Sante DICOM Viewer FREE

Quick start guide

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Contents

The user interface

The program works with DICOM series. If the user opens a single DICOM file, the program automatically creates a DICOM series with this file in the memory, and works with this single-file series. If the user opens a DICOM study the program works with all the DICOM series of this study. The loaded DICOM series are displayed in the series pane **(3)** as thumbnails.

The user interface is divided in 6 parts:
1. The menu bar
2. The toolbars
3. The series pane
4. The main window
5. The Frames/Series/MPR Mode selection tab
6. The frame selection slider

1. Menu bar
The menu bar contains all the commands of the program.

2. Toolbars
The toolbars provide shortcut buttons for the most useful commands of the program.
The program allows the user to add and remove toolbar buttons, so it fits their tastes and preferences.

3. Series Pane
This pane displays a thumbnail for every open series. Every thumbnail displays the patient name, the series description and the number of frames of the series. If the user has loaded a series in the main window, this series is displayed in blue color. Otherwise is displayed in yellow color. The active series is displayed in magenta color.
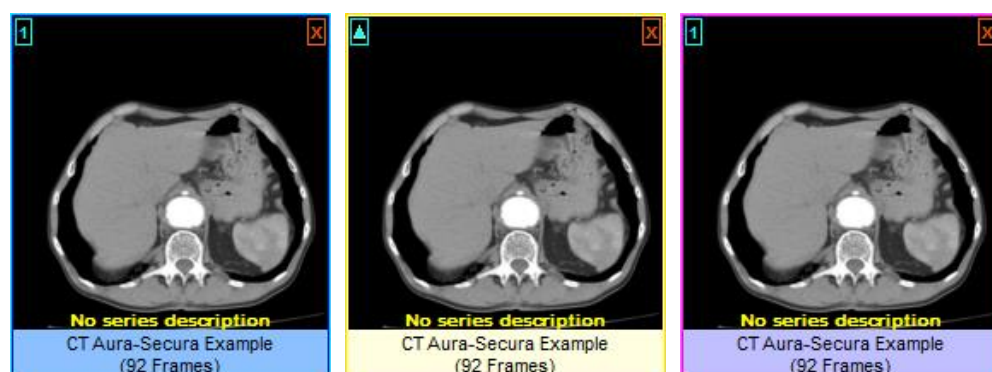
4. Main window
The main window is the working area of the user. The main window displays the frames of the active series (Frame mode), or one frame of all the loaded series (Series mode). The user can select the mode of the main window from the Frames/Series selection tab. Every mode can have different number of tiles, and the user can select the number of tiles with the **"Options ➡ Tiles Layout"** menu command.
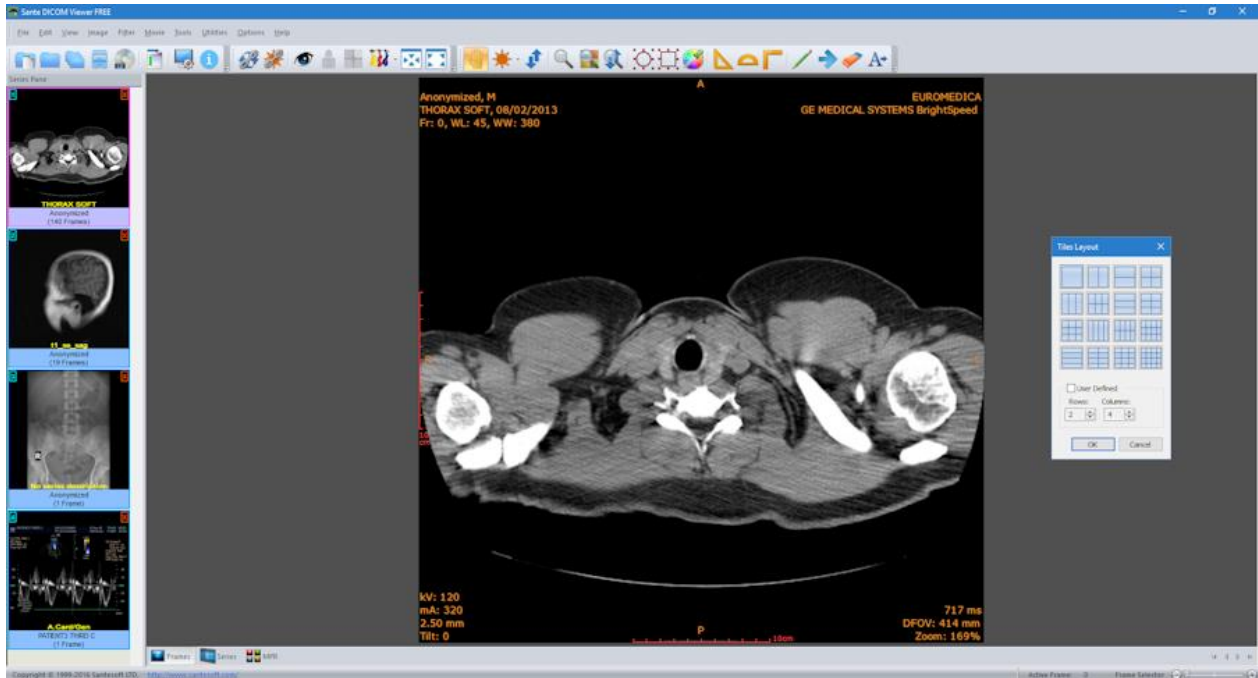

5. Frames/Series/MPR selection tab
If the tab "Frames" is selected the main window displays the frames of the active series (Frame Mode). If the tab "Series" is selected the main window displays all the loaded series (Series Mode). If the tab "MPR" is selected the main window displays the scout image/localizer and the axial/coronal/sagittal volumes of the series (MPR Mode).

6. Frame selection slider
If the active series has many frames, this slider lets the user to select the active frame. Otherwise is disabled.
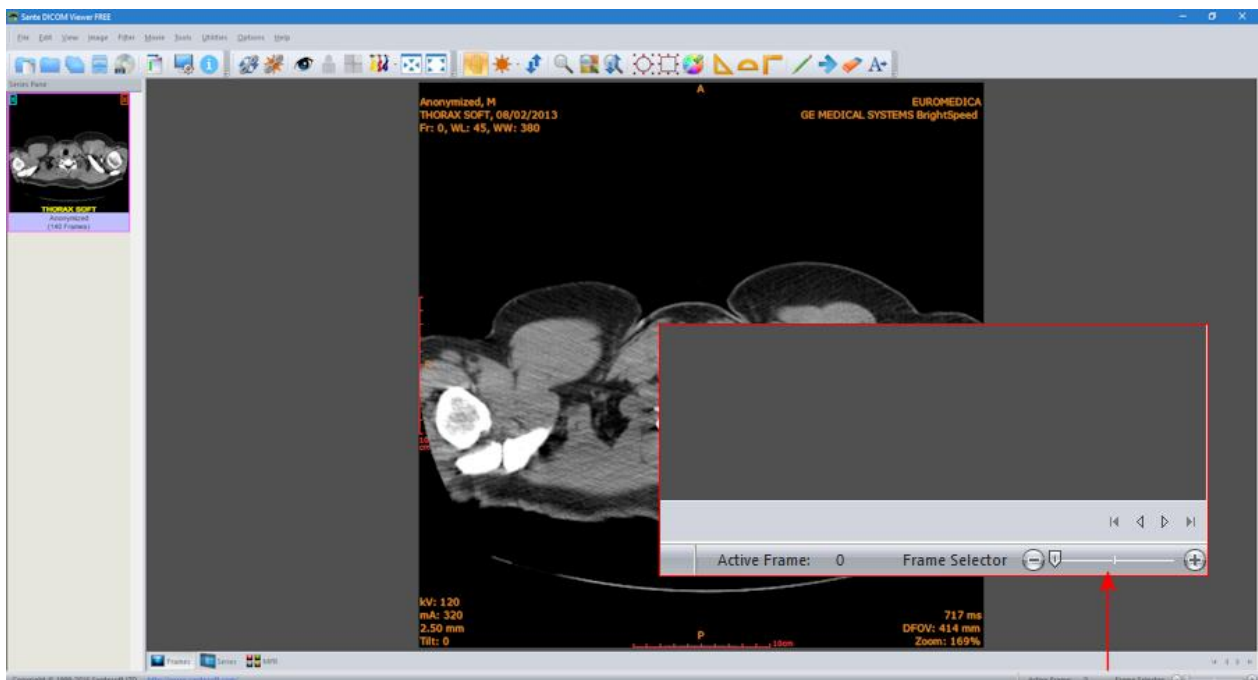
The modes of the Main Window (4)

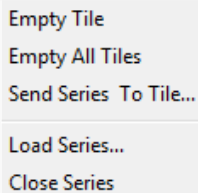The Main Window **(4)** is divided in tiles and it has three modes:

1. The **"Frames Mode"** that displays in its tiles the frames of the same series (the active series).
The user can select the number of the tiles with the **"Options ➡ Tiles Layout"** menu command.

