



Image-F

Multi-Face Fever Detection
User Manual for TK130

Version information :

Version	Content	Date
Ver. 1.0	Version 1	2020/6

Table of Contents

- 1. TK-130 Thermal camera 4
- 2. Installation Requirements 4
- 3. Camera Settings
 - 3.1 Log in to the web interface 5
 - 3.2 IP Address settings 5
 - 3.3 Global Parameters settings 6
- 4. Notification on EZ Pro
 - 4.1 Install the setup tool 10
 - 4.2 Setup tool 12
 - 4.3 EZ Setting 13

1. TK-130 Thermal camera

Main feature

Temperature measurement range: 30-45°C

Working temperature: 10-35°C

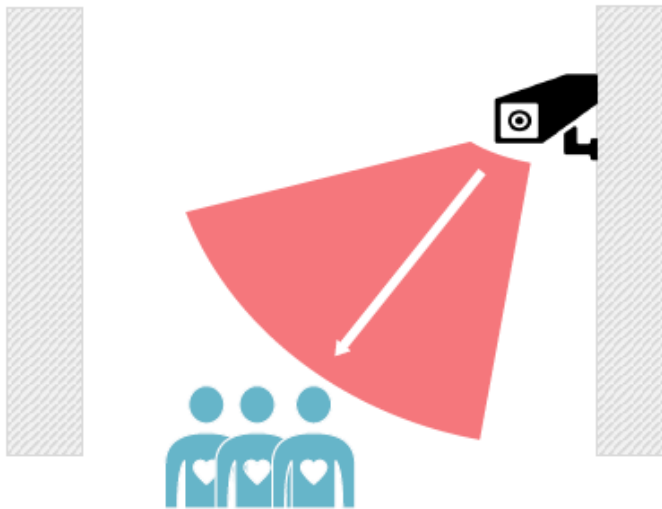
Accuracy: $\pm 0.5^{\circ}\text{C}$

Resolution: 384×288

2. Installation Requirements

Mount the TK-130 to the recommended height, approx. 2.5 meters.

The best detect distance between human & camera is approx. 2.5-9 meters.



3. Camera Settings

3-1. Log in to the web interface

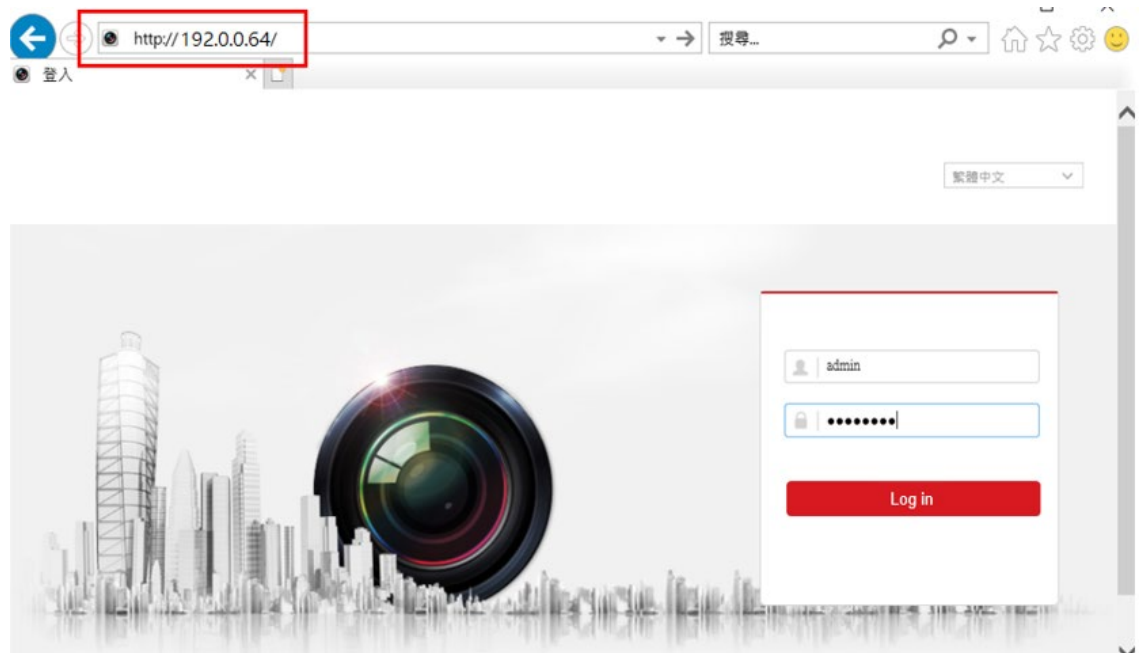
Key in the camera's IP with Internet Explorer to enter the web UI.

The default IP Address would be: 192.0.0.64

The default user credentials would be:

User: admin

Password: 12345



3-2. IP Address settings

The factory default IP Address would be: 192.0.0.64

- Modifying IP using camera web interface

(1) Go to **【Configuration】 > 【Network】 > 【Basic Settings】 > 【TCP/IP】** on web interface

Set up IPv4 address, subnet mask and gateway here.

TCP/IP	DDNS	PPPoE	Port	NAT	Multicast
NIC Type	Auto				
	<input type="checkbox"/> DHCP				
IPv4 Address	192.168.1.64		Test		
IPv4 Subnet Mask	255.255.255.0				
IPv4 Default Gateway	192.168.1.1				

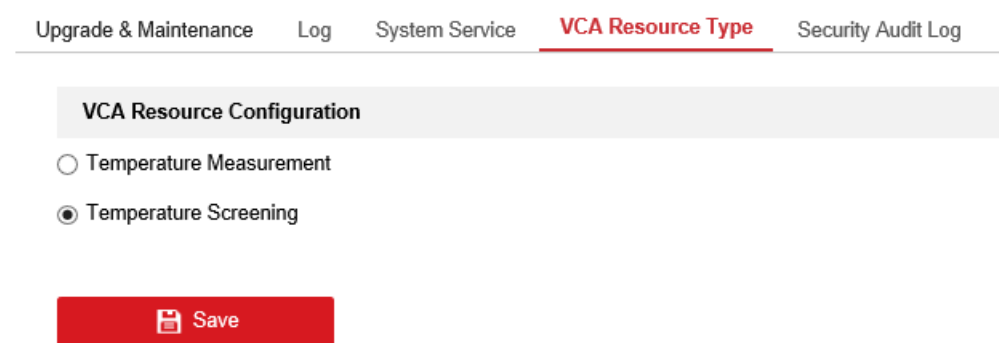
Press  Save to save the change

3-3. Global Parameters settings

Before using TK-130 to detect human temperature, you should set up some parameters

- Go to **【Configuration】 > 【System】 > 【Maintenance】 > 【VCA Resource Type】**

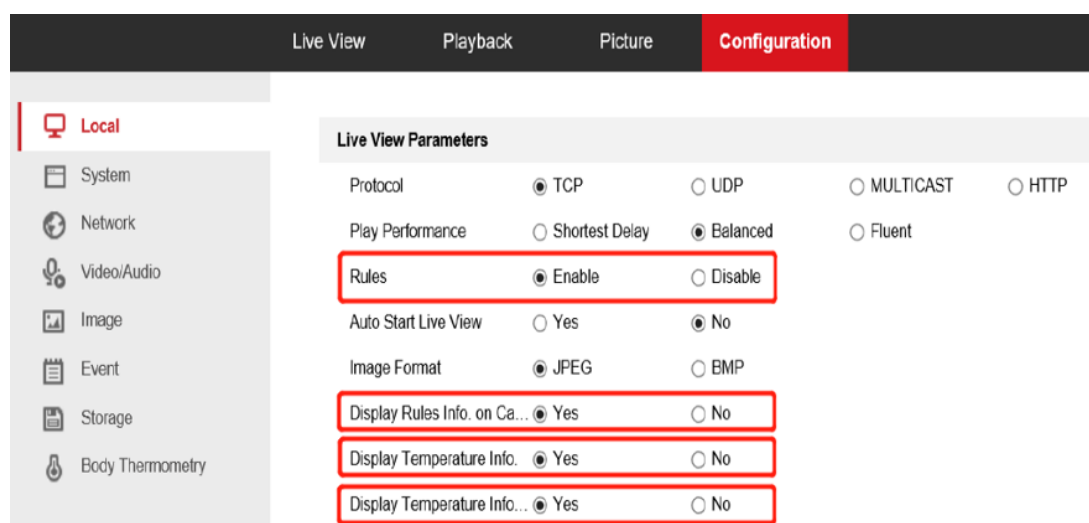
Make sure you have choose the *Temperature Screening*



- Live View Parameters

Go to **【Configuration】 > 【Local】**

Enable and save the following settings:



- Basic Settings
Go to **【Configuration】 > 【Temperature Screening】 > 【Basic Settings】 > 【Basic Settings】**
Choose *Camera 01*, configure and save the following settings:
Please set the distance as the real situation.

