3)c program to solve a system of linear congruences by applying the Chinese Remainder Theorem

#include<stdio.h>

int findMinX(int num[], int rem[], int k)

{

int x = 1;

while (1)

{

Int j;

for (j=0; j<k; j++ )

if (x%num[j] != rem[j])

break;

if (j == k)

return x;

x++;

}

return x;

}

int main(void)

{

int num[100];

int rem[100];

int k;

printf("Enter k value\n");

scanf("%d",&k);

printf("enter numbers\n");

for(int i=0;i<k;i++)

scanf("%d",&num[i]);

printf("enter remainders\n");

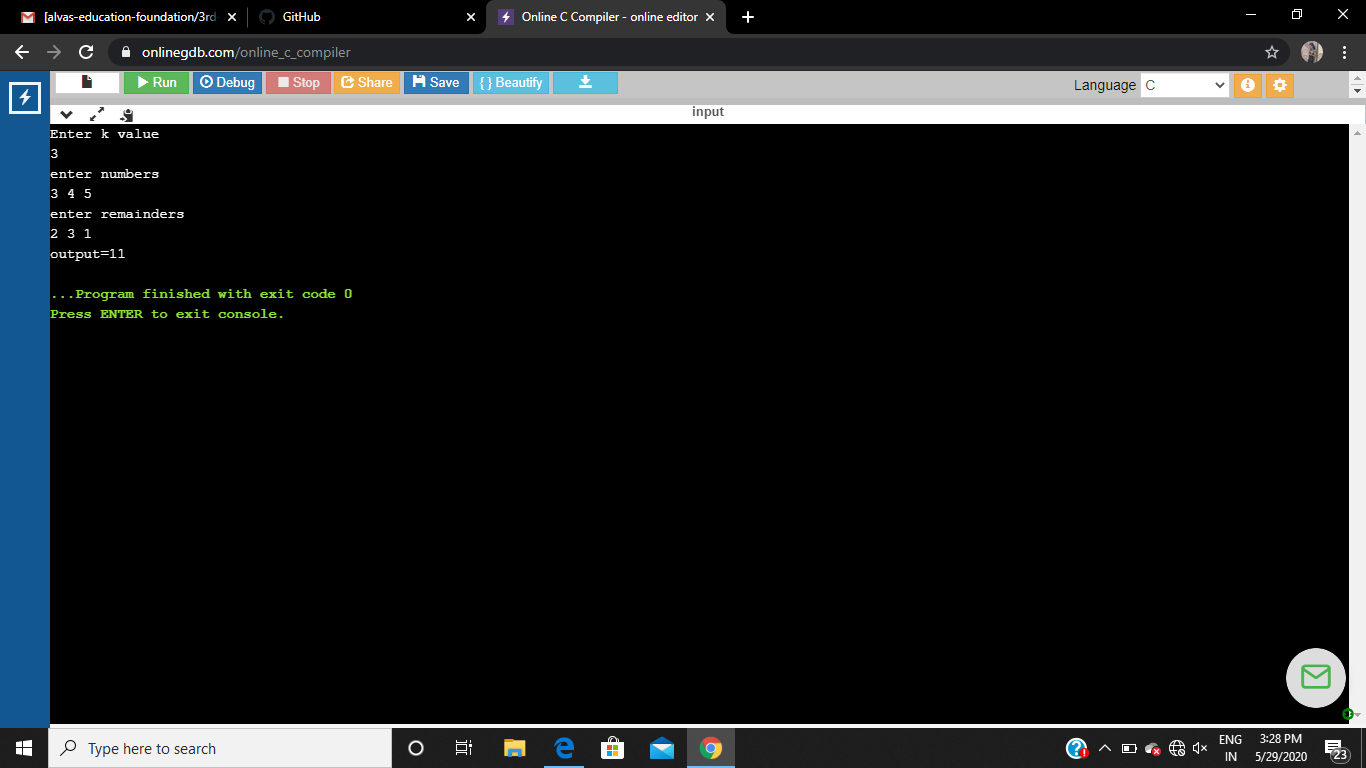
for(int i=0;i<k;i++)

scanf("%d",&rem[i]);

printf("output=%d",findMinX(num, rem, k));

return 0;

}



**OUTPUT**