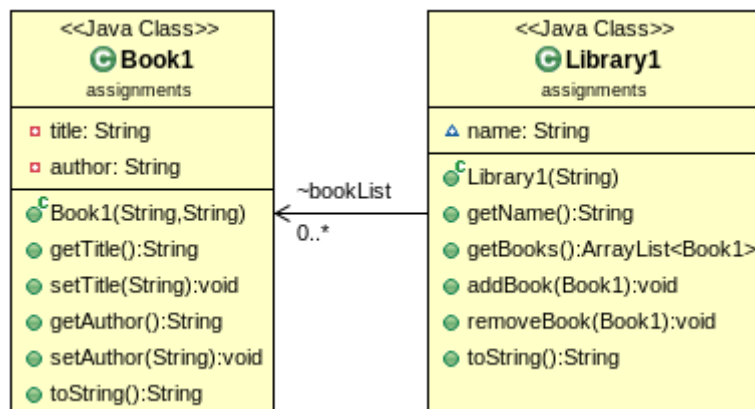Q1.    Using the UML diagram above you are required to:

- ○  implement the Book1 and Library1 classes.
- ○  Create an executable driver class which creates an instance of Library and populates its ArrayList with a number of Books.
- ○  The driver class will also include the following methods:
    - ▪  **public static void** writeToFile(List<Book1> list) which writes the contents of the ArrayList to a text file *Library.txt*
    - ▪  **public static void** readFromFile(List<Book1> list) which reads the contents of the *Library.txt* file and outputs them to standard output.

Q2.    Using the code from Q1, you are required to:

- ○  alter the Book1 and Library1 classes to allow serialization take place
- ○  Create an executable driver class which creates an instance of Library and populates its ArrayList with a number of Books.
- ○  The driver class will also include the following methods:
    - ▪  **public static void** serialise(List<Book1> list) which serializes the application.
    - ▪  **public static void** deserialise(List<Book1> list) which deserializes the application.