The screenshot displays the 'Basic Settings' configuration page for 'Camera 01'. The interface includes a sidebar with navigation options: Local, System, Network, Video/Audio, Image, Event, Storage, and Temperature Screening. The 'Temperature Screening' section is active, showing 'Basic Settings' and 'Face Capture' sub-sections. The 'Basic Settings' sub-section contains the following configuration options:

- Channel No.:** Camera 01 (dropdown)
- ☒ **Enable Temperature Measurement**
- ☐ **Enable Color-Temperature**
- ☒ **Display Temperature Info. on Stream**
- ☐ **Add Original Data on Capture**
- ☐ **Add Original Data on Stream**
- Data Refresh Interval:** 3 s (dropdown)
- Unit:** Degree Celsius(°C) (dropdown)
- Temperature Range:** 30.0~45.0 (dropdown)
- Version:** V2.0.8build20200429 (text field)

Below these settings is the **Target Thermographic Parameters** section, which includes:

- Emissivity:** 0.98 (text field)
- Distance Mode:** Self-Adaption (dropdown)
- Distance:** 3 m (text field)

A red **Save** button is located at the bottom of the configuration area.

- Temperature Screening Configuration
Go to **【Configuration】 > 【Temperature Screening】 > 【Basic Settings】 > 【Temperature Screening Configuration】**
Configure *Camera 01* (Optical) Settings.
(1) Make sure you have set the temperature to ensure alarm and pre-alarm.
(2) Press *Draw Area* to adjust face detection region

Basic Settings **Temperature Screening Configuration** Linkage Method

Channel No. Camera 01

☒ Enable Face Detection
☒ Display Temperature
☒ Upload Captured Face Image
☒ Display Face Temperature Position

Opera...

Configuration Targeting

Face Detection Parameters

Min. Pupil Distance	<input type="text" value="27"/>	✓
Max. Pupil Distance	<input type="text" value="1680"/>	✓
Generation Speed	<input type="range" value="5"/>	
Sensitivity	<input type="range" value="5"/>	
Alarm When Temperatur...	<input type="text" value="37.5"/>	°C
Pre-Alarm Temperature	<input type="text" value="35"/>	°C

06-17-2020 Wed 14:37:35

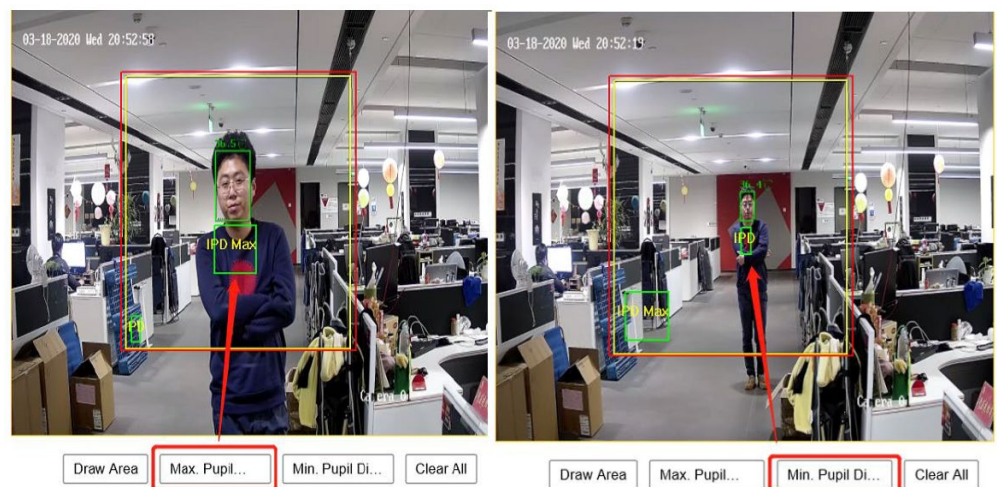
IPD Max

Camera 01

Draw Area Max. Pupil... Min. Pupil Di... Clear All

Save

- (3) Set up Max. and Min. Pupil Distance
You can use the button below the image to set pupil distance. Max and Min distance refer to camera detection distance.



