

3. What is the output of the program below?


```

1 #include <iostream>
2 using namespace std;
3
4 int main() {
5     int i = 5, j = 6, k = 7, n = 3;
6     cout << i + j * k - k * n << endl;
7     cout << i / n << endl;
8     return 0;
9 }
10

```

```

Process exited after 0.1085 seconds with return value 0
Press any key to continue . . .

```

6. What is the output when the following code fragment is executed?

```

1 #include <iostream>
2 using namespace std;
3
4 int main() {
5     int found = 0, count = 5;
6     if (!found || --count == 0)
7         cout << "danger" << endl;
8     cout << "count = " << count << endl;
9     return 0;
10 }
11

```

```

- Errors: 0
- Warnings: 0
- Output Filename: E:\C++ Programs\assignment day 1\6.exe
- Output Size: 1.83212089538574 MiB
- Compilation Time: 0.88s

```

```

#include <iostream>
using namespace std;

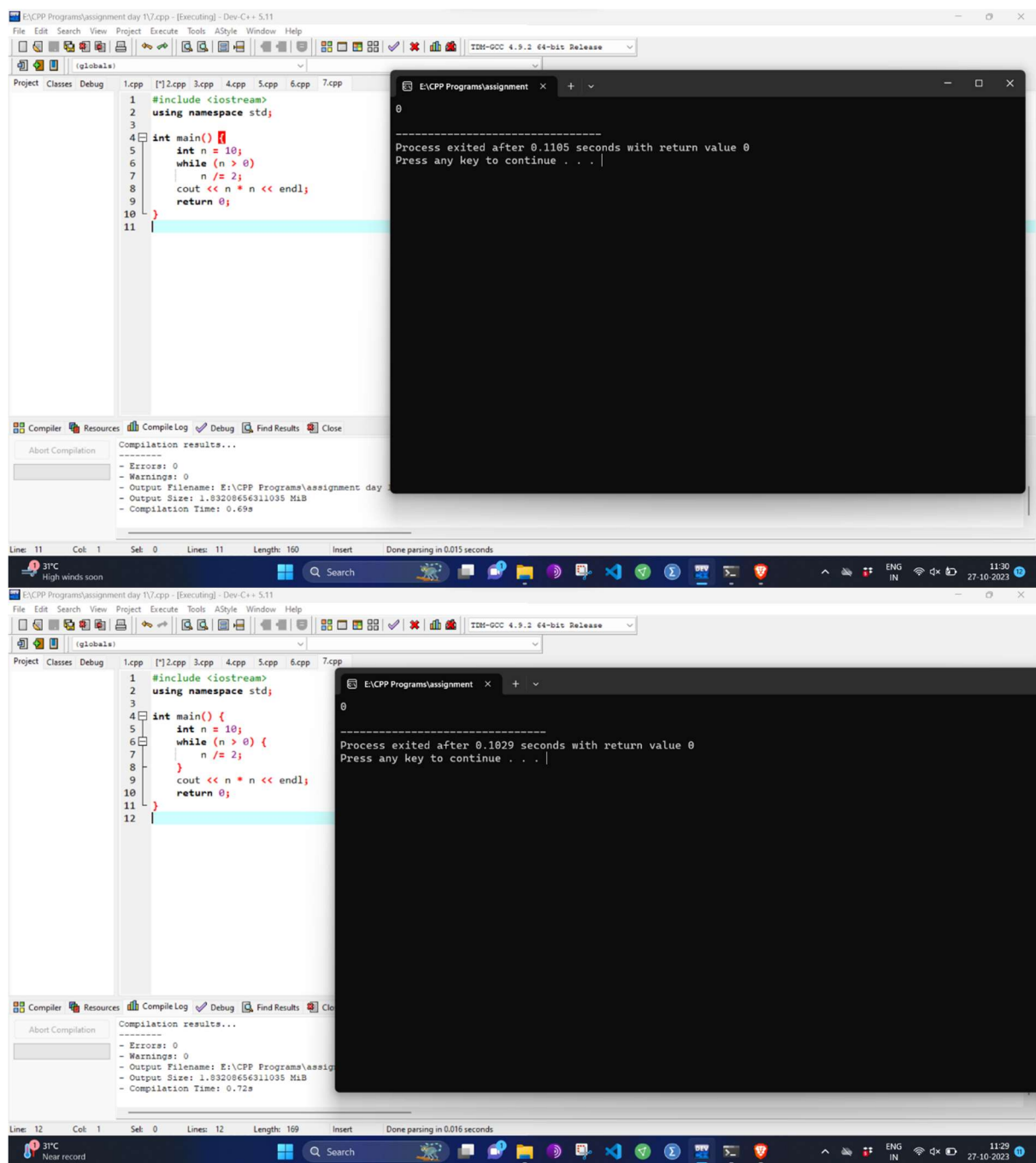
int main() {
    int found = 0, count = 5;
    if (!found || --count == 0)
        cout << "danger" << endl;
    cout << "count = " << count << endl;
    return 0;
}

