Jake Henry Tuten John Le OOAD 4448 05/02/2023 Milestone 7

Go Fish Project 7

Repository:

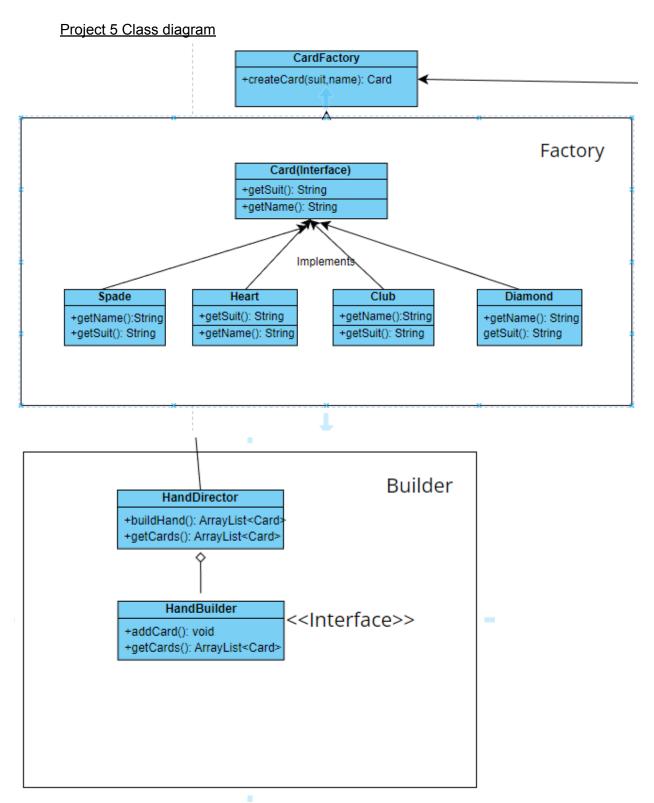
https://github.com/jatu5220/OOAD-Spring-2023-jatu5220-jole (jatu5220@colorado.edu) (jole2101@colorado.edu)

Final State of System:

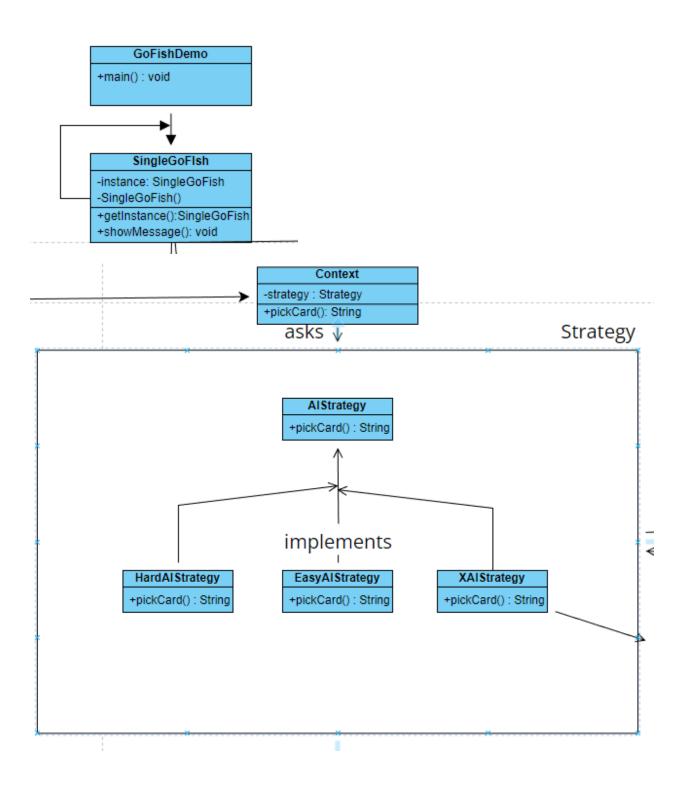
As of now, our system is entirely implemented. We were able to accomplish most of our goals and are proud of our final project. Firstly, our program asks a user for their account information and asks if they would like to make one if they haven't already. After, the program asks the user what difficulty setting they would like to play on. Following that, the player and computer are given cards and take turns asking the other if they have certain cards. Once all of the sets are made, the game concludes. We were able to implement the singleton pattern to ensure that there is only ever one instance of the game running at a time. We then were able to use the factory pattern to create the deck of cards that the game will use. After that, the builder pattern is used to build the hands of cards. Finally, the strategy pattern is used to determine what difficulty the player faces.

The changes that we have made from Project 5 and 6 was that we added a database for the user to create an account and login through their own username and password. The only really big feature that we weren't able to implement was making the Go Fish game into a web online version. Due to the time constraints and our inability to figure out how to incorporate the Java to a website, we decided to not to continue with that version.

