

## Assignment 6 Ansible + Containerlab

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```
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 main sudo containerlab deploy +
[sudo] password for nithiroj:
23:35:55 INFO Containerlab started version=0.73.0
23:35:55 INFO Parsing & checking topology file=project.clab.yml
23:35:55 INFO Creating docker network name=clab IPv4 subnet=172.20.20.0/24 IPv6 subnet=3fff:172:20:20::/64 MTU=0
23:35:56 INFO Creating lab directory path=/home/nithiroj/modern-network-2025/lab6/clab-project
23:35:56 INFO Creating container name=srl1
23:35:56 INFO Creating container name=srl2
23:35:56 INFO Running postdeploy actions kind=nokia srlinux node=srl2
23:35:56 INFO Created link: srl1:el-1 --- srl2:el-1
23:35:56 INFO Running postdeploy actions kind=nokia srlinux node=srl1
23:36:12 INFO Adding host entries path=/etc/hosts
23:36:12 INFO Adding SSH config for nodes path=/etc/ssh/ssh_config.d/clab-project.conf
```

Name	Kind/Image	State	IPv4/6 Address
clab-project-srl1	nokia_srlinux ghcr.io/nokia/srlinux:latest	running	172.20.20.3 3fff:172:20:20::3
clab-project-srl2	nokia_srlinux ghcr.io/nokia/srlinux:latest	running	172.20.20.2 3fff:172:20:20::2

```
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 main sudo docker ps -a
CONTAINER ID   IMAGE                                COMMAND                  CREATED        STATUS        PORTS        NAMES
ea7a1d68315f   ghcr.io/nokia/srlinux:latest        "/tini -- /usr/local..." 49 seconds ago Up 49 seconds        clab-project-srl2
0b8922cfd89c   ghcr.io/nokia/srlinux:latest        "/tini -- /usr/local..." 49 seconds ago Up 49 seconds        clab-project-srl1
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 main
```

Ln 27, Col 1 (17 selected) Spaces: 2 UTF-8

Container lab deploy and docker ps -a

```
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 main ping 172.20.20.2 -c 3
ping 172.20.20.3 -c 3
PING 172.20.20.2 (172.20.20.2) 56(84) bytes of data.
64 bytes from 172.20.20.2: icmp_seq=1 ttl=64 time=1.13 ms
64 bytes from 172.20.20.2: icmp_seq=2 ttl=64 time=1.10 ms
64 bytes from 172.20.20.2: icmp_seq=3 ttl=64 time=1.10 ms

--- 172.20.20.2 ping statistics ---
3 packets transmitted, 3 received, 0% packet loss, time 2002ms
rtt min/avg/max/mdev = 1.096/1.107/1.129/0.015 ms
PING 172.20.20.3 (172.20.20.3) 56(84) bytes of data.
64 bytes from 172.20.20.3: icmp_seq=1 ttl=64 time=1.11 ms
64 bytes from 172.20.20.3: icmp_seq=2 ttl=64 time=1.14 ms
64 bytes from 172.20.20.3: icmp_seq=3 ttl=64 time=1.12 ms

--- 172.20.20.3 ping statistics ---
3 packets transmitted, 3 received, 0% packet loss, time 2002ms
rtt min/avg/max/mdev = 1.107/1.121/1.141/0.014 ms
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 main
```

Ln 30, Col 1 (43 selected) Spaces: 2 UTF-8

Ping test to clab-project-srl1 & srl2

```

nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 》 main sudo docker exec clab-project-srl1 bash -c "printf 'Permit
RootLogin yes\nPasswordAuthentication yes\nPubkeyAuthentication yes\nUsePAM yes\n' > /etc/ssh/sshd_config_mgmt"
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 》 main sudo docker exec clab-project-srl2 bash -c "printf 'Permit
RootLogin yes\nPasswordAuthentication yes\nPubkeyAuthentication yes\nUsePAM yes\n' > /etc/ssh/sshd_config_mgmt"
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 》 main sudo docker exec clab-project-srl1 bash -c "pkill sshd; sl
eep 2; /usr/sbin/sshd"
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 》 main sudo docker exec clab-project-srl2 bash -c "pkill sshd; sl
eep 2; /usr/sbin/sshd"
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 》 main sudo docker exec -it clab-project-srl1 bash
root@srl1:/# passwd
New password:
Retype new password:
passwd: password updated successfully
root@srl1:/# exit
exit
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 》 main sudo docker exec -it clab-project-srl2 bash
root@srl2:/# passwd
New password:
Retype new password:
passwd: password updated successfully
root@srl2:/# exit
exit

```

Config ssh on docker

