## Palindromes

<u>Palindromes</u> are character sequences that read the same forward or backward (e.g. the strings "mom" or "radar" or "kayak" or "1234321"). You will write a program to determine whether a string is a <u>character-unit palindrome</u>.

**Note: Programming Project should be done primarily on your own.** However, it is appropriate to get some support from your professor, and even other students. Refer to the Syllabus for guidelines. Remember to use Piazza and post your partial code if you are stuck with a problem in your code.

## Requirements

- Your program will take a string input from the user, to be evaluated with the program.
- An optional bool flag, will tell your program to be case-sensitive for all input strings. The default condition (i.e. if the flag is FALSE) is to ignore case-sensitivity. So, for example, "Mom" should evaluate as a palindrome if the flag is set to false, but should evaluate as NOT a palindrome if flag is set to TRUE.
- You must allow the program to be played repeatedly without ending the program between palindrome check.
- Typing 'y' or 'Y' or "Yes" causes program to run again. Anything else exits the program with output "Thanks for playing!"
- Follow formatting as demonstrated in the "Sample Output" below.
- 5 Bonus Points: Support strings with spaces such as "123 454 321"
- Make sure you have your name and Bronco ID in the header comment
  - /\* Name: Jane-Joe
  - \* Bronco ID: 12345678
  - \* Sources of Help: Jon Doe helped me with.....
  - \*/

## **Example Output**

```
Enter the string to evaluate for palindrome: Kayak
Kayak is a palindrome
Do you want to try again (Y or N)? Y
Enter the string to evaluate for palindrome: evil
evil is not a palindrome
Do you want to try again (Y or N)? N
Thanks for playing!
```

Due: Submit your .cpp file to Blackboard. November 02, 2016 by 4.00 PM

## Total Points = 100 + 5 Bonus Points

- Correctness/Robustness: 60 points
- Code complies to requirements: 20 points
- Good coding style: 20 points