```

7. The loop shown below has been written by an inexperienced C++ programmer. The behavior of the loop is not correctly represented by the formatting.

- What is the output of the loop as it is written?
- Correct the syntax of the loop so that the logic of the corrected loop corresponds to the formatting of the original loop. What is the output of the corrected loop?
- Correct the formatting of the (original) loop so that the new format reflects the logical behavior of the original loop.

a)



```

1 #include <iostream>
2 using namespace std;
3
4 int main() {
5     int n = 10;
6     while (n > 0) {
7         n /= 2;
8         cout << n * n << endl;
9     }
10 }
11

```

Process exited after 0.08774 seconds with return value 0
Press any key to continue . . .

Compilation results...

Errors: 0
Warnings: 0
Output Filename: E:\C++ Programs\assignment day 1\8.exe
Output Size: 1.83208656311035 MiB
Compilation Time: 0.59s

8. Remove all the unnecessary tests from the nested conditional statement below.

```

1 #include <iostream>
2 using namespace std;
3
4 int main() {
5     float income;
6
7     cout << "Enter your monthly income: ";
8     cin >> income;
9
10    if (income < 0.0) {
11        cout << "You are going farther into debt every month." << endl;
12    } else if (income >= 0.0 && income < 1200.00) {
13        cout << "You are living below the poverty line." << endl;
14    } else if (income >= 1200.00 && income < 2500.00) {
15        cout << "You are living in moderate comfort." << endl;
16    } else if (income >= 2500.00) {
17        cout << "You are well off." << endl;
18    }
19
20    return 0;
21 }
22

```

Enter your monthly income: 70000
You are well off.

