

HiKE GigaCam

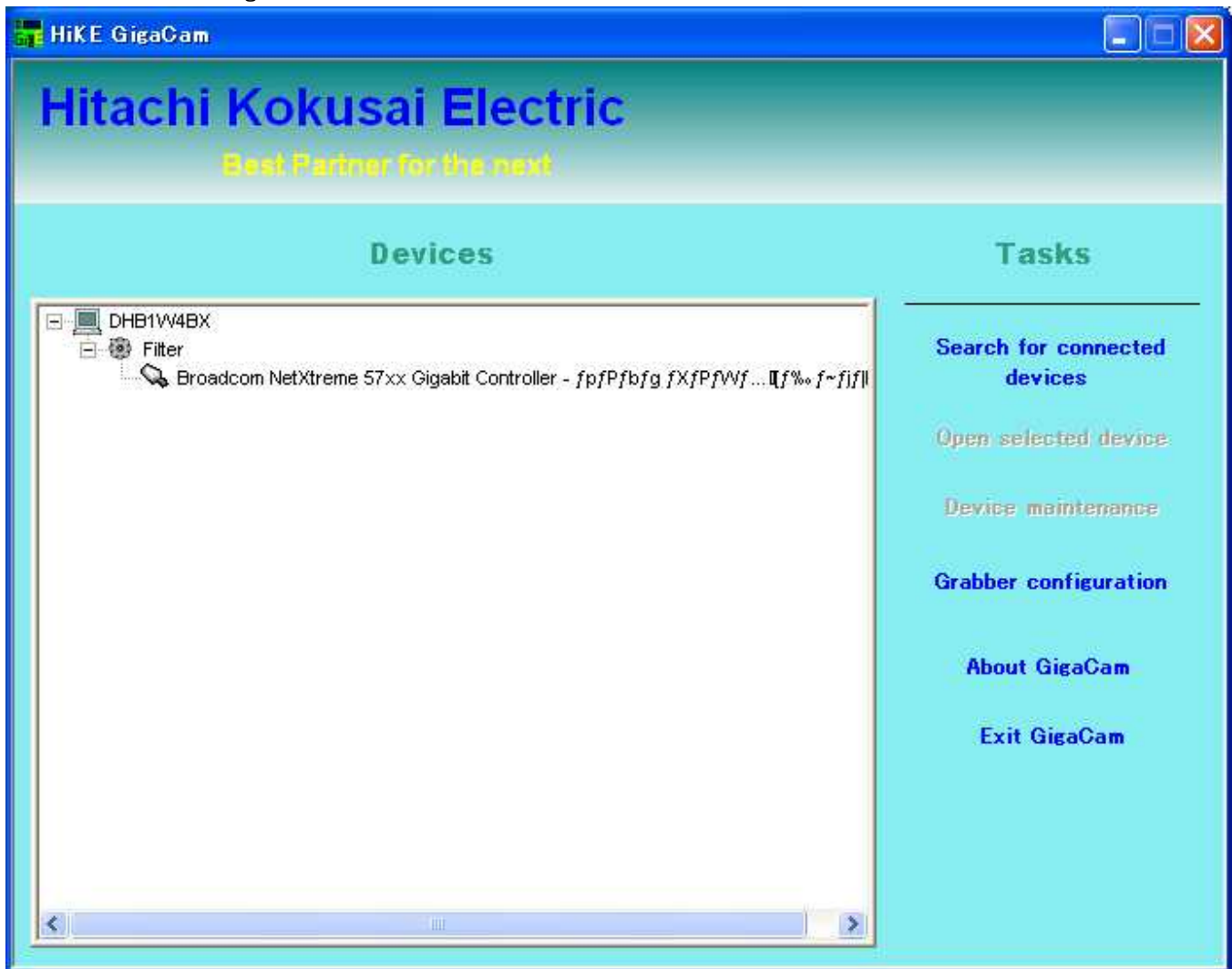
Operation Manual Version 1.01

12th May, 2008

1. Starting the software



Please double click "GigaCam.exe" on screen.

