

Faculty Perceptions of Students' IL Learning in First-Year Writing

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abstract: The study investigates the perceptions of first-year writing faculty of how their students develop information literacy (IL). The authors conducted 16 semi-structured interviews and analyzed them using a qualitative inductive coding method. The study contributes a close and nuanced understanding of faculty perceptions of IL learning to a literature with few recent qualitative studies. Faculty identify what they see as enablers and barriers to student learning. The authors conclude that the empathetic, process-oriented characterization of IL learning by these faculty invites further examination using multiple methodologies and elevation of faculty's voice in the discourse around IL.

Introduction

Information literacy instruction has become a core component of the modern academic library, and the library literature has identified library-faculty relationships and faculty attitudes as key to the success of student IL learning in postsecondary education. Why do some faculty-librarian collaborations work well, producing successful results for student learning, while others fail? Understanding this pivotal relationship is crucial for the success of an academic library's information literacy and instruction programs. For the purposes of this article, the terms *faculty, teacher*, or *instructor* will be used to describe both part-time and full-time instructors.

Given the importance of the relationship between the library and first-year writing programs as a starting point for IL instruction, the faculty perspective begs to be better understood. This article explores the following research questions:

- How do first-year writing faculty perceive that their students learn information literacy skills?
- What teaching and assessment behaviors do first-year writing instructors think contribute to their students' IL competencies?
- How do first-year writing faculty view their students' abilities in the domain of information literacy?

The authors found no qualitative studies of the perceptions, understandings, and practices of first-year writing faculty regarding information literacy. Many publications speak of collaborations between librarians and first-year writing instructors, but librar ians and course instructors may not share common understandings of the skills and dispositions that students learn outside their coursework.2 This article will use the terms writing or first-year writing instead of composition, rhetoric, or freshman writing

Literature Review

Much has been written about information literacy and writing instruction.³ Rolf Norgaard's appeal for increased collaboration between librarians and writing faculty has resulted in continued dialogue, research, programs, and approaches on this topic, a dominant theme of which has been the integration of information literacy and writing instruction.4 This focus is evident in statements produced by such professional organizations as the Council of Writing Programs Administrators (WPA).5 The current study, while related to and informed by this body of literature, follows a slightly different path. It takes a step back and focuses on the perceptions of first-year writing faculty.

The topic of library-faculty relationships is not new in the literature. 6 However, few recent studies deeply examine teachers' perceptions of, and practices related to, information literacy. Surveys and interview studies from the 1990s to 2007 show that a majority of faculty value IL instruction and skills, and as many as 30 to 50 percent integrate this type of teaching into their courses.8 University and college teachers view research skills as "intertwined with their perceived overall educational outcome of a course."9

Elizabeth Joy Birmingham and her five coauthors surveyed English faculty at three colleges and universities and found that, among their sample, instructors did integrate IL teaching into their courses. Methods included assigning a research paper, discussing source evaluation and criteria, explaining documentation styles and source use, conducting in-class activities and assignments around searching, laddering assignments (that is, chunking them into smaller tasks), and using a laddered approach to demonstrate that research is a process.10

Claire McGuinness's qualitative study of the perceptions of IL development among sociology and civil engineering faculty, as well as subject librarians, concluded that faculty think students are already learning the skills they need through their coursework and assignments. Instructors believe learners will gradually develop the skills they need over time as they encounter different information problems. However, the success of this learning largely depends on student motivation.¹¹

More recent surveys provided a big-picture view of faculty perceptions of information literacy across different disciplines. Sophie Bury¹² and Jacqui Weetman DaCosta¹³

surveyed professors from different academic fields in Canada, England, and the United States. Bury and DaCosta both found that most college teachers value information

literacy and want their students to obtain IL skills, but only about half actively address information literacy through their teaching. In a multidisciplinary, multi-institutional survey, Eleonora Dubicki found that instructors report including IL skills in course learning outcomes at a higher rate, ranging from 80 to 94 percent (depending on the skill). ¹⁴ This result does not necessarily represent a larger population of faculty because Dubicki intended her study to measure the success of library-led interventions to familiarize course instructors with IL standards. Laura Saunders conducted a multi-institutional

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survey of 278 faculty from six different disciplines and did follow-up semi-structured interviews with 25 instructors. She similarly found that almost all faculty thought information literacy important, and over three-quarters reported addressing IL concepts in their teaching. In Saunders's survey, just over half the teachers said they assessed their students' IL abilities.¹⁵

More recently, in a qualitative multidisciplinary study of faculty members' understanding and observations of information literacy, Jonathan Cope and Jesús Sanabria summarized that college teachers "frequently expressed a common understanding of

the rudiments of IL that heavily corresponded with their colleagues in different disciplines." ¹⁶ Similarly, Bury found that instructors in different academic fields largely agreed that information literacy involved accessing and critically evaluating information. ¹⁷ These studies also revealed that faculty "view information literacy as intrinsic to their disciplinary practices" ¹⁸ and see it as directly connected to other literacy skills,

