6.033 DP Prep Assignment, Spring 2022

Due: February 25th, 2022 Length: 750-1000 words Submit: On Canvas

Introduction

The DP Prep assignment is the first Design Project deliverable. This assignment is an opportunity for you to engage with the DP Spec and the Impact Framework that we'll be using alongside it. You won't be proposing your own design yet, but instead getting familiar with the requirements of the project.

This is an individual assignment, which means that your writing should be your own. But you are encouraged to discuss these issues with your DP teammates once they're assigned.

The Impact Framework

As you design your system, it will be important to think about the **impact** of your design decisions: both on properties such as performance, fault-tolerance, scalability, etc., but also on people. To help you think through the impact of your decisions on different groups of people, you'll use the <u>Impact Framework</u>. This framework utilizes a series of prompts, worksheets, and other tools to aid you in thinking critically about who is affected by your system, and how.

You'll return to the Impact Framework repeatedly throughout the design process; it's meant to be iterative. For this assignment, you'll be using steps 1.1-1.3. Use the prompts given in those steps as a tool to complete this assignment; you do **not** need to submit separate answers to any of the prompts.

Assignment Description

In this paper you will summarize key facts and definitions from the DP Spec, analyze that information to explain the design priorities, and finally identify questions you have about the proposal to better inform your design.

The introduction should explain the purpose of your document, which is to summarize key elements of the DP Spec and explore areas for further questioning. You should also outline the structure of your paper for the reader.

The body of the paper should summarize the desired system, overview its most important use cases, system behaviors, and desired properties. Evidence from the DP should be used and cited for each of these elements.

You should then evaluate the priorities and impact of the system as you understand it. Which use cases and behaviors are most crucial? Why? Which properties matter and which are less important? Drawing on sections 1.1-1.3 of the Impact framework, explain what domains are impacted by this system? What are the best and worst outcome(s) of this system?

Finally, you should provide a list of evidence-led inquiries about the DP. These should be robust questions that utilize facts and definitions from the DP description to ask for additional information and clarification. (We'll post an FAQ by 3/4/2022 that answers many of these questions.)