

Taboo and Otherwise: Epistemic Life Histories of Knowledge Resources

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Abstract

Taboo shapes the way that people talk about important topics like sex and reproduction. How does taboo shape the way that Wikipedia contributors create and sustain articles on taboo topics? This work presents a mixed-methods series of comparative case studies of taboo and non-taboo articles over a range of years. Drawing from the histories of “Clitoris” (taboo), “Cell Membrane” (non-taboo), “Menstruation” (taboo), and “Philip Pullman” (non-taboo), we describe challenges authors of taboo articles face.

Keywords: wikipedia, taboo, epistemology, women’s health, knowledge, content gaps, online communities

Introduction

Wikipedia suffers from content gaps in its coverage of countries, religion, women, and LGBT subjects (Warncke-Wang et al., 2015). However, some topics that we might expect to suffer from content gaps—like those on taboo subjects in women’s health—have grown and thrived over the last two decades. On the day it was born (October 25, 2001), the *Clitoris* article in Wikipedia was three sentences long. Today, it is more than 12,000 words, with 17 figures and 198 references. How did this valuable resource arise?

In this project, we compare two taboo articles to two non-taboo articles. We do so using a mixed methods approach that traces each article history. We do so by asking *RQ1: How do taboo and non-taboo knowledge resources develop?* Next, we ask *RQ 2: What conflicts and shared challenges do communities face in the creation of these resources?* Third and finally, *RQ3: What challenges do authors face in creating taboo articles in particular?*

Methods

We selected the extensive history of four articles for our analysis. Two were taboo articles focused on women’s health: “Clitoris” and “Menstruation.” For comparison, we also included two non-taboo articles: the article on “Cell Membrane” and biography of the author “Philip Pullman.” The non-taboo articles were selected because

they were created at the same time as the taboo articles and have roughly the same number of revisions (Table 1).

We draw our data from the publicly-available XML dumps produced and published by the Wikimedia Foundation. We extract all revisions to all articles in the sample set (see Table 1). Our selection of articles for examination is informed by prior work describing the conflict associated with articles about women’s health in Wikipedia (Menking, 2019), with articles matched on age and number of contributions for comparison purposes.

We made detailed observations of every event in the life of each article, developing codes, then memos, then life history narratives (RQ1). Working iteratively through these notes, memos, and narratives, we identify challenges and collaborative approaches in taboo and non-taboo articles (RQ 2, 3) (Braun and Clarke, 2006). We spent 9 months scrutinizing 13,267 Wikipedia article contributions over more than 20 years. Having built qualitative versions of answers to each research question, we used an article revision quality measure extracted from the ORES machine learning model (Halfaker, 2017) to extend and challenge our qualitative perspective.

Results

Article Histories

We found *Clitoris* faced two controversies: the use of images and whose values about appropriateness should prevail. *Cell Membrane* reads like a biology textbook and has led a relatively quiet life. *Menstruation* has undergone constant renovation to use appropriate biomedical sourcing and to acknowledge the lived phenomenon of menstruation—without pathologizing or using jargon. These goals are sometimes in conflict. *Philip Pullman* has developed in an event-driven way, growing when the author was in the news, and updated with each new interview, award, or publication.

Our quantitative analyses examine article history using the average monthly quality of each revision to the article as assessed by the ORES machine learning model (Figure 1). Article quality grows across all four articles, although interrupted by conflict or vandalism. By linking our qualitative analysis to our quantitative analysis, we show that quality jumps come about in diverse ways: by the work of single volunteers, as with *Clitoris* attaining

“Good Article” status, or through organized groups, as with a notable quality jump in “Cell Membrane” due to a WikiEdu-supported university biology course.

Qualitative Themes

Our qualitative analysis identified a set of themes that described the ways that conflicts, challenges, and resolutions were shaped by taboo.

Resilient Leadership Articles were at times characterized by one or two contributors doing most of the work. We found that contributors to the taboo subjects were forced to be resilient in the face of not only everyday attacks, as are common throughout Wikipedia, but also gendered attacks that targeted them personally.

Identifiability Challenges Those who make themselves in some ways less identifiable—by contributing without an account—may find themselves mistrusted. Although each of the articles we observed were locked to non-account holders in the face of vandalism, the locks were allowed to expire in the case of the two non-taboo subjects, but maintained long term for taboo subjects.

Disjointed Sensemaking We describe the disentrained and often repetitive process of sensemaking we observe as “disjointed.” A question might be posed with no reply, or replies may be much delayed. Participants may engage briefly or without accounting for what has happened before. In taboo articles, shared conclusions or negotiated positions are fragile; conflict may re-emerge when a new person triggers the same old debate. The same misconceptions, misinformation, and misogynistic commentary about the clitoris and menstruation were added repeatedly over the span of years. Would-be contributors sometimes inserted questions directly into the article, or repeatedly on the talk page. Article authors tried multiple strategies to manage this disjointedness: adding comments in the article, documenting disputes, and repeatedly pointing people to past discussions.

