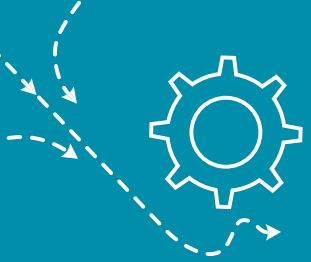
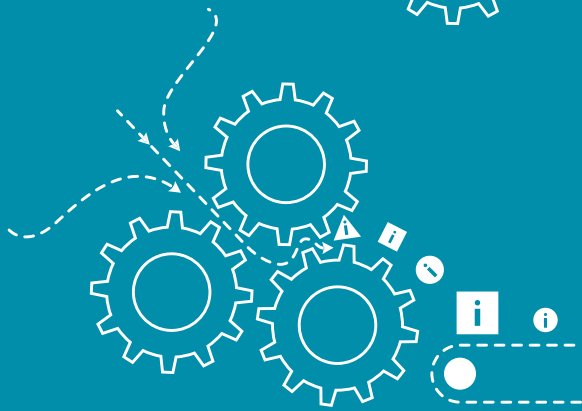


asiakastieto.fi

FROM IDEA TO PRODUCTION

THE ASIAKASTIETO OPENSHIFT JOURNEY



Eero Arvonen

10.9.2018

WHO I AM

- Eero Arvonen
- Coding professionally since 2011
- With Suomen Asiakastieto since 2016
- Application Architect since late 2017

asiakastieto.fi

WHO WE ARE

- Suomen Asiakastieto
- Oldest branch founded in 1905
- ~150 employees (well, more like 500)
- ~30 IT people, 50-50 Dev and Ops
- Publicly traded since 2015

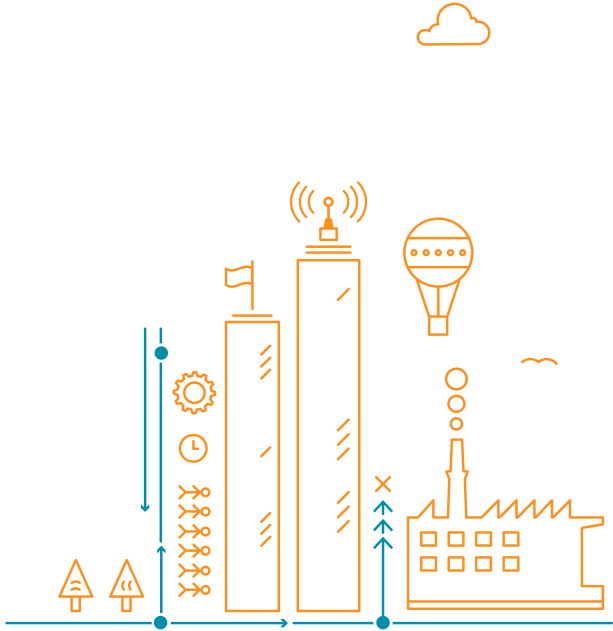
WHAT WE DO

- Leading business and consumer information service provider in Finland (and Sweden)
- Automation of decision making and risk management processes
- Credit rating of individuals and companies
- Know Your Customer and Anti Money Laundering

asiakastieto.fi

OUR IT IS PRETTY EFFICIENT

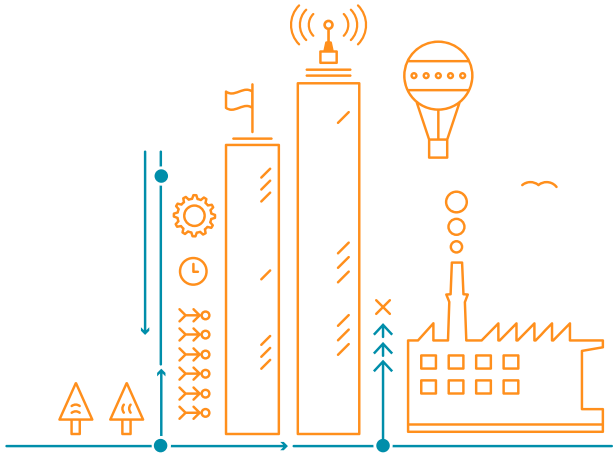
- Mostly in-house
- One deployment per day
- Uniform architecture
- Reasonable costs



asiakastieto.fi

AND WE NEED TO STAY AHEAD

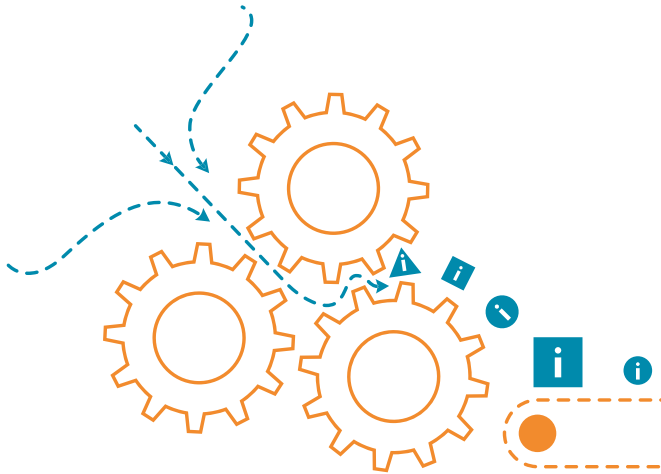
- Scaling is painful
- Crammed application servers
- Trying new things is hard



asiakastieto.fi

SO WE DID A POC

- Installed OpenShift on-premise
- Ported an application
- Demonstrated high availability



asiakastieto.fi

JUMPING IN AT THE DEEP END

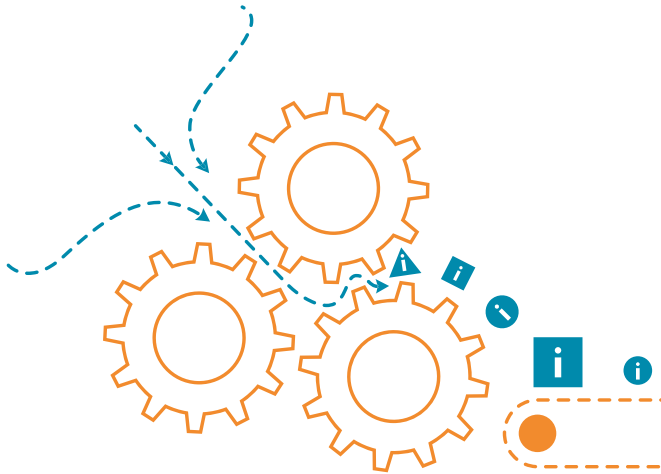
- GDPR compliance service on OpenShift
- OpenShift from Ambientia (new platform)
- Luoto Company (new partner)
- Node.js (new tech)
- Hard deadline
- What could go wrong?

