

Package `recipemanager`

Class **RecipeBox**

`java.lang.Object`  
`recipemanager.RecipeBox`

public class **RecipeBox**  
extends `Object`

Constructor Summary

Constructors	
Constructor	Description
<code>RecipeBox()</code>	Constructors <code>RecipeBox()</code> takes no arguments and will initialize the list of recipes
<code>RecipeBox(ArrayList&lt;recipemanager.Recipe&gt; listOfRecipes)</code>	<code>RecipeBox(ArrayList)</code> takes the existing list of recipes as a parameter and initializes the list of recipes with it

Method Summary

All Methods	Static Methods	Instance Methods	Concrete Methods
Modifier and Type	Method	Description	
void	<code>addRecipe(recipemanager.Recipe recipe)</code>	Adds recipe to list of recipe	
void	<code>createRecipe(recipemanager.MyMethods myMethods, Scanner scanner)</code>	Prompts user for information to create new recipe	
<code>List&lt;recipemanager.Recipe&gt;</code>	<code>getListOfRecipes()</code>	gets List of Recipes	
static void	<code>main(String[] args)</code>	Main method is the program's entry point	
static int	<code>printMenu(recipemanager.MyMethods myMethods)</code>	Prints menu options to the user and returns their selection	
void	<code>printRecipeDetails(RecipeBox recipeBox)</code>	Prints recipe information	
void	<code>printRecipeNames(RecipeBox recipeBox)</code>	Prints recipe names	
void	<code>setListOfRecipes(List&lt;recipemanager.Recipe&gt; listOfRecipes)</code>	Sets recipe list to array list	

Methods inherited from class <code>java.lang.Object</code>
<code>equals</code> , <code>getClass</code> , <code>hashCode</code> , <code>notify</code> , <code>notifyAll</code> , <code>toString</code> , <code>wait</code> , <code>wait</code> , <code>wait</code>

Constructor Details

RecipeBox
<code>public RecipeBox()</code>  Constructors <code>RecipeBox()</code> takes no arguments and will initialize the list of recipes
RecipeBox

```
public RecipeBox(ArrayList<recipemanager.Recipe> listOfRecipes)
```

RecipeBox(ArrayList) takes the existing list of recipes as a parameter and initializes the list of recipes with it

**Parameters:**

listOfRecipes -

## Method Details

### main

```
public static void main(String[] args)
```

Main method is the program's entry point

**Parameters:**

args -

### createRecipe

```
public void createRecipe(recipemanager.MyMethods myMethods,  
                        Scanner scanner)
```

Prompts user for information to create new recipe

**Parameters:**

myMethods -

scanner -

### addRecipe

```
public void addRecipe(recipemanager.Recipe recipe)
```

Adds recipe to list of recipe

**Parameters:**

recipe -

### getListOfRecipes

```
public List<recipemanager.Recipe> getListOfRecipes()
```

gets List of Recipes

**Returns:**

List

### setListOfRecipes

```
public void setListOfRecipes(List<recipemanager.Recipe> listOfRecipes)
```

Sets recipe list to array list

**Parameters:**

listOfRecipes -

### printMenu

```
public static int printMenu(RecipeManager.MyMethods myMethods)
```

Prints menu options to the user and returns their selection

**Parameters:**

myMethods -

**Returns:**

int

### printRecipeNames

```
public void printRecipeNames(RecipeBox recipeBox)
```

Prints recipe names

**Parameters:**

recipeBox -

### printRecipeDetails

```
public void printRecipeDetails(RecipeBox recipeBox)
```

Prints recipe information

**Parameters:**

recipeBox -

Package `recipemanager`

Class **MyMethods**

`java.lang.Object`  
`recipemanager.MyMethods`

public class **MyMethods**  
extends `Object`

Constructor Summary

Constructors	
Constructor	Description
<code>MyMethods()</code>	

Method Summary

All Methods	Instance Methods	Concrete Methods
Modifier and Type	Method	Description
double	<code>readDouble(String prompt)</code>	Reads an double from the user.
double	<code>readDouble(String prompt, double low, double high)</code>	Reads double from user, validates the double is within range
float	<code>readFloat(String prompt)</code>	Reads a input from user and validates that it is a float
float	<code>readFloat(String prompt, float low, float high)</code>	Reads user input and validates that its a float within certain range
int	<code>readInteger(String prompt)</code>	Validates user input as string
int	<code>readInteger(String prompt, int low, int high)</code>	Reads an integer from the user, validate integer within range

