**Project: Simple Grocery Store API Testing**

**Date: September 1, 2024**

**1. Overview of the API Endpoints Tested**

**This report outlines the testing conducted on the Simple Grocery Store API using Postman. The primary endpoints tested include:**

1. **Get Product s- Retrieves details of all products .**
2. **Add a Product - Adds a new product to the store.**
3. **Update a Product - Updates information for an existing product.**
4. **Delete a Product - Deletes a product from the store.**
5. **Get All Products - Retrieves a list of all products available in the store.**

**2. Summary of Test Scenarios and Their Outcomes**

**2.1. Get Products  
http://simple-grocery-store-api.online/products**

**Test Scenarios:**

* **/products.**

**Outcomes:**

* **Success: The API returned all of the products.**

**2.2. create a cart**

**Test Scenarios:**

* **/carts**

**Outcomes:**

* **Created new cart and returned id**

**2.3. replace item in cart**

**Test Scenarios:**

* **/carts/:cartId/items/ItemId:**
* **cartId="** **marJtEepElC4jS6TL0Bpz "**
* **ItemId=** **830664095**

**Outcomes:**

* **Success: puts the new item instead of the oldone**
* **Error:(if ItemId is not in cart)** **"No item with id 830664095 in this cart."**

**2.4. Delete a item from cart**

**Test Scenarios:**

* **/carts/:cartId/items/ItemId:**
* **cartId="** **marJtEepElC4jS6TL0Bpz "**
* **ItemId=** **830664095**

**Outcomes:**

* **Success: delets the item from the cart**
* **Error(if ItemId is not in cart ) "No item with id 830664095."**

**3. Issues Encountered and Their Resolutions**

* **Issue: Encountered a 404 error when retrieving a product with an invalid productId.**
  + **Resolution: This was an expected behavior. The API correctly returned an error when the product was not found.**
* **Issue: Encountered a 400 error when attempting to add a product with missing fields.**
  + **Resolution: This error was also expected. The API requires all mandatory fields to be populated before creating a new product.**

**4. Suggestions for Improvements or Additional Tests**

**Suggestions for Improvements:**

* **Error Handling: Enhance error messages to provide more detailed information about why a request failed (e.g., specifying which field is missing or invalid).**