

CHAPTER 10.

**“SOMETHING INVISIBLE . . .  
HAS BEEN MADE VISIBLE FOR  
ME”: AN EXPERTISE-BASED WAC  
SEMINAR MODEL GROUNDED  
IN THEORY AND (CROSS)  
DISCIPLINARY DIALOGUE**

**Angela Glotfelter**

Miami University

**Ann Updike**

Miami University

**Elizabeth Wardle**

Miami University

*In this chapter, we describe a theory- and expertise-based model of a WAC seminar we have developed in the Howe Center for Writing Excellence (HCWE) at Miami University (Ohio) called the Howe Faculty Writing Fellows Program. We describe our rationale for developing such a seminar, outline the components of the model, describe some of the work faculty have engaged in as a result of participating, and overview some of what we have learned thus far in our program assessment about faculty response to the model. The program is designed to change conceptions of writing as tied to disciplinary expertise, and our program assessment seems to be demonstrating success in achieving this goal. While there is still much to be learned from the data we have collected, we so far see evidence that the program is resulting in changed and expanded conceptions of writing, a greater recognition that disciplinary writing is inseparable from disciplinary threshold concepts, and a wide variety of changed teaching practices. Participants themselves, when asked what accounts for change in thinking and practice, point to the disciplinary*

*teams and cross-disciplinary dialogues, while we also observe that many of the changes they report entail applications of particular theoretical lenses to which they were exposed.*

Many WAC programs seek to promote institutional, long-term, sustainable changes around writing across campuses (Cox et al., 2018; Wilhoit, 2013). One-time workshops designed for individuals struggle to achieve such change or to alter faculty members' "view of the relationship between student writing and learning in their disciplines" (Wilhoit, 2013, p. 125). There are a variety of reasons for this, including the fact that enacting change in organizations requires groups rather than individuals, and that changing (mis)conceptions of writing and what it means to "teach writing" takes time. Semester- or year-long faculty learning communities have proven more successful in changing teaching practices than one-time workshops (Beach & Cox, 2009; Desrochers, 2010). Both Pamela Flash (2016) and Chris Anson and Deanna Dannels (2009) have worked to enact group-based changes by facilitating projects at the departmental level, relying on disciplinary faculty and their expertise to revise outcomes and curricula. They have had great success at their respective institutions, enabling departments to explore practices and outcomes around student writing and to create faculty-driven goals and plans for improving student writing. As Flash (2016) noted, however, helping faculty recognize what they implicitly know about writing and how their disciplinary discourses differ from others can be difficult. As Brad Hughes and Elisabeth Miller (2018) have recently discovered, simply having faculty from different disciplines in the same room is not enough to overcome this difficulty. Combining the opportunity for cross-disciplinary conversations provided by the Faculty Learning Community (FLC) model with an explicitly theory-based frame for departmental team-based WAC programs might be one way to facilitate the process of helping faculty "see" what they only know implicitly and examine their conceptions of writing in order to encourage ground-up change at a department level.

In this chapter we describe a WAC program that relies on disciplinary teams participating in a semester-long, cross-disciplinary seminar rooted in theories of threshold concepts, writing studies, and applied linguistics. Like Christy Goldsmith in "Making Connections Between Theory and Practice: Pre-Service Educator Disciplinary Literacy Courses as Secondary WAC Initiation" (this volume), we have discovered that learners find a theory-based approach rooted in their own expertise compelling, generative, and practical. Asking faculty to consider their underlying disciplinary assumptions and research-based ideas about writing, as embodied in threshold concepts, offers a means by which they can examine and, when necessary, change their conceptions about writing and how

it works in disciplinary contexts. In addition, an expertise-based approach positions faculty as experts who can improve student writing in their disciplines in ways that outsiders to their discipline cannot. Their own expertise is more readily visible and nameable when they can compare their practices with those of other disciplines. Our Faculty Writing Fellows Program has been designed to change conceptions of writing as tied to disciplinary expertise, and our program assessment seems to be demonstrating success in this area. However, moving from changes in individual faculty conceptions of writing to larger changes in conceptions held by entire departments proves to be a more elusive goal.

## **FOREFRONTING THEORY IN A WAC MODEL OF FACULTY DEVELOPMENT**

Rolf Norgaard (1999) argued that WAC staff may struggle to reach faculty in varied disciplines if we cannot find ways to value the expertise of those faculty—including ways to help them name what they implicitly know and do as experts in their fields (pp. 44-45). In a special issue of *Across the Disciplines*, scholars argued for expanding the European notion of Integrating Content and Language (ICL) or Content and Language Integrated Learning (CLIL) in order to foster “the exchange of knowledge and experience regarding collaboration between content . . . and language [specialists] in higher education contexts” (Gustafsson et al., 2011, n.p.). They suggested creating “productive institutional discursive spaces” that transgressed “disciplinary boundaries [with] the potential to bridge the distance between communication specialists and disciplinary specialists” (2011, n.p.). They argued that, in these spaces, faculty can “reflect on what they are doing differently and theorize [about] why they are doing it differently” (2011, n.p.). The focus in such spaces is not on workshops where writing faculty teach what Walvoord et al. (2011) called “WAC strategies” (p. 1) but rather “on disciplinary discourse as access to disciplinary content knowledge” (Gustafsson et al., 2011, n.p.).

What might such a discursive space look like in practice? When Elizabeth was newly appointed as the director of the Howe Center for Writing Excellence (HCWE) at Miami University (Ohio) in 2016, she hoped to design a WAC model that forefronted theory on writing and learning from writing studies, threshold concepts, and applied linguistics. A similar impetus has guided previous scholarship on first-year composition (Wardle, 2004, 2009, 2013) and led to a “writing about writing” approach (Wardle & Downs, 2007, 2012, 2014, 2016). There has been subsequent success, providing students the lenses, tools, and language to understand for themselves how writing works in order to empower them to make their own decisions about effective rhetorical responses.

The same could be true for faculty enrolled in WAC seminars.

In considering how to design such a WAC program, University of Minnesota's Writing Enriched Curriculum (WEC) (Flash, 2016) and North Carolina State's Communication Across the Curriculum (CAC) program (Anson & Dannels, 2009) served as models. Both emphasize the autonomy and expertise of faculty members and departments rather than the expertise and strategies to be imparted by the writing specialists, who instead serve as facilitators and consultants. While both models were helpful to our planning in many ways, neither included an interdisciplinary discursive space (as both center around intensive work within one department) or an explicit theoretical frame (though both, clearly, are guided *by* theory).

