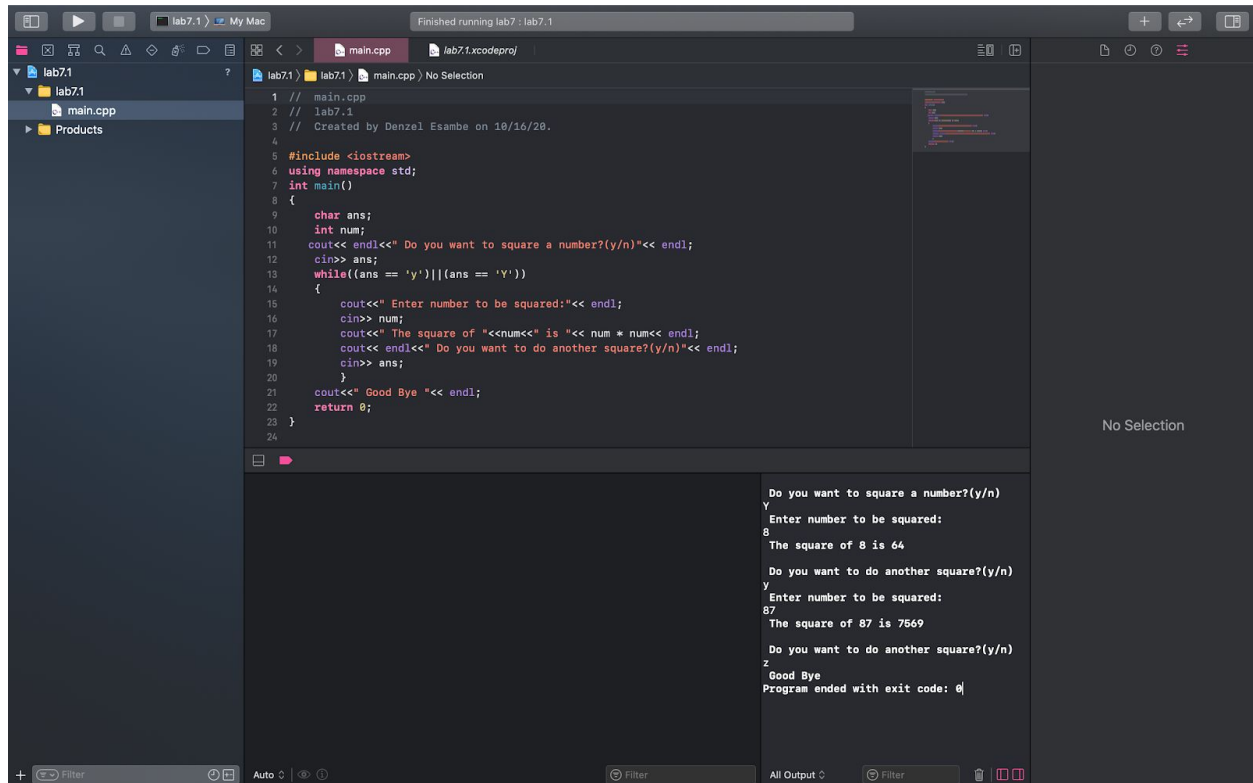


Lab 7

Denzel Esambe

Lab 7.1

3. If i put z it ends the code because the loop works only works if you put a lower case y or a uppercase y
4. The code won't run because the comment stops the code you put there gives error message
5. The code worked but only asked what number to be squared. It doesn't ask if you want to square another number because it is a comment



The screenshot shows a C++ IDE with the following components:

- Left Panel (File Explorer):** Shows the project structure with 'lab7.1' containing 'main.cpp'.
- Center Panel (Source Code):** Displays the code for 'main.cpp'. The code includes `<iostream>`, uses the `std` namespace, and defines a `main` function. It prompts the user to enter a number and asks if they want to square another number. A comment at the end says 'Good Bye'.
- Right Panel (Output):** Shows the program's execution. It displays the prompts and user inputs (Y, 8, Y, 87, Z) and the corresponding outputs (The square of 8 is 64, The square of 87 is 7569, Good Bye). It also shows the exit code: 0.

