

Despliegue de aplicaciones

Practica 1 Tema 2

Linux

1. Seleccionamos las AMI y creamos la Instancia

Instancia: i-06e230045ad6f3e50 (Maquina 1)

Detalles Seguridad Redes Almacenamiento Comprobaciones de estado Monitoreo Etiquetas

▼ Resumen de instancia Información

ID de la instancia i-06e230045ad6f3e50 (Maquina 1)	Dirección IPv4 pública 44.212.25.187 dirección abierta	Direcciones IPv4 privadas 172.31.93.174
Dirección IPv6 -	Estado de la instancia En ejecución	DNS de IPv4 pública ec2-44-212-25-187.compute-1.amazonaws.com dirección abierta
Tipo de nombre de anfitrión Nombre de IP: ip-172-31-93-174.ec2.internal	Nombre DNS de IP privada (solo IPv4) ip-172-31-93-174.ec2.internal	
Responder al nombre DNS de recurso privado	Tipo de instancia	Direcciones IP elásticas

2. creamos uno y le damos acceso por ssh (puerto 22)

Instancia: i-06e230045ad6f3e50 (Maquina 1)

LP
sg-01d667e5a47e70492 (launch-wizard-1)

▼ Reglas de entrada

ID de la regla del grupo d...	Intervalo de pu...	Protocolo	Origen	Grupos de seguridad
sgr-055f724e7b4b8f487	22	TCP	0.0.0.0/0	launch-wizard-1

▼ Reglas de salida

ID de la regla del grupo d...	Intervalo de pu...	Protocolo	Destino	Grupos de seguridad
sgr-053f79c2cc4622ea4	Todo	Todo	0.0.0.0/0	launch-wizard-1

3. Creamos un par de claves para poder conectarnos mediante putty

LinuxP1.ppk	14/10/2022 18:43	Archivo PP
putty.exe	14/10/2022 18:54	Aplicación
puttygen.exe	14/10/2022 18:54	Aplicación

4. Creamos un disco de 1 GB y lo asociamos a la maquina

Configuración del volumen

Tipo de volumen [Información](#)

SSD de uso general (gp2)

Tamaño (GiB) [Información](#)

1

Mín.: 1 GiB, máx.: 16384 GiB. El valor debe ser un número entero.

IOPS [Información](#)

100 / 3000

Referencia de 3 IOPS por GiB con un mínimo de 100 IOPS, ampliable a 3000 IOPS

Rendimiento (MiB/s) [Información](#)

No se aplica

Zona de disponibilidad [Información](#)

us-east-1d

ID de instantánea - *opcional* [Información](#)

No crear un volumen a partir de una instantánea



<input type="checkbox"/>	Name	ID de volumen	Tipo	Tamaño	IOPS	Rendimiento	Instantánea	Creada	Zona de dispo
<input type="checkbox"/>	-	vol-00d2786f0696e099c	gp2	8 GiB	100	-	snap-04f849d...	2022/10/14 18:46 GMT+2	us-east-1d
<input type="checkbox"/>	-	vol-0f0d08a2d03c6ef2b	gp2	1 GiB	100	-	-	2022/10/17 16:27 GMT+2	us-east-1d

Crear volumen

Modificar volumen

Crear instantánea

Crear política de ciclo de vida de instantánea

Eliminar volumen

Asociar volumen

Desasociar el volumen

Desasociar el volumen forzosamente

Administrar habilitación automática de E/S

Administrar etiquetas

Volumen adjuntado correctamente vol-0f0d08a2d03c6ef2b a la instancia i-06e230045ad6f3e50.

Volúmenes (2)

Buscar

	Name	ID de volumen	Tipo	Tamaño	IOPS	Rendimiento	Instantánea	Creada	Zona de dispo
<input type="checkbox"/>	-	vol-00d2786f0696e099c	gp2	8 GiB	100	-	snap-04f849d...	2022/10/14 18:46 GMT+2	us-east-1d
<input type="checkbox"/>	-	vol-0f0d08a2d03c6ef2b	gp2	1 GiB	100	-	-	2022/10/17 16:27 GMT+2	us-east-1d

