Spatial Editor

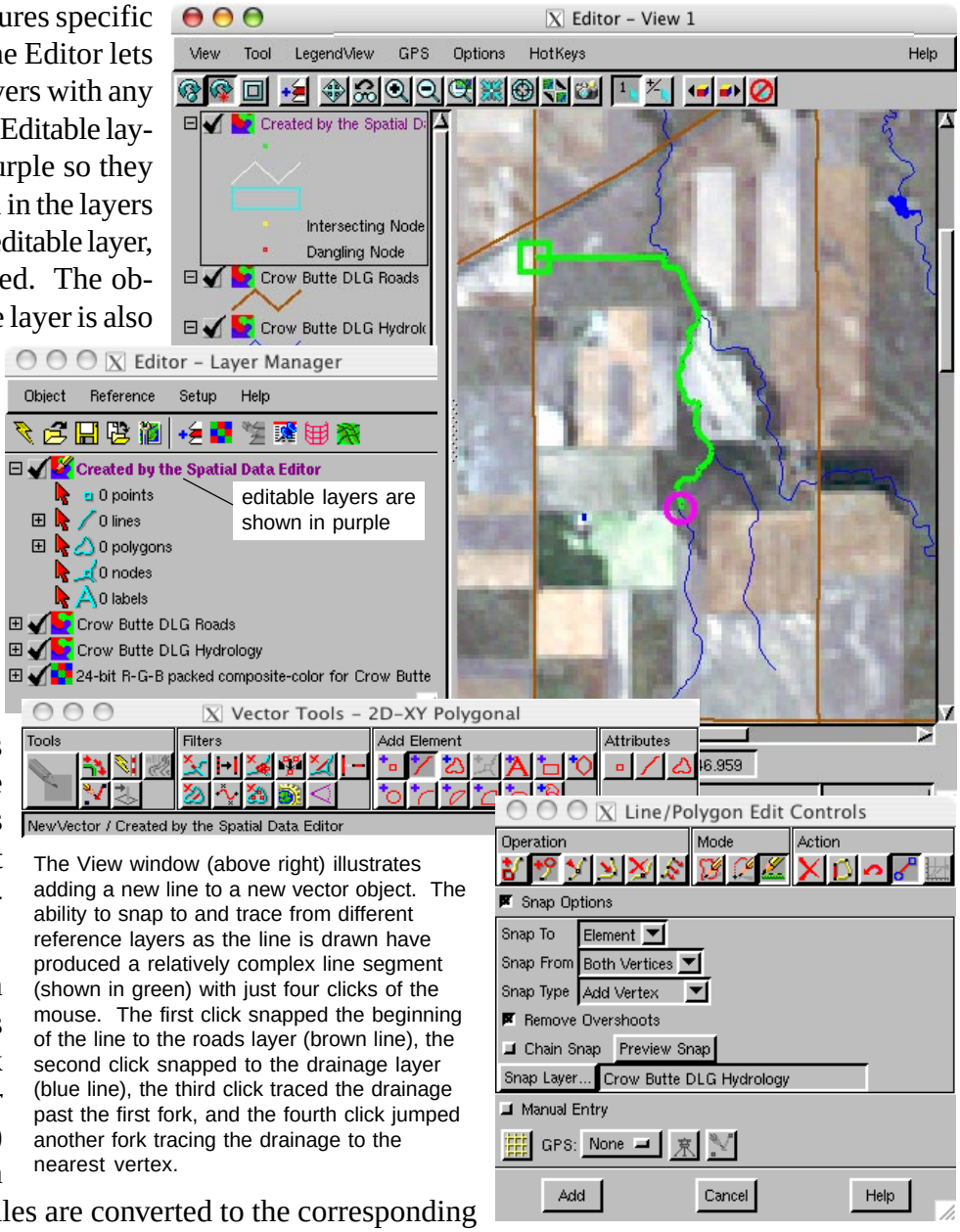
Selecting and Managing Layers

Managing layers in TNTmips' Editor (Main/Edit) has been redesigned to reflect the changes in the Display process. See the color plate entitled *Spatial Display: Getting Started Using the New Design* to acquaint yourself with the features of the Display process. Features specific to the Editor are introduced here. The Editor lets you combine one or more editable layers with any number of reference layers. Editable layers' names are shown in purple so they can be readily distinguished in the layers list. If the layer is the active editable layer, the name will also be bolded. The object type icon for an editable layer is also changed to include a pencil.

editable vector layer

vector reference layer

Like the Display Manager window in the Display process, the Editor utilizes a controls window that lists all the layers and a View window for display and interactive editing. Depending on your current operation, you may have additional windows open. For example, as illustrated at the right, the Vector Tools and Line/Polygon Edit Controls are also open when adding a line, in this case to a new empty vector object that has acquired its georeference information from one of the reference layers.



