Recipe Vault - User Guide
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Introduction

Welcome to the Recipe Vault user guide. Recipe Vault is a lightweight, standalone desktop application designed to help users digitally preserve, organize, and manage their personal and family recipes with ease. Built using Java and JavaFX, and enhanced with Apache PDFBox for professional PDF export capabilities, Recipe Vault offers a seamless and intuitive experience for culinary enthusiasts of all backgrounds. Whether you are a home cook wanting to compile generations of family recipes or an individual looking to neatly organize personal creations, Recipe Vault provides a user-friendly platform to input, structure, and save your recipes securely on your personal device. With its visually appealing design and seasonal-themed PDF templates, Recipe Vault transforms traditional recipe keeping into a beautiful and accessible digital experience.

Overview of the Software

Recipe Vault is a Java-based desktop application developed to run on any operating system compatible with Java version 22 or newer. It does not rely on external databases or cloud storage, ensuring complete user control and privacy over their recipe data. The software features an intuitive graphical user interface (GUI) designed with JavaFX, a seasonal-themed PDF export system built using Apache PDFBox, and robust input validation for a polished, professional experience.

Key features include:

- **Recipe Creation:** Input fields for recipe name, cuisine, recipe author, preptime, cook time, total time to cook, servings, ingredients (up to 15 items), and step-by-step cooking instructions (up to 25 steps) and additional notes.
- **PDF Export Functionality:** Export recipes into beautifully themed PDF templates representing Spring, Summer, Fall, and Winter.
- **Real-Time Input Feedback:** Character count indicators to help manage text limitations and prevent data truncation.
- Validation and Error Handling: Comprehensive checks for missing fields with user-friendly feedback.
- **Visual Consistency:** A warm, recipe-book aesthetic with cream backgrounds, brown accents, Georgia font styling, and stylized UI elements.
- Standalone Deployment: Delivered as a zipped folder containing all necessary files, including dependencies for Windows users, with detailed instructions for running the application on MacOS and Linux.

Recipe Vault emphasizes portability, simplicity, and privacy, making it an ideal solution for individuals seeking a dedicated, offline recipe management tool.

Purpose of the User Guide

The purpose of this user guide is to provide clear, comprehensive instructions on how to install, operate, and troubleshoot the Recipe Vault application. This guide serves as a resource for users to understand the application's functionalities, navigate through its features, and maximize its benefits with minimal technical effort. Step-by-step directions are provided to assist users with entering recipes, exporting them to PDF files, and managing their culinary collection on their personal devices. Additionally, this guide covers platform-specific setup instructions and outlines best practices for maintaining optimal performance of the application.

By following this guide, users will be able to:

- Successfully set up and launch the Recipe Vault application on their system.
- Navigate the graphical interface with confidence.
- Create, edit, and export their recipes effectively.
- Resolve common issues encountered during usage.

The guide ensures that even users with basic technical knowledge can use the application with ease and enjoy a streamlined experience.

Target Audience

This user guide is intended for a broad range of users, particularly:

- Home Cooks and Culinary Enthusiasts: Individuals who want to document, organize, and share their personal or family recipes digitally.
- Recipe Collectors Seeking an Offline Solution: Users who prefer managing their recipes locally on their device without relying on internet access or cloud-based services.
- Educators and Students interested in Culinary Arts: Those who might use the application as a tool for organizing practice recipes or creating a personal cookbook for assignments or personal use.

This guide assumes no prior knowledge of Java programming or technical background beyond basic file management skills. It has been designed with accessibility and clarity in mind, enabling users to quickly become proficient with the Recipe Vault application. Users who are familiar with basic computer operations such as downloading files, extracting zip folders, and

running applications via simple commands or executable files can easily start using the application and start creating and saving unique recipes.

Getting Started

Getting started with the Recipe Vault application is as easy as possible. Start by ensuring your system meets the minimum specifications laid out in the **System Requirements** section of this document. Once the specifications have been confirmed, follow the **Installation**Instructions to set the application up on your system. Once the system has been installed, you can use the **Using the Software** and **Step-by-Step Instructions for Using the Software's Main**Features sections to utilize Recipe Vault quickly and easily. For any questions during operation, refer to the README provided with the software or the **Troubleshooting Tips** section of this guide.

Installation Instructions

Installation for the Recipe Vault application is incredibly easy. Follow the correct instruction set for your operating system below:

Windows:

- 1. Download the .zip folder containing the Recipe Vault application.
- 2. Extract the .zip to the location of your choice.
- 3. The program has been successfully installed. Use the Run.bat file located in the Recipe Vault project folder to start the application.

MacOS

- 1. Download the .zip folder containing the Recipe Vault application.
- 2. Extract the .zip to the location of your choice.
- 3. Open the Recipe Vault folder and navigate to the lib folder.
- 4. Navigate to the javafx folder
- 5. Delete the contents of the javafx folder
- 6. Download the MacOS version of the JavaFX SDK from the following link:
 - a. https://gluonhq.com/products/javafx/
- 7. Extract the .zip folder to the location of your choice
- 8. Navigate to the newly extracted folder.
- 9. Copy the contents of the javafx-sdk folder into the javafx folder in the Recipe Vault folder
- 10. Change the name of the Run.bat file to Run.command

Linux

- 1. Download the .zip folder containing the Recipe Vault application.
- 2. Extract the .zip to the location of your choice.
- 3. Open the Recipe Vault folder and navigate to the lib folder.
- 4. Navigate to the javafx folder
- 5. Delete the contents of the javafx folder
- 6. Download the Linux version of the JavaFX SDK from the following link:
 - a. https://gluonhq.com/products/javafx/
- 7. Extract the .zip folder to the location of your choice
- 8. Navigate to the newly extracted folder.
- 9. Copy the contents of the javafx-sdk folder into the javafx folder in the Recipe Vault folder
- 10. Change the name of the Run.bat file to Run.sh

System Requirements

Recipe Vault can run on any operating system capable of running Java 22 or later. The user can download the latest Java distribution from Oracle's website at https://www.oracle.com/java/technologies/downloads/. Find the correct distribution for your operating system and download the required installer. Once downloaded, Java can be installed for Windows, MacOS, and Linux and the Recipe Vault application can be utilized. The following minimum specifications are recommended for any PC running the Receipt Vault application.:

- Dual-core CPU
- 2GB of RAM
- GPU compatible with OpenGL 4.4 or later

User Interface Overview

The Recipe Vault application provides an intuitive and user-friendly interface that is designed to make recipe entry and management simple for all users. The main window is organized into several defined sections with consistent visual styling based on a warm cream and brown color palette to create a welcoming and authentic cookbook experience. Upon launching the application, users are greeted with a centered and vertically maximized window that is divided into three primary areas:

- **Header Section:** Positioned at the top of the window, the header displays the title "Recipe Vault" along with the slogan "Preserve the past, cook for the future!" Both elements are in bold, Georgia font in dark brown for both consistency and style.
- Recipe Entry Form: Below the header is a scrollable area where users input all recipe details. These fields include Recipe Name, Cuisine, Recipe Author, Prep Time, Cook

Time, Total Time, Servings, Theme selection, Ingredients, Instructions, and optional Notes. Each text field displays a real-time character counter, ensuring users remain within defined limits.

• **Action Buttons:** At the bottom of the window, three prominent buttons will allow the user to save the entries into the PDF, reset any entered data, and close the application.

Throughout the application, friendly pop-up dialogs will assist the user by providing helpful alerts and confirmations for actions like exceeding ingredient limits, missing required fields, or successfully saving a recipe.

Using the Software

The Recipe Vault is a JavaFX application that requires Java 22 or later and JavaFX libraries to run correctly. This application can be run on any operating system, such as Windows, Mac, and Linux. For installation and setup, please follow the steps below:

- 1. Ensure that Java is installed on the user's computer. This installation can be verified by opening the command prompt or terminal and typing java -version.
- 2. Ensure that the JavaFX folder inside the Recipe Vault project contains the correct version for the user's platform.
- 3. Double-click the Run.bat file located in the Recipe Vault project folder.
- 4. The recipe vault window will then launch and be ready for use.

If double-clicking the Run.Bat file does not successfully open the Recipe Vault, users can manually launch the application by running a Java command directly from the terminal window.

