

Polarity Map of Structured and Unstructured Discussions

+ Upper Left	+ Upper Right
Predictable content	Organic flow of content
Consistency in discussion expectations	Flexibility in discussion expectations
Predictability of timing in discussions	Agility to in time choices
Structured Discussions	Unstructured Discussions
Rigidity in content	Ambiguity in content outcomes
Inflexibility in discussion expectations	Vague discussion expectations
Unbending time expectations	Unclear time expectations
- Lower Left	- Lower Right

CURRICULUM & TEACHING STUDIES | RESEARCH ARTICLE Managing the paradoxes of discussion pedagogy

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CURRICULUM & TEACHING STUDIES | RESEARCH ARTICLE

Managing the paradoxes of discussion pedagogy

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Abstract: Discussion pedagogy is part of a larger curricular goal that intersects the two aspirations of diversity of perspectives and democratic inquiry in that it challenges stereotypes and assumptions through student discourse. Yet, teaching with discussion is a complex and sometimes ambiguous endeavor that leaves instructors feeling pulled between desirable, but seemingly contradictory, goals. This article discusses these paradoxes of instructional choices and student outcomes that instructors may negotiate through polarity management, a theoretical framework that focuses on values that are diametrically opposed, yet interdependent upon each other. Implications of polarity management for discussion pedagogy are highlighted.

Subjects: Adult Education and Lifelong Learning; Curriculum Studies; Education; Education & Training; Education Studies; Higher Education; Teacher Education & Training; Teachers & Teacher Education; Teaching Practice - Education

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1. Introduction

Discussion pedagogy may facilitate spaces where students can engage with difficult and opposing ideas as a form of shared inquiry. Discussion is part of a larger curricular goal that intersects the two aspirations of diversity of perspectives and democratic inquiry in that it challenges stereotypes and assumptions through student interactions (Piro & Anderson, in press-a, in press-b). An essential goal of discussion is increased personal understanding of difficult issues through social learning. Discussion pedagogy engages students with issues that surpass the self and connects them with larger societal problems, allowing them to expand their perspectives and increase their worldviews of difficult issues. Discussion may also promote democratic learning spaces in classrooms (Brookfield & Preskill, 2012; Hess, 2009). Darling-Hammond (1996) stated:

America's capacity to survive as a democracy ... rests on the kind of education that arms people with an intelligence capable of free and independent thought ... that helps people to build common ground across diverse experiences and ideas ... that enables all people to find and act on who they are, what their passions, gifts, and talents may be, what they care about, and how they want to make a contribution to each other and the world. (p. 5)

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PUBLIC INTEREST STATEMENT

Teaching with discussion is a complex and sometimes ambiguous endeavor that leaves instructors feeling pulled between desirable, but seemingly contradictory, goals. This article discusses these paradoxes of instructional choices and student outcomes that instructors may negotiate through polarity management, a theoretical framework that focuses on values that are diametrically opposed, yet interdependent upon each other. Implications of polarity management for discussion pedagogy are discussed.









Viewed in this light, discussion pedagogy may help students to navigate taken-for-granted ideas and habits of thought, increasing the potential for connecting dialog and democracy.

Nevertheless, teaching with discussion is a complex and sometimes ambiguous endeavor (Anderson & Piro, 2015). Using discussion pedagogy promotes perturbation, disturbance, and disequilibrium (Doll, 1993) as natural and anticipated outcomes of instruction. Instructors using discussion often feel pulled between desirable, but seemingly contradictory, outcomes for their students: for example, wanting students to participate but also wanting them to learn to listen to others' viewpoints; hoping that they will dialog but also wanting them to pose questions with each other; expecting they will use the text to ground their opinions and also valuing students' personal experiences as they relate to the topic under discussion. Similarly, instructors using discussion must manage instructional paradoxes: focusing on the process of discussion but also having an eye on the possible products of the discussion, such as outside actions or a culminating project; wanting to provide structure to help students understand expectations and increase student engagement and also valuing organic, less structured dialogs that highlight student interest in the topic. These contradictions may be met with a problem-solving stance leading to an either/or consequence, choosing one viewpoint over another. Yet, the paradoxical outcomes and instructional choices in discussion, though opposing, are mutually desirable. In fact, each side of the paradox relies on the other. These types of problems for discussion outcomes and instruction are not really problems. They are polarities, and polarities simply need management.

