

ACCELERATE YOUR SDLC

INTRODUCING THE BEST™ FRAMEWORK

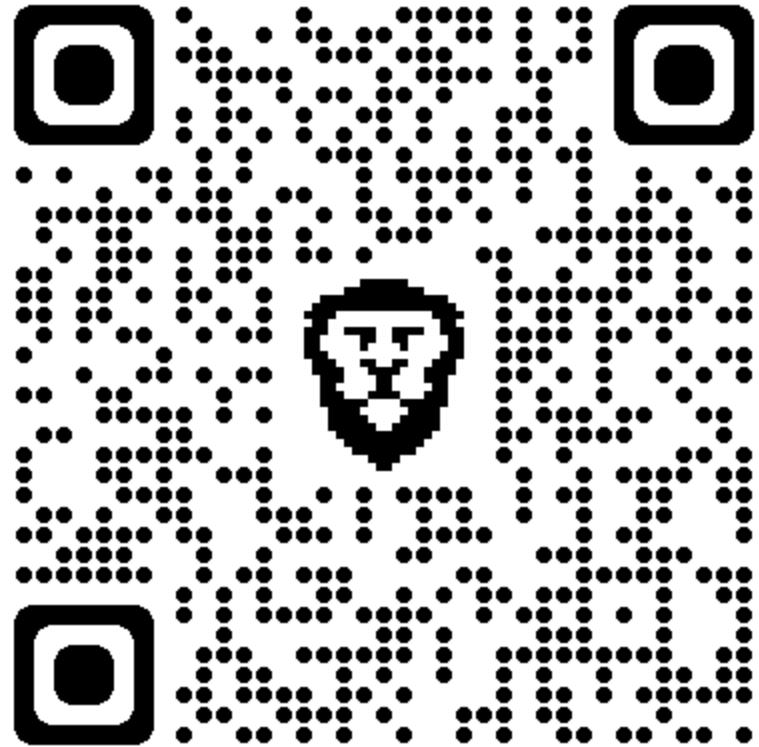
CALVIN HENDRYX-PARKER, CTO

SIX FEET UP

IT LEADERS INDIANAPOLIS 2023



SOURCE SLIDES/PRESENTATION



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JOURNEY

- » 6 Globally Distributed Teams
- » Some Poorly Performing
- » Goal to Improve Delivery Velocity
- » Assumptions:
 - » Poor Test Coverage?
 - » Technical Debt?

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THE DISCOVERY

- » Interviewed 6 Teams
- » Used a sampling of people
- » About 6 hours per team in just interviews
- » Uncovered many more issues

ONE TEAM, MANY ISSUES

Poor score	Average	Good
<ul style="list-style-type: none">• Issue resolution• Access management• Documentation• Instrumentation• Security• Code reviews• Configuration management• Orchestration• Testing• Team Resiliency• Tracking and forecasting• Scaling	<ul style="list-style-type: none">• Coding Standards• SCM• Innovation	<ul style="list-style-type: none">• Powerstation setup• Culture• Training

