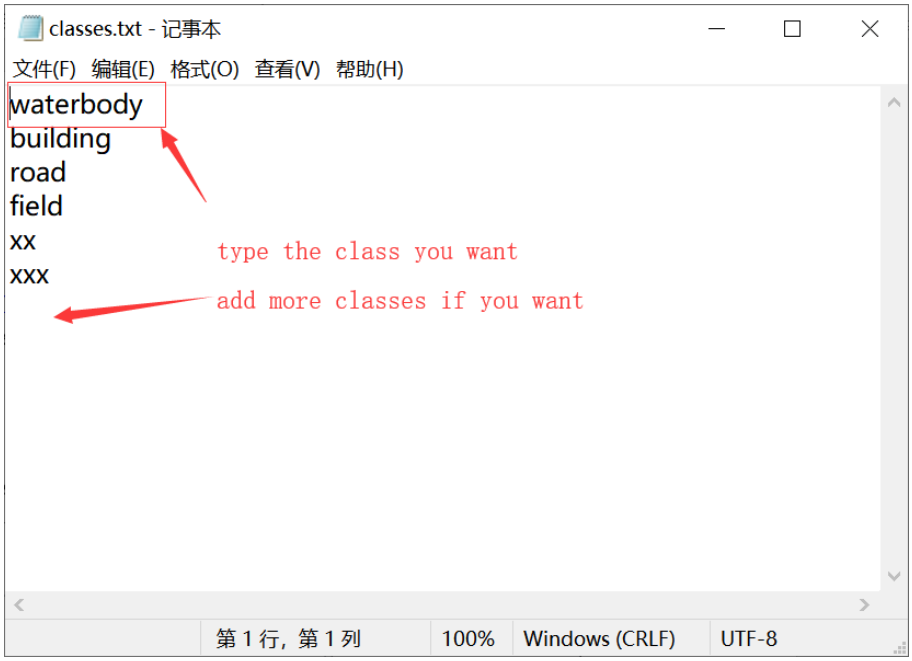
Annotation Tool Document

Github: https://github.com/FrostMonarch95/Label_Img

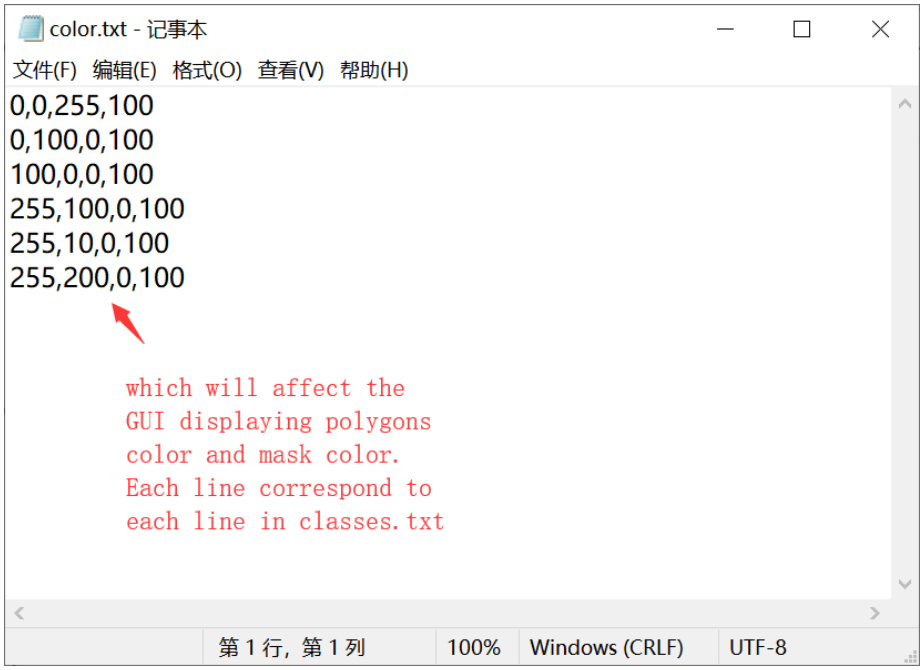
Before using this tool, make sure that the following test files are customized properly!

