DOCUMENTATION GUIDE

COMP 3900

Abstract

This document is intended to help make sense of the types and purposes of the different documentation types used in COMP 3900, and the links between them.

Original Author: Trevor Lord

Edited by: Donna Turner

dturner80@bcit.ca

Table of Contents

1	FAQs	3
	What documentation is required to be submitted each week?	3
	What are the major deliverables?	3
	How do we complete each document?	3
2	Scope and Mission	3
	Overview	3
	Inputs	4
	Outputs	4
3	Project Proposal	4
	Overview	4
	Inputs	4
	Outputs	4
4	Stage Plan	4
	Overview	4
	Inputs	4
	Outputs	5
5	Weekly Status Reports	5
	Overview	5
	Inputs	5
	Outputs	5
6	Estimates and Actuals	5
	Overview	5
	Inputs	5
	Outputs	6
7	Weekly Meeting Minutes	6
	Overview	6
	Inputs	6
	Outputs	6
8	Risks and Issues Working Table	6
	Overview	6

Inp	outs	. 7
	ıtputs	
	Test Plan	
Ov	verview	. 7
Inp	outs	. 7
Ou	ıtputs	. 7
10.	Test Cases	. 7
	verview	
Inp	outs	. 7
Ou	ıtputs	. 8
11.	Work Flow Process Diagram	. 9
Ov	verview	c

1. FAQs

What documentation is required to be submitted each week?

Starting in **Week 2** and in **each week** of the course from that point forward, your team must submit the following documents to the appropriate Dropbox folder in D2L:

- Meeting Minutes (x3): for Team, Supervisor, and Client meetings
- Status Report

What are the major deliverables?

The major deliverables include:

- draft and final versions of the Scope and Mission document
- Project Proposal
- Stage Plan for each Stage (1 − 4)
- <u>Test Plan</u> and <u>Test Cases</u>
- Risks and Issues Working Table

The schedule for these documents is posted on D2L.

How do we complete each document?

Refer to the documentation guides below for some information that could be useful.

2. Scope and Mission

Overview

The Scope and Mission document is where you identify and define the (business) problem(s) your Client is trying to solve through this project and their goals. It is also where you document the parameters for the project, including performance targets, the boundaries of what is in and what is out of scope, and who will be using the solution. The creation of this document is project scoping and business requirements gathering process. This document has a multi-step approach so that you have time to review it with both your Supervisor and your Client to ensure that you have a complete and accurate understanding of the goals and parameters of the project.

To understand your Client's goals, seek to understand how their business will be quantifiably better with the successful achievement of the project, i.e. what will your Client have when you are finished that they do not have currently, and how does that add value for their business. Keep in mind that the technological solution you and your team will work on is a tool, a means to an end and not an end in itself. Therefore, the questions you and the team need to answer – and document in the Scope and Mission document – are about the Client, their business and their goals. If you and the team do not fully understand *why* the Client wants your project and you focus on technical features and functionality without understanding the real-world needs driving those requirements then you have a real risk of an unsuccessful project.

Inputs

- The project scoping and business requirements gathering processes are the inputs for this document.

Outputs

- The **Project Proposal** is developed, in part as an output of the creation of the Scope and Mission document.

3. Project Proposal

Overview

The Project Proposal is where you document the technical solution(s) you and your team recommend for your Client. You can propose more than one solution and ask the Client to select the option, or group of elements that works best for their needs. Of course, this will need to be reviewed and approved/amended by your Client before you can proceed.

Inputs

- The project scoping and business requirements gathering processes, which also leads to the creation of the **Scope and Mission** document are the inputs for this document.

Outputs

- Project Execution, which is detailed in your **Stage Plans**, follows from the Project Proposal.

4. Stage Plan

Overview

You and your team are required to complete a Stage Plan for each of the four Stages of the project. You can think of the Stage Plan as a mini-project plan or a statement-of-intent for each Stage. In the document you detail: your measurable goals for each Stage of the project; the tasks that must be completed to reach those goals; the owner(s) of each task; and the target completion date for each task.

- Each Stage Plan is an important document that you will use to organize and drive progress on your project
 - Your Client and Supervisor also will use the Stage Plans to gauge how well you and your team are doing
- Draft items for each Stage Plan at a low enough level of granularity that you can actually make and demonstrate incremental progress throughout each phase.

Inputs

- Ultimately, all Stage Plans are based on the Scope and Mission document and the Project Proposal
- The Stage Plans for Stages 2, 3 and 4 are based on the Stage Plan that preceded it
- Include any open items from the weekly Status Reports in the Stage Plan for the upcoming Stage

Outputs

- Track the status of any open items from the weekly Meeting Minutes
- The progress against the Stage Plan for each Stage is tracked in the weekly Status Reports

5. Weekly Status Reports

Overview

A Status Report is to be completed and submitted to D2L at the **end of each week**. The purpose of this document is to provide transparency around the progress and current condition of the project. Each Status Report is an honest and succinct snapshot of the state of the project at that moment.

