THE JOURNEY OF BUILDING OPENSPEEDMONITOR

Learnings from unexpectedly finding ourselves developing a FLOSS project

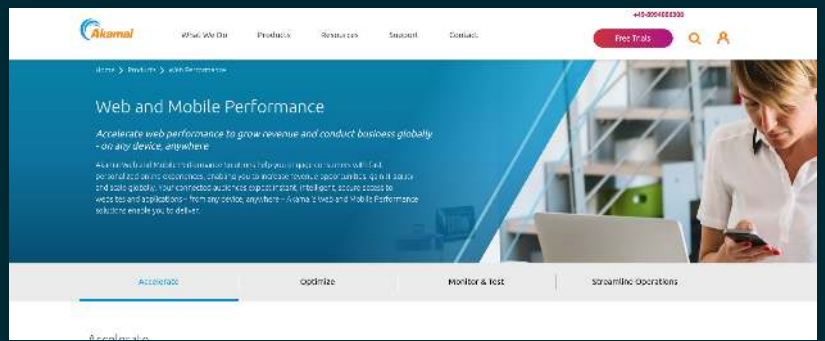
FOSDEM 2020

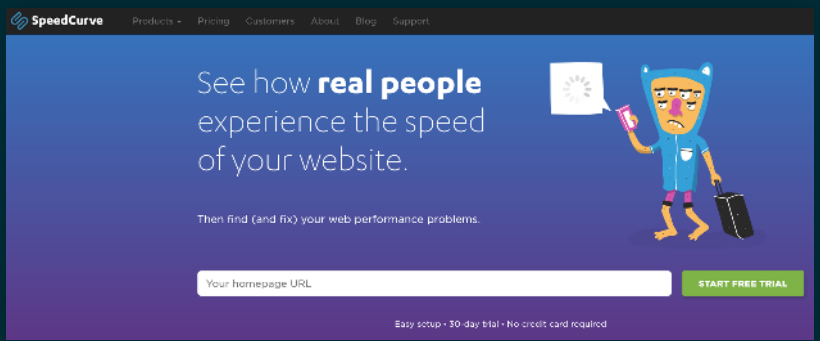
Are we product developers?

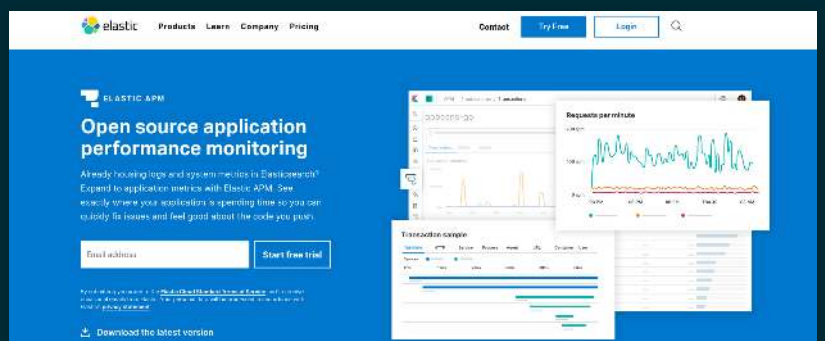
Do we earn our money with open source?

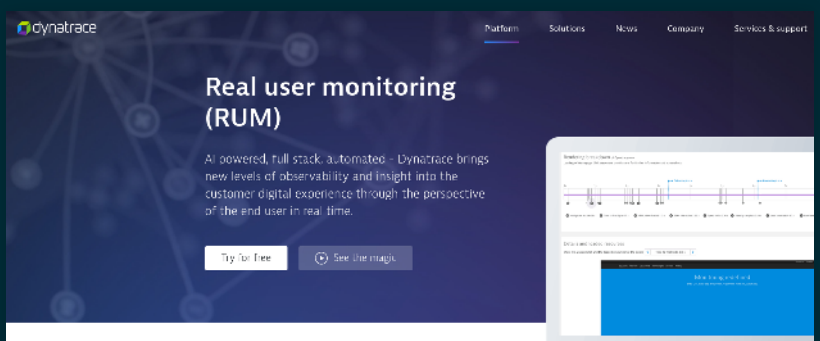
Do we work in academic research?

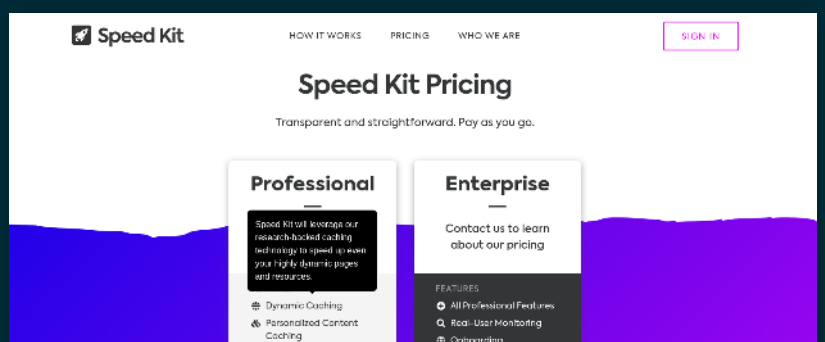
Is webperformance our core business?

