

# POLITICS & INFORMATION LITERACY: A PROBLEM-BASED LEARNING APPROACH

PEG COOK AND MARY WALSH

Students in the 21<sup>st</sup> century classroom are bombarded with information. Students of politics are no different. With the click of a mouse, or tap of a pad, students can follow a bill through Congress or find all recent executive orders issued by the President. The same click may also lead them to a photo-shopped image of Barack Obama cruising with Osama Bin Laden or to a rant about the US government insiders behind 9/11. A recognition of the increasing ease with which information, and misinformation, is communicated points to a necessary component of the education of any student of politics: information literacy. Acquisition of the skills necessary to navigate the information – or misinformation – highway is an important tool for political science students to master. This paper details the collaborative efforts of a reference librarian and political science teacher to seamlessly meld the study of politics with the acquisition of information literacy skills using a problem based learning approach. Students in an introductory American Government class were engaged in a group project in which they acted as media consultants for the political candidate of their choice. Two information literacy sessions were embedded into the project. ACRL Information Literacy Standards were used to generate and assess performance outcomes. Student feedback, as well as pre-test and post-test results, indicate that a project based approach to enhancing information literacy in political science courses effectively engages students interest.

Problem based learning (PBL) is student-directed learning in which the instructor acts as facilitator and the students pursue questions and solutions of their own choosing

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*Cook* (Assistant Librarian) and  
*Walsh* (Assistant Professor, Political Science)  
Elmhurst College [Elmhurst, IL]

within the parameters set by the instructor and project (Bell, 2010). PBL's emphasis on higher-order critical thinking skills, such as understanding and application, as opposed to lower-order skills, such as recall, proved attractive to teachers of every grade level and across the disciplines. Studies investigating the effectiveness of PBL indicate that students of a PBL approach acquire better problem solving skills (Bell, 2010; Ravitz, 2009). Moreover, students taught using PBL were more likely to report a greater affinity for the topic of instruction (Erdemir, 2009). At the conclusion of our own PBL exercise, our students reported an increased interest in politics: "As the group and I did more research ... I found myself not only comprehending politics, but also starting to appreciate the idea" (Personal Reflection Paper, Spring 2010). Crucial to PBL is collaboration among students (Savery, 2006). This reflects the real world situation which requires team work, collaboration, interpersonal skills and the motivation of various team members toward a common goal. It also provides a variety of perspectives on the problem and solution.

The PBL emphasis on higher-order critical thinking skills, the increased interest in the subject and the stress on collaboration all translate well to a political science classroom. In politics, mastery of content is empty without the acquisition of skills necessary to interpret and synthesize new information, without the ability to understand and respond to the dynamic and changing political environment. In 1991, John Wahlke, issued a report for the American Political Science Association and the Association of American Colleges in which he identified purposes and practices in the political science major, which included the maximization of "students' capacity to analyze and interpret the significance and dynamics of political events" and the ability to "cope with" politics - - "Coping with" in this context means not merely to understand, or to manage their effects ... but also to evaluate and seek to shape them' (Wahlke,

1991, p. 49). In this way, dynamic, engaged political science classrooms open the door between passive and active citizenship; PBL can furnish this door. Self-directed, active, learning inspires continued action. Students in our own PBL exercise repeatedly report a greater likelihood of actually voting as a result of the experience.

Indeed, many in the political science profession already realize the necessity of bridging content with skills and skills to action. There exist many examples of possible PBL exercises readily available over the internet. One of the best sites is from the Buck Institute of Education; the PBL project used in this study was adapted from one of the suggestions found there. We take one more step in that direction, suggesting not only specific teaching strategies and exercises, but also the incorporation of information literacy and the integration of performance standards and outcome goals available through ACRL.

A class of 30 students in an introductory-level General Education course undertook a PBL project in which they adopted the role of media consultant for a political candidate. Small groups chose which candidate to support, how to market their candidate and which issues to explore. They decided how to divide the work and how to present their conclusions. The end product included, among other things, a campaign instrument “selling” their candidate, a written explanation of issue positions taken by their candidate, as well as, possible responses to critics and an annotated bibliography. An initial trial with the project two years ago revealed that while students recommended the project for future classes as an enjoyable learning experience, they would recommend more sequenced steps incorporated into the project.

