ANTONIS KALIPETIS - @AKALIPETIS

DOCKER FOR MAC/WINDOWS

WHO AM I?

- Technology lead at SourceLair
- Python developer
- I ❤️ Docker
- DevOps enthusiast

OVERVIEW

- Native application
- Host-native virtualisation
  - Hyper-V
  - xhyve
- Better networking/filesystem mounting
- Docker CLI, Compose and Notary

BENEFITS

- Less dependencies
  - No need for Virtualbox or similar
- All tools share the same version
- The same Docker love

VIRTUAL MACHINE

- xhyve or Hyper-V
- Alpine Linux
- [OSX Only] Multi-CPU Architecture Support
  - Run arm, mips, ppc64le or even s390x containers
  - Images built with qemu

NETWORKING

- Works in most NAT environments
- Works nicely behind a VPN
- [OSX Only] Port forwarding to localhost
  - docker run -d -p 8080:80 nginx -> localhost:8080
- [Windows Only] docker.local DNS entry
  - docker run -d -p 8080:80 nginx -> docker.local:8080

FILE SYSTEM

- inotify support
- [OSX only] osxfs
  - Does not use OSXFUSE
- Direct mount
  - [OSX only] /Users, /Volumes, /private, /tmp, Rest /Mac
  - [Windows only] C:

[OSX ONLY] OSXFS

- File ownership
  - If not changed, files are owned by the container user inside, Mac user outside
- File system events
  - Things like inotify work seamlessly - hello server reloads!
- Mounts
  - They can't be listed, but can be mounted
- Does not use OSXFUSE

```
akalipetis in ~/Developer/docker/django-compose λ docker-compose run web \
> django-admin startproject web .
akalipetis in ~/Developer/docker/django-compose λ la
total 40
-rw-r--r--  1 akalipetis  staff    46B May 12 16:47 .env
-rw-r--r--  1 akalipetis  staff    77B May 12 16:20 Dockerfile
-rw-r--r--  1 akalipetis  staff   324B May 12 16:49 docker-compose.yml
-rwxr-xr-x  1 akalipetis  staff   246B May 12 16:50 manage.py
-rw-r--r--  1 akalipetis  staff    30B May 12 16:25 requirements.txt
drwxr-xr-x  6 akalipetis  staff   204B May 12 16:50 web
akalipetis in ~/Developer/docker/django-compose λ docker-compose run web whoami
root
akalipetis in ~/Developer/docker/django-compose λ
```

OSXFS DEMO

UBUNTU
ON DOCKER
ON WINDOWS
ON FUSION
ON MAC

GET DOCKER BETA

BETA.DOCKER.COM

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THANKS