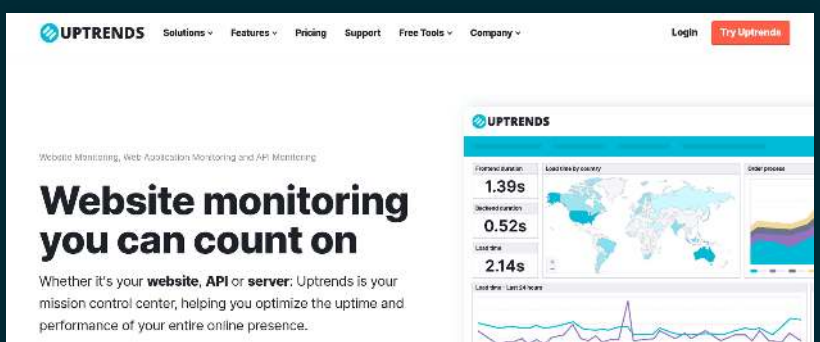












STILL

- OpenSpeedMonitor development since 8 years
- daily web performance work

Stefan Burnicki
@_sburnicki
@iteratec

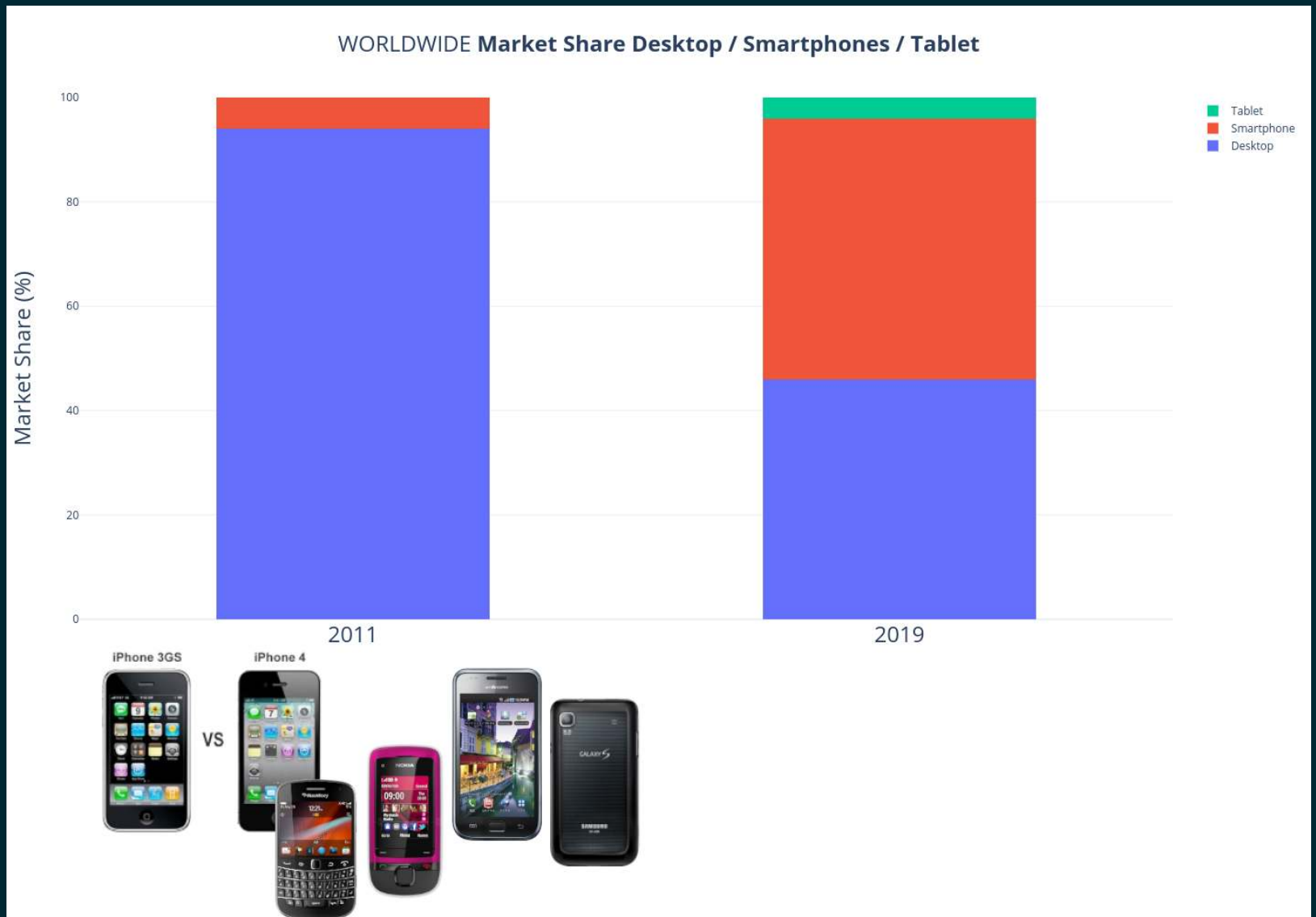
Nils Kuhn
Software developer and architect
@iteratec

WHAT HAPPENED ???

