

Configuring Multiple Displays

Technical Brief

Document Version 1.2



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Chapter 1 Preface

This chapter provides general information about the document.

Intended Audience

This document is targeted at system administrators required to manage Xcalibur Global software and Chip PC thin client devices.

Scope

This document is applicable to the following product versions:

- Xcalibur Global, Version 1.1, Revision 2 + Service Pack 2
- ChipPC client device firmware, Version 6.5.4

Objectives

The objective of this document is to provide the technical knowledge and understanding that is required to correctly and to effectively use multiple display devices on a Chip PC client device.

Prerequisites

This document assumes that the reader has at least a mid-level technical understanding in the following areas:

- Xcalibur Global management in general and the use of Xcalibur Global policies in particular
- Chip PC client device configuration

Reference Materials

- Xcalibur Global Administrator's Guide, Ref: DG018U
- Image 6.5.x for Chip PC Thin Clients User Manual, Ref: DM019U



Document Features

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Technologies

Conventions

Bold formatting is used to indicate a product name, required selection or screen text entries.

Caution	Text marked Caution contains warnings about possible loss of data.

Important Text marked **Important** contains information that is essential to completing a task.

Note Text marked **Note** contains supplemental information.

Chapter Overview

This document is divided into the following chapters:

- Chapter 1, "Preface", provides general information about the document.
- Chapter 2, "Introduction", introduces the different display types, terminology and video technologies supported by Chip PC client devices.
- Chapter 3, "Multiple Display Options", describes the various configuration options available on Chip PC client devices that support multiple displays.
- Chapter 4, "Configuring Multiple Display Options", explains how to configure the multiple display options on the client device and via Xcalibur Global.
- Appendix A, "Plug-in Support for Multiple Displays", covers the configuration options for multiple displays that are available in the settings of some of the plug-ins.
- Appendix B, "A 'Quad' Client with Two Display Devices", explains the configuration possibilities available when connecting two display devices, each to a separate socket on a "Quad" client.



Chapter 2 Introduction

This chapter introduces the different display types, terminology and video technologies supported by Chip PC client devices.

Video Signals and Display Types

Chip PC client devices support the following types of video signals and their corresponding display types:

- Analog signal used by CRT screens, analog projectors, etc.
- Digital signal used by LCD screens, digital projectors, etc.

Note Some digital devices can also work with an analog signal.

Display Sockets

Two types of display sockets are used on the Chip PC client devices:

- VGA this is the standard socket for connecting Analog display devices.
- DVI this is the standard socket for connecting Digital display devices.

VGA Connector



DVI Connector



DVI Socket types

DVI sockets are capable of integrating an additional Analog signal together with the standard Digital signal.

- DVI sockets that only support a Digital signal are referred to as DVI-D sockets.
- DVI sockets that integrate both a Digital and an Analog signal are referred to as DVI-I sockets.

Connecting Two Display Devices to a Single DVI-I Socket

Due to the nature of the DVI-I socket, it is possible to connect two display devices to a single DVI-I socket. This is achieved with the help of a special "Y" cable that splits the DVI-I into two separate DVI-D and VGA sockets.





Dual & Quad Client Devices

Chip PC client devices supporting multiple displays are available in two categories:

- "Dual" client devices support up to two displays.
- "Quad" client devices support up to four displays

Working with Multiple Displays

When using multiple displays, there are two primary "display behavior" modes:

- Mirror Each display duplicates, "mirrors", the behavior of the other display.
- Append The screens are combined into one long extended screen. Each display is appended to the right edge or the previous display.

It is possible to configure multiple screens to use a combination of the above methods.

Desktops

When appending displays the first desktop on the left will be the primary desktop. The second display, appended to the right edge of the primary desktop will be the secondary desktop.

- Primary desktop By default plug-ins, system dialog boxes, system messages, and icons will appear in this display.
- Secondary desktop Some of the device settings support the option of redirecting system messages and dialogs to the secondary desktop. Some plug-ins can also be configured to open in the secondary desktop.
- Additional desktops these may be available appended to the right edge of the secondary desktop.

It is possible to drag windows across the desktops and some plug-ins can be expanded over all the desktops.