2. The **"Series Mode"** that displays in its tiles all the loaded in the main window series.
The user can select the number of the tiles with the **"Options ➡ Tiles Layout"** menu command.
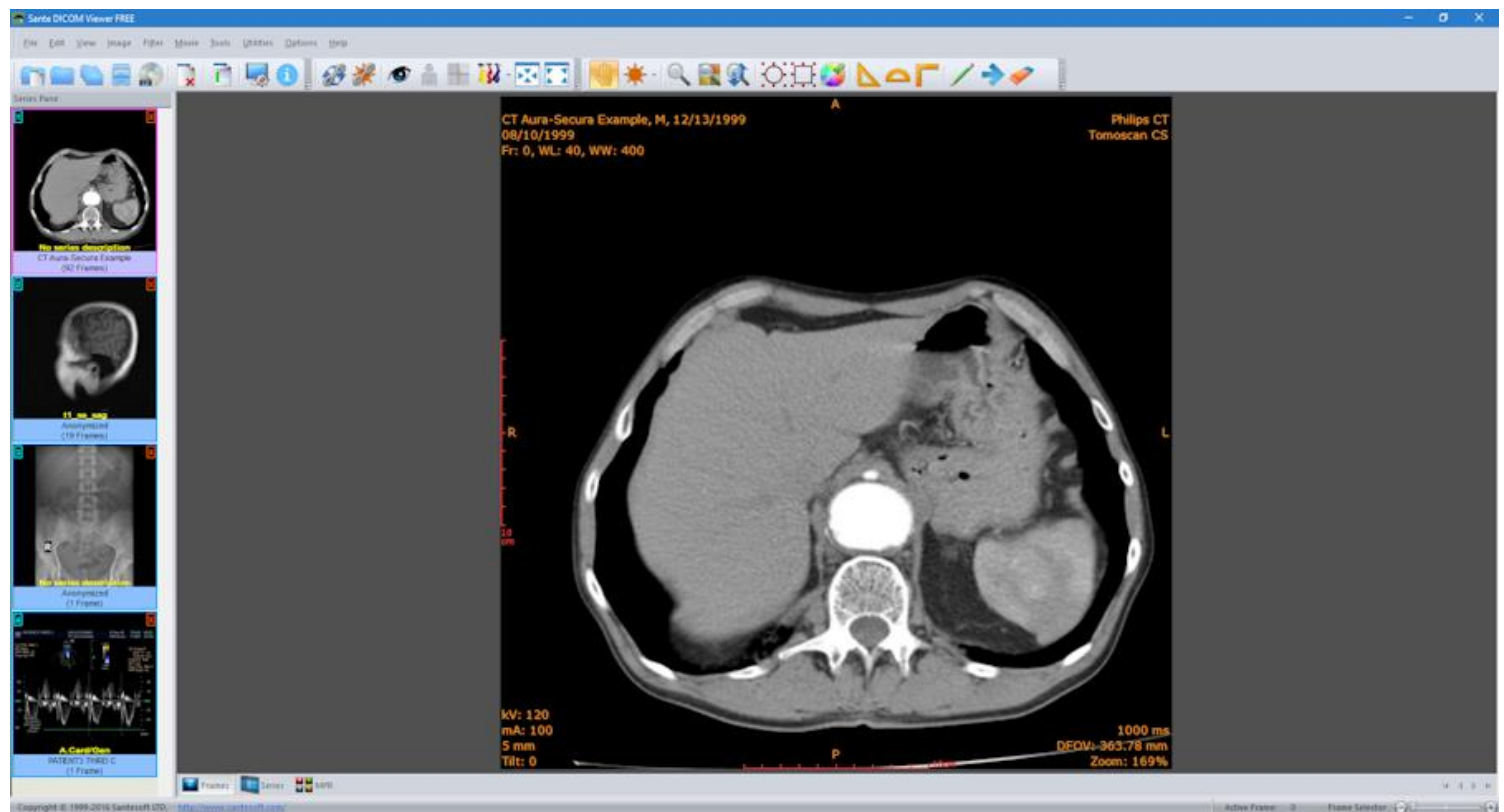The active series is displayed in the "Series Mode" with a red rectangle around its tile (4). The user can select the active series by clicking its tile in the "Series Mode", or by single-clicking its thumbnail in the series pane. If a series is loaded in the main window, in the upper-left corner of its thumbnail is displayed the number of its "Series Mode" tile. If the user press the right mouse button in a "Series Mode" tile, a pop-up menu appears and lets the user to empty the tile, empty all tiles, change the series tile, load an other series to this tile and close the series that is loaded in this tile. This menu is not available in the "Frames Mode".

Empty Tile
Empty All Tiles
Send Series To Tile...
Load Series...
Close Series

3. The **"MPR Mode"** that displays the scout image/localizer, the axial volume of the series and the volumes of the coronal and sagittal reconstructions of the series.

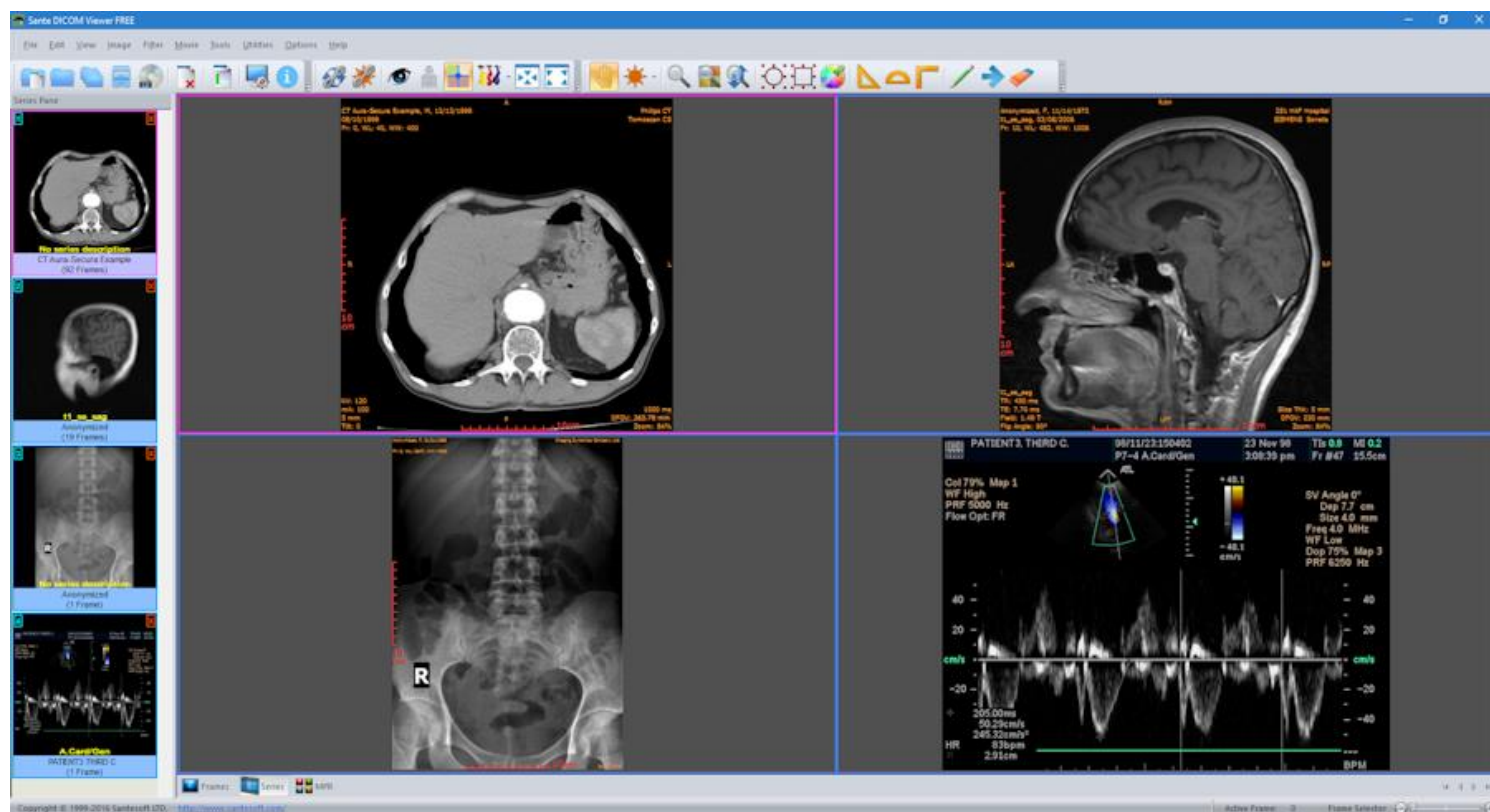**The main window in the frame mode (one tile)**

