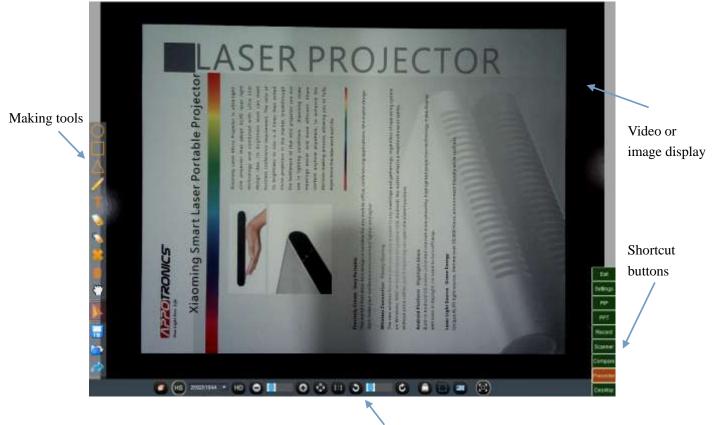
# Document camera or Visualizer Software V2.0 Operating Instruction

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## I. Function introduction

Double click "Document camera" or "Visualizer" icon on desktop or in start menu to start the software and you will see the following window:



Tool bar

### Seven functions optional for teachers:

- **Presenter:** support HD image display, high speed dynamic image projection, and the easy-to-use real-time annotation.
- **Comparative Teaching:** support 1, 2, 3 and 4 split screen for teaching, support the easy-to-use real-time annotation.
- **PPT**: support one-button switch to the prepared PPTcourseware, support the easy-to-use real-time annotation.
- **Desktop:** support one-button switch to desktop to display courseware, files, pictures, videos and software in the PC, support the easy-to-use real-time annotation.
- **Recording:** you can simply record the teaching process into teaching video or micro-class video at any time.
- **Scanning:** support HD scanning, editing, managing and saving the image files; printing and sending emails, and converting the files into PDF format, etc.
- **PIP:** you can enable PIP (Picture in Picture) window at any time to display the image of the teacher or the scene of the class; the PIP window can be zoomed and dragged to any position of the screen, and the PIP image can also be recorded together with the teaching process into teaching video or micro-class video.

Shortcut buttons: there is a list of "Shortcut" buttons at the bottom right corner of the screen. You can switch to corresponding function by simply clicking the relevant button, or to exit the software and return to desktop by clicking "Exit".

(Note: if you see the pop-up window "No Scanner device! Or scanner device is invalid!" after the software is started, please make sure the USB connection between the device and the PC, and solve the connection problem if any)

## **II.** Presenter



Click Presenter in the "Shortcut" buttons to enter function interface of the Presenter:



### **Toolbar description:**

Image adjusting button, click it to display the image parameter adjusting menu as shown below. The teacher can adjust the Brightness, Contract, Saturation and Exposure according to actual needs;

Click if you want to restore to default setting.

*
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0
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Exposure 🗹 Auto 🕃
-10

- The tool bar to adjust video playing speed and definition. The faster the speed is, the lower the definition will be, and the higher the definition is, the lower the speed will be. The teacher can adjust the definition according to actual need. The Presenter supports two working modes: HS (i.e. MJPG video format) mode and HD (i.e. YUY2 video format) mode. In HS mode, the speed will be faster (suitable for displaying videos), but the quality will be lower; in HD mode, the speed will be slower, but the quality will be better (suitable for displaying texts or picture).
- Adjust the display size of the video or picture. This may also be achieved by moving the mouse wheel. Press and hold the mouse and drag to move the

picture, click to adjust the size to fit the screen, and click to adjust to actual size.

- Rotation tool bar. It can rotate the video or picture. Click the button on the left to rotate anticlockwise, and right to rotate clockwise. Every time you click the button, the picture will rotate by 90 degree; or you can drag the bar to rotate by any degree.
- Freeze the video. It can Freeze the video of camera. Even if the teacher moves the article, the image will not move, in this way, it ensures the image in the Presenter will not move and prevents interference of the image due to change of light.

Note: when the teacher is using the Marking tools for teaching, the video will freeze

automatically, to unfreeze it, click the return button in the Marking tool bar, or the video will be unfrozen automatically when all markings are cleared.

