OPERATION MANUAL FOR AVM-USB2

2026/10/28
Watec Co., Ltd.

REVISION HISTORY

Revision	Date	Changed
1.0	2016.3.7	1st Release
2.0	2016.4.11	2nd Release *Renamed the jig board to “AVM-USB2”
3.0	2026.10.28	3rd Release *Added AVM-USB2(Type-C) to “INTRODUCTION” *Revise “Support camera” *Revise “PC REQUIREMENTS” *Correct ZIP file name and EXE file name *Modified “How to Disconnect the Camera”

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INTRODUCTION

Including

*AVM-USB2 1pcs



*AVM-USB2(Type-C) 1pcs



Support camera

WAT-240E/FS model only(Serial No. : W166******)

*WAT-240E/FS, which serial number starts with W176******, is not supported.

Equipment

PC REQUIREMENTS

OS : Windows 11
USB : USB 2.0

USB CABLE REQUIREMENT

CABLE TYPE :
*AVM-USB2 : A (PC side) - micro-B ([AVM-USB2] side)
*AVM-USB2(Type-C) : A (PC side) - Type-C ([AVM-USB2] side)
CABLE LENGTH :
*AVM-USB2 : Less than 5m
*AVM-USB2(Type-C) : Less than 4m

INSTALL

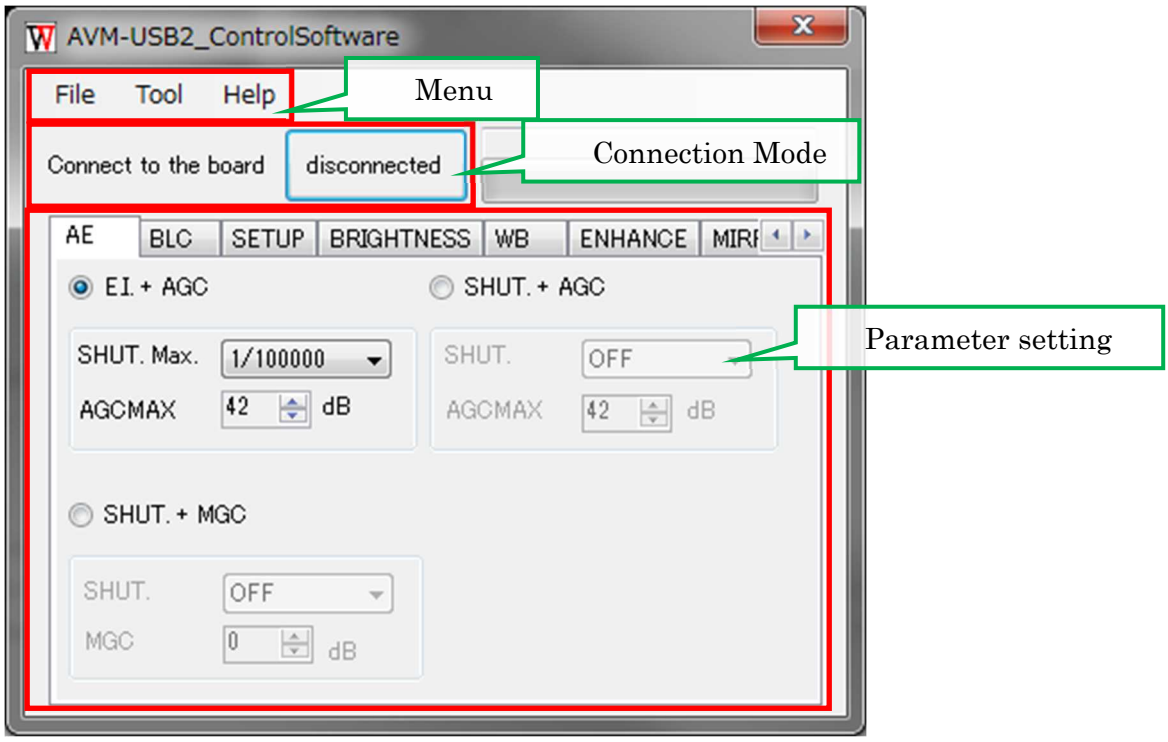
Unzip AVM-USB2_ControlSoftware_(R)_E122.zip

- AVM-USB2_ControlSoftware_(R)_E122.exe
- SLABHIDDevice.dll
- SLABHIDtoSMBus.dll
- ei_agc_max.csv
- initial_rom.csv
- shut_agc_max.csv
- initial.txt … WAT-240E/FS factory default file

UNINSTALL

Delete unzipped files.

DESCRIPTION OF THE APPLICATION



Connection Mode

DISCONNECTED MODE



Not connected to the camera. The software starts up in this mode.
It will not be reflected in the camera if you change the parameters.
You can use to create a parameter file without a camera connection.
When you press the [disconnected] button, and then move to [connected] mode.

