i3PROJECTOR

INTERACTIVE FUNCTIONS MANUAL

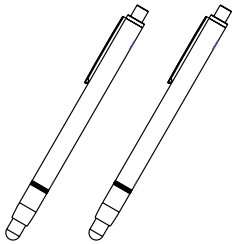
Optical touch control projector packing list.....i
Accessories ii
Install in Windows OS 1
Install in Mac OS 20
Install in Linux OS 28
Troubleshooting.....30

OPTICAL TOUCH CONTROL PROJECTOR PACKING LIST

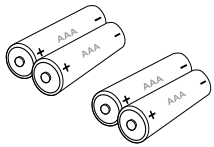
Accessory check list

Please check this list against accessories included with your optical touch control projector. Please call the dealer where you purchased the product for any missing item.

1. Light pen

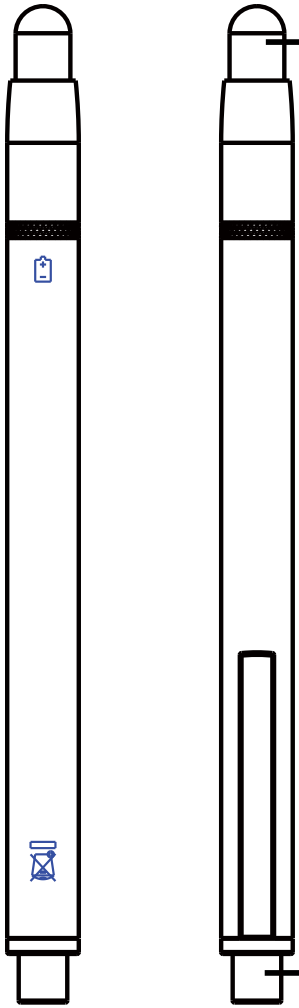


2. Battery (AAA)



ACCESSORIES

Keys and buttons for the light pen



Before using the light pen
Make sure it is powered on.

How to use (your light pen)?

Press the touch control pen tip to the screen, signals transmitted from the tip to validate locations with sensors in projector.The touch control pen tip lights up when sending signals.

1) Place the pen tip anywhere on the screen.
2) Press the pen tip to the screen to activate.You may draw lines in paint brush mode.

Note:

The sensor on the pen tip consumes power when the tip touches anything. Please power off the pen when not in use. Touch the pen tip and see if there is light emitting to make sure.

INSTALL IN WINDOWS OS

The LightPen software features an optical touch control function

1. System requirements

For normal optical touch control operation, please make sure the following system requirements are met.

Install the LightPen software

System requirements	
Operating system	Microsoft Windows XP (SP2) (32bit)/Vista (32bit)/Windows 7 (32bit/64bit)
CPU	Intel® Core™ 2 Duo 2.0 GHz or better (dedicated GPU is recommended)
Memory	2 GB or more
Minimum hard disk space	100 MB

INSTALL IN WINDOWS OS

2. Software installation

2.1 Driver installation

<Install from the USB device>

A CD drive is created by connecting the interaction module to a computer through a USB cable (see Figure 1). Enter the windows\Setup.exe folder of the CD drive to install SPDriver. You may execute the launcher.exe program to start the SPDriver directly.

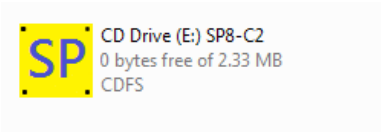


Figure 1

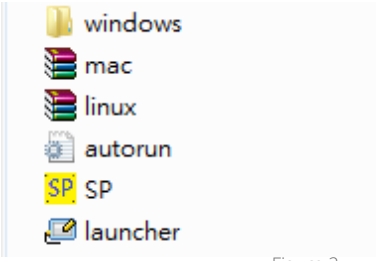


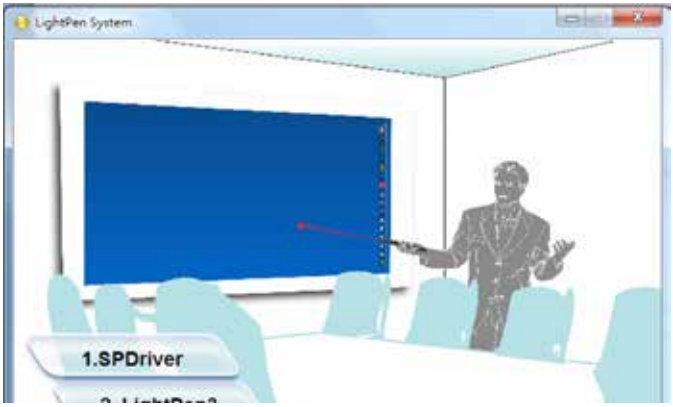
Figure 2

<Install from CD>

Step 1: Insert the Owner's Manual CD into your CD drive.

Step 2: Enter the "LightPen Software for Windows" folder found on your CD.

