

## C- Program to implement Matrix addition & subtraction

### Algorithm

1. Start
2. Input  $r$  &  $c$ .
3. Repeat through step 3.  
for ( $i=0; i < r; i++$ )  
for ( $j=0; j < c; j++$ )  
for ( $k=0; k < c; k++$ )  
Input  $a[i][j]$
4. Repeat through step 4.  
for ( $i=0; i < r; i++$ )  
for ( $j=0; j < c; j++$ )  
Input  $b[i][j]$
5. Repeat through step 5.  
for ( $i=0; i < r; i++$ )  
for ( $j=0; j < c; j++$ )  
•  $m[i][j] = a[i][j] + b[i][j]$   
print  $m[i][j]$   
print "\n"
6. Repeat through step 6.  
for ( $i=0; i < r; i++$ )  
for ( $j=0; j < c; j++$ )  
 $m[i][j] = a[i][j] - b[i][j]$   
print  $m[i][j]$   
print "\n"

7. Stop

Flowchart