The main window in the frame mode (six tiles): Displays six frames of the active series. The number of the tiles is selectable by the user.
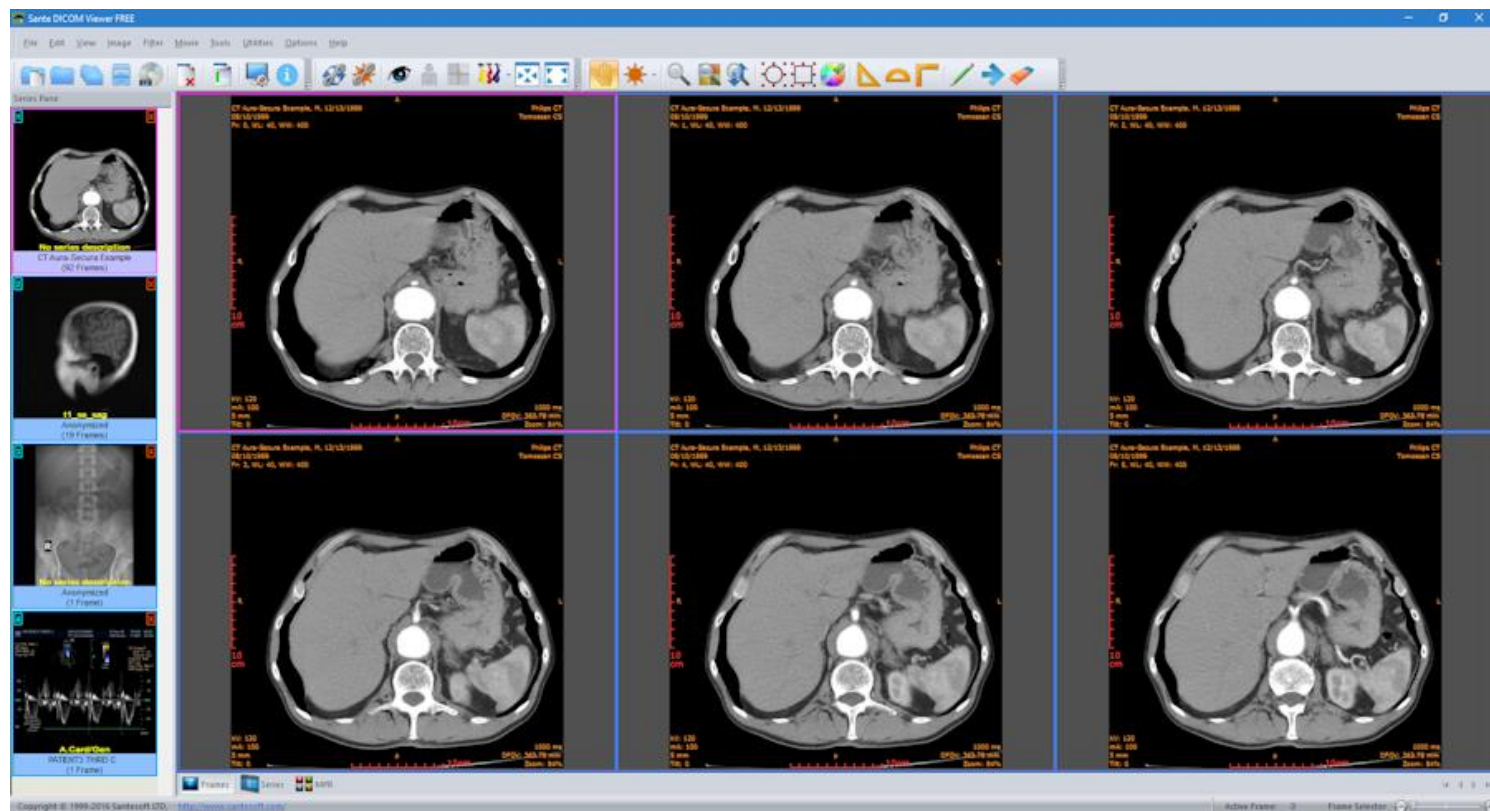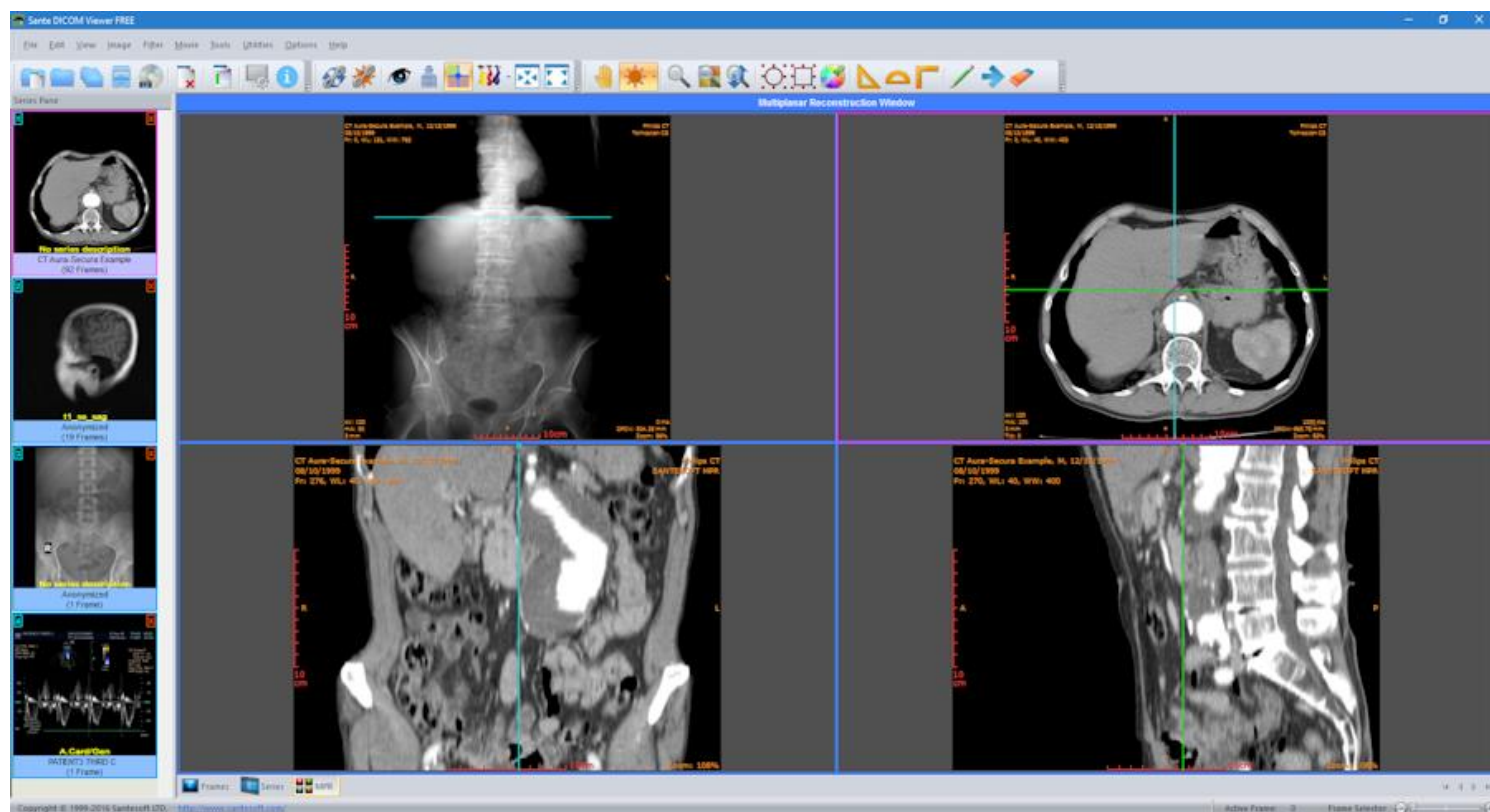
The main window in the series mode (four tiles): Displays four different series. The number of the tiles is selectable by the user.

The active series has a **red rectangle** around its **tile**.