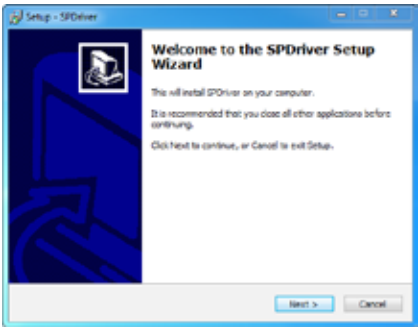
Step 3: Double click the "Setup.exe" and a pop-up window as shown below will display.



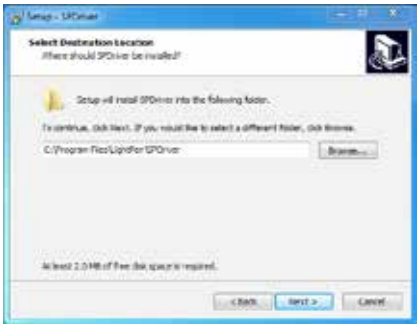
INSTALL IN WINDOWS OS - SPDRIVER

Step 4:

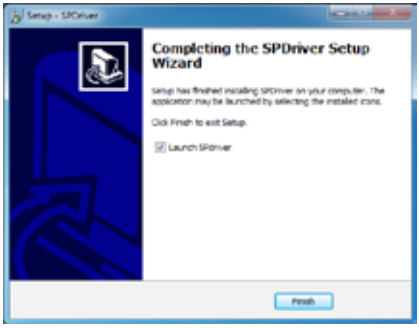
(1) Click SPDriver and a pop-up window as shown below will display.Click Next to continue.



(2) Select the destination folder for installation (a default folder is provided). Click Next to continue.



(3) Please wait until the installation process is completed successfully.



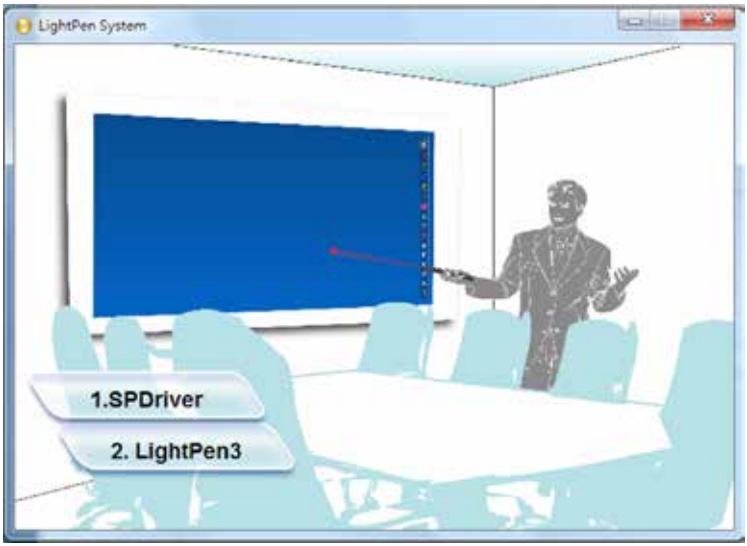
INSTALL IN WINDOWS OS - LIGHTPEN3

2.2 Install the LightPen 3 software

Step 1: Insert the Owner's Manual CD into your CD drive.

Step 2: Enter the "LightPen Software for Windows" folder found on your CD.

Step 3: Double click the Setup.exe file name and a pop-up window as shown below will display.



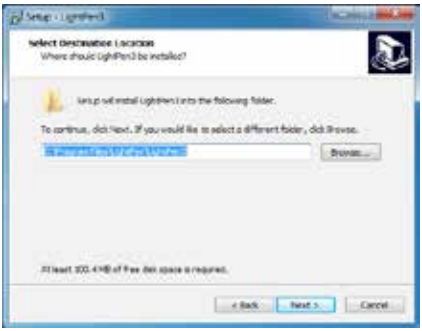
Step 4:

(1) Click LightPen3 and a pop-up window as shown below will display.Click Next to continue.

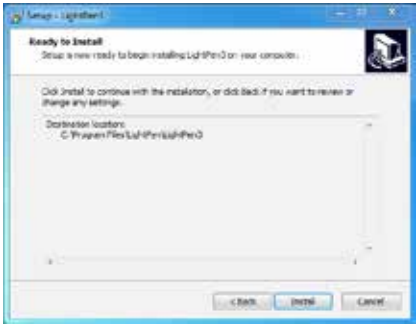
INSTALL IN WINDOWS OS - LIGHTPEN3

(2) Select the destination folder for installation (a default folder is provided).

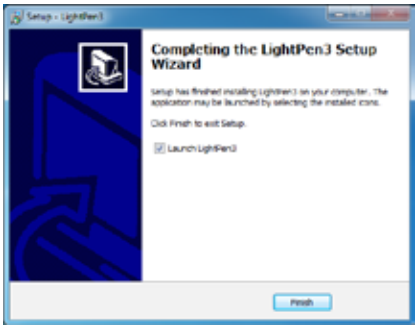
Click Next to continue.



(3) Click Install after validating the installation data, continue the installation process.



