BIO00028H Bioscience Capstone Project FAQ Document

Questions raised in the S2 report writing session:

Q: If im using a figure that relies on colour to show the information like a chord diagram, should i include the same information somewhere else
A: I'm not familiar with chord diagrams. I accept that sometimes data actually come in colour form: for example a picture of some stained cells. In that case you have to stick with colour, especially if converting it to greyscale loses e.g. clarity. In most cases they don't. Many figures that typically use colour do not actually need to: for example heatmaps can be done in greyscale. Or they can be tabulated. Generally it's not recommended to repeat the same information twice in a project report, but if it's done for accessibility reasons with one form being in main text and another form in Suppl. Info., that's probably more acceptable.

Q: how many words should the methods be?
A: We leave that up to you. Part of becoming a writer is making those decisions for yourself. You will need to balance the benefits and costs of making your methods section shorter or longer. Projects that have used many or complicated methods will probably need longer methods sections. On average they are probably about 25% of the 4000 words = 1000 words.

Q: is an ethics form and risk assessment needed for data science projects
A: yes: those could have ethical implications (e.g. data could include personal info or belong to someone) and could involve risks (e.g. repetitive strain injury). Plus we want you to have thought about those issues.

Q: How many words would you recommend for the discussion?
A: We leave that up to you. Part of becoming a writer is making those decisions for yourself. You will need to balance the benefits and costs of making your discussion section shorter or longer. Projects that have lots to discuss will probably need longer discussion sections. On average they are probably about 25% of the 4000 words = 1000 words.

Q: How would you recommend splitting the word count?

A: I would recommend making that decision for yourself based on the needs of your project and given that making one section longer might necessitate making other sections shorter. Some projects generate lots of results and might need longer results sections and discussions. Others have complicated methods and might need longer methods sections. On average probably each section is about 1000 words.

General Questions raised in S1

Q: I am doing a science communication project, and I am not sure on where to find resources on the VLE to help me know what is required from me each week. A lot of the weekly videos or resources are focussed on lab or data based projects, so I am not sure which parts are relevant to me.

I have been trying to find resources on how to structure or write the 3000 word report alongside my communications resource. Where would I be able to find some guidance on this, and when are we expected to start writing this?

In terms of the weekly tasks, what are we meant to be mainly focussing on at this point of the project for science communication? As lab based projects are currently planning out their methodologies etc. I have started planning out my communications resource but feel as though I need to be doing more at this point in time.

A: All the weekly videos are important training: if you feel your project does not have e.g. strong health and safety, ethical or data analysis issues then lucky you for now, but these are useful life skills nonetheless, so please treat them seriously. With the exception of lab work training etc, all the activities on the module planner are relevant to non-lab projects. You are expected to give a project plan presentation for example in weeks 7-8, and to have a draft of your first project section (for you, the justification rather than introduction), by week 0 S2. The guidance for the 3000 word report is found with all the other project documentation: In Module Information, How to study this module. The assessment criteria will also be helpful. These documents were pointed out to you in freshers week. You will be expected to write as much as you can as soon as you can: the Justification should be in draft form by week 0 of S2. The rest will normally wait until nearer the end of your time, with a complete draft expected by S2 week 7. So, just as for all other students.

Have you asked your project director what they think you should be focussing on? They will have more detailed knowledge of what is appropriate for your project. For a Sci Comm resource project I would be asking my students to find out what already exists for the topic I want to communicate and to the chosen audience, assess the need and benefits of creating such a resource, read pedagogic literature about the best ways to communicate my chosen topic to my

chosen audience (including establishing principles of design), and design approaches to evaluating my resource once created. So, lots to do, before you even get to creating the resource itself. All this is in the guidance doc above and assessment criteria. Looks like reading that will answer a lot of questions.

Questions from the week 4 session “Preparing for your project plan presentation”

Q: How long should it take us in general preparing for the project plan presentation?
A: All the work you do on your project between starting it and the project plan presentation will be contributing to that. So the unhelpful response will be: 1.5 days x number of weeks spent working on the project. Now, some people will be able to devote lots of time to this as their project directors will expect them to dedicate their time entirely to planning activities. Others amongst you may have other commitments due to the nature of your projects; for example setting up experiments, learning how to use equipment etc. Although this is helpful for your plans indirectly, it detracts from time you can spend e.g. background reading, and making slides etc. So the also unhelpful response is that there is no general expectation but preparing plans is a vital part of doing a good project and your directors will probably be supportive of that being a main activity between now and weeks 7-8.

