

Helpful Hint—Labels and Annotations

Applies to Version:	Toolkit SP-4; ArcGIS 9.2
Written by:	June Johnson Washington NRCS Toolkit Coordinator
Helpful Hint Date:	10-2-2008

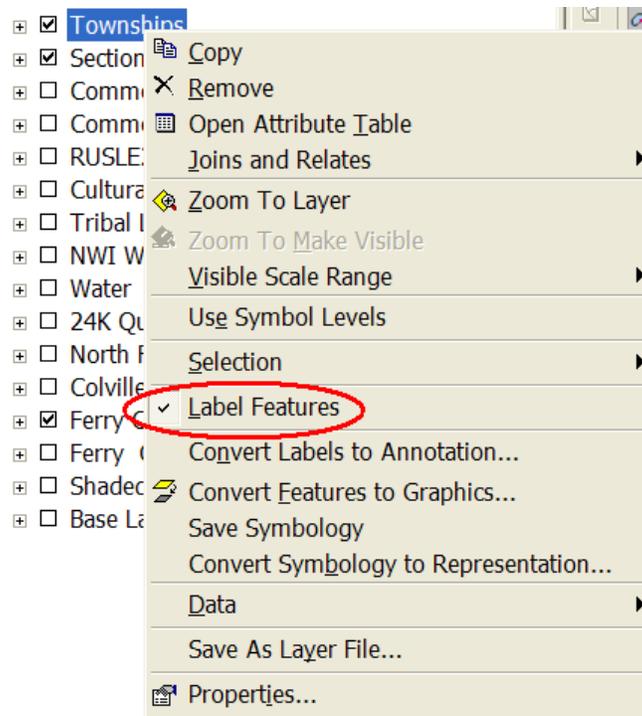
Background: In Toolkit, when the Label tool  is used with Create Annotation Layer checked, an annotation group is created. Labels created from the Labels tab in the Layer Properties window, or created by the Label tool with Create Annotation Layer unchecked are different. This hint will describe those differences.

LABELS:

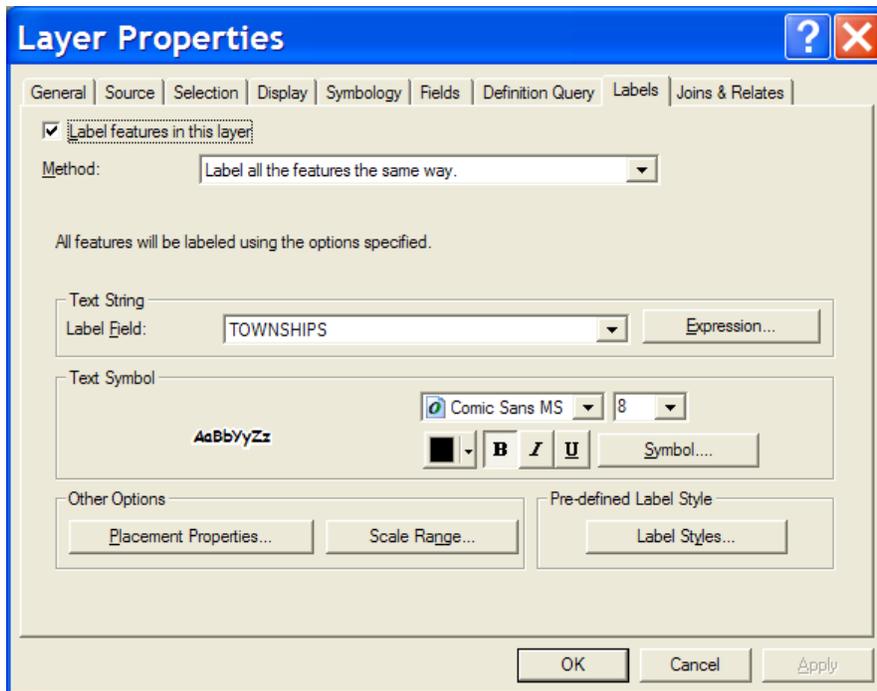
In ArcGIS, a label is descriptive text based on one, or more attributes. They are automatically placed on, or near, the feature. The user can select how to have them displayed. The user cannot select and move or modify an individual label. Label placement rules and display properties, like font size and color are set for the entire layer. The whole layer does not have to be in the view for a label to be created.

