APARNA E GOPALAN
S4CS
ROLL NO-65
FOSS LAB

1.Getting started with linux basic commands for directory oerations,displaying directory structure in tree format etc.
2.Linux commands for operations such as redirection,pipes,filters,job control,changing ownership/permissions of files/linksdirectory.
3.Advanced linux commands curl,wget,ftp,ssh and grep

Command 1:
Purpose:Making a directory
Usage:mkdir<directory name>
Sample i/p and o/p:s1765@linux-server:~$ mkdir template
s1765@linux-server:~$ ls
template

Command 2:
Purpose:for getting in to the directory
Usage:cd <directory name>
 sample ip and o/p: s1765@linux-server:~$ cd
template s1765@linux-server:~/template$ ls

Command 3:
Purpose:getting back from the directory
 Usage:cd..
Sample Ip and o/p:s1765@linux-server:~/template$ cd ..
s1765@linux-server:~$ ls

Command 4:
Purpose:to create a file
Usage:nano<filename>
Sample I/p and o/p:s1765@linux-server:~$
nano hello s1765@linux-server:~$ nano file1

Command 5:
Purpose:Displaying all files in the directory
Usage:ls<filename(optional)>
Sample ip and o/p:s1765@linux-
server:~/s4cs65$ ls file1

Command 6:
PurPose:It displays all the commands done
previously Usage:history
Samle i/p and o/p:s1765@linux-server:~/s4cs65$ history
1 mkdir template
2 cd template
3 cd..
4 nano hello
5 ls

6 history

Command 7:
Purpose:To create a file
Usage:touch<filename>
Sample i/p and o/p:s1765@linux-server:~/s4cs65$
touch appu s1765@linux-server:~/s4cs65$ ls appu

Command 8:
Purpose:To dislay the contents in the file
Usage:cat <filename>
Sample i/p and o/p:s1765@linux-server:~$ nano
file1 s1765@linux-server:~$ cat file1 hhh

kkk
lll
uuu
ooo
eee
tt
aa
cc

Command 9:
Purpose:To display first three lines from the top
Usage:s1765@linux-server:~$ head hello -n 3
aaa
bbb
ccc

Command 10:
Purpose:remove the directory
Usage:rm -r<directory name>
Sample i//p and o/p:s1765@linux-server:~/s4cs65$ rm -r
Template s1765@linux-server:~$ cd Template
-bash: cd: Template: No such file or directory

Command 11:
Purpose:move a file to a directory
Usage:mv filename <directory name>
Sample i/p and o/p:s1765@linux-server:~$ mv file1
s4cs65 s1765@linux-server:~$ cd s4cs65
s1765@linux-server:~/s4cs65$ ls file1

Command 12:
Purpose:to check the string in the file
Usage:grep a filename
Samle i/p and o/p:s1765@linux-server:~/s4cs65$ grep
a file1 aa

Command 13:
Purpose :to check the string in the file
Usage:grep -i "a" filename
sample i/p and o/p:s1765@linux-server:~/s4cs65$ grep -i "a" file1
aa
adgfs
fgat
kja
kasw
Command 14:
Purpose:to print the first 10 lines
Usage:head filename
Samle i/p and o/p:s1765@linux-server:~/s4cs65$ head file1
hhh
kkk
lll
uuu
ooo
eee
tt
aa
cc
adgfs

Command 15:
purpose:to print the last three lines
Usage:tail file n 3
sample i/p and o/p:
s1765@linux-server:~/s4cs65$ tail file1 -n 3
fgat
kja
kasw

Command 16:
purpose:to remove a file
Usage:rm filename
sample i/p and o/p:
s1765@linux-server:~/s4cs65$ rm file3
s1765@linux-server:~/s4cs65$ ls
file1 file2

Command 17:
purpose:to print the string starting with a
Usage:cat file1 |grep ^a
Sample i/p and o/ps1765@linux-server:~/s4cs65$ cat file1 |grep ^a
aa
adgfs

Command 18:
purpose:to print the starting with c
usage:cat file 1|grep c$
sample i/p and o/p:

s1765@linux-server:~/s4cs65$ cat file1 |grep c$
cc

Command 19:
purpose:to count the no. Of a in the file
usage:cat file1 |grep^a |wc -l
sample i/p and o/p:s1765@linux-server:~/s4cs65$ cat file1 |grep ^a
| wc -l 2

Command 20:
Purpose:to get the complete details
Usage:uname -a
sample i/p and o/p:
s1765@linux-server:~/s4cs65$ uname -a
Linux linux-server 3.13.0-32-generic #57-Ubuntu SMP Tue Jul 15 03:51:08 UTC 2014
x86_64 x86_64 x86_64 GNU/Linux

Command 21:
Purpose:to get the detail
Usage:uname
Sample i/p and o/p:s1765@linux-server:~/s4cs65$ uname
Linux

Command 22:
Purpose:to sort the file in alphabetical order
Usage:sort filename
s1765@linux-server:~/s4cs65$ sort file10
abhi
achu
anju
aparna
chinju
preetha
remani
sreenu
vyshaki

Command 23:
Purpose:to get the string ending with u
Usage:grep -i "u" file10
sample i/p and o/p:
s1765@linux-server:~/s4cs65$ grep -i "u" file10
chinju
anju
achu
sreenu

Command 24:

Purpose :Counting word,lines,characters
Usage :wc {-l,-c,-w} filename

Sample I/p and Output :ubnutu@ubnutu-VPCEH26EN:~$ wc
-l file 3 file

Command 25:
Purpose :to sort file alphabetically
Usage :sort {-n} {-kcolumn number} filename
Sample I/p and o/p :ubnutu@ubnutu-VPCEH26EN:~$ cat file1
sahil
anju
miya
riya
ubnutu@ubnutu-VPCEH26EN:~$ sort file1
anju
miya
riya
sahil

Command 26:
Purpose :sed can perform editing functions in
stream Usage :sed expression
Sample I/p and O/p:ubnutu@ubnutu-VPCEH26EN:~$ echo appu123 | sed
                    's//llu/' llu123

Command 27:
Purpose :To list all background jobs
Usage :jobs
Sample I/p and Output :ubnutu@ubnutu-VPCEH26EN:~$ jobs
[1]+ Stopped   tr w q

Command 28:
Purpose :giving current foreground job to
background Usage :CTRL + ZK
                    [3]+ Stopped   find / -type d -name "*.c"
                    ubnutu@ubnutu-VPCEH26EN:~$ bg
                    [3]+ find / -type d -name "*.c" &

Command 29:
Purpose : locating the file
Usage :locate filename
Sample I/p and O/p:ubnutu@ubnutu-VPCEH26EN:~$ locate vivo
                    /home/ubnutu/.local/share/Trash/files/vivo
                    /home/ubnutu/.local/share/Trash/files/vivo/Desktop
                    /home/ubnutu/.local/share/Trash/files/vivo/dd
                    /home/ubnutu/.local/share/Trash/files/vivo/deen
                    /home/ubnutu/.local/share/Trash/info/vivo.trashinfo
                    /usr/share/mime/video/vnd.Uvivo.xml

Command 30:
Purpose :Killing a specific background job
Usage :killing %jobnumber
Sample I/p and O/p :ubnutu@ubnutu-VPCEH26EN:~$ kill
                %9 ubnutu@ubnutu-VPCEH26EN:~$ jobs
                        [1]+ Stopped   tr w q
                        [2]- Terminated   tr w q

Command 31
Purpose :Downloading the files.
Usage :wget url
Sample I/p and O/p:ubnutu@ubnutu-VPCEH26EN:~/fol$
wget https://ssl.gstatic.com/gb/images/v1_051523630.png
--2019-02-08 14:11:20-- https://ssl.gstatic.com/gb/images/v1_051523630.png
Resolving ssl.gstatic.com (ssl.gstatic.com)... 2404:6800:4007:80c::2003,
172.217.163.67 Connecting to ssl.gstatic.com
(ssl.gstatic.com)|2404:6800:4007:80c::2003|:443... connected. HTTP request sent,
awaiting response... 200 OK Length: 63333 (62K) [image/png]
Saving to: 'v1_051523630.png'

v1_051523630.png   100%
[===>]
61.85K 251KB/s   in 0.2s

2019-02-08 14:11:21 (251 KB/s) - 'v1_051523630.png' saved [63333/63333]

ubnutu@ubnutu-VPCEH26EN:~/fol$ ls
v1_051523630.png

Command 32:
Purpose:open an ftp connection to a remote
system Usage :ftp <ip address>
Sample I/p and O/p :ubnutu@ubnutu-VPCEH26EN:~$ ftp 137.97.18.93
                        ftp: connect: Connection timed out
                        ftp> ^Z
                        [4]+ Stopped   ftp 137.97.18.93

Command 33:
Purpose :logging into the remote machine, transferring files.
Usage :ssh <hostname>
Sample I/p and O/p :ubnutu@ubnutu-VPCEH26EN:~$ ssh ubnutu-VPCEH26EN
                        ssh: connect to host ubnutu-vpceh26en port 22: Connection refused

Command 34:
Purpose :To search string or pattern
Usage :grep {-i,w} <string> <filename>
Sample I/p and O/p :s1765@linux-server:~$ nano
                        templates s1765@linux-server:~$
                        nano apu s1765@linux-server:~$
                        grep anju test3 Anju
                        s1765@linux-server:~$ grep -i anju test3

Anju
s1765@linux-server:~$ grep -w anjutest3
s1765@linux-server:~$ grep -w anjutest3
anju

Command 35:
Purpose :Transferring the datas from the url
Usage :curl url
Sample I/p and O/p :ubnutu@ubnutu-VPCEH26EN:~$ curl
www.skyfilabs.com <html>
<head><title>301 Moved Permanently</title></head>
<body bgcolor="white">
<center><h1>301 Moved Permanently</h1></center>
</body>
</html>

Command 36:

Purpose:To output commands result to file (append)
Usage :Linux-command >> filename
Sample I/p and O/p :ubnutu@ubnutu-VPCEH26EN:~$ ls ./there >>
file.txt ubnutu@ubnutu-VPCEH26EN:~$ cat
file.txt Hai
oppo

Command 37:
Purpose :Using pipe more than two commands can be
connected Usage :command 1 | command 2 | command 3
Sample I/p and O/p:To count words starting with some letter
s1765@linux-server:~/anna$ cat test | grep ^H
|wc -l 1
To display word starting with some letter
s1765@linux-server:~/anna$ cat test | grep ^H
Hello Good Morning
Command 38:
Purpose:logging into the remote machine, transferring files between the two machines, and for
executing commands on the remote machine.
Usage :ssh <hostname>
Sample I/p and O/p:ubnutu@ubnutu-VPCEH26EN:~$ ssh ubnutu-aparna
ssh: connect to host ubnutu-aparna port 22: Connection refused