Device: Panasonic PTZ

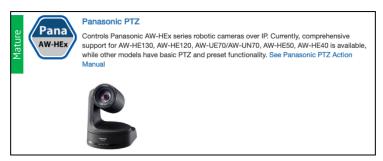


Compatibility

With our Panasonic PTZ Device Core we currently have comprehensive support for the:

- AW-UE150
- AW-HE130
- AW-HE120
- AW-UE70/AW-UN70
- AW-HE50
- AW-HE40

The complete lineup are not supported as the protocol varies for each model. We have integrated with the models we have had a high demand for and/or have had a chance to integrate with. For cameras *not* on the above list just basic pan, tilt, zoom and preset functionality are integrated as the protocol remains the same for these features across all models.



Description of the Panasonic PTZ Device Core from https://www.skaarhoj.com/support/device-cores/

Note about AWB Exec

Notice when an auto white balance is executed the controller will momentarily loose connection to the camera, as the camera stops responding during this process.

Device Configurations

Device configuration options exist:

- Index 0: Connect Timeout in ms
- Index 1: Reply Timeout in ms
- Index 2: IPs for Camera Groups
- Index 3: Time between each parameter query request PER camera in ms

Connect + Reply Timeout

Default Connect Timeout = 100 ms. Timeout for the camera to accept the TCP connection.

Default Reply Timeout = 200 ms. When connection have been accepted, the reply timeout is the time the controller waits for a reply.

In general increasing timeouts will decrease responsive but increase connection stability. The default values have been chosen based on tests at our facility but is not necessarily suitable for all cases.

Camera Groups

Index 2 have the following structure:

D0:2="[xxx.xxx.xxx.xxx, yyy.yyy.yyy,],[zzz.zzz.zzz]"

This enables camera groups. Notice the outer quotes ", if there's an error in this device core option it will fallback to the regular configured IP address. The format is such that each group is an array separated by a comma ,. Inside each group it's also just simple ip addresses separated by a comma ,. There's not any limit to the IPs per group but the system won't handle anything more than 8 per group. There's no limit to the number of groups besides the maximum 13 in the frontend. See example 3 for use case.

Parameter query requests

Default time between *each* parameter query request *per* camera = 1500 ms. To begin with a controller will query all parameters for all cameras connected to a controller. Thereafter a controller will only query parameters updates from the camera on a 1.5 s interval between query requests per camera. This parameter is set to 1.5 seconds to improve connection stability when either:

- Two (or more) SKAARHOJ controllers are connected to the same camera
- A SKAARHOJ controller and a Panasonic controller is connected to the same camera
- A SKAARHOJ controller and the web interface is used to control the same camera

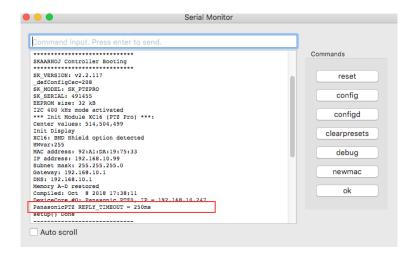
This means if a parameter is changed on SKAARHOJ controller #1 it will not be instantly reflected on SKAARHOJ controller #2, or the Panasonic controller, or the web interface. It also means if a change is made on the Panasonic controller or the web interface it will not be instantly reflected on the SKAARHOJ controller. The parameter query time have been implemented to support cases where one operator is in charge of PTZ control (controller #1) while another operator is in charge shading control (controller #2).

The time can be lowered if you have less complex setups and want faster responds on the connected units. See example 4 for use case.

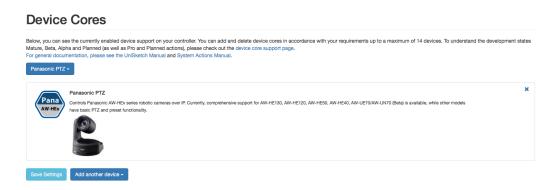
Example 1:

Setting "Reply Timeout" to 250 ms could look like this device configuration code: "D0:1=250" where the general form would be "Dx:y=z" where "x" is the number of the device core as installed on the controller (starting with zero for the first device core), "y" the index number and "z" the value for that index.

