Native WDM and BroadCast WDM

Manual of QHYCCD Native WDM Driver and BroadCast WDM Driver

QHYCCD WDM Driver is a standard video streaming driver for QHYCCD cameras. It can be used to connect the camera with the application software which support the wdm driver. There is a lot software support wdm driver, eg. amcap, sharpcap, firecapture, ufocapture, handyavi and any of the video chat software like msn , skype etc. If you want to do video online broadcast you can also connect the video encoder software with QHYCCD camera to do it.

QHYCCD supply two WDM driver. One is the native WDM driver and another is the broadcast wdm driver.

Native WDM Driver
When use this driver. the host application software can run the camera directly and control the camera directly. But the video streaming can be required only by this host application. It can not transfer to another applications.

BroadCast WDM Driver
BroadCast WDM Driver is a windows shared video streaming driver. You need to use one host application to connect the camera and control the camera and at the same time the video streaming showing on the this host application can be share to any other of the multiple applications in windows. Currently the host application can be SharpCAP or EZPlanetary. And the application can be any other software which support wdm driver.

Installations
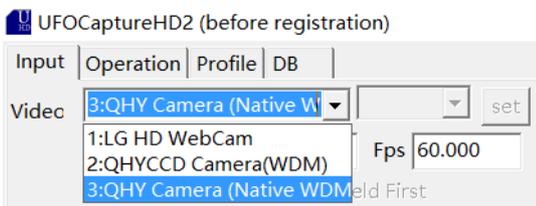You can go to the product web page and download both native wdm driver and boardcast wdm driver and install them.

And please use the **update check software** to confirm the current driver/software is the lastest version.

Use Native WDM Driver (sample as QHY5III174M) in UFOCapture

1.Run UFOCaptureHD2 and select the QHY Camera Native WDM.

2.The QHY5III174 is a progressive camera not interlace camera. So you need to click off the "Interlace" . You an set the FPS, Please note this is only the FPS that the AVI file playback FPS, not the camera's FPS.

You can not set any X, Y size. Only the X,Y size that camera WDM supported can be set.

Please read the camera user manual for the supported resolution in native WDM

3. You can set the exposure, gain and USB traffic in the "set" button.   USB traffic will effect the camera maxium frame rate. When decreasing it, the max frame rate can be increased. In some slow computer you may need increase the USB traffic to control the bandwidth otherwise image maybe hang.
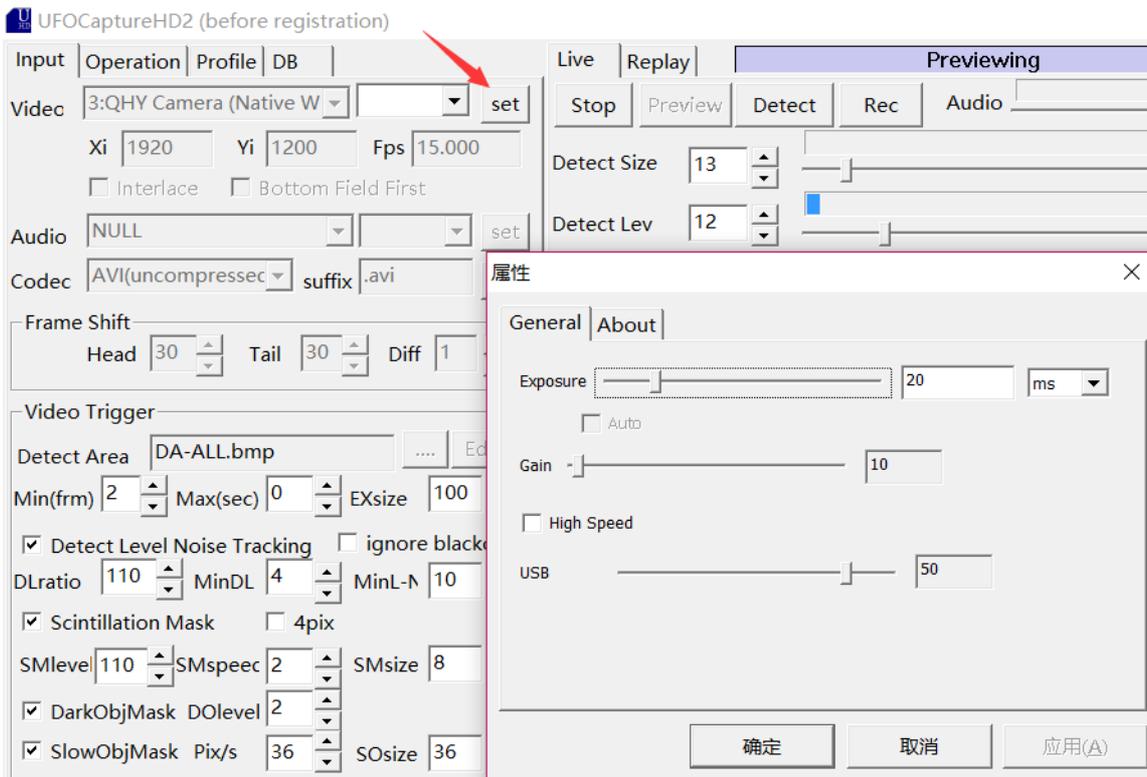
**Note: Currently the UFOCapture only support "YUV" color space mode. The QHYCCD Native WDM support this color space mode. QHYCCD BroadCast does not support this color space mode. So you can only use the QHYCCD Native WDM driver in UFOCapture**

