

Modern Apprenticeship

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Agile Conference 2008

Craftsmanship over crap!



Software Craftsmanship Summit

- Libertyville, IL
- 2008



SC Manifesto

As aspiring Software Craftsmen we are raising the bar of professional software development by practicing it and helping others learn the craft. Through this work we have come to value:

Manifesto for Software Graftsmanship

Raising the bar.

Not only working software, but also well-crafted software

Not only responding to change, but also steadily adding value

Not only individuals and interactions, but also a community of professionals

Not only customer collaboration, but also productive partnerships

That is, in pursuit of the items on the left we have found the items on the right to be indispensable.

Panon the undersi



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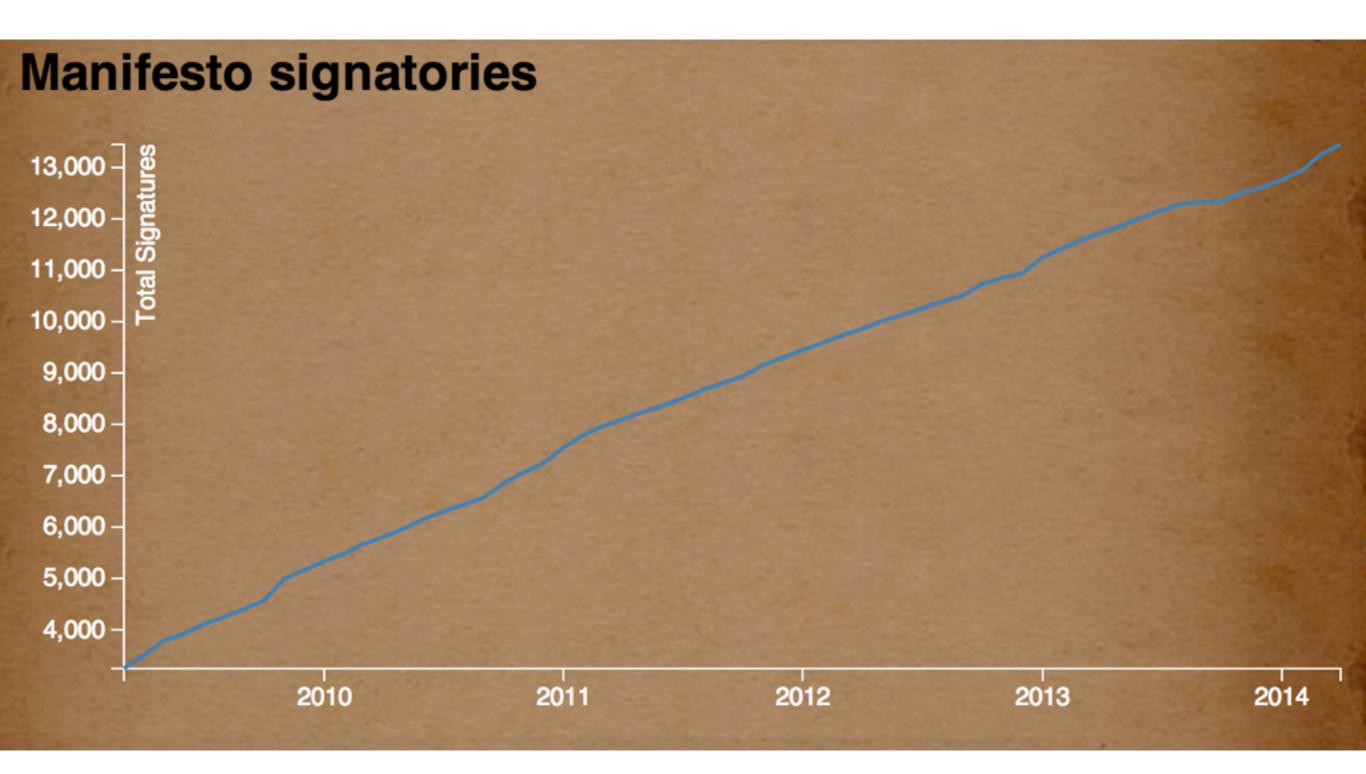
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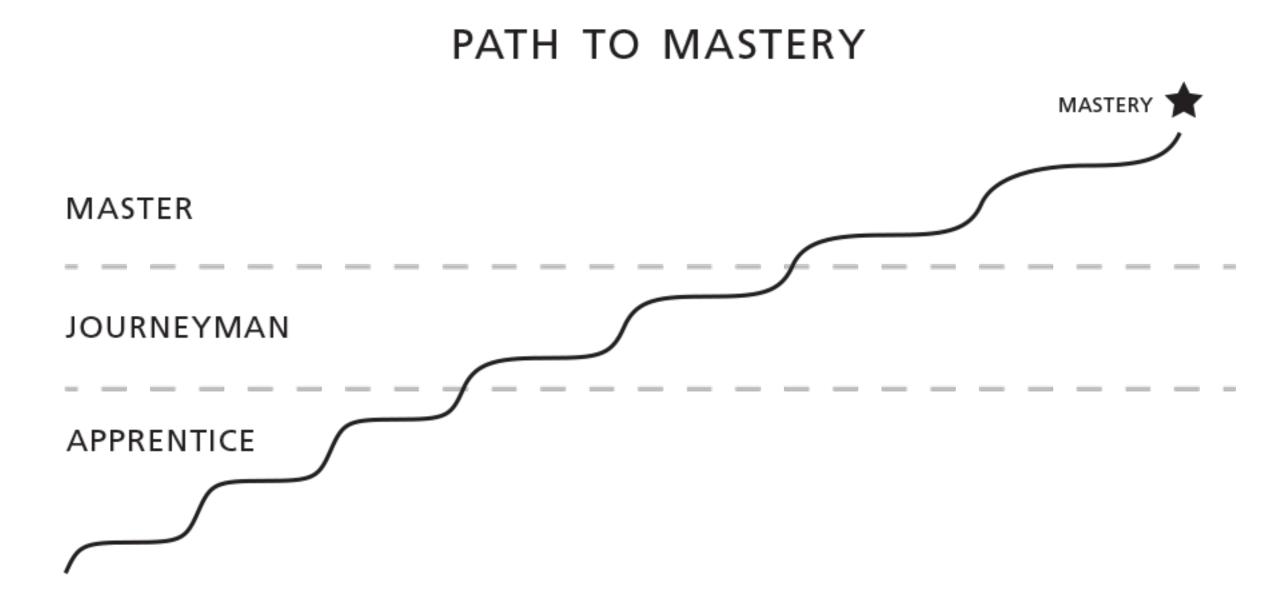