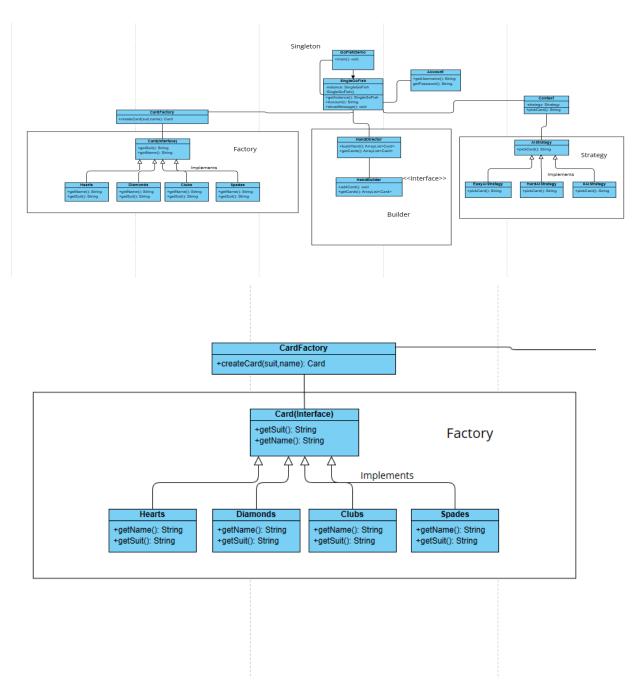
Final Class Diagram:

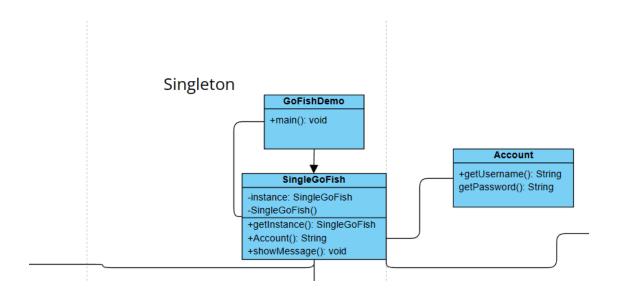


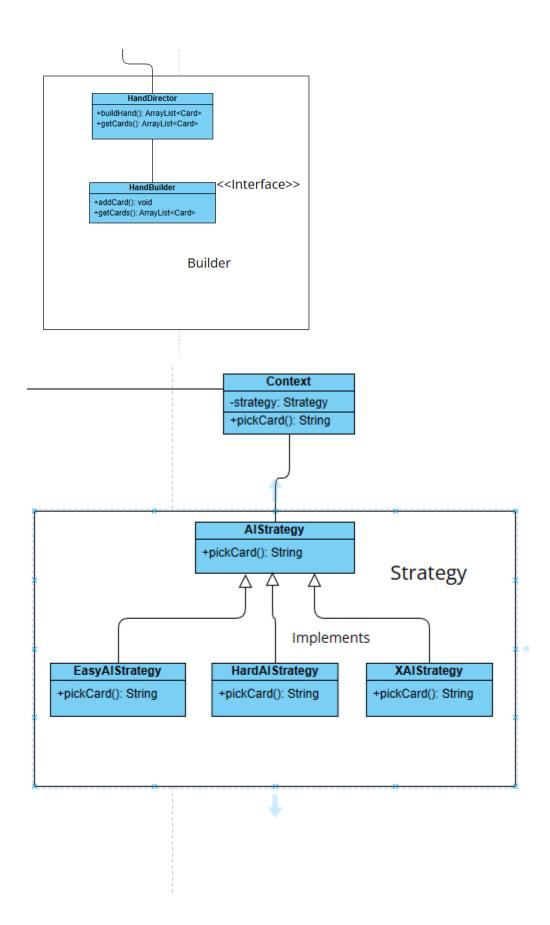
Singleton



Final Class Diagrams







Comparison Statement:

The biggest difference between our original plan and what we actually ended up implementing was that we never ended up making a website for players to play online and therefore only have a command line interface for the game. We were able to implement all of our classes from milestones 5 & 6 as we anticipated and for that reason, the class diagram is very similar, with some additions for some extra stuff we added or needed to implement the other design patterns

Third-Party vs Original Code:

No pre-existing code was taken from any source including stack overflow. We did ask ChatGPT for advice on how to create the database for our game, but the code that we demonstrated and that is in our project is orginal code. (https://chat.openai.com/)

Statement on OOAD process:

We think the project turned out to be really successful. We were able to create a working Go Fish game with 3 levels of difficulty and a database to store an individual's account. One of the things we couldn't get done was implementing a web version of the game. We are sure that we could've eventually implemented this version of the game, but due to the time constraints of this project and projects within other classes, we still think that this project turned out to be successful. Other positives of the design process that we experienced was that coming up with a mockups and diagrams that we were able to reference as we started the coding process. Also listing down the requirements and objectives in Project 5 really helped us know what direction our project was going early instead of making up stuff as we go along.