

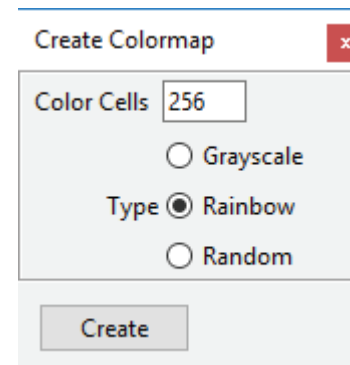
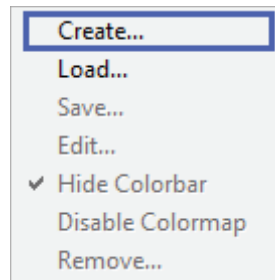
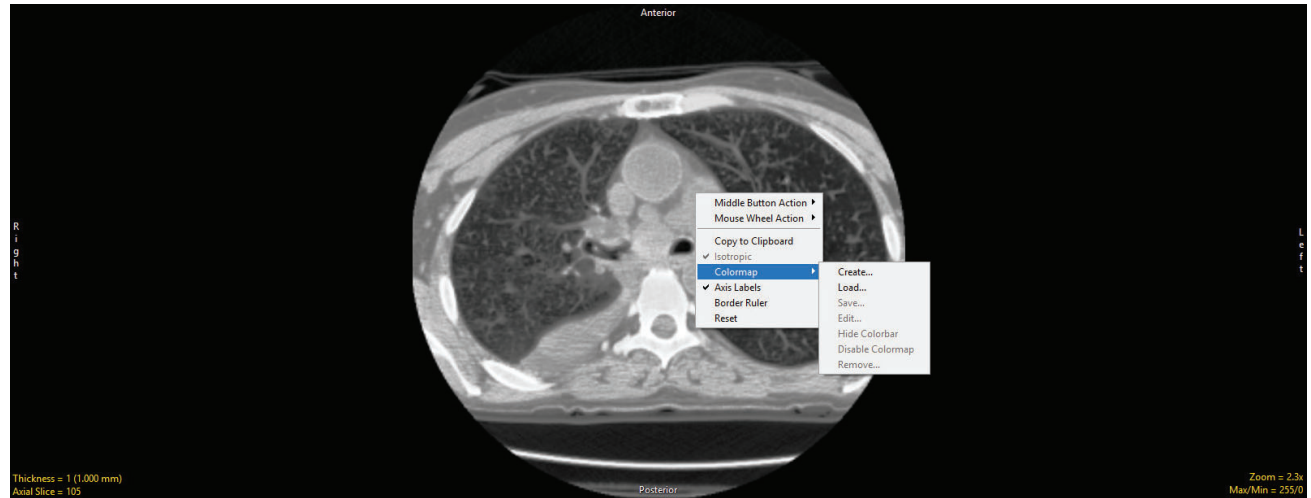
## Colormaps

The Display module provides users with the ability to create or load a colormap over the grayscale image data. Options for creating, loading, saving, editing, hiding, disabling, and removing colormaps are available from the right mouse menu for any of the 2D image displays.

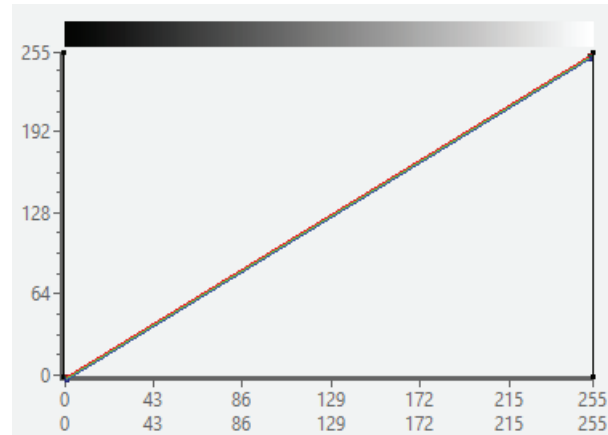
Right-click on 2D slice display and choose Colormap, a submenu for Colormaps will be displayed.

