



# UP Series

## Installation manual



*FUP33 and UP36 camera station*

**SIQURA**

**Note: To ensure proper operation, please read this manual thoroughly before using the product and retain the information for future reference.**

UPxx Series  
Installation Manual v1.1.

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Although considerable care has been taken to ensure a correct and suitably comprehensive description of all relevant product components, this manual may nonetheless contain errors and inaccuracies. We invite you to offer your suggestions and comments by email via [info@tkhsecurity.com](mailto:info@tkhsecurity.com). Your feedback will help us to further improve our documentation.

### **How to contact us**

If you have any comments or queries concerning any aspect related to the product, do not hesitate to contact:

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# Important Safety Instructions

	<p>Prior to installation and operation, carefully read all instructions the in this manual and heed all warnings.</p>
	<p>Unpack this equipment and handle it carefully. If the package appears to be damaged, notify the shipper immediately.</p>
	<p>Use the original packaging to transport the unit. Disconnect power supply before moving it. In case of returning the equipment, the original packaging must be used.</p>
	<p>Make sure that the installation surface can support at least four times the weight of the unit in normal operating conditions. In case of excessive external stress (e.g. vibration, strong winds or impact), the equipment may need additional means of protection.</p>
	<p>Proper hardware should be carefully chosen to fasten the unit to the surfaces.</p>
	<p>Use caution when lifting and assembling the unit. It is recommended that non-slip protective gloves be worn during installation. The unit could bear sharp edges.</p>
	<p>Trying to manually force the wiper will result in damaging the device and will void the warranty.</p>
	<p>To maintain the IP rating of the unit, adequate cable glands must be used. The unit must be tightly closed when operating.</p>
	<p>For security reasons, do not install the unit in the proximity of water containers and never push objects or pour liquids into the unit. The unit can be safely used in damp environments or outdoors, as long as the connectors and lids are properly sealed.</p>
	<p>Video and data cables should not share the same conduit with supply voltage cables. Whenever EMC is an issue, adequately shielded cables must be used.</p>
<p>Open only the covers pointed out in this installation manual. Other covers should be open only by the manufacturer.</p>	
<p>This equipment has been designed to operate in harsh environments requiring little or no maintenance. Suggested inspection interval is 6 months, but extremely harsh environments may require more frequent inspection and maintenance checks. On each inspection check the O-ring seals and the eventual window wiper blade integrity. Replace them if necessary. Check cables, electrical connections and mounting hardware for integrity and tightness. Replace or tighten any damaged/loose part.</p>	
	<p>Before performing any operation, turn off the power. The installation of the unit can be performed only by qualified personnel in accordance with the regulations in force. Do not connect the unit to a supply circuit unless the installation is completed.</p>
	<p>Power the unit with 24 Vac / 3 A (75 W) power supply. Incorrect Power Supply Voltage may damage the unit. Do not overload the terminal connection, as it may cause a fire or electrical shock hazard.</p>



<p>An all-pole mains switch with an opening distance between the contacts at least 3 mm in each pole must be incorporated in the electrical installation. The switch must be equipped with protection against the fault current towards the ground (differential) and the overcurrent (magnetothermal, maximum 15A). It must be very quickly recognizable and readily accessible. A suitable blow fuse must also be installed for protection.</p>
<p>Fasten all the cables with cables ties or similar to avoid the electrical contact with surrounding parts in case that terminal blocks screw off.</p>
<p>Electrical connections (such as plugs and cords) must be protected from potential hazardous environmental factors (e.g. foot traffic, hitting objects).</p>
<p>Ensure that the unit case is properly earthed, connecting all the earth ground studs. Earth cable should be about 10mm longer than the other cables on the connector, in such way that it won't be accidentally disconnected if the cable is stretched or pulled.</p>
<p>When leaving the unit unused for long periods, disconnect supply cables.</p>





## Description & Models



The Upright PTZ (UP33 or UP36) is a high-precision, full-featured network PTZ camera providing high-quality, high-definition images. The robust construction of cast aluminium and durable plastics ensures accurate positioning and stable video, both close by and at large distances. The UPxx is designed to operate under extreme temperatures for mission critical applications. It is tested and approved according to the environmental requirements of NEMA TS-2.

