

# GY-HC900 Firmware V0400 Updated Features and Instructions

7<sup>th</sup> Oct 2020

## 1. Added higher resolution (720p) Web recording format of HD+Web

At HD+Web mode

In case HD: 1920×1080 60p/50p/60i/50i

Web: added 1280×720 60p/50p Bit rate: 6Mbps (LP)

GY-HC500 series

System	Video Format	Resolution	Frame rate	Sampling	Bit Rate(Max)	Audio	Rec Time min	Media
WEB (Proxy)	QuickTime (MPEG- 4.AVC/H.264)	1280 x 720	60p/50p	4:2:0 8-bit	6 Mbps (LP)	μ-law 2ch 16kHz	1040	64GB SD card
		720x480	59.94i	4:2:0 8-bit	8Mbps (HQ)		640	
		720x576	50i		-		1920	
		960×540	29.97p/2 5p/23.98 p		3Mbps (HQ)		3840	
		480×270	29.97p/2 5p/23.98 p		1.2Mbps (LP)			

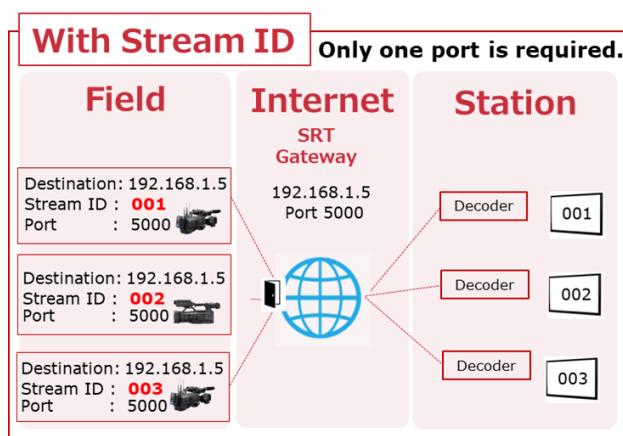
## 2. Added “Stream ID” and FEC (Forward Error Correction) of SRT(Secure Reliable Transport) protocol

At SRT protocol

[Network...] >> [Live Streaming] >> [Streaming Server...] >> [Server1~4]

Added setting belows

Added "Stream ID" Stream identifier: Half-width alphanumeric characters , max. 63 characters  
Stream ID makes possible multiple cameras directly stream to 1 device



Added "FEC" of SRT      FEC setting [Setting value: Off (Default), 10x10, 8x8, 6x6]  
FEC makes possible to recover redundant packet loss.

**FEC (Forward Error Correction)**

Forward Error Correction adds redundant data to the stream to be used to recover packets lost due to unstable connection, Internet congestion, and high jitter.

<Memo>

Default setting of latency at SRT changed to 500ms

### 3. Added "VITC" in Streaming Time code system

Added more "VITC (vertical interval time code) of Time code on streaming  
To LTC (longitudinal time code)

Added setting belows

[TC/UB] → [TC Mode]

"Time Zone" [ Setting Value : UTC (Default)、 Local Time ]

\*1\*2

"Streaming Format "Time code mode [ Setting Value : VITC(Default)、 LTC ]

\*1\*3

\*1 Only available at "FreeRun(NTP)" of TC Generater ,otherwise unable to be selected r

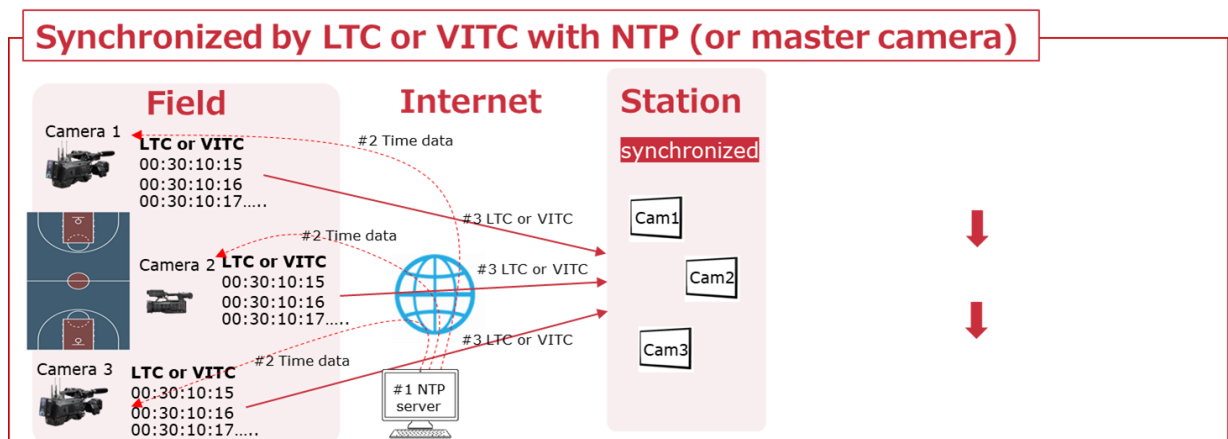
\*2 Set correcting time zone or not from NTP time data

Local Time : TC corrected time zone

UTC : TC not corrected time zone

\*3 "FreeRun(NTP) is selectable even when optional adapter is effective.

Streaming format is fixed VITC



#### 4. Added Interlace Format

Added "Field " to "Field Pair" at interlace mode.

Select according to the decoder. (Haivision, Makito etc)

[Network...] >> [Live Streaming]

Added " Interlace Format" [ Setting Value : Field Pair(Default)、Field ]

#### 5. Added RTMPS Protocol support (Facebook live etc)

Added RTMPS(RTMP over SSL) protocol for Live Streaming.

[Network]>>[Live Streaming]>>[Streaming Server]>>[Server\*\*]>>[Type]

Added item "RTMPS"

#### Memo

In case Rec with H.264 mode, w/o Overlay, w/o optional adapter(KA-MC100,KA-EN200 etc)

Resolution / Frame Rate / Bit Rate

1920x1080 / 60p (50p) / 12M、8Mbps

1920x1080 / 30p (25p) / 8M、5M、3Mbps

1280x720 / 60p (50p) / 8M、5M、3Mbps

1280x720 / 30p (25p) / 8M、5M、3M、1.5Mbps

640x360 / 30p (25p) / 3M、1.5M、0.8M、0.3Mbps

( Same as HC550/500)