

Characteristics of teachers as change agents

Citation for published version (APA):

Heijden, van der, H. R. M. A., Geldens, J. J. M., Beijaard, D., & Popeijus, H. L. (2015). Characteristics of teachers as change agents. *Teachers and Teaching*, 21(6), 681-699.
<https://doi.org/10.1080/13540602.2015.1044328>

Document license:

TAVERNE

DOI:

[10.1080/13540602.2015.1044328](https://doi.org/10.1080/13540602.2015.1044328)

Document status and date:

Published: 01/01/2015

Document Version:

Publisher's PDF, also known as Version of Record (includes final page, issue and volume numbers)

Please check the document version of this publication:

- A submitted manuscript is the version of the article upon submission and before peer-review. There can be important differences between the submitted version and the official published version of record. People interested in the research are advised to contact the author for the final version of the publication, or visit the DOI to the publisher's website.
- The final author version and the galley proof are versions of the publication after peer review.
- The final published version features the final layout of the paper including the volume, issue and page numbers.

[Link to publication](#)

General rights

Copyright and moral rights for the publications made accessible in the public portal are retained by the authors and/or other copyright owners and it is a condition of accessing publications that users recognise and abide by the legal requirements associated with these rights.

- Users may download and print one copy of any publication from the public portal for the purpose of private study or research.
- You may not further distribute the material or use it for any profit-making activity or commercial gain
- You may freely distribute the URL identifying the publication in the public portal.

If the publication is distributed under the terms of Article 25fa of the Dutch Copyright Act, indicated by the "Taverne" license above, please follow below link for the End User Agreement:

www.tue.nl/taverne

Take down policy

If you believe that this document breaches copyright please contact us at:

openaccess@tue.nl

providing details and we will investigate your claim.

This article was downloaded by: [Eindhoven Technical University]

On: 01 July 2015, At: 06:50

Publisher: Routledge

Informa Ltd Registered in England and Wales Registered Number: 1072954 Registered office: Mortimer House, 37-41 Mortimer Street, London W1T 3JH, UK

Volume 21 Number 6 August 2015

Teachers *and*
TEACHING
THEORY AND PRACTICE

Special Issue: Teachers' Professional Agency in
Contradictory Times
Guest Editors: Auli Toom, Kirsi Pyhälä and
Frances O'Connell Rust

THE JOURNAL OF THE
INTERNATIONAL STUDY ASSOCIATION
ON TEACHERS AND TEACHING



CrossMark

[Click for updates](#)

Teachers and Teaching: theory and practice

Publication details, including instructions for authors and subscription information:

<http://www.tandfonline.com/loi/ctat20>

Characteristics of teachers as change agents

H.R.M.A. van der Heijden^{ab}, J.J.M. Geldens^a, D. Beijaard^b & H.L. Popeijus^a

^a Kempel Research Center, University of Professional Teacher Education De Kempel, Helmond, The Netherlands

^b Eindhoven School of Education, Eindhoven University of Technology, Eindhoven, The Netherlands

Published online: 02 Jun 2015.

To cite this article: H.R.M.A. van der Heijden, J.J.M. Geldens, D. Beijaard & H.L. Popeijus (2015) Characteristics of teachers as change agents, *Teachers and Teaching: theory and practice*, 21:6, 681-699, DOI: [10.1080/13540602.2015.1044328](https://doi.org/10.1080/13540602.2015.1044328)

To link to this article: <http://dx.doi.org/10.1080/13540602.2015.1044328>

PLEASE SCROLL DOWN FOR ARTICLE

Taylor & Francis makes every effort to ensure the accuracy of all the information (the "Content") contained in the publications on our platform. However, Taylor & Francis, our agents, and our licensors make no representations or warranties whatsoever as to the accuracy, completeness, or suitability for any purpose of the Content. Any opinions and views expressed in this publication are the opinions and views of the authors, and are not the views of or endorsed by Taylor & Francis. The accuracy of the Content should not be relied upon and should be independently verified with primary sources of information. Taylor and Francis shall not be liable for any losses, actions, claims, proceedings, demands, costs, expenses, damages, and other liabilities whatsoever or howsoever caused arising directly or indirectly in connection with, in relation to or arising out of the use of the Content.