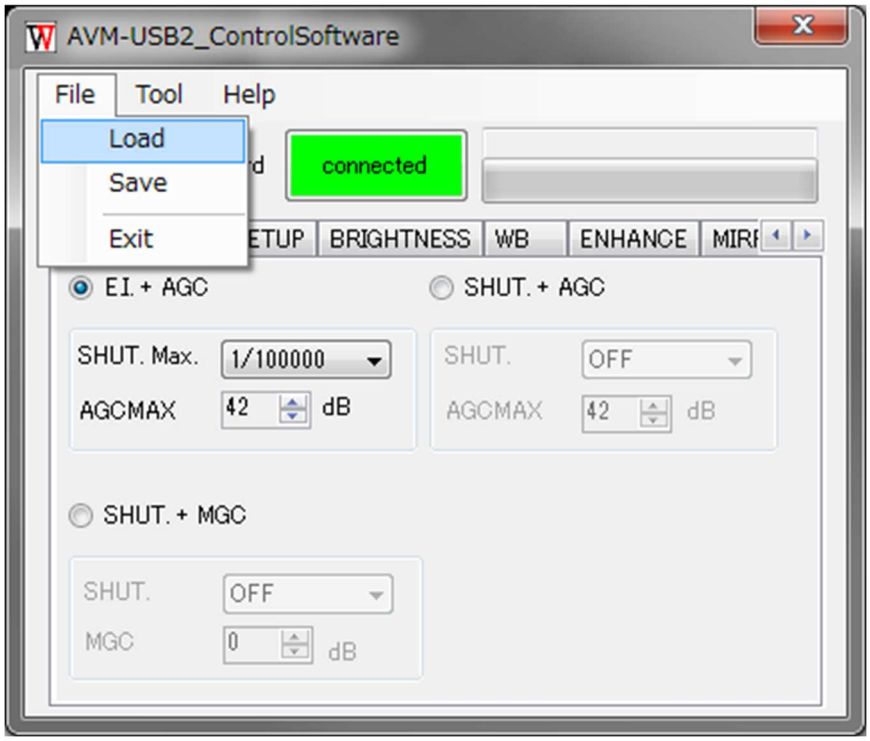
CONNECTED MODE



It connected to the camera.
It will be reflected in the camera if you change the parameters.
When you press the [connected] button, and then move to [disconnected] mode.

Menu

File



Load

Load the parameter file.

In the case of the CONNECTED MODE, the parameter settings are sent to the camera and software window.

In the case of the DISCONNECTED MODE, the parameter settings are sent to the software window only.

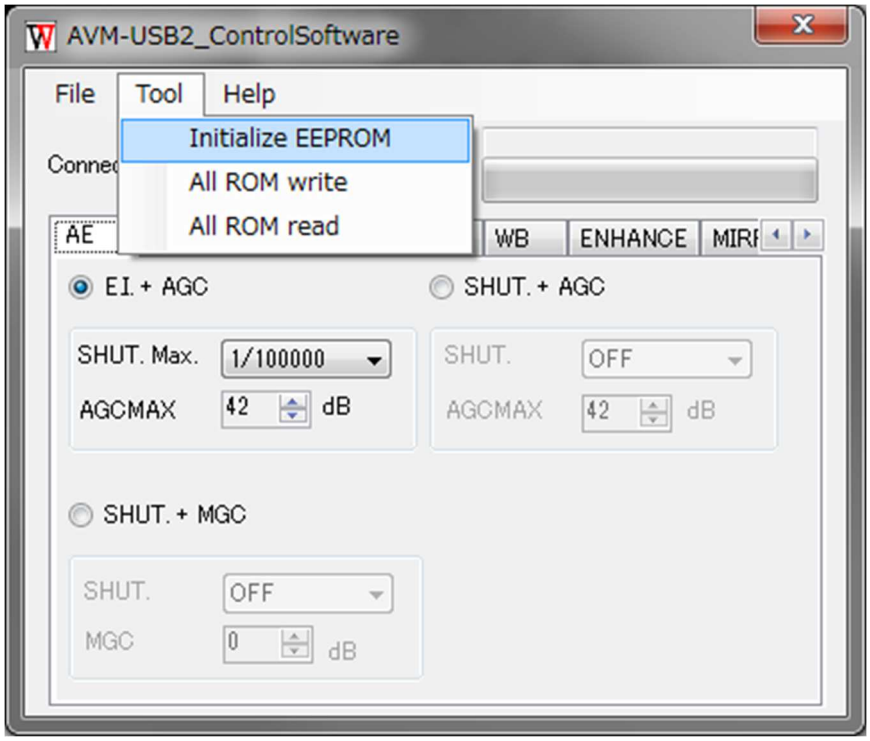
Save

Save the parameters on the current software window to a file.