Examples of labels are the Section and Township layer labels that are in your county Toolkit templates.

A user can see that they are labels by right mouse clicking on the layer and seeing a check mark next to Label Features. To turn off the labels, uncheck Label Features.



To view what is used for the label, go to the layer properties, Labels tab. It displays the Method, the attribute used for the label, Text Symbol and has buttons for setting different label properties.



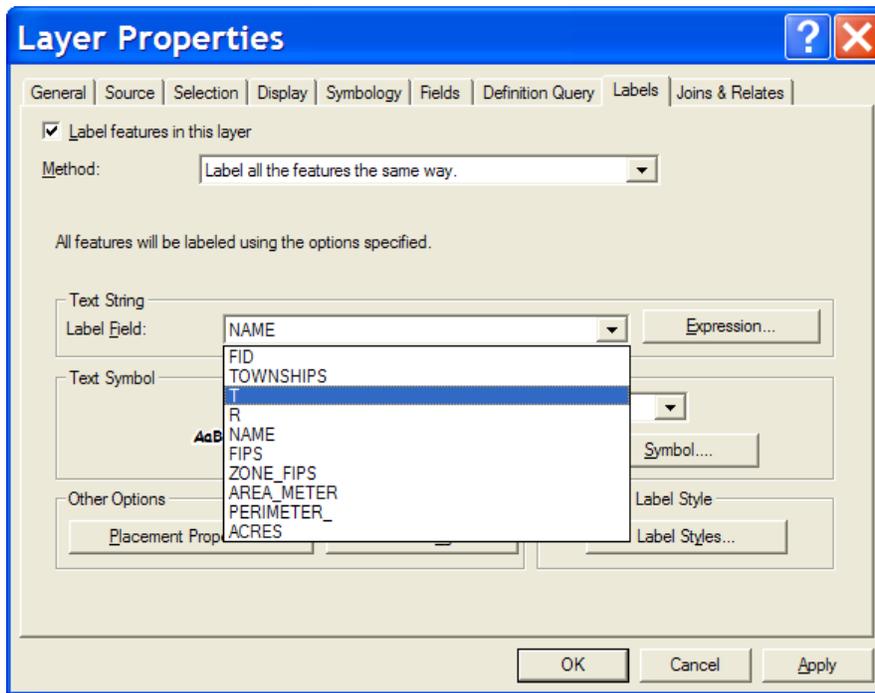
For Townships, all of them are labeled the same way.

If the user is not sure of what to use for the Label Field, right mouse click on the layer name in the table of contents and open the Attribute table. For the Townships layer in the Toolkit Template, the Townships attribute is used. The T and R could have been used instead, as shown below.