classes.txt



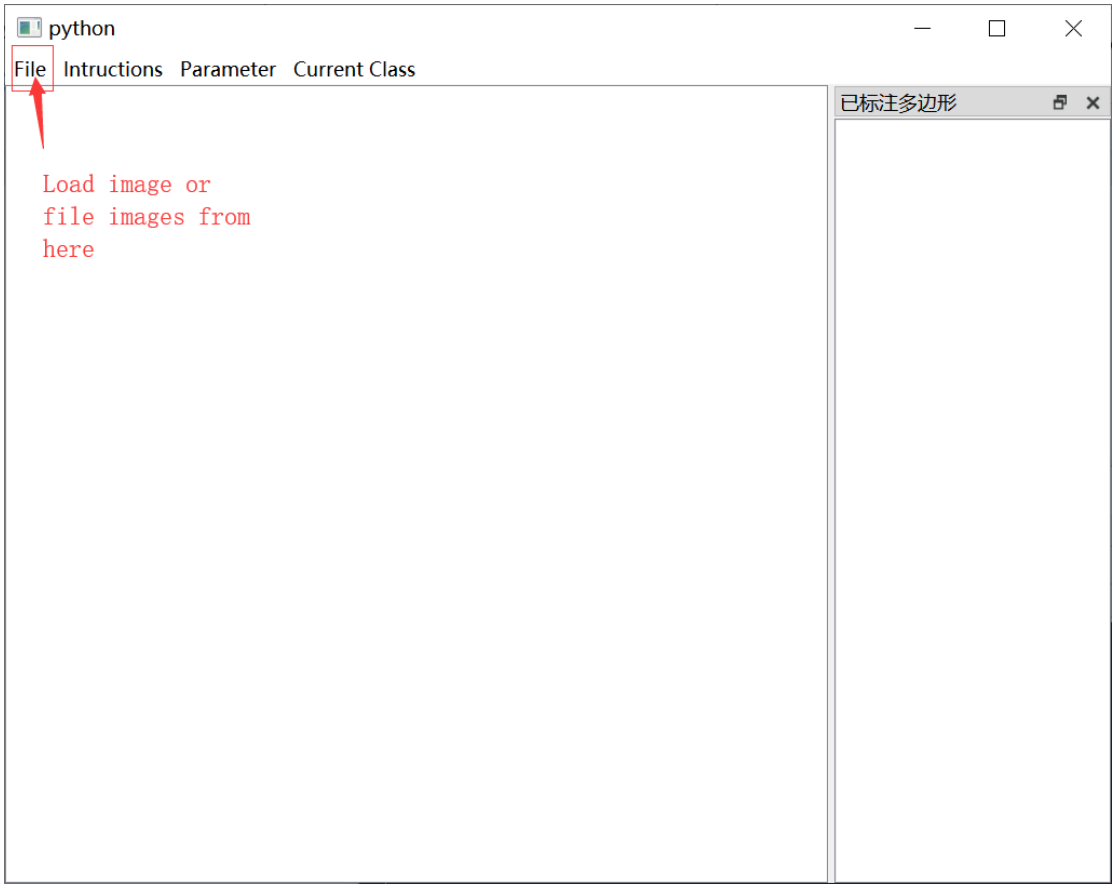
color.txt

customize R, G, B, alpha for each class. Alpha means the transparent value. The less alpha is, the more transparent polygon will be.



