use any other AC adaptors except the supplied one.
- We recommend using Panasonic batteries (→ 18).
- If you use other batteries, we cannot guarantee the quality of this product.
- Do not heat or expose to flame.
- Do not leave the battery(ies) in a car exposed to direct sunlight for a long period of time with doors and windows closed.
- Do not expose to low air pressure at high altitudes.
- Do not expose to extremely low air pressure, as this may result in explosions or leakage of flammable liquids and gases.
- The battery charger will determine the status of the battery after the battery is mounted. Therefore, it may take some time until the charging lamp is to illuminate. Mount the battery again if the charging lamp does not illuminate after ten seconds or longer has elapsed.
- Mount the battery to be charged prioritized on the <CHARGE1> side when charging.

Attaching and removing the battery

1 Install the battery by inserting it in the direction shown in the figure.

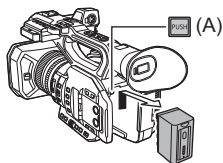
- Insert the battery until it clicks and locks.



❖ Removing the battery

Make sure that the power switch is set to <OFF> and the status indicator is turned off, and then remove by holding onto it taking care not to drop. (→ 21)

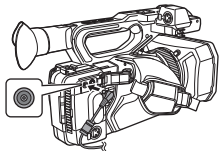
- While pressing the battery release button (A), remove the battery.



Connecting to the AC outlet

By connecting an AC adaptor to the <DC IN 12V> terminal on this unit and switching on the power of the unit, you can use it while it is being supplied with power from the power outlet.

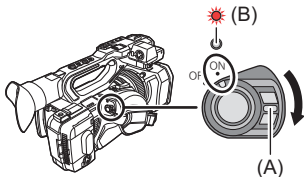
- Even when you use the AC adaptor for recording images, keep the battery connected. This allows you to continue the recording even if a power failure occurs or the AC adaptor is unplugged from the AC outlet by accident.
- The AC adaptor is in the standby condition when the mains plug is connected. The primary circuit is always “live” as long as the mains plug is connected to an electrical outlet.



Turning the unit on/off

- 1 **Set the power switch to <ON> while pressing the lock release button (A) to turn on the unit.**

- The status indicator (B) lights on.



❖ To turn off the unit

Set the power switch to <OFF> while pressing the lock release button. The status indicator goes off.

- To turn on the power again after [ECO MODE] functions, first switch the power switch to <OFF>, then switch it back to <ON>.

When turning on the power for the first time

The time zone, date, and time are not set when the unit is shipped.

[TIME ZONE] is displayed in the LCD monitor when the power is turned on for the first time.

Follow the guidance and make the settings in the order of [TIME ZONE] and then [CLOCK SETTING].

❖ [TIME ZONE]

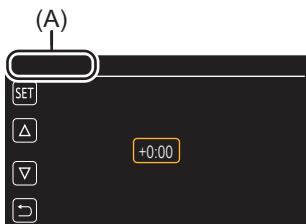
Set the time difference from the Greenwich Mean Time.

(A) [TIME ZONE]

1 Set the time difference.

2 Select [SET].

Once the setting for [TIME ZONE] is completed, the [CLOCK SETTING] screen is displayed.



- The setting for the date/time of the main unit changes together with the time zone settings.

❖ [CLOCK SETTING]

Set the year, month, date, and time.

(A) [CLOCK SETTING]

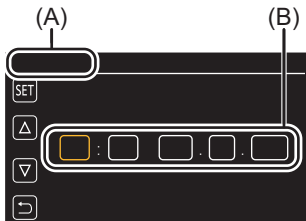
(B) 0 : 0 JAN. 1. 2022

1 Set the year, month, date, and time.

The year can be set between 2021 and 2037.

2 Select [SET].

Once the setting is complete, the camera image screen is displayed.



