

PACS QUICK GUIDE

SOFTWARE VERSION 4.4

ARA Help Desk (512) 531-PACS (7227)

We're here to assist you with questions about operating your equipment.

LOCATING A STUDY IN WORKLIST

1. Double click the Synapse® icon.



2. If prompted, log in with username and password provided by the PACS admin.
3. Locate the Patient/Study to view by selecting the appropriate folder.



Recent = 7 days

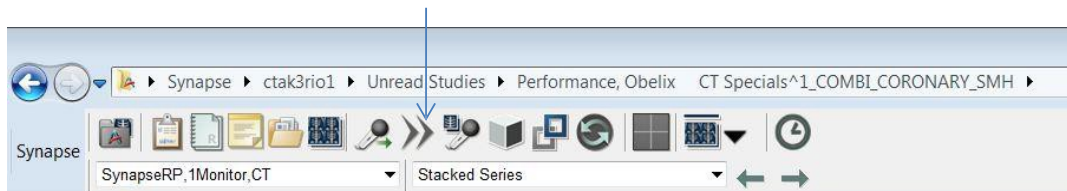
4. Enter patient information as shown to refine the search.

Patient Name	Patient ID
type name here	type MRN here

5. Double click on a listed Study to display.
6. Select an image by left click. To view next image, rotate the mouse wheel.
7. Right click to access Synapse Image Tool Menu.
8. Select the UP Icon to return to list.



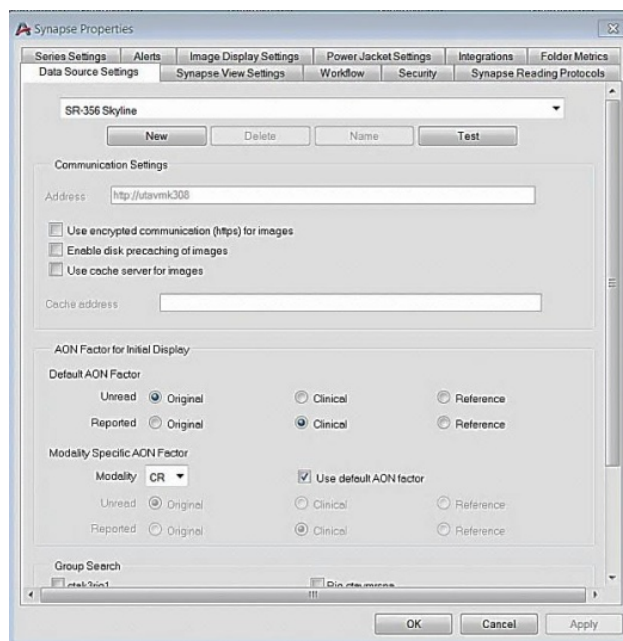
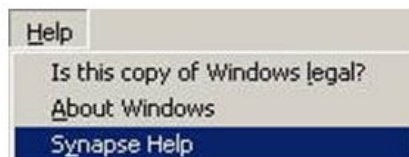
9. If using Windows 7 without UP, return to list by clicking on folder at top of page.



SYNAPSE PROPERTY SETTINGS

There are many customizable workstation settings found in the Synapse Properties.

Please refer to the **Synapse Property Settings** in the **Synapse Help** file.



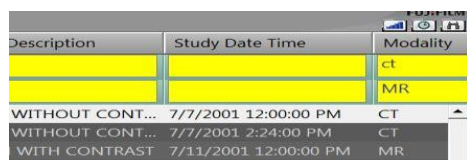
FILTERING WORKLISTS

Worklists may be filtered by various methods.

The **Search Bar** can be used to filter lists by any column on the List View. If any search criteria is used, the **Search Bar** will be highlighted (yellow on color and gray on monochrome monitors).



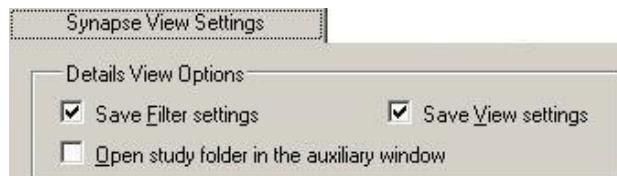
Multiple Search criteria can be used across multiple columns or in the same column by using the down arrow.



Multilevel sort can be used for up to 3 levels by pressing the **Ctrl** key while clicking on the column headers. Arrows next to column headers represent sort hierarchy.



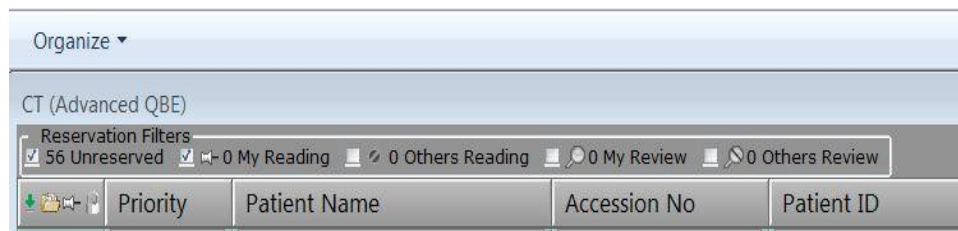
Filters can be saved by selecting **Save Filter settings** in Synapse Properties View Settings.