Capture the current image and save it as picture format to preset directory. You can

click click

 $\Box$ Full screen mode: to enter full screen, the task bar will be hided. Click the button again to exit full screen and show task bar again.

## Marking tools:

Draw lines

Input texts

Eraser size

Clear all markings in screen

Save screen as picture format

Open and view picture

Extend tools bar on/off

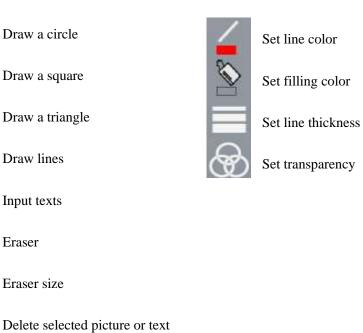
Exit marking and return to dynamic display

Move the markings

Eraser

## **Extended tools:**





## **III.** Comparative Teaching

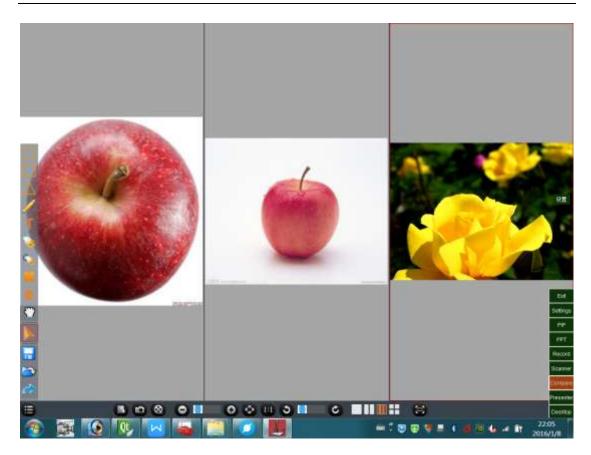
Click Compare in the "Shortcut" buttons at any time to enter Comparative Teaching mode. In this mode, you can explain different pictures in 2, 3 and 4 split screens. Click any split screen to focus on it, and such screen will be highlighted by red lines.



**Full screen** 



2 split screens



3 split screens



4 split screens

### **Toolbar description:**

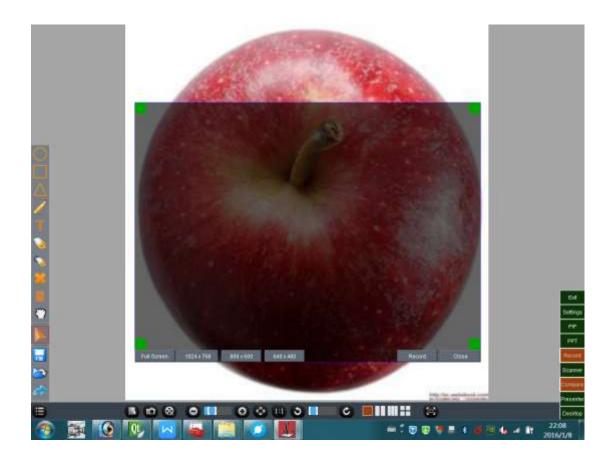
- Dependence of the preset directory), and click any picture to show it on the focus split screen; click the button again to hide the list.
- Den the pictures saved in certain directory of the PC, and show it in the correspondingsplit screen.
- Componenthe video window of the camera, press and hold the mouse and drag the image of camera to a certain split screen to display it in the correspondingsplit screen.
- Show the real-time video of the camera in the correspondingsplit screen.
- Adjust the size of the video or picture in the focus split screen, This may also be achieved by moving the mouse wheel. Press and hold the mouse and drag to move the picture, click to adjust the size to fit the screen, and click to

adjust to actual size.

- Rotation tool bar. It can rotate the video or picture. Click the button on the left to rotate anticlockwise, and right to rotate clockwise. Every time you click the button, the picture will rotate by 90 degree; or you can drag the bar to rotate by any degree.
- Full screen mode: to enter full screen, the task bar will be hided. Click the button again to exit full screen and show task bar again.

## **IV. Recording**

Click in the "Shortcut" buttons to enter the recording interface as shown below. The select box will be at the center of the screen, and the teacher may adjust the size of recording by dragging the four corners of the box, or drag the whole box to any place for recording. The software provides 4 preset sizes of recording.