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such as reading, comprehension, and writing.¹⁹ Dubicki found that faculty believe they teach IL witten their own courses, though they acknowledge that IL learning also happens outside the classroom (in library sessions, through consultations with a librarian, in writing centers, and by other means).²⁰ These studies point toward a more connected approach to teaching information literacy, one linked to coursework and to the teaching and learning of other academic literacies. Rebecca Kuglitsch echoes this view, arguing that, if information literacy is taught from within a disciplinary domain,

students can use their local knowledge of the domain to support and abstract the general principles of information literacy. By placing the larger principles in a particular setting and explicitly drawing them out, we can encourage students to think about the principles metacognitively, with awareness of their own thinking and learning process, and learn to see the principles as transferable to new, particular circumstances.²¹

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While these studies do not explicitly try to understand how instructors perceive that students learn IL skills, the results do point to barriers to learning information literacy. Cope and Sanabria say that faculty believe students lack the time needed and generally rush through the research process with an overreliance on Google searching. ²² Cope and Sanabria also observe that teachers think their students are good at accessing sources online but struggle to synthesize and apply what they find. ²³ Bury reports that faculty view IL as a "high level competency, and it is not realistic to expect undergraduates to have sophisticated knowledge." ²⁴ She also notes that instructors see students struggling with topic selection and delineation; lacking familiarity with potential resources, including scholarly sources; having difficulty searching academic databases (though searching the free and open Web quite well); and wrestling with critical thinking, finding their own voice, and synthesizing their research. ²⁵ Dubicki's findings point to such barriers to learning as poor reading comprehension and a lack of synthesis and citation skills. ²⁶ In comparison, faculty in Saunders's study identified the important obstacles to student learning as information glut, a lack of information-finding skills (despite students' label

as "digital natives"), overuse of Google, and a failure to evaluate and use information when required.²⁷ Saunders also found that "faculty members appear to believe that students need instruction and support in locating and identifying quality informa-

faculty perceive IL skills as building through continuous practice.

tion"28 but thought these skills should be taught "it lots of different places and in lots of different ways."29 Dubicki's study confirmed that faculty perceive IL skills as building through continuous practice.

Her results showed that course instructors think they can improve IL learning experiences for students through class discussions, modeling research processes, giving students repeated opportunities to practice (for example, assigning annotated bibliographies), providing a definition of IL in the course syllabus, and collaborating with the library.³⁰

Lorna Dawes completed a qualitative study of how science, social science, and humanities faculty experience teaching information literacy to freshmen.³¹ Dawes found that instructors teach Isside-by-side with their disciplinary course matter and conceive of this teaching in four ways:

- Teaching how to develop strategies for managing and finding relevant sources for specific purposes.
- Teaching how to judge the relevance, credibility, and authenticity of sources.
- Teaching how to analyze and integrate other views and ideas with personal research and contributions to communicate within a specific discourse community.
- Teaching how to use information to develop new understandings that change behavior or impact the society.³²

Dawes notes many ways in which faculty scaffold IL learning, providing successive levels of temporary support, such as quizzes, class discussions, modeling reading and source evaluation, and identifying structure in texts.³³

Simon Barrie's work (outside the LIS literature) on Australian faculty's understanding of generic graduate attributes—that is, the skills and knowledge that students gain from a university education, beyond their content knowledge of a discipline—shows that

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a common understanding of such attributes cannot be presumed or taken for granted.³⁴ Given this evidence, and the perception of faculty that information literacy is embedded in and connected to both their discipline and other academic skills, it is important to continue to explore disciplinary understandings of information literacy.

Since most if not all the recent work is multidisciplinary in nature and points to an integrated and connected disciplinary approach to information literacy instruction, studying the perceptions of information literacy among first-year writing faculty seems a natural next step. Another further step is to investigate how first-year writing instructors think students learn information literacy, especially since they also teach another. tion, po significant academic literacy, namely writing.

Method

This Institutional Review Board-approved study was conducted at Montclair State University in Montclair, New Jersey, recently designated a Carnegie Level II research doctoral institution. Subjects comprised both part-time and full-time faculty from the newly formed Department of Writing Studies, home of the first year writing program. They were invited to participate via e-mail or in person and were not offered incentives for taking part. The authors (a librarian and a paid graduate research assistant in education) focused on faculty in this department for the reasons discussed in the literature review. This decision was also strategic because prost of the library's instruction efforts consist of teaching library sessions for this department in WRIT105 and WRIT106, both required courses for freshmen. There is no mandatory IL component in either course, but many faculty schedule a library visit for their classes.

The authors used a non-probabilistic, purposive sampling method, deciding who would be in the sample based on two criteria: (1) They interviewed both participants who had previously brought their writing classes to the library and those who had not; and (2) They included a mix of part-time and full-time faculty to ensure they gathered data from those two groups with potentially different perspectives. In total, 16 faculty participated. Selection bias is an issue since the instructors who agreed to discuss information literacy with a librarian might be more interested and engaged with information literacy in their eaching than others. Nevertheless, understanding what inspires some faculty members to take an interest in information literacy is important.