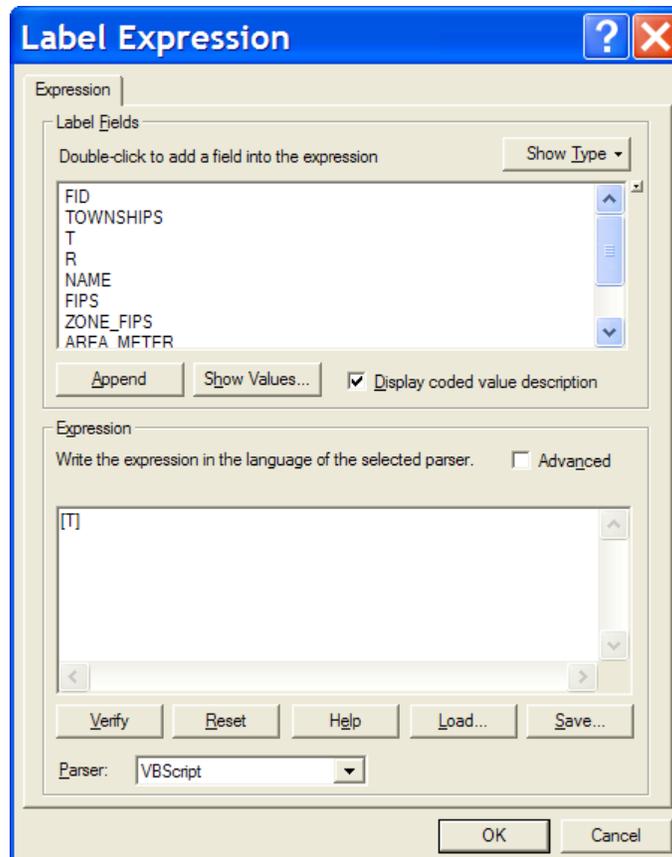
FID	Shape	TOWNSHIPS	T	R	NAME	FIPS	ZONE_FIPS	AREA_METE	PERIMETER
0	Polygon	T27N,R34E	27N	34E	FERRY	WA019	tnshps_a_WA019	337975.827	4895.79
1	Polygon	T27N,R35E	27N	35E	FERRY	WA019	tnshps_a_WA019	33373536.15	23200.78
2	Polygon	T28N,R31E	28N	31E	FERRY	WA019	tnshps_a_WA019	4.539	581.24
3	Polygon	T28N,R32E	28N	32E	FERRY	WA019	tnshps_a_WA019	46133902.973	29774.87
4	Polygon	T28N,R33E	28N	33E	FERRY	WA019	tnshps_a_WA019	35150863.331	34334.08

How to use data from more than one attribute column:

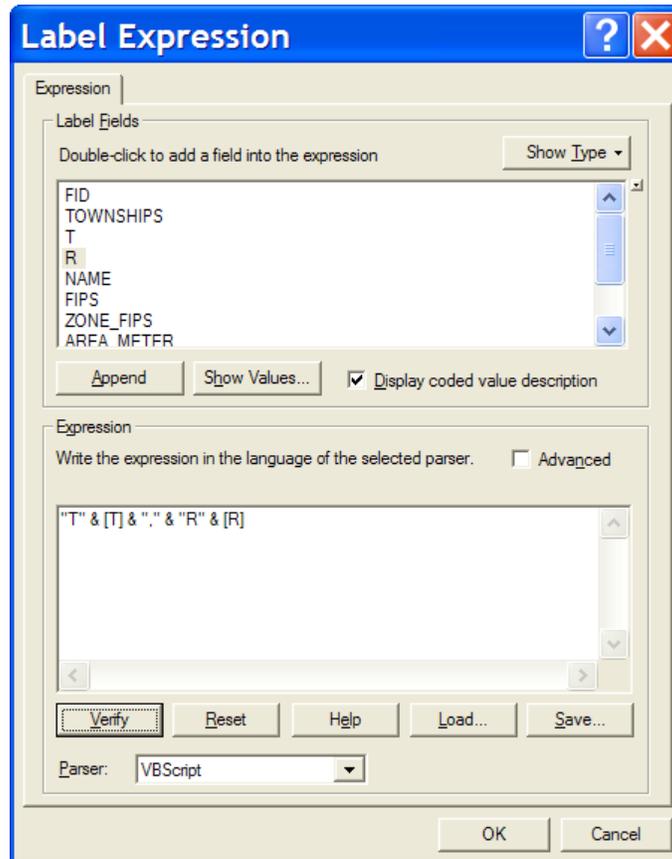
1. Click on the down arrow next to Label field and select the first desired field.