Supported Product Models

The following table lists the currently available Chip PC products that support multiple displays:

Chip PC Client Devices Supporting Multiple Displays					
Model	Туре	Notes			
Jack PC EFI 6900	Dual	Single DVI-I	Can use a "Y" cable to split the DVI-I socket into two sockets: one DVI-D socket and one VGA socket.		
Xtreme PC NG 6500	Dual	One DVI-D & One VGA	Cannot use a "Y" cable. Display devices are connected directly to the client sockets.		
Xtreme PC NG 6600	Quad	Two DVI-I	Can use "Y" cables to split the DVI-I sockets. Each DVI-I can be split into two sockets: one DVI-D socket and one VGA socket. A maximum of four display devices can be connected.		



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Chapter 3 Multiple Display Options

This chapter describes the various configuration options available on Chip PC client devices that support multiple displays.

The following table lists available configuration options and acceptable values:

Multiple Display Configuration Options				
Option	Values			
Monitor Settings (This option is used to determine the operation mode/behavior of the display/displays)	Single Monitor Single Monitor (cross) Dual Monitor Dual Monitor (cross) Clone Mode Horizontal Span Quad Spread (Analog Primary) Quad Spread (Digital Primary)			
Reposition dialog boxes on (This option determines the location of system dialog windows when using the "Horizontal Span" monitor setting)	No Repositioning Move to primary Move to secondary			
Second Display Properties (these options cannot be modified and appear for reference purpose only)	N/A			

Chapter 3 - Multiple Display Options



Monitor Settings

The **Monitor Settings** configuration option is used to determine the operationmode/behavior of the displays connected to the Chip PC client device.

The effect of the **Monitor Settings** option and the legitimate values for this option, vary between "Dual" client devices and "Quad" client devices. Following are explanations regarding the use of this setting on each type of device.

The "Dual" Client Device

"Dual" client devices can support one analog and one digital display devices. "Dual" client devices may appear in one of the following configurations:

- 1. One VGA (analog) and one DVI-D (digital) socket (Xtreme PC NG 6500).
- 2. One DVI-I socket that can be split into separate VGA (analog) and DVI-D (digital) sockets with a "Y" cable (Jack PC 6900).

The following table describes the effect of the **Monitor settings** values on "Dual" client device:

Effect of Monitor Settings on "Dual" Client Device				
Monitor Settings	onitor Maximum Effect ettings Resolution			
Single Monitor	1600x1200 x24	Only the analog display is active, the digital display is disabled .		
Single Monitor (cross)	1600x1200 x24	Only the digital display is active, the analog display is disabled .		
Dual Monitor	1024x768 x16	One extended screen composed of two displays: The analog display is the left half of the screer and functions as the primary desktop. The digital display is the right half of the scree and functions as the secondary desktop.		





Effect of Monitor Settings on "Dual" Client Device (continued)				
Monitor Settings	or Maximum Effect gs Resolution			
Dual Monitor (cross)	1024x768 x16	One extended screen composed of two displays: The digital display is the left half of the screen and functions as the primary desktop. The analog display is the right half of the screen and functions as the secondary desktop.		
Clone Mode	1600x1200 x24	The analog display and the digital display "mirror' each other and both function as the primary desktop		
Horizontal Span	1024x768 x16	One extended desktop composed of two displays. The desktop (including the task bar) is spanned across the two displays: The analog display is the left half of the desktop and functions as the primary desktop. The digital display is the right half of the desktop and functions as the secondary desktop		
Quad	N/A	N/A		
(Analog Primary)	N/A	N/A		
Quad Spread	N/A	N/A		
(Digital Primary)	N/A	N/A		

Note The options of "Quad Spread" and "Quad Spread (cross)" are not available on a "Dual" client device. If such a device receives an Xcalibur Policy configuring it to one of these options, the setting on the device will appear as "Horizontal Span" but will behave as "Clone Mode". This discrepancy between the appeared setting and the actual behavior is "by design" and intended as an indicator of an inapplicable policy.