Configure Camera 02 (Thermal) Settings.

Uncheck *Enable Blackbody Correction* If no blackbody is used.


Check.

Enable of Body Temperature Compensation and keep parameters as default.

Manual Calibration can adjust some errors if needed.

Basic Settings Temperature Screening Configuration Linkage Method

Channel No. Camera 02




03-18-2020 Wed 20:53:41

36.67°C

Camera 02

Draw Area Clear All

 Save

Black Body Parameters

☐ Enable Blackbody Correction

Distance 3 m ✓

Temperature 40 °C ✓

Emissivity 0.97 ✓

Body Temperature Compensation

☒ Enable

Compensation Type Auto ▼

Compensation Value 0.8 °C

Manual Calibration 0 °C ✓

Environmental Temperat... Auto ▼

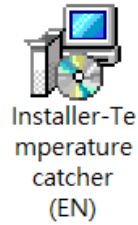
Environmental Temperature 19.5 °C

4. Notification on EZ Pro

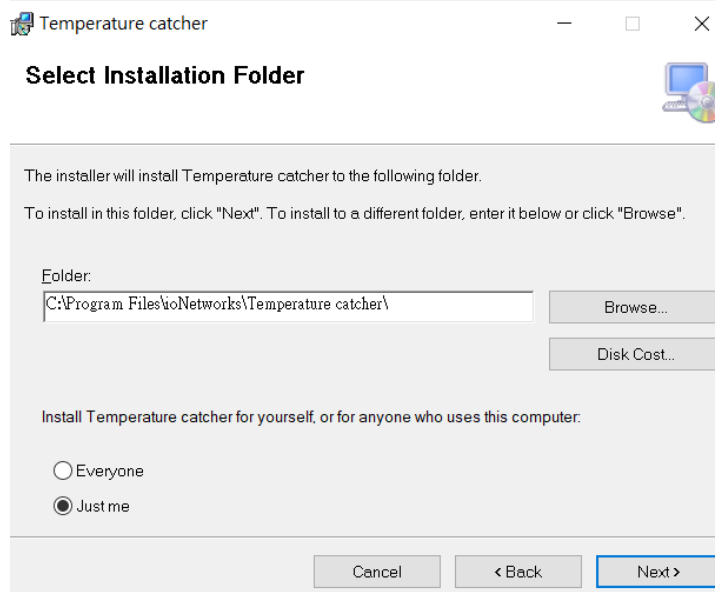
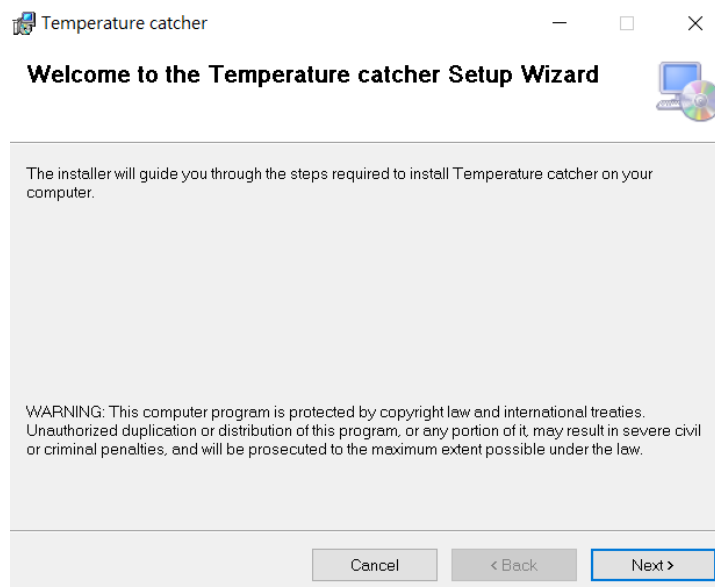
4-1. Install *Temperature catcher*

