

## How to Use PoE Switch for IP Surveillance Cameras?

IP surveillance camera was once affordable only by large enterprises, but it is now everywhere in our daily life. This is because the prices of IP cameras and PoE switches have dramatically fallen down. Under such circumstances, many people try to set up IP surveillance systems by themselves. Then, where and how can we use PoE switch for IP cameras? This post will give detailed explanations of them.

### Main Applications on PoE Switch for IP Surveillance Cameras

IP surveillance cameras connected with PoE switch are being used in many places, making a broad range of applications. They can mainly be used at home, in smart offices, commercial PoE applications, healthcare environment applications and industrial PoE applications without the need for extra power outlet installation. Then, how to use PoE switch for IP surveillance cameras? The following text will give you a step-by-step guidance.

### How to Use PoE Switch for IP Surveillance Cameras?

Actually, “how to use PoE switch for IP surveillance cameras” can be regarded as how to use IP cameras with PoE switch involved. Regardless of different places in which IP cameras and PoE switches are used, the connection and usage of them are basically the same, except that the number and location of the devices are different. Here, we take the connection and use of the IP cameras and a PoE switch in home network as an example to explain this issue step by step.

### How to Install IP Surveillance Cameras for Home Security

#### Step 1: Figure out Where You Want Your IP Surveillance Cameras

Firstly, you should find locations that give the IP surveillance cameras clear view and stable power supply (It's better within 100 meters from the PoE switch). Normally, you can install IP surveillance cameras in relatively high places to get clearer and wider view.

Secondly, avoid pointing your camera directly to a light source. Pointing towards the light source would result in a slight underexposure of videos and images captured.

Thirdly, it is best not to install IP surveillance cameras under windows. Otherwise, infrared reflections can cause overexposed images and videos.

#### Step 2: Mount Your Home IP Surveillance Cameras on the Wall

Drill holes to install the IP cameras on the wall, ceiling, and other spots you've determined for the camera mounting. Then, place your camera in the right position and right angle for a good view.

#### Step 3: Arrange Network Cables for IP Surveillance Camera Installation

Drill holes where the Ethernet cables will go through, and consider the nearest route if you are doing the installation in a two- or three-story house.

#### Step 4. Connect Home IP Surveillance Cameras and a PoE Switch

After the wiring process, the next step is to connect your home IP surveillance system. An IP surveillance system is often composed of PoE switch, IP surveillance cameras, network video recorder (NVR), and network cable such as Cat5e, Cat6, Cat6a, etc. Among them, PoE switch can both transmit data and provide power for IP cameras and manage them.

Actually, there are four sub-steps to connect the PoE switch for IP cameras:

- Power the PoE switch with its power cord provided by the vendor.
- Connect your router and the PoE switch with an Ethernet cable.
- Connect the IP cameras and the PoE switch with network cables.
- Connect the PoE switch with an NVR which connects with a computer for camera display.

#### Step 5. Set up Your Self-Installed IP Surveillance System

IP surveillance camera setup is the last procedure in a complete residential security camera installation process. Normally, the camera manufacturers offer app and desktop software for accessing your camera. You can set up parameters such as live view, motion detection, video recording, zoom in/out, and more to suit your needs.

### Conclusion

PoE switch makes surveillance installation simpler, safer and less expensive. If you decide to build a reliable IP surveillance system by yourself, just deploy a suitable PoE switch and several IP surveillance cameras in your network according to the guidance listed above.