- Por ultimo vamos a crear una tabla de particiones para el nuevo disco y lo vamos a montar en un directorio /disco datos

```
95 ses=4294967295
[ 4.606056] systemd-journald[1687]: Received request to flush runtime journal
from PID 1
[ 4.782166] input: Power Button as /devices/LNXSYSTM:00/LNXPWRBN:00/input/inp
ut3
[ 4.802474] ACPI: Power Button [PWRF]
[ 4.805409] input: Sleep Button as /devices/LNXSYSTM:00/LNXXSLPBN:00/input/inp
ut4
[ 4.810884] ACPI: Sleep Button [SLPF]
[ 4.888068] input: ImExPS/2 Generic Explorer Mouse as /devices/platform/i8042
/seriol/input/input5
[ 4.920795] mousedev: PS/2 mouse device common for all mice
[ 5.002280] AVX2 version of gcm_enc/dec engaged.
[ 5.005722] AES CTR mode by8 optimization enabled
[ 5.035917] alg: No test for pcbc(aes) (pcbc-aes-aesni)
[ 5.048317] EDAC sbridge: Seeking for: PCI ID 8086:2fa0
[ 5.051726] EDAC sbridge: Ver: 1.1.2
[ 5.097123] device-mapper: uevent: version 1.0.3
[ 5.100903] device-mapper: ioctl: 4.37.0-ioctl (2017-09-20) initialised: dm-d
evel@redhat.com
[ 5.254914] RPC: Registered named UNIX socket transport module.
[ 5.259029] RPC: Registered udp transport module.
[ 5.262365] RPC: Registered tcp transport module.
[ 5.265482] RPC: Registered tcp NFSv4.1 backchannel transport module.
[ 1619.119619] blkfront: xvdf: barrier or flush: disabled; persistent grants: di
sabled; indirect descriptors: enabled; bounce buffer: disabled;
[ec2-user@ip-172-31-93-174 ~]$
```

```
[ec2-user@ip-172-31-93-174 ~]$ sudo fdisk -l
Disk /dev/xvda: 8 GiB, 8589934592 bytes, 16777216 sectors
Units: sectors of 1 * 512 = 512 bytes
Sector size (logical/physical): 512 bytes / 512 bytes
I/O size (minimum/optimal): 512 bytes / 512 bytes
Disklabel type: gpt
Disk identifier: BAA99F14-8A2D-4BFA-B85B-D7584D58F47D

Device            Start      End  Sectors  Size Type
/dev/xvda1         4096 16777182 16773087   8G Linux filesystem
/dev/xvda128       2048     4095     2048   1M BIOS boot

Partition table entries are not in disk order.

Disk /dev/xvdf: 1 GiB, 1073741824 bytes, 2097152 sectors
Units: sectors of 1 * 512 = 512 bytes
Sector size (logical/physical): 512 bytes / 512 bytes
I/O size (minimum/optimal): 512 bytes / 512 bytes
[ec2-user@ip-172-31-93-174 ~]$
```

```
Changes will remain in memory only, until you decide to write them.
Be careful before using the write command.
```

```
Device does not contain a recognized partition table.
Created a new DOS disklabel with disk identifier 0x4b2e18c7.
```

```
Command (m for help): n
Partition type
   p   primary (0 primary, 0 extended, 4 free)
   e   extended (container for logical partitions)
Select (default p): p
Partition number (1-4, default 1): 1
First sector (2048-2097151, default 2048): 2048

Last sector, +sectors or +size(K,M,G,T,P) (2048-2097151, default 2097151):
Created a new partition 1 of type 'Linux' and of size 1023 MiB.

Command (m for help): m
```

```
[ec2-user@ip-172-31-93-174 ~]$ sudo mkfs.ext4
Usage: mkfs.ext4 [-c|-l filename] [-b block-size] [-C cluster-size]
               [-i bytes-per-inode] [-I inode-size] [-J journal-options]
               [-G flex-group-size] [-N number-of-inodes]
               [-m reserved-blocks-percentage] [-o creator-os]
               [-g blocks-per-group] [-L volume-label] [-M last-mounted-directory]
               [-O feature[,...]] [-r fs-revision] [-E extended-option[,...]]
               [-t fs-type] [-T usage-type] [-U UUID] [-jnvqDFKSV] device [blocks-count]
[ec2-user@ip-172-31-93-174 ~]$
```

```
[ec2-user@ip-172-31-93-174 ~]$ sudo mkfs.ext4 /dev/xvdf1
mke2fs 1.42.9 (28-Dec-2013)
Filesystem label=
OS type: Linux
Block size=4096 (log=2)
Fragment size=4096 (log=2)
Stride=0 blocks, Stripe width=0 blocks
65536 inodes, 261888 blocks
13094 blocks (5.00%) reserved for the super user
First data block=0
Maximum filesystem blocks=268435456
8 block groups
32768 blocks per group, 32768 fragments per group
8192 inodes per group
Superblock backups stored on blocks:
    32768, 98304, 163840, 229376

Allocating group tables: done
Writing inode tables: done
Creating journal (4096 blocks): done
Writing superblocks and filesystem accounting information: done
```

```
[ec2-user@ip-172-31-93-174 ~]$ df -h
Filesystem      Size  Used Avail Use% Mounted on
devtmpfs        484M   0  484M   0% /dev
tmpfs           492M   0  492M   0% /dev/shm
tmpfs           492M 412K  491M   1% /run
tmpfs           492M   0  492M   0% /sys/fs/cgroup
/dev/xvda1      8.0G  1.5G  6.6G  19% /
tmpfs           99M   0   99M   0% /run/user/1000
[ec2-user@ip-172-31-93-174 ~]$ sudo mount /dev/xvdf1 /discodatos/
[ec2-user@ip-172-31-93-174 ~]$ df -h
Filesystem      Size  Used Avail Use% Mounted on
devtmpfs        484M   0  484M   0% /dev
tmpfs           492M   0  492M   0% /dev/shm
tmpfs           492M 412K  491M   1% /run
tmpfs           492M   0  492M   0% /sys/fs/cgroup
/dev/xvda1      8.0G  1.5G  6.6G  19% /
tmpfs           99M   0   99M   0% /run/user/1000
/dev/xvdf1      989M  24K  922M   1% /discodatos
[ec2-user@ip-172-31-93-174 ~]$ sudo nano /etc/fstab
[ec2-user@ip-172-31-93-174 ~]$ sudo nano /etc/fstab
[ec2-user@ip-172-31-93-174 ~]$ df -h
```