```

nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 》 main ssh-keygen -f "/home/$USER/.ssh/known_hosts" -R "172.20.
20.2"
# Host 172.20.20.2 found: line 1
# Host 172.20.20.2 found: line 2
# Host 172.20.20.2 found: line 3
/home/nithiroj/.ssh/known_hosts updated.
Original contents retained as /home/nithiroj/.ssh/known_hosts.old
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 》 main ssh-keygen -f "/home/$USER/.ssh/known_hosts" -R "172.20.20
.3"
# Host 172.20.20.3 found: line 1
# Host 172.20.20.3 found: line 2
# Host 172.20.20.3 found: line 3
/home/nithiroj/.ssh/known_hosts updated.
Original contents retained as /home/nithiroj/.ssh/known_hosts.old
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 》 main ssh root@172.20.20.2
The authenticity of host '172.20.20.2 (172.20.20.2)' can't be established.
ED25519 key fingerprint is SHA256:/aXA3LTj5ZVv4N5AnyRXy9Sb6GpPb0020bPGwTwtNdM.
This key is not known by any other names.
Are you sure you want to continue connecting (yes/no/[fingerprint])? yes
Warning: Permanently added '172.20.20.2' (ED25519) to the list of known hosts.
(root@172.20.20.2) Password:
root@srl2:~# exit
logout
Connection to 172.20.20.2 closed.
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 》 main ssh root@172.20.20.3
The authenticity of host '172.20.20.3 (172.20.20.3)' can't be established.
ED25519 key fingerprint is SHA256:iJLQD0YI37tjnD+7GkST7ID1DdxqjvTNzI05hvc7cY.
This key is not known by any other names.
Are you sure you want to continue connecting (yes/no/[fingerprint])? yes
Warning: Permanently added '172.20.20.3' (ED25519) to the list of known hosts.
(root@172.20.20.3) Password:
root@srl1:~# exit
logout
Connection to 172.20.20.3 closed.

```

Ssh keygen and ssh to root on clab-project-srl1 & srl2

```

nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 》 main ansible -i hosts.ini lab -m ansible.builtin.ping
[WARNING]: sftp transfer mechanism failed on [172.20.20.2]. Use ANSIBLE_DEBUG=1 to see detailed information
[WARNING]: scp transfer mechanism failed on [172.20.20.2]. Use ANSIBLE_DEBUG=1 to see detailed information
clab-srl02-srl2 | SUCCESS => {
  "ansible_facts": {
    "discovered_interpreter_python": "/usr/bin/python3.11"
  },
  "changed": false,
  "ping": "pong"
}
[WARNING]: sftp transfer mechanism failed on [172.20.20.3]. Use ANSIBLE_DEBUG=1 to see detailed information
[WARNING]: scp transfer mechanism failed on [172.20.20.3]. Use ANSIBLE_DEBUG=1 to see detailed information
clab-srl02-srl1 | SUCCESS => {
  "ansible_facts": {
    "discovered_interpreter_python": "/usr/bin/python3.11"
  },
  "changed": false,
  "ping": "pong"
}

```

## Ansible ping all

```
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6: main ansible-playbook -i hosts.ini showifconfig.yml

PLAY [show ifconfig with shell command] *****

TASK [Gathering Facts] *****
[WARNING]: sftp transfer mechanism failed on [172.20.20.2]. Use ANSIBLE_DEBUG=1 to see detailed information
[WARNING]: scp transfer mechanism failed on [172.20.20.2]. Use ANSIBLE_DEBUG=1 to see detailed information
ok: [clab-srl02-srl2]
[WARNING]: sftp transfer mechanism failed on [172.20.20.3]. Use ANSIBLE_DEBUG=1 to see detailed information
[WARNING]: scp transfer mechanism failed on [172.20.20.3]. Use ANSIBLE_DEBUG=1 to see detailed information
ok: [clab-srl02-srl1]

TASK [show ifconfig] *****
changed: [clab-srl02-srl2]
changed: [clab-srl02-srl1]

TASK [debug] *****
ok: [clab-srl02-srl1] => {
  "output.stdout_lines": [
    "gateway: flags=4163<UP,BROADCAST,RUNNING,MULTICAST> mtu 1500",
    "    inet 127.250.250.1 netmask 255.255.255.252 broadcast 127.250.250.3",
    "    inet6 fe80::1 prefixlen 120 scopeid 0x20<link>",
    "    ether 1a:ef:00:ff:00:00 txqueuelen 1000 (Ethernet)",
    "    RX packets 13 bytes 990 (990.0 B)",
    "    RX errors 0 dropped 0 overruns 0 frame 0",
    "    TX packets 11 bytes 830 (830.0 B)",
    "    TX errors 0 dropped 2 overruns 0 carrier 0 collisions 0",
    "",
    "lo: flags=73<UP,LOOPBACK,RUNNING> mtu 65536",
    "    inet 127.0.0.1 netmask 255.0.0.0",
    "    inet6 ::1 prefixlen 128 scopeid 0x10<host>",
    "    loop txqueuelen 1000 (Local Loopback)",
    "    RX packets 0 bytes 0 (0.0 B)",
    "    RX errors 0 dropped 0 overruns 0 frame 0",
    "    TX packets 0 bytes 0 (0.0 B)",
    "    TX errors 0 dropped 0 overruns 0 carrier 0 collisions 0",
    "",
    "mgmt0.0: flags=4163<UP,BROADCAST,RUNNING,MULTICAST> mtu 1500",
    "    inet 172.20.20.3 netmask 255.255.255.0 broadcast 172.20.20.255",
    "    inet6 fe80::42:acff:fe14:1403 prefixlen 64 scopeid 0x20<link>",
    "    inet6 3fff:172:20:20::3 prefixlen 64 scopeid 0x0<global>",
    "    ether 02:42:ac:14:14:03 txqueuelen 1000 (Ethernet)",
    "    RX packets 1685 bytes 1563497 (1.4 MiB)",
    "    RX errors 0 dropped 0 overruns 0 frame 0",
    "    TX packets 1019 bytes 148854 (145.3 KiB)",
    "    TX errors 0 dropped 0 overruns 0 carrier 0 collisions 0"
  ]
}

ok: [clab-srl02-srl2] => {
  "output.stdout_lines": [
    "gateway: flags=4163<UP,BROADCAST,RUNNING,MULTICAST> mtu 1500",
    "    inet 127.250.250.1 netmask 255.255.255.252 broadcast 127.250.250.3",
    "    inet6 fe80::1 prefixlen 120 scopeid 0x20<link>",
    "    ether 1a:a7:01:ff:00:00 txqueuelen 1000 (Ethernet)",
    "    RX packets 13 bytes 990 (990.0 B)",
    "    RX errors 0 dropped 0 overruns 0 frame 0",
    "    TX packets 11 bytes 830 (830.0 B)",
    "    TX errors 0 dropped 2 overruns 0 carrier 0 collisions 0",
    "",
    "lo: flags=73<UP,LOOPBACK,RUNNING> mtu 65536",
    "    inet 127.0.0.1 netmask 255.0.0.0",
    "    inet6 ::1 prefixlen 128 scopeid 0x10<host>",
    "    loop txqueuelen 1000 (Local Loopback)",
    "    RX packets 0 bytes 0 (0.0 B)",
    "    RX errors 0 dropped 0 overruns 0 frame 0",
    "    TX packets 0 bytes 0 (0.0 B)",
    "    TX errors 0 dropped 0 overruns 0 carrier 0 collisions 0",
    "",
    "mgmt0.0: flags=4163<UP,BROADCAST,RUNNING,MULTICAST> mtu 1500",
    "    inet 172.20.20.2 netmask 255.255.255.0 broadcast 172.20.20.255",
    "    inet6 3fff:172:20:20::2 prefixlen 64 scopeid 0x0<global>",
    "    inet6 fe80::42:acff:fe14:1402 prefixlen 64 scopeid 0x20<link>",
    "    ether 02:42:ac:14:14:02 txqueuelen 1000 (Ethernet)",
    "    RX packets 1679 bytes 1565780 (1.4 MiB)",
    "    RX errors 0 dropped 0 overruns 0 frame 0",
    "    TX packets 951 bytes 143906 (140.5 KiB)",
    "    TX errors 0 dropped 0 overruns 0 carrier 0 collisions 0"
  ]
}