Q: if we’re doing a sci comms project for schools, are we allowed to collect data on how well it works for schools, with consent obviously?
A: In general I would encourage you to collect data to objectively analyze the efficacy of your output. However, bear in mind that this may require ethical approval and that under 18-year-olds require special categories of safeguarding for which your director may not have ethical approval. So discuss this with your director.

Q: for a sci comm output, is the actual piece of communication marked?
A: yes, the quality of that communication output is part of the marking criteria, but alongside your report justifying and evaluating it. I’d encourage you to look at the marking criteria to see how these different elements are assessed.

Questions from the Week 1 “Choosing your project” session

Q: If our top choices are a particularly popular option, how likely is it that we will be allocated one of our bottom choices that are less popular?
A: More likely. Obviously if your first choice is very popular, and 100 people ask for it, you will have a roughly 10% chance of getting that, but it isn’t as simple as that because

it also depends on what other choices those and other people also put down. I can't put a more precise number on it.

Q: How significant of an impact does your choice of project have on further study or employment? would you recommend prioritizing projects you're particularly interested in over ones that seem the most e
A: The type of project you do is important for further study and jobs, but it depends on what you have in mind. If you know you want to work in a lab in the future or do a lab -based research masters, you should really want to do lab projects. For non-biology related jobs I don't think it will matter so much what your project is, as all projects develop the transferable skills that an employer might look for. What you need to worry about is if particular technical skills are present in one project but not another. I hope that helps. I do have a tendency to recommend people to follow their interests, as that will probably be playing to your strengths and hence help you to achieve a career in which you are satisfied and can perform well.

Q: do we have to buy our own physical lab book or will one be given to us?

A: If you need a physical (hard copy) lab book (e.g for a lab project) you will need to buy it yourself. Your director however may allow you to use a google doc or some other free equivalent.

Q: Are labs timetabled or do we organise when we go in with our project director?
A: They will not appear on your timetable. You will have to book lab space on a booking system, and this will all be explained to you on your lab orientation. Your director will be able to advise you.

Q: When do we need to start writing the learning journal?
A: The LJ will be introduced to you in week 5. We will then encourage you to use it to reflect back on your semester so far and to discuss that with your personal supervisor at your group supervision meeting in week 6. Once you have your LJ you can use it to record reflections on anything at any time.

Q: How likely are we to get our bottom choices? How Many students a year get their top 3?
A: I can't give you any precise numbers because we have never run the allocation with this many staff and students before, so I have no data on which to base a guess. All I can say is that putting your preferred choice at the top of your list will make it more likely that you get it, as the algorithm tries to give people their highest preferences.

Q: If I have already selected but changed my mind how do I go around sorting it ? Do I do another google form ? Or just edit the first one I submitted ?
A:Just edit is easiest. We will take the last submission if you submit more than once.

Q: I would like to choose biotechnology projects, but I am not officially on the biotech pathway (but I have taken the required optional core modules for this specialism last year). Can I choose them?
A: Your choices must be those which are listed as eligible for your programme. If there is a project which you feel is relevant to your programme but not listed as eligible, please get in touch and we can ask the director.

Questions from the Stage 3 welcome session.

Q:Is it too late to switch to an integrated masters?
A: Apparently not, but if you are thinking of that you should talk to your personal supervisor and SAS. The final deadline is Wednesday week 1 at noon because that is the deadline for IM project choices submission! So act quickly!

Q: Are there past exam papers we can use to prepare for the real exams or is this against regulations?
A: We provide a single example paper, questions only and with answers and feedback, for each module which should be on the VLE, usually under the assessment tab. In Stage 3, workshops prepare you for the assessment whatever it is, and if the assessment is an open exam paper, you should be provided throughout semester with other example questions to try. The purpose of stage 3 modules is very geared towards assessment preparation.

Q: I have submitted my project choices but I want to change it. Can I do that my editing my google doc ? Or do I need to email someone ?
A: Just submit the form again. We will use the last submitted set of answers we get.

Q: What's the deadline for changing modules?
A: Noon Monday Week 2 (30 september 2024).

Q: Are our project lab books separate from our lab books from Stage 1 and 2. May have lost that one over the summer…
A: Yes, they are new for your project only.

