

Viewing Files



Viewing Files

There are a few Linux commands available to view the content of files. The `cat` command, which stands for “concatenate”, is often used to quickly view the contents of small files.

The `cat` command will display the entire contents of the file, hence why it is mainly recommended for smaller files where the output is limited and does not require scrolling. To view the contents of a file using the `cat` command, simply type the command and use the name of the file you wish to view as the argument:

```
cat [OPTIONS] [FILE]
```

Our VM has a few small text files that you can view with the `cat` command. One such file is the `animals.txt` file:

Follow Along

Use the following command to switch to the `Documents` directory:

```
sysadmin@localhost:~$ cd ~/Documents
```

```
sysadmin@localhost:~/Documents$ cat animals.txt
```

```
1 retriever
2 badger
3 bat
4 wolf
5 eagle
```

The `cat` command displays all five lines of the file above. When viewing larger files, the `cat` command can result in very lengthy output that cannot be paused to scroll through. A better method of viewing long text files, is with a pager command which has a functionality that can pause and scroll through the output of the file.

Note

Examples of pager commands include the `more` and `less` commands. These and additional commands used for viewing files in Linux are covered in [NDG Linux Essentials](#). Another way to view the content of files is by using the `head` and `tail` commands. These commands are used to view a select number of lines from the top or bottom of a file. Taking a look at a few lines of a file can sometimes be helpful to ensure that the file is the one you want to use.

Another reason to preview only the first or last few lines, is because some files, such as system log files are frequently updated with new entries. Similar to the `cat` command, the `head` and `tail` commands use the name of the file you want to view as the argument to the command:

```
head [OPTIONS] [FILE]
```

```
tail [OPTIONS] [FILE]
```

To compare the output of the `head` and `tail` commands with that of the `cat` command, use the `cat` command to view the entire `alpha.txt` file:

```
sysadmin@localhost:~/Documents$ cat alpha.txt
```

```
A is for Apple
B is for Bear
C is for Cat
D is for Dog
E is for Elephant
F is for Flower
G is for Grapes
H is for Happy
I is for Ink
J is for Juice
K is for Kangaroo
L is for Lol
M is for Monkey
N is for Nickel
O is for Oval
P is for Pickle
Q is for Quark
R is for Rat
S is for Sloth
T is for Turnip
U is for Up
V is for Velvet
W is for Walrus
X is for Xenon
Y is for Yellow
Z is for Zebra
```

```
sysadmin@localhost:~/Documents$
```

In the example above, all twenty-six lines of the file are displayed.

To filter the output and view lines from the top of the `alpha.txt` file, use the `head` command:

```
sysadmin@localhost:~/Documents$ head alpha.txt
A is for Apple
B is for Bear
C is for Cat
D is for Dog
E is for Elephant
F is for Flower
G is for Grapes
H is for Happy
I is for Ink
J is for Juice
```

Then, to view lines at the bottom of the `alpha.txt` file, you use the `tail` command:

```
sysadmin@localhost:~/Documents$ tail alpha.txt
Q is for Quark
R is for Rat
S is for Sloth
T is for Turnip
U is for Up
V is for Velvet
W is for Walrus
X is for Xenon
Y is for Yellow
Z is for Zebra
```

By examining the output of the `head` and `tail` commands above, you can see that the default behavior of the `head` and `tail` commands in this shell is to display ten lines.

The `-n` option with the `head` and `tail` commands can be used to specify the amount of lines to display. To use the `-n` option, specify the amount of lines from the file you want to display after the option and use the filename as an argument:

```
head -n number_of_lines filename
```

For example, to change the output of the `head` command to view the first five lines of the `alpha.txt` file:

```
sysadmin@localhost:~/Documents$ head -n 5 alpha.txt
A is for Apple
B is for Bear
C is for Cat
D is for Dog
E is for Elephant
```

View the last five lines of the `alpha.txt` file:

```
sysadmin@localhost:~/Documents$ tail -n 5 alpha.txt
V is for Velvet
W is for Walrus
X is for Xenon
Y is for Yellow
Z is for Zebra
sysadmin@localhost:~/Documents$
```