Main specifications

Power	7.28 V \equiv (when battery is used) 12 V \equiv (when the AC adaptor is used)
Power consumption	X2 20.6 W (when the LCD monitor is used) X20 18.5 W (when the LCD monitor is used)
Ambient operating temperature	0 °C to 40 °C (32 °F to 104 °F)
Ambient operating humidity	10 % to 80 % (relative humidity, no condensation)
Mass (Weight)	X2 Approx. 2040 g (4.50 lbs.) ^{*1} /Approx. 2490 g (5.49 lbs.) ^{*2} X20 Approx. 2000 g (4.41 lbs.) ^{*1} /Approx. 2430 g (5.36 lbs.) ^{*2} ^{*1} Main unit only (including grip belt), excluding lens hood, battery, and supplied accessories ^{*2} Including lens hood, supplied battery, eye cup, 2 SD cards, microphone holder and 2 INPUT terminal caps
External dimensions (W×H×D)	X2 173 mm×195 mm×344 mm (6.82 "×7.68 "×13.55 ") X20 171 mm×195 mm×343 mm (6.74 "×7.68 "×13.51 ") Including lens hood, excluding eye cup and microphone holder
Pickup device	1.0 " MOS solid-state image sensing device for colors Total pixels: approx. 20,920,000 pixels
Number of effective pixels	Approx. 15,030,000 pixels
Lens	Optical image stabilizer lens, motorized 20× zoom F value: F2.8 to F4.5 Focal length: f=8.8 mm to 176 mm 35 mm conversion: f=24.5 mm to 490 mm
Filter diameter	67 mm

USB terminal	USB Type-C®×1, USB3.1 Gen1, Host/device combined (switched with menu) Device: USB mass storage functionality (read only) Host: Supports bus power (5 V, 0.9 A) <div style="border: 1px solid black; padding: 2px; display: inline-block;">X2</div> USB tethering functionality <div style="border: 1px solid black; padding: 2px; display: inline-block;">X20</div> USB ethernet adaptor functionality
LCD monitor	3.5 " LCD monitor: approx. 2,760,000 dots
Viewfinder	0.39 " OLED (organic EL display): approx. 2,360,000 dots Video display area: approx. 1,770,000 dots

Wi-Fi

Compliance standard	IEEE802.11b/g/n compliant
Frequency range used (central frequency)	2412 MHz to 2462 MHz [1 to 11ch]
Encryption method	Wi-Fi compliant WPA™ / WPA2™
Access method	Infrastructure mode

AC adaptor


Power source	100 V – 240 V \sim 50 Hz/60 Hz, 1.2 A 79 VA (100 V \sim) – 99 VA (240 V \sim)
Power output	12 V \equiv 3.0 A

Battery charger

Input voltage	12 V \equiv 3.0 A
Output voltage	8.4 V \equiv 4.0 A

Battery pack (AG-VBR59)**Voltage/capacity** 7.28 V  5900 mAh 43 Wh

The symbols on this product (including the accessories) represent the following:

 AC DC Class II equipment (The construction of the product is double-insulated.)

Trademark

- SDXC logo is a trademark of SD-3C, LLC.
- “AVCHD”, “AVCHD Progressive” and the “AVCHD Progressive” logo are trademarks of Panasonic Holdings Corporation and Sony Corporation.
- Manufactured under license from Dolby Laboratories. Dolby, Dolby Audio, and the double-D symbol are trademarks of Dolby Laboratories Licensing Corporation.
- The terms HDMI and HDMI High-Definition Multimedia Interface, and the HDMI Logo are trademarks or registered trademarks of HDMI Licensing Administrator, Inc. in the United States and other countries.
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Limited Warranty (ONLY FOR U.S.A.)

Panasonic Products Limited Warranty

Limited Warranty Coverage (For USA Only)

If your product does not work properly because of a defect in materials or workmanship, Panasonic Corporation of North America (referred to as “the warrantor”) will, for the length of the period indicated on the chart below, which starts with the date of original purchase (“warranty period”), at its option either (a) repair your product with new or refurbished parts, (b) replace it with a new or a refurbished equivalent value product, or (c) refund your purchase price. The decision to repair, replace or refund will be made by the warrantor.

Product or Part Name	Parts	Labor
4K Video Camera	1 Year	90 Days
All included Accessories (Except Non-Rechargeable Batteries)	90 Days	Not Applicable
Only Non-Rechargeable Batteries	10 Days	Not Applicable

During the “Labor” warranty period there will be no charge for labor. During the “Parts” warranty period, there will be no charge for parts. This Limited Warranty excludes both parts and labor for non-rechargeable batteries, antennas, and cosmetic parts (cabinet). This warranty only applies to products purchased and serviced in the United States. This warranty is extended only to the original purchaser of a new product which was not sold “as is”.

Mail-In Service--Online Repair Request

Online Repair Request

To submit a new repair request and for quick repair status visit our Web Site at <http://shop.panasonic.com/support>.

When shipping the unit, carefully pack, include all supplied accessories listed in the Owner’s Manual, and send it prepaid, adequately insured and packed well in a carton box. When shipping Lithium Ion batteries please visit our Web Site at <http://shop.panasonic.com/support> as Panasonic is committed to providing the most up to date information. Include a letter detailing the complaint, a return address and provide a daytime phone number where you can be reached. A valid registered receipt is required under the Limited Warranty.

IF REPAIR IS NEEDED DURING THE WARRANTY PERIOD, THE PURCHASER WILL BE REQUIRED TO FURNISH A SALES RECEIPT/PROOF OF PURCHASE INDICATING DATE OF PURCHASE, AMOUNT PAID AND PLACE OF PURCHASE. CUSTOMER WILL BE CHARGED FOR THE REPAIR OF ANY UNIT RECEIVED WITHOUT SUCH PROOF OF PURCHASE.

Limited Warranty Limits And Exclusions

This warranty ONLY COVERS failures due to defects in materials or workmanship, and DOES NOT COVER normal wear and tear or cosmetic damage. The warranty ALSO DOES NOT COVER damages which occurred in shipment, or failures which are caused by products not supplied by the warrantor, or failures which result from accidents, misuse, abuse, neglect, mishandling, misapplication, alteration, faulty installation, set-up adjustments, misadjustment of consumer controls, improper maintenance, power line surge, lightning damage, modification, introduction of sand, humidity or liquids, or rental use of the product, or service by anyone other than a Factory Service Center or other Authorized Servicer, or damage that is attributable to acts of God.

THERE ARE NO EXPRESS WARRANTIES EXCEPT AS LISTED UNDER "LIMITED WARRANTY COVERAGE".

THE WARRANTOR IS NOT LIABLE FOR INCIDENTAL OR CONSEQUENTIAL DAMAGES RESULTING FROM THE USE OF THIS PRODUCT, OR ARISING OUT OF ANY BREACH OF THIS WARRANTY.

(As examples, this excludes damages for lost time, travel to and from the servicer, loss of or damage to media or images, data or other memory or recorded content. The items listed are not exclusive, but for illustration only.)

ALL EXPRESS AND IMPLIED WARRANTIES, INCLUDING THE WARRANTY OF MERCHANTABILITY, ARE LIMITED TO THE PERIOD OF THE LIMITED WARRANTY.

Some states do not allow the exclusion or limitation of incidental or consequential damages, or limitations on how long an implied warranty lasts, so the exclusions may not apply to you.

This warranty gives you specific legal rights and you may also have other rights which vary from state to state. If a problem with this product develops during or after the warranty period, you may contact your dealer or Service Center. If the problem is not handled to your satisfaction, then write to:

Panasonic Corporation of North America
Consumer Affairs Department 8th Fl.
Two Riverfront Plaza
Newark NJ 07102-5490

PARTS AND SERVICE, WHICH ARE NOT COVERED BY THIS LIMITED WARRANTY, ARE YOUR RESPONSIBILITY.

