Panasonic

This document describes WV-SFV531,WV-SFR531,WV-SFN531 firmware upgrade Information.
1. Release version： Version 4.70
2. Release Note Reference Number：SFV531-020

March 26, 2021
Panasonic i-PRO Sensing Solutions Co., Ltd,

WV-SFV531,WV-SFR531,WV-SFN531 Firmware Release Note

VER (ActiveX Ver) Release Date	Priority Rank Level				Contents Priority Rank Level A: Recommend to apply (Major or serious update) B: When issue happened C: Maintenance timing U: Function /Performance improvement (Not Necessary to update)		*: ONVIF is a trademark of Onvif, Inc.
	A	B	C	U	Issue (Phenomenon)	Occurrence condition	Correspondence
Ver1.85 (4.33.06) July,'15	-				First production		
Added for correction on Oct. 14,　Correction on Dec. 21, 2015 : For WV-SFV531 and WV-SFR531							Improved picture quality.
Ver1.87 (4.38.07) Aug.,'15	U			x	-	-	Improved picture quality. 1. Resolution feeling. 2. Signal to Noise (S/N) Ratio.
Ver1.88 (4.38.07) Sept,'15	C			x	-	-	For Repair technicians, not for users; Required this version If lens were replaced with a new type.
Ver1.89 (4.38.07) Oct,'15	C		x		Became the camera picture blackened.	By environmental changes of brightness repeated.	Fixed.
Ver1.91 (4.38.07) Dec.,'15	U			x	-	-	Updated for Japanese market models only.
Ver2.00 (4.38.08) Jan.,'16	C			x	-	-	Supported the ONVIF® command, StartFirmwareUpgrade, to upgrade the firmware.
				x	-	-	Added "Smart Coding mode" function.
				x	-	-	Made encripting the firmware. To upgrade the firmware from version 1.91 or older, required 2-step upgrading; - First step: upgrade to version 9.99. - Second step: upgrade to version 2.00. Click here to request the version 9.99.
				x	-	-	Supported Safari/Firefox/Google Chrome at configuration settings Note: Tested version; - Safari: Version 5.34.57 - Google Chrome: Version 44.0.2403 (Except displaying H.264 images) - Firefox: Version 39.0.0
				x	For WV-SFV531 only.		
					-	-	Added a function of Monitor output from Audio output terminal.
				x	For WV-SFN531 only.		
					-	-	Improved picture quality. 1. Resolution feeling. 2. Signal to Noise (S/N) Ratio.
				x	Wrote settings onto the Flash-ROM by clicking the "Set" button on menu setting page even if nothing changed. （Occurrence frequency : High）	-	Fixed.

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Ver2.00 (4.38.08) Jan.,'16			C	x	-	-	Changed the upper limit value of the set of iVMD function on External software.
							  [Prev.] 100%, 150%, 200%, 250%, 300%
							  [New] 100%, 150%, 200%, 250%, 300%, 350%, 400%, 450%, 500%, Unlimited

		信息		x	-	-	Changed the word in Chinese at SD memory card information (SD记忆卡信息) in System log (系统日志);
							  [Prev.] 错误内容 (Description)
							  [New] 内容 (Description)

				x	-	-	Changed the action to the following cgi commands; - /cgi-bin/get_capability - /cgi-bin/get_capability2

				x	-	-	Corrected the vulnerability by upgrading OSS for NTP;
							  [Prev.] ntp-4.2.6 p3
							  [New] ntp-4.2.8 p4

			x		Maintenance page layout may collapse. （Occurrence frequency : High）	In the page of User mng.	Fixed.
				x	For WV-SFV531 only. –	–	Added a function of Monitor output from Audio output terminal.
~~Ver2.02~~ (4.38.08) Feb.,'16 Added on June 24, 2016			C	x	-	-	Added a notice for each screen that alarm notification will not be appeared while displaying VMD and audio detection.

Ver2.40 (4.38.08) Apr.,'16			C	x	-	-	Added a choice to select a certification when using HTTPS.
							This is effective from products manufactured in April, 2016. Those serial numbers are as follow;
							  "PDxxxxxx", PExxxxxx, PFxxxxxx and after.
							  "Qxxxxxxx", Rxxxxxxx and after.

				x	-	-	Added a choice to select a certification when using the "Alterration detection".
							This is effective from products manufactured in April, 2016. Those serial numbers are as follow;
							  "PDxxxxxx", PExxxxxx, PFxxxxxx and after.
							  "Qxxxxxxx", Rxxxxxxx and after.

				x	-	-	1. Changed factory default setting value at User Authentication from "OFF" to "ON".
							2. Deleted pre-registered User name (admin), and Password (12345).
							3. All users must register User name(s) and Password(s) at initial access.
							  - User name: 1 to 32 characters
							  - Password; 8 to 32 characters, two or more types of characters among alphabets, numbers and symbols.
							 Note:
							Currently registered User name(s) and Password(s) will NOT be deleted by upgrading firmware, however, you have to register them under the new policy (above "3") after initializing (default reset) by the INITIAL SET button or by the setup menu.