### Models

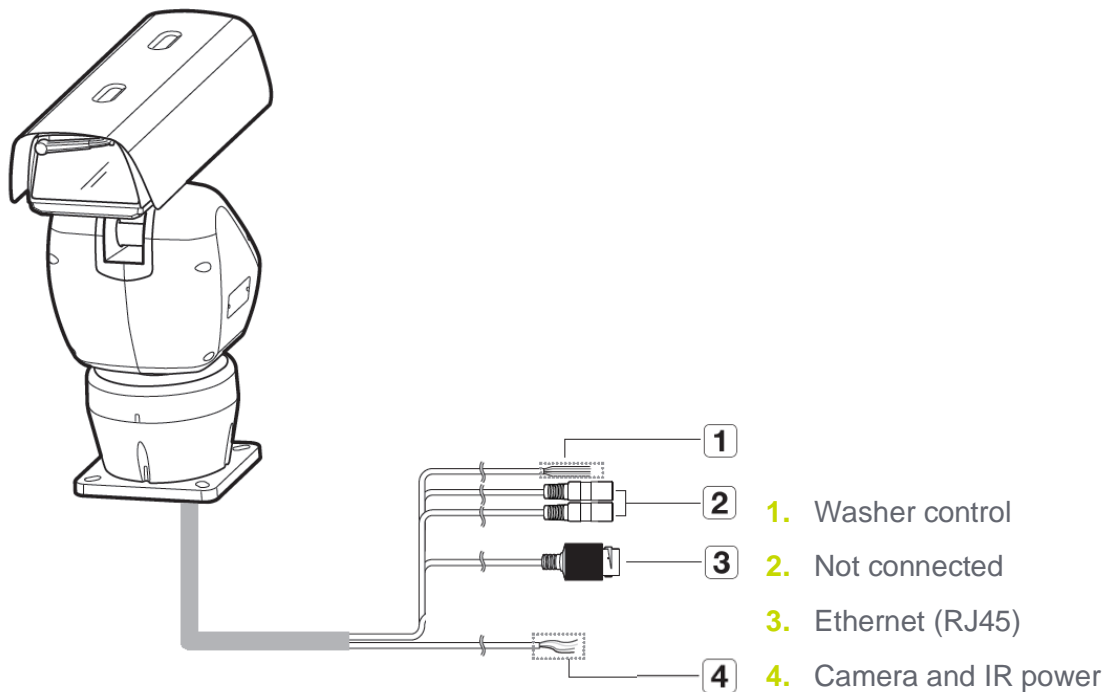
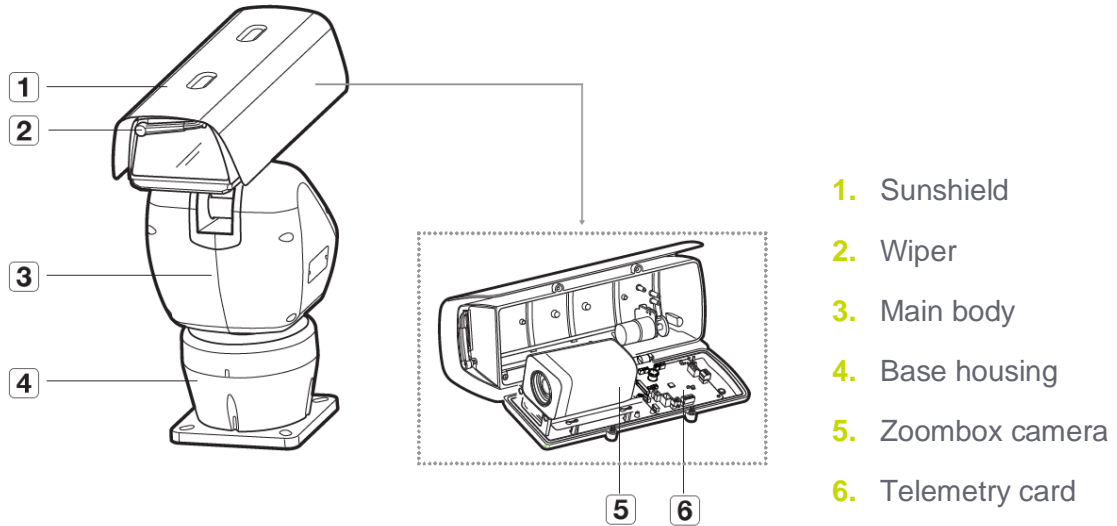
- UP33 - Upright PTZ, 33x zoom, 24 Vac
- UP36 - Upright PTZ, 36x zoom, 24 Vac
- UP-IR200 - IR illumination kit for Upxx, 200m, 25°, 850 nm
- UP-WM - Wall mount bracket for UPxx





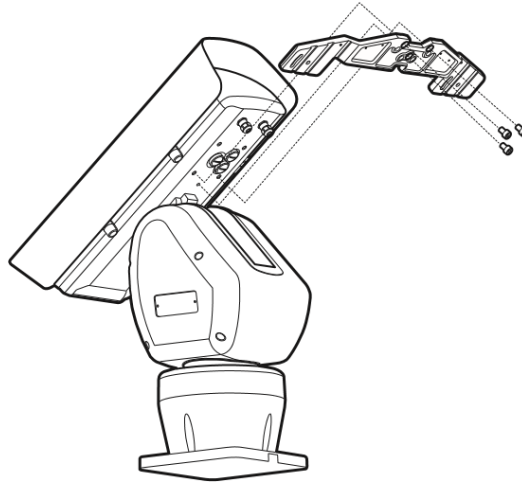
# Installation & Connections

## Overview

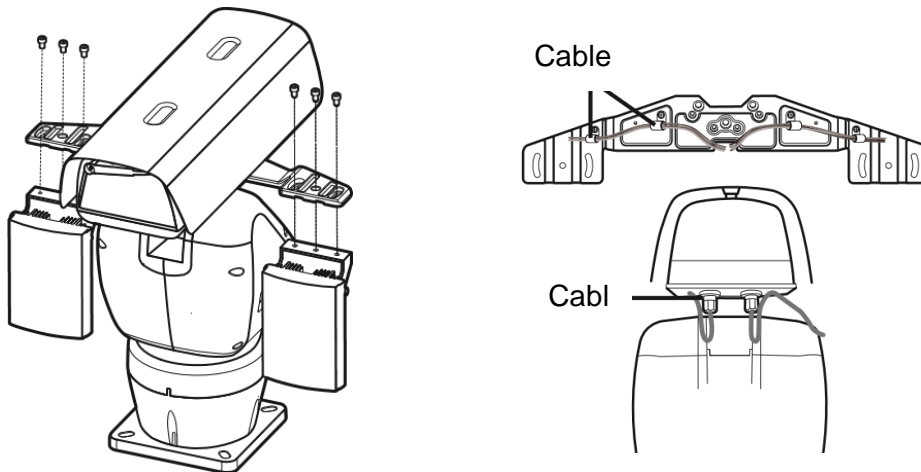


## Installing the optional IR Illuminator (UP-IR200)

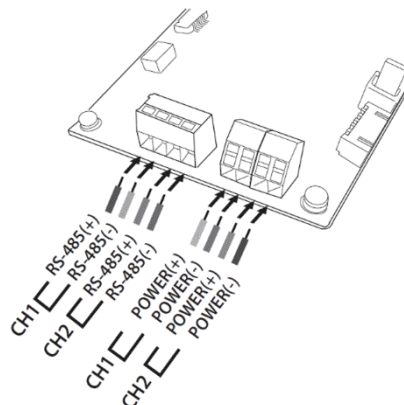
1. Secure the bracket to the camera with the 3 supplied bolts.



2. Connect the IR illuminators to the brackets. Lead the IR illuminator cable into the housing through the cable-clamps in the bracket and insert it in the housing through the cable-gland at the back of the housing.



3. Connect the IR-illuminator power cables and RS485 control cable with indicated terminals on the telemetry board.

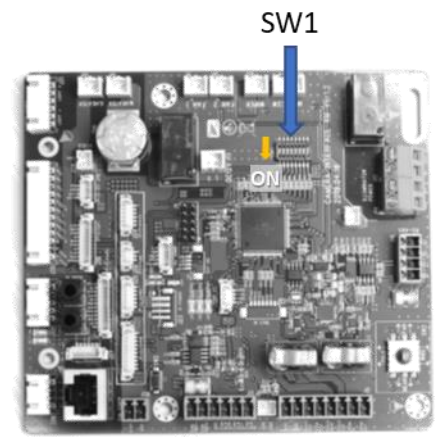




- The default setting for IR-illumination control is by the light-sensor. Both UP33 and UP36 controls the illuminators by this mode.