**Create:** When selected opens the Create Colormap window.

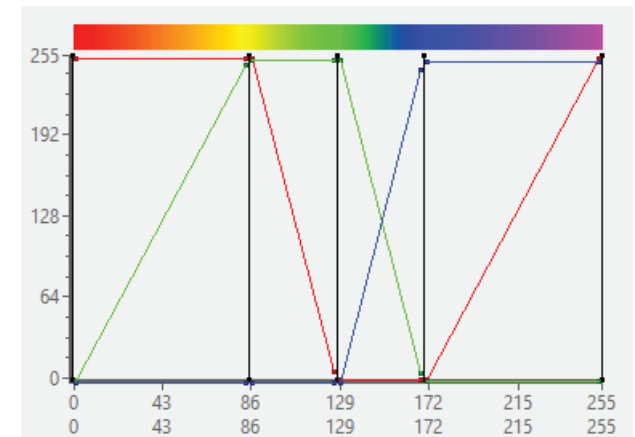
- Color Cells: allows you to specify the number of color cells to be used in the creation of the color map.
- Type: Allows you to specify the type of color map to be created, choosing from the following:



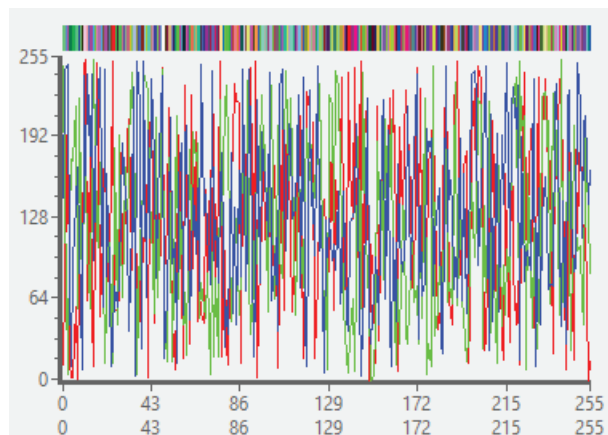
- Grayscale: Creates a Grayscale colormap.



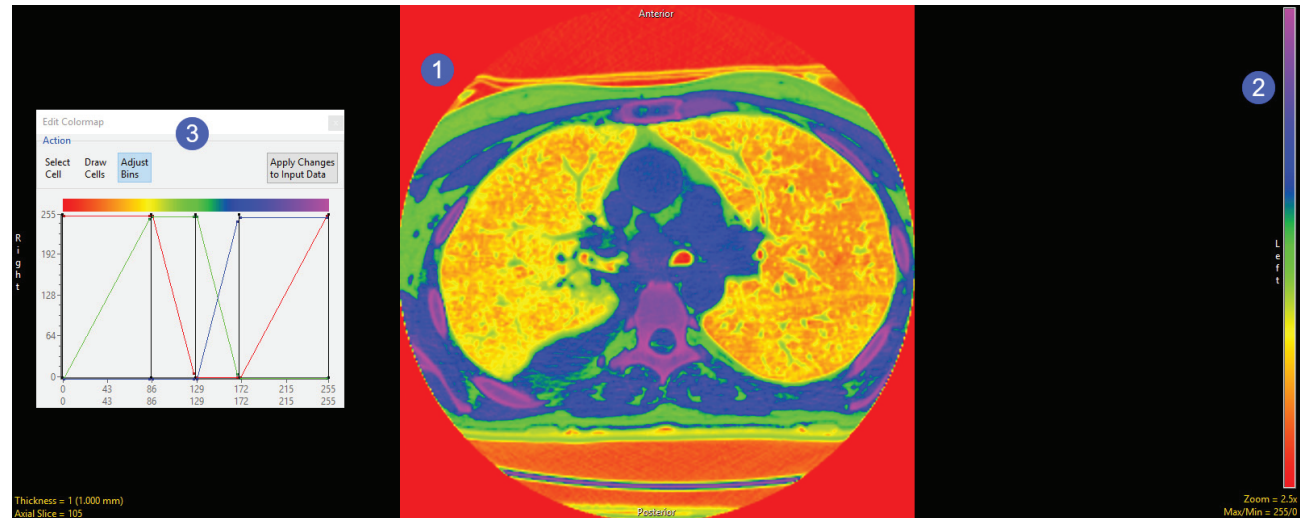
- Rainbow: Creates a Rainbow colormap.