**The main window in the MPR mode**

Customize the toolbars

The program allows the users to add and remove toolbar buttons, so it fits their tastes and preferences.
Any toolbar can be quickly customized with the "Add or Remove Buttons" submenu available from the chevron button when it is docked or with a special button in the toolbar caption when it is in the floating state.
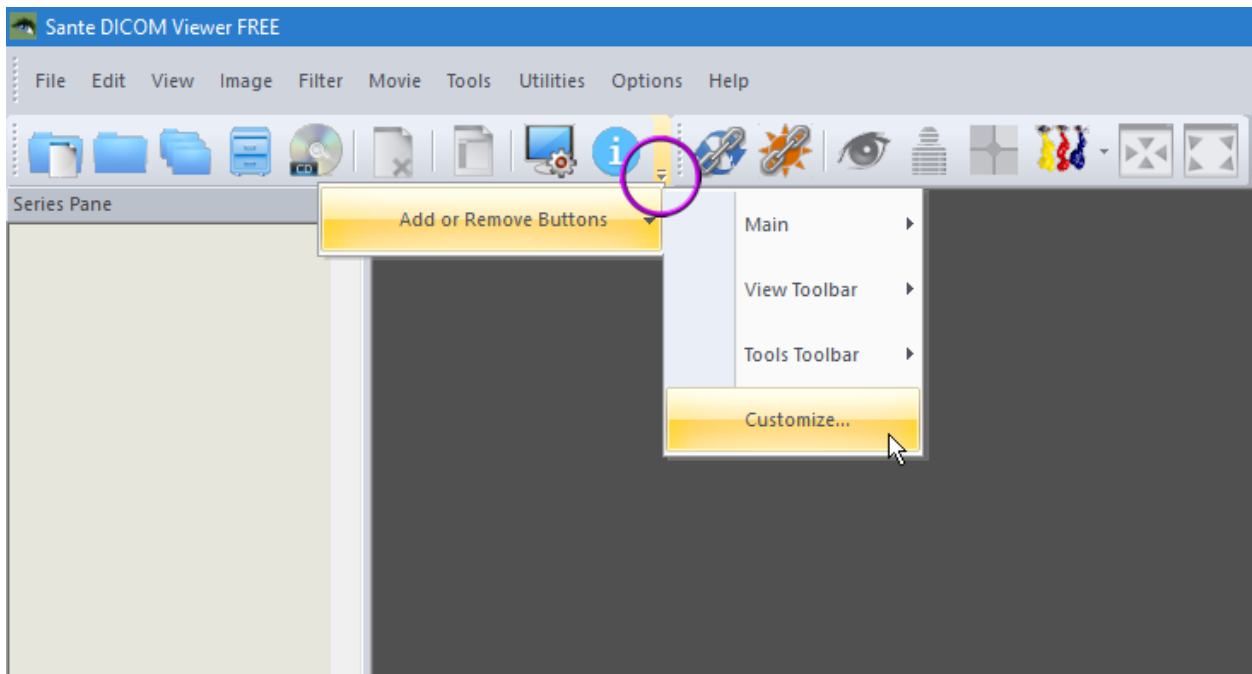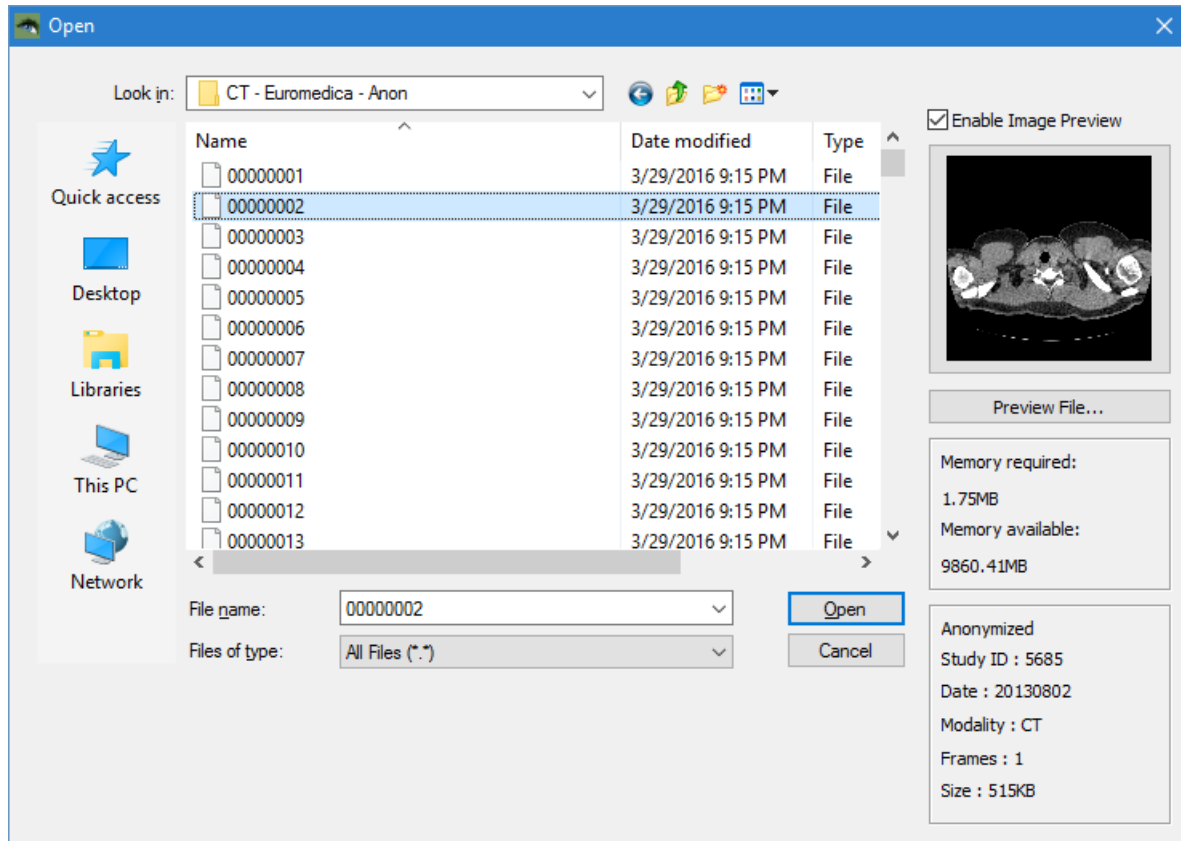

By selecting the menu item **"Customize"** a dialog box appears and allows the user to drag-and-drop buttons from the dialog box to any toolbar. It allows also the user to drag buttons out of a toolbar, in order to remove them.
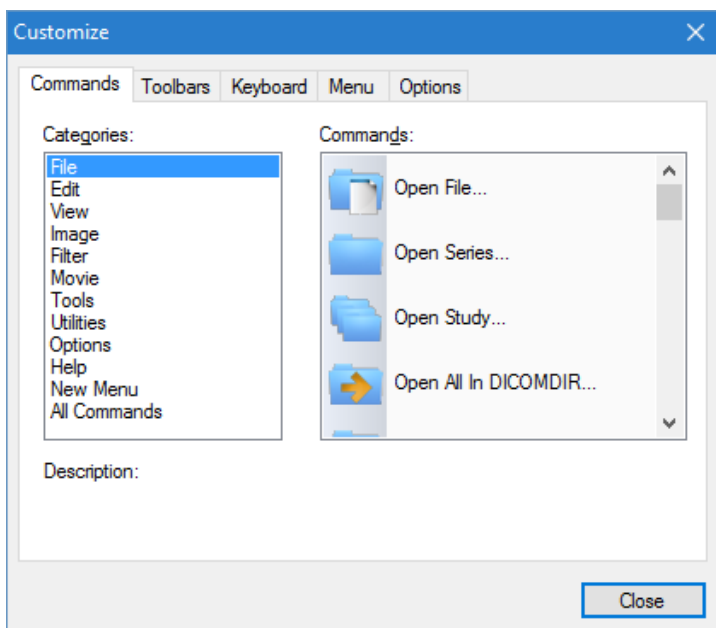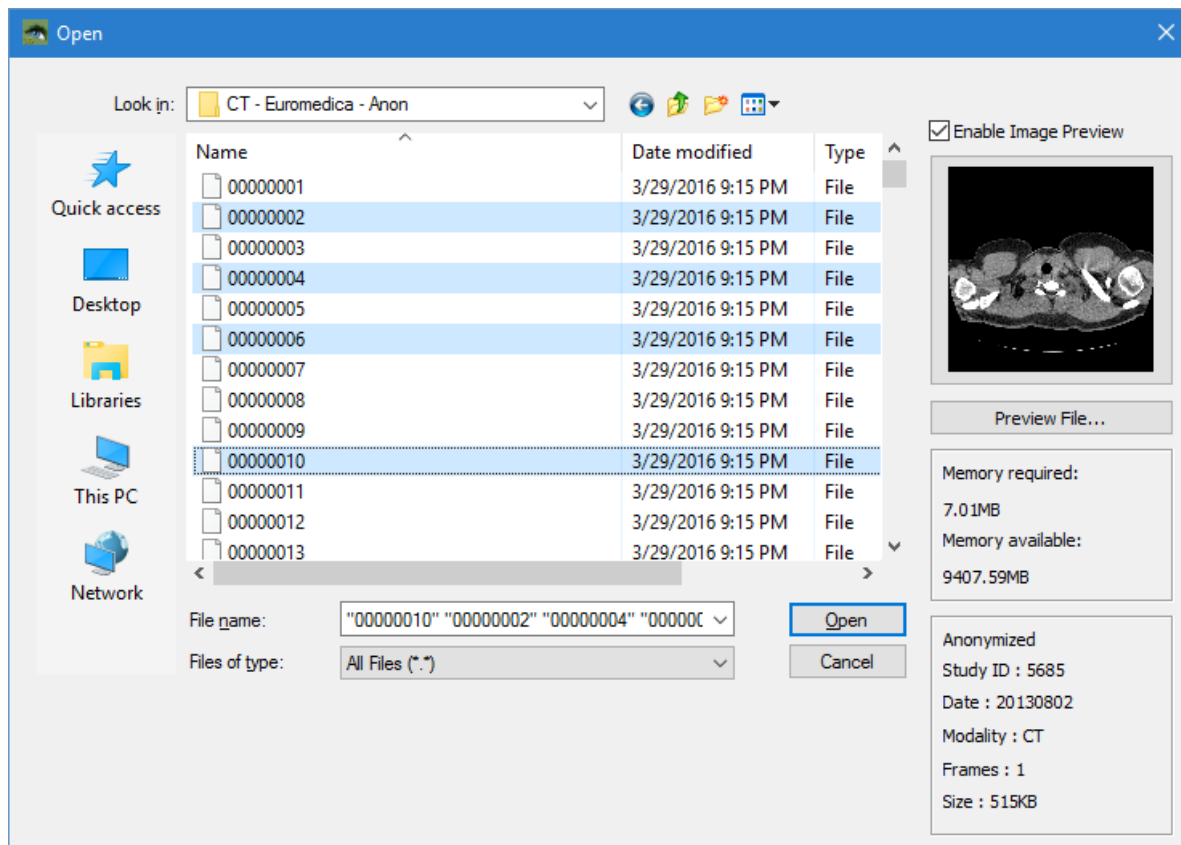
Open a file