Exit

Exit this software.

Tool



Initialize EEPROM

Rewrite the parameters of the camera to the factory default settings.

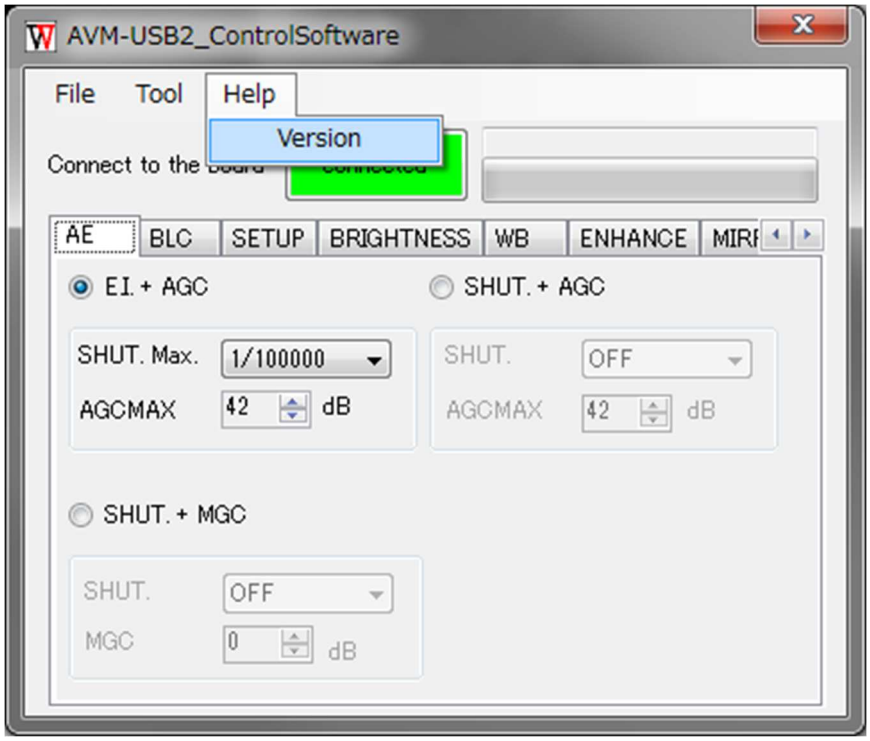
All ROM write

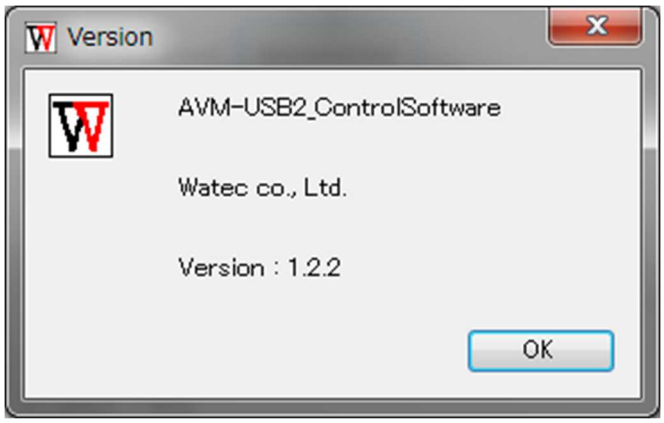
Write the parameters on the current software window to the connected camera.

All ROM read

Read from the parameters on the connected camera to the current software window.

