Поиск файлов. Перенаправление ввода-вывода. Просмотр запущенных процессов.

Мурашко В.В.

14.05.2021

Отчёт по лабораторной работе №7

Цель работы

Ознакомление с инструментами поиска файлов и фильтрации текстовых данных. Приобретение практических навыков: по управлению процессами (и заданиями), по проверке использования диска и обслуживанию файловых систем.

Запись названия файлов

```
vvmurashko1@dk4n70 ~ $ ls /etc > file.txt
vvmurashko1@dk4n70 ~ $ ls ~ >> file.txt
```

```
vvmurashko1@dk4n70 ~ $ grep .conf file.txt
appstream.conf
brltty.conf
ca-certificates.conf
cachefilesd.conf
cfg-update.conf
cpufreq-bench.conf
dconf
dhcpcd.conf
dispatch-conf.conf
dleyna-server-service.conf
dnsmasq.conf
e2fsck.conf
e2scrub.conf
etc-update.conf
fluidsynth.conf
```

Новый текстовый файл

```
vvmurashko1@dk4n70 ~ $ grep .conf file.txt > conf.txt
```

Имена файлов в домашнем каталоге

```
vvmurashko1@dk4n70 ~ $ ls -l | grep c*
-rw-r--r- 1 vvmurashko1 studsci 1233 мая 14 10:13 conf.txt
vvmurashko1@dk4n70 ~ $ find ~/c* -name "c*" -print
/afs/.dk.sci.pfu.edu.ru/home/v/v/vvmurashko1/conf.txt
```

Имена файлов из каталога /etc

```
vvmurashko1@dk4n70 ~ $ cd /etc
vvmurashko1@dk4n70 /etc $ ls -l | grep h* | less
grep: harbour: Это каталог
vvmurashko1@dk4n70 /etc $ cd
```

Удаление файла

```
vvmurashko1@dk4n70 ~ $ find ~ -name "log*" -print > ~/logfile &
[1] 4208
vvmurashko1@dk4n70 ~ $ rm -r logfile
[1]+ Завершён find ~ -name "log*" -print > ~/logfile
```

Запуск редактора

```
vvmurashko1@dk4n70 ~ $ gedit &
[1] 4265
```

Идентификатор процессора

```
    vvmurashko1@dk4n70 - $ ps aux | grep -i gedit

    vvmurash 3955 .0 9.1 6.776192 135904 ?
    S1 10:08 0:06 /usr/bin/gedit --gapplication-service

    vvmurash 4323 0.0 0.0 13320 972 pts/3
    S+ 10:20 0:00 grep --colour=auto -i gedit

    [1]+ 3asepuë+
    gedit
```

Команда kill

```
KILL(1)
                              User Commands
                                                                  KILL(1)
NAME
      kill - send a signal to a process
SYNOPSIS
      kill [options] <pid> [...]
DESCRIPTION
      The default signal for kill is TERM. Use -1 or -L to list available
      signals. Particularly useful signals include HUP, INT, KILL, STOP,
      CONT, and 0. Alternate signals may be specified in three ways: -9,
      -SIGKILL or -KILL. Negative PID values may be used to choose whole
      process groups; see the PGID column in ps command output. A PID of
      -1 is special: it indicates all processes except the kill process
      itself and init
OPTIONS
      <pid> [...]
             Send signal to every <pid> listed.
      -<signal>
      -s <signal>
      --signal <signal>
             Specify the signal to be sent. The signal can be specified
             by using name or number. The behavior of signals is ex-
             plained in signal(7) manual page.
      -1, --list [signal]
             List signal names. This option has optional argument, which
             will convert signal number to signal name, or other way
             round.
      -L, --table
             List signal names in a nice table.
```

Информация о команде df

```
DF(1)
                                                                                                User Commands
NAME
       df - report file system disk space usage
SYNOPSIS
       df [OPTION]... [FILE]...
DESCRIPTION
       This manual page documents the GNU version of df. df displays the amount of disk space available on the
       able on all currently mounted file systems is shown. Disk space is shown in 1K blocks by default, unless t
       If an argument is the absolute file name of a disk device node containing a mounted file system, df shows t
       node. This version of df cannot show the space available on unmounted file systems, because on most kinds
OPTIONS
       Show information about the file system on which each FILE resides, or all file systems by default.
       Mandatory arguments to long options are mandatory for short options too.
       -a, --all
             include pseudo, duplicate, inaccessible file systems
       -B, --block-size=SIZE
              scale sizes by SIZE before printing them; e.g., '-BM' prints sizes in units of 1,048,576 bytes; see
       -h. --human-readable
             print sizes in powers of 1024 (e.g., 1023M)
       -H. --si
             print sizes in powers of 1000 (e.g., 1.1G)
       -i, --inodes
             list inode information instead of block usage
```

```
DU(1)
NAME
      du - estimate file space usage
SYNOPSIS
      du [OPTION]... [FILE]...
      du [OPTION]... --files0-from=F
DESCRIPTION
      Summarize disk usage of the set of FILEs, recursively for directories.
      Mandatory arguments to long options are mandatory for short options too.
      -0. --null
             end each output line with NUL, not newline
      -a. --all
             write counts for all files, not just directories
       --apparent-size
             print apparent sizes, rather than disk usage; although the apparent size is u
              the like
      -B, --block-size=SIZE
              scale sizes by SIZE before printing them; e.g., '-BM' prints sizes in units of 1
      -b. --bytes
             equivalent to '--apparent-size --block-size=1'
       -c. --total
             produce a grand total
```