All 16 faculty completed a short online survey listing their disciplinary affiliation, rank, and courses taught in the past two years, and giving a definition of information literacy. To ensure response independence, the authors conducted private, semi-structured interviews with each participant, eliciting conversation around such topics as faculty perceptions of their students' IL skills and abilities, how students learn them, and teaching and assessment practices that contribute to student IL learning. See the Appendix for a list of the interview questions (not including spontaneous probing questions). Interviews ranged from 34 to 96 minutes and averaged just over one hour.

Other research methods could also be used to investigate faculty perceptions of student information literacy learning. Focus groups would be useful for identifying points on which participants agree or disagree and could be used in a follow-up or a different study. For this study, the authors wanted faculty members to voice their perceptions

without being influenced by others, especially since the participants might seldom have discussed the concept of information literacy.

One strength of this study is the use of questions designed to elicit a specific and authentic response. For example, the authors asked faculty to comment on the information literacy of students in a recently taught course and to refer to a particular assignment, eliciting more specific answers. They requested that participants draw a timeline of student learning to produce a more vivid picture of such learning. They also asked participants to think of a student who struggled and one who succeeded. The intent of this questioning was to move away from generalizations of perceptions of student learning and try to reach a more precise understanding of these perceptions. The timeline drawings were particularly useful. Participants seemed to relax at this point during the interview, and the formality of the conversation loosened. Though the drawings themselves consisted mostly of lines, arrows, and scribbles, and were not particularly informative as artifacts, the narration (captured in the transcripts) generated interesting data.

Interviews were recorded and transcribed. Once transcribed, the interviews were read and reviewed multiple times and coded using NVivo software and an inductive coding methodology, which involved creating codes as they emerged from the data. The authors always worked collaboratively on coding and so did not calculate inter-coder reliability. On average, they spent between 5 and 6 hours (sitting in an office together) coding each transcript and discussing each code to ensure they agreed. If agreement could not be reached, they did not implement a code. Similarly, when creating new codes, developing a code hierarchy, or renaming codes, they obtained consensus before moving forward.

The authors generated the codes in multiple ways. They began by highlighting a word or phrase that might eventually turn into a code (for example, one that occurred multiple times.) They also looked for repetition. In some cases, they identified connections, hierarchies, or both between codes, sometimes based on a theme, such as those related to time. They also looked for unique or outlier data. The following "Results" section includes some identifications of frequency (a specific number, a few, some, all, one, or most) but does not explicitly quantify the qualitative data results. This study intended to focus on identifying the breadth of themes inductively from the perspective of faculty but dict not attempt to quantify them. (See David Hannah and Brenda Lautsch for a discussion of when to use and when to avoid counting in a qualitative study.)³⁵

Results

Faculty Definitions of Information Literacy

Faculty could provide a basic definition of *information literacy* with no prompting. All the faculty in this study recognized the term—that is, they had at least heard it before—and were eager to discuss it because they saw IL learning as critical to the learning that was happening in their courses. One participant admitted never really understanding what the term meant despite having heard it multiple times. Some conversation and prompts (excerpts from the Association of College and Research Libraries "Framework for Information Literacy for Higher Education," hereafter referred to as the Framework)³⁶

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were required to establish a deeper, richer common understanding. This process was also used in other studies where faculty were asked to define and discuss *information literacy* as a term.³⁷

When asked to define *information literacy* (by way of an online survey completed by all 16 participants just prior to the in-person interview), most faculty contributed a short definition. The shortest totaled 7 words and the longest 77 words, with the average length

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26 words and the median 21 words. Most faculty described information heracy as an ability (some used the terms *understanding*, *awareness*, or *capacity*), but no one mentioned *skill* in their written definition. As in other studies, ³⁸ finding and locating information played prominently in almost all definitions. So did evaluating, discerning, discriminating, distinguishing, and assessing to detect bias and to determine reliability, accuracy, and relevancy. Faculty often wrote that information literacy involved using various sources and types of sources (primary, secondary, fiction, nonfiction, reliable, unreliable, digital, online, non-digital, or print). Four participants mentioned information use, the ability to use information effectively, synthesizing information effectively, relating information to the topic being explored, and using information to complete a task. Two other faculty identified reading and processing information. Another two mentioned research tools, such as databases and Google, while yet another highlighted the importance of research questions. One participant invoked the notion of "fake news" and identified the need for students to move beyond the controlled setting of the library.

Despite a librarian conducting the interviews, all participants offered a definition of *information literacy* that clearly recognized it as an ability that went beyond using

library tools and resources for research (though those were included as well). All definitions also spoke of information literacy as useful in multiple contexts (for example, personal and academic). A few definitions reflected a binary view of good versus bad or reliable versus unreliable information. Two participants mentioned Web versus print or digital versus non-digital, but most definitions ignored this distinction.