Help





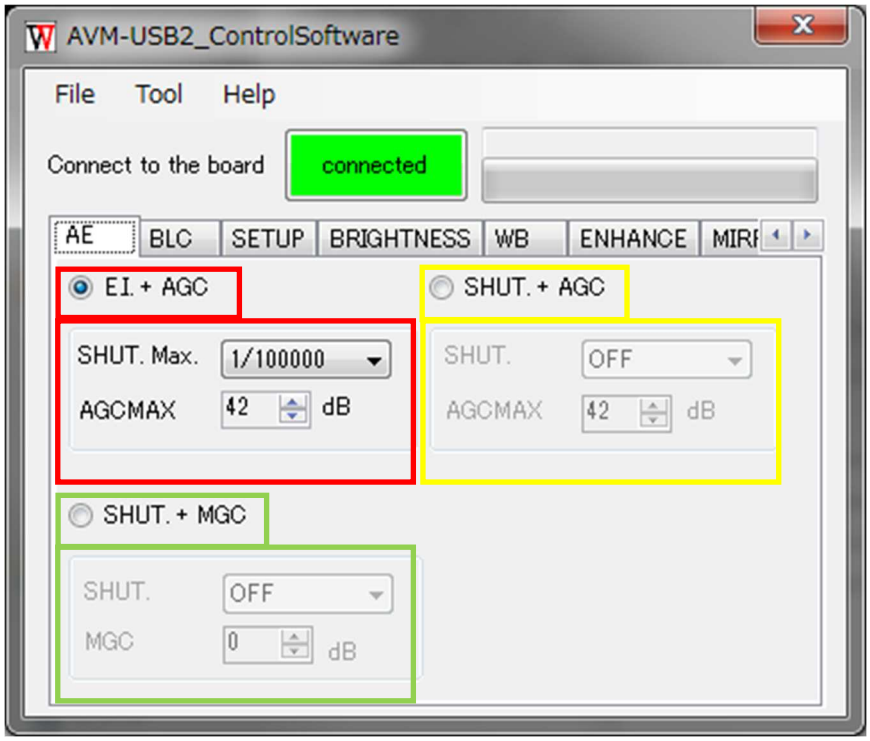
Version

Show the version of this software.

Parameter Setting

AE

Set the exposure mode.



E.I + AGC

Adjust the exposure with the electronic shutter and the automatic gain control.
The maximum electronic shutter speed and the maximum gain can be selected.

SHUT + AGC

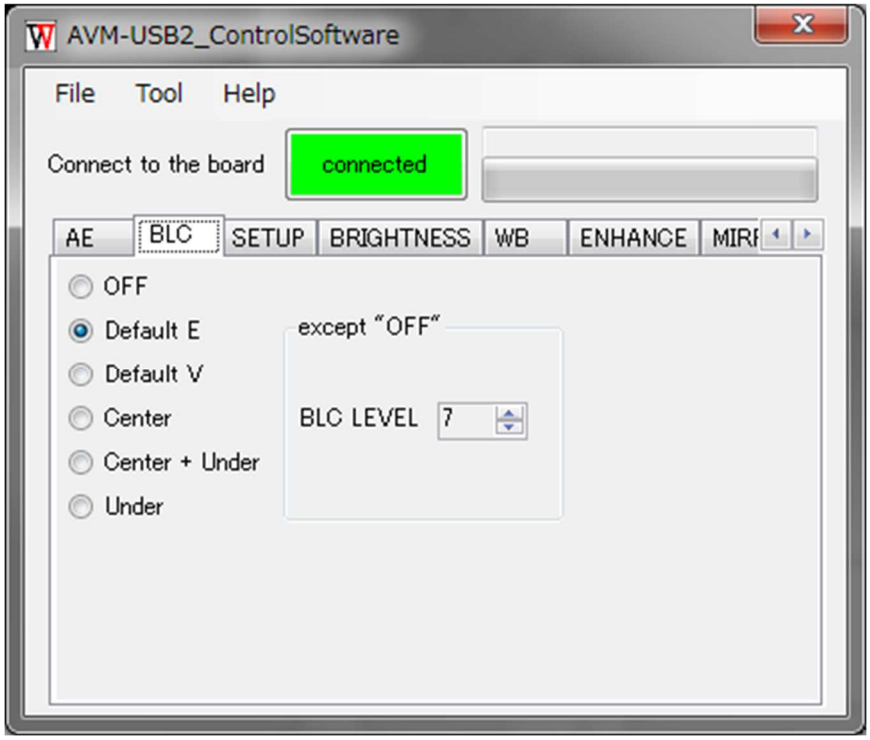
Adjust the exposure with fixed electronic shutter and the automatic gain control. The electronic shutter speed can be selected in OFF or FL. The range of the maximum gain can be selected.