Q: Who marks our project reports?
A: The first marker reads the report, and proposes a mark. The first marker is an academic with expertise in the same general area as your project, but is not your director. The project director then looks at the report and the mark and can either agree or disagree. If they disagree, then a discussion must take place to agree a mark, and if they are still not able to agree it goes to a third marker.

Q: How many hours a week should we aim to spend doing independent study?
A: There is not much timetabled activity, so what you should ideally do is this: spend 1.5 days a week on each of your modules, including any timetabled work. That is how we work out that you should spend 1.5-2 days a week on your project in teaching weeks. Because it's one third of your credits. The same should apply to your other modules. The "minimum" you can get away with is normally suggested by your module leader for each module, as they will have suggested "directed study" activities which they consider core, and then it depends on how much time those take. Generally however those are only 2-3 hrs a week, in principle (you may find they take longer), though they often suggest extension activities for those with more time.

Q: when you said projects have a topic does that apply to sci comma or can you pick your topic for that?

A: There is generally quite a lot of freedom for the Sci Comm projects but the degree of freedom varies from director to director: for example Richard Waites allows lots of freedom, Pen Holland supervises gaming-based projects etc, Dani Ungar supervises very specialized projects on rare diseases. You will see this in the project choices booklet.

Q: When we meet with our project director will it be a 1 to 1 meeting or a group?
A: Generally you will have opportunities for both types of meeting. This has been left up to directors to arrange but I am certainly running group meetings every week plus drop-in opportunities for people who want to talk individually.

Q: How many credits is the research project worth?
A: 40.

Q: Are we able to get new lab coats? I've come back from a year away and have no idea where mine has gone
A: if you don't have a lab coat or lost it etc we will supply you with a new/clean second hand one. Ask in the teaching labs.

Q: Do we have access to graphpad or biorender?

A: These are not listed as supported by IT services but we have a GraphPad Prism subscription for the department. People can pay for a seat on it, the cost is about £84 for the year. We don't have Biorender but a lot of people use the free version of it.

Q: Is it possible to get access to a lab outside of normal working hours if it is required for your project?
A: Yes, sometimes, but within strict limits. You will need to apply for permission for this via a form so we know who is doing what and when. Your project director or the teaching lab technicians will be able to advise you. Any out of hours activities must be risk free or appropriately supervised.

Q: How are first markers allocated?
A: This is done by the Chair of Exams committee in conjunction with the Deputy Head of Department for Teaching and Learning. We aim to share the workload sensibly across staff whilst retaining appropriate marker expertise.

Q: Are our reports marked anonymously?
A: In the past, and this is currently our policy, we have not marked anonymously because generally it will be obvious to your project director whose report is whose, so anonymity is impossible. So we do ask for your names on your project report.

Q: Do we have to use r studio within science communication projects?
A: There is no general rule for any project that you have to use R for data analysis. Looking through the list of Sci Comms directors, it is unlikely that any of them will demand that you use R. However, many Sci Comm projects will require quantitative data analysis.

Q: If you get allocated a project you don’t want to do, can you design your own project with a lecturer?
A: First, don’t choose a project that you don’t want to do. Make sure that you are keen to do any of them at the point of choosing. We realize that people do sometimes have second thoughts once projects have started, but this is generally a very small minority. The vast majority of those people persevere with their allocated project and make it work because their feelings change. If you are genuinely miserable with your allocated project, and can’t make it work, which has happened rarely, we would try to work with you to find out what would work best given the other options available. But most likely we would try to fit you into another existing group (so this is not the same as designing a bespoke project). The further into semester these problems arise, the harder it is to make changes, as you can imagine.

Q: Do you have any recommendations about who I can talk to about help for applying for further study? Like meeting deadlines etc
A: Talk to your personal supervisor first of all. It depends on what type of study you are interested in. If you know what type of study you are interested in, the deadlines are generally easy to find online.

Older General project questions

Q:Should we still be having weekly meetings with our supervisor, I haven't seen mine since we came back from easter break but there is still a slot on the timetable for weekly meetings. I don't want to be disadvantaged if other people are getting weekly meetings to discuss progress.
A: up to you and your director if you want to meet. I have met with my students if they want to but left this up to them to decide and most have decided they don't need to. Most queries at this stage will be quite short ones and may not merit a meeting.

For marking, the mark scheme has jumps between percentages, e.g. 65, 68, 72 etc. Does this mean you can only be score one of the stated grades rather than getting anything in-between such as a 70?
Answer: Correct. It is called stepped marking and we are adopting it for all open assessments. If you had any other open assessments this year it would have used this kind of marking.

