Ages
Problem ID: a10p06ages

Write a program that:

1. Allows the user to input the names and ages of several persons.

2. Determines who the oldest and youngest persons are.

3. Shows the median and average ages, rounded to the 2nd decimal.

   - If there's an even number of people, then the median is the average of the two central values in a sorted list.

The program should be robust enough to handle invalid input when the user fails to type an integer when one is expected.

Input

First, the program should prompt the user for an integer n, the number of people.
If an integer is not input the program should output the following:
```
{n} is not an integer.  Please try again.
```
until the user inputs an integer.

The following then repeats n times, for each i satisfying $1 \leq i \leq n$:

- The program prompts the user for the name N_i of person p_i.

- The program prompts the user for the age H_i of person p_i, where $1 \leq H_i \leq 100$.
  If an integer is not input the program should output the following:

  ```
  {H_i} is not an integer.  Please try again.
  ```
  and prompt the user again.

Output

After any error messages have been displayed as a response to erroneous input, the output should conclde with the following four lines:

- `The oldest person is {`N_o`} who is {`H_o`} years old`
  where N_o and H_o are the name and age of the oldest person.

- `The youngest person is {`N_y`} who is {`H_y`} years old`
  where N_y and H_y are the name and age of the youngest person.

- `The median age is {`$\mu_{1/2}$`}`
  where $\mu_{1/2}$ is the median age, and should be rounded to the 2nd decimal.

- `The average age is {`μ`}`
  where μ is the average age, and should be rounded to the 2nd decimal.

Sample Input 1	Sample Output 1
3 Richard 27 Gilfoyle 33 Erlich 35	The oldest person is Erlich who is 35 years old The youngest person is Richard who is 27 years old The median age is 33.0 The average age is 31.67

Sample Input 2

```
a
b
4
Richard
27
Gilfoyle
33
Erlich
35
GavinB
in his prime
damnit, okay i'm forty nine years old
49
```

Sample Output 2

```
a is not an integer. Please try again.
b is not an integer. Please try again.
in his prime is not an integer. Please try again.
damnit, okay i'm forty nine years old is not an integer. Please try again.
The oldest person is GavinB who is 49 years old
The youngest person is Richard who is 27 years old
The median age is 34.0
The average age is 36.0
```