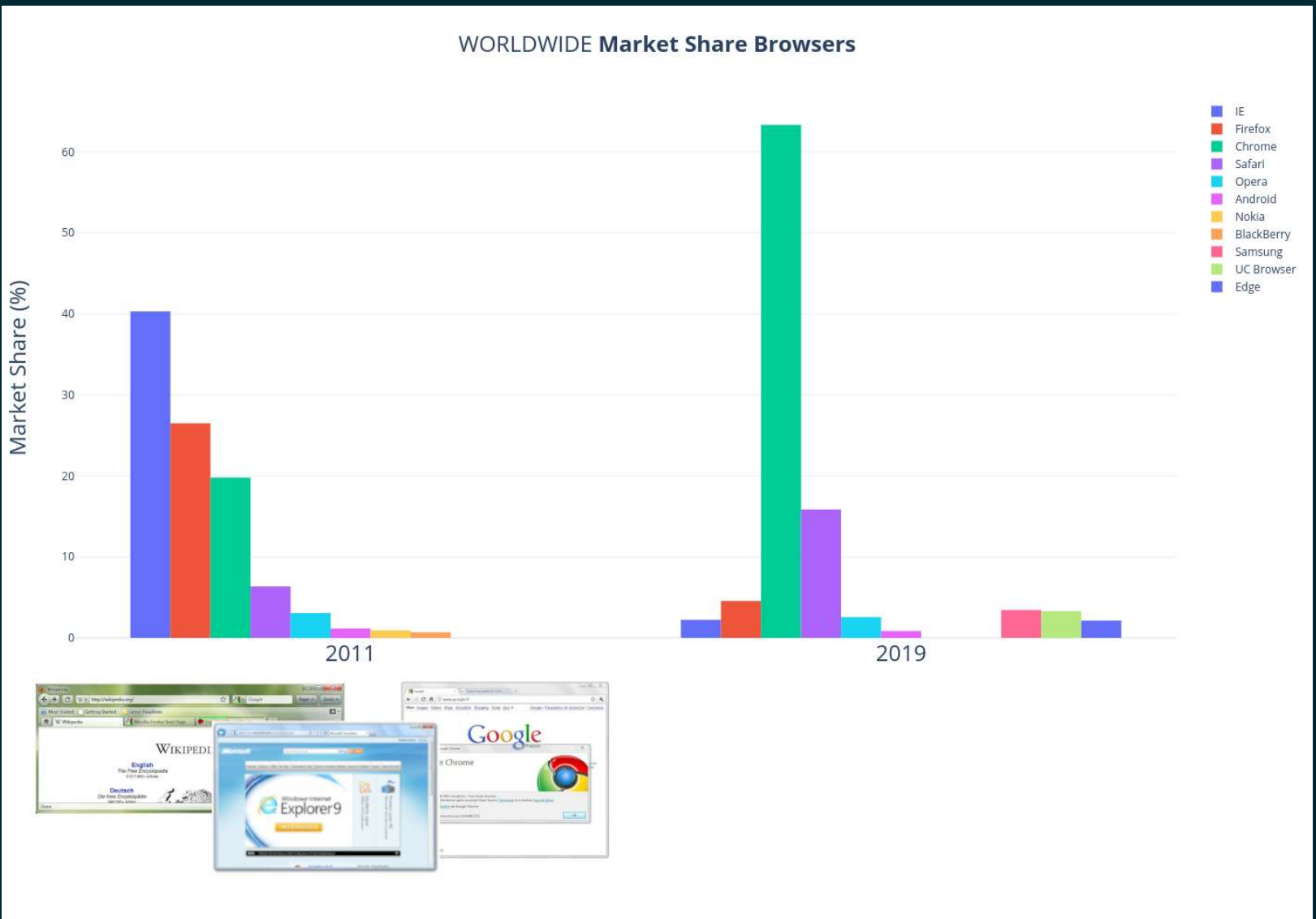
2011

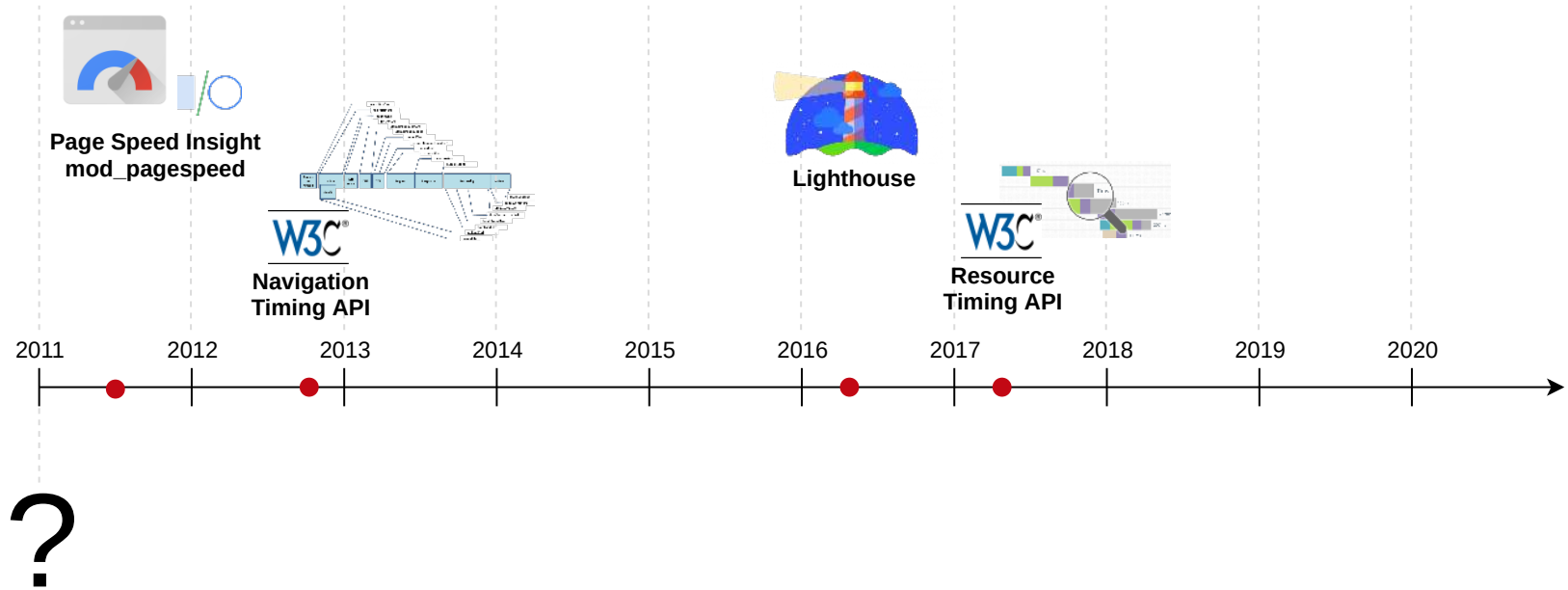
one of Europes biggest e-commerce shops asked us to evaluate their webperformance.

2011 was different...



2011 was different...

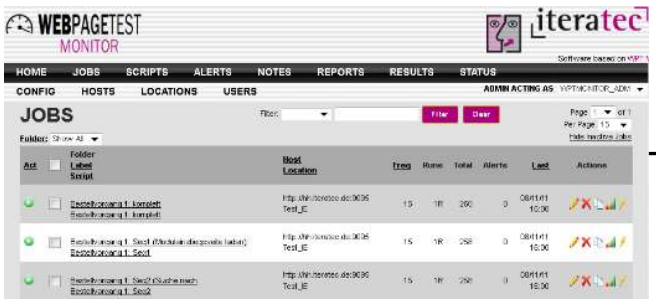



Page Speed Insight
mod_pagespeed
Navigation
Timing API
Lighthouse
Resource
Timing API
2011
2012
2013
2014
2015
2016
2017
2018
2019
2020
?

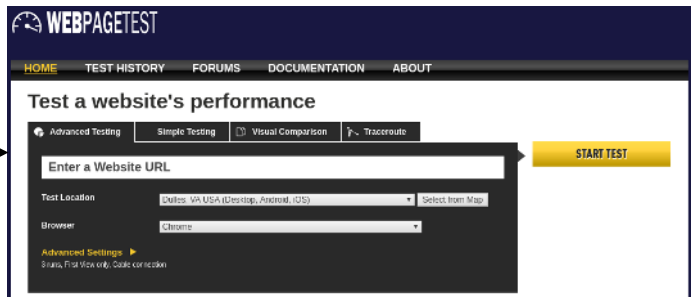
REQUIREMENTS OF OUR CUSTOMER

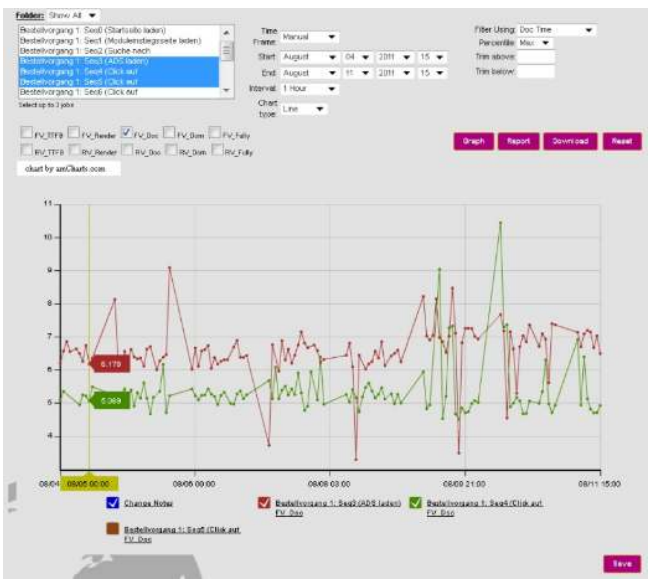
- continuous monitoring
- deep dive into single results / outliers
- more detailed results than existing monitoring

initial setup 2011

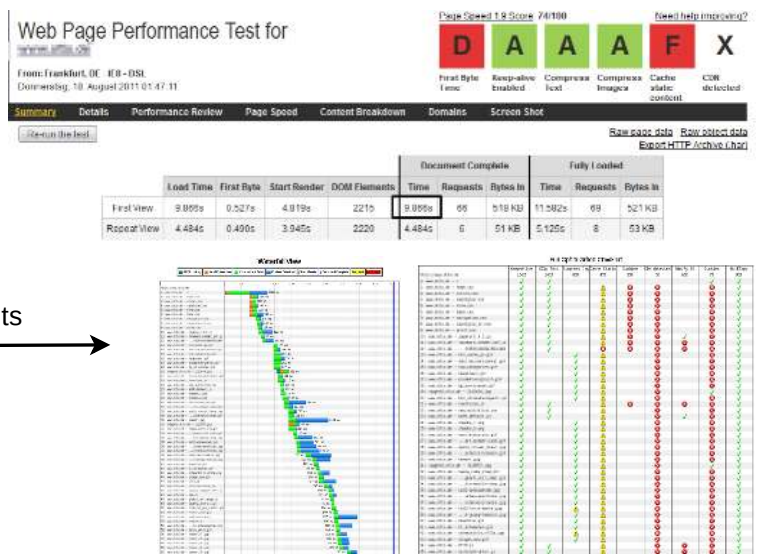


Automation





Results



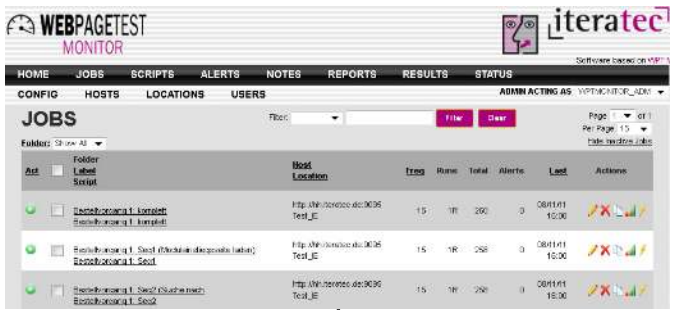
FURTHER REQUIREMENTS...