2. Use Native WDM in HandyAvi

Run HandyAvi and select QHY Camera(Native WDM drivr) .You use "video settings" to set the gain,exposure and USB tranffic
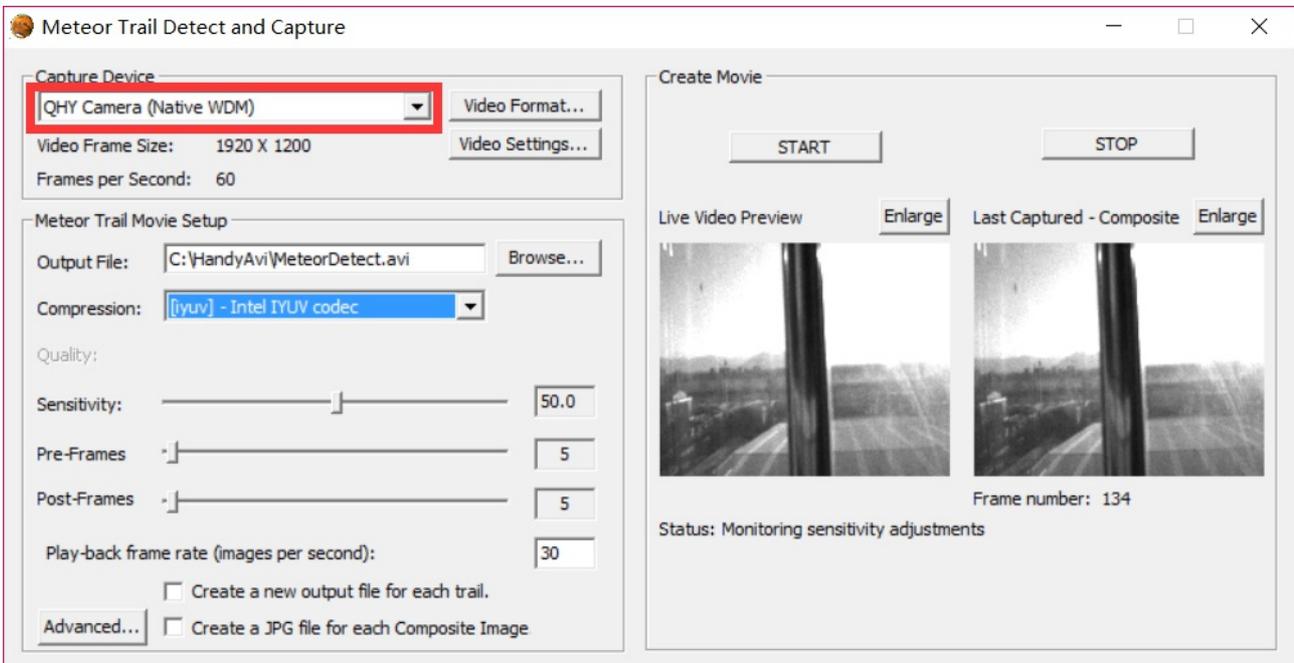
You can also select the resolution in the "video Format"
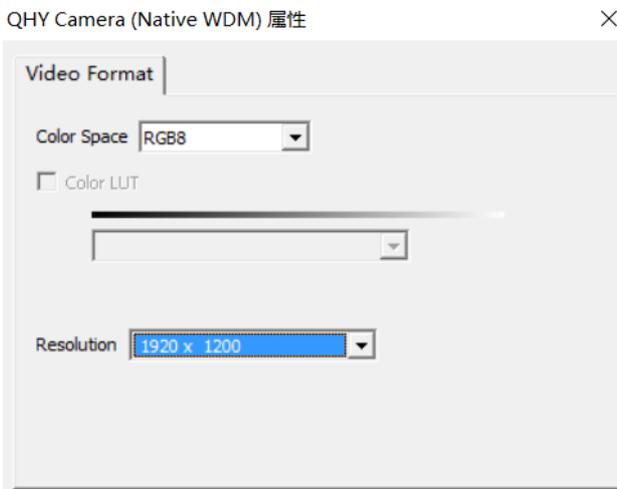
3. Use BroadCast WDM in HandyAvi

