

## **Lesson study in initial teacher education: students' positioning analysed through the lens of Figured Worlds**

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This paper considers how lesson study (LS) can be used to support professional development in initial teacher education (ITE). The concept of Figured Worlds is used to analyse the student teachers' positioning in relation to various 'figures' e.g. the school-mentor and university tutor involved in the lesson study process. Findings will aid reflection on how best to employ lesson study in initial teacher education. I argue that teachers who have trained through lesson study might be able to challenge accepted practice. In this particular case the experience seems to allow student teachers to position themselves as teacher-researchers who are able to develop practice through reflection.

**Keywords: lesson study; initial teacher education; Figured World**

### **Introduction**

Preparing to become a teacher is a demanding task that requires the development of many skills. Here I analyse how lesson study (LS) can be used to support student teachers' professional development. Despite the fact that the literature suggests that transmissionist professional development experiences have no effect on teacher development and student outcomes while professional development models that are collaborative, and centered on practice are more suited to creating opportunities for renewal, many models available to teachers still focus on telling teachers what to do (Flint, Zisook, & Fisher 2011). The lesson study model can be used with trainee teachers in order to allow them take an active approach to their professional development and see themselves as experts who can tackle challenges. LS is a professional development tool for teachers that originated in Japan. In the LS cycle teachers collaboratively plan a lesson, observe, and then analyse, reflect and discuss these observations in a post lesson discussion (Fernandez and Yoshida, 2012). The purpose of LS is not to produce the perfect lesson but to collaboratively reflect on a particular issue, agreed by the participants, in order improve pedagogy (Archer, 2016), so that learning happens during the planning stages of the lesson and the post lesson discussions as well as during the lessons itself. The lesson is considered a research lesson since participants collect data (in the form of student responses) and analyse it during the post lesson discussion. In the last 10 years LS has become increasingly popular internationally, especially in the UK and US, and various models and interpretations have developed (Radovic, Archer, Leask, Morgan, Pope, & Williams 2014).

During the academic year 2012–13, a cohort of roughly 50 postgraduate students in the north-west of England, all studying to become secondary mathematics teachers (we will refer to them as trainee teachers here), were involved in LS as part of the university component of the course. Subgroups of trainee teachers visited 5 different schools accompanied by their university tutor and supported by school teachers. The trainee teachers were involved in planning and either observing or

teaching a lesson; after the lesson they worked on analysing and reflecting on observations, and later re-teaching. The tutors/researchers observed the planning, teaching and post-lesson analyses. The experience was very different across the 5 schools and in particular the involvement of school teachers varied considerably across the schools. Some teachers taught the lessons (that the trainee teachers had planned) while others acted only as observers.

I report here on this experience, using Holland, Lachicotte, Skinner & Cain (1998) concept of Figured Worlds and try to answer the research question: how do trainee teachers position themselves with respect to different figures during LS experience? Holland et al.'s theory is particularly relevant in this case since it allows us to analyse how the power relations within the group affect the student teachers' positionality.

The focus of this particular lesson study cycle was to research how to facilitate dialogue in the mathematics classroom. It was made very clear to the student teachers that the lessons would not be graded and would not be part of the formal assessment component of the course. In some schools the trainee teachers took it in turns to teach the lessons and act as observers while in others the class teacher taught the lesson and the trainee teachers acted only as observers. Following the lesson the group spent time discussing the data gathered from the observation and revising the plan. The following week the group (or in one case the class teacher) taught the revised lesson with a different class and then engaged in another group reflection. The re-teaching of the lesson is not a component of the Japanese model of LS, however the team felt this would be a significant learning experience for student teachers (Radovic et al., 2014). In fact student teachers initially lack a point of reference when planning (McIntyre, 1993, p. 44), and so the re-teaching of the lesson gives the opportunity to act upon their reflections.

The interview data suggests that through LS student teachers construct a Figured World where power is shared between the different figures. The teachers' power comes from their ability to handle the situation and from experience in delivering lessons while the student teachers identify themselves as teacher-researchers whose power is in their knowledge of the plans and in having been able to observe and reflect on children's work.

## **Background**

The university tutors who designed and organised the LS experience wanted the trainees to feel free to experiment outside their comfort zone by experiencing a research lesson, therefore attempted to develop a school based model that allowed collaborative reflection and interaction between student teachers, mentors and university tutors. This experience was designed to allow student teachers to be part of the team and not to act from the periphery. Furthermore, in contrast to the heavily assessed nature of ITE in England, it was constructed as a purely developmental and non-assessed part of the course. The tutors did not want the teachers and student teachers to feel that LS was yet another performance management tool since the constant scrutinising of teachers and student teachers in our performative culture is not always helpful (Williams, Ryan & Morgan 2014). The tutors wanted to create a safe environment for enquiry based professional development to happen. For this reason it was felt that LS was appropriate since the observations focus on the learners' progress and not on the teacher's performance.

Holland et al.'s (1989) theory of Figured Worlds allows us to analyse the different figures and the student teachers' positioning with respect of these figure within the LS experience.

Figured Worlds are socially produced, culturally constructed activities where people come to conceptually (cognitively) and materially produce/perform new self understanding. Holland (1998, pp. 40—41).

During the PGCE course trainee teachers begin to identify themselves as teachers and position themselves in relation to established social constructions while taking part in the Figured World. 'People figure who they are through the world they participate in and form their identities by participating in Figured Worlds' (Urrieta 2007, p. 107). The presence of other figures (e.g. classroom teacher, head of department, university tutor, and researchers) and the trainee teachers' positionality with respect to these figures shape the trainees participation within the Figured World.

Student teachers craft their own identity, starting from their unique positions, which are contextualized personally and socially (Flint et al 2011) and therefore the LS experience and the presence of different figures can lead them in very different directions. Here I analyse how the individuals' positionality, the positionality of different figures and the relational hierarchy as described in Holland (1985) fashion the LS experience.

The mathematics team's intention in designing the lesson study experience was to break barriers and allow collaboration between mentors, student teachers and university tutors in order to develop the profession. By looking at how trainee teachers position themselves within the relational hierarchy I am interested in seeing if LS could provide an opportunity to break the hierarchy and allow trainees to be heard and take the positioning of somebody who is knowledgeable.

Significance is attached to the mentor position as an evaluator of the trainee teachers' work and to their ranking in the department. In traditional teacher training courses the mentor is seen as the classroom/school expert, the professional who knows "what is best" and can guide the trainee teacher on how to teach. 'Mentors are widely presumed to be knowers and trainees are commonly seen as not-knowers and acted-upon' (Bieler 2010, p. 391). The university tutor is also seen as the expert who knows about theory by trainee teachers but might be seen as the theorist by the mentors, somebody who has very idealistic ideas but lacks pragmatism and up to date knowledge of the daily running of schools and classrooms (Burghes, 2008).

## **Data Collection**

Following the LS experience a research assistant conducted and audio recorded semi-structured interviews with 5 trainee teachers as well as conducting two focus groups. The tutors also audio recorded lessons and post lesson discussion during and after the LS cycles. The information gathered during the post-lesson discussions was used as triangulation data for the research. The sample was self-selected, the research assistant interviewed trainees who indicated a willingness to participate. Within the groups of volunteers one representative from each school was chosen in order to provide a variety of responses.

The data was analysed, identifying themes related to the research question. Extracts from the audio recordings were identified where trainee teacher positionality with respect to different figures began to emerge. Using the theory of Figured Worlds a number of themes became evident when analysing the data.

## Analysis

It is interesting to observe that similar themes emerged in all the different schools despite the fact that the teachers took very different roles. In school A the trainee teachers taught the lesson on both weeks. Having planned the lesson and having reflected on dialogue the trainee teachers position themselves as the owners of the plan and the experts on the lesson. They value the input from the school teachers but do not see them as the experts on dialogue.

The teachers were less aware of the goal of the task, so their input were more about the delivering of the lesson, as opposed to the dialogue, which was the main goal. Because they weren't aware of that so their input wasn't about that

The trainee teachers have a sense of entitlement because they have reflected on dialogue. This gives them a position of power that the teachers don't have.

Again during the discussion the teachers were less involved with the purpose of the activity. They were more concerned about the delivery of the lesson than the dialogue. They also need more involvement in these purposes.

Similarly, in school B the trainees recognise the position of power occupied by the teachers because of their experience but they see themselves as the expert on the plan and the intended pedagogy.

So having another experienced teacher there, to say maybe "you haven't thought about that". It was more about the practical sides of things, so "the lesson was good, but have you thought about distributing material..."

