



Consegna S5/L3

Come prima operazione verifichiamo il ping tra le due macchine

```
(kali㉿kali)-[~]  
$ ping 192.168.1.101  
PING 192.168.1.101 (192.168.1.101) 56(84) bytes of data.  
64 bytes from 192.168.1.101: icmp_seq=1 ttl=64 time=0.661 ms  
64 bytes from 192.168.1.101: icmp_seq=2 ttl=64 time=0.547 ms  
64 bytes from 192.168.1.101: icmp_seq=3 ttl=64 time=0.625 ms  
64 bytes from 192.168.1.101: icmp_seq=4 ttl=64 time=0.539 ms  
64 bytes from 192.168.1.101: icmp_seq=5 ttl=64 time=0.547 ms  
64 bytes from 192.168.1.101: icmp_seq=6 ttl=64 time=0.354 ms  
64 bytes from 192.168.1.101: icmp_seq=7 ttl=64 time=0.568 ms  
64 bytes from 192.168.1.101: icmp_seq=8 ttl=64 time=0.606 ms  
64 bytes from 192.168.1.101: icmp_seq=9 ttl=64 time=0.672 ms  
64 bytes from 192.168.1.101: icmp_seq=10 ttl=64 time=0.314 ms  
64 bytes from 192.168.1.101: icmp_seq=11 ttl=64 time=0.531 ms  
64 bytes from 192.168.1.101: icmp_seq=12 ttl=64 time=0.602 ms  
64 bytes from 192.168.1.101: icmp_seq=13 ttl=64 time=0.591 ms  
64 bytes from 192.168.1.101: icmp_seq=14 ttl=64 time=0.870 ms  
64 bytes from 192.168.1.101: icmp_seq=15 ttl=64 time=0.767 ms  
64 bytes from 192.168.1.101: icmp_seq=16 ttl=64 time=0.669 ms  
64 bytes from 192.168.1.101: icmp_seq=17 ttl=64 time=0.724 ms  
64 bytes from 192.168.1.101: icmp_seq=18 ttl=64 time=0.714 ms  
64 bytes from 192.168.1.101: icmp_seq=19 ttl=64 time=0.937 ms  
64 bytes from 192.168.1.101: icmp_seq=20 ttl=64 time=0.848 ms  
64 bytes from 192.168.1.101: icmp_seq=21 ttl=64 time=0.795 ms  
64 bytes from 192.168.1.101: icmp_seq=22 ttl=64 time=0.895 ms  
64 bytes from 192.168.1.101: icmp_seq=23 ttl=64 time=0.553 ms  
^C  
— 192.168.1.101 ping statistics —  
23 packets transmitted, 23 received, 0% packet loss, time 22325ms  
rtt min/avg/max/mdev = 0.314/0.649/0.937/0.154 ms
```

```
msfadmin@metasploitable:~$ ping 192.168.1.100  
PING 192.168.1.100 (192.168.1.100) 56(84) bytes of data.  
64 bytes from 192.168.1.100: icmp_seq=1 ttl=64 time=0.760 ms  
64 bytes from 192.168.1.100: icmp_seq=2 ttl=64 time=0.664 ms  
64 bytes from 192.168.1.100: icmp_seq=3 ttl=64 time=0.653 ms  
64 bytes from 192.168.1.100: icmp_seq=4 ttl=64 time=4.08 ms  
64 bytes from 192.168.1.100: icmp_seq=5 ttl=64 time=0.604 ms  
64 bytes from 192.168.1.100: icmp_seq=6 ttl=64 time=0.760 ms  
64 bytes from 192.168.1.100: icmp_seq=7 ttl=64 time=1.02 ms  
64 bytes from 192.168.1.100: icmp_seq=8 ttl=64 time=1.01 ms  
64 bytes from 192.168.1.100: icmp_seq=9 ttl=64 time=0.871 ms  
64 bytes from 192.168.1.100: icmp_seq=10 ttl=64 time=0.576 ms  
64 bytes from 192.168.1.100: icmp_seq=11 ttl=64 time=0.737 ms  
  
--- 192.168.1.100 ping statistics ---  
11 packets transmitted, 11 received, 0% packet loss, time 9994ms  
rtt min/avg/max/mdev = 0.576/1.068/4.087/0.965 ms  
msfadmin@metasploitable:~$  
msfadmin@metasploitable:~$
```

OS fingerprint Metasploitable

```
(root@kali)-[/home/kali]
# nmap -O 192.168.1.101
Starting Nmap 7.94 ( https://nmap.org ) at 2023-12-20 08:56 EST
Nmap scan report for 192.168.1.101 (192.168.1.101)
Host is up (0.00070s 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: 08:00:27:62:C4:CC (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 1.50 seconds
```

