Keaton Player
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Scenario

Summary

Create a recipe creating/sharing and grocery list app.

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**

Part 1: Conceptual Planning

Brainstorming

Keep track of user data:
    name, email, PW
    "My recipes section" user space for his own recipes
Keep track of recipes:
    Who created them?
    Ingredients Instructions, public or private?
Keep track of grocery lists:
    Who created them?
    contents (ingredients)
Keep track of occasion
    Who created them?
    the recipes that will be assigned
Keep track of user commonality:
    What each user's grocery list has in common with each other.
    Give the user the ability to share favorite recipes with each other.
    "Chef's like me" section. Place to check common things that users share with each other.

Table Ideas

Users: this table will hold the basic data of the user.
Authentication: holds each user's auth dat (email, password)
Recipe: holds all recipes information such as instructions and ingredients needed, & the author of the recipe.
Grocery list: holds all the info for a specific user grocery list
Occasion: this will hold info for an occasion created by a user like name and recipes assigned.
Assigned_recipe: this will hold the information to properly reference all the assigned recipes to an occasion

Relationships

One-to-one

- Users-Authentication: authentication works as an extension of the user table providing access to auth. data like email and password

One-to-many

- Users-recipes: references the recipe author
- Users-occasion: references a specific occasion with its user
- Users-grocery list: references a specific grocery list to its user

Many-to-many

- Occasion-recipes: references an occasion with the recipes assigned to it

Part 2: Table Planning

Columns

USERS

FIELD NAME	DATA TYPE	EXPLANATION
user_id	int / serial PK	Unique identifier for a user, needs to be a serialized integer number.
name	varchar(255)	Holds the name of a user.

AUTHENTICATION

FIELD NAME	DATA TYPE	EXPLANATION
auth_id	int / serial PK	Unique identifier for an authentication record, needs to be a serialized integer number.

FIELD NAME	DATA TYPE	EXPLANATION
user_id	int / FK	Unique identifier for a user, needs to be a serialized integer number.
email	varchar(1000) UNIQUE	Holds the email of a user, this will become the user name of the user.
password	varchar(50)	Holds the password of a user. Password constraints checked in the backend

RECIPE

FIELD NAME	DATA TYPE	EXPLANATION
recipe_id	int / serial PK	Unique identifier for a recipe, needs to be a serialized integer number.
user_id	int / FK	Unique identifier for a user that created the recipe, needs to be a serialized integer number.
name	varchar(255)	Holds the recipe's name
ingredients	text	Holds the recipe's list of ingredients
instructions	text	Holds the recipe's list of ingredients
is_private	bool	Indicates if the recipe should be considered private or public

GROCERY_LIST

FIELD NAME	DATA TYPE	EXPLANATION
list_id	int / serial PK	Unique identifier for a grocery list, needs to be a serialized integer number.
user_id	int / FK	Unique identifier for the user who created the list, needs to be a serialized integer number.
items	text	Holds the grocery list body

OCCASION

FIELD NAME	DATA TYPE	EXPLANATION
occassion_id	int / serial PK	Unique identifier for an occasion, needs to be a serialized integer number.
user_id	int / FK	Unique identifier for the user who created the occasion event, needs to be a serialized integer number.
name	varchar(225)	Holds the name of the occasion event

ASSIGNED_RECIPE

FIELD NAME	DATA TYPE	EXPLANATION
ar_id	int / serial PK	Unique identifier for a user, needs to be a serialized integer number.
occassion_id	int / FK	Unique identifier for an occasion, needs to be a serialized integer number.
recipe_id	int / FK	Unique identifier for a recipe, needs to be a serialized integer number.