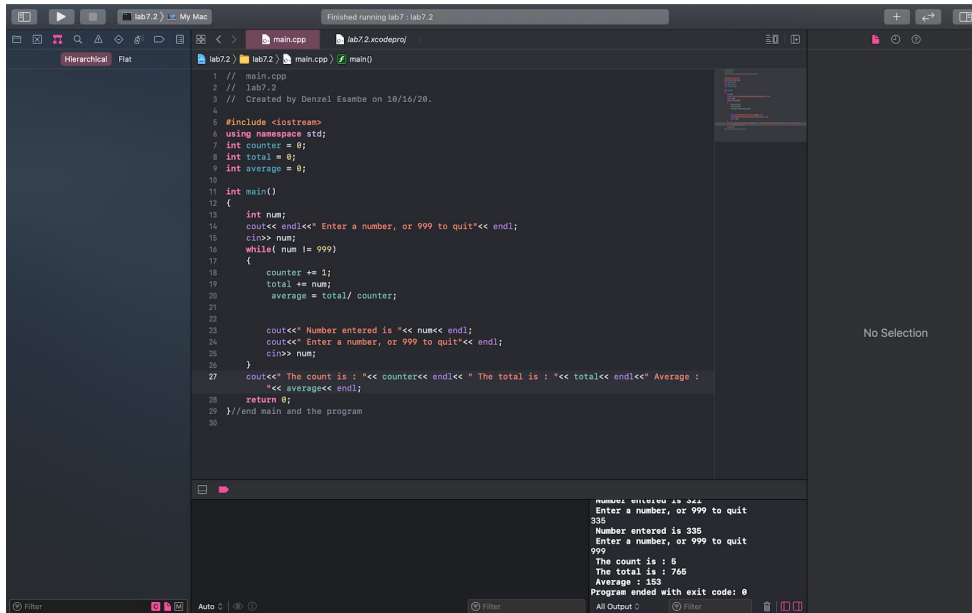
```
1 // main.cpp
2 // lab7.1
3 // Created by Denzel Esambe on 10/16/20.
4
5 #include <iostream>
6 using namespace std;
7 int main()
8 {
9     char ans;
10    int num;
11    cout<< endl<< "Do you want to square a number?(y/n)"<< endl;
12    cin>> ans;
13    while((ans == 'y') || (ans == 'Y'))
14    {
15        cout<< "Enter number to be squared:"<< endl;
16        cin>> num;
17        cout<< "The square of "<<num<< " is "<< num * num<< endl;
18        cout<< endl<< "Do you want to do another square?(y/n)"<< endl;
19        cin>> ans;
20    }
21    cout<< "Good Bye "<< endl;
22    return 0;
23 }
```

Do you want to square a number?(y/n)
Y
Enter number to be squared:
8
The square of 8 is 64
Do you want to do another square?(y/n)
Y
Enter number to be squared:
87
The square of 87 is 7569
Do you want to do another square?(y/n)
Z
Good Bye
Program ended with exit code: 0

