# Detailed Design Plan

The detailed design plan is built in order to give the programming side of a project a full blueprint which they can begin to start implementing. In order to do this at this stage in the project, we need to take the high level design document and derive the detailed level design from it. The aim of this plan is to provide some information on how we plan on doing this. It is broken down into several stages:

1. Team Feedback: By opening up the design side of the project to scrutiny from the rest of the team, we open ourselves up to new perspectives and can include elements that were forgotten or could be improved upon.
2. Testing: We can also start to test our design by implementing information about object behaviour. This allows us to refine our design into something more concise and we can find and eliminate issues as they appear. Documenting the information will also be extremely useful for the design team when it comes to understanding how the design works.
3. Refactoring: This is where we begin to improve on the overall structure of the architecture. By doing some additional research into design patterns and our own high level design, we can break down and re-arrange the architecture, if need be. As the programming team is to begin some early attempts at implementation after the high level design is complete, it is unlikely that any major changes will occur at this point in the project, unless it is worthy of significant change.
4. More Detail: Additional detail will be added to the design. As previously mentioned, part of this will entail the introduction of information about the object behaviour. However, we also intend to include information on particular data structures that will be used, as well as elaborating on each individual method that has been listed. Algorithms will be detailed in plain English rather than pseudo-code, as this allows the programming team a greater degree of freedom when it comes to implementing the design.

This is by no means an exhaustive list, and these stages may not occur entirely in order. However, they are five guidelines which the next stage of the design will revolve around.