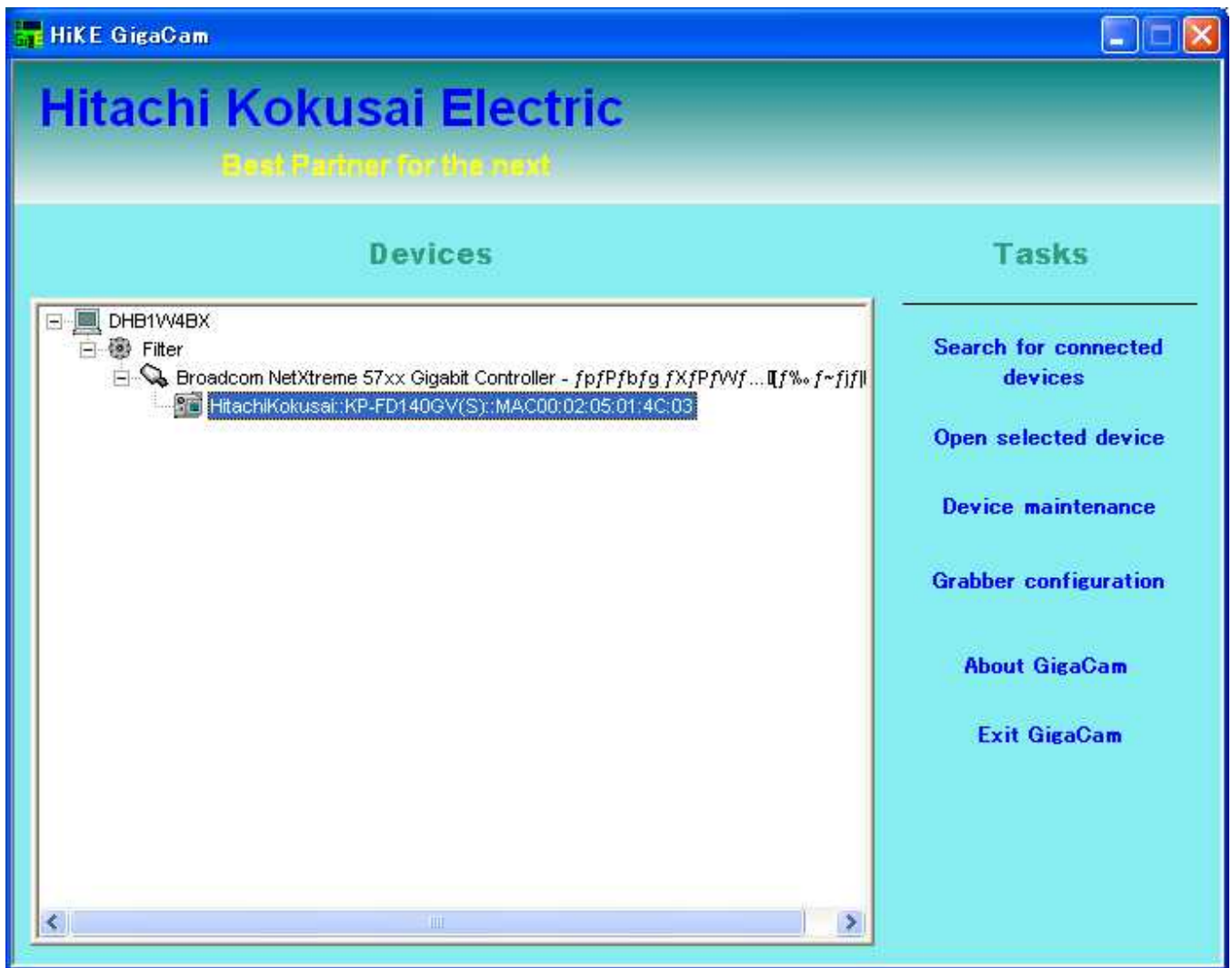


2. Discovery the Camera

Please click the "Search for connected device."

----> If .successful, Vender name and Camera name appear in the "Devices" tree.

----> If failure, the "Devices" tree does not change.