- Random: Creates a Random colormap.

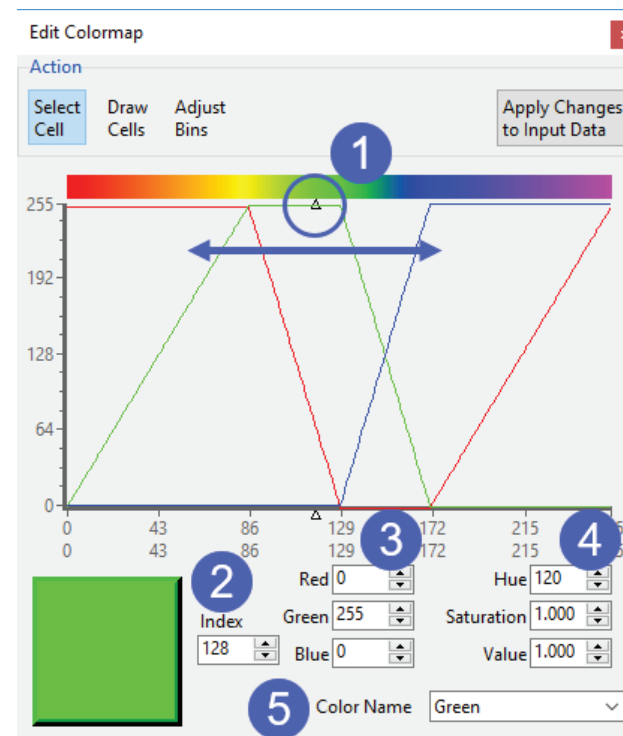


**Create:** When selected creates colormap from specified color cells and type. The colormap is applied to the displayed image data (1), a color bar is displayed (2), and the Edit Color Map Window (3) is returned. When the Edit Colormap window opens the following options are available.

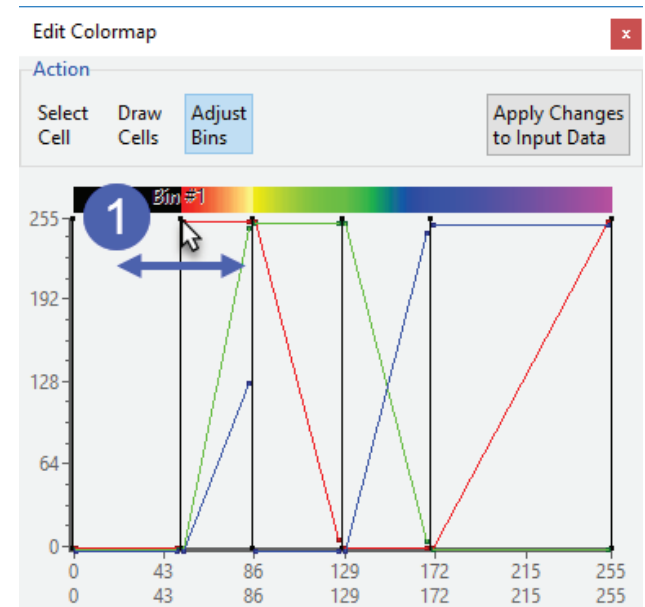
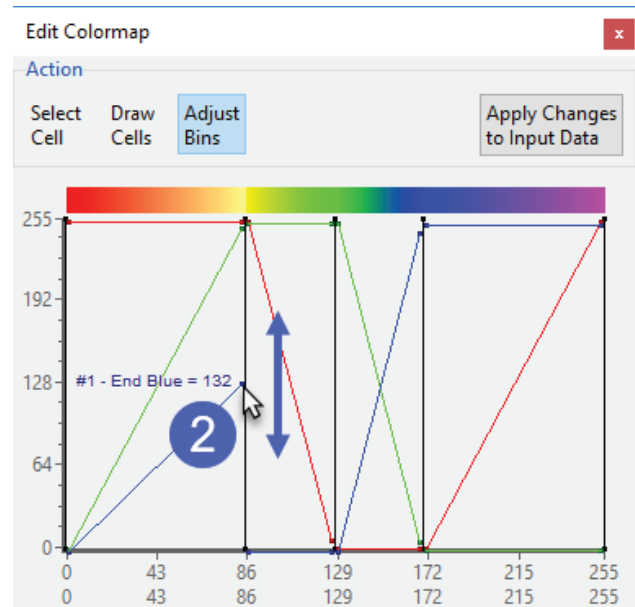
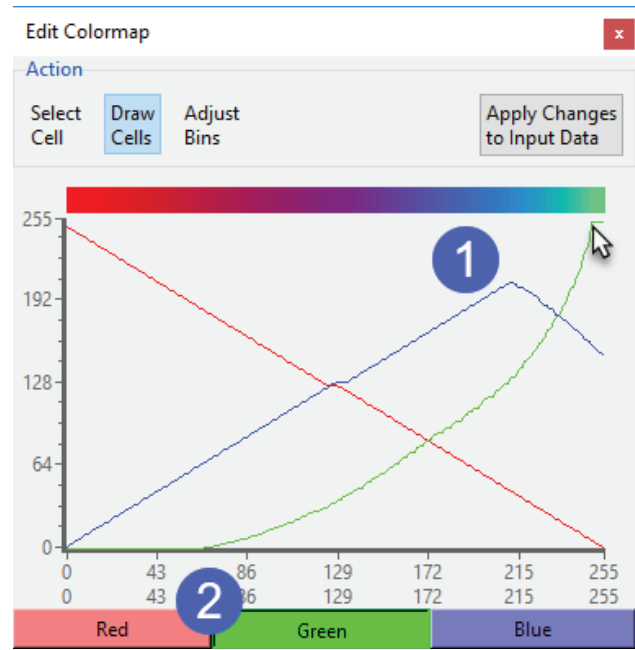


