# Scenario

## Summary

We want to create a recipe creating/sharing and grocery list app. You'll be planning out what tables we'll need, what information they'll store, and how the data will relate to each other.

### Features

- users can sign into the app with their email and password
- users can create recipes with ingredients and instructions
- recipes can be marked as public or private
- users can view other people's recipes
- ingredients from recipes can be added to user's grocery lists
- users can create their own occasions and assign recipes to occasions

# 1. Brainstorming

- Username
- User id
- Email
- Password
- Recipes
- Recipe id
- Recipes - private/public
- Grocery list
- Groceries list id
- Occasions
- Occasion id

## Table Ideas

- Users
- Recipes
- Grocery Lists
- Occasions

# Relationships

**One : One**

**One : Many**

- User-to-recipes - one user can have many recipes
- User-to-grocery list - one user can have many grocery lists
- User-to-occasions - one user can have many occasions
- Recipe-to-ingredients - one recipe can have many ingredients
- Recipe-to-occasion - one recipe can have more than one occasion
- Grocery_list-to-ingredients - one grocery-list can have many ingredients
- Recipe to Grocery - recipe has ingredients and grocery-list has ingredients

**Many : Many**

# 2. Table Planning: See PDF

# 3. Create Tables in SQL & Inserting Data

```sql
-- Create a table named users, that has a serial primary id, name and email
CREATE TABLE users (
    user_id SERIAL PRIMARY KEY,
    name varchar(255),
    email varchar(255)
);

-- insert some users into the table
INSERT INTO users (name, email)
VALUES ('Maxy Priest', 'demo1@demo.com'),
       ('Rusty Jackson', 'demo2@demo.com'),
       ('Bernie Martin', 'demo3@demo.com');

-- Create a table named recipes, that has a serial primary id, foreign key of user_id,
and ingredient_id, name, instructions and boolean of privacy

CREATE TABLE recipes (
    recipe_id SERIAL PRIMARY KEY,
    user_id INTEGER NOT NULL REFERENCES users(user_id),
```

```sql
    name VARCHAR(255),
    instructions TEXT,
    privacy boolean NOT NULL
);


-- insert some recipes into the table
INSERT INTO recipes (user_id, name, instructions, privacy)
VALUES (1, 'Pizza', 'Bake in oven', true),
       (2, 'Pasta', 'Cook al dente', true),
       (3, 'Salad', 'Lightly toss', true);




-- Create a table called occassion, that has a serial primary id, references user_id,
recipe_id and has an occasion_title and recipe_title

CREATE TABLE occassions (
    occassion_id SERIAL PRIMARY KEY,
    user_id INTEGER NOT NULL REFERENCES users(user_id),
    recipe_id INTEGER NOT NULL REFERENCES recipes(recipe_id),
    occasion_title VARCHAR(255),
    recipe_title VARCHAR(255)
);

-- insert some occassions into the table
INSERT INTO occassions (user_id, recipe_id, occasion_title, recipe_title)
VALUES (1, 4, 'Birthday', 'Pizza'),
       (2, 4, 'Brunch', 'Quiche'),
       (3, 5, 'Lunch', 'Salad'),
       (3, 5, 'Graduation', 'Salmon Steak');



-- create a table called gorcery lists, that has a serial primary id, references
user_id, recipe and ingredient_id and has a name, quantity and a price

CREATE TABLE grocery_lists (
    grocery_list_id SERIAL PRIMARY KEY,
    user_id INTEGER NOT NULL REFERENCES users(user_id),
    recipe_id INTEGER NOT NULL REFERENCES recipes(recipe_id),
    ingredient_id INTEGER NOT NULL REFERENCES ingredients(ingredient_id),
    ingredient VARCHAR(255),
    quantity INTEGER,
    price   FLOAT
);
```

```sql
-- insert some grocery lists into the table
INSERT INTO grocery_lists (user_id, recipe_id, ingredient_id, ingredient, quantity,
price)
VALUES (1, 4, 13, 'Pizza Sauce', 1, 3.99),
        (1, 4, 14, 'Cheese', 1, 5.99),
        (2, 4, 15, 'Pepperoni', 1, 4.99),
        (2, 5, 16, 'Spinach', 3, 1.00),
        (2, 5, 17, 'Gruyere', 1, 8.00),
        (2, 5, 18, 'Eggs', 12, 1.50),
        (3, 6, 19, 'Lettuce', 1, 1.00),
        (3, 6, 20, 'Tomatoes', 1, 1.50),
        (3, 6, 21, 'Balsamic Vinaigrette', 1, 2.99),
        (3, 6, 22, 'Salad dressing', 1, 2.50),
        (3, 6, 23, 'Salmon', 2, 30.00),
        (3, 6, 24, 'Capers', 1, 6.99);


-- create a table called ingredients, that has a serial primary id, references
recipe_id and grocery_list_id. Has an ingredient

CREATE TABLE ingredients (
    ingredient_id SERIAL PRIMARY KEY,
    recipe_id INTEGER NOT NULL REFERENCES recipes(recipe_id),
    ingredient VARCHAR(255)
);

--add ingredients to the ingredients table
INSERT INTO ingredients (recipe_id, ingredient)
VALUES (4, 'Pizza sauce'),
        (4, 'Cheese'),
        (4, 'Pepperoni'),
        (5, 'Spinach'),
        (5, 'Gruyere'),
        (5, 'Eggs'),
        (6, 'Lettuce'),
        (6, 'Tomatoes'),
        (6, 'Balsamic Vinaigrette'),
        (6, 'Salad dressing'),
        (6, 'Salmon'),
        (6, 'Capers');
```