asiakastieto.fi

AS IT TURNS OUT

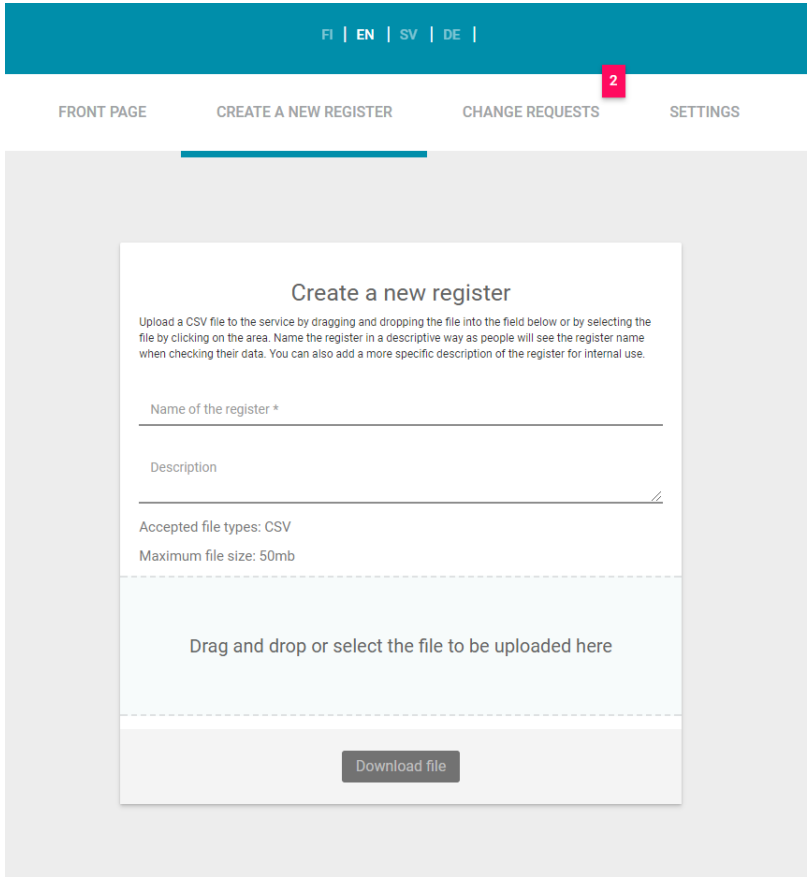
OpenShift never was a burden at all

- CI/CD pipeline out of the box
- Parallel environments
- Inherent portability



asiakastieto.fi

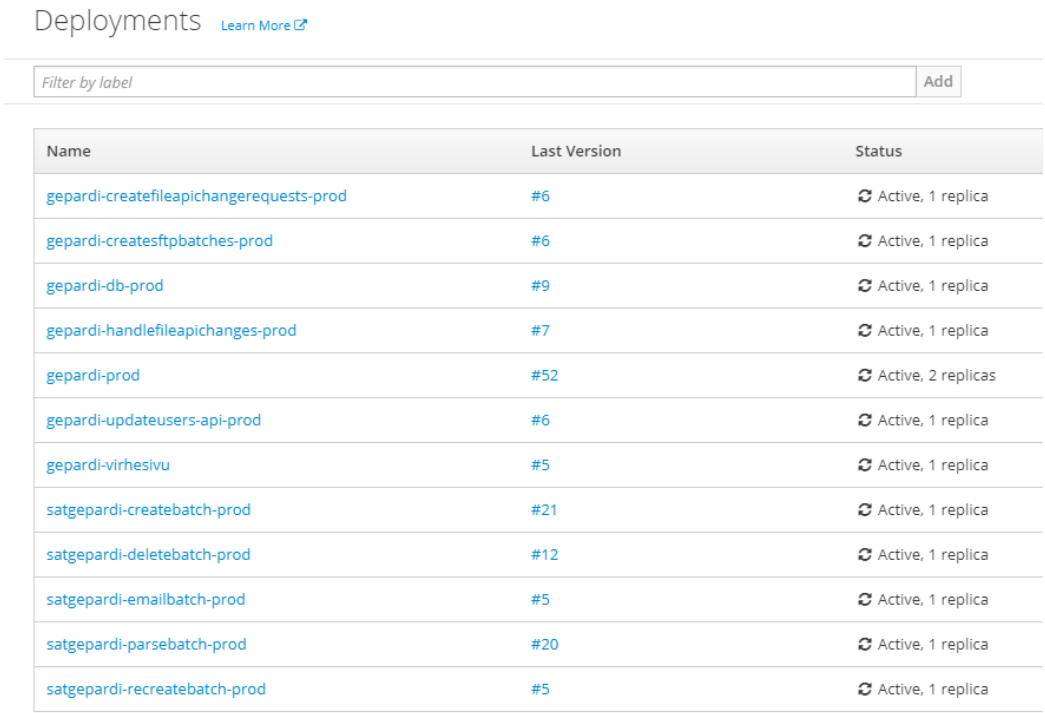
WHAT BECAME OF IT



asiakastieto.fi

WHAT BECAME OF IT

- 12 deployments, 13 pods
- ~10 updates since rollout
- Rolling deployments
- N-1 compatible changes
- Parallel prod for Sweden



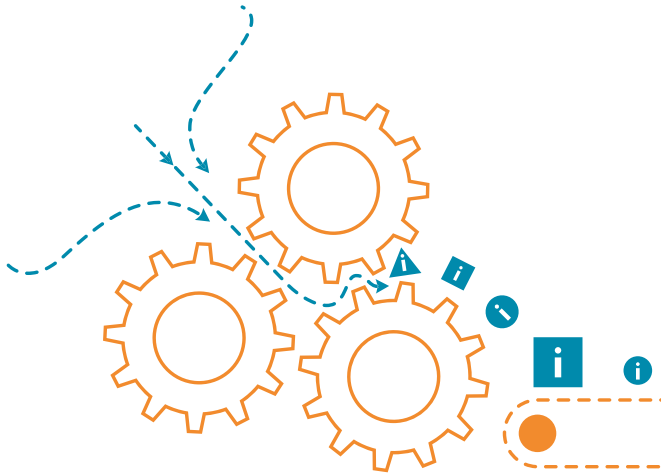
Deployments Learn More

Filter by label Add

Name	Last Version	Status
gepardi-createfileapichangerequests-prod	#6	Active, 1 replica
gepardi-createsftpbatches-prod	#6	Active, 1 replica
gepardi-db-prod	#9	Active, 1 replica
gepardi-handlefileapichanges-prod	#7	Active, 1 replica
gepardi-prod	#52	Active, 2 replicas
gepardi-updateusers-api-prod	#6	Active, 1 replica
gepardi-virhesivu	#5	Active, 1 replica
satgepardi-createbatch-prod	#21	Active, 1 replica
satgepardi-deletebatch-prod	#12	Active, 1 replica
satgepardi-emailbatch-prod	#5	Active, 1 replica
satgepardi-parsebatch-prod	#20	Active, 1 replica
satgepardi-recreatebatch-prod	#5	Active, 1 replica

asiakastieto.fi

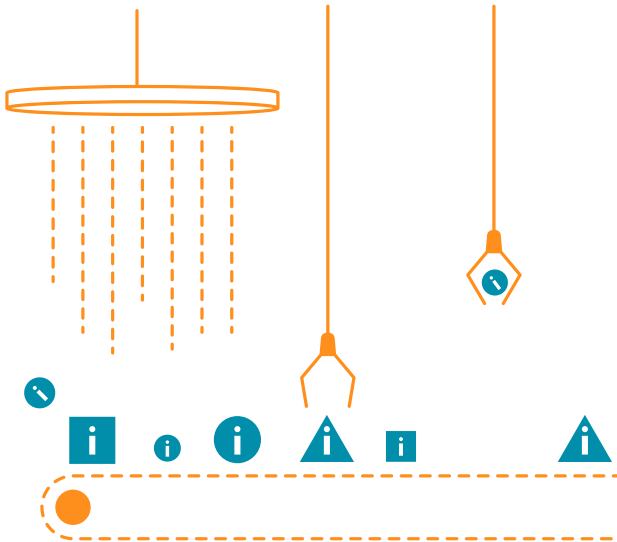
PHASE TWO – PRIVATE OPENSHIFT



asiakastieto.fi

HOW TO EAT AN ELEPHANT?

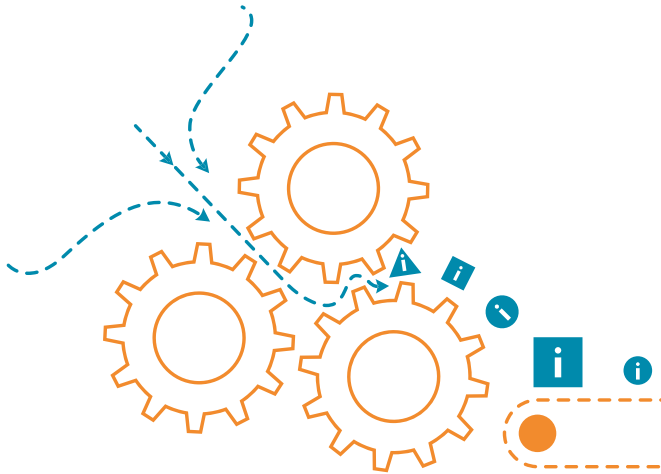
- One container at a time
- EAP out of the box
- Picked a few candidates
- Focus on Omatieto from POC



asiakastieto.fi

FIXING THE LITTLE THINGS

- Made generated classes Serializable
- Don’t call localhost
- Sideways compatibility