The following table illustrates the effect of **Monitor Settings** on a "Dual" Client device:

Illustration of the effect of Monitor Settings on a "Dual" Client Device					
Monitor Settings	Analog	Digital			
Single Monitor	ICON ICON ICON ICON Task Bar				
Single Monitor (cross)		ICON ICON ICON ICON Task Bar			
Dual Monitor	ICON Primary ICON ICON Extended Task Bar	Secondary Screen			
Clone Mode	ICON Primary ICON ICON Mirrored Task Bar	ICON Primary ICON ICON Mirrored Task Bar			
Horizontal Span	ICON Primary ICON ICON Extended ICON Task	Secondary Screen Bar			
Monitor Settings	Digital	Analog			
Dual Monitor (cross)	ICON Primary ICON Extended ICON Task Bar	Secondary			





The "Quad" Client Device

"Quad" client devices are fitted with two DVI–I sockets. With the help of a "Y" Cable, each DVI-I socket can be split into one VGA and one DVI-D socket, as illustrated below. All together, a maximum of two analog and two digital display devices can be attached to a "Quad" device. The following naming conventions are used to distinguish between the different displays:

- 1. **Analog-1** and **Digital-1** refer to the VGA and DVI-D sockets that are split from the DVI-I socket near the **rear** of the client device.
- 2. **Analog-2** and **Digital-2** refer to the VGA and DVI-D sockets that are split from the DVI-I socket near the **front** of the client device.





The following table describes the effect of the **Monitor settings** values on "Quad" client device:

Effect of Monitor Settings on a "Quad" Client Device				
Monitor Settings	Maximum Resolution	Effect		
Single Monitor	1600x1200 x24	Only the Analog-1 display is active, the remaining displays are disabled.		
Single Monitor (cross)	1600x1200 x24	Only the Digital-1 display is active, the remaining displays are disabled.		
Dual Monitor	1600x1200 x24	 Two extended screens each composed of two displays. The two extended screens "mirror" each other: <u>Screen 1</u>: The Analog-1 display is the left half of the screen and functions as the primary desktop. The Analog-2 display is the right half of the screen and functions as the secondary desktop. <u>Screen 2</u>: The Digital -A display is the left half of the screen and functions as the primary desktop. 		
		The Digital -B display is the right half of the screen and functions as the secondary desktop.		





Effect of Monitor Settings on a "Quad" Client Device (continued)				
Monitor Settings	Monitor Maximum Effect Settings Resolution			
Dual Monitor (cross)	1600x1200 x24	Two extended screens each composed of two displays. The two extended screens "mirror" each other: <u>Screen 1</u> : The Analog-2 display is the left half of the screen and functions as the primary desktop. The Analog-1 display is the right half of the screen and functions as the secondary desktop. <u>Screen 2</u> : The Digital-2 display is the left half of the screen and functions as the primary desktop. The Digital-1 display is the right half of the screen and functions as the secondary desktop.		
Clone Mode	1600x1200 x24The Analog-1 display and the Digital-1 dis "mirror" each other and both function as the primary desktop. The remaining displays a disabled.			
Horizontal Span	1024x768 x16	 One extended screen composed of four displays. The displays are appended to each other in the following order, from left to right: First, the Analog-1 display that functions as the primary desktop. Second, the Digital-1 display which is appended to the right edge of the Analog-1 display and which functions as the secondary desktop. Third, the Analog-2 display which is appended to the right edge of the Digital-1 display. Fourth, the Digital-2 display which is appended to the right edge of the Analog-2 display. In addition, the Analog-1 display and the Digital-1 display are merged into one extended desktop with the task bar spanned across both displays. 		

Chapter 3 - Multiple Display Options





Effect of Monitor Settings on a "Quad" Client Device (continued)				
Monitor Maximum Effect Settings Resolution				
		One extended screen composed of four displays. The displays are appended to each other in the following order, from left to right: First, the Analog-1 display that functions as the primary desktop.		
Quad Spread (Analog Primary)	1024x768 x16	Second, the Digital-1 display which is appended to the right edge of the Analog-1 display and which functions as the secondary desktop.		
		Third, the Analog-2 display which is appended to the right edge of the Digital-1 display.		
		Fourth, the Digital-2 display which is appended to the right edge of the Analog-2 display.		
	1024x768 x16	One extended screen composed of four displays. The displays are appended to each other in the following order, from left to right:		
		First, the Digital-1 display that functions as the primary desktop.		
Quad Spread (Digital Primary)		Second, the Analog-1 display which is appended to the right edge of the Analog-1 display and which functions as the secondary desktop.		
		Third, the Digital-2 display which is appended to the right edge of the Digital-1 display.		
		Fourth, the Analog-2 display which is appended to the right edge of the Analog-2 display.		