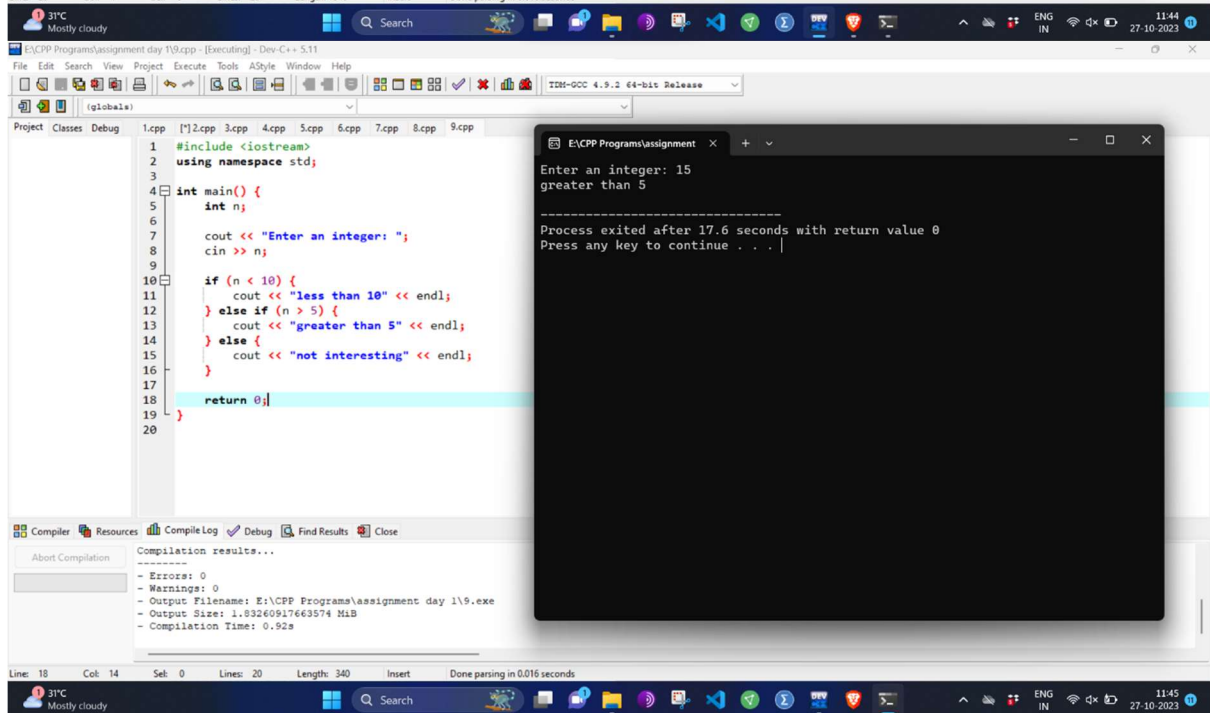
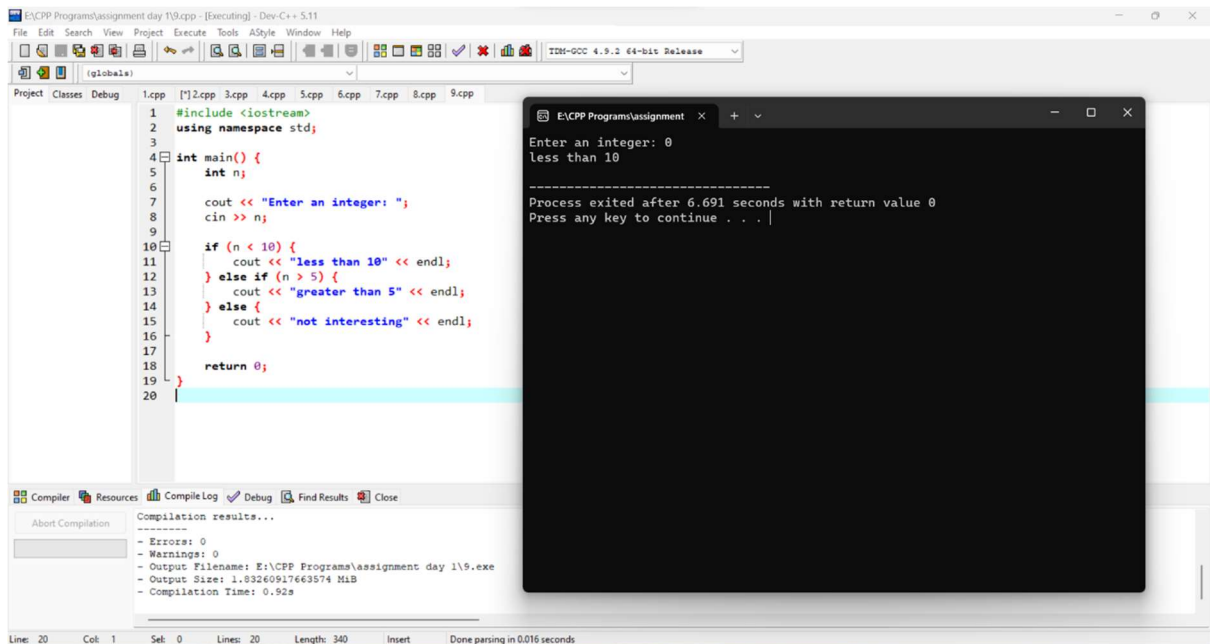
Process exited after 6.196 seconds with return value 0
Press any key to continue . . .

