Meeting Notes Nov. 7, 2013

Thursday, November 7, 2013
Attending:
Dan Schmiedt - willys@clemson.edu
Dale W. Carder - dwcarder@wisc.edu
kevin mayeshiro - kmayeshiro@ucdavis.edu
Kathy Benninger - benninger@psc.edu
Chris Small - chsmall@uw.edu
Deniz Gurkan - dgurkan@uh.edu
Rich Cropp - rac111@psu.edu
Heidi Picher Dempsey hpd@bn.com
--
Agenda:
1) Agenda Bash
None.
2) Network management plane, control plane, data plane
Discussion started on IRTF (Internet Research Task Force, focuses on research frameworks). Discussions focused on how to 'manage this.' Now that SDN separates control and data plane, what about the management of this network? Is this a separate from the control plane?
Deniz asked what thoughts were in this regard. What does management plane mean to you?
Dan: Command line interface: configure the devices
SNMP
Chris Smalls: think of a wireless network, where there is no real manageability of nodes.
Wireless networks - no CLI
Abstracted by controllers
OpenStack model: generalized view with three elements: network, subnet, port
Grover: yes, but this is only one use case.Abstraction: application may need additional topology info?
Chris s: raw sockets has no place
Dan: pica8, no info from the switch - no manageability (in the traditional sense)
Automation is essential in abstraction - wireless, RF, etc maybe possible no CLI
Heidi: multiple admin domains in GENI
Actual switch info is still important since implementations are not uniform yet
E.g.: HP switch capabilities, size of the forwarding table,
Another e.g.: load balancer application's view of the switch may become important
PURE OpenFlow case: network management through ?
Control plane: API for management
Management plane: human interface?
Management plane: statistics?
Push simple config
Where is the controller, who connects to that controller
Configuring app's?
For example: BGP as a northbound app and may need to be configured by the management plane
Dale: programming experience is similar
Abstractions are not there yet to manage effectively, more like taking responsibility for the actions
Dale: eg: we used to manage many APs ... now, with centralized controllers, we only have a single management point. We no longer manage thousands of APs.
Similar to PC operating systems
Information gathering methods will change.
Grover: layers of abstractions add the ability for a broader audience to do interesting things.
AL2S update: Forwarding is working well on AL2S now.NDDI FlowVisor 1.4
I2 innovative apps program folks are doing demos now.
Working hard on a plan for virtualization. How to enable this in a production environment. Implementation plan for virtualization foirst draft is now available.
Grover: this is a high priority but high risk item.
We will hopefully talk with Luke Fowler/ GRNoc team next call about FlowSpace Firewall, etc.