# Conclusion

In this design report, we decided to add new features, classes after analysis report. Firstly, we have added new Entity objects including Potato, Tomato, Cherry, Raspberry, and Apple class as a subclass of Food class. Accordingly, TomatoSeed and PotatoSeed classes have been added. Besides, Tree class added with AppleTree, RaspberryTree, and CherryTree classes, which Tree class is superclass of these classes. In other words, we added ability to plant new trees to our farmland and new type of plants. Also, we added power-ups like GMO, Fertilizer, and Rain. These new features, will increase the entertainment level of game.

## 3.1 Design Patterns

### Façade Design Pattern:

We are planning to implement our system in Façade design pattern since this structural design pattern helps developers to easily manage subsystem. This design pattern has Façade class which is essential to communicate with classes of other subsystems. Also, Façade class is the only class that communicates with other classes in certain subsystem.

We designed our 2 subsystems in Façade design patterns including, game entities subsystem and game management subsystem. In game management, our Façade class is MapManager class, which controls and communicates with our subsystems and other classes through the actions of the user. Besides, our Façade class in game entities is Map which controlled and modified by the game management subsystem.