Information Literacy Threshold Concepts and the Association of College and Research Libraries' Framework for Information Literacy for Higher Education

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1. Threshold Concepts in Information Literacy
   • Threshold Concepts
   • Information Literacy in Higher Education in the U.S.
   • IL Standards and the New Framework for Information Literacy in Higher Education

2. Practical Applications
   • Example Lessons for Specific Concepts
   • Teaching Information Literacy Threshold Concepts
Threshold Concepts
A threshold concept can be considered as akin to a portal, opening up a new and previously inaccessible way of thinking about something...

...a transformed way of understanding, or interpreting, or viewing something without which, the learner cannot progress.

Transformative
Bounded
Troublesome
Integrative
Irreversible
Discursive
Information literacy in Higher Education in the U.S.
Information Literacy Competency Standards for Higher Education

Association of College and Research Libraries
-- A division of the American Library Association

- Approved by Board of Directors of the Association of College and Research Libraries (ACRL) January 2000
- Endorsed by American Association for Higher Education October 1999 and Council of Independent Colleges February 2004
5 Standards

The information literate student:

• determines the nature and extent of the information needed.

• accesses needed information effectively and efficiently.

• evaluates information critically and incorporates selected information into his or her knowledge base and value system.

• uses information effectively to accomplish a specific purpose.

• understands many of the economic, legal, and social issues surrounding the use of information and accesses and uses information ethically and legally.
Project Information Literacy Research Report: How Freshmen Conduct Course Research Once They Enter

- Differences: high school to college libraries
- Navigation of complex digital & print information spaces
- Difficulties encountered (and resolved, if at all)
- Strategies/workarounds applied from high school or discovered during college
- Gaps in skills between high school and college-level research

What frustrates students most about research? Top four answers for academic research:

- Information overload (e.g., the more you know, the less you know, it’s depressing).
- Too much irrelevant information, can’t locate what is needed from online results.
- Beginning and getting started on an assignment.
- Trying to find the “perfect source.”
Head & Eisenberg identified four types of context students tried to establish in research:

1. Big picture
2. Language
3. Situational
4. Information Gathering
Information literacy instruction

• Mostly single session
• Often instruction librarians are liaison or subject librarians
• Collaboration & embeddedness are valued
• Some librarians are faculty members, some are not
Threshold concepts and information literacy

Introduction

This Framework for Information Literacy for Higher Education (Framework) grew out of a belief that information literacy as an educational reform movement will realize its potential only through a richer, more complex set of core ideas. During the fifteen years since the publication of the Information Literacy Competency Standards for Higher Education, academic libraries and their partners in higher education associations have developed learning outcomes, tools, and resources that some institutions have deployed to other information literacy concepts and standards. The Framework is informed by a belief that within the rapidly changing higher education environment, along with the dynamic and often uncertain information ecosystem in which it operates, students need core concepts and ideas to build their own informational foundations. Students have a greater role and responsibility in creating new knowledge, in understanding the contexts and the changing dynamics of the world of information, and in using information, data, and scholarly literacy. Teaching faculty have a greater responsibility in designing curricula and assignments that foster enhanced engagement with the core ideas about information and scholarship within their disciplines. Librarians have a greater responsibility in identifying core ideas within their own knowledge domains that extend learning for students, in creating a core scheme for information literacy, and in collaborating more extensively with faculty.

The Framework offered here is called a framework intentionally because it is based on a cluster of interconnected core concepts, with flexible options for implementation, rather than on an array of standards or learning outcomes, or an exhaustive enumeration of skills. At the heart of this Framework are conceptual understandings that organize many other concepts and ideas about information, research, and scholarship into a coherent whole. These conceptual understandings are informed by the work of Wiggins and McTighe, which focuses on essential concepts and actions in developing curricula, and also by threshold concepts, which are those ideas in any discipline: that are passageway to enlarged understanding or ways of thinking and practicing within that discipline. This Framework draws upon an information literacy core of core concepts, the same foundation concepts that underlie the ACRL Core of Academic Library Services, the Library Learning Framework, and the Information Competency Standards for Higher Education. These foundation concepts, too, are threshold concepts.
Framework for Information Literacy for Higher Education

