

OCT User Guide

Mpression Machine Vision Camera

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1. OCT SDK

1.1 OCT SDK Introduction

OCT is a machine vision camera image capture software. It is developed by OCAM, only used for camera's demonstration.

1.2 OCT Interface Introduction

OCT has three display areas. Area1 is used for device control and status check. Area2 is used for video display. Area3 is used for video status checking.

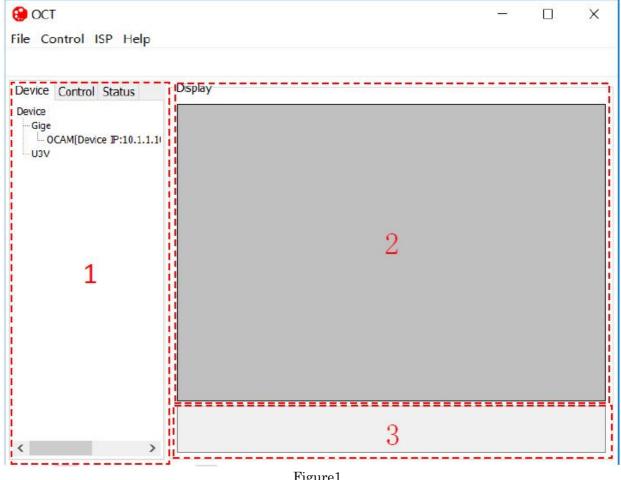


Figure1

1.2.1 Device control and status check area

There are 3 tags in this area, "Device", "Control", and "Status".

After connect with cameras, please check the "Device" tag for camera list checking. It includes 2 type cameras, GigE camera and U3V camera.



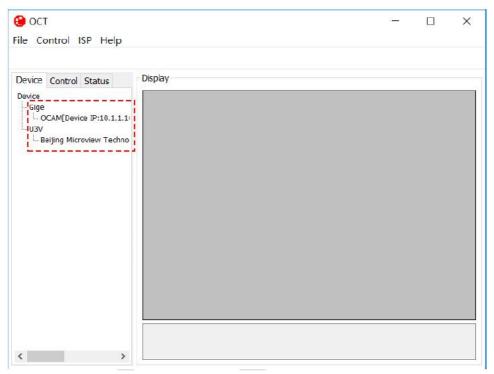


Figure2

Select the camera from the Device tag, then click the right button of mouse. From the pop-up menu, please select "connect -> Window", the video captured by camera will show in the display area. If the connected camera is GigE type, you can set the camera's IP from the pop-up menu by click the "Set IP".

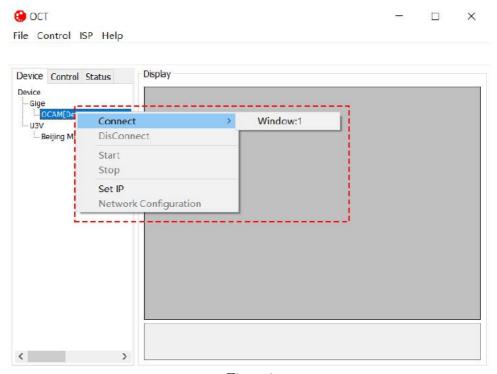


Figure3



After connecting with camera, click the Control tag to find camera's control menu. From below figure, area1 shows control items, area2 shows the description of the selected control item, you can adjust the tag size by drag area3.

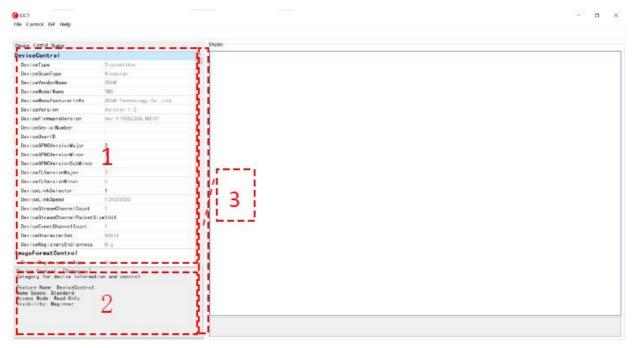


Figure4

The Status tag shows the connected camera and video status as below figure.

