

# DEVOPS THAT MATTERS

Demystifying CI/CD and Build Pipelines



Seattle DevOps Meetup





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McKay**



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DEVELOPER ADVOCATE at JFROG



# WHY SHOULD A DEV CARE ABOUT DEVOPS?

- Define DevOps
- Describe Components
- Your IT Value Stream
- Some Stories/Suggestions



# WHAT IS DEVOPS ... DEVSECOPS?

## The Phoenix Project

Gene Kim, Kevin Behr, George Spafford

*"Every person involved in a failed IT project should be forced to read this book."*

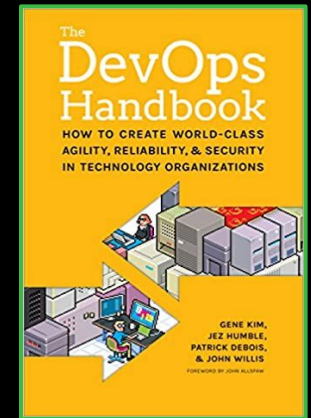
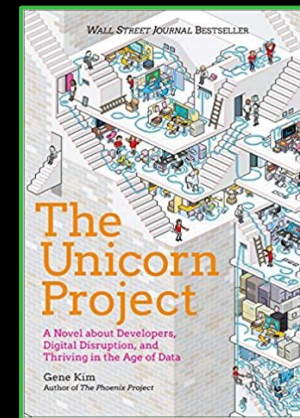
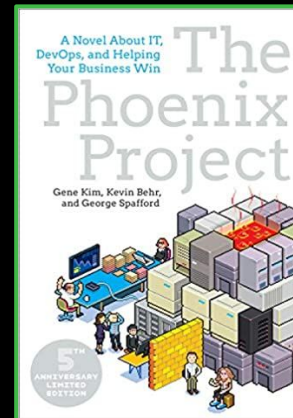
—TIM O'REILLY, Founder & CEO of O'Reilly Media