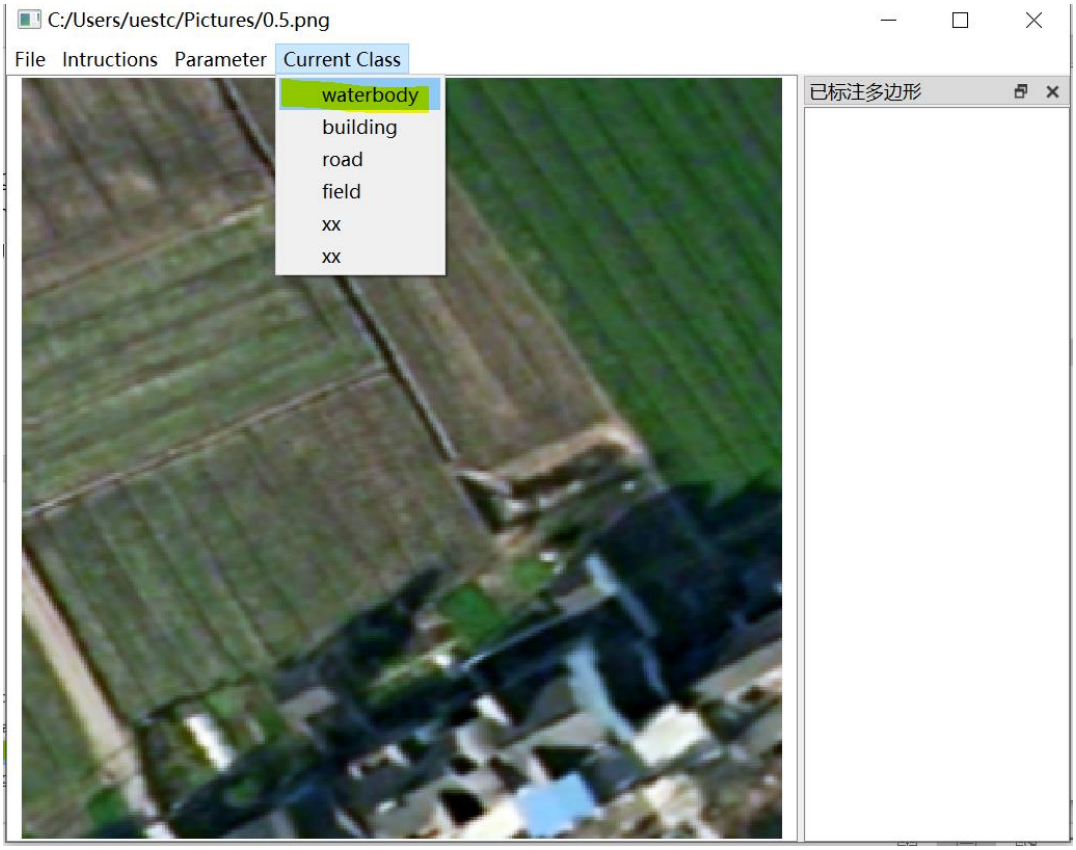
How to load a image or load file images?

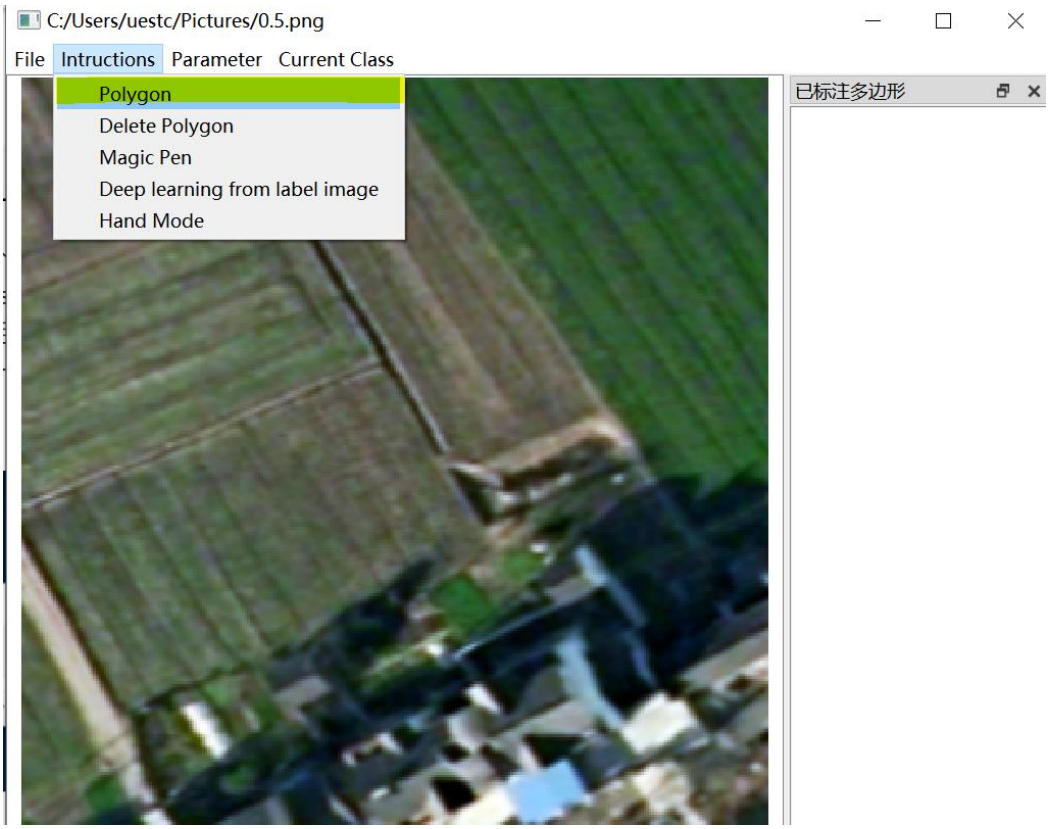
Click
File-> Load Image
Or File-> Load File Image