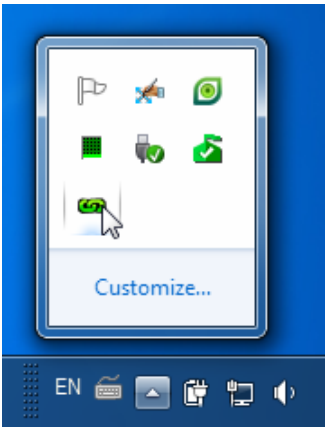
(4) Please wait until the installation process is completed successfully.



3. Initialize the optical touch control function

3.1 Once the SPDriver is installed, run it by steps Start/All Programs/LightPen/SPDriver/ SPDriver, then connect your projector and a PC with a USB cable.

Your system may look like the Figure shown below.

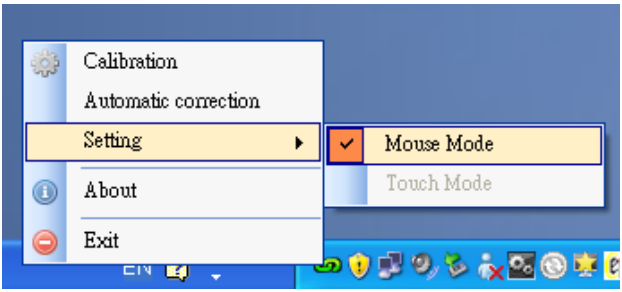


(Windows 7/VISTA)

(Win XP)

3.2 Click the icon and the menu as shown below will display.

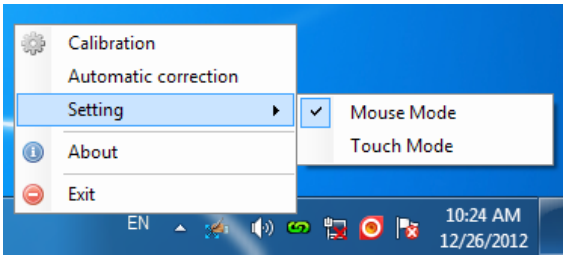
(VISTA/Win XP)



** For Windows XP and Windows Vista, only the standard Mouse Mode is available*

** Select "About" to show the software version information.*

(Windows 7)

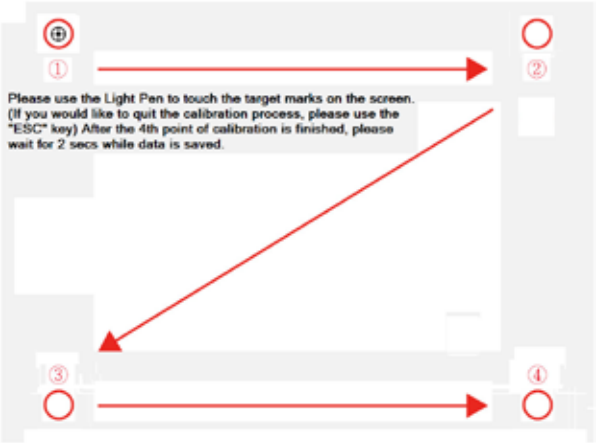


** The Microsoft Windows 7 OS support multi-point touch control. When using your projector with a PC running Microsoft Windows 7 OS, you may select to use the default Mouse mode or the Multi-point Touch Control mode.*

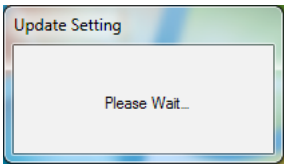
** Select "About" to show the software version information.*

3.3

(1) Select Calibration to execute the calibration procedure



The system saves calibration data after the four calibration points are touched. Please wait while system is saving data.



(2) Auto calibration

You may select Auto Calibration to calibrate your product as prompted by the screens shown in Figure 3. DO NOT block images shown in the calibration screen while auto calibration is running.

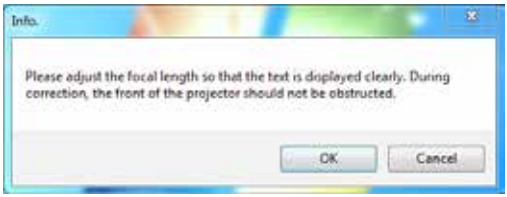


Figure 3

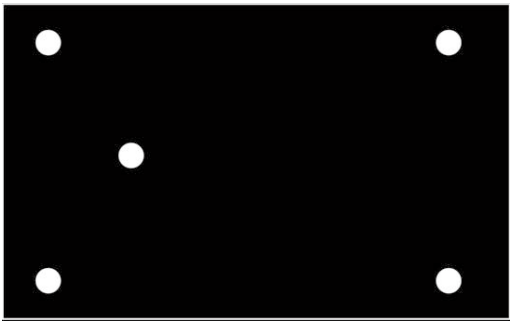


Figure 4

3.4 Calibration completed successfully.

3.5 Auto calibrating failed

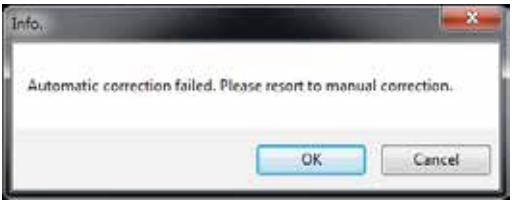


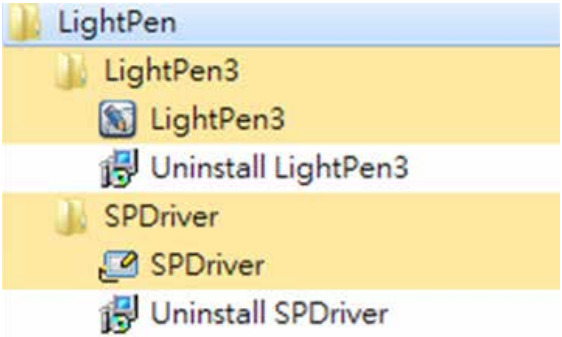
Figure 5

If the "auto calibrating failed" message prompts as shown in Figure 5, please take the steps below for troubleshooting, then do auto calibration again.

