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Linguistic Ethnographic Analysis of Classroom Dialogue

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Abstract

Research on dialogic teaching has focused primarily on structural and cognitive dimensions of classroom discourse and interaction, including, for example, teacher questions, student argumentation, sequential structures, and the distribution of participation. For good reason: such aspects are central to most characterizations of dialogic pedagogy, and they readily lend themselves to systematic observation and quantitative measurement. Nevertheless, more happens in dialogic teaching and learning than is captured in such measures. Students negotiate their own and one another's identities, make sense of lesson content and expectations, manage relationships with peers and teacher, struggle to assert their voices, and find creative ways of passing the time while also staying out of trouble. Likewise, teachers are occupied with managing these student concerns, classroom power relations, and institutional pressures, while also living up to dialogic ideals. Linguistic ethnography offers a powerful set of tools for making sense of such forces and issues, which, though not often studied within research on dialogic pedagogy, critically shape dialogue's processes and outcomes. In this chapter the authors introduce linguistic ethnographic principles; demonstrate their application in the analysis of classroom dialogue, focusing in particular on pupil identities; and discuss the implications of such analysis for thinking about dialogic pedagogy.

Linguistic Ethnographic Analysis of Classroom Dialogue

According to the current conventional wisdom, classroom dialogue that involves students jointly constructing knowledge, exchanging ideas, advancing arguments and critiquing one another's thinking is good for their learning and cognitive development. This conventional wisdom is reflected in practical teaching strategies that form an "emerging pedagogy of the spoken word… that exploits the power of talk to engage and shape children's thinking and learning, and to secure and enhance their understanding" (Alexander, 2008, p. 92). Resnick, Asterhan and Clarke (2015) describe the features of such academically productive classroom talk as follows:

> This kind of talk begins with students thinking out loud about a domain concept: noticing something about a problem, puzzling through a surprising finding, or articulating, explaining, and reflecting upon their own reasoning. Students do not simply report facts they already know for the teacher to evaluate. Instead, with teacher guidance, they make public their half-formed ideas, questions, and nascent explanations. Other students take up their classmates' statements: challenging or clarifying a claim, adding their own questions, reasoning about a proposed solution, or offering a counter claim or an alternate explanation… The key component is the learning power generated by two or more minds working on the same problem together. (pp. 3-4)

Research designed to explore this and similar forms of classroom dialogue has focused primarily on structural and cognitive dimensions of discourse and interaction, including, for example, teacher questions, student reasoning, teacher feedback and the distribution of participation. Such a focus makes good sense – not only are these issues central to most characterizations of dialogic pedagogy, they also readily lend themselves to systematic observation and quantitative measurement.

Nevertheless, more happens in dialogic teaching and learning than is captured in these and related measures. Students negotiate their own and one another's identities, make sense of lesson content and expectations, manage relationships with peers and teacher, struggle to assert their voices, and find creative ways of passing the time while also staying out of trouble. Likewise,

teachers are occupied with managing these student concerns, classroom power relations, and institutional pressures, while also living up to dialogic ideals. While such issues are not often the focus of research on dialogic pedagogy, they critically shape dialogic processes and outcomes.

In this chapter we introduce linguistic ethnography as a useful set of tools for making sense of these and related issues. First, we briefly explain this methodological approach, its assumptions, concepts and methods. Next, we illustrate the application of this approach to the analysis of an episode from a primary literacy lesson, focusing in particular on pupil identity work – that is, the processes through which pupils and teacher attribute identity categories to themselves and each other (we elaborate this sociocultural linguistic approach below). We conclude with a brief discussion of the implications of linguistic ethnographic analyses for understanding and advancing dialogic pedagogy.

Linguistic ethnography

Linguistic ethnography is an umbrella term used to describe a growing body of research, primarily in Europe, which brings together linguistic methods for studying language and discourse data with ethnographic interpretation of cultural practices. The approach is employed to study a range of disciplinary fields and professional contexts, including education, psychology, health, communication, and management (see e.g. Snell, Copland & Shaw, 2015; Tusting, fc). Linguistic ethnography draws upon concepts and methods from multiple traditions in the study of discourse and interaction, including the ethnography of communication, interactional sociolinguistics, conversation analysis, micro-ethnography, social semiotics, and new literacy studies. It has been significantly influenced by linguistic anthropology and shares many of the same theoretical underpinnings (for a discussion, see Rampton, Maybin & Roberts, 2015). However, whilst linguistic anthropology has prospered in North America, in Europe an 'institutionalized linguistic anthropology' (Rampton (2007, p. 594) did not develop.

