Questions that came during the presentation:

- **Why do you think that preprints are less favoured in non-science areas?**
  
  o **JP:** The popularity of preprints in any given field is likely influenced by funder policies, fear of “scooping,” culture around sharing early data widely, etc. However, many people also believed that preprinting would not work in the life sciences after several aborted attempts to start servers, but they are widely used just a few years later. I think this suggests that the usage of preprinting is as much influenced by a server starting under the right conditions as the intrinsic culture of the field.

  o **JL:** Research in the humanities and to some extent the social sciences also tends to be less time sensitive and is more likely to be presented in book form - the long argument of a theory or point of view. Clearly one of the drivers of preprints is the need for speed though there are many other benefits.

- **Stephen: Sounds like preprints are more valuable than the final "official" version of the paper in a journal. What do you think is the future of the journal in your field?**
  
  o **SR:** My feeling is that, in order to survive, journals need to innovate. They also need to clearly demonstrate to the research community what they offer and the value they add. Unfortunately, small and not-for-profit publishers are in a weaker position to experiment with publication models and therefore to compete with the large publishers. Having said that journals need to adapt to survive, they still offer certification of papers on which our career structure depends, so I can’t see the situation changing in the near future.

- **Can anyone comment on medical preprints and whether clinicians have any uptake outside of the current pandemic. Do doctors really comment on preprints?**
  
  o **JP:** Not clear on commenting, but medRxiv and Preprints with the Lancet have been growing since last year ([https://asapbio.org/preprint-info/biology-preprints-over-time](https://asapbio.org/preprint-info/biology-preprints-over-time))
• Stephen: Would you ever put a pre-print forward to the REF?

  o SR: Yes, I would be happy to do that, but I probably would not submit a preprint in the place of a journal article.

• Stephen: There are studies that show that the difference between preprints and accepted manuscripts is minimal. Is this your experience? And if so, if the world stopped judging you on your publication list, would you bother publishing in journals at all? What do they add?

  o SR: That is definitely my experience. Of course, peer review improves the work, but most of the time it doesn’t do so in a material way. For almost all of my papers, peer review has not, for example, changed the title or abstract of the paper at all. As I explained in my talk, I’m sceptical about whether the amount of time spent on this process is worth it for the field. Why bother at all? I think most scientists would agree that the only reason we still engage in this process is because we are judged on our publication list.

• Are any services (apart from Google Scholar) linking the citations accruing to preprints to the citations accruing to the relevant Version of Record?

  o JP: EuropePMC does this.

• Some journals do not accept unpublished thesis/dissertations as a citation and it seems if preprints ARE an acceptable citation, grad students would find this option attractive. When encouraging grad students to use preprinting for sharing their thesis/dissertations, would you recommend a shorter manuscript version VS the ‘whole piece’?

  o SR: I would advise a short version. At bioRxiv, preprints must be “a paper” and longer form submissions such as a thesis are not allowed. Plus, I think all grad students benefit from writing a short-form paper.

• Can you give an example of when a preprint prevents further publishing in a journal? When can a preprint be of problem in the publishing process?

  o SR: Not any more in my field. Any journal that doesn’t interface with preprints is simply losing out on submissions to the majority that do. I have seen anecdotal evidence on Twitter of researchers in other fields encountering Academic Editors unaware of preprints (and of the journal’s own policies), but this usually gets straightened out.
● Is there a patent preprint?
  o JP: Preprints are public disclosures in the context of patent filing.

● What about the risk linked to preprints which are retracted, modified or elaborated differently so that people, also general people because it's open, could read a version which is incorrect, incomplete or fraud?
  o JP: Preprints can be withdrawn or retracted. The process of withdrawing a preprint is much more straightforward than withdrawing a published paper - authors can typically simply post a new version and some servers offer special ways of flagging these manuscripts. See server practices at https://asapbio.org/preprint-servers

● I've come across preprints where the published version has less content than the preprint, but it's still called the 'Version of Record'? I wonder whether we will stop calling published versions the VoR?
  o JP: There’s support (often attributed to Herbert Van de Sompel) for the idea of replacing the “version of record” with a “record of versions.” This would be helped by authors including a list of changes with each new manuscript upload. bioRxiv is offering authors the opportunity to add a short description of what has changed when uploading a new version of their papers. Ideally, journals would also provide this field as well.

