From Test Cases to Context Driven Testing: A Start-up Story

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Referenced resources listed at http://wp.me/p4H3NU-1j

How Did I Get Here?
Some background on my journey as a tester

• 2008 – My first testing book
  – First introduction to context driven testing

• 2009 – Joined Twitter and read blogs
  – Tweeted about general topics, but not testing
  – Discovered testers to follow through community sites like softwaretestingclub.com
How Did I Get Here?

- 2010 – Maintenance mode
  - Employer started downsizing
  - Product put into maintenance mode
  - I still had a job, but wasn’t testing

- 2011 – Seeking a new job
  - Boku welcomed me as their new Senior QA Engineer
  - I was a team of one
  - How can I move towards context driven testing at Boku?
  - You’re about to find out…

The Start-up Days

- The birth of Boku – a mobile payments startup
- No testers (yet)
- An Engineer took ownership of testing
  - Developed test harnesses (a.k.a. simulators)
  - Wrote stability and basic capability tests using JMeter
- Some bugs not found prior to release
  - Time to bring in a dedicated tester
- QA Manager comes on board
  - How are Boku’s products tested?
  - Establish some form of documentation
  - Converted test plans into test cases
The Start-up Days

- Development cycles were 4 weeks long
  - 2 weeks of feature development
  - 1 week of feature testing (code thrown over wall)
  - 1 week of regression testing
- More feature testing to do than can be done by a single tester
  - Recruit Engineers to assist with feature testing
  - Tester handles regression testing
- Released software to production every 4 weeks

My First Year

- Followed the testing program as it had been done before me
- Maintained the test cases but could not increase coverage without scaling up
- Business was growing and more features and products in the works
- Brought in 2 additional testers
- Moved into a management role and passed the torch to the new testers
- Business needs caused impromptu releases
  - Context shifting for developers and testers
Year Two

• Focused on training and skill development of the new testers
• Introduced concepts I learned through the test community
  – Bach’s Heuristic Test Strategy Model (SFDIPO, CRUSSPIC STMPL)
  – FEW HICCUPS
  – Hendrickson’s Test Heuristics Cheat Sheet
• Needed less assistance with feature testing from Engineers
• Post code-cutoff changes were increasing, delaying regression testing
  – A larger test team enabled us to relinquish 1 week of our “QA cycle”
• CAST 2013 via Twitter

Year Three

• Added 2 official “mid-iteration” releases
  – 1 major release and 2 minor releases
• Remained an active blog, article, and tweet reader
• Discovered Karen Johnson’s RCRCRC (regression)
  – Recent
  – Core
  – Risks
  – Chronic
  – Repaired
  – Configuration
The Journey Accelerates

• Shared RCRCRC with my boss
  – It might help find important bugs faster
• Was the current regression suite finding important bugs?
  – Bugs in production
• Time to experiment
  – A/B test RCRCRC against current regression suite
  – Reporting results without using metrics
  – Didn’t publicize just yet
• My findings
• Making it permanent
  – Go rogue or get broad buy-in?

A New Regression Strategy

• Test cases out, RCRCRC in
• Addressing the 6 dimensions of RCRCRC
  – examine the sprint backlog
  – identify the critical components of our products
  – interview developers and product owners
  – examine bug reports
• Metrics out, visual reporting in
  – Bach’s Low-Tech Testing Dashboard
• Broadcasting it
What Next?

- Embrace a heuristic-based testing strategy more fully
  - How would I achieve that?
- Broader socialization and buy-in would be important
  - Who would I talk to?
    - Senior VP of Product, Director of Product
    - Senior VP of Operations
    - Chief Business Officer
  - How would I approach the conversation?
Preparing to Socialize

• Klain’s Talking with C-Level Management About Testing
  – Don’t talk about testing
    • (But I did!)
  – Talk about how testing aligns with the business’ strategy
  – What you want them to know / do

• Priming the executives for the chat
  – In-person invites
  – Email invites

From Start-up to Scale-up

• How can testing support:
  – Onboarding future big merchants
  – More frequent releases
  – Reduction in last minute changes to the release
  – Better collaboration with testers, developers, and product owners
  – Mitigation of risks (revenue affecting especially)
  – Scaling up testing without hiring more testers

• Mention
  – The new regression testing strategy
Show Time

• 3 lunch meetings over 3 weeks
• Everyone understood the basis for proposing change
  • The quality challenges
  • The problems we wanted to solve
• I was given the green light
  • YES!
  • Yikes!
• Continue the socialization with the rest of the company
• Continue growing, learning, and practicing to drive up my confidence level

