

# Every action matters: Reducing the climate impact of EHPS conferences

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The Intergovernmental Panel on Climate Change (IPCC) now clearly states that the existing adverse impacts of human-induced climate change on the natural world are "beyond natural climate variability" (2022). The report states that it is more likely than not that the 1.5°C global warming threshold will be reached before 2040 even in a very low greenhouse gas scenario, and that adaptation to many climate risks will likely become constrained and have reduced effectiveness once this happens.

As scientists working in the health field, we know about the connection between global environmental change and human health (Inauen et al., 2021). There is more and more data emerging on how changes to our environment affect our health (see here <https://www.thelancet.com/journals/lanplh/home>). Health Psychologists across the planet have been developing interventions to support health behaviour change and know about the health co-benefits of some mitigation and adaptation behaviours (e.g. reducing meat consumption). Knowledge amassed on human behaviour change for health can be used to support bottom-up (Chevance et al., 2021) and top-down initiatives

(Sniehotta et al., 2017) that target mitigation and adaptation efforts.

As a response to the overwhelming evidence highlighting human activity as a key accelerating factor in global warming the Special Interest Group "Equity, Global Health, and Sustainability" within the European Health Psychology Society (EHPS) set out to assess what we, as a society, can do to reduce the environmental impact of our annual meetings. You may have read our first [European Health Psychologist \(EHP\)](#) paper on "How to make EHPS conferences more climate-friendly" (Warner et al., 2022). Herein, we discussed that the largest impact of conferences on planetary health is, by far, emissions produced by traveling to in-person conferences (Neugebauer et al., 2020). Ideas for other conference formats (e.g. hybrid, online-only, bi-annual face-to-face or online; face-to-face in each member country and linking internationally online, etc.) have already been put forward, and the executive committee of the EHPS engages in ongoing discussions with EHPS members.

Apart from reducing the carbon footprint associated with conference travel, the organization of conferences themselves can be optimized to reduce emissions. One obvious target is food (Bossdorf et al., 2010). The life cycle of plant-based foods produces substantially lower carbon emissions than animal products (Poore et al., 2019). Importantly, eating more plant-based food is also good for human health: the risk for chronic (e.g. diabetes, overweight, coronary heart diseases) and infectious diseases (e.g. zoonotic viruses, antibiotic resistance) can be lowered by reducing the consumption of animal products, especially meat (Willett et al., 2019; Espinosa et al., 2020).

Thus, the planetary health diet, which considers both planetary boundaries and human health, consists of predominantly plant-based foods and recommends a maximum of 300g of meat per week per person (developed by the EAT-Lancet commission; Willett et al., 2019).

Catering plays an important role in this necessary societal dietary change. The choice architecture and the overall foodscape set up by caterers can influence individual food choices (e.g., availability, defaults, labelling, and tastiness of options; see e.g., Ensaif, 2021; Garnett et al., 2019, Hansen et al., 2021). Menu options (e.g., 4 meat and 2 vegetarian dishes) may communicate social norms about what other people normally eat (Raghoobar et al., 2020), which may be an important lever for changing these societal norms. Offering a sufficient variety of attractive, affordable, and healthy plant-based food options also prevents people, who do not want to eat certain animal products due to health issues, moral reasons, or religious beliefs, from being disadvantaged.

In that first EHP sustainability paper, we

published a short survey to assess EHPS delegates' acceptance of plant-based meals as a default catering options at in-person conferences, and to ask for further ideas to reduce the environmental impact of future EHPS conferences. In the current paper, we report the results of the survey and reflect on our first, almost fully vegetarian day (if it weren't for the "fish incident") at this year's conference in Bratislava.

### Acceptability of plant-based food during EHPS conferences

The 4-item survey was deployed from mid-April to early June 2022 and 61 EHPS members responded. We asked them: "To what extent do you eat a plant-based diet in your everyday life?". Figure 1 shows that almost a quarter of the respondents did not routinely eat meat, while another two quarters either ate meat infrequently or were trying to reduce consumption of it. Twelve percent of respondents ate meat and were not trying to reduce it<sup>1</sup>.