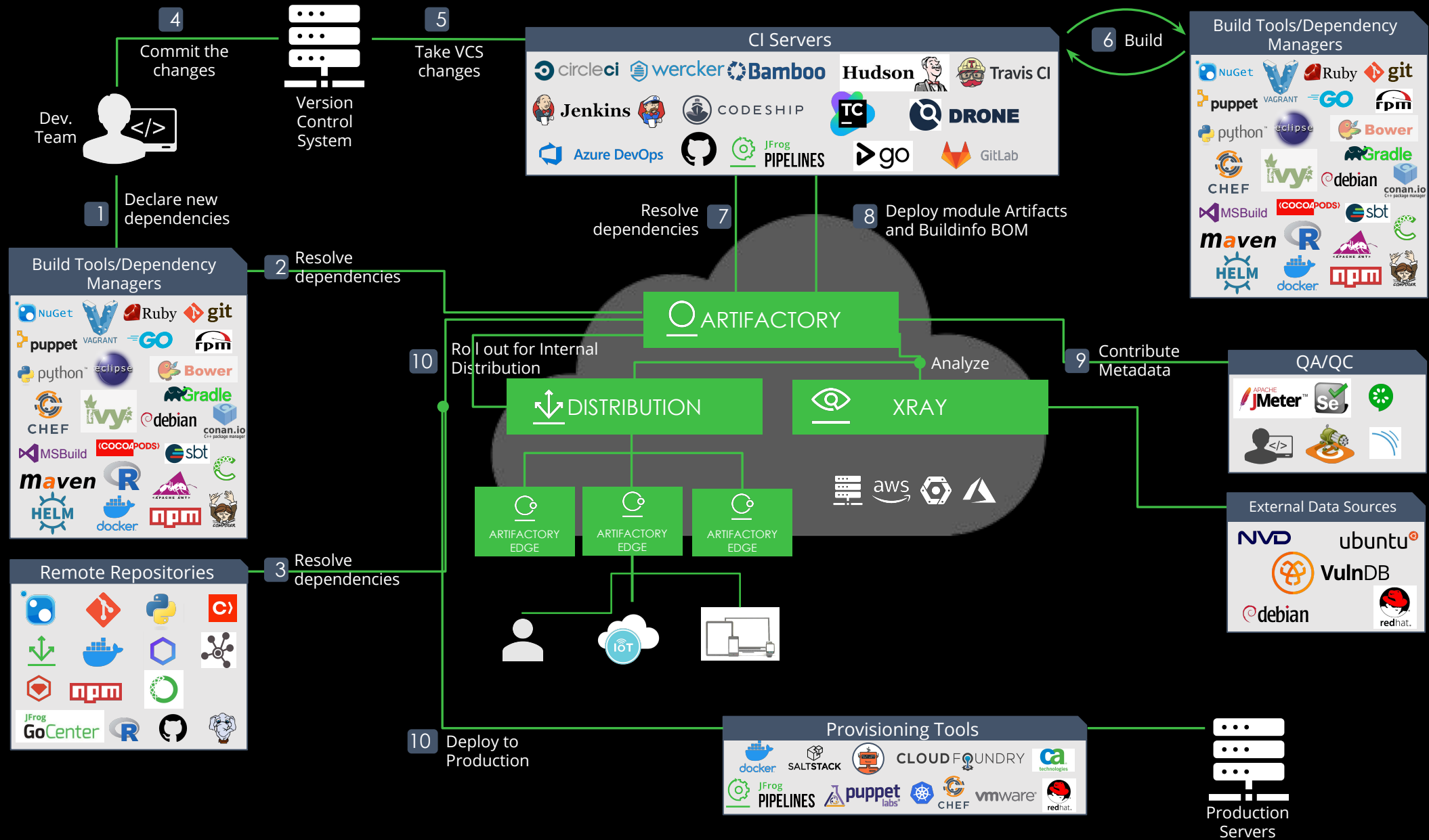
## The Unicorn Project

Gene Kim

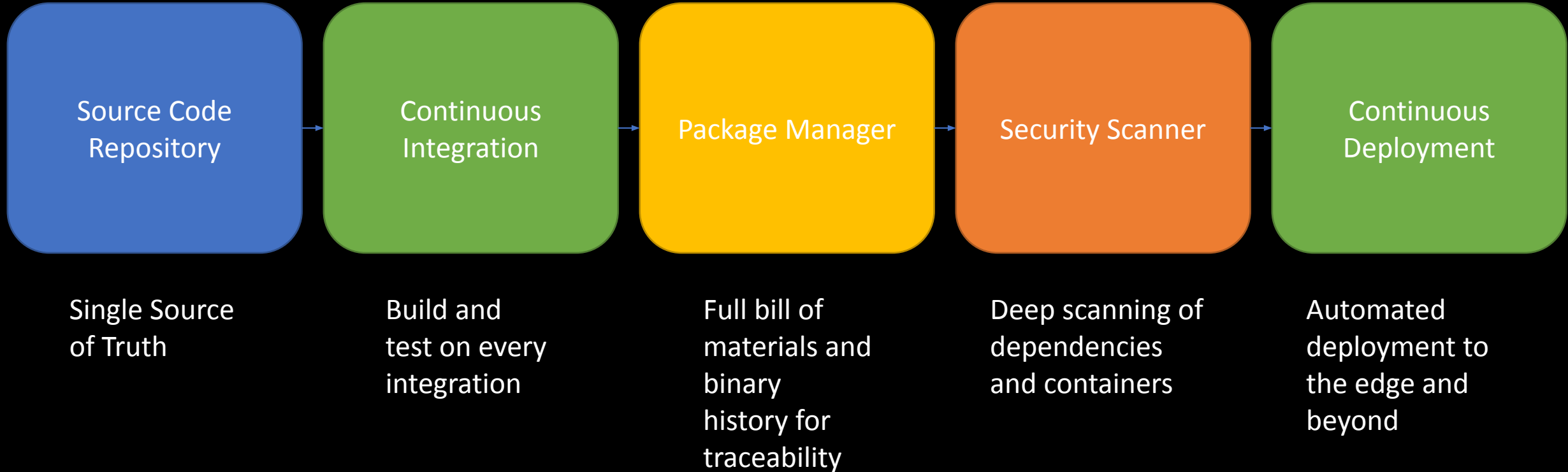
## The DevOps Handbook

Gene Kim, Patrick Debois, John Willis,  
Jez Humble, John Allspaw





# DEV(SEC)OPS COMPONENTS





# WHAT DO YOU REALLY CARE ABOUT?

- Fast?
- Efficient?
- Reliable?
- Economical?



```
LOGGER.info("In function transformMedia");
```

