Panasonic

Operating Instructions
INTERCHANGEABLE LENS FOR DIGITAL CAMERA

Model No. H-FS014042

LUMIX



Before connecting, operating or adjusting this product, please read the instructions completely.

MEGA O.I.S.





For USA and Puerto Rico assistance, please call: 1-800-211-PANA(7262) or, contact us via the web at: http://www.panasonic.com/contactinfo

For Canadian assistance, please call: 1-800-99-LUMIX (1-800-995-8649) or send e-mail to: lumixconcierge@ca.panasonic.com



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-If you see this symbol-

Information on Disposal in other Countries outside the European Union



This symbol is only valid in the European Union. If you wish to discard this product, please contact your local authorities or dealer and ask for the correct method of disposal.

THE FOLLOWING APPLIES ONLY IN CANADA.

This Class B digital apparatus complies with Canadian ICES-003.

Information for Your Safety

Keep the unit as far away as possible from electromagnetic equipment (such as microwave ovens, TVs, video games, radio transmitters, high-voltage lines etc.).

- Do not use the camera near cell phones because doing so may result in noise adversely affecting the pictures and sound.
- If the camera is adversely affected by electromagnetic equipment and stops functioning properly, turn the camera off and remove the battery and/or the connected AC adaptor. Then reinsert the battery and/ or reconnect the AC adaptor and turn the camera on.

The lens can be used with a digital camera compatible with the lens mount standard for the "Micro Four Thirds System".

 It cannot be mounted on the Four ThirdsTM mount specification camera.

- The digital camera illustrations in these operating instructions show DMC-G2 as an example.
- The appearance and specifications of products described in this manual may differ from the actual products you have purchased due to later enhancements.
- Four Thirds[™] and Four Thirds Logo marks are trademarks or registered trademarks of Olympus Imaging Corporation, in Japan, the United States, the European Union and other countries.
- Micro Four Thirds[™] and Micro Four Thirds Logo marks are trademarks or registered trademarks of Olympus Imaging Corporation, in Japan, the United States, the European Union and other countries.
- G MICRO SYSTEM is a lens exchange type digital camera system of LUMIX based on a Micro Four Thirds System standard.
- Other names, company names, and product names printed in these instructions are trademarks or registered trademarks of the companies concerned.

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.

Any unauthorized changes or modifications to this equipment would void the user's authority to operate this device.

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.

Responsible Party:

Panasonic Corporation of North America

One Panasonic Wav

Secaucus, NJ 07094

Support Contact:

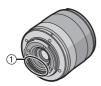
Panasonic Consumer Electronics Company

Telephone No.: 1-800-211-PANA (7262)

Precautions

■ Lens Care

- Sand and dust can damage the lens. Make sure that no sand or dust gets inside the lens or the terminals when using the lens on a beach, etc.
- This lens is not waterproof. If drops of water get onto the lens, wipe the lens with a dry cloth.
- Do not press the lens with excessive force.
- When there is dirt (water, oil, and fingerprints, etc.) on the surface of the lens, the picture may be affected. Lightly wipe the surface of the lens with a soft, dry cloth before and after taking pictures.
- Do not place the lens mount facing downwards.
 Do not allow the lens contact point ① to become dirty.



■ About Condensation (Fogging of the Lens)

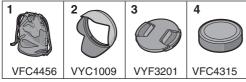
- Condensation occurs when there are differences in temperature and humidity as described below.
 Condensation can cause the lens to become dirty and lead to mold and malfunctioning, so exercise caution in the following situations:
 - When the camera is brought indoors from outside during cold weather
 - When the camera is brought into an airconditioned car
- When cold air from an air conditioner is directly blown onto the lens
- In humid places
- Put the camera into a plastic bag to allow it to acclimatize to the surrounding temperature in order to prevent condensation. If condensation occurs, turn the power off and leave it for about two hours. Once the camera acclimatizes to the surrounding temperature the condensation will go away naturally.

Supplied Accessories

[Inspection to be performed when you unpack the unit]

When removing the unit from its packing box, check that the main unit and the supplied accessories are there and also check their external appearance and functions to verify that they have not sustained any damage during distribution and transportation. If you discover any trouble, contact your vendor before using the product.

Product numbers correct as of March 2010. These may be subject to change.



- 1 Lens Storage Bag
- 2 Lens Hood
- 3 Lens Cap
- 4 Lens Rear Cap (The lens cap and lens rear cap are attached to the interchangeable lens at the time of purchase.)

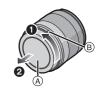
Attaching/Detaching the Lens

 Refer also to the camera's operating instructions for attaching and detaching the lens.

■ Attaching the Lens

- Check that the camera is turned off.
- 1 Turn the lens rear cap to detach it.

A: Lens Rear Cap



2 Align the lens fitting marks (a) (red marks) on the camera body and the lens and then rotate the lens in the direction of the arrow until it clicks.