**Action**

- Select Cell: Allows users to modify the color of a specific color cell in the colormap.
- Use the Index selection arrow (1) or the Index field (2) to select a color cell.
- Adjust the color cell color using the RGB input fields (3), the HSV input fields (4), or the Color Name drop-down (5).

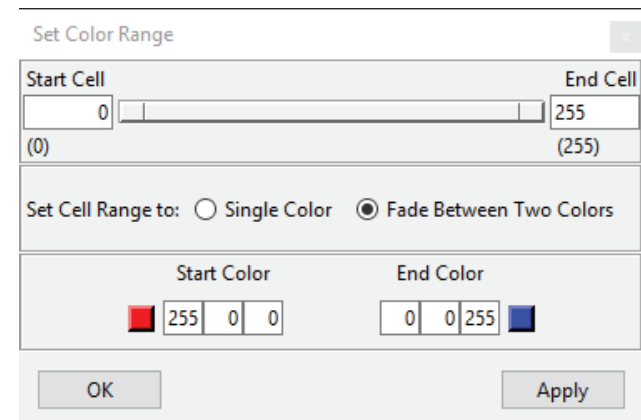
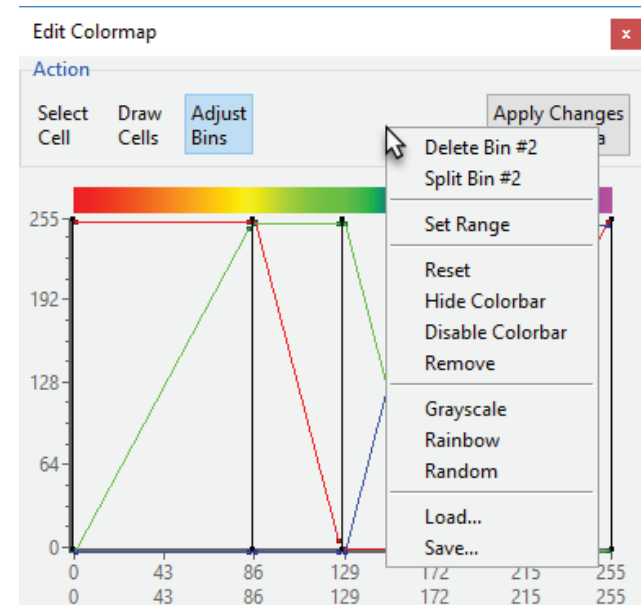


