

Advanced Networking Topics: BGP, BGP Hijacking, MPLS, MPLS-based VPNs, Segment Routing, and others

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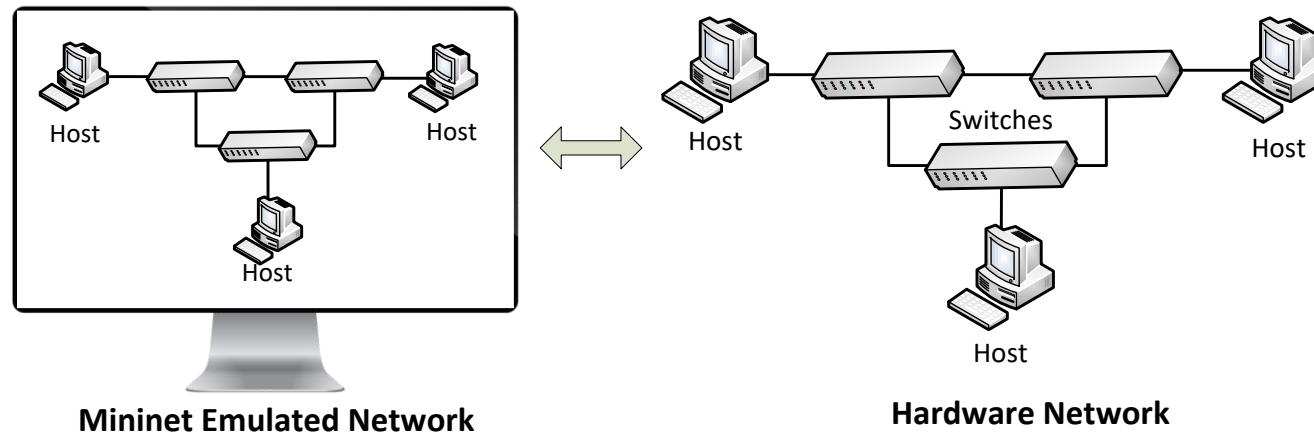
WASTC 2021 virtual Faculty Development Weeks (vFDW)
June 14, 2021

Introduction to Mininet

Lab activities are described in Lab 1, BGP Lab Series

What is Mininet?

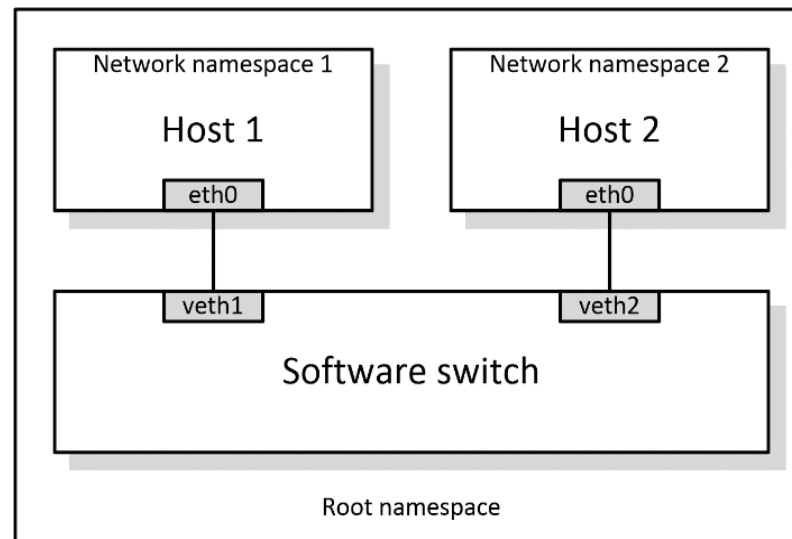
- A virtual testbed capable of recreating realistic scenarios¹
- It enables the development and testing of network protocols
- Inexpensive solution, real protocol stack, reasonably accurate



¹Mininet website, <http://mininet.org/>

What is Mininet?

- Mininet nodes are network namespaces
 - Each node has different / separate virtual interfaces, routing tables
- Nodes use the underlying protocol stack of the host device
- Nodes are connected via virtual Ethernet (veth) links, which behave as Ethernet links



Pod Design with Mininet

- A pod is a set of virtual equipment (routers, switches, etc.)
- A pod is created every time a lab reservation is made
- For the Border Gateway Protocol (BGP) Lab series, pods are embedded into Mininet