(1)Draw a polygon

The most conman usage is to annotate the image with a polygon, let's try this.
Before drawing a polygon, make sure to choose the proper class you want.
Click Current Class->waterbody





Once you have finished drawn the polygon press ESC to confirm this is the polygon you want.

If the polygon is not perfect, no worries, you can modify those grip items.


C:/Users/uestc/Pictures/0.5.png
File Intructions Parameter Current Class
已标注多边形
waterbody
you can drag
those grip items
to modify the
polygon


C:/Users/uestc/Pictures/0.5.png
File Intructions Parameter Current Class
已标注多边形
waterbody
You can also drag the whole polygon

(2)delete a polygon

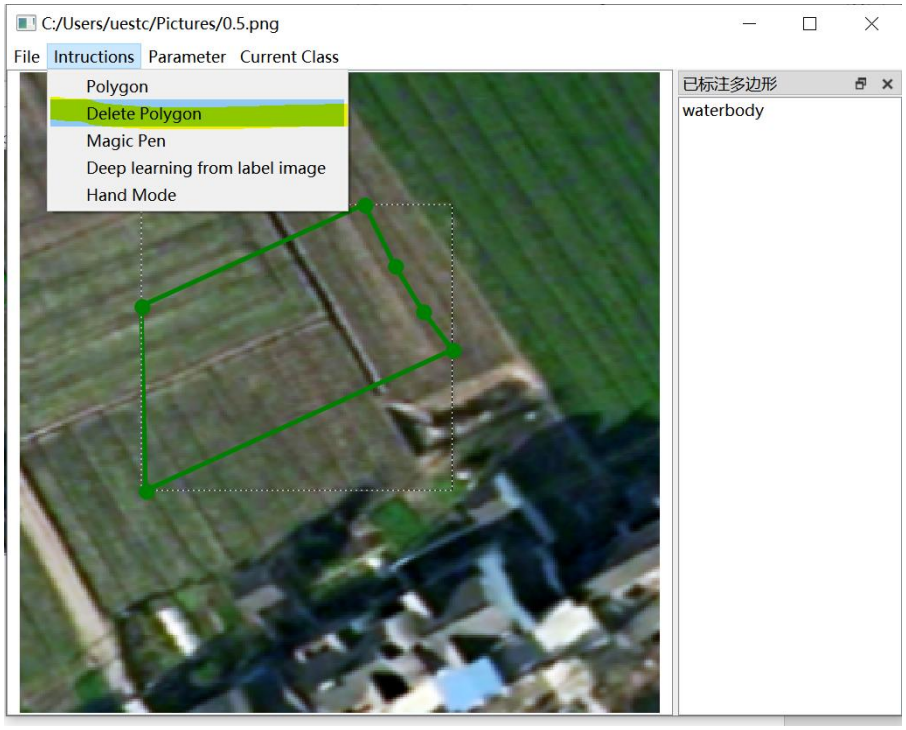
If you want to delete the polygon,

Click

Instructions->Delete Polygon

Then you can choose the polygon you want to delete!