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Ver2.40 (4.38.08) Apr.,'16	C			x	**Added on June 24, 2016** Best shot of face may not be sent.	If the duration of tracking were too short.	Fixed.
Ver2.41 (4.38.08) Apr.,'16	C			x	It may not be able to startup. （Occurrence frequency : Rare）	-	Fixed.
Ver2.43 (4.38.08) May,'16	C			x	Unable to connect the cameras by the HTTPS protocol.	After turning power off and on if the connection protocol were configured in "HTTPS" and using with the Root Certification Authorities (CA).	Fixed.
				x	For WV-SFV531 only. No monitor output from Audio Output terminal.	-	Fixed.
Ver2.50 (4.39.00) July,'16	C			x	-	-	Added choices of "Bandwidth control(bit rate)". 1024kbps/15360kbps/20480kbps/25600kbps/30720kbps/35840kbps/40960kbps/51200kbps
				x	-	-	Added choices of "On(Mid)" and "On(High)" to "Smart Coding mode".
				x	-	-	ONVIF®: Supported "WS Addressing".
				x	-	-	Added information about place of product destination and model number with suffix to the reply of CGI command "/cgi-bin/getinfo".
				x	-	-	Updated hyperlink to the web sites of support.
			x		Layout of image display may be collapsed.	By inputting "</script>" at input-field.	Fixed.
			x		-	-	Corrected the vulnerability by upgrading OSS for NTP; 　[Prev.] ntp-4.2.6 p4 　[New]　ntp-4.2.8 p7
			x		Unable to change settings of "Transmission priority" and "Refresh interval" simultaneously by CGI command, "/cgi-bin/set_h264".	On firmware version between 2.01 and 2.43.	Fixed.
			x		Confirmation window would not appear even if "Bandwidth control(bit rate)" to be set less than "Max bit rate (per client)".	When attempting to set "Bandwidth control(bit rate)" to be set less than "Max bit rate (per client)" on "H.264(2)" through "H.264(4)".	Fixed.
			x		Setting of "Refresh interval" left "8s" internally (should become "1s") even if settings both "Smart coding = On" and "H.264 streaming = SD" although "Smart coding" become "Off". As a result, recording in H.264 on SD memory card may be abnormal.	-	Fixed.
			x		The camera may restart, unexpectedly.	In a case, connect/disconnect H.264 streaming , repeatedly.	Fixed.

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Ver2.51 (4.39.00) Nov.,'16			C	x	-	-	Improved the resolution of the around the subject.
Ver2.52 (4.39.00) Dec.,'16			C	x	Replied to the "SetVideoSourceMode" command (ONVIF®).	-	Fixed.
				x	The Real-time Pull-Point Notification Interface did not conform to ONVIF®.	-	Fixed.
				x	-	-	Improved security.
Ver2.54 (4.39.00) Mar.,'17			C	x	Unable to work time adjustment function synchronizing with NTP server.	When the difference between the clock and the NTP server is within 5 seconds.	Fixed.
				x	Streaming in RTSP for the netwaork disk recorder, Model WJ-NX400, may stop.	In case of operating continuously.	Fixed.
Ver2.54 (4.39.00) Mar.,'17 *Added on May 15,2017*			C	x	Unable to work time adjustment function synchronizing with NTP server.	When the difference between the clock and the NTP server is within 5 seconds.	Fixed.
				x	Streaming in RTSP for the netwaork disk recorder, Model WJ-NX400, may stop.	In case of operating continuously.	Fixed.
Added on June 5,2017				x	Refresh interval may be switched to ″8s″, unexpectedly.	By changing "Transmission priority" of H.264 for the options other than "VBR", initiated by PSSCT or WJ-NV300 only if it is the first time from the installation of the camera.	Fixed.
Ver2.56 (4.39.23) Sept.,'17			C	x	-	-	Changed company name to the new company name in the plug-in (ActiveX) software.
				x	-	-	Updated the URL of support website displayed on screen.
Ver2.58 (4.39.23) Mar.,'18			C	x	-	-	Improved security.
				x	-	-	In CGI command of "get_io2", added new parameter "3" for "format" so that possible to obtain Command alarm / i-VMD information.

				x	-	-	Added new Panasonic alarm notifications as follow;
							  SD-MEMORY WRITE ERROR
							  SD-MEMORY READ ERROR
							  SD-MEMORY DELETE ERROR
							  SD-MEMORY FILESYSTEM ERROR
							  SD-MEMORY OTHER ERROR

				x	-	-	Discarded a restriction that only "Unicast port (AUTO)" in RTSP transmission would be available when "Transmission type" is "On".
			C		Leaked POST connection.	in a case of disconnect network in "over HTTP" for 2 and half minutes or more.	Fixed.
			C		Image capture size may become incorrect.	By setting Image capture size from Image Viewer.	Fixed.
				x	Administrator password may be deleted.	-	Fixed.

