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Author: Louws, M.L.

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UNDERSTANDING TEACHERS' PROFESSIONAL LEARNING GOALS FROM THEIR CURRENT PROFESSIONAL CONCERNS 7

ABSTRACT

In the day-to-day workplace teachers direct their own learning, but little is known about what drives their decisions about what they would like to learn. These decisions are assumed to be influenced by teachers' current professional concerns. Also, teachers in different professional life phases have different reasons for engaging in professional learning. In this study we explored the professional concerns underlying teachers' learning goals in order to understand variation in professional learning over a teacher's career. In this qualitative study we administered a semi-structured interview and a card sorting task to 15 teachers (ranging from 1 to 34 years of teaching experience) to elicit teachers' learning goals and current professional concerns. By conceptually combining learning goals with professional concerns, we distinguished three different types of concern-goal pairs: continuous, growth and improvement, and work-management pairs.

The results showed that early-career teachers have mainly growth and improvement concerns (personal ambition and socialization in the job) whereas mid- and late-career teachers have both continuous and growth and improvement concerns. Work-management concerns differ for early- and late-career teachers: the former are still trying to manage the job, whereas the latter try to avoid having a burnout. Results are further discussed in terms of professional life phase models and teachers' developmental tasks throughout their career.

⁷This chapter has been submitted in adapted form as:

3.1 INTRODUCTION

Most teacher learning occurs during teaching and does not necessarily depend on centrally organised learning activities (Kwakman, 2003). For this learning in the workplace, teachers are generally held responsible for choosing what and how to learn. This is especially true in the Dutch context where teachers are asked to use ten percent of their time for professional learning activities. However, there is hardly any research on how teachers direct their learning in these day-to-day settings (cf. Hoekstra, Beijaard, Brekelmans, & Korthagen, 2007). Previous research portrayed teachers as not willing to learn or unable to direct their own learning (cf. Van Eekelen, Vermunt, & Boshuizen, 2006), but this seems to contradict with the idea of teachers having a say in their own professional development. Moreover, only rarely do studies address what teachers themselves would like to learn (i.e., what are their professional learning goals) (Janssen et al., 2012). With this study we tried to better understand teachers' reasons for formulating professional learning goals (Day, Stobart, Sammons, Kington, et al., 2006).

To better understand the processes of teachers' ongoing and continuous professional learning in school contexts we adopted the research tradition of describing and understanding teachers' professional lives and careers (Day, Sammons, Stobart, Kington, & Gu, 2007; Rinke, 2008; Tang & Choi, 2009). Within this tradition, Day et al. (2007) state that teachers' professional learning is driven not only by teachers' sense of efficacy, but also by personal and professional lives and the school context. From their VITAE studies these authors conclude that professional learning over time plays an important role in teachers remaining committed and effective, because professional learning is described as an 'important professional life investment', 'recharging batteries', or 'renewal/refreshment' (Day et al., 2007, p. 148), or so-called 'personal drivers' of teachers' professional learning (Grundy & Robison, 2004). We aim to further examine the relationships between professional lives and teacher learning in this study and assumed professional lives to influence teachers' decision-making when self-directing their learning. Knowing what reasons underlie teachers' learning in their workplace and throughout their career can inform theories on what a professional continuum of teacher learning might look like (Beck & Kosnik, 2014; Feiman-Nemser, 2001; McMahon, Forde, & Dickson, 2015).

Furthermore, teachers in different phases of their career vary in their approach to choosing their learning goals, because '[...] the reasons that teachers undertake [C]PD may change over time – focusing on different "developmental tasks" (Day, Stobart, Sammons, Kington, et al., 2006, p. 141). These developmental tasks have been well-researched for teachers in the induction phase (first years of teaching), but have received less attention for teachers post-induction (Feiman-Nemser, 2001). To understand the variation in teachers' learning goals for teachers with different years of experience we used models of professional life phases (cf. Fessler & Rice, 2010).

3.1.1 RESEARCH AIM

CHAPTER 3

In our study, we assumed that teachers' current professional concerns, originating in professional life phases, provide insights into how teachers are directing their professional learning. As formulated in our research questions:

- 1. How can teachers' learning goals be understood from their current professional concerns?
- 2. How do teachers' learning goals and their current professional concerns relate to their teaching experience?