- measure customer journeys through the shop
- KPI to describe the overall performance of the shop

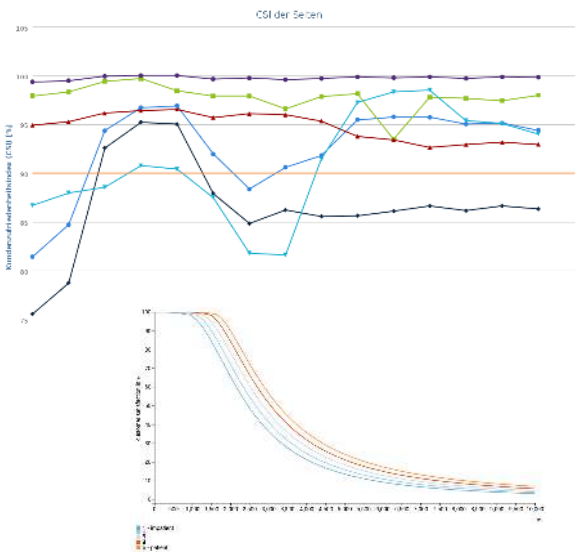
2012

started development which led to OSM

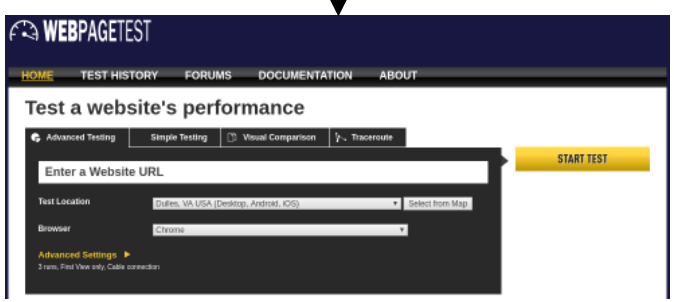
OSM Setup 2012



Derivation of CSI

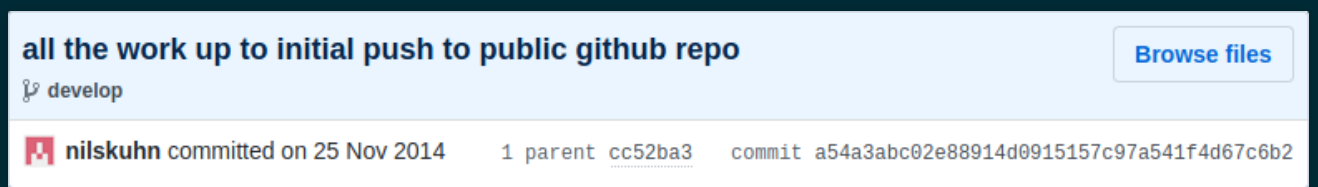