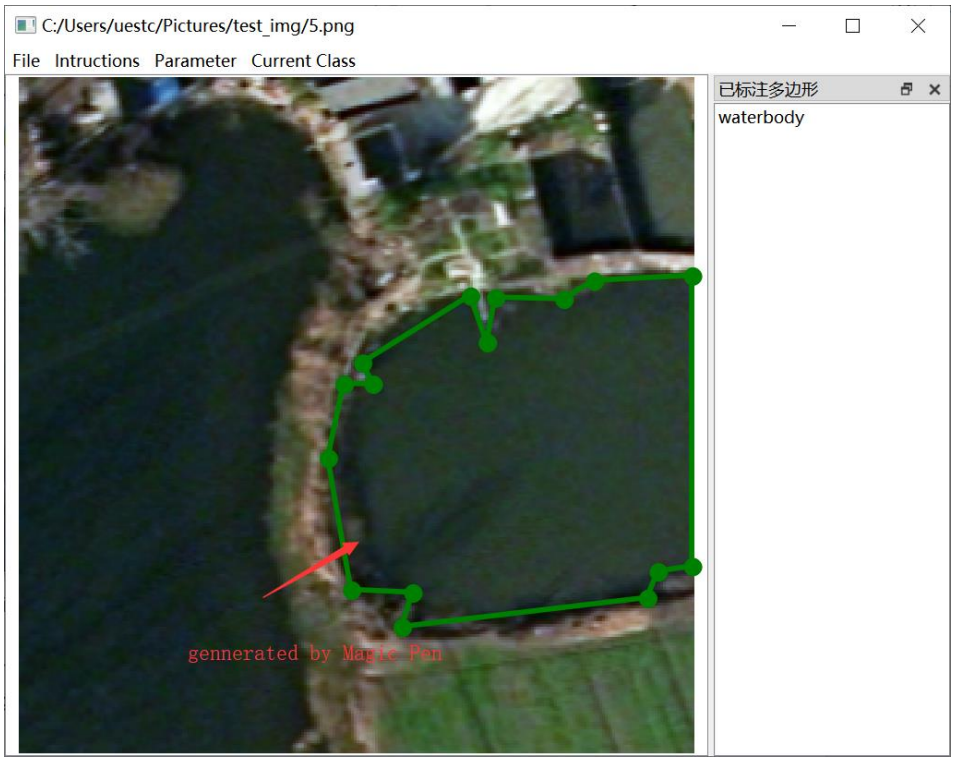
Remember once you have finished deleted the polygon you should choose Hand Mode to exit delete polygon instruction otherwise you will keep deleting polygons you click!



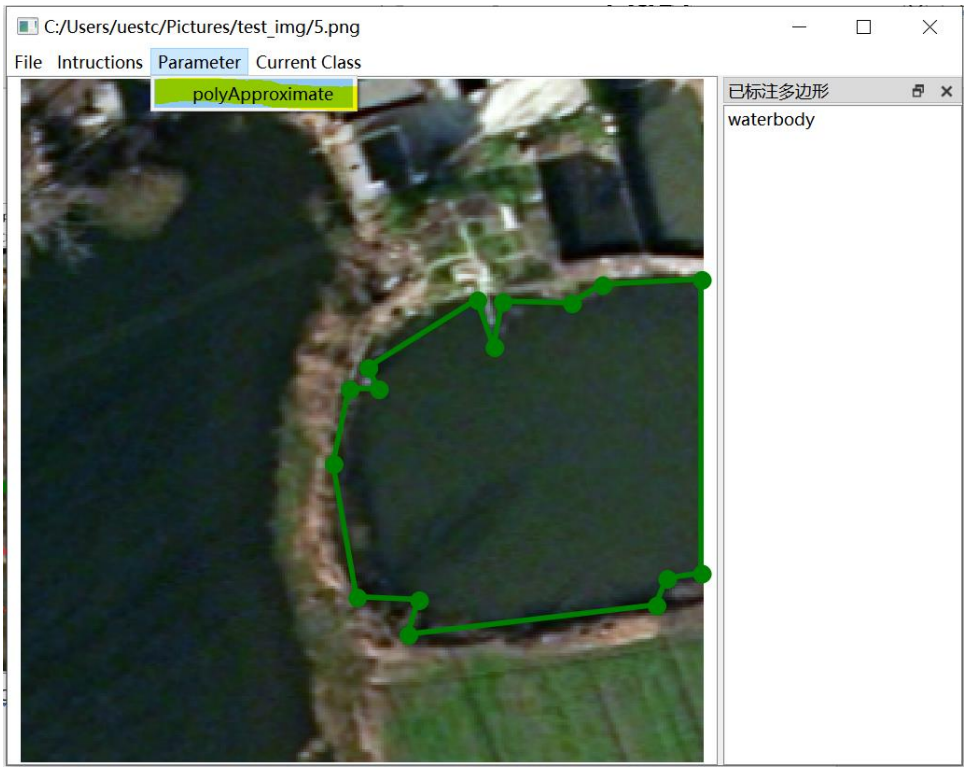
(3)Auto annotation using Magic Pen.

