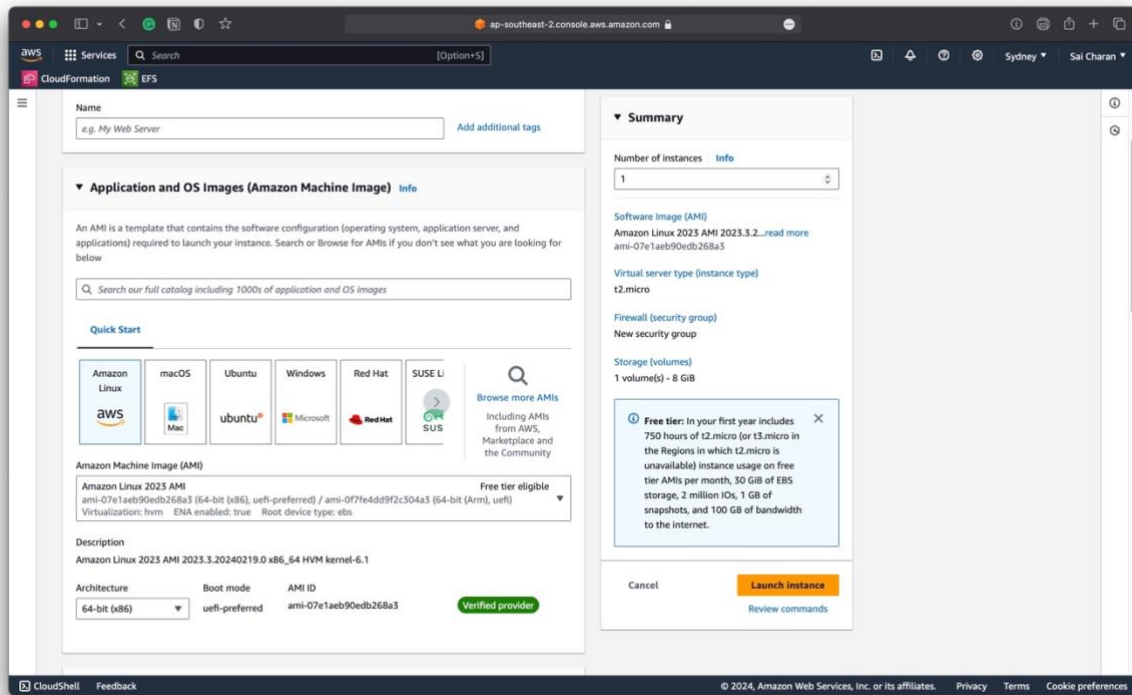
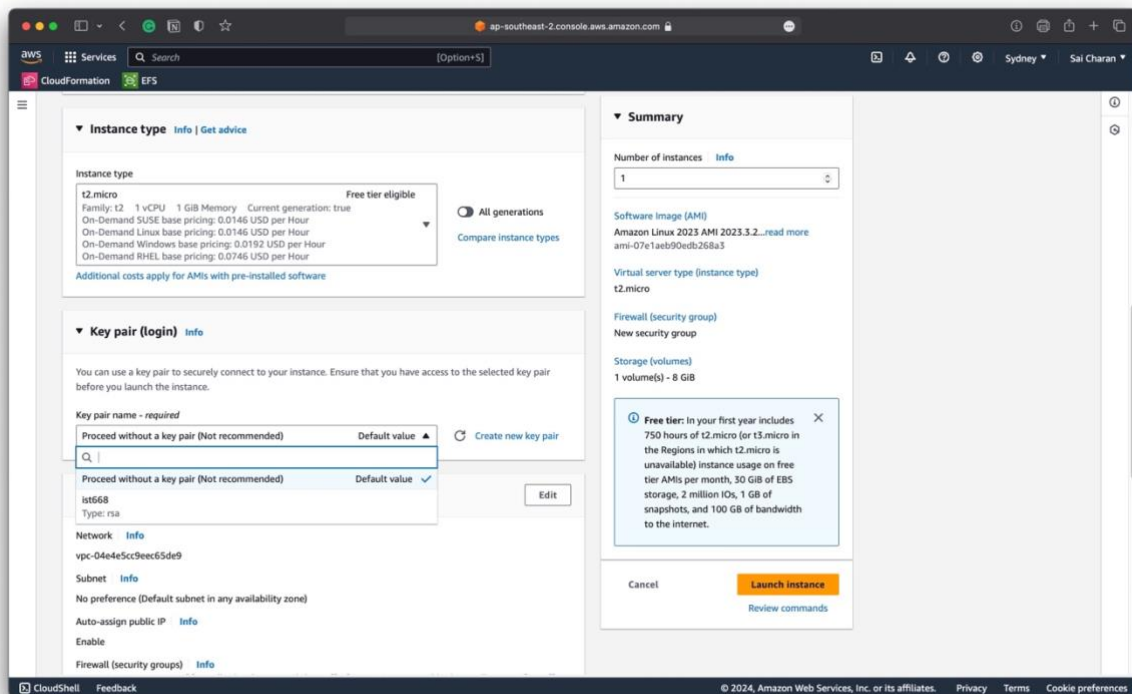


