## Glossary of Terms for Assignments

## CBP 24-07-21 Ver.1

Here is a glossary of terms I use in my assignment matrices. I guess you will be familiar with most of these, but I've highlighted some important new terms. The ones in blue refer to learning conversations.

annotated code	You can do this at several levels. A large program may have a 'goal hierarch', e.g., the entire program may find the maximum and minimum of an array of integers. So, the top goal would be just that. Sub-goals could be (i) iterate over the array, (ii) compare the current number with the stored maximum and minimum. You could annotate your program with this hierarchy. Other useful annotations would be (i) explain what each function/method does, (ii) state where variables are declared (and where they are initialized. If you are coding in OO, then you would talk about classes, inheritance, interfaces, and all that lovely stuff.
comprehensive	An explanation (or critical evaluation) is comprehensive when it is broad and considers many aspects or points, rather than focussing on details of a single aspect or point. So, it is complementary to <i>detailed</i> .
coherent	This means that your text hangs together; it flows rather like a story, each written clause (sentence) is related to a previous one, so there is a thread. It is the opposite of a list of bullet points.
critical analysis	Analysis is logical and ideally presents both sides of an argument. Applied to data it could consider accuracy and repeatability.
critical evaluation	Analysis is logical and may critique just one side of an argument. Applied to data it could evaluate the data in relation to the real world (validation).
design and build discussion	A good way to document this is a bit like a diary. As you design your artefact, you should record sketches
detailed	An explanation (or critical evaluation) is detailed when it provides a focus on a single aspect or point rather than considering many points. For example, in discussing operating systems, you may want to focus on the operation of the scheduler, providing examples of how it works (rather than talking about MUTEXes, semaphores and other lovely things.
enhancing	This means you provide additional material which is very closely linked to what you have been asked to write. In effect it is adding <i>detail</i> rather than new information.
expanding	This means you provide additional material which is loosely linked to what you have been asked to write. In effect you are adding new information making your writing more <i>comprehensive</i> .

exploratory talk	A real conversation with one or more fellow students. You <b>explore</b> alternatives (e.g., robot designs or solutions to a problem). Some of you may have different designs or solutions. This talk is about how you deal with these differences; perhaps you converged on an agreed design or solution, perhaps not.
extra material	Material not presented by the lecturer, not present on the worksheets. It comes from independent study and research
learning conversation	This means a conversation with one or more fellow students where you share ideas, to understand an issue, solve a problem or even debug code.
observations	You will perform an investigation, perhaps using the Unreal-4 engine to learn about wind turbines. Almost certainly you will change an <i>independent</i> variable (such as wind speed) and see its effect on the turbine rotation speed. You could make a <i>direct observation</i> , looking at the simulated rotation and make some conclusion based on what you see. Or you could make an <i>indirect observation</i> , perhaps your code will output the power generated for each speed. You would present this as a speed-power graph; I call this an <i>indirect</i> observation.
persuasive	Refers to a position paper where you provide a strong argument, taking the reader through some clear logical steps and arriving at a strong conclusion. The reader may be persuaded to say 'Yes, I agree with this'.
relevant	Applied to citing journal articles, the point made in the article is connected to the point made in the paper (the paper could agree with the article or critique it)
shared thinking	This is a conversation where you exchange thoughts and ideas with fellow students, and you feel that you move forward together.
statement of position	A <i>Position Paper</i> lets you speak from your heart. You should express your personal feelings on the topic, yes, your <i>opinion</i> . It is an opportunity for you to be <b>creative in your writing.</b> You do not need to situate your position against others' (no journal references required). But the bottom line is that your position paper needs to be based on workshop activities.