Please make sure you have successfully installed the QHYCCD BroadCast WDM driver. Run HandyAvi and select the QHYCCD Camera(WDM)
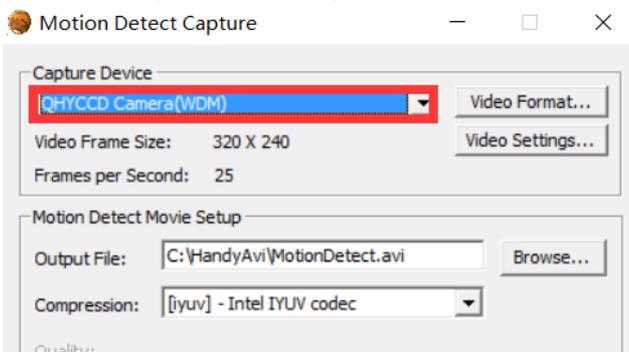
After select the broadcast driver the image shown in the HandyAVI preview window maybe grey an no image. Now we can start the sharpcap and select "enable user BroadCast" . The video displayed in sharpcap will be broadcast to HandyAvi. You can control the gain, exposure and other parameter in SharpCAP.

HANDYAVI DELUXE EDITION

File   Capture   Tools   View   Help

Motion Detect Capture

Capture Device
QHYCCD Camera(WDM)   Video Format...
Video Frame Size: 352 X 240   Video Settings...
Frames per Second: 25

Motion Detect Movie Setup
Output File: C:\HandyAvi\MotionDetect.avi   Browse...
Compression: [iyuv] - Intel IYUV codec
Quality:
Sensitivity: ————————|————————   50.0
Additional frames to capture after motion has stopped: 0
Play-back frame rate (images per second):   30

Advanced...   EMail...   START   STOP

Live Video Preview   Enlarge   Adjust Sensitivity   Enlarge

                                        Frame number: 604

Status: Monitoring sensitivity adjustments

SharpCap - QHY5III174M - C:\Users\Qiu\Desktop\SharpCap Captures

文件(F)   摄像头(C)   选项(O)   拍摄   Tools   Scripting   帮助(H)

开始拍摄(S)   Quick Capture   停止拍摄(T)   暂停   抓图   Live Stack   目标名字:

Previewing : 2301 frames (0 dropped) in 0:04:46 at 8.0 fps (currently at 8.4 fps)

Camera Control Panel

Capture Profiles

Capture Format and Area
Colour Space   MONO8
Capture Area   1920x1200
Binning   1x1
Output Format   AVI fil...   Auto

Camera Controls
Exposure   20.0 ms   LX Mode
Quick Picks   Auto
Gain   0
Frame Rate Limit   Maximum
Amp Noise Reduction   On   Auto
Offset   0
USB Traffic   50
Enable Live Broadcast   On