To confirm that a device configuration is in fact detected by the controller, please check it out on the serial monitor where it will be mentioned:



Example: If the Panasonic PTZ device core is the first like below:



Then setting the "Connect Timeout" would be set by this configuration under "Manage Media" on your configuration page for your controller on <u>cores.skaarhoj.com</u>

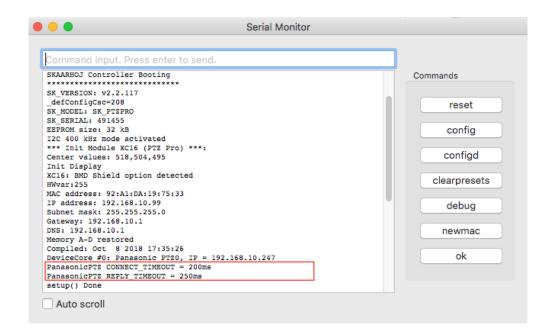


Example 2:

Setting "Connect Timeout" to 200 ms and "Reply Timeout" to 250 ms could look like this device configuration code

D0:0=200,1=250

Manage Media Here, you can add various types of media content to your configuration. Panasonic PTZ Device Core Options Some device cores support additional options that can be defined through this text field. Please refer to the manual for the particular device core for details. D0:0=200,1=250 Strings Add String Images Save Settings Add Image



Example 3:

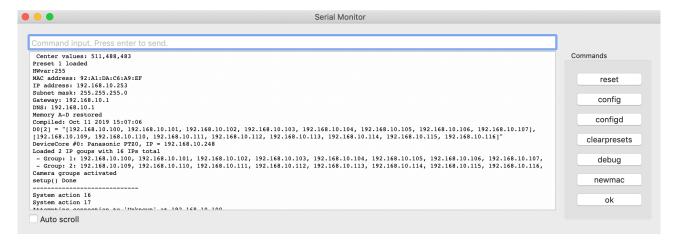
Setting "Groups IPs" could look like this device configuration code

D0:2="[192.168.10.100, 192.168.10.101, 192.168.10.102, 192.168.10.103, 192.168.10.104, 192.168.10.105, 192.168.10.106, 192.168.10.107],[192.168.10.109, 192.168.10.110, 192.168.10.111, 192.168.10.112, 192.168.10.113, 192.168.10.114, 192.168.10.115, 192.168.10.116]"

Where

Group 1 have IPs 192.168.10.100 to 192.168.10.107 Group 2 have IPs 192.168.10.109 to 192.168.10.116

To confirm that a device configuration is in fact detected by the controller, please check it out on the serial monitor where it will be mentioned:



Example 4:

Setting "parameter query request PER camera" to 1000 ms could look like this device configuration code

To confirm that a device configuration is in fact detected by the controller, please check it out on the serial monitor where it will be mentioned:



An excerpt of the list of Panasonic PTZ related actions.

Notice some actions are camera dependent. Please check the camera manual/protocol if specific actions are supported for your type of camera

Panasonic PTZ: Pan Panasonic PTZ: Tilt Panasonic PTZ: Pan/Tilt Panasonic PTZ: Zoom Panasonic PTZ: Zoom (Binary) Panasonic PTZ: Auto Focus Panasonic PTZ: Focus Panasonic PTZ: Focus One Push Panasonic PTZ: Auto Iris Panasonic PTZ: Iris Panasonic PTZ: Sensor Gain Panasonic PTZ: Shutter Panasonic PTZ: Synchro-Scan Panasonic PTZ: Auto Shutter Limit Panasonic PTZ: Shutter Mode Panasonic PTZ: Scene File Panasonic PTZ: AWB Mode Panasonic PTZ: AWB Exec Panasonic PTZ: ABB Exec Panasonic PTZ: Master Pedestal Panasonic PTZ: WB R/B Gain Panasonic PTZ: Pedestal R/G/B Panasonic PTZ: Pedestal Offset (AW-UE150) Panasonic PTZ: Detail Panasonic PTZ: Contrast Level Panasonic PTZ: Color Temperature Panasonic PTZ: ND Filter Panasonic PTZ: Chroma Level Panasonic PTZ: Chroma Phase (AW-UE150) Panasonic PTZ: DRS Panasonic PTZ: Knee Mode Panasonic PTZ: Auto Knee Response Panasonic PTZ: Knee Point Panasonic PTZ: Knee Slope Panasonic PTZ: Preset Panasonic PTZ: Preset Speed Panasonic PTZ: Set Tally Panasonic PTZ: Audio Control Panasonic PTZ: Audio Volume Panasonic PTZ: Output Format Panasonic PTZ: Zoom Pan/Tilt Speed Adjust Panasonic PTZ: Invert PTZ Control Panasonic PTZ: Install Position Panasonic PTZ: Power Panasonic PTZ: Speed Limit Panasonic PTZ: Camera Select ✓ Panasonic PTZ: Camera Group Select