A Condensed Checklist for Engineering Changes

These are 6 steps which can be followed to ensure each piece of engineering work is developed with clarity. In every step it is essential to pause and reflect for a moment before moving on: *Is there anything I could improve upon thus far?*

☐ **1 Explain the pros/cons** of different approaches.
☐ **2 Describe the changes** you will make in your preferred approach.
☐ **3 Make the changes**, i.e. modify source code.
☐ **4** Explain how others can **repeat your checks** and what they should expect.
☐ **5 Describe the limitations** of your changes.
☐ **6 Provide a history** of how the work progressed.

Material from the middle steps are increasingly formal, with source code being completely formal. The formallity is related to how much effort your colleagues want to see from you, i.e. "make the changes" is a small item in the middle. From your colleagues' perspective, the most important thing is to see that you have put care and effort into understanding the problem and producing a well-considered solution.

You can, and should, ask your colleagues for assistance at any point that you don't understand something. However, make sure you take notes, and that they see you taking notes - they will likely be annoyed if they think you aren't learning from the assistance you requested.