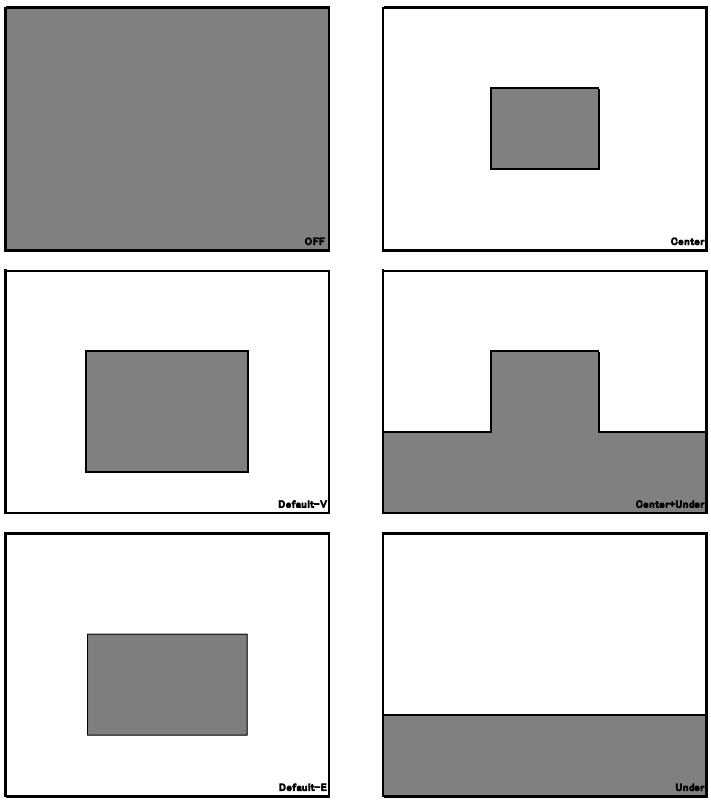
SHUT. + MGC

Fixed exposure mode.
The electronic shutter speed and the gain can be selected arbitrarily.

BLC

Select the backlight compensation mode.



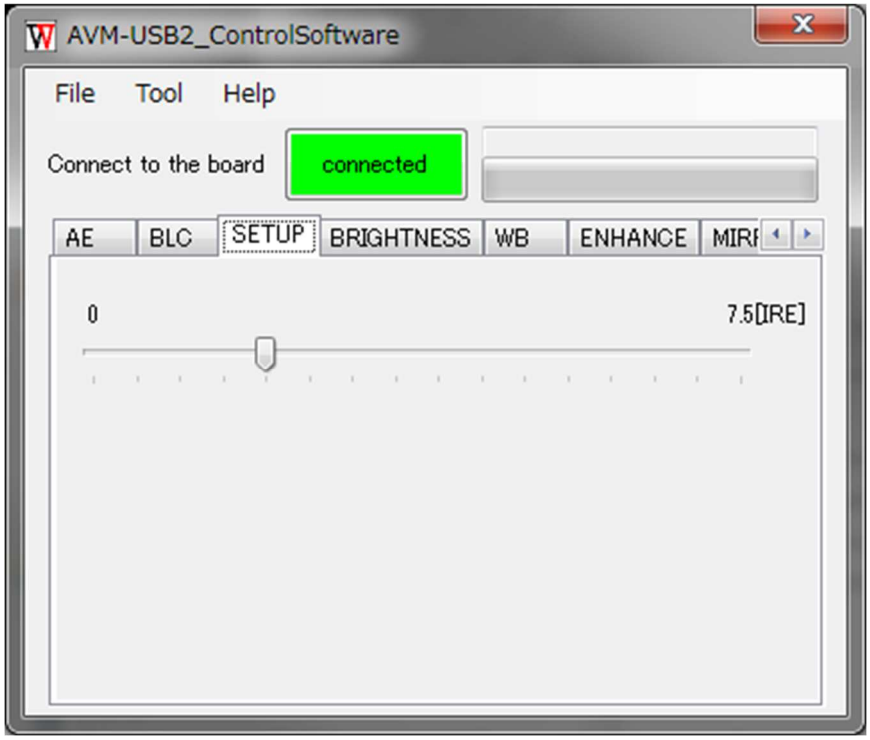


■ : Weighted Area.

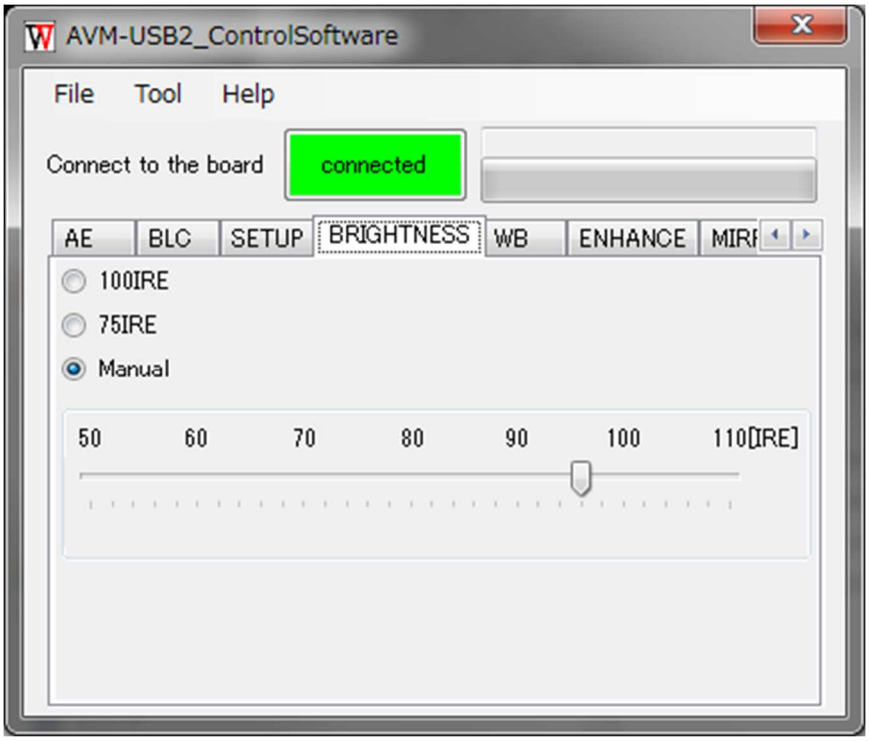
BLC LEVEL

Adjust a compensation level.
When the value is increased, the correction becomes stronger.

