实验三

（1）Task1

打开(O)

c1.c
~/linuxB22040503/Experiment3

task1.c

```c
#include <stdio.h>
int main(int argc,char* argv[])
{
char buf[1024]={0};
FILE* fp=fopen(argv[1],"r");
if(argc<2)
{
printf("please input source file!\n");
}
if(fp==NULL)
{
printf("open source %s failed\n",argv[1]);
return -1;

}
while(fgets(buf,1024,fp))
{
printf("%s\n",buf);
}
return 0;
}
```

```
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$ gcc -c c1.c
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$ gcc -o hello1 c1.o
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$ gcc -c c1.c
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$ rm -rf *.o
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$
```

```
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$ ./hello1 hello.txt
hello world!

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```

（2）Task2

打开(O)

c2.c
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c1.c

```c
#include <stdio.h>
#include <dirent.h>
#include <sys/types.h>
int  main(int argc, char* argv[])
{
    DIR* dirp;
    struct dirent* direntp;
    if ((dirp = opendir(argv[1])) == NULL) {
        printf("error\n");
     //   exit(1);
    }
    while ((direntp = readdir(dirp)) != NULL)
        printf("%s\n", direntp->d_name);
    closedir(dirp);
    // exit(0);
}
```

```
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$ gcc -o hello2 c2.o
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$ gcc -c c2.c
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$ rm -rf *.o
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$
```

```
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$ ./hello2 /home/leo/linuxB22040503/Experiment3
hello2
.
c1.c
hello1
c3.c
c2.c
hello.txt
..
c1.o
hello3
```

（3）Task3

打开(O)

c3.c
~/linuxB22040503/Experiment3

c1.c × c2.c

```c
#include <stdio.h>
 #include <stdlib.h>
 #include <unistd.h>
 int main(){
    char buf[1024] = {0};
    char buf2[1024]={0};
    getcwd(buf, 1024);
    printf("%s\n", buf);
    if(chdir("/home")<0){
        printf("error\n");
    }
    else
    {
        printf("success\n");
    }
    getcwd(buf2,1024);
    printf("%s\n",buf2);
    return 0;
}
```

```
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$ gcc -c c3.c
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$ gcc -o hello1 c3.o
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$ rm -rf *.o
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$
```

```
leo@leo-virtual-machine:~/linuxB22040503/Experiment3$ ./hello3
/home/leo/linuxB22040503/Experiment3
success
/home
```