Despite most participants reporting eating at least some meat, we found high support for the reduction of meals including meat at our

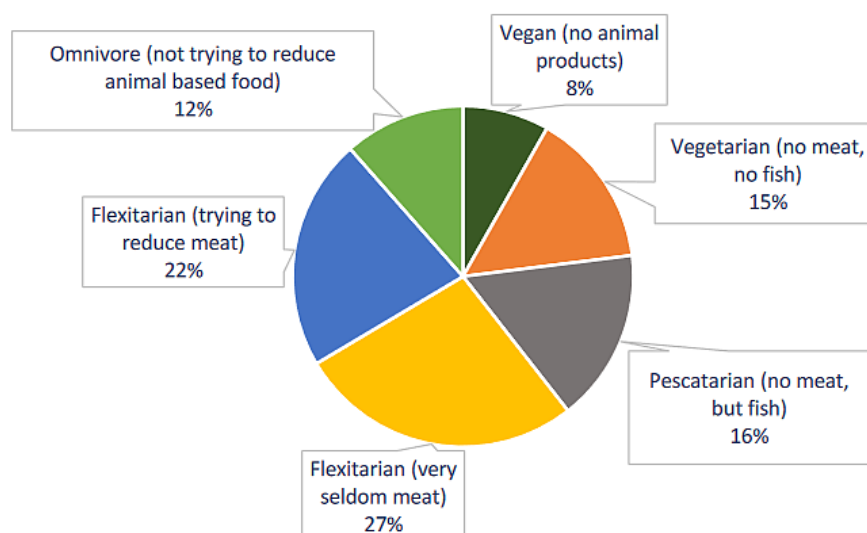


Figure 1: Quantitative results on food preferences of respondents ( $n = 61$ )

<sup>1</sup> It is possible that these self-reports come from meat conscious-consumers and that the sample may be biased by social desirability.

On how many days would you like all food provided during the conference (lunches, snacks) to be vegetarian (no meat, no fish, excluding the conference dinner with individual choices) or vegan (completely plant-based, excluding the conference dinner with individual choices)

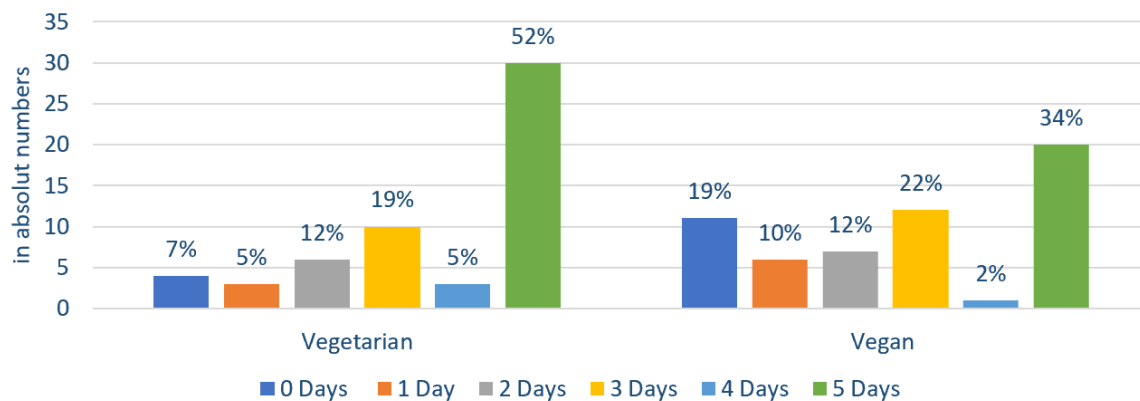


Figure 2: Preferences for vegetarian or vegan catering provided during in-person EHPS conference assessed in early 2022 ( $n = 58$ )

conferences (see Figure 2), which underlines that such changes would not only be supported by vegetarians and vegans.

Figure 2 depicts the number of days participants preferred to eat vegetarian or vegan food during in-person EHPS conferences (assessed prior to the Bratislava conference). Only a minority said they did not want to eat vegan or vegetarian food at all. Vegetarian meals were preferred to vegan meals, should they become the default options. Overall, the responding EHPS members would support 3-5 fully vegetarian days and/or 2-5 fully vegan days.

We also asked delegates to comment on this question: "What is your opinion on introducing veggie or vegan days, or entire veggie or vegan EHPS conferences?". Table 1 summarises these comments in categories and indicates how many people made similar comments.

Most comments included appreciation of the initiative to reduce meals with meat during EHPS conferences. A third of respondents suggested a level of compromise enabling the shift towards catering with more vegetarian and vegan options over time, while evaluating acceptability of this change among the delegates. Some respondents also highlighted the need for sustainable catering

that is tasty and nutritious, which they thought could increase acceptability and decrease resistance to the possible changes in catering. Lastly, two participants highlighted the importance of inclusivity of preferences and choices for everyone.

The quantitative and qualitative data show that the vast majority of the participants were very supportive of the initiative to reduce meat and increase plant-based food at future EHPS conferences. One of the most acceptable ways to do this, according to the participants, would be to introduce a compromise either in the number of days on which vegetarian and vegan options are the default catering options, or offering a greater variety of meals, which would represent the preferences in this survey.

#### **Experiences with the first vegetarian lunch buffet at EHPS 2022 in Bratislava**

Preliminary results of this survey led to the first attempt to introduce a vegetarian day at this year's EHPS conference in Bratislava.

