# EM&CP Blk  Wednesday, March 30, 2022

PA #7 b — due by 3 today

PA #3 PA #5

Chp 3 True/False

and or Truth Tables

## LOOP

definite loop

for <var> in <seq>: ~ determine the number of times pass thru loop body

<body>

Processing

definite loop

2, 4, 6, 8 . . 98, 100

```
for ( int i = 2; i <= 100; i = i + 2) {

}
```

While loop —— indefinite loop

unknow how many times executed

Syntax:

```
While <condition>:
    <body>
```

—— do something that eventually Changes condition to False

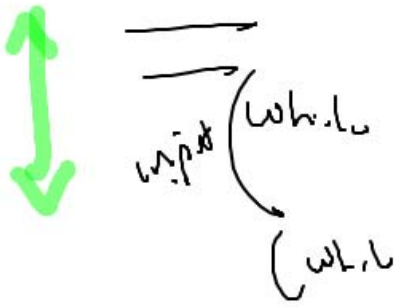
mean: $\bar{x} = \frac{1}{n}\sum x$

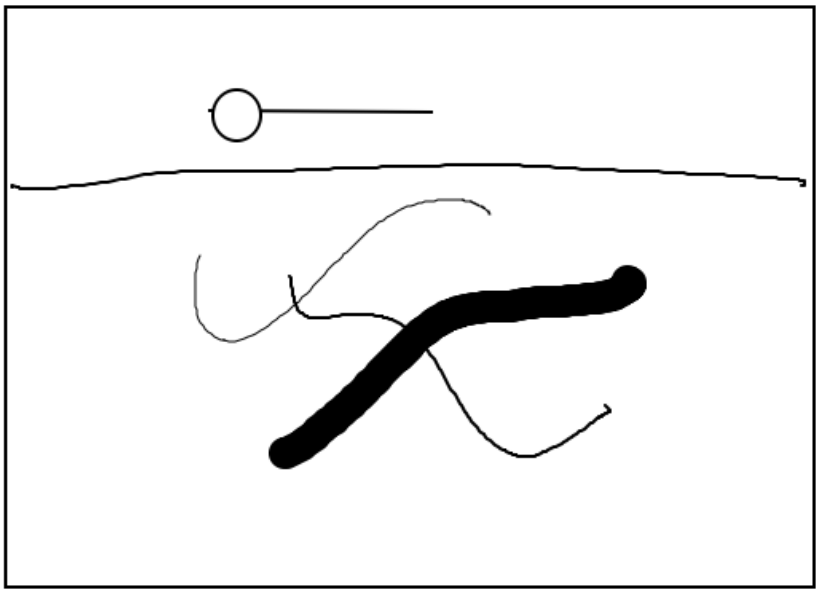
Total

mean

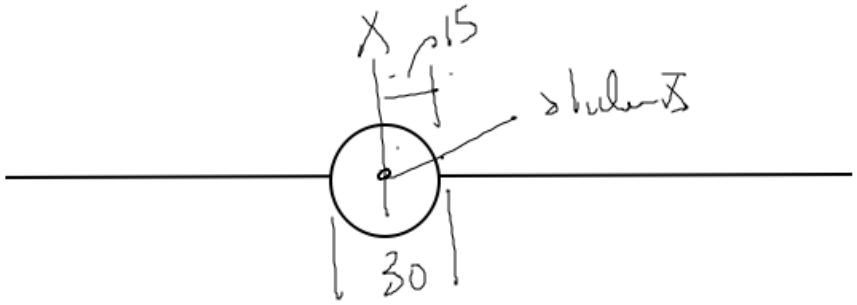
count

```
gameOver = False
while not gameOver:
```