The following table illustrates the effect of **Monitor Settings** on a "Quad" Client device:

Illustration of the effect of Monitor Settings on a "Quad" Client Device					
Monitor Settings	Analog-1	Digital-1	Analog-2	Digital-2	
Single Monitor	ICON Primary ICON ICON ICON Task Bar				
Clone Mode	ICON Primary ICON ICON Mirrored Task Bar	ICON Primary ICON ICON Mirrored Task Bar			
Horizontal Span	ICON Primary ICON ICON ICON Task	Secondary Extended Bar	Screen		
Quad Spread (Analog Primary)	ICON Primary ICON ICON ICON Task Bar	Secondary Extended	Screen		

Chapter 3 - Multiple Display Options



Note Notice that in each table header the various displays appear in a different order.

	Illustration of the effect of Monitor Settings on a "Quad" Client Device				
Monitor Settings	Analog-1	Analog-2	Digital-1	Digital-2	
Dual Monitor	ICON Primary ICON Extended ICON Extended	Secondary Screen - Mirrored	ICON ICON ICON ICON Extended	Secondary Screen - Mirrored	
Monitor Settings	Analog-2	Analog-1	Digital-2	Digital-1	
Dual Monitor (cross)	ICON Primary ICON Extended ICON Task Bar	Secondary Screen - Mirrored	ICON ICON ICON ICON ICON Task Bar	Secondary Screen - Mirrored	
Monitor Settings	Digital-1	Analog-1	Digital-2	Analog-2	
Single Monitor (cross)	ICON Primary ICON ICON ICON Task Bar				
Quad Spread (Digital Primary)	ICON Primary ICON ICON ICON Task Bar	Secondary Extended	Screen		



Reposition dialog boxes on

The **Reposition dialog boxes on** configuration option determines the location of system dialog windows when using the "Horizontal Span" monitor setting.

Effect of Reposition dialog boxes on		
Value	Effects	
No Repositioning	This is the default value. All system dialog boxes are opened in the center of the Extended Desktop. Half of the dialog box appears on the left display and half on the right display.	
Move to primary	The dialog boxes appear on the primary desktop.	
Move to secondary	The dialog boxes appear on the secondary desktop.	



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Chapter 4 Configuring Multiple Display Options

This chapter explains how to configure the multiple display options on the client device and via Xcalibur Global.

Configuring on the Client Device

Perform the following tasks on the client device:

- 1. From the desktop, open the **WBT Configuration** window by selecting: **Start \ Settings \ Device**
- 2. In the WBT Configuration, access the multiple display options by selecting the **Dual Screen** tab.

WBT Configuratio	n			×
General Input D	splay Dual S	Screen Printers	USB Printers	s USB Dev 🔸 🕨
📮 Use ti	his page to co	nfigure Dual Scr	een support	
Monitor Settings	: F	Ilone Mode		~
Reposition dialog boxes on :	ſ	lo Repositioning		V
Second Display I	Properties —			
Colo <u>r</u> s:			Set by displa	у ТАВ 😽
<u>S</u> creen Area:			Set by displa	у ТАВ 🗸
Refresh <u>F</u> requ	ency:		60	
	<u></u> K		ancel	Apply

- In the Dual Screen tab, select values for the Monitor Settings field and for the Reposition dialog boxes on field. Refer to the previous chapter for information regarding these settings.
- In the Dual Screen tab, click on the OK button to save your settings are exit the WBT Configuration window. The Settings Changed window will now appear.

Settin	gs Changed
2	You must restart your device before the new settings will take effect. Do you want to restart now?
	QK Cancel

5. In the Settings Changed window, click on the **OK** button to restart the client device. This is required for the settings to take effect.

Chapter 4 - Configuring Multiple Display Options





Configuring via Xcalibur Global

When using Xcalibur Global, the multiple display options are configured via an Xcalibur Policy.

Note For additional information on Xcalibur Policies, consult the Reference Materials.