After adjusting recording size, click "Record" to record the selected screen. At this time, "Recording" will display in the "Shortcut" button and start to flash. To stop recording, click

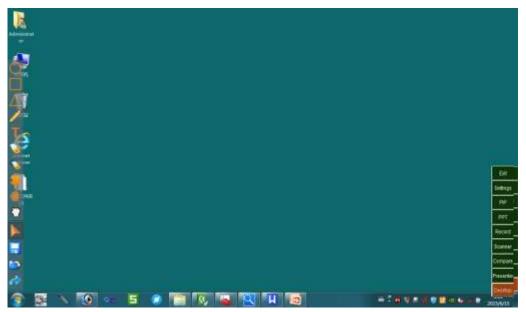
Recording. If the recording takes a long time, the data may become huge and it may display "Saving data, please wait..." when you stop recording, please wait patiently until the prompt disappears.

To view the recorded file, click in the "Marking tool bar".

The recorded file is in AVI format, which is a common video format and can be played on any PCs.

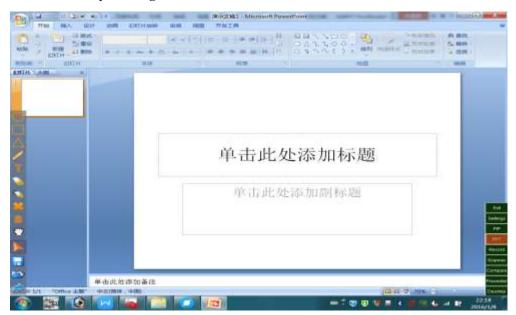
## V. One-button Switch to Desktop

Click Desktop in the "Shortcut" buttons to hide the window of the software and return to desktop. You will only see the "Marking tool bar" on the left of the screen and the "Shortcut" buttons. While doing other operations, such as playing video, PPT, viewing a word file or a webpage, the teacher may use the marking tools for teaching and may record the screen at any time.



## VI. One-button Switch to PPT

Click PPT in the "Shortcut" buttons at any time to switch to PPT software. You will only see the "Marking tool bar" on the left of the screen and the "Shortcut" buttons. The teacher can use the marking tools for teaching directly in PPT, record the screen, or switch to other functions by clicking the "Shortcut" buttons.



## VII. PIP

Click **PIP** in the "Shortcut" buttons at any time to display the video of the secondary camera to display the image of the teacher or the scene of the class. The secondary video window can be zoomed in/out and dragged to any position of the screen, and the video can also be recorded together with the screen into teaching video or micro-class video, as shown in the picture below:



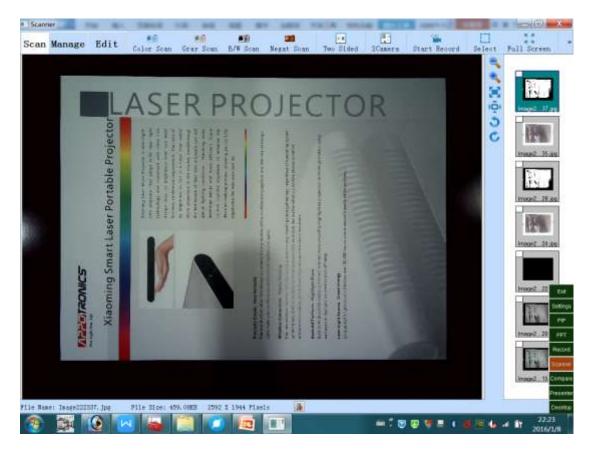
If the device doesn't support secondary camera, you will see the following pop up window:



## VIII. Scan

### 1. How to scan

Main window in scan mode



#### Pre-set page size to scan and crop

Click on the toolbar button """ to enter the system setting dialog, choose corresponding "Page size" due to the scan paper size. If you want to manually or automatically "Remove Frame" after scan, you should choose "Full size"

#### Put and align items to scan

Click on the "Scan" button on the left upper corner of the main window, enter the video window of the camera, put the document/certificate/card/ 3D objects to scan on the surface of "presentation pad/desk", and align with the corresponding lines. Before scan, by rolling the mouse wheel to zoom in and clicking, dragging the mouse, you could preview scan item details. Click on the toolbar **corresponding**buttons to get scan quickly done. Meanwhile, the scan results would be saved into the preset folder, and displayed in the right list.