SETUP


AVM-USB2_ControlSoftware
File
Tool
Help
Connect to the board
connected
AE
BLC
SETUP
BRIGHTNESS
WB
ENHANCE
MIRI
0
7.5[IRE]

BRIGHTNESS



100IRE

Preset [100IRE]

75IRE

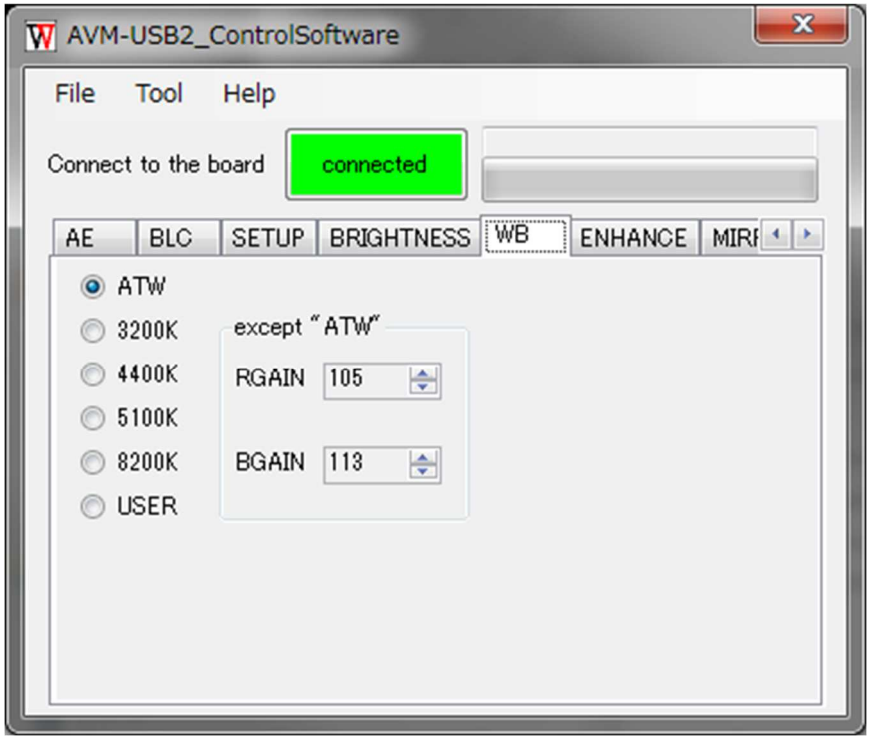
Preset [75IRE]

Manual

Select brightness level manually.

WB

Set the white balance mode and tuning the R and B gain.



ATW

The RGAIN and the BGAIN will be controlled automatically by camera.

3200K

Use for the Incandescent light bulb.

4400K

Use for the reddish fluorescent lamp.

5100K

Use for the bluish fluorescent lamp.

8200K

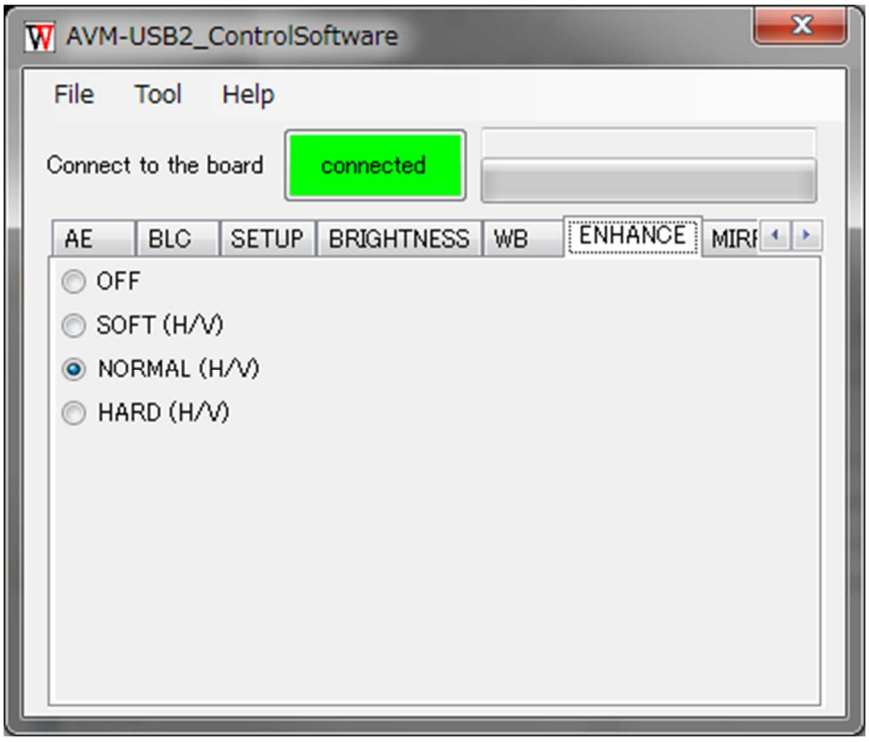
Use for the extremely bluish lamp.

