

Poniższy opis jest odwzorowaniem klas i interfejsów jakie będą napisane w języku PHP, z wyjątkiem deklaracji typów zmiennych gdyż język PHP do wersji 7 nie wspiera twardego podziału na typy zmiennych. Jednakże jeżeli projekt powstanie w języku Java i w technologii Java Spring oraz Java Spring MVC to nazwy i zawartości interfejsów mogą się różnić od tych opisanych w dokumencie. Wynika to z faktu, że ta technologia jeszcze nie jest nam znana i nie wiemy czy uda się odwzorować opisane w niej interfejsy.

```
struct Ingredient{  
    int id;  
    string name;  
    List<string> units;  
};
```

```
struct Category{  
    int id;  
    string name;  
};
```

```
struct Comment{  
    int id;  
    int recipeId;  
    string comment;  
};
```

```
struct Recipe{
    int id;
    string name;
    string description;
    List<Category> categories;
    List<Ingredient, int> ingredients;
    List<string, string> customIngredients;
    List<Comment> comments;
    int prepareTime;
    int costsServing;
    int calories;
    date publishDate;
    date lastCookedDate;
    boolean favorite;
};
```

```
exception SQLError {
    attribute string message;
};
```

```
exception BDHandleError {
    attribute string message;
};
```

```
interface IngredientsList {
    boolean addIngredient(in Ingredient ingredient);
    boolean deleteIngredient(in Ingredient ingredient);
    boolean editIngredient(in Ingredient ingredient);
    List<Ingredient> getIngredients();
};
```

```
interface CategoriesList{
    boolean addCategory(in Category category);
    boolean deleteCategory(in Category category);
    boolean editCategory(in Category category);
    List<Category> getCategories();
};
```

```
interface RecipesList{
    boolean addRecipe(in Recipe recipe);
    boolean deleteRecipe(in Recipe recipe);
    boolean editRecipe(in Recipe recipe);
    boolean addToFavorites(in Recipe recipe);
    boolean deleteFromFavorites(in Recipe recipe);
    boolean updateLastCookedDate(in Recipe recipe, in Date date);
    List<Recipe> getRecipes();
};
```

```
Interface RecipeCategories{
    void addCategory(in Category category);
    void addCategories(in List<Category> categories);
    void deleteCategory(in Category category);
    void deleteCategories(in List<Category> categories);
};
```

```
Interface RecipeIngredients{
    void addIngredient(in Ingredient ingredient);
    void addIngredients(in List<Ingredient> ingredients);
    void deleteIngredient(in Ingredient ingredient);
    void deleteIngredients(in List<Ingredient> ingredients);
};
```

```

interface DataBase{
    readonly attribute string host;
    readonly attribute string port;
    readonly attribute string user;
    readonly attribute string password;
    readonly attribute string base;
    void connect() raises (BDHandleError);
    void disconnect() raises (BDHandleError);
};

```

```

interface DataBaseIngredientsList : DataBase {
    boolean addIngredient(in Ingredient ingredient) raises (SQLException);
    boolean deleteIngredient(in Ingredient ingredient) raises (SQLException);
    boolean editIngredient(in Ingredient ingredient) raises (SQLException);
    List<Ingredient> getIngredients() raises (SQLException);
};

```

```

interface DataBaseCategoriesList : DataBase{
    boolean addCategory(in Category category) raises (SQLException);
    boolean deleteCategory(in Category category) raises (SQLException);
    boolean editCategory(in Category category) raises (SQLException);
    List<Category> getCategories() raises (SQLException);
};

```

```

interface DataBaseRecipesList : DataBase{
    boolean addRecipe(in Recipe recipe) raises (SQLException);
    boolean deleteRecipe(in Recipe recipe) raises (SQLException);
    boolean editRecipe(in Recipe recipe) raises (SQLException);
    boolean addToFavorites(in Recipe recipe) raises (SQLException);
    boolean deleteFromFavorites(in Recipe recipe) raises (SQLException);
    boolean updateLastCookedDate(in Recipe recipe, in Date date) raises
(SQLException);
};

```

```
List<Recipe> getRecipes() raises (SQLException);  
};
```