ADVANCED FILTERING WORKLISTS

Filtering worklists by Reservations or assignment type.

Apply checkbox to filter by Reservation, My Reading, Others Reading, My Review, and Others Review (privilege based).



List filtered by My Reading and CT Modality:

Unread Studies (Advanced QBE)										
Reservation Filters										
375 Unreserved 2 My Reading 0 Others Reading 0 My Review 0 Others Review										
Priority	Assigned by	Assigned to	In Progress	Patient Name	Accession No	Patient ID	Proc Description	Study Date Time	Modality	
									ct	
	Synapseae, Syn...	Synapseae, Syn...	No	2000ctseries4, Performance	A200.16.2000.4.1.1	P200.16.2000.4.1	UNKNOWN	1/2/2007 1:01:01 AM	CT	
	Synapseae, Syn...	Synapseae, Syn...	No	2000ctseries4, Performance	A200.16.2000.4.2.1	P200.16.2000.4.2	UNKNOWN	1/2/2007 1:01:01 AM	CT	

List filtered by My Reading and Priority Column sort:

Unread Studies (Advanced QBE)										
Reservation Filters										
375 Unreserved 2 My Reading 0 Others Reading 0 My Review 0 Others Review										
Priority	Assigned by	Assigned to	In Progress	Patient Name	Accession No	Patient ID	Proc Description	Study Date Time	Modality	
									ct	
S	Synapseae, Syn...	Synapseae, Syn...	No	2000ctseries4, Performance	A200.16.2000.4.1.1	P200.16.2000.4.1	UNKNOWN	1/2/2007 1:01:01 AM	CT	
S	Synapseae, Syn...	Synapseae, Syn...	No	2000ctseries4, Performance	A200.16.2000.4.2.1	P200.16.2000.4.2	UNKNOWN	1/2/2007 1:01:01 AM	CT	

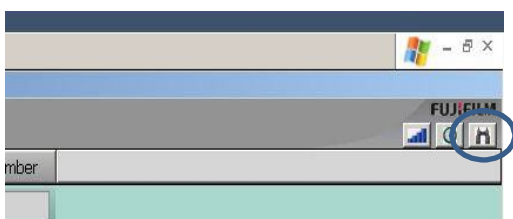
USING THE SEARCH OPTION TO LOCATE STUDIES

The Synapse® "Search" option can be found in three places:

1. Desktop Icon – right click Synapse Icon, then left click "Search"

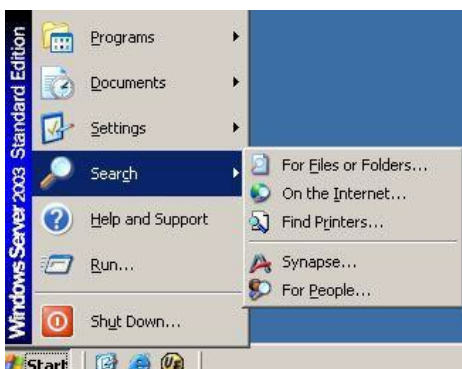


2. List View



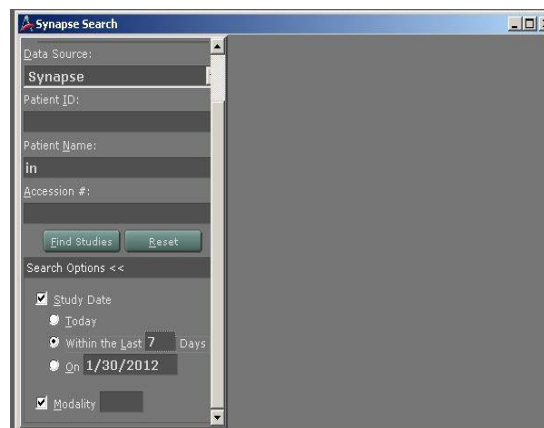
 Left click Search Icon

3. Start > Search > Synapse



The Search feature can be used for looking up patients without navigating to a Work List. Also, it can be left open and incorporated in Interruption Workflow.

After choosing Search from List View, Synapse Desktop Icon or Start bar, enter the patient information to locate the study. After viewing, close the window. The original study view will be maintained.



ACCESSING PATIENT AND STUDY INFORMATION

Power Jacket is the Master Patient Information Jacket and all information associated with selected patients is accessible from this window. Columns may be sorted.