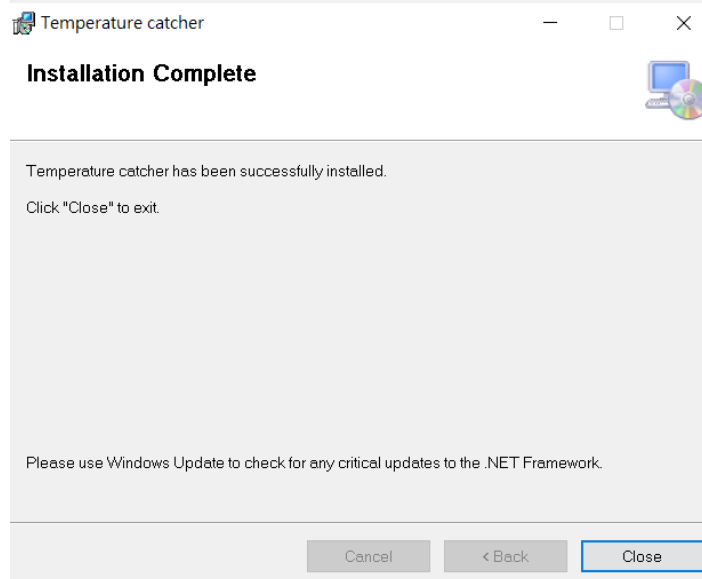
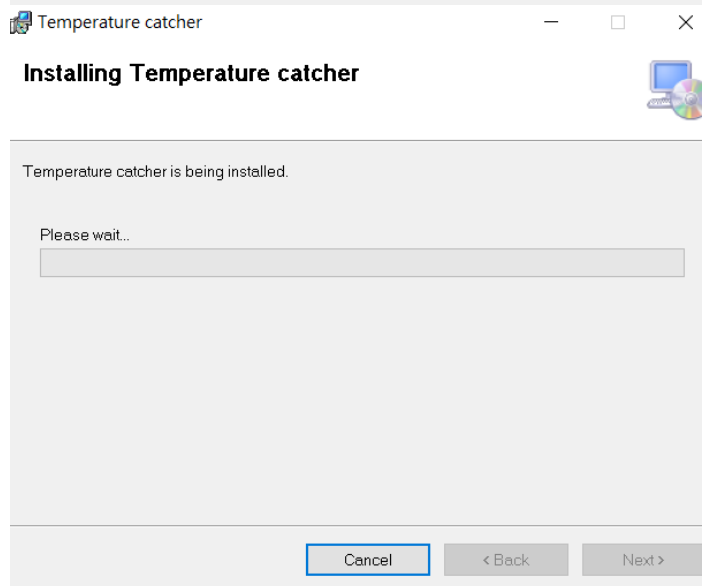
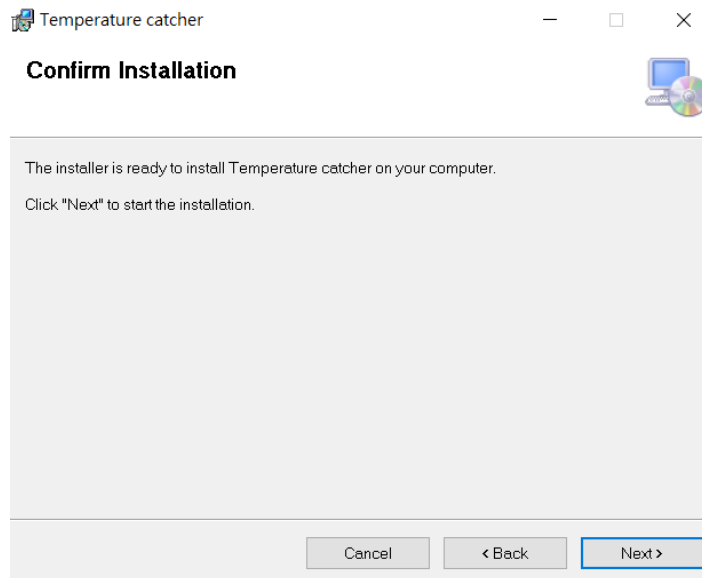
To post notification on EZ Pro, we need to install the setup tool first.

(1) Execute the installer.



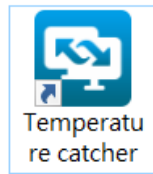
(2) Follow the steps to finish the installer.





4-2. Temperature Catcher Setting

(1) Execute *Temperature catcher*.



