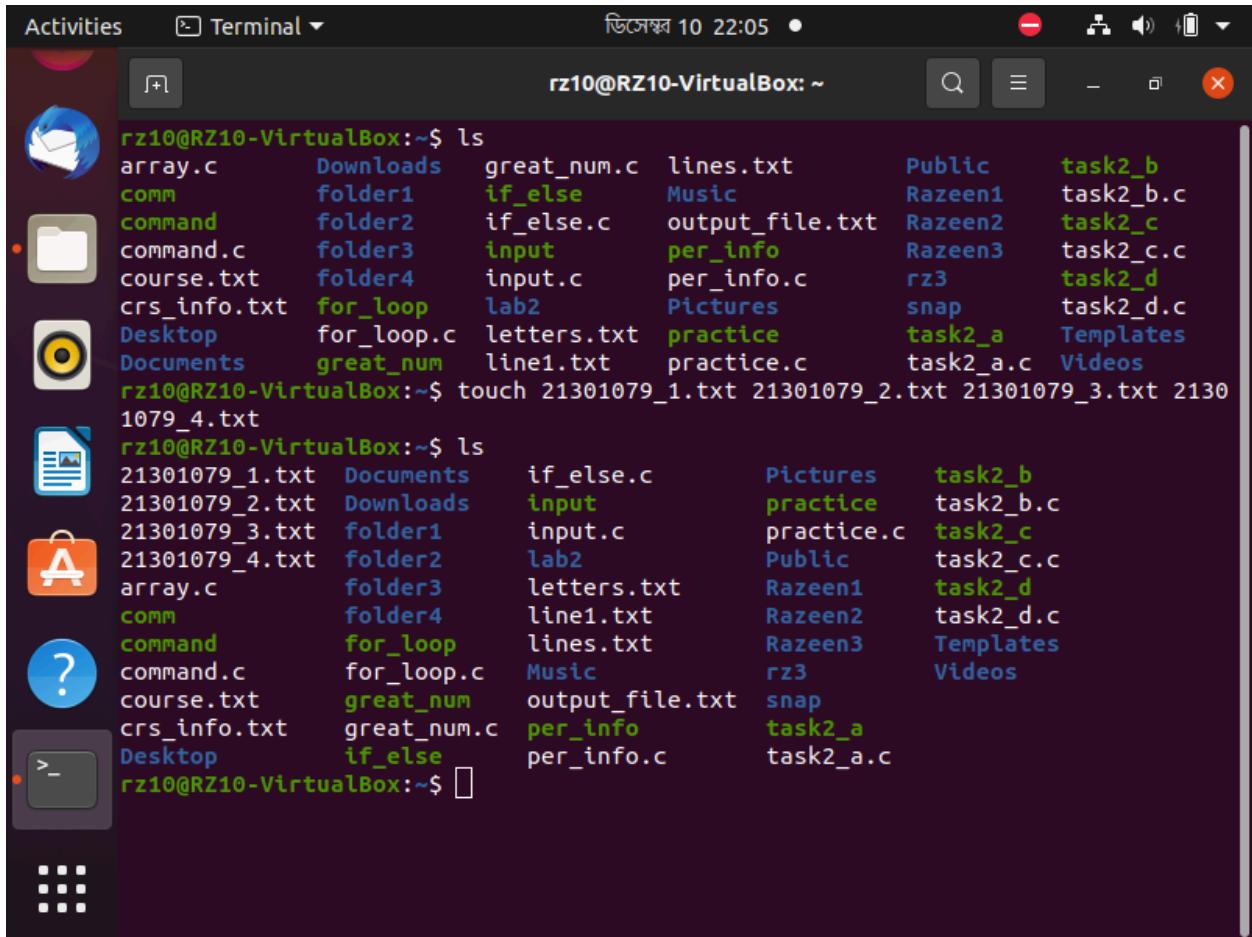


Linux Commands:

```
touch 21301079_1.txt 21301079_2.txt 21301079_3.txt 21301079_4.txt
```

```
mkdir Razeen1 Razeen2
```



The screenshot shows a Linux desktop environment with a terminal window open. The terminal window title is "rz10@RZ10-VirtualBox:~\$". The desktop background features a dark theme with various icons for applications like a file manager, browser, and system tools.

```
rz10@RZ10-VirtualBox:~$ ls
array.c      Downloads   great_num.c  lines.txt      Public      task2_b
comm         folder1    if_else     Music        Razeen1    task2_b.c
command      folder2    if_else.c   output_file.txt Razeen2    task2_c
command.c    folder3    input       per_info    Razeen3    task2_c.c
course.txt   folder4    input.c    per_info.c   rz3        task2_d
crs_info.txt for_loop   lab2       Pictures    snap       task2_d.c
Desktop      for_loop.c letters.txt practice   task2_a    Templates
Documents    great_num  line1.txt  practice.c  task2_a.c Videos
rz10@RZ10-VirtualBox:~$ touch 21301079_1.txt 21301079_2.txt 21301079_3.txt 21301079_4.txt
rz10@RZ10-VirtualBox:~$ ls
21301079_1.txt  Documents   if_else.c    Pictures    task2_b
21301079_2.txt  Downloads   input       practice   task2_b.c
21301079_3.txt  folder1    input.c    practice.c task2_c
21301079_4.txt  folder2    lab2       Public     task2_c.c
array.c         folder3    letters.txt Razeen1    task2_d
comm            folder4    line1.txt  Razeen2    task2_d.c
command         for_loop   lines.txt  Razeen3    Templates
command.c       for_loop.c practice.c  rz3       Videos
course.txt      great_num  output_file.txt snap     task2_a
crs_info.txt    great_num.c per_info    task2_a.c task2_a.c
Desktop         if_else    per_info.c
rz10@RZ10-VirtualBox:~$
```