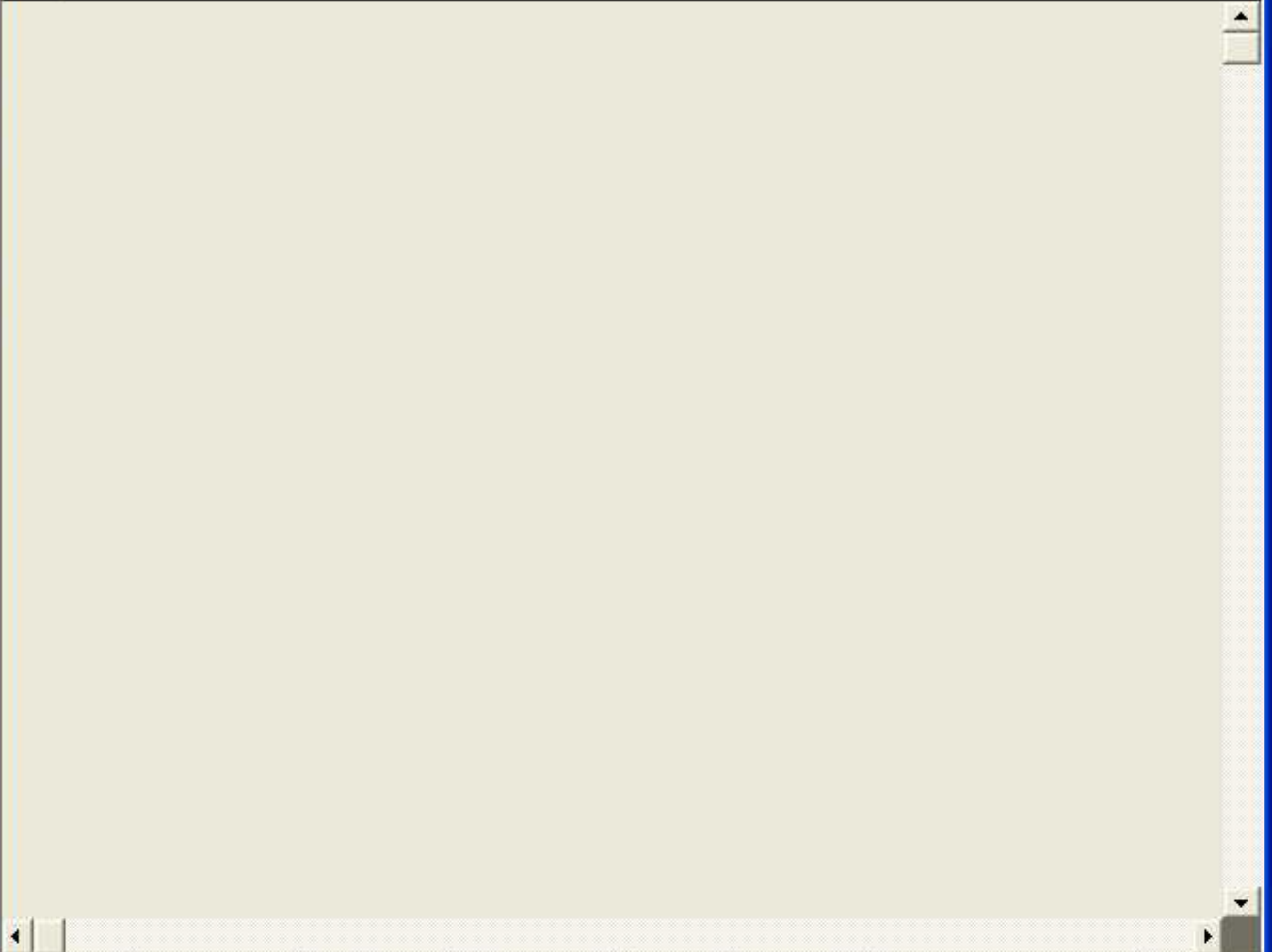
3. Open the Camera

Please select the device you would like to open in the device tree and click "Open selected device".

