



# Recipe Ingredients Recalculator

This test is to find out more about your skills and capabilities to implement algorithms and to write production code.

## The problem:

The program read a recipe and recalculates ingredients when the amount of any ingredient changes or modify the servings. Following the rules below:

- The recipe is always a JSON object.
- The ingredients are in direct proportion to each other.
- The ingredients names are unique, but not require to validate.
- The amount is float expect if the unit is “piece”.
- If the amount is “piece”, then the program rounds up to integer this value when recalculate the recipe.
- The “servings” is also should be integer, the program rounds down this value when recalculate the recipe.
- Your task is to implement the RecalculateIngredients method, which takes the JSON data, an ingredient name or servings with amount to change as input and returns the recalculated recipe.
- You may not use any third party libraries for your solution.

```
{
  "title": "Pancake",
  "servings": 4,
  "ingredients": [
    {
      "name": "flour",
      "amount": 20,
      "unit": "dkg"
    },
    {
      "name": "egg",
      "amount": 2,
      "unit": "piece"
    },
    {
      "name": "milk",
      "amount": 3,
      "unit": "dl"
    },
    {
      "name": "carbonated mineral water",
      "amount": 2,
      "unit": "dl"
    },
    {
      "name": "salt",
      "amount": 1,
      "unit": "pinch"
    },
    {
      "name": "oil",
      "amount": 0.75,
      "unit": "dl"
    },
    {
      "name": "oil for cooking",
      "amount": 1,
      "unit": "dl"
    }
  ]
}
```

## Pluses:

- Including automated test to your solution is a plus but not mandatory.
- Clean Code (by Robert. C. Martin) makes us happy.

## Additional info:

- User interface is not required.
- You should use your favorite language, unless we discuss otherwise in advance.
- You shouldn't write pseudo code. You should write code that you would commit/push to a repository and solves the given problem.
- You need to write a short documentation into a README.md file that describes one possible way to start your code.
- You have net maximum 24 hours to submit your solution.
- You should submit even if you are not fully finished.
- If you have any further question, don't hesitate to ask.