**Lab Reports**

The purpose of the lab report is for you to show me what sort of results you are obtaining from the sessions. In general I am expecting 4-5 pages, perhaps longer depending upon how many Figures you include. It is ***not*** appropriate to include extensive details about how the microscope was aligned etc. It is also ***not*** appropriate for you to repeat/copy basic explanation material from a textbook or the lab guide ***unless*** it is important to make a point or explain something. Note that anything taken from a textbook or lab guide needs to be appropriately referenced. It is highly appropriate (required) for you to label and identify any relevant features in images or diffraction patterns – this is what most of the marks will be for (and where marks will be deducted). The aim of the labs, in addition to teaching how to use the microscope, is to teach you how to interpret your images/diffraction patterns. A concise, well-organized and well-printed lab report that can read with the least effort will score much better than one where the grader has to struggle to understand what you did.

General rules:

1) All diffraction patterns should be indexed (not every spot) and the zone axis given.

2) All images should include a scale bar. General practice is to use round units, (e.g. 100 nm) not odd ones (e.g. 73.2 nm)

3) All images and diffraction patterns should be readable in the final printed form – you have to play around with the conditions to get this.

4) Any features you want to draw to my attention should be explained, either in the text or Figure Captions. (Put the Figure Captions close to the Figures, not at the end as in paper submission.)

5) Type the report, don’t hand write it!

6) Use a spell/grammar checker. I don’t expect perfect English, but you will make my life harder (and generate an unfavorable impression) if there is a spelling or grammar mistake in every other sentence.

7) As appropriate, proper citation of sources is ***required***. (Not to do so is technically academic dishonesty.)

8) If your session or negatives died an ugly death, borrow results from someone else, stating clearly that you did this.

Note: I expect you to do the reports in groups – but you do not have to.

All lab reports are to be submitted electronically.