This article may be used for research, teaching, and private study purposes. Any substantial or systematic reproduction, redistribution, reselling, loan, sub-licensing, systematic supply, or distribution in any form to anyone is expressly forbidden. Terms &

Conditions of access and use can be found at <http://www.tandfonline.com/page/terms-and-conditions>

Characteristics of teachers as change agents

H.R.M.A. van der Heijden^{a,b*}, J.J.M. Geldens^a, D. Beijaard^b and H.L. Popeijus^a

^a*Kempel Research Center, University of Professional Teacher Education De Kempel, Helmond, The Netherlands;* ^b*Eindhoven School of Education, Eindhoven University of Technology, Eindhoven, The Netherlands*

(Received 7 April 2014; accepted 6 March 2015)

Teachers play a key role in realizing successful changes in education. Among them are real ‘change agents’ at both classroom and school level. To obtain insights into what characterizes these teachers, an exploratory study has been conducted by interviewing external experts, principals, and teachers ($n = 20$). An analysis of data resulted in a picture of characteristics attributed to teachers as change agents. These characteristics pertain to lifelong learning (being eager to learn and reflective), mastery (giving guidance, being accessible, positive, committed, trustful, and self-assured), entrepreneurship (being innovative and feeling responsible), and collaboration (being collegial). The category mastery appeared to consist of the most characteristics. Within the category entrepreneurship, ‘being innovative’ was mentioned most. The characteristics mentioned apply to both the classroom and school level, but the importance of demonstrating these characteristics at the school level seems to be weighed less heavily by teachers than by experts and principals.

Keywords: teachers as change agents; teacher characteristics; professional agency; teacher change; primary education

Introduction

Teachers play a key role in realizing successful changes in education. Essential for this is that they are already from the beginning actively involved in a process of change in their schools (Bakkenes, Vermunt, & Wubbels, 2010; Fullan, 2007). Teachers differently use their ‘professional agency’ in such processes (see also Lasky, 2005; Sannino, 2010). Their professional agency is expressed in the ways they influence work-related matters, make choices and decisions at work, and act accordingly (Vähäsantanen, 2013). Teachers may use their agency to support, take a critical stance, or even resist educational change in their schools (Sannino, 2010). However, not much is known about how and to what extent teachers actually do so in daily practice.

Eteläpelto, Vähäsantanen, Hökkä, and Paloniemi (2013) argue that professional agency is needed to develop the work of teachers at both classroom and school level, for professional learning, and for renegotiating their professional identities in changing educational practices. It is generally agreed that the way teachers act, develop themselves, and learn from and through their work in schools is influenced by personal factors, including the way they (want to) see themselves as teachers

*Corresponding author. Email: m.heijden@kempel.nl

(self-image), and the educational context (or environment) in which they work (Beijaard, Meijer, & Verloop, 2004; Clardy, 2000; Day, Sammons, Stobart, Kington, & Gu, 2007; Kelchtermans, 2009; Lasky, 2005; Scribner, 1999; Van Eekelen, Vermunt, & Boshuizen, 2006). Teachers' sense of their professional selves influences how they practice agency at work (Vähäsantanen & Eteläpelto, 2011). Teachers' professional agency and the social context in which they work can be seen as being mutually constitutive and highly interdependent (Eteläpelto et al., 2013; Lasky, 2005; Vähäsantanen, 2013; van Oers, 2014). It seems important to create supportive school contexts in which teachers are encouraged to be agentic in order to positively influence or change their education, and to learn and develop themselves both individually and with their colleagues (Day, Elliot, & Kington, 2005; Fullan, 1993b). Kwakman (2003) concludes in her research on teacher professional development, that personal characteristics of teachers (for example, their attitudes towards something new or what they do or do not appraise as meaningful) have more influence on teacher learning and development than school contexts do. Hattie (2012) also points out that individual characteristics of teachers, such as their beliefs and commitments, have the greatest influence on their students' achievement. Personal characteristics explain to a large extent differences among teachers in the way and the extent to which they enact professional agency in order to influence or change education, also within the same school (e.g. Bakkenes et al., 2010; Fullan, 2007, 2013).

The rapidly changing society of today requires from teachers that they are able and willing to cope with the many challenges of change. In today's schools, teachers are needed who are real change agents, thus teachers who are willing to learn and change from 'inside' (internal drive to reflect and make sense of things) and 'outside' (meeting external demands), both individually and in collaboration with others in their schools (Fullan, 1993a, 1993b, 2013; Hattie, 2012). Until now, little empirical research has been done on what characterizes teachers as change agents as they influence, change, or improve education in daily practice by using their agency (Eteläpelto et al., 2013; Lukacs, 2009; Van der Bolt, Studulski, Van der Vegt, & Bontje, 2006).