- Draw Cells: When selected allows users to draw color channels on the interface (1). Color channels can be enabled/disabled by clicking on the color buttons at the bottom of the window (2).
- Adjust Bins: Allows users to interactively manipulate bins and the color ranges of bins. Adjust Bins is the default selection.
- Bins are indicated by the black vertical lines on the color map plot. To adjust a bin range, select the black control point at the top of the vertical black bin line (1) and move the line to the left or right to increase or decrease the bin range.
- The Red, Green, and Blue color channels can be adjusted for each bin. Each color channel has a Start point and an End point. To adjust select the start or end point (2) for a color channel and move it up or down to adjust.

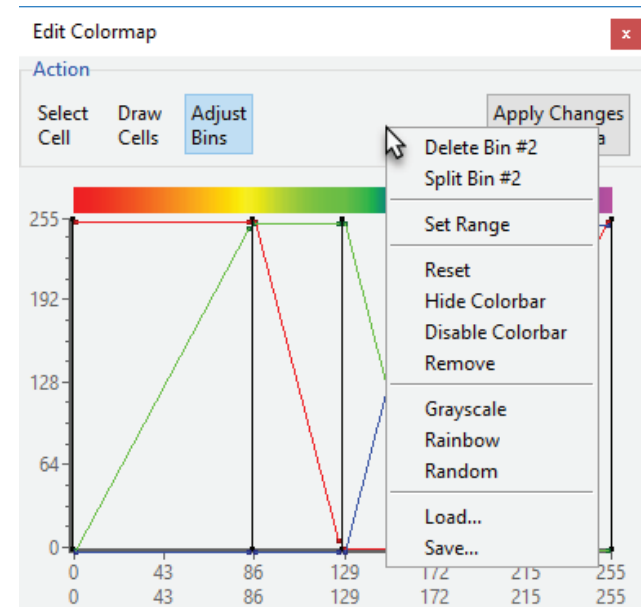


- Apply Changes to Input Data: must be selected in order to apply the colormap to the image data. If not selected before closing the Edit Colormap window or adjusting the slice display all work on the colormap will be lost.

- Right mouse menu options: Right-clicking in the colormap plot display will reveal additional options depending on the current Action selected. These options include: .
  - Delete Bin: When selected deletes the current Bin (available for Adjust Bin Action only).
  - Split Bin: When selected splits the current Bin into two bins (available for Adjust Bin Action only).
  - Set Range: Opens the Set Color Range window allowing users to specify the color for a range of color cells.
    - Start Cell: Specify the starting color cell.
    - End Cell: Specify the ending color cell.
    - Set Cell Range to:
      - Single Color: Select a single color for the color cell range.
      - Fade Between To Colors: Allows users to specify two colors to fade between for the specified color cell range
    - Start Color: Specify the Starting color. When Single Color is selected this is the only option.
    - End Color: Specify the Ending color.
    - OK: Closes the Set Range window.
    - Apply: Applies the edits to the colormap.



- **Reset:** Resets the colormap.
- **Hide Colorbar:** Disables/Enables the colorbar on the display of the 2D image
- **Display Colorbar:** Disables the colormap on the grayscale image data. To enable the colormap again right-click on the grayscale data and choose Colormap and then uncheck Disable Colormap.
- **Remove:** Removes colormap from the image data.
- **Grayscale:** Sets the colormap to a grayscale colormap
- **Rainbow:** Sets the colormap to a Rainbow colormap
- **Random:** Sets the colormap to a Random colormap
- **Load:** Load an existing colormap (.lkup) file (see Load).
- **Save:** Save the current colormap (.lkup) file.



**Load:** Allows users to navigate to and load an existing colormap .lkup file. A selection of predefined colormaps can be downloaded from [analyzedirect.com/data](http://analyzedirect.com/data)

**Save:** Saves the current colormap .lkup file.

**Edit:** Opens the Edit Colormap window.

**Hide Colorbar:** Disables/Enables the colorbar on the display of the 2D image

**Display Colorbar:** Disables the colormap on the grayscale image data. To enable the colormap again right-click on the grayscale data and choose Colormap and then uncheck Disable Colormap.

**Remove:** Removes the colormap from the image data.

