



Agile Garden Development

by Amanda Muñoz

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Hi everyone! My name is Amanda Muñoz and I'm a software engineer and consultant at Pivotal Labs here in Cambridge. At Pivotal, my day to day is building software using our twist on agile and extreme programming methodologies.

Iteration

Incremental Steps

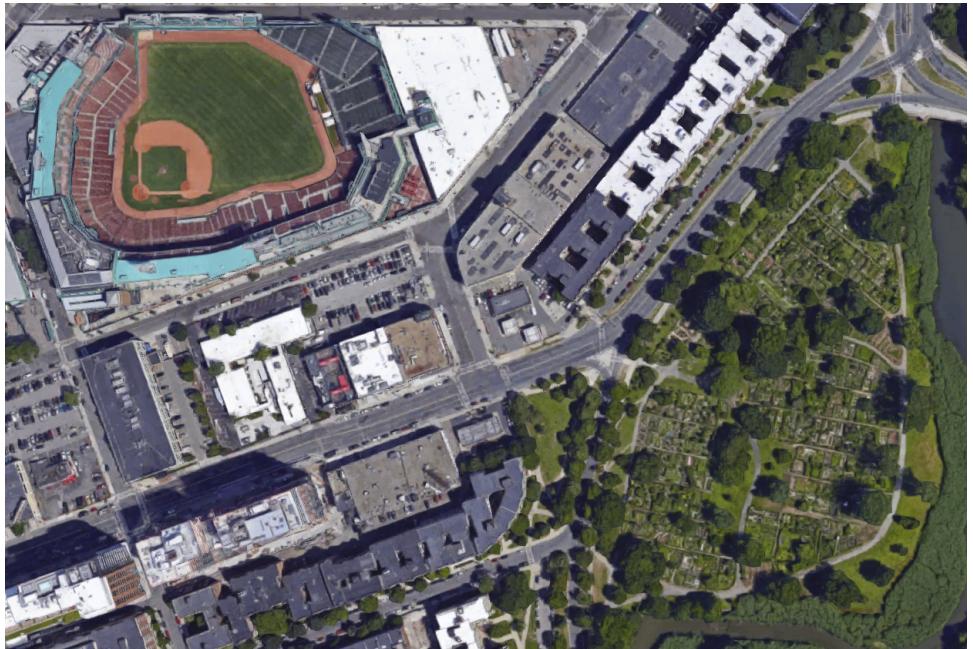
Collaboration

The exact definitions of agile or extreme programming are super important if you're unfamiliar with the terms. The most important parts to me when building software is doing so by constantly iterating on ideas, working in tiny, incremental steps, and working in a highly collaborative environment. Since being immersed in an environment that values these software practices, I've found myself thinking in this agile way both in and outside of work, and applying it to non-software projects.



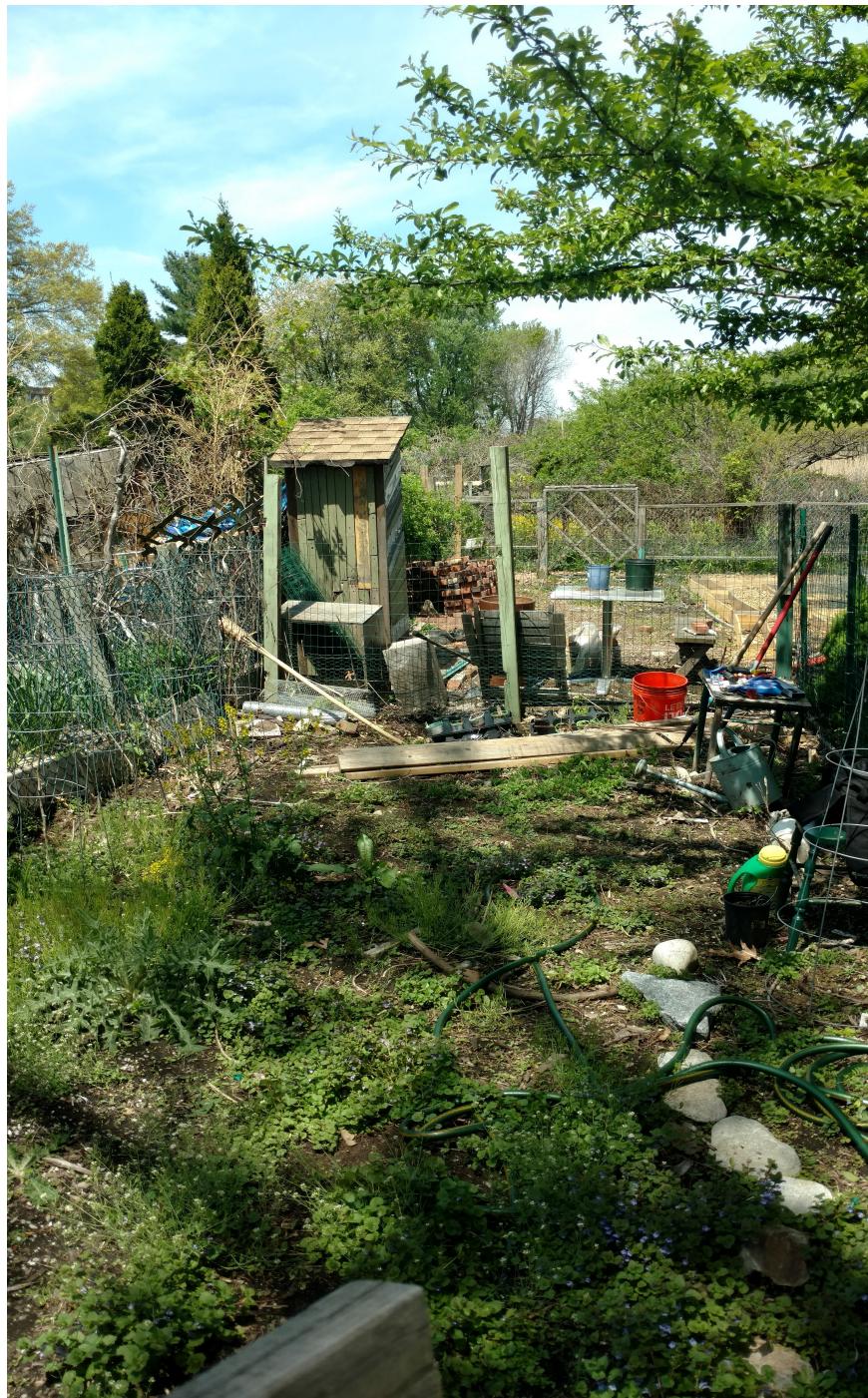
This talk is about how I used the tools that I and so many of us use to build effective software to build a community garden. I'm going to tell the story how I tried to build up a garden, failed in some ways, and re-tried with more success using these agile principles.