Integrating steps focused on information literacy challenged students to pursue skills necessary to politics without diminishing the creative choices necessary to the end product. IL standards provided a way to integrate some concrete steps into the project. The Buehler Library of Elmhurst College, where this course was offered, has a very active Information Literacy program (over 200 sessions a year). One of the goals of the librarians has been to incorporate as much active learning instruction as possible into IL sessions. This librarian has been looking for opportunities to integrate other problem-based or active learning into information literacy sessions. American Federal Government presented an excellent choice.

In the context of information literacy instruction, PBL is a commonly used methodology for teaching or for creating collaborations with classroom faculty. As early as 2001, Macklin was describing variations on implementing PBL into information literacy instruction. Kenney (2008) provides a framework for using PBL in the traditional “one shot” library session. Using PBL, she argues, benefits all constituents in the information literacy process—students learn more, librarians have more opportunity to engage with students, and classroom faculty are pleased with the results. Enger et al. (2002) discussed the benefits of incorporating PBL into information literacy sessions and also addressed the challenges inherent to 50 minute session, and suggested that longer sessions and more involvement in the

structure of the course would be beneficial.

In this case, the American Federal Government class attends two sessions in the library. These sessions are structured in order to give students an opportunity to find information that they need to successfully complete their project (a bonus from their perspective) as well as introduce them to some ideas about searching and evaluating information. The first session gives an overview of some of the library resources and a very brief tour of a “one-click shopping” course page. Since the primary focus of the session is to give students an opportunity to begin their research as a group, the session quickly moves to the exercise. This exercise asks students to search for an “overview article” on a current-events topic relevant to their candidate using five different search tools: Google, Academic Search Complete, the New York Times database, the New York Times website, and their candidate’s campaign website (if available). We used “health care reform” as the exercise topic, a timely topic that had been discussed that week in a class session on Congress. We ended the session with discussion to clarify and connect the experience with concepts. For example, in the context of group results we talked about what an overview article is, what information an overview article contains that would be useful as you begin researching a topic, and how to chase information through citations. We also discussed strategies for identifying search terms that would help a searcher locate an overview article on Google or in a database source.

The second library session focuses on the “Credibility Bibliography” which students complete as part of their final product. With this exercise (see Appendix), students tease out clues to credibility and bias in sources. Students are directed to a secondary library course page, with links to four different web sources ranging from credible and unbiased (CNN) to credible but biased (Huffington Post) and two sources that are “unknown” in terms of credibility but clearly biased (firedoglake.com—a liberal blog site, and SmallGovTimes.com, a libertarian “news source”). Students then complete the exercise sheet that asks them to identify aspects of the sites that indicate bias, including language, placement of stories on the page, use of photos and ads, etc. The session concludes with a group discussion, asking students to identify the clues they used to judge credibility and bias, and distinguish between the two.

ACRL’s Information Literacy Standards provide a roadmap to creating and assessing problem-based learning activities for library sessions. In the case of American Federal Government, the standards became “hooks” on which to hang information goals related to the overall project. Successful completion of the media consultant project required that students meet certain information needs; the information literacy sessions became just another step in the overall process. Both exercises were designed to primarily address Standards 1--Know, 3--Evaluate, and 4--Use. The first exercise did so by asking students to find an “overview” article and to generate some further search terms. This exercise gave students an idea of what kinds of information they might find useful. The second exercise was designed to address Standards 3--Evaluate and 4--Use. This exercise gives students the tools they need to complete the

Credibility Bibliography associated with the completion of the project.

Learning Outcomes were assessed via a pre-test and post-test administered using an anonymous online survey instrument. Students also wrote individual reflection papers, deliberating on the strengths and weaknesses of the project. In the pre-test and post-test, students self-evaluated their ability to determine credibility and bias in sources. In terms of credibility, student confidence in their ability increased overall, with the biggest gain in students describing their ability as “good”, as compared to “okay” (pre-test 37% = okay; post-test 3% = okay; pretest 48% = good; post-test 69% = good). In terms of bias, student confidence also increased (pre-test 56% = okay; post-test 14% = okay; pretest 14% = good; post-test 66% = good).

In the post-test, students were asked to judge the usefulness of the information literacy sessions in grasping concepts of credibility and bias. Two-thirds of the students found the sessions helpful in both regards:

- “Yes, this project taught me how to look for credible research. From this project, I learned that some research isn’t credible enough to read.”
- “As a newly registered voter, I am now aware of how important it is to analyze and research candidates BEFORE you vote for them.”

