

Teaching Research, Writing, and Information Literacy

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Since the publication of the Wahlke Report in 1991, political science departments have created research methods and senior capstone courses as ways to introduce students to the political science research process. However, the traditional format of these courses has not been able to provide an immersive and cohesive research experience as there are simply too few opportunities to practice and apply newly learned skills to contexts relevant to students.

The 2020 TLC Teaching Research, Writing, and Information Literacy track emphasized ways to turn those courses and skills into experiential learning opportunities that expand research methods beyond statistics and consider integrating both the consumption and production of research methods skills throughout departmental course offerings. This approach offers students in introductory courses the ability to gain social science research skills, develops a scaffold upon which research skills can be built iteratively, and provides students with the opportunity to practice these skills at varying levels throughout their coursework.

Track panelists agreed that a holistic view of what, when, and how research methods are taught will more effectively prepare students for both capstone writing assignments and the type of analytical thinking increasingly required on the job market. Toward this end, track panelists presented strategies for expanding the scope of current research methods and writing courses and approaches to integrating related skills across the curriculum. In surveying the existing literature, Brown, Smith, and Theis noted there is a relative lack of pedagogical literature and tangible tools available to instructors to expand the scope of research methods and to integrate these skills throughout the discipline. Our track answered this call through a set of innovative and diverse interventions from across different types of institutions.

Expanding the Scope of the Research Methods Course

When a research methods course focuses exclusively statistical content, students miss the opportunity to understand how research methods relate to the broader research and writing process. This exacerbates students' struggle to understand how statistical concepts are relevant to answering political questions and de-emphasizes the critical role of research design and writing in political science. Within the traditional research methods course, track panelists presented two innovative approaches to increase the scope, relevance, and cohesiveness of the traditional research methods syllabus.

Both Pitsch Santiago and Corbetta explained how research methods courses can be structured to bring together research design, qualitative and quantitative analysis skills, and an emphasis on topical political issues. Pitsch Santiago emphasized the critical role a research methods course can provide in linking research design and writing skills with qualitative and quantitative methods. The opportunity to tie together strategies for developing a well-grounded and articulated theoretical argument with the methodological skills to analyze said argument provides a powerful way for students to learn by doing. Corbetta described being forced to re-think teaching research methods when teaching it for the first time in an online classroom and

agreed that synthesizing theory and methods is crucial, even given this much different course format.

Both presentations represented approaches to teaching research methods in different contexts, and track panelists agreed that the common thread of increasing the relevance and accessibility of research methods courses will help improve student learning outcomes, retention in the major, and more effectively develop critical thinking skills.

Integrating Research, Writing, and Information Literacy Across the Curriculum

Expanding the scope of the research methods course is, however, insufficient to fully prepare students for conducting research in their future careers. Repetition, practice, and scaffolding research design and methods skills throughout the curriculum are key methods to increase student confidence and ability to perform these tasks.

Track panelists applied these ideas to a diverse set of research, writing, and information literacy topics in a wide variety of classroom settings. Our main take-away was that introducing research design and methods skills can and should occur in every course in the discipline, and that there are a number of successful models by which to do so. As we emphasize later, though the investment of single instructors is crucial for this approach to work, additional departmental and discipline support is needed for research design and methods skills to be truly integrated into the fabric of all courses, regardless of instructor or institution.

Building Foundations in Introductory Courses

Introductory courses often provide students with their first exposure to the discipline and are often non-majors' only way to learn about the social science research process. Track panelists paid special attention to integrating research design and methods skills into introductory courses. Approaches varied based on substantive course content and the type of students likely to enroll, as well as the instructor's vision for how the skills taught in an introductory course could be built upon in future disciplinary coursework. Interventions occurred in introductory American politics, comparative politics, international relations, public administration, state politics, and disciplinary survey courses. The size of the intervention in these courses ranged from low stakes exercises to new activities to major structural reform.

Given that students are often hesitant to tackle data literacy, low stakes classroom and homework exercises are an excellent way to introduce these concepts or to help students draw theoretical links between course topics. McCurdy developed a series of data literacy and analysis exercises to complement her textbook for Introduction to American Politics. These exercises are meant to help students consume and interpret data in preparation for applying data literacy skills in future courses. Similarly, Collins and Nyenhuis introduced concept maps as an active learning method to increase students' ability to synthesize course material, a key skill for summarizing literature and developing a theoretical argument. Their experimental intervention showed that making concept mapping a regular in-class activity improved student synthesis and retention compared to a control course without concept mapping.