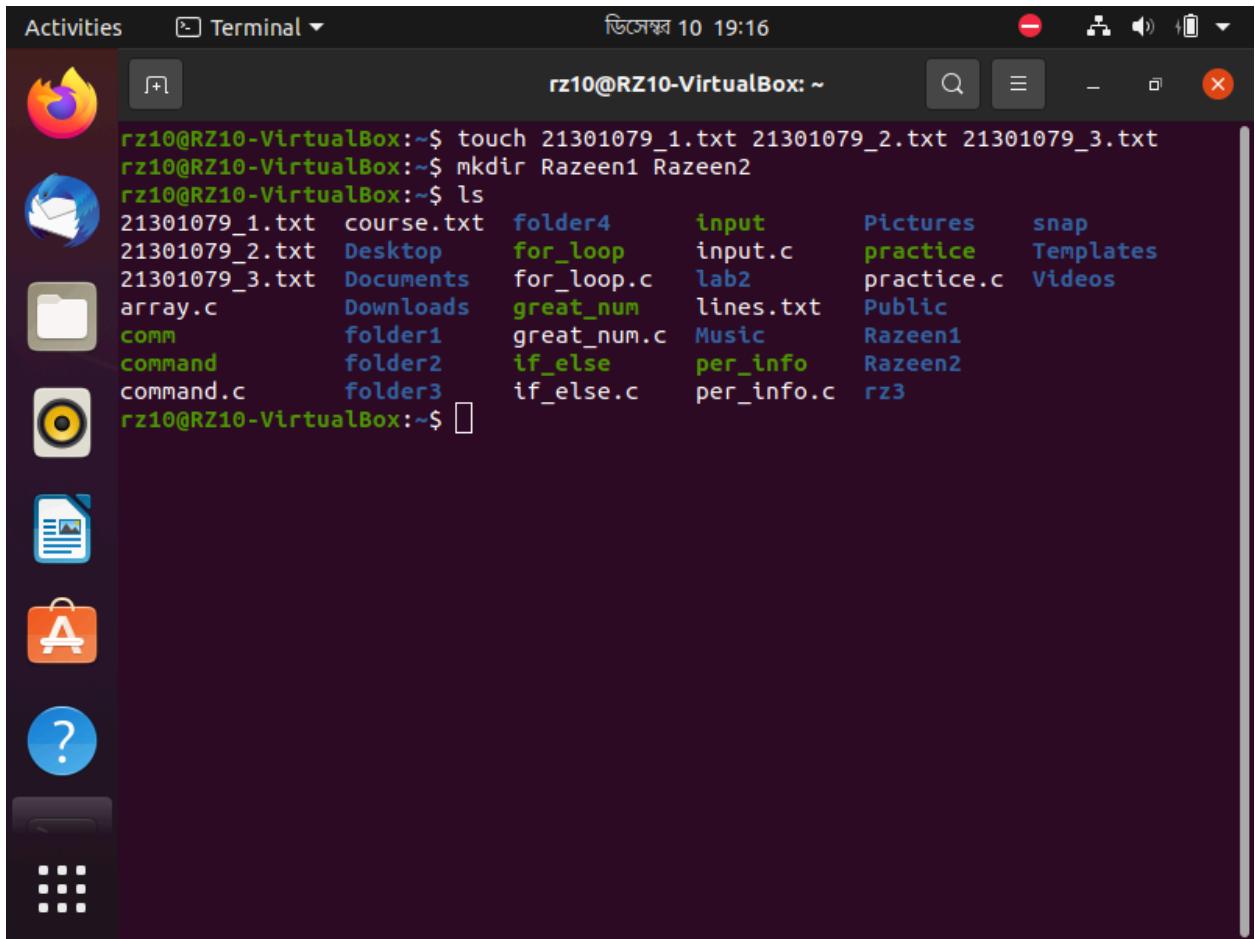
Activities Terminal ▾

ডিস্কু 10 19:16

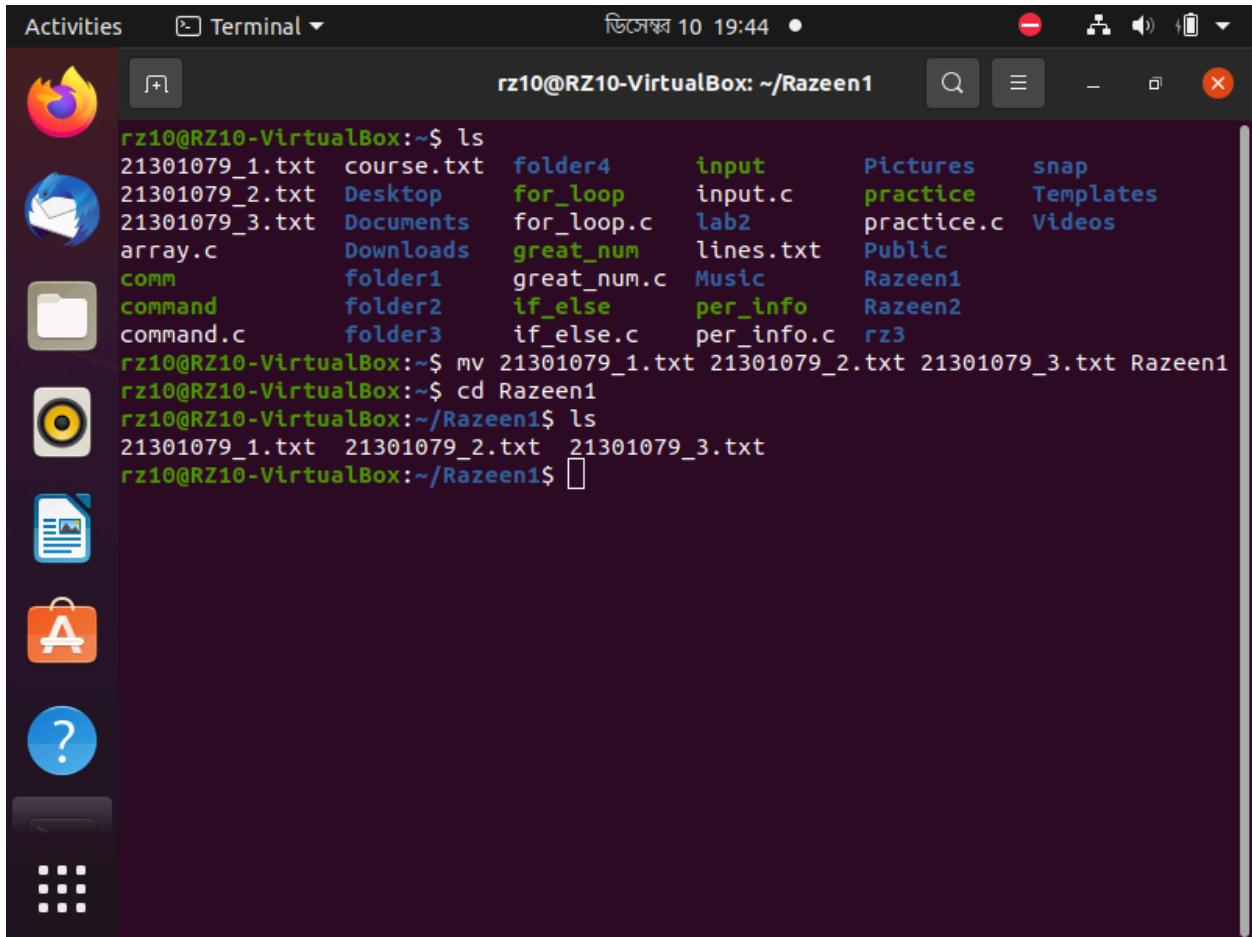
rz10@RZ10-VirtualBox:~\$ touch 21301079_1.txt 21301079_2.txt 21301079_3.txt
rz10@RZ10-VirtualBox:~\$ mkdir Razeen1 Razeen2
rz10@RZ10-VirtualBox:~\$ ls

21301079_1.txt	course.txt	folder4	input	Pictures	snap
21301079_2.txt	Desktop	for_loop	input.c	practice	Templates
21301079_3.txt	Documents	for_loop.c	lab2	practice.c	Videos
array.c	Downloads	great_num	lines.txt	Public	
comm	folder1	great_num.c	Music	Razeen1	
command	folder2	if_else	per_info	Razeen2	
command.c	folder3	if_else.c	per_info.c	rz3	

rz10@RZ10-VirtualBox:~\$



```
mv 21301079_1.txt 21301079_2.txt 21301079_3.txt Razeen1
```

