



CSE 215L: Programming language II Lab
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Lab - 03 [Control Statements]
Fall-2022
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Objective:

- To learn to use Conditional Statements
- To learn about different types of loops (for, while)
- To learn about two keywords such as break, continue, and their usages

<i>if-else</i>	<i>switch</i>
<pre>If (condition) { // do something } else { // do something else }</pre>	<pre>switch (case) { case 1: // do things for case 1 break; case 2: // do things for case 2 break; default: // do things for default case }</pre>
<i>for</i>	<i>while</i>
<pre>for(int i = 0; i < 10; i++){ // do something }</pre>	<pre>while(condition){ // do something }</pre>

Tasks:

1. Write a program that takes an integer and determines if it's odd or even. Use switch cases to produce results.
 2. Write a program that takes an integer and determines if it's prime or not. A number is prime if it is divisible by 1 and itself only, i.e., 2, 3, 11, 37, etc.
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3. Write a program using for loop which prints the summation of the following series:

$$\frac{1}{1^2} - \frac{1}{2^2} + \frac{1}{3^2} - \frac{1}{4^2} + \dots + \frac{1}{n^2}$$

where the integer n will be input to your program.

Sample Input / Output

Enter n: 5
Sum: 0.84

4. Write a Java code that will print a pyramid of numbers like below. The number of rows N in the pyramid will be input into your program. Assume $N \leq 9$.

Sample Input/Output:

Enter N: 7

1
12
123
1234
12345
123456
1234567