Program-20

Design a class Perfect to check if a given number is a perfect number or not.   
[A number is said to be perfect if sum of the factors of the number excluding itself is equal to the original number]  
  
Example: 6 = 1 + 2 + 3 (where 1, 2 and 3 are factors of 6, excluding itself)  
  
Some of the members of the class are given below:  
  
Class name: Perfect  
  
Data members/instance variables:  
num: to store the number  
  
Methods/Member functions:  
Perfect (int nn): parameterized constructor to initialize the data member num=nn  
int sum\_of\_factors(int i): returns the sum of the factors of the number(num), excluding itself, using a recursive technique  
void check(): checks whether the given number is perfect by invoking the function sum\_of\_factors() and displays the result with an appropriate message  
  
Specify the class Perfect giving details of the constructor(), int sum\_of\_factors(int) and void check().   
Define a main() function to create an object and call the functions accordingly to enable the task.