Progetto S3/L2

L'esercizio di oggi richiede l'installazione e l'esecuzione di un programma a CLI per prendere dimestichezza con i principali comandi della Shell Linux. Nel particolare, si tratta di un gioco a livelli in cui bisogna completare delle quest e, man mano che si avanza, si imparano nuovi comandi, oltre ad un aumento graduale della difficoltà.

Per installarlo bisogna eseguire questi 3 comandi, dopodiché il gioco partirà:

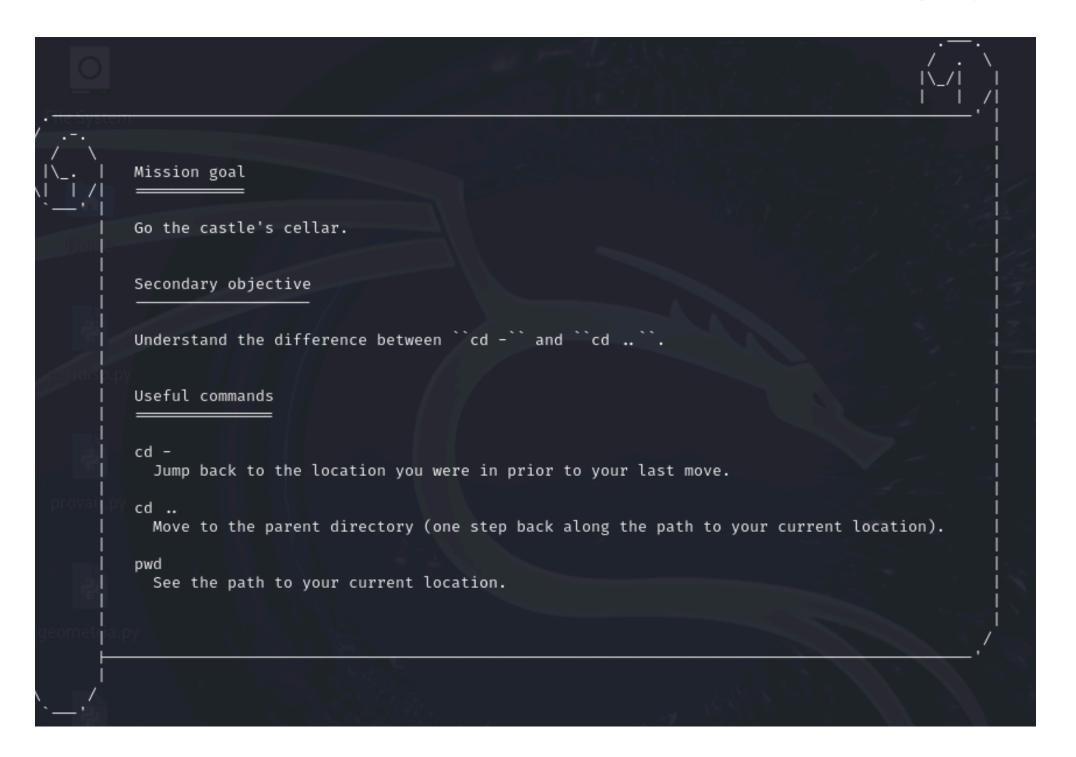
- sudo apt install gettext man-db procps psmisc nano tree bsdmainutils x11-apps wget
- wget https://github.com/phyver/GameShell/releases/download/latest/gameshell.shù
- # bash gameshell.sh



Ecco come si presenterà:

Il primo livello
richiedeva il
raggiungimento di
un determinato file
chiamato
"Top_of_the_tower".
Dunque, con un
sapiente uso dei
comandi pwd, cd,
ed Is trovarlo è
stato facile.

```
[mission 1] $ gsh goal
                                                                                              [use 'gsh help' to get a list of available commands]
                                                                                              [mission 1] $ pwd
                                                                                              /home/kali/gameshell/World
[use 'gsh help' to get a list of available commands]
                                                                                              [mission 1] $ ls
      Mission goal
                                                                                              Castle Forest Garden Mountain Stall
                                                                                              [use 'gsh help' to get a list of available commands]
      Go to the top of the main tower of the castle.
                                                                                              [mission 1] $ cd Castle
                                                                                              [use 'gsh help' to get a list of available commands]
      Useful commands
                                                                                              [mission 1] $ ls
                                                                                              Cellar Great_hall Main_building Main_tower Observatory
      cd LOCATION
        Move to the given location.
                                                                                              [use 'gsh help' to get a list of available commands]
        Remark: ``cd`` is an abbreviation for "change directory".
                                                                                              [mission 1] $ cd Main_tower
                                                                                              [use 'gsh help' to get a list of available commands]
       Show the path to your current location.
                                                                                              [mission 1] $ ls
        Remark: ``pwd`` is an abbreviation for "print working directory".
                                                                                              First_floor
                                                                                              [use 'gsh help' to get a list of available commands]
        Show a list of locations that are currently accessible.
                                                                                              [mission 1] $ cd First_floor
        Remark: ``ls`` is an abbreviation of "list".
                                                                                              [use 'gsh help' to get a list of available commands]
        Check if the mission objective has been achieved.
                                                                                              [mission 1] $ ls
                                                                                              Second_floor
        Restart the mission from the beginning.
                                                                                              [use 'gsh help' to get a list of available commands]
                                                                                              [mission 1] $ cd Second_floor
      Remarks
                                                                                              [use 'gsh help' to get a list of available commands]
                                                                                              [mission 1] $ ls
                                                                                              Top_of_the_tower
      UPPERCASE words appearing in commands are meta-variables: you need to replace them by
                                                                                              [use 'gsh help' to get a list of available commands]
                                                                                              [mission 1] $ cd Top_of_the_tower
      Most filesystems treat uppercase and lowercase characters differently. Make sure you
      use the correct path.
                                                                                              [use 'gsh help' to get a list of available commands]
                                                                                              [mission 1] $ ls
[use 'gsh help' to get a list of available commands]
                                                                                              [mission 1] $ gsh check
                                                                                              Congratulations, mission 1 has been successfully completed!
[use 'gsh help' to get a list of available commands]
[mission 1] $
```