Clearly, self-reported assessments of confidence or ability are insufficient. So, in both the pre- and post-tests, students were asked to list three strategies for determining credibility and bias. Student ability to identify three strategies for determining credibility increased from 78% to 90%. By the time of the post-test, 100% could identify two strategies. Students’ ability to identify three strategies to detect bias increased from 60% to 69%. Interestingly, the largest increase was in students able to identify two strategies: a 13% increase from 84% to 97%.

Future analysis of data will include content analysis of reported strategies, focusing on the correctness and breadth of the various strategies identified. Were some strategies mentioned in post-test that weren’t mentioned in the pre-test? Were students able to generalize concepts - such as attribution - more readily in the post-test? Did the post-test contain less repetition of strategies, as opposed to merely re-wording the same idea?

We will continue to repeat the study of this assignment for another semester. Our hope is to improve the project as well as improve our students’ information literacy skills. We also hope to add to the literature on teaching political science by wedding the problem-based learning approach with ACRL standards, emphasizing information literacy.

## REFERENCES

- Bell, S. (2010). Project-Based Learning for the 21st century: Skills for the future. *Clearing House*, 83(2), 39-43. doi:10.1080/00098650903505415.
- Buck Institute for Education. Project based government. Retrieved on May 25, 2010 from [http://www.bie.org/tools/units/pbg\\_curriculum\\_units](http://www.bie.org/tools/units/pbg_curriculum_units)
- Enger, K, Brenenson, S, Lenn, K, MacMillan, M, Meisart, M, Meserve, H., & Vella, S. (2002). Problem-based learning: evolving strategies and conversations for library instruction. *Reference Services Review*, 30(4), 355-358, doi: 10.1108/00907320210451367 Retrieved from Library, Information Science & Technology Abstracts database.
- Erdemir, N. (2009). Determining students’ attitudes toward physics through problem-solving strategy. *Asia-Pacific Forum on Science Learning and Teaching*. 10 (2).
- Fosmire, M, and Macklin, A. (2002). Riding the active learning wave: Problem-Based Learning as a catalyst for creating faculty-librarian instructional partnerships. *Issues in Science and Technology Librarianship*. Retrieved from <http://www.istl.org/02-spring/article2.html>.
- “Information Literacy Competency Standards for Higher Education,” American Library Association, September 01, 2006. <http://www.ala.org/ala/mgrps/divs/acrl/standards/informationliteracycompetency.cfm> (Accessed May 25, 2010) Document ID: 185693
- Kenney, B. (2008). Revitalizing the one-shot instruction session using Problem-Based Learning. *Reference & User Services Quarterly*, 47(4), 386-391. Retrieved from Library, Information Science & Technology Abstracts database.
- Macklin, A. (2001). Integrating information literacy using problem-based learning. *Reference Services Review*, 29(4). Retrieved from Library, Information Science & Technology Abstracts database.
- “Political Science Research Competency Guidelines.” Association of College and Research Libraries. July 2008. Retrieved from [www.ala.org/ala/mgrps/divs/acrl/standards/PoliSciGuide.pdf](http://www.ala.org/ala/mgrps/divs/acrl/standards/PoliSciGuide.pdf)
- Ravitz, J. (2009). Summarizing findings and looking ahead to a new generation of PBL research. *The Interdisciplinary Journal of Problem-based Learning*. 3(1), 4-11.
- Savery, J. R. (2006). Overview of Problem-based learning: Definitions and distinctions. *The Interdisciplinary Journal of Problem-based Learning*. 1(1), 9-20.
- Wahlke, R. A. (1991) Liberal learning and the political science major: A report on the profession. *PS* 24(1), 48-60.

## APPENDIX

### American Federal Government Credibility Bibliography Exercise

Examine the sources on the Credibility webpage. Answer the following questions:

Article #1:

Title:

Author:

Publication:

Date:

Publisher:

What information can you find about the source of the article? Is it a journalism source? A scholarly source? What clues are you looking at to find this out?

What information can you find about the author?

Can you find other sources that corroborate the information in the article?

Write down some words in the article that clue you in to possible bias in the article.

Article #2:

Title:

Author:

Publication:

Publisher:

What information can you find about the source of the article?

What information can you find about the author?

Can you find other sources that corroborate the information in the article?

Write down some words in the article that clue you in to possible bias in the article.