

1)

```
#include "stdafx.h"
#include<iostream>
using namespace std;
```

```
int suma(int **tab, int n, int m)
{
    int suma;
    __asm
    {
        pushad;
        pushf;
        xor eax, eax;
        mov ecx, n;
        mov esi, tab;
    petla2:
        mov edi, [esi + 4 * ecx - 4];
        mov ebx, m;
    petla1:
        add eax, [edi + 4 * ebx - 4];
        dec ebx;
        jnz petla1;
        dec ecx;
        jnz petla2;
        mov suma, eax;
        popf;
        popad;
    }
    return suma;
}
```

```
int* iloczyn(int **tab, int *wek, int n, int m)
{
    int *ilo = new int[m];
    __asm
    {
        pushad;
        pushf;
        mov ecx, n;
        mov edi, wek;
        mov edx, ilo;
    petla2:
        mov esi, tab;
```

```

        mov esi, [esi + 4 * ecx - 4];
        xor eax, eax;
        push ecx;
        mov ecx, m;
petla1:
        mov ebx, [esi + 4 * ecx - 4];
        imul ebx, [edi + 4 * ecx - 4];
        add eax, ebx;
        loop petla1;
        pop ecx;
        mov [edx + 4 * ecx - 4], eax;
        loop petla2;
        popf;
        popad;
    }
    return ilo;
}

```

```
int _tmain(int argc, _TCHAR* argv[])
```

```
{
```

//suma elementow macierzy

```

int n,m;
cout << "Podaj liczbe wierszy: ";
cin >> n;
cout << "Podaj liczbe kolumn: ";
cin >> m;
int **tab = new int*[n];
for (int i = 0; i < n; i++)
    tab[i] = new int[m];
cout << "Podaj elementy macierzy: " << endl;
for (int i = 0; i < n; i++)
    for (int j = 0; j < m; j++)
        cin >> tab[i][j];
cout << "Suma= " << suma(tab, n,m) << endl;

```

//mnozenie macierzy i wektora

```

int *wek = new int[m];
int *ilo = new int[n];
cout << "Macierz juz masz teraz podaj wektor: " << endl;
for (int i = 0; i < m; i++)
    cin >> wek[i];
ilo = iloczyn(tab, wek, n, m);
for (int i = 0; i < n; i++)
    cout << ilo[i] << " ";
cout << endl;

```

```

        delete[] wek;
        delete[] ilo;
        for (int i = 0; i < n; i++)
            delete[] tab[i];
        delete[] tab;
        system("Pause");
        return 0;
    }

2)
// lab05.cpp : Defines the entry point for the console application.
//
#include "stdafx.h"
#include <iostream>
using namespace std;

int suma(int **tab, int n1, int n2)
{
    int wynik;
    __asm{
        xor eax, eax;
        mov ecx, n1;
        mov esi, tab;

    petla1:
        mov edi, [esi + 4 * ecx - 4];
        mov ebx, n2;

    petla2:
        add eax, [edi + 4 * ebx - 4];
        dec ebx;
        jnz petla2;
        loop petla1;
        mov wynik, eax;
    }
    return wynik;
}

int _tmain(int argc, _TCHAR* argv[])
{
    int n = 2;
    int **tab = new int*[n];
    for (int i = 0; i < n; i++)
    {
        tab[i] = new int[n];
        for (int j = 0; j < n; j++)
        {
            cin >> tab[i][j];

```

```
        }  
    }  
    cout << suma(tab, 2, 2) << endl;  
    system("pause");  
    return 0;  
}
```