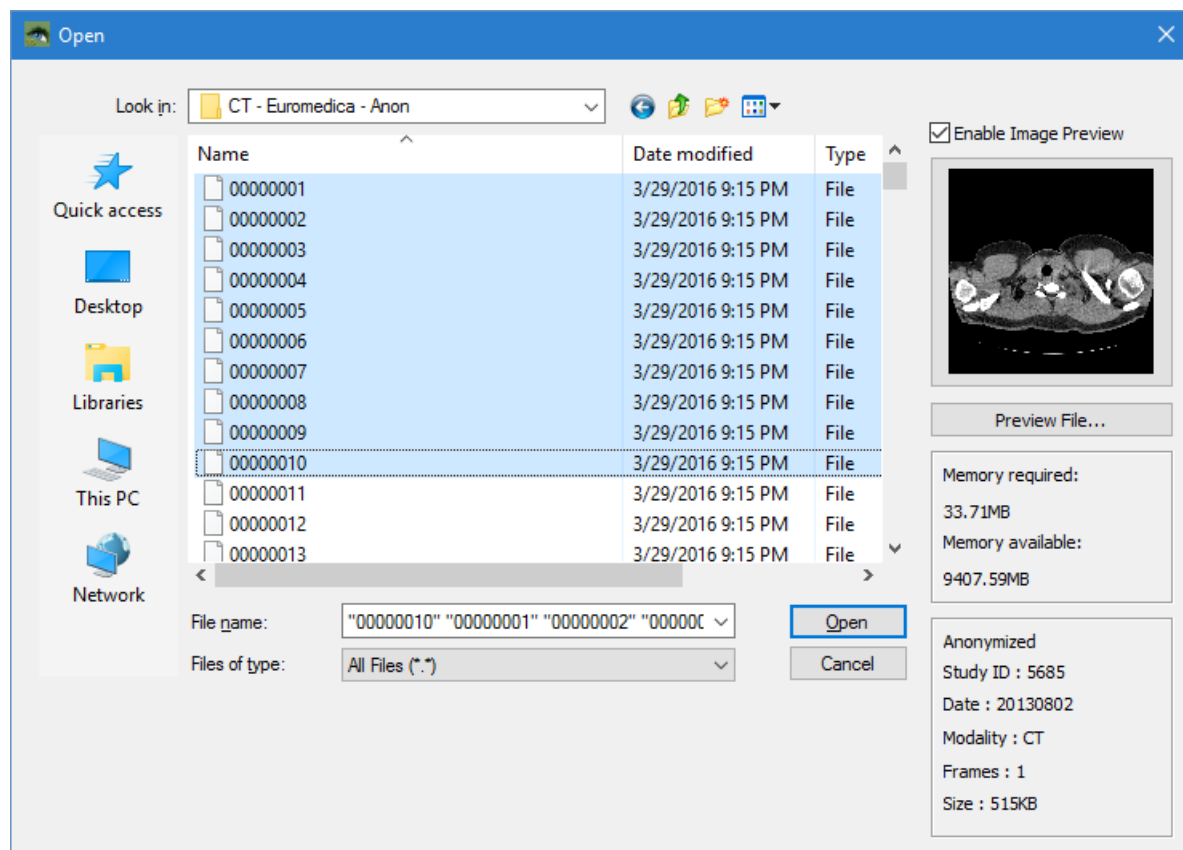To open a file, use the menu command **"File➡Open➡Open File"**.
A dialog box appears and allows you to select the desired file:

To select many files, press and hold down the **<Ctrl>** key of the keyboard and select the files.

To select many sequential files, press and hold down the **<Shift>** key of the keyboard and select the first and the last file of the sequence.
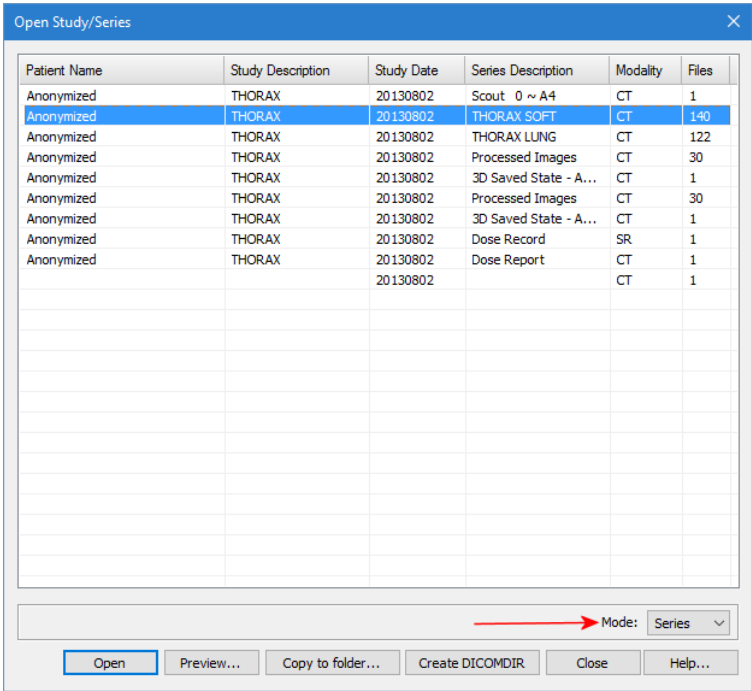
Open a series

To open a series, you need a DICOMDIR file.
If you don't have a DICOMDIR file, you can use the menu command **"File➡New DICOMDIR"** to create one.

Use the menu command **"File➡Open➡Open Series"** and select the DICOMDIR file. A dialog box appears and allows you to select the desired series. To select many series, press and hold down the **<Ctrl>** key of the keyboard and select the series.
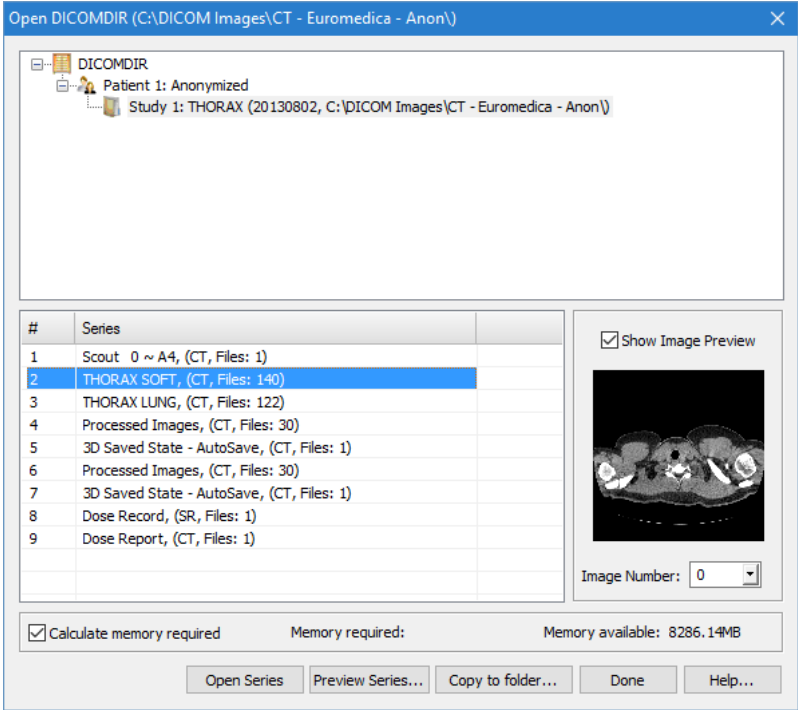
If you don't have a DICOMDIR file, you can use the menu command **"File➡Open➡Open Folder"**.
The program scans the selected folder, finds the DICOM files and organizes them to studies and series, and allows you to select a series to open.
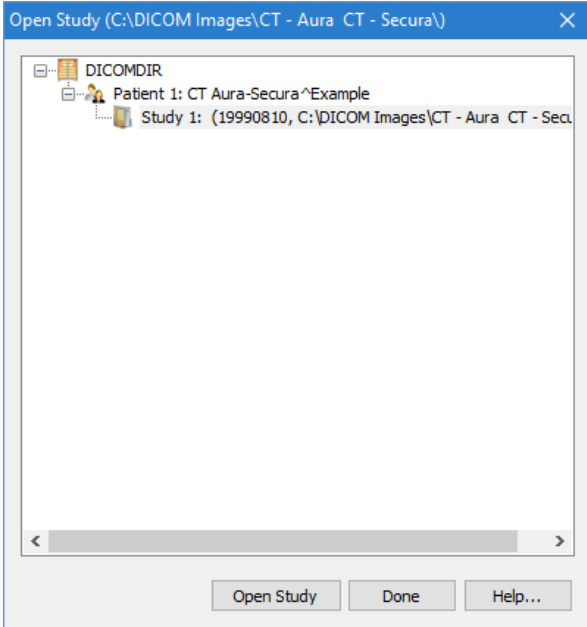

Please note that the mode in this dialog box must be set to "Series".