The Fenway Victory Gardens Est. 1942

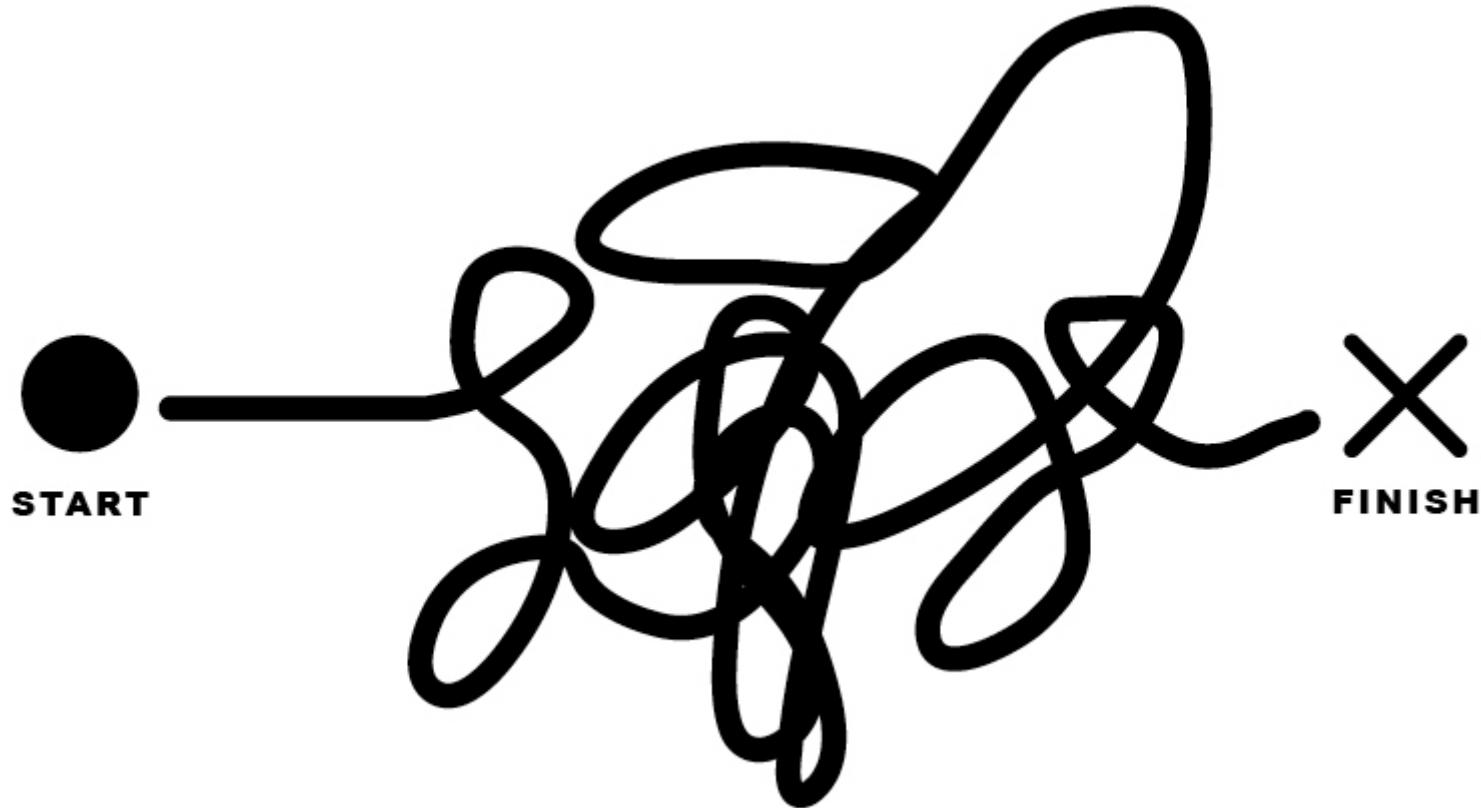


Imagery via Google Maps

In April 2016, I moved to the Fenway neighborhood in Boston and immediately joined the waitlist for a Fenway Victory Garden plot. The Fenway garden Society is a volunteer-run organization, and the gardens are the oldest continuously operating World War II Victory Gardens.



I was lucky and got off the waiting list right away, but the plot was a fixer upper. I had a ton of work to do to make the overgrown, unmaintained plot I was assigned the urban oasis I had always dreamed of.



Imagery via Total Body Workout

That first season, I didn't know where to begin. I had a general plan to have a nice garden but no concrete goals. I would bite off too much and leave projects unfinished. I was feeling unaccomplished by not achieving small wins.



I did learn some lessons that first season, though. I realized how valuable and how much more enriching my garden membership was when I got to know some of my fellow gardeners. My neighbor noticed how much work needed to be done in my plot, and advised us to plant something, anything, so we could have something to enjoy while working. We planted some tomatoes, and



did end up having a good tomato harvest.

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I approached the next season with the lessons from the previous season, and this new lean, agile mentality. I decided to apply some of the principles that were so successful to build software products to building my garden.

Iteration

I iterated on ideas. I would try things and move on if they didn't work out.



For example, I got the idea in my head to plant a bunch of seeds and grow my own seedlings. Seedlings are little baby plants that are typically grown inside, like in a greenhouse, to then be planted outside.



I thought the sunny window ledges in my apartment would be great for growing seeds, but my cat Boston also thought it'd be a great to rip out the little green growths and kick around the sacks of dirt.