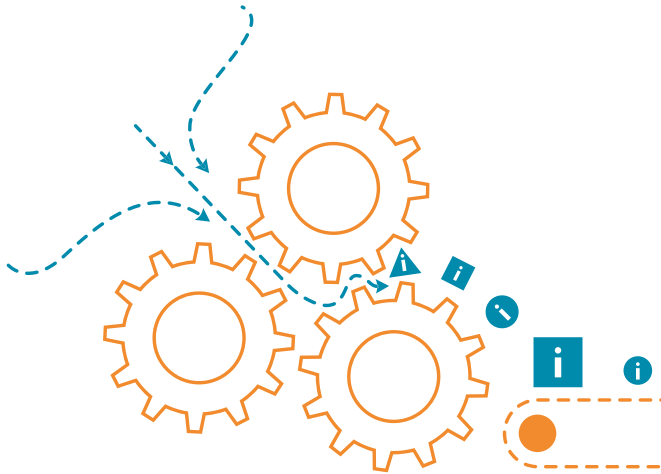


asiakastieto.fi

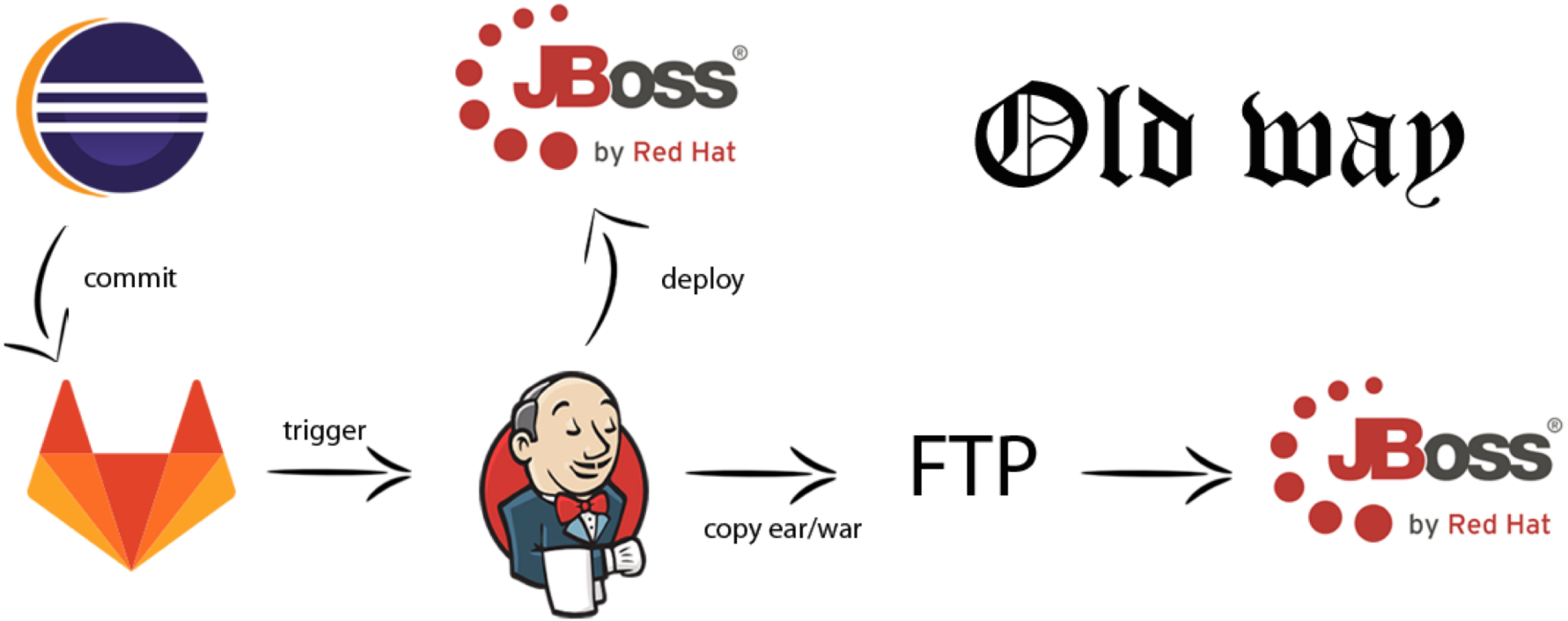
SEEING THE BIG PICTURE

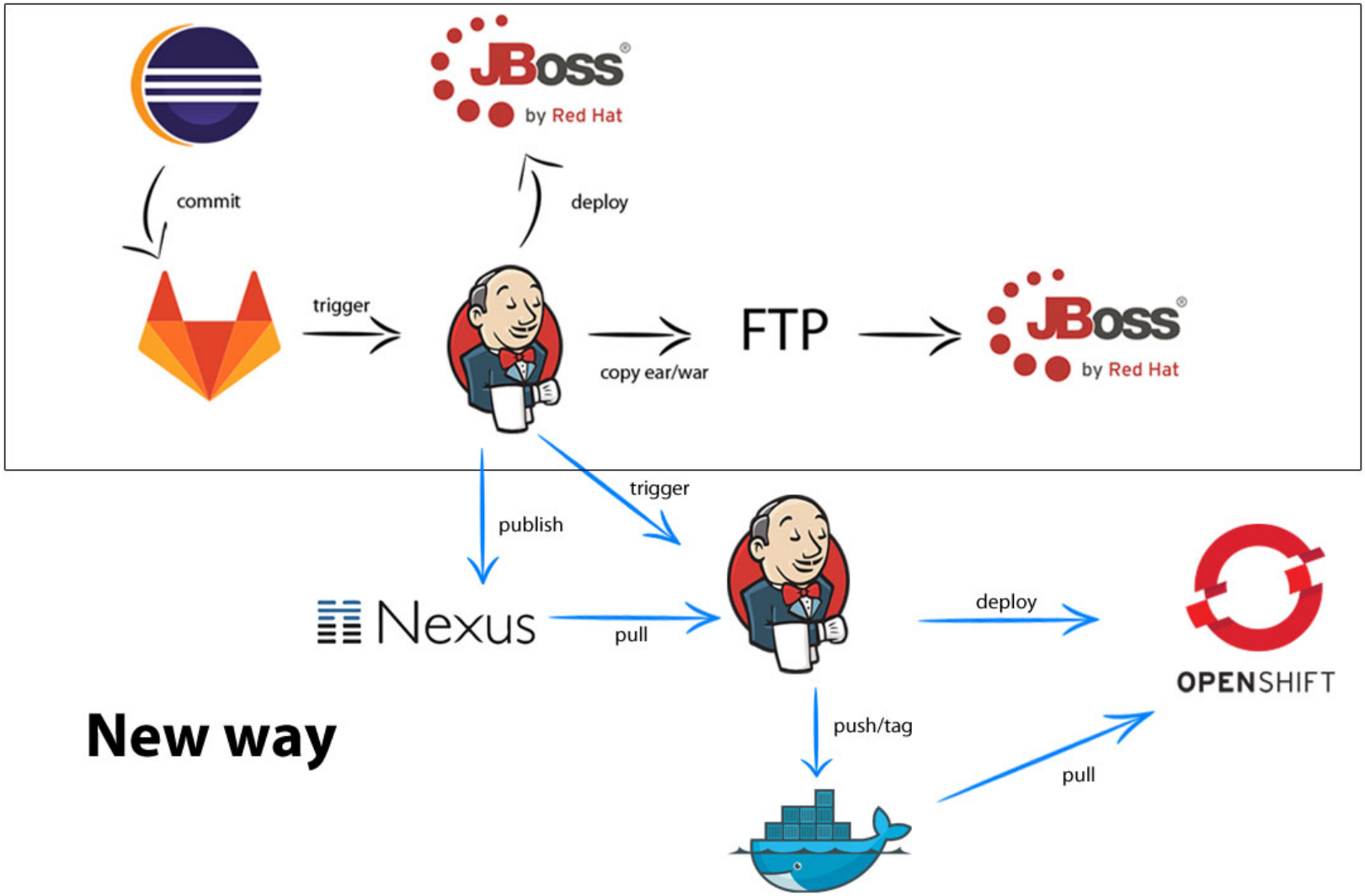
Can’t reinvent the wheel

- Integrate into existing CI/CD



asiakastieto.fi


JBoss