Windows

1. Similar a lo realizado con Linux ahora vamos a seleccionar la AMI para Windows y creamos la instancia

<input checked="" type="checkbox"/>	-	ami-057a1a83a927c2ea8	EC2LaunchV2-Windows_Server-2016-English-Full-Base-2022.10.12	amazon/EC2LaunchV2-Windows_Se
<input type="checkbox"/>	-	ami-0cf1b012ff29d9b63	EC2LaunchV2-Windows_Server-2016-English-Full-Base-2022.09.14	amazon/EC2LaunchV2-Windows_Se
<input type="checkbox"/>	-	ami-03be79cbcd5c8e236	EC2LaunchV2-Windows_Server-2016-English-Full-Base-2022.08.10	amazon/EC2LaunchV2-Windows_Se
<input type="checkbox"/>	-	ami-06686d3646ac2170a	EC2LaunchV2-Windows_Server-2016-English-Full-Base-2022.07.13	amazon/EC2LaunchV2-Windows_Se
<input type="checkbox"/>	-	ami-008f7f464ab7f665e	EC2LaunchV2-Windows_Server-2016-English-Core-Base-2022.10.12	amazon/EC2LaunchV2-Windows_Se
<input type="checkbox"/>	-	ami-05c9bafc391533f31	EC2LaunchV2-Windows_Server-2016-English-Core-Base-2022.09.14	amazon/EC2LaunchV2-Windows_Se
<input type="checkbox"/>	-	ami-05c9bafc391533f31	EC2LaunchV2-Windows_Server-2016-English-Core-Base-2022.09.14	amazon/EC2LaunchV2-Windows_Se

<input type="checkbox"/>	Maquina 1	i-06e230045ad6f3e50	En ejecución	t2.micro	Inicializando	Sin alarmas	us-east-1d
<input checked="" type="checkbox"/>	Windows_201...	i-08b1d03f16b67e1fb	En ejecución	t2.micro	Inicializando	Sin alarmas	us-east-1d

2. En esta ocasión el grupo de seguridad se pone por defecto en el puerto 3389

Instancia: i-08b1d03f16b67e1fb (Windows_2016_P1)

sg-08cc2bbbd85a6d451 (launch-wizard-2)

▼ Reglas de entrada

ID de la regla del grupo de seguridad	Intervalo de pu...	Protocolo	Origen	Grupos de seguridad
sg-r-04dc8b5115ef3bd25	3389	TCP	0.0.0.0/0	launch-wizard-2

▼ Reglas de salida

ID de la regla del grupo d...	Intervalo de pu...	Protocolo	Destino	Grupos de seguridad
sg-r-0e9a2c13c73a5ba81	Todo	Todo	0.0.0.0/0	launch-wizard-2

3. El siguiente paso es crear un par de claves pero en este caso deberán ser tipo .pem

Obtener la contraseña de Windows Información

Use your private key to retrieve and decrypt the initial Windows administrator password for this instance.

ID de la instancia

i-08b1d03f16b67e1fb (Windows_2016_P1)

Par de claves asociado a esta instancia

Clave_Windows_2016_p1

Private key

Either upload your private key file or copy and paste its contents into the field below.

