



Project Management Methodologies

Use Agile and Lean to manage the lifecycle of a digital product

Session 1: Iterating to Minimize Project Risk and Uncover Consumer Value

Lesson 1: A brief overview of agile and lean project methodologies, how and why they evolved, and several corporate case studies

Lesson 2: Understand common techniques and principles of Scrum, Kanban, and XP and the conditions in which they're most applicable

Lesson 3: Explore viable, competitive product ideas using purpose-based alignment models while generating quantified costs and benefits

Assignment: Choose a digital site or product that you use often. It could be your preferred news source, streaming service, or an app on your mobile device. What do you like about this product, and why? What could be improved? What features do you notice on competitor products, and what makes those features unique or interesting?

Use your observations to describe high-level theoretical features and improvements that you would suggest for a future update for your chosen product. Analyze and refine these ideas according to the competitive alignment model and your understanding of the main demographic and competitors.

Note: We will spend the rest of the class expanding your initial ideas while reviewing the key activities of a sample agile project. It's recommended that you choose a suitable product in a market sector that interests you!

Session 2: Project Inception and Planning Techniques

Lesson 1: What questions are used to generate ideas and brand statements while identifying key user motivations and desired outcomes?

Lesson 2: What techniques and feedback loops are used during inception sprints to validate ideas with users?

Lesson 3: How do we define and achieve success? What are the most valuable aspects of our feature? What are the most risky or costly elements? What could go wrong? What risks will we accept before we begin development?

Assignment: Considering your chosen product and list of desired improvements, identify some specific user motivations, map out a user's desired usage flow, and create some ideas with optional accompanying sketches that address those needs.

Session 3: Capturing Priorities and Context

Lesson 1: Learn how to create decision-making roadmap tools with your team and stakeholders. Use story-mapping techniques, feature epics, and release planning to generate an initial MVP (minimum viable product).

Lesson 2: Prioritize stories, technical debt or risks, and ideas using matrixing and MoSCoW techniques. Learn the hallmarks of clear, actionable requirements and stories.

Lesson 3: Learn how stories are presented to teams for estimation, including facilitating "grooming" and prioritization sessions for an iteration backlog, giving the team as much context and insight as possible to plan and complete their work.

Assignment: Create a high-level release roadmap and spanning several epics, including block of prioritized, actionable stories. Describe the main themes and priorities for the upcoming iteration.

Session 4: Focus, Feedback, and Delivery

Lesson 1: Learn about constraint techniques which improve focus and quality during development, including velocity measurement, work-in-progress (WIP) limits, iterating, prioritizing, zero bug limits, and Definitions of Done.

Lesson 2: Gather team and customer feedback on the product during an iteration demo; learn how the outputs of the demo help teams determine whether to release the product or make adjustments in the next iteration. Consider methods in which post-release feedback and metrics are used to influence future release requirements.

Lesson 3: Learn about the end-of-sprint retrospective, a regular opportunity for the team to discuss what went well, what could be improved, and what course corrections are needed.

Assignment: Whether from your own career or from a case study, cite an example where a constraining technique was either used effectively or could have been helpful. Hold a personal retrospective for this class using one of the formats provided.