Linguistic ethnography integrates ethnography's openness and holism (among other advantages) with the insights and rigor of linguistics (Rampton, 2007; Rampton, Maybin & Roberts, 2015). In practice, this means adopting an ethnographic perspective and using ethnographic tools to study everyday practices and social structures, drawing upon anthropological and sociological

theories and research practices (Green & Bloome 1997, p. 183), while also using systematic linguistic analysis to extend ethnographic observation into smaller and more focused spaces, and to examine closely small (but consequential) aspects of social life. In relation to classroom data, linguistic analysis typically involves long, slow immersion in audio- and/or video-recorded data, analysing interaction turn-by-turn, asking at each moment, e.g., 'What is the speaker doing?' 'Why that, now?' 'What else might have been done here but wasn't?' 'What next?' (see Rampton 2006: 395-398 for a description of this 'micro-analytic' approach). By replaying and reanalysing video data, often muted, linguistic ethnographers also focus on nonverbal communicative resources such as spatial configuration, body postures, gesture and gaze. This multi-modal analysis enriches the analysis of spoken discourse, and also brings into view those pupils whose participation in the lesson is less vocal (and who are thus largely absent from the transcript) (Bezemer & Jewitt 2010). These micro- and multimodal analyses reveal the moment-to-moment unfolding in interaction of social stances, roles and relationships, and the creation and recreation of local knowledge, power and identities.

At the same time, by drawing upon ethnographic knowledge of events outside of the immediate interactional here-and-now, linguistic ethnographers contextualize their micro-interactional investigations within the wider practices of the classroom, school and culture, examining the circulation of voices, ideas and discourses circulate between the classroom and other contexts (e.g. the curriculum, policy documents, popular culture, other lessons, and wider discourses about language, education and the social order). As Copland and Creese point out, it is the combination of linguistics and ethnography that "links the micro to the macro, the small to the large, the varied to the routine, the individual to the social, the creative to the constraining, and the historical to the present and to the future" (2015, p. 26).

Linguistic ethnography has been applied to numerous issues around classroom discourse and dialogue, including the implications of social processes and relationships for joint knowledge construction (e.g., O'Connor, 1996; Swann, 2007); the construction of teacher and pupil identities (e.g., Bloome et al., 2005; Castanheira, et al., 2007; Snell & Lefstein, 2018; Wortham, 2006); teacher stance and its implications for pupil authority (e.g., Boyd & Markarian, 2011; O'Connor & Michaels, 1993); teacher and pupil processes of making sense (e.g., Godfrey &

O'Connor, 1995; Kelly, Crawford & Green, 2001; McDermott & Gospodinoff, 1979); the interaction of pupil and teacher cultural resources and the official curriculum (e.g., Duff, 2004; Gutierrez, Rymes & Larson, 1995; Lefstein & Snell, 2011); pupil voice and its realization in classroom discourse (e.g., Maybin, 2006; Park, et al., 2017; Segal & Lefstein, 2016); how educational policy and school contexts shape classroom dialogue (e.g., Aukerman, 2013; Segal, Snell & Lefstein, 2016); and how changes in the broader communicative ecology shape the classroom interactional regime (e.g., Rampton & Harris, 2009).[1]

Linguistic ethnographic analyses of discourse and interaction are grounded in a number of fundamental insights about social interaction, meaning-making and the communicative order. Here we highlight three principles that we find particularly important for the study of classroom dialogue, and their methodological implications:

(1) *Meaning is co-constructed in interaction*. Rather than viewing meaning as residing within individuals' minds, linguistic ethnographers trace the ways in which meaning emerges in the interactional give-and-take, as interlocutors display to one another (and to the analyst) how they are making sense of each other's turns at talk, and then ratify or repair their conversational partners' interpretations (Heritage, 1984). In such a way, meaning is jointly achieved over a series of turns at talk, and therefore can and should be analyzed sequentially, by tracing the process of its turn-by-turn co-construction.

2) *Meaning and interaction are shaped by historical and cultural contexts*. Discourse carries meanings and values associated with the many "contexts in which it has lived its socially charged life" (Bakhtin, 1981: 293). Hence, for example, legal discourse brings to mind lawyers, judges and courts, and the ways of being and believing relevant to them. Therefore, making sense of discourse involves attending to its history, both in general and specifically with regard to the particular social group and situation of its use (Silverstein & Urban, 1996). But which contexts are most salient? Addressing this question requires that we pay close attention to how

[1] Note that not all of the researchers cited here would call themselves "linguistic ethnographers", nor have they all focused on dialogic pedagogy. Nevertheless, we identify their work as broadly aligned with the principles, concepts and methods described, and believe that their insights are valuable for the study of dialogic pedagogy.

interlocuters *contextualize* their interaction (Duranti & Goodwin, 1992). Such contextualization is jointly accomplished by conversational partners through implicitly evoking or explicitly indicating relevant contexts through, for example, their use of language, enactment of identities and roles, knowledge references, or engagement in activities.

3) *We do multiple things when we talk (beyond the exchange of ideas).* We not only use language to convey ideas, we also, while using language for this *referential* function, perform a range of *social* functions. We open lines of communication, negotiate roles and relationships, assert identities, make or extricate ourselves from commitments, take stances, persuade, entertain, pass the time and more. Typically, though not always consciously, we perform many of these and other tasks at once. Hence, analyses of discourse that exclusively focus on its ideational content offer rather narrow views of what participants are doing and what concerns occupy and motivate them.

