

Advanced Programming

-Assignment2

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- **The change if you use a different design compared to your assignment**

Assignment 1 design is a poor design due to all function put in the drive class, so that is a 'high cohesion and low coupling' design.

As assignment 2 design base on MVC framework, the mainly usage with Modul is stored package people & relation class. These two class can package the people's information and relationship separately.

The main function of peopleMemory class and relationMemory class is stored data which come from txt.file, and have adding & delete function.

The main function of View package is stored interface. Controller package mainly implement interface in view package and interact information with mainControl class in model. In additional, the foundational logic judgment of interface is completed with interface. For example: textbox cannot be blank when user enter the new user name and the name must be a string type. However, like, search child's parents is implemented by mainControl class in Controller package.

- **How the new classes are organized**

Based on there have many custom exceptions need to be throw out, so we put these into the myException package. At the same time, there have tools package which main store:

1. Basic interface to determined code. As there have 6 Interface need to repeat identity same condition so that it can reduce the data redundancy. It is one of the reason why put all of them into the tool package.
2. Due to make interface we used JPanel many time and maybe JPanel should need different background such as color and image so that we make imgPanel class. The unique functionality of this class is instantiating one of JPanel has background.
3. When user implementing miniNet, the system will give relevant response. Therefore, we make a message class to instantiate message which have these relevant response.
4. All the class in tools package is an abstract class. Because we don't want to them be instantiated

- **The process by which your program will interact with user and external data source to run a game.**

When open the MiniNet application, we use ArryList in PeopleMemory class and RelationMemory class separately to atomically store all data from txt.file . MainControl class as a bridge between the interface and model. When users update some information successfully, the data in ArrayList change at the same time then write back to txt.file so the new data will cover the old data.

Note: Because the class diagram is too large, we keep class diagram as photo instead of putting here. Thus, There are two different format(.jpg/.jpeg) photos for class diagram.