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Surveys, though useful, might fall short as a tool for gathering faculty perceptions and understandings of information literacy. The participants tended to give short, simple definitions and focused on finding and evaluating information. No one

all participants offered a definition of information literacy that clearly recognized it as an ability that went beyond using library tools and resources for research (though those were included as well).

mentioned the economic, social, ethical, or legal issues surrounding information other than one person who spoke about civic responsibility. Bury found that faculty provided a similarly narrow definition of IL when given no prompts, even in an interview.³⁹

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During the semi-structured interviews, when discussing the definition of information literacy prompted by language from the Framework, faculty admitted to leaving out or missing elements from the definition they had provided in the online survey. This was expected because the conversational nature of the interview was intended to produce a richer, more thorough or thoughtful discussion of information literacy. Some comments were:

I mean, now that you ask me these things, I realize they're all part of information literacy.

And now that I'm thinking about my response, I was like, oh, I kind of missed the larger context.

I've heard the term [information literacy], made assumptions about what it meant, but never really investigated it.

I found it really helpful to kind of look through this to think about . . . everything that information literacy kind of has under its umbrella . . . It helped me realize like, not only the way students look for information, but how they consume information.

To me, this is like turning people into scholars.

The research process is part of information literacy . . . I didn't realize the research process in and of itself is part of information literacy.

For example, the ethics or ethical use of information came up as an important component of information literacy, but faculty never medioned it when they wrote their own definitions. Several subjects recognized that they had left out creating new knowledge and using information. One faculty member originally reacted to the term information literacy as pertaining to print but not digital resources, but through conversation realized that this was not the case. Some participants pointed out that information is not just words and texts, which should be considered when talking about a definition of information literacy. Some faculty expected that a definition of information literacy would be less about abilities and processes and more about specific sources, such as secondary sources. Similarly, another participant thought a definition of information literacy should include attributes of Offerent types of information sources.

This study used language from the Framework as a prompt but did not present it as a checklist of information literacy abilities or a ruler against which faculty measured their students; rather, it was intended to facilitate conversation around IL learning. The use of Framework language as a prompt influenced the conversations and might have biase Oaculty toward seeing the Framework statements in a more positive light. If the authors were to pursue a similar study again, they would reconsider presenting the IL definition and prompts as coming from an authoritative body on information literacy, such as the Association of College and Research Libraries.

Most Important Aspects of Information Literacy

Certain aspects of the Framework language resonated with faculty more than others. For example, almost half of participants found the metaphor of the scholarly conversation important and useful because it recognized that information literacy called for students to find and use their own voice to create new content and new information. Faculty



readily embraced the idea that information literacy not only involved finding and using information but also understanding and producing new knowledge:

I'm gonna say: "This thing that just came out of your mouth, as long as it's not racist, sexist, or homophobic, has a place. It's valued." And that's in some ways . . . my work—to figure out how to let them see that this has a place here. And that they're in this conversation.

About a third of participants considered evaluation and discernment important aspects of informa-

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tion literacy and thought that a crucial part of evaluating information was to suspend judgment and to understand authority:

I think that we just don't trust the expertise as a thing anymore. I don't even know if that's the students necessarily. I just think that's a cultural shift . . . I think that they're also a little cynical. So, some of my students, I think they're . . . like, "This is terrible, and all politicians are the same." "It doesn't really matter." "Everybody's lying to you all the time."

So, they do belong to a world online. They belong to a world of exchanging ideas on social media. They belong to a really dangerous and inaccurate world where information skills are being slowly or rapidly degraded in such a huge way.

They have no sense that one thing is somehow more valid or expert or authoritative than another. Because they just skim. It's all on the same level, and I find that is very true. They literally can't distinguish between a blog post with no name on it, with no author, and a news article.

A few faculty emphasized the evolving nature of research and the feedback loop that results when conducting it. Research influences one's thinking, which causes researchers to seek out more information and even contradictory information, which subsequently modifies their thinking, and so on. Two faculty saw the ability to persist and continue researching, even when it was difficult, as important.

Some faculty alluded to a current societal shift that increases the importance of IL abilities:

That ability to evaluate . . . how do you evaluate what's useful and what's not, especially in our current media world?

The need to evaluate results is something that is particularly important to me, especially right now.

There's such an elitist approach when it comes to evaluating sources . . . Our idea of expertise . . . is sort of rapidly degrading under this current administration, in my opinion. That our idea of ethos and expertise is often linked up with a lot of preconceived notions about class.

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What Students Know

Since the authors were interested in learning how faculty perceived that their students learn information literacy skills, it was important to know what IL abilities faculty thought their students started with. When asked what their students knew related to

When asked what their students knew related to information literacy at the beginning of the semester, faculty generally agreed that their students were weak in this area. information literacy at the beginning of the semester, faculty generally agreed that their students were weak in this area. A third of faculty said that their students had some level of skill with citation—for example, knowledge of Modern Language Association (MLA) style, citation mechanics, and knowing they should cite sources—but their competence was not as developed as it needed to be. Similarly, a third of faculty reported that their students knew how to do a Google search. Some observed that students could not evaluate search results and information sources, while others said that undergraduates

knew more than many educators think they did about evaluating. Two participants mentioned that students had difficulty recognizing advertising and mistook advertisements for an information source, and another reported that students were unsure what news sources were. Others observed that students were naive readers, that they often simply regurgitated what they read, did not reflect about the information they encountered, and were better at reading visuals than text.

Enabling IL Learning

The data showed that faculty regarded a number of enabling activities, conditions, and mind-sets as helping their students develop information literacy. Since the authors were interested in how faculty perceive their students learn IL, the identification of these faculty-perceived enablers was critical to this study. Each of these enablers is described in the following sections: (1) scaffolding, (2) time, (3) student interest, and (4) understanding evidence and argument.

Scaffolding 2

The most frequently mentioned tactic for promoting information literacy was scaffolding, which has often been discussed in IL literature.⁴⁰ According to the Education Resources Information Center (ERIC) Thesaurus, *scaffolding* is "temporary support or assistance, provided by a teacher, peer, parent, or computer, that permits a learner to perform a complex task or process that he or she would be unable to do alone—the technique builds knowledge/ skills until learners can stand on their own, similar to scaffolding on a building."⁴¹ Since the decision to scaffold lies with the faculty member who teaches the course, this enabler to information literacy learning is the responsibility of the instructor. Scaffolding strategies mentioned by faculty that they saw as enabling student IL learning were:

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- Employing reading activities to improve comprehension (such as annotating while reading).
- Producing annotated bibliographies as a stage in the research paper process.
- Collaboratively searching databases, together as a class, and thinking through all the decisions as a group, making that process explicit.
- Modeling (providing a sample annotated bibliography or modeling a database search).
- Guiding source evaluation activities (for example, applying the CRAAP test, an
 acronym for currency, relevance, authority, accuracy, and purpose).
- Having students first select research resources from course readings or from a pool of faculty-selected readings rather than through independent research.
 Later assignments give students more freedom to select resources on their own.
- Employing a jigsaw reading and source evaluation activity in which students read from a pool of readings provided by faculty and then present their source and an evaluation of it to the class.
- Brainstorming and mind-mapping activities (coming up with questions to answer and mapping their topic) to refine scope.
- Using activities around creating an argument and group discussions around argument development.
- Crafting an argument proposal together with an annotated bibliography, with the idea that the bibliography informs the argument.

Most of the activities listed were pursued independently by the faculty member and did not involve working with a librarian or having a class library visit. Some faculty expressed surprise that, even after the scaffolding and modeling activities, students still struggled to demonstrate the level of information literacy expected.

One faculty member approached scaffolding in a slightly different way. He encouraged students to start with whatever they had found, rather than agonizing over finding the best sources. The primary reason for this technique is that the students get lost in the sources and their writing suffers:

There might have been time early on in my teaching career that I would've really emphasized that and insisted on getting students to the adequate results before they started composing. And I'd say that my teaching philosophy now has them working with what they immediately find early on and then

getting to adequate results more experimentally.

Two other faculty members emphasized that it was important to meet students wherever they were with their information abilities and work with them from that point so they could learn and improve. One faculty member encouraged students to approach writing as a project that the class worked on together.

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Time

Faculty discussed time as a factor in information literacy learning. ⁴⁵ They expressed that they needed more time to spend on information literacy related teaching and activities in their classes:

In this class, when we're working on it, I always feel like there's so much. We could spend a whole week on what we're trying to do in one-third of a class period . . . It's sort of like throwing a bunch of information at them and hoping some of it will stick in the five–six weeks we're spending on this.

Most faculty emphasized that students needed repeated opportunities to practice and apply information literacy learning and that this work needed to continue beyond the semester-long course they taught. Students should continue to learn information literacy throughout their time at university:

Practice, repetition. I mean, I do think that the combination of having their read about it [and] watch videos, just that [helps]. So, they're reading, watching videos. I'm obviously talking to them about it. We're practicing it. We're looking at, if not example sources together, then example documented essays together. And we look at how has this been constructed; where is the synthesis; how well are the sources being [used]? Like all of that stuff. So, also, I would say coming at it from lots of different modes or directions or something instead of just, "OK, so here's the handbook pages. Read it. Do you know everything?"

I don't think one semester is enough. So, throughout all of college, that's what they are doing.

As they become sophomores, juniors, and seniors, I think those classes need to assume that they don't necessarily know this.

This is academic success . . . Focus on it. If it's in the background, and it's murky and unknown, it's never going to resonate with them. But if it becomes important in terms of content . . . who knows what could happen inside a classroom?

Student Interest

In contrast to the faculty-driven scaffolded activities, the second most frequently mentioned enabler to IL learning was student interest.⁴³ Many first-year writing faculty said that if seconds were interested in the topic, it helped them succeed, though interest did not guarantee a successful outcome:

I found that when the students are actually interested in what they're writing, especially for research, they tend to do a better job.

Some of them really shine in this moment and really step up because they are writing about something they're interested in, and that usually goes really well.

Sometimes, students, if they really feel invested in the topic, I think some of them, not all of them obviously, but some of them are able to make a pretty big leap because they feel some connection with what they're writing about.