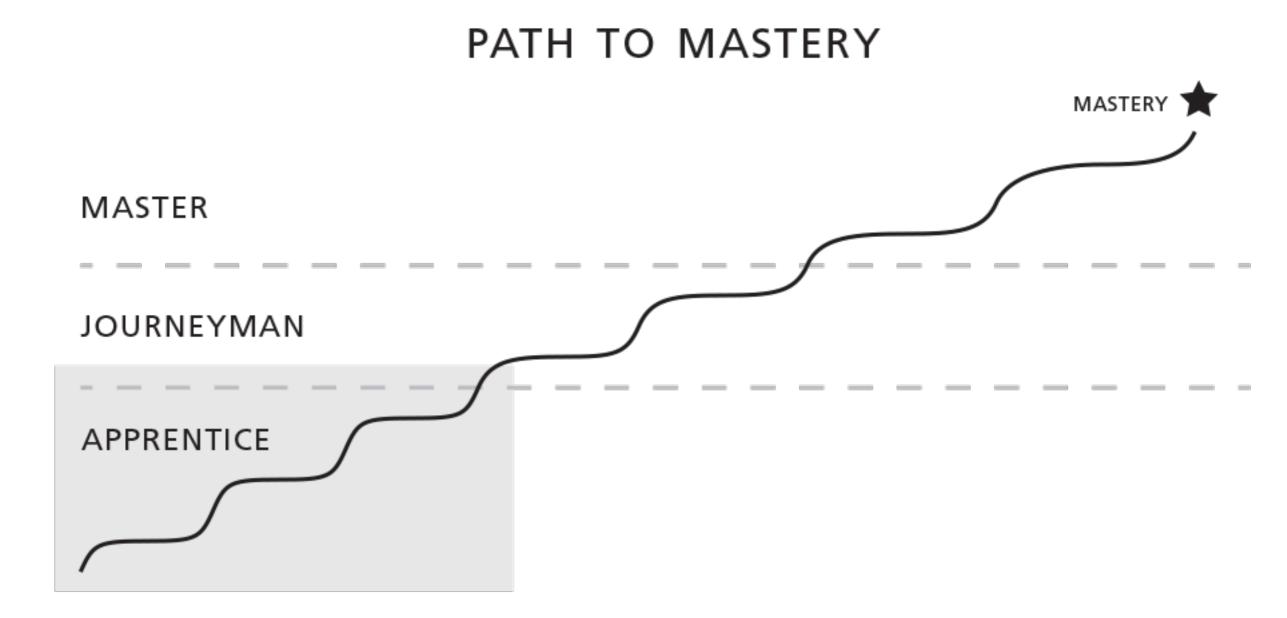


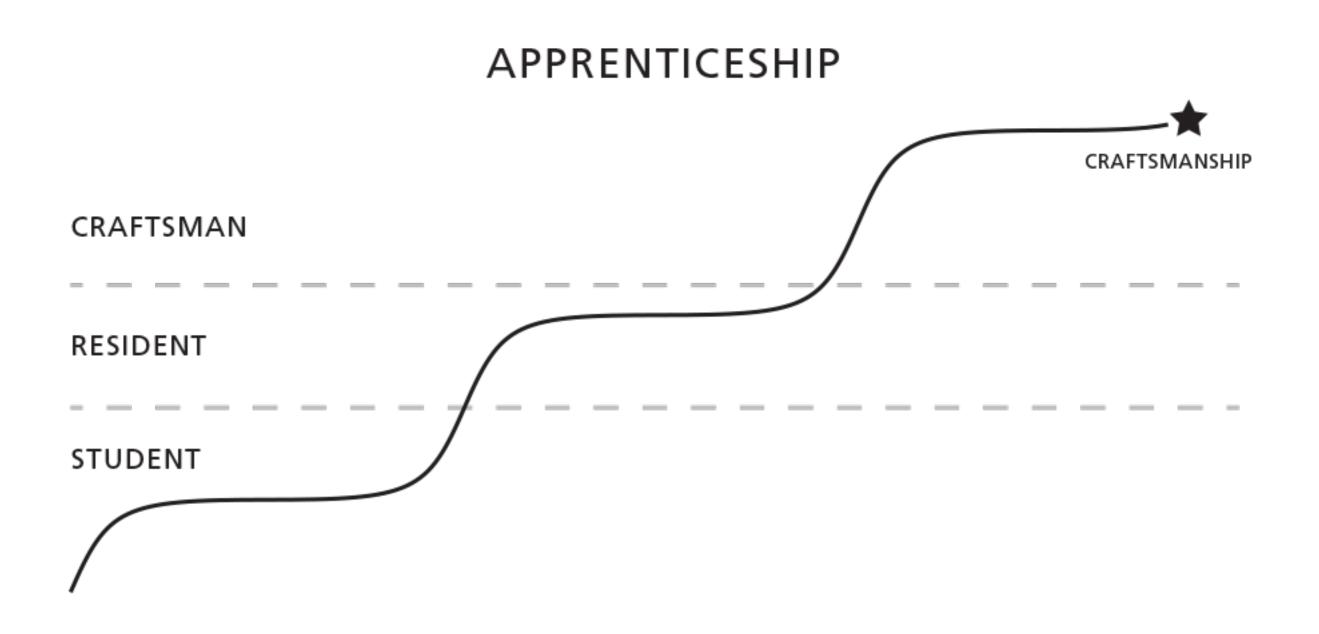
Modern Apprenticeship in the wild

8th Light Apprenticeship

8 Years, 82 resident apprentices Average 5 months 100% of new craftsmen since 2010









Student

- Internship
- College
- Boot camp



Student

- Immersive learning
- Theory and practical
- Teacher driven



Student

Goal is to find vocation

Vocation – Apprenticeship

Vocation is the deliberate decision to combine your passions and aptitude to a life-long pursuit of craft.

