

LAB TASK # 5

Question # 1

Code:

```
#include <iostream>

using namespace std;

int main()
{
    int A[ 3][3];
    int Min, Max;

    for(int i=0; i< 3; i++)
    {
        for(int j=0; j<3; j++)
        {
            cin>>A[i][j];
        }
    }
    Max = A[0][0];
    Min = A[0][0];
    for(int i=0; i<3; i++)
    {
        for(int j=0; j<3; j++)
        {
            cout<<A[i][j]<<" ";

            if (A[i][j] > Max)
            {
                Max = A[i][j];
            }
            if (A[i][j] < Min)
            {
                Min = A[i][j];
            }
        }
        cout<<endl;
    }
    cout<<"Max: "<<Max<<endl;
    cout<<"Min: "<<Min<<endl;
    return 0;
}
```

OutPut of Question #1

```
C:\Users\hp\Downloads\min in 2D array.txt
1      2      3
4      5      6
1      2      1
1 2 3
4 5 6
1 2 1
Max: 6
Min: 1
```

Question # 2

Code:

```
#include <iostream>
using namespace std;

int main()
{
    int r, c, a[100][100], b[100][100], sum[100][100], i, j;

    cout << "Enter number of rows (between 1 and 100): ";
    cin >> r;

    cout << "Enter number of columns (between 1 and 100): ";
    cin >> c;

    cout << endl << "Enter elements of 1st matrix: " << endl;

    // Storing elements of first matrix entered by user.
    for(i = 0; i < r; ++i)
        for(j = 0; j < c; ++j)
        {
            cout << "Enter element a" << i + 1 << j + 1 << " : ";
            cin >> a[i][j];
        }

    // Storing elements of second matrix entered by user.
    cout << endl << "Enter elements of 2nd matrix: " << endl;
    for(i = 0; i < r; ++i)
        for(j = 0; j < c; ++j)
        {
            cout << "Enter element b" << i + 1 << j + 1 << " : ";
            cin >> b[i][j];
        }

    // Adding Two matrices
    for(i = 0; i < r; ++i)
        for(j = 0; j < c; ++j)
            sum[i][j] = a[i][j] + b[i][j];

    // Displaying the resultant sum matrix.
    cout << endl << "Sum of two matrix is: " << endl;
    for(i = 0; i < r; ++i)
        for(j = 0; j < c; ++j)

// Adding Two matrices
for(i = 0; i < r; ++i)
    for(j = 0; j < c; ++j)
        sum[i][j] = a[i][j] + b[i][j];

// Displaying the resultant sum matrix.
cout << endl << "Sum of two matrix is: " << endl;
for(i = 0; i < r; ++i)
    for(j = 0; j < c; ++j)
    {
        cout << sum[i][j] << " ";
        if(j == c - 1)
            cout << endl;
    }

return 0;
```

Output of Question # 2

```
Enter elements of 1st matrix:
Enter element a11 : 1
Enter element a12 : 2
Enter element a13 : 2
Enter element a21 : 3
Enter element a22 : 4
Enter element a23 : 1
Enter element a31 : 2
Enter element a32 : 3
Enter element a33 : 1

Enter elements of 2nd matrix:
Enter element b11 : 1
Enter element b12 : 2
Enter element b13 : 3
Enter element b21 : 4
Enter element b22 : 2
Enter element b23 : 1
Enter element b31 : 1
Enter element b32 : 2
Enter element b33 : 3

Sum of two matrix is:
2  4  5
7  6  2
3  5  4
```

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