● Six Frames
● Each frame is comprised of:
  ○ A core concept (We consider these to be threshold concepts)
  ○ A set of knowledge practices (“demonstrations of ways in which learners can increase their understanding”) surrounding the core concept
  ○ A set of dispositions of learners who are developing that core concept of information literacy (“which describe ways in which to address the affective attitudinal or valuing dimension of learning”)
● Influenced by the concept of metaliteracy
• Scholarship as Conversation
• Research as Inquiry
• Searching as Strategic Exploration
• Information Creation as a Process
• Authority is Constructed and Contextual
• Information Has Value
...the previous standards [are like] the authoritarian gym coach yelling “here are the five things you need to be information literate–learn them” the new standards are more like the hippie English teacher saying, “hey guys, here’s some stuff to think about, but interpret it whatever way works best for you.”

...the framework set out to rid itself of jargon, but wound up only replacing old jargon with new jargon (metaliteracy, knowledge practices, etc.).

Nicole Pagowsky, “Thoughts on ACRL’s New Draft Framework for ILCSHE” Blog, March 2, 2014
Are threshold concepts just a rehash of older, more established educational theories? Food for thought.

Amanda Hovious, “Tackling Threshold Concepts”  Designer Librarian, March 6, 2014
Why do we like threshold concepts?

- Conceptual teaching -- Why versus What
- Student-centered
- Acknowledge unique disciplinary approaches & discourses
- Embrace intellectual struggle of research
- Was a fruitful way for us to collaborate
- Idea of troublesome knowledge asks us (educators) to be aware of knowledge we take for granted
The Editors

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Features practical lesson plans with a strong conceptual foundation

Includes interactive, hands-on activities

Features ideas of other instruction librarians
Practical Application
Information Creation as a Process

Information in any format is produced to convey a message and is shared via a selected delivery method. The iterative processes of researching, creating, revising, and disseminating information vary, and the resulting product reflects these differences.
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The information creation process could result in a range of information formats and modes of delivery, so experts look beyond format when selecting resources to use. The unique capabilities and constraints of each creation process as well as the specific information need determine how the product is used. Experts recognize that information creations are valued differently in different contexts, such as academia or the workplace. Elements that affect or reflect on the creation, such as a pre- or post-publication editing or reviewing process, may be indicators of quality. The dynamic nature of information creation and dissemination requires ongoing attention to understand evolving creation processes. Recognizing the nature of information creation, experts look to the underlying processes of creation as well as the final product to critically evaluate the usefulness of the information. Novice learners begin to recognize the significance of the creation process, leading them to increasingly sophisticated choices when matching information products with their information needs.

Knowledge Practices

Learners who are developing their information literate abilities

- articulate the capabilities and constraints of information developed through various creation processes;
- assess the fit between an information product’s creation process and a particular information need;
- articulate the traditional and emerging processes of information creation and dissemination in a particular discipline;
- recognize that information may be perceived differently based on the format in which it is packaged;
- recognize the implications of information formats that contain static or dynamic information;
- monitor the value that is placed upon different types of information products in varying contexts;
- transfer knowledge of capabilities and constraints to new types of information products;
- develop, in their own creation processes, an understanding that their choices impact the purposes for which the information product will be used and the message it conveys.

Dispositions

Learners who are developing their information literate abilities

- are inclined to seek out characteristics of information products that indicate the underlying creation process;
- value the process of matching an information need with an appropriate product;
- accept that the creation of information may begin initially through communicating in a range of formats or modes;
- accept the ambiguity surrounding the potential value of information creation expressed in emerging formats or modes;
- resist the tendency to equate format with the underlying creation process;
- understand that different methods of information dissemination with different purposes are available for their use.
Information Creation as a Process

What evidence do we see in students’ research that shows us that this is “troublesome”?

How are we teaching students to research in ways that deal with this concept?

