

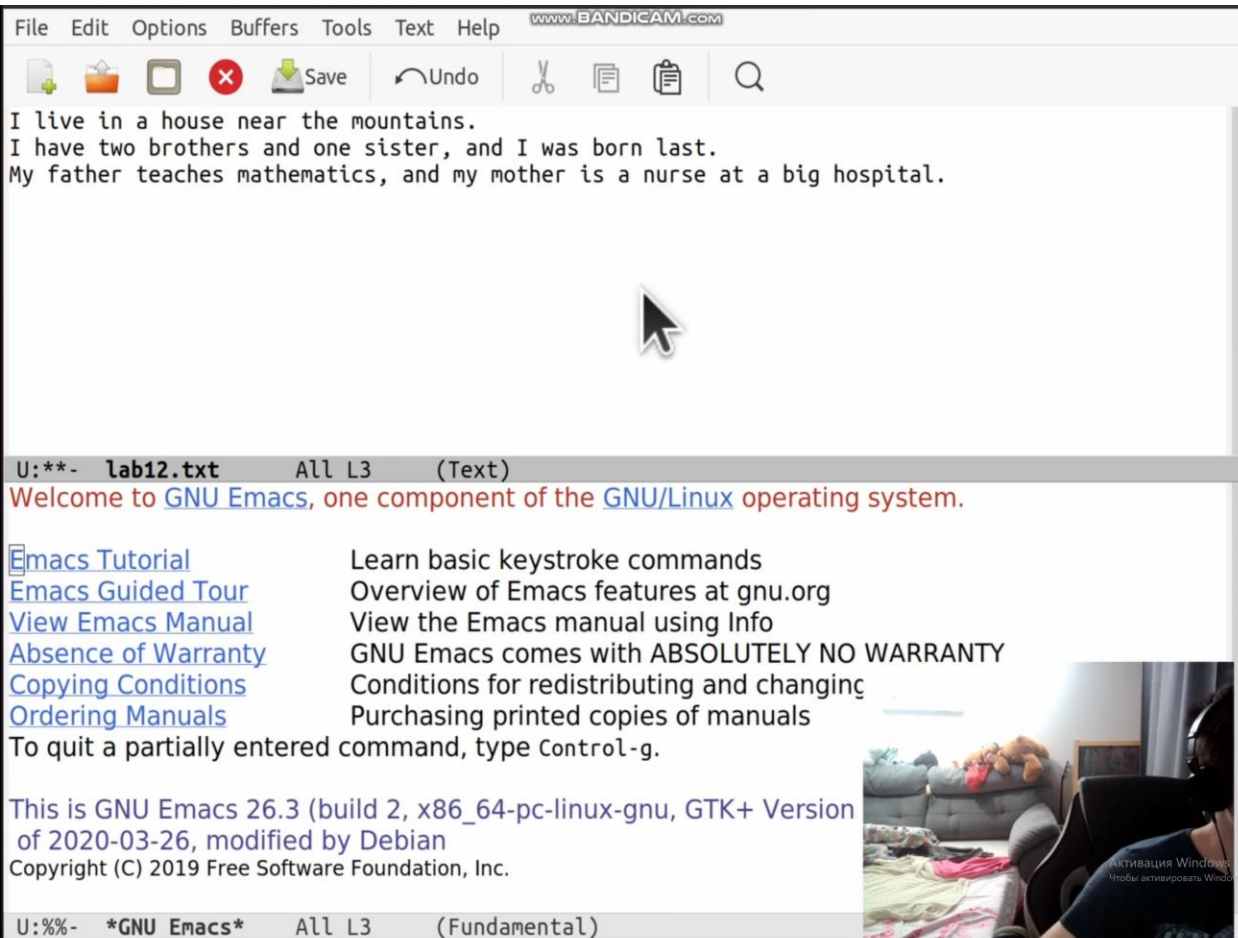
# Презентация Лабораторной работы №2

# Лабораторная работа 12

Новосельцев.Д.С. НФИбд-02-20

Цель работы: изучить основы программирования в оболочке ОС UNIX, научиться писать более сложные командные файлы с использованием логических управляющих конструкций и циклов.

