SQGNE
Software Quality Group
of New England
Welcome to Our
2020~21 Season
Celebrating 27 years
Event Will Be Recorded
www.sqgne.org

SQGNE Software Quality Group of New England

Dedicated To The Profession of Advancing Software Quality

- Over 27 years, the Software Quality professional has greatly changed!
- Quality ownership is now distributed to everyone in the organization
- Software quality as a key business differentiator is becoming more challenging to achieve
  - Everyone owns quality
    - but application and mastery of quality skills and tools are not as widespread

Our Mission:

- To promote use of engineering and management techniques that lead to delivery of high quality software
- To disseminate concepts and techniques related to software quality engineering and software engineering process
- To provide a forum for discussion of concepts and techniques related to software quality engineering and the software engineering process
- To provide networking opportunities for software quality professionals

SQGNE Software Quality Group of New England

Dedicated To The Profession of Advancing Software Quality

- All-volunteer **non-profit** with no membership dues!
- As a local network of professionals:
  - 1500+ members in our SQGNE LinkedIn Group
  - 625+ members in our SQGNE Meetup Group
  - 1100+ members on our direct email list

www.SQGNE.org

- Supported entirely by our sponsors…

CHECKPOINT Technologies

FLATBREAD COMPANY

SQGNE 2020~21 Volunteers

Current Officers:

- John Pustaver – Founder
- Darin Kalashian - President
- Robin Goldsmith – Vice President
- Barbara Wioncek – Treasurer
- Pratik Shah -- Clerk

Website:

- Jim Turner
- **<Open>**

At-large Directors:

- Bill Basinski
- Mike Arnold
- Jim Turner

Program Committee :

- Robin Goldsmith

Membership Committee :

- Niranjan Mangaonkar
- Paras Babbar
- Riley Nolan
- Pratik Shah
- Eric Patel

Nominating Committee :

