



TerraModeler New Features

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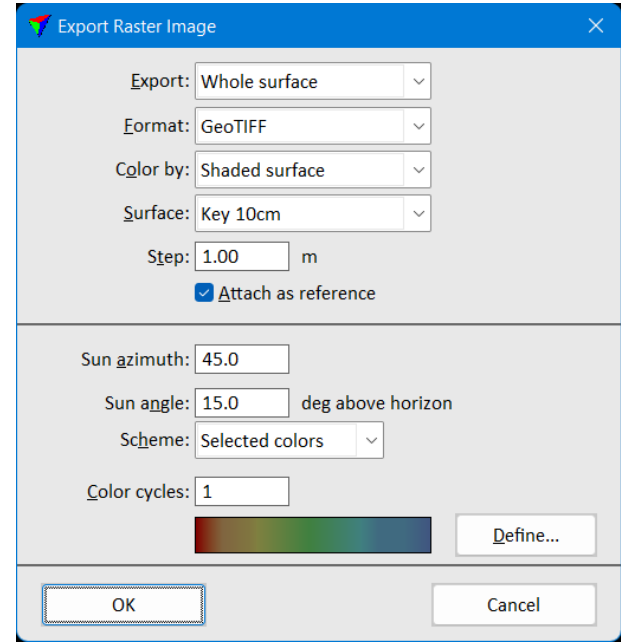
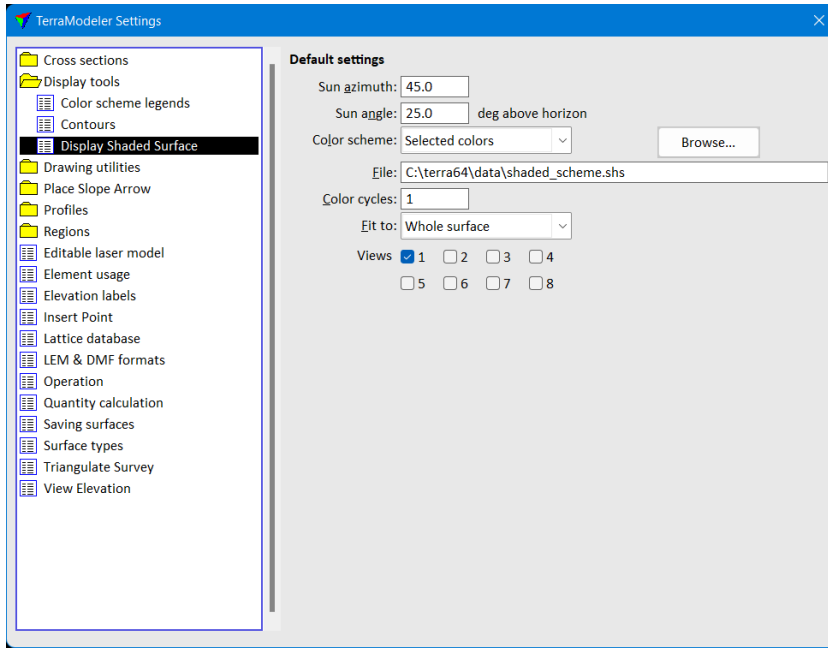
Setup: Public Function Header Files

- Setup installs two C header files as documentation for public functions:
 - `\terra64\include\model_functions.h` – public function prototypes
 - `\terra64\include\model_types.h` – data types used