The complexity and ambiguity of discourse and social interaction captured by these three principles – i.e., the instability and emergence of meaning, its historical and cultural situatedness, and the multiple purposes and dimensions of communication – lead to a general methodological principle to *let our data drive our analysis*. We cannot approach our data without theory: the very act of transforming social life into social science data necessarily involves choices, which are motivated by prior understandings and concepts (i.e., theory). However, our analysis will benefit from treating our discourse data as situated interaction prior to investigating it as an instance of a theoretical construct. In such a way, we put our own theoretical interests into broader perspective – including the perspectives of the participants in the event analyzed – and thereby enrich our understandings of both the event and the theory. Ultimately, we return to and apply our theories to the data, but in this application we strive to use our theories as sensitizing rather than definitive concepts, which 'suggest directions along which to look' rather than 'prescriptions of what to see' (Blumer, 1954: 7). In this way, our encounter with our data can help us to extend or problematize our theory (Burawoy, 1998).

In the spirit of foregrounding data analysis, in what follows we demonstrate linguistic ethnographic analysis and its contribution to understanding classroom discourse, interaction and dialogic pedagogy through exploration of an exchange in a Year 5 literacy lesson.

'I Don't Really Like That, Miss' – an illustration

Ms Leigh is teaching the second of two consecutive lessons on story openers. She has just demonstrated to the class the lesson's key idea and objective – to open their stories by dropping the reader right into the action – and begins to set them the task of working in pairs to act out the opening to their own story in order to think about how to improve it. Before she finishes her instructions, however, she is interrupted by an interjection from William: "Miss, I don't really like that. I- I sort of like a bit of talk before it'. William's challenge leads to a relatively dialogic, six-minute discussion of the merits of various ways of opening stories. In what follows we explore this six-minute segment, first as an instance of dialogic teaching and pupil reasoning, and then as an opportunity to illustrate the sort of issues that can emerge in a linguistic ethnographic analysis.

First, a bit of background about how we happened to be video-recording the lesson. Ms Leigh and her colleagues at Abbeyford Primary School (all names are pseudonyms) collaborated with us in *Towards Dialogue*, a research project that investigated processes of continuity and change in classroom discourse. In this study, a group of teachers experimented with dialogic pedagogy and reflected with us on video-recorded episodes from their lessons. The project, and indeed this particular episode, are described in detail in Lefstein and Snell (2014); here we briefly touch on some key points to illustrate linguistic ethnographic analyses.[2]

This episode stood out to us for a number of reasons. First, William's challenge was a rather exceptional event – English pupils rarely challenge their teachers so explicitly – which produced the sort of cognitive tension necessary for productive dialogue. Second, in the wake of William's challenge the class critically consider a number of texts and literary ideas in a 'dialogic spell'

[2] This episode is the focus of chapter 5, which also includes commentaries by Robin Alexander, Gemma Moss, Greg Thompson and Laura Hughes. A video of the episode may be viewed at https://youtu.be/t97xdo0sBD8. The full transcript is available at http://dialogicpedagogy.com/episode-2-i-dont-really-like-that-miss/.

(Nystrand, et al., 1997) rich with further challenges, clarifications, elaborations and joint knowledge construction; we sensed this intuitively at the time, and were able to confirm it months later after we coded this and other lessons for key indicators of dialogic discourse (types of questions and feedback, the extent of pupil participation, etc.). Third, the sequence also poses numerous dilemmas for the teacher, making it an ideal episode for exploring the complexities of dialogic teaching.

We briefly describe the episode before proceeding to its analysis. The event can be roughly broken up into six stages:

1. An effective story opener? (lines 1-64)

Ms Leigh directs two pupils, Rachel and Terry, to model the drama activity she intends to assign to the class. At Ms Leigh's direction, Rachel acts out while Terry narrates two ways of opening a story. The first sentence is unexciting ('I was walking down the road one day') and thus elicits lacklustre actions from Rachel. Rachel enacts the second sentence, ''Oh no it's a tornado' she shouted and ran", more dynamically. Ms Leigh explains to the pupils that this opening is more effective because 'we drop ourselves *right* in the action to start off with and we have some speech there as well'. One pupil, William, challenges this method of opening a story:

33	William:	miss I don't really like (.) that
34		I- I sort of like
35		a bit of talk before it
36	Ms Leigh:	well it depends on how you want to start your
37		story
		doesn't it
38	William:	*((nodding))* (yeah)
39	Ms Leigh:	so you could have-
40		you mean talk as the narrator
41		or talk as the actors
42	William:	no the narrator

2. *An alternative story opener (lines 65-122)*

Ms Leigh asks William what he would do instead to start his story. She says that she's heard Ms Forester (the class Learning Support Assistant) and Terry talking about how they're *not* going to start their story and raises the challenge of whether William will begin his story in this way. William says that he "wouldn't start it like, drop it straight in the action with the first line", rather he would "have a bit of narrator talk to tell you what's going on, and the characters and where you are and that, and then get into the action". Ms Leigh summarizes William's approach as "start[ing] off at the bottom of the story mountain with the narrator directing the action", and asks him for an example. William reads aloud the beginning of his story: "loads of people think nothing's going to happen as they go into a tunnel".

To provide a contrast to William's story opener, Ms Leigh reaches behind her and picks up a novel, *The Fall* (Nix, 2000), which happens to be on her desk. She reads out the dramatic beginning to this story, which indeed drops the reader directly into the action: 'Tal stretched out his hand and pulled himself up onto the next outthrust spike of tower'. By using this book, Ms Leigh demonstrates how much more exciting it is to begin a story right in the middle of the action (compare William's 'loads of people thing nothing's going to happen as they go into a tunnel'). William sticks to his original position, however, by suggesting that sometimes books begin with 'a little paragraph before' the main opening (lines 108-109). Another pupil, Harry, calls this 'a prologue' (line 116). Ms Leigh elaborates, 'so that [a prologue] would help you to have your narrator voice'.