Команда df

vvmurashko1@dk4n70 ~ \$ df				
Файловая система	1К-блоков	Использовано	Доступно	Использо
none	4000164	12028	3988136	
udev	3924440	0	3924440	
tmpfs	4000164	77860	3922304	
/dev/sda8	491812356	59266468	407540144	
tmpfs	4096	0	4096	
tmpfs	4000164	59528	3940636	
/dev/sda6	91557952	816336	86067672	
mark.sci.pfu.edu.ru:/usr/portage	8388608	4369664	1790976	
mark.sci.pfu.edu.ru:/com/lib/portage	733747200	115402752	618344448	
mark.sci.pfu.edu.ru:/usr/local/share/portage	8388608	4369664	1790976	
AFS	2147483647	0	2147483647	
tmpfs	800032	248	799784	
mark.sci.pfu.edu.ru:/usr/local/share/portage	8388608	4369664	1790976	

Команда du

```
vvmurashko1@dk4n70 ~ $ du
        ./public/public_html
2
4
        ./public
2
        ./.config/gnome-session/saved-session
4
        ./.config/gnome-session
3
        ./.config/ibus/bus
5
        ./.config/ibus
10
        ./.config/dconf
5
        ./.config/evolution/sources
7
        ./.config/evolution
74
        ./.config/libaccounts-glib
3
        ./.config/goa-1.0
2
        ./.config/gconf
44
        ./.config/gtk-3.0/assets
58
        ./.config/gtk-3.0
72
        ./.config/session
        ./.config/nautilus
2
2
        ./.config/mc/mcedit
8
        ./.config/mc
```

Справка команды find

FIND(1) General Commands

NAME

find - search for files in a directory hierarchy

SYNOPSIS

find [-H] [-L] [-P] [-D debugopts] [-Olevel] [starting-point...] [expression]

DESCRIPTION

This manual page documents the GNU version of find. GNU find searches the directory tree rooted at rules of precedence (see section OPERATORS), until the outcome is known (the left hand side is false starting-point is specified. '.' is assumed.

If you are using find in an environment where security is important (for example if you are using it tions' chapter of the findutils documentation, which is called Finding Files and comes with findutil find it a more useful source of information.

OPTIONS

The -H, -L and -P options control the treatment of symbolic links. Command-line arguments following begins with `-', or the argument '(' or '!'. That argument and any following arguments are taken it rectory is used. If no expression is given, the expression -print is used (but you should probably

This manual page talks about 'options' within the expression list. These options control the beht -L, -P, -D and -O must appear before the first path name, if at all. A double dash -- can also be to begin with either '.' or '/' is generally safer if you use wildcards in the list of start points).

- -P Never follow symbolic links. This is the default behaviour. When find examines or prints properties of the symbolic link itself.
- -L Follow symbolic links. When find examines or prints information about files, the information itself (unless it is a broken symbolic link or find is unable to examine the file to which still be in effect. If -L is in effect and find discovers a symbolic link to a subdirectory

Имена всех директорий

```
vvmurashko1@dk4n70 ~ $ find ~ -type d -print
/afs/.dk.sci.pfu.edu.ru/home/v/v/vvmurashko1
/afs/.dk.sci.pfu.edu.ru/home/v/v/vvmurashko1/public
/afs/.dk.sci.pfu.edu.ru/home/v/v/vvmurashko1/public_html
/afs/.dk.sci.pfu.edu.ru/home/v/v/vvmurashko1/.config
/afs/.dk.sci.pfu.edu.ru/home/v/v/vvmurashko1/.config/gnome-sessic
/afs/.dk.sci.pfu.edu.ru/home/v/v/vvmurashko1/.config/gnome-sessic
/afs/.dk.sci.pfu.edu.ru/home/v/v/vvmurashko1/.config/jbus
/afs/.dk.sci.pfu.edu.ru/home/v/v/vvmurashko1/.config/dconf
/afs/.dk.sci.pfu.edu.ru/home/v/v/vvmurashko1/.config/evolution
/afs/.dk.sci.pfu.edu.ru/home/v/v/vvmurashko1/.config/evolution
/afs/.dk.sci.pfu.edu.ru/home/v/v/vvmurashko1/.config/evolution
```

Я ознакомилась с инструментами поиска файлов и фильтрации текстовых данных, приобрела практические навыки: по управлению процессами (и заданиями), по проверке использования диска и обслуживанию файловых систем.