Ход работы:



```
danila@dsnoveseljcev-VirtualBox:~/.ssh$ cd www.BANDICAM.com
danila@dsnoveseljcev-VirtualBox:~$ cd lab12
bash: cd: lab12: No such file or directory
danila@dsnoveseljcev-VirtualBox:~$ emacs lab12.sh
danila@dsnoveseljcev-VirtualBox:~$ bash lab12.sh -ilab12.txt -olab121.txt -pice
danila@dsnoveseljcev-VirtualBox:~$ emacs lab12.sh
danila@dsnoveseljcev-VirtualBox:~$ emacs lab12.txt
danila@dsnoveseljcev-VirtualBox:~$ bash lab12.sh -ilab12.txt -olab121.txt -pis
I have two brothers and one sister, and I was born last.
My father teaches mathematics, and my mother is a nurse at a big hospital.
danila@dsnoveseljcev-VirtualBox:~$ bash lab12.sh -ilab12.txt -olab121.txt -pis -n
I have two brothers and one sister, and I was born last.
My father teaches mathematics, and my mother is a nurse at a big hospital.
danila@dsnoveseljcev-VirtualBox:~$ bash lab12.sh -ilab12.txt -olab121.txt -pis -C
I have two brothers and one sister, and I was born last.
My father teaches mathematics, and my mother is a nurse at a big hospital.
danila@dsnoveseljcev-VirtualBox:~$ bash lab12.sh -ilab12.txt -olab121.txt -piS -c
lab12.sh: illegal option -- c
Illegal option ?
danila@dsnoveseljcev-VirtualBox:~$ bash lab12.sh -ilab12.txt -olab121.txt -piS -C
I have two brothers and one sister, and I was born last.
My father teaches mathematics, and my mother is a nurse at a big hospital.
danila@dsnoveseljcev-VirtualBox:~$
```



Активация Windows  
Чтобы активировать Windows, перейдите в раздел "Параметры".

File Edit Options Buffers Tools C Help [www.BANDICAM.com](http://www.BANDICAM.com)

Save Undo

```
#include <stdio.h>
#include <stdlib.h>

int main(){
    int a;
    printf("input: ");
    scanf("%i", &a);
    if (a==0) exit (0);
    else if (a<0) exit (1);
    else if (a>0) exit (2);
    return 3;
}
```

U:--- lab122.c All L12 (C/\*l Abbrev)

Welcome to [GNU Emacs](#), one component of the [GNU/Linux](#) operating

[Emacs Tutorial](#) Learn basic keystroke commands

U:%%- \*GNU Emacs\* Top L3 (Fundamental)

U:%%- /home/danila/lab122.c



Активация Windows  
Чтобы активировать Windows, перейдите в раздел "Параметры".

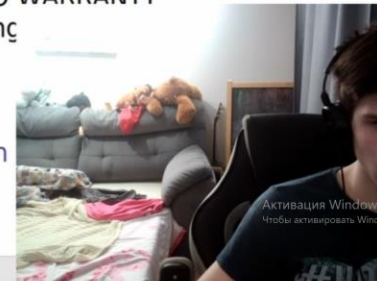
```
File Edit Options Buffers Tools Sh-Script Help
Save Undo
#!/bin/bash
gcc -o cprog lab122.c
./cprog
case $? in
  0) echo 'input number is equal to 0';;
  1) echo 'input number is smaller than 0';;
  2) echo 'input number is bigger than 0';;
esac

-:--- lab123.sh All L2 (Shell-script[bash])
Welcome to GNU Emacs, one component of the GNU/Linux operating system.

Emacs Tutorial      Learn basic keystroke commands
Emacs Guided Tour   Overview of Emacs features at gnu.org
View Emacs Manual   View the Emacs manual using Info
Absence of Warranty GNU Emacs comes with ABSOLUTELY NO WARRANTY
Copying Conditions  Conditions for redistributing and changing
Ordering Manuals    Purchasing printed copies of manuals
To quit a partially entered command, type Control-g.

This is GNU Emacs 26.3 (build 2, x86_64-pc-linux-gnu, GTK+ Version
of 2020-03-26, modified by Debian
Copyright (C) 2019 Free Software Foundation, Inc.

U:%%- *GNU Emacs* All L3 (Fundamental)
Welcome to GNU Emacs 26.3 (build 2, x86_64-pc-linux-gnu, GTK+ Version
of 2020-03-26, modified by Debian
Copyright (C) 2019 Free Software Foundation, Inc.
```



Активация Windows  
Чтобы активировать Windows, перейдите в раздел "Параметры".



danila@dsnovoseljcev-VirtualBox:~\$ bash lab123.sh

input: 13

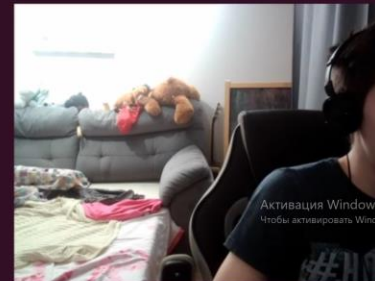
input number is bigger than 0

danila@dsnovoseljcev-VirtualBox:~\$ bash lab123.sh

input: -45

input number is smaller than 0

danila@dsnovoseljcev-VirtualBox:~\$



Активация Windows  
Чтобы активировать Windows, перейдите в раздел "Параметры".

File Edit Options Buffers Tools Sh-Script Help [www.BANDICAM.com](http://www.BANDICAM.com)

Save Undo

```
#!/bin/bash
let dflag=0;
while getopts a:d optletter
do case $optletter in
    a) aflag=1; aval=$OPTARG;;
    d) dflag=1;;
    *) echo Illegaloption $optletter
    esac
done
#echo ${aval}
if ((dflag==0))
then for ((i=1;i<=aval;i++))
do touch ${i}.txt
done
fi
if ((dflag==1))
then for ((i=1;i<=aval;i++))
do rm ${i}.txt
done
fi
```

U:\*\*- lab124.sh All L21 (Shell-script[sh])

[Emacs Tutorial](#) Learn basic keystroke commands  
[Emacs Guided Tour](#) Overview of Emacs features at gnu.org  
U:%%- \*GNU Emacs\* 11% L3 (Fundamental)  
Beginning of buffer



Активация Windows

Чтобы активировать Windows

перейдите в раздел "Параметры".

www.BANDICAM.com  
-rw-rw-r-- 1 danila danila 189 OKT 25 22:59 lab122.c~  
-rw-rw-r-- 1 danila danila 189 OKT 25 22:52 lab122.c~  
-rw-rw-r-- 1 danila danila 0 OKT 25 22:53 '#lab123.c#'  
-rw-rw-r-- 1 danila danila 194 OKT 25 22:57 lab123.sh  
-rw-rw-r-- 1 danila danila 193 OKT 25 22:56 lab123.sh~  
-rw-rw-r-- 1 danila danila 355 OKT 25 23:17 lab124.sh  
-rwxrwxr-x 1 danila danila 823 OKT 25 22:42 lab12.sh  
-rwxrwxr-x 1 danila danila 806 OKT 25 11:43 lab12.sh~  
-rwxrwxr-x 1 danila danila 170 OKT 25 22:46 lab12.txt  
-rwxrwxr-x 1 danila danila 0 OKT 25 11:43 lab12.txt~  
-rw-rw-r-- 1 danila danila 222 OKT 25 11:14 Lab12.txt  
-rwxrwxr-x 1 danila danila 44 OKT 25 12:02 lab131.sh  
-rwxrwxr-x 1 danila danila 43 OKT 25 12:01 lab131.sh~  
-rwxrwxr-x 1 danila danila 218 OKT 25 12:11 lab132.sh  
-rwxrwxr-x 1 danila danila 218 OKT 25 12:10 lab132.sh~  
-rwxrwxr-x 1 danila danila 205 OKT 25 11:54 lab13.sh  
-rwxrwxr-x 1 danila danila 0 OKT 25 11:49 lab13.sh~  
-rw-rw-r-- 1 danila danila 245 OKT 25 10:42 lab9.txt~  
-rw-rw-r-- 1 danila danila 0 OKT 25 11:54 lockfile  
-rw-rw-r-- 1 danila danila 269 OKT 25 18:08 Makefile  
drwxr-xr-x 2 danila danila 4096 OKT 24 18:55 Music  
drwxr-xr-x 2 danila danila 4096 OKT 24 18:55 Pictures  
drwxr-xr-x 2 danila danila 4096 OKT 24 18:55 Public  
-rwxrwxr-x 1 danila danila 42 OKT 24 19:24 script2.sh  
-rwxrwxr-x 1 danila danila 41 OKT 24 19:18 script2.sh~  
-rwxrwxr-x 1 danila danila 245 OKT 24 19:32 script3.sh  
-rwxrwxr-x 1 danila danila 239 OKT 24 19:31 script3.sh~  
-rwxrwxr-x 1 danila danila 156 OKT 24 19:35 script4.sh  
-rwxrwxr-x 1 danila danila 0 OKT 24 19:32 script4.sh~  
-rwxrwxr-x 1 danila danila 91 OKT 24 19:15 script.sh  
-rwxrwxr-x 1 danila danila 0 OKT 24 19:09 script.sh~  
drwxr-xr-x 2 danila danila 4096 OKT 24 18:55 Templates  
drwxr-xr-x 2 danila danila 4096 OKT 24 18:55 Videos  
drwxrwxr-x 3 danila danila 4096 OKT 25 17:49 work  
danila@dsnovoseljcev-VirtualBox:~\$