There was, however, one lesson learned, later referred to as the "fish incident" by Radomír Masaryk in his farewell speech. Long story short, we conclude that future organising committees

Table 1: Summary of open answers towards “introducing veggie or vegan days or entire veggie or vegan EHPS conferences” ( $n = 54$ )

Categories	Examples	n
<b>Positive feedback</b>	<ul style="list-style-type: none"> <li>– Great idea</li> <li>– A great initiative</li> <li>– Highly appreciated</li> </ul>	34
<b>Compromise</b>	<ul style="list-style-type: none"> <li>– Only vegetarian</li> <li>– Perhaps taking a “flexitarian” approach to begin with, reducing the amount of meat offered while increasing the number of veggie/vegan options. Over time the conference can become completely vegetarian/vegan</li> <li>– Good as addition, not as a replacement</li> <li>– Would be a good idea to try this for a day or two</li> <li>– Gradually introduce vegetarian with some vegan options</li> </ul>	12
<b>Taste</b>	<ul style="list-style-type: none"> <li>– MUST be good quality to swing meat eaters over</li> <li>– All depends on the competence of the menus - poor menus will result in future resistance</li> <li>– If the food is tasty people don't care most of the time (except if specific condition) :) but vegan is often bland (vegetarian speaking here)</li> <li>– As long as the food is tasty and nourishing, I wouldn't miss animal products in it.</li> </ul>	6
<b>Dietary needs</b>	<ul style="list-style-type: none"> <li>– I respect the idea but need to eat meat for health reasons. Allergies limit my veggie options and the limited vegan food I could eat would just make me hungry and angry.</li> <li>– I agree that it is highly important to reduce meat consumption. This, however, does not mean that completely excluding meat from the diet is healthy for everyone. Some people may have non-veggie dietary needs and it is important to take that into account.</li> <li>– Keep allergies in mind (soy and nuts are frequently used in vegan alternatives)</li> </ul>	5
<b>Suggestions</b>	<ul style="list-style-type: none"> <li>– I eat meat but would be fine for vegan or veggie-only days. Maybe mixed up and people encouraged to experiment and leave feedback</li> <li>– Not sure whether full switches are wiser than gross asymmetries in offers (i.e. in a buffet with 12 dishes, 5 vegan, 5 vegetarian, 2 fish/poultry/meat). <ul style="list-style-type: none"> <li>– Suggest flipping the usual approach - default food provided is veggie and people can request “meat-option”</li> </ul> </li> </ul>	3
<b>Negative feedback</b>	<ul style="list-style-type: none"> <li>– I think it's wonderful to offer this choice, but it's not okay to force people to this</li> <li>– The Self-Determination Theory people will dislike how controlling it is.</li> </ul>	2

may want to put additional effort into communicating the catering needs of the society to the conference venue or the caterers, making sure that the requests can be accommodated. Cultural differences and traditions must be considered, as the level of discussion on sustainability and food choices may differ between countries (e.g., food in Slovakia tends to be served on ceramic plates or in



glassware rather than on dishes made of recyclable materials). Meat is often an important part of local culinary tradition in some countries. However, research shows (Hansen et al., 2021) that introducing exclusively meat-free options in community meal settings such as conferences tends to be accepted, if these options are presented as default and are not particularly advertised.



Table 2: A summary of EHPS members' ideas to further reduce the environmental impact of future EHPS conferences ( $n = 37$ )

