Project Check-In 1

By November 20…

- Understanding K-means, the math behind it ✅
- An initial implementation of the K-means algorithm (just to get my feet wet) ✅
    - Implemented a working K-means algorithm in Kotlin from scratch
    - Logic for computing distances, assigning points, updating centroids, and finally detecting potential convergences
- Run algorithm with selected parameters ✅
    - Ran algorithm with randomly generated values with K=2
    - Created a *GeneratePoints.kt* file that creates gaussian cluster of points to visualize
- ❗ ***ClusterPlot***
    - I thought it would be worth my time to be able to visualize these points instead of outputting the results in the terminal
    - Created a *ClusterPlot.kt* file that visualizes these points from the algorithm
- Stretch Goal: Implement K++ initialization strategy ❌
    - Making the *ClusterPlot* visualization took a lot more time than I thought it would so I wasn't able to implement this strategy for today
    - Hope to have it implemented by December 8th!

By December 8…

I hope to satisfy all the goals I proposed in my project proposal and write appropriate DocStrings for my code.