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For the hearing or speech impaired TTY: 1- 877-833-8855

As of November 2021

Warranty (For Canadian Customers)

Panasonic Canada Inc.

5770 Ambler Drive, Mississauga, Ontario L4W 2T3

PANASONIC PRODUCT – LIMITED WARRANTY

Panasonic Canada Inc. warrants this product to be free from defects in material and workmanship under normal use and for a period as stated below from the date of original purchase agrees to, at its option either (a) repair your product with new or refurbished parts, (b) replace it with a new or a refurbished equivalent value product, or (c) refund your purchase price. The decision to repair, replace or refund will be made by Panasonic Canada Inc.

Camcorder Products - One (1) year, parts and labour

This warranty is given only to the original purchaser, or the person for whom it was purchased as a gift, of a Panasonic brand product mentioned above sold by an authorized Panasonic dealer in Canada and purchased and used in Canada, which product was not sold “as is”, and which product was delivered to you in new condition in the original packaging.

IN ORDER TO BE ELIGIBLE TO RECEIVE WARRANTY SERVICE HEREUNDER, A PURCHASE RECEIPT OR OTHER PROOF OF DATE OF ORIGINAL PURCHASE, SHOWING AMOUNT PAID AND PLACE OF PURCHASE IS REQUIRED

LIMITATIONS AND EXCLUSIONS

This warranty ONLY COVERS failures due to defects in materials or workmanship, and DOES NOT COVER normal wear and tear or cosmetic damage. The warranty ALSO DOES NOT COVER damages which occurred in shipment, or failures which are caused by products not supplied by Panasonic Canada Inc., or failures which result from accidents, misuse, abuse, neglect, mishandling, misapplication, alteration, faulty installation, set-up adjustments, misadjustment of consumer controls, improper maintenance, improper batteries, power line surge, lightning damage, modification, introduction of sand, humidity or liquids, or rental use of the product, or service by anyone other than an Authorized Servicer, or damage that is attributable to acts of God.

Dry cell batteries are also excluded from coverage under this warranty. Rechargeable batteries are warranted for ninety (90) days from date of original purchase.

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WARRANTY SERVICE

For product operation, repairs and information assistance, please visit our Support page:

www.panasonic.ca/english/support

IF YOU SHIP THE PRODUCT TO A SERVICENTRE

Carefully pack and send prepaid, adequately insured and preferably in the original carton.

Include details of the defect claimed, and proof of date of original purchase.

Useful Information

(Only For Latin American Countries)

Customer Service

Customer Service Directory

Obtain products information and operative assistant; localize the closer distributor or Service Center; buy spare parts and accessories by our Web Site to Latin America or calling our Contact Center:

COUNTRY	WEB SITE	CONTACT CENTER
Panama	www.panasonic.com/pa/soporte/	800-7262
Colombia	www.panasonic.com/co/soporte/	01-8000-947262
Ecuador	www.panasonic.com/pa/soporte/	1-800-726276
Costa Rica	www.panasonic.com/pa/soporte/	800-7262737
El Salvador	www.panasonic.com/pa/soporte/	800-7262
Guatemala	www.panasonic.com/pa/soporte/	1-801-811-7262
Uruguay	www.panasonic.com/pa/soporte/	0-800-7262
Paraguay	www.panasonic.com/pa/soporte/	Web Site
Chile	www.panasonic.com/cl/soporte/	800-390-602 022-797-5000
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Venezuela	www.panasonic.com/pa/soporte/	Web Site
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Argentina		0800-333-7262 0810-321-7262
Dominican Rep.	www.panasonic.com/pa/soporte/	809-200-8000

For Caribbean countries that speak English please enter this web site in order to find information of our products and operative assistant:
www.panasonic.com/caribbean