by Red Hat
Old way
commit
deploy
trigger
copy ear/war
FTP
JBoss
by Red Hat

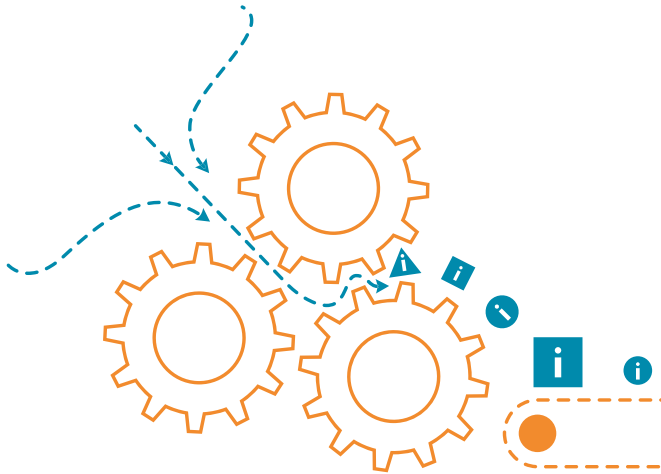

JBoss
by Red Hat
commit
deploy
trigger
FTP
copy ear/war
JBoss
by Red Hat
publish
trigger
Nexus
pull
deploy
OPENSHIFT
push/tag
pull