Hitachi_Kokusai_Electric_Inc::KP-F33GV::MAC00:02:05:01:4D:04



Video Tools



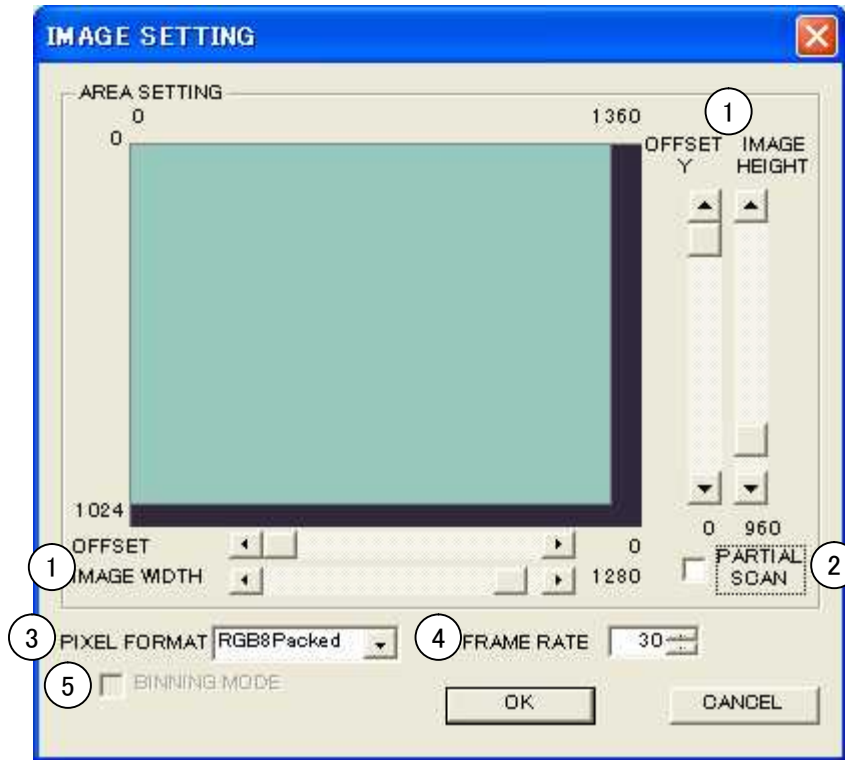
652 X 490

Mono8

CONTROL

4. Image setting

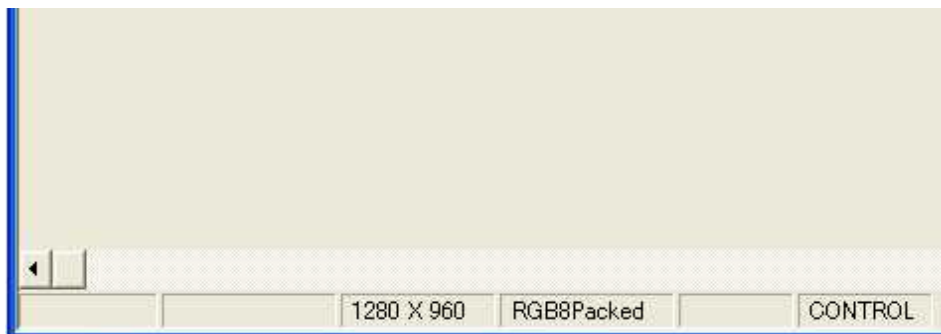
When the "Image setting" of menu "Tools" is clicked, the image setting dialog appears.




[Each part explanation]


- ① OFFSET X / OFFSET Y : Setting of grabbing starting position
- IMAGE WIDTH / IMAGE HEIGHT : Setting of grabbing size
- ② PARTIAL SCAN : If checked, frame rate is increased according to IMAGE HEIGHT
- ③ PIXEL FORMAT : Setting of pixel format (ex. Mono8, RGB8Packed)
- ④ FRAME RATE : Setting of frame rate from 7 (maximum is different in each camera)
- ⑤ BINNING MODE (only for Black & White camera) : If checked, 2 acceleration output by vertical two pixel addition


When "OK" is clicked, dialog is closed and image setting is.