2. Reconcilable differences: polarities in discussion pedagogy

Organizational theory (Johnson, 1998; Lawrence & Lorsch, 1967; Martin, 2009; Pascale, 1990) demonstrated the limitations of using binary thinking and the value of a more integrative approach in the culture of organizations. A polarity workplace management model, first set forth by Johnson (1992, 1998), suggests that polarities are ongoing issues—ones that are unavoidable and unsolvable. Polarities are often addressed with "problem-solving" skills but rather, polarities need to be managed, not solved like a problem. Problems usually have a right answer. However, to use polarity management, one must move beyond either/or to both/and thinking. A polarity has two or more right answers diametrically opposed, yet interdependent upon each other. Johnson (1998) detailed three generic polarities: part—whole, self—other, and doing—being. A fundamental question to ask when encountering a difficult issue is "Is this a problem we can 'solve' or is it an ongoing polarity we must manage well?" (Johnson, 1998, p. 2)

For example, when teaching a child how to interact with a friend, there are two polar and interdependent values: teaching the child to be concerned about someone else and also teaching to be concerned about herself. Taking care of only one of those poles does not lead to a satisfactory relationship; both are necessary. In a friend relationship, one needs to attend to the friend's needs and one's own, as well (Johnson, 1998, p. 4). Johnson further demonstrated another polarity management model; the example of breathing. The polarities of inhaling and exhaling appear to be opposite functions. Yet, it would be disastrous not to recognize the reciprocal relationship between the body's attempt to collect oxygen and its opposite attempt to rid itself of carbon dioxide. Inhalation and exhalation are paradoxically connected into a whole function—breathing—that cannot persist without both poles.

Functional discussions produce their own sets of paradoxes that must be managed. Laiken (2002) extended the use of polarity management more specifically to discussions and dialogs. She studied the paradox of action and reflection as polarities within work-style differences. Convergent approaches to work are often reinforced by pressures to quickly make decisions and move forward. On the other hand, divergent thinking can help expand the possibilities but "often plays second fiddle to an action orientation" (p. 5). By managing these polarities during discussions with adult learners, she found that balance was achieved between task and process activities and that difference could be viewed in a new way.

During a process of reflecting on our own practice as professors (Piro & Anderson, in press-a), we developed a set of polarities that we identified while using discussion pedagogy in our own graduate-level teacher education courses. Table 1 illustrates 10 key polarities of our discussion pedagogy,



Participating	Witnessing
Dialoguing	Questioning
Scholarliness	Personal experience
Dominant paradigms	Marginalized paradigms
Autonomy	Open-mindedness
Integrity	Fair-mindedness
Relational knowledge	Metacognitive knowledge
Fracturing dissonance	Growth dissonance
Structured	Unstructured
Product	Process

each with its own value and each which is interdependent upon the other. Both sides of the polarities are desirable for effective discussion with students and are further discussed in the sections that follow the table.

2.1. Participating and witnessing

In discussions, there is a polarity between students participating in verbal dialog and witnessing the dialog. This polarity encompasses oppositional student goals to participate by speaking and providing their measured viewpoints and to actively listening in a witnessing modality. Participating in the speaking component of discussion provides a forum for students to advance ideas, and witnessing may lead to expanded perspectives.

2.2. Dialoguing and questioning

Similarly, there is a polarity between the pedagogical goals of wanting students to dialog and to pose questions. Dialogs of student opinions, by themselves, are incomplete. Using varying forms of questioning of their own and other students' expressions is needed, as well. By questioning, students learn to recognize their own and others' limitations in content and in analysis.

2.3. Scholarliness and personal experience

Grounding student dialog in course content and readings by asking students to refer to course content when they dialog is a goal for informed discussions such as a Socratic Seminar. Yet, the value of personal experience within difficult discussions is equally valid.

2.4. Dominant and marginalized paradigms

Within any teacher–student and student–student talk, there are paradigms that are more and less acknowledged by current cultural values. Teachers must find the space to manage student talk within dominant and marginalized paradigms of thought.

2.5. Autonomy and open-mindedness

Instructors hope that students will develop the ability to have rational confidence in their beliefs, values, and inferences, or what might be termed intellectual autonomy (Paul, 1993) while simultaneously encouraging open-mindedness, or the ability to consider new and differing perspectives (Dewey, 1933, 1944).

2.6. Integrity and fair-mindedness

Discussion requires integrity, the realization of the need to be genuine to one's own thinking, and fair-mindedness, awareness of "the need to treat all viewpoints alike, without reference to one's own feelings or vested interests" (Paul, 1993, pp. 16–17). Fair-mindedness may expand intellectual integrity.