PLAY RECAP *****
clab-srl02-srl1      : ok=3    changed=1    unreachable=0    failed=0    skipped=0    rescued=0    ignored=0
clab-srl02-srl2      : ok=3    changed=1    unreachable=0    failed=0    skipped=0    rescued=0    ignored=0

nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6: main
```

## Ansible play book Show interface

```
ect_Nokia_SR_Linux.pdf U ! showifconfig.yml U X ! change_loopback_ip_address.yml U ! project.clab.y

lab6 > ! showifconfig.yml > {} 0 > {} tasks > {} 0
 1 - name: show ifconfig with shell command
 2   hosts: all
 3   become: yes
 4
 5   tasks:
 6   - name: show ifconfig
 7     shell: ifconfig -a
 8     register: output
 9   - debug:
10     var: output.stdout_lines
11
12
```

Showifconfig.yml file

```
nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 > main ansible-playbook -i hosts.ini change_loopback_ip_address.yml

PLAY [change loopback ip address] *****

TASK [Gathering Facts] *****
[WARNING]: sftp transfer mechanism failed on [172.20.20.3]. Use ANSIBLE_DEBUG=1 to see detailed information
[WARNING]: scp transfer mechanism failed on [172.20.20.3]. Use ANSIBLE_DEBUG=1 to see detailed information
ok: [clab-srl02-srl1]
[WARNING]: sftp transfer mechanism failed on [172.20.20.2]. Use ANSIBLE_DEBUG=1 to see detailed information
[WARNING]: scp transfer mechanism failed on [172.20.20.2]. Use ANSIBLE_DEBUG=1 to see detailed information
ok: [clab-srl02-srl2]

TASK [show ifconfig before change ip address] *****
changed: [clab-srl02-srl2]
changed: [clab-srl02-srl1]

TASK [debug] *****
ok: [clab-srl02-srl1] => {
  "output.stdout_lines": [
    "gateway: flags=4163<UP,BROADCAST,RUNNING,MULTICAST> mtu 1500",
    "  inet 127.250.250.1 netmask 255.255.255.252 broadcast 127.250.250.3",
    "  inet6 fe80::1 prefixlen 120 scopeid 0x20<link>",
    "  ether 1a:ef:00:ff:00:00 txqueuelen 1000 (Ethernet)",
    "  RX packets 14 bytes 1060 (1.0 KiB)",
    "  RX errors 0 dropped 0 overruns 0 frame 0",
    "  TX packets 11 bytes 830 (830.0 B)",
    "  TX errors 0 dropped 2 overruns 0 carrier 0 collisions 0",
    "",
    "lo: flags=73<UP,LOOPBACK,RUNNING> mtu 65536",
    "  inet 127.0.0.1 netmask 255.0.0.0",
    "  inet6 ::1 prefixlen 128 scopeid 0x10<host>",
    "  loop txqueuelen 1000 (Local Loopback)",
    "  RX packets 0 bytes 0 (0.0 B)",
    "  RX errors 0 dropped 0 overruns 0 frame 0",
    "  TX packets 0 bytes 0 (0.0 B)",
    "  TX errors 0 dropped 0 overruns 0 carrier 0 collisions 0",
    "",
    "mgmt0.0: flags=4163<UP,BROADCAST,RUNNING,MULTICAST> mtu 1500",
    "  inet 172.20.20.3 netmask 255.255.255.0 broadcast 172.20.20.255",
    "  inet6 fe80::42:acff:fe14:1403 prefixlen 64 scopeid 0x20<link>",
    "  inet6 3fff:172:20:20::3 prefixlen 64 scopeid 0x0<global>",
    "  ether 02:42:ac:14:14:03 txqueuelen 1000 (Ethernet)",
    "  RX packets 2026 bytes 1946050 (1.8 MiB)",
    "  RX errors 0 dropped 0 overruns 0 frame 0",
    "  TX packets 1225 bytes 177806 (173.6 KiB)",
    "  TX errors 0 dropped 0 overruns 0 carrier 0 collisions 0"
  ]
}
```