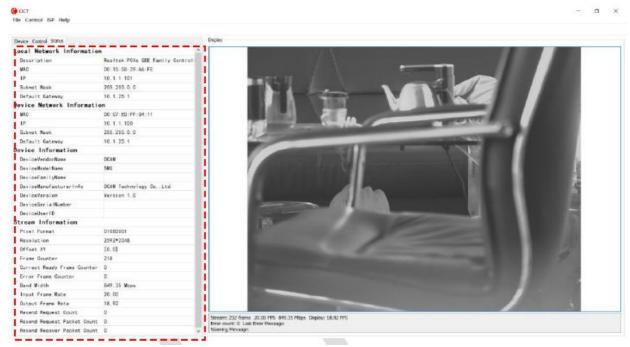


Figure 5



1.2.2 Display Area

In this area, click the right button of mouse. From the pop-up menu, select the camera you want to connect or click the "Start" to display video frame from camera.

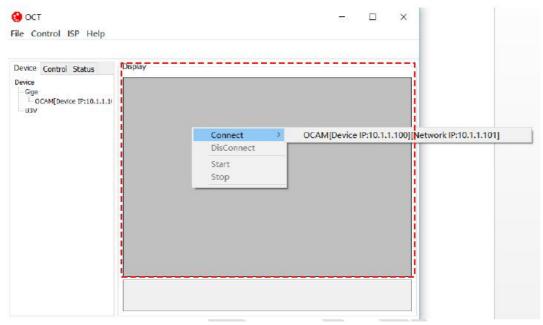


Figure6

1.2.3 Video Status Area

From this area, you can check video stream status, such as FPS, error count, band width etc.

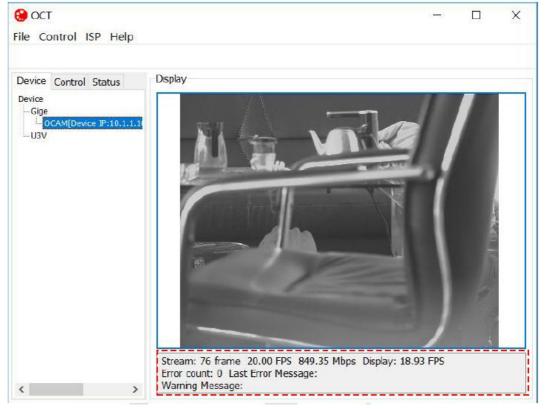


Figure7



1.3 OCT Menu Introduction

1.3.1 Control menu

• Windows – up to 4 windows can be selected to display 4 camera video streams.

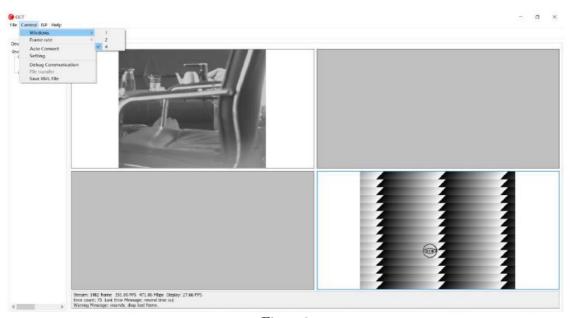


Figure8

• Frame Rate – set up the refresh rate of display

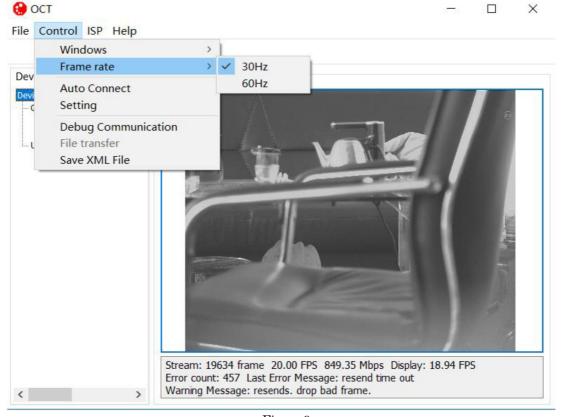


Figure9



- Auto Connect After setting it, the camera will be auto connected when it becomes on-line if it had been connected before. If the connected camera drop the line with video stream display, when it is on-line again, the video stream will display automatically.
- Setting has 2 tags, "communication control" and "Gige stream control". All features set up will take effect after camera re-connect again.
 - Communication control set up heartbeat features and command retry times.

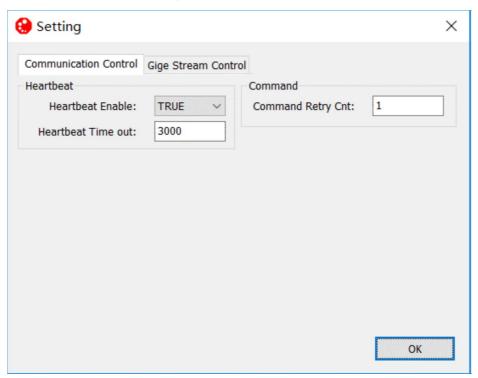


Figure 10

• Gige stream control – set up package lost resend enable and stream buffer size.