Sometimes if we want to label some smooth texture items like lake or waterbody we can use Magic Pen to auto generate the contour for us.

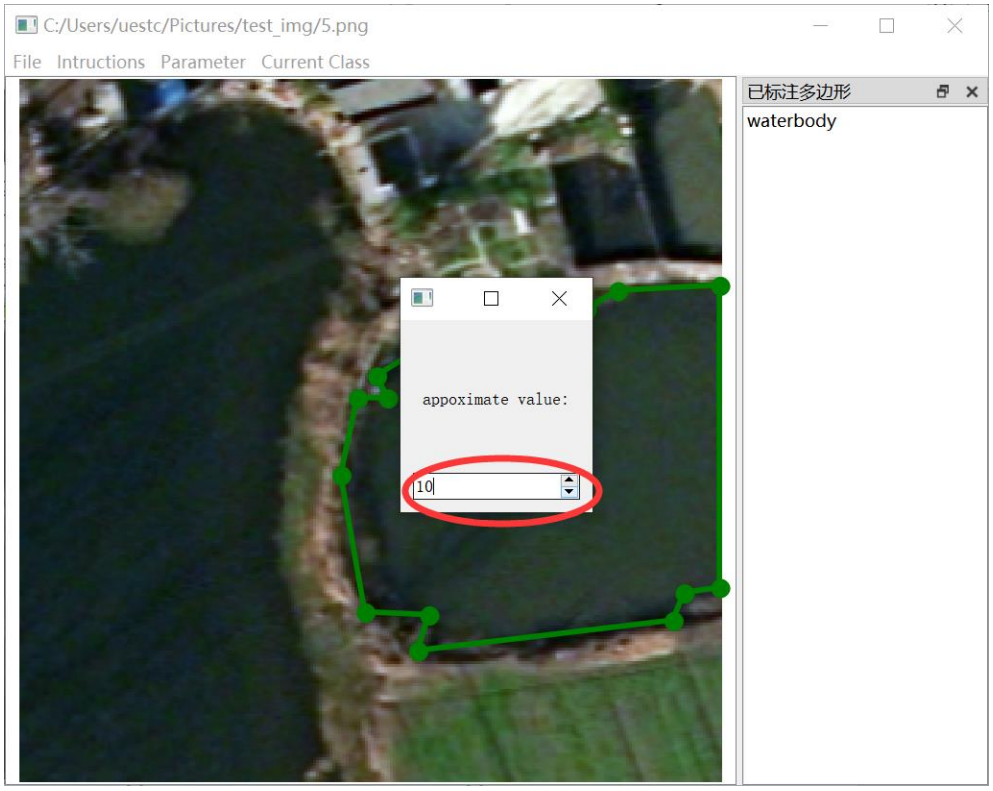
Click instruction->Magic Pen then click on the target in the image!