Threshold concepts can provide a framework for a faculty WAC seminar, as Chris Anson (2015) suggested in his chapter in *Naming What We Know*. Erik Meyer and Ray Land (2003) noted that faculty in various disciplines identified what Meyer and Land began to call "threshold concepts"—concepts critical for epistemological participation in a discipline. They identified several characteristics of such concepts: they are troublesome, transformational, and integrative; they illustrate the boundaries of disciplinary territory and enact both ways of knowing and ways of practicing in a particular field. Learning them also requires recursive time in a liminal space—time that can't be rushed.

Ian Kinchin, Lyndon Cabot, and David Hay (2010) have argued that the threshold concept framework provides an "expertise-based model" of teaching and thus, implicitly, of professional development, that places "subject specialists at the centre of pedagogic developments" (p. 81). The expertise-based model "places [faculty] development within the disciplines, using familiar discourse" (Meyer et al., 2010, p. 91). In this model,

not all teaching has to change. . . . Rather than dictating to academics how they *should* [emphasis added] act, part of the reason for visualizing the hidden processes of expertise is to make explicit how they already *do* [emphasis added] act. The strength of the pedagogy of expertise therefore lies not in its prescriptive ability, but rather in its descriptive ability. (Kinchin et al., 2010, pp. 91-92)

The threshold concepts framework can help disciplinary experts examine what they already know about writing and how they use writing in their disciplines. With such implicit knowledge and assumptions made explicit, they can make informed and expertise-based decisions about writing in their classrooms—and also make the values and beliefs behind such decisions visible to their students.

## THE SEMINAR DESIGN

The threshold concepts-based WAC seminar, Howe Faculty Writing Fellows, that we began offering at Miami in Spring 2017 was designed to attempt to enact all of these ideas (see Wardle, 2019).<sup>1</sup> To participate, faculty must come in programmatic teams in order to better name and draw on their expertise (and have a greater likelihood of making change when they return to their departments). Teams from multiple disciplines participate at the same time so that they can see similarities and differences across their communities of practice. Participants meet one and a half hours a week for a full semester or three hours a day each day for a two- to three-week intensive summer program. Participants spend the first three-quarters of the seminar thinking about theory and naming their expert practices; then they engage in a change-making project of their choosing. Participants receive \$2,000 in professional development funds.

The program proceeds in the following segments (for a sample schedule, see Appendix A):

- Introducing the threshold concepts framework (Cousin, 2006; Meyer & Land, 2003);
- Having teams identify threshold concepts of their disciplines/subdisciplines;
- Having teams work with threshold concepts of writing and test them against their own experiences and knowledge (Adler-Kassner & Wardle, 2015);
- Considering the idea of disciplinary values and ideologies and examining how those are enacted in their writing (Hyland, 2000; Swales, 1990);
- Reading about theories of learning, prior knowledge, and transfer (Ambrose et al., 2010);
- Surveying ideas for teaching and responding to writing (Bean, 2011); and
- Working on team projects and presenting them in a final showcase.

Nearly every day is spent with teams and individuals engaging in activities to test and better understand the theories. After learning about the threshold concepts framework (Cousin, 2006; Meyer & Land, 2003), for example, participants spend time identifying some of the troublesome threshold concepts of their own disciplines or subdisciplines, which they then teach to the teams from

1 This seminar is only one piece of our larger WAC program. Other elements include stand-alone workshops and lunches, one-on-one consulting, writing groups and writing hours, an assignment review service, and oversight of the university's "advanced writing" requirement (see <http://miamioh.edu/hcwe/hwac/about/index.html>).

other departments. The purpose is to help faculty get explicit about the practices and processes that inform their expectations and conventions around writing and disciplinary knowledge and epistemology. The teams engage enthusiastically in this activity, naming threshold concepts such as these:

- gerontology: aging, a social and cultural construction of a biological phenomenon; intersectionality
- anthropology: ethnocentrism, cultural relativism; holism; biocultural change
- family science and social work: empowerment, dignity, unconditional positive regard
- philosophy: appearance/reality distinction, condition for possibility, mental geography, for the sake of argument

Next they read the first four sections of *Naming What We Know* (Adler-Kassner & Wardle, 2015) and, with their teams, interrogate some of those writing-related threshold concepts in light of their own practices, uncovering what they already know about writing based on how they use writing as experts and in their daily lives. The goal is to give them language and a framework for considering what they already do with and know about writing and how that might then inform how they use writing in their classrooms. For example, when they consider the idea that writing mediates activity and gets things done, they fill the whiteboards with all the purposes for which they use writing and the various forms that writing takes. Through this activity they illustrate that they write daily for many purposes, that purposes take many forms, and that form follows function—yet in classrooms, forms may tend to be rigid and purposes may tend to be limited. In other words, by interrogating their own practices, they come to understand some of the basic tenets of rhetorical genre theory.

After several weeks, participants interrogate how their disciplinary values and social goals are enacted in their discipline's textual conventions. They read excerpts from John Swales (1990) and Ken Hyland (2000) to acquire some language and lenses for this linguistic analysis. Each participant brings an article from their field, trades with a partner from a different discipline, and asks questions such as: What's familiar and strange here? What counts as evidence? What theories frame the work? Who is cited and how? Here participants are trying to identify their often buried and unstated assumptions about what they think constitutes "good writing."

By this point in the seminar, participants have collected enough information, reflected extensively about writing and their own experiences with writing, and made explicit enough of their implicit knowledge to try to explain what they think counts as "good writing" in ways that the other disciplinary groups might

understand well enough to try to operationalize. The philosophy faculty,<sup>2</sup> for example, wrote the following:

“Good” writing in philosophy

- is a clearly articulated motivated problem or question that has not been considered or considered in this way before
- situates itself within the scholarly conversation on this topic
- allows the reader to see something in a new way
- provides and follows a conceptual map articulated at the beginning
- doesn’t get caught up in jargon but understands its significance

Teams often see some similarities across disciplines but notice in their article exchanges that particular conventions or “moves” are enacted quite differently in different disciplines (for example, what constitutes effective and expected “organization” differs; what counts as “jargon” or “common knowledge” is quite different across disciplines, and not immediately obvious to newcomers or outsiders). At times, participants realize that expectations for writing that seem obvious to them are not easily understood by other teams—or that other disciplines would not accept particular conventions (for example, whether narrative and storytelling is expected or unacceptable is often a source of discussion). Faculty teams then draw on everything they have done so far to complete a “Mad Libs”<sup>3</sup> (see Appendix B) activity where they try to operationalize their ideas about writing by filling in incomplete sentences (like: “we tend to write in genres such as \_\_\_\_.”) They present these to the other teams to test whether or not they are able to describe their work and discourse in ways that are accessible to outsiders and, particularly, to students (see, for example, Figure 10.1).

