TITLE OF PROJECT: MONEY BUDDY

**INTRODUCTION:** 

Money Buddy is a course project for managing personal finances. The application allows users to

track their expenses and income, set financial goals, and generate reports to monitor their finances.

This app is designed to provide users with a simple and intuitive interface that makes it easy to

manage their finances and stay on top of their spending.

**GOALS:** 

The goal of the budgeting app is to help users manage their finances more effectively by providing

them with the tools they need to track their expenses and income, set financial goals and generate

reports. The app aims to provide users with a comprehensive overview of their financial situation,

enabling them to make informed decisions about their spending and saving habits.

**PROBLEM IT SOLVES:** 

Many people struggle to manage their finances effectively, often finding it difficult to keep track of

their expenses and income. This can lead to overspending, debt and financial stress. The budgeting

app solves this problem by providing users with a simple and intuitive platform that allows them to

track their expenses and income, enabling them to set financial goals and also generate reports

about their spending habits. By using the app, users can gain a better understanding of their finances

and make informed decisions about how they spend their money. This app also provides users with

alerts and reminders to help them stay on track with their financial goals. Overall, the budgeting app

provides users with the tools they need to manage their finances effectively, helping them to achieve their financial goals and reduce financial stress.

## **REQUIREMENTS:**

#### 1. FUNCTIONAL REQUIREMENTS

- a. Expense and income tracking: Users should be able to easily add, edit, and delete their expenses and income. The app should also allow users to categorize their expenses and income and provide an overview of their spending and earnings.
- b. Goal setting: The app should allow users to set financial goals, such as saving for a vacation
  or paying off debt, and track their progress towards these goals.
- c. **Budgeting tools:** The app should provide tools to help users create and manage their budgets. This could include the ability to set spending limits for different categories and receive alerts when approaching or exceeding these limits.
- d. *Reporting*: The app should provide users with detailed reports on their expenses, income, and overall financial health. Reports could include charts and graphs to visualize spending patterns and help users identify areas where they can cut back on expenses.
- e. **Notifications and reminders**: The app should have the ability to send notifications and reminders to users when bills are due, when spending limits are approaching, and when financial goals are achieved.

### 2. NON-FUNCTIONAL REQUIREMENTS

- a. User-friendly interface: The app should have a clean and intuitive interface that is easy for users to navigate and understand. It should also be compatible with multiple devices and operating systems.
- b. **Secure data storage**: The app should store user data securely and protect it from unauthorized access or data breaches. This could include features such as encryption, two-factor authentication, and regular backups.
- c. **Customer support**: The app should provide users with a reliable customer support system to address any technical issues or questions they may have.
- d. Cost-effective: The app should be reasonably priced or free to use, without hidden fees or subscriptions.
- e. *User authentication*: The app should have a secure login system to protect user data and ensure that only authorized users can access the app.

## **USE CASES**

# Use Case 1

- Dan is a freelance graphic designer who wants to keep track of his income and expenses. He
  downloads Money Buddy on his tablet and creates an account.
- 2. Once logged in, Dan adds his various sources of income, including his freelance work and any side projects. He then adds his expenses, such as his studio rent, software subscriptions, and office supplies, and categorizes them accordingly.

- 3. Dan sets a financial goal to save 20% of his income for taxes each month. The app helps him calculate how much he needs to save each month and provides him with reminders to transfer the money to his tax savings account.
- 4. As Dan starts to track his spending, he notices that he's spending a lot of money on office supplies. He adjusts his budget accordingly and sets a spending limit for office supplies to help him stay on track.
- 5. At the end of the quarter, Dan generates a report on his expenses and income. The report shows him which projects brought in the most income and where he can cut back on expenses. He uses this information to adjust his pricing strategy and stay within his budget.
- 6. The app sends Dan reminders when his quarterly tax payments are due, when he's approaching his spending limits, and when he reaches his savings goal. This helps him stay organized and avoid any tax penalties.
- 7. Dan continues to use the app to track his finances and set new financial goals, such as saving for retirement or investing in his business. The app helps him stay on top of his finances and make informed decisions about his business.

### Use Case 2

- Emily is a college student who wants to keep track of her finances while she's in school. She downloads Money Buddy on her smartphone and creates an account.
- Once logged in, Emily adds her sources of income, including her part-time job and any scholarships or grants she receives. She then adds her expenses, such as her tuition, books, rent, and food, and categorizes them accordingly.
- 3. Emily sets a financial goal to save \$500 for a spring break trip. The app helps her calculate how much she needs to save each month and provides her with reminders to stick to her budget.

- 4. As Emily starts to track her spending, she realizes she's spending more money on coffee than she thought. She adjusts her budget accordingly and sets a spending limit for coffee to help her stay on track.
- 5. At the end of the semester, Emily generates a report on her expenses and income. The report shows her where she can cut back on expenses and save more money. She uses this information to adjust her budget and save more money for her future goals.
- 6. The app sends Emily reminders when bills are due, when she's approaching her spending limits, and when she reaches her savings goal. This helps her stay organized and motivated to stick to her budget.
- 7. Emily continues to use the app to track her finances and set new financial goals, such as saving for a summer internship or planning for post-graduation expenses.

# **Use Case 3**

- John is a small business owner who needs to keep track of his finances to ensure that his business stays profitable. He downloads Money Buddy on his laptop and creates an account.
- Once logged in, John adds his business income, including revenue from his products and services. He then adds his business expenses, such as rent, utilities, marketing, and salaries, and categorizes them accordingly.
- 3. John sets a financial goal to increase his revenue by 20% within the next year. The app helps him track his progress towards this goal and provides him with insights into areas where he can improve his profitability.
- 4. As John starts to track his spending, he realizes that he's spending too much on advertising.
  He adjusts his budget accordingly and sets a spending limit for advertising to help him stay on track.

- 5. At the end of each quarter, John generates a report on his expenses and income. The report shows him his profit and loss statement, balance sheet, and cash flow statement. He uses this information to make informed decisions about his business and adjust his budget for the upcoming quarter.
- 6. The app sends John reminders when bills are due, when he's approaching his spending limits, and when he's meeting his revenue targets. This helps him stay organized and motivated to achieve his financial goals.
- 7. John continues to use the app to track his finances and set new financial goals, such as expanding his product line or opening a new location