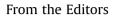
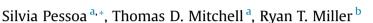
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Scaffolding the argument genre in a multilingual university history classroom: Tracking the writing development of novice and experienced writers



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ABSTRACT

This paper reports on an SFL-based writing intervention in a university global histories course and examines differences in developmental trajectories among students after the intervention. Based on our previous research on writing in this course, we developed three Systemic Functional Linguistics-based workshops to explicitly teach valued linguistic resources necessary for meeting the expectations of writing historical arguments. We examine how student writing developed among nine focal students both quantitatively and qualitatively using an SFL-based rubric that we developed for the purposes of this study. We focus closely on two students, a novice and an experienced writer of academic English, by providing a detailed analysis of how they progressed differently towards incorporating the targeted linguistic resources. Our analysis suggests that explicit disciplinary writing instruction can help close the gap between novice and experienced academic writers; however, experienced writers also showed gains. Given the limited research on how intervention studies affect writing, particularly at the university level, this study can help teachers and researchers respond to the needs of the increasingly linguistically diverse students in higher education.

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1. Introduction

In history classes, students are expected to show their knowledge and understanding by writing arguments, particularly at the secondary and post-secondary levels (de Oliveira, 2011). The social purpose of the school history Argument genre is to argue "the case 'for' or 'against' a particular interpretation of the past and foreground the debatable nature of historical knowledge" (Coffin, 2006a, p.77). Research on the disciplinary expectations of school history arguments shows that to write effective arguments in history, students must evaluate information and perspectives, select and interpret evidence to support their claims, and show the tentativeness of historical information (Coffin, 2006a; Monte-Sano, 2010, 2008; Monte-Sano & Budano, 2012). This requires students to control a range of linguistic resources. Particularly important to historical arguments are interpersonal resources that allow writers to incorporate outside perspectives as evidence for

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their own position, acknowledge the existence of multiple perspectives, and position the reader consistently (Coffin, 2006a; Schleppegrell, 2006).

However, many students, especially novice writers of academic English, face challenges controlling the linguistic resources of the argument genre (De La Paz, Ferreti, Wissinger, Yee, & MacArthur, 2012; Miller, Mitchell, & Pessoa, 2014, 2016; Miller & Pessoa, 2016; Mitchell, Miller, & Pessoa, 2016; Mitchell & Pessoa, 2017; Monte-Sano, 2008; Pessoa, Mitchell, & Miller, 2017; Schleppegrell, 2005, 2006). As a result, students may write non-argument genres, inconsistent arguments, or arguments that meet some but not all genre expectations (Miller et al., 2016, 2014; Mitchell, et al., 2016; Mitchell & Pessoa, 2017; Monte-Sano, 2008; Pessoa, et al., 2017; Schleppegrell, 2006).

A growing body of research has attempted to address these challenges by highlighting the importance of explicit disciplinary writing instruction (De La Paz, 2005; De La Paz & Felton, 2010; De La Paz, Malkus, Monte-Sano, & Montano, 2011; Monte-Sano, 2008, 2010; 2011). These studies show that with instruction in discipline-specific argument writing students can construct more accurate and better organized arguments that are effectively grounded in source-based evidence. This research also emphasizes differences in student writing development. For instance, it has been reported that initial differences in skills significantly impact how students develop (De La Paz et al., 2011), with stronger student writers using and evaluating text-based evidence more often and effectively than novice writers (De La Paz et al., 2012). While these studies have generated positive outcomes, they have had a limited focus on the linguistic resources needed to write effective arguments and have not provided detailed descriptions of writing development.

On the other hand, studies using an SFL framework have focused on describing the linguistic features of argumentative writing and students' challenges with this genre (Coffin, 2006a; Miller, et al., 2016; Miller & Pessoa, 2016; Mitchell, et al., 2016; Mitchell & Pessoa, 2017; de Oliveira, 2011; Pessoa, et al., 2017; Schleppegrell, 2006). Based on her seminal work on school history genres, Coffin (2006b) briefly reports on improvement in student writing over time, particularly in text structure and organization, with limited improvement in grammatical accuracy. Coffin calls for more studies that focus on collaborations between language experts and disciplinary teachers to make explicit the linguistic resources of the genres of history to help students develop their academic writing. Furthermore, overall, few SFL-based studies have focused on documenting student outcomes after literacy interventions.

1.1. Systemic functional linguistics for analyzing and scaffolding the history argument genre

In this paper, we report on an SFL-based collaborative intervention between faculty in English with expertise in SFL and a history professor to scaffold the writing of the argument genre, and examine differences in developmental trajectories after the intervention. Our approach to scaffolding writing in the history classroom is grounded in SFL because previous SFL research provides rich descriptions of school history genres and their disciplinary expectations with an explicit focus on language (e.g., Christie, 2012; Christie & Derewianka, 2008; Coffin, 2006a; de Oliveira, 2011; Schleppegrell, 2014, 2006). SFL defines genre as a "staged, goal-oriented, social process" (Martin, 1992, p. 505) and provides tools to investigate how language is used to make meaning to achieve the goals of a genre. SFL-based genre instruction aims to make language choices explicit to students and scaffold production of increasingly complex genres. Such instruction has been found to be effective for improving academic writing, but has mostly focused on primary and secondary school (e.g., Brisk, 2014) with limited work at the university level (however, see Dreyfus, Humphrey, Mahboob, & Martin, 2016).

SFL has also been used for the study of student writing development. From an SFL perspective, writing development may be understood as "a shift from commonsense ways of knowing to new forms of knowledge that are distinct and distinctive for educational knowledge" (Byrnes, 2006, p. 4). This development can be tracked by documenting the lexico-grammatical and discourse semantic features (of either general academic writing or specific disciplinary genres) that learners produce over time (e.g. Christie & Derewianka, 2008). Using this conceptualization of writing development, Achugar and Carpenter (2014) found that linguistically diverse students in a history course made progress toward using ways of reasoning and arguing typical of history. However, students developed in different ways based on their available linguistic resources, backgrounds, and experiences. Thus, the authors argue that "it is important to document academic language development in qualitative ways that capture the complexity of development considering constellations of linguistic features and how they function to serve discipline specific ways of making meaning" (p. 60). In this study, we build on this work by using both *qualitative* and *quantitative* methods based on an SFL framework – the 3×3 toolkit – which allows for the detailed examination of the complexity of student writing development.

1.2. The 3 \times 3 toolkit for the conceptualization and analysis of history argument

In the intervention and our analysis of student writing, we conceptualize the Argument genre in history using the SFLbased 3×3 toolkit. The 3×3 toolkit was created to assist instructors in describing key linguistic features of particular academic genres (Humphrey, Martin, Dreyfus, & Mahboob, 2010). Based on Humphrey et al.'s 3×3 , prior SFL research on argumentative writing in history (e.g., Coffin, 2006a), and our own previous research on writing in the history course under study (Miller, et al., 2016, 2014; Miller & Pessoa, 2016; Mitchell, et al., 2016; Mitchell & Pessoa, 2017; Pessoa, et al., 2017), we created a 3 \times 3 specifically tailored to history arguments. The 3 \times 3 allows for an understanding of a text by considering how meanings of SFL's three metafunctions of language (ideational, interpersonal, and textual) are realized through linguistic resources at the levels of the whole text, paragraph, and sentence/clause.