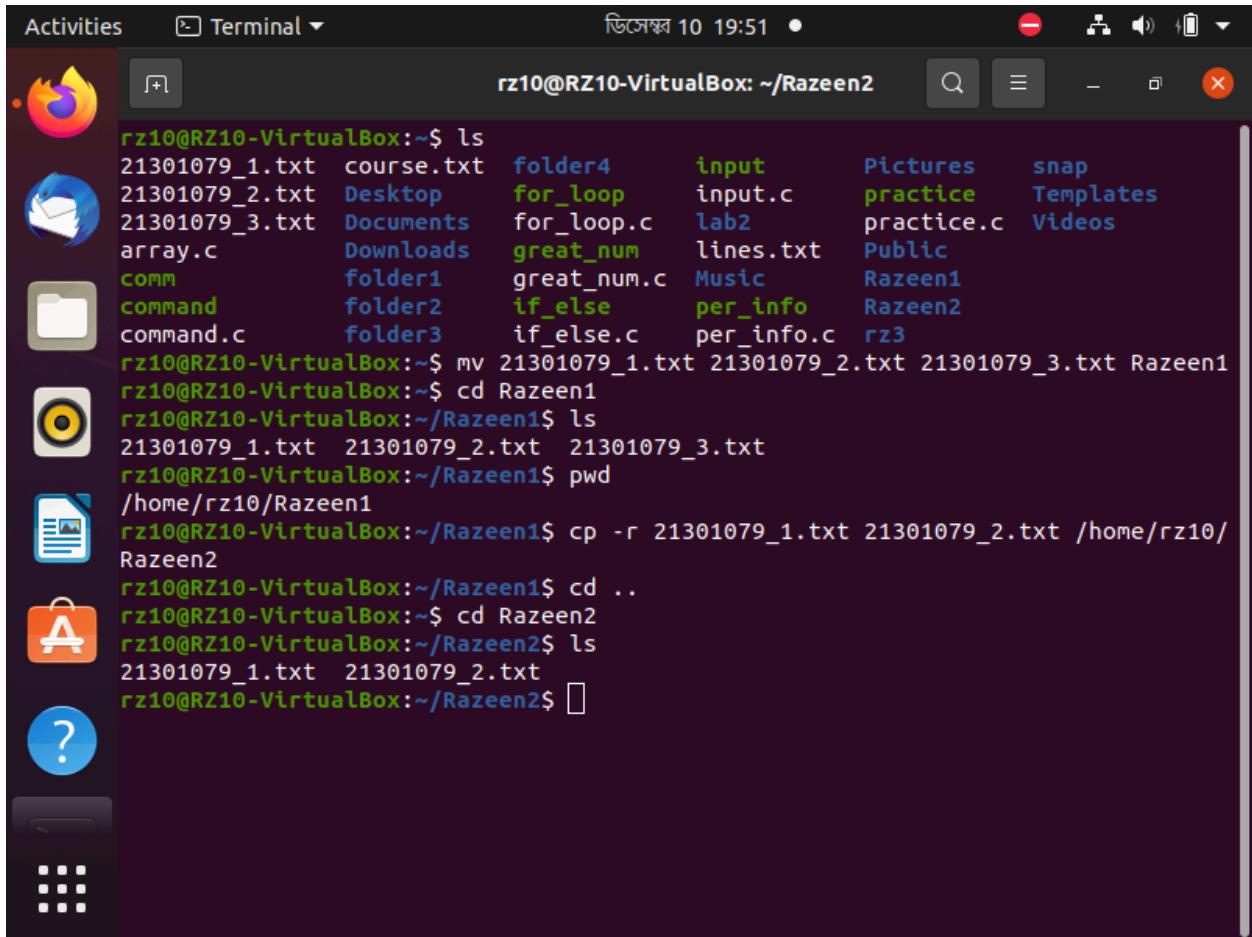


The screenshot shows a Linux desktop environment, likely Ubuntu, with a terminal window open in the Activities overview. The terminal window title is "Terminal" and the command prompt is "rz10@RZ10-VirtualBox: ~/" followed by "Razeen1". The terminal displays the following commands and output:

```
rz10@RZ10-VirtualBox:~$ ls
21301079_1.txt  course.txt  folder4      input      Pictures    snap
21301079_2.txt  Desktop     for_loop    input.c    practice   Templates
21301079_3.txt  Documents   for_loop.c  lab2      practice.c Videos
array.c          Downloads   great_num   lines.txt  Public
COMM             folder1    great_num.c Music    Razeen1
command          folder2    if_else    per_info  Razeen2
command.c        folder3    if_else.c  per_info.c rz3
rz10@RZ10-VirtualBox:~$ mv 21301079_1.txt 21301079_2.txt 21301079_3.txt Razeen1
rz10@RZ10-VirtualBox:~$ cd Razeen1
rz10@RZ10-VirtualBox:~/Razeen1$ ls
21301079_1.txt  21301079_2.txt  21301079_3.txt
rz10@RZ10-VirtualBox:~/Razeen1$
```

The terminal window has a dark theme with light-colored text. The dock on the left contains icons for various applications: a browser, email, file manager, terminal, file editor, application menu, and help.

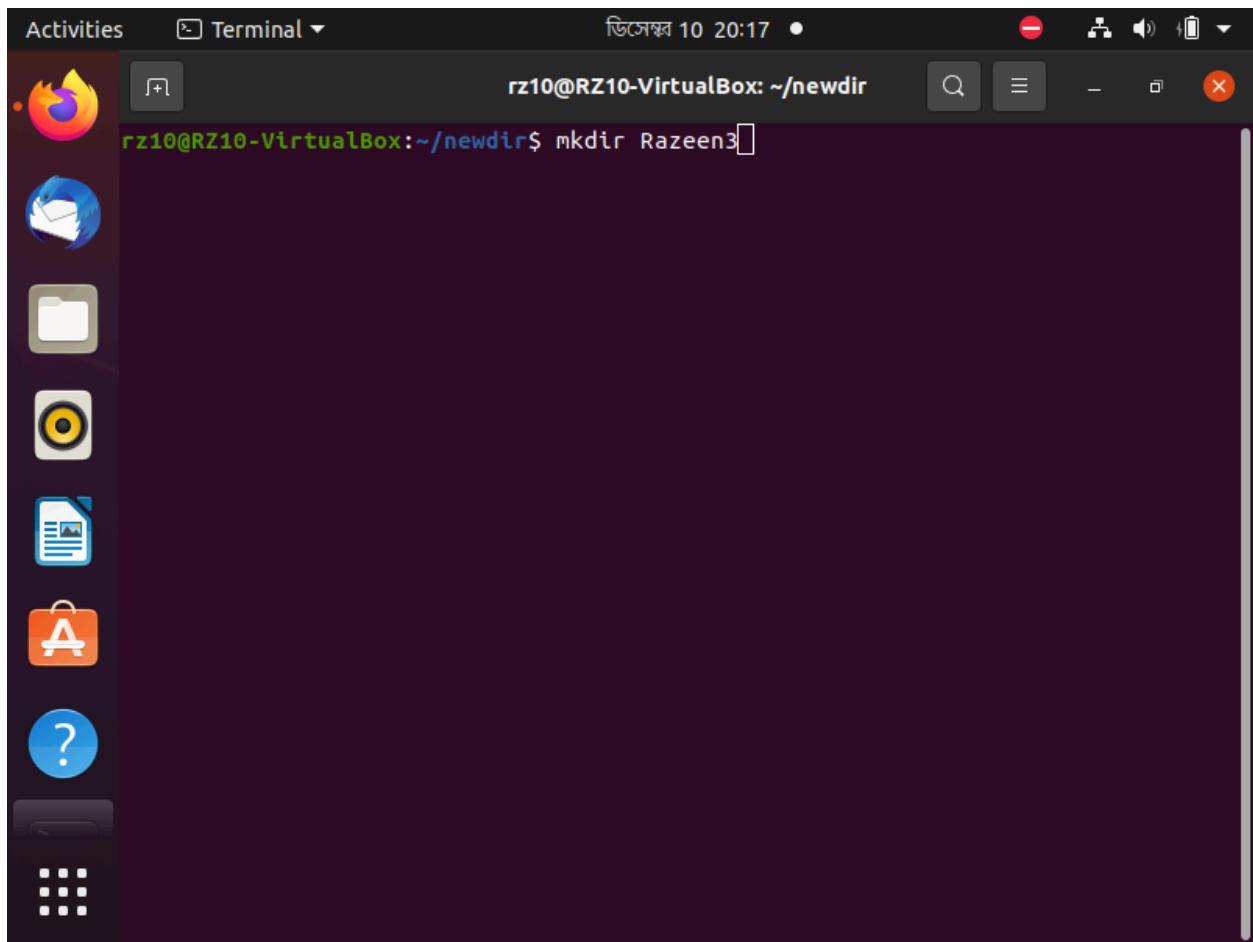
```
cp -r 21301079_1.txt 21301079_2.txt /home/rz10/Razeen2
```