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Some faculty reported struggling with how to spark interest in students. They identified the following factors as contributing to increased student interest in a topic:

- Awareness of gaps in knowledge.
- Freedom to select their own topic.
- Personal connection with the topic.
- Sense of agency or ownership of topic.
- Finding their own voice within the topic.
- A juicy or salacious topic.
- Interest in learning.

Understanding Evidence and Argument

Another oft-cited enabler to IL learning perceived by faculty was the student's ability to understand both evidence and argument. 44 Faculty frequently mentioned that teaching about both argument and evidence was a core part of their course.

They go out and do some research. I want them to see what they find . . . The tricky thing is, and this is something I'm trying to refine in my own teaching, I want them to learn from the research that they're doing. They don't see research as an opportunity to learn ... I often have to tell them, "Don't try to figure out what your argument's going to be and then do your research. Do your research to try and learn more, and then develop your idea out of that."

Faculty acknowledged that development of the argument and the student voice in the paper was sometimes at odds with the sources. They recognized that students needed to engage with sources to help them progress and develop their own voice and argument (in a kind of conversation). Some of their students did this: "They'll then bring secondary sources to both support their original claim but also complicate it [referring to the stronger students]. We want sources that oppose us, that color our thinking."

Consulting secondary sources sometimes posed problems. Instead of developing their own argument, students assumed as their own a contention in a source they found or ignored sources that complicated their argument:

Some of them are just lifting the argument from that article and then finding other stuff to support it, but then some of them . . . the article made them think about the film in a

One faculty member, who explicitly told students they were expected to change their argument (after being influenced by their research), found that students faked this change to avoid developing their own opinion:

Well, I do look for the 3

I will say in a research class, if your research hasn't changed your position at all, then you're doing something wrong. And so sometimes you can tell when that creates a false binary. Like sometimes they'll pretend like they had an epiphany of some kind.

Other enablers to IL learning described by faculty included better preparation in high school; more time reading; getting feedback from professors and reflecting on this

feedback; timely teaching of information literacy (that is, when students need those skills to do their work); understanding that part of research is coming up with questions to explore; diligence; having a connection with the library as place; and making information literacy learning mandatory.

Barriers to IL Learning

Just as important as what faculty perceive as enablers to information literacy learning are the barriers they believe their students encounter. These perceived barriers, each discussed later, include time; inadequate high school preparation; students do not know what they do not know; students fail to develop their own voice; students' attitude that research is for citing, not learning; overconfidence; and too much information. Once again, since this study was interested in how faculty perceive their students learn IL, the identification of these faculty-perceived barriers was critical.

Time

The most frequently mentioned barrier that students face in the process of information literacy learning was time. Faculty said that, as teachers, they lacked time in their courses to spend on activities that facilitated this learning. They had too much other

course content to each and not enough hours to cover it all well.

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I really don't think we can do it all. Like you guys can't do it all in the library, and we can't to it all in our classes.

Faculty also observed that their students did not dedicate enough time to learning information literacy on their own and that this type of learning should not be crammed into a single lesson during the semester. It should be spread over time, and ideally over multiple semesters at college: "I don't think we can get anywhere close to competency or proficiency within the space of two semesters."

Inadequate High School Preparation

The second most frequently mentioned barrier was what faculty perceived as insufficient preparation during high school.⁴⁶ Two-thirds of participants referred to this obstacle. Faculty thought the students should arrive at college more prepared in reading comprehension and technological and information literacy. They also reported that students lacked sufficient exposure to research in high school and that, before college, they learned an approach to reading, research, and writing that was too formulaic:

I'm not blaming their English teachers. I think that the standardized testing pushed them to do very formulated writing.

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Often students will tell me they've never had to look for a scholarly source. They don't understand what it is.

I have found, too, that most of the freshmen have not been asked to do a lot of research prior to coming to college.

Students Do Not Know What They Do Not Know

Students lack an understanding of the gaps in their knowledge.⁴⁷ This issue is tied up with the perceived weak preparation in high school and with a lack of time available to spend on information literacy, in the classroom and on students' own time. Faculty cited students' lack of awareness of their knowledge gaps as yet another barrier to IL learning:

But I feel like they have no idea. They're always amazed. I tell them, like, go on the library database, [and they say,] "Really?! We can?!" And in [WRIT]106, sometimes we'll do it in class because they've been [to the library classroom] for the [WRIT]105 [visit]. So sometimes when they start to research, we'll look. And I still sometimes find that I have to help them . . . They're surprised that all of this is available to them at the library.

Students Fail to Develop a Voice

The students not only lack awareness of resources that can help them with their research but also do not or cannot develop their own voice in relation to their research.⁴⁸ More than half the faculty cited this a barrier to information literacy learning. If the students

fail to develop a voice in relation to their research, they fail to enter the scholarly conversation. Ultimately, they reteam at a level where they deliver a report of what they have read without engaging any deeper. One faculty member went so far as to say that the students had been trained to engage with research in this way, to report their findings in a five-paragraph essay, and to avoid any deep exploration of the ideas in their paper. Others commented:

If the students fail to develop a voice in relation to their research, they fail to enter the scholarly conversation. Ultimately, they remain at a level where they deliver a report of what they have read without engaging any deeper.