Is there any way of running draft reports through turnitin to make sure there are no issues ahead of time before final submission?
Answer: You can use Turnitin as part of your writing process to help you check your use of source information. To access the Turnitin submission points, complete the **Online Turnitin Tutorial** in your VLE module list.

What is the risk assessment and is it part of the report/is it the same as the ethics form? I am doing a low risk data project and haven't heard anything about it?
Answer: for information about the risk assessment see here. Even for a data project there are risks to manage, such as musculo-skeletal and eye strain issues. The risk assessment is not the same as the ethics form: for information on project ethics see here, available in the "Module Information", "How to Study this Module" folder.

What should the lab book include as there are no examples of this?
Answer: Information on lab books is here.

How many words is the abstract?
Answer: see the marking criteria on the VLE.

Do words in your figures count towards the word count? for example labels and words in a bioinformatic workflow.
Answer: no. Figures do not count as text, even if they have words in them.

I didn't receive any written feedback for my introduction, i have spoken to my peers and a few of them said they did, or at least got comments added and some changes suggested to be made. Is this normal?
Answer: Academic staff have many demands on their time, and sometimes require a polite reminder to fulfill a specific commitment. You should feel free to e-mail or offer in person a polite reminder to your project director if they have forgotten to provide you with comments on your introduction. However, at this stage it is probably sensible to just wait for comments on the full draft report.

Q: Are those doing data projects meant to have the equivalent to a lab book? Thank you!
A: Yes, talk about it with your project director, but I'd recommend a google doc which is a diary of what you do each day, include any important records like file names you have created and what's in them, maybe links to code etc. You can use it as a way of interacting with your director as well by sharing it with them, and you can then share ideas and get feedback from them: for example drafts of hypotheses you want to test, or analyses you wish to implement.

Project report writing questions.

Q: Would it be better to include asterisks in a graph to show significance or should we include the exact p-value?
A: I think this varies depending on the field of Biology, so I would advise looking at a paper within your specific field and seeing what is standard. In my area (Ecology and Evolution) we tend not to like having statistical results text actually pasted into figures and use asterisks in figures instead. Statistical details are normally reported in Tables (if there are lots of them) or the main text. But, I know areas of Biology where this is not standard.

Q: Can we make multiple submissions up to the deadline? or is only one submission allowed?
A: I don't know, but in the past the department has been sympathetic to multiple submissions and marked only the most recent. I imagine lots of people will want to do that.

Q: In the introduction, is it better to put my aims in a separate paragraph and list them (e.g. Aim1:... Aim2:...) or should I integrate them into my final introduction paragraph
A: these different approaches have advantages and disadvantages. In general I would imagine your markers would expect to see prose rather than stand-alone lists, although lists integrated into the text can work.

Q: If my figure legend/panels within the figure overlaps on to the next page - is this okay? As some of my figures have multiple panels and so some of those graphs overlap onto the next page and I can't fit it all on to one page without leaving a massive gap. If this is allowed do I need to include anything in the figure legend stating this.
A: It is not ideal is it? If I were you I would consider repositioning the figure so it does not leave a big gap in the text.

Q: Hi, are footnotes included in the wordcount?
A: I am a bit confused by the question. Footnotes are not very standard in the Biosciences but are common in the humanities. Hence I would not expect to see main text footnotes. The only place I have ever seen footnotes in the Biosciences is when a Table requires a brief legend but more explanation is needed to make that transparent to the reader, in which case further explanatory text can be added to as a footnote under the Table. In the latter case this would be part of the Table, hence not main text and it wouldn't count. If you used footnotes to the main text, reconsider doing that.

Q: For the ethics form, is this just the word document we used to complete the google form that was sent out? Can we edit the bit about describing our project in 100 words if this has changed slightly since finishing it (i.e. didn't have time to carry out something we planned)
A: that would be fine.

Q: For projects with little ethical considerations, you mentioned that all have ethical considerations in data curation - I am unsure how this is. Is it the way we store and back up files? I don't know how this involves ethics.
A: Yes. Some people might regard it as a reckless use of funds and time if you do not store the results of your work adequately.