Syn Scan Metasploitable

```
(root@kali)-[/home/kali]
# nmap -sV -sS 192.168.1.101
Starting Nmap 7.94 ( https://nmap.org ) at 2023-12-20 09:06 EST
Nmap scan report for 192.168.1.101 (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?
513/tcp   open  login        OpenBSD or Solaris rlogind
514/tcp   open  tcpwrapped
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: 08:00:27:62:C4:CC (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 64.50 seconds
```

```
(root@kali)-[/home/kali]
# nmap -sV -sT 192.168.1.101
Starting Nmap 7.94 ( https://nmap.org ) at 2023-12-20 09:12 EST
Nmap scan report for 192.168.1.101 (192.168.1.101)
Host is up (0.00015s latency).
Not shown: 977 closed tcp ports (conn-refused)
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?
513/tcp   open  login        OpenBSD or Solaris rlogind
514/tcp   open  tcpwrapped
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: 08:00:27:62:C4:CC (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 64.00 seconds
```


Stesso procedimento anche per Windows.

Quindi come prima operazione verifichiamo il ping tra le due macchine

```
(kali@kali)-[~]  
$ ping 192.168.1.102  
PING 192.168.1.102 (192.168.1.102) 56(84) bytes of data.  
64 bytes from 192.168.1.102: icmp_seq=1 ttl=128 time=0.363 ms  
64 bytes from 192.168.1.102: icmp_seq=2 ttl=128 time=0.268 ms  
64 bytes from 192.168.1.102: icmp_seq=3 ttl=128 time=0.363 ms  
64 bytes from 192.168.1.102: icmp_seq=4 ttl=128 time=0.311 ms  
64 bytes from 192.168.1.102: icmp_seq=5 ttl=128 time=0.657 ms  
64 bytes from 192.168.1.102: icmp_seq=6 ttl=128 time=0.490 ms  
64 bytes from 192.168.1.102: icmp_seq=7 ttl=128 time=0.244 ms  
64 bytes from 192.168.1.102: icmp_seq=8 ttl=128 time=0.313 ms  
64 bytes from 192.168.1.102: icmp_seq=9 ttl=128 time=0.665 ms  
64 bytes from 192.168.1.102: icmp_seq=10 ttl=128 time=0.698 ms  
64 bytes from 192.168.1.102: icmp_seq=11 ttl=128 time=0.540 ms  
64 bytes from 192.168.1.102: icmp_seq=12 ttl=128 time=0.294 ms  
^C  
— 192.168.1.102 ping statistics —  
12 packets transmitted, 12 received, 0% packet loss, time 11219ms  
rtt min/avg/max/mdev = 0.244/0.433/0.698/0.160 ms
```

```
Pinging 192.168.1.100 with 32 bytes of data:  
Reply from 192.168.1.100: bytes=32 time<1ms TTL=64  
Reply from 192.168.1.100: bytes=32 time<1ms TTL=64  
Reply from 192.168.1.100: bytes=32 time<1ms TTL=64  
Reply from 192.168.1.100: bytes=32 time<1ms TTL=64  
  
Ping statistics for 192.168.1.100:  
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),  
    Approximate round trip times in milli-seconds:  
        Minimum = 0ms, Maximum = 0ms, Average = 0ms
```

OS fingerprint Windows

```
(root@kali) ~/home/kali
# nmap -O 192.168.1.102
Starting Nmap 7.94 ( https://nmap.org ) at 2023-12-20 09:58 EST
Nmap scan report for 192.168.1.102 (192.168.1.102)
Host is up (0.00036s latency).
All 1000 scanned ports on 192.168.1.102 (192.168.1.102) are in ignored states.
Not shown: 1000 filtered tcp ports (no-response)
MAC Address: 08:00:27:67:12:C5 (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: specialized|VoIP phone|general purpose|phone
Running: Allen-Bradley embedded, Atcom embedded, Microsoft Windows 7|8|Phone|XP|2012, Palmmicro embedded, VMware Player
OS CPE: cpe:/h:allen-bradley:micrologix_1100 cpe:/h:atcom:at-320 cpe:/o:microsoft:windows.7 cpe:/o:microsoft:windows.8 cpe:/o:microsoft:windows cpe:/o:microsoft:windows_xp::sp3 cpe:/o:microsoft:windows_server_2012 cpe:/a:vmware:player
OS details: Allen Bradley MicroLogix 1100 PLC, Atcom AT-320 VoIP phone, Microsoft Windows Embedded Standard 7, Microsoft Windows 8.1 Update 1, Microsoft Windows Phone 7.5 or 8.0, Microsoft Windows XP SP3 or Windows 7 or Windows Server 2
012, Palmmicro AR1688 VoIP module, VMware Player virtual NAT device
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 22.16 seconds
```