3. *'I really want to know what happens next' (lines 123-161)*

Ms Leigh then encourages Ms Forester, the Learning Support Assistant, to contribute to the discussion: 'I just want to go back to what your conversation- because you're getting a bit twitchy here Ms Forester. Why are you twitching?'. Ms Forester is 'twitching' because her interest has been piqued in the novel after hearing the first sentence that Ms. Leigh read aloud. She tells Ms Leigh and the class, 'I really want to know what happens next'. Ms Leigh wonders about her response to William's story opener, but Ms Forester cannot "even remember" it:

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143  Ms Leigh:     [what did you want to know from William's story
144                [((William signals towards Harry? Harry takes his
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145 *hand down))*
146 (2)
147 Ms Forester: I can't even remember what his-
148 what was the beginning William
149 tell me [again
150 William: [erm
151 many people go to a tunnel
152 thinking nothing's going to happen
153 *((Harry raises his hand))*
154 Flynn: [well yeah because you want to know what's (xxxxx)
155 Ms Forester: [well that happens every day
156 [I go into a tunnel thinking nothing's going to happen
157 Harry: [*((Raises hand))*
158 William: but then
159 Ms Forester: that's quite normal
160 William: but then (.) and then
161 Ms Forester: Hmmm

4. *Dramatic narration (lines 162-185)*

Building upon Ms Forester's response, Ms Leigh demonstrates how William could develop his idea to open his story with narration by adding some foreshadowing:

162 Ms Leigh: so what we need to do is see if we can develop that
163 [a little bit more
164 Flynn: [or xxxxxxxxxxxxxx)
165 Ms Leigh: well we could maybe have a hint from the narrator
166 earlier that there might have been something
167 that had go-
168 you know
169 *((dramatically))* the tunnel had recently been
170 repaired
171 from the tragic accident that had killed
172 a bus load full of school children
173 (1)

174 as usual William and his father
175 went through thinking
176 nothing was going to go wrong
177 *((normal voice))* and then you've got a hint that oh
178 there's already an accident

5. *Introduction of another text (lines 186-307)*

After her dramatic reformulation of William's opening, Ms Leigh invites Harry, who has raised his hand persistently throughout the episode, to contribute. Harry introduces another text, *Necropolis* (Horowitz, 2008), into the discussion. Harry read this book outside school and enjoyed it so much that he lent it to Ms Leigh. Harry seems to suggest that Ms Leigh's reformulation of William's story is like a scene from *Necropolis,* in which the protagonist is almost run over by a 'massive van'. Harry does not specify in what ways these two texts are similar (beyond the fact that both include a road accident), but Ms Leigh uses his comments to reinforce the point that the author is giving the reader just a hint of danger, an idea that she then applies to William's story, inventing another way in which William could lead the reader to think that something bad may happen.

6. *Another attempt at beginning the task is thwarted* (308-337)

After further interaction between Harry and Ms Leigh related to *Necropolis*, Ms Leigh attempts to bring the discussion to a close so that pupils can get on with their task: 'right, I'm actually going to stop you there because otherwise we're not going to have time' (lines 308-309). But William poses another challenge: 'well something sort of goes wrong [in Necropolis] in that the truck's about to hit her' (lines 321-322). This prompts Ms Leigh to further clarify what 'suspense' means, illustrating the concept with a familiar example: "if I stand behind you, and you're talking and doing something you shouldn't be, all of a sudden you kind of get that aahhh feeling, 'she's behind me'. And the hairs on the back of your neck stand up. That's what we mean by suspense: we're waiting for something to go wrong".

Dialogue and reasoning

This episode is particularly rich in the sort of academically productive interactions we associate with dialogic pedagogy: the pupils and teacher challenge one another (e.g., William's "I don't

like that, Miss" and Ms Forester's "that happens every day… that's quite normal"); they probe one another's ideas (e.g., "you mean talk as the narrator or talk as the actors?"); clarify and elaborate their ideas (e.g., "but then… and then…"); build upon one another's ideas (e.g., Harry's introduction of the idea of a prologue, which is then taken up by William); and weave together academic and everyday concepts (e.g., "that's what we mean by suspense: we're waiting for something to go wrong"). They also bring together and explore multiple texts in order to develop their ideas (the texts acted out by Rachel and Terry, multiple versions of William's text, *The Fall, Necropolis*).

To quantify the density of these phenomenon, we coded the episode using the Cambridge Discourse Analysis Scheme (CDAS), thereby allowing us to compare this episode to a diverse national sample of 72 lessons (Vrikki et al., 2018).[3] Select results of this exercise appear in Table 1.

- Insert Table 1 approximately here –

The episode indeed scores relatively high on reasoning moves, and particularly high with regard to elaborations, in which participants clarify, build upon or elaborate their own or other's contributions; querying, in which participants challenge, disagree with, or cast doubt upon another's statement; and referring to ideas from outside the school context. However, while such an analysis of reasoning moves can give us a rough indication of the extent to which participants are exchanging and exploring ideas, it gives us a rather partial account of what is happening in the episode. In what follows we illustrate this point through an examination of the ways in which the pupils and teacher manage their identities and relationships as they reason about the texts and story openers.