How could students’ research be transformed by this concept?
Information Creation as a Process: An Example lesson

Tracing Information Over Time
Introduces students to the information cycle via an event in popular culture

Author: Xan Goodman, University of Nevada, Las Vegas
Information Life Cycle

This lesson asks students to evaluate information they use for their college writing assignments, such as newspapers, scholarly journal articles, etc., through the lenses of format and rigor by introducing them to the information life cycle.

CONCEPT IN CONTEXT
The connection between format and quality of information is not apparent to novice researchers. Students just beginning to do research are learning about the importance of evaluating the information they discover, but their understanding of the information life cycle is probably limited. Here, the librarian fosters student awareness of the different information formats and how the process behind their creation determines their shape, content, and quality, or rigor, the term used in this lesson. Students examine articles from a variety of sources and think about the time it takes to create the information in each. This obvious examination of time spent on production requires students to think critically about the information they encounter; why it was created, for whom, and what effect the time element has on the depth, accuracy, and overall impact of its content. Can we compare the rigor of an article in a journal to that of a newspaper article? Are there degrees of rigor within each format? This activity engages students with the content in a way that compels them to consider the format of information each time they consider using it in their work.

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Level: Basic/general education
Estimated Time: 50–60 minutes

MATERIALS NEEDED
- Five stations are set up throughout the classroom prior to the start of the class. These can be whiteboards or large pieces of paper taped to the wall.

- Understanding of information life cycle limited
- Connection between format and quality of information
- Awareness of different information formats
- Process behind creation determines shape, content, and quality of info
Station 1:
Online news, newspaper articles, blog posts

Station 2
Longer newspaper articles, weekly magazine articles

Station 3
Monthly magazine articles, longer online articles

Station 4
Journal article

Station 5
Books and encyclopedia entries
Small Group Discussion of Another Concept
What evidence do you see in students’ research that shows you that this is “troublesome”? How could it be transformative?

Authority Is Constructed and Contextual
Information resources reflect their creators’ expertise and credibility, and are evaluated based on the information need and the context in which the information will be used. Authority is constructed in that various communities may recognize different types of authority. It is contextual in that the information need may help to determine the level of authority required.

Information Creation as a Process
Information in any format is produced to convey a message and is shared via a selected delivery method. The iterative processes of researching, creating, revising, and disseminating information vary, and the resulting product reflects these differences.

Information Has Value
Information possesses several dimensions of value, including as a commodity, as a means of education, as a means to influence, and as a means of negotiating and understanding the world. Legal and socioeconomic interests influence information production and dissemination.

Research as Inquiry
Research is iterative and depends upon asking increasingly complex or new questions whose answers in turn develop additional questions or lines of inquiry in any field.

Scholarship as Conversation
Communities of scholars, researchers, or professionals engage in sustained discourse with new insights and discoveries occurring over time as a result of varied perspectives and interpretations.

Searching as Strategic Exploration
Searching for information is often nonlinear and iterative, requiring the evaluation of a range of information sources and the mental flexibility to pursue alternate avenues as new understanding develops.
How are you already teaching students to research in ways to help them understand this concept?

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Discussion

1) What evidence do you see in students’ research that shows you that this is “troublesome”? How could it be transformative?

2) How are you already teaching students to research in ways to help them understand this concept?

3) What are ideas for instruction sessions to teach this concept?
Discussion:
Questions?
Comments? Ideas?
Additional Discussion Topics

How do we assess student learning of concepts?

What are other potential threshold concepts in information literacy?

How do you see threshold concepts working in the different disciplinary contexts of your students?

Using IL threshold concepts in individual classes & at a programmatic level
Sources of more information:

ACRL Framework for Information Literacy for Higher Education

ACRL Information Literacy Competency Standards for Higher Education
http://www.alala.org/acrl/standards/informationliteracycompetency#ilassess

Introduction to Threshold Concepts, by Glynis Cousin

Teaching Information Literacy Threshold Concepts: Lesson Plans for Librarians

Threshold Concepts and Information Literacy, The Delphi Study
http://www.ilthresholdconcepts.com/

Threshold Concepts and Troublesome Knowledge (1): Linkages to Ways of Thinking and Practising Within the Disciplines

Listservs
acrlframe-request@lists.ala.org