Il secondo livello richiedeva l'utilizzo dei comandi cd .. e cd-, in modo da andare a ritroso nelle cartelle e raggiungere la cartella "Cellar"

```
[use 'gsh help' to get a list of available commands]
[mission 2] $ cd ..
[use 'gsh help' to get a list of available commands]
[mission 2] $ pwd
/home/kali/gameshell/World/Castle/Main_tower/First_floor/Second_floor
[use 'gsh help' to get a list of available commands]
[mission 2] $ ls
Top_of_the_tower
[use 'gsh help' to get a list of available commands]
[mission 2] $ cd ..
[use 'gsh help' to get a list of available commands]
[mission 2] $ ls
Second_floor
[use 'gsh help' to get a list of available commands]
[mission 2] $ pwd
/home/kali/gameshell/World/Castle/Main_tower/First_floor
[use 'gsh help' to get a list of available commands]
[mission 2] $ cd ..
[use 'gsh help' to get a list of available commands]
[mission 2] $ pwd
/home/kali/gameshell/World/Castle/Main_tower
[use 'gsh help' to get a list of available commands]
[mission 2] $ ls
First_floor
[use 'gsh help' to get a list of available commands]
[mission 2] $ cd ..
[use 'gsh help' to get a list of available commands]
[mission 2] $ pwd
/home/kali/gameshell/World/Castle
[use 'gsh help' to get a list of available commands]
[mission 2] $ ls
Cellar Great_hall Main_building Main_tower Observatory
[use 'gsh help' to get a list of available commands]
[mission 2] $ cd Cellar
[use 'gsh help' to get a list of available commands]
[mission 2] $ ls
barrel_of_apples
[use 'gsh help' to get a list of available commands]
[mission 2] $ gsh check
 ongratulations, mission 2 has been successfully completed!
```

Il terzo livello richiedeva semplicemente di ritornare alla cartella principale e successivamente di raggiungere la cartella "Throne_room" utilizzando semplicemente due comandi

```
[use 'gsh help' to get a list of available commands]
[mission 3] $ cd
[use 'gsh help' to get a list of available commands]
[mission 3] $ cd Castle/Main_building/Throne_room
[use 'gsh help' to get a list of available commands]
[mission 3] $ gsh check
Congratulations, mission 3 has been successfully completed!
                                 Well done!!!
                                 From now on, the current location will be shown just before the command prompt.
```

Il 4º livello aveva una richiesta molto semplice e bisognava semplicemente creare una cartella chiamata "Chest" dentro una cartella chiamata "Hut", a sua volta dentro la cartella "Forest". Il tutto utilizzando il comando "mkdir"

4° Livello

```
/Castle/Main_building/Throne_room
[mission|4] $ gsh goal
       Mission goal
       mkdir DIRECTORY
~/Castle/Main_building/Throne_room
/home/kali/gameshell/World/Castle/Main_building/Throne_room
/Castle/Main_building/Throne_room
[mission 4] $ cd
[mission 4] $ pwd
/home/kali/gameshell/World
[mission 4] $ ls
Castle Forest Garden Mountain Stall
[mission 4] $ cd Forest
/Forest
[mission 4] $ mkdir Hut
~/Forest
[mission 4] $ ls
~/Forest
[mission 4] $ cd Hut
[mission 4] $ mkdir Chest
~/Forest/Hut
[mission 4] $ gsh check
```

Il 5° livello richiedeva di spostarsi sulla cartella "Cellar" ed eliminare tutti i file "spider" utilizzando il comando rm

```
[mission 5] $ gsh goal
       | Mission goal
        Go back to the cellar and get rid of all the spiders. Leave the bats alone: they appear on the castle's coat of arms and are said to confer luck
         Useful commands
         rm FILE1 FILE2 ... FILEn
          Delete the files (permanently).
           Remark: `rm` is an abbreviation for "remove".
[mission 5] $ pwd
/home/kali/gameshell/World
[mission 5] $ cd World/Castle/Cellar
bash: cd: World/Castle/Cellar: No such file or directory
[mission 5] $ cd Castle/Cellar
~/Castle/Cellar
[mission 5] $ ls
barrel_of_apples bat_1 bat_2 spider_1 spider_2 spider_3
~/Castle/Cellar
[mission 5] $ rm spider_1 spider_2 spider_3
~/Castle/Cellar
[mission 5] $ ls
barrel_of_apples bat_1 bat_2
~/Castle/Cellar
[mission 5] $ gsh check
Congratulations, mission 5 has been successfully completed!
```