Open a study

To open a study, you need a DICOMDIR file.
If you don't have a DICOMDIR file, you can use the menu command **"File ➡ New DICOMDIR"** to create one.

Use the menu command **"File ➡ Open ➡ Open Study"** and select the DICOMDIR file. A dialog box appears and allows you to select the desired study. The program opens all the series of this study.


If you don't have a DICOMDIR file, you can use the menu command **"File ➡ Open ➡ Open Folder"**. The program scans the selected folder, finds the DICOM files and organizes them to studies and series, and allows you to select a study to open.
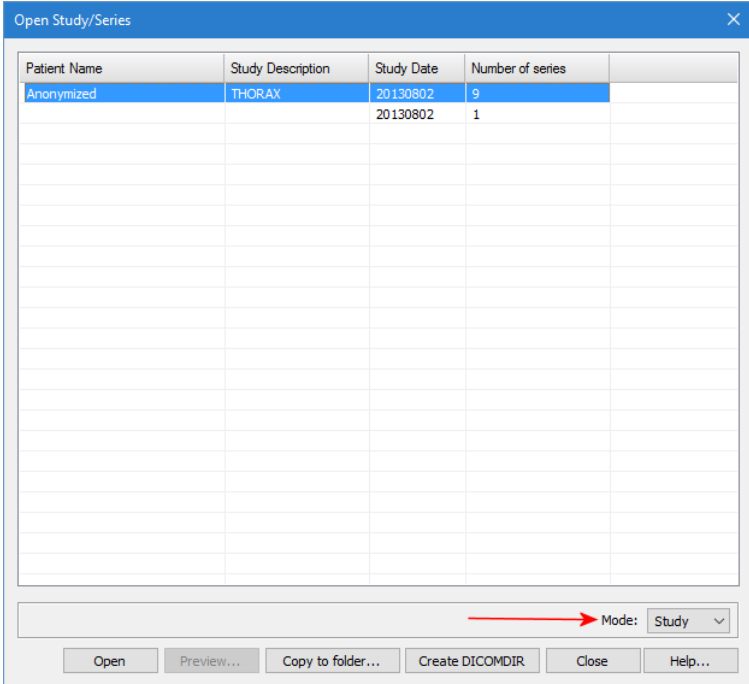
Please note that the mode in this dialog box must be set to "Study".

Load a series to the main window

The program automatically loads all the opened series to main window. If you wish to change this behavior, select the menu command **"Options➡Other Options"** and uncheck the checkbox **"Load the file/series automatically to Main Window"**
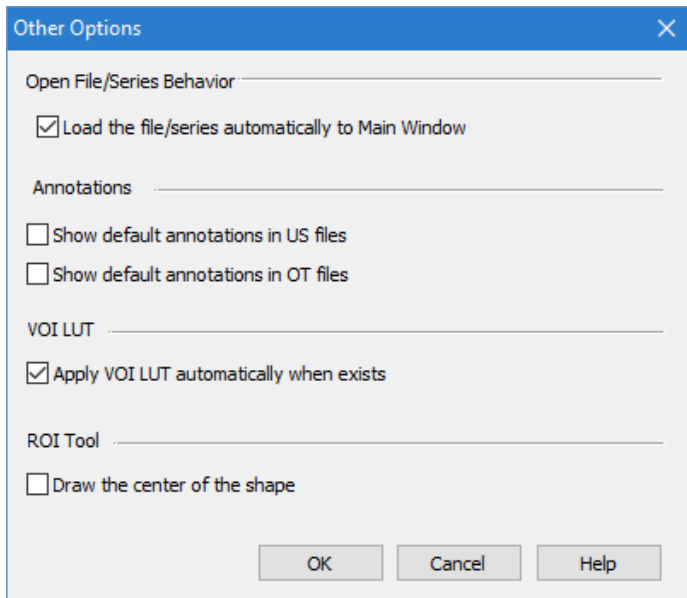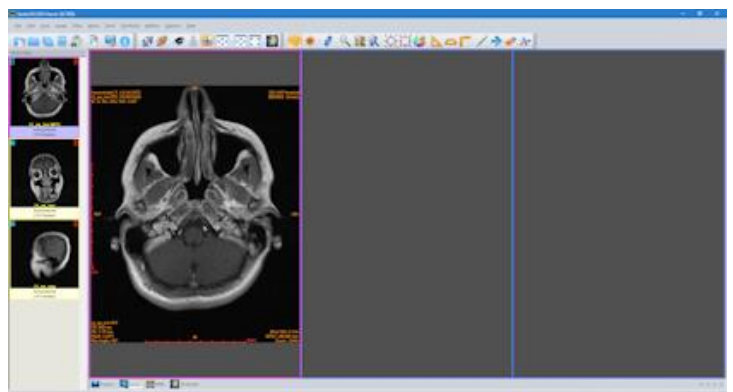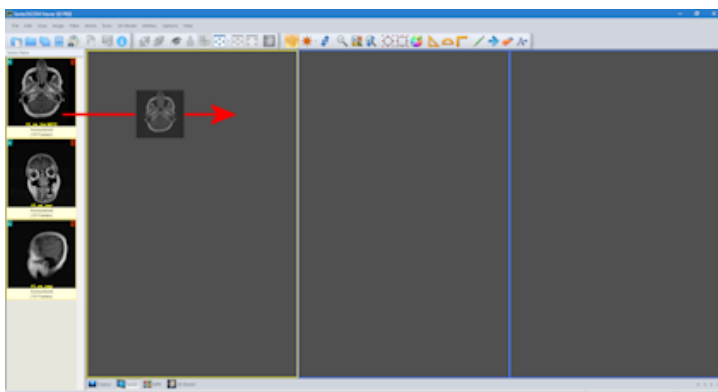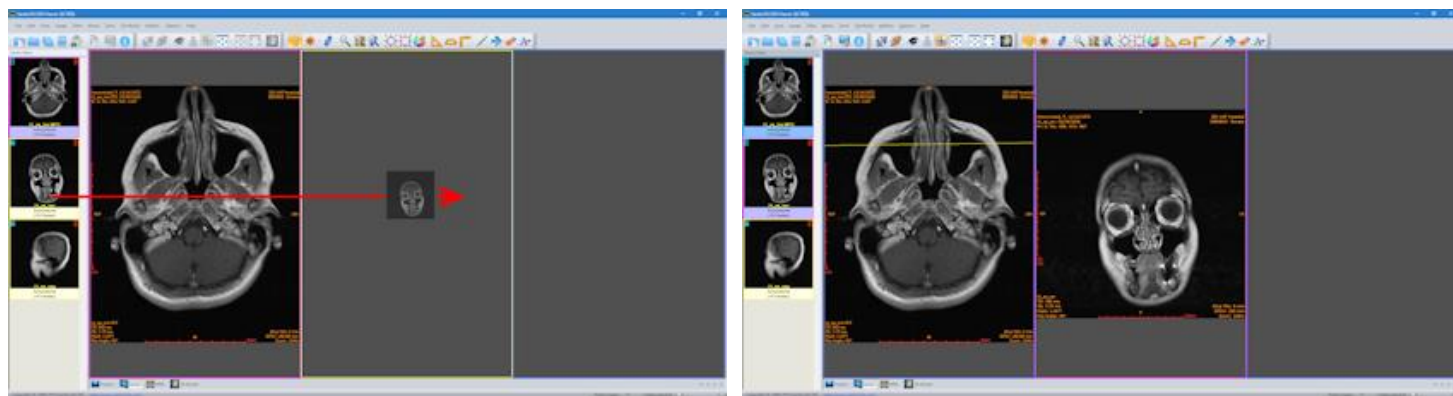

To load a series to the main window use one of the following methods:
1. Double-click the series thumbnail in the Series Pane **(3)**.
2. Click the green rectangle in the upper left corner of the series thumbnail in the Series Pane **(3)**.
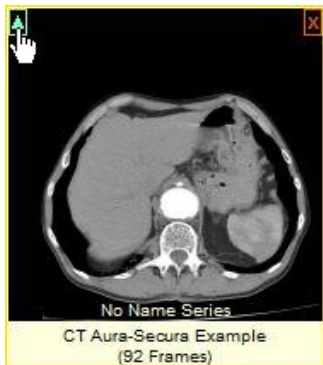
3. Use the **"drag-and-drop"** operation in the Frame Mode, Series Mode or MPR Mode.

