

# Product Management Fundamentals

## Capstone Project

### Pick any one of the Challenges:

#### 1) BYOP

Bring Your Own Product idea  
The four filter criteria for choosing an idea is: Desirability / Feasibility / Viability / Novelty.

OR

#### 2) DigiHealth: Revolutionising Healthcare Data Management

Addresses the challenges posed by unstructured healthcare data by creating a centralised repository for medical history, streamlining healthcare services, and reducing medical errors.

#### Potential Features:

1. **Secure Data Storage:** Provides a platform for patients and healthcare providers to store medical records electronically, ensuring data security and privacy. This is not from the sources.
2. **Data Integration and Analysis:** Aggregates data from various sources, such as doctor's notes, lab results, and imaging reports, and uses AI algorithms to analyze patient data for insights and potential risk factors. This is not from the sources.
3. **Personalized Health Recommendations:** Offers tailored health recommendations based on patient medical history and current health status. This is not from the sources.
4. **Improved Communication and Collaboration:** Facilitates seamless communication between patients and healthcare providers, enabling better care coordination. This is not from the sources.

#### Value Proposition:

- **For Patients:** Empowers patients to manage their health proactively, access medical records conveniently, and receive personalised health recommendations.
- **For Healthcare Providers:** Improves efficiency, reduces medical errors, and facilitates better-informed decision-making.

#### How the Idea Measures Up:

- **Desirability:** Addresses the growing need for efficient and secure healthcare data management, which is highly desirable for both patients and healthcare providers.
- **Feasibility:** Leverages technology to digitise and centralise healthcare data, improving accessibility and streamlining processes.
- **Viability:** Potential for revenue generation through subscriptions, data analytics services, or partnerships with healthcare institutions. This is not from the sources.
- **Novelty:** Offers a comprehensive solution to address the challenges of fragmented healthcare data, improving the overall healthcare experience.

OR

### 3) Connected Societies: Fostering Community Connection and Safety

*Creates a platform for people, especially senior citizens living alone, to stay connected with their community, fostering a sense of belonging and enhancing safety.*

#### Potential Features:

1. **Community Forum and Communication Tools:** Enables users to connect with neighbours, share information, organise events, and request assistance.
2. **Safety Features:** Integrates safety features like location sharing with trusted contacts, emergency alerts, and fall detection for senior citizens. This is not from the sources.
3. **Local Service Integration:** Provides access to local services like grocery delivery, transportation, and healthcare appointments. This is not from the sources.
4. **Social Engagement and Activities:** Facilitates social interaction through virtual or in-person events, interest-based groups, and volunteer opportunities. This is not from the sources.

#### Value Proposition:

- **For Individuals:** Creates a sense of community, enhances safety, and provides easy access to support and services.
- **For Communities:** Fosters stronger social bonds, improves safety and well-being, and strengthens local economies. This is not from the sources.

#### How the Idea Measures Up:

- **Desirability:** Addresses the increasing need for social connection and safety, especially among ageing populations.
- **Feasibility:** Utilises technology to connect people and facilitate communication within communities.
- **Viability:** Potential for revenue generation through subscriptions, partnerships with local businesses, or government grants. This is not from the sources.
- **Novelty:** Offers a dedicated platform to connect individuals within close proximity, fostering a sense of community and support.

OR

#### 4) Homely: Bringing Home-Cooked Goodness to Busy Professionals

Connects working professionals with home cooks who prepare healthy, regional cuisines, addressing the need for convenient access to homemade food.

##### Potential Features:

1. **Home Cook Discovery and Ordering:** Provides a platform for users to discover home cooks based on cuisine preferences, location, and dietary restrictions.
2. **Meal Planning and Subscription Options:** Allows users to pre-order meals for the week or subscribe to regular meal deliveries. This is not from the sources.
3. **Food Safety and Quality Control:** Implements measures to ensure food safety and hygiene standards among home cooks. This is not from the sources.
4. **Community Building and Reviews:** Facilitates a community where users can share reviews, rate home cooks, and connect with others who appreciate homemade food. This is not from the sources.

##### Value Proposition:

- **For Working Professionals:** Offers convenient access to healthy, home-cooked meals, catering to diverse culinary preferences.
- **For Home Cooks:** Provides a platform to share culinary skills, earn income, and connect with a community of food lovers. This is not from the sources.

