

# Chess: Part I

## Problem ID: a16p01chessplayerspart1

In this first part, the purpose of the program is to display another view of the data, by grouping the data by country.

In addition to the above requirement, you should make sure that your program can easily look up a given chess player and display their attributes (rank, country, rating, birth year), even though that functionality is not part of the current requirements.

### Input

The input consists of a single line, containing the name of an input file which will be made accessible to the program.

### Output

The output should contain a table of player rankings grouped by country, the beginning of which should look like the following:

Players by country:

```
-----
ARG (1) (2653.0):
                Sandro Mareco      2653
ARM (3) (2710.3):
                Levon Aronian      2780
                Gabriel Sargissian  2691
                Hrant Melkumyan    2660
AUT (1) (2690.0):
                Markus Ragger      2690
AZE (6) (2722.3):
                Shakhriyar Mamedyarov  2820
                Teimour Radjabov    2751
                Arkadij Naiditsch   2721
                Rauf Mamedov        2699
                Eltaj Safarli       2676
                Gadir Guseinov      2667
BLR (1) (2664.0):
                Vladislav Kovalev   2664
CHN (9) (2718.7):
                Liren Ding          2804
                Yangyi Yu           2765
                Yi Wei              2742
                Hao Wang            2722
                Xiangzhi Bu         2712
                Chao b Li           2708
                Yue Wang            2681
                Hua Ni              2676
                Yifan Hou           2658
```

So, the first two lines should contain the table header, on the first line, accompanied by an equally long line of dashes on the second line. After that, each country that has at least one player among the 100 top scoring players, should make an appearance in alphabetical order, as a subheader, followed by a list of the players from that country.

The numbers in parenthesis are the number of players in each group and the average chess ratings of those players.

For each country, the players should be listed in order of rating, the highest scoring first, and so on down the list. As it happens, this is the same order as they appear in the input file. When printing the chess player name and rating, use this format: { :>40 } { :>10 }

**Sample Input 1**

chess-top-100.csv

**Sample Output 1**

Enter filename: Players by country:

```
-----
ARG (1) (2653.0):
                                Sandro Mareco      2653
ARM (3) (2710.3):
                                Levon Aronian     2780
                                Gabriel Sargissian  2691
                                Hrant Melkumyan     2660
AUT (1) (2690.0):
                                Markus Ragger      2690
AZE (6) (2722.3):
                                Shakhriyar Mamedyarov 2820
                                Teimour Radjabov    2751
                                Arkadij Naiditsch   2721
                                Rauf Mamedov        2699
                                Eltaj Safarli       2676
                                Gadir Guseinov      2667
BLR (1) (2664.0):
                                Vladislav Kovalev  2664
CHN (9) (2718.7):
                                Liren Ding      2804
                                Yangyi Yu         2765
                                Yi Wei            2742
                                Hao Wang           2722
                                Xiangzhi Bu        2712
                                Chao b Li          2708
                                Yue Wang           2681
                                Hua Ni              2676
                                Yifan Hou          2658
CRO (1) (2687.0):
                                Ivan Saric      2687
CUB (1) (2653.0):
                                Lazaro Bruzon Batista 2653
CZE (2) (2702.0):
                                David Navara    2740
                                Viktor Laznicka    2664
EGY (1) (2686.0):
                                Bassem Amin    2686
ENG (5) (2688.6):
                                Michael Adams  2712
                                Matthew D Sadler 2693
                                David W L Howell 2689
                                Gawain C B Jones  2677
                                Luke J McShane   2672
ESP (1) (2713.0):
                                Francisco Vallejo Pons 2713
FID (1) (2740.0):
                                Veselin Topalov  2740
FRA (2) (2729.0):
                                Maxime Vachier-Lagrave 2780
                                Etienne Bacrot   2678
GEO (1) (2715.0):
                                Ivan Cheparinov  2715
GER (1) (2667.0):
                                Liviu-Dieter Nisipeanu 2667
HUN (4) (2695.8):
                                Richard Rapport    2725
                                Zoltan Almasi     2702
                                Peter Leko        2690
                                Ferenc Berkes     2666
```