Summer 2025

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Afra Alam

Ryan Aoude

<Project Name>

Software Requirements Specification

<Group Name> | Group #

Executive Summary

# Background

# Description

## Company Value Add

## End-User Value Add

# Scope

## What is Included

## What is Not Included

# Justification

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Section 1

# 1.1 Document Authors

**Heet Hiteshbhai Patel: - CEO, back-end lead, and co-founder**.

* At Grazer, Heet is in charge of leadership, strategy, and overall vision. He guarantees the scalability, security, and dependability of the platform's fundamental infrastructure thanks to his extensive experience in back-end programming and systems integration. In his capacity as CEO, he is in charge of long-term growth planning, milestone delivery, and team coordination.

**Param Jayesh Katrodia:- Chief Data Officer (CDO), and co-founder.**

* Param Jayesh Katrodia, is an expert in data analytics, insights, and optimization. He is in charge of creating and implementing Grazer's business dashboards, trend analysis tools, and price-comparison logic. Additionally, he keeps an eye on KPIs to make sure that partner companies and customers are receiving correct, up-to-date information. Param connects data-driven business choices with technological execution.

**Ryan Aoude: - Co-Founder, Chief Product Officer (CPO), and Front-End Lead.**

* Ryan Aoude oversees product design, user interface, and user experience (UI/UX). He is in charge of the front-end platform development at Grazer, ensuring that it is intuitive, responsive, and user-friendly. Ryan sets the product roadmap, converts consumer requests into products, and ensures a smooth shopping experience for both end users and companies.

**Afra Alam: -Co-Founder and Head of Quality and Operations (CQO).**

* Afra Alam oversees quality assurance, processes, and compliance. She tests the product thoroughly to verify that it satisfies high usability, security, and reliability criteria. Afra also oversees team documentation, operational planning, and process improvement, ensuring that Grazer runs smoothly both as a platform and as a company.

# 1.2 Document Revision History

|  |  |  |
| --- | --- | --- |
| **WEEK** | **DATE** | **Revisions** |
| 1 | 20-09-2025 | * Completed section 1 and 2.1 |
| 2 | 25-09-2025 | * Revised Problem statement and Product Vision |
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# 1.3 Document Purpose

The objective of this document is to serve as the core business proposal and operational charter for Grazer, a startup dedicated to changing the way consumers and companies engage in the online purchasing ecosystem.

This paper is more than simply an academic requirement; it is a strategic plan outlining Grazer's vision, goals, and structure for implementation. It describes the difficulties Grazer is tackling, the novel solutions presented, and the distinct value we hope to provide to both consumers and enterprises. By collecting this information, the paper creates a clear narrative for stakeholders, investors, advisers, and the founding team.

Specifically, the document is intended to:

* **Establish Vision and purpose:** Clearly express Grazer's vision of building a transparent, efficient, and environmentally responsible e-commerce platform, as well as its purpose of empowering consumers and businesses.
* **Align the Team:** Ensure that all co-founders have a clear grasp of the project's goals, deliverables, and long-term strategy, reducing uncertainty and encouraging cooperation.
* **Demonstrate Market Need:** Highlight the global expansion of e-commerce, the growing problem of unsold inventory, and the difficulties of consumers who are unable to adequately compare costs.
* **Showcase Innovation:** Set Grazer apart from competitors by describing its focus on price transparency, data analytics, local business inclusion, and sustainability.
* **Provide accountability:** Serve as a living record of milestones, modifications, and agreements, ensuring that the team operates with accountability and traceability throughout the development process.
* **Support Investor Readiness:** Present Grazer as a serious enterprise with well-defined objectives, making this document appropriate for early investor or adviser evaluation.
* **Guide Execution Across Semesters:** Create a roadmap for how Grazer will progress from an idea to a functioning prototype and, eventually, to a scaled product across two semesters.

Ultimately, this document exists to guarantee that Grazer starts with clarity, alignment, and professionalism. It sets the tone for the startup's growth and expresses our dedication to creating a platform that is technically sound, user-friendly, and beneficial to both businesses and consumers.

# 1.4 Audience

1. **Founding Team**

The founding team is the document's primary audience. For Grazer's co-founders, it acts as a thorough reference outlining the company's mission, duties, and expectations. It keeps each participant focused on the project's goals while holding them accountable for deliverables, deadlines, and overall startup success.

1. **Academic Supervisors and Evaluators**

In the academic environment, this paper is also intended for teachers and assessors who will review the project. For them, it illustrates that Grazer is more than just a school project, but rather a competent and well-structured commercial venture. It demonstrates the team's capacity to adapt theoretical knowledge to actual entrepreneurship.

