Timothy Swanson

Hi guys,

Sorry for delay in response but here's some comments.

"Vision and Goals"

- 1. The bullet for "extend openstack neutron and api's support to the ASR" is the general purpose of the plugin. It's context for the goals but I'm not sure I'd put it as an itemized goal.
- 2. You might want a blurb about the scope of the feature development includes fully automated unit and functional tests—per the openstack neutron development best practices.
- 3. this section might be a good place to indicate that an additional stretch goal is to also be able to identify and potentially add support for existing neutron features not yet supported by the plugin.
- 4. The users of the project subsection—you could describe that the out-of-band config is specifically targeted at openstack admin users.

"What has already been done" section:

1. "The plugin can take basic level 2..." — that functionality is outside the scope of the ASR1K plugin. The ASR1K plugin is entirely L3. You could change that sentence to say "Neutron's ML2 plugins take level 2 configurations from Neutron and implement them in the appropriate switches. " And specifically say the ASR1K plugin implements the L3 router stuff.

"What we'll work on" section:

- 1. The "there are 2 main goals" sentence makes more sense outside of the "out-of-band" config sub-section.
- 2. The SNMP example I mentioned pertains to per-VRF SNMP configuration: http://www.cisco.com/c/en/us/td/docs/ios-xml/ios/snmp/configuration/15-sy/snmp-15-sy-book/nm-snmp-vpn-context.html#GUID-746C841B-8075-46E6-913F-767172EA18A0
 - I wouldn't describe SNMP too much but rather mention that there's a use-case where per-VRF SNMP config might be useful—specifically to allow a per-openstack tenant SNMP notification receiver to get ASR1K notifications confined to the context of an openstack tenant router.
- 3. In the out-of-band config section the paragraph "The openstack ASR1K plugin implements openstack tenant router ..." is a general description of the ASR1K neutron plugin. It would be better to have that in your "Vision and Goals" section or the "What's already been done" section.

"Acceptance Criteria"

- 1. For both firewall and out-of-band config you should indicate that tests validating the ASR1K gets configured with the appropriate settings per the API flows being modified.
- 2. Also, indicate that existing ASR1K regression tests pass with no additional errors.
- 3. In the preface paragraph mention following openstack neutron feature development best-practices—including but not limited to coding style guidelines, git workflow, and creation of unit and functional tests.
 - 1. A final bullet: All changes committed in a common project version control repository. Ideally, this will be in the openstack/networking-cisco github repo.
 - 2. Mention that any outstanding defects pertaining to the features are filed per the project best-practices.
 - 3. These things we typically classify as a "definition of done" but can be considered acceptance criteria.
- 4. You could add a successful demonstration to your mentors as an Acceptance criteria (AC)

The architecture section could use some work but in the firewall part you could refer to figure 1 and indicate that the FW funtionality is architecturally another service bubble on the network-node that the plugin could setup the ASR1K to implment.

Thanks.

Tim

Sridar Kandaswamy

Hi Guys:

If u guys have time: Few nits

In addition to Fig 1, u may want to add in the first figure from

http://docs.openstack.org/security-guide/networking/architecture.html

(Also it will be prudent to add a reference to to cite the source of these 2 figures.

In the text that u have below Figure 1:

will use

Figure 1 to give a clear description of what has already been implemented. The plugin can take basic level 2 configurations from Neutron and translate this information to the appropriate switches. In layer 3 OpenStack stores all information about the subnet (default gateway IP and NATed IPs) in the virtual router. The plugin currently can provide an environment to terminate the user facing API. This information can then be translated for ASR1K configuration to add additional network directing rules. So as of right now Cisco's plugin can integrate a subnet with dynamic NAT from OpenStack Neutron to the ASR1K.

Drop the part of the "level 2" (I think u mean Layer 2) while this is done by neutron – not a part of what we are doing – if u want to talk about that look at ML2 in neutron that effects handling L2 configuration. If u mention this fix it up to state this more as background info and that it is done elsewhere.

OpenStack, tracks (and stores) the information about all things L3 (networks, subnet, default gw etc) in a database. Now these things are implemented in a virtual router such as the network namespace router.

Change the last sentence - "The Cisco ASR1K plugin supports all standard neutron networking constructs such as networks, subnets, routing and NAT. The Cisco plugin also supports High Availability (HA) using Hot Standby Router Protocol (HSRP). " (u guys are not dealing with HA in ur work – if u think it is relevant mention that somewhere too)

And on:

denied to access the firewall
A Firewall Group is a binding of ingress & egress Firewall Policies to ports where they are applied.
Thanks
Sridar

Firewall groups: Group of users who are binding to policy or group who are