Q: I am doing a science communication report. I am confused as to whether my surveys and participant information form should go into the supplementary information section or the appendices. I have included additional graphs in the appendices section and links to my 'workshop material'.
In my report, I have mentioned 'please see the supplementary section for surveys and participant information form'. Is this the correct way to go about this?
A: The distinction between appendices and SI is that the former must be text and will form part of the report. The latter will not necessarily be text and is less likely to be looked at by markers. I think either would be acceptable but maybe a survey form would be something you would expect markers to want to look at and so might be more appropriate in an appendix. Your text seems fine: could it be briefer? (e.g see Supplementary Information). .

Q: Is it ok to have a lot of very long tables? They are necessary to keep in the main report, and cannot be shortened, but I'm worried there will be too many pages just taken up with tables.
A: I understand the dilemma. I would hope that, if there is no alternative, and those are your main results, then the markers would recognize and understand that. However, just be sure there is no alternative. You do not want your main results to be relegated to supplementary information.

Q: Just to be clear, can we submit the supplementary material as a zipped folder to the vle submission point?
A: If the google form allows that and the instructions on the VLE accommodate that, then that sounds fine. I haven't tried it out myself.

Q: Do you have to include R scripts in the supplementary material or is this an optional thing?
A: This is good practice and your markers can view the supplementary materials but they do not form an explicit component of the report mark scheme. I think the degree to which this matters depends on the nature of your project: for some data science projects it might represent most of your novel work, hence could be viewed by markers as important, but for a lab project which involves a single t-test at the end it would not matter a hitch.

Q: How can I demonstrate 'critical and analytical synthesis' when my project does not involve any statistical tools?
A: synthesis is done when you discuss your results (i.e. in discussion). Being critical means evaluating the robustness and importance of your results, whilst synthesis means bringing together the various elements of your report (if appropriate) for a coherent narrative. These seem to have little to do with statistical tools.

Q: If our report must be anonymised why is it allowed to include our name and supervisor on our title page?
A: reports should not be anonymized. They are marked by the director (second marker) so they will know who you are.

Q: Can the supplementary info be a word document containing the ethics form and risk assessment or should it be a folder?
A: You can have a series of elements if they are of many different formats e.g. sound files, R projects, word documents. If everything is text, by all means stick it in a single word file.

Q: For our write up, is it better to include the results and graph of an experiment that didn't work, or should we omit it entirely
A: You should not necessarily report everything you have done on your project and part of the art of report writing is choosing the best material to include so as to make a nice tight story. So the answer to your question is that it depends, for example on what else you have available for your report and what kind of story you can tell with the entirety of what you have done. If all you have is an experiment that didn't work, you should still be able to achieve a first class mark, because the marking criteria say nothing explicitly about what the results actually are. If you can afford to leave it out, then you might consider leaving it out.

Q: If I cannot produce a graph for my data, as it is not usable, should I omit this from my methods section and pretend that experiment never happened?
A: You should not necessarily report everything you have done on your project and part of the art of report writing is choosing the best material to include so as to make a nice tight story. So the answer to your question is that it depends, for example on what else you have available for your report and what kind of story you can tell with the entirety of what you have done. If all you have is an experiment that didn't work, you should still be able to achieve a first class mark, because the marking criteria say nothing explicitly about what the results actually are. If you can afford to leave it out, then you might consider leaving it out.

Q: Should I include data that isn't statistically significant? I only have two graphs so far and I fear I won't have much to talk about.
A: You should not necessarily report everything you have done on your project and part of the art of report writing is choosing the best material to include so as to make a nice tight story. So the answer to your question is that it depends, for example on what else you have available for your report and what kind of story you can tell with the entirety of what you have done. If all you have is an experiment that didn't work, you should still be able to achieve a first class mark, because the marking criteria say nothing explicitly about what the results actually are. If you can afford to leave it out, then you might consider leaving it out.

Q: Are we allowed citations in the abstract?
A: It's a free country, but have a look at some scientific papers and see if they do that. The abstract should be understandable without reference to the rest of the text (including the reference list) so that should tell you something.

Q: Is the supplementary information such as risk assessment and ethical responsibilities form marked. Does it contribute towards the report grade?
A: It could influence your mark if you have supplementary materials like additional figures or methods referred to in the text, or if you have a communications resource in it for those types of assessment. We do not mark the risk assessment and ethical responsibilities form. We just tell you that it's good practice to have them and would like you to have an awareness of risk and ethics.

Q: do acknowledgments count towards word count
A: no.

Q: How is it decided who the primary marker is for our dissertation?
A: This is decided by the chair of exams committee based on existing other workload and relevant expertise.