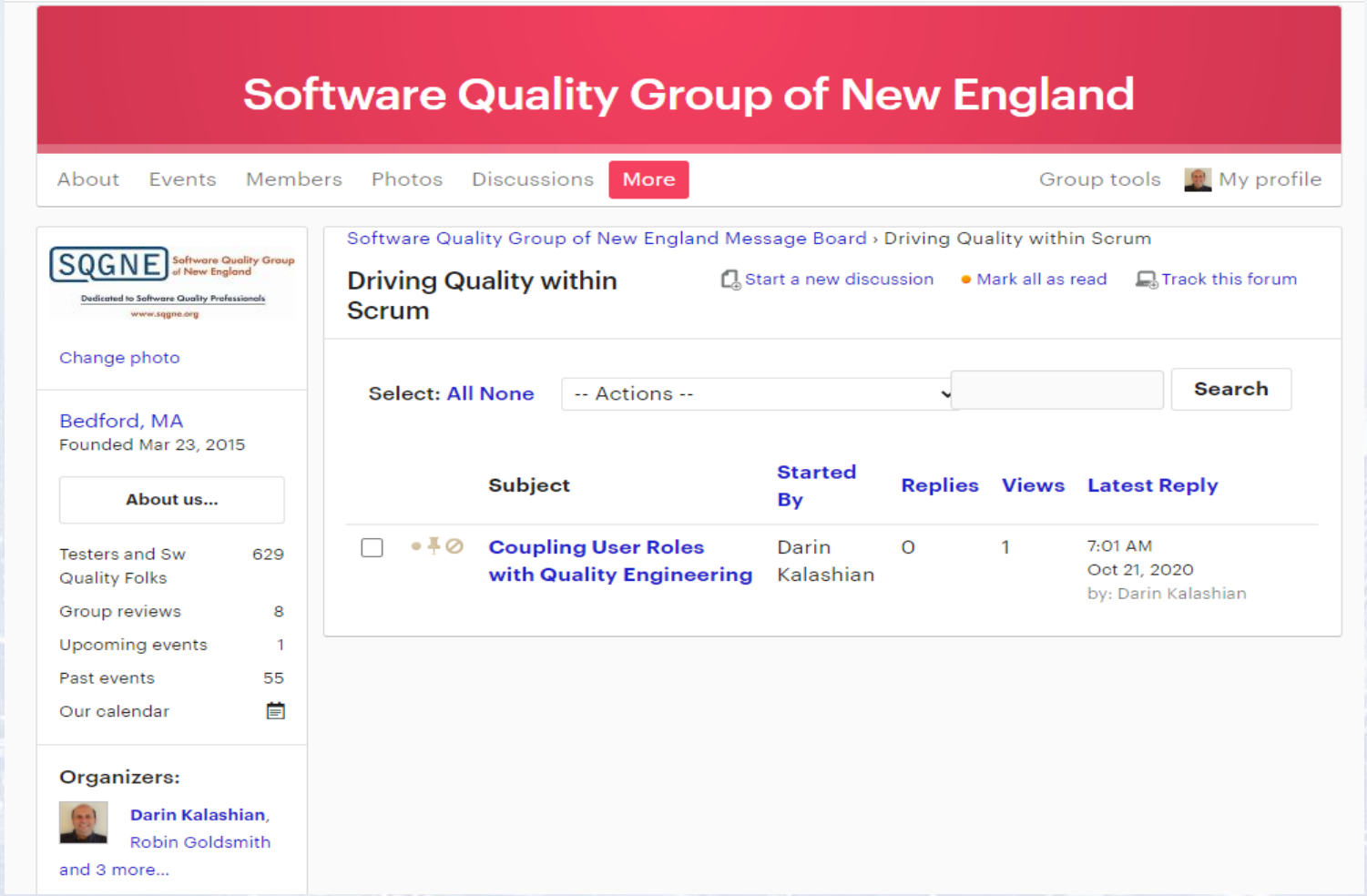
- Ann Cultrera

- Monthly meetings – September thru June, 3rd Wednesday of the month
- Looking for a **sponsor** for hosting our meetings post-pandemic/reconvene in-person meetings
- Looking for a **volunteer** who wants to expand and add to their credentials ***Website development***
- Additional **sponsorship** opportunities available

SQGNE October Highlights

- ***Expanding Networking Opportunities***
  - Virtual Breakout Rooms Prior to Meeting (6:00 ~ 6:30)
  - Volunteer Opportunities (Hack-a-thon/Quality-a-thon/Mentorship)
  - Better utilization of LinkedIn and Meetup Platforms for Networking
  - Job Opportunity/ Individual Availability Socialization
- ***Local Education/Training Programs***
  - Last Year two Offerings:
    - ❑ A Practitioner's Guide to Agile/Scrum Software Development
    - ❑ ASQ Certified Software Quality Engineer (CSQE) Body Of Knowledge Review
  - Looking for inputs on new ideas / training / professional growth needs
- ***Free Giveaway(s)***
  - Rich tradition of giving away books at the end of the meeting
  - Continuing this tradition this month, courtesy of ***Eric Patel*** and ***bostonexo***

Meetup SQGNE Active Discussions



- Members connecting/helping members
- Start a Discussion
- Get Insights/help from local peers

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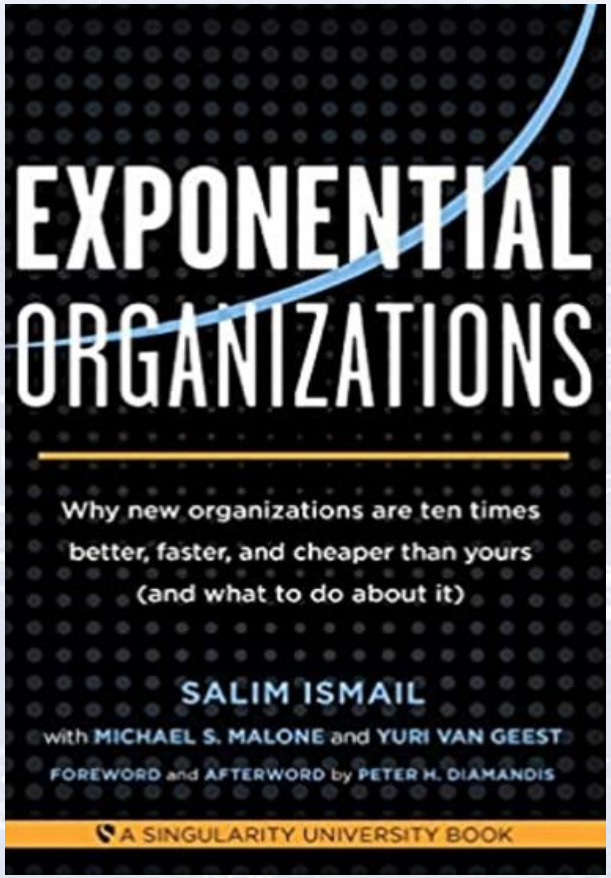
Raffled Away Tonight