Part 3: SQL Statements

-- CREATE TABLES & SET PRIMARY & FOREIGN KEYS CONSTRAINS

```
CREATE TABLE USERS (
                "USER_ID" SERIAL NOT NULL,
                "NAME" VARCHAR(255) NOT NULL,
                CONSTRAINT "USERS_PK" PRIMARY KEY ("USER_ID")
) WITH (
  OIDS=FALSE
);

CREATE TABLE AUTHENTICATION (
                "AUTH_ID" SERIAL NOT NULL,
                "EMAIL" VARCHAR(1000) NOT NULL UNIQUE,
                "PASSWORD" VARCHAR(50) NOT NULL,
                "USER_ID" INT NOT NULL,
                CONSTRAINT "AUTHENTICATION_PK" PRIMARY KEY ("AUTH_ID")
) WITH (
  OIDS=FALSE
);

CREATE TABLE GROCERY_LIST (
                "LIST_ID" SERIAL NOT NULL,
                "USER_ID" INT NOT NULL,
                "ITEMS" TEXT NOT NULL,
                CONSTRAINT "GROCERY_LIST_PK" PRIMARY KEY ("LIST_ID")
) WITH (
  OIDS=FALSE
);

CREATE TABLE RECIPE (
                "RECIPE_ID" SERIAL NOT NULL,
                "NAME" VARCHAR(255) NOT NULL,
                "INGREDIENTS" TEXT NOT NULL,
                "INSTRUCTIONS" TEXT NOT NULL,
                "IS_PRIVATE" BOOL NOT NULL DEFAULT 'FALSE',
                "USER_ID" INT NOT NULL,
                CONSTRAINT "RECIPE_PK" PRIMARY KEY ("RECIPE_ID")
) WITH (
  OIDS=FALSE
);

CREATE TABLE OCCASION (
                "OCCASION_ID" SERIAL NOT NULL,
                "USER_ID" INT NOT NULL,
                "NAME" VARCHAR(255) NOT NULL,
                CONSTRAINT "OCCASION_PK" PRIMARY KEY ("OCCASION_ID")
) WITH (
  OIDS=FALSE
);

CREATE TABLE ASSIGNED_RECIPE (
```

```
                "AR_ID" SERIAL NOT NULL,
                "OCCASION_ID" INT NOT NULL,
                "RECIPE_ID" INT NOT NULL,
                CONSTRAINT "ASSIGNED_RECIPE_PK" PRIMARY KEY ("AR_ID")
) WITH (
  OIDS=FALSE
);

ALTER TABLE "AUTHENTICATION" ADD CONSTRAINT "AUTHENTICATION_FK0" FOREIGN KEY
("USER_ID") REFERENCES "USERS"("USER_ID");
ALTER TABLE "GROCERY_LIST" ADD CONSTRAINT "GROCERY_LIST_FK0" FOREIGN KEY
("USER_ID") REFERENCES "USERS"("USER_ID");
ALTER TABLE "RECIPE" ADD CONSTRAINT "RECIPE_FK0" FOREIGN KEY ("USER_ID") REFERENCES
"USERS"("USER_ID");
ALTER TABLE "OCCASION" ADD CONSTRAINT "OCCASION_FK0" FOREIGN KEY ("USER_ID")
REFERENCES "USERS"("USER_ID");
ALTER TABLE "ASSIGNED_RECIPE" ADD CONSTRAINT "ASSIGNED_RECIPE_FK0" FOREIGN KEY
("OCCASION_ID") REFERENCES "OCCASION"("OCCASION_ID");
ALTER TABLE "ASSIGNED_RECIPE" ADD CONSTRAINT "ASSIGNED_RECIPE_FK1" FOREIGN KEY
("RECIPE_ID") REFERENCES "RECIPE"("RECIPE_ID");
```

Intermediate: Populate tables

-- POPULATE USER TABLE

```
INSERT INTO USERS (NAME)
VALUES ('ALFONSO'),
('KEATON');
```

-- POPULATE AUTHENTICATION TABLE

```
INSERT INTO AUTHENTICATION (EMAIL,PASSWORD,USER_ID)
VALUES ('ALFONSO@HOTMAIL.COM','QWERTY1',1),
('KEATON@HOTMAIL.COM','QWERTY2',2);
```

-- POPULATE RECIPE TABLE

```
INSERT INTO RECIPE (NAME,INGREDIENTS,INSTRUCTIONS,IS_PRIVATE,USER_ID)
VALUES ('PEPPERCORN STEAK','PEPPERCORN STEAK INGREDIENTS','PEPPERCORN STEAK
INSTRUCTIONS',FALSE,2),
('GREEK SALAD','GREEK SALAD INGREDIENTS','GREEK SALAD INSTRUCTIONS',FALSE,1),
('MOCHA ESPRESSO ICE CREAM','MOCHA ESPRESSO ICE CREAM INGREDIENTS','MOCHA
ESPRESSO ICE CREAM INSTRUCTIONS',FALSE,2),
('RISOTTO WITH ASPARAGUS AND BACON','RISOTTO WITH ASPARAGUS AND BACON
INGREDIENTS','RISOTTO WITH ASPARAGUS AND BACON INSTRUCTIONS',FALSE,1);
```

-- POPULATE GROCERY LIST TABLE

```
INSERT INTO GROCERY_LIST (USER_ID,ITEMS)
VALUES (2,'PEPPERCORN STEAK INGREDIENTS'),
(1,'RISOTTO WITH ASPARAGUS AND BACON INGREDIENTS');
```

-- POPULATE OCCASION TABLE

```
INSERT INTO OCCASION (USER_ID,NAME)
VALUES (2,'FAMILY DINNER NIGHT'),
(1,'MOM´S BIRTHDAY');
```

-- POPULATE ASSIGNED_RECIPE TABLE

```
INSERT INTO ASSIGNED_RECIPE (OCCASION_ID,RECIPE_ID)
VALUES (1,1),(1,2),(2,4),(2,3);
```

TEST QUERY: GET THE NAME OF ALL THE RECIPES ASSIGNED TO AN OCCASION

```
Select name
from recipe
join assigned_recipie ar on recipe.recipe_id = ar.recipe_id
Where ar.occasion_id = 1;
```