

Name- Abhinav Kumar  
PRN- 21070126006  
Branch- AIML-A1  
Lab Assignment- Depth First Search

```
#include<stdio.h>
#include<stdlib.h>
int visited[7]={0,0,0,0,0,0,0};
int a [7][7]= {
{0,1,1,1,0,0,0},
{1,0,1,0,0,0,0},
{1,1,0,1,1,0,0},
{1,0,1,0,1,0,0},
{0,0,1,1,0,1,1},
{0,0,0,0,1,0,0},
{0,0,0,0,1,0,0}
};
void DFS(int i){
int j;
printf("%d ",i);
visited[i] =1;
for(j=0;j<7;j++){
if(a[i][j]==1 && !visited[j]){
DFS(j);
}
}
}
int main(){
DFS(4);
return 0;
}
```