2.7. Relational and metacognitive knowledge

Pursuing both relational knowledge, the ability to understand and dialog in contexts with people representing diverse ideas that may differ from one's own perspectives, and metacognitive knowledge, knowledge of one's own thinking, values, and assumptions, are both valid outcomes for students in discussion pedagogy and are, in fact, interdependent outcomes.

2.8. Fracturing and growth

Discussion of difficult topics may increase the likelihood of cognitive dissonance and subsequent growth based upon new ideas and assumptions about the world; yet, that dissonance has the potential of fracturing one's sense of self and taken-for-granted assumptions leading to a rigidity of standpoints about topics. Cognitive dissonance can spur growth and may be an essential component of discussions of difficult subject matter with varied perspectives; teachers must simultaneously be aware that dissonance may create barriers in student learning.

2.9. Structured and unstructured

Organizing discussions to allow input from multiple parties, provide pedagogical variance, and encourage participation from normally silent students are positive interventions for structured discussions. Yet, the value of organic discussions which do not follow strictly structured guidelines and spontaneously move with student interest is a valued process of discussion pedagogy.

2.10. Process and product

The process of the discussion is important; attending to the above polarities within the practice of discussion, allowing for risk, encouraging self-growth and metacognition—each of these processoriented instructional choices make for a functioning discussion. Yet, many instructors also want a culmination to the discussion, perhaps even action based upon the discussion. It is not enough to simply raise consciousness; action culminating from the discussion is valued.

Highlighting the differences between the paradoxes of discussion pedagogy is only a first step and a self-limiting one by itself. Instructors must next map polarities to determine the positive benefits and negative consequences of each pole.

3. Polarity mapping: examples from discussion pedagogy

According to Johnson (1992), polarity management has some essential steps which may be applied to discussion pedagogy. First, identify which components of the discussion are problems to solve and which are polarities. An example of a problem to solve in discussion pedagogy is the choice of topic or the guiding question that initiates the discussion. Instructors must decide which content best suits discussion pedagogy and which questions will intrigue and create interest. Another problem to solve is the form of the discussion. Should the discussion be a Socratic Seminar? An organic whole group discussion? A partner discussion? Which discussionary form best suits the pedagogical needs? This is a problem that instructors must solve prior to the discussion.

Polarities within discussion pedagogy are those values from the previous section which are not problems, though they are contradictions that need to be managed rather than solved. Naming those polarities is a key element of polarity management. The next phase to manage paradox is to create a polarity map (Johnson, 1992). A polarity map provides a visual of the strengths and weaknesses that come from focusing only on each side of the pole. Johnson (1998) stated:

Polarities to manage are sets of positions which can't function well independently. Because the two sides of a polarity are interdependent, you cannot choose one as a "solution" and neglect the other. The objective of polarity management perspective is to get the best of both opposites while avoiding the limits of each. (p. xviii)

Johnson's (1998) point is that each side of a polarity has both strengths and weaknesses. Polarity maps have four quadrants. The upper two quadrants demonstrate the positive outcomes of using the pole.



The bottom quadrants demonstrate the negative outcomes of each pole. Figure 1 demonstrates a polarity map between a structured discussion and one that only values unstructured activities. Figure 2 displays a polarity map between relational learning and metacognitive learning in discussions. The goal of polarity management is to stay in the two upper quadrants when possible (Johnson, 1998, p. 81).

Below, structured and unstructured discussions are mapped. In the upper left quadrant, the positive benefits of using structured discussions are listed. In the upper right quadrant, the positive benefits of using unstructured discussions are given. In the lower left quadrant are the negative consequences of using structure in discussions. In the lower right quadrant, the negative consequences of using unstructured discussions are provided.

In the upper left quadrant of this polarity map, the benefits of using structured discussions are listed. For example, when the content is predictable through instructor planning, assigned common readings, and clear essential questions, the discussion outcomes are also predictable: common content and common guiding questions, leading to student engagement that centers on those collective curricular goals. When students understand their expectations, they know that they are expected to dialog and listen; to put forth opinions based upon the readings and also to listen; to be true to their values and be open-minded to others' opinions. Focusing on expected timing issues in discussions—such as using a timer in jigsaw activities or planning time for both dominant and quiet students to give input through pairing activities—allow breadth of coverage, a diverse representation of individuals within the group, and space for both communal and individual expressions.

A focus on the upper right quadrant, the positives of unstructured discussions, suggests that organic choices, rather than a predetermined structure for content and process, have benefits too. Allowing students to flexibly guide discussions through their own interests and in their own time frame, rather than in a teacher-oriented one, result in natural and spontaneous expressions of opinions within discussion. Outcomes are less predictable and deliberate, but the effect may be one that the instructor had not imagined possible, with creativity, fluidity, and an emergent nature unfound in more structured discourse.