Managing identities and relationships

Wortham (2006) argues that students and teachers engage in identity work while at the same time making sense of academic content: learning and identity processes are intertwined. Identity, in this view, is the way an individual is recognized by themselves and others as a certain 'kind of

[3] We would like to thank Elisa Calcagni for guidance on using CDAS, and indeed for checking our coding.

person' (Gee, 2000, p. 99), for example, 'a white working class boy', a 'quick learner', 'good at math' or 'learning disabled'. Identities are co-constructed in interaction, as participants attribute identity categories to themselves and to others, assert their membership in particular groups, affirm or contest others' identifications, and otherwise work to construct and maintain their own and others' identities. Such identity work can involve explicit identifications ("he's so smart") or more subtle cues, such as speaking in an academic register to identify oneself and one's interlocuters as highly educated. Note that, in this sociocultural linguistic approach, identities emerge in interactional processes and are therefore 'social and cultural rather than primarily internal psychological phenomenon' (Bucholtz & Hall, 2005). In line with this approach, we see the issue of who participates in classroom discourse and in what ways as being consequential for pupil identities and learning.

Drawing on our ethnographic participant-observation in Ms. Leigh's classroom, we know that the two key pupil-participants in the focal episode – William and Harry – were confident, outgoing, popular with their peers and often at the center of classroom discussion (they were mentioned by name in field notes for 12 of the 13 lessons we observed in Ms. Leigh's classroom). These boys were often given special status in classroom activities (e.g., acting as team captains), and they were always among the first to volunteer for role-play and other kinds of classroom performances. In the episode, we see how their identities as strong pupils with authoritative voices are co-constructed in interaction; they are a product of the boys' own behaviour and the ways in which they are identified by others. The most obvious example is William's challenge to the teacher on line 33. Ms Leigh had set out her preferred model of story opening (dropping the reader in the action), which was to act as a model for the pupils' next task. We see traces of the original lesson plan in Ms Leigh's initial response to William's challenge, in which she quickly moves to incorporate his comments within her predefined aims and structure. However, she stops herself mid-sentence in order to request clarification from William: 'you mean talk as the narrator or talk as the actors?' (lines 40-41). At this point, it is evident that she is making space for William's challenge, and she fully commits to this when she asks Rachel and Terry to sit down on line 63, and gives William the green light to continue, asking 'what would you use to start off with- your story then, William?' (65-66). In this line of questioning, there is not only a presupposition of pupil competence, but also of accountability – William is positioned with

responsibility for clarifying his ideas and for contributing to others' thinking (Greeno, 2002, p. 5). Thus, William's challenge, and importantly, his teacher's uptake of this challenge, not only gives rise to the cognitive tension necessary for productive dialogue, it also reinforces William's identity as a competent and authoritative student. Note that our focus here (and throughout the episode) is on the meaning that emerges in the interactional give-and-take, rather than on the intentions or actions of teacher or pupil on their own.

Ms Leigh continues to interrogate William's ideas. On lines 70-73, the test is whether or not William will start his story in the way that Ms Forester and Terry have already decided that they would *not*. Ms Leigh says, 'because I've just overheard Ms Forester and Terry having a conversation about how they're *not* going to start their story. Let's see if he does it'. Ms Leigh, Ms Forester and Terry all share knowledge to which William is not privy, but William does not appear threatened by this. He simply gives his own example of a story opening. On line 143, Ms Leigh invites Ms Forester to compare William's opening with another story, this time a published novel that she had read over the Christmas holiday. Ms Forester reveals that she 'can't even remember' what William's story opening was (even though he read it out loud only a few seconds earlier). The comparison clearly does not work in William's favour, but he is unfazed.

Not only is William able to withstand challenges to his own thinking, he also interrogates the ideas of others. In lines 292 and 321-322, for example, William challenges Harry's assessment of the opening to the book *Necropolis* (which Harry had introduced into the discussion on line 186). Harry had said earlier (on lines 223-227) that nothing actually goes wrong in the scene he recounted because the character of Scarlet is saved from being run over, but William contests this on two occasions ('something sort of goes wrong in that the truck's about to hit her'), even reintroducing the topic on lines 314-324 after Ms Leigh had made an explicit attempt to shut the conversation down. In doing so, William reinforces his identity as a confident pupil, who is entitled to speak even after the teacher has decided to move on, while also pushing forward the discussion of suspense and foreshadowing that runs through the interaction (by prompting Ms Leigh's explanation on lines 323-336).