New way

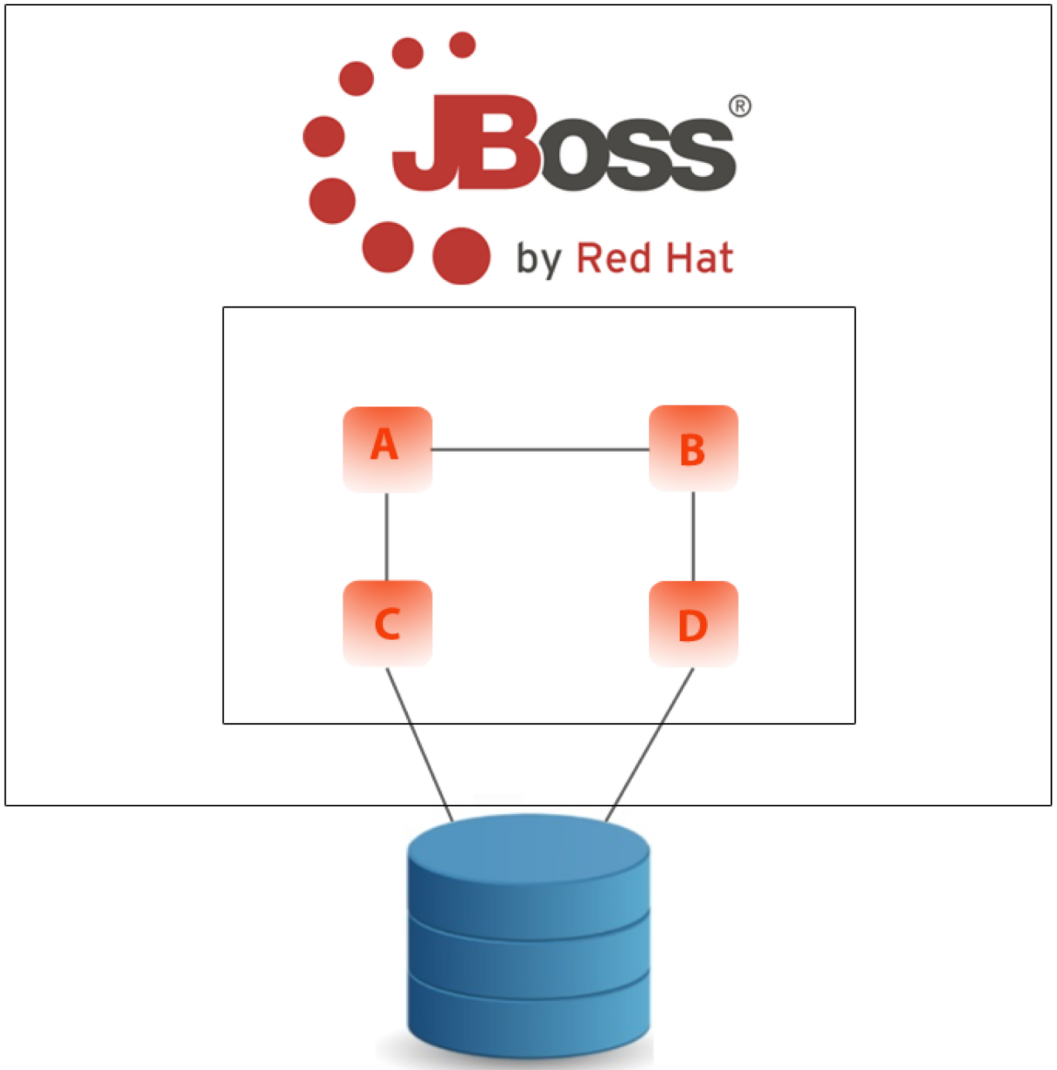
SEEING THE BIG PICTURE

Can’t reinvent the wheel

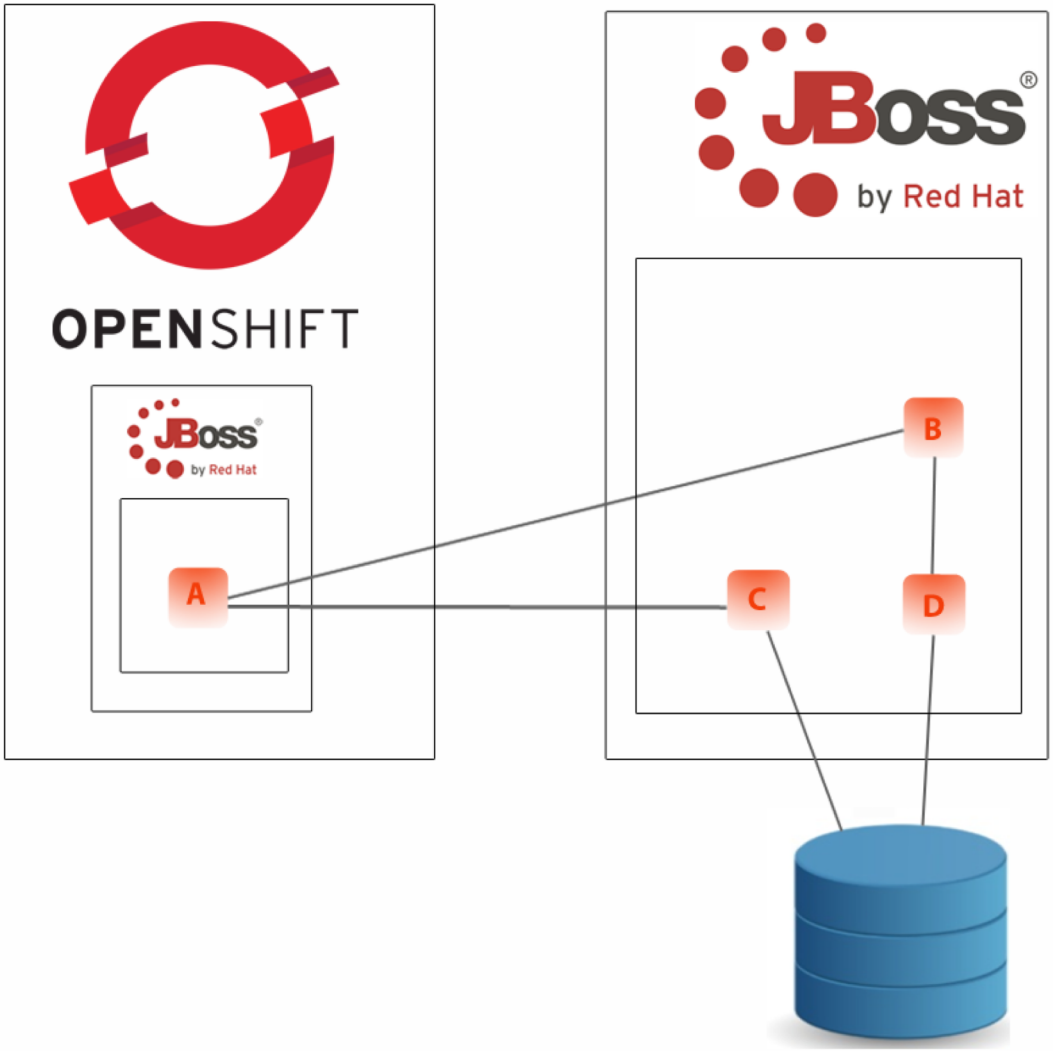
- Integrate into existing CI/CD
- Provide an incremental transition path