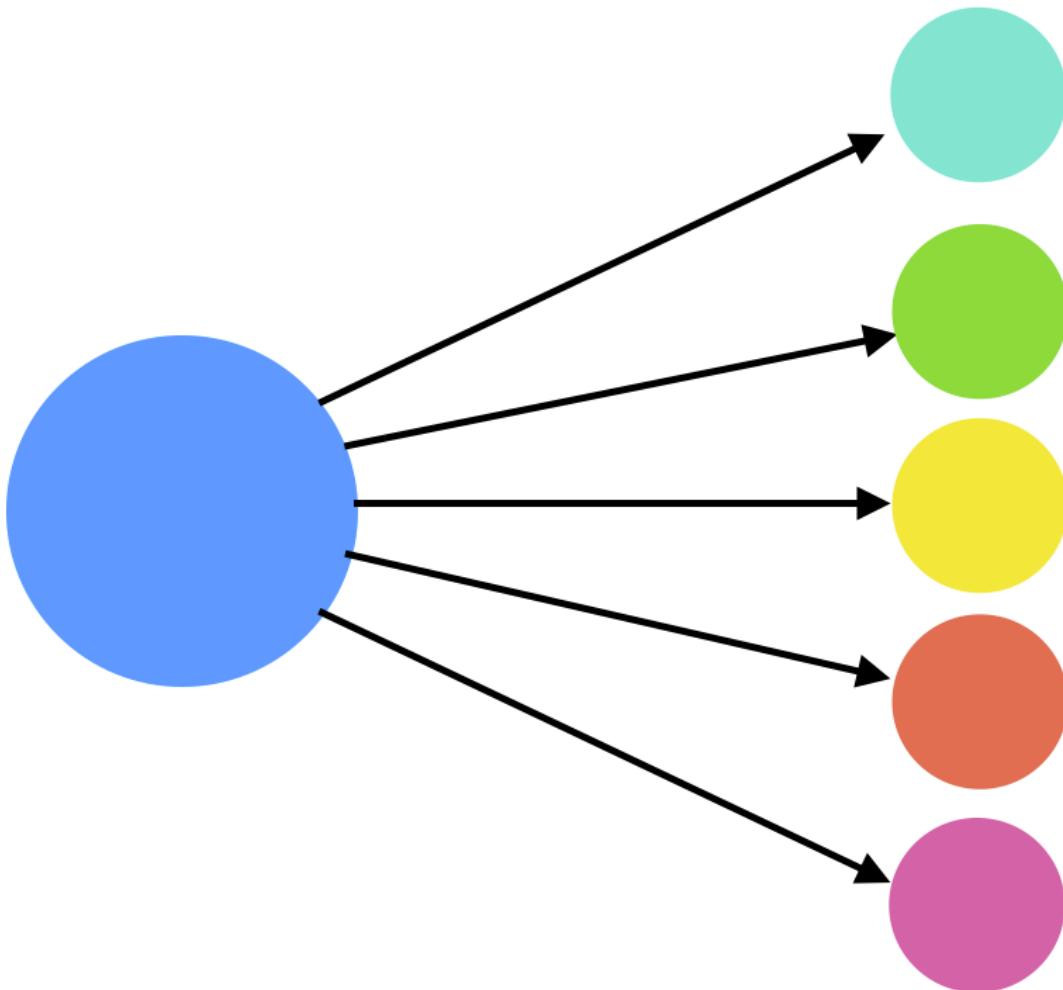
...so, that didn't work out as I hoped, and I ended up buying more seedlings from the store at planting time. I did have a few that survived, though, and I was happy to have given myself permission to try and fail.

Incremental Steps

Another thing I did was I broke projects down into tiny, incremental steps. I'd turn one to-do list item into as many smaller, atomic to-do list items as possible.



For example, I bought a dahlia bush and needed to plant it.



In breaking down the task of planting the dahlia bush into as many sub-tasks as possible, “plant dahlia bush” turned into: clearing a spot, digging a hole, fertilizing the soil, actually planting the bush, and mulching around it. I turned one task into five smaller ones. The satisfaction in checking off each of these items kept my momentum and motivation strong. There is a lot of power in achieving small wins.

Collaboration

A lesson I had learned the previous summer was that my community was one of my most valuable assets. I talked to more gardeners in my garden society, and learned we have quite the group of gardeners at work. I was able to get tips from people, like how you can buy fox urine at the gardening store to repel rabbits.

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Through iterating on ideas and plans, working incrementally, and collaborating with my community, things we often talk about in tech, building my garden was a much more fun and productive process. I encourage you to take these principles, and try them out on your technical and non-technical projects.





Here is the before picture of the garden plot. On the left is it in 2016 when I first got it, and on the right is it in late May of this year



Thank you!

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