Emergent Governance Early in the history of these articles—and of Wikipedia—mechanisms for resolving conflict were absent. How should collective decisions be made? The answer emerged after repeated failures. Participants tried local discussions and polls, but eventually referred to wiki-wide policy bodies. One key moment in image policy came about from the community’s response to the release of photos depicting Americans torturing Iraqis in Abu Ghraib prison: despite the deeply disturbing images associated with this event, the community agreed that Wikipedia is not censored, and this decision resounded through the discussion of taboo images as well. However, the clitoris is not a war crime. Wiki-wide policies were at times insufficient to determine the definitive answer to some points of conflict in taboo articles, e.g.,

whether a given image is encyclopedic, pornographic, or both.

Audience and Publicness Contributors to taboo articles struggled to reach consensus about their audience. Did they intend that all content be appropriate for schoolchildren? For viewing at work? In all countries? As with the discussion of images, these questions were generally resolved by declaring Wikipedia to be uncensored and dedicated to all forms of knowledge, but as disjointed sensemaking suggests, this did not prevent them from being raised repeatedly. Non-taboo articles did not face these recurrent concerns about audience and the public view.

Discussion

Contributors to taboo articles face substantial barriers. To succeed, contributors must be resilient in their conflicts with other Wikipedians, often revisiting the same topics repeatedly. While our work shows how they can succeed, it also demonstrates how this success is despite the fact that their areas of work are often not well served by the governance of the platform. The quality of taboo articles is a testament to the commitment and endurance of these volunteers. Perhaps it should not be so hard. Closing content gaps may require the creation of a governance environment and tools that are more supportive of the vulnerability-inducing nature of work on taboo topics and the energy-draining impact disjointed sensemaking and audience challenges may have on contributors.

Acknowledgements

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Taboo Set			Matched Set		
Title	Birthdate	Revisions	Title	Birthdate	Revisions
Clitoris	2001-10-25	3340	Cell membrane	2001-10-27	3286
Menstruation	2002-02-07	1779	Philip Pullman	2002-02-08	1724

Table 1: Articles in the sample. Matches are a random selection from a list of candidates developed based on being created within a week of the women’s health article and having a revision count within 100 of the women’s health topic.

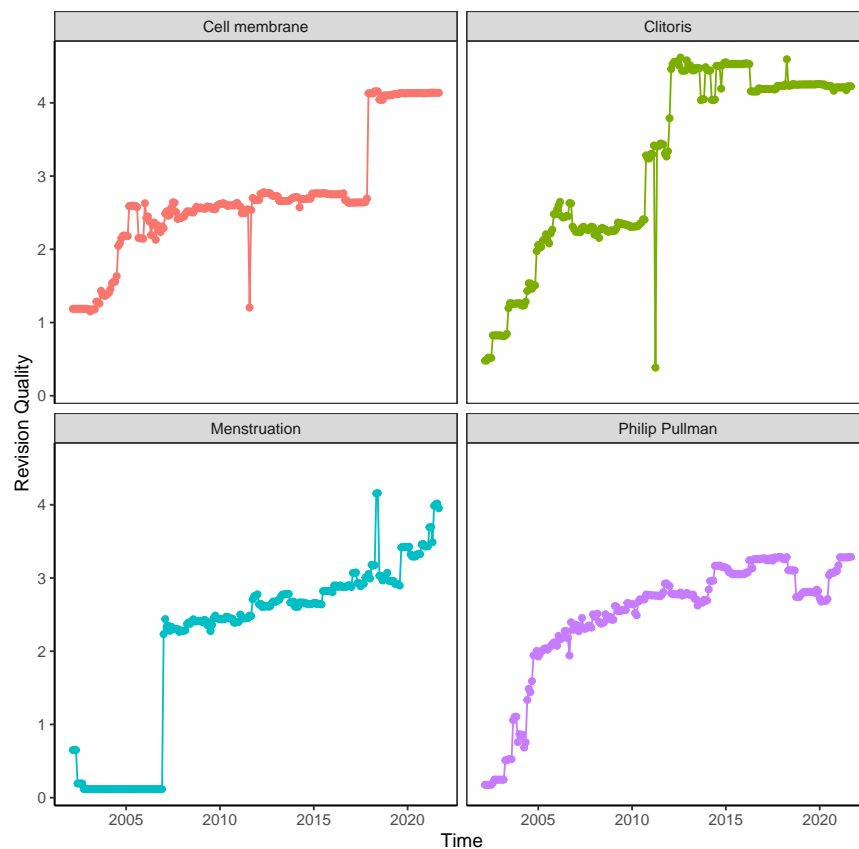


Figure 1: Article revision quality over time.