# **How to Write and Review CHI Papers**

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Copyright is held by the owner/author(s). CHI'17 Extended Abstracts, May 06-11, 2017, Denver, CO, USA ACM 978-1-4503-4656-6/17/05. http://dx.doi.org/10.1145/3027063.3027097

### **Abstract**

Everything that we do as researchers is based on what we write. Especially for graduate students and young researchers, it is hard to turn a research project into a successful CHI publication. This struggle continues for postdocs and young professors trying to provide excellent reviews for the CHI community that pinpoint flaws and improvements in research papers. This course provides hands-on advice on how to write papers with clarity, substance, and style and how to structure reviews that are helpful and focused on enhancing someone's research. It is structured into two 80-minute units with a focus on writing and reviewing respectively.

# **Author Keywords**

Writing; Reviewing; Research Methods; Style; Clarity.

## **ACM Classification Keywords**

H.5.2. Evaluation/Methodology.

### **Benefits**

Writing and reviewing papers is at the heart of our craft as CHI researchers. Yet, good writing sometimes seems ephemeral to us when trying to structure our research ideas around what we perceive as the demands of the CHI community. In addition, we are quick to complain about bad reviews, but often lack the training and sometimes the information to create excellent reviews ourselves. While some helpful work exists online [5,10-12,14-16] with lots of writing and research structure

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Schedule				
Unit 1	Writing			
0-5	Intro and Goals			
6-30	Micro Lecture: Clarity and Struc- ture			
31-50	Exercise: Struc- turing CHI Re- search			
51-80	Exercise: Writing the Introduction			
Unit 2	Reviewing			
0-10	Recap			
0-10	Recap Micro Lecture: On Reviewing for SIGCHI			
0 20	Micro Lecture: On Reviewing for			

Table 1: The schedule for two 80minute course sessions at CHI with a break in between.

advice for CHI authors [1,2,9,13], it has unfortunately not been synthesized into a course format.

Students will learn the practical writing skills that enable them to "trim the fat" in their writing and focus on bringing the essential information across in the first course unit (some of the advice being taken from essential style guides [6-8]). They will also work through exercises that show them how to structure their CHI paper around a research narrative that focuses on solving a main problem and outlining a strong contribution using exploratory learning [3]. By following a clear structure and focusing on lean writing, we will then transition to the second unit, where they will learn what reviewers are looking for and how to signpost this information to make papers more attractive to read.

Participants will leave this course with improved writing skills, which they will have exercised during the course and also a wealth of knowledge about CHI paper structure, style, and content, which will be expanded online at the URL: http://chicourse.acagamic.com.

## **Intended Audience**

This course introduces principles about writing and reviewing for CHI to a largely junior audience. However, this does not mean that this course is not useful for senior CHI researchers, but the primary target audience are junior researchers. Thus, this course is particularly useful for young researchers, ranging from graduate students to postdocs and junior faculty. The expectation for the course audiences is that people have at least tried to submit a paper to CHI before (not necessarily that they have had one accepted), so that they are familiar with basic PCS terminology and the concept of the CHI conference (and CHI research in general).

## **Prerequisites**

The are no prerequisites for this course other than visiting the online course materials before the conference to familiarize oneself with some of the course concepts and to listen to the interviews.

## Content

The course is structured into two units (see Table 1), the first one on writing and the second one on reviewing CHI papers. At the start of the first unit, the participants are introduced to the course instructor and the course goals:

- Become a better writer by learning how to avoid unnecessary words and give each sentence a strong meaning
- Understand the goals of CHI research and what makes a strong CHI contribution
- Learn how to structure your paper around a compelling research narrative to emphasizes your research problem and solution as main drivers
- Writer better reviews by understanding what is important to have as content for CHI research papers This is followed by a micro lecture and two hands-on exercises.

Unit 1 Micro Lecture: Writing Clarity and Structure This lecture introduces the rhetorical positioning of research papers and how to narrow the problem space toward a unit that can be presented at CHI. It goes over the construction of logical research arguments and how these fit into the sections of a paper. It also discusses the most common pitfalls in writing style and how to avoid adding unnecessary descriptions in research prose that distract from the main idea.

The exercises are discussed in the practical work section. In the **second course unit**, I will shift the focus toward reviewing CHI papers after a brief revision.

Unit 2 Micro Lecture: On Reviewing for SIGCHI
This lecture will give the participants an overview of what reviewers are looking for and how to be a good program committee member and sought-after reviewer. It closely follows Hinckley's [10] advice on how to review and outlines what differences in reviews to expect from 1ACs, 2ACs, and external reviewers.

## **Practical Work**

Unit 1 Exercise 1: Structuring CHI Research
In this exercise, participants will build a research plan
for a CHI publication (10 minutes) and present their
plans to the group with a brief discussion (10 minutes)
of structural flaws or strengths.

Unit 1 Exercise 2: Writing the CHI Introduction In many of the interviews that I have conducted with senior CHI researchers, the abstract and introduction have been mentioned as the most important structural parts of a CHI paper. In this exercise, I will give the participants four questions (i.e., What's the real-world problem that you are trying to solve? Why is it important to solve this problem? What's the solution that you came up with to solve it? How do you know that the solution is a good solution to your initial problem?) for structuring their introduction section and then they will try to answer these questions by writing an abstract or an introduction or both (20 minutes). The written paragraphs are passed around and discussed in groups with regards to answering the research questions (10 minutes).

Unit 2 Exercise 1: Dissecting a CHI Paper
For this exercise, participants will get a published CHI paper and discuss how some of the excellence criteria learned in the first unit can be applied to the writing found in the paper. I will run this exercise as a structured discussion (20 minutes).

Unit 2 Exercise 2: Writing a Helpful Review

A few short paper examples will be provided (4 pages) and given out for review by the participants (10 mins for reading and annotating the short paper). In writing the review (15 minutes), the focus will lie on reflecting on the contributions and discussing the weaknesses and limitations in a positive way while calling out the strengths and utility of the work [10]. We'll end with a short discussion (5 minutes).

## **Instructor Background**

Lennart E. Nacke, Ph.D., is an Associate Professor for Human-Computer Interaction and Game Design at the University of Waterloo. He has many years of experience serving on SIGCHI program and steering committees and teaching University graduate classes on HCI research methods. Dr. Nacke has co-organized many workshops for CHI over the past five years; he also chaired the CHI PLAY 2014 and Gamification 2013 conferences, served as technical program co-chair for CHI PLAY 2015 and CHI Games and Play subcommittee co-chair for CHI 2017, and is currently the chair of the CHI PLAY steering committee. He has also reviewed hundreds of papers and gotten lots of his own submissions rejected from CHI (sometimes for good reasons).

## Resources

To expand the course, I have gathered additional information online from interviews with senior CHI re-

search colleagues, which I plan to expand in the future, available at http://chicourse.acagamic.com.

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