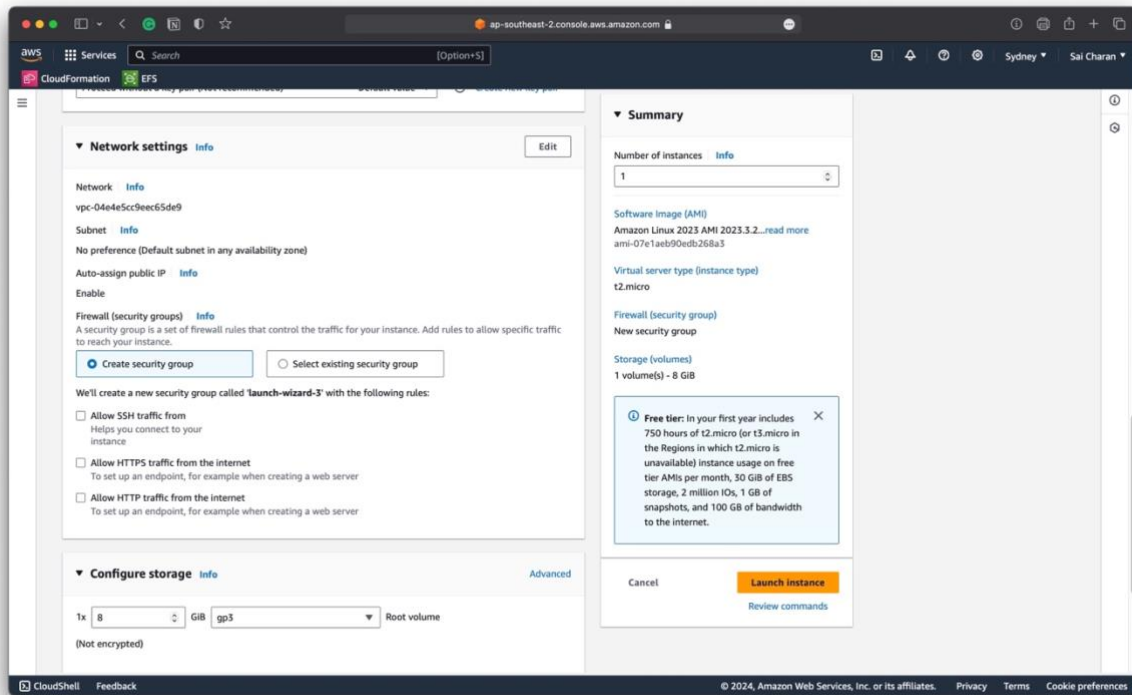
Creating the Instance



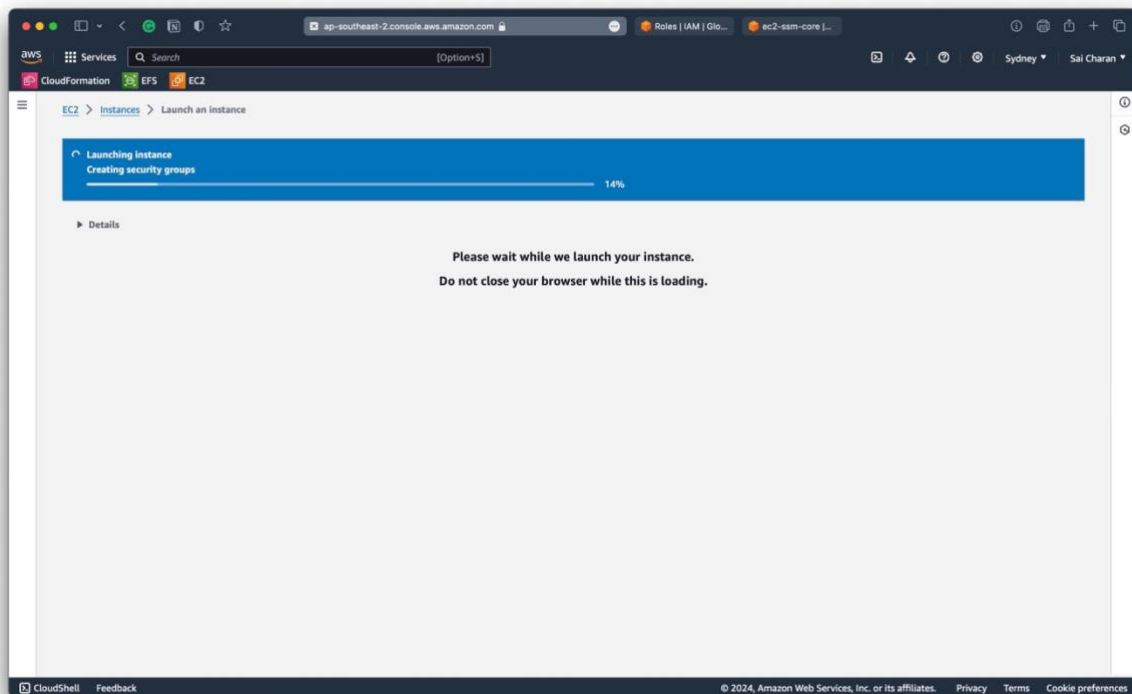
Without the Key-Pair



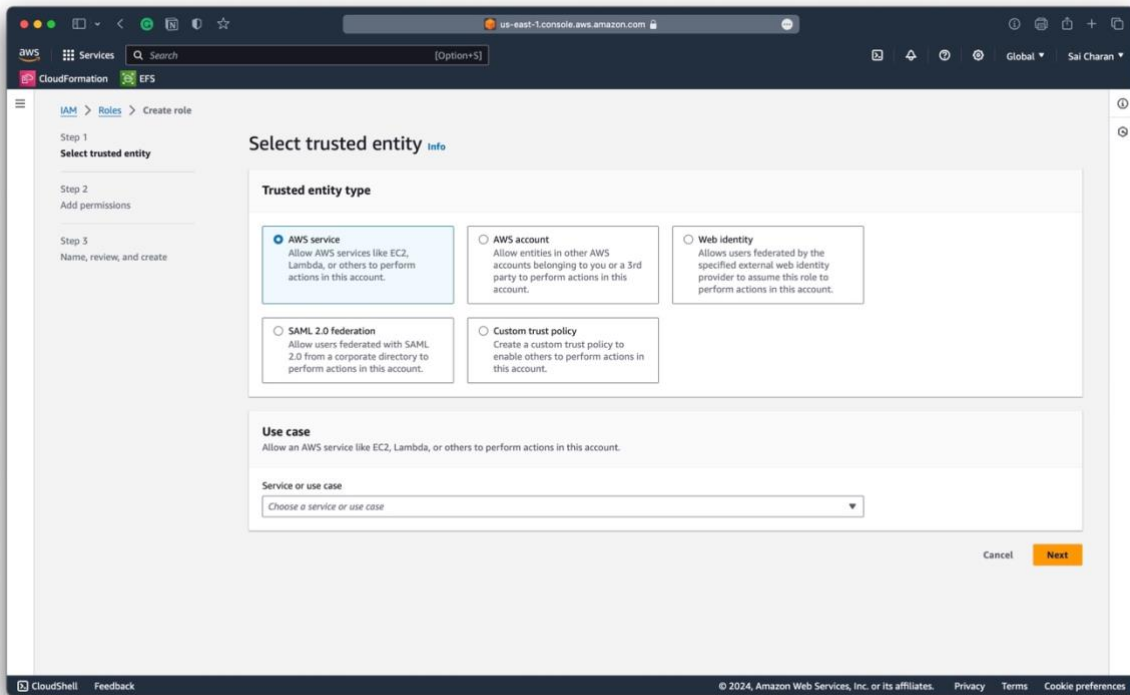
Deselecting Allow SSH traffic form:



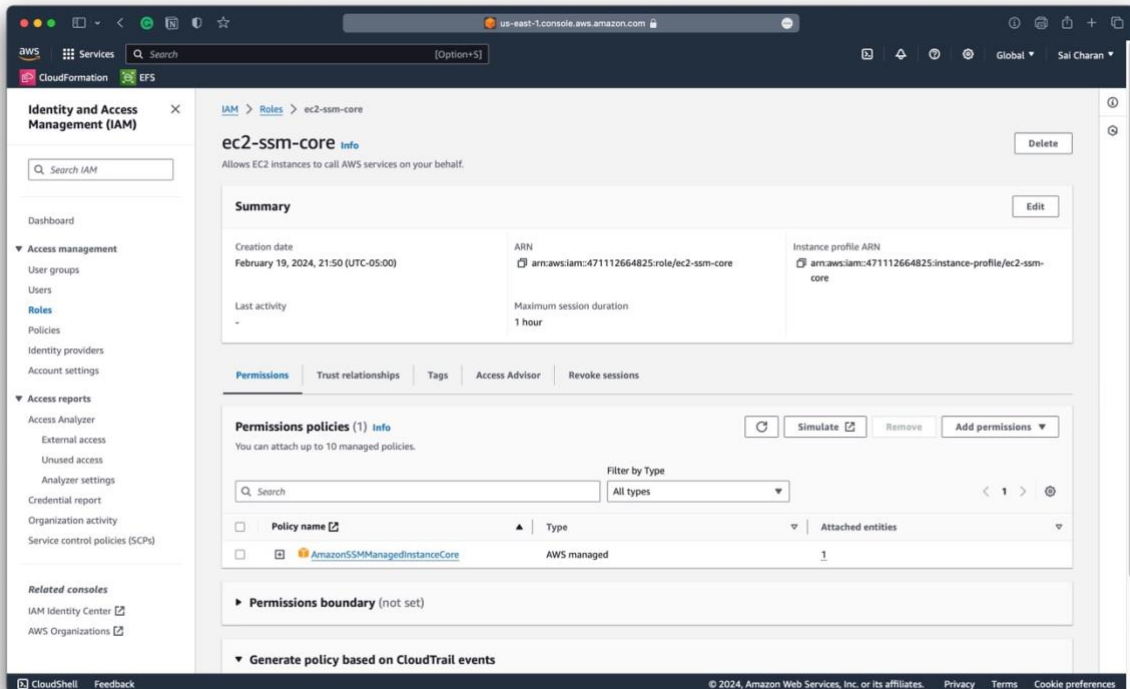
Launching the Instance



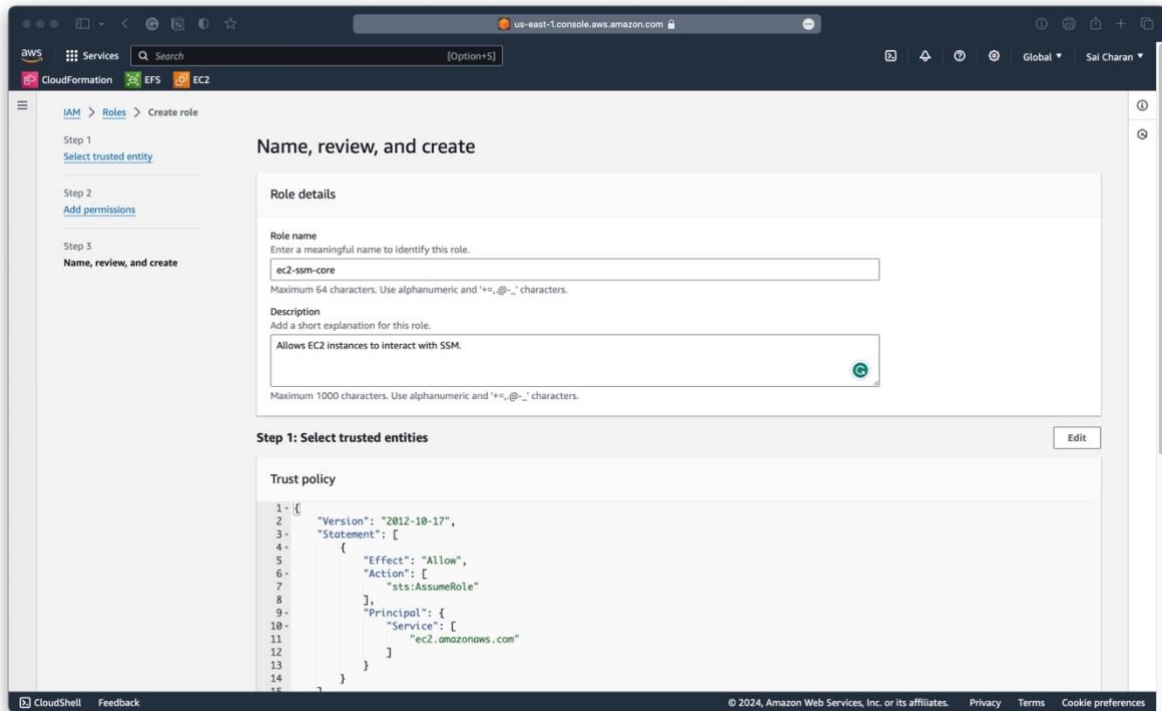
