Subject: BVM-L230/BKM-16R Countermeasure against Horizontal Streaking Noise/ Trouble of Memory Stick Data

Applicable Model(s) (Destination)	Serial Number(s)	Number of Unit(s)
BKM-16R	2000009 - 2000819	811
BKM-16R	2000821 - 2000907	87
BKM-16R	2000909 - 2000914	6
BKM-16R	2000916	1
BKM-16R	2000921 - 2000928	8
BKM-16R	2000931 - 2000933	3
BKM-16R	2000935 - 2000951	17
BKM-16R	2000953 - 2000956	4
BKM-16R	2000965 - 2000969	5
BKM-16R	2000972 - 2000976	5
BVM-L230	2000009 - 2000790	782
BVM-L230	2000792 - 2000799	8
BVM-L230	2000801 - 2000876	76
BVM-L230	2000881 - 2000882	2
BVM-L230	2000884	1
BVM-L230	2000886 - 2000887	2
BVM-L230/R	2501001 - 2501016	16

Subject	**BVM-L230/BKM-16R Countermeasure against Horizontal Streaking Noise/ Trouble of Memory Stick Data**

Symptom

<Horizontal Streaking Noise>

When inputting the YPbPr format irrespective of SDI and analog format, if the Chroma control is set in the Max (Up) state, horizontal streaking noise appears 2 or 3 times in 10 second.

By feeding an entire black (Black) signal and setting the Chroma control to the maximum, the symptom can be easily seen.

<Trouble of Memory Stick Data>

1. When using a former version memory stick (V1) which is not the memory stick Pro, the data such as Capture data may break, resulting in no saving or no loading.
2. When using a Memory Stick Pro, the data such as Capture data may not be saved or loaded. However, the data does not break.

Cause

<Horizontal Streaking Noise>

It is caused in the writing error of the interface between the DDR2 and the IC4000 having the IP conversion and the scaler.

<Trouble of Memory Stick data>

1. When using a Memory Stick (V1)*, due to the bug on the management information process in the memory stick, a wrong information may be read.
   The erase process is caused by wrong management information and the data garble occurs.
2. When using a Memory Stick Pro, due to the bug on the mount process, it takes a time.
   Thus, the communication between BVM-L230 and the BKM-16R times out.

   Memory Stick (V1)*: Not Memory Stick Pro but Memory Stick (However, Memory Stick Micro is excluded.)

Bug Fixed

<Horizontal Streaking Noise>

By changing the ODT setting of the DDR2, it is supported.

To change the setting, the software (control program) of the BVM-L230 has been changed.

<Trouble of Memory Stick Data>

By correcting the bug in the process of the memory stick data, it is supported.

The software (control program) and kernel of the BKM-16R have been changed.

To fix the bug, the software of the BVM-L230 has been changed from Ver.1.21 to Ver.1.22, and the software and the kernel of the BKM-16R has been changed from Ver.1.20 to Ver.1.21.

BVM-L230	Software(Control Program)	V1.21	=>	V1.22
BKM-16R	Software(Control Program)	V1.20	=>	V1.21
	Kernel	V1.20	=>	V1.21

[Note] The Technical Memo (DPMO08-036R) describing the initial release of V1.2 is revised.
The version upgrade data accompanied by the revised Technical Memo (DPMO08-036R) is renewed to the data supplied with this Technical Memo.

Tool Required

<Common to BVM-L230/BKM-16R>

1. Data for version upgrade
2. Memory Stick Pro

Use the memory stick Pro (hereafter called as a memory stick) for version upgrade.
Prepare a memory stick Pro or memory stick Pro Duo of capacity less than 8GB.
In case of a memory stick Duo, an adapter is not needed.

<In case of upgrading the BVM-L230>

1. BKM-16R

Use the BKM-16R to read the data from the memory stick for version upgrade.

<In case of upgrading the BKM-16R>

1. BVM-L230

Use the BVM-L230 when displaying the menu screen for version upgrade.

[Note] Be sure to use a memory stick Pro or memory stick Pro Duo.
Unless the memory stick Pro is used, the version upgrade may fail.