Figure 1. Polarity map of structured and unstructured discussions.

Polarity Map of Structured and Unstructured Discussions

+ Upper Right
Organic flow of content
Flexibility in discussion expectations
Agility to in time choices
Unstructured Discussions
Ambiguity in content outcomes
Vague discussion expectations
Unclear time expectations
- Lower Right



The lower left quadrant represents the negative possibilities of structured discussions: rigidity—such that all content is teacher rather than student-controlled; an inflexibility to the discussion rules, expectations and guidelines leading to a monotonous or overly controlled process with little spontaneity; and a rigidity of time expectations, perhaps by moving students away from undiscussed material before they have mastered it or before their interests suggest a natural change, or before all students have input into the discussion.

The lower right quadrant represents the negative possibilities of unstructured discussions—such as so much ambiguity in outcomes that students come unprepared or are unable to provide a scholarly basis for their opinions—resulting in uninformed discussion expressions or monologues of individual and non-relational thought. Another negative possibility of this quadrant is that students have so little understanding of the expectations that one or a few students dominate the dialog, since they do not understand that they should listen as well as speak or that certain discourses have more power in society than others, resulting in little initiative to actively listen to and engage with alternative perspectives. Similarly, unclear time expectations provide no distinct indicator when the discussion should move to another topic or to another form of the discussion, such as from a whole group to a partner discussion to encourage collective participation by all students.

When instructors are unaware of polarities in instruction, they may focus on only one side of the map, unconsciously limiting the outcomes. In the above map, teachers who value structured discussions may be inflexible in their expectations of student choices on topics for dialog or may be rigid in their expectations because they lack the awareness of organic and less structured discussion outcomes.

Other polarities in discussion outcomes may be mapped. Figure 2 displays a second polarity mapping in discussions: relational and metacognitive learning, a map that was informed by Johnson's (1998) team and individual polarity.

Figure 2. Polarity map of relational and metacognitive learning.

Polarity Map of Relational and Metacognitive Learning

+ Upper Left	+ Upper Right
Connectedness	Uniqueness
Civility in discourse	Personal autonomy
Peer support	Individual creativity
Relational Learning	Metacognitive Learning
Conformity of thought	Isolation in learning
Group think	No focus on civility as an outcome
Loss of individual creativity	No peer support
- Lower Left	- Lower Right



In the upper left quadrant of this polarity map, the relational learning benefits of discussion are listed. A positive element of relational learning is the connectedness and sense of belonging that students acquire through an exchange of ideas in a social context. An additional benefit is the ability to dialog about those difficult and complex issues through respectful but engaging civil discourse, an outcome that is related to democratic pedagogy. Last, peer support for learning through prompts, asking for clarification or depth regarding an issue under discussion, or the actual social learning that occurs from interacting with others are all upper left quadrant benefits.

A focus on the upper right quadrant, the positives of metacognitive learning, suggests that individual learning and consciousness about one's own learning and assumptions are valuable for discussion too. A further benefit is the development of personal autonomy, whereby one clearly understands where he or she stands on issues and is able to use rational discourse to set forth that stance, a skill that may not require a social component to learning. Further, individual creativity unencumbered by group conformity is enhanced through a focus on this quadrant.

The lower left quadrant represents the negative possibilities of relational learning in discussion: the possibility of conformity of thought in group contexts when it becomes the cultural norm not to disagree, or when marginalized discourses are under-valued within a discussion, leading to Group Think (Janis, 1972) at the expense of individual and metacognitive growth. As well, in a relational learning-only context, individual creativity may be lost to conformity.

The lower right quadrant represents the negative possibilities of only individual or metacognitive learning in discussion pedagogy. Intellectual isolation is a good prospect without relational and social learning contexts. As a result of that isolation, it is difficult to build civility and civil discourse as positive outcomes of democratic pedagogy, such as discussion. The individual student relies solely on himself or herself for feedback, greatly reducing the possibility of outside perspectives and cognitive dissonance in a closed feedback loop.

Both of the above polarity maps—structured and unstructured instructional choices in discussions and relational and metacognitive learning through discussions—demonstrate that the contradictions of instructional choices or student outcomes are mutually interactive and achievable. The goal of polarity mapping, according to Johnson (1998), is to attempt to recognize the benefits of both polarities and to purposefully remain in both of the upper quadrants, thereby maximizing the benefits of each polarity. Additionally, by recognizing the negative outcomes of each polarity, as displayed in the bottom quadrants, one can intentionally avoid the consequences. The shift to both/and thinking—focusing on both polarities and also on the positive and negative outcomes for each polarity within the polarity mapping quadrants—allows instructors to negotiate the interdependent poles of using discussion instruction within their classrooms.