1. **Investors & Advisors**

Potential investors and advisors are another important audience. For them, the plan communicates Grazer's market potential, competitive positioning, and long-term scalability. It enables stakeholders to analyze the team's commitment, the soundness of the business strategy, and the possibility for financial return or mentoring benefit.

1. **Strategic Partnerships and Businesses**

Local stores, small enterprises, and e-commerce collaborators are also key audiences. The document demonstrates how Grazer can help them enhance exposure, attract more consumers, and increase sales through competitive pricing. For these partners, the proposal explains how joining the platform generates mutual benefit.

1. **Consumers and early adopters.**

Consumers and early adopters remain a key audience, even though they are not actively participating in the plan currently. This document explains how Grazer will give them with more pricing transparency, convenience, and confidence in their buying experience. It also demonstrates how their engagement promotes sustainability by reducing unsold inventories and waste.

# 1.5 Group Agreement

### Team – Group 6

### Project Title - Grazer

### Project Time Frame – 2025 Sept 02 to 2025 Dec 21

### Team Members

* Heet Hiteshbhai Patel
* Param Jayesh Katrodia
* Ryan Aoude
* Afra Alam

### Team Leadership

Leadership responsibility rests with Heet Hiteshbhai Patel, who will serve as Project Manager and CEO. He will coordinate schedules, monitor progress, and ensure that deadlines and deliverables are met. Leadership will also be shared in specialized domains, with each member holding authority in their respective roles.

### Team Functions/Roles

Each team member has a defined role that contributes to the overall success of the project:

* **Heet Patel**: CEO, Project Manager, and Back-End Development Lead
* **Param Katrodia**: Chief Data Officer, responsible for data analytics, insights, and reporting
* **Ryan Aoude**: Chief Product Officer, responsible for product design, UI/UX, and front-end development
* **Afra Alam**: Head of Quality & Operations, ensuring testing, process compliance, and documentation

### Team Meetings – Wednesday at 2:00PM and Saturday at 2:00PM

### Team Problems

Conflicts, delays, or miscommunication will be addressed openly in meetings. Issues will first be discussed collaboratively within the team to find solutions. If consensus cannot be reached, the Project Manager will make the final decision. The team agrees that transparency, respect, and professionalism will guide all problem-solving efforts.

### Team Commitment

The undersigned members agree to work together on the project until the end of the PRJ666 next Semester. They recognize that as a team and individually they are equally responsible for the quality of all deliverables.

|  |  |  |
| --- | --- | --- |
| **Name** | **Date** | **Signature** |
| Heet Patel | 17-09-2025 | HHP |
| Param Jayesh Katrodia | 17-09-2025 | PHK |
| Afra Alam | 17-09-2025 | AA |
| Ryan Aoude | 20-09-2025 | RA |
|  |  |  |

Section 2

# 2.1 Project Proposal

## 2.1.1 Project Background

|  |  |  |  |
| --- | --- | --- | --- |
| **Name** | **What it Does / Main Features** | **Cons (Limitations)** | **Best Used For** |
| **KAYAK** | - Searches many travel websites for flights, hotels, car rentals (KAYAK, 2024a).  - Price alerts / notifications when prices drop (KAYAK, 2024b).  - Flexible date/destination search (Google Play, 2024). | − Doesn’t always guarantee lowest price  − Forecasts not always accurate  − Customer service may involve third parties (KAYAK, 2024c) | Planning and booking travel, especially when flexible with dates or destination |
| **Honey** | - Finds and applies coupon codes automatically (Demore Wealth, 2023).  - Price watch list (Droplist) (Ramsey Solutions, 2024).  - Honey Gold rewards system (Permission.io, 2021). | − Coupon code success varies  − May miss codes  − Privacy concerns | Everyday online shopping across many categories |
| **Capital One Shopping** | - Finds and applies coupon codes (Demore Wealth, 2023).  - Price watch features (Wikipedia, 2024).  - Rewards/credits system (Wikipedia,  2024). | − Price comparisons sometimes imperfect  − Rewards small  − Mostly U.S.-centric | Retail purchases and coupon savings |
| **Rakuten** | - Offers cash-back on purchases (Ramsey Solutions, 2024).  - Provides coupons and deals (Ramsey Solutions, 2024).  - Browser extension and app. | − Cashback takes time  − Not all retailers participate  − Some coupon overlap issues | Larger purchases where cashback value is meaningful |
| **RetailMeNot** | - Aggregates coupons, promo codes for many stores (Ramsey Solutions, 2024).  - Offers seasonal / special-event codes.  - Provides both online and in-store coupon options | − Not all codes work  − Not always best available  − Limited travel retailer support | Browsing coupons before shopping (especially non-travel items) |

## 2.1.2 Problem Statement

Shopping online today is supposed to make life easier, but most of the time it feels overwhelming. Prices jump around depending on the website, coupon codes often fail, and cashback takes forever to show up. Travel booking isn’t any better—flights and hotels can change in price overnight, leaving buyers unsure of whether they’re getting a good deal.