Harry also asserts his dominance in the episode. When he introduces *Necropolis* for the first time (on line 186), he claims coherence by prefacing his utterance with 'Miss it's like…', thus suggesting that his comment relates directly to Ms Leigh's dramatic reformulation of William's story (on lines 165-182). But the reference of Harry's 'it' is ambiguous. Is he making a comparison between the opening to Necropolis and Ms Leigh's retelling of William's story? Or does his comment refer further back to Ms Leigh's initial point that a good sentence opener drops the read right in the action (lines 30-32), for this is how *Necropolis* begins: 'The girl didn't look before crossing the road.' Either way, it's important to keep in mind that the other pupils have not read *Necropolis*; thus Harry's contribution moves the discussion away from the common ground of William's story and towards Harry's own literary preferences. In trying to understand this new turn in the discussion, we must again reflect on the social (as well as ideational) aspects of the talk. *Necropolis* is a book that Harry had read and had then lent to Ms Leigh. Similarly, the holiday reading (*The Fall*) that Ms Leigh introduces on line 100 was given to her by Harry. These texts are thus not only materials for exploring issues related to suspense and foreshadowing, but also a means through which Harry can signal his privileged position in the classroom as a pupil who shares books with the teacher. Ms Leigh and Harry's shared interpretation of *Necropolis* (239-273) further reinforces Harry's identity as an advanced reader and connoisseur of novels.

In summary, Harry and William are identified (and identify themselves) as competent and productive members of the classroom community and are encouraged to exercise "productive agency in their learning" (Greeno, 2002: 6). They open up the discussion of story writing to include multiple texts and conflicting voices, and in doing so, prompt sustained dialogue on the topics of suspense and foreshadowing. But to what extent could other pupils follow the complex layering of texts and ideas in this discussion? And to what extent are William and Harry themselves distracted by social concerns, compromising their understanding of the key issues? These two boys were friends but also keen competitors in the classroom, and this competition may have motivated at least some of their contributions. For example, when William hesitates on line 67, Harry immediately raises his hand and enthusiastically signals that he wishes to contribute. He puts his hand down only when the teacher says his name on line 100, and thereby shifts the focus onto him (and away from William), through the holiday reading. When William

begins to speak on lines 108-109, Harry again raises his hand vigorously, competing for the floor. Equally, when Harry moves onto centre stage with the discussion of *Necropolis*, William begins bidding for the floor, raising his hand on line 231 and only lowering it one minute later, when he has the opportunity to contradict Harry's earlier interpretation of the book's opening, which is that "nothing does go wrong, a man saves her" (lines 224-226). Here, and again on lines 321-323, William insists that "something sort of goes wrong". Even though William has not read the book, he challenges Harry's interpretation, which makes us wonder if perhaps William is more concerned with undermining Harry than with the substantive issues under discussion (see Swann, 2007, for another example of the use of ostensibly dialogic moves to pursue social purposes).

Some implications of linguistic ethnographic analysis for understanding dialogic pedagogy

We used the analysis of the story openers discussion to illustrate a linguistic ethnographic approach to working with classroom interactional data. We demonstrated how teachers and pupils used language and communication to perform social alongside referential functions – for example, asserting identities and managing relationships while also challenging, elaborating, and reasoning about ideas and texts. We also showed that social relations and identity issues critically shaped who participated in the episode, their positions in the discussion, their access to relevant epistemic resources (e.g., knowledge of the texts being discussed), and these factors shaped the unfolding discussion. Reasoning and knowledge construction were of course central to the episode, but provide a rather limited and perhaps even distorted view of what engaging in dialogue involves. Participating in dialogue involves formulating ideas and arguments, but also, and at the same time, navigating a complex and delicate social field. Moreover, the sort of dialogic teaching and learning we particularly value, that which is characterized by mutual challenge, disagreement and critique, intensifies the social risks and sensitivities.

We focused primarily on identity work. Identity work is important for learning. Pupils who feel competent and authorized to contribute are better motivated to participate constructively in classroom dialogue. Conversely, pupils who feel incompetent, unappreciated or alienated are unlikely to be motivated or even available to engage in learning. Dialogic pedagogies, in particular, have complicated implications for classroom identity work. On the one hand, they

call for an inclusive, egalitarian, and caring environment, but on the other hand they emphasize cognitive challenge and give prominence to pupils' authoritative voice and accountable participation. Taken together, these dialogic imperatives encourage teachers to draw reluctant or perceived "low ability" pupils onto a challenging classroom stage, on which their performance may be found wanting. In the episode we analysed here, the classroom dialogue publicly identified William and Harry as articulate and competent. Elsewhere in our data-set, similar pedagogical practices and expectations publicly identified other pupils as inarticulate and incompetent (we explore this issue in detail in Snell & Lefstein, 2018).

By considering multiple dimensions of classroom activity (i.e., the content of discussion alongside social dynamics, power relations, communicative channels, language use, cultural and epistemic resources, spatial organization, etc.), a linguistic ethnographic perspective can highlight the multiple and competing demands dialogic pedagogy places upon the teacher, and the dilemmas that arise as a result. For example, on the one hand, part of what makes the story opener episode dialogic is the sustained interaction between the teacher and just a small number of confident and enthusiastic pupils – with the rest of the class in the role of relatively passive observers. If Ms Leigh had attempted to open out the discussion to include all members of the class, the dialogic spell would likely have dissipated. On the other hand, if pupils not involved in centre stage talk feel excluded from classroom discourse, they may come to see themselves as less competent students and become disengaged from their learning. Likewise, we were impressed by how Ms Leigh made space for pupil voices and especially their heterodox ideas. Such respect for voice is a central dialogic value. However, pursuing William and Harry's ideas – and texts – amplified the complexity and manageability of the discussion, threatened topical coherence and undermined the original goal of the lesson.

