Report nmap

- **1-** Come prima task andiamo ad effettuare delle scansioni su Metasploitable (p. 192.168.1.102):
- -Prima scansione nmap -O per ricevere informazioni sul sistema operativo.

```
MAC Address: 08:00:27:F0:63:36 (Oracle VirtualBox virtual NIC)
Device type: general purpose
Running: Linux 2.6.X
OS CPE: cpe:/o:linux:linux_kernel:2.6
OS details: Linux 2.6.9 - 2.6.33
Network Distance: 1 hop

OS detection performed. Please report any incorrect results at https://nmap.org/submit/ .
Nmap done: 1 IP address (1 host up) scanned in 15.18 seconds
```

-Seconda scansione nmap -sT stabilisce una connessione completa con il target completando il three-way-handashake. Notiamo come per le porte chiuse ci da come risposta "(conn-refused)".

```
|-[/home/kali]
   nmap -sT 192.168.1.102
Starting Nmap 7.93 ( https://nmap.org ) at 2022-11-23 08
Nmap scan report for 192.168.1.102
Host is up (0.0039s latency).
Not shown: 977 closed tcp ports (conn-refused)
PORT
         STATE SERVICE
21/tcp
         open ftp
22/tcp
         open
               ssh
23/tcp
        open telnet
25/tcp
         open smtp
```

-Terza scansione nmap-sS non stabilisce una connessione completa. E a differenza della tcp connection possiamo vedere come per le porte chiuse ci da come risposta "(reset)"

```
)-[/home/kali]
   nmap -sS 192.168.1.102
Starting Nmap 7.93 ( https://nmap.org ) at 2022-1
                                                    3 08:33 EST
Nmap scan report for 192.168.1.102
Host is up (0.00018s latency).
Not shown: 977 closed tcp ports (reset)
        STATE SERVICE
PORT
21/tcp
        open ftp
22/tcp
        open ssh
        open telnet
23/tcp
25/tcp
        open smtp
        open domain
53/tcp
80/tcp
              http
        open
111/tcp
        open
              rpcbind
139/tcp
        open netbios-ssn
```

-Quarta scansione nmap -sV ci recupererà la versione relativa ad ogni servizio delle porte aperte eseguendo prima una Tcp connection e poi un grab del banner

```
nmap -sV 192.168.1.102
Starting Nmap 7.93 ( https://nmap.org ) at 2022-11-23 08:35 EST
Nmap scan report for 192.168.1.102
Host is up (0.00015s latency).
Not shown: 977 closed tcp ports (reset)
PORT
         STATE SERVICE
                             VERSION
         open ftp
21/tcp
                             vsftpd 2.3.4
        open ssh
open telnet
                             OpenSSH 4.7p1 Debian 8ubuntu1 (protocol 2.0)
22/tcp
23/tcp
                             Linux telnetd
25/tcp
                             Postfix smtpd
         open smtp
53/tcp
         open domain
                             ISC BIND 9.4.2
                             Apache httpd 2.2.8 ((Ubuntu) DAV/2)
80/tcp
         open http
111/tcp open
                rpcbind
                             2 (RPC #100000)
139/tcp open netbios-ssm Samba smbd 3.X - 4.X (workgroup: WORKGROUP)
445/tcp open netbios-ssm Samba smbd 3.X - 4.X (workgroup: WORKGROUP)
512/tcp open exec
                             netkit-rsh rexecd
513/tcp open login?
514/tcp open shell
                login?
                             Netkit rshd
                             GNU Classpath grmiregistry
Metasploitable root shell
1099/tcp open
                java-rmi
1524/tcp open bindshell
                             2-4 (RPC #100003)
ProFTPD 1.3.1
2049/tcp open nfs
2121/tcp open
                ftp
                             MySQL 5.0.51a-3ubuntu5
3306/tcp open mysql
5432/tcp open postgresql
                             PostgreSQL DB 8.3.0 - 8.3.7
5900/tcp open vnc
                             VNC (protocol 3.3)
6000/tcp open
                              (access denied)
                             UnrealIRCd
6667/tcp open irc
8009/tcp open ajp13
8180/tcp open http
                             Apache Jserv (Protocol v1.3)
                             Apache Tomcat/Coyote JSP engine 1.1
MAC Address: 08:00:27:F0:63:36 (Oracle VirtualBox virtual NIC)
Service Info: Hosts: metasploitable.localdomain, irc.Metasploitable.LAN; OSs: Unix, Linux; CPE: cpe:/o:linux:
linux_kernel
```

2- Come seconda task andiamo a effettuare un OS fingerprint di windows 7 (192.168.1.104)

-Con firewall attivo su windows non riesco a recuperare informazioni

```
Starting Nmap 7.93 ( https://nmap.org ) at 2022-11-23 08:21 EST

Nmap scan report for 192.168.1.104

Host is up (0.00079s latency).

All 1000 scanned ports on 192.168.1.104 are in ignored states.

Not shown: 1000 filtered tcp ports (no-response)

MAC Address: 08:00:27:B9:0D:44 (Oracle VirtualBox virtual NIC)

Too many fingerprints match this host to give specific OS details

Network Distance: 1 hop

OS detection performed. Please report any incorrect results at https://nmap.org/submit/.

Nmap done: 1 IP address (1 host up) scanned in 27.08 seconds
```

-Con il firewall disattivato riesco a recuperare informazioni precise

```
Running: Microsoft Windows 7|2008|8.1

OS CPE: cpe:/o:microsoft:windows_7::- cpe:/o:microsoft:windows_7::sp1 cpe:/o:microsoft:windows_server_2008::sp
1 cpe:/o:microsoft:windows_server_2008:r2 cpe:/o:microsoft:windows_8 cpe:/o:microsoft:windows_8.1

OS details: Microsoft Windows 7 SP0 - SP1, Windows Server 2008 SP1, Windows Server 2008 R2, Windows 8, or Windows 8.1 Update 1

Network Distance: 1 hop

OS detection performed. Please report any incorrect results at https://nmap.org/submit/.

Nmap done: 1 IP address (1 host up) scanned in 16.40 seconds
```

-Come ultimo tentativo sono andato a modificare o ad attivare delle regole nelle impostazioni del firewal riuscendo a recuperare delle informazioni ma poco precise.

```
445/tcp open microsoft-ds
49154/tcp open unknown
49156/tcp open unknown
MAC Address: 08:00:27:B9:0D:44 (Oracle VirtualBox virtual NIC)
Warning: OSScan results may be unreliable because we could not find at least 1 open and 1 closed port
Device type: general purpose|specialized|phone
Running: Microsoft Windows 2008|8.1|7|Phone|Vista
OS CPE: cpe:/o:microsoft:windows_server_2008:r2 cpe:/o:microsoft:windows_8.1 cpe:/o:microsoft:windows_7 cpe:/o
:microsoft:windows cpe:/o:microsoft:windows_vista::- cpe:/o:microsoft:windows_vista::sp1
OS details: Microsoft Windows Server 2008 R2 or Windows 8.1, Microsoft Windows Embedded Standard 7, Microsoft
Windows Phone 7.5 or 8.0, Microsoft Windows Vista SP0 or SP1, Windows Server 2008 SP1, or Windows 7, Microsoft
Windows Vista SP2, Windows 7 SP1, or Windows Server 2008
Network Distance: 1 hop

OS detection performed. Please report any incorrect results at https://nmap.org/submit/.
Nmap done: 1 IP address (1 host up) scanned in 27.37 seconds
```