Vocation – Litmus

"Code is an end in itself, not just a means."

-Brian Marick

Code Schools

"Become a professional in 12 weeks." "Buy a house with no money down."

Code Schools



7 Resident Apprentices



Resident

- Training focused
- Entry level employment
- Apprenticeship programs



Resident

- Deliberate practice
- Teaching / Mentoring
- Working on a team



Resident

 Goal is finding a mentor relationship and a curriculum.

Mentor

Humanizes the material and can use empathy to create motivation or inspiration.

Mentor - Relationship

- Meet weekly
- Support
- Skill assessment

Curriculum

- Toolsets
- Frameworks
- Paradigms
- Languages

Practice – Types

- Breakable toys constrained wild
- Concentration pomodoro, pairing
- Shared experience HTTP Server



Craftsman

- Working on a project
- Delivering quality code
- Full time employment



Craftsman

- Learning professionalism
- Code of ethics
- Building intuition



Craftsman

Goal is professionalism

Suzuki Method

Professionals are not self-taught. Learning to be a professional is learning tacit knowledge from professionals.

Intuition

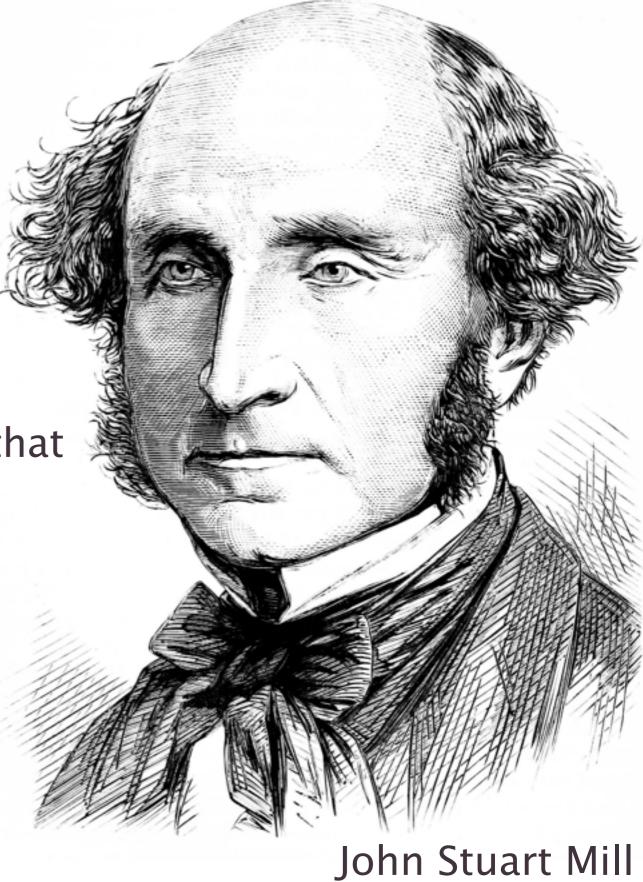
- System 1 vs. System 2 thinking
- Concentration pomodoro, pairing

Software code of ethics

Purpose

"In the end [craftsmen] are not loyal to a particular boss or even to a company but to a set of values they believe in and find satisfying." —Goran Lindahl

Proper course of action is the one that maximizes utility and reduces suffering.



Strong practices, weakly held

Across every craft, perfection is defined externally. It isn't up to us to define; it's up to us to discover. We teach the apprentices the best utility tools and frameworks, for now. "Act only according to that maxim whereby you can, at the same time, will that it should become universal law"



Immanuel Kant



• We do X.

• We do not do Y.

 We continually master a variety of technologies and techniques.

• We do not let unfamiliarity dissuade us from using the best tools.

- We embrace differences of opinion and personality.
- We do not allow our current practice to impede improvements.

- We teach anyone with the willingness to learn.
- We do not hoard our knowledge or practices.

 We take responsibility for the correctness of our code by testing it thoroughly.

• We do not tolerate preventable defects.

Leader/Employer responsibility

To have a great and diverse team in software, you have to make that team.



Thanks! questions?