RGAIN/BGAIN

In the mode of non- ATW, you can fine-tune the RGAIN and BGAIN.

ENHANCE

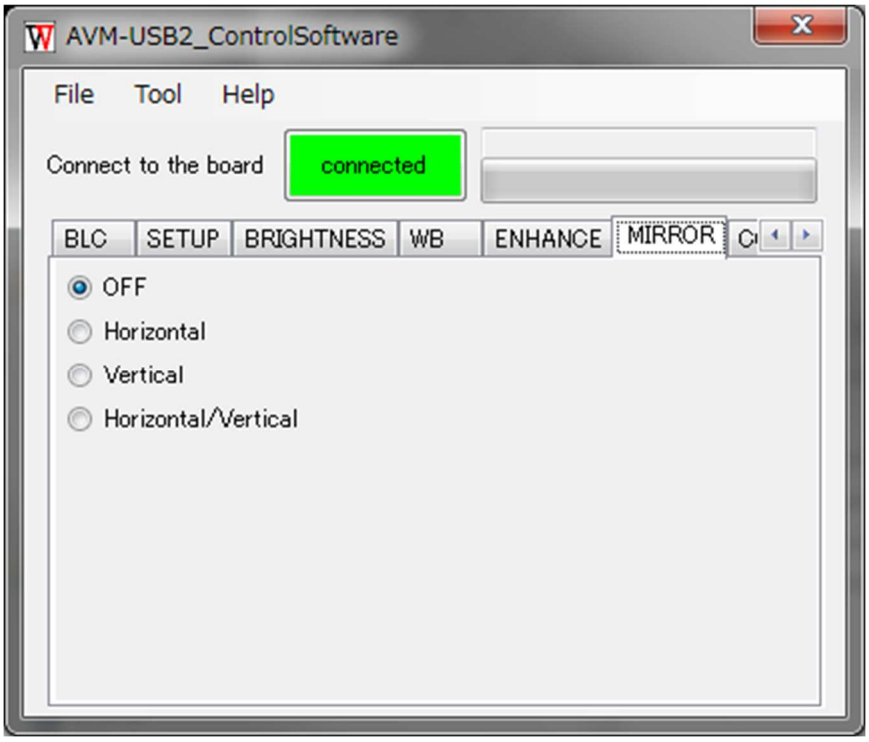
Setting for the edge enhancement of vertical and horizontal directions