Finally, team members then work on a team project of their choosing. Sometimes, those final projects entail turning their Mad Libs and other ideas into writing resources that are accessible to students. For example, Philosophy turned their Mad Libs into a document directly for students, titled “So . . . you’re taking a philosophy course” (see <https://www.miamioh.edu/hcwe/hwac/teaching-support/disciplinary-writing-hwac/philosophy/index.html>). In this document, they not only named and operationalized some “essential methods and tools” for writing in philosophy, but linked to examples of each (e.g., “distinguishing between conceptual and empirical” links students to a fuller description of what that means and looks like in writing). The philosophers then annotated a student paper to further illustrate where and how the moves and ideas outlined in that previous explanation play out in writing.

2 Philosophy team members: Keith Fennen, Elaine Miller, and Gaile Polhaus, Jr.

3 Thanks to Linda Adler-Kassner and Heidi Estrem, who use similar activities and have enhanced our thinking about the “Mad Libs” activity.

Our field of Philosophy is rooted in the study of the nature of anything and everything. The goals for our work are contestable but nonetheless include understanding being (including possible being), articulating what it means to know, and how to live well individually, with others, and with nature. We have some fundamental ways of looking at reality or doing conceptual analysis. Sometimes outsiders or newcomers misunderstand or are confused or surprised by the lack of agreement on anything in our field. Some “threshold concepts” that have grown up around our work and are central to being able to do work in this field include distinguishing between the conceptual and the empirical, making conceptual distinctions and connections, logical validity, and tracing the genealogy of ideas. Our field tends to value critique and often or usually empirical data is not as valued or forefronted. Our values and threshold concepts are embodied in how and what we write. We tend to write in genres such as argumentative essays. We rarely write reports or surveys. We find writers to be credible when they situate themselves within a scholarly debate and when they use conceptual analysis, present a logically valid argument, and charitably consider opposing positions. Effective writing in our field tends to walk you through a sequence of thoughts about a question or problem, and may consider multiple sides, even those the author disagrees with. Ultimately the goal is to draw you in and transform your thinking. Our citation practices embody and help enact our values and goals. You can see this in how we commonly make reference to other philosophers with whom we are in dialogue, including dead ones. Names are foregrounded in our citations, and, without necessarily documenting it, reference is often made to classical problems without further explanation. Citations are rarely used simply to establish authority. Thus, our advice to you when you write in our classes is to imagine yourself in dialogue with the texts you are discussing, rather than simply reporting on them (the authors of the texts are also not simply reporting facts to you).

*Figure 10.1. The Mad Libs statement drafted by the philosophy team.*

Other teams have redesigned courses or assignments, designed new courses, created resources for faculty in their departments, and designed workshops for their departments, among other projects. Some of their projects are described on our website: <http://miamioh.edu/hcwe/hwac/about/miami-writing-spotlight/index.html> (Miami Writing Spotlight, 2018).

## **AFTER THE SEMINAR: FACULTY-GENERATED DISCIPLINARY WRITING RESOURCES**

Faculty members are not required to complete any additional work after the seminar ends. However, many of them regularly attend our other WAC events, and we have been designing follow-up events and activities solely for Fellows graduates. After the seminar ends, our staff members follow up in order to assist



Fellows if they wish to revise the seminar materials to create disciplinary writing resources for students and writing center consultants. The purpose of these disciplinary writing resources is to provide an introduction to writing within particular disciplines through the lens of threshold concepts. These resources build on the theoretical explorations and naming that Fellows began during the program but include concrete examples of specific values or conventions. Such concrete examples are important in helping writers try to distinguish among what teachers from varied disciplines are asking them to do and in assisting students who are asked to write in new ways. Students need examples of how writing “a logical, organized, evidence-based argument that is written clearly and directly” differs across disciplines, especially when quite different conventions are referred to by the same name across disciplinary classrooms. The Mad Libs activity often serves as an effective “roadmap” as faculty decide what writing values and conventions—including common genres, citation practices, and expectations—they would like to illustrate for students.

The Mad Libs statement is also useful for students as they learn how to write and think and practice like a gerontologist, historian, biologist, etc. Many Fellows have annotated scholarly articles or shared exemplary pieces of student writing, pointing out places where writers are making moves common in their fields. Faculty have also provided other examples that are helpful for students, including visualizations of complex concepts, lists of vocabulary or jargon, videos discussing writing conventions or citation style, and more. HCWE staff compile these pieces into a cohesive disciplinary resource that is shared on our website and can be used by a wide range of audiences including faculty, students, and writing consultants. These resources look different by discipline, but they generally include

- an explanation of threshold concepts in the discipline
- the naming of writing conventions/values in the discipline
- examples that help illustrate those writing conventions/values

To illustrate, we detail one disciplinary writing resource developed for the discipline of gerontology (Glotfelter et al., 2018).<sup>4</sup> The gerontology resource begins with an adaptation of their Mad Libs statement:

Being a Gerontologist means more than just studying later life and applying methods to solve problems. It means having a “Gerontological voice. . . .” Writers are seen as credible when they present a conceptual context that draws from multiple

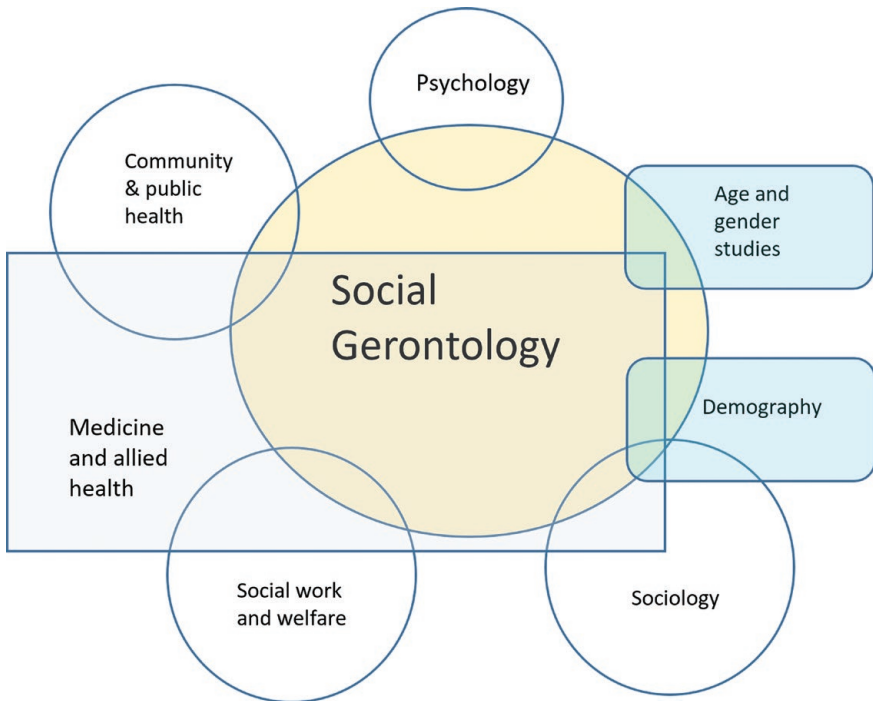
---

<sup>4</sup> All the guides are available at <https://www.miamioh.edu/hcwe/hwac/teaching-support/disciplinary-writing-hwac/index.html>.

