Kristianstad University
SE-291 88 Kristianstad
Sweden
+46 44 250 30 00
www.hkr.se

Agile Working - Project idea

Pineapple Planner

Max Sellick, Varvara Aladyina, Deinoras Krasauskas, Azhaf Kahn, Simon Ostini

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Programme
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Authors
Max Sellick, Varvara Aladyina, Deinoras Krasauskas, Azhaf Khan, Simon Ostini

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Contents

1 Task 1

This report focuses on our task management project "Pineapple Planner". It is a task management tool with integrated calendar, todo list which aims to minimize stress in order to help completing daily tasks and improves personal productivity. We are going to build a desktop application. Our application aims to contribute to structure peoples lives and to help them achieve their daily goals.

2 Task 2

Considering ethical aspects and social responsibility in the development of the Pineapple Planner desktop application is crucial to ensure fairness, accessibility, and user trust. Ethical principles help create a product that respects user privacy and promotes inclusivity.

One key consideration is data privacy and security. Task management applications often store sensitive personal information, so implementing strong data protection measures aligns with ethical guidelines such as the General Data Protection Regulation. Ensuring that user data is stored securely in a Firebase store and not exploited for commercial gain fosters trust and transparency. [1]

Additionally, our application should avoid manipulative design and addictive features that pressure users. Dark patterns, such as misleading notifications, excessive reminders, or barriers to account deletion, must be eliminated to ensure user control. Instead, the design should promote productivity without fostering dependency. To support ethical use, the application should offer customizable notifications, break reminders, and transparent data policies. Clearly explaining data usage and providing simple consent options will reinforce trust and align with ethical standards. [2]

3 Task 3

a) We plan to develop the Pineapple Planner app with scalability and usability in mind. By using Domain-Driven Design (DDD) with C#, WPF, and Blazor, the system will be modular and easy to maintain, allowing the integration of new features over time if required. The combination of WPF for desktop and Blazor for web components will ensure a user-friendly and responsive interface. Technically, our infrastructure allows easy migration to cross-platform usage. With C#'s strong type safety and GitHub's CI/CD pipelines, the app will maintain data integrity and deliver stable updates. Lastly, we will strongly profit from JIRA's structured project and task management.

b) We intend to build a C# WPF application that integrates a Blazor web appplication as an external assembly. The Blazor app accesses data from a database through queries and commands (CQRS) which are implemented in the application layer assembly. The application layer accesses our entities that are defined in the domain layer. Generally, it can be said that we plan to use a microservice architecture according to the Domain-Driven-Design (DDD) infrastructure pattern also known as the *Onion architecture*.

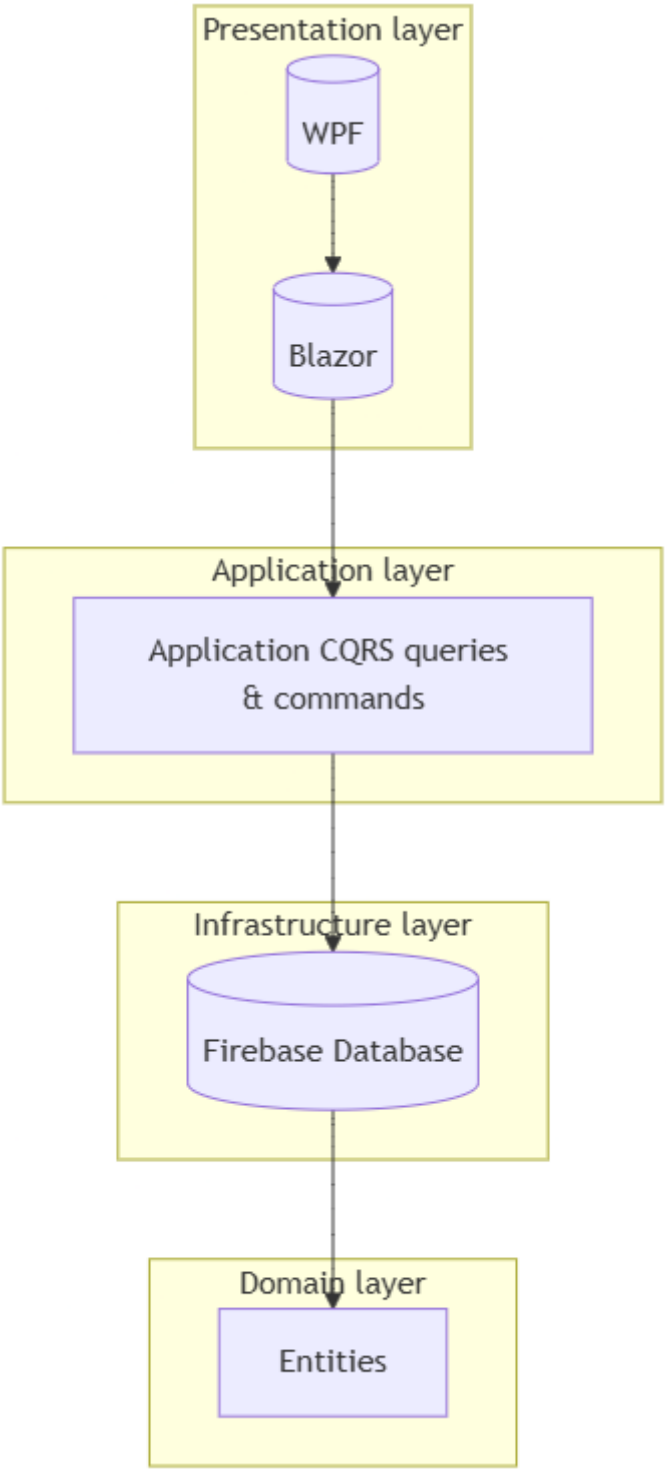

Figure 1: Infrastructure proposal

4 Task 4

R2.
D2. .

R3. The user link their task data to their account.

Nr	Requirement item	Priority (High/Medium/Low)
R1	The user shall be able to inspect their tasks.	High
R2	The user shall be able to manage their tasks.	High
R3	The user link their task data to their account.	High
R4	The user shall be able to prioritize tasks.	Medium
R5	The user shall be able to set recurring tasks.	Medium
R6	The user shall be able to set reminders for tasks.	Low

Table 1: Requirement items

Nr	Requirement item	Priority (High/Medium/Low)
D1	Task items are listed in a todo list view and visible in a calendar view.	High
D2	A task form allows the users to create, edit and delete their tasks.	High
D3	The application saves a users' tasks in a database	High
D4	Tasks can be assigned priority levels (e.g., High-/Medium/Low) with visual indicators (e.g. color-coding) in the todo list and calendar views.	High
D5	Tasks can be set to repeat daily, weekly, monthly, or custom intervals.	Medium
D6	A notification system alerts users via desktop notifications.	Low

Table 2: Design items

5 Task 5

Sprint	Sprint 1	Sprint 2	Sprint 3	Sprint 4
Scrum master	Varvara Aladyina	Deinoras Krasauskas	Azhaf Khan	Max Sellick, Simon Ostini
Developers	Max Sellick, Simon Ostini	Varvara Aladyina	Deinoras Krasauskas	Azhaf Khan
Tester	Deinoras Krasauskas	Azhaf Khan	Max Sellick, Simon Ostini	Varvara Aladyina
Support	Azhaf Khan	Max Sellick, Simon Ostini	Varvara Aladyina	Deinoras Krasauskas

Table 3: Sprint role planning

6 References

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