With the "drag-and-drop" in the Series Mode, you can select the tile for every series, thus you can have your series in the desired order.

If the destination tile contains already a series, the program replaces the old series with the new one.

4. In the Series Mode, press the **right** mouse button over the desired tile.

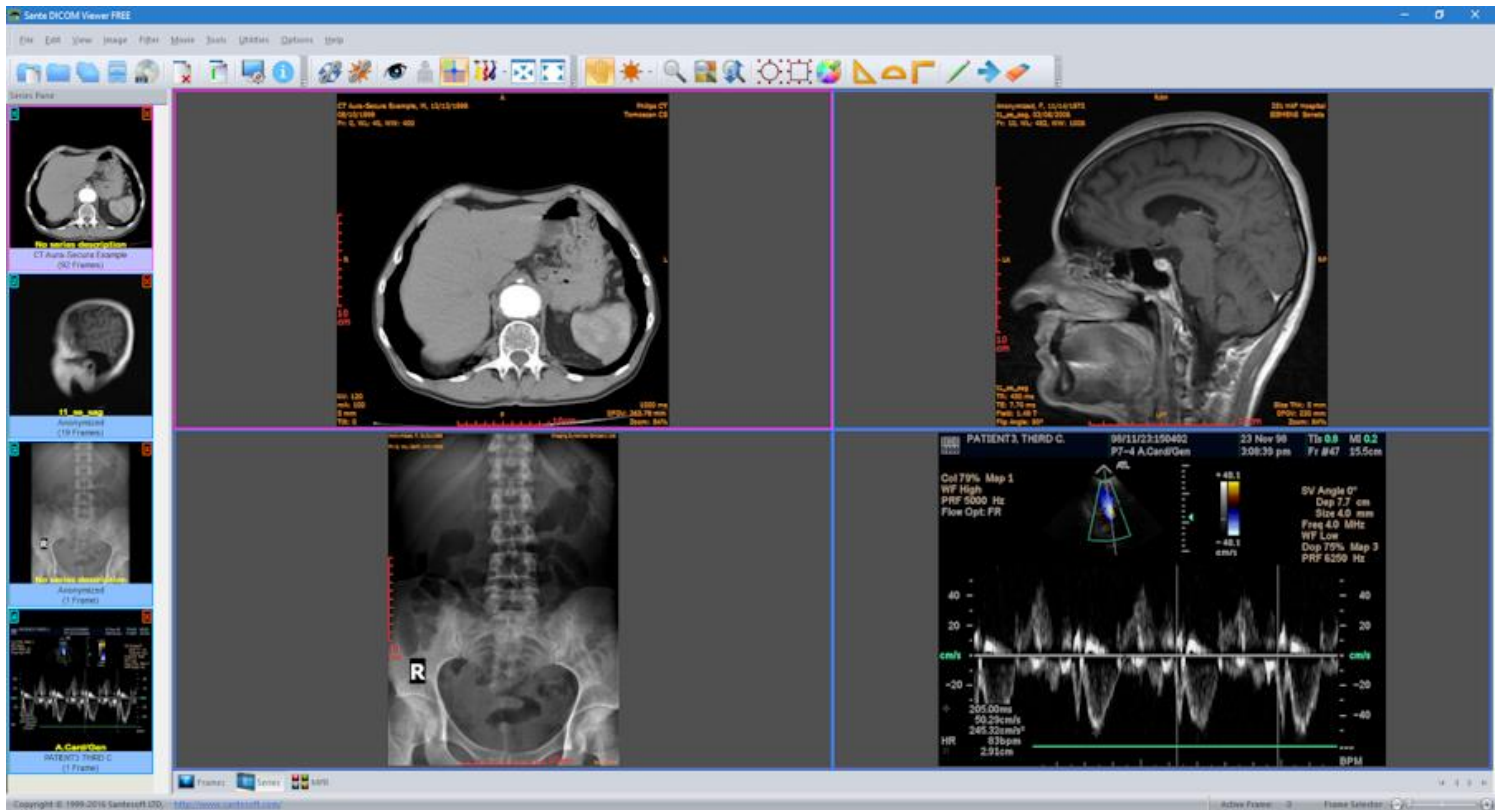A pop-up menu appears and allows the user to load a series in the tile.
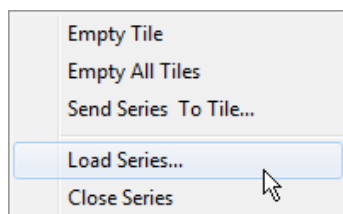
This menu is not available in the other modes.

Set the active series

**1.** Click the series thumbnail of a loaded series in the Series Pane **(3)**.

2. In the Series Mode, press the **left** mouse button over the desired series.
The series becomes active and it has a **red rectangle** around its **tile**.

Unload a series from the main window

1. In the upper left corner of the loaded series thumbnail in the Series Pane **(3)** is displayed a number. This number indicates the tile of the Main Window in the **Series Mode** in which this series is loaded. Click this number to unload the series from the Main Window. The series remains in the memory and its thumbnail becomes yellow.
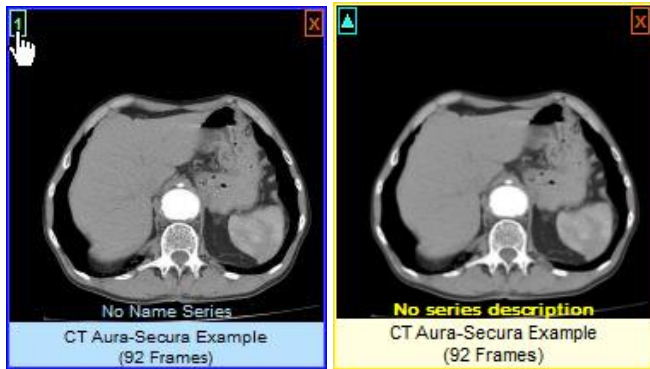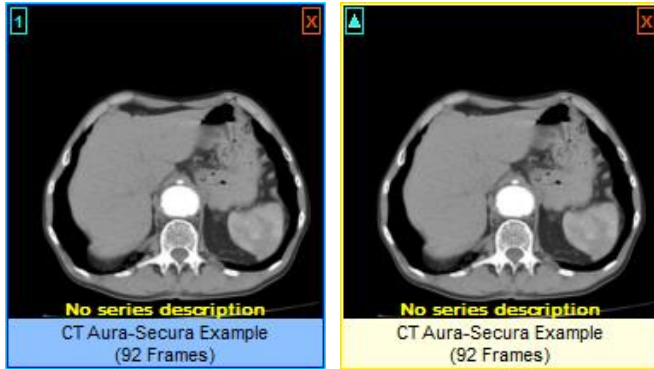

2. In the Series Mode, press the **right** mouse button over the tile of the desired series.
A pop-up menu appears and allows the user to unload the series and empty the tile.
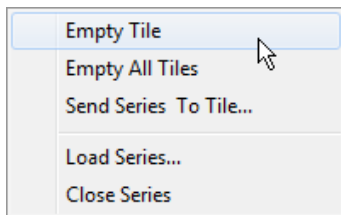
This menu is not available in the other modes.

Close a series

1. To close the active series select the menu command **"File➡Close"**

2. To close all the series, select the menu command **"File➡Close All"**

3. To close a specific series, press the red **x** button in the upper right corner of its thumbnail in the series pane **(3)**.