First Test Conference
CAST 2014

• Reinforced concepts previously learned
  – Fiona Charles – Art and Science of Heuristics
• Echoing back that I was on the right path
  – James Bach – Test Cases are Not Testing: Towards a Performance Culture
  – Alessandra Moreira – My Boss Would Never Go For That: The Art of Persuasion
• Better understand my approaches to leading change
  – Maria Kedemo/Erik Davis – Balancing the Leadership Seesaw
• New friends and peers
• Came back to work on a high
Rapid Testing Intensive Training
Offered by James Bach

Note: Now called Rapid Software Testing Applied (RSTA)

- More reinforcement and new concepts to bring into the workplace
  - Oracles
  - Heuristic Test Strategy Model
  - Simple testing notes
  - Product Coverage Outlines
  - Risk analysis

- Elevated tester confidence and skill
  - Team worked together in new ways
  - Team walked away excited to implement these concepts

Considering Other Tester’s Experiences
Katrina Clokie - Creating a common test approach across multiple teams

**Their Challenges**

- 5 year old test strategy
- Strategy not reflective of actual testing performed
- Testers diverged from strategy in different ways

**My Challenges**

- Test strategy not defined
- Testing focused on functionality / lacking diversity
- Testing activities not very visible outside of test team
Considering Other Tester’s Experiences

Katrina Clokie – A test strategy retrospective

Their Reasons
• Testing might be performed by anyone in a cross-functional team
• Quality of testing varies based on who does it
• Test decisions sometimes made by individuals
• Test practices might be adopted without understanding why

My Reasons
• Testing is performed by testers, programmers, and product owners
• Quality of testing varies
• Testing decisions made by individuals, mostly testers
• Desire to diversify testing

Trying this out after being inspired by @katrina_tester ... So far it’s working ... I think I’m doing it rightish

Sean Cresswell applying Katrina’s experiences

A light bulb moment for me. Time to try for myself
Community Experiences Being Applied

Initiatives | Reinforce
---|---
Justify | Rationalize
Do More | Happens Always
Do Less | Happens Never
Tester | Dev | Other (PM)
The Three Amigos

- A concept I found in the Agile community
- 3 Amigos: Tester, Developer, Product Owner (or BA)
- Provided a forum for questions about testing to be asked
  - Provided a safe/positive space outside of design and technical meetings
- Increased collaboration on testing with development and product team
  - Product had a stronger voice in what was tested
  - Programmer testing got more visibility
  - Better understanding of how tester and programmer testing overlapped
  - Is now a model for how we want our project teams to operate
- Elevated the visibility of testing
  - People started to know what we do and how we do it

I am Here

- A 3 year journey helped:
  - Move from releasing software every 4 weeks to every week
    - Development and testing overlap
  - Elevate the role and visibility of testing in a product development group
    - Highlight that testing is performed by many people, even outside of the test team
  - Skyrocket collaboration within teams
  - Address the larger concerns about quality and risks
  - Improve the professional skills and opened the minds of my testers
- My journey isn’t over yet – I’m still on it and you are a part of it right now
Closing Thoughts

• Be the change that you want to see
  – Don’t wait for an invitation
  – “Dress for the job you want, not for the job you have” – Gary’s Mom

• Implement change incrementally
  – A grand plan isn’t needed in advance, just intention, desire, and initiative
  – A single change is a good way to test the waters

• Build credit in the bank
  – Rapport with decision makers and important people will help advance your cause
  – Establish relationships before you need something from them

• Let your passion shine
  – If you are excited and passionate about testing, others might find it easier to support your endeavors in making testing better
  – Find opportunities to shine (brown bags/demos/impromptu chats)

• Keep tabs on the testing community
  – You’re likely entering waters previously paddled by others
  – Use community advice to help you see possible solutions and actions
  – Peers and community can uplift your confidence – engage with them

• Use change to encourage company-sponsored training
  – Managers may be more likely to approve training or conference attendance if you are undergoing improvements/change
References

- Testing Without a Map (FEWHICCCUPS) (2005) Bolton
- Test Heuristics Cheat Sheet (2006) Test Obsessed
- Explore It! (2013) Hendrickson
- A heuristic for regression testing (2009) Johnson
- Talking with C-Level Management About Testing (2014) Klain
- Test Cases are Not Testing: Towards a Performance Culture (2014) Bach
- Rapid Testing Intensive
- Creating a common test approach across multiple teams (2014) Clokie
- Test Strategy Retrospective (2014) Clokie
- Tweet (2014) Cressell
- Introducing the Three Amigos (2013) Scrum Alliance

Journey with me – I’m Hiring!

http://www.boku.com/jobs

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