#include <iostream>

#include "time.h"

using namespace std;

int fibo(int n) {

if (n == 1 || n == 2) {

return 1;

}

return fibo(n - 1) + fibo(n - 2);

}

int iFibo(int n) {

int m = 1, k = 1, f = 1;

for (int i = 3; i <= n; i++) {

f = k + m;

m = k;

k = f;

}

return f;

}

int main()

{

srand(time(0));

int n;

cin >> n;

int cStart = clock();

cout << fibo(n) << endl;

int cFin = clock();

double result = (double)(cFin - cStart) / 1000;

cout << "Time1 = " << result << "s" << endl;

cStart = clock();

cout << iFibo(n) << endl;

cFin = clock();

result = (double)(cFin - cStart) / 1000;

cout << "Time2 = " << result << "s" << endl;

system("pause");

return 0;

}