Lab 7.2

Lab 7

Denzel Esambe

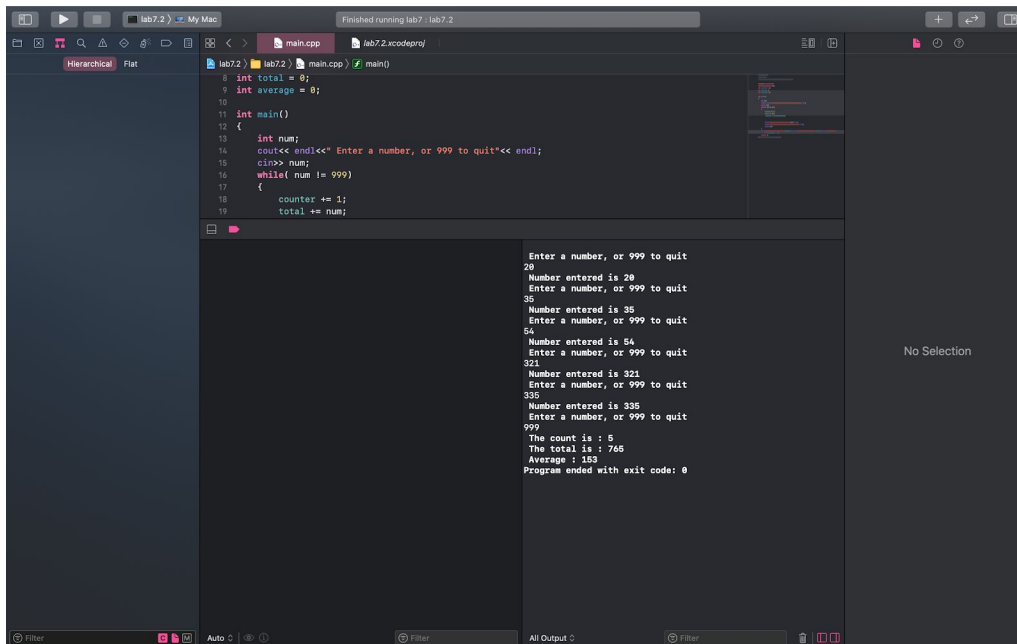


The screenshot shows an IDE with the file `lab7.2.cpp` open. The code is a C++ program that calculates the average of five numbers entered by the user. The output window shows the program's execution, including the prompts and the final results.

```
1 // main.cpp
2 // lab7.2
3 // Created by Denzel Esambe on 10/16/20.
4
5 #include <iostream>
6 using namespace std;
7 int counter = 0;
8 int total = 0;
9 int average = 0;
10
11 int main()
12 {
13     int num;
14     cout<<endl<<" Enter a number, or 999 to quit"<<endl;
15     cin>> num;
16     while( num != 999)
17     {
18         counter ++ 1;
19         total += num;
20         average = total/ counter;
21
22         cout<<" Number entered is "<< num<<endl;
23         cout<<" Enter a number, or 999 to quit"<<endl;
24         cin>> num;
25     }
26     cout<<" The count is : "<< counter<<endl<<" The total is : "<< total<<endl<<" Average : "<< average<<endl;
27     return 0;
28 } //end main and the program
```

Output:

```
Enter a number, or 999 to quit
335
Number entered is 335
Enter a number, or 999 to quit
999
The count is : 5
The total is : 765
Average : 153
Program ended with exit code: 0
```



The screenshot shows the same IDE as above, but with a different set of input values. The code is the same, but the output window shows the program's execution with different numbers entered by the user.

```
8 int total = 0;
9 int average = 0;
10
11 int main()
12 {
13     int num;
14     cout<<endl<<" Enter a number, or 999 to quit"<<endl;
15     cin>> num;
16     while( num != 999)
17     {
18         counter ++ 1;
19         total += num;
20
21         cout<<" Number entered is "<< num<<endl;
22         cout<<" Enter a number, or 999 to quit"<<endl;
23         cin>> num;
24     }
25     cout<<" The count is : "<< counter<<endl<<" The total is : "<< total<<endl<<" Average : "<< average<<endl;
26     return 0;
27 } //end main and the program
```

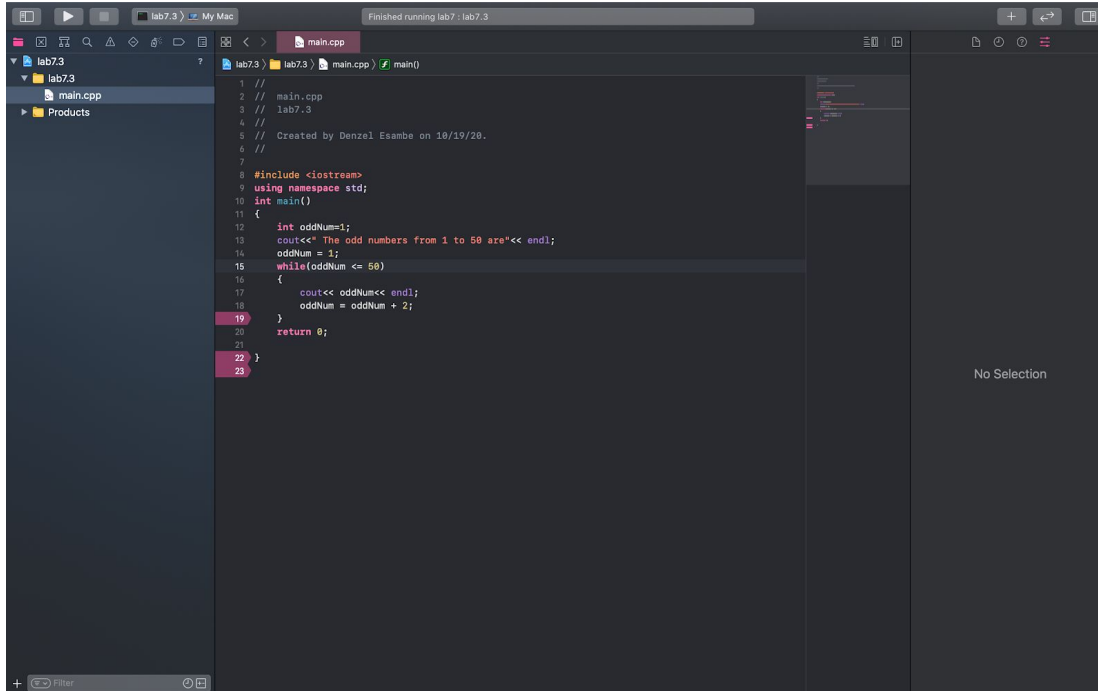
Output:

```
Enter a number, or 999 to quit
20
Number entered is 20
Enter a number, or 999 to quit
35
Number entered is 35
Enter a number, or 999 to quit
54
Number entered is 54
Enter a number, or 999 to quit
321
Number entered is 321
Enter a number, or 999 to quit
335
Number entered is 335
Enter a number, or 999 to quit
999
The count is : 5
The total is : 765
Average : 153
Program ended with exit code: 0
```