Perform the following tasks in Xcalibur Global:

- 1. Create an Xcalibur
- 2. In the Xcalibur Global policy editor, expand the following path, as illustrated:

<policy name> \ Peripheral Settings \ Input/Output Device Settings



3. Double click on the **Dual-Monitor options** to open the Dual-Monitor options window.

Chapter 4 - Configuring Multiple Display Options



Dual-Monitor options	<u>? ×</u>
Settings Explain Supported Client	s]
Use this page to configure D	ual Screen support
 Noj Configured Enabled Digabled 	Prev Next
Monitor type:	Clone Mode
Reposition <u>d</u> ialog boxed on:	No Repositioning
DVI Display Properties	
Colors:	The Same As CRT
Sc <u>r</u> een Area:	The Same As CRT 💌
Refresh <u>F</u> requency:	60 🔽
OK	Cancel Apply

- 4. In the Dual-Monitor options window, select values for the **Monitor Settings** field and for **the Reposition dialog boxes on** field. Refer to the previous chapter for information regarding these settings.
- 5. In the Dual-Monitor options window, click on the **OK** button to save your settings are exit the Dual-Monitor options window.



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Appendix A Plug-in Support for Multiple Displays

This appendix covers the configuration options for multiple displays that are available in the settings of some of the plug-ins.

The following plug-ins have special configuration settings for multiple displays:

- 1. Citrix ICA
- 2. Microsoft RDP
- 3. Microsoft Internet Explorer
- 4. Pericom Terminal Emulation



Citrix ICA

Configuring the Plug-in on the Client Device

To configure the multiple display settings for the Citrix ICA plug-in, on the client device, perform the following procedure:

- 1. From the client device desktop, open the **Plugins** tab within the **WBT Configuration** window by selecting: **Start \ Settings \ Plugins...**
- 2. From the Plugins tab, open the **Citrix ICA Connection Plug-in** window by selecting the **Citrix ICA Connection** in the list of **Available Plug-ins**, and then clicking the **Configure...** button.
- 3. From the Citrix ICA Connection Plug-in window, open the **Misc** tab by clicking on it.
- 4. In the Misc tab, select one of the following values for the field **Maximize** applications in Dual Screen Mode to:
 - 4.1 Span when maximized, the application window spans across the displays.
 - 4.2 Primary the application window will maximize on the primary display.
 - 4.3 Secondary when maximized, the application window spans across the displays.

Citrix ICA Connection Plug-in		×
This third-party Plug-in offers connectivity to 0 9.0402)	litrix server/s. (ver.	
Settings Misc		
TransportReconnectEnabled		
IransportSilentDisconnect		
TransportReconnectDelay (msec):	12000	
TW2StopwatchScale:	5 🔽	
PrinterThreadPriority :	1	
$\underline{M} a ximize applications in Dual Screen Mode To :$	Span 🗸	
Use user credentials for pass-through authenticatio	OPrimary	
Use user credentials to connect to PNAgent server	Secondary	
Use default ICA icon for PNA connections	ICA Global	
Wait for PNAgent process (sec) :	10 💌	
<u>o</u> k	Cancel	

- 5. In the Misc tab, click **OK** to save your settings and return to the WBT Configuration window.
- 6. In the WBT Configuration window, click **OK** to save your settings and return to the client desktop.
- 7. In the client device desktop, a new dialog window will appear requesting a restart of the client device. Click **OK** to confirm and restart the device.





Configuring the Plug-in via Xcalibur Global

When configuring via Xcalibur Global an Xcalibur Policy is used. To configure the multiple display settings for the Citrix ICA plug-in, via Xcalibur Global, perform the following procedure:

- 1. Open the relevant Xcalibur Policy with the policy editor.
- 2. In the Xcalibur Global policy editor, expand the following path:

<policy name> \ Device Configuration \
Installable Software Modules \ Connections \

- 3. From within the **Connection** branch, open the **Global Settings** window by right clicking on the **Custom ICA** *X.XX* **Connection** and selecting the **properties** option from the drop down menu.
- 4. From the Global Settings window, select Enabled and select one of the following values for the field **Maximize applications in Dual Screen Mode to:**
 - 4.1 Span when maximized, the application window spans across the displays.
 - 4.2 Primary the application window will maximize on the primary display.
 - 4.3 Secondary when maximized, the application window spans across the displays.