```
ok: [clab-srl02-srl2] => {
  "output.stdout_lines": [
    "gateway: flags=4163<UP,BROADCAST,RUNNING,MULTICAST> mtu 1500",
    "  inet 127.250.250.1 netmask 255.255.255.252 broadcast 127.250.250.3",
    "  inet6 fe80::1 prefixlen 120 scopeid 0x20<link>",
    "  ether 1a:a7:01:ff:00:00 txqueuelen 1000 (Ethernet)",
    "  RX packets 13 bytes 990 (990.0 B)",
    "  RX errors 0 dropped 0 overruns 0 frame 0",
    "  TX packets 11 bytes 830 (830.0 B)",
    "  TX errors 0 dropped 2 overruns 0 carrier 0 collisions 0",
    "",
    "lo: flags=73<UP,LOOPBACK,RUNNING> mtu 65536",
    "  inet 127.0.0.1 netmask 255.0.0.0",
    "  inet6 ::1 prefixlen 128 scopeid 0x10<host>",
    "  loop txqueuelen 1000 (Local Loopback)",
    "  RX packets 0 bytes 0 (0.0 B)",
    "  RX errors 0 dropped 0 overruns 0 frame 0",
    "  TX packets 0 bytes 0 (0.0 B)",
    "  TX errors 0 dropped 0 overruns 0 carrier 0 collisions 0",
    "",
    "mgmt0.0: flags=4163<UP,BROADCAST,RUNNING,MULTICAST> mtu 1500",
    "  inet 172.20.20.2 netmask 255.255.255.0 broadcast 172.20.20.255",
    "  inet6 3fff:172:20:20::2 prefixlen 64 scopeid 0x0<global>",
    "  inet6 fe80::42:acff:fe14:1402 prefixlen 64 scopeid 0x20<link>",
    "  ether 02:42:ac:14:14:02 txqueuelen 1000 (Ethernet)",
    "  RX packets 2023 bytes 1948535 (1.8 MiB)",
    "  RX errors 0 dropped 0 overruns 0 frame 0",
    "  TX packets 1157 bytes 172862 (168.8 KiB)",
    "  TX errors 0 dropped 0 overruns 0 carrier 0 collisions 0"
  ]
}
```

```
TASK [change ip address] *****
changed: [clab-srl02-srl1]
changed: [clab-srl02-srl2]
```

You can paste the image from the clipboard.

```
TASK [show ifconfig after change ip address] *****
changed: [clab-srl02-srl1]
changed: [clab-srl02-srl2]
```

```
TASK [debug] *****
ok: [clab-srl02-srl1] => {
  "output.stdout_lines": [
    "gateway: flags=4163<UP,BROADCAST,RUNNING,MULTICAST> mtu 1500",
    "  inet 127.250.250.1 netmask 255.255.255.252 broadcast 127.250.250.3",
    "  inet6 fe80::1 prefixlen 120 scopeid 0x20<link>",
    "  ether 1a:ef:00:ff:00:00 txqueuelen 1000 (Ethernet)",
    "  RX packets 14 bytes 1060 (1.0 KiB)",
    "  RX errors 0 dropped 0 overruns 0 frame 0",
    "  TX packets 11 bytes 830 (830.0 B)",
    "  TX errors 0 dropped 2 overruns 0 carrier 0 collisions 0",
    "",
    "lo: flags=73<UP,LOOPBACK,RUNNING> mtu 65536",
    "  inet 172.148.156.31 netmask 255.255.255.0",
    "  inet6 ::1 prefixlen 128 scopeid 0x10<host>",
    "  loop txqueuelen 1000 (Local Loopback)",
    "  RX packets 0 bytes 0 (0.0 B)",
    "  RX errors 0 dropped 0 overruns 0 frame 0",
    "  TX packets 0 bytes 0 (0.0 B)",
    "  TX errors 0 dropped 0 overruns 0 carrier 0 collisions 0",
    "",
    "mgmt0.0: flags=4163<UP,BROADCAST,RUNNING,MULTICAST> mtu 1500",
    "  inet 172.20.20.3 netmask 255.255.255.0 broadcast 172.20.20.255",
    "  inet6 fe80::42:acff:fe14:1403 prefixlen 64 scopeid 0x20<link>",
    "  inet6 3fff:172:20:20::3 prefixlen 64 scopeid 0x0<global>",
    "  ether 02:42:ac:14:14:03 txqueuelen 1000 (Ethernet)",
    "  RX packets 2251 bytes 2198988 (2.0 MiB)",
    "  RX errors 0 dropped 0 overruns 0 frame 0",
    "  TX packets 1358 bytes 190716 (186.2 KiB)",
    "  TX errors 0 dropped 0 overruns 0 carrier 0 collisions 0"
  ]
}
```