Categories	Examples	n
Transportation	<ul style="list-style-type: none"> <li>– Setting up car-pooling networks, ridesharing</li> <li>– Provide lots of info on the best way to travel to conference location from other countries</li> <li>– Minibus travel (with ferries if needed) to conferences or more encouragement (perhaps even with incentives) for train travel.</li> <li>– Enabling people to travel by train – setting up joint travels so that networking can start on the go, perhaps?</li> <li>– Offer support in traveling by train (e.g., by providing a route description from different starting points)</li> <li>– Conference and accommodation in 1 place (limited travel during conference)</li> </ul>	12
Digitalization	<ul style="list-style-type: none"> <li>– Program &amp; everything fully online (no printouts), maybe a conference app?</li> <li>– Electronic posters</li> <li>– No printing</li> <li>– Digitize everything</li> </ul>	8
Resource saving	<ul style="list-style-type: none"> <li>– Minimize single-use cups or cutlery, minimize paper and other things given out by the conference.</li> <li>– Paperless</li> <li>– Trying to adapt to the climate by using a minimum of heating/aircon machinery, through proper clothing, or outside venues in the case of hot weather circumstances</li> <li>– Not having a material 'welcome kit'.</li> <li>– No conference bags/pens/notepads or brochures</li> </ul>	6
Reusable material	<ul style="list-style-type: none"> <li>– Introduce reusable coffee cups</li> <li>– Less plastic water bottles and branded paper provided by conference (but ensure places to fill up own bottle).</li> <li>– Reusable name tags; no disposable cups</li> <li>– Eliminating one-way use things or, if necessary, only having biodegradable one-way use things</li> <li>– Water fountains and a reusable water bottle for all in conference packs plus reusable coffee cups. You can get ones that do both. Less washing and waste (the cups at conferences are usually so small that people often have 2 cups, meaning more washing up at the high temps of industrial washers).</li> </ul>	5
Remote participation	<ul style="list-style-type: none"> <li>– Offer hybrid means of attending</li> <li>– Making digital participation more engaging, facilitating online networking</li> </ul>	5
Plastic reduction	<ul style="list-style-type: none"> <li>– Other initiatives are taken for paper/plastic reduction, which is already on a good path</li> <li>– Plastic free!</li> </ul>	4
Other suggestions	<ul style="list-style-type: none"> <li>– Option for participants to pay for CO<sub>2</sub> compensation</li> <li>– In each place where the conference takes place we should promote a "soapbox" event to showcase to the community and local stakeholders how to implement environmentally-friendly behaviour</li> <li>– I was wondering about ways to reduce technology use. Do we really all need to use PowerPoint - can we just talk through our studies</li> </ul>	3
Environmentally friendly products	<ul style="list-style-type: none"> <li>– No goodies, lanyards, etc., no bottled water, no bananas, less cocoa, careful with the coffee for its massive carbon footprint (17 kg CO<sub>2</sub> equivalent emissions per kg of coffee).</li> <li>– Strongly relying on local products and reducing the amount of imported ones as much as possible</li> </ul>	2
Conference location	<ul style="list-style-type: none"> <li>– Transportation remains the most important as written in the paper, but the choice of next place should be made with accessibility in mind</li> </ul>	1

### Further ideas on how to make EHPS conferences more climate-friendly

In addition to exploring EHPS members' views on conference catering options, we asked them:

"Which further ideas do you have for environmentally-friendly actions that could be implemented before or during the 2022 EHPS conference?". Table 2 summarises their comments

and indicates how often these ideas were echoed within the sample.

Most participants were concerned about the impact of traveling on the conference's carbon footprint and suggested that hybrid conferences could help lower this impact for delegates who would normally fly to attend. Others suggested that information about more environmentally friendly modes of transport should be provided to delegates attending in person. This could include teaming up with train operators or getting special rates for tickets or even Interrail (instead of, or in addition to special rates by airlines for delegates who have no land connection) for future conferences. A possible option to reduce the environmental impact of the conferences might also be to choose university venues or prioritise hotels implementing the EU Eco-Management and Audit Scheme or those performing well in the Hotel Carbon Measurement Initiative (Zotova et al., 2020).

Many delegates were concerned about (single) use of resources. For example, printouts of brochures, programs, posters, or branded writing pads could be reduced if delegates switched to electronic note-taking or if these materials were available in a conference app. However, some delegates prefer to use the printed program instead of an app. A solution might be to print the program using recycled paper. Evidence to support or discourage the use of electronic posters instead of physical ones with the aim to reduce the environmental impact of conferences is beginning to emerge, but it is still mostly inconclusive, and enabling electronic posters for larger conferences may not be feasible in venues that do not provide sufficient equipment (Leochico, Di Giusto, & Mitre, 2021).

Online as well as hybrid (or bi-annually changing) conference forms are being discussed among EHPS members and the Executive Committee for conferences following the 2023 conference in Bremen. To estimate the environmental impact of

the last in-person conference in Dubrovnik in comparison with this year's hybrid conference in Bratislava, we have also asked questions about the delegate's travel modes in the post-conference survey this year, and we will report the results soon.

Single-use cups and cutlery have sharply decreased at events in Europe, and future EHPS conferences could follow this trend. To acknowledge the effort of the local organising committee, the special interest group in Equality, global health and sustainability, and the support of EHPS delegates, we also want to highlight what we have, collectively, achieved this year. In Bratislava, lanyards for nametags were generic and can be reused at future conferences. Nametag holders were also be collected and can be reused, so bring your lanyard and name tag holder next year if you wish! As part of the initiative, the Bratislava team also offered more durable metallic pens with university branding (no plastic EHPS 2022 pens), a bag that was multi-purpose, maps and brochures on request, kept on the registration desk for those who wanted one, and glass water bottles to be returned at the end of the conference. To summarise, the sustainability efforts of the EHPS community have already sharply increased compared to previous conferences.

There is still room for improvement and for further creative ideas from all of us to help make EHPS conferences more sustainable. The 2023 Bremen team will now take these suggestions on board, and continue to facilitate the collaborative change within our society.

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