Global Settings	? ×
Settings Explain Supported Clients	
Global Settings	
C No <u>t</u> Configured C <u>E</u> nabled C Di <u>s</u> abled	<u>Prev</u> Ne <u>x</u> t
Enable connection to USB storage device	
MountPoint \hard disk	
DriverLetter	_
TW2StopwatchScale	_
Maximize applications in Dual Screen Mode To	Span 💌
Use user credentials for pass t <u>h</u> rough authentic	Span Primary Secondary Ad <u>v</u> anced
OK Cano	el <u>A</u> pply

- 5. In the Global Settings window, click **OK** to save your settings and return to the policy editor window.
- 6. Exit the policy editor by selecting File \ Exit from the menu.



Microsoft RDP

Configuring the Plug-in on the Client Device

To configure the multiple display settings for the Microsoft RDP plug-in, on the client device, perform the following procedure:

- 1. From the client device desktop, open the My Connections Manager window by selecting Start \ My Connections.
- 2. From the My Connections Manager window, create a new RDP connection or open the properties of an existing RDP connection.
- 3. In the **RDP Connection Wizard** window (new connection) or in the **RDP Connection Setup** (existing connection), open the **Experience** tab.
- 4. In the Experience tab, in the **Display Properties** section, select one of the following values for the **Open on** field:
 - 4.1 Span the application window is spanned across the displays. This option is only available if the device is configured to Horizontal Span mode.
 - 4.2 Primary the application window will appear on the primary display.
 - 4.3 Secondary the application window will appear on the secondary display

RDP Connecti	on Wizard					×
Experience						
Display Pro	nerties					
	Colors:	65535 Color	s			
E I	<u>W</u> idth:	1024	H <u>e</u> ight:	768	-	
	Op <u>e</u> n on	Primary				
🔽 Displa	ay connection b	al Primary				
V Open	connect <u>i</u> on in '	FilSpan			Idow	
Performan	ce					
	Choose your	connection sp	eed to optimiz:	e performanc	:e.	
	Modem (56	Kbps)				
Allow the	following:					
Deskt	op background	1	V Bit <u>m</u> ap	caching		
Men <u>u</u>	and Window a	nimation	Comp <u>r</u> e	ssion		
Show dragg	contents of wi	indow while	Themes	;		
Note: Final o settings. Ser	onnection conf ver settings ca	iguration is def In override clier	ined by both c it settings.	lient and ser	ver	
		Back	<u>N</u> ext>		ancel	

5. Complete the RDP Connection Wizard (new connection) or click OK to exit the RDP Connection Setup (existing connection).



Configuring the Plug-in via Xcalibur Global

When configuring via Xcalibur Global an Xcalibur Policy is used. To configure the multiple display settings for the Microsoft RDP plug-in, via Xcalibur Global, perform the following procedure:

- 1. Open the relevant Xcalibur Policy with the policy editor.
- 2. In the Xcalibur Global policy editor, expand the following path:

<policy name> \ Device Configuration \
Installable Software Modules \ Connections \

- 3. In the Connections branch, select the Remote Desktop Connection.
- 4. Create a new RDP Connection or use an existing connection.
- 5. From the right pane, open the *<connection name>* Properties window by right clicking on the desired RDP Connection and selecting Properties from the drop down menu.
- 6. From the *<connection name>* Properties window, open the **Display** tab.
- 7. From the Display tab, in the **Remote desktop size** section, select one of the following values for the **Open on** field:
 - 7.1 Horizontal Span the application window is spanned across the displays.
 - 7.2 Primary the application window will appear on the primary display.
 - 7.3 Secondary the application window will appear on the secondary display

RDP Connection Properties ?	×
Logon Display Local Resources Programs Experience Options	
Remote desktop size I 1024 by 768 pixels Wight: 1024 Height: 768 Opgn on Primary ✓ Display the condary Hoprizontal Span Open connection in Eull Screen	
Colors Colors High Color (16 bit) Note: Settings on the remote computer might override this setting. OK Cancel Apply	

- 8. In the *<connection name>* Properties window, click **OK** to save your settings and return to the policy editor window.
- 9. Exit the policy editor by selecting File \ Exit from the menu.