In the second class she did help when the pupils were working on groups and doing some scaffolding (...) they kind of helped a bit but the delivering, getting the pupils coming back to discuss at the end, was all led by the five of us

The experience in school C was different in that the trainee teachers planned the lesson but the class teacher taught it both times. In the first week the class teacher misunderstood the trainees' intention and slightly changed the plan. Also in this case the trainee teachers position themselves as the experts on the plan and occupy a position of power granted by their reflection on that plan and their awareness of what they saw the children doing. The teacher's misinterpretation of the plan gave the trainee teachers an opportunity to further think about their own planning.

At first the teacher was quite apologetic, you know, I messed up and stuff. He did miss something out, but it was also the problem with the plan, that it was not very tight and one section went too long

The trainee teachers hold the teacher responsible for not having followed the plan.

In the activities that no many critical points appeared it was because the teacher didn't follow the plan so we made them clearer

We thought, ok, the teacher next time has got to model. We want him to do a bit more on these examples

..when he comes along to make it more positive and more constructive (...) We discussed how we felt about the lesson, then we made it more concrete in terms of what when wrong and what we could do to improve it, and we told the teacher who taught the lesson what we could do to improve it

The trainees have a sense of entitlement. Their power comes from having collected evidence on what the children can do by observing the lesson and the children's work.

We had opinions about things, but they were supported by things we noticed during the lesson, so we could convince everyone in the table, "look, we have ten

critical points in this part of the lesson, we could make that activity longer to see if we can get more critical points”

## Conclusions

I conclude that, despite the significant differences in the LS experience, a common theme seems to emerge. LS could break barriers established by positions of power and afford trainee teachers an opportunity to see themselves as experts whose power comes from their knowledge and reflections on their plans and from having been able to observe and reflect on children’s work. The trainee teachers figure themselves in a position of power as the experts on that particular lesson but also recognise classroom teachers’ power in their experience and ability to handle the situation.

I observe that whether the teachers delivered the lesson or not does not seem to affect how trainees position themselves. The division of powers seems to be used well in most cases during the LS process. Trainees value the experience of reflecting on the lessons as a group and developing their own pedagogy as well as the input from experienced teachers on the managing of the lessons. Professional relationships based on trust and caring further contribute to the success of the professional development efforts Flint et al (2011).

There is some evidence in the data of the fact that LS can help to develop the profession by allowing trainee teachers to enquire into the pedagogy. In order to establish if this experience will have a long lasting effect on the trainees one could carry out a longitudinal study and follow the trainee teachers in their career to analyse if once established in the profession they continue to think through the pedagogy. Teachers that have trained through lesson study might be able to challenge accepted practice. In this case the LS experience would represent a ‘rupture from the taken for granted’, as described by Holland (1989: 35), where alternative figuring, that of the teacher-researcher, can develop through reflection.

## References

- Archer, R. (2016), Lesson Study, a trip to Japan, *Mathematics Teaching* 250 : 36 – 40.
- Bieler, D. (2010). Dialogic praxis in teacher preparation: A discourse analysis of mentoring talk. *English Education*, 42(4), 391-426.
- Burghes, D. (2008). International comparative study in mathematics teacher training. CfBT Education Trust.
- Fernandez, C., & Yoshida, M. (2012). *Lesson study: A Japanese approach to improving mathematics teaching and learning*. Routledge.
- Flint, A. S., Zisook, K., & Fisher, T. R. (2011). Not a one-shot deal: Generative professional development among experienced teachers. *Teaching and teacher education*, 27(8), 1163-1169.
- Holland D., Lachicotte W. Jr., Skinner D., & Cain C. (1998). Identity and agency in cultural worlds. Cambridge, MA: Harvard University Press.
- McIntyre, D. (1993) Theory, theorizing and reflection in initial teacher education. In: J. Calderhead & P. Gates (Eds.), *Conceptualizing reflection in teacher development* (pp. ??-??). London: Falmer Press.
- Radovic, D., Archer, R., Leask, D., Morgan, S., Pope, S., & Williams, J. (2014) Lesson study as a Zone of Professional Development in secondary mathematics ITE: From reflection to reflection-and-imagination. *Informal Proceedings*, 28(3), 271 – 278.

- Urrieta Jr, Luis. (2007) "Figured worlds and education: An introduction to the special issue." *The Urban Review* 39.2, 107-116.
- Williams, J., Ryan, J., & Morgan, S. (2014). Lesson Study in a Performative Culture. In *Workplace Learning in Teacher Education* (pp. 151-167). Netherlands: Springer.