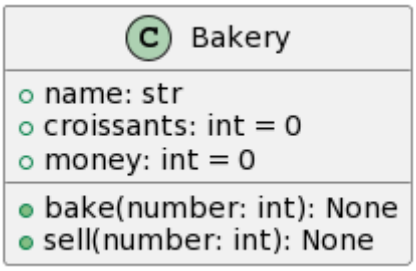
Midterm exam -- ACIT2515

Classes

In this assignment, you will implement one class that represents a bakery selling croissants 🥐.

Class diagram



Instructions

Attributes

- The bakery has a `name` attribute. The name is received by the constructor.
- The bakery has two other attributes:
  - `croissants`: the number of croissants available
  - `money`: the amount of money made selling croissants
  - these attributes are set to 0 when a bakery is created

`bake`

The `bake` method:

- receives an argument, which must be "similar to a positive integer" = the number of croissants to bake
  - `instance.bake(10)` is fine
  - `instance.bake("10")` is fine
  - `instance.bake(1.5)` is not fine (raises `ValueError`)
  - `instance.bake(-10)` is not fine (raises `ValueError`)
  - `instance.bake("abc")` is not fine (raises `ValueError`)
- the argument is the number of croissants baked (add it to the total number of croissants of the instance)

`sell`

The `sell` method:

- receives an argument, which must be a positive integer = the number of croissants to sell
  - `instance.sell(10)` is fine
  - `instance.sell("10")` is not fine (raises `ValueError`)

    - `instance.sell(-10)` is not fine (raises `ValueError`)
    - `instance.sell(1.5)` is not fine (raises `ValueError`)
    - `instance.sell("abc")` is not fine (raises `ValueError`)
    - if no argument is provided, sell 1 croissant
- when the argument received is more than the total number of croissants, the method must raise a `RuntimeError` (you cannot sell more croissants than you have)
- otherwise, substract the number of croissants sold from the total number of croissants
- add the money made by selling the croissants to the total amount of money on the instance
- each croissant sells for $3

Read and use the tests in the `test_bakery.py` file!

Submission

Submit your `bakery.py` file to D2L.

7 marks: 1 mark per test