By raising these issues, we are not suggesting that Ms Leigh should have acted differently, but rather that dialogic teaching is highly complex work, which requires sensitivity and judgement. Though not their intended use, coding schemes can advance a "best practice" approach to dialogic pedagogy (i.e., a higher score implies better teaching). A linguistic ethnographic perspective reminds us that teaching and learning through dialogue involves trade-offs: "dilemmas, not deficits" (Alexander, 2004: 25).

In conclusion, we should clarify that, though it has been rhetorically expedient to set linguistic ethnographic analysis against discourse coding, we see both methodologies as playing important roles, and indeed as complementary. Coding is critical for quantifying variables, for managing a large data set and for identification of trends across multiple lessons, teachers and schools. It can also help guide the selection of episodes for detailed micro-analysis. Linguistic ethnographic analysis can help in the interpretation of quantitative findings: clarifying codes' situated meanings (including, for participants), exploring anomalies, and offering a multi-dimensional and holistic understanding of the complexities of classroom dialogue.

References

Alexander, R. J. (2004). *Talk for Learning: The Second Year*. North Yorkshire County Council.

Alexander, R. J. (2008). *Essays on pedagogy*. London: Routledge.

Aukerman, M. 2013. "Rereading Comprehension Pedagogies: Toward a Dialogic Teaching Ethic That Honors Student Sensemaking." *Dialogic Pedagogy: An International Online Journal* 1: A1–A31. http://dpj.pitt.edu doi:10.5195/dpj.2013.9.

Bakhtin, M. M. (1981). *The dialogic imagination: four essays*. Austin: University of Texas Press.

Bezemer, J. and Jewitt, C. (2010) 'Multimodal analysis', in L. Litosseliti (ed), *Research Methods in Linguistics*. London: Continuum. pp: 180-197.

Bloome, D., Carter, S. P., Christian, B. M., Otto, S., & Shuart-Faris, N. (2005). *Discourse analysis & the study of classroom language & literacy events: a microethnographic perspective*. Mahwah, N.J.: L. Erlbaum Associates.

Blumer, H. (1954). What is Wrong with Social Theory? *American Sociological Review, 19*(1), 3-10. doi:10.2307/2088165

Boyd, M. P., & Markarian, W. C. (2011). Dialogic teaching: talk in service of a dialogic stance. *Language and education, 25*(6), 515-534. doi:10.1080/09500782.2011.597861

Bucholtz, M., & Hall, K. (2005). Identity and interaction: a sociocultural linguistic approach. *Discourse Studies, 7*(4-5), 585-614. doi:10.1177/1461445605054407

Burawoy, M. (1998). The extended case method. *Sociological Theory, 16*(1), 4-33.

Castanheira, M. L., Green, J., Dixon, C., & Yeager, B. (2007). (Re)Formulating identities in the face of fluid modernity: An interactional ethnographic approach. *International Journal of Educational Research, 46*(3), 172-189. doi:https://doi.org/10.1016/j.ijer.2007.09.005

Copland, F. & Creese, A. (2015). *Linguistic ethnography: collecting, analysing and presenting data*. Los Angeles: SAGE.

Duff, P. A. (2004). Intertextuality and hybrid discourses: The infusion of pop culture in educational discourse. *Linguistics and Education, 14*(3-4), 231-276.

Duranti, A., & Goodwin, C. (1992). *Rethinking context: language as an interactive phenomenon*. Cambridge: Cambridge University Press.

Gee, J. P. (2000). Identity as an analytic lens for research in education. *Review of Research in Education, 25* (1), 99–125.

Godfrey, L., & O'Connor, M. C. (1995). The vertical hand span: Nonstandard units, expressions, and symbols in the classroom. *The Journal of Mathematical Behavior, 14*(3), 327-345. doi:10.1016/0732-3123(95)90014-4

Green, J. L., & Bloome, D. (1997). A situated perspective on ethnography and ethnographers of and in education. In S. B. Heath, J. Flood, & D. Lapp (Eds.), *Handbook for research in the Communicative and Visual Arts*. New York: Macmillan.

Greeno, J. G. (2002). *Students with competence, authority, and accountability: Affording intellective identities in classrooms*. New York, NY: The College Board.

Gutierrez, K., Rymes, B., & Larson, J. (1995). Script, Counterscript, and Underlife in the Classroom - Brown, James Versus Brown V Board-of-Education. *Harvard Educational Review, 65*(3), 445-471.

Heritage, J. (1984). *Garfinkel and Ethnomethodology*. Cambridge: Polity Press.

Horowitz, A. (2008). *Necropolis*. London: Walker Books.

Kelly, G., Crawford, T., & Green, J. (2001). Common Task and Uncommon Knowledge: Dissenting Voices in the Discursive Construction of Physics Across Small Laboratory Groups. *Linguistics and Education, 12*(2), 135-174. doi:10.1016/s0898-5898(00)00046-2

Lefstein, Adam, & Snell, Julia. (2011). Promises and Problems of Teaching With Popular Culture: A Linguistic Ethnographic Analysis of Discourse Genre Mixing in a Literacy Lesson. *Reading Research Quarterly, 46*(1), 40-69.

