*** ACCESS. LOG PRACTICE***

```
@DELL@DELLP-PC MINGW64 ~/Desktop
$ cd terminalCommands
@DELL@DELLP-PC MINGW64 ~/terminalCommands
$ cd linux-content
@DELL@DELLP-PC MINGW64 ~/terminalCommands/linux-content (master)
$ cat access. log
Q) Print last 4 frequently access urls count in sorted order from access. log
@DELL@DELLP-PC MINGW64 ~/terminalCommands/linux-content (master)
$ cat access. log | awk '{print $11}' | sort | uniq -c |tail -4
    1141 "https://fundoopush-dev.bridgelabz.com/dashboard/article"
       1 "https://fundoopush-dev.bridgelabz.com/dashboard/hashtags/animals"
       5 "https://fundoopush-dev.bridgelabz.com/dashboard/jobs" 1475
    "https://fundoopush-dev.bridgelabz.com/login"
Q) Print last 4 frequently access unique urls at particular hours from access. log
@DELL@DELLP-PC MINGW64 ~/terminalCommands/linux-content (master)
199 /vendor.js
      15 /vendor.js.map
       4 /wp-login.php
Q) Print list of web response code count in the unique sorted order at specific hours from access.log
@DELL@DELLP-PC MINGW64 ~/terminalCommands/linux-content (master) $ cat access.log | awk '{print $9}' | sort | uniq -c | sort -n 8 206
       26 304
      3176 200
Q) print list of last 10 uniue sorted client IP from access. log
@DELL@DELLP-PC MINGW64 MINGW64 ~/terminalCommands/linux-content (master)
$ cat access.log | awk '{print $1}' | sort | uniq -c | tail -10 323 10.56.21.2 251 10.56.22.3
     214 10.56.3.4
       9 10. 56. 34. 4
     242 10. 56. 4. 2
       7 10. 56. 44. 4
      40 10. 56. 46. 2
     168 10. 56. 5. 2
285 10. 56. 6. 4
     186 10.56.9.3
```

****DATA ANALYSIS****

@DELL@DELLP-PC MINGW64 ~/terminalCommands/linux-content (master)

```
$ cat data.csv
                                                                                          TotalPayBenefits
Id EmployeeName
                    JobTitle
                                         BasePay
                                                   OvertimePay
                                                                  OtherPay 1 0 1
                                                                              TotalPay
   NATHANIEL
                                         167411
                                                                   400184
                                                                              567595
                    GM
                                                                                          567595
                    CAPTAIN
                                                   245131
                                                                                          538909
   GARY
                                         155966
                                                                   137811
                                                                              538909
   ALBERT
                    CAPTAIN
                                         212739
                                                   106088
                                                                   16452
                                                                              335279
                                                                                          335279
4
   CHRISTOPHER
                    MECHANIC
                                                                   198306
                                                                              332343
                                                                                          332343
                                         77916
                                                   56120
   PATRICK
                    DEPUTYCHIEF
                                         134401
                                                   9737
                                                                   182234
                                                                              326373
                                                                                          326373
                    ASSTDEPUTY
                                                                   189082
6
   DAVID
                                         118602
                                                   8601
                                                                              316285
                                                                                          316285
                    BATTALIONCHIEF
                                         92492
                                                   89062
                                                                   134426
                                                                              315981
                                                                                          315981
   ALSON
   DAVID
                    DEPUTYDIRECTOR
                                         256576
                                                   0
                                                                   51322
                                                                              307899
                                                                                          307899
10 JOANNE
                                                                              302377
                                                                                          302377
                    CHIFF
                                         285262
                                                   0
                                                                   17115
   PATRICIA
                    CAPTAIN
                                         99722
                                                   87082
                                                                   110804
                                                                              297608
                                                                                          297608
13 EDWARD
                    EXECUTIVE
                                         294580
                                                   0
                                                                              294580
                                                                                          294580
```

Q) What is aggregate Totalpay of employees whose jobtitle is 'CAPTAIN'

```
@DELL@DELLP-PC MINGW64 ~/terminalCommands/linux-content (master)
```

Þ	cat data.csv	grep -1 captain					
2	GARY	CAPTAIN	155966	245131	137811	538909	538909
3	ALBERT	CAPTAIN	212739	106088	16452	335279	335279
12	2 PATRICIA	CAPTAIN	99722	87082	110804	297608	297608

```
@DELL@DELLP-PC MINGW64 ~/terminalCommands/linux-content (master)
```

\$ cat data.csv | grep -i captain |awk '{print \$7}' 538909

@DELL@DELLP-PC MINGW64 ~/terminalCommands/linux-content (master)

\$ cat data.csv | grep -i captain |awk '{sum+=\$7} END {print sum}' 1171796

Q) Print the average Basepay

```
@DELL@DELLP-PC MINGW64 ~/terminalCommands/linux-content (master)
$ cat data.csv | awk '{print $4}
BasePay
167411
155966
212739
77916
134401
118602
92492
256576
285262
99722
294580
@DELL@DELLP-PC MINGW64 ~/terminalCommands/linux-content (master)
cat data.csv \mid awk ' \{sum += $4\} END \{print sum/NR\}' 157972
```

Q) print employee Name and Totalpay who has Basepay greater than 10000

```
@DELL@DELLP-PC MINGW64 ~/terminalCommands/linux-content (master)
$ cat data.csv | awk '$4>10000 {print $2, $7}';
EmployeeName | IotalPay
NATHANIEL
                 567595
GARY
                 538909
ALBERT
                 335279
CHRISTOPHER
                 332343
PATRICK
                 326373
DAVID
                 316285
ALSON
                 315981
DAVID
                 307899
JOANNE
                 302377
PATRICIA
                 297608
EDWARD
                 294580
```

**** find the difference between original file and the updated file Apply change to the original file****

```
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ mkdir original

@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ mkdir updated

@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ nano -T 3 original-file.sh

@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ mv original-file.sh original

@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ nano -T 3 uptaded-file.sh

@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ mv uptaded-file.sh updated

@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ mv uptaded-file.sh updated
```

****MOVE FILES FROM ONE FOLDER TO RESPECTIVE FOLDER****

```
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ touch abc.txt def.txt ghi.txt jkl.txt
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ mkdir abc def ghi jkl
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ Is
abc/
       abc. txt
                 def/ def. txt
                                   ghi/ ghi.txt jkl/ jkl.txt original/
                                                                                   updated/
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ mv abc.txt abc
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ mv def.txt def
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ mv ghi.txt ghi
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ mv jkl.txt jkl
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ Is
abc/ def/ ghi/ jkl/ original/
                                        updated/
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$
```

**** CHECK FOLDER EXIST OR NOT ****

```
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ touch aaa. txt bbb. txt
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ cat createfolder.sh
#!/bin/bash
for file in `ls *.txt`; do
foldername=`echo $file | awk -F. '{print $1}'`; #echo
"checking if directory already exist started"; if [ -d
$foldername];
then
rm -R $foldername; fi
#echo creating folder {$foldername}; mkdir
$foldername;
#echo copied {$file} to {$foldername}/; cp
$file $foldername;
done
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ ./createfolder.sh
@DELL@DELLP-PC MINGW64 ~/terminalCommands/Day3
$ ls
       sunil.txt aaa/
al/ updated/
Raj/ sur
original/
                            aaa. txt
                                         abc/ bbb/ bbb. txt
                                                                   createfolder.sh*
                                                                                              def/ ghi/ jkl/
                                         *******
@DELL@DELLP-PC MINGW64 ~/terminalCommands
$ mkdir Day3
mkdir: cannot create directory 'Day3': File exists
                                         ******
```