//two level directory organisation

#include<stdio.h>

#include<string.h>

#include<stdlib.h>

struct file

{

char fileName[15][20];

char dirName[10];

int fno;

};

struct file dir[10];

int i,n;

void InsertFile(int i)

{

printf("\n Enter the File name: ");

scanf("%s",dir[i].fileName[dir[i].fno]);

dir[i].fno++;

}

void DisplayFiles()

{

int j;

printf("\ndisplaying files:");

printf("\n Directorytfiles:");

for(j=0;j<n;j++)

{

printf("\n %s",dir[j].dirName);

for(i=0;i<dir[j].fno;i++)

{

printf("\n t%s",dir[j].fileName[i]);

}

}

}

void DeleteFile(int z)

{

char name[20];

printf("\n Enter the file to be deleted : ");

scanf("%s",name);

for(i=0;i<dir[z].fno;i++)

{

if(strcmp(dir[z].fileName[i],name)==0)

{

printf("\n%s is deleted \t:",dir[z].fileName[i]);

strcpy(dir[z].fileName[i],dir[z].fileName[dir[z].fno-1]);

dir[z].fno--;

}

}

}

void SearchFile(int z)

{

char name[20];

int found=-1;

printf("\n Enter the file to be searched :");

scanf("%s",name);

for(i=0;i<dir[z].fno;i++)

{

if(strcmp(dir[z].fileName[i],name)==0)

{

printf("\n The File is found at position %d\n",i+1);

found=1;

break;

}

}

if(found==-1)

printf("\n The file is not found ");

}

int getdir(char name[30])

{

for(i=0;i<n;i++)

{

if(strcmp(dir[i].dirName,name)==0)

{

return i;

break;

}

}

return i;

}

int option(int i)

{

while(1)

{

int op;

printf("\nchoose the option \n1:Insert a file in directory %s",dir[i].dirName);

printf("\n2:Display Files and Directories");

printf("\n3:Delete File from %s",dir[i].dirName);

printf("\n4:Search File in %s",dir[i].dirName);

printf("\n5:choose another directory\n6:Exitn>>> ");

scanf("%d",&op);

switch(op)

{

case 1:InsertFile(i);

break;

case 2:DisplayFiles();

break;

case 3:DeleteFile(i);

break;

case 4:SearchFile(i);

break;

case 5:return 1;

break;

case 6:exit(0);

}

}

}

int main()

{

char name[20];

printf("\n Enter the no of directories ");

scanf("%d",&n);

for(i=0;i<n;i++)

{

dir[i].fno=0;

printf("\nFor directory %d Enter the directory name: ",i+1);

scanf("%s",dir[i].dirName);

}

while(1)

{

printf("\n choose a directory to perform operation ");

for(i=0;i<n;i++)

{

printf("\n\t%s",dir[i].dirName);

}

printf("\n>>");

scanf("%s",name);

option(getdir(name));

}

return 0;

}

Output:

