Invitation Email

Dear {FIRSTNAME},

We are researchers at the **[Institution]** and would like to invite you to participate in a survey that aims to understand how HCI researchers and reviewers perceive and use pre-registrations.

We are contacting you because you are the first author of at least one paper at CHI 2020. We understand that pre-registrations are not yet a widely used practice in HCI community. Therefore, we'd really appreciate it if you could help us if you have experience of using pre-registrations or reviewing pre-registered studies. Your responses are completely anonymous and we will not ask you to reveal which paper you submitted. The survey for authors consists of 10 questions, and the survey for reviewers has 16 questions.

Google Form Link: **[Google Form URL]**

We understand that the first author might not be responsible for drafting the pre-registration. We would be grateful if you could share this survey with your co-author(s) who you believe could better answer this survey. If you believe another person might have a similar reviewing experience or might be interested in our study, please also forward the email to them.

Thank you so much for your time,

Best Regards,
[Author 1, 2, 3] [Institution]

Survey for Reviewers
Page 1

Objective: We aim to understand how pre-registrations are used and perceived, what elements reviewers focus on, and elicit suggestions that could make pre-registration better for open science.

Estimated duration: The survey consists of 11-16 questions depending on your prior experience with pre-registrations.

Anonymity: Your participation is voluntary and anonymous. We are not going to ask details about the paper you have engaged with.

Researchers: [Author 1, 2, 3] [Institution]

Contact: [Author 1's Email Contact Information]

Screening Question: Do you have experience of reviewing a pre-registered study?
() Yes   () No

Page 2

Throughout the survey, "the paper" refers to one paper (or many papers) you have reviewed in the past that included a pre-registered study.

1. How many papers have you reviewed in the past that included at least one pre-registered study?
   a. 1
   b. 2
   c. 3
   d. 3-5
   e. 6-10
   f. More than 10

2. Did you read the pre-registration(s) when you reviewed the paper?
() Yes   () No () I can't remember

Page 3 (If the answer for (2) is no)
3. There are myriad reasons for why people do not access supplementary materials, including that most venues explicitly say that papers should stand on their own, without requiring knowledge of supplementary materials. Can you tell us why you did not read the pre-registration?
   a. I ran out of time
   b. I trust the papers stand on their own.
   c. It's hard to match the elements in pre-registrations to those in the papers

d. Some pre-registration(s) are not well written
e. Pre-registrations templates vary across different platforms
f. I don't have any reason to assume that the pre-registration would contain additional information
g. I don't have any reason to assume that the pre-registration would contain different information from the paper
h. Others [   ]

Page 3 (If the answer for (2) is yes)

3. Was the pre-registered study linked in the paper you reviewed?
() Yes   () No

4. If no, where did you find the pre-registrations for the paper?
[   ]

Page 4

5. What was your motivation for reading the pre-registration(s)?
   a. I was curious about their initial plan.
   b. I want to find more information about their methods.
   c. I want to ensure the scientific rigor of the study by comparing the pre-registration and the paper.
   d. I want to make sure the authors pre-registered their studies ahead of time.
   e. The form was linked in the paper. I want to have a comprehensive reviewing of their work.
   f. Others [   ]

6. When reading the pre-registration, was there any specific information you looked for in the pre-registration? If so, how easily did you obtain that information?
[   ]

7. When did you read the pre-registration(s) during your reviewing process?
   a. Before reading the paper
   b. Once while reading the paper
   c. Several times while reading the paper
   d. After reading the paper
   e. Other [   ]

8. How much time did you spend when you read the pre-registration(s) on average?
[   ]

9. To what extent did you feel obligated to read the pre-registration(s)?
Not at all Obligated to Very Obligated (5-point likert scale)

Page 7

10. Did you refer to the pre-registration in your review?
() Yes   () No   () I can't remember

11. If yes, do you remember why you referred to it and which part of the pre-registration you may have referred to in your review?
[   ]

Page 8

12. When reading the pre-registration(s), did you notice any discrepancies between the research questions, hypotheses, analysis description, or any other study details between the pre-registration and the paper submission?
() Yes   () No () I can't remember

13. After reading the pre-registration(s), did you feel more confident in the scientific rigor of the work?
Not Confident to Much More Confident (5 point likert scale)

14. If a paper that you review or read after publication suggests that one or more of its studies were pre-registered, would this increase your trust in the scientific rigor and validity of the work in comparison to a paper that presents non-pre-registered studies?
Not at all to Very Likely to Increase My Trust (5-point likert scale)

15. To what extent do you feel that the information in the paper submission and in the pre-registration should be better connected? For example, do you think it'd be helpful if you can have a way to check if the hypothesis in the paper matches that in the pre-registration?
Not At All to Very Helpful (5-point likert scale)

16. To what extent do you feel that an overview of the research progress would be helpful for your reviewing process? For example, the author might explain why they changed their research design from within-subject to between subjects, or they might indicate that they added hypothesis testing for additional variables)?
Not At All to Very Helpful (5-point likert scale)

Page 10

Thank you very much for your filling out our survey. We appreciate if you have any other comments on pre-registrations in HCI scientific research.
[   ]

Page 11

If you are an author who completed one pre-registered study in your paper, we'd be grateful if you help us understand how authors use pre-registrations in the next section of the survey. It consists of 10 questions and will take approximately 10-15 minutes. Thank you very much for your time.

Did you have a pre-registered study or publish a paper that contains a pre-registration?
() Yes (Go to the next section)
() No (Submit form)

Survey for Authors

Page 12

Throughout the survey, "the paper" refers to one paper (or many papers) you have submitted in the past that included a pre-registered study.

1. How many papers have you submitted in the past that included at least one pre-registered study?
   [   ]

2. What was your motivation for using the pre-registration?
   a. I wanted to plan my study thoroughly before collecting the data
   b. I wanted to make my study easier to be replicated
   c. I wanted to respond to the recent call for transparent statistics in HCI community
   d. I wanted to show the scientific rigor of my study when I submit my paper
   e. [   ]

3. To what extent did you feel obligated to draft a pre-registration?
   Not at all Obligated to Very Obligated (5-point likert scale)

4. Did you submit an Institutional Review Board (IRB) before drafting a pre-registration?
   () Yes   () No   () I can't remember

Page 13

5. What platform(s) did you use for pre-registration?
   a. Open Science Framework (http://osf.io)
   b. As Predicted (https://aspredicted.org)
   c. Harvard Dataverse (https://dataverse.harvard.edu/)
   d. Other [   ]

6. What challenges did you have when you used the pre-registration platform(s) above?
   [   ]

7. To what extent do you think you needed additional guidelines when you pre-registered your study? For example, you might have needed a little help when you were debating between two potential statistical models or hypothesis testing methods.
   I don't need them at all to They could be very helpful (5-point likert scale)

8. How often did you refer back to the pre-registration over the course of your research? For example, you might have come back to your pre-registrations and seen if you needed to make adjustments accordingly when you recruited participants, collected data, and analyzed the data?

Never to Very often (5-point likert scale)

Page 14

9. Did you make your pre-registration publicly available?
    () Yes   () No

10. Did you link your pre-registration in your paper?
    () Yes   () No

11. How likely would you make your pre-registration publicly available if your findings conflict with your hypotheses on your pre-registration or you changed your design/analysis a little bit because the pre-registered procedures were no longer suitable for the real data?
    Very unlikely to Very likely (5-point likert scale)

12. As an author, pre-registrations could be a possible burden to pay attention to, and it might be frustrating to see a null result at the end. However, given the benefits of pre-registration, how likely would you support a tool that tracks your rigorous research progress while also indicating your study was pre-registered? For example, you might need to change a statistical model because the assumptions of that model aren't satisfied.
    Very unlikely to Very likely (5-point likert scale)

Page 15

We appreciate if you have any other comments on the usability of pre-registrations in HCI research as authors.
[   ]