Methods inherited from class <code>java.lang.Object</code>
<code>equals</code> , <code>getClass</code> , <code>hashCode</code> , <code>notify</code> , <code>notifyAll</code> , <code>toString</code> , <code>wait</code> , <code>wait</code> , <code>wait</code>

Constructor Details

MyMethods
<code>public MyMethods()</code>

Method Details

<code>readInteger</code>
<code>public int readInteger(String prompt)</code>  Validates user input as string  Parameters: prompt - string prompt  Returns:

int

### readInteger

```
public int readInteger(String prompt,  
                       int low,  
                       int high)
```

Reads an integer from the user, validate integer within range

**Parameters:**

prompt - string prompt

low - int low

high - int high

**Returns:**

int

### readDouble

```
public double readDouble(String prompt)
```

Reads an double from the user. Validate double

**Parameters:**

prompt - string prompt

**Returns:**

double

### readDouble

```
public double readDouble(String prompt,  
                         double low,  
                         double high)
```

Reads double from user, validates the double is within range

**Parameters:**

prompt - string prompt

low - int low

high - int high

**Returns:**

double

### readFloat

```
public float readFloat(String prompt)
```

Reads a input from user and validates that it is a float

**Parameters:**

prompt - string prompt

**Returns:**

float

### readFloat

```
public float readFloat(String prompt,  
                        float low,  
                        float high)
```

Reads user input and validates that its a float within certain range

**Parameters:**

prompt - string prompt

low - float low

high - float high

**Returns:**

float

Package `recipemanager`

Class `Recipe`

`java.lang.Object`  
`recipemanager.Recipe`

`public class Recipe`  
`extends Object`

Constructor Summary

Constructors	
Constructor	Description
<code>Recipe(String name, int serving, List&lt;Ingredient&gt; ingredients, double calories)</code>	Constructor to initialize a recipe with its details

Method Summary

All Methods	Instance Methods	Concrete Methods	
Modifier and Type	Method		Description
<code>Ingredient</code>	<code>addNewIngredient()</code>		Calls <code>createFromUserInput</code> from <code>Ingredient</code> class
<code>Ingredient</code>	<code>createNewIngredient(String name, float numberOfCups, int caloriesPerCup, double calories)</code>		Creates a new ingredient using given parameters
<code>List&lt;Ingredient&gt;</code>	<code>getRecipeIngredients()</code>		
<code>String</code>	<code>getRecipeName()</code>		Gets recipe name
<code>int</code>	<code>getServings()</code>		Gets number of servings
<code>double</code>	<code>getTotalRecipeCalories()</code>		Gets total calories in recipe
<code>void</code>	<code>printRecipe()</code>		Prints recipe information to console
<code>void</code>	<code>setRecipeIngredients(List&lt;Ingredient&gt; recipeIngredients)</code>		Sets recipe ingredients to the given parameter
<code>void</code>	<code>setRecipeName(String name)</code>		Sets recipe name to given parameter
<code>void</code>	<code>setServings(int servings)</code>		Sets serving to given parameter
<code>void</code>	<code>setTotalRecipeCalories(double totalRecipeCalories)</code>		Sets the total recipe calories to the given parameter

Methods inherited from class `java.lang.Object`

`equals`, `getClass`, `hashCode`, `notify`, `notifyAll`, `toString`, `wait`, `wait`, `wait`

Constructor Details

Recipe
<pre>public Recipe(String name,               int serving,               List&lt;Ingredient&gt; ingredients,               double calories)</pre>

Constructor to initialize a recipe with its details

**Parameters:**

name - string name

serving - int serving

ingredients - list ingredient

calories - double calories

**Method Details****getRecipeName**

```
public String↗ getRecipeName()
```

Gets recipe name

**Returns:**

string

**setRecipeName**

```
public void setRecipeName(String↗ name)
```

Sets recipe name to given parameter

**Parameters:**

name - string name

**getServings**

```
public int getServings()
```

Gets number of servings

**Returns:**

int

**setServings**

```
public void setServings(int servings)
```

Sets serving to given parameter

**Parameters:**

servings - int servings

**getRecipeIngredients**

```
public List↗<Ingredient> getRecipeIngredients()
```

**Returns:**

ArrayList of type Ingredient

**setRecipeIngredients**

```
public void setRecipeIngredients(List↗<Ingredient> recipeIngredients)
```



Sets recipe ingredients to the given parameter

**Parameters:**

recipeIngredients - list ingredient

**getTotalRecipeCalories**

```
public double getTotalRecipeCalories()
```

Gets total calories in recipe

**Returns:**

double

**setTotalRecipeCalories**

```
public void setTotalRecipeCalories(double totalRecipeCalories)
```

Sets the total recipe calories to the given parameter

**Parameters:**

totalRecipeCalories - double total calories

**createNewIngredient**

```
public Ingredient createNewIngredient(String name,  
                                     float numberOfCups,  
                                     int caloriesPerCup,  
                                     double calories)
```