2. Click on the Expression button.

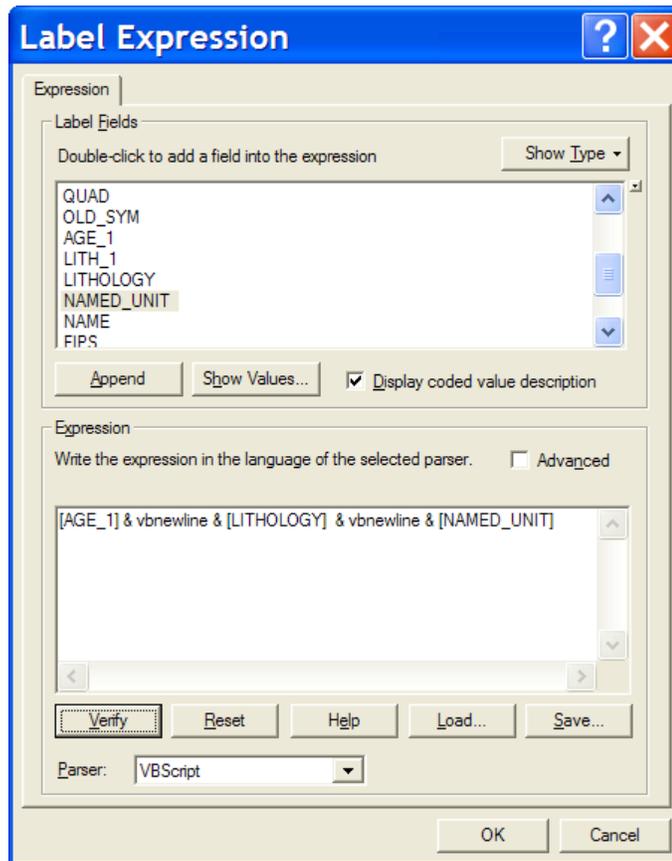


3. Type in the Expression box like this:

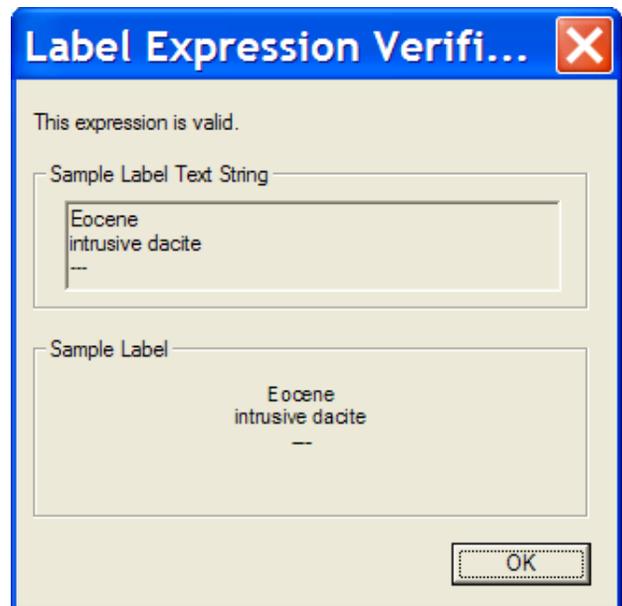


Be sure to put quotation marks around any text you add and the ampersand (&) symbol between each item. The [T] and [R] are added by double-clicking on the label field in the box above.

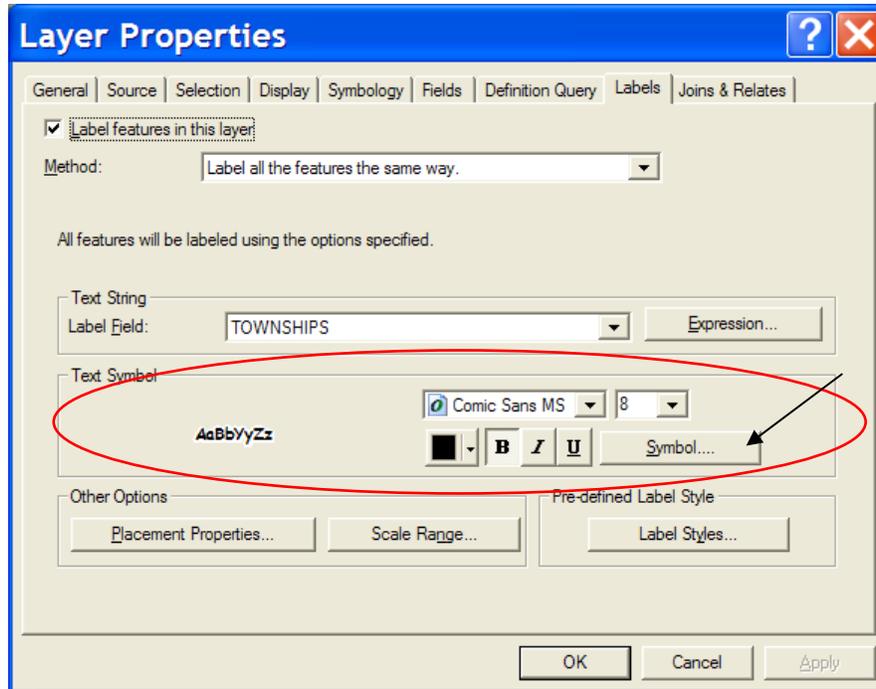
If you want to create a label using more than one line, use vbnewline between the attributes.