Appendix A - Plug-in Support for Multiple Displays



Microsoft Internet Explorer

Configuring the Plug-in on the Client Device

To configure the multiple display settings for the Microsoft Internet Explorer plug-in, on the client device, perform the following procedure:

- 1. From the client device desktop, open the **My Connections Manager** window by selecting **Start \ My Connections**.
- From the My Connections Manager window, create a new Internet Explorer connection or open the properties of an existing Internet Explorer connection.
- 3. In the **Internet Explorer Wizard** window (new connection) or in the **Internet Explorer Setup** (existing connection), select one of the following values for the **Open on** field:
 - 3.1 Primary the application window will appear on the primary display.
 - 3.2 Secondary the application window will appear on the secondary display
 - 3.3 Span the application window is spanned across the displays. This option is only available if the device is configured to Horizontal Span mode.

Internet Explorer Wiz	ard	×
Welcome to	Internet Explorer connection setup.	
<u>T</u> itle:	Chip PC	
<u>S</u> tart Page:	http://www.chippc.com	
Op <u>e</u> n on	Primary	
Open IE in full scree	Primary BrSecondary Span	

4. Click OK to save the settings and return to the client desktop.



Configuring the Plug-in via Xcalibur Global

When configuring via Xcalibur Global an Xcalibur Policy is used. To configure the multiple display settings for the Microsoft Internet Explorer plug-in, via Xcalibur Global, perform the following procedure:

- 5. Open the relevant Xcalibur Policy with the policy editor.
- 6. In the Xcalibur Global policy editor, expand the following path:

<policy name> \ Device Configuration \
Installable Software Modules \ Connections \

- 7. In the Connections branch, select the Microsoft Internet Explorer.
- 8. Create a new internet Explorer Connection or use an existing connection.
- From the right pane, open the *<connection name>* Properties window by right clicking on the desired Microsoft Internet Explorer Connection and selecting Properties from the drop down menu.
- 10. From the *<connection name>* Properties window, select one of the following values for the **Open on** field:
 - 10.1 Primary the application window will appear on the primary display.
 - 10.2 Secondary the application window will appear on the secondary display
 - 10.3Horizontal Span the application window is spanned across the displays.

Internet Explorer Properties ?	x
Properties	
Internet Explorer	
Display na <u>m</u> e: Internet Explorer	
Sta <u>r</u> t Page: www.chippc.com	
On policy receive	
Don't create connection shortcut on desktop	
✓ Open internet explorer in <u>full</u> screen mode <u>Widht</u> 640 Height 480	
Open on Primary Primary Secondary	
Horizontal Span	
OK Cancel Apply	

- 11. In the *<connection name>* Properties window, click **OK** to save your settings and return to the policy editor window.
- 12. Exit the policy editor by selecting File \ Exit from the menu.

Appendix A - Plug-in Support for Multiple Displays



Pericom Terminal Emulation

Configuring the Plug-in on the Client Device

To configure the multiple display settings for the Pericom Terminal Emulation plug-in, on the client device, perform the following procedure:

- 1. From the client device desktop, open the **My Connections Manager** window by selecting **Start \ My Connections**.
- 2. From the My Connections Manager window, create a Terminal Emulation.
- 3. From the My Connections Manager, open the **TeamTalk Advanced Properties** windows by right clicking on the desired Terminal Emulation connection and selection **Advanced...** from the drop down menu.
- 4. In the TeamTalk Advanced Properties window, select one of the following values for the **Open on** field:
 - 4.1 User Default uses the default device setting.
 - 4.2 Primary the application window will appear on the primary display.
 - 4.3 Secondary the application window will appear on the secondary display
 - 4.4 Span the application window is spanned across the displays. This option is only available if the device is configured to Horizontal Span mode.

TeemTalk 4	Advanced Properties	
	Define advanced connection parameters	
Op <u>e</u> n on	Span User Default Primary Secondary Span	
	Qk <u>C</u> ancel	

5. Click OK to save the settings and return to the client desktop.



Configuring the Plug-in via Xcalibur Global

When configuring via Xcalibur Global an Xcalibur Policy is used. To configure the multiple display settings for the Pericom Terminal Emulation plug-in, via Xcalibur Global, perform the following procedure:

- 1. Open the relevant Xcalibur Policy with the policy editor.
- 2. In the Xcalibur Global policy editor, expand the following path:

<policy name> \ Device Configuration \ Installable Software Modules \ Connections \

- 3. In the Connections branch, select the Pericom Connection.
- 4. Create a new Pericom Connection or use an existing connection.
- 5. From the right pane, open the *<connection name>* Properties window by right clicking on the desired Pericom Connection and selecting Properties from the drop down menu.
- 6. From the *<connection name>* Properties window, open the **Advanced** tab and select one of the following values for the **Open on** field:
 - 6.1 User Default uses the default device setting.
 - 6.2 Primary the application window will appear on the primary display.
 - 6.3 Secondary the application window will appear on the secondary display
 - 6.4 Span the application window is spanned across the displays.

