

FOR IMMEDIATE RELEASE

Panasonic announces LUMIX DC-GH5 Firmware Update Service Ver.2.0 for exceptional enhancement of performance and functions



FIRMWARE VERSION 2.0

Panasonic has announced a new firmware update program Ver.2.0 for the LUMIX DC-GH5 to further enhance the camera's performance. Interviewing front-line photographers and cinematographers worldwide after they had used the GH5, Panasonic investigated what was needed in the field and provided the functions that were strongly demanded. This enhancement is not just a firmware update, but an exceptional upgrade of camera performance to satisfy professional GH5 users.

The firmware will be released at the end of September at <http://panasonic.jp/support/global/cs/dsc/>

As announced, the camera will offer compatibility with 400-Mbps 4:2:2 10-bit ALL-Intra video recording in 4K 30p/25p/24p and Full-HD; high-resolution video recording in Anamorphic mode; 4K Hybrid Gamma Profile compatible with 4K HDR television; and USB tethering.

The new firmware includes the following upgrades:

1. Compatibility with “LUMIX Tether” PC software

The new firmware enables GH5 tethered shooting via USB, using “LUMIX Tether” PC software. It lets you view the image on a large PC screen while shooting, which is helpful in commercial photoshoots such as portraits or products, etc., where continuous confirmation is required. You can use ‘6K PHOTO’ and ‘4K PHOTO’ and start and stop video recording during tethered shooting.

2. Improved autofocus performance

The GH5’s autofocus performance has been improved in this firmware update with the goal of supporting enhanced video and stills shooting in challenging lighting conditions.

Furthermore, the following AF area enhancements have been made:

- The customised AF area can be continuously displayed in ‘Multi AF’ and ‘Custom Multi AF’ during live-view.
- The AF area in ‘Multi AF’ can be moved to the other edge (side, top or bottom) when it reaches one edge.
- The start point of AF lock can be set on the live view screen in advance in ‘AF Tracking’.
- The AF area can be moved while the shutter button is half-pressed or while recording in ‘Burst Mode’, ‘6K PHOTO’ and ‘4K PHOTO’.

3. Improved performance in ‘6K PHOTO’ and ‘4K PHOTO’

- When using ‘6K Burst’ and ‘4K Burst’, the waiting time before starting the next burst shooting sequence has been shortened to less than half the time.
- ‘Loop Rec’, which allows the user to continually record and overwrite data on an SD Memory Card, is now available in ‘6K PHOTO’, as well as the original ‘4K PHOTO’.^[1]

4. An additional ALL-Intra Video Recording mode

As originally announced, a 4:2:2, 10-bit ALL-Intra video recording mode has been added to 4K/FHD video recording.^[1]

New 4:2:2,10-bit ALL-Intra Recording Mode

Item	System Frequency	Size	Frame Rate	Bit Rate	YUV/bit	Image Compression
[C4K/ALL-I/400M/24p]	59.94Hz (NTSC)	4096 x 2160	23.98p	400 Mbps	4:2:2/10 bit	ALL-Intra
[4K/ALL-I/400M/30p]		3840 x 2160	29.97p	400 Mbps	4:2:2/10 bit	ALL-Intra
[4K/ALL-I/400M/24p]		3840 x 2160	23.98p	400 Mbps	4:2:2/10 bit	ALL-Intra
[FHD/ALL-I/200M/60p]		1920 x 1080	59.94p	200 Mbps	4:2:2/10 bit	ALL-Intra
[FHD/ALL-I/200M/30p]		1920 x 1080	29.97p	200 Mbps	4:2:2/10 bit	ALL-Intra
[FHD/ALL-I/200M/24p]		1920 x 1080	23.98p	200 Mbps	4:2:2/10 bit	ALL-Intra
[4K/ALL-I/400M/25p]	50.00Hz (PAL)	3840 x 2160	25.00p	400 Mbps	4:2:2/10 bit	ALL-Intra
[FHD/ALL-I/200M/50p]		1920 x 1080	50.00p	200 Mbps	4:2:2/10 bit	ALL-Intra
[FHD/ALL-I/200M/25p]		1920 x 1080	25.00p	200 Mbps	4:2:2/10 bit	ALL-Intra
[C4K/ALL-I/400M/24p]	24.00Hz (CINEMA)	4096 x 2160	24.00p	400 Mbps	4:2:2/10 bit	ALL-Intra
[4K/ALL-I/400M/24p]		3840 x 2160	24.00p	400 Mbps	4:2:2/10 bit	ALL-Intra
[FHD/ALL-I/200M/24p]		1920 x 1080	24.00p	200 Mbps	4:2:2/10 bit	ALL-Intra

5. 4K HDR video recording

- As promised, 'Hybrid Log Gamma' (HLG) Profile has been added to the 'Photo Style' menu. HDR (High Dynamic Range) mode reproduces both bright and dark areas in an image for outstanding, natural contrast, and preserves fine detail. The camera records video with a designated gamma curve compatible with ITU-R BT.2100.
- A new low bit-rate 4K HEVC for HLG recording mode enables playback on AV equipment compatible with the HEVC compression format, such as Panasonic 4K HDR TVs.