The purpose of this exploratory study is to identify personal characteristics of teachers who act as change agents in primary schools. A characteristic can be defined as a typical feature of a person that can be observed and consists of behavioral and attitudinal components expressed, for example, in underlying knowledge, beliefs, and feelings (Ajzen, 2001; Ajzen & Fishbein, 2000). A follow-up study will investigate to what extent these characteristics are promoted or hindered by teachers' school contexts, significant others, and the wider political, social, and cultural contexts of schools. Teacher education and schools might benefit from knowing what characterizes teachers as change agents; for example, by using the findings as a source for reflection by (prospective) teachers on their own professional identity development and what it means to be a change agent in schools. In the long term, the results of this and other research on teachers as change agents may have an impact not only on teachers' further professional development (as an investment) but also on schools' personnel policy regarding the composition of school teams and the way such a team can function optimally (see also Hargreaves & Fullan, 2012).

Theoretical background

Vähäsantanen (2013) distinguishes three complementary perspectives of professional agency, namely in terms of: (1) influencing one's own work; (2) making decisions and choices about one's own involvement in educational reform; and (3) negotiating and influencing one's own professional identity. Eteläpelto et al. (2013) provide a conceptualization of professional agency at work from a subject-centered sociocultural and lifelong learning perspective. The focus in this perspective is on the processes by which teachers construct and actively negotiate their identity position at work, how they develop themselves professionally (lifelong learning), and the way they enact their agency at work. Investigating teachers' professional agency from this perspective seems important, as the way teachers think, act, and learn, through and during their work, is imbued and resourced (or constrained) by the sociocultural context in which they work (Lasky, 2005; Vähäsantanen, 2013; van Oers, 2014).

Bandura (2001) states that 'to be an agent is to intentionally make things happen by one's actions' (p. 2). In line with this statement, teachers as change agents are open to change and act accordingly, while being self-conscious of the complexity of change processes in their schools (Fullan, 1993a, 1993b). In the literature, two terms are used interchangeably for these teachers: 'change agents' (Fullan, 1993a, 1993b; Hattie, 2012; Lukacs, 2009) and 'agents of change' (Price & Valli, 2005; Priestley, Biesta, & Robinson, 2012; Villegas & Lucas, 2002; Vrijnsen-de Corte, 2012). A 'change agent' is also an existing official role within human resource management and defined in this context as a professional who is responsible for creating changes in an organization (Ulrich, 1997). Both persons and materials and/or innovations, for example Information and Communication Technology, can be referred to as 'agents of change'. Teachers who are actively involved in a joint achievement of something new, may be mentioned as 'agents of change' when they accomplish a desired effect (or change) at school. In this study, the term 'change agents' is preferred because it (more) clearly illustrates that these teachers are personally driven to initiate change in education at both the classroom and school level by using their professional agency (see also Eteläpelto et al., 2013; Vähäsantanen, 2013). Change agents appear to have the drive to change from the 'inside' as a constant intrapersonal factor, which is not necessarily the case with 'agents of change' (Fullan, 1993a).

The current literature about how teachers as change agents might be identified is limited (Lukacs, 2009; Van der Bolt et al., 2006). Hattie (2012) describes that teachers need to see themselves as change agents, as activators and evaluators, in order to make a difference in students' learning. In his opinion, being a change agent is a mindset, a way of thinking about the teaching profession. Lukacs, Horak, and Galluzzo (2011) define teachers as change agents as 'classroom teachers who choose to initiate actions in support of an improvement in teaching and/or student learning beyond their own classrooms' (p. 7). This definition can be considered as too narrow: (1) it overlooks the fact that teachers can also be change agents at the classroom level and, through that, developing themselves, including their professional identity and their own teaching practice; and (2) it is not necessary that making improvements are the starting point for change agents to use their agency. For example, teachers may also use their agency to try out something new in their classroom out of curiosity or the desire to explore its effect on students' learning. Two decades ago, Fullan (1993b) gave an appropriate description. In his opinion, the teacher as a

change agent is ‘a professional who, to be effective, must become a career-long learner of more sophisticated pedagogies and technologies’ (p. 16). Such a teacher is, according to Fullan, furthermore ‘able to form and reform productive collaborations with colleagues, parents, community agencies, businesses and others’ (pp. 16–17).

At least four general personal characteristics, derived from the literature, can be distinguished that seem important for teachers who act as change agents (see also the Teacher Change Agent Scale developed by Lukacs, 2009).

First, teachers as change agents may be characterized as lifelong learners who systematically reflect on their teaching practice and who are in search of information and ideas (e.g. Eteläpelto et al., 2013). Research shows that there are big differences among teachers within schools and their desire to learn: from not seeing the need to learn, to wondering how to learn, and being eager to learn (Van Eekelen et al., 2006). It might be expected that teachers who are change agents have a will to learn and use their agency for that. Hattie (2012) points out that teachers as change agents are evaluators of the effects they have on students’ learning by gathering evidence of that. Teachers as change agents are thus lifelong learners who use inquiry-oriented ways to make improvements and adapt their work at both school and classroom level to new insights (Fullan, 1993b).

Second, mastery is important for being a change agent; mastery can be described in terms of being an expert with comprehensive teaching knowledge and skills (Fullan, 1993a, 1993b; Lukacs, 2009; Snell & Swanson, 2000; York-Barr & Duke, 2004). Teachers who are change agents seem to be skilled in teaching. Lukacs (2009) states that a sophisticated understanding of both subject matter and teaching strategies is necessary for teachers as change agents, which is a prerequisite for being able to acknowledge that there is a ‘problem’ in their school that needs to be solved. Hattie (2012) points out that teachers as change agents know and apply a range of learning strategies to foster student learning and achievement. He argues that teachers’ beliefs about students’ abilities and commitments to their work exert the greatest influence on student achievement. Hattie further mentions that teachers as change agents are passionate and inspiring teachers in order to make as many students passionate and inspired learners as well. Teachers as change agents might thus demonstrate ‘mastery’ through being effective teachers (Fullan, 1993a, 1993b; Lukacs, 2009; Snell & Swanson, 2000; York-Barr & Duke, 2004).

Third, within human resource management, the change agent is an entrepreneur who responsibly takes risks, makes decisions, and motivates colleagues in the process of change within their organization (Delmotte, 2008; see also Snell & Swanson, 2000). According to Le Fevre (2014), risk and risk-taking are tightly associated with effective innovation in school. Teachers with (unreal) perceptions of high levels of risk, or who are reluctant to take risks, can face major barriers to changing their teaching practice. Le Fevre mentions that increasing teachers’ willingness to take risks is necessary to bring about an effective educational change. Teachers as change agents might express themselves thus through a certain kind of entrepreneurship by taking creative initiatives and daring to take responsibility for the calculated risks that accompany these initiatives (Commission of the European Communities, 2009; Le Fevre, 2014; Lukacs et al., 2011).

Fourth, collaboration with others appears to be essential for teachers as change agents. In general, teacher collaboration has a positive effect on teachers’ learning and students’ learning outcomes (Doppenberg, den Brok, & Bakx, 2013; Meirink, Imants, Meijer, & Verloop, 2010). Fullan (1993b) states that teachers as change

agents are able to form and reform productive collaborations with colleagues and others. Lukacs (2009) points out that teachers as change agents use their collaborative skills when they actively take initiatives in working with their colleagues, such as organizing collaborative discussions about their teaching practices (see also Hattie, 2012). Teachers as change agents appear to be aware of needing colleagues and others to enhance their own teaching practice, to influence or change education in their school, as well as to enhance student learning (Vähäsantanen, 2013).

The four general characteristics described above (lifelong learning, mastery, entrepreneurship, and collaboration) are used in this study as a framework or lens to explore in depth the personal characteristics of teachers as change agents in their daily practice in primary schools.

Methods

Participants

An exploratory study was carried out to obtain insights into characteristics of teachers as change agents. Interviews were held with three different groups of participants: four external experts, four principals of four selected primary schools, and 12 teachers from these schools. The external experts had an extensive experience of 10 years or more in leading and guiding change and innovation processes in their field of expertise within primary education. Their average age was 39.5 years, ranging from 33 to 44. The four principals had an average of 14 years of experience in their current function. Their average age was 57.8 years, ranging from 55 to 62. The 12 participating primary school teachers all played an active role in educational change at school according to their principal. They had an average of 13.8 years of experience, ranging from 2.5 to 38. The teachers' average age was 38 years, ranging from 26 to 64.

Data collection

The strategy followed throughout the data collection was to start interviewing external experts who had, due to their experience, a broad insight into teachers' behavior and work in a large number of primary schools. Through these experts, we gained access to primary schools where teachers as change agents work. We selected four average-sized primary schools in the Netherlands: two schools with a size above average, ranging from 462 to 501 students, and two schools with a size slightly below average, ranging from 192 to 225 students. The average number of students in primary schools in the area where this study was carried out was 250 (Centraal Bureau voor de Statistiek [CBS], 2009). The principal of each primary school was interviewed. With the support of these principals, we approached 12 teachers, three teachers per school, who according to them could be perceived as change agents. All interviews were held in a period of five months.