Table 1 provides an abridged version¹ of the 3×3 that we created for school history arguments. Briefly, to meet the expectations for ideational meanings in this genre, writers need to provide a consistent answer to the prompt that is grounded in accurate and relevant knowledge from the sources. They need to use specialized or technical vocabulary to characterize an overarching claim and create a framework for analyzing the text. To meet expectations for interpersonal meanings, writers need to answer the prompt with a defendable central claim that takes an argumentative position, rather than simply explain or report on historical events. This involves the control of external voices (e.g., the source text) to demonstrate the relevance of evidence to the central claim and to acknowledge multiple perspectives. To meet expectations for textual meanings, students need to preview the supporting arguments in the introduction, follow this preview in the supporting argument stages, and include a reinforcement stage that reiterates the thesis and major points. More details about how we used the linguistic resources of the 3×3 are discussed in more detail in section 3.

Conceptualizing the school history argument with the 3×3 allows us to make explicit the linguistic resources needed to meet genre expectations. The 3×3 provides a rich analytical tool to uncover the subtle ways in which student writing met or did not meet genre expectations. By attending to these subtleties longitudinally, we were able to carefully document the complexity of student writing development by paying particular attention to how students used language to meet disciplinary genre expectations.

Table 1

Abridged 3×3 toolkit for the conceptualization and analysis of the history Argument.

	Whole text	Paragraph	Sentences & clause
Ideational	 i. The text is grounded in accurate and relevant knowledge from the source text. ii. The answer to the prompt is consistent from beginning to end. iii. The text moves through clear stages to answer the prompt with an argumentative stance. 	 i. The text uses a clear analytical frame- work (overarching claim with sub- claims) to present information according to demands of prompt. ii. Related topics are grouped as distinct supporting claims. 	 i. Specialized/technical vocabulary is used to characterize an overarching claim. ii. Nominal expressions are used in the introduction and in the hyper-Themes to create a taxonomy for the sub-claims.
Interpersonal	 i. The text answers the prompt with a defendable overarching proposition that shows interpretations of history as tentative (not factual) and as something that has to be argued for. ii. The proposition is reinforced, justified, and defended to persuade the reader that a position is valid. iii. The text moves its points or positions forward across the stages using the source text as evidence for claims. iv. The text consistently guides the reader towards the overarching claim. 	voices (e.g., the source text) to develop points, include evidence, and show how the evidence supports the claims.	 ii. The text uses expanding resources (attribute) to bring in the source text. (e g., <i>The author arguesAccording to the author</i>) iii. The text uses contracting resources such as: endorsement: to show how the cited material supports the claims, and to draw and support conclusions (e.g., <i>This means/This shows that/This evidence is indicative of</i>) concede-counter moves: to show awareness of a different perspective and bring the reader towards the writer's perspective (although thisthat) counter moves: to reveal an imagined position of the reader and align the reader to the writer (e.g., <i>even, just, only, although</i>)
Textual	 i. The text previews the claims to be discussed in the introduction, includes supporting arguments in the body paragraphs, reiterates the points in the conclusion. ii. The text creates coherence by predicting, signposting, and scaffolding ideas. 	i. The language and order of sub-claims in the body paragraphs matches the preview in the introduction.ii. Sub-claims are placed at the beginning of the paragraphs.	 Nominal expressions and referring words are used to pack, signal or foreground information, and track ideas.

1.3. The present study

We collaborated with a history professor to design an intervention that aimed to unpack the disciplinary expectations of the school history argument and make the linguistic features of this genre "visible" to the students. The study took place in a first-year history course at an American English-medium university in the Middle East. The intervention was informed by the

¹ We provide only the elements of our 3 × 3 that we explicitly addressed in our writing workshops. For the full version of the 3 × 3, see Pessoa et al., 2017.

literature on the disciplinary expectations of history and the language to meet these expectations (Coffin, 2006a; Schleppegrell, 2006; de Oliveira, 2011), and our work on students' writing challenges in a previous iteration of the same course.

Similar to other SFL-based literacy intervention studies, we emphasize the important role of explicit instruction to help students meet genre expectations. Going a step further in this paper, we use an SFL-based understanding of writing development (as described in Section 1.1) and examine *how* student writing develops among nine focal students who entered the university with different backgrounds and writing experiences in academic English, and developed in different ways in their incorporation of the targeted linguistic features from our intervention. To illustrate some of these differences, we provide a detailed analysis of two students' progress (a novice and an experienced writer of academic English) towards incorporating the linguistic features of the genre targeted in the intervention, the history argument.

Through our analysis, we aim to answer the following questions: What does detailed longitudinal analysis of students' writing reveal about their development? What valued features of Argument did they incorporate, and how did they incorporate them? What differences were there among students in terms of how their writing changed over time?

2. Methods

2.1. Design-based research

We report on a design-based research project (Anderson & Shattuck, 2012; Collins, Joseph, & Bielaczyc, 2004), in which we delivered a 3-part intervention to scaffold the writing of the argument genre in a history course and examined student writing development across a 14-week semester. Design-based research is a formative research method that involves collaborations between researchers and practitioners. This method focuses on both the design and implementation of an intervention to examine its impact on learning and teaching in a real-world setting through mixed methods and techniques. Design-based research is an iterative process: data is collected, analyzed, and reflected upon to improve outcomes and more effectively develop future interventions, pedagogical practices, and theory building.

Schleppegrell (2013) points out that "context is crucial to design-based research" (p. 157), as the implementation of the iterative process of designing, implementing, and refining instructional materials and practices is constrained by a complex system of contextual factors. These may include institutional constraints; existing pedagogical practices; each teacher's background, knowledge, experience, expertise, and attitudes toward change; and students' differing backgrounds and academic proficiencies.

Proponents of this research approach argue that it fills a niche in the methodologies used to improve educational practices by sitting in between ethnographic research and more traditional pre-/post-test control group studies (Collins et al., 2004). The strength of this approach is that it is contextualized in educational settings, which allows researchers both to adjust to the intricacies of learning and teaching, and to generalize from those settings to guide the iterative design process and on-going theory building. Critics have pointed out the potential drawback of researcher bias for the efficacy of this method (Barab & Squire, 2004), which strong design-based research can mitigate with the use of multiple methods and measures.

2.2. The course and the intervention

Since 2009 we have been collecting and analyzing student writing from this course. Students are expected to write 6 argumentative essays (1–2 pages each) during the semester in response to prompts and based on primary and secondary sources (students choose from 3 to 5 prompts for each reading). The disciplinary goal of these essays is to argue for a response to the course readings. The professor's rubric explicitly values argumentative, analytical writing that is clearly structured, and explicitly discourages writing that is "narrative" and "chiefly descriptive." However, students do not always meet assignment and genre expectations (Miller, et al., 2016; Miller & Pessoa, 2016; Mitchell & Pessoa, 2017; Pessoa, et al., 2017).

We collaborated with the history professor to develop three interactive writing workshops that used analysis of sample texts to make explicit the linguistic resources that are used to achieve disciplinary purposes (see Pessoa, Mitchell, & Reilly, in press). We provided students with guiding questions and sample excerpts to consider before each workshop. During the workshops, we discussed students' answers to these questions as we introduced relevant metalanguage and provided new samples for in-class, small-group analysis. Table 2 provides an overview of the goals and language features of the three workshops.

In workshop 1, we made it explicit to students that their essays needed to be grounded in accurate and relevant knowledge derived from the source texts (ideational metafunction). After establishing this, we then focused on the disciplinary expectations of "thinking like a historian" by presenting a consistent argumentative position and writing an organized text (de Oliveira, 2011, p. 132). Our materials highlighted key resources of the interpersonal, textual, and ideational metafunctions to emphasize the importance of responding to the prompt with an arguable thesis, following the stages of argument, and staying consistent from beginning to end. In our previous research (Miller, et al., 2016), we found that some students did not craft an argumentative thesis (interpersonal metafunction) and produced non-argument genres; consequently, in the workshop we provided students with sample prompts and thesis statements to highlight the difference between argumentative and non-argumentative thesis statements. We made it explicit to the students that to write an argumentative thesis statement they needed to make a claim about the source text with an interpretation or evaluation, rather than just reproduce information from it. For example, we showed the difference between claiming that "Hammurabi's code represented a *mix* of political

Table 2		
Overview of the	History Writing	Workshops.