SW1:

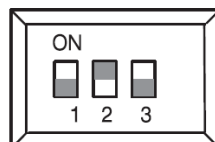
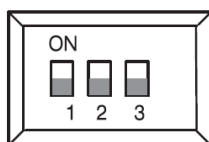
1.	ON	Reserved
2.	ON	Reserved
3.	OFF	Reserved
4.	OFF	Reserved
5.	OFF	Reserved
6.	OFF	Reserved
7.	OFF	Reserved
8.	ON	Light sensor
	OFF	Camera (Aux) control



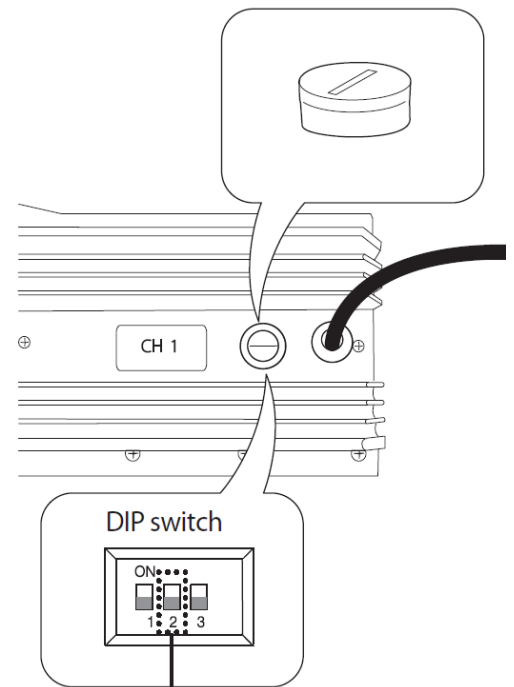
- When shipped from the factory, two IR illuminators are set to different channels as Ch1 and Ch2. The two IR illuminators cannot operate with the same channel. To change the IR illuminator channels, remove the blind plug on the backside of the IR-illuminator to access the DIP switch.

The channel is determined by DIP switch 2:

**Channel 1 (Left)**      **Channel 2 (Right)**

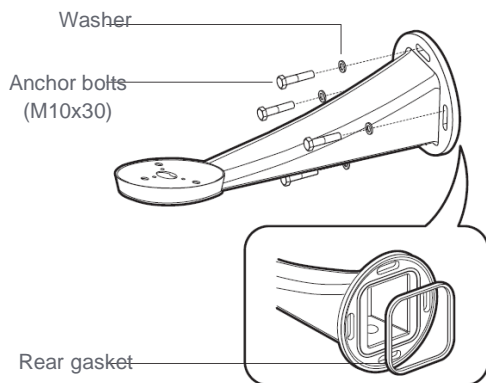


DIP switches 1 and 3 should always be set to "off".

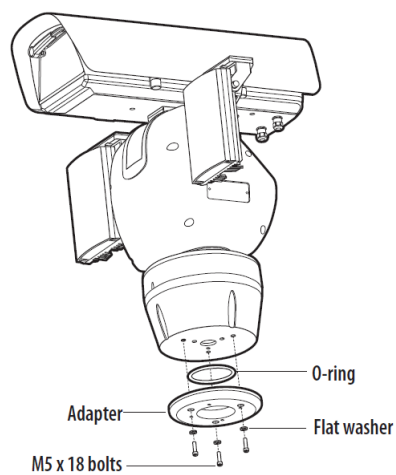


## Mounting with the optional wall bracket (UP-WM)

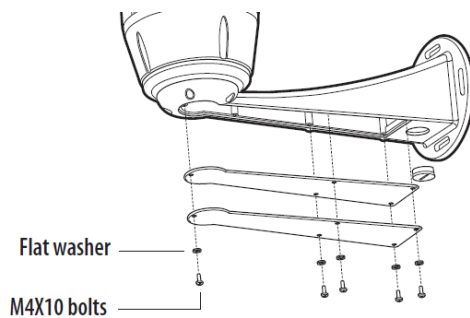
1. Fix the wallmount bracket (UP-WM) using sturdy anchor bolts. Each bolt should be able to hold at least 60 kg. (M10x30 is recommended)



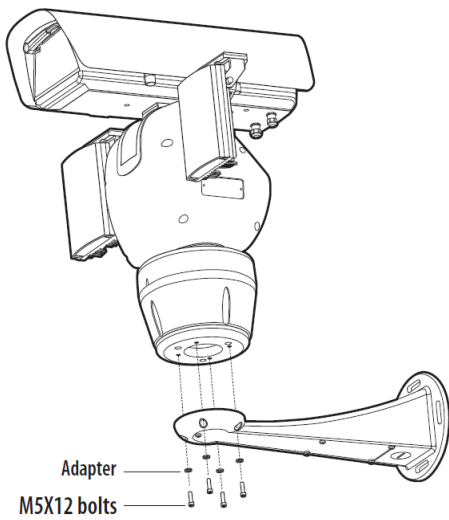
2. Replace the rectangle shaped base-plate from the base housing with the wallmount adapter.