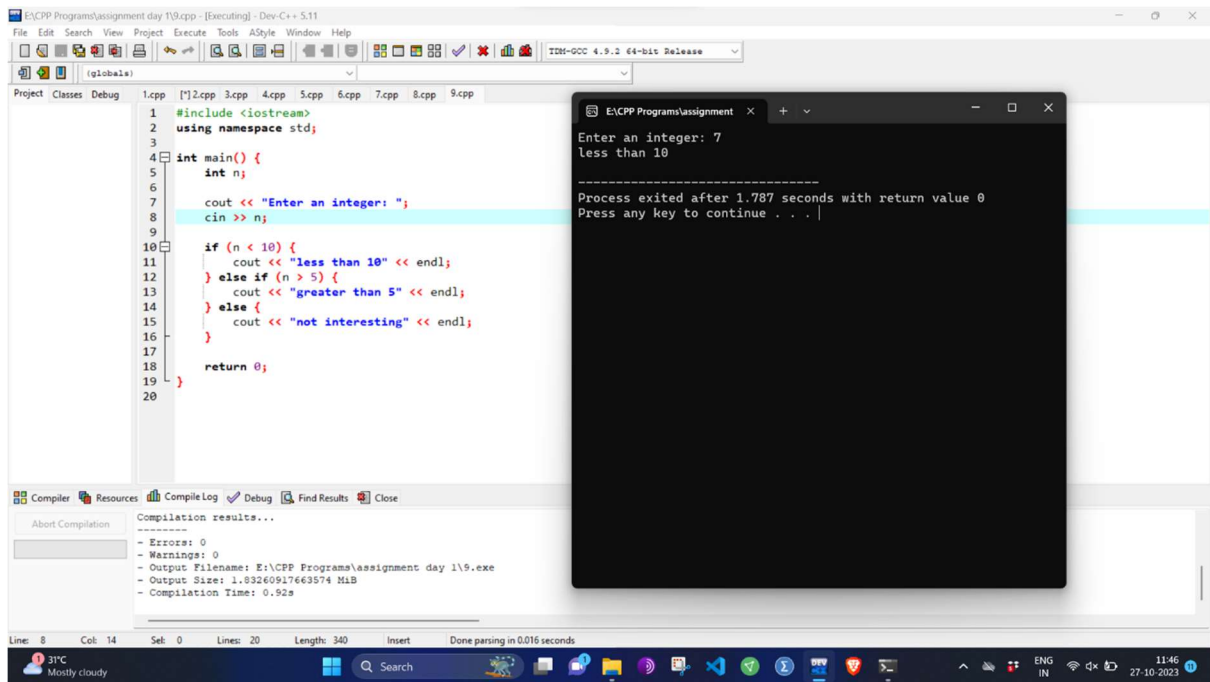
Compilation results...

Errors: 0
Warnings: 0
Output Filename: E:\C++ Programs\assignment day 1\8.exe
Output Size: 1.93260917663574 MiB
Compilation Time: 0.61s

9. Answer the questions below concerning the following fragment of code.

- What will be the output of the fragment above if the interactive user enters the integer value 0 ?
- What will be the output of the fragment above if the interactive user enters the integer value 15 ?
- What will be the output of the fragment above if the interactive user enters the integer value 7 ?
- What values for n will cause the output of the fragment above to be "not interesting"?





10. Rewrite the following code fragment so that it uses a "do...while..." loop to accomplish the same task.