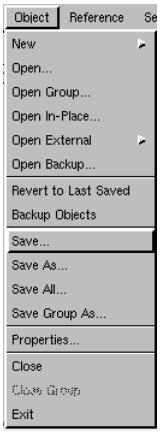
The View window (above right) illustrates adding a new line to a new vector object. The ability to snap to and trace from different reference layers as the line is drawn have produced a relatively complex line segment (shown in green) with just four clicks of the mouse. The first click snapped the beginning of the line to the roads layer (brown line), the second click snapped to the drainage layer (blue line), the third click traced the drainage past the first fork, and the fourth click jumped another fork tracing the drainage to the nearest vertex.

Files in all external formats that can be selected for direct display, such as TIFF, JP2, DGN, DXF (see the Quick Guide entitled *Direct Use of Popular Geodata Formats* for a complete list) can be directly selected for editing with the exception of shapefiles. These files are converted to the corresponding internal format when saved (raster or CAD). Shapefiles and two other ESRI formats, E00 and Coverage, are selected for editing using Object/Open External. These three file types can then be converted to internal format (Object/Properties/*Convert to internal format* toggle) or exported to their original format (Object/Save As).

The Editor Layer Manager window has a menubar with four choices: Object, Reference, Setup, and Help. The options on these menus are further explained on the back of this page.

(over for menu details)

Object



These menu options apply to the object you are editing.

New. Choose from Vector, CAD, TIN, or Raster.

Open. Choose from any spatial object in Project File format or other format that can be directly used (except shapefiles, which are opened using Open External).

Open Group. Open any group previously saved from Display or the Editor. If saved from the Editor, editable layers remain editable layers.

Open In-Place. Opens object without making a copy and saves changes to original object.

Open External. Choose from ESRI E00, Coverage, and shapefiles. Edit just like any internal object. Can be converted to internal object or saved in original format.

Open Backup. Automatically defaults to the location where the Editor saves backup files so you can select the desired file, which may or may not be the last backup saved. You control this automatic backup behavior on the Backup tabbed panel of the Preferences window (Setup/Preferences).

Revert to Last Saved. Removes the object you are currently editing and restores the object to the state it was in at the time of your last save.

Backup Objects. Initiates a backup of all open editable objects.

Save. Saves changes to the currently open object. The first time this option is used you receive a warning that saving over the original object will remove the original object.

Save As. Prompts you to locate and name a new object for saving changes.

Save All. Prompts you to save changes for all editable objects. You can choose between Save and Save As for previously saved objects.

Save Group As. Creates group description that includes all layers, both reference and editable. This group can be opened in the Editor or Display processes. If opened in the Editor, editable layers are again editable.

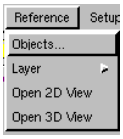
Properties. Opens Object Properties window, which lets you examine and/or change object properties including coordinate type (2D XY, 3D XY, 3D XYZ), topology level, extents mode, units, and other properties.

Close. Removes object from the Editor. If editable with unsaved changes, you are asked if you want to save.

Close Group. If you opened a group or saved a group, this option lets you close that group.

Exit. Closes the Editor. If any editable layers have unsaved changes, you are asked if you want to save.

Reference



These menu options apply to reference layers.

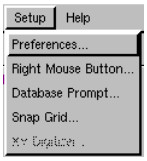
Objects. Opens Select Objects window so you can choose one or more objects to be reference layers.

Layer. Select the layer type you want to use for reference before the Select Object window opens. You need to use this option to add multiple-object layers, such as RGB from three 8-bit raster objects.

Open 2D View. Opens another 2D View window with the same layers listed in the Editor window.

Open 3D View. Opens a 3D View with the same layers listed in the Spatial Data Editor window.

Setup



These menu options let you set how the Editor will operate in a number of situations.

Preferences. This window has ten tabbed panels for setting your Editor preferences: View, Layer, Save, Backup, Color, Raster, Vector, CAD, TIN, and Other.

Right Mouse Button. Choose the functions to appear on your right mouse button menu when using the Editor.

Database Prompt. Set when to be prompted for new database records during the editing process.

Snap Grid. Set up a grid to snap vertices of added elements in vector, CAD, and TIN objects. You define the size of a grid cell here, either interactively with an elastic box or by entering the grid cell size. To use the snap grid when adding or editing elements, toggle on the Snap Grid icon in the Edit Controls window.

X-Y Digitizer. Use an X-Y digitizer instead of the mouse for Editor input. This option is active if you have set up an X-Y digitizer for your system (Tools/System/X-Y Digitizer).