- 1. Open the terminal window
- 2. Use the cd command to move to the folder where the Recipe Vault is located.
- 3. Run the following command to start the application: *java -cp "out;lib/*" --module-path "lib/javafx/lib" --add-modules javafx.controls,javafx.fxml Main*
- 4. The recipe vault window will then launch and be ready for use.

Once the Recipe Vault application is successfully launched, users can immediately begin entering their recipe information and generating customized PDF files. With the application ready, users can enjoy a smooth and intuitive experience, capturing and preserving their favorite recipes.

Step-by-Step Instructions for Using the Software's Main Features

Once the application window is open, follow the steps below to create and save a recipe:

1. Enter the basic recipe information

- Enter the Recipe Name
- Enter the Cuisine
- Enter the Recipe Author
- Enter the Prep Time, Cook Time, and Total Time
- Enter the number of Servings
- Select a Theme

2. Add Ingredients

- Type an ingredient into the Add Ingredient field
- Click Add or press Enter to add the ingredient to the list
- Repeat these steps until all ingredients have been entered (up to 15 maximum)
- If needed, select an ingredient from the list and click Remove Selected Ingredient to delete it

3. Add Cooking Instruction

- Type an instruction into the Add Instruction field
- Click add or press Enter to add it to the instruction list
- Repeat these steps until all instructions have been entered (up to 25 maximum)
- If needed, select an ingredient from the list and click Remove Selected Instruction to delete it

4. Add Optional Notes

• Enter any optional tips, comments, notes, or reminders into the Notes/Tips text area

5. Save the Recipe

- Click the Save button at the bottom of the window
- Choose a save location and filename when the Save dialog appears
- Click Save to export your recipe into a themed PDF file

6. Reset or Exit the application

- Click Reset to clear the entire form to start a new recipe
- Click Close to exit the application

After filling in all necessary fields and saving the recipe, users will have a fully customized PDF file that reflects their chosen theme and entered information. For convenience, the application also allows users to reset the form at any time or safely exit if needed. By following the step-by-step process, users can efficiently build a personal recipe collection for both personal preservation and sharing.

Troubleshooting Tips

Issue	Possible Cause	Solution
Application does not open	Java is not installed or is an outdated version.	Install the latest version of Java (Java 22 or higher). Restart your computer after installation.
Error generating PDF file	Missing template file or file permissions issue	Verify that the seasonal PDF templates are correctly placed in the application folder. Ensure you have permission to save files.
Ingredients or instructions not saving	Incomplete fields or internal saving error	Make sure all required fields are filled in before saving. Check if the list limits (15 ingredients, 25 instructions) have been exceeded.
Application crashes when resetting or saving	System memory issue or unexpected error	Close other applications to free up resources. Restart the Recipe Vault application.
Exported PDF is missing data	Fields were left empty or data did not transfer	Double-check that all fields were entered before exporting. Try re-exporting the recipe.
Seasonal theme not applied to PDF	Template selection error or file missing	Confirm that the selected seasonal template exists and is correctly linked in the application. Re-select a theme and retry exporting.

References

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OpenJFX. (n.d.). *JavaFX documentation*. Retrieved April, 28, 2025, from https://openjfx.io/ Oracle. (n.d.). *Java SE documentation*. Oracle. Retrieved April, 28, 2025, from https://docs.oracle.com/en/java/

Glossary of Terms

Term	Definition
Recipe Vault	The Java-based application developed to input, save, and export recipes.
PDF Export	The feature that allows a user to generate a PDF version of a saved recipe with a selected seasonal theme.
Seasonal Template	Pre-designed PDF layouts (Fall, Winter, Spring, Summer) applied to exported recipes.
Java	The programming language used to develop the Recipe Vault application.
Java FX	A software platform used to create and style the graphical user interface of the Recipe Vault.
Ingredient List	A list within the application where users add ingredients for their recipe, up to 15 entries.
Instruction Steps	A section for listing cooking or preparation steps, limited to 25 entries.
Form Reset	A function that clears all entered recipe information and resets the form for new data entry.
Save Recipe	Saves the inputted data internally to be used for PDF generation or future reference.

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