disciplinary areas and demonstrate methodological sophistication and rigor. Papers should represent a “dialogue.” The field’s citations practices embody these values, and you can see that in the breadth of sources used, with specific citations from Gerontology sources. Citations should be purposeful, strategic, and support the writer’s argument/claim and avoid overgeneralizations, oversimplifications, and unfounded opinions. Effective writing in Social Gerontology does the following:

- presents logical, parsimonious argument with neutral language
- uses standard signposts and structure
- avoids absolutes
- demonstrates respectful authority

This gerontology resource also includes graphics to visually depict the interdisciplinary nature of the field (see Figure 10.2), as well as a word cloud showing scholars who are widely cited (see Figure 10.3).



*Figure 10.2. Visual representation of the interdisciplinary nature of the field of gerontology*

In Figure 10.2, the interdisciplinary nature of the field of gerontology is represented using a Venn diagram. “Social Gerontology” appears in a beige circle in the middle of the figure. The names of other fields appear in shapes that surround and overlap with Social Gerontology. Starting at the top and moving clockwise are the following fields: psychology, age and gender studies (also overlaps with medicine and allied health), demography (also overlaps with sociology and medicine and allied health), sociology (also overlaps with demography and medicine and allied health), social work and welfare (also overlaps with medicine and allied health), medicine and allied health (also overlaps with age and gender studies, demography, sociology, social work and welfare, and community and public health), and community and public health (also overlaps with medicine and allied health).



*Figure 10.3. Word cloud of widely cited scholars in gerontology.*

In Figure 10.3, the names of influential theorists/researchers are stacked on top of each other. The names (from top to bottom: Lawton, Kent, Bengston, Dannefer, Ferraro, Rubinstein, Cole, Hudson, Elder, Baltes, Achenbaum, Ray, Holstein, Binstock, Settersten, Gubrium, Birren, Schaie, Hendricks, Carstensen, Havinghurst, and Neugarten) appear in different colors over a black background.

The guide concludes with an annotated journal article that illustrates how particular writing conventions are enacted in that article. The conventions they highlight include the following:

- “respectful authority”

- signposting
- descriptive headings
- diverse sources from relevant disciplines

This resource presents readers with both a theoretical explanation of how writing happens in the field of Gerontology and practical examples of how the field's values and characteristics appear in writing. All of the disciplinary writing resources faculty have created are flexible enough to be used in a variety of contexts, including writing center consultations, faculty/student conferences, and for student reference.

While we understand these resources as flexible, we have wondered whether articulating and writing about the conventions of a field might suggest that these conventions are rigid and stable across time. In other words, can naming conventions run the risk of reifying calcified beliefs that may be problematic or even inequitable? Clearly, faculty must introduce the materials to students in ways that carefully frame and contextualize. We encourage teams to explain when there are conflicts or multiple means of achieving a writing goal or to explain why some conventions are as they are. Faculty in some fields have found that they dislike or disagree with commonly accepted conventions, and they subsequently have the language to explain conflicts to students rather than reinforce them or suggest that they are universally accepted.<sup>5</sup>

## ASSESSING THE WRITING FELLOWS THUS FAR

We began offering the Fellows seminar in the Spring 2017 semester and have run a total of six seminars, graduating 71 alumni representing 19 departments/programs and five of Miami's six divisions. The response to our invitations to participate has been positive with very little advertising or recruiting needed, at least for these first cohorts. There are several likely reasons for this. One is that the program aligns well with the values Miami has long embodied. Teaching is deeply valued and supported in myriad ways, and Miami is regularly listed in *US News and World Report* as among the best institutions nationally for undergraduate teaching. The Faculty Learning Community model originated at Miami and continues to be popular through the Center for Teaching Excellence. Thus, the Fellows program as we have been enacting it is dispositionally suited for our local academic environment. Another likely reason we have good

---

<sup>5</sup> There is much more to be said about how discourse enacts and entrenches oppressive practices (see Prendergast, 1998; Green & Condon, this volume) and what the WAC Fellows seminar can do to help faculty recognize such practices. However, space does not allow us to adequately elaborate in this chapter; we will do so in a future publication.

response to the program is that Elizabeth's arrival at Miami coincided with a new general education writing requirement ("advanced writing") that required her to consult immediately with many departments and faculty across campus. These relationships and conversations also made it possible for the HCWE and its new director to gain credibility and for the new Fellows program to attract some attention across campus.

We have assessed the Fellows program in a number of ways. The primary goal of all our assessments is to learn what the impact of the program has been on how faculty think about writing and teaching writing, with the assumption that these changes, coupled with their own expertise, will lead to changes in both individual and, perhaps, departmental teaching practices. It has not been our goal to assess faculty members' teaching directly or to assess their students' writing; we consider those to be assessments and research projects that faculty members and departments should initiate, though we do ask them to self-report on how their teaching has changed since the Fellows seminar. Our assessments thus far include administering an anonymous survey at the end of each semester's program, one anonymous follow-up survey of all previous participants (35 at the time), and holding one focus group with four faculty members representing four departments and three colleges. The graduate assistants and associate director also take notes as they observe each seminar session. In addition, our graduate assistants (Angela Glotfelter and Caitlin Martin) have conducted interviews with former participants intended to learn more about people, programs, or practices that we can describe in our Miami Writing Spotlight (2018) feature. We have received IRB approval to use all of this assessment and interview data for research purposes. All the survey responses and interview and focus group transcripts were uploaded to Atlas.ti, and the three of us plus Caitlin Martin, who joined our team after the IWAC presentation, read it together for recurring themes which helped us develop codes. While there is still a great deal to be learned from the data we have collected, faculty members frequently describe changed and expanded conceptions of writing after completing the program, pointing to how the invisible is now visible to them. In their explanations of how they understand writing, they frequently illustrate an understanding that writing in their disciplines is inseparable from its disciplinary threshold concepts. Faculty members frequently talk about changes in their teaching.

Fellows often point to both extended conversations within their disciplinary teams plus the ability to see differences across the disciplinary teams as one reason they came to the insights they did. We also surmise that being exposed to relevant theories and then using those to immediately interrogate their ideas within and across disciplines aids movement toward change.