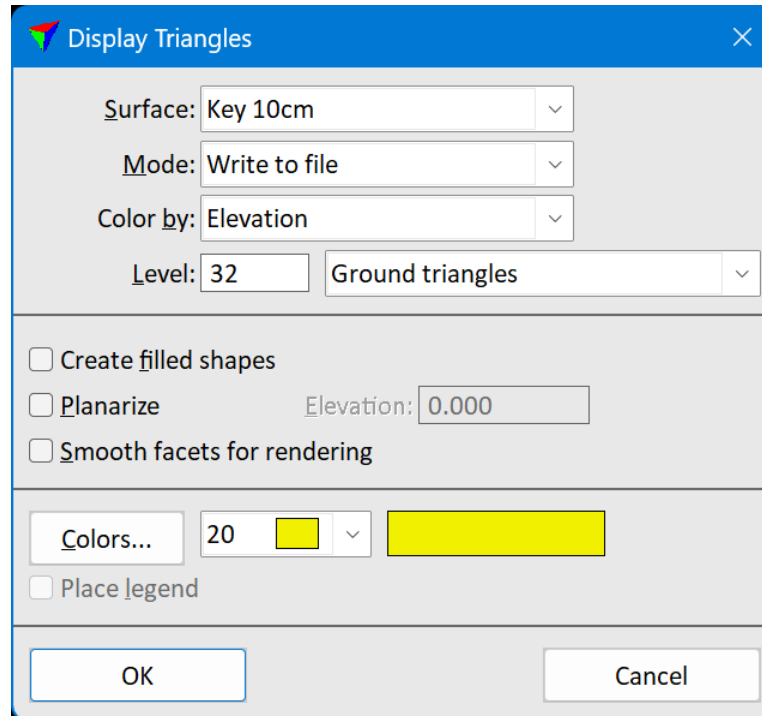
Shaded Surface Improvements

- **Model Settings** has default scheme choice for **Display Shaded Surface**
 - Hot to cold
 - Earth tones
 - Selected colors
- **File / Export / Raster image** supports same scheme choices



Level Dropdown List

- **Display Triangles, Display Grid, Display Elevation Texts** and **Display Slopes** let user select level from a dropdown list in addition to level number



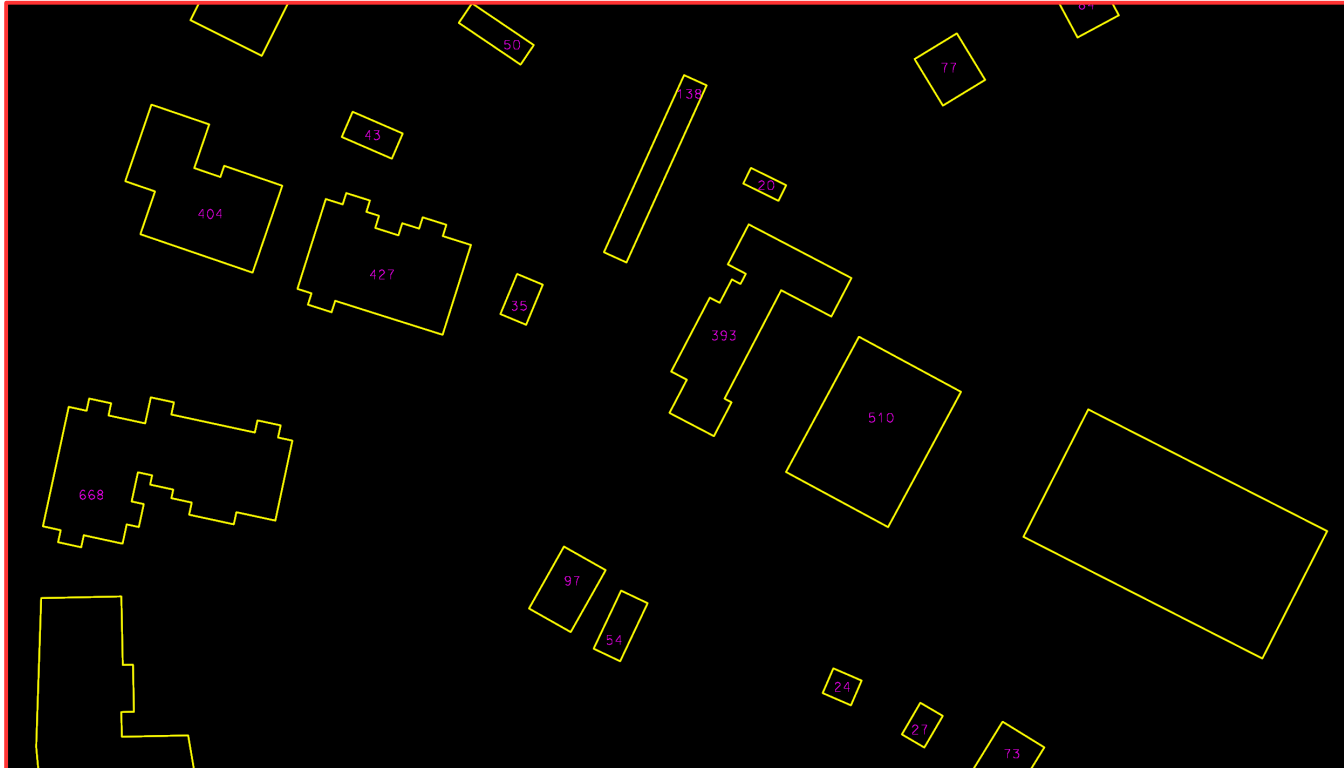
The screenshot shows a dialog box titled "Display Triangles" with a close button (X) in the top right corner. The dialog contains several settings:

- Surface:** A dropdown menu with "Key 10cm" selected.
- Mode:** A dropdown menu with "Write to file" selected.
- Color by:** A dropdown menu with "Elevation" selected.
- Level:** A text input field containing "32" and a dropdown menu with "Ground triangles" selected.
- Create filled shapes
- Planarize Elevation:
- Smooth facets for rendering
- Colors...:** A button, a text input field with "20", a color selection dropdown with a yellow swatch, and a larger yellow rectangular preview.
- Place legend

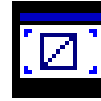
At the bottom of the dialog are two buttons: "OK" and "Cancel".

Label Area & Multiple Selected Polygons

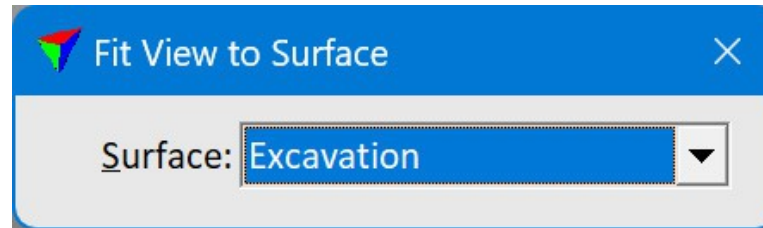
- **Label Area** tool can label multiple selected polygons as one operation