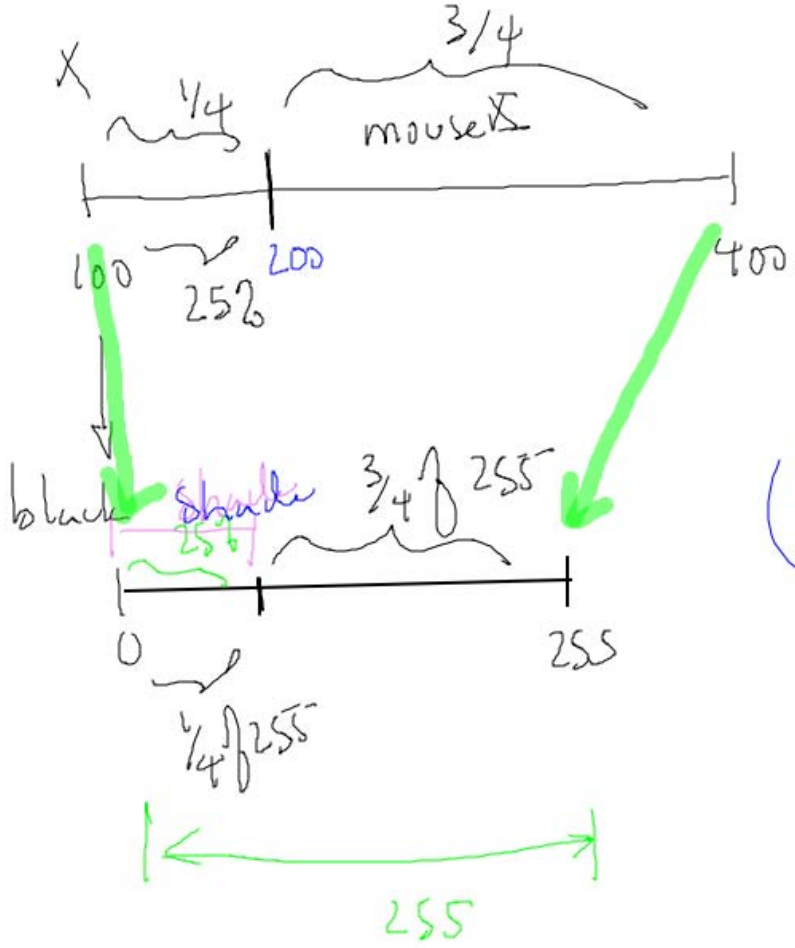




$slider_X - 15 \leq mouse_X \leq slider_X + 15$



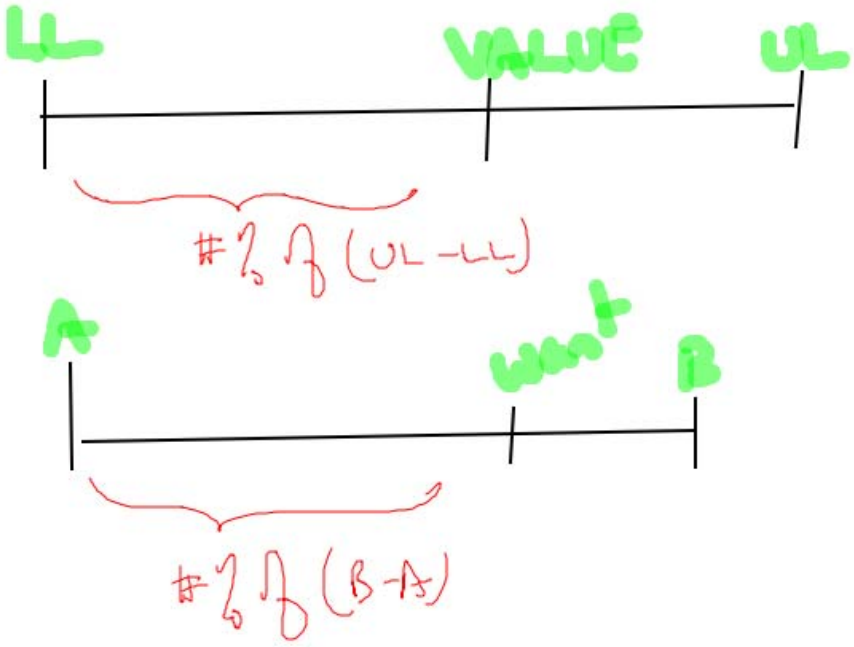
# Linear Interpolation

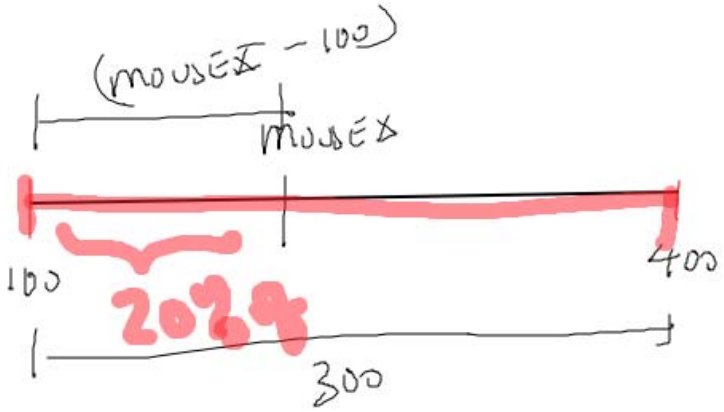



$$\left(\frac{shade}{255}\right) = \frac{\overbrace{mouseX - 100}^{100}}{300}$$

$$\frac{1}{3}$$

$$shade = \frac{1}{3}(255)$$


LL
VALUE
UL
#ℤ ∩ (UL − LL)
A
want
B
#ℤ ∩ (B − A)



$$\frac{shade}{255} = \frac{mouseX - 100}{300}$$

$$shade = 255 * \frac{(mouseX - 100)}{300}$$