Applied Vision 3.0

Quick Start Guide

Introduction to Applied Vision

Applied Vision 3.0 (AV3) is the latest evolution of the software application that comes with Ken-A-Vision digital camera products.

Applied Vision enables users to connect their USB-based Ken-A-Vision products to a Windows computer, allowing capturing, viewing, and manipulation of both video and still images. Applied Vision 3.0 is optimized for use in educational and audio/visual applications while remaining widely applicable for any environment in which digital imaging is required.

Here are a few of the many things you can do with Applied Vision:

- Capture a still image
- Capture a movie
- View camera video in full screen
- View multiple camera sources simultaneously
- Capture a video
- Play movie files at various replay rates
- Capture a still image from a saved movie file
- Magnify areas of a captured image

Installation

Minimum Requirements

OS: Windows 2000, XP, Vista
Processor: Pentium III or higher
Memory: 512MB RAM
USB: 1.1 (2.0 for certain cameras)

Install Procedure
Insert the disc and follow the prompts to install the software automatically. When finished, the Applied Vision 3.0 icon should be visible on the Desktop.

Camera Drivers
Camera drivers are installed by default during the installation of the software. After the software has finished installing, plug in the camera. This may start a "Found New Hardware" wizard; accept the defaults and complete this to finalize installation of the camera drivers. If you are prompted with a warning message regarding the WHQL logo testing, please click Continue Anyway to finalize installation.

Updates
Applied Vision 3.0 contains an integrated update system that allows you to check online for updated versions of the software. Click Start, then All Programs, then Applied Vision 3.0, and click on Check for AV3 Updates. This will ascertain whether or not a newer version is available for download, and if so, it will automate the download and installation of the new version.

Mac OS X Software
If you have a Ken-A-Vision camera that supports Mac OSX, you can install it by navigating to the Mac Software folder on your Applied Vision 3.0 disc and copying the zipped installer to your computer. Run the installer to install Ken-A-Vision Capture software; if you are prompted for a serial number, use the software serial number listed on the disc envelope. Contact Ken-A-Vision for any questions regarding our Mac Software application and drivers.

Application Modes

There are three panels, or modes, available in Applied Vision 3.0. They are:

- **Live Video** - Displays video stream from camera for viewing or capture.
- **Image Editor** - Displays captured or saved still images for viewing, editing, and saving.
- **Movie Player** - Displays captured or saved video files.

These modes are accessible and easily traversed by using the tabbed buttons at the bottom of the Applied Vision window. Just click on the tab and Applied Vision will open the appropriate mode.

Live Video Mode

In Live Video Mode you can capture images, capture video, view in full screen and adjust the camera options.

	Capture Image	You can capture a still image while in Live Video Mode with this button. Click on the button and the application will capture a frame from the active camera and load it in Image Editor, automatically switching to that mode.
	Record Movie	You can capture a movie file while in Live Video Mode with this button. Click on the button and the application will start the capture of video from the active camera device. Click the button again, and the recording will cease, and you will be prompted to specify a name and location for the captured movie file.
	Open Image	Clicking this button will open a dialog to browse for a saved image on your hard drive to load into Image Editor.
	Open Movie	Clicking this button will open a dialog to browse for a saved movie file on your hard drive to load into Movie Player.
	Full Screen	Full Screen expands the video stream from the active camera to fill the computer display. Click the mouse or press ESC to return from this mode.
	Camera Settings	The Camera Settings button accesses the Video Capture Filter and Video Capture Pin sections of the camera driver. Depending on the camera model and the driver, these offer camera level adjustments such as brightness, contrast, exposure level, white balance, vertical and horizontal flip, and video resolution.

Image Editor Mode

Image Editor Mode lets you modify still images that already exist on the hard drive or images captured when Applied Vision is in Live Video Mode.