- OFF
- SOFT (H/V)
- NORMAL (H/V)　　: Default
- HARD

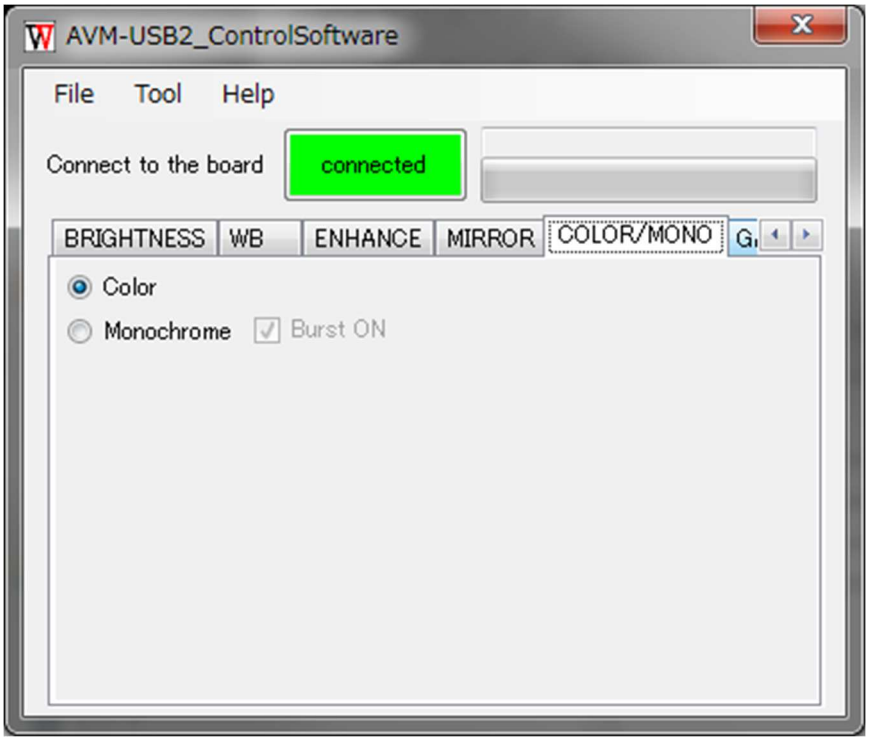
MIRROR

Set the mirror image mode



- OFF : Default
- Horizontal
- Vertical
- Horizontal / Vertical

COLOR/MONO

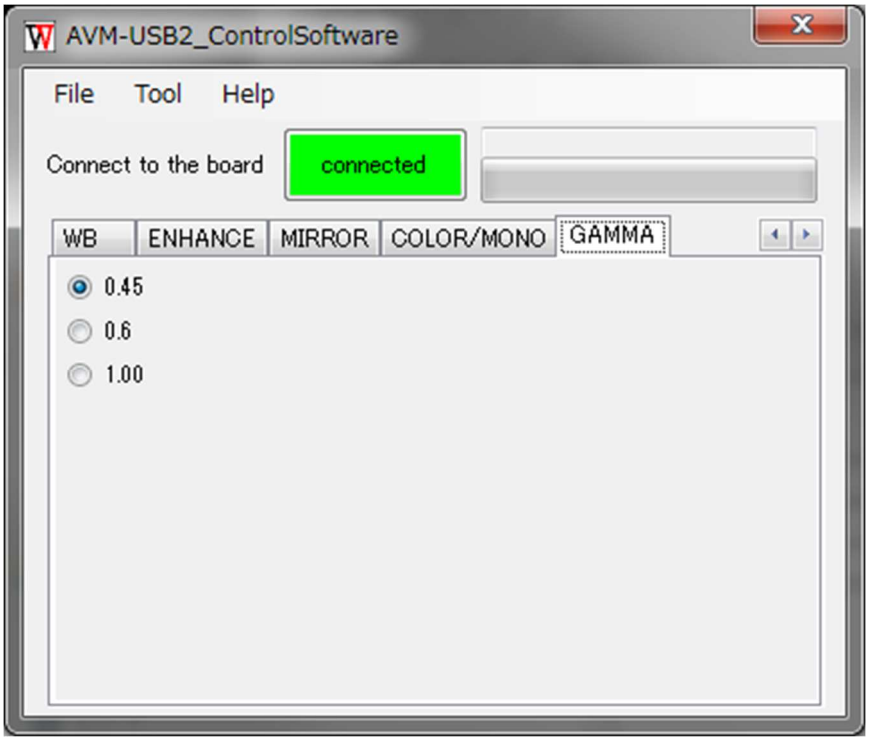


- Color
- Monochrome

Burst ON

If checked, Output a monochrome video signal with the color burst.

GAMMA



0.45

Correct with a gamma of about 0.45 for CRT gamma 2.2.

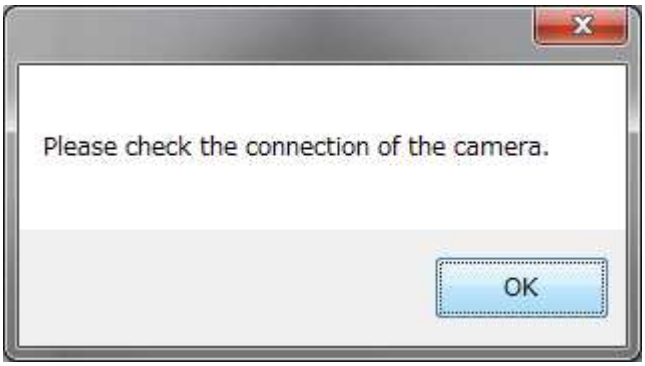
0.6

Correct with a gamma of about 0.6.

1.0

No correction (linear)

ERROR MESSAGE

MESSAGE	SOLUTION
	AVM-USB2 was not detected. Please check the connection of the USB cable.
	Multiple AVM-USB2 have been detected. Please connect only one.
	Unable to connect to AVM-USB2 and the camera. Please re-check the connection between the camera and AVM-USB2.

OPERATION PROCEDURE

1. How to Connect the Camera
   (1) Turn on the camera.
   (2) Connect AVM-USB2 and the camera.
   (3) Connect the PC and AVM-USB2.

2. How to Disconnect the Camera
   (1) Disconnect the camera from AVM-USB2.
   (2) Make sure the power supply to the camera is off.

Caution