Experiment 6

ALGORITHM

Step 1: Start

Step 2: create the class of allarea type with private variable ar1, ar2, ar3.

Step 3: Declare and define functions “area” for calculating area of circle, rectangular and triangle.

Step 4: declare and define display function.

Step 5: declare the variables and call the allarea of type of class.

Step 6: take the input from user.

Step 7: stop

Code:-

```
//exp6
#include<iostream>
using namespace std;
const float pi=3.14;
class allarea{                                  //declare the class of type allarea
   private:float ar1,ar2,ar3;                   //declare variables to find the area
   public:
      float area(float n,float b,float h)       //function to calculate area
      {
         ar1=n*b*h;
```

```
        }
        float area(float r)
        {
           ar2=pi*r*r;
        }
        float area(float lr,float br)
        {
           ar3=lr*br;
        }
       void display()                                    //display the output
       {
          cout<<"\nArea of traingle:"<<ar1<<endl;
          cout<<"\nArea of circle:"<<ar2<<endl;
          cout<<"\nArea of rectangle:"<<ar3<<endl;
       }
};

int main()
{
   float b,h,r,lr,br;
   allarea a;                              //define the class and compute area..
   cout<<"\nenter the base & height of traingle:\n";
   cin>>b>>h;
   a.area(0.5,b,h);

    cout<<"\nenter radius of circle:\n";
```

```
    cin>>r;
    a.area(r);

     cout<<"\nenter the length and breath of rectangle:\n";
    cin>>lr>>br;
    a.area(lr,br);

    a.display();
    return 0;
}
```

Output:-