```

ok: [clab-srl02-srl2] => {
  "output.stdout_lines": [
    "gateway: flags=4163<UP,BROADCAST,RUNNING,MULTICAST> mtu 1500",
    "  inet 127.250.250.1 netmask 255.255.255.252 broadcast 127.250.250.3",
    "  inet6 fe80::1 prefixlen 120 scopeid 0x20<link>",
    "  ether 1a:a7:01:ff:00:00 txqueuelen 1000 (Ethernet)",
    "  RX packets 13 bytes 990 (990.0 B)",
    "  RX errors 0 dropped 0 overruns 0 frame 0",
    "  TX packets 11 bytes 830 (830.0 B)",
    "  TX errors 0 dropped 2 overruns 0 carrier 0 collisions 0",
    "",
    "lo: flags=73<UP,LOOPBACK,RUNNING> mtu 65536",
    "  inet 172.148.156.31 netmask 255.255.255.0",
    "  inet6 ::1 prefixlen 128 scopeid 0x10<host>",
    "  loop txqueuelen 1000 (Local Loopback)",
    "  RX packets 0 bytes 0 (0.0 B)",
    "  RX errors 0 dropped 0 overruns 0 frame 0",
    "  TX packets 0 bytes 0 (0.0 B)",
    "  TX errors 0 dropped 0 overruns 0 carrier 0 collisions 0",
    "",
    "mgmt0.0: flags=4163<UP,BROADCAST,RUNNING,MULTICAST> mtu 1500",
    "  inet 172.20.20.2 netmask 255.255.255.0 broadcast 172.20.20.255",
    "  inet6 3fff:172:20:20::2 prefixlen 64 scopeid 0x0<global>",
    "  inet6 fe80::42:acff:fe14:1402 prefixlen 64 scopeid 0x20<link>",
    "  ether 02:42:ac:14:14:02 txqueuelen 1000 (Ethernet)",
    "  RX packets 2247 bytes 2201407 (2.0 MiB)",
    "  RX errors 0 dropped 0 overruns 0 frame 0",
    "  TX packets 1275 bytes 184810 (180.4 KiB)",
    "  TX errors 0 dropped 0 overruns 0 carrier 0 collisions 0"
  ]
}

PLAY RECAP *****
clab-srl02-srl1      : ok=6    changed=3    unreachable=0    failed=0    skipped=0    rescued=0    ignored=0
clab-srl02-srl2      : ok=6    changed=3    unreachable=0    failed=0    skipped=0    rescued=0    ignored=0

nithiroj@nithiroj-Nitro-AN515-57 ~/modern-network-2025/lab6 : main

```

## Ansible-playbook change loopback ip address

```

ect_Nokia_SR_Linux.pdf U  ! showifconfig.yml U  ! change_loopback_ip_address.yml U X  ! project.clab.yml
lab6 > ! change_loopback_ip_address.yml > {} 0 > {} tasks > {} 4 > {} debug > abc var
1  - name: change loopback ip address
2    hosts: all
3    become: yes
4
5    tasks:
6      - name: show ifconfig before change ip address
7        shell: ifconfig -a
8        register: output
9      - debug:
10        var: output.stdout_lines
11
12      - name: change ip address
13        shell: ifconfig lo 172.148.156.31 netmask 255.255.255.0
14
15      - name: show ifconfig after change ip address
16        shell: ifconfig -a
17        register: output
18      - debug:
19        var: output.stdout_lines

```

## Change\_loopback\_ip\_address.yml file

