PRD for Solar Water Heating Commercial System launch

PRD Entry	Solar Water Heating Scenario

Product Users
Note: Buyer and User personas often describe key buyers or users
	• **Primary Users/Buyers:** The product will target three key segments:
	    o Commercial businesses (small, moderate, and large).
	    o Residential homeowners and apartment managers.
	    o Government facilities.
	• **Market Need:** These users need to reduce high energy costs, comply with environmental mandates, and manage budgets, but lack a user-friendly, intelligent system that provides both control and clear data.
	• **Product Use:**
	    o Commercial/Government: Users will use the app for real-time monitoring of system efficiency, diagnosing faults, and remotely configuring the system to maximize ROI.
	    o Residential: Users will use the app and wireless console for simple, convenient monitoring of their system, making adjustments, and understanding their energy savings.

Functional Requirements Note: Functional requirements are often described through User Stories or Use Cases	• **Commercial App:** • Monitor and measure system efficiency with real-time data and metrics. • Receive real-time fault indicators and access detailed diagnostic reports. • Remotely configure the system to adapt to changing conditions. • Access a troubleshooting guide and FAQs. • Link directly to the 24/7 help desk. • **Residential App:** • Monitor system status (e.g., temperature, storage levels). • Adjust basic system operations and settings. • Access a troubleshooting guide and FAQs. • Link directly to the 24/7 help desk. • **Residential Console:** • Connect wirelessly to the main solar heating system • Display system status and key operational outputs. • Allow users to adjust system settings.
Non-Functional Requirements	• **Security:** The system and app must be secure, ensuring all user data is protected and not made available to third parties. • **Automation:**

	• The residential console must automatically adjust the solar collector's position to achieve optimal efficiency. • The commercial app must support automated fault eradication procedures. • Usability: The app must be intuitive, allowing a new user to download it and begin operating the system effectively within 15 minutes. • Compatibility: The app must be developed for and fully functional on both Apple (iOS) and Android operating systems.
Product Support	• A 24/7 help desk will be established and staffed to support customers post-launch. • A downloadable user manual with illustrations will be provided, replacing the all-text tutorial. • An integrated troubleshooting guide and Frequently Asked Questions (FAQ) section will be available within the app. • The app will provide a direct link for users to contact the help desk.