

Exercise 3.2: Identify and setup measurement techniques for reducing cognitive load

For this exercise, we want you to create a backlog of ten potential platform capabilities that can help reduce the cognitive load.

We would like you to create a table in the following format.

Table 3.3 Sample table to be used for tracking the cognitive load issues and the platform capabilities that can fix the issue

Cognitive load issue	Platform Capability that can fix the issue	How will it solve the issue?	Effort in person weeks
.....
.....

Solution

The solution to this exercise will be a table with ten entries similar to the example given below.

Note that column 3 is a high-level overview of how to solve the issue and would typically require a more detailed analysis to be accurate. The same thing goes for the effort in person weeks. You just need to provide a high-level swag to help set the context. In most cases, you might want to give a T-shirt size estimate for this effort.

Cognitive load issue	Platform Capability that can fix the issue	How will it solve the issue?	Effort in person weeks
Developers often have to switch between multiple tools and environments to manage their workflows, such as coding, testing, debugging, and deploying. This frequent context switching can significantly increase cognitive load, leading to reduced productivity and increased risk of errors.	An IDE that integrates all necessary tools and environments into a single interface. Key capabilities would include: <ul style="list-style-type: none">• Source control management• Continuous integration and deployment pipelines• Built-in code analysis and testing tools• Real-time collaboration features	The solution will solve the issue across four axes. <ol style="list-style-type: none">1. Unified Interface2. Seamless Integration3. Automation Features4. Collaboration and Remote Work	Research:2 Core Features:6 Testing:4 Deployment /Enablement:2