I



Активация Windows  
Чтобы активировать Windows, перейдите в раздел "Параметры".

```
File Edit Options Buffers Tools Sh-Script Help
Save Undo
#!/bin/bash
tar -cf 12.tar $@
tar -cf 12l.tar
find $@ -mtime -7 -exec tar -rf 9l.tar '{}' ';'

U:--- lab125.sh All L5 (Shell-script[sh])
Welcome to GNU Emacs, one component of the GNU/Linux operating system.

Emacs Tutorial      Learn basic keystroke commands
Emacs Guided Tour   Overview of Emacs features at gnu.org
View Emacs Manual   View the Emacs manual using Info
Absence of Warranty GNU Emacs comes with ABSOLUTELY NO
Copying Conditions  Conditions for redistributing and changing
Ordering Manuals    Purchasing printed copies of manuals
To quit a partially entered command, type Control-g.

This is GNU Emacs 26.3 (build 2, x86_64-pc-linux-gnu, GTK+ Version
U:%%- *GNU Emacs* Top L3 (Fundamental)
U:%%- /home/danila/lab125.sh
```



Активация Windows  
Чтобы активировать Windows, перейдите в раздел "Параметры".

```

-rwxrwxr-x 1 danila danila 0 OKT 25 17:49 lab125.sh~
-rw-rw-r-- 1 danila danila 245 OKT 25 10:42 lab9.txt~
-rw-rw-r-- 1 danila danila 0 OKT 25 11:54 lockfile
-rw-rw-r-- 1 danila danila 269 OKT 25 18:08 Makefile
drwxr-xr-x 2 danila danila 4096 OKT 24 18:55 Music
drwxr-xr-x 2 danila danila 4096 OKT 24 18:55 Pictures
drwxr-xr-x 2 danila danila 4096 OKT 24 18:55 Public
-rwxrwxr-x 1 danila danila 42 OKT 24 19:24 script2.sh
-rwxrwxr-x 1 danila danila 41 OKT 24 19:18 script2.sh~
-rwxrwxr-x 1 danila danila 245 OKT 24 19:32 script3.sh
-rwxrwxr-x 1 danila danila 239 OKT 24 19:31 script3.sh~
-rwxrwxr-x 1 danila danila 156 OKT 24 19:35 script4.sh
-rwxrwxr-x 1 danila danila 0 OKT 24 19:32 script4.sh~
-rwxrwxr-x 1 danila danila 91 OKT 24 19:15 script.sh
-rwxrwxr-x 1 danila danila 0 OKT 24 19:09 script.sh~
drwxr-xr-x 2 danila danila 4096 OKT 24 18:55 Templates
drwxr-xr-x 2 danila danila 4096 OKT 24 18:55 Videos
drwxrwxr-x 3 danila danila 4096 OKT 25 17:49 work
danila@dsnovoseljcev-VirtualBox:~$ emacs lab125.sh
danila@dsnovoseljcev-VirtualBox:~$ bash lab125.sh /lab12
tar: Removing leading '/' from member names
tar: /lab12: Cannot stat: No such file or directory
tar: Exiting with failure status due to previous errors
tar: Cowardly refusing to create an empty archive
Try 'tar --help' or 'tar --usage' for more information.
find: '/lab12': No such file or directory
danila@dsnovoseljcev-VirtualBox:~$ ls
12.tar Documents lab123.sh~ Lab12.txt lab9.txt~ scri
1.txt Downloads lab124.sh lab131.sh lockfile scri
2.txt lab121.txt lab125.sh lab131.sh~ Makefile scri
3.txt lab122.c lab12.sh lab132.sh Music scri
4.txt lab122.c~ lab12.sh~ lab132.sh~ Pictures scri
cprog '#lab123.c#' lab12.txt lab13.sh Public scri
Desktop lab123.sh lab12.txt~ lab13.sh~ script2.sh scri
danila@dsnovoseljcev-VirtualBox:~$

```



Активация Windows  
Чтобы активировать Windows, перейдите в раздел "Параметры".

Вывод: изучил основы программирования в оболочке ОС UNIX, научился писать более сложные командные файлы с использованием логических управляющих конструкций и циклов.