

COSC1415 – Headline Generator Program

You own a tabloid newspaper that has a large reading audience. You've hired a group of eager reporters, but they need ideas from you for creative front page stories. You decide to write a program to create headlines for your reporters who will then "fill in the facts". Each week you will run your program to create 10 new headlines.

Write a program which uses string arrays. There are 3 input files that you will use to fill in your arrays. **Headlines1.txt** holds phrases to be used as the subjects of your headlines (first part). **Headlines2.txt** holds phrases to be used as the actions of your headlines (second part). **Headlines3.txt** holds phrases to be used as third part of your headlines.

Write a function that will read phrases from a file and store them into an array until the end of file. You will call this function 3 times, once for each of the 3 input files. Each file contains a different number of phrases. No file will contain more than 50 phrases. There will be one phrase per line of the file. Since the extraction operator (>>) uses whitespace as separators, in order to read a phrase that includes blanks, you will need to use

`getline(infile, phrase);`

instead of

`infile >> phrase;`

(These code samples assume the declaration: **`string phrase;`**)

After your arrays are filled, you are now ready to generate your headlines. Do so by using the random number generator to choose an entry from each array for a headline. How can you be sure that the random number does not go beyond the last valid index?? (Remember the mod operator.) Call rand() three times for each headline – once for each of the three parts.

Seed the random number generator at the top of your program as you did for your craps program. If you set srand properly, each time you run your program you will get different headlines.

Have your program print 10 headlines to an output file. (Because some of the headlines are long, you may want to print the third part of the headline on a separate line.) Also print the name of your tabloid (be creative) and a motivational message to your reporters. Your output file should be well-formatted.

Turn in your source code and two different output files.