5. Acquisition start / stop

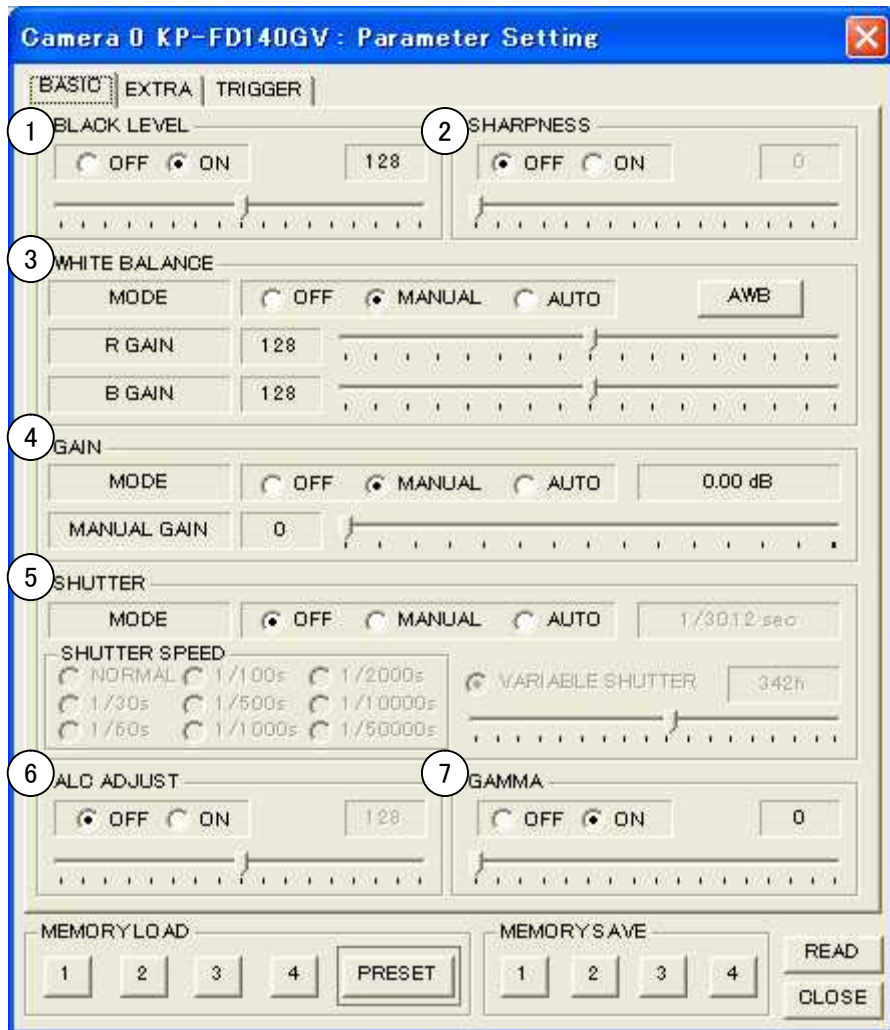
When the icon  of toolbar or "play" of menu "Video" is clicked, live is start.

When the icon  of toolbar or "stop" of menu "Video" is clicked, live is stop.

When the icon  of toolbar or "One shot" of menu "Video" is clicked, grab one shot.