Upload private key file

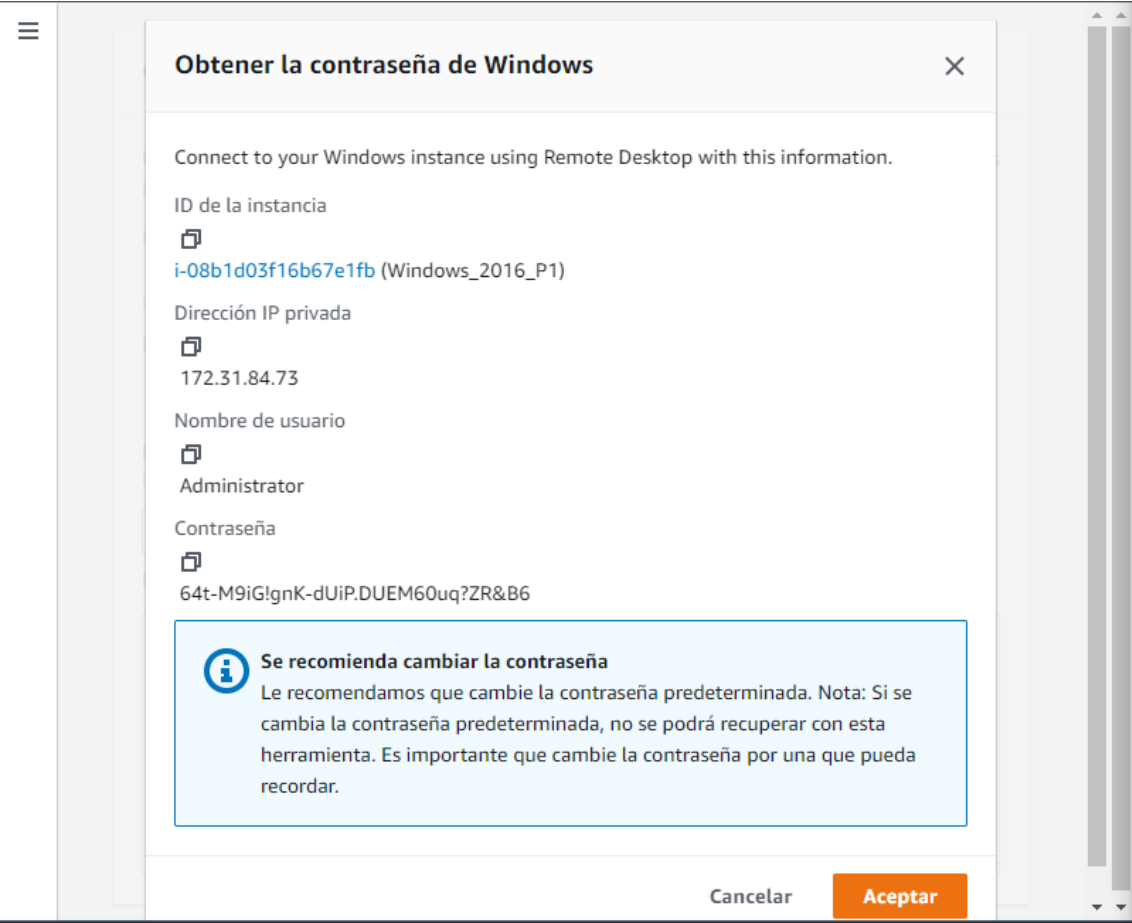
Clave_Windows_2016_p1.pem
1.674KB

Private key contents - optional

```
-----BEGIN RSA PRIVATE KEY-----
MIIIEogIBAAKCAQEAItQuAfr4MvtnEOKOUQjwP2hIOdoSlvQaKyHY/ISN0MPi/nqa
GL3mM99ITzqn5pVH8CyAJhaUTkdr7CDAv7+GAxg40PvLsdiK1j3CSvnASdnbHH7
wk9f1e8BcXyCWLsw4U17n5gmpFY06/5J19EaWS/8xVprYukSVNYP827UPvNTnHn4
GGbmaf4Ob4OOeOtuJ4PPd1HCYPJHfF7zCKlgy9P5F7B1TCn5x9sNt3Twr7hjKNe
/LolYp4mOO1F6YBs/YB+myFDJ8omQB4sJtVYeBDLhQDXhtAXUh//w+mRbSU1ZJTW
/GhD9+IgbvdKAnNgVY6KkcYVdYVhzfPWW9aRfQIDAQABAoIBAGZuaRrQmJkZgOJs
/aQA9KKWYjMeEHb9bTjhhTqKDrJMB1ELcueTnwKvrCWscf6sG4BdbwMaqfuZT9
-----
```

