



Measuring Flow

Enabling scientific approach to DevOps

**Deliver
Better
Software
Faster**

Why Do DevOps?

- Velocity
- Quality

DEFINE FLOW?

the amount of change we can move through our pipeline in a given unit of time



MLT

Mean Lead Time

how long does it take for a bit of code to get built, tested and deployed

DCR

Daily Change Rate

number of changes getting committed to mainline and tested per day

MTTE

Mean Time To Environment

how long does it take devs/testers to bring up a testing environment for verifying changes

MTTD

Mean Time To Detect

how much time passes since the original commit of the code until the bug it introduced gets detected

MTTR Mean Time To Resolve

how much time it takes to resolve an issue once it's been detected

MTTA Mean Time To Approve

how much time it takes to verify and approve a release

Quality

BFR

Build Failure Rate

% of failed builds

Quality

DFR Deployment Failure Rate

% of failed deployments

Quality

IRFR

Infra-Related Failure

Rate

% of builds/deployments failures related to infrastructure issues

Quality

RWR

Rework Rate

% of tickets being reopened

ADR

Automated Detection

Rate

% of issues being detected by automated testing cycles

UWR Unplanned Work Rate

% of unplanned issues

Where's the Data

- Project Mgmt Tools
 - SCM
 - CI Server
 - Humans

Prerequisites

- Integrated Tools
- Change Tracking

Where to put Data?

- ELK (G)
- Dashboards
- Knowledge Sharing

don't forget why

- Continuous Improvement