CHAROTAR UNIVERSITY OF SCIENCE & TECHNOLOGY

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DEVANG PATEL INSTITUTE OF ADVANCE TECHNOLOGY & RESEARCH

Department of Computer Engineering

Subject Name: Object Oriented Programming with C++ Semester:

II

Subject Code: CE144 Academic year: 2023-24

| , | Aim of the Practical | | |
|---|--------------------------------|--|--|
| | PROGRAM CODE : | | |
| | Req1 | Convert employee experience to float value | |
| | Inputs | Take employee experience (no of year and no of months) | |
| | Output | Enter employee experience in years and months Years :11 Months :8 Employee experience is :11.67 | |
| | | Enter employee experience in years and months Years :12 Months :6 Employee experience is :12.50 | |
| | #include <iostream></iostream> | | |
| | using namesp | ace std; | |
| | class EmployeeExperience | | |
| | { private: | | |
| | float totalExperience; | | |
| | public: | | |
| | // Default c | onstructor | |

```
EmployeeExperience(): totalExperience(0.0f) {}
  // Parameterized constructor
  EmployeeExperience(int years, int months) {
    totalExperience = years + months / 12.0f;
  }
  void display() {
    cout << "Employee experience is " << totalExperience << " years" << endl;
};
int main() {
  int years, months;
  cout << "Enter employee experience in years: ";</pre>
  cin >> years;
  cout << "Enter employee experience in months: ";
  cin >> months;
  EmployeeExperience empExp(years, months);
  empExp.display();
  return 0;
OUTPUT:
Enter employee experience in years: 5
Enter employee experience in months: 2
Employee experience is: 5.16667
                               execution time : 6.196 s
Process returned 0 (0x0)
Press any key to continue.
```

CONCLUSION:

In this C++ program, I've demonstrated how to utilize a class to encapsulate the functionality for calculating an employee's experience in terms of years and months. The EmployeeExperience class contains private member variables for storing the years and months of experience, a constructor to initialize these variables, and a method calculateExperience() to compute the total experience in float value by converting months into a fractional part of a year.

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By encapsulating this functionality within a class, the code becomes more organized, modular, and easier to understand. It adheres to the principles of object-oriented programming (OOP) by encapsulating related data and functionality within a single entity.