Cancelar Descifrar contraseña

4. Lo siguiente es generar una contraseña para poder acceder a la máquina de manera remota



5. Igual que hemos hecho con el Linux ahora vamos a asociar un nuevo volumen de 2GB a la máquina de Windows

<input type="checkbox"/>	-	vol-00d2786f0696e099c	gp2	8 GiB	100	-	snap-04f849d...	2022/10/14 18:46 GMT+2	us-east-1d
<input type="checkbox"/>	-	vol-0f0d08a2d03c6ef2b	gp2	1 GiB	100	-	-	2022/10/17 16:27 GMT+2	us-east-1d
<input type="checkbox"/>	-	vol-0f36f40fe5ac6bd83	gp2	30 GiB	100	-	snap-029e4ed...	2022/10/19 17:45 GMT+2	us-east-1d
<input type="checkbox"/>	-	vol-02e05d51f38f56cee	gp2	2 GiB	100	-	-	2022/10/21 17:26 GMT+2	us-east-1d

6. El último paso es realizar las particiones del nuevo volumen desde el administrador del servidor dentro de la maquina

The screenshot shows the 'New Volume Wizard' window at the 'Select the server and disk' step. The left sidebar contains a list of steps: 'Before You Begin', 'Server and Disk' (highlighted), 'Size', 'Drive Letter or Folder', 'File System Settings', 'Confirmation', and 'Results'. The main area is divided into two sections: 'Server:' and 'Disk:'. The 'Server:' section contains a table with the following data:

Provision to	Status	Cluster Role	Destination
EC2AMAZ-S9UEDUQ	Online	Not Clustered	Local

Below the table are 'Refresh' and 'Rescan' buttons. The 'Disk:' section contains a table with the following data:

Disk	Virtual Disk	Capacity	Free Space	Subsystem
Disk 1		2.00 GB	2.00 GB	

At the bottom of the window are buttons for '< Previous', 'Next >', 'Create', and 'Cancel'.

The screenshot shows the 'New Volume Wizard' window at the 'Specify the size of the volume' step. The left sidebar contains a list of steps: 'Before You Begin', 'Server and Disk', 'Size' (highlighted), 'Drive Letter or Folder', 'File System Settings', 'Confirmation', and 'Results'. The main area displays the following information:

Available Capacity: 1.97 GB
Minimum size: 8.00 MB
Volume size: 1.97 GB

At the bottom of the window are buttons for '< Previous', 'Next >', 'Create', and 'Cancel'.

New Volume Wizard

Assign to a drive letter or folder

Before You Begin

Server and Disk

Size

Drive Letter or Folder

File System Settings

Confirmation

Results

Select whether to assign the volume to a drive letter or a folder. When you assign a volume to a folder, the volume appears as a folder within a drive, such as D:\UserData.

Assign to:

☒ Drive letter: X

☐ The following folder:

☐ Don't assign to a drive letter or folder.

< Previous

Next >

Create

Cancel

New Volume Wizard

Select file system settings

Before You Begin

Server and Disk

Size

Drive Letter or Folder

File System Settings

Confirmation

Results

File system: NTFS

Allocation unit size: Default

Volume label: New Volume

☐ Generate short file names (not recommended)

Short file names (8 characters with 3-character extensions) are required for some 16-bit applications running on client computers, but make file operations slower.

< Previous

Next >

Create

Cancel

New Volume Wizard

Confirm selections

Before You Begin

Server and Disk

Size

Drive Letter or Folder

File System Settings

Confirmation

Results

Confirm that the following are the correct settings, and then click Create.

VOLUME LOCATION

Server: EC2AMAZ-S9UEDUQ

Disk: Disk 1

Free space: 2.00 GB

VOLUME PROPERTIES

Volume size: 1.97 GB

Drive letter or folder: X:\

Volume label: New Volume

FILE SYSTEM SETTINGS

File system: NTFS

Short file name creation: Disabled

Allocation unit size: Default

< Previous

Next >

Create

Cancel

New Volume Wizard

Completion

Before You Begin

Server and Disk

Size

Drive Letter or Folder

File System Settings

Confirmation

Results

You have successfully completed the New Volume Wizard.

Task	Progress	Status
Gather information	<div></div>	Completed
Create new partition	<div></div>	Completed
Format volume	<div></div>	Completed
Add access path	<div></div>	Completed
Update cache	<div></div>	Completed

< Previous

Next >

Close

Cancel