While existing platforms like KAYAK, Honey, Rakuten, and Capital One Shopping offer useful tools such as coupons, cashback, or price alerts, they miss a key reality: shoppers don’t just want discounts, they want **clarity**. People need to know whether it makes sense to buy now or wait, and whether a brand-new item is worth the extra cost compared to a used one. On top of that, local independent sellers—who often have great prices or unique inventory—rarely get visibility online.

This leaves buyers stuck guessing, overpaying, or missing opportunities, while small sellers remain hidden behind larger retailers.

## 2.1.3 Product Vision

Our vision is to build a platform that makes shopping simpler, smarter, and fairer for everyone—whether you’re buying, selling, or both.

For customers: We put all options in one place, comparing brand-new and used products side by side so shoppers can make smarter trade-offs between price and condition. With interactive price-trend charts, buyers see how prices are moving over time and get actionable purchase advice (e.g., “Buy now” or “Wait—prices are trending down”). Beyond just the big retailers, the platform also showcases local independent sellers, giving people access to nearby deals and supporting their own communities.

For businesses: Independent shops and smaller sellers get the visibility they deserve. Instead of being buried under big-box listings, they can reach motivated buyers with fair exposure, transparent comparisons, and tools to compete effectively.

### **What Makes Our Product Stand Out:**

* **Compare new *and* used, side by side** — one view for all purchase options.
* **Interactive price-trend charts** — clear visuals of how prices are moving.
* **Alerts for both markets** — notifications when new or used items hit the right price.
* **Local independent sellers front-and-center** — discover deals close to home.
* **Actionable purchase advice** — guidance like “Buy now” or “Wait” to cut out the guesswork.

# 2.2 Stakeholders and Users

**Internal:**

* **Role name/Persona** - Description.
* ……..

**External:**

* **Role name/Persona** - Description.
* ……..

# 2.3 Project Scope

# 2.4 System Risks

# 2.5 Operating Environment

# 2.6 Functional Requirements

# 2.7 Nonfunctional Requirements

# 2.8 UI/UX Interface Mock-ups

Section 3

# 3.1 Data Flow Diagrams

# 3.2 User Stories and related Use Case Scenarios

# 3.3 Activity Diagrams

# 3.4 Business Rules

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Business Rule #** | **Description** | **Activity Diagram** | **Related UCS** | **UI  Mock-up** |
| BR1 |  | AD1 | UC1 | UI 2.7.2 |
| BR2 |  | AD2 | UC2 | UI 2.7.3 |
| BR3 |  | AD3 | UC3 | UI 2.7.4 |
| BR4 |  | AD3 | UC3 | UI 2.7.4 |
| BR5 |  | AD5 | UC4 | UI 2.7.6 |
| BR6 |  | AD6 | UC5 | UI 2.7.6 |
| BR7 |  | AD7 | UC6 | UI 2.7.7 |
| BR8 |  | AD8 | UC7 | UI 2.7.8 |
| BR9 |  | AD8 | UC7 | UI 2.7.8 |
| BR10 |  | AD8 | UC7 | UI 2.7.8 |
| BR11 |  | AD8 | UC7 | UI 2.7.8 |
| BR12 |  | AD8 | UC7 | UI 2.7.8 |
| BR13 |  | AD9 | UC8 | UI 2.7.9 |
| BR14 |  | AD9 | UC8 | UI 2.7.9 |
| BR15 |  | AD9 | UC8 | UI 2.7.9 |
| BR16 |  | AD9 | UC8 | UI 2.7.9 |
| BR17 |  | AD10 | AD9 | UI 2.7.9 |
| BR18 |  | AD10 | AD9 | UI 2.7.9 |
| BR19 |  | AD10 | AD9 | UI 2.7.9 |
| BR20 |  | AD11 | UC10 | UI 2.7.10 |
| BR21 |  | AD11 | UC10 | UI 2.7.11 |
| BR22 |  | AD11 | UC10 | UI 2.7.11 |
| BR23 |  | AD12 | UC11 | UI 2.7.10 |
| BR24 |  | AD13 | UC12 | UI 2.7.12 |

Section 4 – Domain Class

Section 5 – Database

Section 6 – Project Management

# 6.1 Work Breakdown Structure

# 6.2 Milestones & Acceptance Criteria

Section 7 – Product Backlog & Implementation Schedule

Section 8 - References

Section 9 – Client/Faculty Sign-off