Creates a new ingredient using given parameters

**Parameters:**

name - string name

numberOfCups - int number of cups

caloriesPerCup - int calories per cup

calories - double calories

**Returns:**

Ingredient

**addNewIngredient**

```
public Ingredient addNewIngredient()
```

Calls createFromUserInput from Ingredient class

**Returns:**

Ingredient

**printRecipe**

```
public void printRecipe()
```

Prints recipe information to console

Package `recipemanager`

Class `Ingredient`

`java.lang.Object`  
`recipemanager.Ingredient`

public class **Ingredient**  
extends `Object`

Constructor Summary

Constructors

Constructor	Description
<b>Ingredient</b> ( <code>String</code> nameOfIngredient, float numberOfCups, int numberOfCaloriesPerCup)	Constructor to initialize the ingredient

Method Summary

All Methods	Static Methods	Instance Methods	Concrete Methods
Modifier and Type	Method	Description	
static <b>Ingredient</b>	<b>createFromUserInput</b> ()	Creates an Ingredient object based on user input.	
<b>String</b>	<b>getNameOfIngredient</b> ()	Gets the name of the ingredient	
int	<b>getNumberOfCaloriesPerCup</b> ()	Gets the number of calories per cup	
float	<b>getNumberOfCups</b> ()	Gets the number of cups	
double	<b>getTotalCalories</b> ()	Gets the total calories	
void	<b>setNameOfIngredient</b> ( <code>String</code> name)	Sets the name of ingredient	
void	<b>setNumberOfCaloriesPerCup</b> (int caloriesPerCup)	Sets the number calories per cup	
void	<b>setNumberOfCups</b> (float number)	Sets the number of cups for ingredient	
void	<b>setTotalCalories</b> (double totalCalories)	Sets the total calories	
<b>String</b>	<b>toString</b> ()	Returns a string representation of the ingredient.	

Methods inherited from class <code>java.lang.Object</code>
<code>equals</code> , <code>getClass</code> , <code>hashCode</code> , <code>notify</code> , <code>notifyAll</code> , <code>wait</code> , <code>wait</code> , <code>wait</code>

Constructor Details

Ingredient
<pre>public Ingredient(<code>String</code> nameOfIngredient,                   float numberOfCups,                   int numberOfCaloriesPerCup)</pre>
Constructor to initialize the ingredient
Parameters: nameOfIngredient - the name of the ingredient numberOfCups - the number of cups of the ingredient

numberOfCaloriesPerCup - the number of calories per cup of the ingredient

## Method Details

### getNameOfIngredient

```
public String getNameOfIngredient()
```

Gets the name of the ingredient

**Returns:**

the name of the ingredient

### setNameOfIngredient

```
public void setNameOfIngredient(String name)
```

Sets the name of ingredient

**Parameters:**

name - of ingredient

### getNumberOfCups

```
public float getNumberOfCups()
```

Gets the number of cups

**Returns:**

the number of cups

### setNumberOfCups

```
public void setNumberOfCups(float number)
```

Sets the number of cups for ingredient

**Parameters:**

number - number of cups

### getNumberOfCaloriesPerCup

```
public int getNumberOfCaloriesPerCup()
```

Gets the number of calories per cup

**Returns:**

the number of calories per cup

### setNumberOfCaloriesPerCup

```
public void setNumberOfCaloriesPerCup(int caloriesPerCup)
```

Sets the number calories per cup

**Parameters:**

caloriesPerCup - calories in one cup

**getTotalCalories**

```
public double getTotalCalories()
```

Gets the total calories

**Returns:**

the total calories

**setTotalCalories**

```
public void setTotalCalories(double totalCalories)
```

Sets the total calories

**Parameters:**

`totalCalories` - total calories in ingredient

**createFromUserInput**

```
public static Ingredient createFromUserInput()
```

Creates an Ingredient object based on user input.

**Returns:**

Ingredient

**toString**

```
public String↗ toString()
```

Returns a string representation of the ingredient.

**Overrides:**

`toString↗` in class `Object↗`

**Returns:**

a string describing the ingredient.