4、Line segment drawing

When using OpenCV to process images, we sometimes need to draw line segments, rectangles, etc. on the image. OpenCV uses the line(dst, pt1, pt2, color, thickness=None, lineType=None, shift=None) function to draw line segments.

Parameter Description:

l dst: output image.

l pt1, pt2: required parameters. The coordinate points of the line segment represent the starting point and the ending point respectively.

l color: required parameter. Used to set the color of line segments

l thickness: optional parameter. Used to set the width of the line segment

l lineType: optional parameter. Used to set the type of line segment, optional 8 (8 adjacent connecting lines - default), 4 (4 adjacent connecting lines) and cv2.LINE_AA is anti-aliasing

The code was run on jupyterlab

```
import cv2

import numpy as np

import matplotlib.pyplot as plt



newImageInfo = (600, 600, 3)

dst = np.zeros(newImageInfo,np.uint8)



# line

# Draw line segments 1 dst 2 begin 3 end 4 color

cv2.line(dst, (100,100), (450,300), (0,0,255))

# 5 line w

cv2.line(dst, (100,200), (400,200), (0,255,255), 10)

# 6 line type

cv2.line(dst, (100,300), (400,300), (0,255,0), 10, cv2.LINE_AA)


cv2.line(dst, (200,150), (50,250), (25,100,255))

cv2.line(dst, (50,250), (400,380), (25,100,255))
```

```
cv2.line(dst, (400,380), (200,150), (25,100,255))


# cv2.imshow('dst',dst)

#cv2.waitKey(0)

dst = cv2.cvtColor(dst, cv2.COLOR_BGR2RGB)

plt.imshow(dst)

     plt.show()
```