Patient Information for "Incledon, Summer" - CT ABDOMEN w/OUI

Docs	Priority	Description	Study Date	Mod	# Img	Status	Accession #
	R	MRI ABDOMEN with and without contrast	9/27/2009 11:55:01 AM	MR	846	Complete	3264
	R	MRI ABDOMEN with and without contrast	10/14/2002 8:14:23 AM	MR	192	Finalized	3109
	R	CT ABDOMEN w/OUI	9/24/2002 11:12:37 AM	CT	102	Complete	3110
S		CT HEAD w/O	7/7/2001 2:24:00 PM	CT	33	Complete	3108
	R	CT HEAD without contrast	7/7/2001 12:00:00 PM	CT	24	Finalized	3107

List studies with: Same Modality

Compare Off Compare Open Update

Study Info

Site ID: HOSP
Patient ID: 2000037
DOB: 3/30/1952 Age/Gender: 50Y, F
Order #: 3110
Accession #: 3110
Procedure: CT ABDOMEN w/OUI
Date: 9/24/2002 11:12:37 AM
Reason: ABANDONMENT/LACK OF CARE
Ordering Physician: Bass, Brian Phone: <unknown> Pager: <unknown>
Referring Physician: Bass, Brian Phone: <unknown> Pager: <unknown>
Attending Physician: Bass, Brian Phone: <unknown> Pager: <unknown>
Visit #: 1650
Class: I
Pregnancy: Unknown LMP: N/A
Admission Date: 11/30/2009
Prim. Loc: CCU
Current Loc: UNKNOWN ID

Power Jacket sorted by Modality Column

Patient Information for "Dayton, Melissa" - CHEST 2 VIEWS

Docs	Priority	Description	Study Date	Mod	# Img	Status	Accession #
	R	CHEST 2 VIEWS	8/15/2005 11:00:52 AM	CR	2	Finalized	3231
S		CHEST 2 VIEWS	8/5/2005 7:29:17 AM	CR	2	Complete	3232
	R	Portable Chest	8/3/2005 6:42:45 PM	CR	1	Finalized	3234
	R	CHEST 2 VIEWS	8/3/2005 7:07:16 AM	CR	2	Finalized	3230
	R	CHEST 1 VIEW	8/2/2005 12:24:45 PM	CR	1	Finalized	3233
	R	MRI ABDOMEN with contrast	4/7/2008 6:15:33 AM	MR	270	Complete	3078

List studies with: Same Modality

Compare Off Compare Open Update

Power Jacket sorted by Study Status

Patient Information for "Dayton, Melissa" - CHEST 2 VIEWS

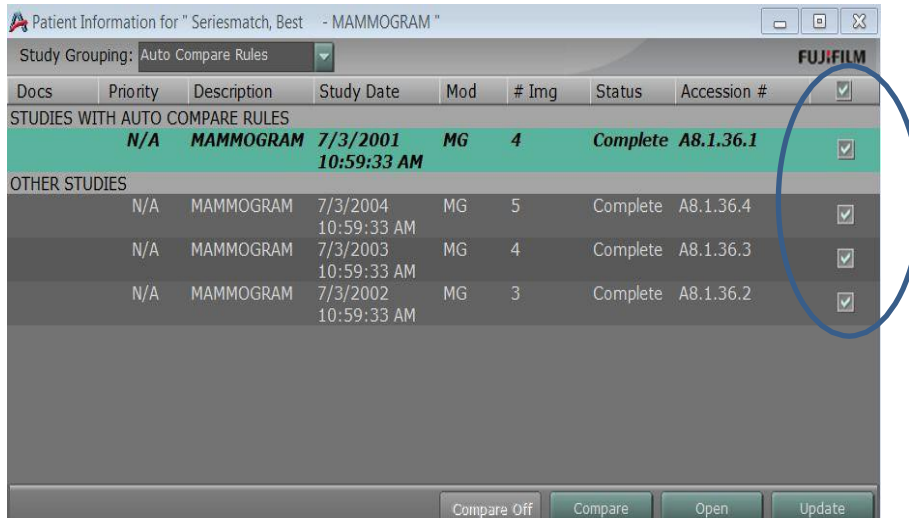
Docs	Priority	Description	Study Date	Mod	# Img	Status	Accession #
	R	MRI ABDOMEN with contrast	4/7/2008 6:15:33 AM	MR	270	Complete	3078
S		CHEST 2 VIEWS	8/5/2005 7:29:17 AM	CR	2	Complete	3232
	R	CHEST 2 VIEWS	8/15/2005 11:00:52 AM	CR	2	Finalized	3231
	R	Portable Chest	8/3/2005 6:42:45 PM	CR	1	Finalized	3234
	R	CHEST 2 VIEWS	8/3/2005 7:07:16 AM	CR	2	Finalized	3230
	R	CHEST 1 VIEW	8/2/2005 12:24:45 PM	CR	1	Finalized	3233

List studies with: Same Modality

Compare Off Compare Open Update

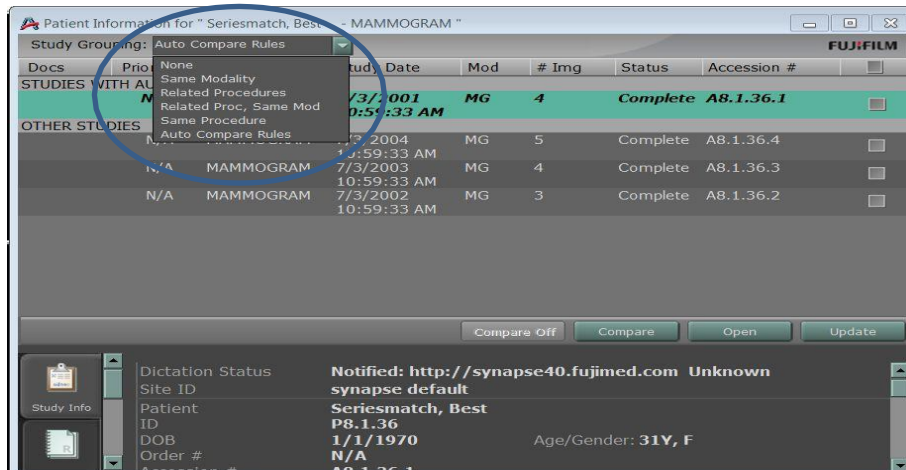
Power Jacket Comparison Checkbox

Left click on the checkbox to choose comparison studies, then left click on "Compare".