3.2 CONCEPTUAL FRAMEWORK

3.2.1 TEACHERS' PROFESSIONAL LEARNING AND LEARNING GOALS

Our study focuses on teachers' professional learning (Hoban, 2002; Nilsson, 2012). In studies on professional learning, teachers are addressed as active agents in educational change (Hoban, 2002) and as self-initiating professional learning activities (Lohman & Woolf, 2001). Teachers are viewed as active agents directing their own professional learning as part of their professional life (Czerniawski, 2013; Gravani, 2007). We specify teachers' professional learning as learning goals which can be considered the initial step towards planning their own learning (Janssen et al., 2012). We define learning goals as teachers' desired change(s) in behaviour or cognition (Bakkenes, Vermunt & Wubbels, 2010; Fenstermacher, 1994; Putnam & Borko, 2000), with cognition regarded as 'the integrated whole of theoretical and practical insights, beliefs, and orientations on the part of the individual' (Zwart, Wubbels, Bolhuis, & Bergen, 2008, p. 983).

3.2.2 PROFESSIONAL LIFE PHASES AND PROFESSIONAL CONCERNS

In this study we used three professional life phase models, in which phases in teachers' professional lives are distinguished on the basis of different professional concerns in each phase (Day et al., 2007; Fessler & Christensen, 1992; Huberman, 1993) (see Table 1.1 in Chapter I for an overview). The induction phase is characterized by becoming socialized in the profession and developing basic teaching skills, and is referred to as easy or painful beginnings Huberman (1993). After induction comes a phase in which teachers try to become stabilized in their profession, characterized as pedagogical mastery (Huberman, 1993), committing to the teacher profession (Huberman, 1993), and increasing perceived effectiveness (Day et al., 2007). Also, at this stage a period of enthusiasm and growth can be experienced, due to increased opportunities for continued (curricular) development and further career opportunities (Fessler & Christensen, 1992), also referred to as diversification and change (Huberman, 1993). After this phase a career crisis may occur (e.g., career frustration by Fessler and Christensen (1992) or reassessment by Huberman (1993)), as a result of disillusionment with the teaching profession or because ideals cannot be transformed into practice. Another cause for career crisis can be negative experiences in work and lives (e.g., work load, family tensions), as mentioned in the 'managing tensions' phase of Day et al. (2007). The final phases of the teaching career are characterized by teachers' confidence in their teaching abilities on the one hand, and gradual withdrawal from the profession with either positive memories or bitterness on the other. Huberman (1989) also asserts that each phase is part of individual trajectories, and although he tries to find similarities across these trajectories he finds just as many differences, due to the idiosyncratic nature of teachers' lives. Hence, the mix of components that reflects a distinct phase can always be different for each individual.

The focus on concerns as influencing teacher learning started in 1969 with the seminal work of Frances Fuller. She claimed that in order to understand beginning teachers' learning to teach, it is necessary first to understand their concerns (Fuller, 1969). Beginning teachers' concerns develop from concerns of the self (self-concerns), via concerns with respect to pedagogy and curriculum (task-concerns) to concerns with respect to students' learning (impact-concerns). Later, scholars used Fuller's model of concerns in adapted forms, but the operationalization of concerns as teachers' worries, fears or problems remained (Kagan, 1992; Shoffner, 2011).

Rather than focusing exclusively on *problems* teachers may experience, we focus on professional concerns reflecting themes that matter most to teachers in their daily professional lives. We used the models of professional life phases to define themes teachers might be occupied with in light of their professional learning (see Method section).

3.3 METHOD 3.3.1 PARTICIPANTS AND CONTEXT

We approached 15 teachers from School 2 to participate in a study on teacher learning. The school had good exam scores and student numbers increased due to its good reputation. At the time, school management was investing in introducing laptops in the lower grades.