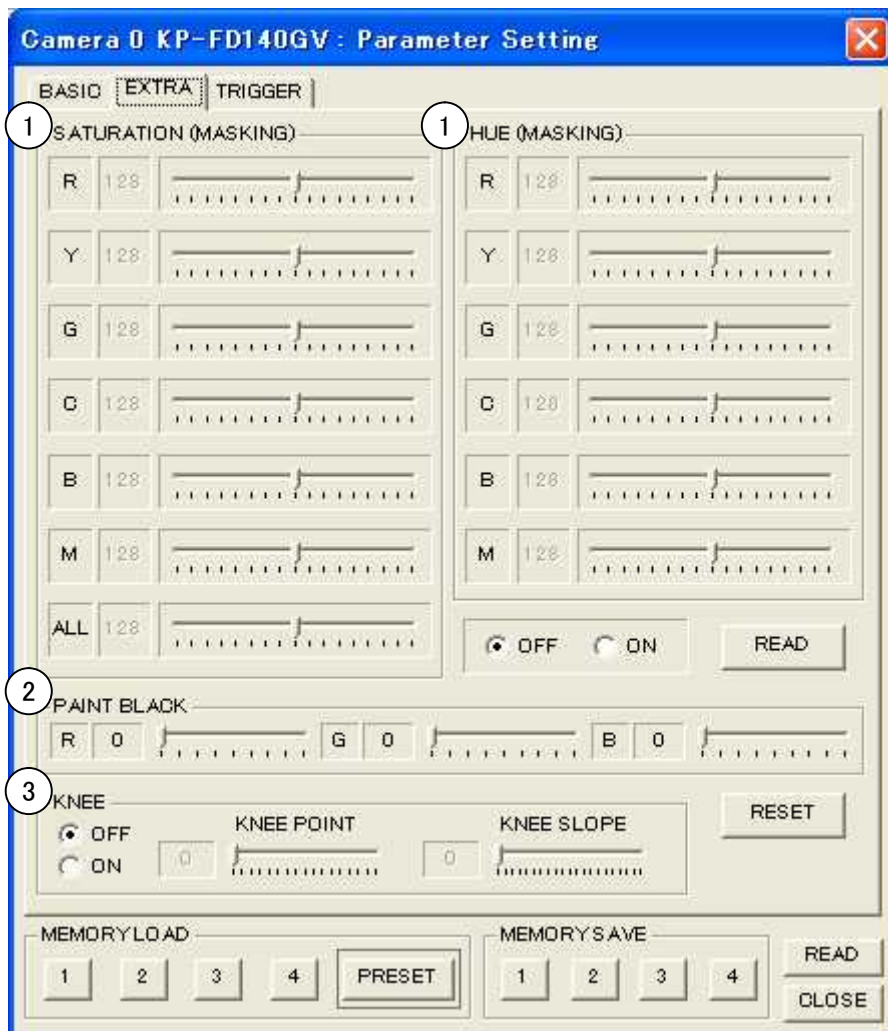
6. Camera control

When the icon  of toolbar or the "Camera control" of menu "Tools" is clicked, the camera control dialog appears.



[Each part explanation]

- ①BLACKLEVEL : Setting of master black
- ②SHARPNESS : Setting of sharpness (object contour correction)
- ③WHITE BALANCE (only for Color camera) : Setting of white balance
- ④GAIN : Setting of electric sensitivity from 0 to 18dB manually or automatically.
- ⑤SHUTTER : Setting of electric shutter
 - MODE OFF : Normal shutter
 - MANUAL: PRESET or VARIABLE shutter
 - AUTO : AES
- ⑥ACL ADJUST : Setting of video level for AUTO GAIN and AUTO SHUTTER
- ⑦GAMMA : Setting of gamma correction



[Each part explanation]

① MASKING (only for Color camera)

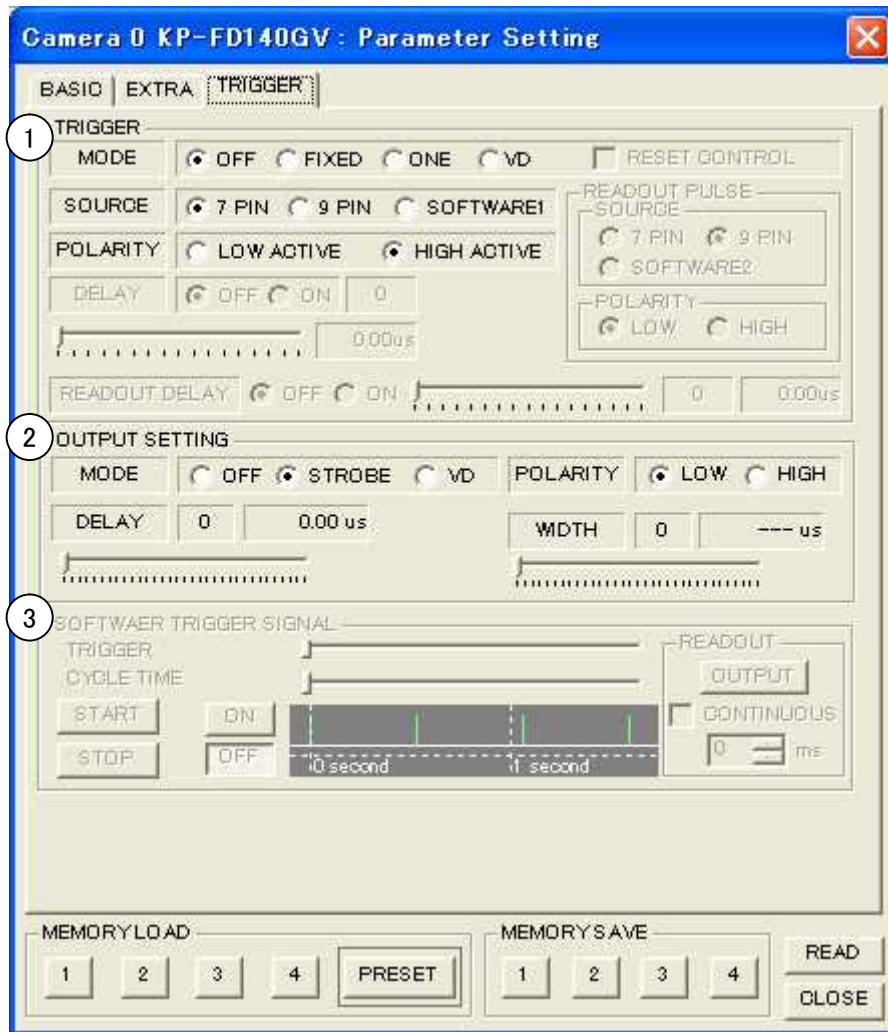
: Setting of 6 color independent masking (saturation and hue)

