

COURSE NAME: Software Project Management (SWE321)

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Lab 4

PROJECT MANAGEMENT PLAN TEMPLATE

VERSION HISTORY

Version: 1.0

Approved by: [Name]

Revision Date: [Date]

Description of Change: Initial Version

Author: [Name]

1. EXECUTIVE SUMMARY

The **SipSync Project** aims to develop a user-friendly water intake reminder mobile application using Flutter. The app will help users track their daily water consumption and send timely reminders to promote healthier hydration habits. The application includes features such as user registration, water intake logging, and a streak-based motivation system. The primary objective is to promote healthier hydration routines through reminders, analytics, and gamification elements.

2. PROJECT MANAGEMENT APPROACH AND GOVERNANCE

The project will be managed using an **Agile methodology**, ensuring flexibility and iterative development. The team will follow a **weekly sprint approach**, with regular updates and progress tracking. The project team consists of a **Project Manager**, **Assistant Project Manager**, and **Frontend Development Lead**. External vendors or resources are not required, as the team will handle all development tasks internally.

2.1 PROJECT SCOPE

The scope of the project includes:

- Developing a mobile application for iOS and Android platforms.
- Implementing user authentication and profile management.
- Setting personalized hydration goals based on user attributes (age, weight, height, activity level).
- Integrating smart reminders and notifications.
- Adding gamification elements (e.g., streak tracking).

- Ensuring cloud-based storage and data synchronization for multi-device access.

Scope Limits:

- The app will not include advanced health tracking features beyond hydration.
- No integration with third-party fitness apps or devices.

2.2 DELIVERABLES

The following deliverables are expected:

- Mobile Application (iOS & Android).
- User Authentication & Profile Management.
- Smart Hydration Tracking & Goal Setting.
- Reminder & Notification System.
- Gamification & User Engagement Features.
- Backend & Database Integration.
- Deployment & Documentation.

2.3 WORK BREAKDOWN STRUCTURE (WBS)

The project tasks will be broken down as follows:

- **Project Initiation:** Define requirements, set goals, and plan the project.
- **UI/UX Design:** Create wireframes and finalize the app's design.
- **Backend & Database Setup:** Develop the backend infrastructure and database.
- **Development Phase:** Implement features such as user authentication, hydration tracking, and reminders.
- **Testing & Debugging:** Conduct thorough testing to ensure functionality and fix bugs.
- **Final Deployment:** Release the app on iOS and Android platforms.

:2.4 STAKEHOLDER ANALYSIS

- **Project Sponsor:** Misr International University.

- **Customers:** Health-conscious individuals, fitness enthusiasts, busy professionals, students, and elderly users.
- **Project Team:** Jana Ghoniem (Project Manager), Hala Amr (Assistant Project Manager), Haya Walid (Frontend Development Lead).

2.5 SCHEDULE BASELINE

The project will run from March 8, 2025, to April 6, 2025. Weekly progress reports will be prepared to track progress.

2.6 MILESTONE LIST

- **March 8, 2025:** Project Initiation.
- **March 15, 2025:** Requirements Analysis.
- **March 24, 2025:** UI/UX Design Finalization.
- **March 30, 2025:** Backend & Database Setup.
- **April 1, 2025:** Development Phase Completion.
- **April 5, 2025:** Testing & Debugging.
- **April 6, 2025:** Final Deployment.

2.7 CHANGE MANAGEMENT PLAN

Any changes to the project scope, schedule, or budget must be documented and approved by the Project Manager and Project Sponsor. Changes will be evaluated for their impact on the project timeline and budget before approval.

2.8 PROJECT SCOPE MANAGEMENT PLAN

The Project Manager (Jana Ghoniem) will oversee the project scope. Any changes to the scope must be approved by the Project Sponsor (Misr International University).

3. COMMUNICATION MANAGEMENT PLAN

- **Weekly Progress Reports:** Prepared every Friday and shared with the Project Sponsor.
- **Team Meetings:** Held twice a week (Monday and Thursday) to discuss progress and address issues.
- **Communication Tools:** Email and Slack for team communication.

4. RESOURCE MANAGEMENT PLAN

- **Software Tools:** Flutter for app development, Firebase for backend and database, Figma for UI/UX design.

- Hardware: Laptops and mobile devices for testing.
- Budget: \$400 (TTD) allocated for software licenses and minor expenses.

• 5. HUMAN RESOURCES MANAGEMENT PLAN

5.1 PROJECT STAFF LIST

Name	Title	E-mail	Phone
Jana Ghoneim	Project Manager	Jana2208912@miuegypt.edu.eg	+20 110 239 0270
Hala Amr	Assistant Project Manager	Hala2206898@miuegypt.edu.eg	+20 100 650 3800
Haya Walid	Frontend Development Lead	Haya2202798@miuegypt.edu.eg	+20 1159 222 670

5.2 RESOURCE REQUIREMENT CALENDAR

- **March 8-15, 2025:** Project Initiation & Requirements Analysis (All team members).
- **March 16-24, 2025:** UI/UX Design (Haya Walid).
- **March 25-30, 2025:** Backend & Database Setup (Jana Ghoniem, Hala Amr).
- **March 31-April 1, 2025:** Development Phase (All team members).
- **April 2-5, 2025:** Testing & Debugging (All team members).
- **April 6, 2025:** Final Deployment (All team memebers).

6. SCHEDULE MANAGEMENT PLAN

The project schedule will be managed using Jira for task tracking and milestone reminders. Weekly updates will ensure the project stays on track.

7. QUALITY MANAGEMENT PLAN

- **Quality Standards:** The app must be user-friendly, bug-free, and compatible with both iOS and Android devices.
- **Testing:** Manual and automated testing will be conducted to ensure functionality and usability.
- **User Feedback:** A beta version will be released to a small group of users for feedback before final deployment.

8. RISK MANAGEMENT PLAN

8.1 RISK LOG

Risk	Mitigation Strategy
Delays in development due to technical issues	Allocate buffer time in the schedule and prioritize critical tasks.
Compatibility issues across devices	Test the app on multiple devices and OS versions during development.
Low user engagement	Incorporate gamification elements and conduct user testing to improve engagement.
Data security concerns	Ensure compliance with privacy regulations and use secure cloud storage solutions.

9. COST BASELINE

The total budget for the project is **\$400 (TTD)**, allocated as follows:

- **Software Licenses:** \$200.
- **Testing Devices:** \$100.
- **Miscellaneous Expenses:** \$100.

10. QUALITY BASELINE

The app must meet the following quality standards:

- **Usability:** Intuitive and user-friendly interface.
- **Performance:** Fast and responsive with minimal bugs.
- **Security:** Secure handling of user data and compliance with privacy regulations.

11. APPENDICES

Project Charter.

Gantt chart

12. AUTHORIZATION SIGNATURES

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Approved by: Eng. Salma Osama

Date: 15/3/2025