Workshops	Disciplinary expectation	Goals of the workshop	Language features
Workshop 1: Early September 2015	1. Present a consistent position.	1. Answer the prompt with an argumen- tative thesis.	1. State a position with the writer's own interpre- tation or evaluation.
	2. Write an organized text.	2. Write an organized and consistent essay.	 Use specialized/technical vocabulary to charac- terize an overarching claim.
			 State the supporting claims of your interpreta- tion or evaluation with key words to create an analytical framework for the essay.
			4. Follow the stages of argumentation (with a consistent Thesis and Reinforcement stage).
Workshop 2: Late September 2015	 Use evidence to support position. Assess information and provide own perspective. Incorporate diverse Maintain an argumentative sta throughout the essay. Effectively bring different voices into argument. Acknowledge multiple perspectives. 		 Use multi-voiced statements to demonstrate awareness of other perspectives and/or align reader: Modality (e.g., can, may, seem, potentially); counter-expectational adjuncts (e.g., just, only). Acknowledge the sources (e.g., According to
	points of view.		 Hammurabi's Code) and quote from them Explain the quotes as they relate to the writer's argument (e.g., <i>this law shows that</i>) Use concede-counter moves (although
Workshop 3:		Expansion of Workshop 2	thisthat) to align reader
Mid October 2015		Expansion of workshop 2	

systems," followed by supporting claims about laws that were indicative of dictatorship, democracy, or theocracy (the key words of the supporting claims), compared to a proposition stating that the laws "applied dictatorship, a rigid system, and communism," followed by stages that corresponded to each of these three parts, but with no over-arching characterization of the students' interpretation or evaluation of the political system (i.e., a report genre, rather than argument; see Miller, et al., 2016). We also showed how previous students had responded with non-arguments because they ignored key language in the prompts such as language that invites a thesis with an evaluation of degree (e.g., *"how compelling* do you find the author's argument?"), a key type of prompt for history argument writing (Coffin, 2006a).

In addition to unpacking the expectations for a strong thesis statement, workshop 1 also focused on the disciplinary goal of writing an organized essay. We went through the stages of argumentation (textual metafunction) by illustrating an effectively organized sample essay with the stages clearly color-coded. The stages of history Arguments include: 1) an optional Back-ground section to orient the reader to the historical context, 2) a Thesis stage where a central argument is set forth, often by characterizing an overall claim or using evaluations of degree to indicate an overall stance, followed by a preview of the overall structure, 3) Supporting Arguments with effective topic sentences, and 4) finally a Reinforcement of the central argument (Coffin, 2006a; Schleppegrell, 2006). When presenting the stages, we emphasized the importance of remaining consistent throughout the argument (ideational metafunction), since our findings (Miller, et al., 2014) indicated that lower-graded essays included irrelevant or contradictory information in supporting argument stages, or demonstrated a mismatch between the Thesis and Reinforcement stages. In the workshop, the students contrasted an effectively organized sample essay with one that did not follow the stages and one that had an inconsistent argument in which one entire supporting claim and the Reinforcement contradicted the thesis statement.

Workshop 2 focused on the disciplinary expectation of using evidence that is carefully interpreted and assessed to defend a position while incorporating diverse points of view (de Oliveira, 2011). Thus, we focused on the interpersonal metafunction to emphasize the importance of bringing in different voices into the argument, attending to the tentative nature of historical evidence, and maintaining an argumentative stance throughout the essay. We focused on interpersonal resources, based on Martin and White's (2005) Engagement framework, to help students effectively bring different voices into their argument and align the reader with their position. Based on identified challenges (see Miller, et al., 2014), we introduced students to the importance of using multi-voiced resources (heteroglossic propositions) to present information as an interpretation that needs to be argued for, since non-argumentative essays over-rely on single-voiced resources (monoglossic propositions, e.g., non-modalized verbs in the past tense) which present information as factual (Coffin, 2006a). We discussed incorporation of the source text in terms of expanding the dialog by acknowledging the sources (e.g., According to Hammurabi's Code) and quoting from them, and then narrowing the dialog by explaining the quotations as they relate to the writer's argument (e.g., this law shows that) and thus bringing the reader closer to the writer's perspective. These resources allow students to analyze their evidence and formulate reasons to explain why they chose certain quotes for evidence and to assert how the evidence supports their claims. We also introduced the students to the idea that effective arguments strategically align the reader to the writer's perspective through the use of, for example, concede-counter moves (although this...that). Other multi-voiced resources that we discussed were the use of counter (but; just; only) moves that allow writers to demonstrate an awareness of different perspectives while aligning the reader to their established position. The third workshop emphasized these interpersonal linguistic resources in more detail, drawing on new sample materials.

Workshop 1 was delivered in early September 2015 after students had submitted their first essay, which we used as baseline data. Workshop 2 was delivered in late September 2015 and Workshop 3 took place in mid-October 2015 after most students had written the second essay. We delivered the first two workshops during the 1-h class period, and the 61 students in the course attended these (3 sections of approximately 20 students each). The third workshop was optional, delivered outside of class time, and attended by 9 students, who became the focal students for this paper.

2.3. The focal students

We analyzed the writing of the 9 students who participated in the third optional workshop (a total of 45 essays, 5 essays each²), tracking how each student incorporated the targeted genre features in each essay and how their incorporation of these features changed from essay to essay. These 9 students are representative of the diversity of the entire class, both in terms of their gender, cultural and linguistic backgrounds, and the writing they produced for Essay 1 (pre-intervention) (Table 3). The 61 students enrolled in the course under study are part of an in-coming class of 121 students. 61% of the students from this incoming class are female; 40% are local nationals; 38% are non-national residents, the majority of whom are from the Middle East, India, Pakistan, and Bangladesh; the rest are international students mostly from Pakistan. Most of these first-year students speak Arabic at home (67%), while some speak English (11%), Urdu (11%), or other languages (11%). The national and non-national residents were educated locally in educational settings such as Arabic-medium public schools, English-medium private schools, and schools that follow the curriculum of another country (e.g., the Indian educational system). Although it cannot be claimed that these 9 students are representative of the full spectrum of diversity of first-year students enrolled at the University, it may be asserted that they represent the most important socio-demographic characteristics of the first-year student population.³

Table 3

Background information for nine focal students.

Name	Nationality	Native Language	Medium of instruction in high school	Genre of Essay 1
Amal	Qatar	Arabic	Arabic/English	Non-Argument
Muna	Qatar	Arabic	Arabic/English	Non-Argument
Ammar	Sudan	Arabic	English	Non-Argument
Hain	South Korea	Korean	Korean	Non-Argument
Ferran	Pakistan	Urdu	English/Arabic	Argument
Hammad	Tunisia	Arabic	English/German	Argument
Oscar	Palestine & Costa Rica	English/Arabic/Spanish	English	Argument
Munira	Qatar	Arabic	Arabic/English	Argument
Patty	Egypt	Arabic	English	Argument

In this paper, we focus closely on the writing development of a novice writer, Amal, and an experienced writer, Oscar. Although both students met the language requirement to be admitted to the university (TOEFL/IELTS),⁴ they present clear differences in academic writing preparation entering the university. Amal is from Qatar, was educated mostly in Arabic, and came to university with limited experience with advanced academic literacies in English, as judged by the challenges she experienced with Essay 1 (Section 3.1.). Oscar was educated in English and came to university with a strong academic background, as judged by his Essay 1. After they completed the course, we conducted half-hour interviews with them about their experiences writing argumentative history essays. Based on what we learned from these interviews, our experiences teaching both Amal and Oscar in our first-year academic English writing courses, and our analysis of their writing, we refer to Amal as a novice writer of academic English and Oscar as an experienced writer of academic English.

2.4. Analyzing workshop content uptake

Based on the 3×3 framework, we designed a rubric that focused on the linguistic features we made explicit in the workshops and used it to analyze these essays. As shown in Table 4, the rubric has three parts comprising ideational, interpersonal, and textual variables. For each of the metafunctions, we simplified the whole text, paragraph, and sentence/ clause level components of the 3×3 framework to highlight the linguistic features that were taught in the workshops.

² We have analyzed all six essays written by the students but here we report on the first five. We have excluded essay 6 because we believe it is not an accurate indication of the students' writing abilities at the end of the semester. Essay 6 is due the last week of the semester when students have many responsibilities competing for their time. Over multiple years analyzing essays from the same course, we have found that most students, even the strongest ones, turn in substantially weaker writing for essay 6 (this includes semesters when we did not do workshops). The professor confirmed this is a yearly trend.

 $^{^{3}\,}$ All names are pseudonyms and consent was obtained from all participants.

⁴ Per university policy, we do not have access to these students' TOEFL/IELTS scores. However, in a previous research study with students from the same institution, the average TOEFL iBT score was 97.

Table 4

Rubric for the assessment of history essays.

Criteria	Rating	2		
Ideational:				
The essay is grounded in accurate and relevant knowledge from the source text.	0	1	2	3
The thesis uses specialized/technical vocabulary to characterize an overarching claim.	0	1	2	3
The supporting claims are relevant and clearly create an analytical framework for the essay.	0	1	2	3
Thesis and Reinforcement stages are consistent.	0	1	2	3
Interpersonal:				
The essay has an argumentative thesis.	0	1	2	3
The essay uses expanding resources (attribute) to bring in the source text.	0	1	2	3
The essay uses contracting resources (endorsement) to show how the cited material supports the claims		1	2	3
The essay uses concede-counter moves to show awareness of a different perspective and bring the reader towards the writer's perspective		1	2	3
Textual:				
The introduction previews the content of the essay.		1	2	3
The conclusion sums up content of the essay.	0	1	2	3
The language and order of sub-claims matches the preview in the introduction.		1	2	3
Sub-claims are placed at the beginning of the paragraph		1	2	3

0 Poor execution or no use or almost no use of linguistic resource.

1 Only fair or problems using linguistic resource.

2 Good use with minor problems or inconsistencies using linguistic resource.

3 Excellent use of linguistic resource.

The first two authors analyzed each essay written by each focal student using the rubric. We rated each feature using a 4point Likert scale from 0 to 3. A score of 0 indicated that the linguistic feature was not used or was used ineffectively and a score of 3 indicated strong and effective use. We read each essay independently and shared and discussed the scores for each feature until we reached agreement. During this coding process, we noticed that some students seemed to performed higher or lower than others. Thus, once all the essays were rated for all the features, the third author quantitatively analyzed the scores on the baseline essay to identify initial differences among students. This analysis identified three groups that showed differences in students' scores on the initial essay (see Figure 1).

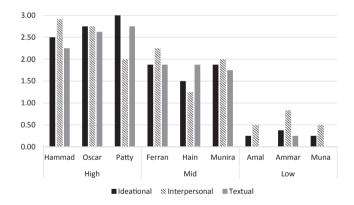


Figure 1. Groups identified based on students' pre-intervention writing.

Based on the identified groups, we conducted a detailed qualitative analysis of the essays produced by each focal student, noting how students used the features under study and tracking each student's use of these features across the five essays. This detailed analysis captured changes in the use of linguistic resources that were discussed in the workshops but that were not emphasized enough to be included in the rubric. Thus, we find this essay-by-essay analysis that was not constrained by the rubric to have been particularly useful for adding nuance to the tracking of student writing development. Together, both the quantitative analysis and the detailed qualitative analysis provide complementary evidence to substantiate our claims about student writing development post-intervention. In both analyses, we paid particular attention to changes in the use of the targeted linguistic features depending on when they were taught in our workshops.

Workshop 1 emphasized answering the prompt with an argumentative thesis, following the stages of argumentation, and remaining consistent from beginning to end. Thus, our quantitative and qualitative analyses of essays written after the first workshop focused on students' effectiveness in using the following features, as compared to their pre-intervention writing:

- Grounding the essay in accurate and relevant knowledge from the source texts (ideational metafunction)
- Answering the prompt with an argumentative thesis embodied in the characterization of an overarching claim with an
 interpretation or evaluation that comments on the sources rather than reports from them (interpresonal metafunction).

- Using specialized/technical language to characterize an overarching claim (ideational metafunction)
- Naming the supporting claims with key words that create an analytical framework for the essay (ideational metafunction)
- Remaining consistent from beginning to end (ideational metafunction)
- Following the stages of argumentation including a preview of the content of the essay in the introduction and a summary in the conclusion; placing the supporting claims at the beginning of the paragraph and using the same language and order from the preview in the introduction (textual metafunction)

Workshops 2 and 3 focused on interpersonal meanings in more detail to help students maintain an argumentative stance, incorporate the source text and multiple perspectives, and guide the reader towards accepting the author's perspective. Thus, in our quantitative and qualitative analyses of essays written after the second and third workshops, we examined the body paragraphs of the essays focusing on the following interpersonal resources, as compared to writing before these workshops:

- Multi-voiced statements to show that the writer is commenting on the sources rather than just reporting, narrating, or describing. These multi-voiced statements include the use of modality (e.g., can, might, seem) and counter-expectational adjuncts (but, just, only).
- Expanding resources to effectively incorporate the source text with phrases such as the author argues that...
- Contracting resources such as this means/this shows that to show how the cited material supports the writer's claim.
- The use of concede-counter moves (*although this...that*) to show awareness of a different perspective and bring the reader toward the writer's perspective.

3. Results

We began our quantitative analysis by first computing reliability statistics for the ideational, interpersonal, and textual metafunctions (Cronbach's alpha = .854, .805, .910, respectively). We then computed composite scores by averaging the items in each metafunction; these composite scores were then used for further quantitative analysis. To investigate patterns among students at the beginning of the course, we first plotted each student's score on each metafunction for Essay 1 (see Figure 1). From these pre-intervention scores, we identified three groups: three students who showed relatively stronger use of each metafunction (Hammad, Oscar, and Patty), three students who showed mid-range scores for each metafunction (Ferran, Hain, and Munira), and three students who showed weaker use of each metafunction (Amal, Ammar, and Muna). These groups were largely distinct, with no overlap between groups in any of the metafunctions, except a slight overlap between Patty and Ferran in the interpersonal metafunction (however, these two students showed substantial differences in the other two metafunctions). We then investigated each group's performance at two subsequent time points, after the first and second workshops and after the third workshop (see Figure 2).

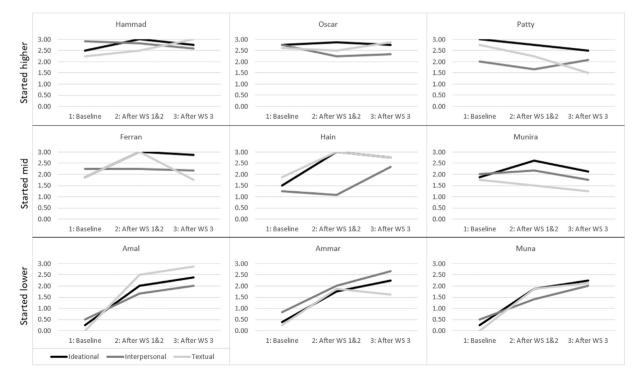


Figure 2. Use of each of the three metafunctions by each student at the start of the semester (Baseline), after the first two workshops (After WS 1&2), and after the third workshop (After WS 3).

The three students in the group that started lower all produced non-arguments for Essay 1. The background of these students and limited experience writing academic texts may have impacted these students' responses in Essay 1. Two of these students (Amal and Muna) were educated in mostly Arabic-medium schools, and they entered university with limited experience reading and writing academic texts in English, particularly in history as they had never taken a history course before. Ammar had been educated in an English-medium school, but his courses had a limited focus on writing, as described by him in the post-intervention interview. After the first and second workshops, these students answered the prompt with an argumentative thesis statement and produced Arguments. All showed improvement in each of the variables within each metafunction throughout the semester, except for the use of concede-counter moves. They became notably more effective at incorporating the source text by using expanding and contracting resources (each student scored a 3.0 in these after workshop 3), but improved less in crafting a tightly organized essay (none scored over 2.0 on the item *The supporting claims are relevant and clearly create an analytical framework for the essay*.)

The students in the group that started in the middle demonstrated some awareness of the valued features of Argument in Essay 1 before any intervention, and they continued to improve steadily and with some consistency, yet with some differences in their development. Having been educated in Korea, Hain joined the university with limited experience reading and writing academic texts in English and struggled in the transition to an English-medium university. In essay 1, Hain used ideational and textual resources effectively to organize his essay, but did not have a clear argumentative thesis. After essay 1, Hain wrote essays that clearly answered the prompt with an argumentative thesis and made significant progress controlling textual resources to organize his essays. However, regarding interpersonal resources, his arguments were not as sophisticated as other more experienced student writers in the class. For example, Hain did not frame any of this thesis statements as a concede-counter move as the more experienced student writers did. Hain did, however, show considerable improvement in his use of interpersonal resources after the third workshop. In contrast, Ferran was educated in both English and Arabic and was also an Urdu speaker who demonstrated strong analytical and argumentative skills. He showed considerable improvement in his use of ideational resources after the first two workshops. However, his use of textual resources to organize his essays was inconsistent, showing strong use of these resources after workshops 1 and 2, but a considerable decrease at the end of the semester. Ferran also received scores of 2 or above for the interpersonal metafunction but his ideas were not always clearly presented and previewed in the introduction of his essays, and he showed little change over time. Munira, who was educated in an Arabicmedium high school with limited experience reading and writing academic texts in English, initially showed improvement in maintaining a consistent argument through topic sentences that consistently advance the argument and aligning the Thesis and Reinforcement stages, but her scores for these variables were low at the end of the semester.

The three students in the group that started at a higher level were all educated in English-medium schools. Two students, Hammad and Oscar, had had ample experience reading and writing academic texts in English, and had a strong awareness of some valued features of Argument in Essay 1 before any intervention. They continued to improve in more sophisticated ways than the other students, and by Essay 3 began framing their essays with a concede-counter move in the Thesis in order to create an analytical framework that allowed them to emphasize a multi-sided view of history throughout the essay. The other student, Patty, educated in an English-medium school with limited focus on writing, initially had high scores in each of the ideational and textual variables, but showed consistent decreases in many of these during the semester, particularly in creating a thesis that previews the content of the essay and indicates the sub-claims of the body paragraphs. Patty did, however, show improvement in her use of interpersonal resources for contracting dialogic space to show relevance of information from source texts and also in her use of concede-counter moves.

To further illustrate the different trajectories of students who began the semester with widely different control of important linguistic resources of the Argument genre, our analysis focuses on the writing development of one of the novice writers with the lowest baseline scores, Amal, and the student with the highest baseline scores, Oscar. We analyze their writing in Essay 1, before any intervention, and what they produced in Essay 3, after two workshops.

As indicated above, the first workshop focused on key resources of each metafunction: answering the prompt with a defendable overarching proposition that shows interpretations of history as tentative (interpersonal); answering the prompt consistently throughout the essay (ideational); and following the stages of argumentation (textual). The second workshop focused on interpersonal resources as described by Martin and White's (2005) Engagement framework. In our analysis, we focus on Amal's improvement in her control of the key resources targeted in the first workshop, and some progress in her control of more intricate use of interpersonal resources targeted in the second workshop. We then show how Oscar, who began the semester with a strong command of many of the resources covered in the first workshop prior to any intervention, was able to incorporate new interpersonal resources creatively after the workshops in his Essay 3. We present excerpts from each student's essay, followed by our analysis.

3.1. Amal essay 1⁵

Prompt: [undeclared]⁶

⁵ In these excerpts, we have labeled Paragraph 1 as P1, Paragraph 2 as P2, etc.

⁶ Some students write the prompt at the top of their essay. Amal did not, and as the analysis shows, she apparently provided information related to multiple prompts rather than staying focused on answering a single one.

- **P1** Hammurabi ruled his empire back in the Babylonian... [P1 provides general background information about Hammurabi and Babylonia with no identifiable Thesis]
- P2 According to Hammurabi's code, the politician system was all about fairness. "An eye for an eye, and a tooth for a tooth." Is what Hammurabi believe is fair and that is what the politician system is based upon. At that time, people were divided into classes which some were higher than others in positions. For example, the lowest class was slaves. And there was also other classes like farmers, nobles and merchants. Some worked as farmers and some in trading products. Farmers and merchants were mentioned in a small number of laws. For instance, law number 104. "If a merchant give an agent corn, wool, oil, or any other goods to transport, the agent shall give a receipt for the amount, and compensate the merchant therefore. Then he shall obtain a receipt form the merchant for the money that he gives the merchant."
- **P3** Women and men both had rights. But comparing men to women rights, men had more rights than women...
- **P4** Hammurabi's politician system was supposed to be mainly fair. He divided people into classes. Their economic was focused on farming and trading. And men had more rights than women.

In Essay 1, Amal is ineffective in her use of some of the most important linguistic resources necessary for meeting the expectations of the genre, resources that would be the focus of the first workshop: she does not answer the prompt with an argumentative thesis (interpersonal metafunction), use key words to label the thesis and supporting claims and create an analytical framework for the essay (ideational metafunction), or follow the stages of argumentation (textual metafunction). For this source text, the professor provided four prompts and students were to select one. The prompts asked students to consider what Hammurabi's laws indicate about the Babylonian political system, social structure, economy, and the treatment of women, respectively. In P1, Amal only provides background information about the source text; she does not answer the prompt with an argumentative thesis or preview any supporting arguments. In P2, rather than grouping related topics as distinct supporting claims (ideational), she discusses the political system, social classes, and farmers and merchants. In P3 she discusses the treatment of women. It becomes clear in P4 that the essay has provided an answer to *each* of the four prompts: Amal revisits information that she has provided about the political system, social classes, the economy, and women's rights. Although she demonstrates awareness of the need to use the textual resource of a Reinforcement stage, she was not able to meet the assignment expectations by responding to a single prompt.

Amal was also limited in her control of the resources that would be the focus of the second workshop (interpersonal resources to integrate the source texts and guide the reader towards the writer's position). While she does use some expanding (heter-oglossic) resources in her reference to and citation of the source text, she does not use contracting resources to indicate that she is imagining a reader who needs to be aligned with her position. This is most evident when she ends P2 with a quotation but does not include an endorse move to show the reader how the external voice of the source text is relevant to a claim.

Overall, Amal shows an awareness of the need to refer to the source text and the importance of a Reinforcement stage, but does not use many of the linguistic resources that would help her meet the genre expectations for Argument. Rather than responding to a single prompt with an argumentative thesis and developing supporting claims and evidence for it, she provides information that is relevant to all four prompts with no single overarching claim.

We now turn to Amal's third essay, which she wrote after the second workshop, to examine how effectively she controlled the resources targeted in the first two workshops.

3.2. Amal, essay 3

- Prompt: Based on your reading of the text, what are the most important obstacles to the centralization of the Japanese state?P1 Since the beginning of time... there has been a monarchy. Japan was centralized... Yet, things changed and the Japanese state started facing obstacles to centralize. The most important obstacles to the centralization of the Japanese state are the separation of the names of the Gods and the Emperors, the elites' power to take lands without authority and not regulating the capital.
- **P2** The proper application of the names of the Gods and Emperors separation is one of the most important obstacles that faced Japan [...]. Consequently, this problem leads to transferring the power from the central government to other lower level power which are the clans, therefore the government will face difficulties to continue their duties.
- **P3** The local elites' power to take lands without authority is an important obstacle because it causes inequality of social class. The elites (For example, the Japanese elites: the Omi 11 and Muraji 12, the Tomo no Miyakko 5 and the Kuni no Miyakko 2) using their power can take any land, and then they get their vassals to work at their private land to make it equivalent to their preferences. According to The Book of Changes 15, "Their contests are never-ceasing. Some engross to themselves many tens of thousands of shiro 13 of rice-land, while others possess in all patches of ground too small to stick a needle into." Meaning that in result of elites taking lands, other people get to own only small lands which causes inequality. This inequality blocks centralization because elites have greater power than the low class, so they are benefiting more.
- **P4** When the capital is not regulated, governors' duties of the time will not be carried out suitably [...] Good aldermen are required to be selected wisely to promote regulations and centralization.
- **P5** Finally, the most important obstacles to the centralization of the Japanese state are the separation of the names of the Gods and the Emperors, the elites' power to take lands without authority and not regulating the capital. And these obstacles will cause the government will face difficulties to continue their duties...

Amal's Essay 3 exhibits several strong improvements in her control of resources targeted in the first workshop. She presents a consistent essay (ideational metafunction) that responds to the prompt with an argumentative thesis (interpersonal metafunction) and follows the stages of Argument (textual metafunction). Her argumentative thesis statement⁷ clearly answers the prompt ("the Japanese state started facing obstacles to centralization") and is followed by a clear preview in P1 ("the separation of the names of the Gods and the Emperors, the elites' power to take lands without authority and not regulating the capital") that is connected to the topic sentences of P2-P4 with cohesive ties (P2: "separation"; P3: "elites' power"; P4: "capital is not regulated"). The topic sentences of P2-P4 introduce clear stages that help to answer the prompt. Amal reiterates her central claim in P5, the Reinforcement stage.

Amal improves in her use of interpersonal resources that were the focus of the second workshop in two important ways. First, she includes the external voice of the source text to develop points, include evidence, and show how the evidence supports her claims. Second, she makes use of the key resource of consequential connectors to provide explicit reasons for the claims she makes. In the second workshop, we highlighted the difference between stating, "One important reason was..." and, "This was an important reason because...," based on Coffin (2006a), who comments that the former is more typical of Explanation genres while the latter is more common in Argument genres. By using *because*, writers go beyond presenting historical information as factual to support their particular interpretation. Amal's control of these interpersonal resources is most effective in P3, where she begins with an assertion about the importance of an obstacle and links it with a reason ("The local elites' power... is an important obstacle *because*..."). She follows this with a claim about specific examples of Japanese elites from the source text and an illustrative quotation. She integrates the quotation with an attribute move ("According to") followed by an endorse move ("meaning that") that links this evidence back to P3's claim. She closes the paragraph by reaffirming how the evidence discussed is to be interpreted as support for her Thesis, once again using interpersonal language to provide argumentative reasoning ("This inequality blocks centralization *because...so...*").

Despite these gains, Amal's Essay 3 could still be improved in significant ways. She does not consistently use the textual resource of creating links with key words in each topic sentence. For example, while she links to the introduction with *obstacle* in the topic sentences of P2 and P3, in P4 she does not make the same move, and does not create this type of link until she mentions *centralization* in the final sentence. While she uses the interpersonal resource of causal connectors in P3 to make explicit argumentative links between claims, evidence, and her explanation of how the evidence supports her argument, her use of this resource is not as effective in the other supporting argument stages. Furthermore, she does not include counter or concede-counter moves in this essay.

Based on Essays 1 and 3, it is clear that Amal developed considerably in meeting the expectations of the Argument genre. She progressed from a non-argumentative essay that demonstrated a limited understanding of assignment expectations to an essay with strong overall organization and some effective uses of valued linguistic resources to develop a stance and support her claims. At this point in the semester, there was still room for her to improve, particularly in terms of her ability to deploy interpersonal resources consistently and strategically to position a potentially resistant reader, and her writing did become more sophisticated. In Essay 4, although she struggled with accurately analyzing a difficult source text about Marxism (ideational metafunction), she made consistent and effective use of interpersonal resources for dialogic narrowing that demonstrated her awareness of the need to persuade the reader. In Essay 5, although there was some overlap in the content of her supporting argument stages (ideational metafunction) and unclear organization due to ineffective topic sentences (textual metafunction), she consistently positioned the reader with counter moves throughout the essay and incorporated an effective concede-counter move. In other words, as she made progress in deploying some of the more nuanced interpersonal resources that were the focus of the second and third workshops and are important to strong argumentation, her control of textual and ideational resources suffered as she did not craft an essay that was as tightly organized with distinct supporting arguments as she did in Essay 3.

In the next part of this analysis, we turn to Oscar, who started the semester with a much wider range of linguistic resources at his disposal, and whose writing unsurprisingly reflects different patterns of development.

3.3. Oscar, essay 1

Prompt: What sort of picture do you get about the treatment of women in ancient Babylon?

- **P1** The laws under Hammurabi's Code did not give women equal rights. The evidence for female inequality, in Hammurabi's code, is mixed. While a number of laws supported women, others were gender neutral, and still others targeted women and not men.
- **P2** Part of Hammurabi's Code includes rules that show equal rights to both genders. For example, law number 15 mentions that if "anyone take a male or female slave of the court, or of a freed man outside the city gates" then they shall be put to death. Another law that does not mention a specific gender is law number 24, which mentions that if "someone" is killed, then the community should pay an amount of currency to the grieving family. These laws seem to support

⁷ All prompts and source texts in this course were not equally well suited to the uptake of Argument (Miller, Mitchell, & Pessoa, 2016). This prompt could be interpreted as asking for a Factorial Explanation (Coffin, 2006a) and is not ideally suited for the uptake of Argument. However, the source text is a nonargumentative primary source that does not make explicit statements or claims about what the obstacles were. As a result, Amal must make inferences to interpret a relevant evidence. She uses argumentative interpersonal resources in her supporting arguments that are not typical of Explanation genres, despite that fact that the prompt somewhat presupposes her Thesis.

equality between men and women, as they do not discriminate a particular gender by increasing the punishment or amount of money given.

- **P3** However, in the same Babylonian Code, there are rules that seem to target women and ignore men. For example law number 109 states that a female tavern keeper shall be "put to death" if... The punishment for the female tavern keeper in this law seems aggravatingly harsh, especially seeing that there are other rules such as the murder of an unborn child that only cost five shekels (211) [...]
- **P4** On the other hand, there were laws that protected wives of Babylonian men. For example [...]. Similarly, rules 137 and 138 mention that if a man wishes to separate from his wife, he must pay her back the dowry. These rules seemed to protect the wives during the Babylonian era.
- P5 Therefore, Hammurabi's Code showed an inconsistency when dealing with equal rights between men and women.

Prior to our intervention, Oscar began the semester with a strong command of many valued resources that would be targeted in the workshops. At the level of the whole text, his first essay is mostly effective in his control of the key interpersonal, ideational, and textual resources targeted by the first workshop: he provides a clear answer to the prompt in an argumentative Thesis (P1: "The evidence for female inequality, in Hammurabi's code, is mixed"); he previews the supporting claims in P1 ("While a number of laws supported women, others were gender neutral, and still others targeted women and not men"); he groups related topics as distinct supporting claims (P2-P4); and he provides a consistent Reinforcement in P5 ("Therefore, Hammurabi's Code showed an inconsistency..."). Oscar also controls some of the interpersonal resources that would be targeted in the second workshop. He introduces direct citations with attribute moves (e.g., P2: "For example, law number 15 mentions") and follows them with endorse moves to link the evidence back to the claim (e.g., P2: "These laws seem to support equality..."). By using modality in his interpretation of the evidence (e.g., P2: "seem to"), Oscar holds his interpretation as tentative, using this heteroglossic resource to demonstrate an awareness of a reader who might not agree. At this early point in the semester, Oscar is using effective combinations of heteroglossic resources to maintain a consistent stance and develop his claims.

However, Oscar's control of some of these resources in Essay 1 could have been more effective in two small, but significant ways. First, he does not control the textual resource of matching the order of the sub-claims in the supporting argument stages with the preview in P1 (gender neutrality is previewed second but addressed first; laws targeting women are previewed third but addressed second). More important still is that Oscar's argument is not completely consistent from beginning to end, and therefore is unsuccessful in its control of this vital ideational resource: the first sentence of P1 contradicts the argument that is presented throughout the rest of the essay, as he first asserts that women had unequal rights, but then focuses the rest of the essay on a claim about the mixed treatment of women. We might imagine a more effective essay that presents a stronger stance regarding the treatment of women as unequal. In such an essay, Oscar could have used similar evidence. He could have conceded to various exceptions found in the laws (such as laws with apparent gender neutrality or laws that seem protect women), and then countered that the gender-neutral laws are insignificant compared to the inequality evidenced in others, and that a law about returning a dowry might really be for the benefit of the woman's father. However, in Oscar's text, the evidence for mixed treatment is presented as three equal parts, and the stronger position asserted in P1's first sentence is not revisited or strategically defended.

Thus, Oscar began the semester already controlling some of the most important resources that we would cover in the first workshop: answering the prompt with an argumentative thesis followed by supporting argument stages and a Reinforcement. Additionally, he was already deploying some important interpersonal resources to incorporate the source text and hold his interpretations as tentative, resources we would cover in the second workshop. Even so, his essay exhibited two small but consequential challenges in controlling key resources that limited its overall effectiveness. We now examine his writing after the second workshop in Essay 3, where he began to experiment with incorporating some of the more sophisticated interpersonal resources targeted in our intervention.

3.4. Oscar, essay 3

Prompt: To what extent would Han Fei, the author of the second document, disagree with Confucius on the way in which to run a state?

- **P1** Even though Han Fei would to some extent agree with some of Confucius' methods on ruling a state, he would disagree with most of the Chinese politician's conservative views.
- **P2** Both Confucius and Han Fei believed in rewarding the righteous men and excluding the law breakers. When asked on how to secure the submission of the people, Confucius replied by saying that one should "advance the upright and set aside the crooked" (p. 1). What Confucius meant by this was [...] Han Fei also believed in this method... but Han Fei called it commendation [...]
- **P3** One of the differences between Confucius and Han Fei's views of leadership was that Han Fei not only believed in out casting the wrongdoers, but he believed in a term called "chastisement" (p. 2) which is defined as "inflict[ing] death or torture upon culprits" (p. 2). Han Fei believed that the severe punishments would inject fear into the society and therefore they would avoid committing crimes and breaking the law. Confucius did not believe in punishment as he said "if the people be led by laws, and uniformity sought to be given them by punishments, they will try to avoid the punishment and have no sense of shame" (p. 1). Confucius believed that punishments were not an efficient way of

controlling the society and making them revere their leader because it would make people look for ways to avoid the punishment instead of feeling guilty and trying to change their behavior. Even though this method might be criticized for being conservative by some (perhaps Han Fei himself), one must see that Confucius was trying to eradicate the problem before it had even occurred.

- **P4** Lastly, Han Fei would disagree with Confucius on the matter of filial piety which is the idea of showing deference and obedience to one's superiors (p. 1) [...] While Confucius considered filial piety vital, Han Fei put the law before anything or anyone else.
- **P5** In conclusion, Han Fei would to some extent agree with some of Confucius' methods of leadership, but overall, he would mostly disagree since his methodology was more aggressive than Confucius' "conservative" methods.

In Essay 3, Oscar again successfully controls the resources that were the focus of the first workshop. He directly responds to the prompt with an argumentative Thesis (P1) and includes a consistent Reinforcement stage (P5). The Thesis stage also accurately previews the structure⁸ of the supporting Argument paragraphs and he answers the prompt consistently throughout the essay in clear stages.

In the second workshop, interpersonal resources such as counter and concede-counter moves were emphasized as being particularly important to holding interpretations of history as tentative, providing a nuanced interpretation, and guiding the reader to the writer's position. In Essay 3, Oscar frames his entire essay with a concede-counter move in the Thesis ("Even though Han Fei would to some extent agree..., he would disagree..."). In P2, where he provides evidence for the Thesis' concession, Oscar effectively uses a counter move to synthesize the two texts, pointing out that Han Fei shared Confucius' view, but used different terminology ("Han Fei also believed in this method... *but* Han Fei called it commendation"). With this counter move, Oscar narrows the dialog away from a reader who might not see such a link based on this difference in wording.

Oscar incorporates a second concede-counter move in P3 (*"Even though* this method might be criticized for being conservative by some (perhaps Han Fei himself), *one must see* that Confucius was trying to eradicate the problem before it had even occurred"). His use of this move is effective, but not in the exact same way that was emphasized in the workshop. Rather than conceding that some might see a particular view expressed in the source texts as similar, and countering that this is not the case (as support for his thesis that they mostly disagree), here Oscar uses the concede-counter to put the texts in conversation with each other. Oscar positions the reader as someone who, along with Han Fei, might be critical of Confucius, and then counters to defend Confucius' view. This move might have been useful as part of an overall claim that Han Fei and Confucius shared the same goals, but disagreed on the methods to achieve them; perhaps such a claim is implicit in Oscar's argument, but it is not one that he emphasizes.

Although Oscar provides a strong reading of the two texts and how they relate to each other, his use of concede-counter in his Thesis could have been more effective, particularly if it were combined with greater control of textual resources throughout the paper. P2 explores a similarity between the source texts, while P3 and P4 explore differences. However, no moves are made to connect these to the concede-counter from the Thesis. Thus, he is lacking key metadiscourse to connect the supporting stages, and as a result the information he presents there comes across as more of a list that mirrors the information presented in P1; he does not reiterate the concession and countering moves in order to guide the reader towards his established position.

