

Correction of Homework #2

```
#include<stdio.h>
int main ( )
{
    //this program creates and displays Pascal's triangle

    int n, i ,j ,t[10][10];
    printf ( "enter an integer : " );
    scanf ( "%d" , &n );
    //Create Pascal's triangle
    for (i=0; i<=n;i++)
        for (j=0; j<=n;j++)
            if ((j==0) ||(i==j))
                t[i][j]=1;
            else
                if (i>j)
                    t[i][j]=t[i-1][j]+t[i-1][j-1];
                else
                    t[i][j]=0;
    //display of pascal's triangle
    for (i=0; i<=n;i++)
    {
        for (j=0; j<=i;j++)
            printf("%d ", t[i][j]);
        printf("\n");
    }
    //development of (X+a)^n
    for (j=0; j<= n;j++)
        if(j==0)
            printf("X^%d + ",n);
        else
            if(j==n)
                printf("a^%d",n);
            else
                printf("(X+a)^n= %dX^%d*a^%d + ",t[n][j],n-j,j);
    }
```