They're just dumping in all the information that they found because they found all this great information, and they want to put it in there because it's great information, and so they're informing the reader of the topic. But they're not really making an argument . . . they're not taking that information and using it to make an argument.

The weaker students will use secondary sources just to support. They'll just find things that confirm their bias. And that's not the worst thing in the world, but for [WRIT]105 they haven't really progressed. And so . . . the second half of the semester is about advancing these skills of secondary sources. Finding ways to complicate our claims.

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Research Is for Citing, Not Learning

Deeply connected to this lack of voice development is the observation of many faculty that their students fail to view research as a tool for learning. ⁴⁹ They believe research is for citing but not for learning. Faculty commented that their students would simply drop quotations into their assignments, with little analysis or discussion. The only reason for citing, in the mind of the students, is to avoid punishment for plagiarizing. Once again, rules drive the students' behavior in the research and writing process:

They don't understand necessarily why it's so important. Like why does it have to be academic? Like who cares? . . . I know I need to cite it because I don't want to get in trouble for plagiarism, but I'm not sure if it goes beyond the punitive.

First of all, they don't see research as a literacy. It's a task to them. And just talking to them about the idea that research and information is not simply a task that you need to do to fulfill your assignment, that it's a process and that's it's learning at the same time.

They don't see research as an opportunity to learn.

Faculty pointed out that students fail to ascribe value or importance to IL abilities. They perceived that students lack an understanding of why research is important and therefore they lack interest in the learning:

I don't think they think it's important . . . That they're doing it because they're required to, not because they're so psyched to find out more information, and this is really exciting.

No, I think it's just hard, and they don't see the value of it.

This perception of student motivation might be explained by the students seeing research as a performance goal or task, rather than a learning goal.⁵⁰

Overconfidence

Students' lack of awareness of their information abilities can lead to overconfidence.⁵¹ Overconfidence was another barrier that faculty observed as impeding their students' IL learning: "I think that they think that they're good, and they don't need to [seek help]."

On a few occasions, the authors found that faculty members overestimated their students' abilities, expecting them to find one or more aspects of the research process easy. In other words, a few instructors underestimated the difficulty of the research task they had presented their students in relation to the students' skill level:

But I don't think there's anything specifically super challenging about any of this.

Because it's not that difficult a concept, I don't think, really. But also, in fairness, they haven't really interacted with these kinds of materials. So, it is kind of like they don't understand really what they are.

I tried to explain. Just read the abstract to see if it resonates at all. Is there any connection whatsoever? And then move on. That's 15 minutes for them to get into the system, plug in one keyword into one journal that may make sense and see. They resisted that.

Faculty talk about the complexity, but then fail to see the complex learning curve for their students.

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A few faculty mentioned that students had difficulty selecting appropriate sources to support their argument or had trouble shifting their thinking when they encountered sources that did not support their contention. They reported that students needed to see their topic reflected in the title or abstract of a source they were considering. Once

the students had an idea, they were reluctant to shift their thinking and tried, instead, to make the sources they found fit with their original stance:

It has to be right there, otherwise they don't know what to do with it.

Sometimes, I'll have them sit with me and look at it, and we'll be like, "Oh, this had a really great title, but look, it has nothing to do with what you're talking about." And some of them will take that out [of] the pile. But I'm not sure that they go through that

process of sorting and kind of evaluating based on that limited information. They just look at title, I think. And like, "Yeah, this is great. I'm writing about Nike. It has Nike in the title." But you're not writing about Nike and child labor exportation. You're writing about Nike and advertising [laughs]."

Some of them just flounder. They never quite find the sources, or maybe they missed the day we did the databases and they just never recover. Or, they get so stubborn about what they want to write about, even though I say, "This is gonna be really hard for you. This isn't gonna work." They really push back . so, some of them, this kills them. This is their death point in the semester.

A few faculty mentioned other barriers to student information literacy learning: students had too much information to grapple with; they failed to seek help when they needed it; they took what they read at face value; they needed more practice reading (especially understanding difficult texts); and they struggled to select good pieces of evidence from what they read.

Conclusion

This study fills a gap in the literature by providing a qualitative and therefore deep and nuanced understanding of first-year writing faculty's perceptions, understandings, and teaching practices related to information literacy and student IL learning. Faculty saw students learning IL through scaffolded practice, over time, and directly integrated with course content. Though these findings are not necessarily generalizable to a larger population, better understanding faculty perceptions of IL learning can help academic librarians to collaboratively incorporate IL teaching into courses and programs.

Given the faculty-perceived enablers, librarian-faculty collaborations that include curated modular information literacy learning activities and teaching materials fulfill a need if faculty want to scaffold information literacy learning over time. Librarians should also customize the teaching materials to the course; the materials might include lesson plans, presentations, worksheets, videos, and assignments.⁵² The "librarian-as consultant-model"—in which a librarian becomes involved in curriculum planning,

Once the students had an idea, they were reluctant to shift their thinking and tried, instead, to make the sources they found fit with their original stance.