● Does the pre-print landscape lay out a different, alternative kind of peer-reviewing system that could take over the journals' driven?
  o SR: I think it could and there are interesting experiments like Reviewer Commons happening right now. The model pioneered by F1000/Wellcome Open Research is essentially a preprint with peer verification being a requirement for full indexing.

● Stephen: As you may know, there are many new journals and publishers who are enthusiastic to get their publications published. How do you know that you are NOT reading articles from so-called "predatory publishers"? Does ISSN play any role in your decision-making when choosing a paper to read?
  o SR: The high levels of spam that researchers receive from predatory journals have very effectively advertised to us that these "journals" should be avoided at all costs! We don't use ISSN, but we would check that a journal is MEDLINE listed if we wanted an indication of validity. Mostly it doesn't come to that though. In my field, papers we read are either published in the small number of subject-specific journals, science weeklies or the megajournals like PLoS
ONE or Scientific Reports. Anything that appears outside of these titles is viewed with a lot of caution.

- How are research integrity issues, such as plagiarism, authorship disputes etc dealt with on pre-prints?
  
  o **JP:** Different servers approach withdrawals and retractions in different ways. See asapbio.org/preprint-servers for more detail.

- You mentioned that a benefit of posting preprints is feedback from the community. What are the benefits to people who provide this feedback and how can we encourage public feedback on preprints?
  
  o **SR:** Networking? Altruism? I think incentivising commenting and feedback on preprints would be hugely beneficial. There are resources such as prereview.org - preprint journal clubs organised by early career researchers - that give feedback to preprint authors.

- Do you foresee a mechanism that will indicate which of these never-published papers were never published because they were of poor quality or for other reason that meant that they did not merit publication?
  
  o **SR:** I think it is difficult to tell what that figure means (30% of preprints remain unpublished). In my case, I have deposited one preprint that I had no intention of seeking publication for. We just wanted to make public some analysis that we had done and saw no point in trying to publish it. There may be others like this among that fraction. Confirmatory or negative data is perfect for the preprint format but is unlikely to be formally published. Another reason could be that the preprint changes or is broken up into new publications and so the preprint isn't matched with a published paper but the data was actually published eventually.

- Are tenure and promotion standards now rewarding work disclosed in preprints but not yet published in a peer-reviewed journal?
  
  o **SR:** Yes, they are permissible at many institutions. I think a dossier entirely made up of preprints wouldn't look good, but several papers and a couple of preprints is fine. Of course, the committee should be assessing what's in all of the papers/preprints and not just looking at the name of the journal!

  o **JP:** See https://asapbio.org/university-policies for some examples.
• Do the speakers agree that there is a problem with the 'searchability' of the preprint servers?
  
  o **SR:** Cross server search is still not ideal. So yes, I think more could be done. The full-text search on bioRxiv is actually really good and in some ways supersedes search tools of journal content.

  o **JP:** EuropePMC provides good search tools.

• Does the 5-6 month publication time lag discussed include time as an 'Epub ahead of print' on journal websites?
  
  o **SR:** For my analysis I use the PubMed date as the "published" date, this corresponds to the epub version for most journals.

• How does preprints researchers argue when we they are asked about the 'peer reviewed journal' requirement
  
  o **SR:** It's clear that preprints are not peer-reviewed and this is displayed prominently on the preprint servers and papers that I have accessed. However, the majority (~70%) are heading for publication in peer reviewed journals. So, although they don't qualify in preprint form, but most will eventually.

• I would like to know the thoughts of the speakers on the importance and the criteria used to do an initial editorial assessment of submitted preprints.
  
  o **SR:** Several journals have scouts that solicit submissions from preprint servers. Editors can also have a look at the buzz around a preprint before they even take a look at the work itself.

• Have you seen any push-back from publishers against preprints, such as refusing to publish articles that have been made available previously?
  
  o **SR:** See answer above

• Many preprint servers allow easy updates, while traditional journals are making it hard. Can you see this argument getting more traction so that journals will be forced to go overlay or implement this?
  
  o **SR:** We have updated our preprints and taken advantage of the versioning ability. I'm not sure how I feel about papers being updatable. I understand that papers are living documents and, for example, may be challenged in the future. But I prefer to think of them as done-and-dusted once published.
• Stephen, could I ask as a researcher, do you allocate separate funding for publications and preprints? do funders require a differentiation?
  
  o  **SR:** No, we don't. Our preprints mostly turn into papers one day and so the funding is just directed towards projects rather than outputs.