Building on the idea of lower stakes assignments, but in a graduate level introductory course, Butler's presentation on strategies for "gamifying" research methods concepts using online quizzes stressed the importance of making both course content and teaching methods timely and relevant to students. Students of all skill levels appreciated the opportunity to use the

online quiz as a learning tool, repeating it multiple times to practice difficult to understand skills and to figure out how and why they made mistakes.

Beyond frequent low stakes exercises, track panelists also developed summative assessments to evaluate student data literacy and understanding of political science research. These assessments were coupled with small changes to course structure that enabled students to engage more deeply with research design and methods skills. Such interventions look different for different types of students. For their introductory courses in a Masters in International Policy Management program, Bhasin and Butcher designed repeated infographic and policy memo assignments that emphasized the practical applications of political science research. Both interventions could be implemented just once during the semester, but panelists repeated these assignments multiple times in order to provide students with space to practice research skills within the course. Franco presented an excellent formula for teaching community college students to read a journal article through guided and repeated practice.

Adding several repeated research design or methods assignments throughout a course is an effective tool for teaching these skills without radically changing the course structure. However, a thoughtfully re-designed introductory course that makes research design and methods skills core student learning outcomes builds a stronger research foundation that will help students in future courses. Wender and D'Erman particularly emphasized the important role understanding broad theoretical debates in the discipline has for structuring students' knowledge of what political science research is and the types of questions research methods can help answer. O'Brochta showed evidence that students in an introductory course designed to teach the research article writing process greatly improved research design, methods, and writing skills to a level comparable to more experienced senior capstone students.

Applying Foundational Knowledge in Upper-Level Courses

Not all research design and methods interventions work in introductory courses. In particular, introductory courses may be more effective at providing an overview of many of the techniques involved in the research article writing process, whereas upper-level substantive courses provide a place to more deeply investigate specific research, writing, and information literacy skills. Rathbun and Bozovic's data literacy experiments showed just this, finding that a simple data analysis paper in an introductory course did not improve data literacy, but that students in an upper-level course asked to more intentionally reflect on common problems in data analysis did improve data literacy.

By introducing strong foundational research, writing, and information literacy skills in introductory courses and providing repeated opportunities to develop and practice these skills in substantive courses, students entering a senior capstone course can carefully focus on polishing their research and writing skills instead of having to learn them from scratch. Brown demonstrated the utility of this scaffolding model by engaging students in intensive peer review in a senior capstone course. Peer review works best when students have already developed research and writing skills, enabling them to offer more careful and substantive comments than if they were learning these skills for the first time. Careful scaffolding can allow for senior capstone experiences to re-focus on improving research skills instead of teaching them for the first time.

Research Methods Outside the Course Context

Scaffolding research methods skills can also be particularly successful when integrating them into extra-curricular departmental opportunities. Duncan and Brown presented one such model, introducing applied qualitative research methods as part of a one-time fieldwork trip to Washington, D.C. Students worked collaboratively to understand research methods concepts while engaging in data collection. As Bauer showed, these types of experiences can be made into ongoing research laboratories where institutionalizing a student chain-of-command can make it feasible for instructors to supervise out-of-class research article writing teams.

Call to Action

Departments need on-going wholesale discussions about teaching research, writing, and information literacy skills that go beyond the content taught in traditional statistical research methods courses. While our track panelists presented new and exciting ways to expand the research methods course and to integrate research design and methods topics throughout introductory and substantive courses, this effort cannot be successful if championed by only a few faculty members. Applied and experiential learning about the political science research writing process requires departmental learning outcomes emphasizing these skills, assessment throughout coursework, and confidence that students can produce high-quality political science research.

Resources are available to assist in this mission. First, university subject librarians and writing center instructors can be invaluable assets when carefully integrated into curriculum design. Second, departments can gain inspiration from published work on teaching research, writing, and information literacy concepts and should encourage instructors to engage in and publish scholarship on this topic. Finally, APSA can encourage departmental progress by making its broader membership aware of research design and methods innovations that go beyond requiring a quantitative research methods and a senior capstone course. Though the existence of such courses does provide a basic structure upon which a holistic approach to teaching political science research skills can be built, few departments have integrated and synthesized research methods into the curriculum in a way that provides a truly significant learning experience for students. Research, writing, and information literacy skills are crucially important for fostering critical thinking and preparing students for the workforce as well as for those students interesting in pursuing graduate studies. We as a discipline and instructors can do more to ensure that students are able to benefit from a full complement of these skills.