- Do not press the lens release button © when you attach a lens.
- Do not try to attach the lens when holding it at an angle to the camera body as the lens mount may get scratched.
- Check that the lens is attached correctly.

■ Detaching the Lens

· Check that the camera is turned off.

Press the lens release button ① while turning the lens as far as possible in the direction of the arrow to detach it.



- Attach the lens rear cap so that the lens contact point does not get scratched.
- Attach the body cap to the camera so no dirt or dust will get inside the main unit.

■ Attaching and Detaching the Lens Cap

 Be careful not to lose the lens cap.



Attaching the Lens Hood (Supplied Accessory)

Insert the lens hood into the lens with the short sides at the top and bottom, and turn in the direction of the arrow until it stops.



(E): Fit to the mark

■ Temporarily Storing the Lens Hood

1 Turn the lens hood in the direction of the arrow to detach it.



2 Reverse the lens hood and then attach it in the same way as shown previously.

 When taking pictures with the flash with the lens hood attached, the lower portion of the screen may turn dark (vignetting effect) and the control of the flash may be disabled because the photo



flash may be obscured by the lens hood. We recommend detaching the lens hood.

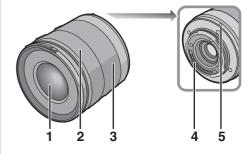
 When using the AF assist lamp in the dark, detach the lens hood.

■ Attaching Filters

- Vignetting may occur if using 2 or more MC protectors (optional:DMW-LMC52), PL filters (optional:DMW-LPL52) or ND filters (optional:DMW-LND52), or if using thick protectors and/or filters.
- The filter may become impossible to remove if excessively tightened, so please refrain from tightening it too much.
- It is possible to attach the lens cap with the filter already attached.
- You cannot attach a conversion lens or adaptor to this lens. A filter may be used, but attaching any other element may cause damage to the lens.

Names and Functions of Components

■ Lens



- 1 Lens surface
- 2 Focus ring

Rotate to focus when taking pictures with manual focus.

3 Zoom ring

Rotate the zoom ring when you wish to take large (tele) or wide (wide angle) pictures. (35 mm film camera equivalent: 28 mm to 84 mm)

- 4 Contact point
- 5 Lens fitting mark



 When flash recording with a close subject, the light of the flash will be blocked by the lens and part of the picture may be dark. Check the distance from the subject when recording.

Cautions for Use

■ About the Lens

Take care not to drop or knock the lens. Also take care not to put a lot of pressure on the lens.

 Take care not to drop the bag that you inserted the lens in as it may damage the lens. The camera may stop operating normally and pictures may no longer be recorded.

When using pesticides and other volatile substances around the camera make sure that they do not get onto the lens.

 If such substances get onto the lens they can damage the exterior case or cause the paint to peel.

Do not carry the unit when it is still attached to the camera body.

- Under no circumstances should the unit be stored in any of the following locations since doing so may cause problems in operation or malfunctioning.
- In direct sunlight or on a beach in summer
- In locations with high temperatures and humidity levels or where the changes in temperature and humidity are acute
- In locations with high concentrations of sand, dust or dirt
- Where there is fire

- Near heaters, air conditioners or humidifiers
- Where water may make the unit wet
- Where there is vibration
- Inside a vehicle
- Refer also to the operating instructions of the digital camera.
- When the unit is not going to be used for a prolonged period, mold and other problems may cause performance failure. It is recommended that you check the unit's operation prior to use.
- Do not leave the lens in contact with rubber or plastic products for extended periods of time.
- Do not touch the lens contact point. Doing so can cause failure of the unit.
- Do not disassemble or alter the unit. If the internal parts require inspection or repair, take the unit to the vendor.

Do not use benzine, thinner, alcohol or other similar cleaning agents to clean the lens glass or exterior cabinet.

- Using solvents can damage the lens or cause the paint to peel.
- Wipe off any dust or fingerprints with a soft, dry cloth.
- Use a dry, dust cloth to remove dirt and dust on the zoom ring and the focus ring.
- Do not use a household detergent or a chemically treated cloth.

Troubleshooting

A sound is heard when the camera is turned on or off.

• This is the sound of lens or aperture movement and is not a malfunction.

When this lens is attached to digital camera, stabilizer function cannot be turned off or stabilizer function does not work.

- The Optical Image Stabilizer function of this lens only works correctly with supported cameras.
 - → When older Panasonic digital cameras (DMC-GF1, DMC-GH1, DMC-G1) are used, [STABILIZER] in the [REC] mode menu cannot be set to [OFF]. It is recommended to update the firmware of the digital camera at the following website.
 - http://panasonic.jp/support/global/cs/dsc/download/
 - → When using this lens with another make of digital cameras, the Optical Image Stabilizer function will not work. (As of March 2010)
 For details, contact the respective company.

