## 1 Practice Programming Quiz

- 1. Create a class called People (with a main method).
- 2. Declare the following private instance variables:
  - String firstName
  - String lastName
  - int age
  - String state
- 3. Declare an public static instance variable People array called persons.
- 4. Define a constructor that is passed data used to initialize firstName, lastName, age, state.
- 5. Create a method called getName. This returns the concatenation of the first and last name.
- 6. Create a method called getAge. This returns the instance variable age.
- 7. Create a method called getState. This returns the instance variable state.
- 8. Create a toString method. The return value should be in the following format:

Name: Bobby Joe, Age: 23, State: Colorado

- 9. Create a static method called readFile (which returns nothing) that takes a String called fileName. Inside this method create a Scanner that reads fileName. The file has the following format:
  - number of people in file
  - first name
  - last name
  - age
  - String that represents the state

Note: the first name, last name, and state can be more than one word.

- 10. Instantiate persons to have the value from the first line in the file (number of people).
- 11. Store each person into persons.
- 12. Create a static method called writeFile (which returns nothing), that takes a Person array called pArray and a String called fileName as parameters. This method writes each element of pArray to fileName. Do not change the printing format (your toString method should overwrite and print in the format desired).
- 13. In the main method: call readFile with input.txt. Should look like: readFile("input.txt");
- 14. In the main method: call writeFile with output.txt and persons. Should look like: writeFile("output.txt", persons);

NOTE: For questions 13 and 14 you could instead adjust your run configuration settings.

For extra object practice try the following:

- 1. In the main method, create an object of People, called person0, who's first name is "Jimmy", last name is "John", age is 26, and he lives in Oregon.
- 2. In the main method, create an object of People, called person1, who's first name is "Ronald", last name is "McDonald", age is 76, and he lives in California.
- 3. In the main method, create an object of People, called person2, who's first name is "Harry", last name is "Potter", age is 29, and he lives in Washington.
- 4. Create an array of People objects, called famousPeople that contains person0, person1, person2.
- 5. Print famousPeople.