## EXPANDING CONCEPTIONS OF WRITING

Surveys, interviews, and focus groups all suggest that faculty members' conceptions of writing shift in fairly dramatic ways during the program. For some participants, this means that their ideas of what "counts" as writing shifted and expanded. For example, an economist said during the focus group, "My perception of what constitutes writing has changed a lot. . . . Because if you'd asked me before we started, 'Do your Intro to Econ students write?' I would have said, 'No. They don't write; they just solve this equation; they graph it. And they might explain the implications of that a little bit.' But having our discussions . . . [in Fellows] . . . showed me that when I ask them to do that on the exam, they're actually writing."

For others, expanding conceptions of writing has meant more deeply inhabiting some of the threshold concepts about writing that we discussed during the program. As an example, a social work faculty member stated, "Writing is not natural. I think that I repeat that now way more now than I used to. I think I knew it, but now I really *know* it. And I say it to students and I mean it in a way that I don't think I did before. So it's not natural. . . . [I]t is a skill [and] you can get better at it. [T]hat takes practice. And these are going to be the opportunities to practice."

Faculty also recognize that writing differs across disciplines and that students cannot be expected to understand writing in their discipline unless faculty explicitly teach it. As one historian put it, "I was just so struck by . . . how different our norms of good writing are from our colleagues *in this building* (the gerontologists)—to say nothing of the [business] people . . . [I]t was really striking . . . and . . . the disciplinary cultures, of course, are inculcated in our student population." An anthropologist noted, "When we saw what another discipline valued, we realized how we do things differently, that we value different things." We have found that faculty expressed realizations about disciplinary and disciplinary writing that were similar to the way that Goldsmith (this volume) describes what pre-service teachers learned when constructing an interdisciplinary lesson plan. These pre-service teachers were able to use their evolving sense of themselves as disciplinary experts and their recognition of interdisciplinary literacies to explicitly teach their students disciplinary writing conventions. So, too, Faculty Fellows come to realize that differences in disciplinary literacy practices are not transparent to students and must be taught explicitly. Instead of siloing disciplines further, articulating disciplinary differences can actually allow faculty to see more clearly and communicate across disciplinary lines.

By the end of the program, faculty tend not to assume that students should have learned their disciplinary conceptions of "good writing" in first-year com-

position or another writing course taught by English faculty. They recognize the challenges students face writing across the curriculum and into their chosen discipline and the responsibility this places on them to teach writing themselves. As one faculty member noted: “They can’t learn what you don’t teach.”

## INSEPARABILITY OF DISCIPLINARY WRITING AND THRESHOLD CONCEPTS

Another frequent trend in our assessment data is that faculty often acquire an understanding of how disciplinary writing is inseparable from disciplinary content and threshold concepts. While faculty might come into the program believing that they have to “make room” for writing in their syllabi, many leave with the realization that writing and disciplinary content are inseparable and that students learn the values and content of their discipline through writing about it and practicing disciplinary genres. A faculty member from history commented that he had realized “how many assumptions about writing in history are wrapped up in assumptions about the discipline itself. . . . It was really useful to think about how difficult it is to teach writing apart from these other deeper disciplinary assumptions.” This history faculty member left the program with a deep understanding of how connected their ways of writing are to their ways of thinking and practicing in history.

Some faculty came to understand themselves to be writing like a “philosopher,” “historian,” or “biologist” and to recognize the implications for their scholarly work and interdisciplinary collaborations. A faculty member from gerontology described her emerging awareness of why writing with and for scholars from other fields is difficult:

I’ve been working with philosophers . . . and [the Fellows program] makes me now more aware of the fact that I’m writing for philosophers: . . . What might their threshold concepts be? How are they going to interpret—how can I tell my story in their voice when it’s not a language that I necessarily speak? So [Fellows ] makes me more aware of the differences . . . we’re talking about aging, but even our fundamental starting point is just completely different. I never cite Aristotle for anything. Just how . . . arguments are built—[Fellows] has made me very aware of thinking about how other people approach their arguments, and it’s not a one size fits all.

Participants come to recognize, then, that all aspects of writing, from what is cited to how much is cited to how much of an argument is made explicit, are tied to disciplinary conventions, beliefs, and knowledge.

## CHANGES IN TEACHING PRACTICES

We asked faculty in the survey of 35 graduates, as well as in the interviews and focus group, to describe any changes they have made in teaching. We did not ask about any specific teaching practices or activities in the Fellows program, as we cover very few except in passing discussions and as examples of particular ideas (although faculty are given a copy of *Engaging Ideas*, by Bean, 2011, and *How Learning Works*, by Ambrose et al., 2010, and they share their own teaching practices quite frequently). Rather, we hope to learn what *they* have innovated as a result of their changes in thinking about writing itself. In their responses, faculty frequently talk about providing more scaffolding, breaking large writing assignments down into smaller parts, and allowing more time for writing. For example, one anonymous survey respondent said, “While I used scaffolded writing in the past, I have increased the number of low-stakes assignments, and become more deliberate in tailoring them to specific, initially limited objectives.”

Faculty also describe an increased awareness of the need to explicitly tell students what they expect and why they are giving particular writing assignments, as well as providing students written examples. One survey respondent said they do more “modeling [of] processes,” while another said they “use far more examples so students can first ‘mimic’ what they read and write and move on from there.” (Mimicry is frequently discussed in the literature as expected and necessary when students are in the liminal space of learning new threshold concepts.)

Faculty also talked about specific activities and practices that changed, but these varied widely and there seemed to be no one common activity or practice that changed for a majority of the graduates. Fellows mentioned changing when and how they responded to writing (earlier rather than later in the drafting process), teaching about citation and source use more explicitly, moving large assignments from the end of the semester to the middle, moving more toward writing and away from exams. Faculty members and teams also designed new assignments and even courses, but, again, what they did and why has varied widely—as we expected and imagined it would, given the philosophy of the program. Some of these changes are described on our website at <https://miamioh.edu/hcwe/hwac/about/miami-writing-spotlight/>.

## WHAT ACCOUNTS FOR CHANGES?

So far, our program assessments have suggested that faculty who complete the program have experienced changes in both their thinking about writing and in their classroom practices. What might account for these changes? Participants themselves, when asked, point to the disciplinary teams and cross-disciplinary



dialogues, while we also observe that many of the changes that they report entail applications of particular theoretical lenses to which participants were exposed.

