Shape

- + x_pos = (float/int)
- + y_pos = (float/int)
- + x pos.getter = (float/int)
- x pos.setter = (float/int)
- + y_pos.getter = (float/int)
- y pos.setter = (float/int)

def translate = (float/int)

Circle

+ radius = (float/int)

- + radius.getter = (float/int)
- radius.setter = (float/int)

area = (float) return pi*radius**2 circumference = (float) return 2*pi*radius is_unit_circle = (True) return if circle radius = 1 is_inside = (bool) (calculate Euclidean distance)

Rectangle

+ height = (float/int)

+ length = (float/int)

- + height.getter = (float/int)
- height.setter = (float/int)
- + length.getter = (float/int)
- length.setter = (float/int)

area = (float/int) return height * length circumference = (float/int) (height*2) + (length*2) is_square = (True) if length==height return True

is_inside = if x_min<x_pos<x_max and y_min<y_pos<y_max return True