Lab 7.3

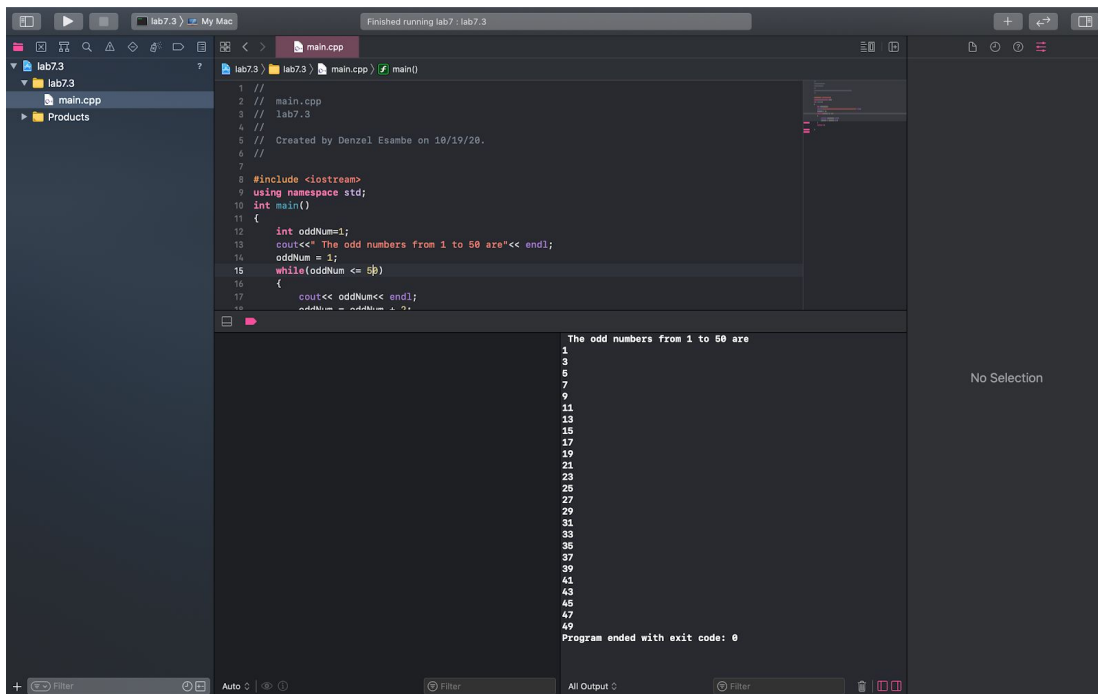
Lab 7

Denzel Esambe



```
1 //
2 // main.cpp
3 // lab7.3
4 //
5 // Created by Denzel Esambe on 10/19/20.
6 //
7
8 #include <iostream>
9 using namespace std;
10 int main()
11 {
12     int oddNum=1;
13     cout<<" The odd numbers from 1 to 50 are"<< endl;
14     oddNum = 1;
15     while(oddNum <= 50)
16     {
17         cout<< oddNum<< endl;
18         oddNum = oddNum + 2;
19     }
20     return 0;
21 }
22 }
23 }
```

No Selection



```
1 //
2 // main.cpp
3 // lab7.3
4 //
5 // Created by Denzel Esambe on 10/19/20.
6 //
7
8 #include <iostream>
9 using namespace std;
10 int main()
11 {
12     int oddNum=1;
13     cout<<" The odd numbers from 1 to 50 are"<< endl;
14     oddNum = 1;
15     while(oddNum <= 50)
16     {
17         cout<< oddNum<< endl;
18         oddNum = oddNum + 2;
19     }
20     return 0;
21 }
22 }
23 }
```

The odd numbers from 1 to 50 are

```
1
3
5
7
9
11
13
15
17
19
21
23
25
27
29
31
33
35
37
39
41
43
45
47
49
Program ended with exit code: 0
```

No Selection