## Problem 4 – Students, Courses, Grades, Visits

You are given a **list of students score** given as text table with the following columns: **student** name, **course**, **grade**, number of **visits**. A student can have several grades and visits for the same course. Write a JavaScript function to **aggregate the results** and print then as **JSON string** as shown in the examples below.

### Input

The input is passed to the first JavaScript function found in your code as **array of strings** holding the table lines. The input data will always be valid and in the format described. There is no need to check it explicitly.

### Output

Print at the console a **JSON string** that holds the **courses** (in alphabetical order), the **average grade** and average visits for each course and a **list of students** for each course (in alphabetical order). **Duplicates** should be removed (all strings are **case-sensitive**). Please follow exactly the **JSON format** from the example below.

The average numbers should be **rounded to 2 digits** after the decimal point and printed **without trailing zeroes**:

* 5 🡪 5; 5.50 🡪 5.5; 5.491 🡪 5.49; 5.495 🡪 5.5; 5.000001 🡪 5; 5.500 🡪 5.5

### Constraints

* The numbers of **input lines** is between 1 and 10 000.
* The names of **students** and **courses** consists of Latin letters and spaces. Their **length** is between 1 and 50 characters. Leading and trailing **whitespace** should be removed.
* The values of **grades** and **visits** will be numbers in the range [0…50].
* Allowed working time: 0.2 seconds. Allowed memory: 16 MB.

### Examples

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| --- |
| **Input** |
| Peter Nikolov | PHP | 5.50 | 8  Maria Ivanova | Java | 5.83 | 7  Ivan Petrov | PHP | 3.00 | 2  Ivan Petrov | C# | 3.00 | 2  Peter Nikolov | C# | 5.50 | 8  Maria Ivanova | C# | 5.83 | 7  Ivan Petrov | C# | 4.12 | 5  Ivan Petrov | PHP | 3.10 | 2  Peter Nikolov | Java | 6.00 | 9 |
| **Output** |
| {"C#":{"avgGrade":4.61,"avgVisits":5.5,"students":["Ivan Petrov","Maria Ivanova","Peter Nikolov"]},"Java":{"avgGrade":5.92,"avgVisits":8,"students":["Maria Ivanova","Peter Nikolov"]},"PHP":{"avgGrade":3.87,"avgVisits":4,"students":["Ivan Petrov","Peter Nikolov"]}} |