MyTerm Properties			? ×
Connection GUI Over	rides Auto Login Se	ettings Advance	۹) .
Press button to chang	je įcon		
On policy receive	Don't create conn	ection shortcut on	deskt 💌
Open o <u>n</u>	User Default User Default Primary Secondary Span	_	
	ОК	Cancel	Apply

- 7. In the *<connection name>* Properties window, click **OK** to save your settings and return to the policy editor window.
- 8. Exit the policy editor by selecting File \ Exit from the menu.

Appendix A - Plug-in Support for Multiple Displays



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Appendix B A "Quad" client with two display devices

This appendix will explain how to work with the following display and client device configuration:

- 1. A "Quad" client device.
- 2. Two display devices that are each connected to a separate socket.
- **Note** For the purpose of this appendix, there is no significance to the type of the connected displays (digital/analog).

Monitor Settings

When configuring the **Dual Screen** properties (on the local device or via Xcalibur Global) the following values are relevant for the field of **Monitor Settings**:

- Clone Mode
- Single Monitor
- Single Monitor (cross)
- Dual Monitor
- Dual Monitor (cross)

When selecting the Clone Mode or one of the Single Monitor settings, the behavior of application windows is the normal behavior found in any regular single display configuration.

The following section will explain the details regarding the special behavior of application windows in the Dual Monitor settings.

Application Windows Behavior in Dual Monitor Settings

In a Dual Monitor setting, the exact behavior of an application window depends on the type of the application.

We will focus on the following two applications:

- Citrix ICA
- Microsoft RDP

Appendix B - A "Quad" client with two display devices



Citrix ICA

The following table describes the various window behaviors that are available when using ICA and their relevant settings:

Window Behavior	ICA mode	ICA plug-in setting	Comments
Maximize	Desktop	N/A	Window is spanned across both displays.
	Published Application – Full Screen	N/A	Window is spanned across both displays.
	Published Application – Seamless Window	Secondary / Span	Window is spanned across both displays.
	Published Application – Seamless Window	Primary	Window will maximize in the Primary display even if resized and moved to the secondary display.
Resize / Minimize	Desktop	N/A	Cannot be resized or minimized.
	Published Application – Full Screen	N/A	Cannot be resized or minimized.
	Published Application – Seamless Window	N/A	Can be resized and minimized. Can be resized across displays.
Drag window between displays	Desktop	N/A	Cannot be dragged between displays
	Published Application – Full Screen	N/A	Cannot be dragged between displays
	Published Application – Seamless Window	N/A	Can be dragged between displays



Microsoft RDP

The following table describes the various window behaviors that are available when using RDP and their relevant settings:

Window Behavior	RDP Connection Settings	Comments
Maximize	Open on: Primary	Window is maximized on the Primary display.
	Open on: Secondary	Window is maximized on the Secondary display.
Resize / Minimize	Display connection bar – enabled Open connection in 'Full Screen' - enabled	Cannot resize. Can minimize.
	Display connection bar – enabled Open connection in 'Full Screen' - disabled	Cannot resize. Can minimize.
	Display connection bar – disabled Open connection in 'Full Screen' - enabled	Cannot resize. Cannot minimize.
	Display connection bar – disabled Open connection in 'Full Screen' - disabled	Cannot resize. Can minimize.

Appendix B - A "Quad" client with two display devices





Window Behavior	RDP Connection Settings	Comments
Drag window between displays	Display connection bar – enabled Open connection in 'Full Screen' - enabled	Cannot drag window between displays.
	Display connection bar – enabled Open connection in 'Full Screen' - disabled	Cannot drag window between displays.
	Display connection bar – disabled Open connection in 'Full Screen' - enabled	Cannot drag window between displays.
	Display connection bar – disabled Open connection in 'Full Screen' - disabled	Can drag window between displays.