Automation



2014

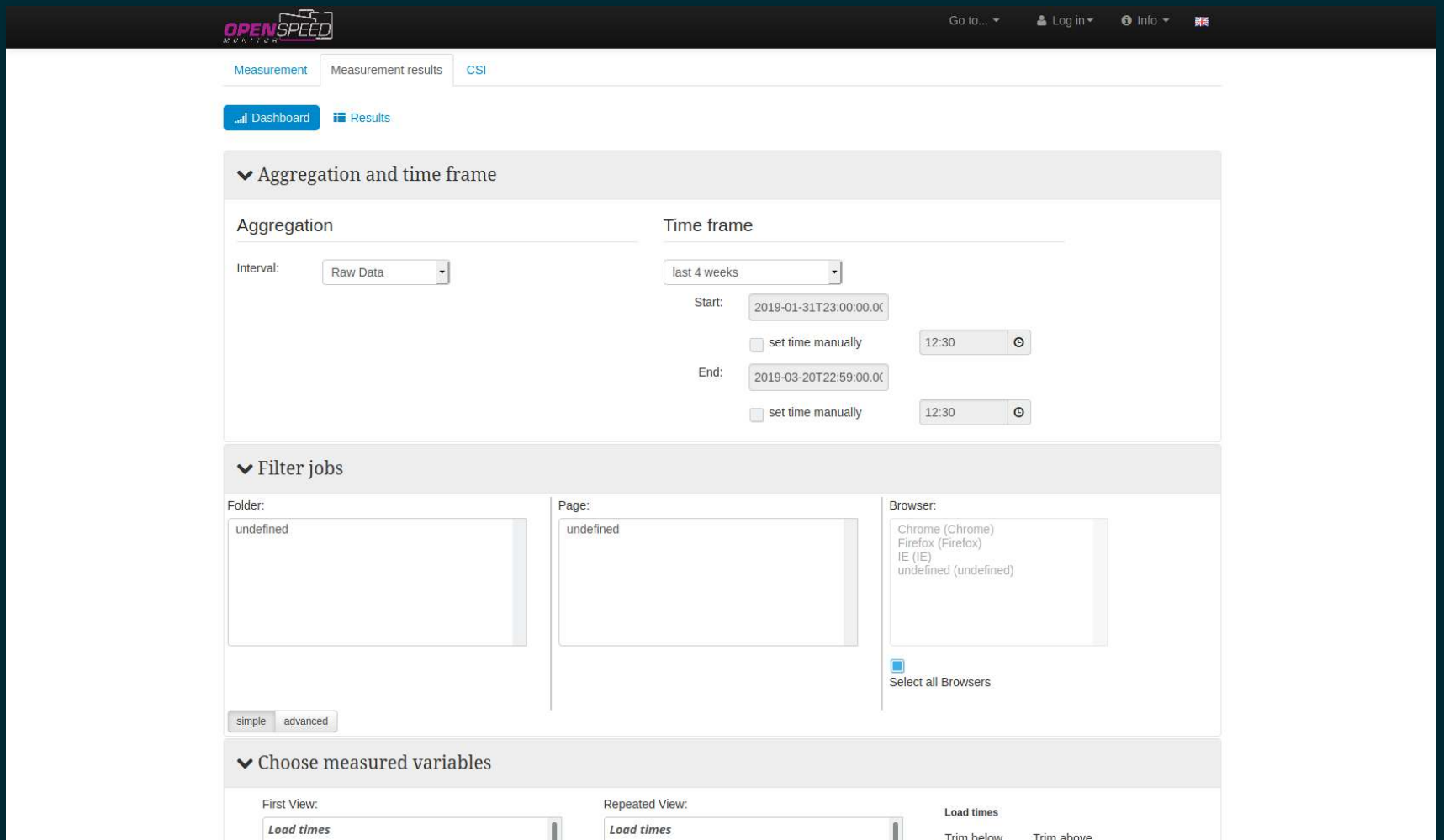
idea: Open Source



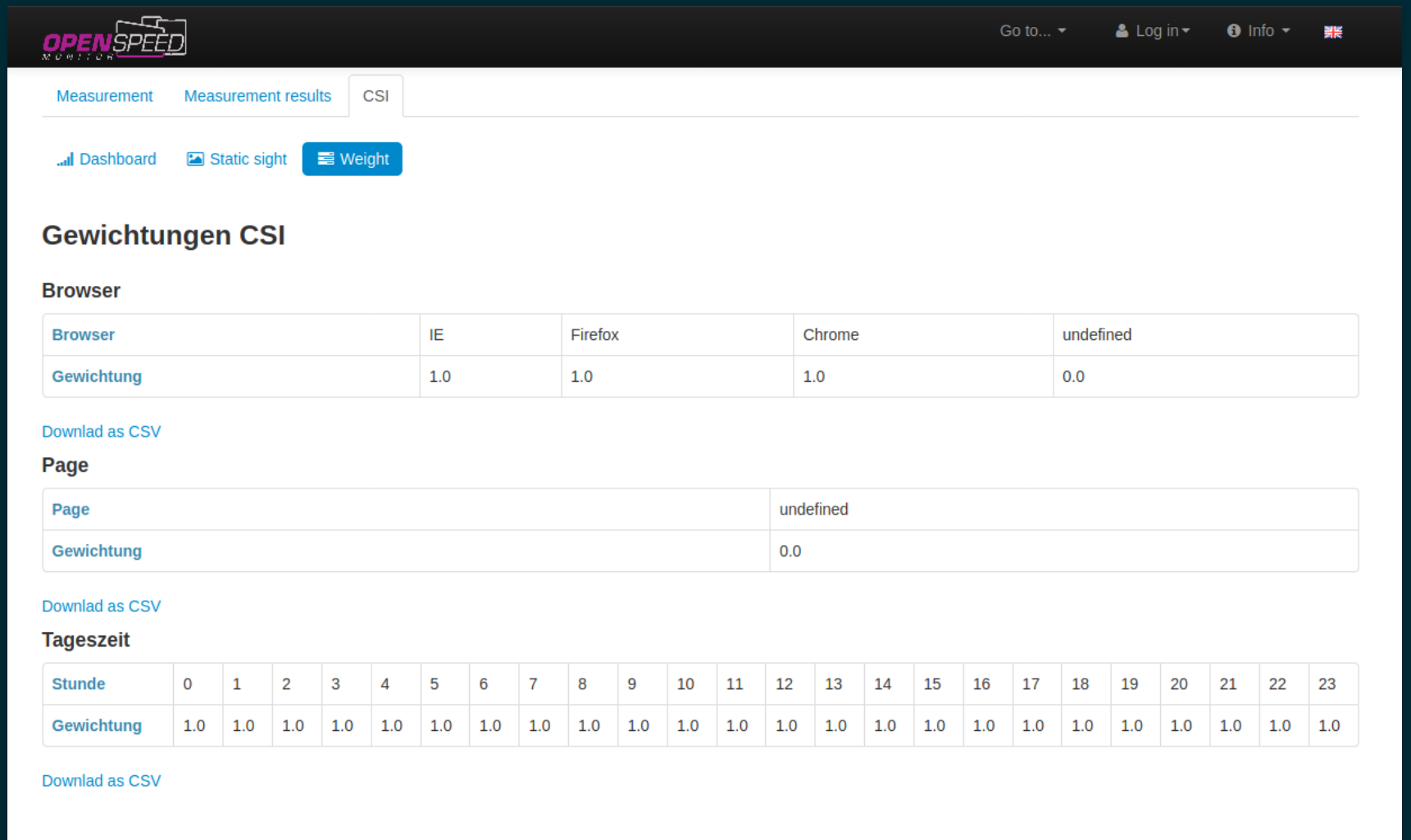
...mistakes have been made

LESSON LEARNED:

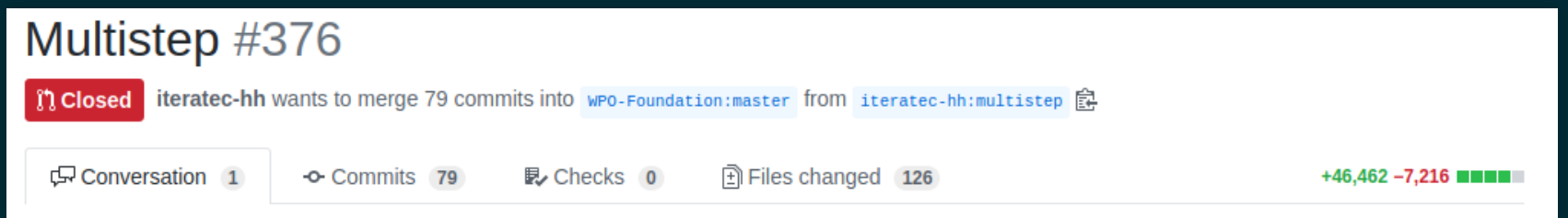
open sourcing a project is more than pushing to github



it was a power user tool only



feature "CSI" remains inaccessible for others



merging our changes into WebPagetest was already impossible

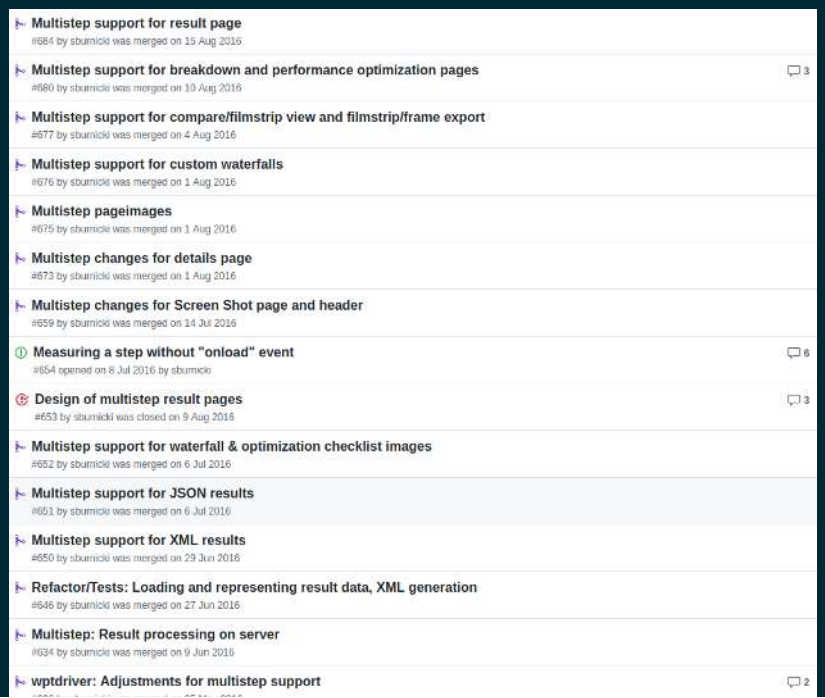
2015

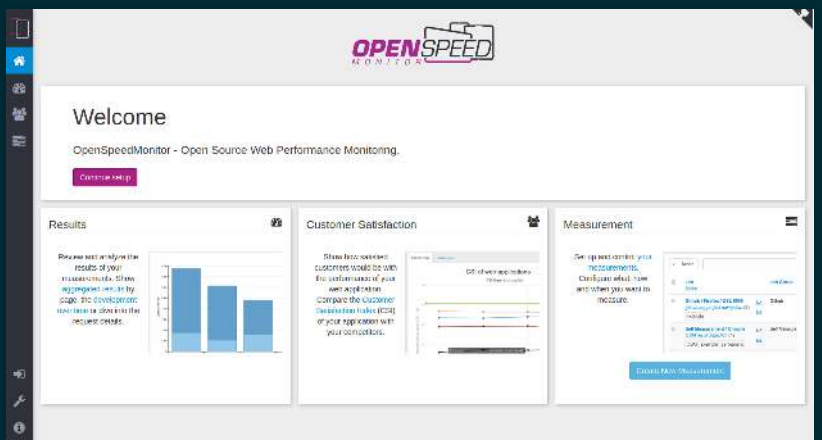
- more customers for web performance
- still a small, changing team of developers
- web performance requirements evolve

2016

invest time in OSS

- re-implement multistep measurement in WPT
- make OSM more usable





LESSON LEARNED:

working together with the community is key

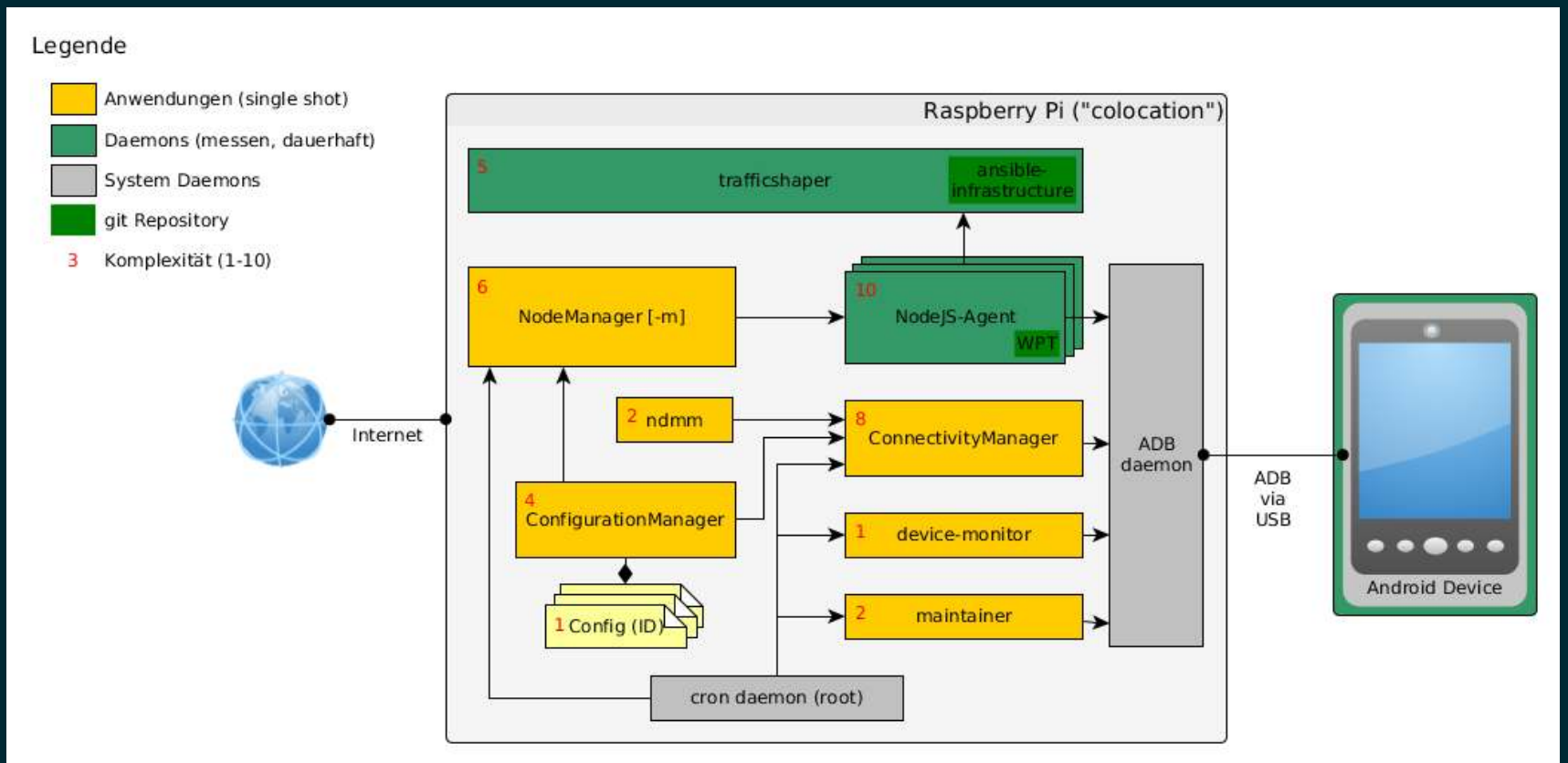
- multistep was considered during WPT development
- first issues on github appeared