3. Disassemble the wallmount cable management cover

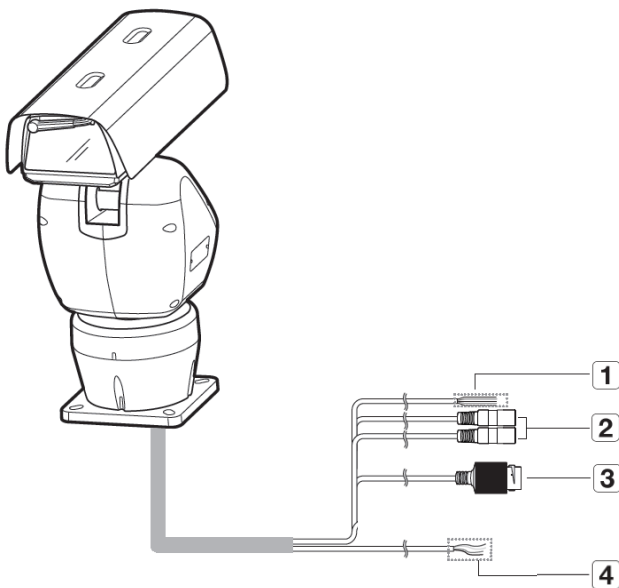


4. Mount the UP33 or UP36 on the wallmount bracket. Lead the multicable tail through the cable tray of the bracket.



5. Reassemble the cover of the wallmount bracket.

## Connections



1. Washer control
2. Not connected
3. Ethernet (RJ45)
4. Camera and IR power



### Power supply (4)

Cable Label	Cable Color	Input
Main power	Brown	24 Vac, 3 A, 50/60 Hz
	Blue	
IR Illuminator power	Black	24 Vac, 3 A, 50/60 Hz
	Green	

Recommend power supply wire specification:

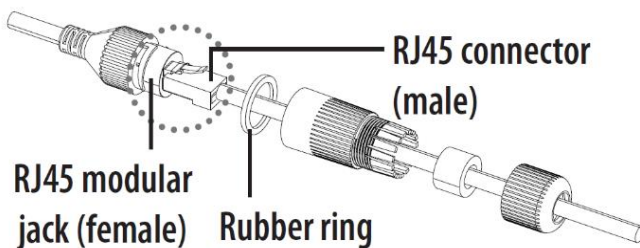
Wire type	AWG22	AWG20	AWG18
Max cable length	34 m	55m	88m

### Ethernet (3)

Ethernet cable should be CAT5e terminated with a RJ45. The max distance is 100m.

The RJ45 connection can be made waterproof (IP66) by using the “RJ45 water proof accessory”, which is standard included.

Assemble the water proof RJ45 as shown in the drawing below.



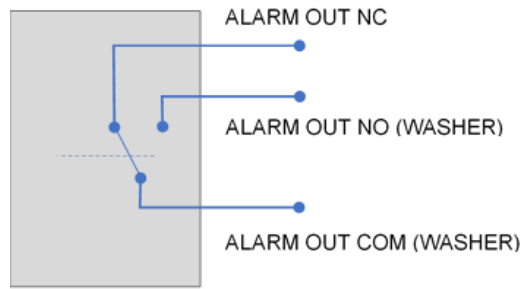
### Washer control (1)

The washer control is connected by the ALARM-out wires.