Power Jacket Study Grouping

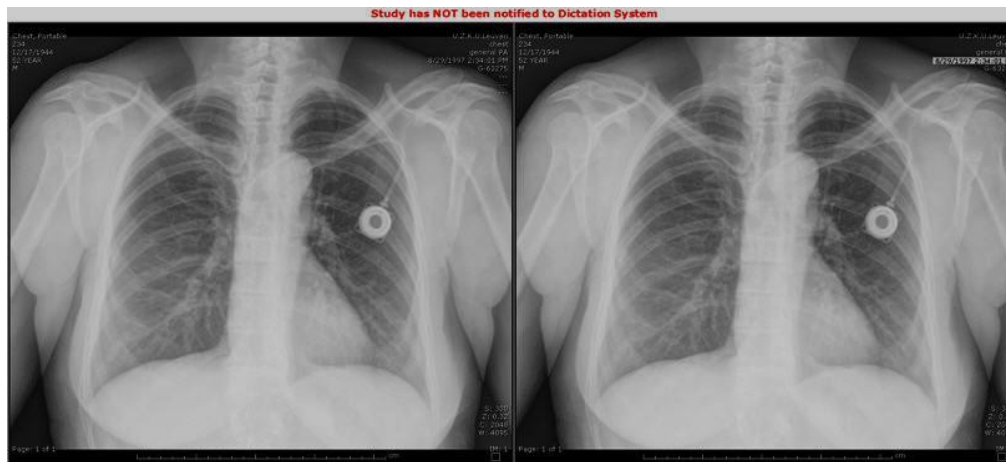
Choose grouping of studies in Power Jacket patient exam list.



Some Shortcuts for Power Jacket Content

Alt + I	Displays the study Information.
Alt + N	Displays the study Notes.
Alt + R	Displays the study Report.
Alt + U	Displays Documents in Power Jacket.
Alt + E	Displays Series Picker in Power Jacket.

After choosing comparison/historical image from the Patient Power Jacket, the comparison images are delineated by the highlighted **time** and **date** of acquisition.

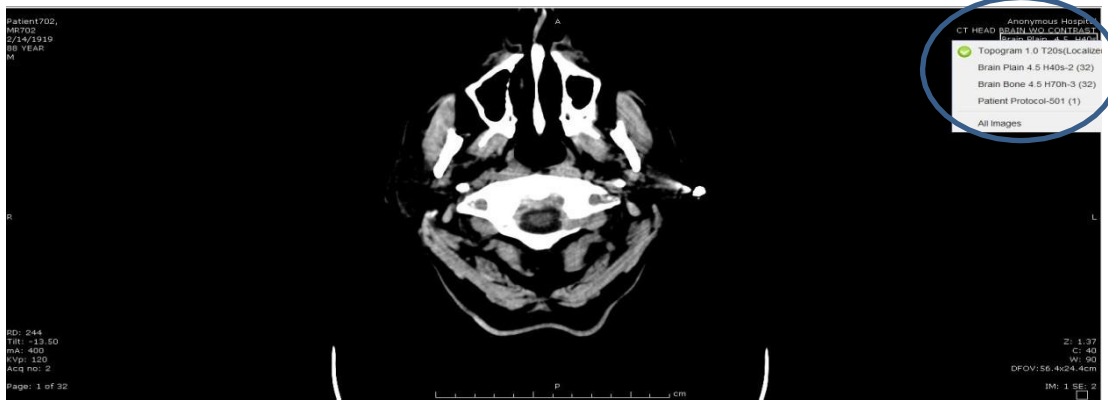


Interactive Series Description: replaces series in active viewport

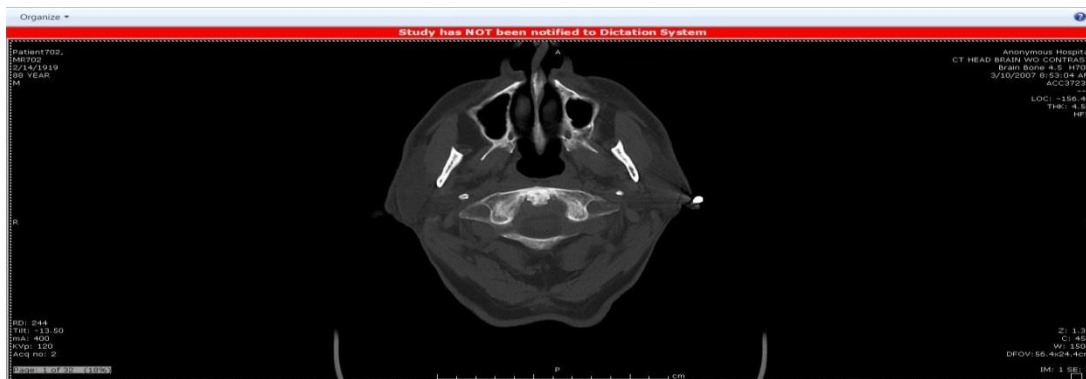
1. Hover cursor on series description in active viewport.