② PAINT BLACK (only for Color camera)

: Setting of paint black

③ KNEE

: Setting of knee point and knee slope



[Each part explanation]

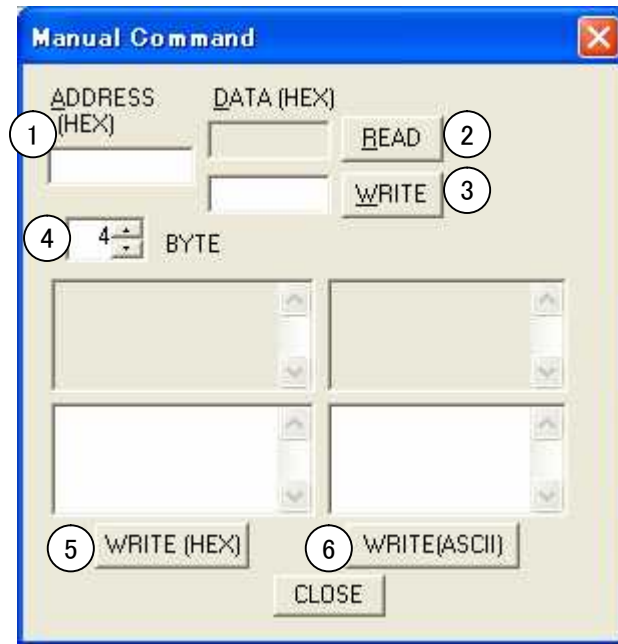
- ① TRIGGER : Setting of external trigger functions
- MODE OFF : It is not used external trigger
 FIXED : It is Fixed shutter mode
 ONE : It is One trigger mode
 VD : It is VD reset mode
- SOURCE LINE1 : Trigger signal is inputted from No.7 pin of DCIN/SYNC connector.
 LINE3 : Trigger signal is inputted from No.9 pin of DCIN/SYNC connector.
 SOFTWARE : Software trigger.
- POLARITY : Select LOW or HIGH active
- DELAY : Setting of trigger delay
- RESET CONTROL : Setting of Reset control mode (available when MODE is FIXED or ONE)
- ② OUTPUT SETTING : Setting of output signal from No. 10 pin of DCIN/SYNC connector
- MODE OFF : Nothing is output
 STROBE : Strobe signal (flash pulse) is output
 VD : VD is output
- POLARITY : Select LOW or HIGH pulse
- DELAY : Setting of strobe delay
- WIDTH : Setting of strobe width
- ③ SOFTWARE TRIGGER SIGNAL : Setting of software trigger signal

7. Register access

When "Manual command" of menu "Tool" is clicked, following dialog appears.

It is possible to access the register of the camera directory.

Both of ADDRESS and DATA must be input by hexadecimal number.



[Each part explanation]

- | | |
|------------------|--|
| ① ADDRESS / DATA | : Hexadecimal number in 4 byte |
| ② READ | : When this button is pressed, read from camera and return value is displayed at edit box of DATA. |
| ③ WRITE | : When this button is pressed, value of DATA is written to camera. |
| ④ BYTE | : The read number of byte is decided. |
| ⑤ WRITE (HEX) | : Numeric data of 4 byte or more is written to camera. |
| ⑥ WRITE (ASCII) | : ASCII data of 4 byte or more is written to camera. |

8. Other tools

When "Waveform" of menu "Tool" is clicked, waveform dialog appears.

When "Histogram" of menu "Tool" is clicked, histogram dialog appears.

When "Vector scope" of menu "Tool" is clicked, vector scope dialog appears (only for color camera).

When the "Save snapshot" of menu "Tools" is clicked, the still image is saved at BMP file.