1. Turn lights off or reduce stray light to calibration screen
2. Do not walk in front of or shake lens during calibrating
3. Adjust focus to sharpen the images

3.6 How to execute the driver again

You may execute the driver again by running the steps "Start/All Programs/LightPen/SPDriver".

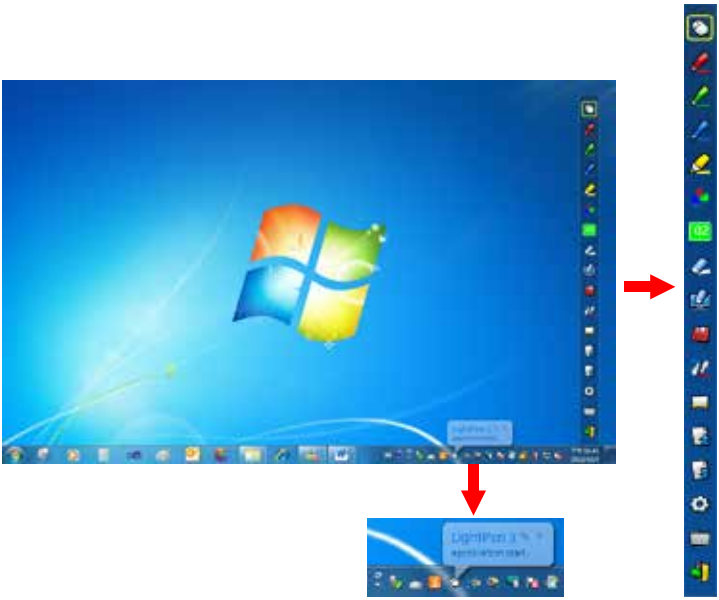


4. Toolbar

4.1 LightPen3 software toolbar

After the LightPen3 program is installed and "Start/All Programs/LightPen/LightPen3" executed, a toolbar will display on the right hand side of your screen (see figure).

** Press LightPen icon and select "About" to show the software version information.*



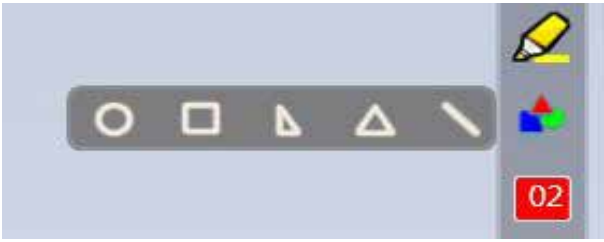
4.2 Main functions

Icons	Names	Descriptions
	Mouse	Mouse functions.
	Red brush pen	Red brush pen.
	Green brush pen	Green brush pen.
	Blue brush pen	Blue brush pen.
	Mark pen	Translucent brush pen.
	Drawing tools	To draw circles, rectangles, isosceles triangles, and lines.
02	Width and color of brush pen	Select width and color of brush pen.
	Eraser	Erase strokes made by brush pen.
	Clear all	Erase all strokes made by brush pen.
	Save	Save contents and hand drawings of current page.
	Dual pen tool	Select Full Screen Dual Pen or Divided Screen Dual Pen mode for two parties to write at the same time.
	Whiteboard mode	Switch to whiteboard background mode.
	Previous page	Back to previous page.
	Next	Go to next page.
	Editor	Handwriting editor.
	On screen keypad	Open the on screen keypad.
	Exit	Exit application software.

4.3 Sub-functions

(1) Drawing tools

Click and a popup sub-menu from the main menu is shown as below. Click to select the desired drawing tool for hand drawing.



(2) Dual pen tools

Click and a popup sub-menu from the main menu is shown as below. Click to select the desired drawing mode for hand drawing.

Icons	Descriptions
	Both parties make drawings with the same tool in full screen mode.
	Both parties make drawings with the same or different tools in equally divided screen mode.

INSTALL IN WINDOWS OS - LIGHTPEN3

(2.1) Full Screen Dual Pens

Both parties make drawings with the same tool in full screen mode.

Divided Screen Dual Pen

Both parties make drawings with the same or different tools in equally divided screen mode.