### Disciplinary and Cross-Disciplinary Dialogue

Repeatedly, seminar participants pointed to having extended time to talk with their own disciplinary colleagues, combined with comparing their experiences to those of other disciplines, as the reason for many of their insights. In terms of time with their own colleagues, participants noted that space for talking about ideas and teaching within their departments is lacking in their daily work lives, so simply having extended space to talk was important to their thinking. In an interview, the philosophers emphasized the importance of having time to talk with one another about teaching and writing in their own discipline, recognizing that even this extended time will not be enough, and then also being able to see how what they are doing does or doesn't align with teaching and learning in other departments:

It was the combination of having two of my colleagues with me *and* colleagues from other departments . . . now I understand my own students when they [ask] “What kind of bibliographic style do you want?” [Because] I don't care. And then when I heard people from international studies say, “Oh my god, I care, I really care.” And then to ask them why. [N]ow I can . . . see where my students are coming from a little bit better. But to have also [the other two philosophers] along . . . [T]he balance of having people who do understand me and people who don't understand me at the same time was . . . immensely helpful.

Thus, spending time with colleagues but also noticing differences and connections across disciplines helped make the invisible visible. As one philosopher explained, “Now I feel like there's something invisible that has been made visible for me, and now I can make it visible for my students as well.”

This idea of cross-disciplinary dialogue as catalyst for making the invisible visible is a thread we have seen throughout the interviews and surveys. For example, an economist made this observation:

That was probably the most eye-opening thing for me . . . you got to see how different fields emphasized different kinds of writing styles . . . taking a step back and [asking], “Well, why aren't they writing the way that I write?” . . . Having that perspective . . . helped in terms of shaping the writing instructions and pointing out examples.

Once faculty recognize their own invisible assumptions and conventions, they then move to a realization of how difficult it must be for their students to learn diverse discourses at once—and they resolve to be more explicit in their teaching.

### Learning and Applying Theories

The initial, underlying assumption of the Fellows program was that providing theoretical lenses and tools for faculty rather than “how-tos” or lists of best practices would be useful and potentially transformative. While threshold concepts provided the main lens, we also relied on linguistic theories from John Swales (1990) and Ken Hyland (2000). Additionally, we implicitly covered theories as embodied in the writing threshold concepts that we discussed; genre theory, in particular, was referenced many times during the program to explain and frame ideas and activities. Repeatedly in the assessment data we see these theories frame ideas that faculty members describe as having changed. For example, the way graduates talk about source use and citation changed fairly radically as a result of the Hyland and Swales readings, which were coupled with analysis of articles across disciplines. Faculty from across the cohorts stopped talking about citation as following rules, and began talking about citation as socially motivated and achieving goals and conventions of their disciplines. A social work faculty member gave this explanation in the focus group:

It wasn't until after the workshop that I had language to talk about, What does it mean to say, “So-and-so and so-and-so, paren., date,” as opposed to a little footnote and what that conveys? . . . [T]hat has been . . . a great way to not only talk about citations, but the whys behind and the importance of it, and that's . . . changed the plagiarism conversation. . . . I'm talking about honoring the ancients, if you will. And *that* students get.

Faculty members also talk about genre conventions and genres themselves as specific to disciplines and socially motivated. The theoretical frames seem to have taken hold and continue to influence faculty members' thinking long after the program ended.

## CONCLUSION

The Faculty Fellows program values faculty and disciplinary expertise, providing a theoretical framework that empowers faculty members, recognizes them as experts already in disciplinary writing, and allows them to make their own inno-

variations and choices about teaching writing. Some faculty noticed and explicitly commented on the design of the program in its effort to value and forefront faculty expertise and a theoretical frame. An anthropologist pulled one of us aside after the last day of the seminar to share his appreciation for an approach that valued his own expertise:

This workshop was so refreshing because we weren't treated like children, which has been my experience at so many other workshops. I mean, you did not have the attitude of "I'm the expert in this area and I'm going to tell you everything you need to know and do." [You] allowed faculty to come to their own realizations, define their own outcomes within the framework.

These and other similar responses suggest that Kinchin et al.'s (2010) recognition of the need to value what faculty already know and to provide them a theoretical lens and vocabulary for coming up with their own ideas for teaching are important and effective components of a WAC model.

Our programmatic assessment suggests there is value in forefronting theory over practice—and that faculty enjoy and are engaged by this approach. We've learned that faculty are most engaged when they are acting from and examining their own expert practice (instead of being lectured to about ours). And they are better able to visualize and name their own expert practices when they can compare and contrast across disciplinary boundaries. The cross-disciplinary contact zones that Norgaard (1999) argued for can be extremely productive sites for faculty to reflect on what they are doing differently and why.

When faculty are able to recognize and name accurate conceptions of writing, they are then empowered to innovate assignments and practices appropriate to their goals and contexts—something we could not do for them as disciplinary outsiders. If we agree that writing and content are truly inseparable, then faculty must be empowered in this way to design innovative writing tasks and assignments that enact and help students learn about (and even critique) their disciplinary values, goals, methodologies, and threshold concepts. What needs to change are faculty conceptions of what writing is and how writing works. If we design assignments and activities for them, this change in conception and the enactment of that change is never realized. We have now seen in action that once faculty conceptions about writing truly shift, they don't call us in panic or frustration very much, because they know what to do and when and how it works or doesn't—and they generally have a better sense of why something might be going wrong.

Where Faculty Writing Fellows graduates do need support is in returning to their departments and helping enact department-wide change. While their con-

ceptions of writing have changed, their colleagues' have not. And there is little space in the daily interactions and work of an academic department to tackle that problem. So this year we are piloting various "Phase 2" follow ups: we have helped lead discussions with three full departments, held follow up "high-impact happy hours" with all graduates to share experiences and generate ideas for further support, and are planning a three-day intensive course on assignment redesign for graduates. In moving from departmental teams to full-department conversations, we can look to the examples of Anson and Dannels and Flash. In fact, we might imagine the Fellows seminar as a gateway to the larger departmental work that Anson and Flash have developed.

## ACKNOWLEDGMENTS

We are grateful to Roger and Joyce Howe, who provided the resources to make the work of the Howe Center possible. We also appreciate all of the Howe Faculty Writing Fellows who have participated in our programming and generously participated in follow-up interviews and focus groups. Finally, we want to acknowledge the ideas and generosity of Caitlin Martin, a graduate student assistant director who joined our team after this article was in progress, but whose work has in many ways influenced the final draft of what we've written here.