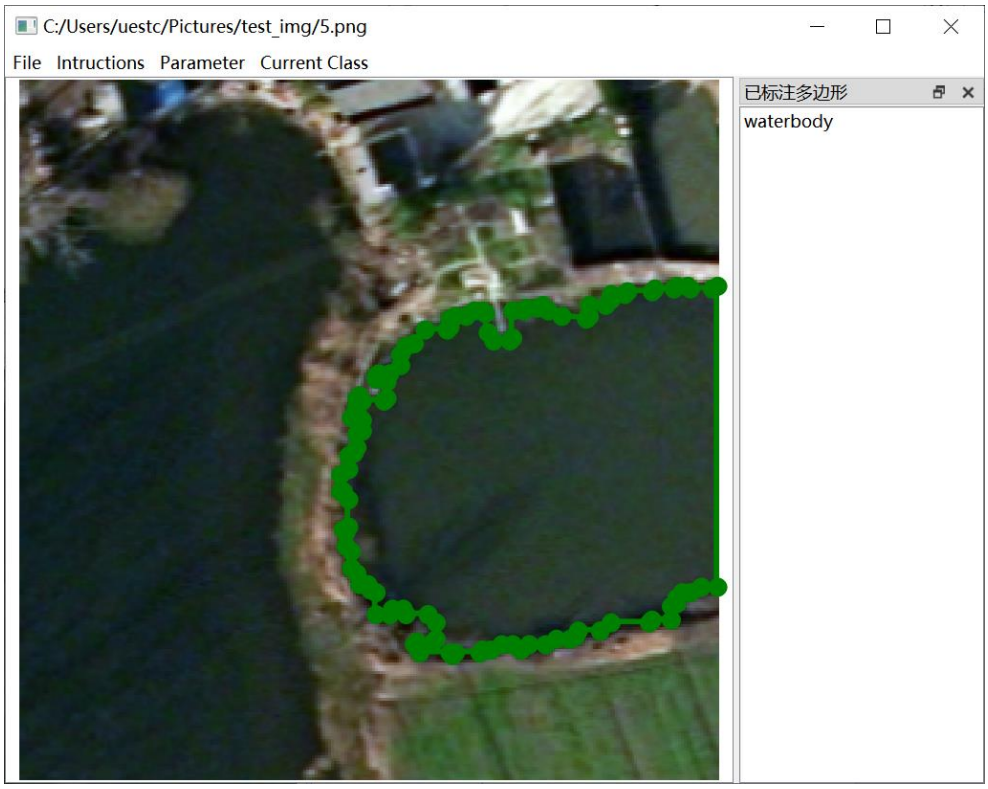
If you want a more high precision approximate polygon click Parameter->PolyApproximate



The higher value you type, the higher precision you will get. Maximum is 10, default value is 5.

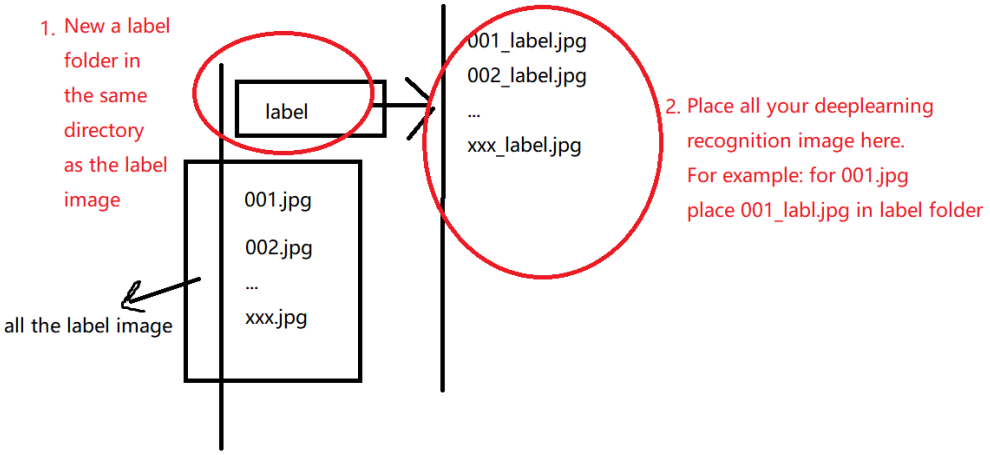


Let's try value 10, and we can see a higher precision polygon generated by magic pen.