Prioritizing Investments

» 4 Stages, 19 Units

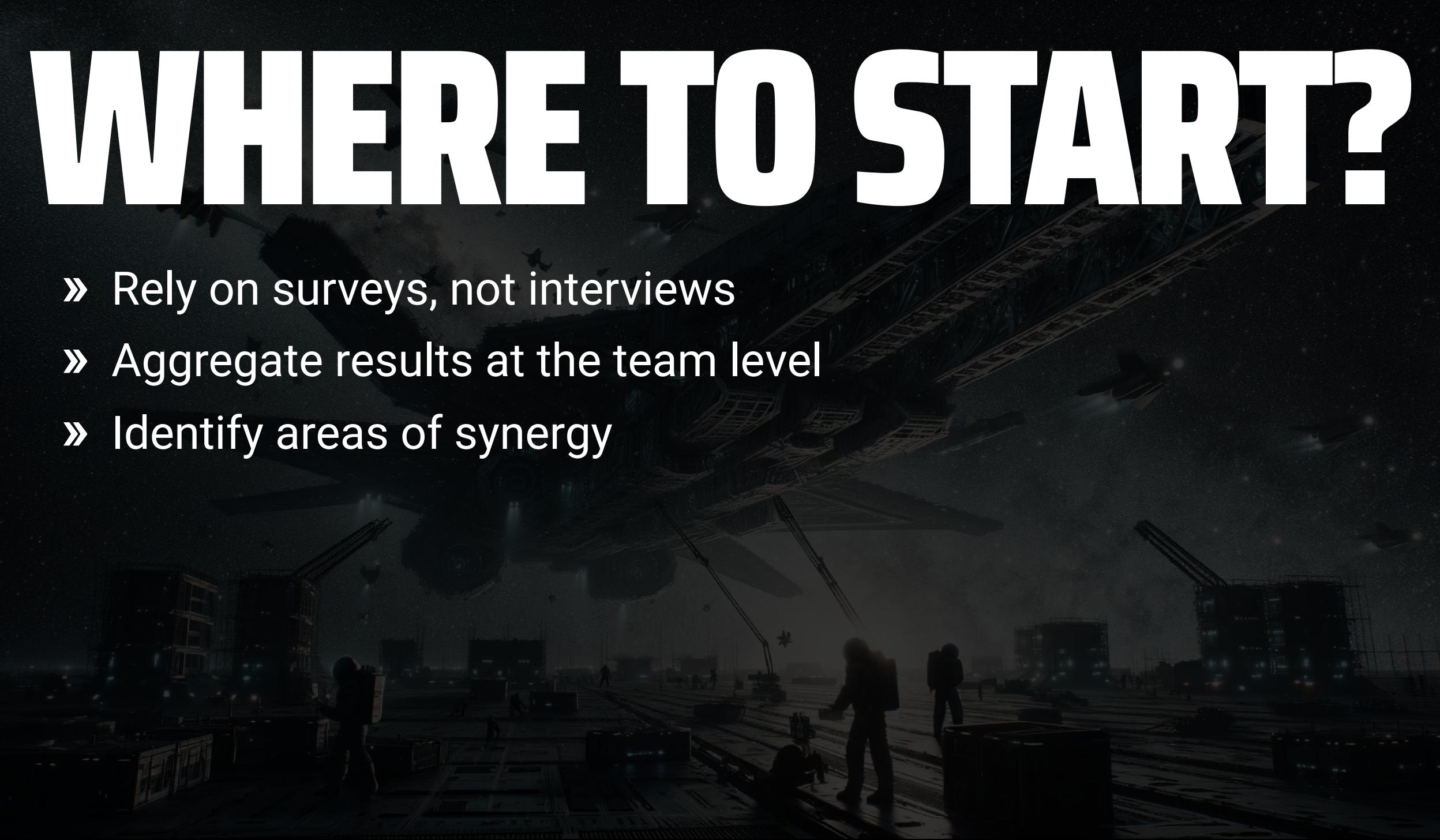
ACT I Build	ACT II Execute & iterate	ACT III Step Up & Automate	ACT IV Accelerate
ISSUE IDENTIFICATION & RESOLUTION Hold L10 Weekly Meetings Start with the end in mind Proactively solve issues	TRAINING Commit to a Growth Mindset Participate in Codewars challenges Practice Git katas	CONFIGURATION MANAGEMENT Leverage Configuration Management "The Rules of DevOps Club" (IaC)	TEAM RESILIENCY Team Resiliency Encourage cross-pollination Encourage cross-discipline training Promote pair-programming Develop a Knowledge And Resource Locator (KARL)
POWERSTATION SETUP Set up Your PowerStation Supercharge your development environment based (IDE, Source Code Management) Document it!	SOURCE CONTROL MANAGEMENT Use Source Control Like Your Life Depends on It Commit code frequently Write good commit messages Commit to a workflow Ensure traceability	ORCHESTRATION Commit to Orchestration Segment your environments Have repeatable deployments (CI/CD) Scale out easily Automate common tasks Respond to events in the environment	TRACKING & FORECASTING Track & Forecast Identify KPIs Report on KPIs
ACCESS MANAGEMENT Audit Your Access Access to specifications Access to source control Access to VPN Access to secrets management Access to API keys Access to communication tools	INSTRUMENTATION Instrument What's Important Begin with orchestrations in mind Collect logs & metrics Configure alerts Set up analytics & reporting	TESTING Test and Run Continuous Integration Run automated tests on each push (unit tests) Separate the build from the run Automatically reject security vulnerabilities Implement code style checks	INNOVATION Think Forward Stay on top of trends Anticipate Innovate
CULTURE Develop a Collaborative Culture Know thyself and thy teammates Ask for and give help Lean in and stand up	SECURITY Right Security Enforce the RIGHT access Practice least privilege Perform regular security reviews		SCALING Dynamically Scale Orchestrate your infrastructure (K8s) Implement Observability and Tracing Instrument Components
DOCUMENTATION Establish Living Documentation Build developer documentation Build project-specific documentation Leverage issue tracker	CODE REVIEWS Code Reviews Select a protocol Establish a cadence Use pull requests Use pre-commit hooks Review best practices		
CODING STANDARDS Adopt Coding Standards The Zen of Python PEP8 Idioms for good code hygiene			

TALE OF TWO TEAMS

» Leverage Cross-Team Pollination

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WHERE TO START?

A dark, atmospheric background featuring a futuristic city skyline. In the foreground, several silhouetted figures of people are walking or standing. Above them, several large, sleek flying vehicles, resembling spaceships or advanced aircraft, are flying through the air, leaving trails of light.

- » Rely on surveys, not interviews
- » Aggregate results at the team level
- » Identify areas of synergy

DIY ASSESSMENTS

- » Identify your best SDLC practices
- » Order them according to priority
- » Develop questions with only 3 options (for ease of scoring)
- » Have everyone take the survey
- » Identify your internal domains of expertise and leverage them
- » Repeat every 6 months and monitor progress

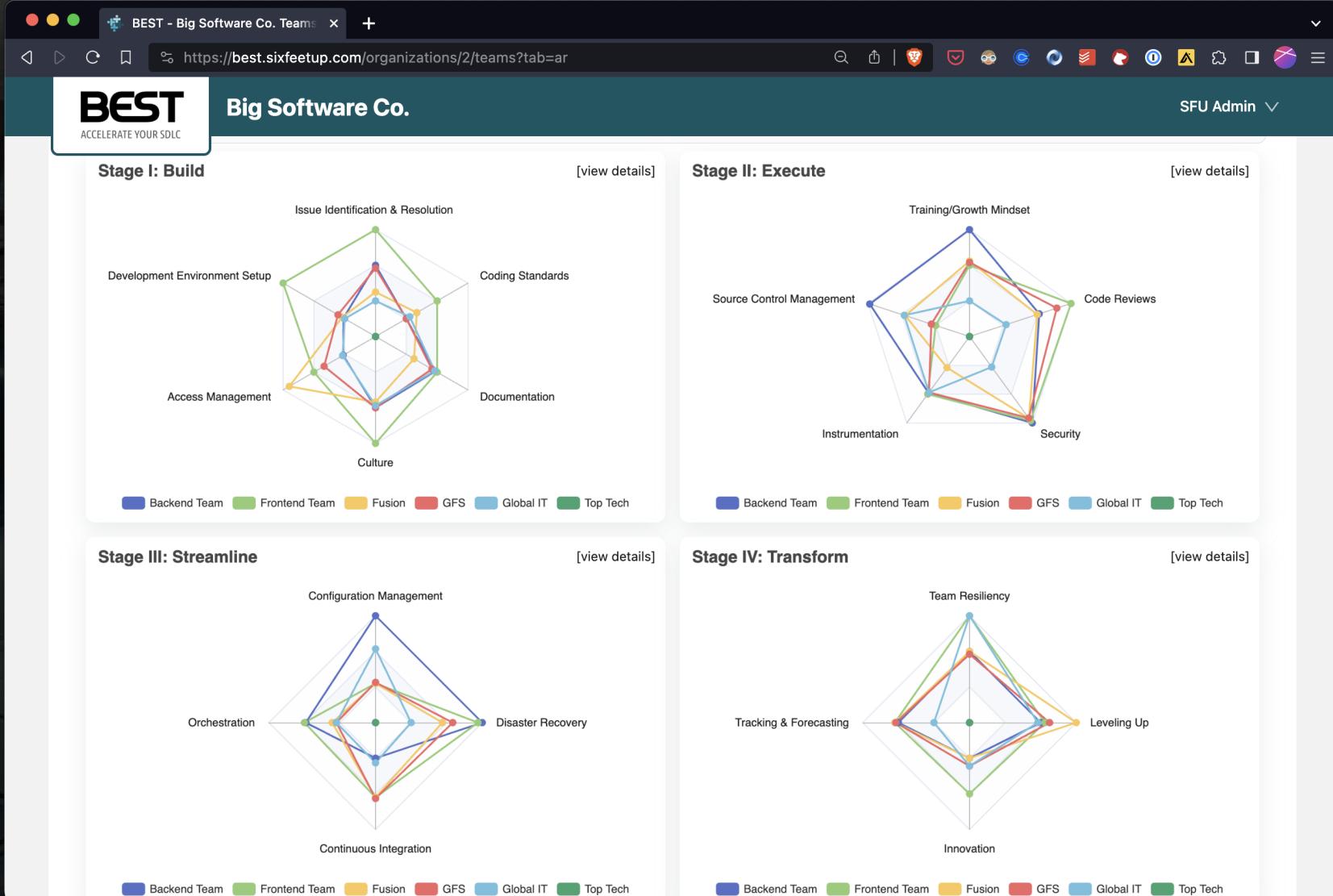
DOWNLOAD OUR 19 BEST™ PRACTICE AREAS



STAGE I BUILD	STAGE II EXECUTE	STAGE III STREAMLINE	STAGE IV TRANSFORM
ISSUE IDENTIFICATION & RESOLUTION Building trust with proactive, reflective improvement.	TRAINING & MINDSET Continuous learning, teamwork, and advanced technologies	CONFIGURATION MANAGEMENT Boost consistency and maintainability	TEAM RESILIENCY Harnessing collective expertise and knowledge
ENVIRONMENT SETUP Streamlining setup, development, and debugging processes	SOURCE CONTROL MANAGEMENT Team-oriented practices for managing code changes	ORCHESTRATION Repeatable, scalable, and automated development and deployment	TRACKING & FORECASTING Tracking, reporting KPIs, and forecasting productivity
ACCESS MANAGEMENT Secure and controlled access to digital resources	INSTRUMENTATION Monitor, analyze, and optimize performance and health proactively	CONTINUOUS INTEGRATION Integrating testing, checks, and security within CI/CD	INNOVATION Agility and responsiveness to the technological landscape and market demands
CULTURE Continuous growth through collaboration and engagement	CULTURE Continuous growth through collaboration and engagement	DISASTER RECOVERY Recovery from disruptions, stressing preparedness and minimal downtime	LEVELING UP Harmonizing technical proficiency with strategic foresight and progress
DOCUMENTATION Knowledge management and traceability	SECURITY Integrating continuous and proactive security practices		
CODING STANDARDS Ensuring the codebase is maintainable, consistent, and understandable for all			

DATA-DRIVEN INSIGHTS





{.stretch}

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EXPLORE FURTHER...



BEST
ACCELERATE YOUR SDLC



TALK TO ME

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