**PS1 Recursive Graphic**

This assignment was to implementing the Sierpinski triangle that based on the described at Princeton website. This assignment requires using sf::Drawable from SFML to draw the Sierpinski triangle.

Based on the template that provided by Professor Yelena, I changed some code and wrote new functions that to draw Sierpinski’s Triangle recursive. In the homework I have two difference codes. One is the Sierpinski’s triangle that is required by the instructor and other is original code with is draw squares by my idea. In sierpinski’s triangle, I draw three more triangles on its side and it will keep doing that base on the depth (how many time I want to do recursive). Same with Sierpinski, my original code draw a squares and then other four squares on each its side.

In the code, I used virtual draw function for normal draw windows function; it will draw any shape based on depth and as many as how many times I want.

By using this recursive function, I save more memory since I only need one object for it recursive. Also, this assignment took me 3 days to finish. This assignment helped me understand more about objects and recursive that create another objects. Not really easy to understand the objects but at least it gave me a different view in C++.

Sierpinski Output:

