## Wikipedia and Political Science

### Wikipedia and Political Science: Addressing Systematic Biases with Student Initiatives

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his symposium discusses systematic knowledge gaps in political science and politics on Wikipedia and the efforts by political scientists to ameliorate these gaps through student initiatives in higher education. Wikipedia, which now contains more than 55 million articles, was launched on January 15, 2001—last year was its 20th anniversary—as an online, open-access, cost-free encyclopedia hosted by the Wikimedia Foundation, a nonprofit organization funded by donations. Wikipedia's aim is to democratize access to knowledge by taking knowledge resources from (often gated) scholarly publications and synthesizing it in writing that is accessible to laypeople. To generate articles, Wikipedia relies on crowdsourcing through volunteer editorship (all authors are "editors").1

This introduction first discusses why political scientists should care about the knowledge gaps and biases in Wikipedia articles on politics and political science. Due to the popularity and accessibility of Wikipedia to worldwide audiences, it is important that existing articles are accurate, complete, and unbiased. Analyses show that Wikipedia's model of crowdsourcing produces articles that are fairly accurate but sometimes incomplete or biased. Furthermore, the realm of existing articles is incomplete due to systematic biases in the articles that editors choose to write. Although they are imperfect, we argue that Wikipedia's accessibility and existing quality are solid enough to warrant political scientists to care about addressing imperfections in our disciplinary topics.

Second, this article discusses how Wikipedia articles on political science and politics can be incomplete and biased in systematic ways that reflect broader systematic biases in knowledge production in the discipline and more broadly in society. Symposium contributors document four notable biases: (1) the skew toward perspectives by the historically privileged, (2) the dearth of entries about political scientists from historically underrepresented groups, (3) the deficiencies in subnational politics, and (4) the lack of Global South

Third, we contend that political science students are ideal editors. Students have access to gated scholarly resources and support from university instructors and librarians. Furthermore, creating Wikipedia content imbues a range of pedagogical benefits to students. We highlight these different student initiatives used by symposium contributors: edit-a-thons, student-led immersions, and term projects.

We conclude by inviting political science instructors and students to use their position and privilege to improve Wikipedia-consistent with university missions to disseminate knowledge to the wider public. As this symposium illustrates, however, it is important-at a minimum-for instructors and students to become better consumers of Wikipedia by understanding the politics of knowledge within and surrounding it.

#### THE IMPORTANCE OF IMPROVING POLITICAL SCIENCE AND POLITICS TOPICS ON WIKIPEDIA

Why should political scientists care about ensuring the quality of political science and politics content on Wikipedia? In short, because it is the most widely used source of encyclopedic knowledge in the world. As the 13th most visited website in the world (eighth in the United States), it lags behind only a few notable search engines, online retailers, and social media platforms.2 Furthermore, popular search engines often use Wikipedia articles as a "first-hit" source of information.3 Similar to how we use it for information about other disciplinary topics, other people are using it to learn about our field as an entry point to scholarly work. Thus, it is important that Wikipedia's knowledge is accurate, complete, and unbiased for the broad goal of ensuring accessible and high-quality encyclopedic information on politics and political science.

Because of its open-access nature, Wikipedia has the potential to address important local and global inequalities in access to knowledge by providing substantive summaries of scholarship that otherwise are gated. Whereas many can access Wikipedia on the internet, both hardcopy and electronically gated published sources typically are too expensive for most individuals unless they have access to a well-funded highereducation library. Such inaccessibility is especially acute for Global South populations, even at higher-education institutions, but rapid expansion in internet access is rendering Wikipedia accessible to many more of these populations. As described by Martha Wilfahrt and Kristin Michelitch (2022) in this symposium, Wikipedia also has the power to make a special impact here-Global South populations often are limited to state broadcasters as sources of political information,

which seldom archive historical information and can be biased in favor of incumbent regimes.