Creating the IAM role



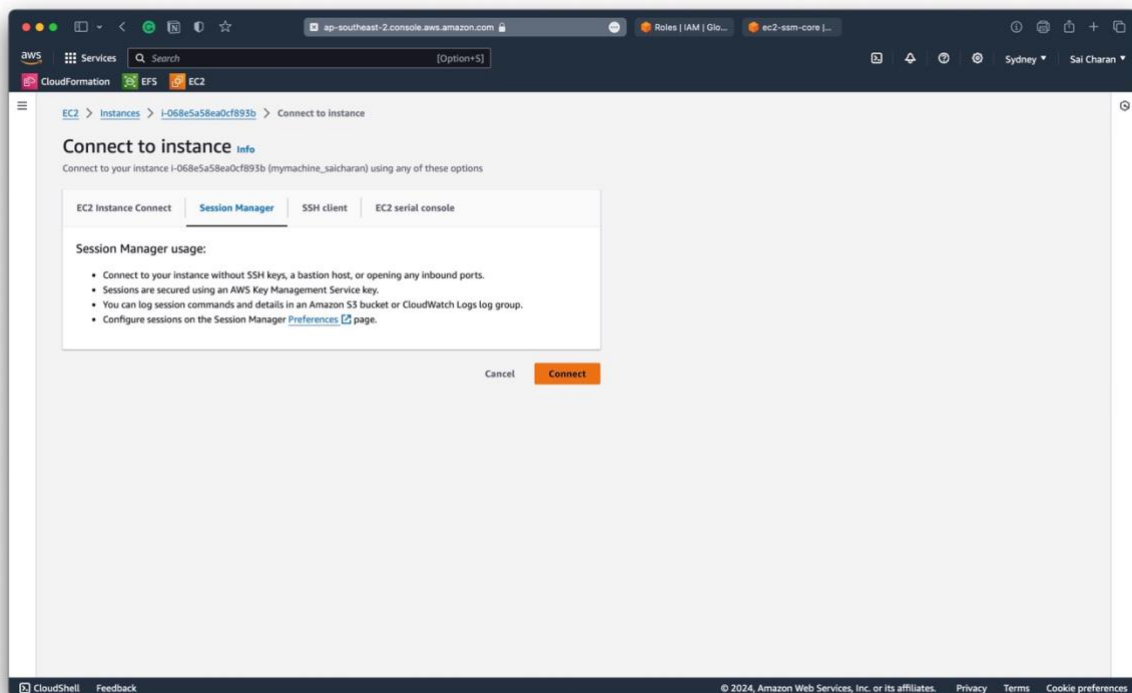
With the Role name “ec2-ssm-core”



