# CS 211 Lab #9: Hash Tables

In this lab, we begin our exploration of hash tables trees by solving the following problems:

## constructConcordance()

This function builds a concordance (**sorted** word frequency distribution) from a supplied file. This function will be completed in lab as a class exercise.

## hasUniqueChars()

This function accepts a single string and outputs true when each character in the string only occurs once. For example, "for" would return true and "example" would not as the character 'e' is repeated twice. Note that this function should not be case sensitive; 'e' and 'E' should be treated as the same.

## isAnagram()

This function accepts two characters and outputs true when they are anagrams of each other. For example, "anagram" can be reworded into "nag a ram."

## mostCommonSubstring()

This function accepts a string and an integer that represents a fixed length. This function should then locate the most commonly occurring substring of the supplied length. For example, in the string "aabcdabc", the most commonly occurring substring of length 3 is "abc" as it occurs twice in the sequence.