```
--{ running }--[ ]--
A:admin@srl2# show version
```

```
-----
Hostname           : srl2
Chassis Type       : 7220 IXR-D2L
Part Number        : Sim Part No.
Serial Number      : Sim Serial No.
System HW MAC Address: 1A:A7:01:FF:00:00
OS                 : SR Linux
Software Version    : v25.10.1
Build Number       : 399-g90c1dbe35ef
Architecture       : x86_64
Last Booted        : 2026-02-11T16:35:59.933Z
Total Memory       : 32638608 kB
Free Memory        : 23739068 kB
-----
```

## Nokiasrlinux show version

```
--{ running }--[ ]--
A:admin@srl2# show network-instance route-table all
```

Prefix	ID	Route Type	Route Owner	Active	Origin Network Instance	Metric	Pref	Next-hop (Type)	Next-hop Interface	Backup Next-hop (Type)	Backup Next-hop Interface
0.0.0.0/0	1	dhcp	dhcp_client_mgr	True	mgmt	0	5	172.20.20.1 (direct)	mgmt0.0		
172.20.20.0/24	0	linux	linux_mgr	False	mgmt	0	5	172.20.20.0 (direct)	mgmt0.0		
172.20.20.0/24	1	local	net_inst_mgr	True	mgmt	0	0	172.20.20.2 (direct)	mgmt0.0		
172.20.20.2/32	1	host	net_inst_mgr	True	mgmt	0	0	None	None		
172.20.20.255/32	1	host	net_inst_mgr	True	mgmt	0	0	None	None		

IPv4 routes total : 5  
IPv4 prefixes with active routes : 4  
IPv4 prefixes with active EOMP routes: 0

Prefix	ID	Route Type	Route Owner	Active	Origin Network Instance	Metric	Pref	Next-hop (Type)	Next-hop Interface	Backup Next-hop (Type)	Backup Next-hop Interface
::/0	1	dhcp	dhcp_client_mgr	True	mgmt	0	5	3fff:172:20:20::1 (direct)	mgmt0.0		
3fff:172:20:20::/64	0	linux	linux_mgr	False	mgmt	0	5	3fff:172:20:20:: (direct)	mgmt0.0		
3fff:172:20:20::/64	1	local	net_inst_mgr	True	mgmt	0	0	3fff:172:20:20::2 (direct)	mgmt0.0		
3fff:172:20:20::2/128	1	host	net_inst_mgr	True	mgmt	0	0	None	None		

IPv6 routes total : 4  
IPv6 prefixes with active routes : 3  
IPv6 prefixes with active EOMP routes: 0

```
--{ running }--[ ]--
A:admin@srl2#
```

## Nokiasrlinux show network-instance route-table all

```

--{ running }--[ ]--
A:admin@srl2# show platform

```

Module Type	ID	Admin State	Operational State	Model	Last Change
control	A	N/A	up	imm48-25g-sfp28+8-100g-qsfp28+2-10g-sfpp	2026-02-11T16:35:59.933Z
linecard	1	N/A	up	imm48-25g-sfp28+8-100g-qsfp28+2-10g-sfpp	2026-02-11T16:36:05.730Z

```

--{ running }--[ ]--
A:admin@srl2# show interface
=====
ethernet-1/1 is up, speed 25G, type None
=====

mgmt0 is up, speed 1G, type None
  mgmt0.0 is up
    Network-Instances:
      * Name: mgmt (ip-vrf)
    Encapsulation   : null
    Type            : None
    IPv4 addr       : 172.20.20.2/24 (dhcp, preferred)
    IPv6 addr       : 3fff:172:20:20::2/64 (dhcp, preferred)
    IPv6 addr       : fe80::42:acff:fe14:1402/64 (link-layer, preferred)
=====

Summary
  0 loopback interfaces configured
  1 ethernet interfaces are up
  1 management interfaces are up
  1 subinterfaces are up
=====

--{ running }--[ ]--
A:admin@srl2#

```

nokiasrlinux showplatform & interface