Il 6° livello richiedeva di spostarsi sulla cartella "Garden" e spostare tutti i file "coin" nella cartella "Chest", già creata precedentemente, utilizzando il comando my

6° Livello

```
(a=()
()=(
        Mission goal
        Collect all the coins that you can find in the garden in front of the castle, and put
         them in your chest in your hut in the forest.
         Useful commands
        mv FILE1 FILE2 ... FILEN DIRECTORY
           Move the files to the directory.
           Remark: ``mv` is an abbreviation of "move".
           The "~" symbol is an abbreviation for the initial directory.
           Example: wherever you are, ``~/Tavern`` denotes the directory (or file) "Tavern" in
           the initial directory.
() = (
                                                                                               (a=()
~/Garden
[mission 6] $ pwd
/home/kali/gameshell/World/Garden
~/Garden
[mission 6] $ ls
coin_1 coin_2 coin_3 Flower_garden Maze Shed
~/Garden
[mission 6] $ mv coin_1 coin_2 coin_3 ~/Forest/Hut/Chest
~/Garden
[mission 6] $ gsh check
Congratulations, mission 6 has been successfully completed!
```

Il 7º livello era quasi identico al precedente, solo che in questo caso i file "coin" erano nascosti, e per vederli bisognava utilizzare il comando ls -A.

Una volta trovati bisognava spostarli nuovamente nella cartella "Chest", facilitandosi con il comando Tab

```
/Garden
[mission 7] $ gsh goal
       Mission goal
       Collect all the coins hidden in the garden in front of the castle, and put them in your chest (in your hut in the forest).
       Secondary objective
       Learn how to use the "Tab" key to go faster.
       Useful commands
         List all the files of the current directory, including hidden files. (A file is "hidden" when its name starts with a dot.)
         The tabulation key "completes" the name of a file or directory once you have typed the beginning of its name. This only works
          if there is only one possible completion.
         Pressing tabulation twice successively shows a list of possible completions.
~/Garden
[mission 7] $ pwd
/home/kali/gameshell/World/Garden
~/Garden
[mission 7] $ ls
Flower_garden Maze Shed
~/Garden
[mission 7] $ ls -A
.13903_coin_3 .24687_coin_1 .35684_coin_2 Flower_garden Maze Shed
[mission 7] $ mv .13903_coin_3 .24687_coin_1 .35684_coin_2 ~/Forest/Hut/Chest
~/Garden
[mission 7] $ gsh check
```

L'8° livello richiedeva la rimozione dei file "spider" come già fatto in precedenza, solo che questa volta bisognava utilizzare una wildcard in modo da listare parole specifiche. In questo caso ho utllizzato il comando * e così, dando il comando *spider*, ho potuto listare solamente i file con all'interno la parola "spider" e rimuoverli tutti insieme

```
~/Garden
[mission 8] $ pwd
/home/kali/gameshell/World/Garden
~/Garden
[mission 8] $ cd
[mission 8] $ pwd
/home/kali/gameshell/World
[mission 8] $ ls
Castle Chest Forest Garden Mountain Stall
[mission 8] $ cd Castle
~/Castle
[mission 8] $ ls
Cellar Great_hall Main_building Main_tower Observatory
~/Castle
[mission 8] $ cd Cellsr
bash: cd: Cellsr: No such file or directory
[mission 8] $ cd Cellar
~/Castle/Cellar
[mission 8] $ ls
10423_spider_40 16038_spider_11 18879_spider_45 22985_spider_21 24813_spider_23 27529_spider_15 32354_spider_34 5866_spider_6
11833_spider_41 16187_spider_22 19874_spider_26 23012_spider_3 24961_spider_25 2785_spider_16
                                                                                                         7093_spider_35
11935_spider_24 1742_spider_48 19908_spider_30 23487_bat_2
                                                            794_spider_33
12619_spider_43 17912_spider_39 2072_spider_44 23531_bat_1
                                                            26123_spider_4
                                                                                                         8833_spider_5
                                                                          29388_spider_13 414_bat_3
13067_spider_8 18168_spider_14 20827_spider_38 23896_spider_31 26180_spider_32 29504_spider_47 4195_spider_37
                                                                                                         9718_spider_36
9907_spider_29
13799_spider_46    18580_spider_17    21171_spider_27    24558_spider_2    2750_spider_18    31066_spider_49    5817_spider_28
~/Castle/Cellar
[mission 8] $ rm *spider*
~/Castle/Cellar
[mission 8] $ ls
23487_bat_2 23531_bat_1 26858_bat_5 4021_bat_4 414_bat_3 barrel_of_apples
~/Castle/Cellar
[mission 8] $ gsh check
 Congratulations, mission 8 has been successfully completed!
```