Structured open interviews were used for data collection. First, the participants were asked for some personal background information, namely their gender, years of experience in their current or similar function, highest educational degree received, grade level taught or field of expertise, and working load in full-time equivalent. Second, the concept of teachers as change agents was explained to the participants by using a general description of change agents with an emphasis on

Table 1. Sample questions from the structured open interviews.

| General characteristics | Sample questions |
|-------------------------|--|
| Lifelong learning | How does this teacher (do you) feel about professional development courses? (attitude) |
| Mastery | How does this teacher (do you) behave in the classroom/at the school level? (behavior) |
| Entrepreneurship | How does this teacher (do you) feel about trying out new, unknown things in practice? (attitude) |
| Collaboration | To what extent does this teacher (do you) make contact with or seek support from colleagues when she/he is (you are) changing or developing education in the classroom/at the school level? (behavior) |

teachers who are regularly and actively engaged in educational change at both classroom and school level. The initial questions for the external experts and principals were to give an example and a description of such a teacher from their point of view. The initial question for the teachers was whether they could understand why their principal had designated them as a ‘change agent’. The central part of the interview was set up around the four general characteristics described above (lifelong learning, mastery, entrepreneurship, and collaboration). Each general characteristic was considered with regard to its behavioral and attitudinal component (see also Ajzen, 2001; Ajzen & Fishbein, 2000). Table 1 contains an example question for each characteristic. Follow-up questions were asked if clarifications or elaborations were required. Furthermore, the participants were asked to what extent the characteristics of the change agents mentioned by them applied to both teachers’ classroom and school level. At the end of the interview, they were asked for their opinion about two propositions in order to gain insights into possible differences in the way change agents operate at the classroom or school level. All interviews were audio taped and transcribed verbatim.

Data analysis

All 20 participants approved the transcriptions of their perceptions of characteristics of teachers as change agents. Data were analyzed qualitatively with the help of the computer program MAXQDA. Notes about difficulties with labeling the data were also kept in this computer program. For reliability reasons, peer debriefing was systematically applied by checking and discussing the labeling process with the members of the research group (Wester & Peters, 2004). More specifically, the development of the category system consisted of the following steps:

- (1) Text fragments were first selected and connected to the four general characteristics (lifelong learning, mastery, entrepreneurship, and collaboration). Text fragments are logical and meaningful fragments of the transcriptions, pertaining to the answer to a question within a general characteristic (including the answers to the necessary follow-up questions) (see Table 2 for an example). A new text fragment started when a general characteristic changed or a new question was asked. In line with the way the interviews were set up, fragments were labeled in terms of behavior or attitude. Labeling the

Table 2. Example of a text fragment pertaining to the general characteristic lifelong learning that has been labeled as ‘being eager to learn’ and described in terms of taking initiatives in career-long learning and mastery.

| | |
|-------------|---|
| Researcher: | ‘Well you’ve just mentioned some things about how they [change agents] stay up to date with new educational developments. You have mentioned that they read literature and that they seek information on the internet [summary]. What else do they do?’ |
| Principal: | ‘They attend training courses’ |
| Researcher: | ‘Training courses?’ |
| Principal: | ‘Yes, they attend workshops and conferences’ |
| Researcher: | ‘And do they decide upon this on their own initiative?’ |
| Principal: | ‘Yes, they often do so. However, they ask me if they are allowed to attend. They want to develop and improve their teaching skills’ |

fragments was a cyclic process of going forth and back until no new insights and no more new labels could be assigned to the fragments. Saturation was reached after having analyzed four transcriptions of every group of participants (in total, 606 text fragments with 183 labels referring to behavior or attitude).

- (2) The preliminary category system developed had to be reorganized, because the distinction between categories with fragments labeled in terms of behavior or attitude appeared not to be functional. Both components were too closely interrelated, so we decided not to make a distinction between these two components anymore. After reorganizing the category system, all (sub)categories contained fragments labeled in terms of both behavior and attitude. For example, the labels ‘teaching with enthusiasm’ (behavior) and ‘being enthusiastic’ (attitude) were now grouped together under the same subcategory ‘committed’ and described as ‘having a passion for education and the profession’. After having analyzed all transcriptions, the result of this step was a category system consisting of four main categories (the general characteristics) and 11 subcategories, including descriptions for each subcategory (in total, 28) (see Table 3 in the ‘Results’ section).
- (3) The reliability of the category system was determined by calculating the ‘inter-rater reliability’ using Cohen’s Kappa (Cohen, 1960). In total, 32.9% of all selected text fragments were included ($n = 283$). The text fragments were categorized independently by the first author and a second researcher relying on a manual with explanations and examples of the (sub)categories. Inter-rater reliability using Cohen’s Kappa was .90.

