Instruction to load FlexSwitch

Pre-install connectivity

1.Connect the console port of the switch to a PC. Most switches come with a RJ45 console port. Use a RJ45-to-serial cable or an RJ45-to- USB cable to connect to a PC.

2. Use a terminal application; such as “Tera Term” to terminal connect. Configure the console port. Use these settings for the console port:

- 115200 baud
- No flow control
- 1 stop bit
- No parity bits
- 8 data bits

3. Connect MGMT port of the switch to the same segment as TFTP server.

In this example we are assuming IP address for management port is 192.x.x.x.

Installing the ONL

1. 1. **Install ONL image from ONI:**
   Before installation, you can download the latest ONL source code from GitHub and build the image.
   https://github.com/OpenComputeProject/OpenNetworkLinux

Boot up the switch and press “Del” key.
Enter ONI menu.
Choose “ONIE” -> “ONIE: Install OS”.

We install the image on Delta switch model AG8032v1.
Issue the following commands to install ONL image.

ONIE:/ # onie-discovery-stop
ONIE:/ # onie-nos-install tftp://192.62.2.102/ONL-2.0.0_ONL-OS_2017-02-06.1958-5cfaeca_AMD64_INSTALLED_INSTALLER

The switch will reboot after it installs the image.

2. **Run ONL image.**
   Boot up the switch and press “Del” key.
   Choose “Open Network Linux”.

   Default login username/password: root/onl

3. **Configure switch IP address and DNS server address in /etc/network/interfaces**.
   root@localhost:~# more /etc/network/interfaces
   ```
   # Include files from /etc/network/interfaces.d:
   source-directory /etc/network/interfaces.d
   auto ma1
   iface ma1 inet static
           address 192.62.2.41
           netmaks 255.255.255.0
           gateway 192.62.2.254
           dns-nameservers 192.62.2.1
   ```

```
root@localhost:~# ifconfig
lo        Link encap:Local Loopback
          inet addr:127.0.0.1  Mask:255.0.0.0
          inet6 addr: ::1/128 Scope:Host
          UP LOOPBACK RUNNING  MTU:16436  Metric:1
          RX packets:225232 errors:0 dropped:0 overruns:0 frame:0
          TX packets:225232 errors:0 dropped:0 overruns:0 carrier:0
          collisions:0 txqueuelen:0
          RX bytes:29065472 (27.7 MiB)  TX bytes:29065472 (27.7
MiB)

ma1       Link encap:Ethernet  HWaddr 00:18:23:30:e6:4e
          inet addr:192.62.2.41  Bcast:192.255.255.255
Mask:255.0.0.0
          inet6 addr: fe80::218:23ff:fe30:e64e/64 Scope:Link
          UP BROADCAST RUNNING MULTICAST  MTU:1500
Metric:1
          RX packets:14003 errors:0 dropped:0 overruns:0 frame:0
          TX packets:8031 errors:0 dropped:0 overruns:0 carrier:0
          collisions:0 txqueuelen:1000
          RX bytes:14001404 (13.3 MiB)  TX bytes:1092844 (1.0
MiB)
          Memory:dff00000-dff20000
```

4. **Copy FlexSwitch package to switch.**

   #sftp odl@192.62.2.102:/tftpboot/flexswitch_bcmsdk-jenkins_master_1.0.0.195.33_amd64.deb

   Note: Please contact SnapRoute to get the latest image.

5. **Install the FlexSwitch package.**

   #sudo dpkg -i flexswitch_bcmsdk-jenkins_master_1.0.0.195.33_amd64.deb

   #sudo apt-get -f install

6. **Query the switch via curl.**

   # curl -X GET --header 'Content-Type: application/json' 'http://localhost:8080/public/v1/state/ArpEntrys' | python -m json.tool

   % Total % Received % Xferd Average Speed Time Time Time Current

   Dload Upload Total Spent Left Speed

   Please refer the link for detail.

   https://opensnaproute.github.io/docs/softwareflexswitch.html