2. Left click to choose replacement series from dropdown list.



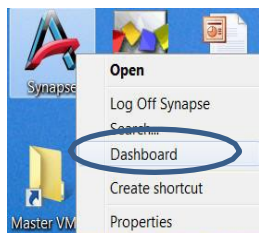
3. Series is replaced in active viewport with new series.



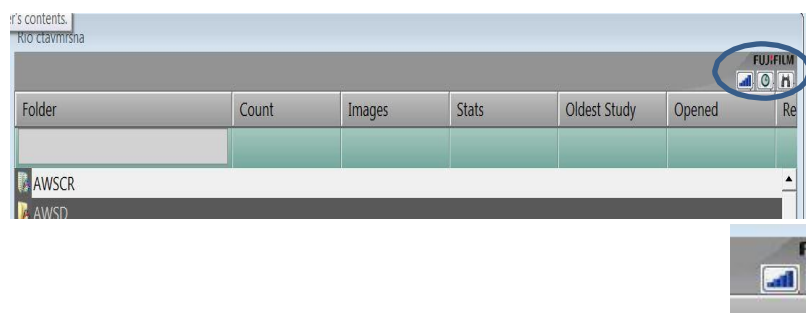
DASHBOARD

The Dashboard allows quick access to folders. The Dashboard can be launched from two locations – the Synapse Icon on the desktop or from any folder list.

1. Right click on Synapse Icon and left click on the Dashboard.



2. Folder list view



Left click on Dashboard Icon

Left click folder to view content and view images.

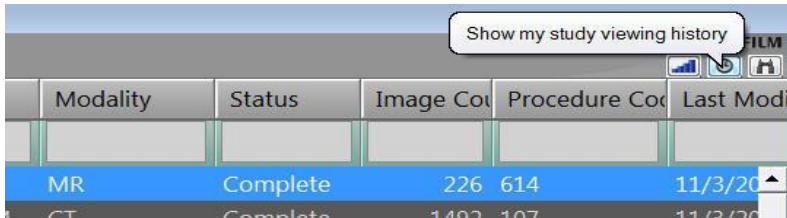
The Dashboard is configurable to the user. Content and color is set in the Synapse Properties.



MY HISTORY

My History allows access to the users most recently viewed items.

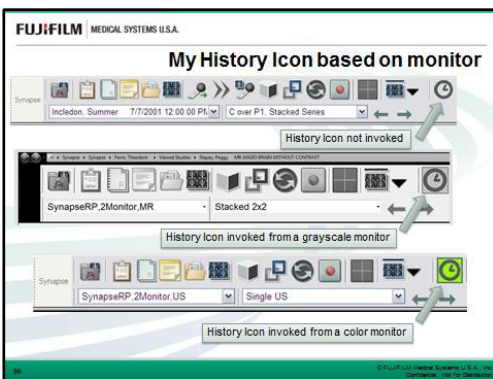
To activate, left click my history icon from List View



My History Folder List View

Priority	# of View	Deleted	List Viewed Time	Patient Name	Accession No	Patient ID	Proc. Description	Study Date Time	Modality	Status
1	No		1/31/2012 3:04:41 PM	Franklin, John	3352	2000012	CHEST GENERAL	3/10/1999 9:30:00 AM	CL	Complete
2	No		1/31/2012 3:07:58 PM	Indira, Tilsa P	4678340	467833003	LOW EXM. TB+FB AP	6/16/2003 4:16:38 PM	CL	Complete
3	No		1/31/2012 12:31:43 PM	Denver, William, P	3001	2000026	HEAD/NECK/CHEST/AL...	8/5/2005 12:21:47 AM	CT	Complete
7	No		1/31/2012 12:53:29 PM	Ramsey, Gordon	2465	1000163	WHOLE BODY	10/4/2006 12:31:56 PM	CT	Complete
1	No		1/31/2012 9:55:04 AM	Lima, Stefania	3115	2000043	BRAIN WITH CONTRAST	7/11/2001 12:00:00 PM	MR	Complete
1	No		1/30/2012 11:19:15 AM	Franklin, John	3352	2000012	CHEST CT/ABDOM	11/18/1999 9:45:00 AM	CT	Complete

My History Activate from Image View



Items may be viewed in My History as in any other folder.

Columns contain status and when item was last viewed.

