```
import java.util.Scanner;
public class DynamicProgramming {
     public static void main(String[] args) {
           Scanner <u>s</u>=new Scanner(System.in);
           int n=s.nextInt(),t,inc=0,exc=0;
           int[] num=new int[n];
           for(int i=0;i<n;i++)</pre>
           {
                 num[i]=s.nextInt();
                 if(i==0)
                 {
                       inc=num[i];
                       exc=0;
                 }
                 else
                 {
                       t=inc;
                       inc=Math.max(inc, exc+num[i]);
                       exc=t;
                 }
           System.out.println(inc);
     }
}
```