I spent four months in this particular school to become acquainted with the school context and teachers' day-to-day working lives (see Appendix A). For the interview study we selected 15 teachers who had been observed in the classroom, aiming for a representative sample in terms of teaching experience, gender and subject taught (see Table 3.1). Teachers were approached verbally and agreed to participate for two meetings of approximately one hour each: one a semi-structured interview about their learning goals, the other a card-sorting task. They were informed about the procedure (e.g., the possibility to opt out throughout the data collection phase) and the confidential treatment of the generated data. Time between interviews was one to three weeks, which ensured that teachers were 'fresh' when they started the complex card-sorting task but had already reflected on their current learning goals during the first interview. Afterwards, teachers received a copy of the interview summary for a member check. Nine teachers suggested small changes, such as leaving out risky remarks, clarifying acronyms or adding a sentence to nuance a statement made.

To compare the professional concerns of 15 teachers who were in different phases of their career, we distinguished three broad subcategories of teaching experience (early-, mid-, and late-career, see Table 3.1). This was done to generate hypotheses on how teachers' underlying concerns and their choices of learning goals are related to their current professional life phase.

Teacher pseudonym (male/female)	Years of teaching experience	Subject domain	
Alex (m)	1	Modern languages	
Hanna (f)	1	Modern languages	
Alissa (f)	3	Dutch language	EARLY-CAREER
Johan (m)	4	Biology	
Erik (m)	4	Philosophy	
Helen (f)	7	Biology	
Nicole (f)	10	Modern languages	
Vera (f)	12	Dutch language	MID-CAREER
Ferdinand (m)	13	Chemistry	
Bart (m)	15	Philosophy & English	
Rick (m)	19	Physics	
Hester (f)	25	Economics	
Lois (f)	28	Modern languages	LATE-CAREER
Caspar (m)	30	Mathematics	
Karel (m)	34	Geography	

3.3.2 INTERVIEWS

Learning goals interview

The focus of this interview was on eliciting teachers' learning goals (similar approach as in Chapter 2). Because teachers do not regularly talk about their learning, nor do they formulate concrete learning goals for themselves (Janssen, 2013), we used many perspectives to elicit these goals (see Appendix B). Sample questions are 'what have you learned in the past year(s)?' and 'How do you see yourself and your teaching in five years from now?'. We made summaries of the teachers' answers to the different questions and derived key sentences that reflected teachers' core learning goals (see Data analysis, phase 2).

Professional concerns

To determine the teachers' professional concerns that were specific to a professional life phase, we designed an instrument that could address this. Following Huberman's (1993) assertion that phases reflect a mix of components which can be different for each individual, we chose to present the participants with the separate themes that are important for teachers' professional lives. On the basis of three professional life phase models with different aims and backgrounds (Day et al., 2007; Fessler & Christensen, 1992; Huberman, 1993), the phases of concerns (Fuller, 1969) and a model of teacher expertise (Berliner, 2001), we elicited 33 themes, which were printed on cards to be used in a card-sorting task (see Appendix C). These themes were selected on the basis of our expectation that teachers would react differently to them in different phases of their professional lives. For example, contact between teacher and student is something beginning teachers might struggle with in terms of how to form good relationships with students, whereas very experienced

teachers might be more concerned with how to connect to young students' worlds.

For the instruction on the task we combined methodologies from the Q-sort task (Van Exel & de Graaf, 2005) and card-sorting tasks (Friedrichsen & Dana, 2003). Typically, the Q-sort methodology presents people with a sample of statements about some topic, and respondents are asked to rank these statements according to their preference, judgement or feeling about them. Also, sorting cards proved to be a useful tool for eliciting teachers' underlying orientations in the method used by Friedrichsen and Dana (2003). The authors found that 'it was not how the teacher sorted particular cards, but what the teacher said during the sorting that offered most insight' (p. 295).

The instruction for card sorting was I) to go through the cards quickly and distinguish them according to whether the theme on the card was relevant or important for the teacher's work situation right now (+), or whether the theme on the card was absolutely not relevant or important for the work situation right now (-). Cards for which they could not really make a clear judgment could be placed in the middle (?), 2) to make a top-five selection of the cards on the + pile and a top-five selection of the cards on the - pile, and 3) to elaborate on how the top-five cards from the + pile influenced their daily work and learning. The responses were audiotaped and videotaped in order to see how the card-sorting task was handled. In the analysis, we were interested predominantly in the teachers' considerations in response to the cards, not the selected cards themselves.

3.3.3 DATA ANALYSIS

Both the first and the second interviews were transcribed verbatim. Our analyses of the data consisted of multiple phases:

Phase 1: Constructing teacher profiles: creating a description of each teacher's background in teaching and their current tasks and responsibilities in the school.

Phase 2: Summaries of the transcripts of the first interview were written. For each summary, two researchers extracted core learning goals independently from each other and described these in key sentences. Next, selected key sentences were compared, disagreements were discussed, and adaptations to the key sentences were made. Sometimes teachers' learning goals were not specifically articulated as a goal but as an experienced deficit needing attention, a problem of practice, or expected learning concerning a new task in the school. If teachers expressed a desire to change something in their behaviour or cognition, this wish was addressed as learning goal. Each learning goal was coded as mostly a characteristic of classroom-context learning (code 1), school-context learning (code 2), or teacher as a professional (code 3). Next, teachers' learning goals (i.e., the key sentences with a code) were described in the teacher profiles.

Phase 3: a summary was made of teachers' responses to the top-five selected themes that were relevant or important for teachers' current professional lives and their answers to the question how these themes were influencing their work and learning. The summaries were also described in the teacher profiles and were characterized as teachers' current professional concerns.

Phase 4: Connecting the teachers' learning goals to teachers' professional concerns, we followed the following steps in the within-case comparison:

Step I. For each learning goal we checked whether concerns could be paired on the basis of content (starting point = trying to explain the learning goal from the concerns). For example, one of Helen's learning goals focused on her communication with students, and her professional concern (in reply to the card 'contact between student and teacher') was that communication is the most important skill for teachers if they are to motivate students and has her continuous attention. The concerns partly overlap the teacher's learning goal and partly provide an extra explanation why this goal is pivotal to Helen's current work experience. The concern-goal pairs were listed in a conceptually clustered data matrix (Miles & Huberman, 1994) (see Table 3.2 for two sample pairs). Learning goals and professional concerns that could not be paired on the basis of content overlap were not included; thus, a total of 19 concerns and 7 learning goals are not displayed in the data matrix and were not considered for further analyses.

Step 2. To provide insight into the way the concern-goal pairs were matched, we described the coherence between the two in our matrix. In the rightmost column we described this coherence by explaining in what way the professional concerns were linked to learning goals with arrows from professional concerns to the learning goals. We arrived at this elaboration by rereading the teacher profiles and summaries and describing links based on content while trying to stay close to the phrasing teachers used in both interviews. These arrows should not be seen as causal relations, but as linked variables.

The pairing of concerns and goals was first done for one early-, one mid- and one latecareer teacher and we discussed thoroughly whether the right concerns were matched with the right goals on the basis of content; counter-examples of pairs were explored. After agreement had been reached on how the pairing should be done content-wise, I constructed all the remaining pairs.

Table 3.2 Two sample concern-goal pairs from the conceptually clustered data matrix

Vera	Learning goals ^a	Professional concerns (card themes)	Coherence between professional concerns and leaning goals
Pair I	I Continuous development on content knowledge and students' learning	Contact between teacher and student Focus on good teaching Focus on students' learning process	I'm continuously developing on students' learning process and having an eye for individuals → Plus it feels rewarding to develop good lessons → these are your main tasks as a teacher
Pair 2	Coaching beginning teachers Guiding special needs students	Search for new challenges	I'm in search of new challenges to prevent working on routine (plus I want to stay motivated until I'm 66) \rightarrow You can of course deepen or broaden the things you already do, but you can also start something new \rightarrow that's how I'm now learning about coaching beginning students and guiding special needs students

^a Number codes indicate the content of the learning goal (I = classroom-context, 2 = school-context, 3 = the teacher as professional)

Phase 5: Cross-case comparison: To search for patterns in the 33 different pairs of professional concerns and learning goals, we looked for similarities in the language teachers used to talk about their learning in combination with their professional concerns. To this end we selected key words that showed how teachers had arrived at the learning goals related to that particular topic. Key words were derived from studies in which indicators of change in teacher learning were used (Clarke & Hollingsworth, 2002; Zwart, Wubbels, Bergen, & Bolhuis, 2007). We found that teachers' learning goals could be shaped by professional concerns in three different ways:

- a) through learning something that is <u>always</u> important to the teacher and closely related to their deep intrinsic <u>values</u> (keywords:'continuous', 'always', 'ongoing', 'main task', 'good teacher', 'never finish learning', 'daily', 'satisfaction', 'highly value', 'commitment', 'important')
- b) through learning for personal growth and improvement of current (teaching) skills (keywords: 'grow', 'update', 'learn more', 'become better', 'new', 'new task', 'experiment', 'explore', 'learn about', 'learn how', 'expect change', 'change', 'more often')
- through managing work practices (keywords: 'prevent', 'manage', 'worrying', 'control', 'main concern', 'ask myself', 'becoming aware', 'pay attention', 'condition', 'only focus on')

In the sample concern-goal pairs in Table 3.2 the keywords are given in bold. Vera's first concern-goal pair is characterized by learning something that is always important (a) and her second concern-goal pair is characterized by a new task she wants to develop herself in, and thus is driven by her current tasks and responsibilities (b). From categorizing the pairs of professional concerns and learning goals we could deduct how teachers' own learning goals can be understood from their professional concerns and how teaching experience played a role (see Table 3.3 in the Results section).

3.4 RESULTS

3.4.1 TEACHERS' PROFESSIONAL LEARNING GOALS

The learning goals formulated by the teachers could be categorized in three categories: I) classroom context, 2) school context and 3) the teacher as professional. Learning goals in the classroom context were mentioned by all teachers. These goals are all related to instructional strategies and/or communication with students. For example, they are aimed at activating students in class (Johan), bringing variation in instruction (Rick), and the more general goals of continuously deepening content and pedagogical knowledge (Bart). Learning goals of the second category were mentioned by six teachers (two early-, three mid-, and one late-career). Examples are learning about being a mentor (Hanna), teaching with innovative digital devices (Lois), and learning how to coach beginning teachers (Vera). The last category, learning goals aimed at teachers as professionals, was mentioned by eight teachers (three early-, three mid- and two late-career), and for six of them this had to do with managing work load and/or saying 'no' to new tasks. The other two teachers formulated goals about their professional identity (Bart) and managing their emotions (Ferdinand).

3.4.2 TEACHERS' PROFESSIONAL CONCERNS

CHAPTER 3

The cards teachers selected in their top-five during the card sorting task reflect their current professional concerns. The cards selected most were 'Contact between teacher and student' (12 teachers), 'Focus on good teaching' (10 teachers), 'Managing work load' (7 teachers), 'Indicating my own boundaries' (6 teachers), and 'Focus on students' learning process' (5 teachers). Exploring the cards most frequently selected, we found that teachers differed in their interpretations of the theme. For example, among the twelve teachers that selected 'contact between teacher and student', interpretations differed as to how this theme influenced their current work and learning. For six teachers, contact between teacher and student was an important *prerequisite* for being a good teacher and motivating students (one early-career, one mid-career, three late-career). Five teachers addressed the importance of *mastering* how to form good relationships with students, saying this needed permanent development (one early-career and four mid-career). And five teachers explained that they highly *valued* the contact they have with students (two mid-career and three late-career). Lois for example explained that:

.. this is always important, even more important than being able to explain your subject. If this no longer works for you, you will need to find something else to do than teaching

3.4.3 COHERENCE BETWEEN TEACHERS' PROFESSIONAL CONCERNS AND LEARNING GOALS

As explained in the Method section, teachers' learning goals can be understood from professional concerns through three different ways: a) learning something that is always important to teachers and closely related to their deep intrinsic values, b) learning for personal growth and improvement of current (teaching) skills, and c) managing work practices. We labelled these continuous, growth and improvement, and work-management pairs, respectively (see Table 3.3).

The continuous concern-goal pairs were characterized by teachers referring to goals that are always important to them or to what they consider a continuous process of learning. Teachers also mentioned what they think characterizes a good teacher and why this requires continuous attention. Some concern-goal pairs also reflect teachers' deep intrinsic values because these topics are at the core of teachers' jobs and can create rewarding or satisfactory feelings. Helen, for example, considers learning about communication with students something that is never finished (see Phase 4, step 1 in Data analysis).