Contrary to initial skepticism, scholarly assessments of Wikipedia articles across diverse disciplines (see the meta-analysis in Mesgari et al. 2015), including political science (Brown 2011), tend to find existing articles to be *accurate* (i.e., do not contain misinformation). However, where they need improvement typically is in regard to their *completeness* (i.e., do not contain all information that scholars deem neces-

#### SYSTEMATIC KNOWLEDGE GAPS AND BIASES

Systematic biases in Wikipedia content and cited sources have been a central concern of the Wikimedia Foundation<sup>7</sup> and a subject of much external coverage of Wikipedia.<sup>8</sup> Political science and politics topics are no exception. There are two main sources of these biases. First, although crowdsourcing promises to democratize the editorship of Wikipedia, as a community of volunteers, its editors are not representative.

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sary), including their *unbiasedness* (i.e., do not present all perspectives and/or maintain a neutral point of view).

These findings, of course, are a consequence of how articles are edited through crowdsourcing. Many people do not realize that editorial supervision exists to ensure policy compliance. Although anyone can edit an entry, edits are monitored by more experienced editors and administrators for adherence to Wikipedia guidelines such as neutral writing and proper citations using reliable published sources. Certain articles (e.g., medical information, living persons, and controversial topics) are heavily and systematically monitored. Editor groups (called WikiProjects)<sup>4</sup> maintain lists of missing or low-quality pages, with bots often aiding in those endeavors.<sup>5</sup>

Therefore, although crowdsourcing critically widens the decision-making power over which entries are included relative to a group of experts, Wikipedia editors are disproportionately from historically privileged groups: the Global North, young, white, and male. Thus, content tends to be tailored toward the interests, abilities, and perspectives of those who are relatively privileged (Sengupta and Ackerly 2022). Whereas Greenstein and Zhu (2018) noted that increasing the crowd of editors reduces bias, increasing the diversity of these editors is certain to make an impact.

Second, Wikipedia's editors, regardless of their identity, must cite published sources that fellow editors assess as reliable.<sup>10</sup> When controversy exists, encyclopedic neutrality

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It is critical, however, that for crowdsourcing to work, a "crowd"—not only one individual—is needed to contribute, especially on more controversial entries in the realm of politics and political science. For example, two studies examining articles on US politics have shown that, compared to the *Encyclopedia Britannica* (created by experts), Wikipedia displays equivalent bias when articles have undergone revision but can be more biased when editorship has been minimal (Greenstein and Zhu 2012; 2018). Savvy readers also can make their own assessment; as Anasuya Sengupta and Brooke Ackerly (2022) note in this symposium, the complete editorial history of each page is available (under the "talk" tab) for anyone to determine whether an article has been written primarily by one editor or if claims have been contested.

A running list exists for missing political science articles.<sup>6</sup> We argue that what is missing (both on and off this list) reflects well-known systematic biases related to the "politics of knowledge" in political science, and we highlight four biases tackled by symposium contributors through student initiatives.

norms call for editors to represent each point of view with the weight and credulity afforded to it by the best sources of information on the topic.<sup>11</sup> It is problematic that available published knowledge in political science, of course, is widely documented to overrepresent privileged groups (e.g., based on class, race/ethnicity, and gender).<sup>12</sup> Political scientists also have documented that published works by overrepresented groups are more likely to be promoted as important (e.g., cited, listed for syllabi, or retweeted) (Bisbee, Larson, and Munger 2020).<sup>13</sup>

Furthermore, Wikipedia policies on reliable sources for citation can compound this skew. In an endeavor to promote the accuracy and reliability of the information, Wikipedia restricts information sources to published work. Although in many ways this is reasonable, one consequence of this policy is that editors may not contribute their own unpublished knowledge (e.g., original data analysis and interview material) due to conflicts of interest. Given the disproportionate hurdles for underrepresented groups to develop a career in knowledge production and creating published work (e.g., academia and

journalism), a lag thus exists in their ability to contribute knowledge.<sup>14</sup>

### STUDENT INITIATIVES TO ADDRESS SYSTEMATIC KNOWLEDGE GAPS AND BIASES

Some political scientists edit Wikipedia as part of an individual mission to close knowledge gaps for a global audience. However, a different and potentially more impactful way that student, chipped away at this gap during a year-long self-guided project to create one page each day about a female or non-US-American political scientist (Baltz 2022).