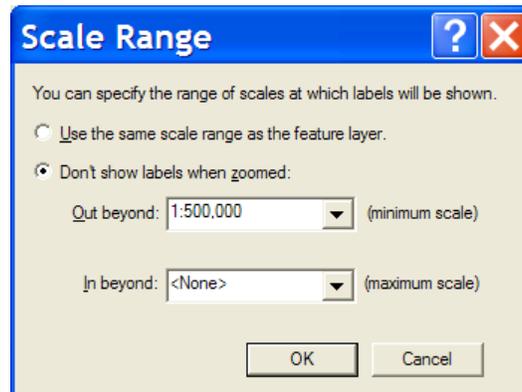
4. Click on the Verify button to make sure that the expression was entered correctly and to see a preview of the label.



- Click OK twice to return to the Layer Properties window.
- The font may be changed right on the Labels tab. If you want a different symbol, click on the Symbol button. It opens the symbol selector where you may select one that already exists, or click on Properties where you can put a Mask Halo around the text.



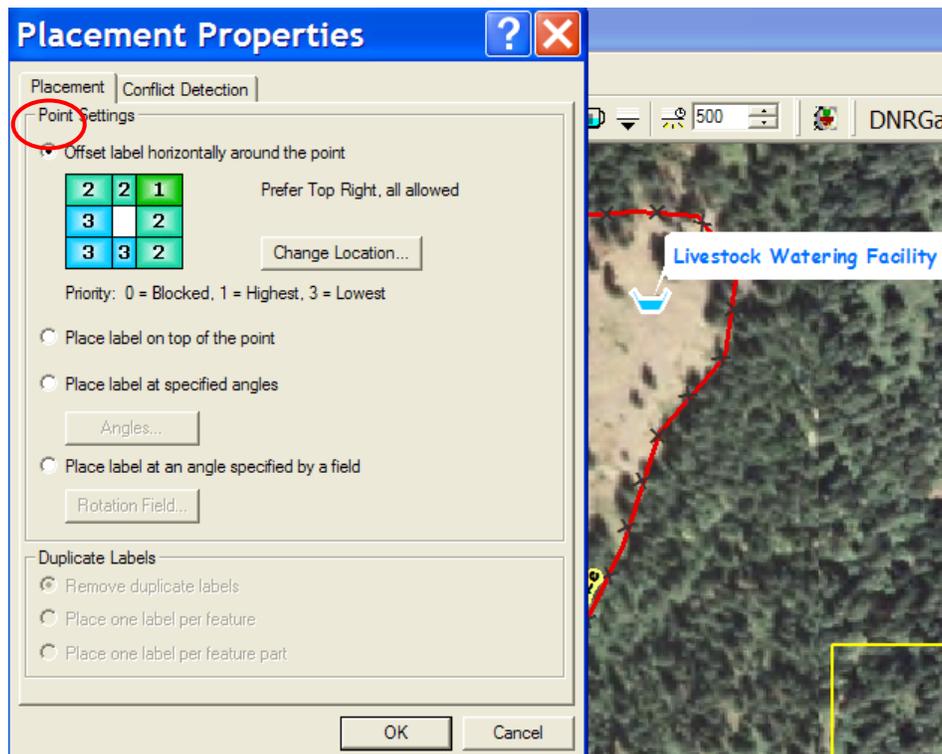
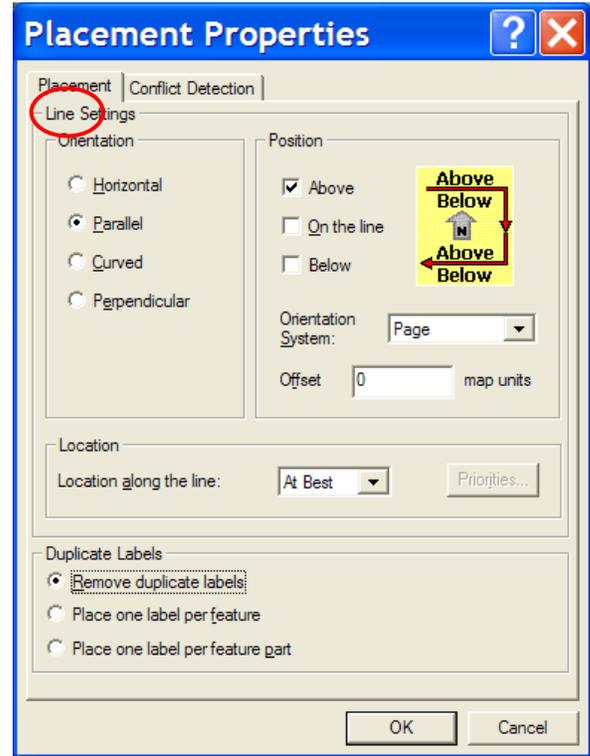
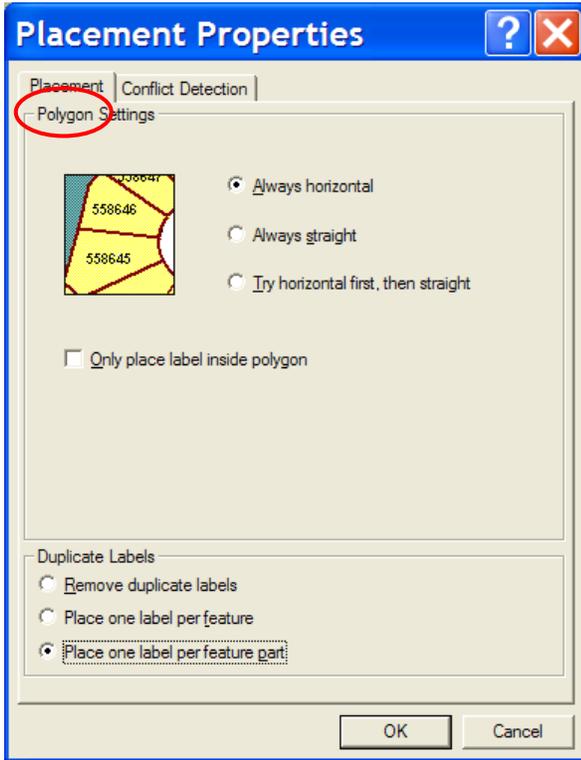
- Under Other Options, click on the Scale Range button. For the Townships layer, I have selected the following:



When the scale is set beyond 1:500,000, the Township labels will disappear. They will appear when the scale is set at 1:500,000 or zoomed in more.

The labels will stay the same size whether zoomed in or out. Remember that the Scale Range feature is available to keep the map from becoming too cluttered when a lot of labels are turned on and the user zooms out. (The sections layer will turn off when zoomed out to a scale of 1:100,001.)

8. Click on the Placement Properties under Other Options, to view the choices a user has for placing the labels. (Note: the options for a polygon and a line are shown below.)