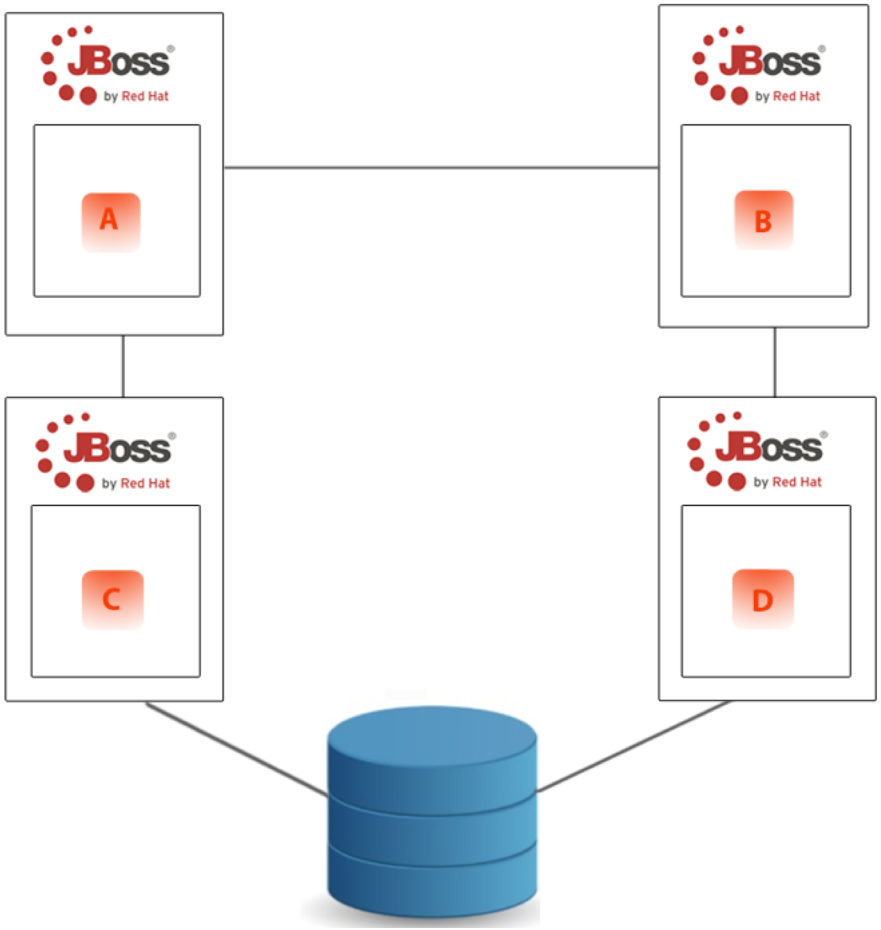
asiakastieto.fi



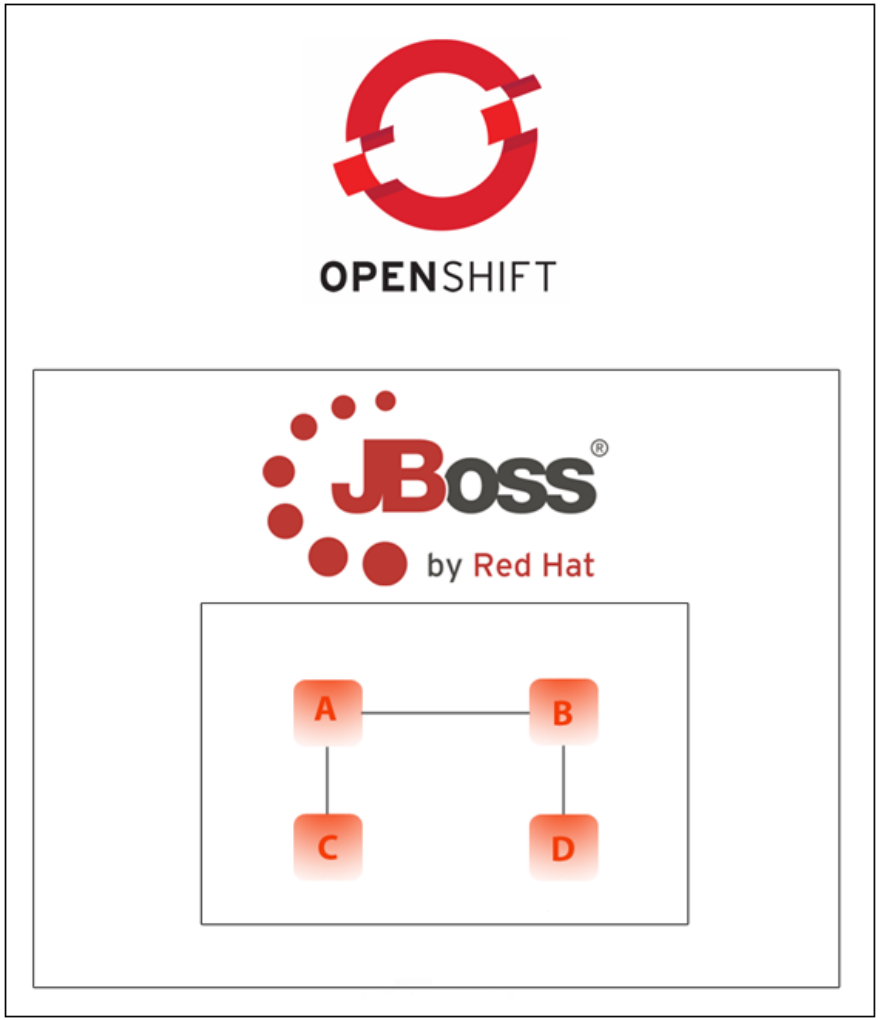
asiakastieto.fi



asiakastieto.fi



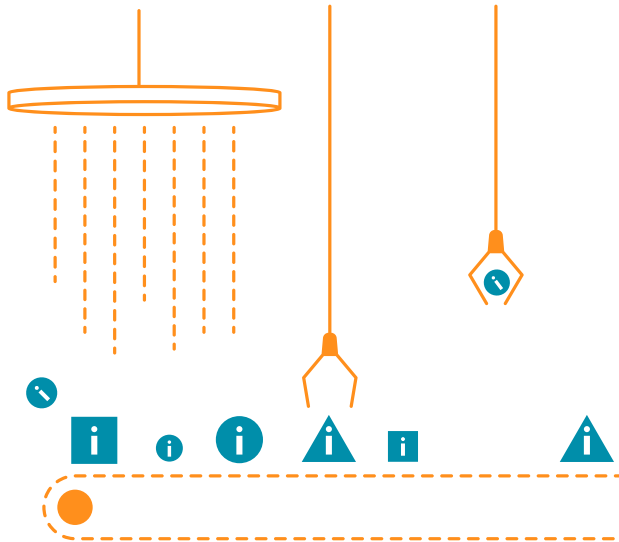
asiakastieto.fi



asiakastieto.fi

WHAT DO?

- Options, no decisions on back-end
- Front-end is straightforward and high value