Click the toolbar button "<sup>\*</sup>, for "Colored scan".
Click the toolbar button "<sup>\*</sup>, for "B/W scan".
Click the toolbar button "<sup>\*</sup>, for "Negative scan".
Click the toolbar button "<sup>\*</sup>, for "Single-color scan".

#### Designated area scan

#### Dual-sides scan

Before scan, you can first select toolbar button "", then follow the tips and get the scan items, such as ID card to the front side and place

to the left position, click "<sup>•</sup> button to scan. And then the reverse it to the back side and put to the right position, click the "<sup>•</sup> button again to complete dual-sides scan.

#### Auto scan

Click the toolbar button """" to enter the setting dialog, select" Auto Scan". Then click the toolbar button """, auto scan will start. You just need to replace the scan items one by one. Note: Black presentation pad must be used for use of Auto Scan function. And if the auto exposure is closed for manual adjustment to the proper exposure value, the effect might get better!

#### Continuous timing scan

Click the toolbar button " Total Pages" and "Interval" (sec). Then click the toolbar

button "•••• to start continuous timing scan. You just need to replace the scan items within setting interval one by one.

#### Auto process

Click the toolbar button " To enter the setting dialog, check the "Auto process after scan", and set up "Rotate", "Deskew", "Remove frame", "Remove BKG" due to the needs. It will automatically process after each image capture, which greatly improve work efficiency. Smart and simple!

For example, you select "Deskew" and "Remove Frame", you would never worry about repeatedly move the document paper to align lines. You just need to put it with roughly aligned lines and the system will automatically correct text deflection angle, while the system will automatically remove the frame after capture. The scan result can track back to a clean and complete paper.

## <u>When using "Auto process after scan" function, pay attention to the</u> following matters to achieve better effects:

- 1, Please do not deliberately put paper at a too big deflection angle.
- 2, The paper should try to be put within the camera visual range.

*3, When using the "Remove Frame" function, please ensure the background of the image is black (turn the presentation pad to its black side, or lay black pad on the presentation desk), turn off "Auto exposure" in the status bar, manually adjust the suitable exposure value until the brightness back to* 

normal and scan, the "Remove Frame" can achieve better effects.

4, "Remove Frame" function can adapt to most paper document scan, but has less ideal effect for some paper with deep-colored patterns on the edge.

#### Full screen operation

Click on the toolbar button """ to switch to full screen. When scanning, you can preview image details or text contents more directly and clearly. Click the right mouse button on the screen to pop up or hide the toolbar.

#### Dual-cameras "PIP" merge scan (only for models with dual cameras)

Select the toolbar button "To pop up image window of the second camera. This camera is mainly used for figure shot, such as some business unit dealing with customers' faces. Adjust thesecond camera window to proper

position and click on the "<sup>w</sup>button to complete scan. The image of the second camera window will be automatically merged to the corresponding position in scan image of file.

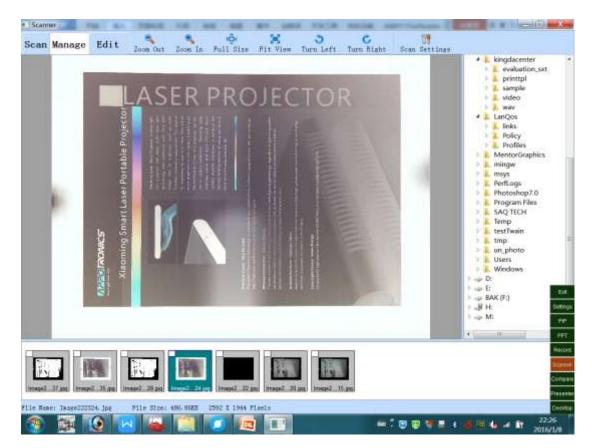
#### Preset save position of captured image or video

Save position can be set in the "Settings" dialog box, the captured image file will be saved in the subfolder named by its capture date (Year\_Month\_Day).

#### Captured image file naming rule

The captured image file name can be set in different ways such as "By capture time", "By number", "By odd number", "By even number" etc. The filename prefix can also be set in the" Settings" dialog box. The image file will be saved in the subfolder named by its capture date (Year\_Month\_Day).

### 2. How to manage and browse images



Main window in browse mode

Click on the "Manage" button on the left upper corner of main window to enter the image management and browsing interface, whose right side would display the folder directory tree. Click on one folder, the image list at the bottom of this interface will display all captured images saved in this folder. Click on any image in the image list, the image will be displayed in the image area on the left side.

#### Rotate to view images

Click on the toolbar button " $\heartsuit$ " to rotate images for 90 degrees left to view.

Click on the toolbar button " $\bigcirc$ " to rotate images for 90 degrees right to view.

#### Zoom and view image details

Click on the toolbar button " " or scroll the mouse to zoom the image size. Click and drag the mouse to view the image details in each area. Click the toolbar button " " to display actual size of images. Click on the toolbar button " to display images due to the window size.

#### Rename image files

Click the right mouse button on one image in the image list, and select "Rename" in the pop-up menu.

#### Delete image

Click the right mouse button on one image in the image list, and select "Delete" in the pop-up menu.

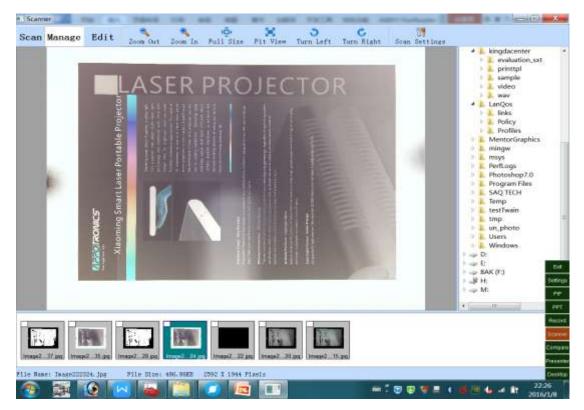
#### Delete multiple images

Check on the left upper corner of images to delete in the image list, then click the right mouse button on any image in the list, select "Delete selected images" in the pop-up menu.

#### Browse and manage in the "Explorer"

Click the right mouse button on one image in the image list, and select "Open to Explorer" in the pop-up menu.

### 3. How to edit



#### Main windos in edit mode

Click on the "Edit" button on the left upper corner of main window or double clickimage in image list to enter the image editing interface, whose right side would display all captured images saved in the folder. Click on any image in the image list, the image will be displayed in the image area on the left side.

#### Rotate images

Click on the toolbar button " $\checkmark$ " to rotate images for 90 degrees left. Click on the toolbar button " $\checkmark$ " to rotate images for 90 degrees right.

#### Mirror images

Click on the toolbar button """ to horizontally mirror/flip the image. Click on the toolbar button """ to vertically mirror/flip the image.

#### Deskew

After rotating the image to the right direction, if the text on the image remains deflection, click on the toolbar button "MA" to automatically put it right. If the effect is not enough, you can click the button again to get it better.

#### Auto remove frame

After scanning, there are usually "frame" or "dark side" around the image which can be automatically removed by clicking on the toolbar button " ". Note: image captured on black presentation pad, would get better effect to remove the frame.

#### Crop images

Selected the toolbar button "L\_J", click and drag the mouse to choose the image area to crop, then click the toolbar button " a to complete cropping. This function can also be used to manually remove frame.

#### Auto remove BKG

Click on the toolbar button " " to automatically remove the dark gray background after the file is shot and captured. It could prevent a serious layer of shadow behind the text after printing, thus waste of printer ink, This function will not damage edge details of the text in the image and cause zigzag, as well as cause no losing of the text strokes.

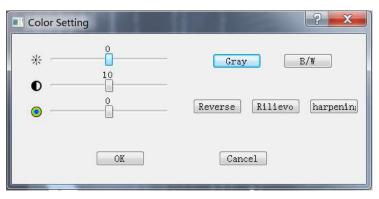
Click on the toolbar button """ to automatically remove the dark gray shadow after the file is shot and captured. Meanwhile, it could turn the colored images or texts into B/W. So this operation is suitable for black and white text files.

#### Auto process

Click on the toolbar button " [...]" to automatically rectify images, remove frames, remove BKG etc. You can choose auto process steps in the setting dialog.