INSTALL IN WINDOWS OS - LIGHTPEN3

(2.2) Toolbar

Icons	Names	Descriptions
	Red brush pen	Red brush pen.
	Green brush pen	Green brush pen.
	Blue brush pen	Blue brush pen.
	White brush pen	White brush pen.
	Thin circular stroke	Thin brush pen.
	Thick circular stroke	Thick brush pen.
	Square stroke	Rectangle brush pen.
	Eraser	Erase strokes made by brush pen. * Only one eraser is available in full screen dual pen at the same time.
	Clear all	Erase all strokes made by brush pen.
	Import background	Load custom background.
	Save	Save contents and hand drawings of current page.
	Exit	Exit dual pen mode.

INSTALL IN WINDOWS OS - LIGHTPEN3

(3) Whiteboard mode

Click , the screen will change to whiteboard background and the two functions on the tool bar would change to Import Background and Import Whiteboard.

i. Click and the selection window will display for you to import desired pictures as background. See figure below.

ii Click to restore the background to whiteboard mode.

Click again to exit the whiteboard mode.

(4) Editing tools

Click and a popup sub-menu from the main menu is shown as below. Click to select the desired edit function.

Icons	Descriptions
	Print current screen.
	Undo last action.
	Cancel undoing last action.
	Simulate spotlight effects.
	Simulate curtain effects.
	Switch toolbar from vertical to horizontal orientation.
	Toggle switch location of toolbar at left or right side of the screen.

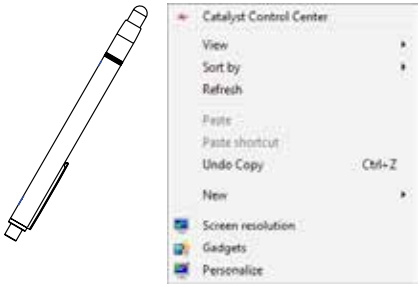
4.4 How to use the interaction function

You can use the light pen as a mouse in mouse mode.

Pressing the light pen tip functions like clicking the mouse key.

Pressing and holding the light pen for 2-3 seconds functions the same as right clicking your mouse.

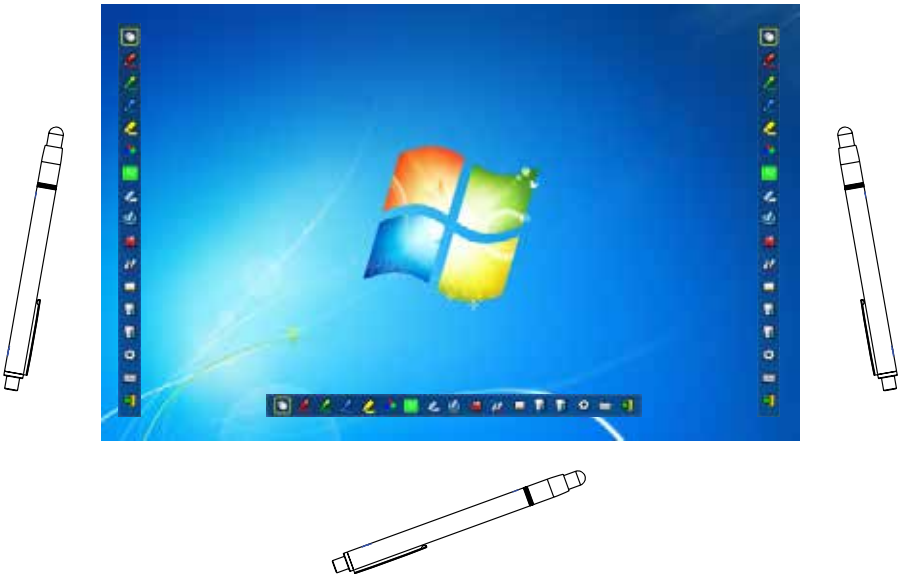
See Figure below.



4.5 Change toolbar direction

Point the light pen at any place under the projection image and press the pen tip to switch vertical toolbar into horizontal one.

Point the light pen to the left or right of the projection image and press the pen tip to switch horizontal toolbar into vertical one.



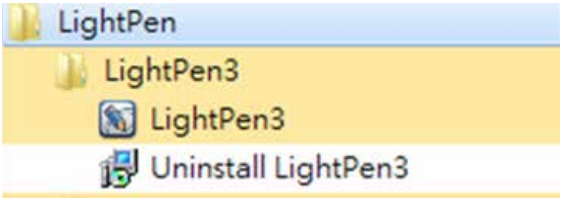
4.6 Change toolbar position

Point the light pen to the left or right away from the screen and press the pen tip to change toolbar location for vertical toolbar. Press again to display or hide the toolbar.

Point the light pen to the bottom away from the screen and press the pen tip to display or hide the toolbar for horizontal toolbar.

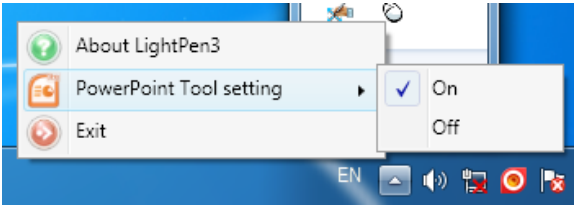
4.7 How to execute LightPen program again

You may execute the LightPen3 program again by running the steps of "Start/All Programs/LightPen/LightPen3".

