INFORMATION LITERACY MODULE

Learning Outcomes (Rebecca Ziino, WPI Research & Instruction Librarian)

- Define different types of authority, such as subject expertise (e.g., scholarship), societal position (e.g., public office or title), or special experience (e.g., participating in a historic event) in order to appraise varied and credible sources appropriately.
- Use library research tools and reliable web resources to discover varied and credible sources.
- Decide where and how their information is published in order to provide appropriate attribution as an ethical user of information.
- Choose appropriate background and specialized sources to provide an in-depth and evidence-based research project.
- Integrate new information with current understanding to be contributors to the information community rather than only users of it.
- Demonstrate how to use appropriate attribution (in-text/references/formatted) in order to be an ethical user of information.
- Recognize that they are entering into an ongoing scholarly conversation and not a finished conversation in order to engage in lifelong learning.

First Session: In-class instruction with librarian (Laura Robinson, WPI Research & Instruction Librarian). This session is designed to familiarize students with some of the library’s resources (beyond Google and Google Books), help them understand why citation conventions are important and how to cite properly, help them understand the difference between peer-reviewed and non-peer-reviewed sources, and give them some early practice with search engines and ways to search.

For fun, your librarian can come to class in the role of Worcester’s Public Librarian, Samuel Swett Green (1837-1918). Although she has access to the latest technology, she enters the scene in 1885 and appeals to some of her audience’s contemporary concerns.

Background: Although the scientific community has largely accepted the bacteriological theory of disease transmission, in 1885 many engineers and even physicians still believed that disease was transmitted by miasma or smell. Character roles in our game include people from both sides of the debate as well as many people who have never thought about the cause of disease. This introduction to library resources takes place within that context, in which students must find 19th-century sources to support their positions.

Before class, all students read “The Insidious Foe: Sewer Gas,” a (2-page) 2001 secondary source published in the Western Journal of Medicine that includes an excerpt from an 1898 primary source and references to other primary and secondary sources.
This class should take place after the discovery of a dead body floating in the Blackstone Canal, an episode that upsets the characters and is intended to motivate the students to discover as much as they can using available 19th-century sources to inform their character’s understanding of the problem.

In class, the reference librarian takes them through various digital sources, teaches students about peer-reviewed sources, databases, search tools and terms, citation format, and so on. The in-class activities include the following:

For all activities here, please note complete citation information for the sources that you have found.

1. **Activity 1**: Use a secondary (current historical research) or encyclopedic sources (Wikipedia, etc.) to review sources cited. Can you find any 19th-century sources in the footnotes or references lists? How can you track down these resources?

2. **Activity 2**: Using the New York Times Historical OR JSTOR, search for 19th-century articles that discuss sewer gas. Hint: Use the advanced search feature to limit by date, and use quotation marks around regular phrases. Watch for ways to sort your results. Some ways to sort may be more useful than others.

3. **Activity 3**: Using Engineering Village, search for 19th-century articles that discuss sewer construction. Hint: Use advanced search options to limit to early publication years. Using the citation that you found in Activity 2, see if you can find a way to obtain full text of the article.

4. **Activity 4**: Use Google Books to find books and manuals about 19th-century sewerage systems.

Alternatively, students can cover the same territory using different questions. For example, we could begin with these questions: **What are the consequences of Worcester’s dirty water? Why, and for whom?** Students could then pursue some of the following inquiries:

- What are Worcester’s major industries in 1885? [note to workshop participants: these included wire manufacturing, tool manufacturing, tanneries, and some textiles.]
- What bodies of water are located near which factories?
- What are the major contaminants associated with these different industries?
- What were the health consequences associated with exposure to these contaminants?

For this assignment, students should read these two primary sources prior to coming to class:

Eddy, H. and Kinnicutt, L.P. (1901). *The Sewage Disposal Works at Worcester, Massachusetts.* Journal of the Massachusetts Boards of Health 11 (2): 75-85. (This source identifies some of the contaminants in the effluent entering the Worcester Sewage Purification Works, including free acid, iron salts, wool washings, tannery waste, and dyestuffs.)

(1876). *Some Sources of Bad Water.* Scientific American 35 (22 July): 49. (This source identifies many of the leading causes and content of water contamination in the 19th century.)