4. Suggestions for managing paradoxes in discussion

Teaching with discussion pedagogy is a complex instructional strategy. Instructional choices—such as teaching with a structured or unstructured format, and instructional goals, such as focusing on metacognitive or social and relational learning—are part of polarity management processes that further complicate the pedagogy. We offer some recommendations for using polarity management in discussion pedagogy.

First, reflect upon your own use of discussion. Consider which of the key polarities in discussion pedagogy are more commonly used. Perhaps students have been focused on engaging in dialog and expressing opinions, but have not consistently used self or peer questioning to further the dialog. Or students have been true to their own expressions by demonstrating intellectual integrity, but have not consistently practiced fair-mindedness by treating other opinions with equal measure. Noticing where one emphasizes one polarity over the other is the place to start.



Second, after choosing a polarity to focus upon, create a polarity map for one of the key discussion poles. Determine the positive outcomes for both sides of the polarity. Then, establish the negative outcomes. From this map, create instructional choices that highlight both the upper quadrants of the map. If discussions have typically been structured, purposefully allow an organic discussion with fewer time or content restrictions. Discover the unanticipated outcomes of an unstructured discussion, while mindfully being aware of the negative quadrant outcomes for unstructured discussions, as well.

Next, recognize that using polarity mapping in instruction is process-oriented as well as product-oriented. Allow both instructor and student dissonances as competing polarities are investigated, being mindful of when that dissonance becomes unproductive rather than helpful. It may be useful to revert to more comfortable polarities in discussion pedagogy when dissonance and discomfort become too great. Champion patience for yourself and for students while expanding your repertoire of instruction through polarity management.

Fourth, explicitly teach the polarities of discussion to students. Engaging students in instructional choices may encourage the positive outcomes of polarity mapping. Students may provide informal feedback to the teacher when it is appropriate to switch poles. Polarity mapping may be viewed as a component of complexity theory (Dent, 1999; Ng, 2014), which suggests that learning is complex, consisting of interdependent parts. Polarity mapping in discussion pedagogy helps students to negotiate the spaces between pedagogical choices that appear conflicting, but which are interdependent and promote wholeness in outcomes. By unequivocally modeling polarity management in instruction, the instructor promotes the students' abilities to simultaneously hold opposing viewpoints in perspectives while they continue their investigation of topics, demonstrating inquisitiveness and open-mindedness as part of the outcomes of discussion.

5. Conclusion

The test of a first-rate intelligence is the ability to hold two opposing ideas in mind at the same time and still retain the ability to function. (Fitzgerald, 2009)

When instructors model the processes of managing paradoxes, they accomplish exactly what functioning discussions should achieve. They demonstrate that people from opposing camps can dialog, leading to more holistic mindsets and more complex actions as outcomes. Discussions can be inter-subjective, multi-perspectival, and complex pedagogy when polarity management is purposefully and systematically incorporated into the planning of instructional process and the consideration of student outcomes. Discussions may highlight non-reductionist thought that focuses on whole and part, conscious and unconscious, autonomous and collaborative, scholarly and experiential.

Discussion pedagogy involves an exchange of ideas about conflicting views, beliefs and values among students (Hess & McAvoy, 2014; McAvoy & Hess, 2013; Watt, 2007). While discussion pedagogy is complex, it also affords opportunities for reflection and growth about the paradoxes inherent in the instructional processes and the student outcomes of discussion, rather than viewing the contradictions as problems to get through. Integrative thinking is largely a tacit skill occurring in the heads of people who consciously cultivate management of polarities (Martin, 2009). Polarity management focuses on sustaining contradictions rather than avoiding ambiguity by valuing the paradoxes, rather than ignoring or downplaying them.

Finally, one of the most significant implications of polarity management is its potential for transformative learning (Laiken, 2002, 2013). Transformative learning is "the development of revised assumptions, premises, ways of interpreting experience, or perspectives on the world by means of critical self-reflection" (Cranton, 1994, p. xii). Within a polarity management framework of discussion pedagogy, students have the opportunity to explore their own values, assumptions, and processes as well as contribute within democratic spaces. They are able to manage difference in a new way. With this opportunity, discussion pedagogy enhances integral and holistic mindsets for students.



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