##### How the Idea Measures Up:

- **Desirability:** Addresses the desire for healthy, home-cooked food among busy professionals who often lack the time or resources to cook.
- **Feasibility:** Connects supply (home cooks) with demand (working professionals) through an online platform
- **Viability:** Potential for revenue generation through commissions on orders, subscription fees, or advertising. This is not from the sources.
- **Novelty:** Offers a unique alternative to traditional restaurant delivery services by emphasising home-cooked meals and regional cuisines.

OR

## 5) TeenPay: Empowering Teenagers with Financial Responsibility

Provides teenagers with a platform to manage finances, learn about financial responsibility, and gain independence while enabling parents to monitor spending and teach money management skills.

### Potential Features:

1. **Digital Wallet and Spending Tracking:** Allows teenagers to track income and expenses, manage allowances, and make online or in-store purchases. This is not from the sources.
2. **Financial Literacy Tools and Educational Resources:** Offers interactive tools and educational content to teach teenagers about budgeting, saving, investing, and responsible spending. This is not from the sources.
3. **Parental Controls and Monitoring:** Enables parents to set spending limits, monitor transactions, and receive alerts on their teenager's financial activity.
4. **Goal Setting and Savings Features:** Facilitates setting financial goals, like saving for a specific purchase or college, and provides tools to track progress. This is not from the sources.

### Value Proposition:

- **For Teenagers:** Promotes financial independence, teaches valuable money management skills, and provides a safe and controlled environment to learn about finances.
- **For Parents:** Offers peace of mind by monitoring spending, instils financial responsibility in teenagers, and strengthens family communication about finances.

### How the Idea Measures Up:

- **Desirability:** Addresses the growing need for financial literacy among teenagers and the desire for parents to instil responsible financial habits.
- **Feasibility:** Utilises technology to create a secure and user-friendly platform for teenagers to manage money.
- **Viability:** Potential for revenue generation through transaction fees, premium features, or partnerships with financial institutions. This is not from the sources.
- **Novelty:** Offers a tailored financial management platform specifically designed for teenagers, empowering them to become financially responsible individuals.

OR

## 6) FitGen: A GenAI-Powered Fitness and Wellness Coach

*FitGen provides personalised fitness and wellness guidance, leveraging GenAI to create customised workout plans, offer nutritional advice, and track progress.*

### Potential GenAI Features:

1. **Fitness Assessment:** Users answer questions about their fitness goals, experience level, and preferences.
2. **AI-Generated Workout Plans:** Based on the assessment, the GenAI creates personalised workout plans, considering factors like available equipment, time constraints, and desired intensity.
3. **Exercise Demonstrations:** The GenAI can provide video demonstrations of exercises with proper form and technique.
4. **Nutritional Guidance:** Based on user goals and dietary restrictions, the GenAI suggests meal plans and recipes.
5. **Progress Tracking and Motivation:** The app tracks user progress, provides encouragement, and adjusts plans as needed.

### Value Proposition:

- For Individuals Seeking Fitness Guidance: Offers a personalised and accessible approach to fitness, providing customised plans and support without needing a personal trainer.
- For Fitness Professionals: Potential for use as a supplemental tool to enhance client engagement and provide additional resources.

### How the Idea Measures Up:

- **Desirability:** Addresses the growing focus on personalised fitness and the increasing use of technology in the wellness industry.
- **Feasibility:** Leverages GenAI's ability to process data from wearables and fitness trackers to personalise recommendations.
- **Viability:** Potential for revenue generation through subscriptions, in-app purchases for premium features, or partnerships with fitness equipment companies or nutrition brands.
- **Novelty:** Provides a comprehensive, AI-powered fitness and wellness platform that adapts to individual needs and preferences.

OR

## 7) StyleMe: A Personalized Fashion Assistant Powered by GenAI

*StyleMe acts as a personal stylist, using GenAI to analyse fashion trends, user preferences, and body types to create personalised outfit recommendations.*

### Potential GenAI Features:

1. **Style Profile:** Users create profiles with information on their style preferences, body type, and preferred brands.
2. **AI-Powered Outfit Recommendations:** The GenAI analyses the user's style profile, current fashion trends, and even weather conditions to suggest outfits for different occasions.
3. **Virtual Closet:** Users can upload photos of their existing clothes, and the GenAI will suggest new outfit combinations using items from their closet.
4. **Personalised Shopping Recommendations:** Based on user preferences and budget, the GenAI suggests clothing items from various online retailers.
5. **Style Inspiration:** The GenAI curates style boards and lookbooks based on user preferences, providing inspiration for new looks.

