

Project Release-3 Requirements

Submission Deadline: July 20th 2022

In Release-2, you implemented functionality to create and manage *workspace* and *boards*. Your project is now ready to add *tasks* related features. In this final iteration of your project, you will be developing the following features.

Feature details

Task Management

- a. **Create tasks:** Create tasks in the form of cards. Note that tasks are a part of boards and a workspace contains any number of boards.
- b. **Date field:** Create a date field for a task; it is used as due date for the task.
- c. **Assign tasks to members:** Assign a task to a team member belonging to the workspace.
- d. **Change status of tasks:** Allow users to change the status of tasks. For example, a user should be able to move a task from *To-Do* list to *Doing* list. Any user who is a part of the workspace can change the status of the task. Obviously, changes in the status are persistent (i.e., another user should be able to see the changes).

Search and filter

- a. **Search tasks:** Search for task cards based on task names. You would have a search box on the same page (i.e., board page where you are displaying the tasks in lists).
- b. **Filter tasks:** Filter the tasks based on the due date. You will offer at least three filters.
 - a. Due today
 - b. Due in this week
 - c. Overdue

Other requirements

- a. You are expected to have test cases for the backend with min. 70% line coverage. You need to have test cases for business logic; you may use mocked database objects wherever necessary.
- b. Working CI pipeline (both compile and test stages are passing without any issue).
- c. Run DesigniteJava on your backend code. Prepare an Excel sheet where you will analyze each reported smell (all except testability smells) and provide a justification.
 - o If the identified smell is genuine, you will refactor the smell and write “Refactored” in justification.
 - o If the identified smell could not be refactored, justify your understanding.

Marking Rubric

	The task is complete with at least 70% code coverage	75% of the task is complete with test cases	50% of the task is complete with test cases	25% of the task is complete with test cases	Neither the task nor test cases are complete
Create tasks	3	2.25	1.5	0.75	0
Date field	2	1.5	1	0.5	
Assign a task to a member	3	2.25	1.5	0.75	0
Change status of tasks	3	2.25	1.5	0.75	0
Search based on task names	3	2.25	1.5	0.75	0
Filter based on date	3	2.25	1.5	0.75	0
Working CI pipeline	2	1.5	1	0.5	0
Smell analysis and refactoring	5	3.75	2.5	1.25	0