Jumping Checkers

Create a folder called “PG1” in the top level of your CS201-01-16F folder. Place all files pertaining to this assignment into the top level of your PG1 folder. Place a (possibly empty) file called “DONE” into this folder when you are ready to have your programs graded. The only files you need to turn in are the .cpp and the .h files. Please don't turn in any files other than these!!

Your program should do the following:

It should ask for the number of rows of the checkerboard and then ask for the number of columns of the checkerboard. These two numbers need not be the same.

Your program should ask for and read a number of lines of text equal to the number of rows of the checkerboard. Each line should contain a number of characters equal to the number of columns of the checkerboard. This information should be stored in a double array of char. (There is a way to do it involving an array of string. But I don't want you to do it that way!) The characters entered should be R for red, B for black, space for empty.

Then you should ask for a row and column number of a square on the checkerboard. Imagine that the upper left corner is row 0, column 0. Your program should print whether the checker at that square can make a legal jump, meaning it can jump diagonally over a checker of the other color into an empty square. Assume that all checkers on the board have been kinged and are allowed to jump in any of the four diagonal directions.

Real-life checkers is only played on the black squares, but in this program, checkers might be on any square.

Your program should then terminate. Do not ask for another space or another checkerboard or anything like that.

Example:

How many rows does your checkerboard have? 3
How many columns does your checkerboard have? 5

Enter your checkerboard below:

R R R
Enter row to be checked: 0
Enter column to be checked: 2

The checker at this square can make a valid jump.

Your program should be broken up into appropriate methods and commented adequately.