Homework 1

Peter Dobbs

005803169

15 January 2015

Problem 1

Requirements

This question requires the program to display a box that contains the student’s name.

Design

The program can be based on the use of multiple print lines. I began by implementing a public class within my new java program. Under that public class I applied the method: public static void main (String[] args). For my statements, the System.out.println(); statement allowed me to create the box with my name in it.

Iterative development steps

1. I began by creating a print line that displays the top side of the box.
2. Then came the first print line that displays the sides.
3. Following that was the print line displaying the sides and my name.
4. After that came the second line that displays the sides.
5. The final print line, identical to the first, displays the bottom of the box.

### Tests

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Description of test | input | expected result | actual result | cause |
| Run the code | written code | box with my name | box with my name | good code |

Problem 3

Requirements

This question requires the program to display a sequence of characters.

Design

This display can be achieved through the use of an escape sequence. I began by implementing a public class within my new java program. Under that public class I applied the method: public static void main (String[] args). The System.out.println(); statement allowed me to display the sequence of characters. The use of the backslash in the escape sequence enables the following character to be displayed as as an ordinary character instead of the possibility of a special character.

Iterative development steps

1. I began by reading about escape sequencing from the first lab procedure of our book.
2. Following that, I implemented the concept that I learned into my code, resulting in the proper sequence of characters.

Tests

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Description of test | input | expected result | actual result | cause |
| Run the code | written code | proper sequence of characters | proper sequence of characters | good code |

Problem 7

Requirements

This question requires the program to display the result of the toUpperCase(); command.

Design

This goal can be achieved through creating references and objects to make abbreviations for what needs to be capitalized. Then the references can be used to capitalize the objects using the toUpperCase(); command. Then the work can be displayed using the System.out.println(); command.

Iterative development steps

1. I began by designating the references within the code.
2. Then I created objects that were to be capitalized
3. Following that I created objects that represent the capitalization of the original objects

Tests

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Description of test | input | expected result | actual result | cause |
| Run the code | written code | capitalization of objects | capitalization of objects | good code |