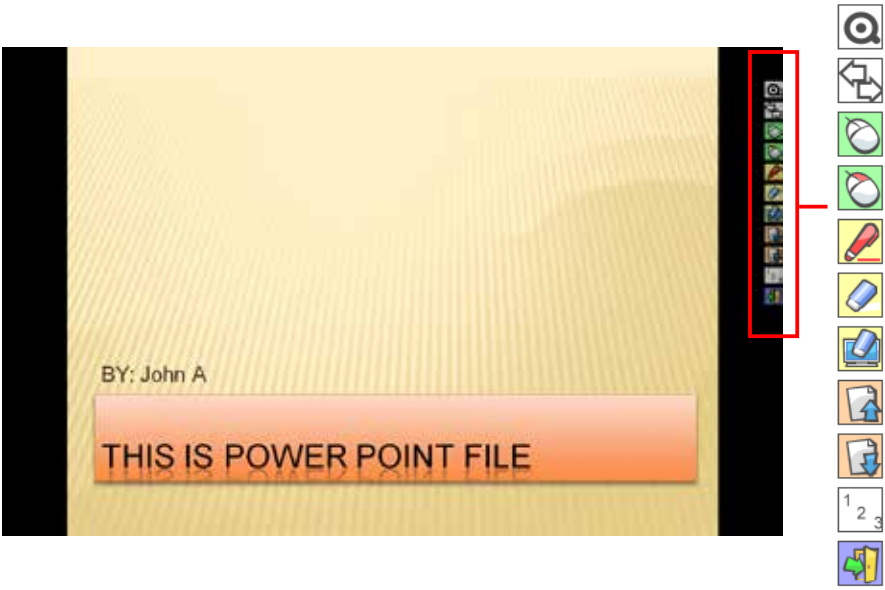


5. PowerPoint toolbar

LightPen3 features PowerPoint toolbar supporting Microsoft Office 2003 or later versions.



The PowerPoint toolbar will display at the right hand side of your screen if you open the PowerPoint Tool Setup from the toolbar and display the PowerPoint file in PowerPoint's Playback mode.



The PowerPoint toolbar closed automatically after exiting Playback mode.

5.1 Function of PowerPoint toolbar

Icons	Descriptions
	Change size of toolbar
	Change position of PowerPoint toolbar
	Switch to mouse mode
	Switch to the right key of your mouse
	Switch to red brush pen
	Erase
	Erase all
	Back to previous page
	Go to next page.
	Select page
	Close slide playback

INSTALL IN MAC OS

The LightPen3 software features an optical touch control function

1. System requirements

For normal optical touch control operation, please make sure the following system requirements are met.

Install your LightPen3 software

System requirements	
Operating system	Mac OS X v10.5 or above
CPU	Intel processor
Memory	2 GB or more
Minimum hard disk space	100 MB

2. Software installation

2.1 Driver installation

** Connect your projector to a computer to act as a disk drive. See Step 3 for installation.*

Step 1: Insert the Owner's Manual CD into your CD drive.

Step 2: Enter the "LightPen Software for Mac" folder in your CD. Copy the mac.zip file to your hard disk.

Step 3: Double click the mac.zip file. Move the SPDriver ICON to your desktop and start installation.

2.2 Install the LightPen 3 software

Step 1: Insert the Owner's Manual CD into your CD drive.

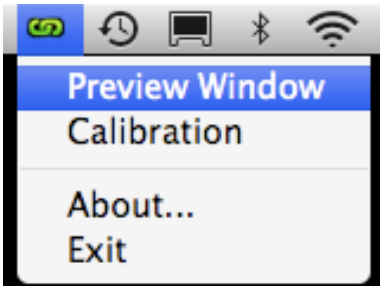
Step 2: Enter the "LightPen Software for Mac" folder in your CD. Copy the LightPen3.zip file to your hard disk.

Step 3: Double click the LightPen3.zip file. Move the LightPen3 ICON to desktop and start installation.

3. Initialize the optical touch control function

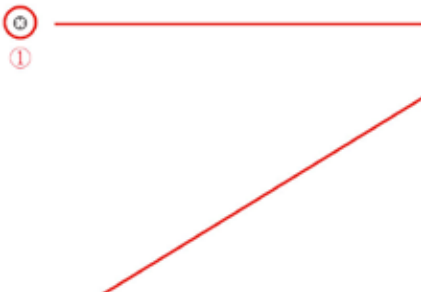
3.1 Connect your projector and a PC with a USB cable.Your system may look like the Figure shown below.

3.2 Click the icon and the menu as shown below will display.



** Select "About..." to show the software version information.*

3.3 Select "Calibration" to execute the calibration procedure.



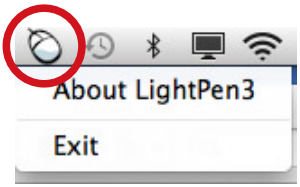
3.4 The system saves calibration data after touching the four calibration points.

4. Toolbar

4.1 LightPen3 toolbar

After the LightPen3 program is installed and executed, a toolbar displays on the right hand side of your screen.

