In this tutorial we will be building a simple SDN with Raspis and Ryu.

A short SDN and Ryu 102

# Set the network environment

* You must install [OVS on the Raspberry Pi](http://luissanabria.me/ditching-linc-for-open-vswitch/).
  + Remember that in step 3-A, the configure command parameter has two hyphens, e.g.: --with-linux.
* Alternatively, you can just do:
  + sudo apt install openvswitch-switch openvswitch-common bridge-utils
* We are going to build the topology shown below:



* Create the OVS switch [using the example script](https://github.com/SanabriaRusso/SDN_primer/blob/master/SDN102/bootSwitch/startSwitch.sh).
  + Change permissions to the script: chmod +x <scriptName>
  + Execute script with sudo privileges: sudo ./<scriptName>
  + Verify that everything went as intended: sudo ovs-vsctl show
  + Make sure that the OVS interface, and all interfaces managed by it have the same MAC address.
    - The only interface with IP address is the OVS interface.
* Now that we have created two OVS in each Raspberry PI, let’s run a simple SDN Controller application at the SDN Controller.