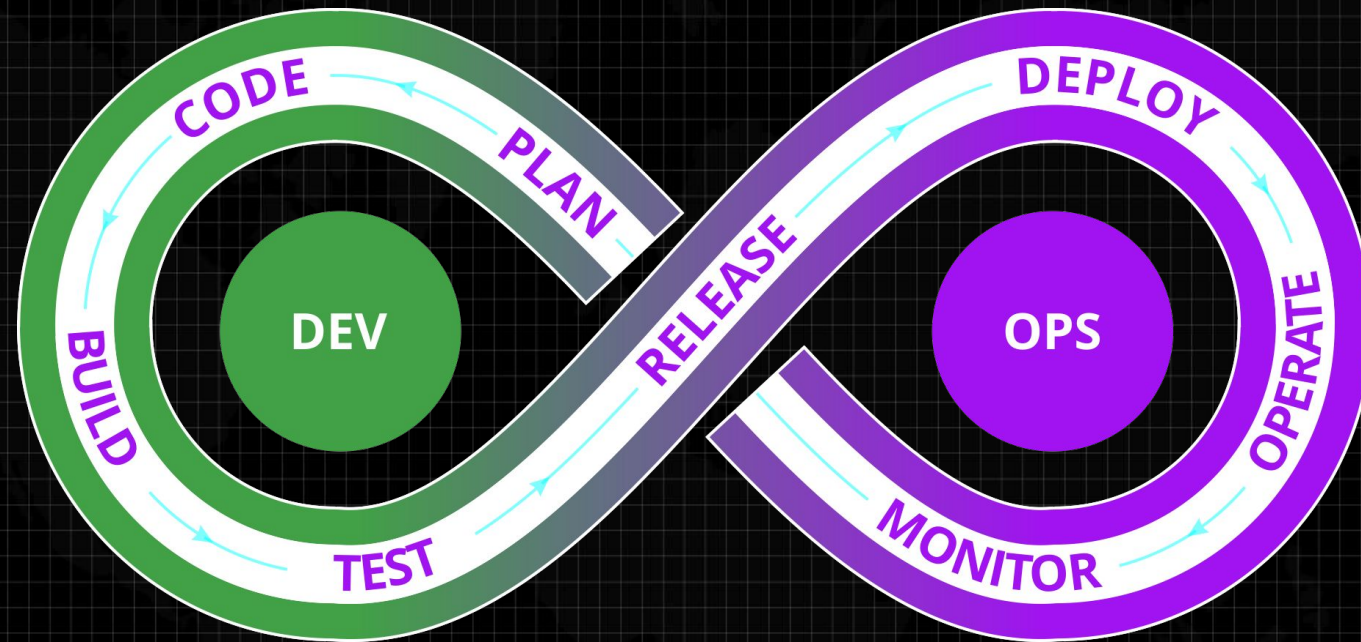


# ELIMINATE SILOS!



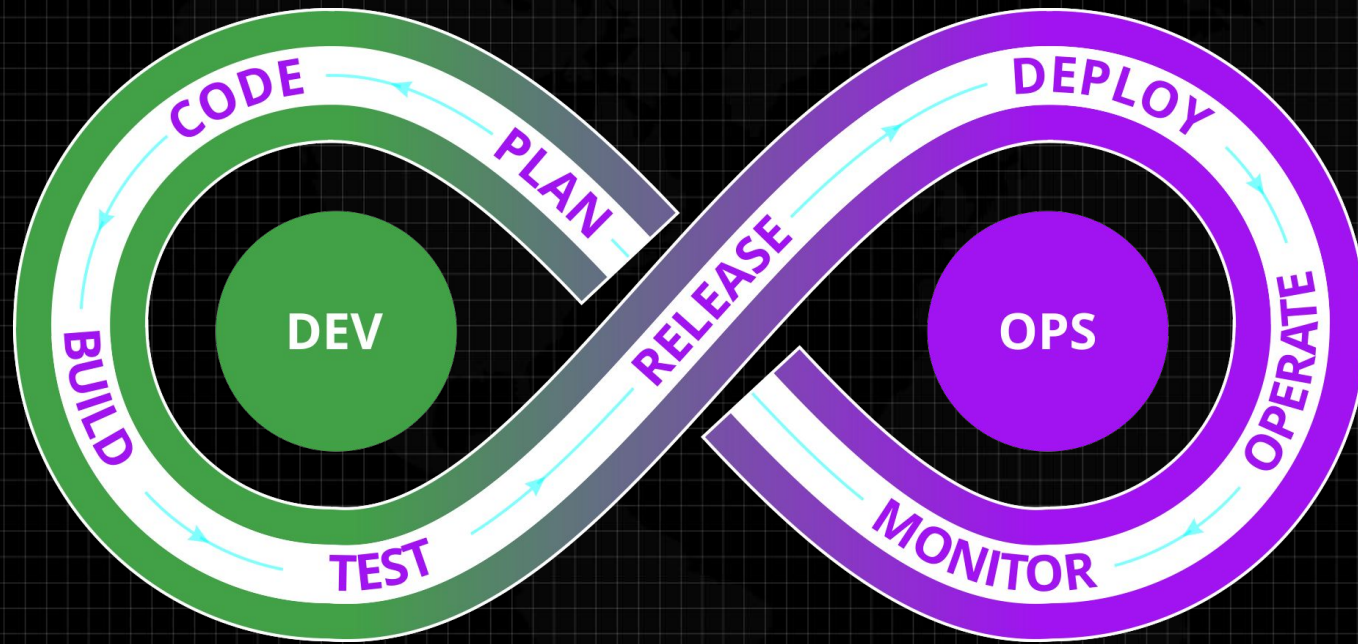


# YOUR IT VALUE STREAM