The growth and improvement concern-goal pairs were characterized by the teachers referring to something they wanted to develop in their current practice. If this was related to their teaching practice, they talked about refining, expanding and improving their repertoire, mostly related to specific teaching skills they wanted to improve. Lois, for example, started an experiment in the classroom and expected this to expand her repertoire of assessing language skills. Sometimes these concern-goal pairs were characterized by expected learning because of starting a new task, changed responsibilities, and/or changes in student population. Vera, for example, mentioned she was looking for various challenges in her job to keep herself motivated, challenges related to her learning

goals about coaching novice teachers and guiding special needs students.

The work-management concern-goal pairs were characterized by teachers managing their work practices, which sometimes included the wish to avoid falling into old routines. The content of these concern-goal pairs was mainly about how to organise your work. Hanna, for example, explained how the combination of teaching and the moral obligations to be involved in school activities influenced her development in a negative way. Therefore, one of her goals was to pay better attention to managing her work-life balance:

what is difficult is the work-life balance; when do you stop, when can I really say it is enough? Also difficult are the moral obligations; there are so many activities that are not compulsory, but they do expect you to be there, and this is what takes a lot of time. [...] I'm very willing to attend these activities, that is not what it is all about, but I do want to have my life besides teaching. I need to learn to settle for what is possible, I'm a perfectionist, but it all needs to fit within the time I have, so to say.

3.4.4 RELATING CONCERN-GOAL PAIRS TO PROFESSIONAL LIFE PHASES

In the preceding we have tried to differentiate between teachers' learning goals by exploring the different concern-goal pairs. Next, we want to relate the concern-goal pairs from Table 3.3 of our early-, mid-, and late-career teachers to the professional life phase models.

The continuous concern-goal pairs are mainly found for mid- and late-career teachers. An exception is early-career teacher Johan, who also sees evolution of his teaching skills as a continuous process in his job. Of those mid- and late-career teachers, three of them have goals related to teacher-student relationships. These teachers see this as central to their task as a teacher, considering building strong relationships a prerequisite to motivating students to learn.

We found some particularities across the growth and improvement pairs that are specific to the teachers' professional life phase. Hanna (early-career) wants to become socialized in the school context and acquire a more stable position. Alex, Alissa and Erik (early-career) talk about their personal ambitions in their job. Vera and Bart (mid-career) explain their learning goal as focusing on something new (coaching/special needs for Vera, curriculum development for Bart). Lois and Caspar's (late-career) goals are triggered by school's introduction of laptops for students in the lower grades. Taken together, beginning teachers' learning goals seem to be driven by their aim for socialization in the profession and personal ambitions, whereas mid- and late-career teachers seem more occupied with remaining challenged and motivated in their job and/or adapting their teaching to current school innovations. Less evidently related to professional life phases are the growth and improvement concern-goal pairs about student behaviour (both early-career Hanna and mid-career Ferdinand) and student learning (early-career Hanna as well as late-career Rick, Lois and Karel).

The work-management concern-goal pairs are about managing work load and indicating boundaries (e.g., saying 'no' to new tasks). For early-career teachers this is because they are interested in learning how to organise their work (Hanna & Alissa) or in managing work load as a necessary condition for being able to learn in their day-to-day professional life (Erik). Mid- and late-career teachers, on the other hand, are more concerned about falling victim to a burn-out, and their learning is therefore aimed at

