

Overview:

This paper presents foundational information any conference organizer should consider when planning for virtual or hybrid convenings. The focus on access for those with disabilities should also highlight that these planning considerations will eventually benefit everyone, across every demographic, at some point in time, who wish to remain active in their respective discipline the older they get. Specific comments follow:

Is there a way to contribute to this discussion? As new things are learned?

Introduction: Why is this being written to focus on the deficit of the geosciences being of the least diverse of all science fields? We know this as it is written in nearly every paper that focuses on DEIA. This paper goes beyond and highlights the opportunities and benefits of planning for access and inclusion. Therefore, this opening introduction starts the reader in a negative frame of mind. How can this be rewritten to focus on the assets of inclusion rather the deficits of a lack of diversity?

Line 50: Why is the “Global North” a focus here? Does this not impact people in the Global South?

Line 72: Returning to in-person events does negatively impact those who are ‘historically marginalized’, but so many others as well for reasons presented in this paper.

Line 76-79: challenges of virtual alternatives: please provide citations as evidence here.

Line 97: Review of Previous Literature: Why was the focus only since 2020, yet Figure 1 shows data previous to 2020. What was known prior to the pandemic?

Line 131-132: Figure 2: ‘lack of correlation between the wo data sets’ is untrue, there are at least 10 correlations in the distinctive dips between the two data sets. This should be explained. Also, there was a significant uptick in virtual meetings BEFORE the pandemic shut things down. Why? Is there a mistake in the X-axis dates?

Line 162: Why is compatibility of conference apps only important for phones? Many others use tablets. Also, screen readers should be taken into consideration here.

Line 169: Virtual poster sessions have been difficult to design with limited success? Be sure to check out the American Geophysical Union Virtual Poster Showcase was an excellent example for how this can be done, and it was done well before the pandemic. <https://www.agu.org/honors/virtual-poster>

Line 182-183: Virtual options do not reduce financial barriers to attendance. Virtual options are expensive and most often this expense gets passed down to attendees through registration. Be sure to differentiate between fully online and hybrid here. It is true that fully online conferences may be less expensive (line 185), but this potentially presents a misconception by stating all virtual options are more accessible due to the reduced financial cost.

Page 8 paragraphs do not flow well. Paragraph on line 207 seems like an extension of paragraph following line 194.

Line 226: closed captioning for virtual events are rarely mentioned, this is really the same for in-person conferences.

Line 256: ‘...suggest themselves as volunteers’ – we should tread cautiously here. Volunteers, especially those from underrepresented groups, are commonly exploited for their time. Is there a way to amplify their voices in the design and development of a hybrid event, and offer some compensation (e.g. conference discount or full registration) for their time without requiring them to volunteer. Also, avoid potential tokenism here (explained line 271)! Many people get asked to volunteer or to speak as a ‘representative’ of an underrepresented group. We all need to do better to avoid this situation.

Line 264: ‘...because people engage in different ways.’ - examples?

Line 267: ‘diversity of conversations’ or rather “broad perspectives and worldviews”

Line 269: ‘...give people the opportunity...’ or rather “encourage people to integrate discussions about their research and DEIA at the same time.

Line 284: Adding in “neurodiversity” in this line seems very deficit-minded. There are other reasons to have pre-event meetings, not just for people with disabilities.

Line 297: Recording of the event shared after... how about offering a platform for continued, asynchronous discussion that is inclusive of those who could not attend in real-time?

Line 302: This budget section could use further development. Many conferences, AGU and GSA included, are considering or have already eliminated virtual/hybrid options due to cost. What can be offered in this section to suggest alternative supports to this while maintaining the benefit of so many who cannot/will not attend in-person?

Line 320: Talks on demand: pre-watch and view with questions; asynchronous community discussion.

Line 336: uploading videos after, while it may be accessible, and less expensive than real-time video, is not inclusive and community-focused.

Line 338: Consider screen-readability as well.

Line 361: This would be a great section to offer, or point to, presenter guidelines for creating and giving an accessible/inclusive presentation. Consider this resource (perhaps throughout this manuscript) by Dr. Gabi Serrato Marks: <https://blog.ucusa.org/science-blogger/how-to-make-professional-conferences-more-accessible-for-disabled-people-guidance-from-actual-disabled-scientists/>

Line 370: Explain how captioning can minimize screen fatigue in virtual events. Captioning done poorly can enhance screen fatigue. Also in this section, recommend CART services for real-time captioning [<https://www.nad.org/resources/technology/captioning-for-access/communication-access-realtme-translation/>], and stress that everyone must use a microphone for both in-audience participants, as well as anyone attending online. Virtual formats do not pick up all questions/discussions, and transcription certainly won’t pick up on what is being communicated if it is not amplified.

Line 405: There are several resources that mention Color vision deficiency. Please cite some of them here. Example: <https://rock.geosociety.org/net/gsatoday/groundwork/G322GW/article.htm>

Line 420: PLEASE mention that these spaces must be separate. Quiet spaces are not meant to be shared with people on a conference call or breast-feeding/pumping. These all require their own space. There have been conferences that combined these spaces... serious fail!

Line 439: Don't forget the importance of using microphones throughout the session room.

Line 442: Virtual attendance still requires childcare and balancing other work. This is not just unique to live/in-person talks.

Line 450: Excessive preparation happens when people are giving a live presentation, also.

Line 467: Video captioning on recordings: Provide presenter guidelines for how to do this in multiple platforms. OR, require everyone to create recorded presentations in Google Slides with the auto captioning on.

Line 474: Do panel sessions need to be live? If we're creative, recordings of presentations can be combined together along with pre-determined questions and asynchronous follow-up discussions by all panelists.

Line 482: Code of Conduct, how will violations be submitted, recorded, and addressed?

Line 488: Where will attendees/presenters go to get assistance when needed?

Line 505: Volunteers and staff, how will daily communication and urgent updates be handled?

Line 510: Questions from the audience: Be sure everyone uses a microphone, at all times, no exceptions! Just because you talk loudly, doesn't mean people can hear you. Some people have assistive technology that uses the same frequencies as the microphone. This is incredibly necessary for both online and in-person. (Restating this in 'Event Etiquette', line 530, might be a good idea. You can never say it too much).

Line 550/555: FEEDBACK should not just be something people provide after an event. There should be countless opportunities for people to give feedback prior to (registration process, attendance planning, etc.) and during the event. Have QR codes posted everywhere where people can open up an online feedback form. Have an information desk and an online help desk open at all times for real-time communication of issues and concerns.

Line 579: '...and inclusion they have provided.' Who/what is "they" – virtual opportunities?

Line 591: '...may exclude some participants.' MOST participants, actually.

Line 595: planning must include authentic voices of the participants that will be most impacted by the decisions being made. Suggested reference:

<https://www.tandfonline.com/doi/abs/10.1080/10899995.2020.1768017>

Line 598: Yes, ask about virtual access needs before the event, but also have a way of contacting should real-time requests/issues/concerns arise during the event.

Line 607: Accessible and open communication is key, before, during, and after the event. Provide opportunities for people to offer and receive information about every aspect of the event.