- (2) Set the Camera and EZ Pro server information.
Default camera port would be: 8000.
Press Connect can check the connect status.
Set the Alarm temperature.
Don't forget to *save setting* before start service.

Detect Temperature Options ×

Camera Settings

Camera IP : Port :

Username : Password :

EZ Pro Settings

IP : Port :

Username : Password :

Alarm Settings

Temperature :

Windows Service

Status : Not activated

- (3) Stop service before you need to modify settings.

Windows Service

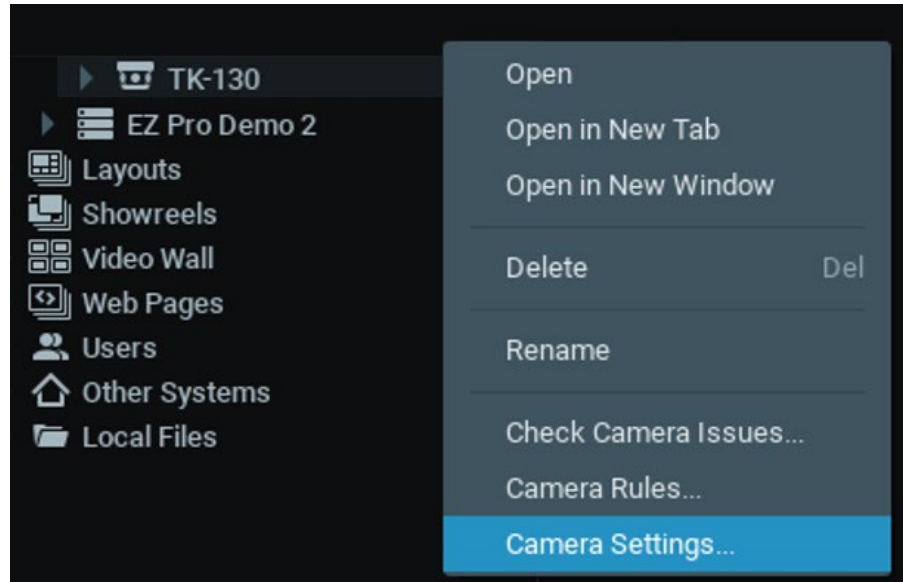
Status : In progress

4-3. EZ Pro Setting

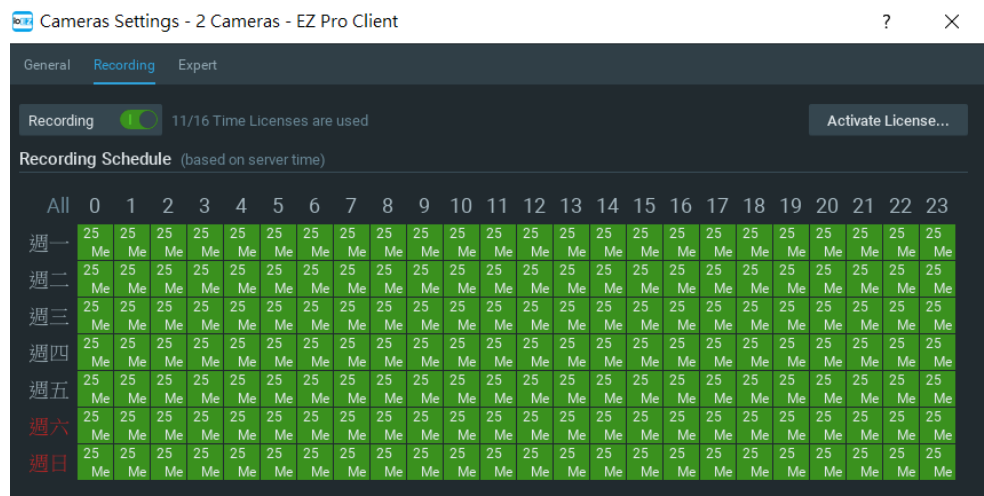
【Camera recording setup】

To use EZ Pro's push notification function, (including alarm triggering and event recording etc.), the camera recording should be properly setup first.

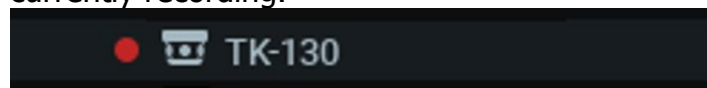
- (1) Right-click on the camera name and select *Camera Settings*.