Table 3.3 Overview of concern-goal pairs for early-mid- and late-career teachers

Table 3.3	Table 3.3 Overview of concern-goal pairs for early- mid- and late-career teachers	/- mid- and late-career teachers	
	Continuous concern-goal pairs:	Growth and improvement concern-goal pairs:	Work-management concern-goal pairs:
	Learning which requires continuous development	Learning for personal growth and improvement of (teaching) skills	Learning to manage work practices
	JOHAN Continuous evolution of	HANNA Focus on students' needs > learn about	HANNA High work load in combination with moral
	teaching skills > updating complex instruction & activating students (1) ERIK Feel strongly committed to school which is crucial to work here > need to	differentiation and anticipating students' answers (1) HANNA Restoring disturbed relationships with students (1)	obligations > organise school work and pay attention to work-life balance (3) ALISSA Tough combination of studying and work > manage work load and ask for compensation (3)
EARLY CAREER	without me (3)	HANNA Stable position in school organisation > curriculum development and mentoring (1 & 2) ALEX Ambition: become excellent teacher > optimize differentiation & handling student misconduct (1) ALEX Challenging myself in designing language skills assignments (1) ALISSA Ambition: Teach upper grades (pedagogies & content knowledge) (1)	ERIK Guarding boundaries is necessary to be able to develop into a good teacher (1)
<u> </u>	HELEN Never finish learning about communication with students (1) HELEN Students' learning process is your main task as a teacher (1)	VERA Start something new > coaching beginning teachers & guiding special needs students (2) FERDINAND Incident with student & changing schools > control emotions & better assess student behaviour (1 & 3)	NICOLE Burn-out 3.5 years ago > indicate boundaries and worry less about interpersonal situations (3) BART Professional identity and contact with students > professional ethics in online communication (3)
CAREER	VERA Continuous learning & main task as teacher (1) BART Always adapting instruction and learning about subject (1)	BART Invest in curriculum development > organisational skills & instruction (2)	BART Professional identity and reassessing myself as teacher > 'where am I in teaching?' (3)
ATE	HESTER Daily learning about subject through lesson preparation and reflection on the lessons (1) CASPAR To be a good teacher > always maintain good contact with students and stay connected with their world (1)	RICK Focus on coaching and contact with students > monitoring students' progress (1) RICK Focus on students' learning and instruction > varying instruction (1) LOIS Laptops in classroom > exploring digital content to motivate students (1) LOIS Experiment with instruction > assessment of language	RICK In recovery after burn out > focus on planning and work-life-study balance (3) HESTER Task description is full > Learn to say 'no' to tasks that are outside teaching (3)
CAREER CAREER		LOIS Experiment with instruction > assessment of language skills (1) CASPAR Laptops in classroom > different classroom management (1) KAREL Conscious of my role in enhancing students' learning > motivate students for my subject and integrate content and the 'real world' (1) KAREL Conscious of my role in enhancing students' learning > how students learn to learn (1)	

managing their planning (Rick) or better indicating their boundaries (Nicole). Late-career teacher Hester's task description includes some extra-curricular tasks (e.g., participating in a committee) and she blames herself because she says 'yes' too often to requests to participate in these tasks. An exception is Bart who seems to be more in a reassessment phase (cf. Huberman, 1993) asking himself 'who am I as a teacher?'.

3.5 CONCLUSION AND DISCUSSION

In this study we aimed to acquire a more detailed understanding of what reasons underlie teachers' professional learning. Regarding our first research question, 'How can teachers' learning goals be understood from their current professional concerns?', we found that teachers' learning goals can be characterized by continuous, growth and improvement, and workmanagement concern-goal pairs. These different concerns underlie teachers' decision-making about what they want to learn.

The continuous pairs can explain teachers' continuous development in teaching. This relates to what scholars have addressed as the 'complexity of teaching' (Labaree, 2000); teaching, because of its strongly contextual and situational character (Doyle, 2006) is so complex that it will always need attention, and thus requires continuous adaptation (Clarke & Hollingsworth, 2002). The content of this continuous learning is either about developing good teacher-student relationships or about investment in instruction and subject pedagogy skills. Those two goals are considered central developmental tasks for teachers (Beck & Kosnik, 2014; Feiman-Nemser, 2001). Being aware of these central tasks for continuous development is a necessary skill for becoming an *adaptive expert* (Darling-Hammond & Bransford, 2005). In this process, teachers become increasingly aware of the complexities of teaching and learn how to systematically assess their own performances.

The growth and improvement pairs show how teachers' learning could be shaped by their goal to become better teachers and/or to learn in a new task or responsibility. The outcomes in terms of learning goals might differ, but what the pairs have in common is that teachers' learning goals are driven by professional growth. Instead of a focus on what a teacher cannot do or what he/she is lacking (deficit approach, which applies to two teachers in our study), the majority of teachers in our sample stated that they wanted to learn for improvement and growth (growth approach) (cf. Clarke & Hollingsworth, 2002). Another characteristic of these pairs is how specific changes in the context (e.g., students, tasks, curriculum or school) can result in teachers setting learning goals for themselves.