airbnb

Google



TESLA

waze

GitHub

bostonexo
AGILE BUSINESS TRANSFORMATION℠

BostonExO helps companies thrive through continuous business model innovation

We leverage exponential technologies along with an abundance mindset to help organizations stay in business, disrupt their industry and achieve exponential valuation

Our Massive Transformative Purpose (MTP) is global exponential mindset transformation

Linear → exponential
Scarcity → abundance

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Welcome to Season 27

October 21st, 2020 Presentation:

Critical Delivery Metrics in the 'New Normal' World

Charlie Ponsonby and Will Lytle

SQGNE is made possible by the support of our sponsors:

Checkpoint Technologies

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Event Will Be Recorded

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SQGNE 2020~21 Program

Speaker	Affiliation	Date	Topic * Online Meeting
Oren Rubin	Testim	16 Sept, 2020	Selenium, Puppeteer or Playwright: How to Choose *
Charlie Ponsonby Will Lytle	Plandek	14 Oct	Critical Delivery Metrics in the 'New Normal' World *
Joe Ours	Centric Consulting	18 Nov	Avoid the Automation Journey to Disillusionment *
A.J. Ford	Tricentis	16 Dec	Scriptless and Scripted Automated Testing *
Bob Crews	Checkpoint Technologies	20 Jan 2021	Why I Love Test Automation… Why I Hate Test Automation *
Mike Pettinella	Sealights	17 Feb	Leveraging AI to Maximize Test Coverage & Enable Smarter, Faster Testing *
Eran Kinsbruner	Perfecto	17 Mar	Best Practices to Overcome Continuous Testing in the Cloud Issues *
Robin Goldsmith	Go Pro Mgt,	21 Apr	Build Buy-In, Increase QA's Perceived and REAL Value
David Franklin	SharkNinja	19 May	Jira-integrated test management systems
<tbd>	SmartBear	16 Jun	API testing Annual Election of Officers

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Tonight's Topic

Critical Delivery Metrics in the 'New Normal' World

Presented by Charlie Ponsonby and Will Lytle

Abstract: The world has changed dramatically and a "new normal" has appeared almost overnight — a time of remote working, great uncertainty, changing priorities and dramatic cost pressures. Software delivery teams sit at the heart of this challenging new environment as organizations look to them to deliver more, for less in strategically critical areas. Metrics, visibility across teams and risk management were already an increasing priority in Agile software delivery — particularly in large scale organizations. But recent events have seen these catapulted from important to essential, as the "new normal" world presents a whole new set of challenges. This presentation uses case studies to show how those organizations which adopt a framework of continuous improvement built around a meaningful set of metrics deliver software better.

Presenter Bio(s):

Charlie Ponsonby is Co-founder and Co-CEO of Plandek. He started his career as an economist before moving to Andersen Consulting. He was founder and CEO of the UK e-commerce company Simplifydigital. Simplifydigital was founded in 2007 and was three times in the UK Tech Track 100 (fastest growing technology companies) and grew to become the UK's largest broadband comparison service. Charlie co-founded Plandek with Dan Lee in October 2017. Plandek is an end-to-end delivery metrics analytics and BI platform, to help technology teams better manage delivery risk and improve their delivery effectiveness. Plandek is used by clients globally including Reed Elsevier, Jato Dynamics, Autotrader.ca and Secret Escapes.