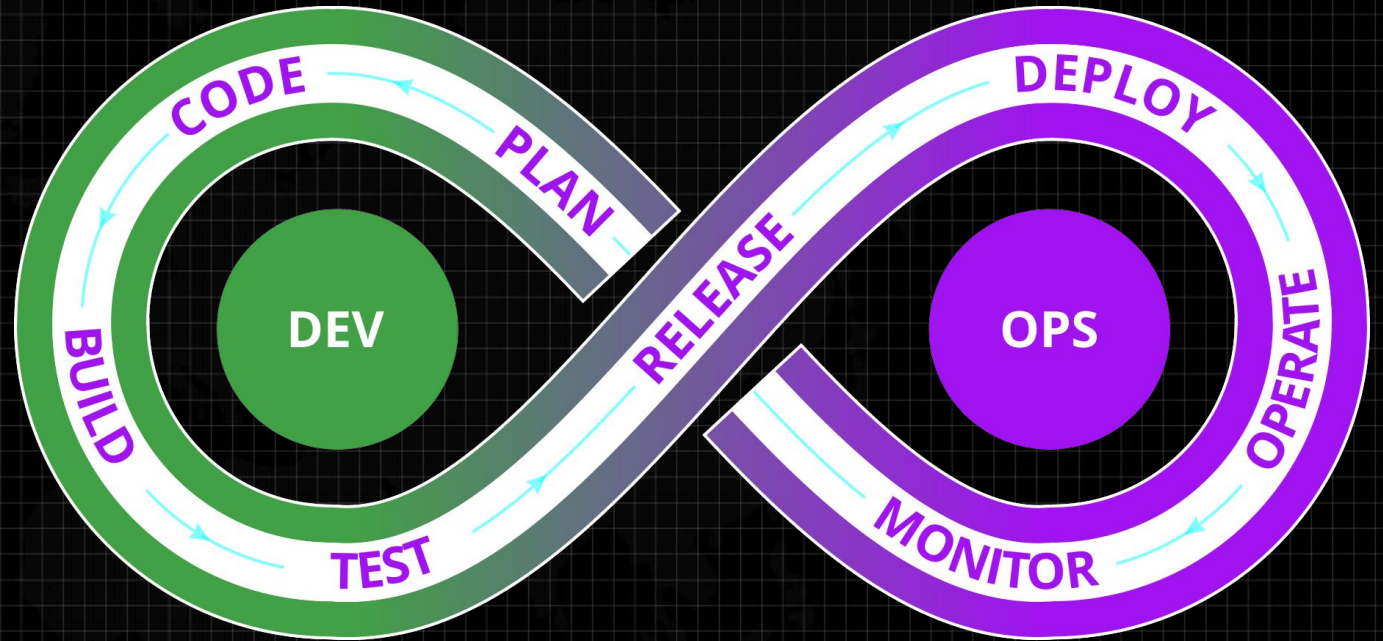
# LET'S TALK PIPELINES





# IMPROVE BY 1%

- Fast Enough?
- Efficient Enough?
- Reliable Enough?
- Economical Enough?