Preparation

1. Unzip "DL230V120.zip" and a directories and files are created in "MSSONY" directory.
2. Copy the entire directory below "MSSONY" to the root directory of the memory stick.
   If the former version data already exists, after erasing all of the directory and files in the former "MSSONY" directory, copy all of them in the new “MSSONY” directory to the root directory of the memory stick.
3. To make sure by the checksum that copying from the PC to the memory stick is correctly done, execute the batch files (4 files) below. Refer to [Version Upgrade] – [Confirmation of Memory Stick Data] in the Service Manual.

   /MSSONY/MONITOR/BVM_L/UPDATES/SOFT/BVM_L230/check_hash.bat
   /MSSONY/MONITOR/BVM_L/UPDATES/FPGA/BVM_L230/check_hash_fpga.bat
   /MSSONY/MONITOR/BVM_L/UPDATES/SOFT/BKM_16R/check_hash.bat
   /MSSONY/MONITOR/BVM_L/UPDATES/KERNEL/BKM_16R/check_hash_kernel.bat

[Note] The “MSSONY” directory contains all of the files necessary for version upgrade in the specific directory configuration.
Although the FPGA data of the BVM-L230 does not need the version upgrade this time, the latest FPGA data is contained.

[Note] When formatting (initializing) a memory stick, be sure to use the application on the memory stick supported machine.
If the memory stick initialized with the Windows Explorer is used for version upgrade, the version upgrade may fail.

Along with the software version upgrade, the Instruction Manual has been revised.
The PDF data of the revised Instruction Manual can be also downloaded from DL230V120 Software file.

Filename: BVML_OperationManual_v12.zip

Version Upgrade Procedure

Upgrade the version using the memory stick. The software version V1.11 of BVM-L230 and BKM-16R are prerequisite.

<Procedure>
In the version upgrade this time, the BVM-L230 and BKM-16R require the following version upgrade respectively.
Upgrade referring to the detailed procedure of version Upgrade of Service Manual.
A password is required to enter the “Maintenance Menu” for version upgrade (see note below).

(1) BVM-L230	Software	V1.21 => V1.22
(2) BKM-16R	Kernel	V1.20 => V1.21
(3) BKM-16R	Software	V1.20 => V1.21

The version-up menu of the kernel is supported since the software V1.21 of theBVM-L230.

[Note] For the password contact your local Service Center.
[Note] Be sure to implement the version upgrades of both BVM-L230 and BKM-16R.
[Note] Never turn off the power of the BVM-L230 and BKM-16R during upgrade.
If done so, the unit may not start up.

Information of Software Bugs

At the moment when the V1.22 of the BVM-L230 is released, the following bugs exist due to the limitation of the FPGA2.

1. Display of capture image of Dual-Link HD-SDI 4:2:2 1080/50P, 60P
=> When displaying Capture image on signal A or signal B during displaying Wipe/Blending.
When the Capture image is at the signal A side => H lines at the signal B side jitter.

When the Capture image is at the signal B side =>The Capture image (signal B) shifts downward by one line.

=> When in the Pixel Zoom, H lines jitter.

Other Information

Other information is described below.

1. Input the Dual-Link HD-SDI 4:4:4 GBR 2048X1080 format
   => Only the Full_Range is supported.
   Input Code: 4 – 1019@10bit, 16 – 4079@12bit
   => The transmission γ (gamma) supports 2.6.
   => When setting the Gamut_Error function to ON, due to Full_Range, if set to the default, an error surely occurs.
   Set the Gamut_Error function to OFF when using.

2. Memory Stick
   => When using a memory stick for saving the capture data and setup data, a memory stick Pro is strongly recommended.

3. Picture & Picture Function
   => The input signals of INPUT 1 and INPUT 2 of the identical input adapter cannot be displayed in a Picture & Picture.
   When using a signal of the input adapter for signal A and signal B, use more than 2 pieces of the input adapter.
   =>When using Wipe or Blending function, signal A and signal B should be Genlocked to synchronize with each other.
   In case that a signal A or signal B is capture data, the Genlock is not required.

=> When using Wipe, Butterfly or Blending function, set the unit in the identical signal system and signal format and compare by setting to the Native Scan mode.
When compared in between different signal systems and signal format, a picture may not be correctly displayed.
Depending on the setup of the border position (Wipe) or display area(Butterfly), the unit may not correctly function.

Reference Manual

Each Service Manual of BVM-L230 and BKM-16R