

Breakout session on “Laboratory Assessment”

Thursday 18th June 2020

Report by Chris Mellor, University of Nottingham

Points that arose from the discussions on Laboratory Assessment:

- a) Next year everyone at the meeting expects to start using electronic laboratory diaries. OneNote seems to be the default choice, probably because it is included with our institutions' Microsoft license and is therefore supported by our institutions' IT departments. We suspect that there are settings that need to be customised for efficiently running laboratory notebooks in OneNote e.g. retaining all versions of the notebook (I think that by default changes that are more than 2 weeks old are deleted). One US institution we heard about uses OneNote as an electronic lab book but requires students to submit the final version as a pdf – perhaps because learning environments/Turnitin handle pdfs better than a OneNote document.
- b) Increased use of electronic notebooks will mean that we need to ensure student access to suitable IT resources.
- c) For laboratory reports no major changes are foreseen for next year, however we did discuss issues such as different laboratories within one department having different guidance for student reports/notebooks. This resulted in the students having to second guess what a particular lab viewed as good practice, which they found frustrating. Other participants shared that they were working hard to ensure that laboratory organisers within a department had a shared understanding of report/notebook requirements to reduce student frustration.
- d) Next year, the consensus was that there would be more open investigations rather than simply following instructions. This was felt to be a positive development.
- e) An interesting approach being used in one institution with third year students was to ask that the students assess their own lab notebooks against defined criterion each week. This produced a summative mark but more importantly the quality of note keeping improved as the semester progressed due to the student reflection.
- f) Another approach was to present the students with the description of the criteria to obtain different grades and to negotiate with them to commit to achieving their chosen grade.
- g) Another challenge that was identified was a high turnover of postgraduate demonstrators and that additionally we will need to work out how to train laboratory demonstrators to teach and assess effectively in a COVID-19 world.