** Select "About LightPen3" to show the software version information.*



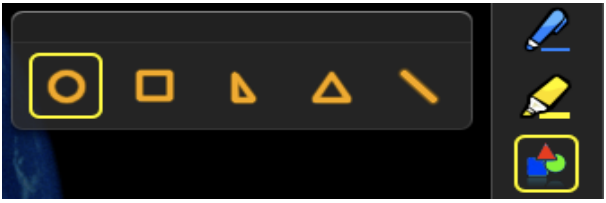
4.2 Main functions

Icons	Names	Descriptions
	Mouse	Mouse functions.
	Red brush pen	Red brush pen.
	Green brush pen	Green brush pen.
	Blue brush pen	Blue brush pen.
	Mark pen	Translucent brush pen.
	Drawing tools	To draw circles, rectangles, isosceles triangles, and lines.
02	Width and color of brush pen	Select width and color of brush pen.
	Eraser	Erase strokes made by brush pen.
	Clear all	Erase all strokes made by brush pen.
	Save	Save contents and hand drawings of current page.
	Whiteboard mode	Switch to whiteboard background mode.
	Previous page	Back to previous page.
	Next	Go to next page.
	Editor	Handwriting editor.
	On screen keypad	Open the on screen keypad.
	Exit	Exit application software.

4.3 Sub-functions

(1) Drawing tools

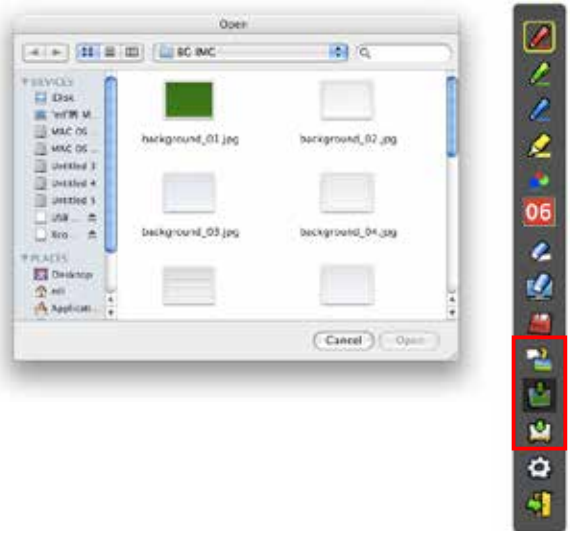
Click the main menu and a popup sub-menu from the main menu is shown as below. Click to select the desired drawing tool for hand drawing.



(2) Whiteboard mode

Click , the main menu will change to white background with the two functions of Import Background and Import Whiteboard.

i. Click and the selection window will display for you to import desired pictures as background. See figure below.



ii Click to restore the background to whiteboard mode.

Click again to exit the whiteboard mode.

(3) Editing tools

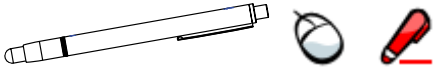
Click and a popup sub-menu from the main menu is shown as below. Click to select the desired edit function.

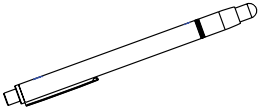
Icons	Descriptions
	Select what you have drawn as an object to enlarge, decrease, rotate, delete or move it.
	Print current screen.
	Undo last action.
	Cancel undoing last action.

4.4 Switch the mouse or brush pen mode

You can switch between mouse or brush pen modes by pointing the pen tip above or below the projected image and pressing the pen tip.

Icons in toolbar change to when switching to mouse mode; change to when switching to brush pen mode.





The items in yellow box will display as thumbnails in the toolbar for easy identification of current mode.

4.5 Change toolbar position

There is a quick method to change position visibility of the toolbar. Press the light pen tip at the left or right side beyond the screen, then you can change position visibility of the toolbar.

INSTALL IN LINUX OS -SPDRIVER

The SPDriver software features an optical touch control function

1. System requirements

For normal optical touch control operation, please make sure the following system requirements are met.

Install SPDriver

System requirements	
Operating system	Linux OS Ubuntu 10.04, Debian 5.05, Suse 11.3
CPU	Intel® Core™ 2 Duo 2.0 GHz or better (dedicated GPU is recommended)
Memory	2 GB or more
Minimum hard disk space	100 MB

2. SPDriver installation steps

** Connect your projector to a computer. Open the disk drive generated after the connection. Copy Linux.rar to the desktop. Unzip it and run 1-setup. (Please use CD for installation if the SP driver cannot be generated.)*

** Please log in as a root user before installation.*

Step 1: Insert the Owner's Manual CD into your CD drive.

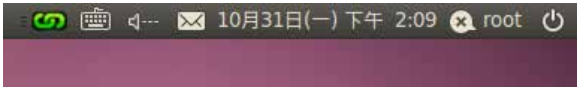
Step 2: Open the "SPDriver for Linux" folder and copy Linux.rar to the desktop and unzip it.

Step 3: Copy Linux.rar to the desktop. Unzip it and run 1-setup to start installation.

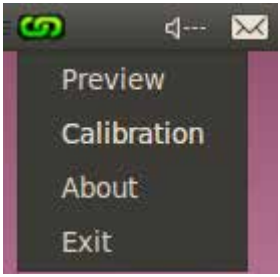
Step 4: Installation completed successfully.

3. Initialize the optical touch control function

3.1 Connect your projector and a PC with a USB cable.Your system may look like the Figure shown below.



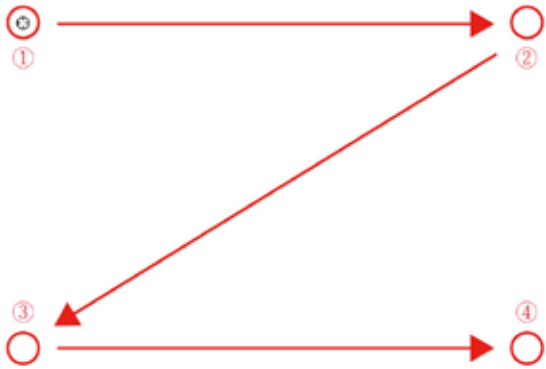
3.2 Click the icon and the menu as shown below will display.



** Select "About" to show the software version information.*

3.3 Select "Calibration" to execute the calibration procedure.

(There is no white background while calibrating.)



3.4 The system saves calibration data after touching the four calibration points.

TROUBLESHOOTING

Q1: Why does the message "The LightPen program is not found" appear?

A: It may be caused by the following:

(1) Your computer and projector are not properly connected. Please make sure the USB cable is properly inserted in both your computer and projector.

(1-1) Insert the USB cable again if you see the screen as shown below.

(1-2) In case the USB cable is not properly connected to your computer and projector. Please make sure the USB cable is properly inserted in both your computer and projector.If something as shown in Figure (A) displays in a Windows OS computer, the USB cable is not connected or the USB port is not working.The light pen function is now ready if a screen like Figure (B) displays.

(A)

(B)

(2) Please use the USB cable included with your projector.If a USB extension is needed, please contact your dealer.

(3) The USB port of your computer is not working. Please contact your IT staff.

Q2: How come the round calibration target does not execute properly?

A: (1) Please check whether the pointer or light pen is working:

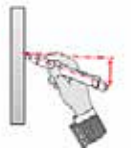
(1-1) Please make sure the pointer or light pen has a battery of adequate power and has been turned on.

(1-2) When using the pointer or light pen, please avoid writing in shadow areaa (see figure below) and maintain a 25 degree angle against the projection screen.The pointer or light pen is available for use only when signals transmitted by it can be received by the sensors.

TROUBLESHOOTING

Avoid writing in shadowy areas

Keep the light pen and project screen at an angle of 25 degree or more against each other



(2) The ambient lighting may be too bright to work properly. Please keep the projection screen and sensors from direct ambient lights.

(2-1) Direct sun light to the projection screen.

(2-2) Light sources exist near the sensors.

Please close and open the SPDriver program again. If Problem Q5 persists, remove light spots until none are left in the window.

Q3: How come the cursor is not located where the light pen is pointed to?

A: It may be caused by the following:

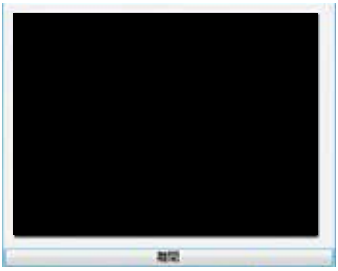
(1) Poor system calibration. Please make sure the center of the round target is pointed during calibration.

(2) The project location, projection size, or projection distance may be changed.

(3) The projection resolution may have been changed. Please calibrate again to solve this problem.

Q4: How come the cursor jumps around?

A: The ambient lighting may be too bright to work properly. Please keep the projection screen and sensors from ambient light interference, especially direct sun light.(Please refer to Q2.)



Q5: Why does the message "The ambient light is too bright to run the light pen system properly" appear?

A: Too strong an ambient lighting may interfere with the functions of sensors contained in your projector. Please keep the sensors of your projector away from direct ambient lights.

6: Since SP driver is resident in the PC, the driver displayed is an invalid one when connects to the SP module again.

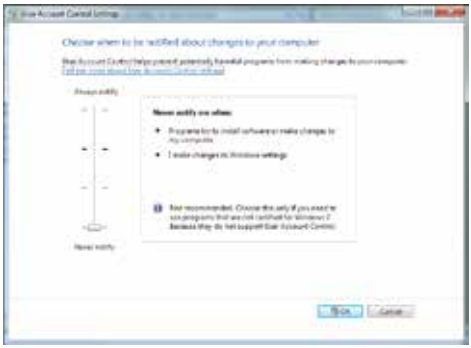
Q6: Why does SPDriver have no response from virtual keyboard function when it set as <Mouse mode> on Windows Vista/Windows 7 operating system?

A: This function of SPDriver may be restricted by the default setting of <User Account Control, UAC> on the Windows operating system. User can modify the setting by following steps.

(1) Enter the setting page from <Start menu/Control Panel/User Accounts>.

(2) Select <Change User Account Control settings>.

(3) Change the level of User Account Control to "Never notify" and then click "OK" to confirm it.



(4) Restart the computer to complete the process.

NOTES

NOTES

AUTHORISED DISTRIBUTOR

WWW.I3-TECHNOLOGIES.COM
INFO@I3-TECHNOLOGIES.COM