// Adjacency Matrix:

#include <stdio.h>

#include <stdlib.h>

int main()

{

int N,M;

N = 5;

int arr[][2] = {{1,2},{2,3},{4,5},{1,5}};

M = sizeof(arr)/sizeof(arr[0]);

int Adj[N+1][N+1];

for(int i =0; i<N+1;i++){

for(int j = 0; j<N+1;j++){

Adj[i][j]=0;

}

}

for(int i = 0; i<M;i++){

int x = arr[i][0];

int y = arr[i][1];

Adj[x][y] = 1;

Adj[y][x] = 1;

}

printf("Adjacency Matrix is: \n");

for (int i = 1; i < N + 1; i++) {

for (int j = 1; j < N + 1; j++) {

printf("%d ", Adj[i][j]);

}

printf("\n");

}

return 0;

}

Output:

Text

Description automatically generated

Time Complexity is: O(n2)