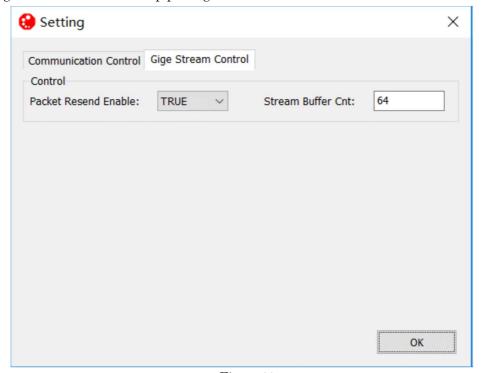


Figure11



- Capture Option Image capture menu, used for setting up the image storage path, image format, and capture type.
 - Local path for image default path is located to the directory "capture" under OCT software installed path.
 - Image format image can be saved as BMP, JEPG or RAW format.
 - Capture type 4 types, please check below figure for details.

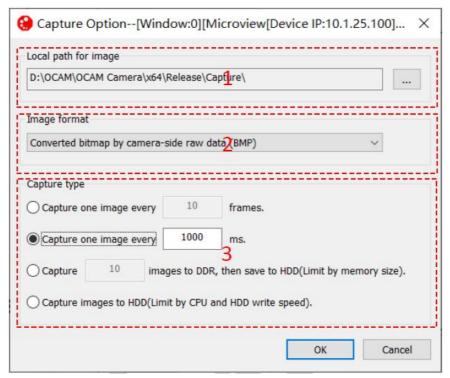


Figure12

After setting up the capture option, you can right click on Display window and find the capture buttons in the pop-up menu.

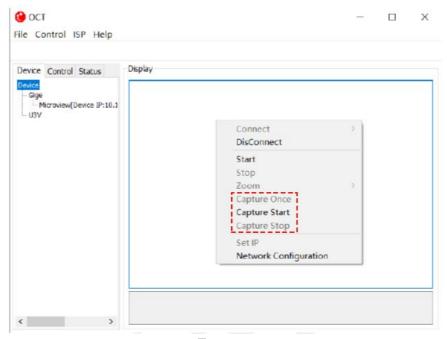


Figure13



- Debug Communication
 - Area1 display communication information
 - Area2 debug command input area
 - Area3 communication port select, including port select (description in XML file), Event port select (description in XML file), input format and output format.
 - Area4 command send button. Select the command in area2, then click the button to send it.

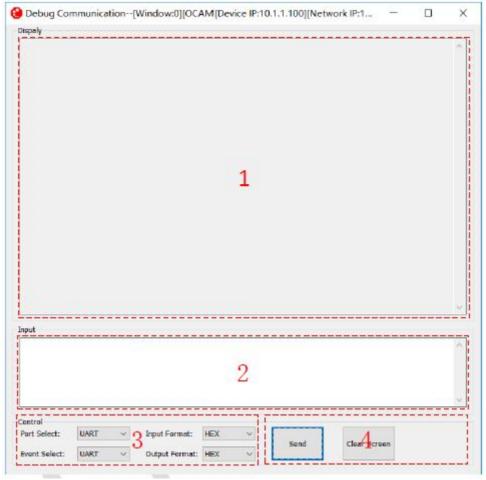


Figure14

- File transfer used for transferring files that is compatible with GenICam standard.
- Save XML file save camera's XML file



1.3.2 ISP Menu

- Bayer Bayer interpolation algorithm selection
 - Normal normal mode, fastest
 - Variable Number of Gradients best performance
 - Edge Aware edge protection

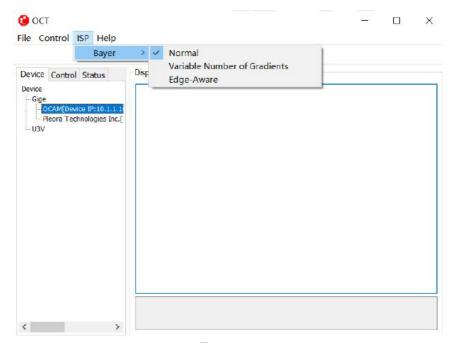


Figure 15



2. Document Revision History

Date	Revision	Changes
June 3, 2020	1.0	English Document created
		•
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