The work-management pairs show how teachers focus their learning not only on their classroom and their teaching, but also on learning how to manage their work. Some teachers indicated that this is an important prerequisite for learning about classroom teaching. This finding underlines the importance of understanding teachers' social and emotional well-being and their abilities to manage tensions in their work and lives before we ask about their professional learning (Day et al., 2007).

For our second research question we compared concern-goal pairs for early-, mid, and late-career teachers, and looked for differences as a result of teaching experience. First, we found that learning goals of early-career teachers are not solely focused on classroom management and disruptive student behaviour, as suggested in various

professional life phase models (Fuller, 1969; Kagan, 1992; Rolls & Plauborg, 2009); rather, their learning goals are also characterized by refining teaching practice and striving for mastery. Their developmental 'tasks' are broader and relate to deepening their subject matter pedagogies, extending their repertoire regarding curriculum and instruction, and increasing responsibilities (cf. PD tasks as decribed by Feiman-Nemser, 2001). Also, unlike their mid- and late-career teachers, early-career teachers talked more explicitly about specific skills they like to learn to become good teachers. This relates to early-career teachers' interest in increasing their effectiveness in teaching, with a focus on instruction and subject-related expertise (cf. Day et al., 2007; Rolls & Plauborg, 2009). According to Huberman (1989, p. 351): 'the consolidation of an instructional repertoire leads naturally to attempts to increase one's effectiveness within the classroom'. Second, when looking into how teachers articulated their growth and improvement concerns we note that earlycareer teachers' learning goals seem to be affected by their aim for socialization in the profession and personal ambitions, whereas mid-career teachers seem more occupied with remaining challenged and motivated in their job (cf. resiliency and committment, Day et al., 2007). Or, as Huberman explains for the diversification and change phase 'having worked with 6-7 yearly cohorts of pupils [...] one begins to repeat the yearly cycle and to find that it lacks variation' (1989, pp. 351-352). Teachers can then use changing routines and learning new tasks to increase the variation in their job and to experience themselves as novices in these new tasks (Fessler & Christensen, 1992). Third, the continuous pairs are found mainly among mid- and late-career teachers, and seem to be the drivers of their permanent investment in improving their teaching. It seems that these teachers' core professional values have been formed, and they know what continuously drives their learning. Lastly, work-management goals of early-career teachers were closely related to their desire to manage their day-to-day work load; for late-career teachers, these goals were more about balancing their work with extra-curricular tasks and preventing themselves from having a burn-out. Work management is often not considered part of a teacher's professional learning, but being able to manage tensions and becoming resilient to aversive work and life events is essential for remaining motivated and committed to the teaching job (Day et al., 2007).

3.6 IMPLICATIONS

The qualitative methodology used in this study proved useful for eliciting teachers' underlying concerns, and provided a better understanding of teachers' learning goals. Asking teachers to construct their own professional concerns and reflect on what mattered most at the time was an important asset for this study, not only for generating insights into teachers' professional lives in relation to their learning goals, but it also served as a useful reflection tool by forcing teachers to prioritize their current concerns and explaining this to an outsider (Postholm, 2008). The advantage of the card-sorting task is that it lets teachers construct their own combination of components most relevant to their professional life (Huberman, 1989).

A possible drawback of the methodological approach was that the coupling of learning goals with concerns was done by researchers rather than teachers themselves. This can

be improved through member checking the generated concern-goal pairs together with the participating teachers shortly after the interviews. Another drawback is that due to our small sample, hypotheses were generated on the fairly general early-, mid-, and late-career level, and relations of teachers' goals with particular professional life phases were not possible. Despite the general distinctions made, we were still able to demonstrate – on the basis of the teachers' selection of their top-five concerns – variation in their underlying reasons for setting learning goals which we could link to differences in teachers' experience levels. From this, we hope to have shown how teachers' professional learning should be seen as driven by their current professional concerns about commitment to teaching, personal ambitions, feelings of mastering the job, work load and work-life balance, and their relationship with students.