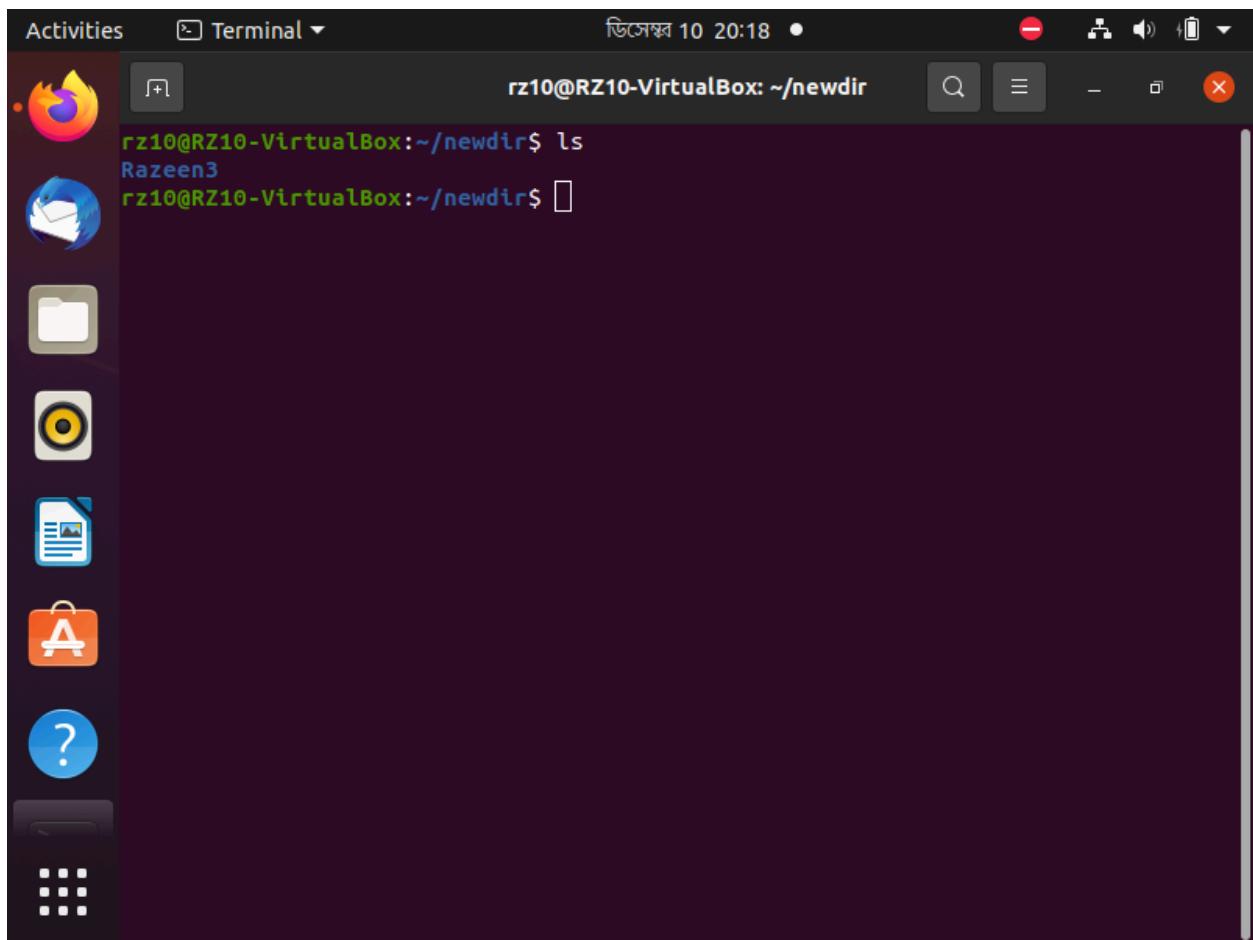


The screenshot shows a Linux desktop environment with a terminal window open. The terminal window title is "rz10@RZ10-VirtualBox: ~/Razeen2". The terminal content shows the user navigating through their home directory and executing commands to copy files. The file names listed include 21301079_1.txt, 21301079_2.txt, 21301079_3.txt, array.c, comm, command, command.c, course.txt, Desktop, Documents, Downloads, folder1, folder2, folder3, for_loop, for_loop.c, great_num, great_num.c, if_else, if_else.c, input, input.c, lab2, lines.txt, Music, per_info, per_info.c, Pictures, practice, Public, practice.c, snap, Templates, Videos, and Razeen1, Razeen2, Razeen3.

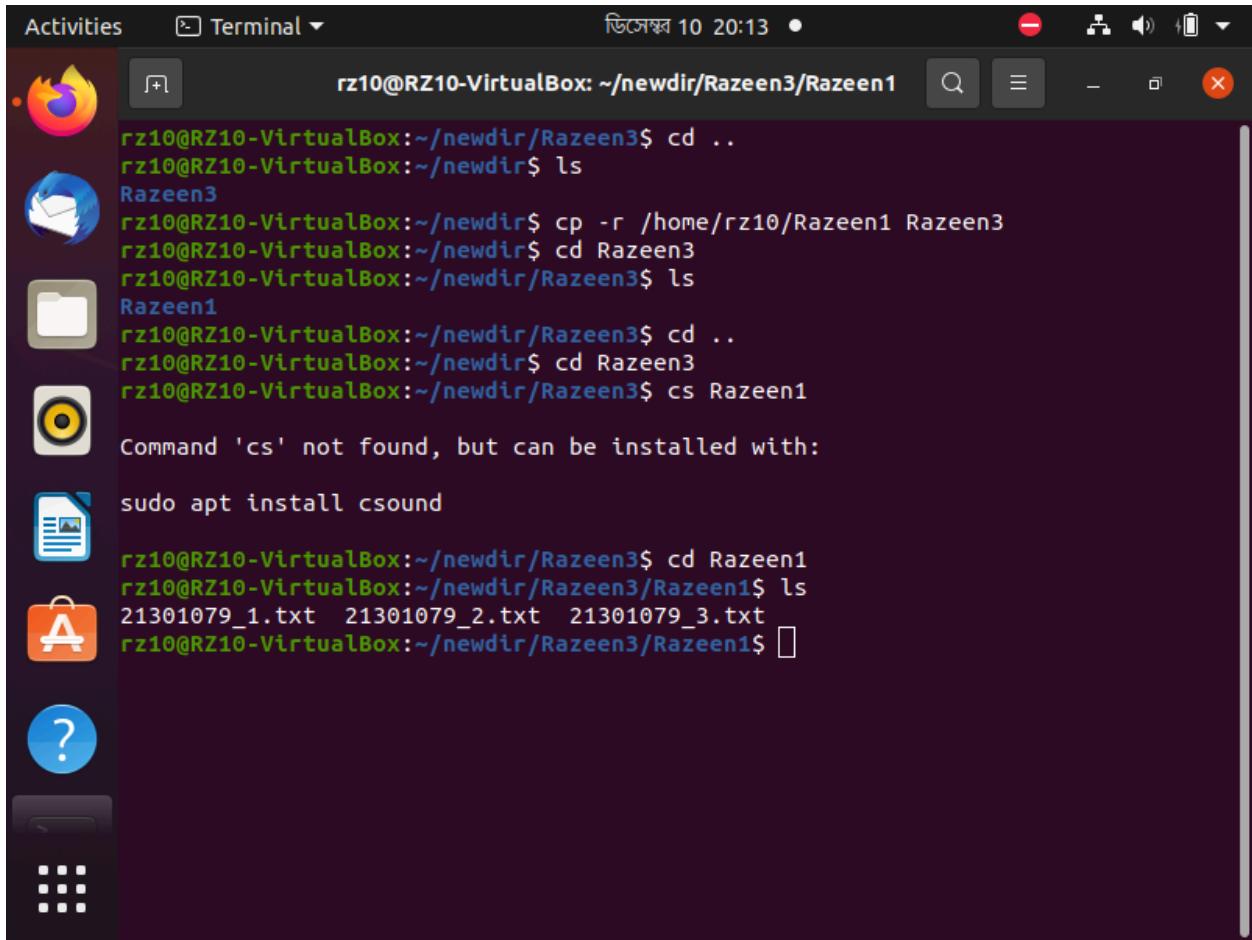
```
rz10@RZ10-VirtualBox:~$ ls
21301079_1.txt  course.txt  folder4      input      Pictures    snap
21301079_2.txt  Desktop     for_loop    input.c    practice   Templates
21301079_3.txt  Documents   for_loop.c  lab2      practice.c Videos
array.c          Downloads   great_num   lines.txt  Public
comm             folder1    great_num.c Music    Razeen1
command          folder2    if_else    per_info  Razeen2
command.c        folder3    if_else.c  per_info.c rz3
rz10@RZ10-VirtualBox:~$ mv 21301079_1.txt 21301079_2.txt 21301079_3.txt Razeen1
rz10@RZ10-VirtualBox:~$ cd Razeen1
rz10@RZ10-VirtualBox:~/Razeen1$ ls
21301079_1.txt  21301079_2.txt  21301079_3.txt
rz10@RZ10-VirtualBox:~/Razeen1$ pwd
/home/rz10/Razeen1
rz10@RZ10-VirtualBox:~/Razeen1$ cp -r 21301079_1.txt 21301079_2.txt /home/rz10/
Razeen2
rz10@RZ10-VirtualBox:~/Razeen1$ cd ..
rz10@RZ10-VirtualBox:~$ cd Razeen2
rz10@RZ10-VirtualBox:~/Razeen2$ ls
21301079_1.txt  21301079_2.txt
rz10@RZ10-VirtualBox:~/Razeen2$ 
```

mkdir Razeen3





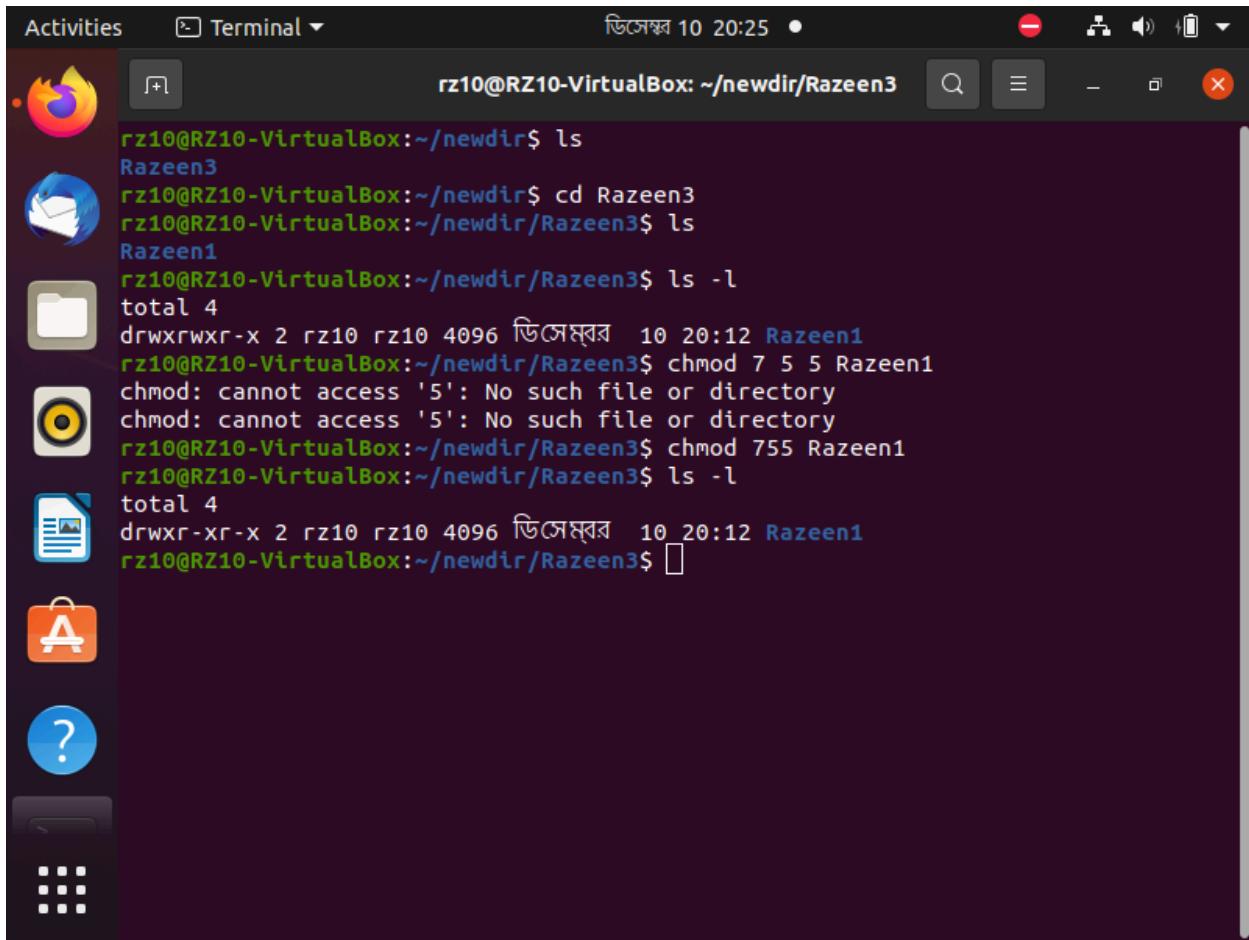
```
cp -r /home/rz10/Razeen1 Razeen3
```



The screenshot shows a Linux desktop environment, likely Ubuntu, with a terminal window open. The terminal window title is "rz10@RZ10-VirtualBox: ~/newdir/Razeen3/Razeen1". The terminal history is as follows:

```
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ cd ..  
rz10@RZ10-VirtualBox:~/newdir$ ls  
Razeen3  
rz10@RZ10-VirtualBox:~/newdir$ cp -r /home/rz10/Razeen1 Razeen3  
rz10@RZ10-VirtualBox:~/newdir$ cd Razeen3  
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ ls  
Razeen1  
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ cd ..  
rz10@RZ10-VirtualBox:~/newdir$ cd Razeen3  
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ cs Razeen1  
Command 'cs' not found, but can be installed with:  
  sudo apt install csound  
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ cd Razeen1  
rz10@RZ10-VirtualBox:~/newdir/Razeen3/Razeen1$ ls  
21301079_1.txt 21301079_2.txt 21301079_3.txt  
rz10@RZ10-VirtualBox:~/newdir/Razeen3/Razeen1$
```

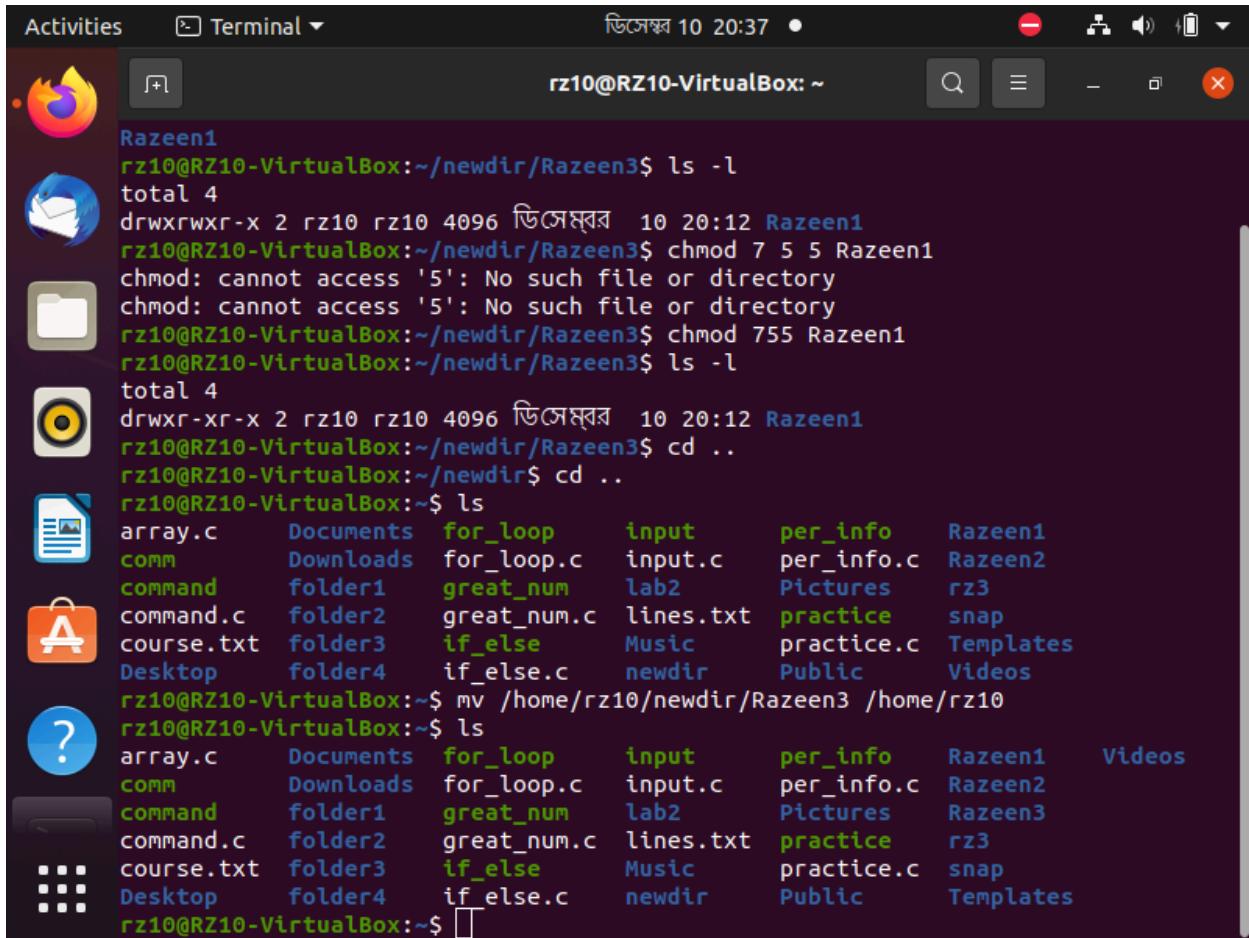
chmod 755 Razeen1



The screenshot shows a standard Ubuntu desktop environment with a Unity interface. A terminal window is open in the top panel, titled "Terminal". The terminal's title bar also displays the date and time: "ডিসেম্বর 10 20:25". The terminal window contains the following command history:

```
rz10@RZ10-VirtualBox:~/newdir$ ls
Razeen3
rz10@RZ10-VirtualBox:~/newdir$ cd Razeen3
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ ls
Razeen1
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ ls -l
total 4
drwxrwxr-x 2 rz10 rz10 4096 ডিসেম্বর 10 20:12 Razeen1
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ chmod 7 5 5 Razeen1
chmod: cannot access '5': No such file or directory
chmod: cannot access '5': No such file or directory
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ chmod 755 Razeen1
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ ls -l
total 4
drwxr-xr-x 2 rz10 rz10 4096 ডিসেম্বর 10 20:12 Razeen1
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ 
```

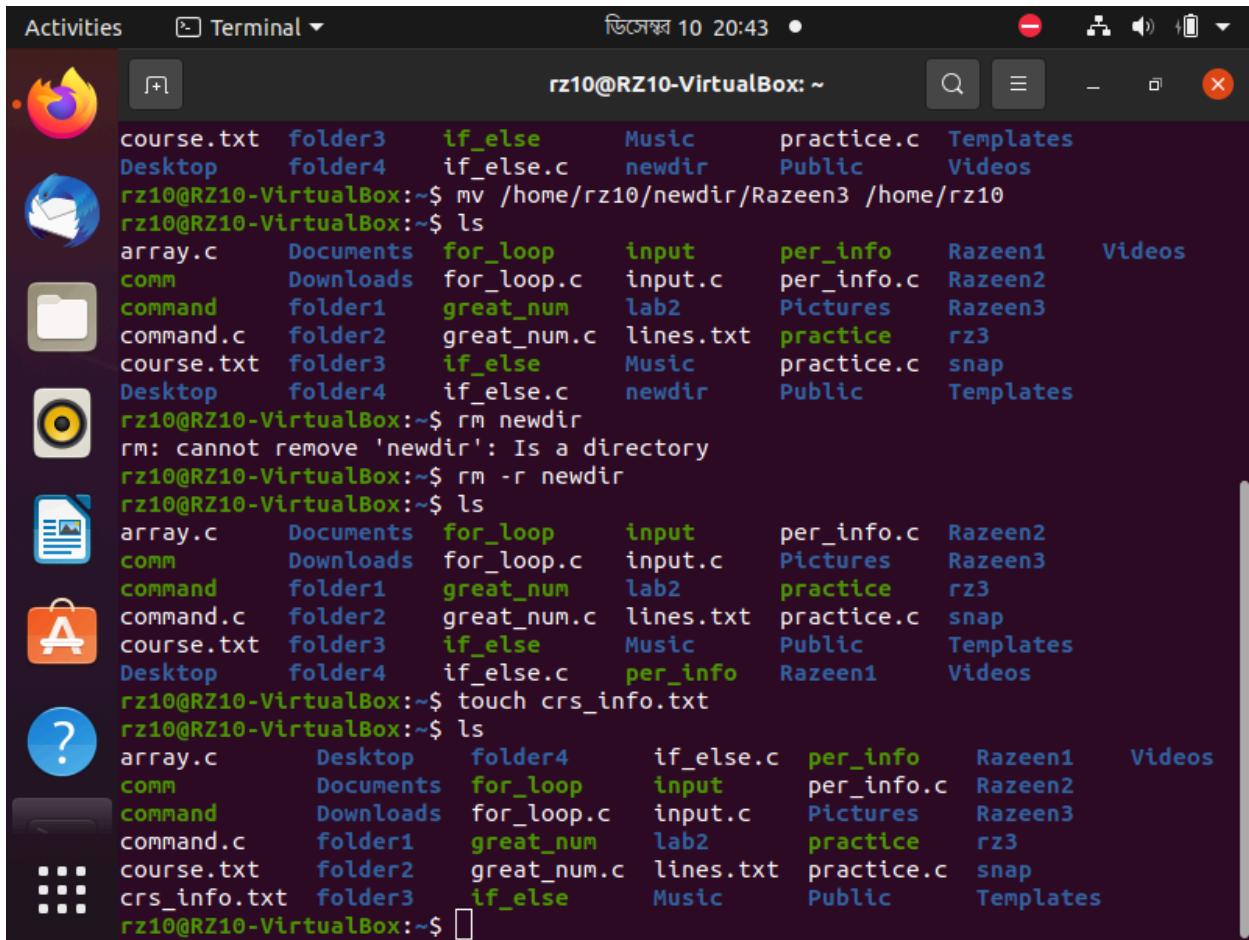
```
cd ..  
cd ..  
mv /home/rz10/newdir/Razeen3 /home/rz10
```



A screenshot of an Ubuntu desktop environment. On the left, there's a dock with icons for the Dash, Home, Applications, and Help. The main area shows a terminal window titled "Terminal". The terminal window has a dark theme and displays the following command history:

```
Razeen1  
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ ls -l  
total 4  
drwxrwxr-x 2 rz10 rz10 4096 ডিসেম্বর 10 20:12 Razeen1  
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ chmod 7 5 5 Razeen1  
chmod: cannot access '5': No such file or directory  
chmod: cannot access '5': No such file or directory  
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ chmod 755 Razeen1  
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ ls -l  
total 4  
drwxr-xr-x 2 rz10 rz10 4096 ডিসেম্বর 10 20:12 Razeen1  
rz10@RZ10-VirtualBox:~/newdir/Razeen3$ cd ..  
rz10@RZ10-VirtualBox:~/newdir$ cd ..  
rz10@RZ10-VirtualBox:~$ ls  
array.c    Documents  for_loop    input      per_info   Razeen1  
comm       Downloads  for_loop.c  input.c    per_info.c Razeen2  
command    folder1   great_num   lab2      Pictures   rz3  
command.c  folder2   great_num.c lines.txt  practice   snap  
course.txt folder3   if_else     Music     practice.c Templates  
Desktop    folder4   if_else.c   newdir    Public     Videos  
rz10@RZ10-VirtualBox:~$ mv /home/rz10/newdir/Razeen3 /home/rz10  
rz10@RZ10-VirtualBox:~$ ls  
array.c    Documents  for_loop    input      per_info   Razeen1   Videos  
comm       Downloads  for_loop.c  input.c    per_info.c Razeen2  
command    folder1   great_num   lab2      Pictures   Razeen3  
command.c  folder2   great_num.c lines.txt  practice   rz3  
course.txt folder3   if_else     Music     practice.c snap  
Desktop    folder4   if_else.c   newdir    Public     Templates  
rz10@RZ10-VirtualBox:~$
```

rm -r newdir



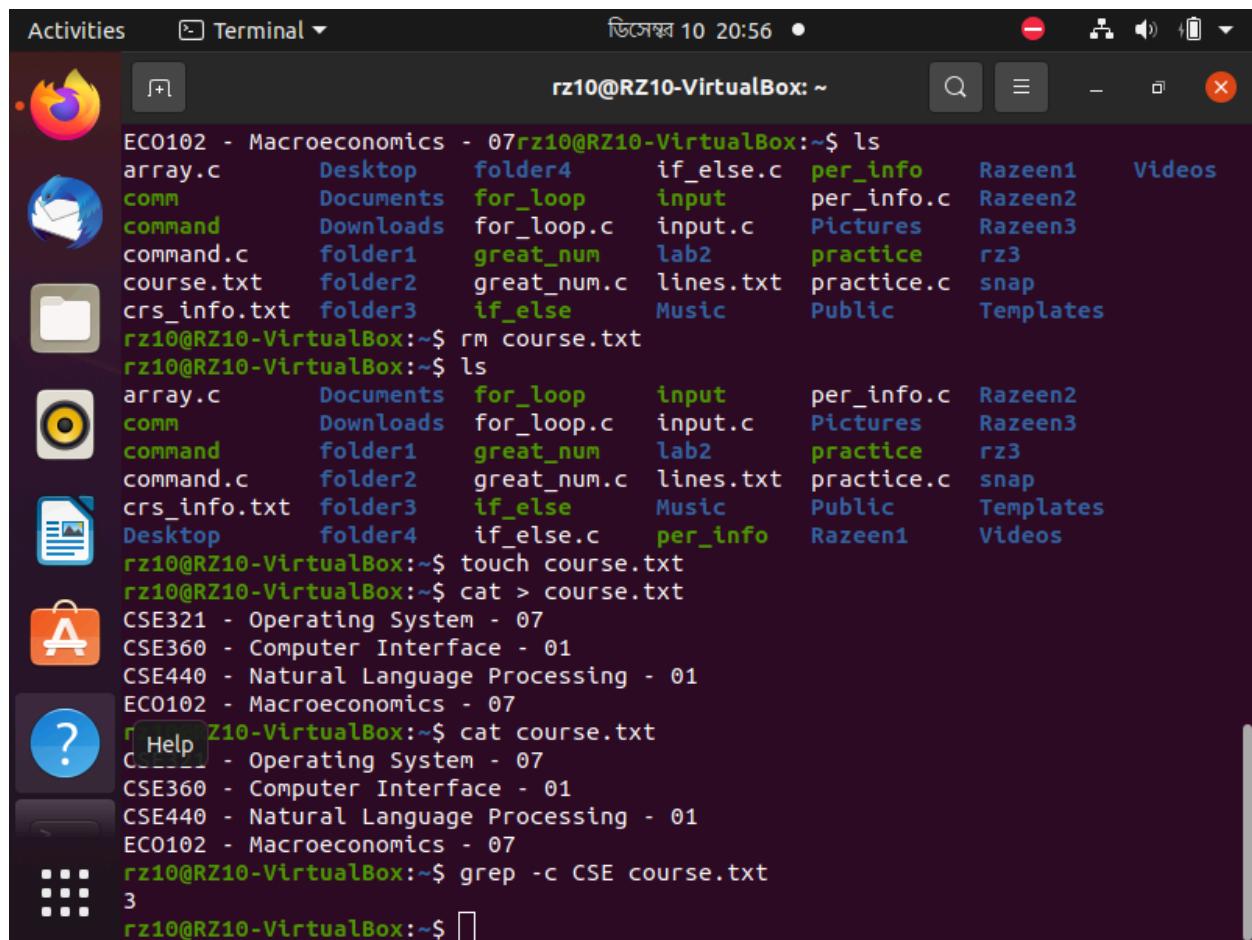
The screenshot shows a Linux desktop environment with a terminal window open. The terminal window title is "Terminal" and the status bar shows "ডিসেম্বর 10 20:43". The terminal content is as follows:

```
Activities Terminal ▾ rz10@RZ10-VirtualBox: ~
rz10@RZ10-VirtualBox:~$ mv /home/rz10/newdir/Razeen3 /home/rz10
rz10@RZ10-VirtualBox:~$ ls
array.c    Documents  for_loop   input     per_info  Razeen1  Videos
comm       Downloads  for_loop.c  input.c   per_info.c Razeen2
command    folder1   great_num  lab2     Pictures  Razeen3
command.c   folder2   great_num.c lines.txt practice  rz3
course.txt  folder3   if_else    Music    practice.c snap
Desktop    folder4   if_else.c  newdir   Public   Templates
rz10@RZ10-VirtualBox:~$ rm newdir
rm: cannot remove 'newdir': Is a directory
rz10@RZ10-VirtualBox:~$ rm -r newdir
rz10@RZ10-VirtualBox:~$ ls
array.c    Documents  for_loop   input     per_info.c Razeen2
comm       Downloads  for_loop.c  input.c   Pictures  Razeen3
command    folder1   great_num  lab2     practice  rz3
command.c   folder2   great_num.c lines.txt practice.c snap
course.txt  folder3   if_else    Music    Public   Templates
Desktop    folder4   if_else.c  per_info  Razeen1  Videos
rz10@RZ10-VirtualBox:~$ touch crs_info.txt
rz10@RZ10-VirtualBox:~$ ls
array.c    Desktop   folder4   if_else.c  per_info  Razeen1  Videos
comm       Documents for_loop   input     per_info.c Razeen2
command    Downloads for_loop.c  input.c   Pictures  Razeen3
command.c   folder1  great_num  lab2     practice  rz3
course.txt  folder2  great_num.c lines.txt practice.c snap
crs_info.txt folder3  if_else    Music    Public   Templates
rz10@RZ10-VirtualBox:~$
```

```
touch course.txt
```

```
cat > course.txt
```

```
grep -c CSE course.txt
```



The screenshot shows a Linux desktop environment with a terminal window open. The terminal window title is "Terminal". The session starts with:

```
rz10@RZ10-VirtualBox:~$ ls
```

listing files and folders including array.c, comm, command, command.c, course.txt, crs_info.txt, Desktop, great_num, if_else, input, lab2, lines.txt, Music, per_info, Pictures, practice, Public, Videos, and folder1 through folder4.

```
rz10@RZ10-VirtualBox:~$ rm course.txt
```

```
rz10@RZ10-VirtualBox:~$ ls
```

After removing course.txt, the listing changes.

```
rz10@RZ10-VirtualBox:~$ touch course.txt
```

```
rz10@RZ10-VirtualBox:~$ cat > course.txt
```

Then, the user types in the terminal:

```
CSE321 - Operating System - 07
CSE360 - Computer Interface - 01
CSE440 - Natural Language Processing - 01
ECO102 - Macroeconomics - 07
```

```
rz10@RZ10-VirtualBox:~$ cat course.txt
```

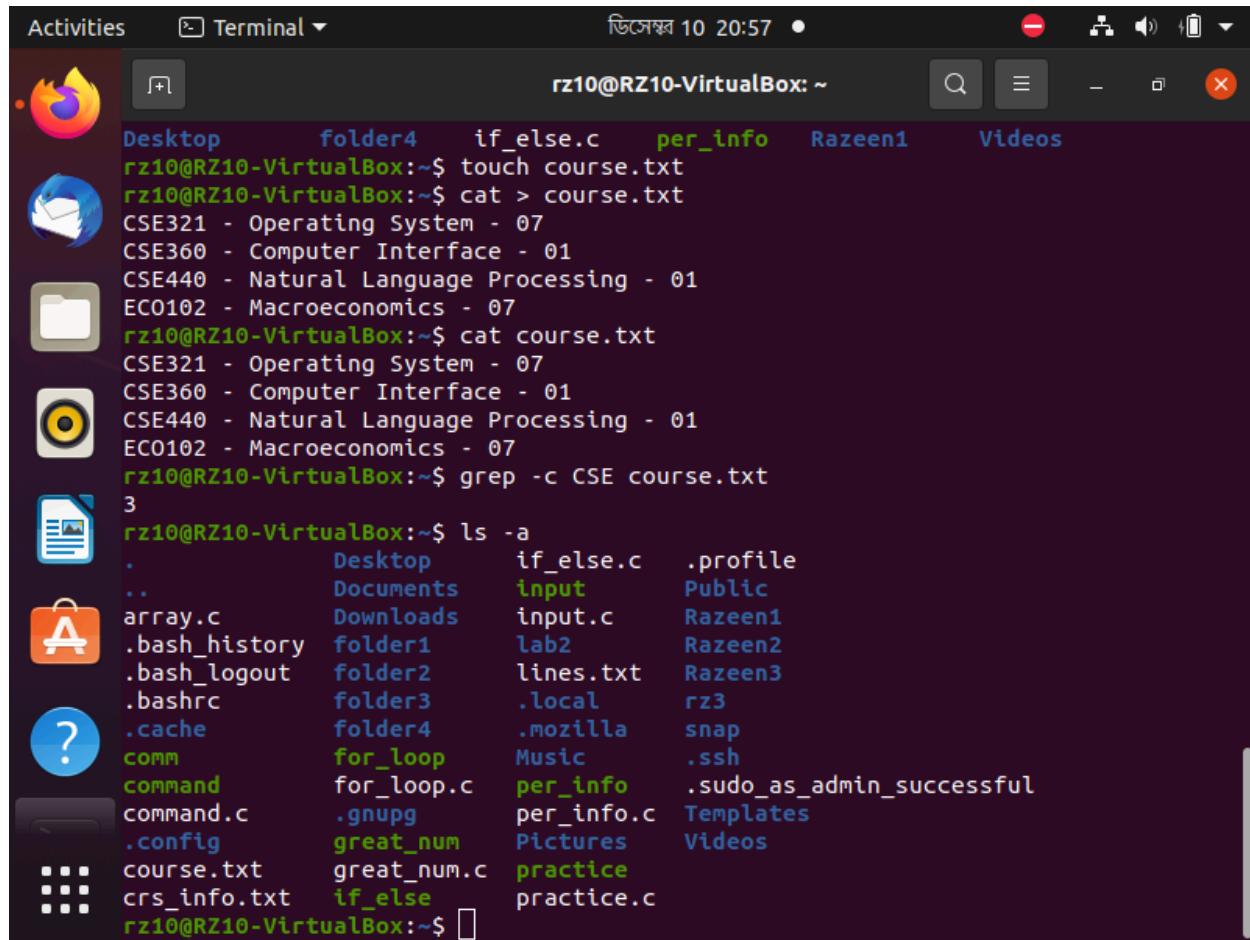
Finally, the user runs a grep command:

```
rz10@RZ10-VirtualBox:~$ grep -c CSE course.txt
```

```
3
```

```
rz10@RZ10-VirtualBox:~$
```