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crafting assignments and assessments, and, in some cases, teaching—also presents an opportunity for faculty to deeply integrate information literacy into their course content.⁵³ Allison Hosier's 2019 paper puts forth the idea that "research is both an activity and a subject of study" and suggests having students take time to study different research contexts (for example, personal, professional, and scientific) and examples of research from those contexts.54 Hosier posits that, in this way, students "may begin to develop a more realistic view of how much more there is to learn beyond the skills they already have and why it is worth learning."55 This type of approach could help with the perceived barriers of students not knowing what they do not know; their belief that research is for citing, not learning; and overconfidence.

In some previous studies, faculty lamented students' not taking the initiative and time to learn the information skills they would need in university and relying to heavily on search tools such as Google.⁵⁶ Bury noted that faculty were frustrated with student information skills, thought students spent too little time with course readings, did not read deeply, and saw database searching as a lower-order skill.⁵⁷ This study paints a different picture, one more like the findings of Saunders: namely, that faculty have a greater awareness than librarians might think of the role that librarians, faculty, and the university must play to teach students information literacy. Bury also reported that a third of faculty participants explicitly taught both writing and reading skills to their students and saw that they had "at least some role for themselves in fostering IL," given more time and expertise.⁵⁸

Many of the barriers discussed in this article are beyond the students' control. They have no say in the approach to teaching research and information literacy in high schools or at universities. Nevertheless, faculty ad nowledge that students have a responsibility for their own IL learning, too.

This study examines faculty perceptions of how students learn IL, not to be confused with the students' own perceptions of their learning⁵⁹ or with IL learning itself. In most cases, faculty are directly involved in IL instruction. Either they teach it themselves, collaborate with a librarian, or invite a librarian into their classroom. This type of study can help librarians better understand how faculty think their students learn information literacy and so mable librarians to position their IL teaching offerings accordingly.

While this study does not investigate student learning directly, its approach of understanding faculty perceptions will ultimately benefit students. It contributes a piece to the puzzle of understanding how information literacy learning is understood by course instructors, why they think it important, and the pedagogical implications for their teaching. We, as librarians, still have much to discover about how faculty teach information literacy and how they think students learn information literacy. Future research in this area could investigate whether first-year writing faculty across a larger, multi-institutional sample perceive similar barriers and enablers to IL learning.

Future research may also pursue this study's research questions with complementary methodologies. In this study, early in the interviews, the authors shared a definition of information literacy with language taken from the Framework. Another approach would have been to first convene focus groups to generate a shared definition of information literacy, eliminating the need to rely on external definitions. The authors chose to work with an external definition because they felt it would deepen and enrich the conversa-



tion, given that faculty may have had few conversations about information literacy or about their perceptions of how their students learned information literacy.

Future research could also involve academic librarians more closely looking at other scholars' research in this area, including those engaged in research on information seeking and behavior.⁶⁰ For example, Annemaree Lloyd presents one conception of information literacy as "a social or transformative practice, and often viewed in the context of learning" rather than as an "outcome of learning." 61 If academic librarians adopted a stance where information literacy was a social practice, rather than an outcome of learning, would it change the way they speak with faculty and students about information literacy.

As the Framework implies, educators need to treat information literacy and the research and teaching of information literacy as an ongoing conversation. It should be continuously reexamined from multiple perspectives, broken apart, and put back logether again. Interrogating the faculty perspective of student information literacy learning is one approach to this work.

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Appendix

Interview Questions

- 1. Do you have any questions/thoughts about this definition (of information literacy)? (Prompt: Does that seem like a clear definition to you? Does anything strike you?) [Participants provided with the current ACRL Framework definition of information literacy and several statements from the knowledge practices and dispositions.]
- 2. What do you think your students should know when they arrive in your class?
- 3. So, those are the expectations you have; what do you find that they actually know at that point? (Prompts: How do you know? What behaviors do you observe? What are you looking for in their early assignments?)
 - 4. Can you draw me a timeline of how the typical student evolves and acquires information literacy skills over the course of the semester? (in your course) (Prompt: Think about any evidence throughout the semester about how strong your students' information literacy skills are.)

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 - What evidence are you looking for that tells you that a student has acquired these skills or not?
 - 6. Can you walk me through this assignment? (Prompts: How did you develop this assignment? What did you want your students to have learned at the end of this assignment?)

 - 8. I see in your assignment that students need to incorporate outside sources. How are they prepared to do that?

 9. Can you recall a student who reall—uted to the:
 - uted to their struggle?
 - 10. Can you recall a student who did this successfully? What do you hink contributed to their success?
 - 11. How do you evaluate success in this assignment?
 - 12. Other than this assignment, when do students use information literacy skills in your
 - 13. Overall, what do you think is the biggest barrier to your students' improvement in
 - 14. Do you think your students seek help when they need it? (Prompts: Why/why not? Do they seek help from you, for example?)
 - 15. How do you think we could better collaborate to more successfully teach information literacy to our students?

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