Lefstein, A., & Snell, J. (2014). *Better than best practice: developing teaching and learning through dialogue*. Abingdon: Routledge.

Maybin, J. (2006). *Children's voices: talk, knowledge, and identity*. Basingstoke: Palgrave Macmillan.

McDermott, R. P., & Gospodinoff, K. (1979). Social context for ethnic borders and school failure. In A. Wolfgang (Ed.), *Nonverbal behavior: applications and cultural implications* (pp. 175-195). New York: Academic Press.

Nix, G. (2000). *The Fall*. New York: Scholastic.

Nystrand, M., Gamoran, A., Kachur, R., & Prendergast, C. (1997). *Opening dialogue: understanding the dynamics of language and learning in the English classroom*. New York: Teachers College Press.

O'Connor, M. C. (1996). Managing the intermental: Classroom group discussion and the social context of learning. In D. I. Slobin, J. Gerhardt, A. Kyratzis, & J. Guo (Eds.), *Social interaction, social context and language* (pp. 495–509). Hillsdale: Lawrence Erlbaum.

O'Connor, M. C., & Michaels, S. (1993). Aligning academic task and participation status through revoicing: Analysis of a classroom discourse strategy. *Anthropology & Education Quarterly, 24*(4), 318-335.

Park, J. Y., Michaels, S., Arancibia E., Diaz Lembert, D., Dimanche, S., Moon, A., & Sanchez, K. (2017). Poetry Inside Out as multiliteracies pedagogy: An inquiry by youth researchers and university researchers. In F. Serafini & E. Gee (Eds.), *Remixing multiliteracies: Theory and practice from New London to new times* (pp. 62–73). New York: Teachers College Press.

Rampton, B. (2006). *Language in Late Modernity: Interaction in an Urban School.* Cambridge: Cambridge University Press.

Rampton, B. (2007). Neo-hymesian linguistic ethnography in the United Kingdom. *Journal of Sociolinguistics, 11*(5), 584-607.

Rampton, B., & Harris, R. (2010). Change in urban classroom culture and interaction. In K. Littleton & C. Howe (Eds.), *Educational dialogues: understanding and promoting productive interaction* (pp. 240-264). Abingdon, Oxon: Routledge.

Rampton, B., Maybin, J., & Roberts, C. (2015). Methodological foundations in linguistic ethnography. In J. Snell, S. Shaw, & F. Copland (Eds.), *Linguistic ethnography: Interdisciplinary explorations* (pp. 14-50). London: Palgrave.

Resnick, L. B., Asterhan, C. S. C., & Clarke, S. N. (2015). *Socializing intelligence through academic talk and dialogue*. Washington, DC: American Educational Research Association.

Segal, A., & Lefstein, A. (2016). Exuberant, voiceless participation: An unintended consequence of dialogic sensibilities? *L1 Educational Studies in Language and Literature, 16*. doi:10.17239/l1esll-2016.16.02.06

Segal, A., Snell, J., & Lefstein, A. (2017). Dialogic teaching to the high-stakes standardised test?. *Research Papers in Education*, *32*(5), 596-610.

Silverstein, M., & Urban, G. (1996). *Natural histories of discourse*. Chicago: University of Chicago Press.

Snell, J., & Lefstein, A. (2018). “Low Ability,” Participation, and Identity in Dialogic Pedagogy. *American Educational Research Journal, 55*(1), 40-78. doi:10.3102/0002831217730010

Snell, J., Shaw, S., & Copland, F. (2015). *Linguistic ethnography: interdisciplinary explorations*. Houndmills, Basingstoke, Hampshire ; New York, NY: Palgrave Macmillan.

Swann, J. (2007). Designing ‘Educationally Effective’ Discussion. *Language and education, 21*(4), 342-359.

Tusting, K. (forthcoming). *The Routledge Handbook of Linguistic Ethnography.* Routledge.

Vrikki, M., Wheatley, L., Howe, C., Hennessy, S., & Mercer, N. (2018). Dialogic practices in primary school classrooms. *Language and education*, 1-19. doi:10.1080/09500782.2018.1509988

Wortham, S. E. F. (2006). *Learning identity: the joint, local emergence of social identification and academic learning*. New York, NY: Cambridge University Press.

Table 1. Contrasting the episode with a national sample vis-à-vis occurrences of discourse moves associated with dialogic pedagogy

Codes[a]	Mean occurrences per lesson in Vrikki and colleagues' national sample (standard deviation)	Occurrences in "story openers" episode (extrapolated to full lesson[b])
Elaboration invitations	29.18 (17.66)	28.64
Elaboration	77.78 (37.2)	190.94[c]
Reasoning invitations	18.54 (13.9)	28.64
Reasoning	53.46 (20.89)	85.92
Querying	18.04 (12.88)	47.74[c]
Reference back	6.09 (6.37)	9.54
Reference to wider context	4.02 (4.69)	85.92[c]

Notes:

[a] Code definitions can be found in Vrikki et al. (2018).

[b] To correct for episode duration we multiplied the frequencies by 9.547 (extrapolating to a full 65.4 minute lesson from the 6.85 minute episode).

[c] The value is more than two standard deviations higher than the average value in the national sample.