- (2) In the 【Recording】 tab, turn on the recording and select 【all time frames】 on the “Recording Schedule”



- (3) The small red dot next to the camera icon indicates that the camera is currently recording.



【Adding a new alarm rule】

EZ Pro can receive alarm event from TK-130 and set actions.

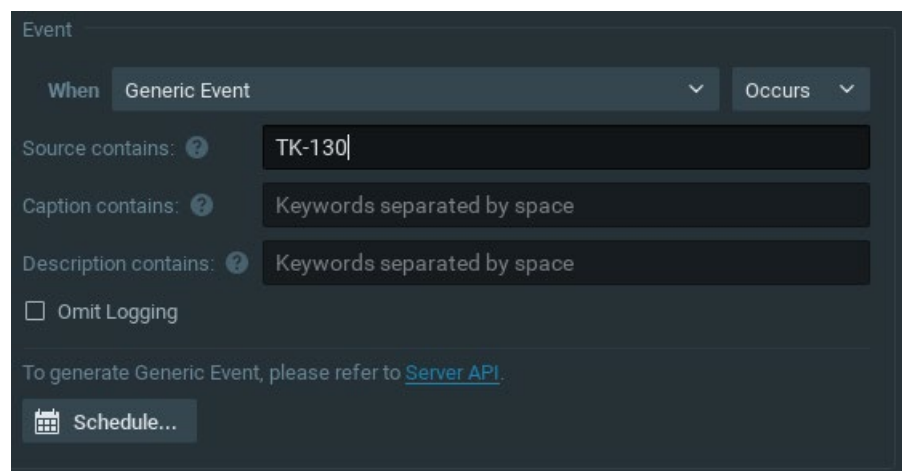
- (1) Add a new event rule 【Main Menu】 > 【System Administration】 > 【Event Rules】 > 【Add Event Rules】



- (2) Setting event rules

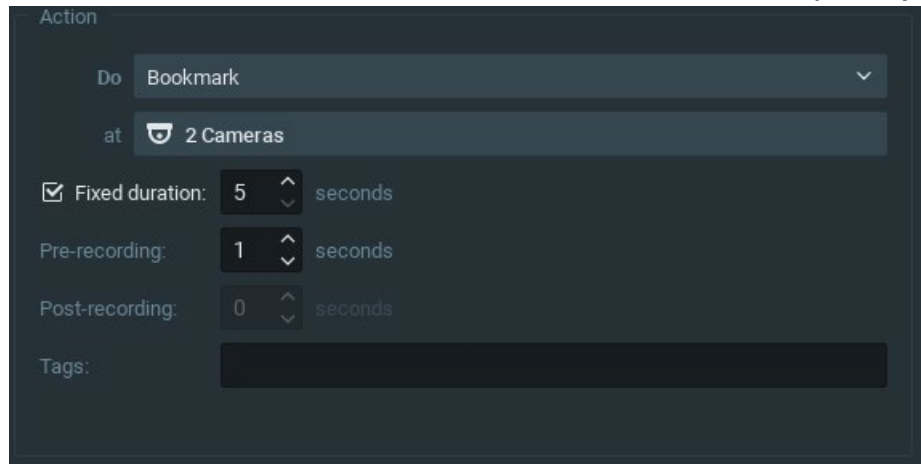
Select *Generic Event*.

Source contains: TK-130



(3) Setting an alarm action

Set an action to be executed by EZ Pro when alarm conditions are met. (E.g. *Play sound*, *insert bookmark* etc.; but only ONE action can be selected at a time. If the user wants EZ Pro to *Play sound* and *insert bookmark* at the same time, then two event rules are required.)



The screenshot shows the 'Action' configuration window. It includes the following fields:

- Do:** A dropdown menu currently showing 'Bookmark'.
- at:** A dropdown menu currently showing '2 Cameras'.
- Fixed duration:** A checkbox that is checked, followed by a numeric input '5' and the unit 'seconds'.
- Pre-recording:** A numeric input '1' followed by the unit 'seconds'.
- Post-recording:** A numeric input '0' followed by the unit 'seconds'.
- Tags:** A text input field.

(4) Click *OK* and *Save* to complete alarm settings.