```cpp
// Filename: Lab04.cpp
// Programmer: Duncan McFarlane
// Date: 01/30/2020
// Compiler: VS 2017
//  Purpose: Calculate water usage for
//           the allenton water department.
#include <iostream>


using namespace std;

int main() {

	const double COST_PER_THOUSAND_GALLONS = 7.0;
	const double MIN_COST = 16.67;

	double curNumGallons = 0.0;
	double prevNumGallons = 0.0;
	double totalGallons = 0.0;
	double totalcost = 0.0;

	cout << "\tWATER BILL CALCULATIONS\n";
	cout << "Enter the current meter reading: ";
	cin >> curNumGallons;
	cout << "Enter the previous meter reading: ";
	cin >> prevNumGallons;
	totalGallons = curNumGallons - prevNumGallons;


	if ((totalGallons * COST_PER_THOUSAND_GALLONS) < COST_PER_THOUSAND_GALLONS)
		totalcost = MIN_COST;
	else
		totalcost = totalGallons * COST_PER_THOUSAND_GALLONS / 1000.0;

	//Slice anything past hundreths because it it is a monitary value
	totalcost = static_cast<int>(totalcost * 100) / 100;


	cout << "Gallons used = " << totalGallons << " Total charge = $" << fixed <<
(totalcost);

	return 0;
}
```

```
        WATER BILL CALCULATIONS
Enter the current meter reading: 1000000
Enter the previous meter reading: 100
Gallons used = 999900 Total charge = $6999.300000
```