**Lab Tasks:**

1. **Write a C++ program that prompts the user to input three integer values and find the greatest value of the three values.**

| Solution |
| --- |
| Paste your code here:  #include <iostream>  using namespace std;  int main() {  float a, b, c;  cout << "Enter First Value ";  cin >> a;  cout << "Enter Second Value ";  cin >> b;  cout << "Enter Third Value ";  cin >> c;  if (a > b && a > c) {  cout << "Greatest Value= " << a;  }  else if (b > a && b > c) {  cout << "Greatest Value= " << b;  }  else if (c > a && c > b) {  cout << "Greatest Value= " << c;  }  return 0;  } |
| Output: |

1. **Write a C++ Program to make a Simple Calculator to Add, Subtract, Multiply or Divide Using switch...case.**

| Solution |
| --- |
| Paste your code here:  #include <iostream>  using namespace std;  int main() {  char op;  cout << "Emter Arithmetic Operator " << '\n';  cin >> op;  float value1, value2;  cout << "Enter First Value " << '\n';  cin >> value1;  cout << "Enter Second Value " << '\n';  cin >> value2;  switch (op) {  case '+':  cout << value1 << "+" << value2 << "=" << value1 + value2 << '\n';  break;  case '-':  cout << value1 << "-" << value2 << "=" << value1 - value2 << '\n';  break;  case'\*':  cout << value1 << "\*" << value2 << "=" << value1 \* value2 << '\n';  break;  case '/':  cout << value1 << "/" << value2 << "=" << value1 / value2 << '\n';  break;  default:  cout << "Invalid Value";  }  return 0;  } |
| Output: |

1. **Write a C++ program to check whether a given number is even or odd.**

| Solution |
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| Paste your code here:  #include <iostream>  using namespace std;  int main() {    int value;  cout << "Enter The Value " << '\n';  cin >> value;  if (value % 2 == 0) //If the number is completely divisible of 2  cout << "The Number is Even" << '\n';  else  cout << "The Number is Odd " << '\n';  return 0;  } |
| Output: |

1. **Write a C++ program to check whether an alphabet entered by user is a vowel or a consonant; using if else statement.**

| Solution |
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| Paste your code here:  #include <iostream>  using namespace std;  int main() {  char letter;  cout << "Enter Alphabet " << '\n';  cin >> letter;  if (letter == 'a' || letter == 'e' || letter == 'i' || letter == 'o' || letter == 'u'  || letter == 'A' || letter == 'E' || letter == 'I' || letter == 'O' || letter == 'U')  cout << "The Alphabet is Vowel " << '\n';  else  cout << "The Alphabet is Consonant " << '\n';  return 0;  } |
| Output: |

1. **Write a program for checking if the character entered by the user is a lower case letter or an upper case letter. Once identified, your program should convert it into the corresponding letter in other category (i.e. ‘e’ should be converted to ‘E’ and vice versa).**

| Solution |
| --- |
| Paste your code here:  #include <iostream>  using namespace std;  int main() {  char ch;  cout << " Enter Alphabet " << '\n';  cin >> ch;  if (ch >= 'a' && ch <= 'z')  {  ch = ch - 32;  cout << "Converted Alphabet = " << ch << '\n';  }  else if (ch >= 'A' && ch <= 'Z')  {  ch = ch + 32;  cout << "Converted Alphabet = " << ch << '\n';  }  else  {  cout << "Invalid Alphabet ";  }  return 0;  } |
| Output: |

**Home Tasks:**

1. **Write a C++ program that determines a student’s grade**

| Solution |
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| Paste your code here: |
| Output: |

1. **Write a C++ program to find all roots of a quadratic equation**

| Solution |
| --- |
| Paste your code here: |
| Output: |

1. **Write a code in C++ to enter P, T, R and calculate Simple Interest.**

| Solution |
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| Paste your code here: |
| Output: |

1. **Write a C++ Program to Check Leap Year.**

| Solution |
| --- |
| Paste your code here: |
| Output: |

1. **Write a C++ program to print total number of days in a month using switch case.**

| Solution |
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| Paste your code here: |
| Output: |