In Essay 3, Oscar continued to effectively deploy the resources he was already using in Essay 1, and attempted to use materials from the workshops to improve. In the workshops, we discussed the value of the concede-counter move to position and align a reader, but we did not suggest that it be used for a Thesis. Oscar creatively adapted the information from the workshops with his Thesis to demonstrate his awareness of the value of showing multiple sides in an historical argument. He began the semester with a wider range of valued resources for history Arguments than Amal, and therefore was able to attempt to incorporate more of the targeted moves into his writing by Essay 3. Oscar continued to develop in his subsequent essays, framing them all around a concede-counter move in the Thesis and incorporating more concede-counter moves in his supporting Argument stages with an improved ability to position the reader strategically across strongly organized and signposted stages.

4. Discussion

In this study, we used our research findings from previous iterations of a history class to develop three workshops to explicitly teach students ways to meet the expectations of the school history argument genre in this course. We documented the writing development of 9 focal students, with a particular focus on an experienced and novice writer.

The quantitative analysis found that students started the course at different degrees of ability to incorporate the linguistic resources for meeting genre expectations, and that this may be related to students' prior experiences with academic literacy in English. The results largely showed that, over time, students incorporated the targeted linguistic resources in their writing in ways that helped them to better meet genre expectations. This was particularly true for students who scored lower on the baseline essay, who, after the workshops, reached a level that was similar to the students who started higher. However, similar to other studies of writing development, we also saw that development was not always linear and that some students showed inconsistent development (see Sommers, 2008; Verspoor, Schmid, & Xu, 2012).

⁸ By using a one-sentence introduction that serves as the Thesis and previews the structure of the paper, Oscar is responding directly to the preferences of his professor. The professor abhors excessive background information and prefers essays that get quickly and clearly to the point.

Overall, the findings point to specific ways that the students progressed in incorporating the targeted linguistic features from the workshops, and support other studies that have found effects of explicit history writing instruction (De La Paz, 2005; De La Paz & Felton, 2010; Monte-Sano, 2010) with an explicit focus on language (Coffin, 2006b). The findings also contribute to the limited research on uptake of language-based writing interventions, particularly at the university level. The particular focus on the novice and experienced writers provides further evidence that explicit instruction can narrow the gap between students with different incoming skills (De La Paz, 2005).

The fact that all 9 focal students, including the three students in the started lower group, were answering the prompt with an argumentative Thesis by Essay 2, and that all students wrote Arguments by Essay 3, shows the value of explicit languagebased disciplinary instruction, particularly in getting the novice students closer to the level of the experienced students. These results are particularly notable in light of our research on a previous iteration of the course (which did not include the writing workshops), where in Essay 2, for example, only 6 of 24 students wrote Arguments (Miller, et al., 2016). It appears that explicit instruction in the present study accelerated students' development towards meeting the expectations of the course and the Argument genre. As the semester progressed, students who initially scored lower on our rubric were able to use textual resources to effectively organize their essays, drawing on the source text as support for their claims and showing an awareness of how this is achieved through linguistic resources.

Our analysis highlights individual differences in students' development, depending on a variety of factors such as their prior educational experiences and the linguistic resources they already possess. This finding resonates with Achugar and Carpenter (2014), who found that although commonalities in development exist among groups of learners, there is substantial variation in the linguistic resources used by individuals within each group.

This variation is illustrated by the cases of Amal and Oscar. Both Amal and Oscar incorporated the targeted linguistic resources, but they did so in distinctive ways, which we attribute to their backgrounds and prior academic literacy experiences. Having been educated mostly in Arabic, Amal's academic reading and writing skills in English were not as developed as Oscar's, who was educated in English-medium schools. Amal struggled in her transition to college with the academic reading and writing demands of her classes, as seen in her writing presented in this paper as well as her other writing. In her first essay, she lacked an understanding of the writing task, her second essay (not shown here) showed her difficulty in evaluating a source text's evidence, and her fourth essay (also not shown here) contained misinterpretations of historical evidence. All of these are typical challenges for underprepared students (Monte-Sano, 2010). However, through time and with explicit instruction, Amal made progress in her writing, showing a better understanding of how to write analytically by increasingly incorporating evidence from source texts using Attribute and Endorse moves and controlling interpersonal language to strategically position and align the reader. However, her control of textual resources regressed somewhat, perhaps as a result of her attempt to experiment with new writing strategies. In the post-workshop interview, Amal said that she appreciated the workshops because she became more aware of the importance of reading the prompt carefully, answering with an argumentative thesis, and using evidence from the text, which reflects the findings of our analysis of her writing.

On the other hand, Oscar was able to take the discussion of interpersonal resources in the workshop and use these resources in new and creative ways by framing his subsequent essays using concede-counter moves to create space for other perspectives. In our interview with Oscar, he confirmed that he was already aware of the material covered in the first workshop, but that the discussion of Engagement resources allowed him to purposefully implement strategies that he previously only had an ambient awareness of. Although our analysis shows that Oscar's control of these resources is still developing, he was nonetheless prepared to try them out with some success. In the post-intervention workshop, Oscar revealed that he consciously chose to use the concede-counter moves to structure his papers in order to create space for other perspectives. The differences between these students show that development is sensitive to initial states (De La Paz et al., 2011; Larsen-Freeman, 2006). An understanding of the differing linguistic resources students possess can help us anticipate potential challenges and address them.

5. Limitations, conclusions, and future work

It is important to acknowledge that in addition to the workshops discussed in this paper, other possible factors might have impacted the students' writing development, such as their recurrent practice writing these essays, feedback and grades from the professor on each assignment, practice reading and writing in other courses, and the use of tutoring resources at the university. Conclusions about the effectiveness of the workshops are also limited because there was no control group available to compare the intervention group against. Future research could include a control group in order to better understand the effects of such interventions.⁹

Despite these limitations, our findings do provide some support for the role of explicit disciplinary writing instruction with an explicit focus on language, particularly in narrowing the gap between students with different incoming skills. Furthermore, our study highlights the value of collaboration between language specialists and faculty in the disciplines and provides a model of collaboration that can be useful in meeting the needs of the increasing number of linguistically and culturally diverse students in higher education.

⁹ However, as one reviewer noted, the use of control groups in education research has ethical implications, and it is important for education researchers to not deny students exposure to instructional intervention that has positive outcomes. Researchers can partially avoid this by, for example, offering the intervention to the control group at a later date; however, non-exposure at crucial stages may still affect students' learning.

Such collaborations require considerable investment from both language specialists and disciplinary faculty in an ongoing process of data collection and analysis to implement and re-implement improved versions of the intervention. Language specialists must become familiar with the demands and challenges of the writing assignments of a given course by analyzing course materials and student writing to understand course, discipline, and genre expectations. They must review the literature on the writing expectations of the given discipline, as well as interview the disciplinary faculty. This process provides deep knowledge of the discipline and the particularities of the local context, and generates rich data, all of which are a necessary foundation to design materials to scaffold student writing.

Our process involved the analysis of high-graded and low-graded essays from former students to identify the valued features of these essays (Miller, et al., 2014; Miller & Pessoa, 2016) and a longitudinal analysis of writing developed in an iteration of the course that did not have an intervention (Mitchell, et al., 2016). We used think-aloud protocols with sample essays and interviews with the professor to understand course and disciplinary expectations. Based on this data, we developed and delivered workshop materials that make explicit the language needed to meet genre expectations (Pessoa et al., in press). We used our post-intervention student interviews and analysis of student writing to refine our workshop materials for the subsequent year's class.

Based on this work, we have developed a new assessment rubric to make the linguistic resources for meeting genre expectations more explicit. The new rubric is currently being tested in some sections of this course. Our current workshops include an explanation of the rubric with annotated copies of sample texts that illustrate strong and weak use of the resources for each category. By linking student assessment more directly to linguistic resources they need to write effectively, we hope that our explication of these resources will have an even stronger impact.

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