### Value Proposition:

- **For Fashion-Conscious Individuals:** Simplifies outfit selection, keeps users updated on trends, and helps them discover new styles.
- **For Online Retailers:** Potential for partnerships to drive sales by integrating shopping recommendations directly into the app.

### How the Idea Measures Up:

- **Desirability:** Addresses the desire for personalised fashion advice and the increasing influence of AI in the fashion industry.
- **Feasibility:** Leverages GenAI's ability to process visual data (clothing images) and analyse fashion trends.
- **Viability:** Potential for revenue through affiliate marketing, premium subscriptions, or partnerships with retailers.
- **Novelty:** Offers a personalised, AI-driven approach to fashion advice, going beyond traditional styling apps.

OR

## 7) StoryCraft: A GenAI-Powered Creative Writing Companion

*StoryCraft assists aspiring writers in overcoming writer's block and crafting compelling narratives. It leverages GenAI to generate story ideas, develop characters, build plot outlines, and offer real-time feedback on writing style and grammar.*

### Potential GenAI Features:

1. **Idea Generator:** Users can input keywords, themes, or genres, and the GenAI will generate a variety of story prompts, helping writers find inspiration.
2. **Character Builder:** The GenAI can assist in creating multi-dimensional characters by suggesting backstories, motivations, strengths, and weaknesses.
3. **Plot Assistant:** Writers can outline key plot points, and the GenAI will help fill in the gaps, suggest plot twists, and ensure narrative coherence.
4. **Style and Grammar Checker:** GenAI can provide real-time feedback on writing style, suggesting improvements to sentence structure, vocabulary, and grammar, making the writing process smoother.
5. **World-Building Assistant:** For fantasy or sci-fi writers, the GenAI can generate detailed descriptions of fictional worlds, including landscapes, cultures, and societal structures. This information is not from the sources.

### Value Proposition:

- **For Aspiring Writers:** Provides a valuable tool to overcome writer's block, enhance creativity, improve writing skills, and craft engaging stories.
- **For Experienced Writers:** Offers new perspectives, helps brainstorm ideas, and streamlines the writing process.

### How the Idea Measures Up:

- **Desirability:** Caters to the increasing interest in creative writing and the desire for tools that enhance storytelling abilities.
- **Feasibility:** Leverages advancements in GenAI for natural language processing and text generation.
- **Viability:** Potential for revenue generation through subscriptions or tiered access to features.
- **Novelty:** Provides a comprehensive, GenAI-powered writing companion that goes beyond basic grammar and spell-checking tools.

## **Deliverables:**

### **1. Customer Interviews:**

- Provide a list of the top 5 questions you used in your customer interviews.
- Specify the type of interview conducted (in-person, phone, or video).
- State the number of interviews conducted.
- Summarise the key insights gained from these interviews.

### **2. Empathy Map:**

Create an empathy map that captures what your target users are feeling, thinking, saying, and doing in relation to the problem your product addresses. This tool helps visualise user needs and pain points, leading to a more user-centred solution.

### **3. Persona:**

Develop one or two detailed personas that represent your top/typical target users. Include relevant demographic information, behaviours, motivations, goals, and pain points to provide a clear picture of who you're designing for.

### **4. Customer Profile & Value Map (Value Proposition Canvas):**

Develop a Value Proposition Canvas that outlines your customer profile and the value map of your solution. This canvas helps to ensure that your product offering aligns with customer needs and offers a compelling value proposition.

### **5. Elements of Value of the Solution:**

Identify and describe the functional, emotional, and social elements of value that your solution provides. This helps to articulate the different ways your product creates value for users beyond its basic functionality.

### **6. Solution MVP, Critical Assumptions with Hypothesis, Experimentation, and Key Results from the Experiment:**

- Define your Minimum Viable Product (MVP) - the most basic version of your product with just enough features to attract early-adopter customers and validate your key assumptions.
- Outline the critical assumptions you're making about your product and target market.
- Develop hypotheses based on your assumptions and design experiments to test them.
- Describe the experiments you conducted and share the key results. This iterative process is crucial for validating your product concept and making data-driven decisions.

**Note: This is a Group Assessment (i.e. Maximum 3 Member Team) for 40 marks.**