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Ver2.60 (4.39.23) Jun.,'18	C				x	-	-	Changed factory default setting for Authentication method; Previous: "Digest or Basic" New: "Digest" For more details: security upgrade June2018.pdf
					x	-	-	Changed password policy that it must include at leaset 3 types of characters among "upper case letters / lower case letters / numbers / symbols". For more details, click here. Note: Original passwords and authentication method of products on the system are kept unchanged even firmware and software have been updated. For more details: security upgrade June2018.pdf
					x	-	-	Added user authentication at host authentication.
					x	-	-	Became saving history of login failure into system log.
					x	-	-	Changed saving setting data with encryption. Note: unable to restore the setting data if you would downgrade the firmware.
					x	-	-	Made some other security measures enhanced.
					x	-	-	Added "Drawing method", "Decoding options" and "Frame Skip Options (When PC is Heavy Processing Load)" onto plug-in software.
					x	-	-	Changed factory default setting for transmission rate: Previous: Unlimited New: 51200kbps
					x	If an RTSP header contains two or more User-Agent headers. no HTTP400(Bad Request) error returned and ignore the second and subsequent User-Agentheaders.	-	Fixed.
Ver2.70 (4.39.23) Sept.,'18	C				x	Revised on Nov. 7, 2018 Frame rate and bit rate may drop.	By transmitting JPEG live images continuously over 1 year without being rebooted.	Fixed.
Ver4.00 (4.39.23) Feb.,'19	C				x	May not be able to change the save destination at the time of FTP periodical transmission error.	-	Fixed.
					x	ONVIF RTSP Multicast transmission may not work.	-	Fixed.
					x	-		Improved to link HTTP alarm function with "HTTP max segment size" setting in "Network setting"
					x	-		ONVIF: Supported DTT v18.06.
					x	-	-	Enhanced security.
					x	-	-	Changed the URLs of hype-link destination according to change of support page URL (from "http" to "https").

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Ver4.00 (4.39.23) Feb.,'19	C				x	The recorded data of the log one before the relevant time might be downloaded when downloading the recorded data from the log list.	-	Fixed.
					x	Camera may restart unexpectedly while receiving ONVIF command continuously.	-	Fixed.
				x		-		Changed the responce of "/cgi-bin/get_io2?format=3&"; It became not to notify CGI response each time even if detecting command alarm continuously.
					x	Camera may restart when a file which cannot be deleted were created during JPEG overwrite recording on the SD memory card.	-	Fixed.
					x	When deleting SD card data on the log list screen, data that can not be deleted may be left while displaying the play window.	-	Fixed.
					x	Communication error may occur while connecting with WJ-NX series recorders. (Occurrence frequency: Rare)		Fixed.
					x	Transmission type (H.264/H.265) and image capture size of stream may not be changed (transmission type and image capture size hold before change).	If those were changed within 2 minutes after the network had been disconnected with over RTSP connection.	Fixed.
					x	Solid black screen may appear during sequencing with the network disk recorder due to it takes time to output the video.	-	Fixed.
					x	Camera may reboot, unexpectedly.	When sequencing the network disk recorder or the video management software (WV-ASM series)	Fixed.
					x		By downloading the SD memory backed up data with the network disk recorder	Fixed.
Ver4.10 (4.39.23) June,'19	C				x	-	-	Security has been enhanced.
					x	Audio may not output by attempting to connect two sessions simultaneously and failure to authenticate one of them.	-	Fixed.
				x		-	-	Added an ONVIF command, "DeviceIO:GetVideoSources".
				x		-	-	Added a note in the window of DDNS setting page when using "Dynamic DNS Update", "Dynamic DNS Update(DHCP)".
				x		-	-	Display the license of open source software (OSS) on upgrade screen.
					x	ONVIF communication may become a cause of destroying resources.		Fixed.
					x	-	-	Fixed Session Description Protocol/SDP (IPv6) on ONVIF.
					x	Unable to find ONVIF search.	-	Fixed.

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					x	-	-	The file may not be found by opening the log list during overwrite recording of the SD memory card and attempt to browse.
Ver4.30 (4.39.24) May,'20	C				x	The camera may show a black image on the "Live" page.	-	Fixed.
					x	-	-	Improved the response when reconnecting in HTTPS connection on Windows 10.
					x	-	-	Changed the company name in the plug-in software Active X to the new one.
Ver4.70 (4.39.24) Mar.,'21	U				x	-	-	Improved the [HTTP alarm notification] function as follows: 1. Supports Digest authentication - The camera performs either "Digest" or "Basic" authentication according to the response from the HTTP server when initially accessed without ID and password. 2. Adds an error log for the failure in HTTP server user authentication - Displays "<HTTP alarm notification> authentication error" in the system log when the authentication fails. 3. Supports HTTPS Communication - Entering "https://" in [Address] enables HTTPS communication.
					x	-	-	Enabled both digital certificates "Digicert" and "GlobalSign". Note: Firmware upgrade does not change the certificate in a camera. Click here for further information in case of SSL communication.
					x	-	-	Changed the behavior related to bit rate when the communication protocol is changed from "HTTP" to "HTTPS" as below. Previous versions: the camera automatically sets the bit rate to 4 Mbps when the selected one is larger than 4 Mbps. This version or later: the camera does not change the bit rate.

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