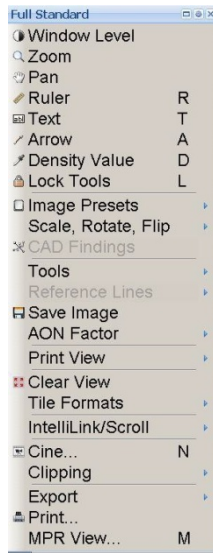
Dictation is possible from My History, but **F8 auto dictate** cannot be used.

Close My History by choosing Close All or X.

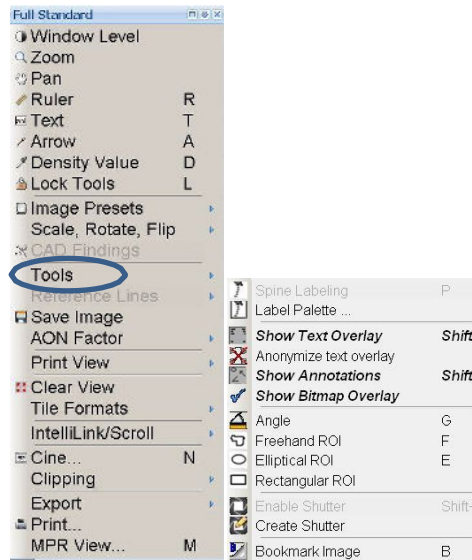


CONTEXT MENU TOOLS

Activate by right click on Image, then left click on desired tool.



Place cursor on tools for additional set.

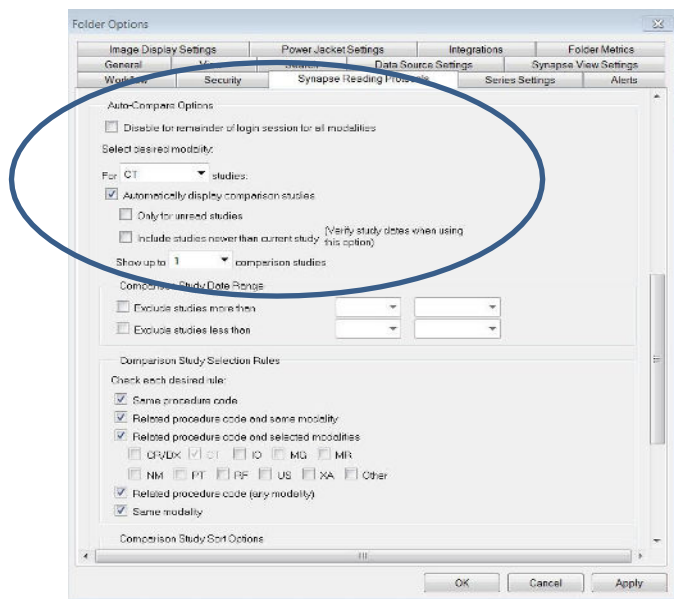


Additional tools

Shortcut to **Window/Level – Zoom – Pan**

- Left click image and hold button down.
- Right click once to toggle through tools.
- Do not release left mouse button.
- Move mouse to use selected tool.
- F5 to reset the study.

Automatic comparisons options are available in the Synapse Properties Reading Protocols tab. Please refer to the Synapse Help file for more detailed information on auto compare options.

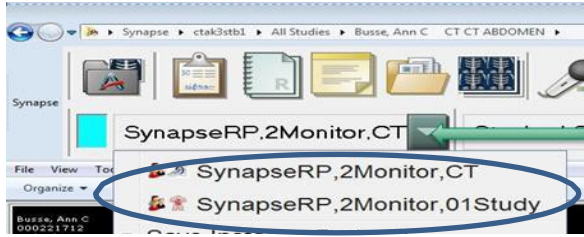


Alt + C	To Auto Compare the first/next available historical study and go through the list of comparison studies.
Alt + Shift + C	To Auto Compare the current study with the previous set of comparison studies.
Alt + X	Closes all opened Comparison studies.
Alt + S	Show Previous Reading Protocol Step
Alt + A	

Reading Protocols displays images by monitor count. Modality type, page layout and series count and all contain a number of steps that alter the number of images and or series in the Image view.

TO CHANGE THE READING PROTOCOL WHEN VIEWING IMAGES:

1. Click the Reading Protocol selection pull down menu.



2. Select a Reading Protocol from the list. The new Reading Protocol will apply to the study(s).
3. The list includes both **Template** and **Instance** Reading Protocols.

TO CHANGE THE READING PROTOCOL STEP

1. Click the **Previous** or **Next** on Explorer Toolbar.
2. The **Previous** or **Next** step of the Reading Protocol will apply to the image.



KEYBOARD SHORTCUTS FOR READING PROTOCOL STEPS

Alt + S	Shows Next Reading protocol Step.
Alt + A	Shows Previous Reading Protocol Step.