ls -a



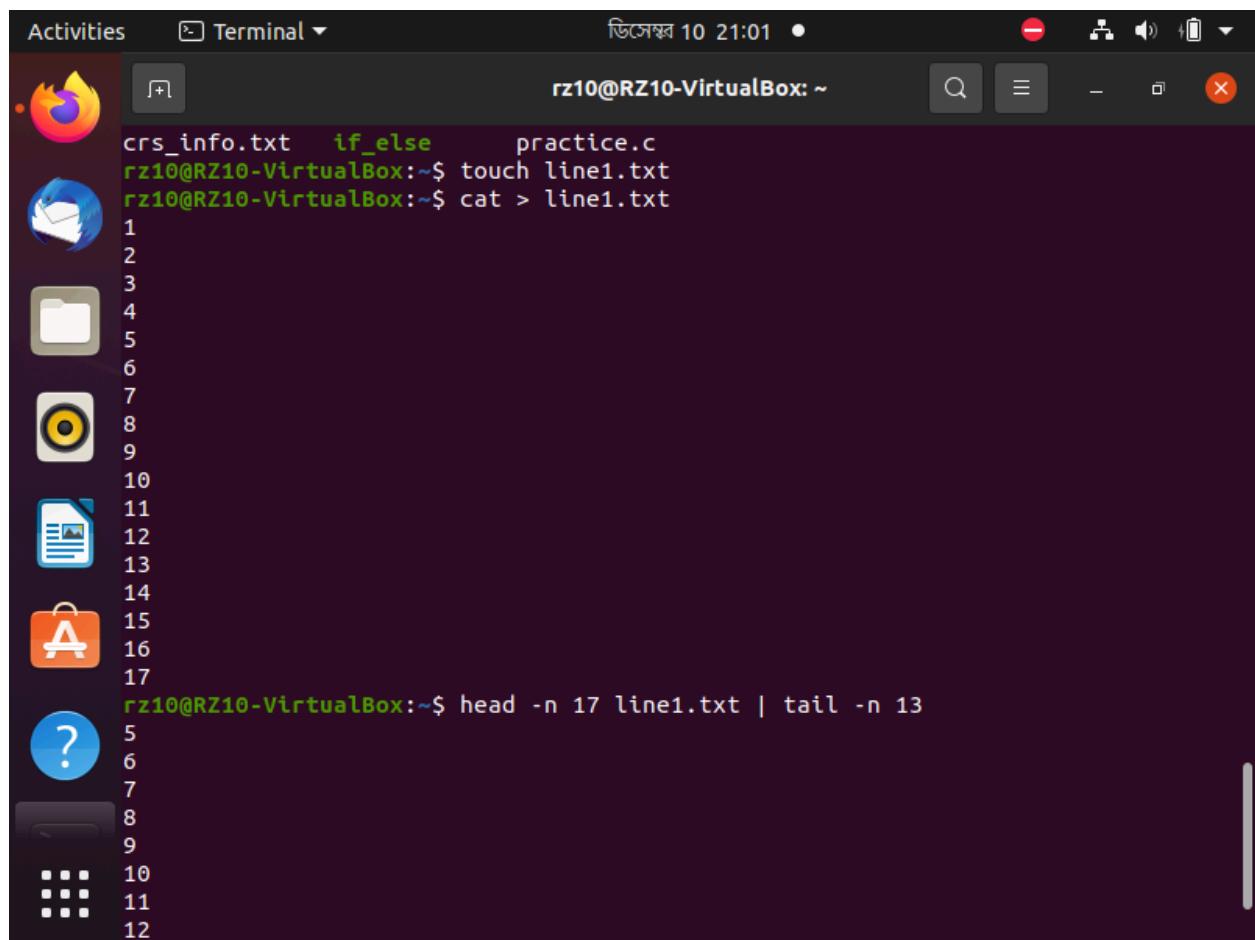
A screenshot of an Ubuntu desktop environment. In the top left, there's an 'Activities' button and a 'Terminal' window icon. The terminal window is open and shows the command 'ls -a' being run. The output of the command is displayed, listing all files and directories in the current directory (~). The terminal window has a dark theme with white text and icons. The desktop background is also dark.

```
Activities Terminal ▾ rz10@RZ10-VirtualBox: ~
rz10@RZ10-VirtualBox:~$ ls -a
Desktop      folder4    if_else.c   per_info  Razeen1    Videos
rz10@RZ10-VirtualBox:~$ touch course.txt
rz10@RZ10-VirtualBox:~$ cat > course.txt
CSE321 - Operating System - 07
CSE360 - Computer Interface - 01
CSE440 - Natural Language Processing - 01
ECO102 - Macroeconomics - 07
rz10@RZ10-VirtualBox:~$ cat course.txt
CSE321 - Operating System - 07
CSE360 - Computer Interface - 01
CSE440 - Natural Language Processing - 01
ECO102 - Macroeconomics - 07
rz10@RZ10-VirtualBox:~$ grep -c CSE course.txt
3
rz10@RZ10-VirtualBox:~$ ls -a
.
..
array.c      Desktop    if_else.c   .profile
.array       Documents  input       Public
.bash_history  Downloads  input.c     Razeen1
.bash_logout   folder1   lab2       Razeen2
.bashrc       folder2   lines.txt   Razeen3
.cache        folder3   .local     rz3
.comm         folder4   .mozilla   snap
.command     for_loop   per_info   .sudo_as_admin_successful
command.c    for_loop.c per_info.c Templates
.config       great_num  Pictures   Videos
course.txt   great_num.c practice
crs_info.txt  if_else   practice.c
rz10@RZ10-VirtualBox:~$
```

```
touch line1.txt
```

```
cat > line1.txt
```

```
head -n 17 line1.txt | tail -n 13
```



A screenshot of a Linux desktop environment, likely Ubuntu, showing a terminal window. The terminal window has a dark purple background and contains the following command-line session:

```
Activities Terminal ▾ rz10@RZ10-VirtualBox: ~
crs_info.txt  if_else  practice.c
rz10@RZ10-VirtualBox:~$ touch line1.txt
rz10@RZ10-VirtualBox:~$ cat > line1.txt
1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
rz10@RZ10-VirtualBox:~$ head -n 17 line1.txt | tail -n 13
5
6
7
8
9
10
11
12
```