#### **Subnational Politics**

There is a dearth of information about subnational politics relative to national politics cross nationally, even in more welldocumented countries such as the United States. Partnering

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political scientists could improve Wikipedia is through student initiatives in higher education. In the 10 years of its existence, for example, students in courses with Wiki-Edu collaborations are responsible for making more content for Wikipedia than the last print edition of the *Encyclopedia Britannica*. <sup>15</sup>

In many ways, students are ideal contributors. With support from librarians and subject-expert instructors, they can access the gated knowledge resources of a university. As Wilfahrt and Michelitch (2022) argue, students are "semi-experts" able to understand and synthesize academic writing into language that is accessible to laypeople. More complicated topics that require additional training might be best served by graduate students, as demonstrated by Baltz (2022). Finally, students tend to be a more diverse population in gender and ethnic backgrounds than the standard editorship of Wikipedia, which has the potential to diversify the content through different lenses. For example, whereas 86% of the editorship of Wikipedia is male, 59% of students undertaking WikiEdu collaborations are female, with an additional 2% identifying as nonbinary.<sup>16</sup>

Contributors to this symposium discuss the following four illustrative examples of how student initiatives can address systematic knowledge gaps across political science and politics entries on Wikipedia.

#### **Marginalized Groups**

Reflecting broader politics of knowledge, much of the content on Wikipedia relates the voices of history's "victors" rather than marginalized groups. Sengupta and Ackerly (2022) have their students delve into Wikipedia pages (including their editorial histories) to reveal bias toward privileged groups (e.g., the California Gold Rush concentrated on the white settler experience, not the Native American genocide). Then they use edit-a-thons to improve the representation of marginalized group experiences on Wikipedia. An edit-a-thon is an event in which editors from a common community or interest get together to edit Wikipedia on a specific topic.<sup>17</sup>

#### **Political Scientists from Underrepresented Groups**

The Wikipedia list of political scientists is disproportionately lacking women and non-US citizens. Samuel Baltz, a PhD

with WikiEdu, an organization that facilitates student contributions through collaboration with higher-education instructors, Elizabeth Norell's American politics courses create biographical articles for missing politicians in subnational governments (Norell 2022).

#### The Global South

Knowledge gaps in political science and politics are particularly severe regarding the Global South, especially Sub-Saharan Africa. Wikipedia articles can make a specific impact here given that some news outlets may be biased and have no counterweight (e.g., state broadcasters in nondemocracies). Furthermore, certain prevalent Global South resources are not eligible for inclusion in Wikipedia (e.g., oral histories). Wilfahrt and Michelitch (2022) assign a term project of creating Wikipedia pages on African politics in partnership with WikiEdu.

These four examples of student engagement with Wikipedia comprise a range of pedagogical benefits, described at length by the symposium contributors. Many underscore research, light coding, and writing skills. Wilfahrt and Michelitch (2022) note that editing Wikipedia joins a general pedagogical movement in higher education away from students merely consuming and regurgitating knowledge to cultivating the ability to be a producer of knowledge. Because Wikipedia is a public-facing outlet, it offers a unique type of service learning and civic skill building as noted by Norell (2022), another important goal of higher education. Finally, as Baltz (2022) and Sengupta and Ackerly (2022) emphasize, student engagement with Wikipedia yields an opportunity to observe and have firsthand experience in precisely what the politics of knowledge makes invisible: the power of their epistemic privilege (i.e., privileged access to knowledge).