4. In the Series Mode, press the **right** mouse button over the tile of the desired series.

A pop-up menu appears and allows the user to close the series, free the memory and empty the tile.
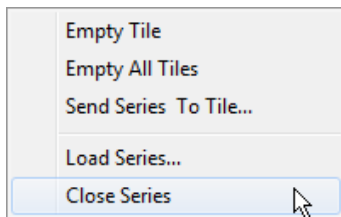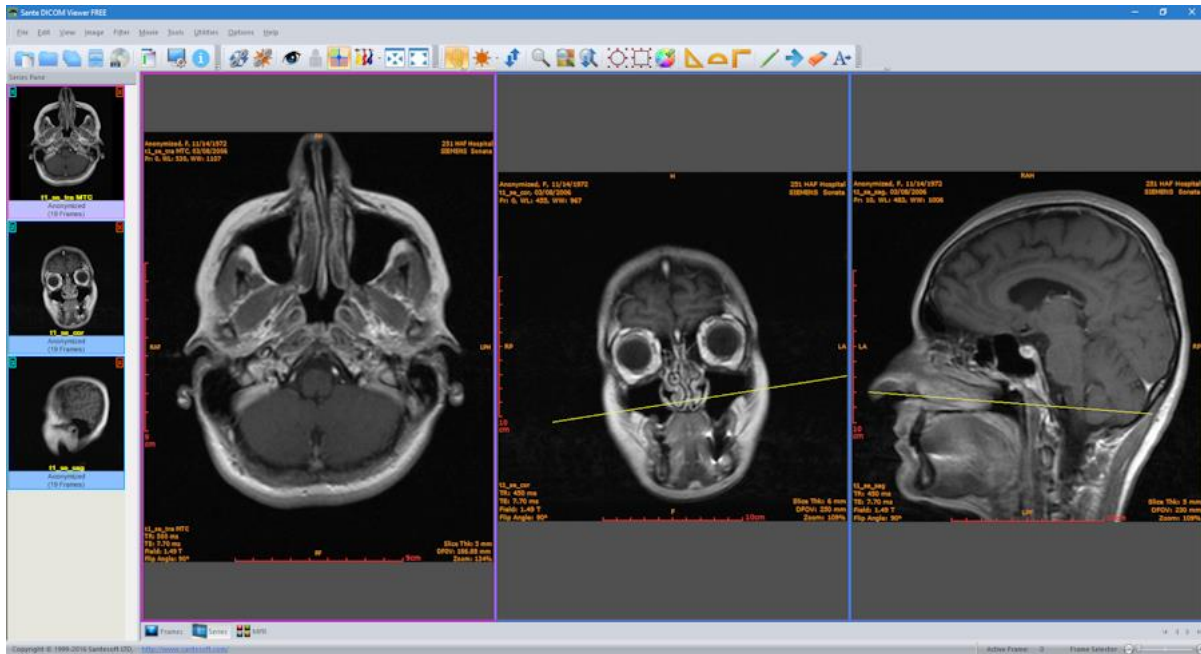

This menu is not available in the other modes.

The Series Mode

The **"Series Mode"** can display one or more series.
It displays the cross reference lines between the series, if the series belong to the same study and the same patient.


The user can use this mode to compare series, the program provides all the necessary tools for this purpose:

1. Use the menu command **"View ⇒ Synchronized Series Frames"** ( ) to force the program to display the same frame of all the series (the series must have the same orientation).

2. Use the menu command **"View ⇒ Synchronized Series Level-Window"** ( ) to force the program to display the images of all the series with the same level-window values.

3. Use the menu command **"View ⇒ Synchronized Field of View"** ( ) to force the program to display the images with the same field of view.
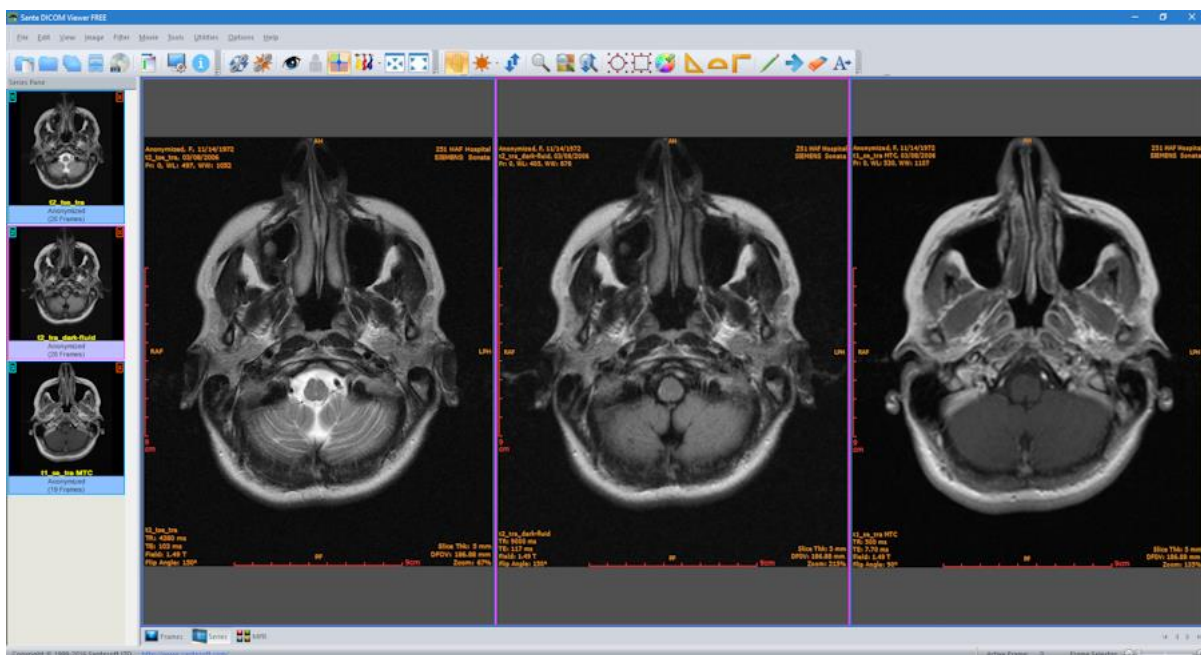
The MPR Mode

The **"MPR Mode"** displays the scout image/localizer, the axial series and the coronal and sagittal reconstructions of the series. The user can move the cross reference lines in the axial, coronal and sagittal frames from the points that are indicated in the image below:
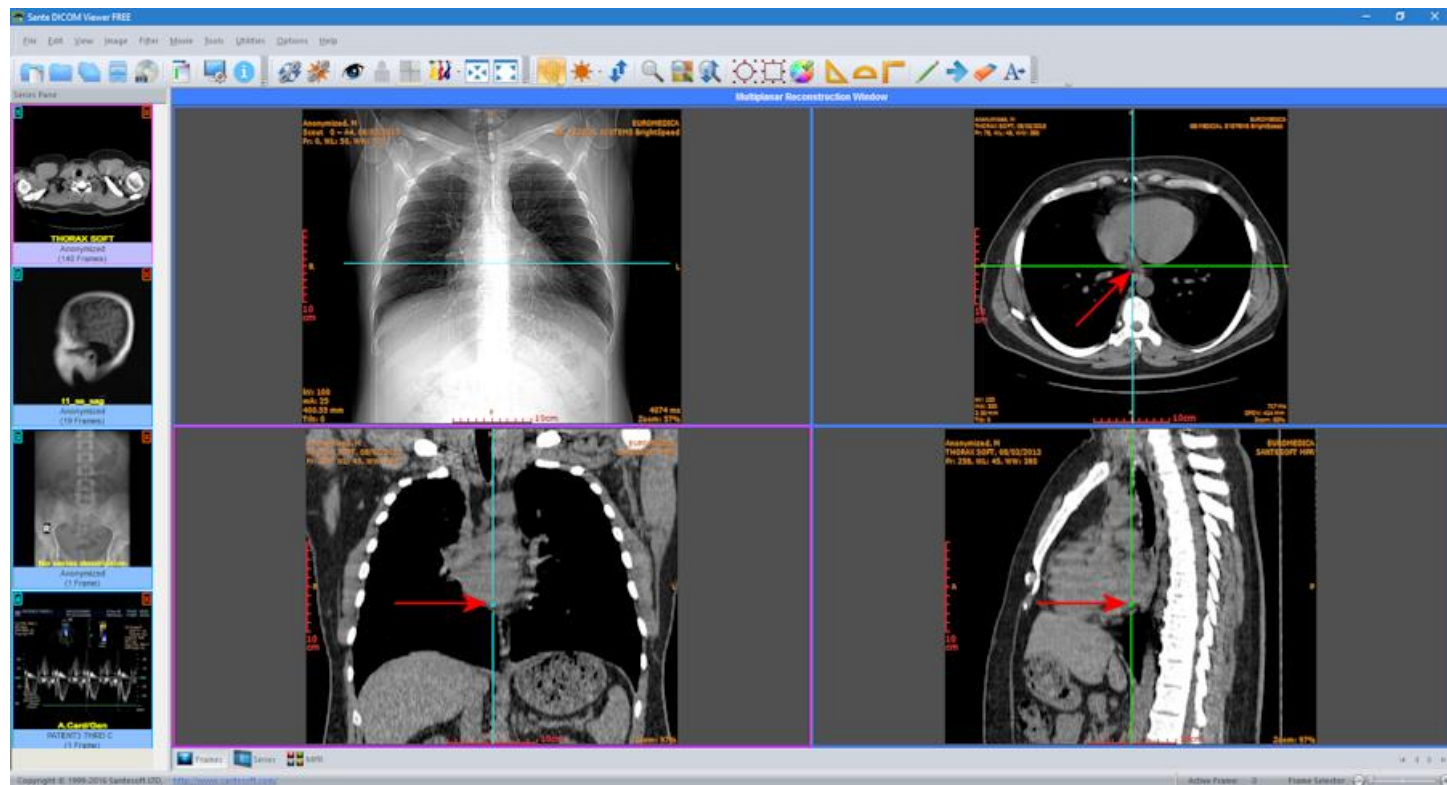
The program displays in the scout image/localizer the cross reference lines of all the axial frames, if the menu command **"View ➡ All Localizer Lines"** is selected.