Algorithm to find out the summation of boundary elements

1. Input: a two-dimensional array

    A[1….m,1….n]

    Sum=0;

2. Find each boundary element

    for(i = 1; i <= m; i++)

        for(j = 1; j <= n; j++)

            if(i = 1 || j = 1 || i = m || j = n), sum=sum+A[i.j],

3. Output: Print sum as the result of summation of boundary elements

Algorithm to find out the summation of diagonal elements

1. Input: a two-dimensional array

    B[1….n,1….n]

    Sum=0;

2. Find each diagonal element and add them with sum

    for(i = 1; i <= n; i++)

        for(j = 1; j <= n; j++)

            if(i = j || i+j = n+1), sum=sum+B[i.j],

3. Output: Print sum as the result of summation of diagonal elements