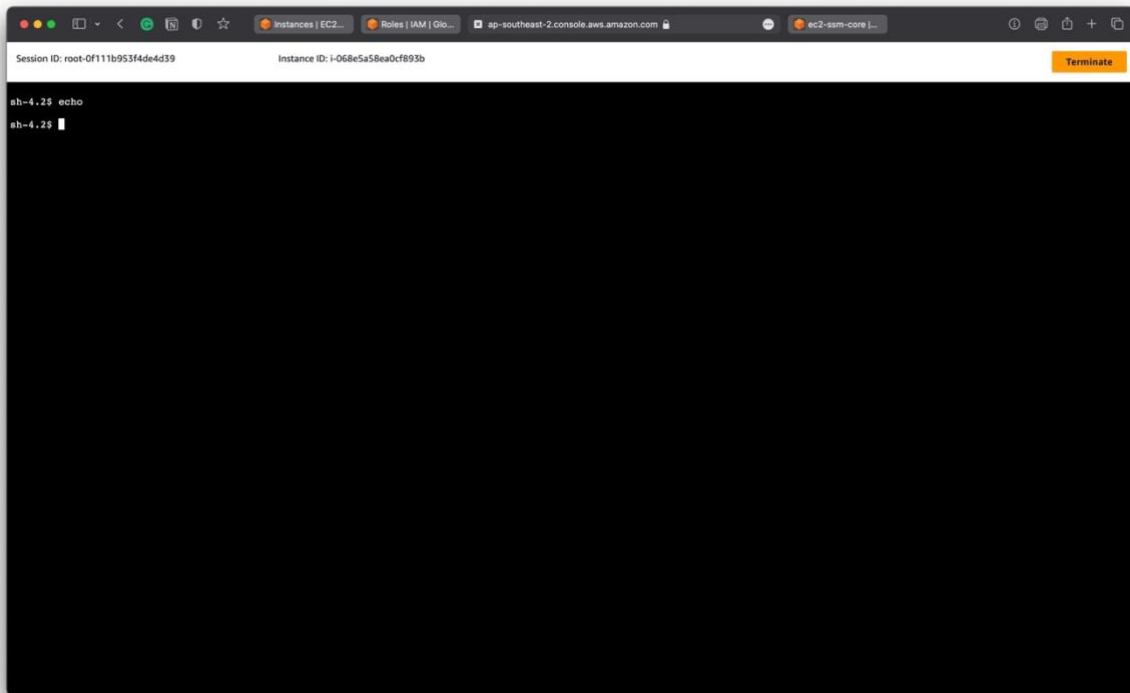
Giving the description



Connecting the Instance using Session Manager



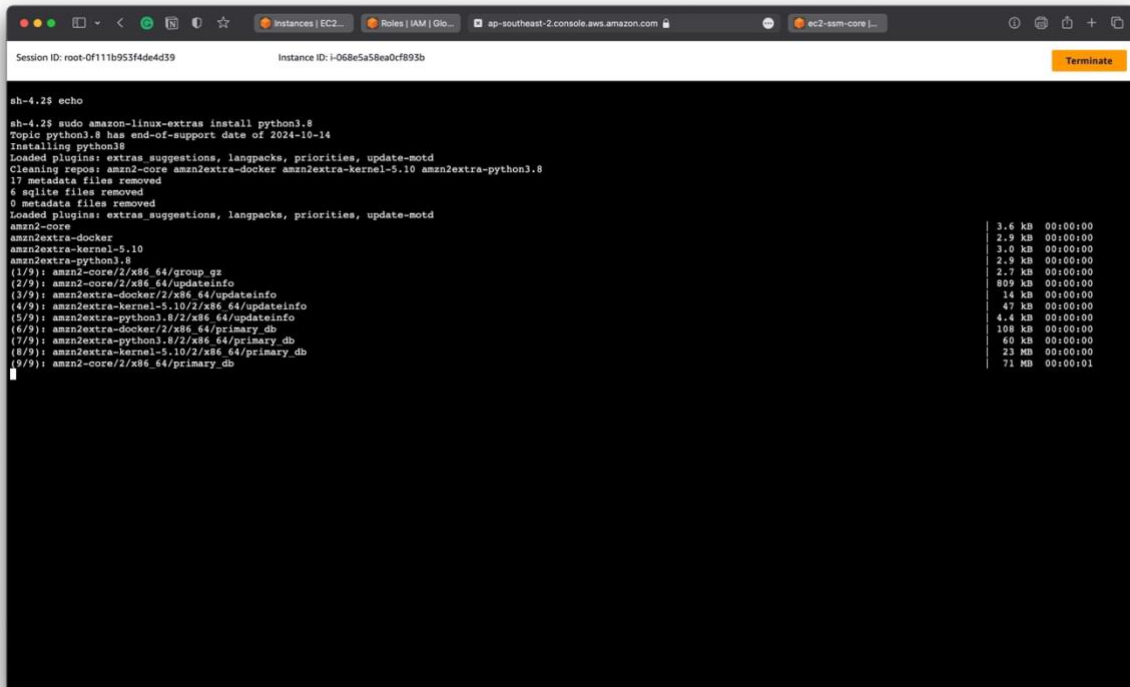
Just checking the system by pinging it “ECHO”



The screenshot shows a terminal window within the AWS Management Console. The browser tabs at the top include 'Instances | EC2...', 'Roles | IAM | Glo...', 'ap-southeast-2.console.aws.amazon.com', and 'ec2-smt-core...'. The terminal header displays 'Session ID: root-Of11b953f4de4d39' and 'Instance ID: i-068e5a58ea0cf893b', with a 'Terminate' button on the right. The terminal content shows a shell prompt 'sh-4.2\$' followed by the command 'echo', which returns 'sh-4.2\$'.

```
sh-4.2$ echo
sh-4.2$
```

Installing Python3.8



The screenshot shows the same terminal window as before, but now displaying the output of the command 'sh-4.2\$ sudo amazon-linux-extras install python3.8'. The output includes a warning about the end-of-support date for python3.8 (2024-10-14), followed by a list of installed plugins and a progress table. The progress table shows the installation progress for various components, including 'amazon-linux-extras', 'amazon-linux-extras-docker', 'amazon-linux-extras-kernel-5.10', and 'amazon-linux-extras-python3.8'. The table has columns for the component name, size, and progress.

```
sh-4.2$ sudo amazon-linux-extras install python3.8
Topic python3.8 has end-of-support date of 2024-10-14
Installing python3.8
Loaded plugins: extras_suggestions, langpacks, priorities, update-motd
Cleaning repos: amzn2-core amzn2extra-docker amzn2extra-kernel-5.10 amzn2extra-python3.8
17 metadata files removed
6 sqlite files removed
0 metadata files removed
Loaded plugins: extras_suggestions, langpacks, priorities, update-motd
amzn2-core
amzn2extra-docker
amzn2extra-kernel-5.10
amzn2extra-python3.8
(1/9): amzn2-core/2/x86_64/group.gz
(2/9): amzn2-core/2/x86_64/updateinfo
(3/9): amzn2extra-docker/2/x86_64/updateinfo
(4/9): amzn2extra-kernel-5.10/2/x86_64/updateinfo
(5/9): amzn2extra-python3.8/2/x86_64/updateinfo
(6/9): amzn2extra-docker/2/x86_64/primary.db
(7/9): amzn2extra-python3.8/2/x86_64/primary.db
(8/9): amzn2extra-kernel-5.10/2/x86_64/primary.db
(9/9): amzn2-core/2/x86_64/primary.db
3.6 kB 00:00:00
2.9 kB 00:00:00
3.0 kB 00:00:00
2.9 kB 00:00:00
2.7 kB 00:00:00
809 kB 00:00:00
14 kB 00:00:00
47 kB 00:00:00
4.4 kB 00:00:00
108 kB 00:00:00
60 kB 00:00:00
23 MB 00:00:00
71 MB 00:00:01
```

Installing the “Link Checker” for finding the Broken links on Website

```
Session ID: root-Gf11b953f4de4d39 Instance ID: i-068e5a58ea0cf893b Terminate

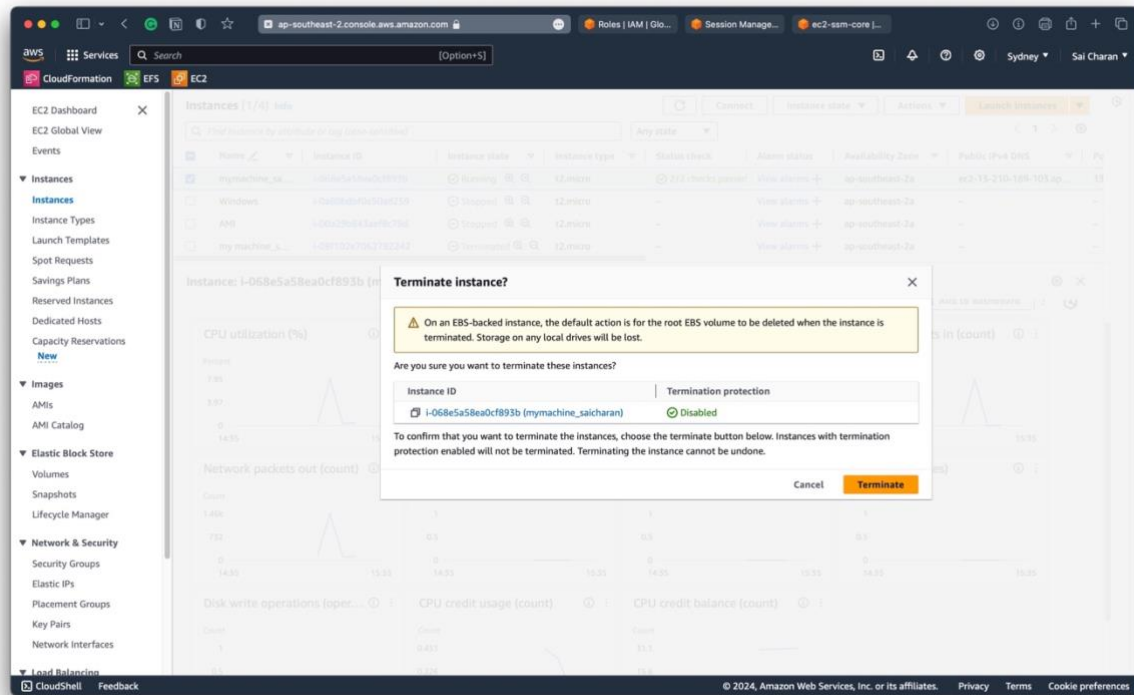
56 redis6 available [ =stable ]
57 ruby3.0 available [ =stable ]
58 postgresql12 available [ =stable ]
59 postgresql13 available [ =stable ]
60 mock2 available [ =stable ]
61 dnsmasq2.85 available [ =stable ]
62 kernel5.15 available [ =stable ]
63 postgresql14 available [ =stable ]
64 firefox available [ =stable ]
65 iustre available [ =stable ]
66 php8.1 available [ =stable ]
67 awscli1 available [ =stable ]
68 php8.2 available [ =stable ]
69 dnsmasq available [ =stable ]
70 unbound1.17 available [ =stable ]
72 collectd-python3 available [ =stable ]
+ Note on end-of-support. Use 'info' subcommand.
sh-4.2$ pip3 install linkchecker
Defaulting to user installation because normal site-packages is not writeable
Collecting linkchecker
  Downloading linkchecker-10.2.1-py3-none-any.whl (286 kB)
    |#####| 286 kB 21.4 MB/s
Collecting BeautifulSoup4>=4.8.1
  Downloading BeautifulSoup4-4.12.3-py3-none-any.whl (147 kB)
    |#####| 147 kB 49.9 MB/s
Collecting dnspython>=2.0
  Downloading dnspython-2.3.0-py3-none-any.whl (283 kB)
    |#####| 283 kB 52.7 MB/s
Collecting requests>=2.20
  Downloading requests-2.31.0-py3-none-any.whl (62 kB)
    |#####| 62 kB 2.5 MB/s
Collecting soupsieve>=1.2
  Downloading soupsieve-2.4.1-py3-none-any.whl (36 kB)
Collecting idna<4,>=2.5
  Downloading idna-3.6-py3-none-any.whl (61 kB)
    |#####| 61 kB 327 kB/s
Collecting urllib3<3,>=1.21.1
  Downloading urllib3-2.0.7-py3-none-any.whl (124 kB)
    |#####| 124 kB 52.8 MB/s
Collecting charset-normalizer<4,>=2
  Downloading charset-normalizer-3.3.2-cp37m-manylinux_2_17_x86_64.manylinux2014_x86_64.whl (136 kB)
    |#####| 136 kB 49.9 MB/s
Collecting certifi>=2017.4.17
  Downloading certifi-2024.2.2-py3-none-any.whl (163 kB)
    |#####| 163 kB 53.2 MB/s
Installing collected packages: soupsieve, BeautifulSoup4, dnspython, idna, urllib3, charset-normalizer, certifi, requests, linkchecker
WARNING: The script normalizer is installed in '/home/ssm-user/.local/bin' which is not on PATH.
Consider adding this directory to PATH or, if you prefer to suppress this warning, use --no-warn-script-location.
WARNING: The script linkchecker is installed in '/home/ssm-user/.local/bin' which is not on PATH.
Consider adding this directory to PATH or, if you prefer to suppress this warning, use --no-warn-script-location.
Successfully installed BeautifulSoup4-4.12.3 certifi-2024.2.2 charset-normalizer-3.3.2 dnspython-2.3.0 idna-3.6 linkchecker-10.2.1 requests-2.31.0 soupsieve-2.4.1 urllib3-2.0.7
sh-4.2$
```

checking the link “~/local/bin/linkchecker -r 2 https://500px.com/pasupuleti_saicharan”

```
Session ID: root-07567ebd876f216 Instance ID: i-0b9f603d5f034d3d3 Terminate

Consider adding this directory to PATH or, if you prefer to suppress this warning, use --no-warn-script-location.
WARNING: The script linkchecker is installed in '/home/ssm-user/.local/bin' which is not on PATH.
Consider adding this directory to PATH or, if you prefer to suppress this warning, use --no-warn-script-location.
Successfully installed BeautifulSoup4-4.12.3 certifi-2024.2.2 charset-normalizer-3.3.2 dnspython-2.3.0 idna-3.6 linkchecker-10.2.1 requests-2.31.0 soupsieve-2.4.1 urllib3-2.0.7
sh-4.2$ ~/local/bin/linkchecker -r 2 https://500px.com/pasupuleti_saicharan
Traceback (most recent call last):
  File "/home/ssm-user/.local/bin/linkchecker", line 5, in <module>
    from linkchecker.command.linkchecker import linkchecker
  File "/home/ssm-user/.local/lib/python3.7/site-packages/linkchecker/command/linkchecker.py", line 28, in <module>
    from .arg_parser import ArgParser
  File "/home/ssm-user/.local/lib/python3.7/site-packages/linkchecker/command/arg_parser.py", line 22, in <module>
    from .. import checker, logconf, logger, COMMAND_NAME
  File "/home/ssm-user/.local/lib/python3.7/site-packages/linkchecker/checker/_init_.py", line 206, in <module>
    from . import ( # noqa: E402
  File "/home/ssm-user/.local/lib/python3.7/site-packages/linkchecker/checker/fileurl.py", line 26, in <module>
    from . import urllib3, get_index_html
  File "/home/ssm-user/.local/lib/python3.7/site-packages/linkchecker/checker/urllib3.py", line 40, in <module>
    from .const import (
  File "/home/ssm-user/.local/lib/python3.7/site-packages/linkchecker/checker/const.py", line 22, in <module>
    import requests
  File "/home/ssm-user/.local/lib/python3.7/site-packages/requests/_init_.py", line 43, in <module>
    import urllib3
  File "/home/ssm-user/.local/lib/python3.7/site-packages/urllib3/_init_.py", line 42, in <module>
    "urllib3 v2.0 only supports OpenSSL 1.1.1+, currently "
ImportError: urllib3 v2.0 only supports OpenSSL 1.1.1+, currently the 'ssl' module is compiled with 'OpenSSL 1.0.2k-fips 26 Jan 2017'. See: https://github.com/urllib3/urllib3/issues/2168
sh-4.2$ ~/local/bin/linkchecker -r 2 https://www.amazon.com
Traceback (most recent call last):
  File "/home/ssm-user/.local/bin/linkchecker", line 5, in <module>
    from linkchecker.command.linkchecker import linkchecker
  File "/home/ssm-user/.local/lib/python3.7/site-packages/linkchecker/command/linkchecker.py", line 28, in <module>
    from .arg_parser import ArgParser
  File "/home/ssm-user/.local/lib/python3.7/site-packages/linkchecker/command/arg_parser.py", line 22, in <module>
    from .. import checker, logconf, logger, COMMAND_NAME
  File "/home/ssm-user/.local/lib/python3.7/site-packages/linkchecker/checker/_init_.py", line 206, in <module>
    from . import ( # noqa: E402
  File "/home/ssm-user/.local/lib/python3.7/site-packages/linkchecker/checker/fileurl.py", line 26, in <module>
    from . import urllib3, get_index_html
  File "/home/ssm-user/.local/lib/python3.7/site-packages/linkchecker/checker/urllib3.py", line 40, in <module>
    from .const import (
  File "/home/ssm-user/.local/lib/python3.7/site-packages/linkchecker/checker/const.py", line 22, in <module>
    import requests
  File "/home/ssm-user/.local/lib/python3.7/site-packages/requests/_init_.py", line 43, in <module>
    import urllib3
  File "/home/ssm-user/.local/lib/python3.7/site-packages/urllib3/_init_.py", line 42, in <module>
    "urllib3 v2.0 only supports OpenSSL 1.1.1+, currently "
ImportError: urllib3 v2.0 only supports OpenSSL 1.1.1+, currently the 'ssl' module is compiled with 'OpenSSL 1.0.2k-fips 26 Jan 2017'. See: https://github.com/urllib3/urllib3/issues/2168
sh-4.2$
```

Terminating the Instance



Note: By doing this assignment I have learned that, without the key-pair also we can connect to the instance.