Setting Up Your Own Security Camera at Home

Surveillance System Uses Existing Electrical Wiring; Seeing Footage on the Web

A security camera can be a useful addition to a household. But these systems can get quite expensive and often require a professional installation that includes drilling holes in walls and running wires throughout your house.

So, this week, we tested an affordable surveillance camera that you can set up yourself, without tools, and that costs only $300 for the first camera and $230 each for as many as five more. It uses a software program that works on most Windows computers, and its images can be viewed on a secure Web site using any Internet-connected computer with a Web browser. The $300 LukWerks Digital Video Surveillance System from WiLife Inc. includes one camera, the software, and three simple options for mounting your camera on a wall, desktop or window.

WiLife Inc.’s LukWerks Digital Video Surveillance System includes software and a camera for **$299.99**

We tested this system over the past week in Katie’s apartment, startling a few friends who didn’t know the camera was there and recording the fact that far too many cars temporarily park in front of the fire hydrant near her house. But most of all, we were impressed by the simple, user-friendly LukWerks (pronounced “Look Works”) technology.

To start, she installed the software on a Toshiba laptop computer and set up the hardware. This included a special Luk Receiver that plugged into a wall socket and connected to our PC via a USB cord, and another piece — the Luk Power Supply — that plugged into another wall socket and delivered power to the Luk Camera through an included cord.

The ingenuity behind LukWerks is a standard, but rarely used, technology called HomePlug, or powerline networking. It creates an Ethernet network using the already-installed electrical power lines running throughout your house. So the LukWerks camera connects to your computer without requiring new wiring, or a wireless network.

Digital video footage is captured on the camera and sent through the power lines back to the Luk Receiver, which is attached to the computer. This technology works within an 8,000 square-foot space.

The Luk Camera itself is rather compact, measuring just about five inches high by three inches wide by two inches deep. The principal method for mounting it without tools is a suction cup that attaches the camera to the inside of a window. It’s simple and sturdy, but the downside is that you must have a window that’s positioned so as to offer a clear view of the place you want to watch, say a front door.

The Luk Camera mounts on a window with a suction cup.

In Katie’s apartment, the best she could do was to plant the camera on a window two floors above the front door, aiming its lens down. This provided a view of the sidewalk and street in front of her small building, but it couldn’t quite capture an image of someone standing at the door.

Positioning will be a challenge in many houses if you’re using the suction cup/window method because many windows aren’t in a good position for seeing the entrance door. You can also opt to set the camera up on a wall or ceiling using a wall-mounting piece (with three screws). A desktop mount is also included.

The current model of the camera isn’t made for outdoor use. But, this summer, WiLife will introduce an outdoor LukWerks camera that will use infrared to see in the dark. Outdoor perches will provide better views of the front door.

The software was very straightforward, without any geeky terminology, for the most part. The largest part of the screen is used to show camera footage — whether live or from past recordings. Numbered circles below this footage screen represent each camera and its status; up to six cameras can be managed. You can opt to view one, four or six camera shots on screen at a time, dependent on how many cameras you have.

After sticking our camera to the window and plugging it into its power source, three green lights on its side signaled that it was turned on. A second later, the image of our street appeared on-screen, cars and all, in remarkably crisp resolution.

Katie easily added a second, optional Luk Camera to her system, setting it up in the living room using the suction cup method (again) to attach it to a nearby window, this time facing inward. Just seconds after she plugged its cord into the Luk Power Source, which was attached to a wall outlet, its live footage appeared on the computer.

The cord attaches to the Luk Power Source in the wall socket.

She set the cameras to record only when movement was detected, but we could always watch the view from each camera, even when there was nothing moving. At night, when just a distant light was on in the living room, dark images were still visible. An outdoor streetlight helped our street camera's view, but it, too, did well at night.

LukWerks uses 20% of your free hard-drive space for recording, though you can adjust this percentage if you choose. When that 20% is filled, it starts over, deleting the oldest files first. If you have a particular video clip that you'd like to save, you can easily do so with a right-click option.

Skimming through previously recorded footage is made very simple with a special Search button and a timeline that can be specific, narrowing down time to the second, or general, looking at time slots in four-hour increments. You can speed up or slow down playback using a large, virtual knob, and a calendar is visible to make it easier to skip ahead to specific dates — those dates in bold denote recorded footage; the current date is circled in red.

After creating an online account using an email and password, you can remotely view your footage via the Internet. Katie did this, and Walt was able to view the images from the two cameras on a Macintosh at his own home, about 20 miles away, with just a Web browser. This is only possible if the camera owner provides a password.

The Web function was a little clumsy. It took two attempts every time to switch between Katie's two cameras or to change between one view that showed both cameras and another that cycled between the two.

If you're really worried about your house or family, you can set the LukWerks program to notify you via email or SMS message if there is movement on any of your cameras. The program can be set to send you a message, video frame or short video clip via email, or just a text message on your cellphone.

Overall, the LukWerks Digital Video Surveillance System was a pleasure to use. It could be useful in many scenarios, and its video quality was really quite impressive. We especially liked the software, which was intuitive and simple — nothing like what we expected from a home-surveillance system. LukWerks won't capture intruders, but it might let you know they're coming.