In addressing some biases, however, these initiatives can exacerbate certain other biases on Wikipedia. This symposium cites examples from only Global North institutions, which generally do not address the underrepresentation of Global South voices or locally sourced resources—a point highlighted by Wilfahrt and Michelitch (2022). Furthermore, Sengupta and Ackerly (2022) note the gap between English and other language Wikipedias, which is not assuaged by Englishlanguage initiatives alone. Finally, improving pages on

#### Teacher Symposium: Wikipedia and Political Science

subnational politics of the United States increases the skew toward the Global North, according to Norell (2022). We should not be paralyzed by these conundrums because these student initiatives are only one part of a larger movement to address biases on Wikipedia. By drawing on insights and cautions of the larger movement, student-centered initiatives can become aware of their limitations due to the students' own positionality and privilege.

#### CONCLUSION AND MOVING FORWARD

The mission of most universities includes not only research and teaching but also wider knowledge dissemination in society. Whereas incentives and resources for political scientist professors are more apparent for the research and teaching goals, pathways for knowledge dissemination beyond academic audiences are less clear. Improving Wikipedia is one such path.

This symposium invites political scientists to consider contributing to Wikipedia, with attention given to addressing systematic gaps and biases in its content. It is important to ensure accurate, complete, and unbiased information regarding our discipline on Wikipedia due to its sheer reach and reasonable level of baseline quality (21 years into what many thought would be an untenable project). In fact, given that Wikipedia is the most accessible knowledge resource to most of humanity, it promises to be the widest audience we can impact.

More specifically, we suggest that political scientists support student initiatives as Wikipedia editors. Symposium contributors describe diverse initiatives that not only improve Wikipedia but also achieve an important range of pedagogical goals for students. Moreover, these student initiatives have the potential for a wider impact among students. First, skills gained through firsthand participation in the generation of public knowledge for Wikipedia yield larger lessons for the production and consumption of knowledge writ large. Second, when instructors provide a foundational entry into Wikipedia editorship, students may feel empowered to continue to edit Wikipedia, in either extracurricular clubs or as an independent project—which increasingly is a graduation requirement at many higher-education institutions (Kuh 2008). Without an introduction to editorship from instructors, however, editing Wikipedia may seem to be an unimaginable task for most

At a minimum, we aim to convince readers to become—and facilitate their students to become—better consumers of Wikipedia. Although we agree that Wikipedia is not appropriate as a citation for a term paper, it is almost every student's initial springboard into researching a topic. Rather than preaching "abstinence" from Wikipedia, we instead should teach ourselves and our students to be savvy digital literates, to adjudicate between high- and low-quality articles, and to identify systematic biases.

#### NOTES

 See https://en.wikipedia.org/wiki/Wikipedia:About for details about Wikipedia's model of creation, including rules for editing.

- Accessed January 7, 2021, as measured by Alexa on their top 500 list. The top
  20 global websites include, in order: Google.com, youtube.com, tmall.com,
  baidu.com, qq.com, Sohu.com, facebook.com, Taobao.com, amazon.com,
  360cn, yahoo.com, jd.com, Wikipedia.org, weibo.com, sina.com.cn, zoom.
  us, live.com, reddit.com, Netflix.com, and xinhuanet.com.
- For example, Google's algorithm currently populates its "knowledge graph" (i.e., the short biography that appears after a biographical search) with content from Wikipedia.
- 4. See https://en.wikipedia.org/wiki/Wikipedia:WikiProject\_Missing\_encyclo pedic\_articles. More experienced editors sometimes endeavor to create "stubs" (i.e., very short articles) on uncovered topics to kickstart further edits.
- 5. See https://en.wikipedia.org/wiki/Wikipedia\_bots.
- See https://en.wikipedia.org/wiki/Wikipedia:Requested\_articles/Social\_ sciences/Politics\_and\_government.
- 7. See https://commons.wikimedia.org/wiki/File:Wikimedia\_2030\_Move ment\_Strategy\_Recommendations\_in\_English.pdf; https://en.wikipedia.org/wiki/Gender\_bias\_on\_Wikipedia; and https://en.wikipedia.org/wiki/Racial\_bias\_on\_Wikipedia.
- For example, see www.nytimes.com/2011/01/31/business/media/31link. html?hpw; "One Page at a Time, Jess Wade Is Changing Wikipedia," January 6, 2021, on Short Wave www.npr.org/transcripts/953334366.
- 9. See https://en.wikipedia.org/wiki/Wikipedia:Wikipedians#Demographics.
- 10. See https://en.wikipedia.org/wiki/Wikipedia:Reliable\_sources.
- 11. See https://en.wikipedia.org/wiki/Wikipedia:Guide\_to\_addressing\_bias.
- 12. For example, the American Political Science Review failed to publish on racial politics in the United States during the 1960s (Easton 1969). Teele and Thelen (2017) documented a range of gendered patterns in publication in political science journals.
- 13. See Bisbee's online tool that allows users to see retweets, followers, mentions, and links across male and female tenured and tenure-track professors: www.jamesbisbee.com/polisci-twitter.
- 14. Furthermore, due to conflict of interest (Baltz 2022), individuals from underrepresented groups cannot simply create their own pages to solve this bias.
- See https://wikiedu.org/blog/2018/04/18/wiki-education-hits-a-major-mile stone-on-its-way-to-enhance-the-trustworthiness-of-online-information.
- ${\bf 16. \ See} \quad https://wikiedu.org/blog/2020/10/05/wiki-education-brings-19-of-english-wikipedias-new-active-editors.$
- 17. See https://en.wikipedia.org/wiki/Edit-a-thon.
- 18. See https://en.wikipedia.org/wiki/List\_of\_political\_scientists.

#### REFERENCES

- Baltz, Samuel. 2022. "Reducing Bias in Wikipedia's Coverage of Political Scientists." PS: Political Science & Politics, doi:10.1017/S1049096521001207.
- Bisbee, James, Jennifer Larson, and Kevin Munger. 2020. "#polisci Twitter: A Descriptive Analysis of How Political Scientists Use Twitter in 2019." Perspectives on Politics 1–22. DOI: https://doi.org/10.1017/S1537592720003643.
- Brown, Adam. 2011. "Wikipedia as a Data Source for Political Scientists: Accuracy and Completeness of Coverage." *PS: Political Science & Politics* 44 (2): 339–43.
- Easton, David. 1969. "The New Revolution in Political Science." American Political Science Review 63 (4): 1051–61.
- Greenstein, Shane, and Feng Zhu. 2012. "Is Wikipedia Biased?" American Economic Review 102 (3): 343–48.
- Greenstein, Shane, and Feng Zhu. 2018. "Do Experts or Crowd-Based Models Produce More Bias? Evidence from *Encyclopedia Britannica* and Wikipedia." MIS Quarterly 42 (3): 945–59.
- Kuh, George D. 2008. "High-Impact Educational Practices: What They Are, Who Has Access to Them, and Why They Matter." Report of the Association of American Colleges & Universities 14 (3): 28–29.
- Mesgari, Mostafa, Chitu Okoli, Mohamad Mehdi, Finn Årup Nielsen, and Arto Lanamäki. 2015. "The Sum of All Human Knowledge: A Systematic Review of Scholarly Research on the Content of Wikipedia." *Journal of the Association for Information Science and Technology* 66 (2): 219–45.
- Norell, Elizabeth. 2022. "Civic Engagement Meets Service Learning: Improving Wikipedia's Coverage of State Government Officials." *PS: Political Science & Politics*, doi:10.1017/S1049096521001451.
- Sengupta, Anasuya and Brooke Ackerly. 2022. "Wikipedia Edit-A-Thons: Sites of Struggle, Resistance, and Responsibility." *PS: Political Science & Politics*, doi:10.1017/S1049096521001220.

Teele, Dawn, and Kathleen Thelen. 2017. "Gender in the Journals: Publication Patterns in Political Science." PS: Political Science  $\mathcal E$ 

Wilfahrt, Martha and Kristin Michelitch. 2022. "Improving Open-Source Information on African Politics, One Student at a Time." *PS: Political Science & Politics*, doi:10.1017/S1049096521001219.

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