Results

Table 3 indicates that a broad and differentiated picture of characteristics of teachers as change agents could be obtained.

Mastery appeared to encompass the most characteristics of teachers as change agents, namely 38% of all text fragments. Within the category entrepreneurship, ‘being innovative’ was mentioned most (19.3%), followed by ‘being eager to learn’ as a subcategory of the main category lifelong learning (16.0%), and ‘being collegial’ in the main category collaboration (12.4%). Data indicate that teachers as change

Table 3. Category system of attributed characteristics of teachers as change agents.

| Main categories | Subcategories | Descriptions | Number of text fragments ^a | % |
|-------------------|-----------------|---|---------------------------------------|------|
| Lifelong learning | | | 228 | 26.5 |
| | Eager to learn | <ul style="list-style-type: none"> • Being curious about life, people, new insights into education • Being open to learning and professional development courses • Taking initiatives in career-long learning and mastery | 138 | 16.0 |
| Mastery | Reflective | <ul style="list-style-type: none"> • Being reflective about teaching at the classroom and school level • Being critical in general, of themselves, of training courses and innovations | 90 | 10.5 |
| | Giving guidance | <ul style="list-style-type: none"> • Putting successful didactic (including classroom management) teaching skills into practice • Putting successful pedagogical teaching skills into practice | 327 | 38.0 |
| | Accessible | <ul style="list-style-type: none"> • Being relaxed in their professional practice • Being communicative to students (including parents) and colleagues • Being open to students (including parents) and colleagues • Being humorous in contact with students and colleagues | 58 | 6.7 |
| | Positive | <ul style="list-style-type: none"> • Wanting what is best for students: their learning and well-being • Being motivated toward developing students, professional development courses and innovations | 63 | 7.3 |
| | Committed | <ul style="list-style-type: none"> • Having a passion for education and the profession • Feeling involved in school, students and education at school | 65 | 7.5 |

(Continued)

Table 3. (Continued).

| Main categories | Subcategories | Descriptions | Number of text fragments ^a | % |
|------------------|---------------|--|---------------------------------------|------|
| Entrepreneurship | Trustful | <ul style="list-style-type: none"> • Being trustful towards students • Building students' confidence | 27 | 3.1 |
| | Self-assured | <ul style="list-style-type: none"> • Having professional self-confidence • Having professional consciousness | 31 | 3.6 |
| | Innovative | <ul style="list-style-type: none"> • Being open to new ideas, educational developments • Giving meaning to change • Participating actively in implementing innovations at school • Making a transfer from theory to professional practice • Applying new educational developments into practice, experimenting at the classroom level | 199 | 23.1 |
| | | | 166 | 19.3 |
| | Responsible | <ul style="list-style-type: none"> • Feeling responsible for education in the classroom • Feeling responsible for education at the school level | 33 | 3.8 |
| Collaboration | Collegial | <ul style="list-style-type: none"> • Taking initiatives in collaboration for enhancing their teaching at the classroom level • Taking initiatives in collaboration at the school level | 107 | 12.4 |
| | | | 107 | 12.4 |

^aThe total number of text fragments = 861.

agents demonstrate almost all attributed characteristics at both the classroom and school level (except for 'giving guidance' and 'being trustful' in the main category mastery). All participants further indicated that the attributed characteristics are features inherent to being professional teachers and therefore should be demonstrated by them in their professional daily practice at both levels.

In view of the interpretation, objectivity and reliability of the results, the characteristics obtained in this study will be described below in more detail per category and illustrated by representative quotes from original text fragments (Maso & Smaling, 1990).

Main category: lifelong learning

All participants perceived teachers as change agents as being lifelong learners, eager to learn, and reflective.

Being eager to learn

The data indicate that teachers as change agents are open to learning and that they take initiatives to professionally develop themselves further, resulting in comprehensive knowledge of education. The participants perceived teachers as change agents as being curious. The following quote illustrates this characteristic:

I really want to learn new things to further develop myself professionally. I think it's very important that 20 years from now, I am teaching very differently than I am doing today. (...) When I am sixty years old, I don't want to teach the same way as I do now. (...) I really want to learn a lot from courses. I also notice that when I am attending a course, I feel good and function better at school as well. It's weird, but when I am attending a course I not only function better at school but also at home. (Primary school teacher)

Being reflective

Teachers as change agents are characterized as being reflective. They are expected to think deeply and carefully about the quality of their teaching and education at school. An essential element of being reflective mentioned by the participants is that teachers as change agents seem to be critical, as demonstrated by the following quote:

(...) what I really appreciate in her is that she's doing things on the basis of arguments. Sometimes arguments by herself, but also arguments by me. She wants to recognize the need for doing things. Why? She is not someone who will follow me blindly. When I say: 'we're going left', she eventually does, but must first be convinced why we turn to the left. (Principal)

Main category: mastery

Teachers as change agents are perceived by the participants as skilled teachers with comprehensive knowledge.

Giving guidance

According to the data, teachers as change agents appear to successfully guide and support students' development. They seem to create powerful and collaborative learning environments for all students, and to demonstrate effective classroom management. The following quote illustrates this characteristic:

(...) I take children seriously, make demands and at the same time I want to let them feel that I am there for them. (...) I explain things a thousand times if that's what they need. And I make sure that children feel safe. A safe classroom climate. They can be who they really are. And I give them a little push into the right direction. (Primary school teacher)

Being accessible

Teachers as change agents are characterized as being approachable by their students, parents, and colleagues. They seem to be relaxed in their professional practice. Furthermore, teachers as change agents appear to have a sense of humour, which they use in their contact with students and colleagues. The following are two quotes of this characteristic:

I am a calm person. Colleagues also see me as a calm person. I am therefore very calm in the classroom with the children. (Primary school teacher)

I make jokes and I tell funny stories to the children. (...) I think humour in the classroom is very important (...) time to relax after having worked hard. (Primary school teacher)

Being positive

Teachers as change agents appear to have a positive view of education and their professional practice. They seem to have high moral goals and high expectations of students and themselves. Teachers as change agents are perceived by the participants as being intrinsically motivated to provide students with the highest quality of education possible. As a result they seem strongly motivated to professionally develop themselves further and to innovate as is demonstrated by the following quote:

I am someone who constantly tries to develop herself as a professional, with the help of others. I am doing this because of my own personal development, but also for the children in my class, because I want to get the most out of children; not only cognitively, but also social-emotionally. (Primary school teacher)

Being committed

Teachers as change agents appear to be very concerned for and loyal to their school, including students, parents, and colleagues. What particularly stands out according to the participants, is that teachers as change agents have a passion for education and the teaching profession. They really seem to enjoy their work. In the perception of the participants, this might be reflected in the way they teach, namely with enthusiasm and by inspiring students. The following are two quotes of this:

I am taking these efforts for myself, I think. My job is my passion actually. Last night, yet again a discussion with my husband ... because I work part time ... But it seems like I work full time. Yes, that's because I enjoy it. (Primary school teacher)

It's her school, they are her children, her colleagues. It's just that general enthusiasm and involvement. (Principal)

Being trustful

Teachers as change agents are characterized as demonstrating empathy towards students and having a strong social relationship with them. They seem to be warm, caring, and are really there for the students for every problem or concern. According to the participants, they furthermore explicitly demonstrate having confidence in each

of their students. The following quotes of two teachers illustrate the importance of being trustful:

Children should like to come to school. They have to feel safe at school, safe to express their feelings, feel appreciated. They have to feel that they are noticed and seen as individuals. I find that very important. (Primary school teacher)

Maybe it's part of my idealism. I want to offer the children in my classroom the feeling that 'you are important'. I think that's the most important thing. Children should know that. (Primary school teacher)

Being self-assured

Teachers as change agents seem to have confidence in their own abilities as professional teachers. They are expected to be aware of the fact that teachers make a difference in students' development. Nevertheless, some participants (teachers) who were characterized as 'being self-assured' additionally indicated that they regularly are unsure and feel the need for confirmation about the way they teach. The following two quotes are illustrative of both aspects of being self-assured:

This teacher has confidence in his teaching, which really stands out. (Principal)

(...) and I also need confirmation, maybe because of my own insecurity. I want to know if I am doing things right ... I ask my colleagues how they would do that. (Primary school teacher)

Main category: entrepreneurship

All participants find that teachers as change agents are able to put ideas into action and take initiatives to influence, change, or improve education.