6. Enhancement of the Anamorphic video recording mode

Building on the existing 4K Anamorphic video capabilities, High-Resolution Anamorphic mode adds the ability to record Anamorphic video in 18 megapixels for the ultimate resolution and quality.^[iii]

New High-Resolution Anamorphic Mode^[iv]

Item	System Frequency	Size	Frame Rate	Bit Rate	YUV/bit	Image Compression
[6K/A/200M/30p] ^[v]	59.94Hz (NTSC)	4992 x 3744	29.97p	200 Mbps	4:2:2/10 bit	Long GOP
[6K/A/200M/24p] ^[vi]		4992 x 3744	23.98p	200 Mbps	4:2:2/10 bit	Long GOP
[4K/A/400M/30p]		3328 x 2496	29.97p	400 Mbps	4:2:2/10 bit	ALL-Intra
[4K/A/400M/24p]		3328 x 2496	23.98p	400 Mbps	4:2:2/10 bit	ALL-Intra
[6K/A/200M/25p] ^[vii]	50.00Hz (PAL)	4992 x 3744	25.00p	200 Mbps	4:2:2/10 bit	Long GOP
[4K/A/400M/25p]		3328 x 2496	25.00p	400 Mbps	4:2:2/10 bit	ALL-Intra
[6K/A/200M/24p] ^[viii]	24.00Hz (CINEMA)	4992 x 3744	24.00p	200 Mbps	4:2:2/10 bit	Long GOP
[4K/A/400M/24p]		3328 x 2496	24.00p	400 Mbps	4:2:2/10 bit	ALL-Intra

- A new ‘Anamorphic Desqueeze Display’ lets the user view an enlarged image in Cinescope while recording with 2.0x and 1.33x Anamorphic lenses, and in playback.
- A feature that will be welcomed is ‘Video Guide Line’, which displays guide lines in a variety of aspect ratios, such as Cinescope, 16:9 and 1:1 while recording video. The mode spans Anamorphic mode and all video recording modes.

7. Enhancement of Body I.S. (Image Stabiliser)

- The new I.S. Lock (video) powerfully compensates for handshake when the viewing angle is fixed.
- A new handshake correction mode provides optimum correction when using 2.0x and 1.33x Anamorphic lenses.

8. Correction of white balance setting

- When the K (Kelvin) value was changed after adjusting the color temperature with 2-axis white balance compensation, the setting was reset. This has been corrected.

9. Improved usability of Time Lapse Shot

- The remaining shooting time and the number of recordable pictures are displayed on the stand-by screen.

10. Improved usability of Power Save LVF

- Power Save LVF can now be used during all stand-by display options.

11. Wireless functions

- A new Bluetooth Remote Control function has been added to Panasonic's Image App. Users can now operate the shutter, video and bulb functionality remotely without wi-fi, which saves both time and battery power when there is no need to transfer images. The Image App will be updated at the same time as the GH5 firmware release.
- When using 'Auto Transfer', the GH5 will now automatically resume image transfer in situations where the camera is powered off and restarted.

12. Other improvements

- When reviewing shots, the user can assign a rating using a customisable Fn button
- The following functions can now be assigned to Fn buttons – 'Constant Preview', '6K/4K PHOTO Bulk Saving', 'Min. Shtr Speed', 'RAW Processing', 'Rec/Playback Switch', 'Destination Slot' and 'Mic Level Adj'.
- The DISP. Button can be locked.
- In Relay Rec, there were cases where the video file number was not able to be reset. This has been corrected.
- In Relay Rec, there were cases where the video file number was reset after formatting the SD Memory Card. This has been corrected.
- In Backup Rec, there were cases where the file number was not reset even after applying resetting. This has been corrected.
- The image quality when applying the following settings is improved: Extended low ISO, [i.Dynamic] (Intelligent D-range Control) and Highlight Shadow.

The new DC-GH5 Firmware Version 2.0 is scheduled to be released at the end of September 2017 at the following LUMIX Customer Support website.

LUMIX DC-GH5 Firmware Ver.2.0

<http://panasonic.jp/support/global/cs/dsc/>

^[i] An SD Memory Card with Video Speed Class 90 is recommended for 'Loop Rec' in '6K PHOTO'.

^[ii] An SD Memory Card with Video Speed Class 60 or higher is recommended for 4K ALL-Intra video recording. Operation is confirmed with Panasonic SD Memory Card with Video Speed Class 90.

^[iii] Recorded in HEVC

^[iv] High Resolution Anamorphic Mode records motion pictures with an aspect ratio suited for an anamorphic lens, 4:3. The effective picture size for this mode is equivalent to the number of pixels produced by 6K (approx. 6,000 (horizontal) x 3,000 (vertical) images (approx. 18 megapixels).

^[v] High-resolution Anamorphic mode

^[vi] High-resolution Anamorphic mode

^[vii] High-resolution Anamorphic mode

^[viii] High-resolution Anamorphic mode