## REFERENCES

- Adler-Kassner, L., & Wardle, E. (Eds.). (2015). *Naming what we know: Threshold concepts of writing studies*. Utah State University Press. <https://doi.org/10.7330/9780874219906>
- Ambrose, S. A., Bridges, M. W., DiPietro, M., Lovett, M. C., & Norman, M. K. (2010). *How learning works: Seven research-based principles for smart teaching*. Jossey-Bass.
- Anson, C. M. (2015). Crossing thresholds: What's to know about writing across the curriculum. In L. Adler-Kassner & E. Wardle. (Eds.), *Naming what we know: Threshold concepts of writing studies* (pp. 203-219). Utah State University Press. <https://doi.org/10.7330/9780874219906.c0013>
- Anson, C. M., & Dannels, D. (2009). Profiling programs: Formative uses of departmental consultations in the assessment of communication across the curriculum. *Across the Disciplines*, 6, 1-15. [https://wac.colostate.edu/docs/atd/assessment/an-son\\_dannels.pdf](https://wac.colostate.edu/docs/atd/assessment/an-son_dannels.pdf)
- Beach, A. L., & Cox, M. (2009). The impact of faculty learning communities on teaching and learning. *Learning Communities Journal*, 1(1), 7-27.
- Bean, J. (2011). *Engaging ideas: The professor's guide to integrating writing, critical thinking, and active learning in the classroom* (2<sup>nd</sup> ed.). Jossey-Bass.
- Cousin, G. (2006). An introduction to threshold concepts. *Planet*, 17, 4-5. <https://doi.org/10.11120/plan.2006.00170004>

- Cox, M., Galin, J., & Melzer, D. (2018). *Sustainable WAC: A whole systems approach to launching and developing writing across the curriculum programs*. National Council of Teachers of English.
- Desrochers, C. G. (2010). Faculty learning communities as catalysts for implementing successful small-group learning. In J. Cooper & P. Robinson (Eds.), *Small group learning in higher education: Research and practice* (pp. 1-17). New Forums Press.
- Flash, P. (2016). From appraised to revised: Faculty in the disciplines change what they never knew they knew. In K. B. Yancey (Ed.), *A rhetoric of reflection* (pp. 227-249). Utah State University Press. <https://doi.org/10.7330/9781607325161.c011>
- Glotfelter, A., Kunkel, S., de Medeiros, K., & Kinney, J. (2018). *Writing in gerontology*. <http://miamioh.edu/hcwe/disciplinary-writing/gerontology/index.html>
- Gustafsson, M., Eriksson, A., Räisänen, C., Stenberg, A.-C., Jacobs, C., Wright, J., . . . Winberg, C. (2011). Collaborating for content and language integrated learning: The situated character of faculty collaboration and student learning. *Across the Disciplines: A Journal of Language, Learning, and Academic Writing*, 8(3). <https://wac.colostate.edu/docs/atd/clil/gustafssonetal.pdf>
- Hughes, B., & Miller, E. L. (2018). WAC seminar participants as surrogate WAC consultants: Disciplinary faculty developing and deploying WAC expertise. *WAC Journal*, 29, 7-41. [https://wac.colostate.edu/docs/journal/vol29/hughes\\_miller.pdf](https://wac.colostate.edu/docs/journal/vol29/hughes_miller.pdf)
- Hyland, K. (2000). *Disciplinary discourses: Social interactions in academic writing*. Longman.
- Kinchin, I. M., Cabot, L. B., & Hay, D. B. (2010). Visualizing expertise: Revealing the nature of a threshold concept in the development of an authentic pedagogy for clinical education. In J. H. F. Meyer, R. Land, & C. Baillie (Eds.), *Threshold concepts and transformational learning* (pp. 81-96). Sense. [https://doi.org/10.1163/9789460912078\\_006](https://doi.org/10.1163/9789460912078_006)
- Meyer, J. H. F., & Land, R. (2003). Threshold concepts and troublesome knowledge: Linkages to ways of thinking and practicing. In C. Rust (Ed.), *Improving student learning—Theory and practice ten years on* (pp. 412-424). Oxford Centre for Staff and Learning Development.
- Meyer, J. H. F., Land, R., & Baillie, C. (2010). *Threshold concepts and transformational learning*. Sense. <https://doi.org/10.1163/9789460912078>
- Miami Writing Spotlight. (2018). <http://miamioh.edu/hcwe/hwac/about/miami-writing-spotlight/index.html>
- Norgaard, R. (1999). Negotiating expertise in disciplinary “Contact Zones.” *Language and Learning Across the Disciplines*, 3(2), 44-62. <https://wac.colostate.edu/llad/v3n2/norgaard.pdf>
- Prendergast, C. (1998). Race: The absent presence in composition studies. *College Composition and Communication*, 50(1), 36-53. <https://doi.org/10.2307/358351>
- Swales, J. M. (1990). *Genre analysis: English in academic and research settings*. Cambridge University Press.
- Walvoord, B., Hunt, L. L., Dowling, H. F., Jr., & McMahon, J. D., with contributions by V. Slachman & L. Udel. (2011). *In the long run: A study of faculty in three Writing-Across-the-Curriculum programs*. National Council of Teachers of English.

- <https://wac.colostate.edu/books/walvoord/>
- Wardle, E. (2004). Can cross-disciplinary links help us teach “academic discourse” in FYC? *Across the Disciplines*, 1. <https://wac.colostate.edu/docs/atd/articles/wardle2004.pdf>
- Wardle, E. (2009). “Mutt genres” and the goal of FYC: How can we help students write the genres of the university? *College Composition and Communication*, 60, 765-88.
- Wardle, E. (2013). Intractable writing program problems, kairos, and writing about writing: A profile of the University of Central Florida’s First-Year Composition program. *Composition Forum*, 27.
- Wardle, E. (2019). Using a threshold concepts framework to facilitate an expertise-based WAC model for faculty development. In L. Adler-Kassner & E. Wardle, *(Re)considering what we know: Learning thresholds in writing, composition, rhetoric, and literacy*. Utah State University Press.
- Wardle, E., & Downs, D. (2007). Teaching about writing, righting misconceptions: (Re)envisioning FYC as Intro to Writing Studies. *College Composition and Communication*, 58, 552-584.
- Wardle, E., & Downs, D. (2012). Reimagining the nature of FYC: Trends in writing-about-writing pedagogies. In K. Ritter & P. K. Matsuda (Eds.), *Exploring Composition Studies: Sites, issues, and perspectives* (pp. 123-144). Utah State University Press.
- Wardle, E., & Downs, D. (2014). Looking into writing about writing classrooms. In D. Coxwell Teague & R. Lunsford (Eds.), *First-Year composition: From theory to practice* (pp. 276-320). Parlor Press.
- Wardle, E., & Downs, D. (2016). *Writing about writing: A college reader* (3<sup>rd</sup> ed.). Bedford/St. Martin’s.
- Wilhoit, S. (2013). Achieving a lasting impact on faculty teaching: Using the WPA outcomes statement to develop an extended WID seminar. In N. N. Behm, G. R. Glau, D. H. Holdstein, D. Roen, & E. M. White (Eds.), *The WPA outcomes statement a decade later* (pp. 124-135). Parlor Press.

