Nested if

Basic Syntax of Nested if-else

The nesting of if-else depends on the situation but a general syntax can be defined as:

```
if(condition1) {
    if(condition2) {
        // Statement 1
    }
    else {
        // Statement 2
    }
}
else {
    if(condition3) {
        // Statement 3
    }
    else {
        // Statement 4
    }
}
```

```
#include <iostream>
using namespace std;

int main() {
        int n = 6;

        // Outer if statement
        if (n % 2 == 0) {

        // Inner if statement
        if (n % 3 == 0) {
        cout << "Divisible by 2 and 3";
    }
        else {
        cout << "Divisible by 2 but not 3";
    }
        }
        else {
        cout << "Not Divisible by 2";
  }

  return 0;
}
```

.....

switch

Syntax:

```
switch (n)
{
    case 1: // code to be executed if n = 1;
  break;
    case 2: // code to be executed if n = 2;
  break;
    default: // code to be executed if
      // n doesn't match any cases
}
```

Nested-Switch Statement: Nested-Switch statements refers to Switch statements inside of another Switch Statements. **Syntax:**

```
#include <iostream>
using namespace std;

int main()
{
   int x = 1, y = 2;

   // Outer Switch
   switch (x) {

   // If x == 1
   case 1:

      // Nested Switch

      switch (y) {

      // If y == 2
      case 2:
         cout << "Choice is 2";
         break;

      // If y == 3
      case 3:
```

```
            cout << "Choice is 3";
            break;
        }
        break;

    // If x == 4
    case 4:
        cout << "Choice is 4";
        break;

    // If x == 5
    case 5:
        cout << "Choice is 5";
        break;

    default:
        cout << "Choice is other than 1, 2 3, 4, or 5";

    }
    return 0;
}
```