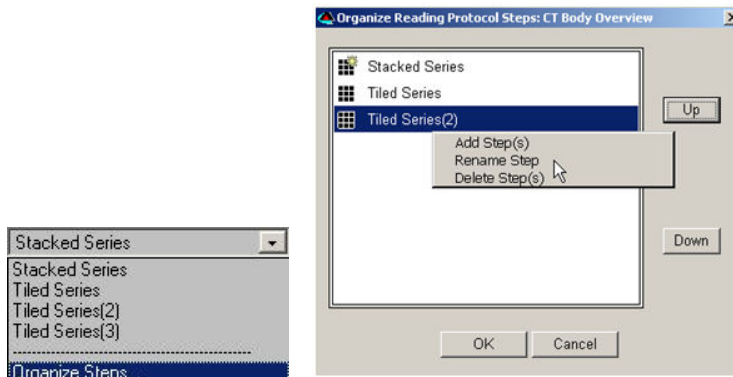
TO CHANGE THE STEP OF THE READING PROTOCOL FROM THE LIST

1. Click the Reading Protocol Step selection pull down menu.



2. Select a step from the list. The new Step of the Reading Protocol will apply to the image.

3. Click Organize Steps to bring up the Organize Reading Protocol Steps dialog window.



SERIES REORDER

The Series Order in the Power Jacket series picker thumbnails or in the Series Picker Toolbar can be changed.

Left click and drag the series to another location and drop on the highlighted area of choice between series thumbnails.



The series is now moved. The new location is visualized in the series thumbnails.



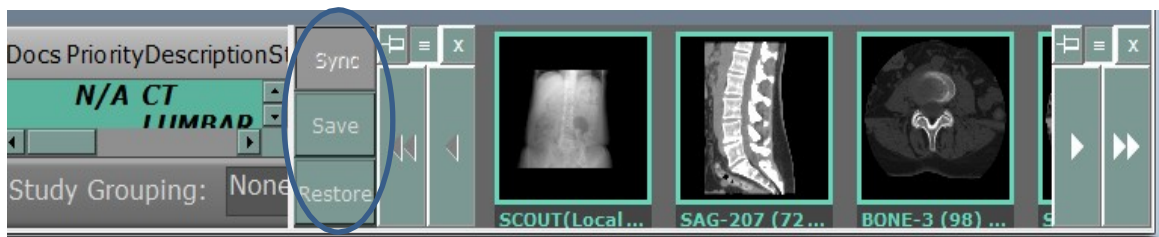
Sync: view new series order in series chooser and update image view.

Save: new order for that exam and update image view.

Restore: return to previous order of series.

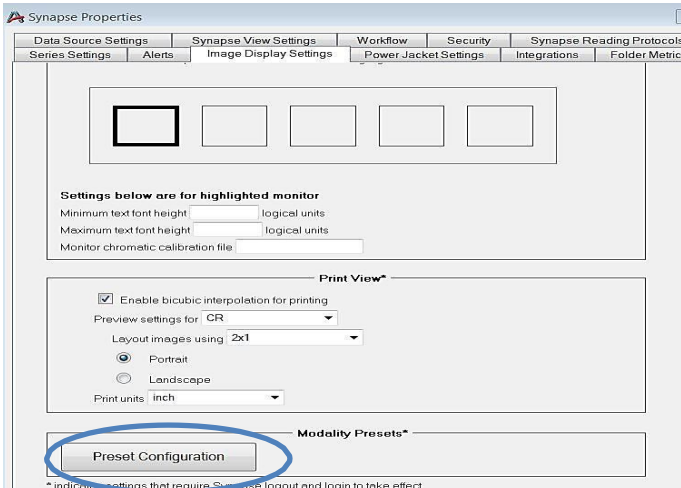


This can also be performed in the **Series Picker Toolbar** while in Image view mode.



PRESET CONFIGURATION

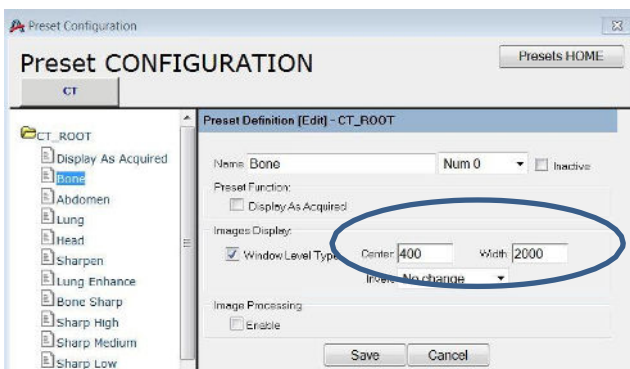
Synapse Presets may be **customized** with the Preset Configuration Tool in the Synapse Properties.



Default Presets can be **viewed** and **edited**.



Select preset then enter new values. Add or change the Number Pad shortcuts if desired, then save.



This requires logging off and logging on to Synapse to affect the change.
Please refer to the Synapse Help file for more details on Preset Configuration.