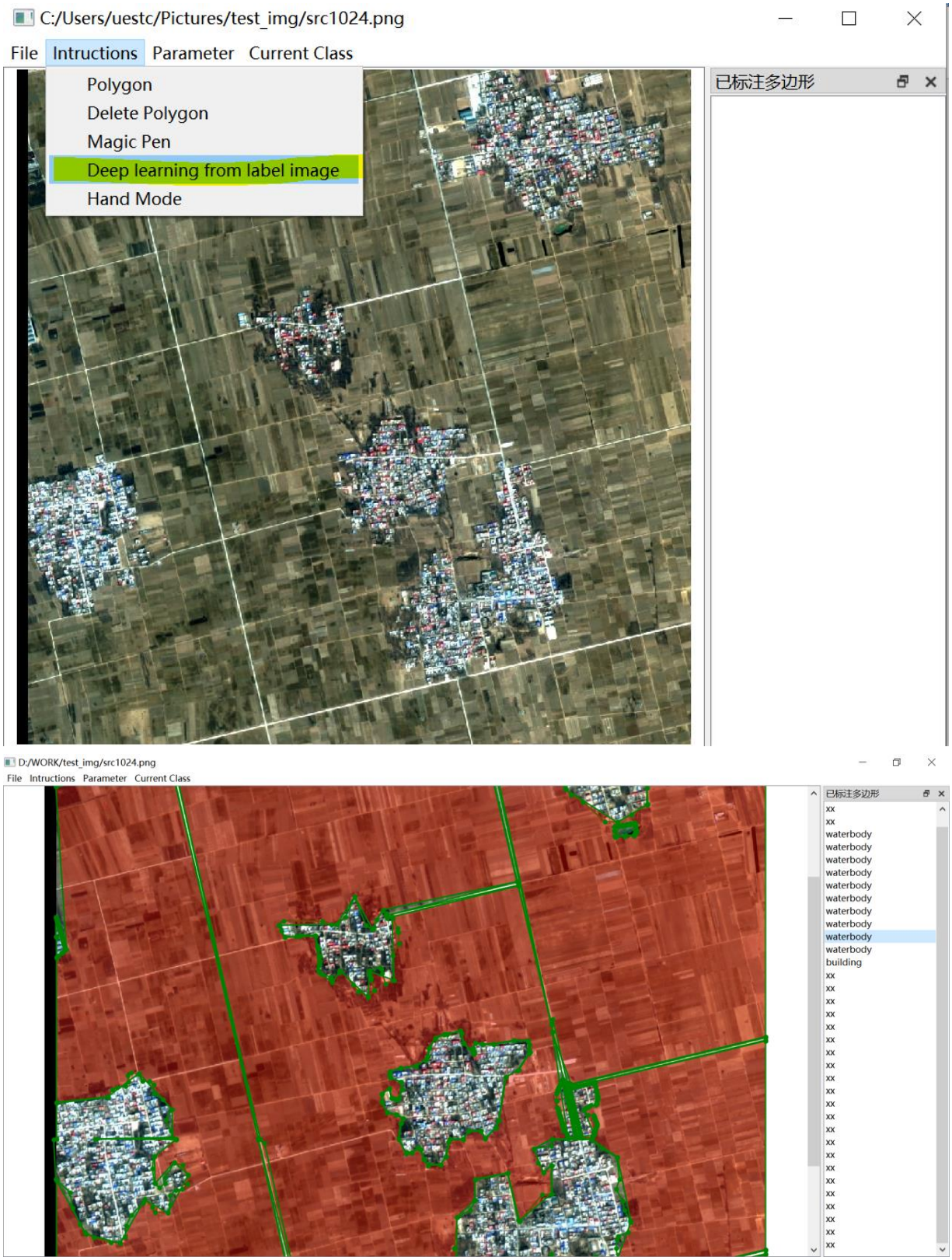


(4) cooperate with deep learning.

If you want to predict the image with deep learning first, then modify it, here it's!
Click Instructions->Deep learning from label image
Remember to place files like the image below.



In each deep learning recognition image, each pixel's value ranging from [0,**how many class you have**] where 0 means background. Let's try it!

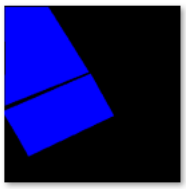


(5)Hand Mode

Hand Mode means you don't want to use any instructions.

(6) Save image

After you have drawn numerous polygons, remember to click save image. And it will generate a mask folder in the same directory as label image. In the mask folder, you can see two files. First is the mask image, it's named by 'original image name + '_mask' +'.tif' '
The second one is a test file, you'd better not to delete it, because it help you review polygons you draw.


0.5_mask.tif


0.5_mask.txt

How to work more efficiently?

Use **shortcut** in your keyboard!

Ctrl + '+': zoom in

Ctrl + '-': zoom out

Left arrow: previous image

Right arrow: next image

C: Chane to NIR, R, G instead of R, G, B to show image (if you want to use this function, make sure that your image is four channels and its order is R, G, B, NIR)