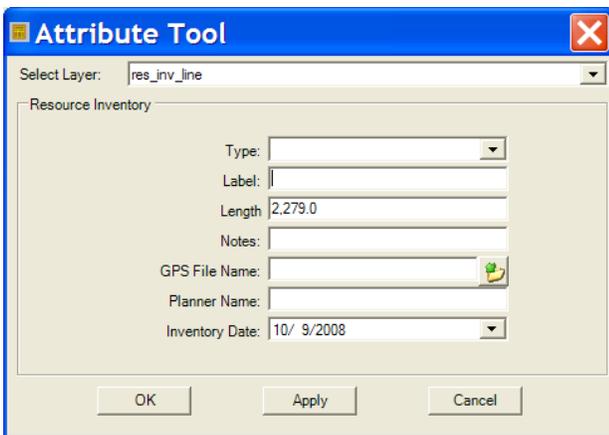
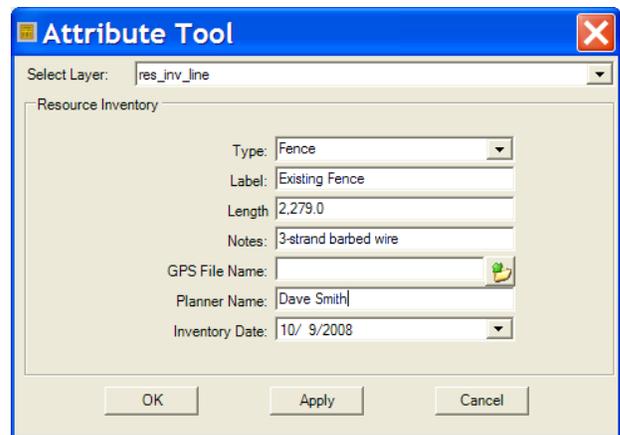
ANNOTATIONS

Annotations may be used to describe a particular feature or to add information to a map. Each annotation stores its own position text and display properties. When you use the Label (paintbrush) tool in Toolkit, you are creating an annotation layer that is associated with a particular layer, provided that the Create Annotation Layer option is checked. The text positions are determined by coordinates and are sized according to a reference scale. That is why it's important to determine the scale you are going to use to print the map before you use the Label tool.

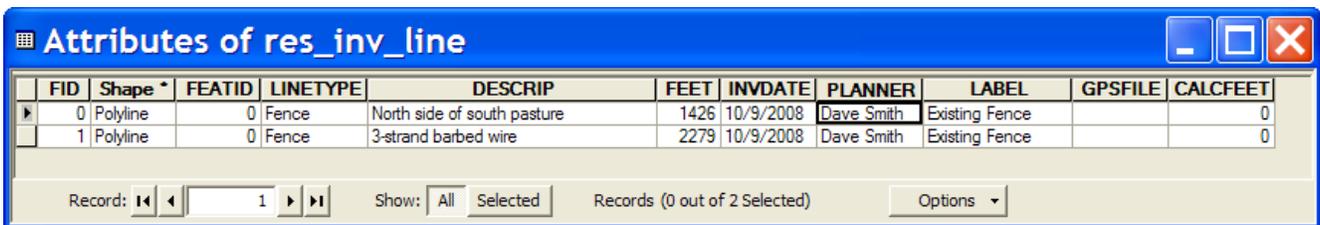
Annotations may be individually changed or moved on the map.

Example of an Annotation Created in Toolkit:

1. To document an Existing Fence, use a Resource Inventory (line) layer.
2. Use the Attribute Tool  to describe the line.

