Using Processing's 2D drawing functions, create a self-portrait. Structure your code so that changing a size or position variable updates the entire portrait. Please be prepared to discuss how the algorithmic/coding process impacted the finished piece as compared to drawing, painting, or photographing a self-portrait.

**In regards to changing a size or position, the frame width and height changes with the original picture size**

void settings() {

img = loadImage("1.jpg");

int iWidth = img.width\*2;

int iHeight = img.height;

size(iWidth, iHeight);

}

**All shapes and lines formed change in regards to the original height and width of the picture and adapts to the original dimensions.**

 void keyPressed() {

if (key == CODED) {

**float x = img.width\*pow(1.1,p)/15;**

**float y = img.height\*pow(1.1,p)/30;**

stroke(1);

for(int i = 0; i < img.width; i += x){

for(int j = 0; j < img.height; j += y){

fill(int(random(255)),int(random(255)),int(random(255)));

**rect(i,j,x,y);**

}

}

if (keyCode == UP) { //size

p++;

} else if (keyCode == DOWN) {

p--;

} else if (keyCode == RIGHT) { //position

q+=10;

} else if (keyCode == LEFT) {

q-=10;

}

}

}

void draw() {

textFont(f,16);

fill(255);

text("Press: Left, Right, Up, or Down",0,16);

**float iWidth = img.width\*pow(1.1,p);**

**float iHeight = img.height\*pow(1.1,p);**

image(img, img.width, 0);

stroke(1);

fill(19,26,34); // black shoes

beginShape();

**curveVertex(0.333333333\*iWidth+q,0.864640884\*iHeight);**

**curveVertex(0.333333333\*iWidth+q,0.864640884\*iHeight);**