Specifications

INTERCHANGEABLE LENS FOR DIGITAL CAMERA "LUMIX G VARIO 14–42 mm/F3.5–5.6 ASPH./MEGA O.I.S."

Focal length	f=14 mm to 42 mm
	(35 mm film camera equivalent: 28 mm to 84 mm)
Aperture type	7 leaf shutters/iris diaphragm/circular diaphragm
Aperture range	F3.5 (Wide) to F5.6 (Tele)
Minimum aperture value	F22
Lens construction	12 elements in 9 groups (1 aspherical lens)
In focus distance	0.3 m (0.99 feet) to ∞ (from the focus distance reference line)
Maximum image magnification	0.16× (35 mm film camera equivalent: 0.32×)
Optical image stabilizer	Available
[O.I.S.] switch	None
	(Setting of the [STABILIZER] is done in [REC] mode menu by
	LUMIX digital cameras.)
Mount	"Micro Four Thirds Mount"
Angle of view	75° (Wide) to 29° (Tele)
Filter diameter	52 mm (2.05 inch)
Max. diameter	60.6 mm (2.39 inch)
Overall length	Approx. 63.6 mm (2.50 inch)
	(from the tip of the lens to the base side of the lens mount)
Mass (Weight)	Approx. 165 g (0.22 lb)

Limited Warranty

FOR U.S.A. and Puerto Rico

PANASONIC CONSUMER ELECTRONICS COMPANY, DIVISION OF PANASONIC CORPORATION OF NORTH AMERICA

One Panasonic Way,

Secaucus, New Jersey 07094

Panasonic Digital Still Camera ACCESSORIES LIMITED WARRANTY

Limited Warranty Coverage

If your product does not work properly because of a defect in materials or workmanship, Panasonic Consumer Electronics Company (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, or (b) replace it with a new or a refurbished product. The decision to repair or replace will be made by the warrantor.

PRODUCT OR PART NAME	PARTS	LABOR
Interchangeable Lens for Digital Camera	1 (ONE) YEAR	1 (ONE) YEAR

You must Mail-In your product during the warranty period. This warranty only applies to products purchased and serviced in the United States or Puerto Rico. This warranty is extended only to the original purchaser of a new product which was not sold "as is".

Mail-In Service

For assistance in obtaining service in the United States and Puerto Rico please contact:

Panasonic Camera and Digital Service Center

1590 Touhy Ave.

Elk Grove Village, IL 60007

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.

Also, purchaser will be responsible for shipping the unit to the above address.

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, or commercial use (such as in a hotel, office, restaurant, or other business), rental use of the product, 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, or loss of, or failure to obtain, images, data or other camera memory content. The items listed are not exclusive, but are 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 others 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 the warrantor's Consumer Affairs Department at the addresses listed for the warrantor.

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

FOR CANADA

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.

Digital Camera	One (1) year, parts and labour
Digital Photo Peripherals	One (1) year, parts and labour
Digital Camera Accessories	Ninety (90) days, 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 <u>AMOUNT PAID AND PLACE OF PURCHASE</u> 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, commercial use such as hotel, office, restaurant, or other business or rental use of the product, or service by anyone other than a Authorized Servicer, or damage that is attributable to acts of God.

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

THIS EXPRESS, LIMITED WARRANTY IS IN LIEU OF ALL OTHER WARRANTIES, EXPRESS OR IMPLIED, INCLUDING ANY IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE. IN NO EVENT WILL PANASONIC CANADA INC. BE LIABLE FOR ANY SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES RESULTING FROM THE USE OF THIS PRODUCT OR ARISING OUT OF ANY BREACH OF ANY EXPRESS OR IMPLIED WARRANTY. (As examples, this warranty excludes damages for lost time, travel to and from the Authorized Servicer, loss of or damage to media or images, data or other memory or recorded content. This list of items is not exhaustive, but for illustration only.)

In certain instances, some jurisdictions do not allow the exclusion or limitation of incidental or consequential damages, or the exclusion of implied warranties, so the above limitations and exclusions may not be applicable. This warranty gives you specific legal rights and you may have other rights which vary depending on your province or territory.

WARRANTY SERVICE

For product operation and information assistance, please contact:

Our Customer Care Centre: Telephone: 1-800-99-LUMIX (1-800-995-8649)

Fax #: (905) 238-2360

Email link: "LUMIX Concierge → Contact us → email" on

https://concierge.panasonic.ca

For defective product exchange within the warranty period, please contact the original Dealer or our Customer Care Centre.

Panasonic Consumer Electronics Company, Division of Panasonic Corporation of North America One Panasonic Way, Secaucus, NJ 07094

Panasonic Canada Inc. 5770 Ambler Drive, Mississauga, Ontario, L4W 2T3

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