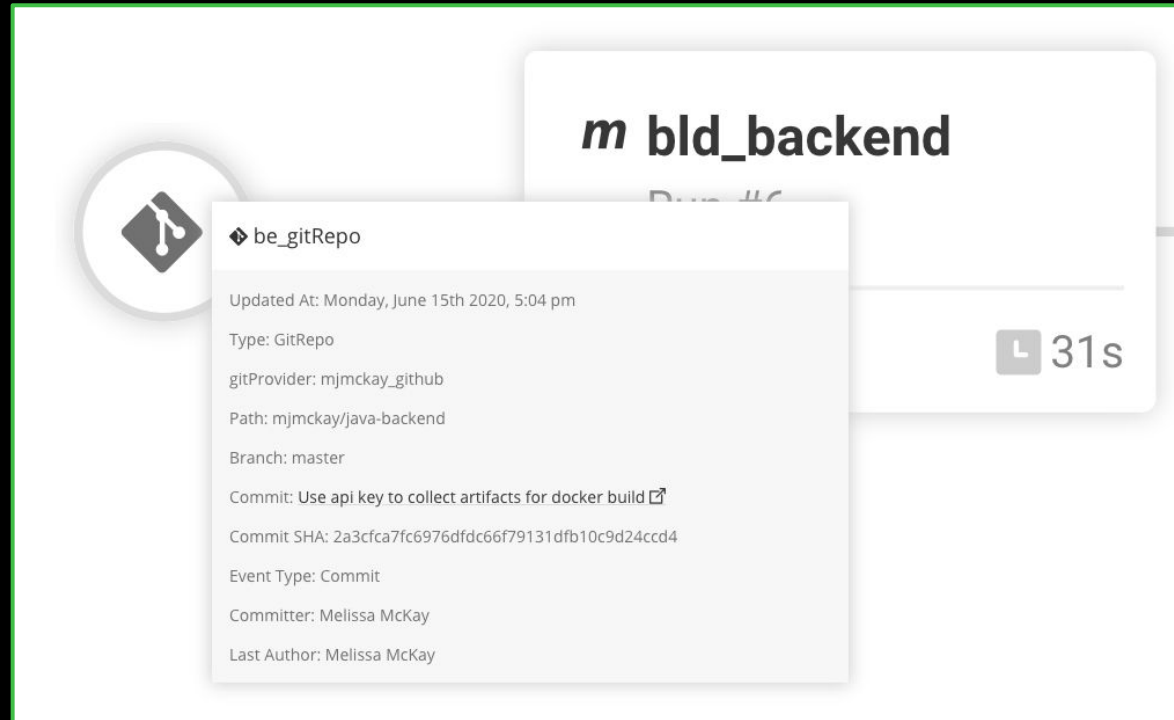




# RECOGNIZE THE PROBLEM



# CODE, TEST, CHECK-IN, REPEAT



**m bld\_backend**

Updated At: Monday, June 15th 2020, 5:04 pm

Type: GitRepo

gitProvider: mjmckay\_github

Path: mjmckay/java-backend

Branch: master

Commit: Use api key to collect artifacts for docker build

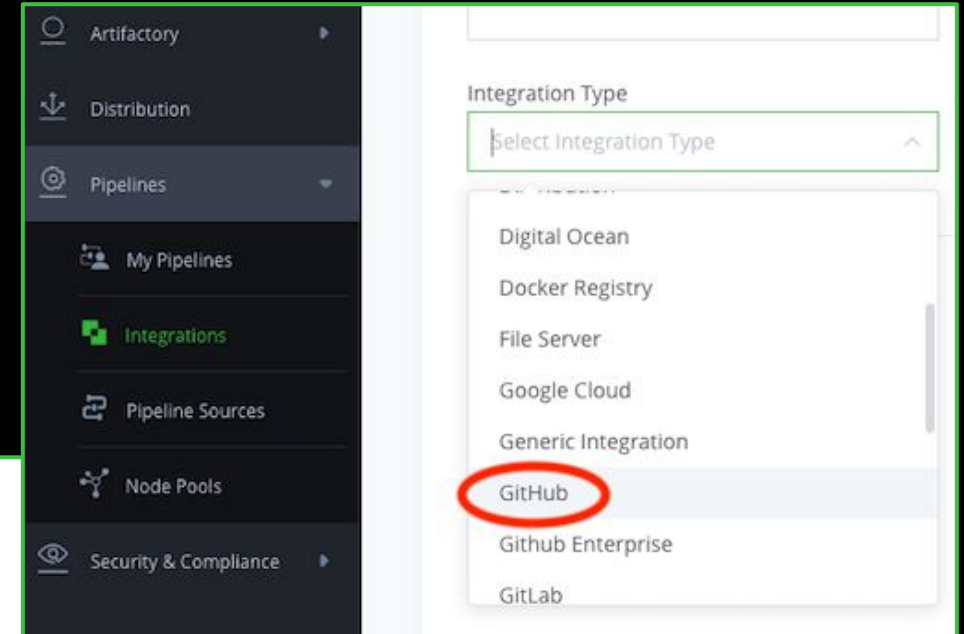
Commit SHA: 2a3cfca7fc6976dfdc66f79131dfb10c9d24ccd4

