

# ESERCITAZIONE W11D1(1)



## Esercizio

Scansione dei servizi

### Traccia: Tecniche di scansione con Nmap

Si richiede allo studente di effettuare le seguenti scansioni sul target **Metasploitable**:

- ☐ OS fingerprint
- ☐ Syn Scan
- ☐ TCP connect - trovate differenze tra i risultati della scansioni TCP connect e SYN?
- ☐ Version detection

### 1) SCANSIONE OS FINGERPRINT:

```
(kali@kali)-[~]
$ sudo nmap -O 192.168.1.101
Starting Nmap 7.94SVN ( https://nmap.org ) at 2024-03-22 06:22 EDT
Nmap scan report for 192.168.1.101
Host is up (0.00038s latency).
Not shown: 977 closed tcp ports (reset)
PORT      STATE SERVICE
21/tcp    open  ftp
22/tcp    open  ssh
23/tcp    open  telnet
25/tcp    open  smtp
53/tcp    open  domain
80/tcp    open  http
111/tcp   open  rpcbind
139/tcp   open  netbios-ssn
445/tcp   open  microsoft-ds
512/tcp   open  exec
513/tcp   open  login
514/tcp   open  shell
1099/tcp  open  rmiregistry
1524/tcp  open  ingreslock
2049/tcp  open  nfs
2121/tcp  open  ccproxy-ftp
3306/tcp  open  mysql
5432/tcp  open  postgresql
5900/tcp  open  vnc
6000/tcp  open  X11
6667/tcp  open  irc
8009/tcp  open  ajp13
8180/tcp  open  unknown
MAC Address: 08:00:27:96:7A:21 (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/submi
t/ .
Nmap done: 1 IP address (1 host up) scanned in 14.68 seconds
```

## 2) SYN SCAN

```
(kali㉿kali)-[~]  
$ sudo nmap -sS 192.168.1.101  
[sudo] password for kali:  
Starting Nmap 7.94SVN ( https://nmap.org ) at 2024-03-22 05:54 EDT  
Stats: 0:00:01 elapsed; 0 hosts completed (0 up), 1 undergoing ARP Ping Scan  
Parallel DNS resolution of 1 host. Timing: About 0.00% done  
Nmap scan report for 192.168.1.101  
Host is up (0.000087s latency).  
Not shown: 977 closed tcp ports (reset)  
PORT      STATE SERVICE  
21/tcp    open  ftp  
22/tcp    open  ssh  
23/tcp    open  telnet  
25/tcp    open  smtp  
53/tcp    open  domain  
80/tcp    open  http  
111/tcp   open  rpcbind  
139/tcp   open  netbios-ssn  
445/tcp   open  microsoft-ds  
512/tcp   open  exec  
513/tcp   open  login  
514/tcp   open  shell  
1099/tcp  open  rmiregistry  
1524/tcp  open  ingreslock  
2049/tcp  open  nfs  
2121/tcp  open  ccproxy-ftp  
3306/tcp  open  mysql  
5432/tcp  open  postgresql  
5900/tcp  open  vnc  
6000/tcp  open  X11  
6667/tcp  open  irc  
8009/tcp  open  ajp13  
8180/tcp  open  unknown  
MAC Address: 08:00:27:96:7A:21 (Oracle VirtualBox virtual NIC)  
  
Nmap done: 1 IP address (1 host up) scanned in 13.50 seconds
```

### 3) TCP CONNECT

```
(kali㉿kali)-[~]
$ sudo nmap -sT 192.168.1.101
[sudo] password for kali:
Starting Nmap 7.94SVN ( https://nmap.org ) at 2024-03-22 07:17 EDT
Nmap scan report for 192.168.1.101
Host is up (0.00082s 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
53/tcp    open  domain
80/tcp    open  http
111/tcp   open  rpcbind
139/tcp   open  netbios-ssn
445/tcp   open  microsoft-ds
512/tcp   open  exec
513/tcp   open  login
514/tcp   open  shell
1099/tcp  open  rmiregistry
1524/tcp  open  ingreslock
2049/tcp  open  nfs
2121/tcp  open  ccproxy-ftp
3306/tcp  open  mysql
5432/tcp  open  postgresql
5900/tcp  open  vnc
6000/tcp  open  X11
6667/tcp  open  irc
8009/tcp  open  ajp13
8180/tcp  open  unknown
MAC Address: 08:00:27:96:7A:21 (Oracle VirtualBox virtual NIC)

Nmap done: 1 IP address (1 host up) scanned in 13.19 seconds
```

### 4) VERSION DETECTION

```
File Actions Edit View Help
(kali㉿kali)-[~]
$ sudo nmap -sV 192.168.1.101
Starting Nmap 7.94SVN ( https://nmap.org ) at 2024-03-22 05:57 EDT
Nmap scan report for 192.168.1.101
Host is up (0.00011s latency).
Not shown: 977 closed tcp ports (reset)
PORT      STATE SERVICE      VERSION
21/tcp    open  ftp          vsftpd 2.3.4
22/tcp    open  ssh          OpenSSH 4.7p1 Debian 8ubuntu1 (protocol 2.0)
23/tcp    open  telnet       Linux telnetd
25/tcp    open  smtp         Postfix smtpd
53/tcp    open  domain       ISC BIND 9.4.2
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  shell        Netkit rshd
1099/tcp  open  java-rmi     GNU Classpath grmiregistry
1524/tcp  open  bindshell    Metasploitable root shell
2049/tcp  open  nfs          2-4 (RPC #100003)
2121/tcp  open  ftp          ProFTPD 1.3.1
3306/tcp  open  mysql        MySQL 5.0.51a-3ubuntu5
5432/tcp  open  postgresql   PostgreSQL DB 8.3.0 - 8.3.7
5900/tcp  open  vnc          VNC (protocol 3.3)
6000/tcp  open  X11          (access denied)
6667/tcp  open  irc          UnrealIRCd
8009/tcp  open  ajp13        Apache Jserv (Protocol v1.3)
8180/tcp  open  http         Apache Tomcat/Coyote JSP engine 1.1
MAC Address: 08:00:27:96:7A:21 (Oracle VirtualBox virtual NIC)
Service Info: Hosts: metasploitable.localdomain, irc.Metasploitable.LAN; OSs: Unix, Linux; CPE: cpe:/o:linux:linux_kernel

Service detection performed. Please report any incorrect results at https://nmap.org /submit/ .
Nmap done: 1 IP address (1 host up) scanned in 66.03 seconds
```