Q: Can we include a diagram from a paper as a figure if we reference it? or do we need to make our own diagram?
A: In published papers it is acceptable to use existing figures if you have given due credit and dealt with any copyright issues. Since your project is unlikely to be in the public domain, you can probably ignore the latter issue.

Q: Are figure legends included in the word count?
A: see the marking criteria on the VLE

Q: Does our report go through Turnitin when assessed and is the mark taken into account in the report mark?
A: Yes, they are put through turnitin. Reports are marked as if there has been no academic misconduct and then those reports where there are concerns are flagged for separate consideration, and that is dealt

with by a separate committee. There are various types of penalty for academic misconduct but basically make sure you do not do it.

Q: Does it matter if my individual data points overlap on my graph, or should I space them apart?
A: It might matter if it interferes with the interpretation of the figure. You could jitter them apart, or you could paste a number next to superimposed datapoints to indicate how many datapoints are underneath, or you could use different sized symbols for different numbers of datapoints.

Q: In the report guidance it says that the ethics responsibilities form should be included in the supplementary materials. By ethics forms do they mean the Google form we completed and can we just link to the form or add screenshot or do we need to physically write the question and answers out?
A: Yes. It doesn't really matter as long as people can see it. I would advise copying and pasting your answers into a doc and use that. Google links may not be permanent.

Q:Can I put all my figures at the end of the text to make it easier to read or are they better coming after the text that will be referring to the figure?
A: Embed them in the text after the first mention in the text. Make sure they are nice and large enough to see.

Q: Hi, I conducted interviews and I would like to add quotations from my own data into the discussion section. Should I include them into the word count?
A: Yes. Also consider if quotes are actually results rather than discussion.

Q: If we abbreviate a word in our abstract, do we need to abbreviate it again when we next use it in the actual text or can we use the abbreviated form from the abstract?
A: Abstracts stand alone from the main text so the former.

Q: Do graphs have to be created on R studio for those on the BSc projects
A: no

Q: Secondly and following on, I wondered what else if anything goes into the supplementary information is it just a ZIP folder including the risk assessment and any R projects used? People have mentioned the ethical responsibilities form also goes in here but I can't find a copy of this anywhere. I definitely submitted this on the google form as I remembered there was no real ethical risk with my project, but I wondered if you knew where I could find this? I do still have the question doc with my answers that I discussed with my supervisor if that would be suffice but not the actual form itself. and from that can I refer to the google doc ethics form in my reflection if this is possible
A: Yes, you were supposed to get a copy of the form returned to you by e-mail but you may have needed to tick a box requesting this upon submission. However, don't worry as this is common and you won't be penalized for it. Your question doc with answers will be fine for your reflection.

Q: does the table of contents go towards the wordcount?
A: You don't need a table of contents, and no.

Q: Does the title page of our report need to have a specific layout?
A: No. You should have the project title, and your name but not exam number. If you want to put the abstract immediately underneath that, feel free: there is no requirement to have a whole page for just the title and your name. You can also start the introduction on the same page if you like. Tables of contents are also not needed!

Q: Does the report have to be written in a specific font?
A: There is no specific font mentioned in the report guidelines, other than the size, 10-12 (and 12 is easier to read so use that)! However, I'd recommend Arial which is accessible and widely used.

Q: Do we include errors in our experiment in the results or discussion section?
A: if reporting results, use the results section. If discussing results, use the discussion section.

Q: Under the penalities for going over the word limit for the project report it says there is a 1% tolerance range. Does this mean you won't be penalised if your word count is 1% over the word limit?
A: No, it means you won't be penalized if you are <1% over the limit. So in practice, 4039 words would not be penalized but 4040 would be. However, in the interests of being concise, go the extra mile and see if you can cut 39 more words. If you can't, you are probably not writing concisely enough.

Q: For a previous scientific report we were told a report significantly below the maximum word count could still get a good mark - is this true for this report as well? If so, what would you say the ideal word count would be (no worries if you can't give an estimate)?
A: 4000 words for scientific report is a short report, so I imagine most people will have the opposite problem of having to cut back significantly on what they want to say. Your report will need to do the best job possible within the 4000 word maximum. If you are not even close to 4000 words, ask yourself if you have done every section well enough: good enough introduction to the background literature and explanation of the motivation for the study? Good enough description and justification of methods? Good enough reporting of the results? Good enough interpretation, contextualization and description of further work? I'm not saying you couldn't write a strong report of 3000 words, but it might be more challenging.