Will Lytle is a senior technology leader, specializing in digital transformation and leading cross-functional delivery teams. He has over 16 years of global experience built on digital delivery expertise, operating models, developing talent, and helping businesses shape and deliver technology-enabled business transformations. Will joined the Plandek leadership team from Deloitte as Customer Success Director. He is passionate about helping our clients build high performing, motivated delivery teams, and works closely with them to identify their biggest delivery challenges, form meaningful objectives, and find the right metrics to drive success.

SQGNE
Critical delivery metrics in the ‘new normal’ world
The power of insight-driven software delivery
21 October 2020
Plandek
12

End-to-end data analytics are seen as increasingly critical for effective DevOps Value Stream Management…

Software delivery complexity increases exponentially with scale

+

The new normal in software delivery

- **Greatly increased uncertainty**
- **Requirement to remote work**
- **Increased pressure to deliver**
- New levels of **cost pressure**

End-to-end analytics are becoming a key element of effective Value Stream Management

- **Need to consider the DevOps Value Stream in its entirety**
- **Use of data analytics to understand and mitigate the root causes of delivery risk across the Value Stream - thereby:**
  - reduce **unplanned go-live delays**
  - improve **quality**
  - increase **throughput**
  - reduce **Time to Value**
  - drive **continuous improvement**

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Gartner and Forrester have recently become very interested the key role of end-to-end delivery metrics in Value Stream Management…

Gartner

> ***"Organisations lack end-to-end visibility into product delivery and struggle to improve their flow of value.*** *I&O leaders...must implement a DevOps value stream management platform and* ***analyze value stream metrics to optimize the overall health of product delivery."***

DevOps Value Stream Management Platforms Market Guide Sept 2020

Predicts 2021: Value Streams Will Define the Future of DevOps

Published 5 October 2020 - ID G00734377 - 23 min read

Initiatives: Infrastructure and Operations Leaders **and 1 more**

To accelerate development and enable continuous delivery of customer value, organizations need to reach the next level in their agile and DevOps practices. I&O leaders and application leaders must focus on value stream management to maximize flow, improve delivery efficiency and drive innovation.

- Gartner's first 'Value Stream Management' Market Guide released in Sept 2020 – with VSM predicted as a key DevOps focus in 2021

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End-to-end software delivery analytics requires the ability to surface data from multiple toolsets across the SDLC…

Pre Dev/ Development

- Workflow Management software — JIRA, Azure DevOps
- Code repositories — Bitbucket, GitHub, GitLab, Azure DevOps
- Code quality tools — sonarqube

Integration/ Deployment

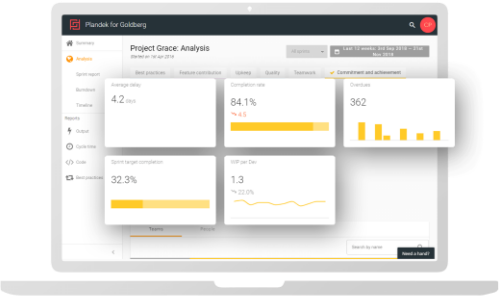
- Time tracking software — HARVEST, TEMPO
- CI/CD tools — Jenkins, go, TC, circleci, Azure DevOps
- Collaboration hubs — slack, Microsoft Teams

Live

- Service Management — PagerDuty

"Look under the hood"

"Join the dots across the Value Stream – mine the data footprint of the tools used throughout the SDLC, to surface actionable insight..."