Use the Status Report as a record of upcoming tasks, issues, risks and decisions as well as any of those items that are currently open. Report the facts about good news as well as those places where improvement is needed. You want there to be no surprises for your Supervisor.

Inputs

- Track the status of any open items from the weekly Meeting Minutes
 - An "open" item is anything that requires effort to be progressed and completed
- The progress against the Stage Plan for each Stage is tracked in the Status Report
 - o i.e. in an Stage Plan you say that tasks X, Y and Z will be completed by a certain date
 - Then the status for those tasks is reported in the weekly Status Reports as you prepare for, execute and complete those tasks
 - You can consider an item "closed" once it is 100% completed

Outputs

- Open items become agenda topics for the relevant meeting(s) in the following week
- Open items become input for further Stage Plan and Status Reports

6. Estimates and Actuals

Overview

Think of this as your timesheet, which is a common weekly chore in industry. It is a working document that is to be updated and submitted to D2L at the **end of each week**. The purpose of this document is to track your budget, which for software projects is typically recorded in units of time.

The secondary purpose of this document is to gauge your estimating skills. You will not be evaluated on how close your estimates come to the actual time spent, that is for your interest only. Ideally over the course of your project, as more becomes known, you should see less discrepancy between your estimates and actuals.

Inputs

- The Work Breakdown sections from the **Stage Plan**s could be the basis of you're the tasks. These can be further broken down in the Estimates table if necessary.

Outputs

- The Estimate and Actual values of completed tasks are included in the Weekly Status Reports
- The Estimates, Actuals, and Variances of the project are summarized in the Final Presentation

7. Weekly Meeting Minutes

Overview

Meeting Minutes are intended to provide a detailed record of the decisions, tasks and open issues from each of your Team, Supervisor, and Client meetings. Identify which team member will record minutes prior to each meeting and strongly consider rotating this responsibility.

- Important share the Client Meeting Minutes with your Client
 - This provides a common reference point for the future and an opportunity for your Client to clarify and/or add to your ongoing discussions
- Important share the Supervisor Meeting Minutes with your Supervisor
 - This provides a common reference point for the future and an opportunity for your
 Supervisor to clarify and/or add to your ongoing discussions
- Ensure that each Action Item has an **owner** and a **date** for completion
 - o i.e. if a task is identified in a meeting, also in the meeting make sure to define and note the details of the task, who will complete it and when it needs to be completed

Inputs

- Each meeting requires an Agenda, which is a listing of the items to discuss/decide in each meeting
 - o There is no template provided for this but there are many simple templates online
- Agenda items for meetings could come from previous Meeting Minutes, Status Reports, Stage
 Plan, or from the Risks Table or Technical Issues Table

Outputs

 Items from Meeting Minutes can be incorporated as tasks in Stage Plans, as risks or issues in either (or both) of the Risks Table and Technical Issues Table, as items in weekly Status Reports, and as Agenda items for future meetings

8. Risks and Issues Working Table

Overview

Risk Management is an important but unloved aspect of any well-managed project. This is the process of identifying and documenting which issues, dependencies or unknowns could knock your project off-track. For our purposes a "technical issue" is any challenge of a technical nature that is not yet completed – whether your team has identified a solution or not.

A complete Risk Management approach also develops and documents contingency plans to help the team to anticipate how to move ahead in the event that any of the risks occur. A "contingency plan" is

your backup plan – what does your team do if a risk actually occurs, e.g. if you are promised some legacy source code by a certain date, what will the team do if the code does not arrive on that date.

The Risks and Issues Working Table is used to track any open risks and/or technical issues on the project whether big or small, simple or complex. The table is generated based on the project scoping exercise and is kept up-to-date as the project progresses and as risks occur, are mitigated away (eliminated), or simply change and multiply.

Inputs

- Risks and issues are identified in the **Scope and Mission** document.

Outputs

 Risks should be noted and discussed in team meetings, tracked in Status Reports and managed/mitigated in Stage Plans.

9. Test Plan

Overview

This is the plan for how you and the team will approach testing, including what environment(s) you need, which types of scenarios you will test, and whether any special permissions are required. It is never too early to plan for testing. Ideally, you and your team plan for testing at the same time you plan for how you will development. Do not make testing an afterthought or try to leave it to the end.

Inputs

Scope and Mission document, Project Proposal and Stage Plan

Outputs

- Test Cases
- Stage Plan

10. Test Cases

Overview

Once your team has defined how it will approach testing, then you define and document the test cases you will run, and the results. These are the individual scenarios/scripts/use cases/function points that will be tested as many times as necessary to ensure complete and usable functionality.

- Each Test Case needs an owner, a date on which it was run, as well as the expected and actual outcome
- Expect that you will run and re-run the Test Cases in multiple iterations

Inputs

- The Test Plan
- Testing cycles will be planned in the Stage Plan

Outputs

- There will be multiple iterations of the **Test Cases** themselves
- The Risks Table and Technical Issues Table, as required
- Testing cycles will be planned in the Stage Plan

11. Work Flow Process Diagram

Overview

This process flow diagram shows the connections between the documents listed above:

