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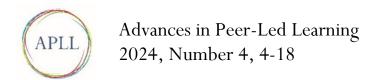
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# The Humanities and Peer Led Team Learning: Refreshing Freshman Composition Classes

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#### **Abstract**

Freshman Composition is the name given to English classes that typically are taken by first-year university students. The aim of the courses is to enhance students' writing abilities, but some studies have suggested that the classes, as traditionally conducted, have little impact. So, to improve learning outcomes at Sam Houston University in Huntsville, Texas, over a three-year period (2012-2014) several traditional sections of Freshman Composition were modified by pursuing an approach that combined three elements: (1) the use of whole original texts, (2) a focus on ethical issues raised by those texts, and (3) discussions of those issues in a Peer-Led Team Learning (PLTL) format. Even though less time was devoted to formal writing instruction, the students in the PLTL modified courses displayed improved writing skills in each of three fall semesters compared to students in traditional courses. These results suggest that a relatively simple and inexpensive pedagogical innovation can significantly improve Freshman Composition writing outcomes.

Keywords: Peer-Led Team Learning, PLTL, Writing Instruction, Critical Thinking, Original Texts

#### Introduction

The approach to teaching Freshman Composition that we will describe is a straightforward and inexpensive pedagogical innovation that addresses a problem documented by Richard Arum and Josipa Roksa in their provocative 2011 work, *Academically Adrift*. Arum and Roska report the results of assessing a large sample of undergraduates with the Collegiate Learning Assessment (CLA, now the CLA+). The CLA was designed for the Council for Aid to Education (now CAE) "to evaluate the critical-thinking and written-communication skills of college students." In 2005, Arum and Roksa tested freshman students from a heterogeneous mix of American four-year colleges and universities and then retested them in 2007 at the end of their sophomore year. They report, "with a large sample of more than 2,300 students, we observe no statistically significant gains in critical thinking, complex reasoning, and writing skills for at least 45% of the students in our study" (p. 36).

While the CLA is not a perfect instrument (Possin, 2013), Arum and Roksa are not alone in drawing this sobering conclusion. A 2005 report from the American Association of Colleges & Universities (AACU) cited an Educational Testing Service report that as few as 6% of college seniors are "proficient" in critical thinking (p.10). Indeed, in reporting on a survey of employers, the Conference Board states that only about one quarter of their respondents can rate college graduates as "Excellent" in the critical thinking and problem-solving skills they bring to the workplace (Casner-Lotto & Barrington, 2006, p. 41).

On a more positive note, Arum and Roksa found that, if students are required to read an average of 40 pages per week and write 20 pages or more in a semester, they are likely to exhibit enhanced critical thinking abilities (p. 94). This suggests that the lack of gains in critical thinking skills observed in the 45% might be due to a paucity of reading and writing experiences provided in the first two years of a typical university education. It follows that one step toward improving undergraduate education would be to increase student engagement with reading and writing to improve learning. But how is this to be done? We have now had several years to assess the success of an innovative pedagogical approach, and we want to share what we have found. A response to the problem identified by Arum and Roksa was a pedagogy that marries the new and the old.

# The New: Peer Led Team Learning (PLTL)

Surprisingly enough perhaps, this part of our story began in a chemistry course at the City College of the City University of New York in 1991. David Gosser and colleagues at other institutions were looking for ways to improve chemistry students' learning. They hit upon using students as peer discussion facilitators in weekly sessions of 6-8 students, called "workshops." It is important to understand that the workshops were an integral part of the chemistry course, not after-hours tutoring sessions. The instructors reduced course lecture

time by one hour per week to allow for the workshops (Gosser et al., 2010). Students who had completed the course subsequently became student Peer Leaders who were paid a modest stipend for their work. Thus, peer-led discussion groups are small sessions led by an experienced student peer and, crucially, occur without the instructor present. This structure allows the students to explore their ideas and thinking in a relatively friendly, non-threatening environment. The results were increases in students' grades over comparable non-PLTL sections and an increase in retention. The PLTL approach has been found also to modestly improve critical thinking skills in science courses (Quitadamo et al., 2009).

# The Old: Reading classic works that raise ethical issues

Inspired by the success of the PLTL format in chemistry and other courses, we wondered whether the non-threatening egalitarian PLTL session format would provide a forum for students to explore and develop their thinking regarding difficult ethical issues. Such an environment is not often present in the traditional college classroom. We hoped to improve our students' learning in the humanities and social sciences by implementing a curriculum combining elements of more extensive reading and writing exercises, peer-led team learning, and a focus on critical thinking concerning ethical issues.

# The Combination: Peer-Led Team Learning and original texts

We developed, on a trial basis, a course pedagogy that employed reading of original texts and peer-led team learning in small discussion groups of ten or so students. The groups would meet regularly over the course of the semester in place of one class hour per week, often on a Friday with the class meeting in the usual fashion on Monday and Wednesday. The instructor would not be present for these discussions, but the instructor would supply questions to guide the discussions in order to focus students on issues raised by the readings. The student peer moderator would not lead the discussion in the manner of a graduate teaching assistant standing in for the professor, but instead the moderator would take roll and, most importantly, keep notes on who participated and on their responses to the questions and to other students' comments. The point of the note-taking was to ensure that all of the students were participants in the discussions.

We designed the curriculum to help students to think critically about the ethical issues expressed in the literature as well as to connect those issues with similar issues they face in their lives. Our hope was that having these experiences of discussing issues with their peers would lead our students to become more ethical citizens and leaders, people who can calmly and rationally discuss the issues confronting society. In addition to Freshman Composition, the PLTL modified course format was used in a variety of courses in the departments of English, History, Sociology, Political Science, and Philosophy. Faculty members from those departments volunteered to conduct classes using the format of student-led peer discussions

of ethical issues moderated by students whom the faculty members recruited. The dean of our college supported the classes by offering token stipends to the student moderators for their work.

Informal reports from the instructors and students were remarkable. Here is a sample of students' comments about their experiences with the PLTL modified class that were collected anonymously in the spring of 2013:

I will remember the lessons of Julius Caesar, Dr. Faustus, and Medea more than any other of the lessons. I will never let pride get the better of me.

Although it did not start out that way, throughout this semester I have learned that I can develop a topic into a well-developed paper that I can be proud to display to others. I have also found out that people will always have different views and expectations throughout their lifetimes but with new insight and information, an individual can clearly see things in another persons' point of view.

It may sound funny but I was pretty intimidated by a couple of students this semester. After PLTL I learned that you basically can't judge a book by the cover.

The stories we read, such as Julius Caesar, Medea, and Frederick Douglass opened up my world, I learned such much from all of these stories. For example, I learned that Medea the play was the basis for Diary of a Mad Black Woman, a movie that I have seen countless time but did not know the back story for. From reading Frederick Douglass, I learned so much from what it meant for him to be a slave, and the challenges he faced, and how he learned to overcome them.

# From the faculty side here are two testimonials:

The theme for 2013, which begins in ENGL 1301 and continues in ENGL 1302, is "Man and the State." While I find the language of the title less inclusive than it should be, I believe that the questions it intends to raise about the relationship between the individual, society, and government are critical at the present moment. Pursuant to this theme, we read four primary texts: Oedipus The King by Sophocles, The Prince by Machiavelli, Hamlet by Shakespeare, and The Adventures of Huckleberry Finn by Twain. ... This was, by far, the most rewarding experience I have had in the composition classroom. The themed approach of the curriculum allows students at the freshman level the opportunity to pursue a single question rigorously for an entire semester. This is a privilege we typically reserve for advanced undergraduates in the form of directed readings courses and special topics seminars.

My approach to the course has been one of highlighting individual moral development, so I encourage the students toward introspection and discussion with one another. Students responded

well to hypothetical ethical dilemmas, and I asked them to analyze the rationale behind the moral decisions of literary characters. I was impressed by the level of camaraderie that the students showed by the end of the semester, and their willingness to hear multiple viewpoints.

Such testimonials were encouraging, but we needed more rigorous supporting evidence. We also wished to demonstrate that the program could achieve its goals without diminishing the expected instructional content of the courses.

# The Laboratory: Freshman Composition

The optimum "laboratory" for experimenting with innovations to increase reading and writing skills in undergraduate students is the Freshman Composition course required of most students. It already stresses writing, and a more extensive reading component could be easily added. In addition, since it occurs early in students' baccalaureate studies, it is placed ideally to affect the course of their entire undergraduate educational experience. Hence, we designed a more formal empirical test of the effectiveness of the modified course pedagogy using Freshman Composition courses.

One advantage of focusing on Freshman Composition as the laboratory for testing the impact of the PLTL modified pedagogy is that there are large numbers of sections that are taught by a variety of faculty members. The sections are of manageable size (capped at 26 students) for the implementation of peer-led team learning. In addition, there are many appropriate original texts available in the public domain that can be obtained at a minimal cost to the students. These characteristics make Freshman Composition an ideal laboratory to test the modified course pedagogy. In the face of the planned changes, we deemed it extremely important that we not diminish traditional goals established for Freshman Composition: the use of grade-level mastery of English diction, syntax, and rhetoric in the process of the development of a single thesis.

# The Comparative Effectiveness Study

In the fall 2012 semester we implemented a test of the modified course pedagogy in Freshman Composition courses offered at a medium-sized state university:

- 1. In a number of sections, the readings were modified to emphasize the reading of whole works;
- 2. discussion was increased by implementing peer-led team learning (PLTL) within the courses;
- 3. critical thinking was emphasized by creating discussion topics that revolved around the moral and ethical dilemmas exemplified in the readings;

4. the writing performance of students in these PLTL modified sections were then compared to student performances in unmodified (traditional) Freshman Composition courses.

#### Methods

### **Participants**

Adjunct faculty and graduate students almost exclusively were the instructors for both the PLTL modified and the regular sections which served as a control group. Some of the faculty taught both a regular and a modified section. While some of the instructors over the three-year time span of this study remained the same, there was frequent turnover. The students enrolled in the composition sections of their choice and were not informed at the time of enrolling as to which sections were PLTL-modified and which were regular or traditional. Thus, there were no efforts to recruit a special cadre of students for the sections with the PLTL modified course format, and it was safe to assume that students in the modified sections were a representative sample of freshmen enrolling at the university.

In the first class session, the PLTL modifications were described to the students. They then were given the opportunity to transfer to traditional sections. Only a handful of students chose to change. It was made clear that their choice to continue with the PLTL modified sections was completely voluntary and would have no effect on grades. This procedure was employed to ensure that the students both in the modified and in the traditional sections would be relatively equivalent. While there could not be a totally random assignment of students to sections, there was no reason to think that the students represented in the PLTL modified and traditional comparison sections over the three fall semesters varied in any systematic way from the general population of students who enroll in Freshman Composition classes at the university.

Some evidence to support the assumption that the two groups were equivalent is the comparative demographic data collected on both groups. In the fall of 2012, eight PLTL modified sections with a total of 150 students and four instructors and four traditional sections with a total of 113 students and four instructors were assessed. The mean characteristics of the students in the modified and traditional courses are presented in Table 1. There were no significant differences between the groups.

Table 1: 2012 Student Characteristics of the Modified vs. Traditional Course

	% Female	% White	% Af. Am.	% Hispanic	% Other	SAT V	SAT M	SAT Wr	ACT
Modified	57	42%	35%	19%	3%	473	485	449	20
Traditional	62	48%	27%	24%	1%	463	487	444	20

In the fall of 2013 ten PLTL modified sections with a total of 158 students and four traditional sections with a total of 82 students were assessed. In the fall of 2014 seven PLTL modified sections with a total of 160 students modified and seven traditional sections with a total of 172 students were assessed.

Student Peer Leaders in 2012 were graduate teaching assistants. Those in 2013 and 2014 were sophomores selected from participants in the modified courses in the previous year. We secured Institutional Review Board exemption for the research project. All participating students completed an informed consent form.

### Readings

In all the traditional sections of Freshman Composition the departmentally prescribed texts were *The Bedford Reader* (Kennedy, et al., 2011). and *The Bedford Handbook with Writing in the Disciplines* (Hacker & Summers, 2009). In the PLTL modified sections, students also used *The Bedford Handbook* as a foundation for grammar review, but, instead of selections from *The Bedford Reader*, they read the complete texts of classics bearing on moral and ethical issues related to the theme of "The Individual and the State." In the fall 2012 and 2013 semesters the classical readings were *Antigone*, *The Prince*, *Hamlet*, and Thoreau's essay "Civil Disobedience." In the fall 2014 semester, the readings were *Oedipus*, *The Prince*, *Othello*, *and Billy Budd. An important point to note is that this approach does not revolve around one specific text or set of texts. Any texts that powerfully raise ethical themes for thinking critically can be employed.* 

# Peer-Led Team Learning Topics: An Example

For the PLTL sessions, the instructor provided discussion topics related to the ethical themes and concepts under consideration. For example, in conjunction with Thoreau's "Civil Disobedience" one discussion topic concerned the case of Muhammed Ali. Ali, because of his religious and ethical convictions, refused to be drafted into the U. S. Army during the Vietnam War. As a result, he was stripped of his world heavyweight boxing title. Students compared that case with the principles outlined in Thoreau's objections to the Mexican-American War 120 years before.

#### Procedure

Following completion of a consent form, students who attended ENGL 1301—both the PLTL modified and the traditional sections—were asked to write two essays, one at the beginning of the course and one at the end of the course. During the second week of the semester, the students were given fifty minutes during their regularly scheduled class periods to write an essay on their choice of one of six topics provided to them at the beginning of the period:

1. The war on terror has contributed to the growing abuse of human rights.

- 2. People have become overly dependent on technology.
- 3. Censorship is sometimes justified.
- 4. How the changing role of women in today's society influences social and political issues.
- 5. Some say the internet provides people with a great deal of valuable information. Others think access to so much information creates problems. Which view do you support? Use specific reasons and examples to support your opinion.
- 6. Account for the notion or idea that there is a steady deterioration of moral, ethical, and cultural values among young people in today's society.

The process was repeated with the same classes and the same instructors during the final week of the semester. The same six topics were provided at the beginning and end of the semester. A team of instructors using a standard rubric scored essays for writing quality in a blind procedure.

Each modified class was divided into two PLTL groups. These peer-led groups met five times during the semester. The course instructors did not observe any of those sessions, but they supplied students with a list of topics prior to each PLTL session. Then in the sessions, the students discussed the topics among themselves and connected the ethical issues in the literature with events and situations in their lives or in recent history. Each session had a paid student moderator to take attendance, to gently encourage reticent students to participate when appropriate, and to bring the discussion back to the current topic if it digressed. The moderators had instructions not to direct or participate in the discussions. Each moderator provided a written report of attendance and participation to the instructor after each session. Although the reports were informal, they often contained relevant anecdotal evidence of the students' use of critical thinking and reasoning skills.

Instructors collected attendance data in both modified and traditional sections, and students performed evaluations of the courses using the university's standard instrument, the IDEA system (see the Campuslabs reference for further information). Instructors treated and graded students in the PLTL modified and traditional sections comparably and otherwise followed the standard university course schedules.

# **Data Analysis**

1. Using a standardized rubric, two evaluators from the English Department blindly scored the start- and end-of-class essays on a 1 to 4 scale, with 4 being the best score.

2. A third reader intervened when graders disagreed in their scoring by more than one point.

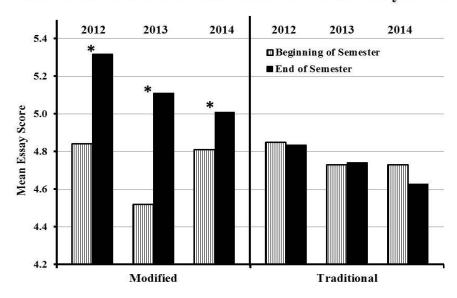
- 3. Scores of 4 and 1 were so clearly defined that unless the third reader agreed with them, they were considered the outliers and omitted from the results.
- 4. Note: the overall score for an essay was the sum of reviewer scores and that is what is shown in Fig. 1 below.
- 5. Disagreements occurred in only 2% of the essays rated.

#### Results

All inferential analyses were performed with SPSS ver. 20 (IBM Corporation). The individual student essay data was evaluated with a Group X Year X Pre-Post ANOVA for mixed designs. The absences and course evaluation data were evaluated on a section basis with a Group X Year ANOVAs. Post hoc mean comparisons employed t-tests with  $\alpha$ =.05.

Writing Ability Results: Pre and Post Essay Comparisons

### Modified vs. Traditional Course Before-After Essay Scores



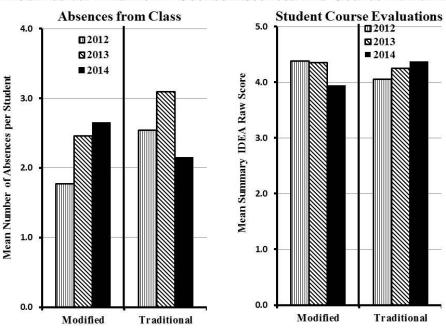
**Figure 1.** Essay scores from the beginning and end of the 2012, 2013, and 2014 fall semesters for the PLTL modified and traditional Freshman Composition courses. The \* indicates statistically significant (p < .05) difference between the beginning and end of semester scores.