Fit View to Surface

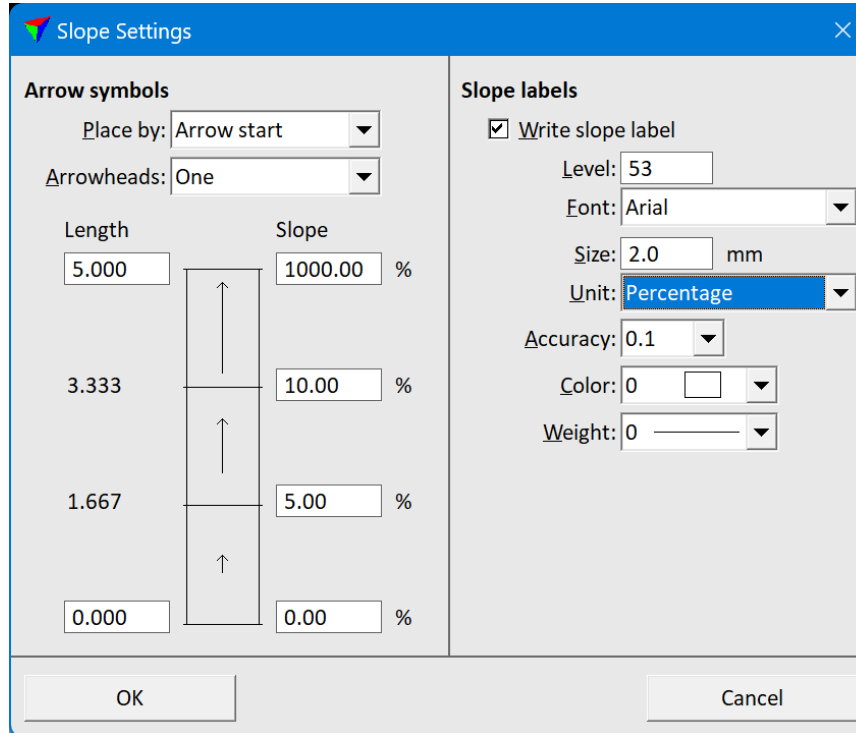


- Fits a view window to show the area of a selected TIN model



Display Slope Arrows & Place Slope Arrow

- User can now choose label unit: **Percentage** or **Degree**



The image shows a software dialog box titled "Slope Settings". It is divided into two main sections: "Arrow symbols" and "Slope labels".

Arrow symbols section:

- Place by:** Arrow start (dropdown menu)
- Arrowheads:** One (dropdown menu)
- Length:** 5.000 (input field)
- Slope:** 1000.00 % (input field)
- Below these are three vertical arrows of increasing height, each with a corresponding slope value: 3.333 (10.00 %), 1.667 (5.00 %), and 0.000 (0.00 %).

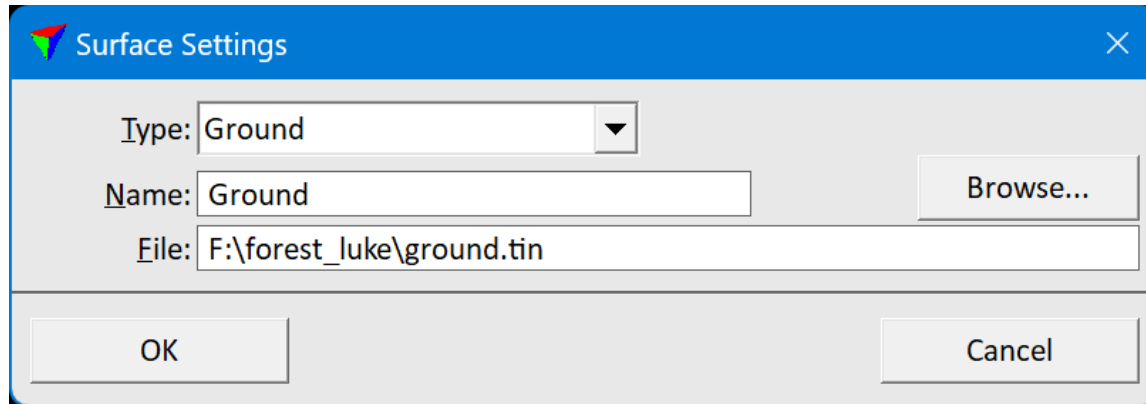
Slope labels section:

- Write slope label
- Level:** 53 (input field)
- Font:** Arial (dropdown menu)
- Size:** 2.0 mm (input field)
- Unit:** Percentage (dropdown menu, highlighted in blue)
- Accuracy:** 0.1 (dropdown menu)
- Color:** 0 (color selection dropdown)
- Weight:** 0 (weight selection dropdown)

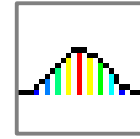
At the bottom of the dialog are "OK" and "Cancel" buttons.

Save TIN Models to Any Folder

- **Surface Settings** dialog lets you specify both folder and file name
- If no folder given, software saves surface to same folder where vector file is
- If folder is given, software saves surface to that folder



Compute Stockpile Volume



- Simple tool for computing stockpile volume directly from point cloud
- Can compute volume without user creating any TIN surfaces
- Requirements:
 - Point cloud
 - 2D polygon drawn around the stockpile

Compute Stockpile Volume

Top surface: Point cloud >>

Step:

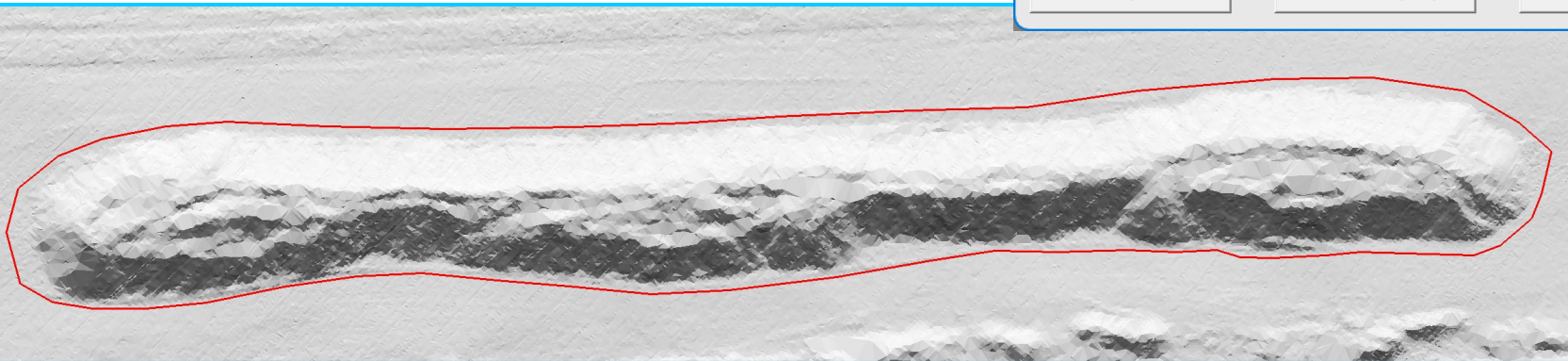
Display: Display only m Red height: m

Draw as: Vertical lines

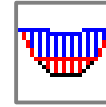
Volume: 4581.3 m³

Area: 2757.0 m²

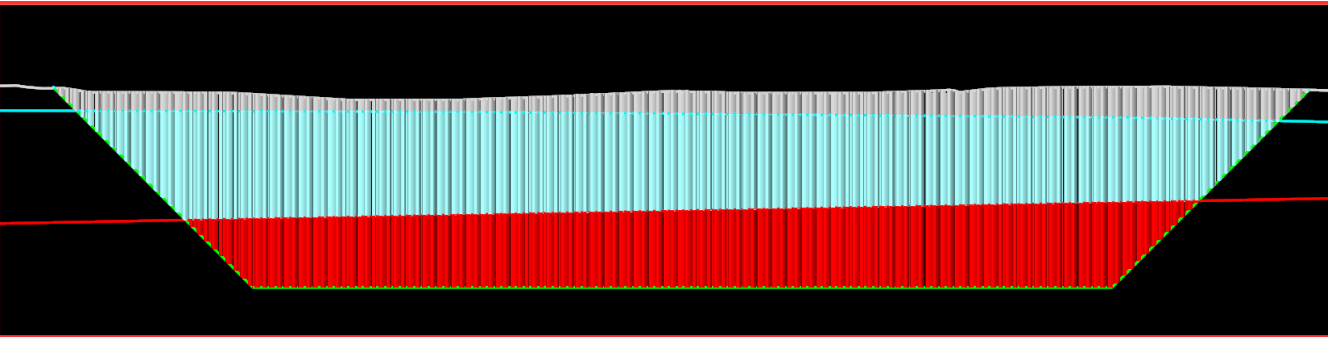
Compute Erase display Reporting...



Compute Multiple Surface Volume



- Tool for computing volumes between multiple surfaces
- One surface can be **Target** type – limits area and depth computed



Compute Multiple Surface Volume

Key10 Source
 Excavation Target
 Gravel Source
 Bedrock Source

Step: 0.500 m Inside polygon
Display: Display only

Gravel - Bedrock	31 689	
Bedrock - Excavation	28 665	
Key10 - Gravel	13 078	
Gravel - Excavation	3 397	
Key10 - Excavation	383	
Key10 - Bedrock		
Excavation - Key10		
Excavation - Gravel		

Volume: 77212.1 m³ Sort by: Volume
Area: 27517.0 m²

Compute Erase display Reporting...