

Book purchases of liberals and conservatives reveal partisan division

April 3 2017



Credit: Wikipedia/CC

Reader preferences for liberal or conservative political books also attract them to different types of science books, according to a new study from researchers at the University of Chicago and Yale and Cornell universities. The result supports observations that the divisiveness of politics in the United States has spread to scientific communication as well, endangering the role of science as politically neutral ground.

While readers on the political left and right exhibited shared level of interest in [science books](#), an analysis led by UChicago's Knowledge Lab and the Social Dynamics Lab at Cornell determined that these groups are largely drawn to different subjects. Liberals prefer basic sciences, such as physics, astronomy and zoology, while conservatives prefer books on applied and commercial science, such as medicine, criminology and geophysics.

Even in disciplines that attract both conservative and liberal readers, such as social science and climatology, they typically cluster around different individual books—a reflection of political polarization within the sciences most relevant to public policy.

"Interest and respect for science remains high across political boundaries in the United States, suggesting that it could be a crucial bridge for crossing partisan divides in America," said James Evans, professor of sociology at the University of Chicago, senior fellow of the Computation Institute, and director of Knowledge Lab. "However our study finds that within science, there are clear differences in readership of specific topics and books, suggesting that science is not immune to partisanship and the 'echochambers' of modern political discourse."

Researchers built a network from more than 25 million "copurchases" and nearly 1.5 million books from the Amazon and Barnes & Noble online stores. After collecting data from "Customers Who Bought This Item Also Bought" recommendations, the researchers could analyze the scientific experiences of readers who purchase liberal or conservative books.

Initial analysis found that readers of liberal and conservative books were more likely to purchase books on science than other non-fiction topics, such as arts and sports—a difference largely driven by interest in books on [social science](#). However, co-purchases revealed that readers on

opposite ends of the political spectrum were far more polarized for science than in arts and sports, less likely to buy and read the same science books.

"Our study found that 'blue' readers prefer fields driven by curiosity and basic scientific concerns, such as zoology or anthropology, while 'red' readers prefer applied disciplines such as law and medicine, and with disciplines that patent more intensively," said first author Feng Shi, a former postdoctoral scholar with Knowledge Lab, currently at the University of North Carolina. "One potential interpretation is that liberal readers prefer scientific puzzles, while conservative readers prefer problem-solving."

Even when left- and right-leaning readers converged upon a scientific discipline, such as paleontology, environmental science or political science, they rarely shared preferences for the same books within the subject area. Conservative choices tended to cluster on the periphery of a discipline, relatively isolated books that are often bought with each other, but not with other books in the subject area. Books preferred by liberals are less clustered, more diverse, and lie closer to the center of a given discipline.

The authors acknowledge that the recommendation algorithms employed by online bookstores, and used by this study to create the co-purchase network, could augment polarization by reinforcing previously established connections, proposing science book sales to new politically active customers. These technologies could contribute to the "echo chamber" effect observed in today's political culture, where Americans are increasingly drawn to voices and products that confirm their own prior beliefs.

These observations also reflect growing politicization of scientific topics such as climate change, evolution and genetically modified organisms,

throwing doubt upon areas of scientific consensus and weakening science as a neutral, evidence-based driver of public policy decisions. The authors suggest that improvements in [scientific communication](#) are needed to push back against this polarization.

"Our work adds urgency to the search for approaches to the communication of scientific information that counter selective exposures to 'convenient truth' and increase potential for science to inform political debate," said Michael Macy, the Goldwin Smith Professor of Arts and Sciences and director of the Social Dynamics Laboratory at Cornell University. "Our findings point to the need to communicate scientific consensus when it occurs, helping scientists find common cause with their audiences and adding public debate alongside scientific analysis to clarify the distinction between facts and values."

More information: *Nature Human Behaviour*,
[nature.com/articles/doi:10.1038/s41562-017-0079](https://doi.org/10.1038/s41562-017-0079)

Provided by University of Chicago

Citation: Book purchases of liberals and conservatives reveal partisan division (2017, April 3) retrieved 11 May 2024 from <https://phys.org/news/2017-04-liberals-reveal-partisan-division.html>

<p>This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.</p>