Use real-time metrics to:

1. **reduce software delivery risk**
2. **improve effectiveness** of your software delivery life cycle (SDLC)

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A BI solution alone won't solve the problem…

Clients need a framework to help them build a hierarchy of meaningful metrics, tied to their core delivery objectives…

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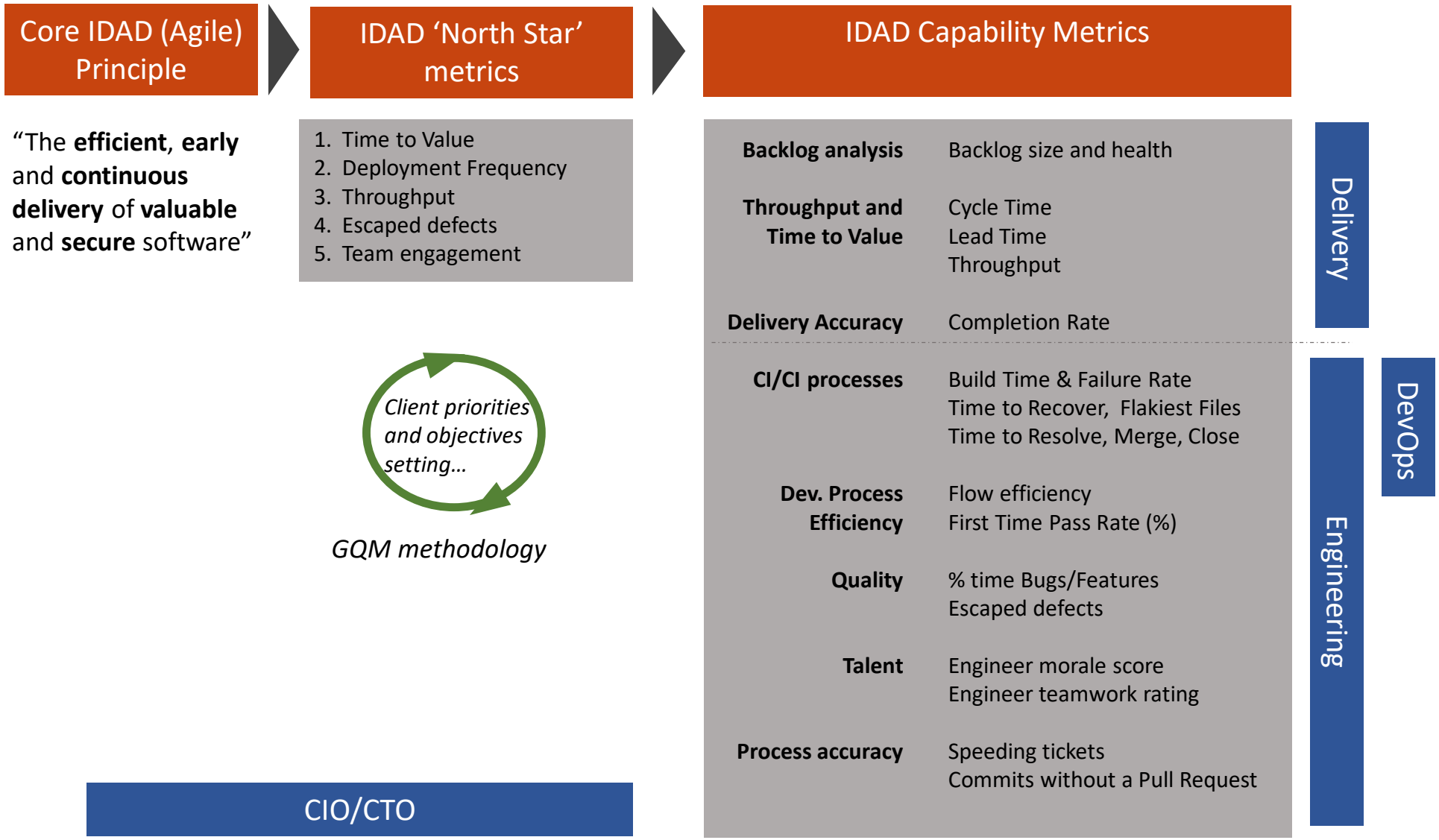
The Insight Driven Agile Delivery (IDAD) framework provides a structure to help clients cascade a hierarchy of meaningful metrics across their delivery organisation…



Typical use cases for applying end-to-end delivery metrics to drive value…

Track the impact of an 'Agile transformation'