	New Image	When the New Image button is pressed in Image Editor, a blank white image is created as the new active image.
	Open Image	Clicking this button will open a dialog to browse for a saved image on your hard drive to load into Image Editor.
	Save	When the Save button is pressed, the image is saved as its current filename. If the image has not yet been saved, it defaults to the Save As functionality.
	Save As	When the Save As button is pressed, a dialog is opened to select a name and location to save the current image to a file.
	Magnifying Glass	When the Magnifying Glass button is pressed, the cursor turns to a magnifier, and clicking on the image results in an area specific magnification of the image. To alter the settings of the magnifier, go to the Tools/Options dialog.

Movie Player Mode

In Movie Player Mode, captured video files can be played back, and still image frames can be captured from the video.

	Open Movie	Clicking this button will open a dialog to browse for a saved movie file on your hard drive to load into Movie Player.
	Capture Frame	When the Capture Frame button is pressed in Movie Player, the current frame from the active movie is captured as a still image and loaded into Image Editor.

Playback Controls: The following controls are available to control the playback of a movie in Movie Player mode:

- Play
- Stop
- Pause
- FF (Fast Forward)
- Rew (Rewind)
- FF to End
- Rew to Start

Playback Rate: The following selections are available in radio buttons to set the playback rate of a movie in Movie Player mode:

- 1/4x
- 1/3x
- 1/2x
- 3/4x
- 1x (Normal)
- 2x
- 3x
- 4x

Menu Structure

File Menu	**New Image:** Creates a new blank white image in the Image Editor mode. **Open:** Opens an image or movie file, depending on what mode the application is in. **Save:** Saves the current image and prompts for a name if it hasn't been saved before. **Save As:** Saves the current image to a different name. **Exit:** Exits Applied Vision.
View Menu	**Live Video/Image Editor/Movie Player:** Switch to each mode. **Resize Window:** Resize video window to a variety of fixed percentages, or invoke Full Screen mode. **Status Bar:** Toggle the main window status bar. **Magnifying Glass:** Invoke the Magnifying Glass tool in Image Editor.

Tools Menu	**Live Video/Image Editor/Movie Player:** Use mode-specific functions.
	Resize Window: Resize video window to a variety of fixed percentages, or invoke Full Screen mode.
	System Information: View information about your computer hardware and software.
	Backgrounds: Change the default background image file for Applied Vision.
	Options: Access the following options:
	    o Language Settings (English, German, French)
	    o Magnifying Glass Settings
	    o Background Image Settings

Camera Menu	**Auto Arrange Live Video Windows:** Arrange open windows automatically. **Cascade Live Video Windows:** Layer open windows in a cascade form. **Camera Settings:** Access the camera specific driver property pages. **[Dynamic List of Cameras]:** Automatically populated list of available imaging devices for selection in Live Video mode.
Help Menu	**Help Contents:** Open the Contents page of the online help file. **Help Index:** Open the Index page of the online help file. **Visit Ken-A-Vision Website:** Hyperlink to www.ken-a-vision.com. **About Applied Vision:** View version information and basic application information.

Applied Vision 2.0

For users who prefer the interface and functions of Applied Vision 2.0,(AV2), we have included a full version to install as an additional option for using with our cameras. Applied Vision 2.0 is oriented towards use in an educational environment, and contains a variety of functions useful in science and other fields. You can install both versions of Applied Vision independently, without conflict. Here are some features you can utilize within Applied Vision 2.0:

- o Timelapse capture
- o Calibrated measurement
- o Image amalgamation
- o Image annotation
- o FTP upload
- o Network streaming

To install Applied Vision 2.0, insert the disc (and cancel the Auto-Run to reinstall Applied Vision 3.0, if it comes up). Browse the disc contents, and open the "AV2" folder. Run the "AV2Install.msi" installer file.

If you are prompted with installer errors, see the included "ERR-1406.pdf" document in the same folder; if this does not resolve the problem, contact Ken-A-Vision for technical support.

Troubleshooting

For technical support, please visit our Web site for troubleshooting guides, downloads, and technical support request forms:

http://www.ken-a-vision.com/techsupport.asp

You can also call our offices toll-free 1-800-627-1953 for technical support.