**Coding Task for Validata Developers Evaluation**

**Requirements:**

Develop a reusable library in C# to manage phone books for users. No user interface is required, only an API to create, delete and edit phone book entries. Each entry would contain: name (first and last), type (Work, Cellphone or Home) and number. Multiple entries under the same name are allowed. The persistence format of the phone book library should be a file, which is not text-based (XML, JSON etc. are not allowed) and is not an embedded DB either (i.e. SQLite, Access, Excel, etc. are not allowed). In addition to creating/editing/deleting, the library also needs to support iterating over the list in alphabetical order or by the first or last name of each entry.

**Nice-to-do:**

·         You are encouraged to use .NET Framework 3.5 or later

·         Having unit tests in your project is a plus (preferably with NUnit)

·         Thread-safety of the library is a nice-to-have feature.

·         XML documentation of the API is welcome, too

**NOTE**: A short list of the assumptions that you made when designing/implementing the API would be great.