2017

mobile is getting into focus

and sometimes out of control...

high effort to stabilize mobile measurements



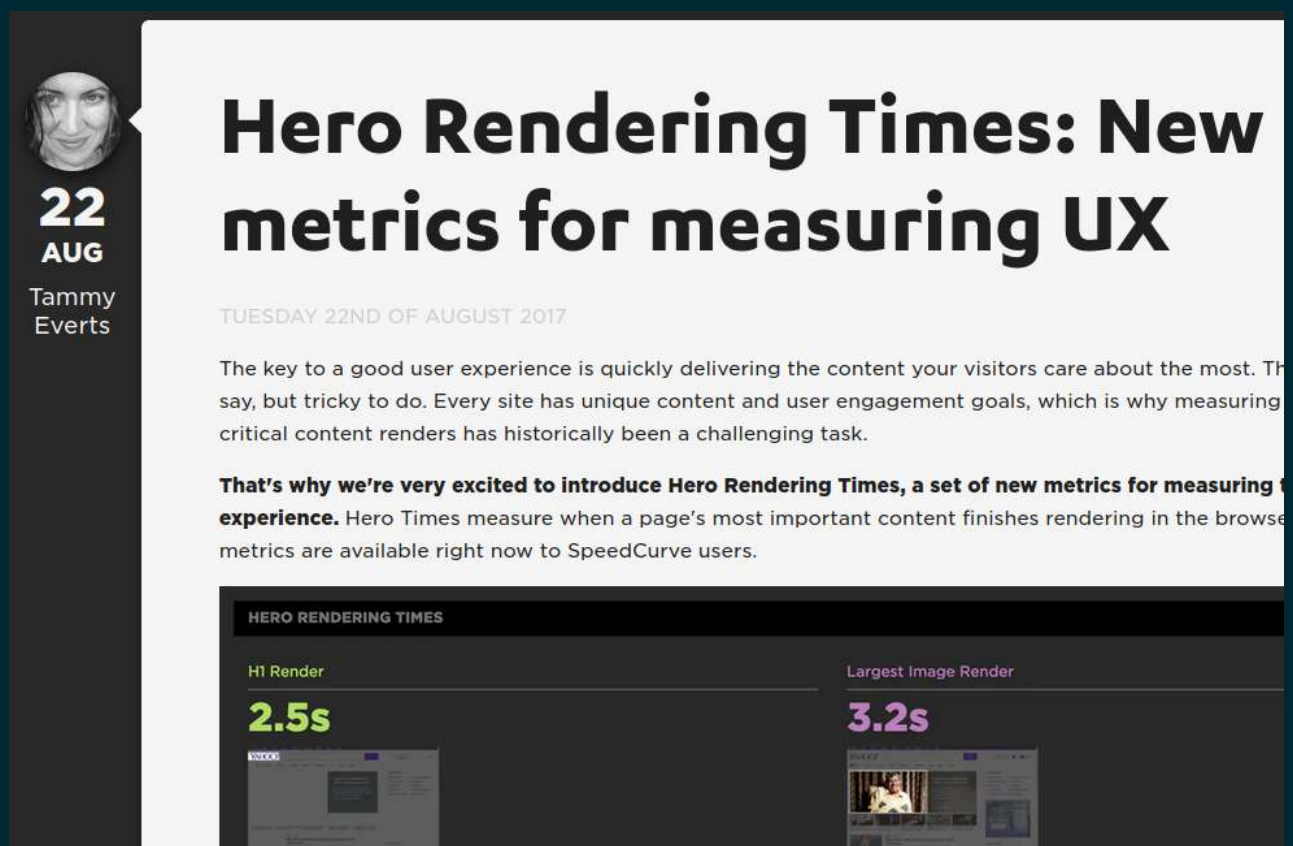
LESSON LEARNED:

exchange with community beyond code is equally important

- discussed the setup with different people
- new wptagent made with all our requirements

2018

support latest web perf metrics



22
AUG
Tammy Everts

Hero Rendering Times: New metrics for measuring UX

TUESDAY 22ND OF AUGUST 2017

The key to a good user experience is quickly delivering the content your visitors care about the most. Th
say, but tricky to do. Every site has unique content and user engagement goals, which is why measuring
critical content renders has historically been a challenging task.

**That's why we're very excited to introduce Hero Rendering Times, a set of new metrics for measuring t
experience.** Hero Times measure when a page's most important content finishes rendering in the browse
metrics are available right now to SpeedCurve users.

HERO RENDERING TIMES

H1 Render
2.5s

Largest Image Render
3.2s

LESSON LEARNED:

being able to benefit from other projects is priceless

- we could easily integrate features from others...
- ... and others could easily implement ours! 🙂

2020

community engagement with OSM is still low

LESSON LEARNED:

community doesn't come for free and needs love

WRAP UP

without OSS we would still work on a web performance level of 2012

...and be probably out of web performance business

it's not the lines of code contributed to *your* project that count

...but collaborating with the community

you don't need to be a key player in web performance to contribute

...it is enough to share what you build because it is missing

iteratec.github.io/OpenSpeedMonitor/

@_sburnicki

@iteratec