

# Partial Project Delivery

**Manuel Ricardo Guerrero Cuéllar**

**code:** 20231020078

## **Description**

Nully is a web-based task management application that makes it easy to organize and collaborate on projects. You can efficiently create, edit, and track tasks for both individual and team projects with its intuitive and flexible interface.

## **Key Features**

- **Dashboard Creation and Management:** Users can create custom dashboards to organize their projects and tasks.
- **List Creation and Management:** Within each dashboard, users can create lists to categorize and organize their tasks.
- **Card Creation and Management:** Cards represent tasks and can be created, edited, and moved between lists based on progress.
- **Comments on Cards:** Users can add comments to discuss task details and collaborate with team members.
- **Users can create custom tags** to categorize and prioritize cards within each board.
- **Nully allows multiple users** to collaborate on the same boards and cards simultaneously, with real-time changes.
- **Security and Authentication:** Implement a secure authentication system to ensure that only authorized users can access and modify application data.
- **User Interface:** Design an intuitive and attractive interface that allows users to navigate and use all application functionalities efficiently.

## **Nully's objective**

is to offer users a versatile and robust task management tool that enhances productivity and teamwork in both individual and group projects.

## **Stakeholders:**

- The application is designed for work teams in various fields, including software development, marketing, project management, and education, who need a tool to manage and collaborate on projects and tasks.
- It is particularly useful for people responsible for coordinating and supervising projects, as they can use the application to plan, assign, and track their team's progress.
- The application is designed for individuals who own businesses or startups and need a tool to efficiently organize and manage their projects, teams, and tasks.
- Teachers and students can use the application to organize educational projects, assignments, and homework while promoting collaboration and teamwork.

## Business Model

- **value proposition:**  
Nully provides an intuitive and flexible task management platform that helps users efficiently organize, collaborate, and manage projects, improving productivity and collaboration across teams and individual projects.
- **Customer Segment:**
  - Work teams in various industries and freelancers looking for a tool for project and task management.
  - Entrepreneurs and business owners who need to organize and manage their projects and teams effectively.
  - Educators and students looking for a solution to organize educational projects and homework.
- **Key Activities:**
  - Application Development and Maintenance: constantly updates and improves the application.
  - Customer Support: Responds to inquiries and troubleshoots problems.
  - Cost Structure:
  - Development and Maintenance: Development costs, updates and bug fixes.
  - Infrastructure: Server and cloud storage costs.
- **Key Partners:**
  - Integrations: Collaborate with other tools (such as Google Drive, Slack, etc.) to provide a complete experience.
  - Companies and Organizations: Establish partnerships with companies that can benefit from your app.

## tools to use

- Frontend:
  - Next.js and React: Next.js is a React framework that makes it easy to create fast, scalable web applications. React is a widely used JavaScript library for building interactive user interfaces.
- Backend:
  - Prisma: Prisma is an ORM (Object-Relational Mapping) tool for modern databases. It allows you to interact with your database securely and efficiently using an intuitive application programming interface (API).
- Database:
  - MongoDB: MongoDB is a flexible and scalable NoSQL database that is well suited for modern applications such as Nully. Its document structure and horizontal scalability make it ideal for storing data efficiently.
- Development Tools:
  - Visual Studio Code: A powerful code editor that is widely used by developers around the world due to its wide range of extensions and features.
  - Git and GitHub: Git is a version control system that allows you to keep track of changes to your code. GitHub is a code hosting platform that facilitates collaboration and teamwork in software development projects.
- Design Tools:
  - Figma or Adobe XD: These are popular tools for user interface design and application prototyping. They allow you to create visual designs and interactive prototypes for your application.

## **User Stories**

- As a user, I want to be able to register in the application to access all its functionalities.
- As a user, I want to be able to log in to my account to access my personalized dashboard.
- As a user, I want to be able to add lists to a dashboard to categorize my tasks.
- As a user, I want to be able to add cards to a list to represent my individual tasks.
- As a user, I want to be able to edit the title and description of a card to update the information of a task.
- As a user, I want to be able to move a card between lists to change the status of a task.
- As a user, I want to be able to add comments to a card to discuss specific details of a task.
- As a user, I want to be able to add tags to a card to categorize and prioritize my tasks.
- As a user, I want to be able to assign a due date to a card to set a deadline for a task.
- As a user, I want to be able to search and filter cards by tags, due date and other criteria to quickly find the information I need.
- As a user, I want to be able to share boards with other users to collaborate on team projects.
- As a user, I want to be able to mark cards as completed to track the progress of my tasks.
- As a user, I want to be able to delete cards and lists to clean up my board when necessary.

## **Generate test data**

- Use libraries such as Faker.js in JavaScript to generate realistic fake data. Faker.js allows you to create names, addresses, emails, dates and other types of fake data easily.
- use pre-existing test data that can be found using Google Dataset Search which provides access to a wide range of datasets in various areas together with the great advantage that Prisma and MongoDB offer tools for data migration.