README

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1 toddwint/ztp

1.1 Info

ZTP (Zero-Touch Provisioning) docker image for Juniper SRX345, SRX1500, ACX7024, EX2300, EX4100, and HPE Aruba 2930F devices.

Docker Hub: https://hub.docker.com/r/toddwint/ztp

GitHub: https://github.com/toddwint/ztp

For more detailed information, please view the ZTP Instructions files: ZTP Instructions.md, ZTP Instructions.html, or ZTP Instructions.pdf.

1.2 Overview

- Performs Zero-Touch Provisioning of
 - Juniper SRX345
 - Juniper SRX1500
 - Juniper ACX7024
 - Juniper EX2300
 - Juniper EX4100
 - HPE Aruba 2930F

1.3 Features

- Ubuntu base image
- Plus:
 - rsyslog
 - isc-dhcp-server
 - ftp
 - vsftpd
 - tftp-hpa
 - tftpd-hpa
 - webfs
 - bsdmainitils
 - fzf

- tmux
- python3-minimal
- iproute2
- tzdata
- ttyd
 - ♦ View the terminal in your browser
- frontail
 - ♦ View logs in your browser
 - ♦ Mark/Highlight logs
 - ♦ Pause logs
 - ♦ Filter logs
- tailon
 - ♦ View multiple logs and files in your browser
 - ♦ User selectable tail, grep, sed, and awk commands
 - ⋄ Filter logs and files
 - ♦ Download logs to your computer

1.4 Sample config.txt file

- $\mbox{\tt\#}$ To get a list of timezones view the files in `/usr/share/zoneinfo` TZ=UTC
- # The interface on which to set the IP. Run `ip -br a` to see a list INTERFACE=ethO
- # The IP address that will be set on the docker container
- # The last 4 IPs in the subnet are available for use.

IPADDR=172.21.255.252

- # The IP address that will be set on the host to manage the docker container
- # The last 4 IPs in the subnet are available for use.

MGMTIP=172.21.255.253

- # The IP subnet in the form NETWORK/PREFIX SUBNET=172.21.0.0/16
- # The IP of the gateway.
- # Don't leave blank. Enter a valid ip from the subnet range
- # The last 4 IPs in the subnet are available for use.

GATEWAY=172.21.255.254

- # The ports for web management access of the docker container.
- # ttyd tail, ttyd tmux, frontail, and tmux respectively

HTTPPORT1=8080

HTTPPORT2=8081

HTTPPORT3=8082

HTTPPORT4=8083

 $\mbox{\tt\#}$ The hostname of the instance of the docker container $\mbox{\tt HOSTNAME=}\mbox{\tt ztp01}$

1.5 Sample docker run script

#!/usr/bin/env bash
REPO=toddwint
APPNAME=ztp
HUID=\$(id -u)

```
HGID=\$(id -g)
SCRIPTDIR="$(dirname "$(realpath "$0")")"
source "$SCRIPTDIR"/config.txt
# Make the macvlan needed to listen on ports
# Set the IP on the host and add a route to the container
docker network create -d macvlan --subnet="$SUBNET" --gateway="$GATEWAY" \
  --aux-address="mgmt_ip=$MGMTIP" -o parent="$INTERFACE" \
  "$HOSTNAME"
sudo ip link add "$HOSTNAME" link "$INTERFACE" type macvlan mode bridge
sudo ip addr add "$MGMTIP"/32 dev "$HOSTNAME"
sudo ip link set "$HOSTNAME" up
sudo ip route add "$IPADDR"/32 dev "$HOSTNAME"
# Create the docker container
docker run -dit \
   --name "$HOSTNAME" \
   --network "$HOSTNAME" \
   --ip $IPADDR \
   -h "$HOSTNAME" \
    * # Volume can be changed to another folder. For Example: ` \
    " # -v /home/"$USER"/Desktop/ftp:/opt/"$APPNAME"/ftp \ ` \
   -v "$SCRIPTDIR"/ftp:/opt/"$APPNAME"/ftp \
   -e TZ="$TZ" \
    -e MGMTIP="$MGMTIP" \
   -e GATEWAY="$GATEWAY" \
   -e HUID="$HUID" \
   -e HGID="$HGID" \
   -e HTTPPORT1="$HTTPPORT1" \
   -e HTTPPORT2="$HTTPPORT2" \
   -e HTTPPORT3="$HTTPPORT3" \
   -e HTTPPORT4="$HTTPPORT4" \
   -e HOSTNAME="$HOSTNAME" \
   -e APPNAME="$APPNAME" \
   `# --cap-add=NET_ADMIN \ ` \
    ${REPO}/${APPNAME}
```

1.6 Login page

Open the webadmin.html file.

- Or just type in your browser:
 - http://<ip_address>:<port1> or
 - http://<ip_address>:<port2> or
 - http://<ip_address>:<port3>
 - http://<ip_address>:<port4>