The scores on the blind-scored writing samples (essays) obtained at the beginning and end of the semesters for 2012, 2013, and 2014 for both the PLTL modified and the traditional classes are presented in Figure 1. Statistical analysis revealed a significant effect before and

after for the modified classes. There was a significant improvement in the essay scores for the PLTL modified class group while there was no significant change for the traditional class group.

Data on Student Absences and Student Course Evaluations

#### Modified vs. Traditional Course Absences and Course Evaluations



**Figure 2.** Absences (left) and IDEA Scores (right) scores from the 2012, 2013, & 2014 fall semesters for the modified and traditional Freshman Composition courses.

We thought of student absences as a proxy for student engagement, but there was no consistent pattern. The absences from class per student for 2012, 2013, and 2014 semesters for the modified and traditional classes are presented on the left side of Figure 2. ANOVA did not reveal any significant group, year, or group X year interaction effects.

We were also interested in seeing if the difference in course format might make a difference in the student evaluations of the course. The student course evaluation scores (IDEA scores) for 2012, 2013, and 2014 semesters for the modified and traditional classes are presented on the right side of Figure 2. ANOVA did not reveal any significant group, year, or group X year interaction effects. This was a welcome result since we did not want any of the faculty members to suffer in their evaluations as a result of participating in this pedagogical study.

#### Discussion

Gains in Essay Scores from the Beginning to the End of the Semester

The PLTL modified course pedagogy required the allocation of class time to discussion of the ethical issues raised in the classic literature, and that was perhaps more demanding of students than the traditional format. In addition, class time was used for peer-led team learning sessions. In the PLTL modified courses, less time was devoted to formal writing instruction. As a result, one of the primary objectives of the study was to establish that the modified course pedagogy did not diminish the quality of the students' writing. It was hoped that the formal writing of the students in the PLTL modified courses would be at least equal to the writing of the students in traditional courses. Contrary to our apprehensions, the modified course sections in fact resulted in an enhancement of writing ability that was on average greater than that achieved in traditional sections. Better writing appeared to be produced with less formal writing instruction but with an emphasis on reading original texts and on PLTL dialogue.

The improved writing occurred in the PLTL modified courses in the first phase in 2012 in association with higher attendance and course evaluations. But the student writing also improved in 2014 when attendance and course evaluations were lower. This suggests that improved writing produced by the course modifications is independent of student engagement and feelings about the course. This is an important finding because it suggests that the modifications produce valuable changes in student learning regardless of the students' attitudes.

The traditional course sections did not show an improvement in writing ability. Unfortunately, this is a common observation with Freshman Composition courses (Hillocks, 1984; Sanders & Littlefield, 1975) Hillocks has suggested that in order to teach writing effectively, "We must make systematic use of instructional techniques that are demonstrably more effective" (Hillocks, 1984, pp. 164–165). His meta-analysis of the literature suggested that the most effective instruction "brings teacher, student, and materials more nearly into balance" (Hillocks, 1984, p. 160). This appears to be what the PLTL modified courses do.

It will require further research to determine what components of the modified courses were most effective and specifically how those components influence writing ability. Nonetheless, the findings clearly show that the modified approach transforms Freshman Composition courses and markedly improves students' writing.

While we cannot determine which components of the modified course pedagogy were responsible for the improvement in writing ability without further study, there is reason to believe that the peer-led team learning played a significant role. Previous research with STEM courses found significant academic gains for peer learning group members (Bonsangue and Drew, 1995; Dreyfuss, 2002; Johnson and Johnson, 1990; Lyon and Legowski, 2008) and for

group leaders (Micari et al., 2005). Furthermore, research by Deanna Kuhn and her collaborators over several decades has demonstrated the impact of dialogue on children's reasoning abilities and, consequently, improvement in their writing (Crowell and Kuhn, 2014; Kuhn et al, 2016.; Kuhn, 2008); there is reason to believe that the increased focus on discussion and critical analysis of ethical issues raised in the classical literary works played an important role.