Q: How many pages for the draft in week 7 are we allowed to submit?
A: You can submit as much as you want: directors will be prepared to read a full draft, but can only provide detailed comments on 4 pages.

Q: The lecture on writing project reports said that we shouldn't include optimisation study results in our methods section. How would I include what concentration I used for the rest of my experiments then without discussing the optimisation study results? Do I just say that I established the most suitable concentration of... through an optimisation study? Thank you!
A: That might work OK. You might also put the results of that in your supplementary information files, if you felt they were sufficiently important to keep available.

Q: Can we format our reports to have two columns per page or just one?
A: Most academics think that 2 columns per page looks awful, so stick to just one.

Q: How do we address errors in our data that occurred due to human error?
A: Hard to give a general answer to this. All data contain variation that is due to measurement error. Some of the time that does not matter because such variation is unbiased and you have replicates. If you think your data are biased, you should discuss that possibility in the discussion and make suggestions for improvement in further work.

Q: Will our supervisor be marking our reports?
A: Project directors will be second markers: a first marker who is not your director reads, comments and proposes a mark. The director reads the report, the first marker comments, and the proposed mark and has to either agree or disagree with the mark. If there is disagreement a discussion takes place, and if agreement cannot be reached a third marker will mark the report and propose a mark.

Q: Could you give us the grade that the past project reports had received?
A: No: that would open a whole can of worms, and we don't want to send you down that route. You should read them critically against the guidance and marking criteria given as they are not perfect, but we tried to provide reports that provided examples of good practice.

Q: Can our supervisor give us an approximate grade that our report would receive?
A: There is no explicit guidance not to do that, but I don't normally do it for my students as the draft report is usually a work in progress, and I imagine it might put directors in a risky position, so I would imagine that directors would be reluctant to do this. Beware of asking for this as remember your director is not the first marker….

Q: Where do you submit the supplementary information for the report? Is it separate to the report pdf?
A: Yes: last year there was a separate submission point on the VLE next to the main report and you had to provide a zipped folder. Your suppl. Infom. Should contain your self-written project risk assessment, your ethical responsibilities form, and any other materials that complement your project report and are referred to in it (e.g. datasets, R projects, supplementary figures and tables).

Q: How do I explain a missing data piece?
A: Very context dependent. It is common, for example, in field studies for disturbance /vandalism to lead to missing data, and normally you just report that in the methods. When you have limited time and resource in a short project everyone will understand if events lead to missing data that might be present given more time and resource and I think you can just report that it is missing in the methods with a brief explanation. But, take advice from your director verbally.

Q: would adding supplementary figures be deemed unnecessary?
A: You should certainly have a good reason for them: they should be important but not something that you want/expect the average reader to look at. Certainly this is something that you can have but do not necessarily have to have. If a result is important, have it in your main report.

Q: How do you go about including criticism, how can we develop skills to identify and objectively critique prior papers without just falling back on the authors using outdated methods?
A: Think of strengths and weaknesses of each piece of work. When criticizing papers, we are not primarily interested in issues of presentation; we are really thinking about the impact of the work, and its robustness. This might include thinking about the scope of a study, the design of data collection, the way the data have been analyzed, and the conclusions that have or should be drawn from the results. A very useful thing to consider is whether you believe everything you are reading, whether you can imagine different ways of doing the same/similar study and whether those alternatives might be an improvement. This might segway into what further studies you might imagine doing.

Q: Does title count towards word count?
A: No.

Q: Can you reference a procedure you used for an experiment in the method section and add the procedure to the supplementary information?
A: Yes. Think about whether another paper documents the procedure, in which case it is only necessary to cite that one. Remember that readers may not look at your supplementary materials so think about whether a short summary of the procedure in the methods might be useful.

Q: the guidelines for formatting says that size of the font is 10-12, does this include headings for introduction, methods etc?
A: no: you can make those bigger if you want. Do what looks best to you.

Is it okay that my risk assessment only has 2 risks? There's not much else I can think of as it's a low risk project
Answer: I'm certain that most data science and sci comms projects are low risk, so most of those will not identify much. You can sense-check your risk assessment against the safety form you will have talked through with your project director at the start of your project. Your risk assessment is not part of the marking criteria for the report.

Should supplementary information be anonymised?
Answer: No, it is tied to your report so no point.