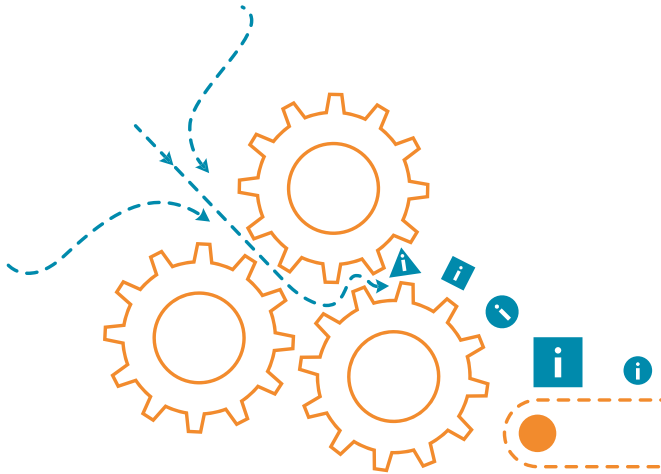


asiakastieto.fi

SEEING THE BIG PICTURE

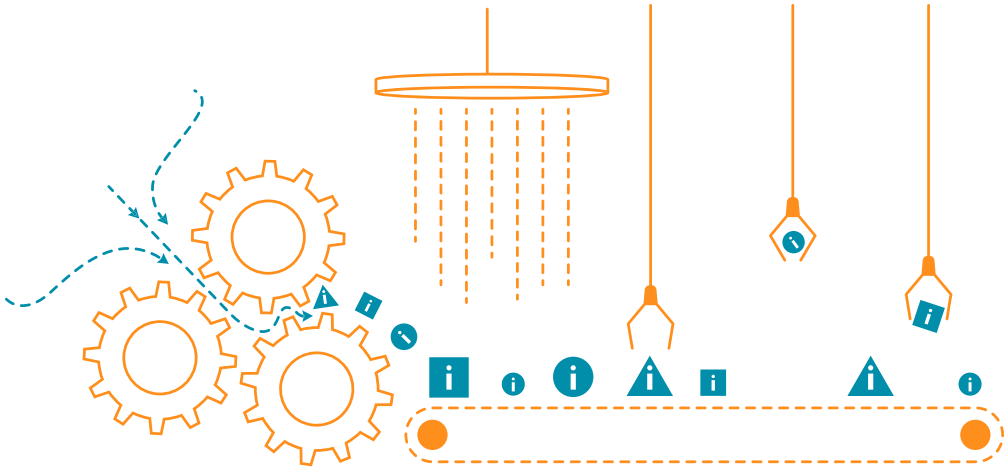
Can’t reinvent the wheel

- Integrate into existing CI/CD
- Provide an incremental transition path
- Identify the opportunities with the biggest impact



asiakastieto.fi

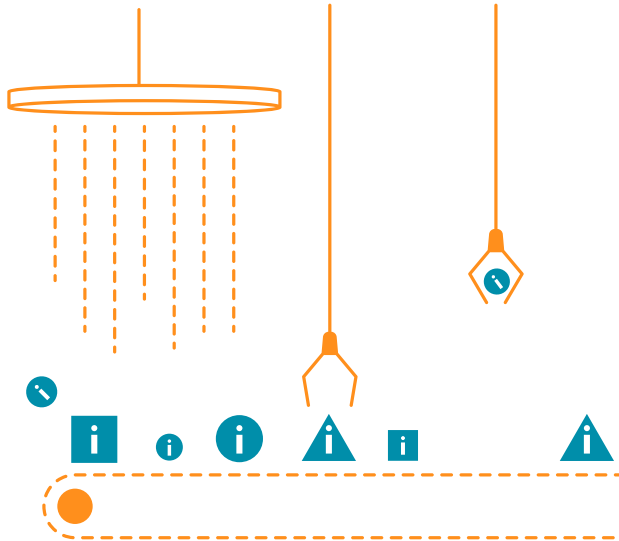
WHERE'S THE BEEF?



asiakastieto.fi

DEFINITELY WORTH IT FOR US

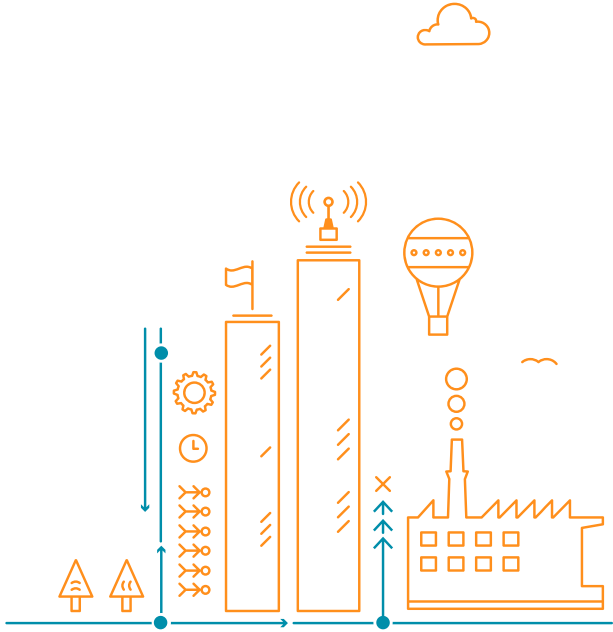
- 24/7 services
- Deploy whenever
- More reactive development and testing
- Experimentation becomes easy
- Real-time horizontal scaling
- Scale into an external cloud?



asiakastieto.fi

BUT IT'S ALSO ABOUT AWARENESS

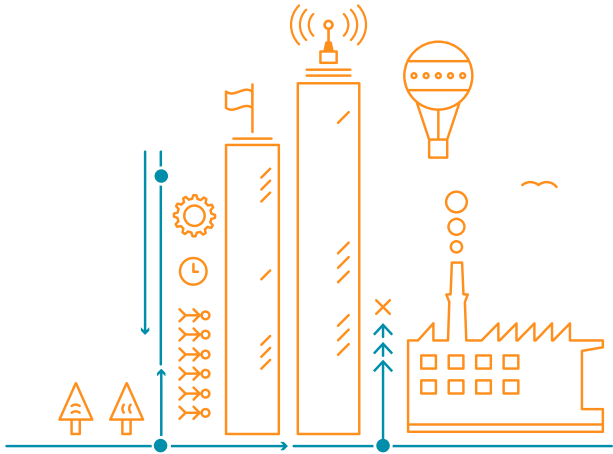
- No one wanted it… because no one knew
- Identify and convert the people sitting on the resources
- Bad ass real use case demo
- Now everyone wants a piece
- So… Don't forget to sell



asiakastieto.fi

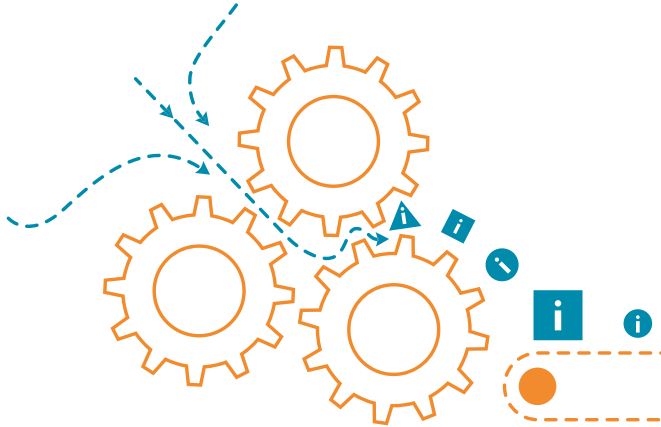
THE BIG STUFF IS YET TO COME

- The UC merger
- Getting rid of mainframes
- Nordic projects



asiakastieto.fi

THAT’S ALL FOLKS



asiakastieto.fi

asiakastieto.fi