Box

Setup for my personal (pet) server.

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Introduction

Contributing

Found an error or have a suggestion? Please open an issue on GitHub (github.com/pojntfx/box):

Figure 1: QR-Code to the source code on GitHub

License

This document and included source code is Free Culture/Free Software.

Figure 2: Badge of the AGPL-3.0 license

SPDX-License-Identifier: AGPL-3.0

Debian

Debian

```
sudo umount /dev/mmcblk0{,p1,p0}
curl -L 'https://raspi.debian.net/tested/20210823_r
sudo dd if=/tmp/debian.img of=/dev/mmcblk0 bs=4M st
sync

sudo mkdir -p /mnt/raspi-boot
sudo mount /dev/mmcblk0p1 /mnt/raspi-boot
{
    echo "root_pw=$(openssl rand -base64 12)"
    echo "root_authorized_key=$(cat ~/.ssh/id_rsa.p
    echo "hostname=jeans-box"
} >>/mnt/raspi-boot/sysconf.txt
sudo umount /dev/mmcblk0{,p1,p0}
```

IPv6

IPv6

```
ssh root@jeans-box
tee /etc/sysctl.d/privacy.conf <<'EOT'
net.ipv6.conf.all.use_tempaddr=2
EOT
sysctl -p

tee /etc/network/interfaces.d/eth0 <<'EOT'
auto eth0
iface eth0 inet dhcp

iface eth0 inet6 static
    address 2001:7c7:2121:8d00::3
    autoconf 1
    accept_ra 2
EOT
```

DNS

DNS

```
jeans-box       10800   IN      AAAA    2001:7c7:2121
*.jeans-box     10800   IN      AAAA    2001:7c7:2121
```

SSH

SSH

```
ssh root@jeans-box.example.com
apt update
apt install -y sudo curl openssh-server locales
systemctl enable --now ssh

echo "LC_ALL=en_US.UTF-8" | tee -a /etc/environment
echo "en_US.UTF-8 UTF-8" | tee /etc/locale.gen
echo "LANG=en_US.UTF-8" | tee /etc/locale.conf
locale-gen en_US.UTF-8

adduser jean
su jean -c "mkdir -m 700 -p ~/.ssh && curl 'https:/
usermod -aG sudo jean

echo 'PermitRootLogin no' | tee /etc/ssh/ssh_config
```

firewalld

firewalld

```
ssh jean@jeans-box.example.com
sudo apt update
sudo apt install -y firewalld
sudo systemctl enable --now firewalld
sudo firewall-cmd --zone=public --add-interface=eth0
sudo firewall-cmd --permanent --add-service=mdns
sudo firewall-cmd --permanent --add-service=llmnr
sudo firewall-cmd --reload
```

APT

APT

```
ssh jean@jeans-box.example.com
sudo apt update
sudo apt install -y unattended-upgrades

sudo tee /etc/apt/apt.conf.d/50unattended-upgrades
Unattended-Upgrade::Origins-Pattern {
   "origin=*";
}
Unattended-Upgrade::Automatic-Reboot "true";
Unattended-Upgrade::Automatic-Reboot-Time "02:00";
EOT
sudo systemctl enable --now unattended-upgrades
sudo unattended-upgrades --debug
```

Podman

Podman

```
ssh jean@jeans-box.example.com
echo 'deb https://download.opensuse.org/repositorie
curl -L "https://download.opensuse.org/repositories
sudo apt update
sudo apt upgrade -y # Prevent conflicts with eventu
sudo apt install -t Debian_11 -y podman
echo 'unqualified-search-registries=["docker.io"]'
sudo systemctl unmask podman-auto-update.service
sudo systemctl unmask podman-auto-update.timer
sudo systemctl enable --now podman-auto-update.time
sudo systemctl enable --now podman-restart
```

Traefik

Traefik

```
sudo mkdir -p /etc/traefik
sudo tee /etc/traefik/traefik.yaml<<'EOT'
entryPoints:
  web:
    address: ":80"

  websecure:
    address: ":443"

  sshalt:
    address: ":2222"

  websecurealt:
    address: ":8443"
```

Cockpit

Cockpit

```
echo 'deb http://deb.debian.org/debian bullseye-bac
sudo apt update
sudo apt install -t bullseye-backports -y cockpit c

curl https://cockpit.jeans-box.example.com/ # Test
```

Gitea

Gitea

```
sudo mkdir -p /var/lib/gitea
sudo podman run -d --restart=always --label "io.con
sudo podman generate systemd --new gitea | sudo tee
sudo systemctl daemon-reload
sudo systemctl enable --now gitea
sudo firewall-cmd --permanent --add-port=2222/tcp
sudo firewall-cmd --reload

curl https://gitea.jeans-box.example.com/ # Test Co
```

Now visit https://gitea.jeans-box.example.com/ and run the Wizard; use the following values:

- SSH Server Domain: gitea.jeans-box.example.com
- SSH Server Port: 2222
- Gitea Base URL: https://gitea.jeans-box.example.com/

Dex

Dex

First, setup Gitea by visiting https://gitea.jeans-box.example.com/user/settings/applications and adding a new OAuth2 application with Application Name Dex and Redirect URI https://dex.jeans-box.example.com/callback. Note the client ID and client secret; we'll need them in the following.

```
sudo mkdir -p /etc/dex
sudo mkdir -p /var/lib/dex
sudo touch /var/lib/dex/dex.db
sudo chown -R 1001:1001 /var/lib/dex/
sudo tee /etc/dex/config.yaml<<'EOT'
issuer: https://dex.jeans-box.example.com

storage:
    type: sqlite3
```

liwasc

liwasc

```
sudo mkdir -p /var/lib/liwasc
sudo podman run -d --restart=always --label "io.con
sudo podman generate systemd --new liwasc | sudo te
sudo systemctl daemon-reload
sudo systemctl enable --now liwasc
```

Now visit https://pojntfx.github.io/liwasc/ as we did before and use wss://liwasc.jeans-box.example.com/ as the backend URL (note the trailing slash!).

bofied

bofied

```
sudo mkdir -p /var/lib/bofied
sudo podman run -d --restart=always --label "io.con
sudo podman generate systemd --new bofied | sudo te
sudo systemctl daemon-reload
sudo systemctl enable --now bofied
sudo firewall-cmd --permanent --add-port=67/udp
sudo firewall-cmd --permanent --add-port=69/udp
sudo firewall-cmd --permanent --add-port=4011/udp
sudo firewall-cmd --reload
```

Now visit https://pojntfx.github.io/bofied/ and login using the following credentials:

- Backend URL: https://bofied.jeans-box.example.com/
- OIDC Issuer: https://dex.jeans-box.example.com
- OIDC Client ID: bofied