## APPENDIX A: SAMPLE FELLOWS SCHEDULE

Date	Topic	Activities During Seminar	Reading Prior to Seminar
Week 1:	Threshold Concepts Framework What are threshold concepts of your disciplines?	Set up Google Drive folders and begin taking/keeping notes and records there each week  Identify threshold concepts of your discipline(s)/fields	<i>How People Learn</i> Chapter 2: “How Experts Differ from Novices” Meyer and Land “Threshold Concepts and Troublesome Knowledge” “Threshold Concepts and Troublesome Knowledge: Issues of Liminality” Cousin, “An Introduction to Threshold Concepts”
Week 2:	Threshold concepts of writing Where are threshold concepts enacted in your syllabi and assignments?	Teach one of your threshold concepts to another team if we did not get there last week.  Begin investigating how you are enacting conceptions of writing you read about in your own professional lives & how these can inform classrooms	Adler-Kassner and Wardle, <i>Naming What We Know</i> , classroom edition  —Metaconcept and Concepts 1 & 2 (pages 15-47)
Week 3:	Threshold concepts of writing Where are threshold concepts enacted in your syllabi and assignments?	Begin investigating how you are enacting conceptions of writing you read about in your own professional lives & how these can inform classrooms	Adler-Kassner and Wardle, <i>Naming What We Know</i> , classroom edition  —Concepts 3 & 4 (pages 48-70)

Continued

Date	Topic	Activities During Seminar	Reading Prior to Seminar
Week 4:	How does your disciplinary discourse enact your discipline's values and ideologies?	Exchange one article across disciplines and examine the conventions, values, and ideologies being enacted.	Hyland, <i>Disciplinary Discourses: Social Interactions in Academic Writing</i> "Disciplinary Cultures, Texts, and Interactions" "Academic attribution: Interaction Through Citation" John Swales, summary of CARS model of research introductions Optional: Swales, "Research articles in English"
Week 5:	How can you explain conventions of writing to students?	Extrapolate from last week: how can you provide students with frames and questions to help them interrogate the kinds of writing you assign? Write a statement for students that conveys explicit guidance about writing in your discipline (the "mad libs")	Read <a href="#">Miami Writing Spotlights for Gerontology, Psychology, Philosophy, and History</a> (all short) to see how they are helping students understand writing differently.
Week 6:		Creating disciplinary writing guides Consider how Ambrose and your "mad libs" descriptions might lead you to revise an assignment or a course	Look at disciplinary writing guides created by other Fellows, particularly the philosophy guide Ambrose et al., <i>How Learning Works</i> . <b>Skim:</b> –Chapter 1: How Does Students' Prior Knowledge Affect Their Learning? –Chapter 4: How Do Students Develop Mastery? –Chapter 5: What Kinds of Practice and Feedback Enhance Learning? –Chapter 7: How Do Students Become Self-Directed Learners?



Date	Topic	Activities During Seminar	Reading Prior to Seminar
Week 7:	<p>Learning, prior knowledge, mastery, and transfer</p> <p>Applying ideas from Bean to your classroom</p>	<p>Consider how Ambrose, Bean, and your “mad libs” descriptions might lead you to revise an assignment or a course</p>	<p>Bean, <i>Engaging Ideas</i>. <b>Skim:</b></p> <p>–Chapter 4: Teaching a Variety of Genres</p> <p>–Chapter 7: Writing to Learn</p> <p>–Chapter 6: Formal Writing, Writing to Communicate</p>
Week 8:	<p>Applying ideas from Bean to your classroom</p> <p>Planning for team projects</p>		<p>Bean, <i>Engaging Ideas</i>. <b>Skim:</b></p> <p>–Chapter 10: Using Small Groups to Coach Thinking and Teach Disciplinary Argument</p> <p>–Chapter 15: Writing Process and Paper Load</p> <p>–Chapter 16: Writing Comments</p>
Week 9:	Work on team projects		
Week 10:	Work on team projects		
Week 11:	Work on team projects		
Week 12:	Work on team projects		Plan for next week
Week 13:	Present team projects	<p>Ways HCWE can support you:</p> <ul style="list-style-type: none"> <li>-Embedded consulting</li> <li>-Department liaisons</li> <li>-Assignment review</li> <li>-Faculty workshops</li> <li>-GA training</li> </ul>	<p>Make a short presentation to the large group of your plans for returning to the classroom and your department</p>

## APPENDIX B: WRITING “MAD LIB”

*Note of Caution: Participants do not draft this until Week 5, drawing on all of the reflection, activities, and reading they have completed in prior weeks. Asking faculty to complete this without the prior groundwork is unlikely to be successful.*

Our field of \_\_\_\_\_ is rooted in the study of \_\_\_\_\_ and goals for our work include \_\_\_\_\_ [what are you trying to accomplish]. We have some fundamental ways of looking at \_\_\_\_\_ [the object of your study] or doing \_\_\_\_\_ [your work, your methods]. Sometimes outsiders or newcomers misunderstand or are confused or surprised by \_\_\_\_\_ about our field.

Some “threshold concepts” that have grown up around our work and are central to being able to do work in this field include \_\_\_\_\_ [list TCs you identified earlier].

Our field tends to value \_\_\_\_\_ and often or usually \_\_\_\_\_ is not as valued or forefronted. Our values and threshold concepts are embodied in how and what we write.

We tend to write in genres such as \_\_\_\_\_ [reports, policy analysis, narratives, IMRD articles, etc.]. We rarely write \_\_\_\_\_ [a particular genre or in a particular way].

We find writers to be credible when they do \_\_\_\_\_ and when they use \_\_\_\_\_ [options here include the kinds of theories and methodologies that are appropriate, the way centrality is established, the way the author presents her/himself and addresses the reader and others in the field, the kinds of evidence they use, etc. Hyland & Swales can help].

Effective writing in our field tends to look like/do \_\_\_\_\_ .

Our citation practices embody and help enact our values and goals. You can see this in how we \_\_\_\_\_ [think about citation practices such as quoting vs. summarizing, how many citations are used, what kind of work tends to get cited, what is forefronted in citations—year, person, etc. See Hyland and Swales].

Thus, our advice to you when you write in our classes is: \_\_\_\_\_ .

- Undergraduates in general education courses in our program are expected to do/understand \_\_\_\_\_ when they write in our courses.
- Undergraduates in our major are expected to do/understand \_\_\_\_\_ when they write in our courses.
- Graduate students in our field are expected to do/understand \_\_\_\_\_ when they write in our courses.