3. Right mouse click on res_inv_line in the table of contents and open the Attribute table.

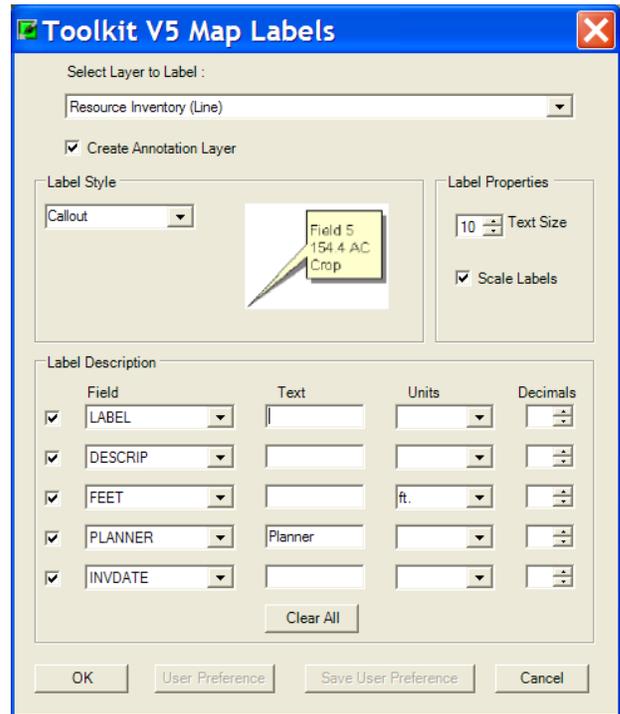
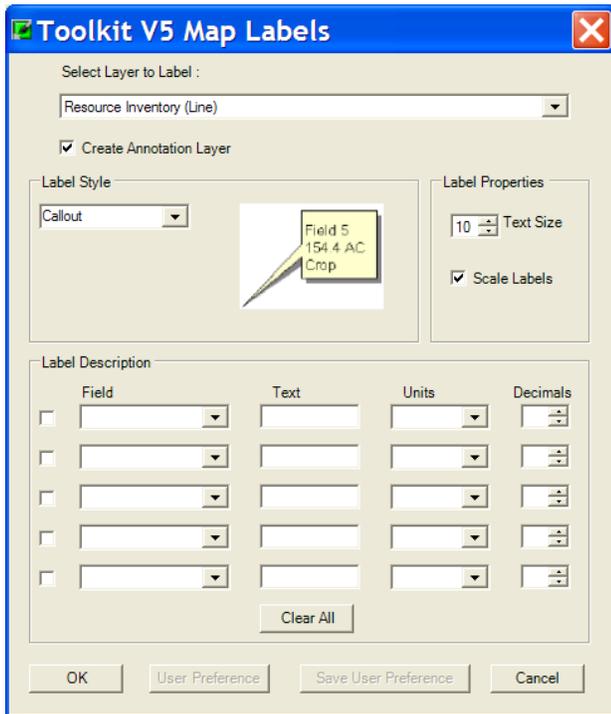


FID	Shape	FEATID	LINETYPE	DESCRIP	FEET	INVDATE	PLANNER	LABEL	GPSFILE	CALCFEET
0	Polyline	0	Fence	North side of south pasture	1426	10/9/2008	Dave Smith	Existing Fence		0
1	Polyline	0	Fence	3-strand barbed wire	2279	10/9/2008	Dave Smith	Existing Fence		0

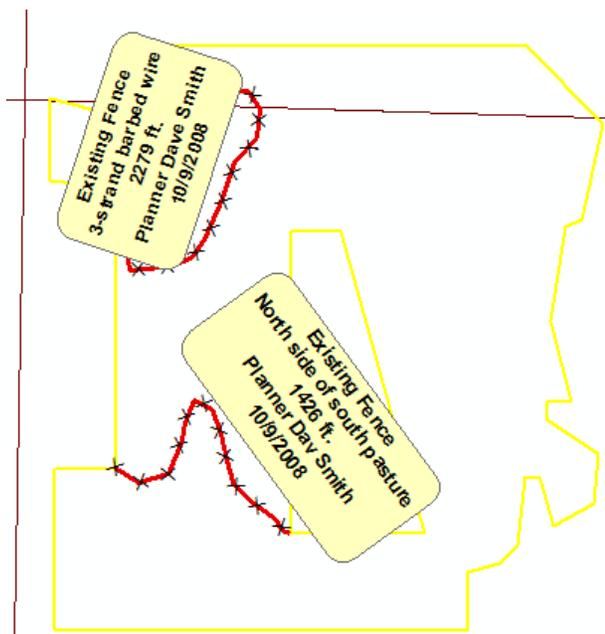
Note the name of the column headings in relationship to the Attribute tool information.

Attribute Tool Name	Attribute Table Column Name
Type	LINETYPE
Label	LABEL
Length	FEET
Notes	DESCRIP
GPS File Name	GPSFILE
Planner Name	PLANNER
Inventory Date	INVDATE

4. Select a scale for the map that will be appropriate. A commonly used scale is 1:7920 (8 inches = 1 mile)
5. Click on the Toolkit Label tool . Select the res_inv_line layer to label. Select the fields according to the table on the previous page. Click OK.



The callout labels were created along the lines in this example:



- Use the black pointer tool to select a label; right mouse click and go to Properties. Notice the angle. Change this to 0. Repeat for the next label(s). That makes them horizontal.