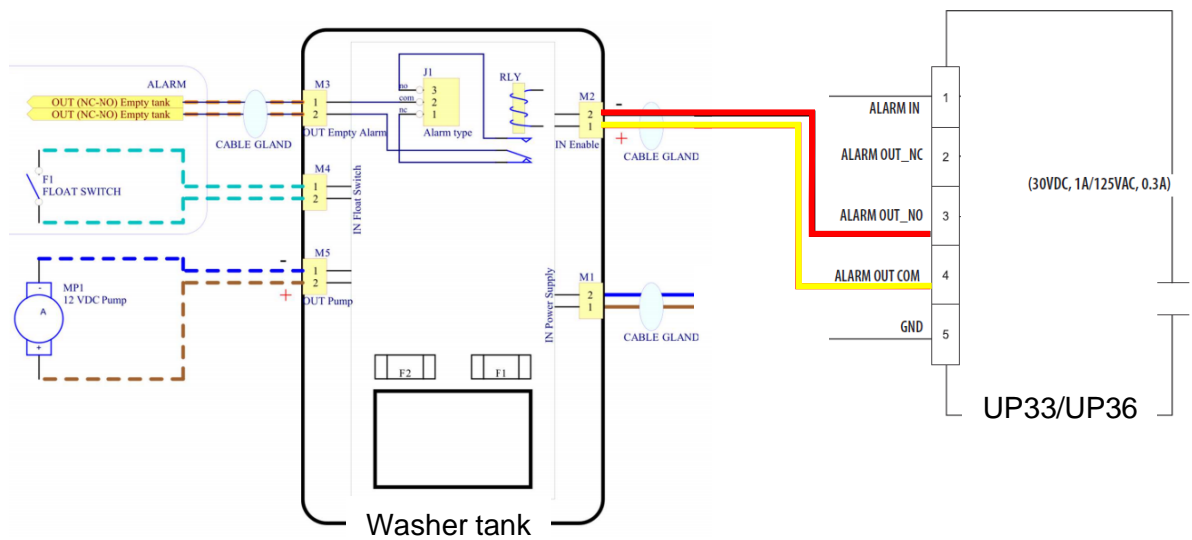
Cable Label	Cable color	Remarks
ALARM IN	Black	Not used
GND	Brown	
ALARM OUT NO	Red	Normally open (Washer)
ALARM OUT NC	Orange	Normally closed
ALARM OUT COM	Yellow	Common (Washer)



The connection diagram looks as follows:



Connection example with the WP10-24 (or -230)



**For the UP33 only:**

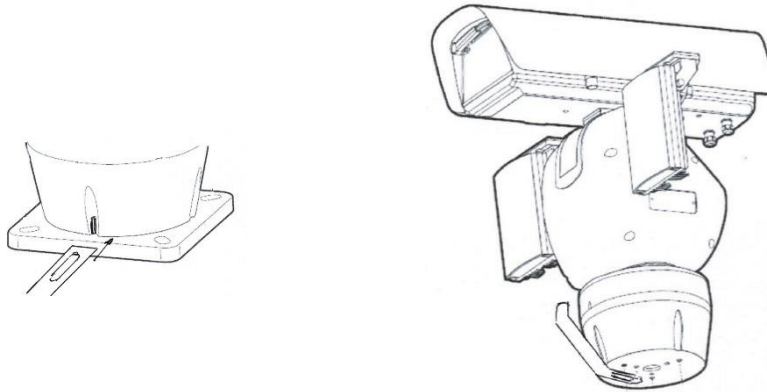
Define a washer position by setting one of the presets to  $P=0^\circ, T=90^\circ$ . The camera has to move to this preset before the washer is activated. (Wiper & washer are supported by VDG Sense using the “onvif” driver)



## Installing the washer nozzle

The bracket for the nozzle has to be installed separately. Please, follow the instructions below:

1. Remove the rectangle shaped base-plate from the base housing.



2. Place the nozzle bracket between the base plate and the base housing at the position of the small notch indicating the 0° position. The nozzle bracket is of the delivery of the WP10 washer tank.
3. Replace the rectangle base plate or proceed with fixing the UP-WM wall mount bracket.
4. For the UP33 only:  
Define a washer position by setting one of the presets to  $P=0^\circ, T=90^\circ$ . The camera has to move to this preset before the washer is activated. (The wipe/washer are supported by VDG Sense using the “onvif” driver)





# Maintenance

To keep the UPxx PTZ camera in perfect condition over its life time, regular inspection and cleaning of the camera with an interval of 3 to 12 months depending on the environment. Please, follow the maintenance instructions below:

1. Clean the camera housing with a damp, cotton cloth. Remove nests of insects with an appropriate brush. (No chemicals)
2. Clean the optical glass window with lukewarm soapy water. Use a cotton cloth to prevent scratches on the window or damage of the AR coating.
3. Check the condition of the wiper and replace the wiper when necessary. It is recommended to replace the wiper with the original UP wiper at least once a year.
4. Inspect the integrity of all the O-rings and rubber sealings. Grease them with silicone grease (O-ring grease) to prevent them from getting too dry and to ensure their watertightness. Replace the sealings when necessary.
5. It is recommended to replace the fan inside the top housing every two years.

For replacement parts, please, contact TKH Security.





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