HOT KEY SHORTCUTS

HOT	TOOL
R	Activates Ruler
H	Activates Ruler for Horizontal Ratio
V	Activates Ruler for Vertical Ratio
T	Activates Text
A	Activates Arrow
D	Activates Density Value
G	Activates Angle
F	Activates Freehand ROI
E	Activates Elliptical ROI
B	Activates Bookmark
I	Activates/Deactivates IntelliLink. Double clicking the mouse wheel can also be used.
S	Activates/Deactivates IntelliScroll
K	IntelliScroll Add/Remove
=	Zoom to fit
-	Zoom to 1X
C	IntelliScroll Remove All
.	Toggles on/off CAD findings
J	Activates/deactivates IntelliScroll Auto Link
Q	Lock the reference lines as currently displayed
U	Unlock reference lines

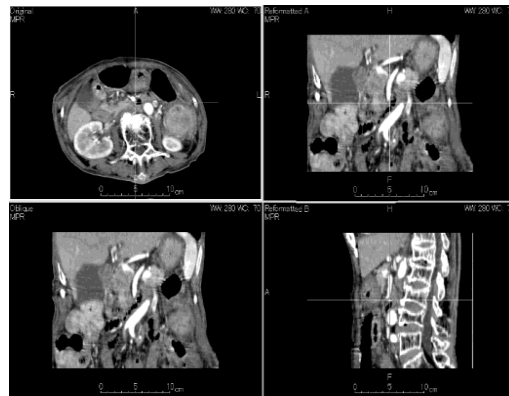
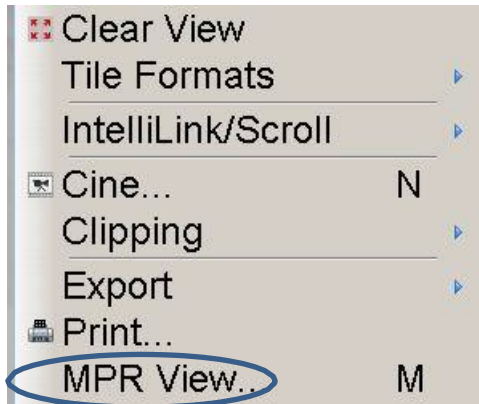
Hot key usage: press and hold letter, then left click mouse

IMAGE NAVIGATION	
N + Left Mouse on Image	Activates Cine.
Home	Returns to first image in the Series/Study.
End	Jumps to the last image in the Series/Study.
Middle Mouse button down + Mouse move	Displays scrolling images on the selected window.
Page down	Scrolls down one page.
Page up	Scrolls up one page.
Up arrow	Scrolls up one row of tiles.
Down arrow	Scrolls down one row of tiles.
Right arrow	Scrolls up one tile.
Left arrow	Scrolls down one tile.

MPR VIEW

MPR VIEW is an optional MPR (Multi-Planar Reformatting) visualization software package for use with Synapse.

MPR VIEW IS also activated from Context tools.

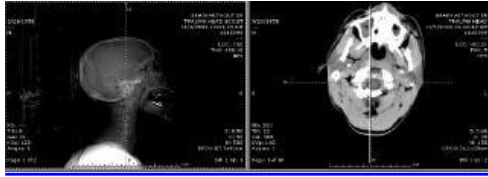


MPR VIEW DISPLAY

*MPR View Display may be dragged to Auxiliary/Color Monitor.

SERIES MANIPULATION

By using the drag and drop operation, **Series** or **Images** can be rearranged for viewing, or copies of the series can be created.



To move an entire series:

Click and hold the **left mouse button** on the series, then drag and drop into another window.

To create a copy of a series in another window:

With the cursor on the required series, press and hold **ctrl + left click** or **right click**, then drag/drop into another window.

To swap an image or series from one tile to another:

Hold the **shift key** and drag the image or series.

To clear an image or series in a tile:

Right click to display the context menu, then select **"Clear"** from the context menu.















SELECTING IMAGES

Ctrl + A	Selects all images or series for image
Ctrl + Left	Selects multiple images.
Shift + Left	Selects sequential image.
Left outside of object	De-selects all.

IMAGE MANIPULATION TOOLS

Left Mouse Button hold + Right Mouse Button Single Clicks	Activates image tool window/level, zoom and pan. Toggle right button to change the tool.
Alt + Left + Mouse move	Right and Left: Window width Forward and Back: Window level
Alt + Ctrl + Mouse move	Image zoom or interactive ROI zoom.
Alt + Shift + Mouse move	Image pan or interactive ROI size change.
O + Left Mouse on Image	Activates interactive ROI.
NumPad + 0 ~ 9	The number pad keys are linked to presets.
L + Left Mouse button	Lock Tool activate.
Esc	Dismiss Locked Image Tool.
" = " + Left Mouse button	Zoom to 1X.
" - " + Left Mouse button	Toggles zoomed image back to fit Display
Shift + T	Toggles text overlays
Shift + A	Toggles Annotations
Shift + S	Toggles DICOM shutter

SYNAPSE® TOOLBAR ICONS

-  Opens the Power Jacket
-  Show Study Information (**Alt+I**)
-  Radiology Reports Page (**Alt+R**)
-  Access Synapse Notes (**Alt+N**)
-  Show Attached or Scanned Docs (**Alt+U**)
-  Open Series Chooser (**Alt+E**)
-  Initiate Dictation/Mark Dictated (**F8**)
-  Skip Selected Exam for Dictation (**F9**)
-  Launch 3D Application (**F7**)
-  Dicom Tools Menu
-  Start Dictation for Selected Exam (**Alt+D**)
-  Page Layout
-  My History (**ALT-Y**)
-  Series Picker View/Config