Shorten time to market and increase velocity

Better **visibility across large teams to reduce delivery RISK**

Understand differences in performance between delivery teams

Deliver **software more dependably**

Embed a culture of continuous improvement around meaningful metrics

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Case study: A global data business looking to increase their delivery velocity in the 'new normal' world…

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Using delivery metrics within an OKR framework to reduce software delivery Cycle Time by >25%

The client context:

- A **multi-national data and publishing business** who use **end-to-end delivery metrics as a key element of their Value Stream Management** across >2,000 engineers globally
- A **specific OKR was created to reduce Cycle Time by 25% in 6 months in H1 2020**

The outcome:

- **Using a variety of metrics** available within the Plandek platform the teams **drove a number of process improvement initiatives**
- The **OKR was met at the end of June 2020 with Cycle Time reduced by >25%**

Using delivery metrics within an OKR framework to reduce software delivery Cycle Time by >25%

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Step 1: selecting 'North Star' metrics…

'North Star' Metric	Agile software delivery objective
1. Cycle Time	Early and continuous delivery
2. Deployment Frequency	
3. Throughput (Delivered Story Points & Value Points)	Delivery of value
4. Sprint Target Completion	Dependability of value delivery

- **Selected by technology leadership** to set direction of continuous improvement
- Based on **key delivery capability objectives**
- **Simple**
- **Meaningful when aggregated**

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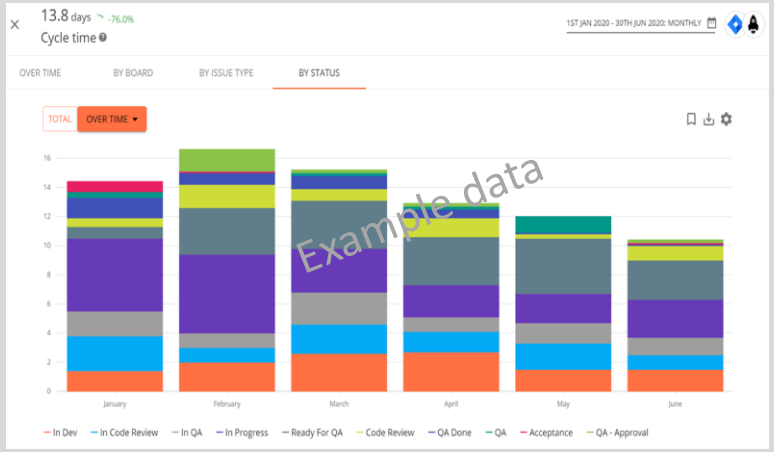
Step 2: identifying Cycle Time as an OKR target…

Step 1 – Agree 'North Star' metrics → **Step 2 – Identify Cycle Time as an OKR target** → **Step 3 – Identify & track determinant metrics** → **Step 4 – buy-in and trust for ongoing CI**

Cycle Time by Status



- **Cycle Time was identified as a key priority** as **time-to-market** was becoming increasingly critical
- An **OKR target was agreed** to reduce Cycle Time by 25% over 6 months in H1 2020
- **Plandek dashboards allowed each team to closely analyse their own Cycle Time** and understand where in the SDLC there was an opportunity to reduce time to value

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Step 3: tracking and improving key metrics that drive Cycle Time to deliver the OKR…

Analysis showed four metrics which could unlock significant shortening of Cycle Times at team level. These were:

1. **Flow Efficiency (%)**
2. **Mean Time to Resolve Pull Requests (hrs)**
3. **First Time Pass rate (%)**
4. **Story Points Ready for Development**

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Step 4: metrics-led continuous improvement in software delivery – buy-in and trust…

Key success factors:

1. The **choice of a simple delivery goal** (a reduction in Cycle Time)
2. The ability to **surface the metric in real time at all levels** within the delivery organisation
3. **Metric transparency to ensure buy-in and trust in the metrics** from Team Leads upwards
4. **Change management support to embed the OKR target in the rhythm of the teams** – stand-ups, retros

"..if Team Leads cannot see how metrics are calculated and that they reflect their team's context – they may reject the metrics – especially if they appear negative."

Plandek