Event Type: Commit

Committer: Melissa McKay

Last Author: Melissa McKay

31s



Artifactory

Distribution

Pipelines

My Pipelines

Integrations

Pipeline Sources

Node Pools

Security & Compliance

Integration Type

Select Integration Type

Digital Ocean

Docker Registry

File Server

Google Cloud

Generic Integration

GitHub

Github Enterprise

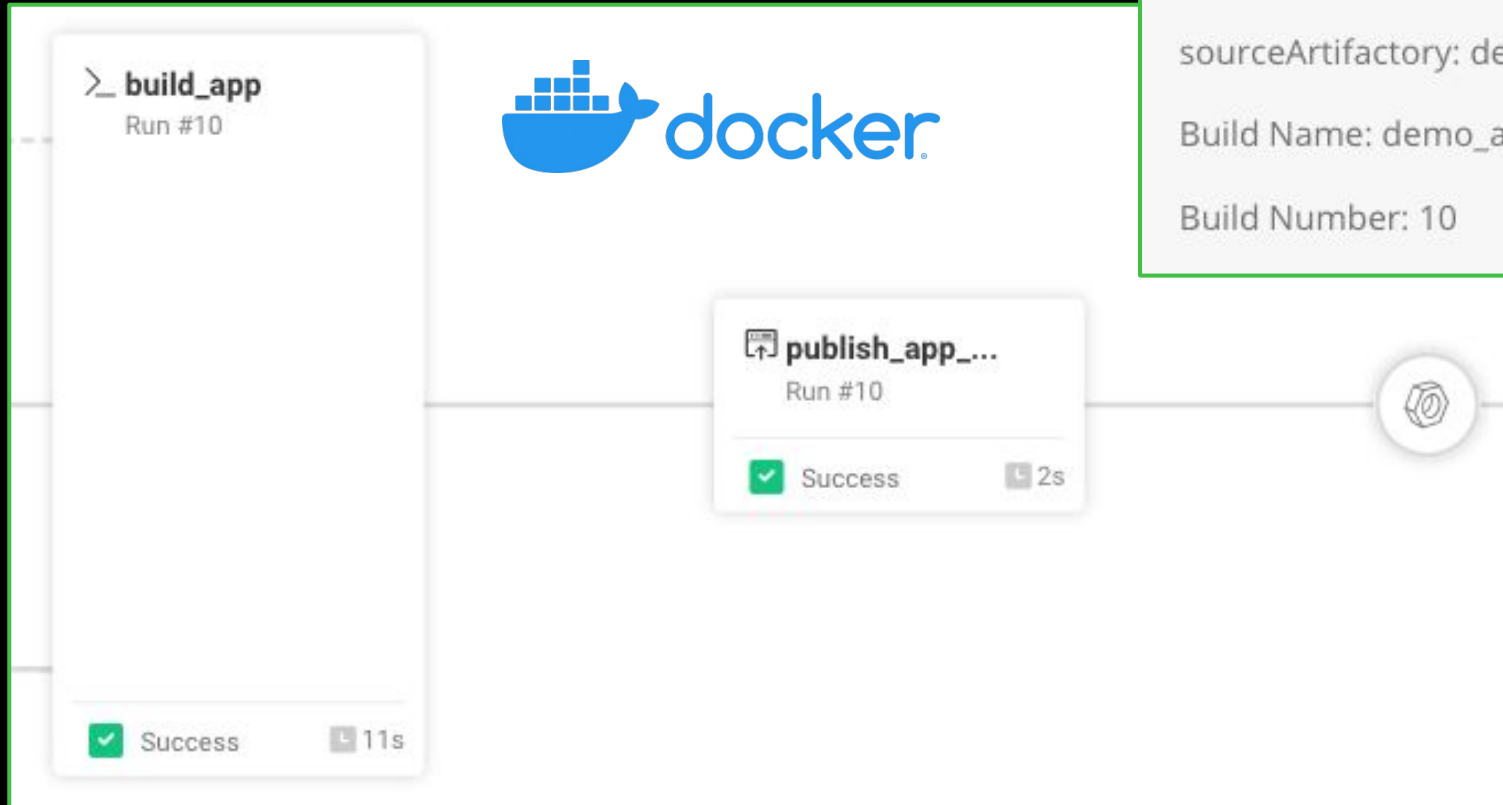
GitLab

## resources:

- name: be\_gitRepo  
type: GitRepo  
configuration:  
path: mjmckay/java-backend  
gitProvider: mjmckay\_github
- name: fe\_gitRepo  
type: GitRepo  
configuration:  
path: mjmckay/vue-frontend  
gitProvider: mjmckay\_github



# KNOW YOUR BUILD!



appl\_build\_info

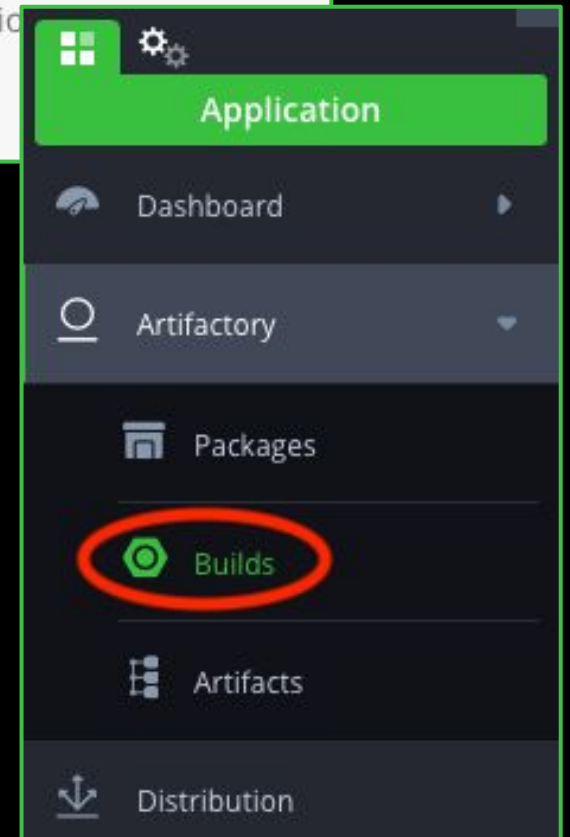
Updated At: Tuesday, June 16th 2020, 6:02 pm

Type: BuildInfo

sourceArtifactory: demoArt

Build Name: demo\_application

Build Number: 10



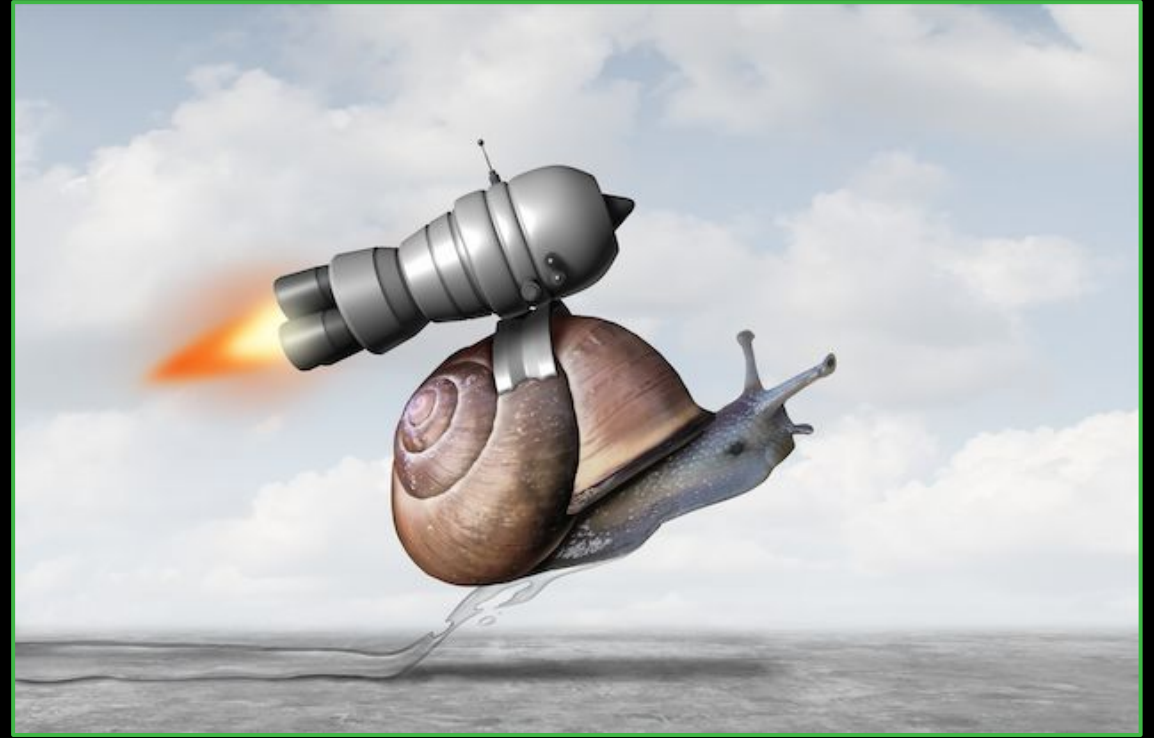
# TEST, TEST, & TEST



[www.testcontainers.or](http://www.testcontainers.or)

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# HOW DO YOU DEPLOY?



# SUMMARY

1. Understand your project's business value and goals (eliminate silos).
2. Document your flow/pipeline.
3. Prioritize and improve by 1%.
4. Make your work and your metrics for success visible.
5. Master your CI/CD (source control management, testing, artifact management, and deployment).
6. Automate where it makes sense.

**Q & A**  
**THANK YOU!**