As Nosich (2008) argues, to teach critical thinking to students, teachers need to focus less in the formal training or content and focus instead in developing students' abilities to reason and apply critical thinking to answer questions or problems. According to Meyers, teachers of critical thinking will often spend much of their class time as "referees, coaches, and mentors rather than as lecturers and purveyors of the truth..." (Meyers, 1986, p. 39). These findings suggest that not only teachers can fulfill this role, but peers can as well.

It is also possible that the emphasis on the ethical and moral implications of the topics discussed resulted in the students perceiving the course contents as more relevant to their own lives. It is well known that materials perceived as relevant are learned and retained better (Beck and Kosnik, 2014). Finally, it is possible that the more rigorous content challenged the students and improved self-esteem. There were a number of comments from students that they appreciated being treated as intelligent adults. This also could have translated to greater attention to the course contents.

#### **Limitations**

The study results must be interpreted carefully. It was conducted with a single type of class, Freshman Composition, and mostly young, new college students. Although there is a plethora of suggestive anecdotal evidence with other courses and topics, there is no experimentally based empirical evidence of actual efficacy in these other courses. The writing results also need to be interpreted with caution. Only global ratings of the writing quality were used, and it is unclear what aspect of the writing was improved, e.g. clarity of content, structure, spelling and grammar, etc. Finally, it is impossible to conduct such a study blind. Both the instructors and students knew that they were involved in something different from the traditional course. It is possible, though unlikely, that subject expectancy effects or experimenter bias might have crept in to confound the results.

#### Future directions for research

The study needs to be replicated with more in-depth measures of the students' essays to document which aspects of the writing improved. In addition, more extensive measures of critical thinking need to be included to ascertain whether and how critical thinking is improved. Also, a component analysis of the course modifications needs to be performed, removing single components or accentuating them with a greater time commitment (such as

using PLTL) from the protocol and comparing it to the effects of the full implementation. To determine how generalizable the technique is to higher education, the course modifications need also to be rigorously tested in classes from other disciplines, at different levels, with different kinds of students, and at different universities. Finally, follow-up data needs to be collected from the student participants in freshman classes to document the extent to which the effects seen within the class extend beyond to other classes and the student's overall college career.

# Conclusions

These findings are encouraging because, as has been argued by Robert Zemsky (2009), it is increasingly difficult to have an up-to-date knowledge base, given that knowledge is growing exponentially. It is preferable to provide the students with critical thinking and problem-solving skills that will help them acquire and apply new knowledge. The PLTL modified course components seem to offer a viable way of doing so. William Perry (1970/1999) has argued that students arrive at college with a view of knowledge acquisition as empty buckets being filled with data by their professors. It is not until they reach a higher stage of development that they start to comprehend and use reasoned arguments. It seems that the PLTL modified course helped them reach this stage earlier than their peers. This result suggests that this relatively brief exposure to the modified format can lead to attitude and skill development that may be important for the students' future academic success. This also suggests that some relatively simple and inexpensive pedagogical modifications can significantly improve higher education outcomes.

Indeed, our university is so persuaded of the value of this approach that we instituted a cross-disciplinary minor in Applied Ethics and Critical Thinking. In addition to required core courses, a student selects four appropriate courses from Sociology, Political Science, History Philosophy, Psychology, and English. The courses all employ reading of original texts with a focus on ethical issues and the PLTL sessions as part of their design. Because the focus in this article has been on the impact of this pedagogy in Freshman Composition, we would like to extend our account beyond that focus with a testimonial from a Philosophy instructor:

PLTL typically involves scheduling special discussion sections into the course, where students split into smaller groups (12-15 students per group) and meet without the instructor but with a Peer Leader. Peer Leaders are usually reliable, academically mature undergraduates who have taken this or a similar course in the past. Their main responsibility is to take attendance and make notes about how the discussion went, and to report this in the form of feedback to the instructor. Peer Leaders are paid, so funds need to be made available to hire them. But these costs are well worth it. A team at our university gathered evidence of what I have found anecdotally: these sessions increase student enthusiasm about, engagement in, and ownership of their learning in this course;

and student work (especially essays) are markedly better as a result. I have begun to use these sessions for an added benefit, namely, to introduce project-based learning into my courses. For each PLTL session, the instructor typically provides discussion questions, perhaps tied to an extra reading assignment. This semester, I am using these sessions to give students the space to complete the project of identifying, inviting, and hosting an outside speaker from the community who will visit class in the final week of the term.

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