#### Color Settings

Click on the toolbar button " \* to adjust image brightness, contrast, saturation, as well as gray, B/W, or Reverse, Rilievo, Sharpening etc.



#### Draw and mark

Click on the toolbar button " A O " to draw and mark in text of the image. Click the buttons in the status bar can adjust colors, line thickness, text font and size, text colors etc. of the drawing.

#### Restore image

Click on the toolbar button "V" to restore the image to the original state before editing.

#### Save editing

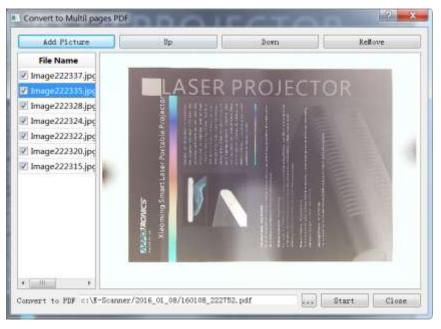
Click on the toolbar button " and select "Confirm" to save editing.

#### Make PDF file

Click on the toolbar button " I and select the menu item" " to select save path and input PDF file name, finally click the "Save" button.

#### Make multi-pages PDF file

Check on the left upper corner of images to add to PDF in the image list, then click the right mouse button on any image in the list, select "Convert selected image to PDF" in the pop-up menu.



You can add or delete images, adjust the image sequence, set the PDF file name, click the "Start" button.

#### Convert to editable file (OCR text identification)

Click on the toolbar button " " and select the menu item" " to check "Default OCR," and then select the text language to identify, finally click the "Confirm" button. After a period of time, it will automatically open "Wordpad" or "Office Word " tools and display the identified files which can be edited. You can be modify, edit or copy to the WORD or EXCEL. \* Note: some versions have no built-in "Default OCR". if choose "Microsoft office OCR", the computer needs to install office 2003 full version first If choose "ABBYY OCR", the computer needs to install ABBYY FineReader software first.

#### Convert image format

Click on the toolbar button "  $\bigcirc$ " and choose the menu item"  $\bigcirc$ " to select saving as the desired image format. Select the save path and input image filename, finally click the "Save" button.

#### Send image via fax

Click on the toolbar button " $\bigcirc$ " and select the menu item" " $\overset{\text{we}}{=}$ ", you can open the fax website for paperless fax.

#### Send image via Email

Click on the toolbar button " $\bigcirc$ " and select the menu item"  $\bigcirc$ ", you can open the email tool to send the current image as email attachments.

#### Print

Click on the toolbar button " Vor to preview print or print the current image.

### 4. Other functions

#### Name image file with identified bar codes

In "Edit" mode, choose an image, click on the toolbar button "L\_J" to select the barcode area, and click on the right mouse button in this area, select "BCR as filename" in the pop-up menu.

#### Name image file with identified text

In "Edit" mode, choose an image, click on the toolbar button "L\_]" to select the text area, and click on the right mouse button in this area, select "OCR as filename" in the pop-up menu.

#### Adjust camera settings

#### Set save format of captured image

Click on the toolbar button """ to enter the setting dialog, select the desired image save format.

#### Relocate captured image save position

Click on the toolbar button "" to enter the setting dialog, click the button to select save position.

#### Set filename prefix of captured image

Click on the toolbar button "I" to enter the setting dialog, you can change the "Filename prefix".

#### Adjust scan resolution

Click on the toolbar button "Video resolution".

#### Adjust image scan quality or file compression

Click on the toolbar button """ to enter the setting dialog, you can set up image scan quality by adjusting the JPEG compression ratio. The higher the number, the better the image quality, the bigger with the file size meanwhile.

#### Record Video

Click on the "Scan" button on the left upper corner of main window to enter the camera video window, then click on the toolbar button """ to start record. Click again to stop record.

#### Record "PIP" Video

Click on the "Scan" button on the left upper corner of main window to enter the camera video window, then select the toolbar button" "", it would pop up with the second camera window, which is mainly used for figure shot. Move and adjust the second camera window to the desired location and size, click on the toolbar button "" to start record(at this point, image content of the second camera will be automatically embedded into the main camera image to video together). Click again to stop record.