Being innovative

Teachers as change agents are perceived above all as being open to new ideas and educational developments. According to the participants this does not necessarily mean they blindly embrace all changes. They seem to view innovations both positively and critically. They also seem to emphasize opportunities instead of possible negative side effects when changes in education take place at school. The data indicate that teachers as change agents deepen ongoing activities as well as initiate new ones. A specific feature in the perception of the participants is that they dare to experiment in their classroom in a planned and systematic way; they seem to seek new ways and variety in their teaching. The following three quotes illustrate this characteristic:

It starts with being open for it and thinking: 'Gee, this could be something'. (External expert)

They can make significant steps towards putting that theory into their teaching practice. (Principal)

I am not afraid of letting go control. I have no fear of incorporating new teaching strategies or other new things (...) not knowing in advance whether this is going to work out the way you have in your mind. (Primary school teacher)

I don't want to work year after year, knowing in advance how my day is going to look. (...) I don't want to feel that I am getting into a rut. (...) Teaching must be innovative for me and the students. (Primary school teacher)

Feeling responsible

The data show that teachers as change agents feel responsible for providing high quality education at both classroom and school level and act accordingly. They appear to take initiatives and to continually wish to change or influence education at both levels, together with colleagues, in order to enhance their students' learning and well-being. The following are three illustrative quotes of this:

They do all those things because they feel responsible for education in their own classrooms, but they also feel responsible for the education of children in all classrooms, thus at the school level. (External expert)

I feel responsible for the way I teach. So that children like to learn. (Primary school teacher)

I feel responsible and I can also take responsibility. Every teacher should feel responsible. Our school takes initiatives to make people responsible. It's not only about teaching in your own classroom. We have to improve education at our school together. (Primary school teacher)

Main category: collaboration

All participants agreed that teachers as change agents are able and willing to collaborate with colleagues in order to enhance the quality of education at the classroom and school level. Within this category, the teachers as change agents are characterized by the participants as being collegial.

Being collegial

Teachers as change agents appear to take ongoing initiatives to work together with colleagues. In the perception of the participants, they seem to view collaboration as a way to learn, as is illustrated by the following two extracts:

Yes, with M., a colleague I work with frequently. We are regularly looking for ways to change things in our classrooms. (...) We are always thinking, reflecting on how we can do things differently or better. So that you are not doing unnecessary things, which take time. But that you're looking for systems or ways by which you work more efficiently. (Primary school teacher)

They play a very clear role in school meetings and find it also very important to participate. (...) To make sure that the meeting is efficient and effective, to achieve the right goals with each other. (Principal)

Discussion

This study investigated personal characteristics of teachers as change agents as attributed by themselves, their principals, and experts in Dutch primary education. Four initial main categories were refined with 11 subcategories and corresponding descriptions, which together provide a better insight into how teachers as change

agents can be identified, and how they enact professional agency at work as they influence or change education in their daily practice. The attributed characteristics of teachers as change agents will be discussed below for each main category and in general.

Mastery

Most attributed personal characteristics of teachers as change agents pertained to the main category mastery. Results of this study indicate that teachers as change agents seem to distinguish themselves, also in their own view, by the way they practice their teaching. Change agents appear to be skilled and successful teachers who make a difference to students' learning and well-being (see also Fullan, 1993a, 1993b; Hattie, 2012; Lukacs, 2009; Snell & Swanson, 2000; York-Barr & Duke, 2004). An explanation might be that teachers as change agents use their agency to continually strive to increase and develop their expertise in teaching. The characteristics 'giving guidance' and 'being trustful' particularly reflected their work in the classroom in their direct contacts with students. Furthermore, change agents seem to be distinguished, again also in their own view, by the way they (want to) express themselves at work as positive, committed, and accessible teachers. For example, real change agents appear to be motivated and enthusiastic teachers with a passion for education and the profession.

At present, there are differences among school teachers in the way they make a difference to their students' learning (Hattie, 2012). Results from this study indicate that the attributed characteristics pertaining to mastery whereby teachers as change agents distinguish themselves, are to a large extent personal. Apparently being skilled and successful are prerequisites for teachers being or becoming real change agents at school. Possible explanations for this might be that: (a) expertise in teaching is necessary to be able to acknowledge when there is a 'problem' regarding, for example, the quality of education at school that needs to be solved (see also Lukacs, 2009); and (b) being an expert with comprehensive teaching knowledge and skills can be seen as a crucial quality and condition for gaining support from colleagues when taking initiatives in changing education at the school level. This might mean that teachers who want to become change agents, first have to develop their teaching skills to a level where it has a large impact on student learning and achievement.

Entrepreneurship

Results of this study indicate that teachers as change agents are above all innovative – a characteristic mentioned most by the participants. Being innovative appears to be one of the main drives of change agents to undertake actions for influencing education (see also Fullan, 1993a, 1993b; Snell & Swanson, 2000; York-Barr & Duke, 2004). The results of this study also indicate that teachers as change agents are proactive in using their agency to influence education. They are open to new insights which they transform into opportunities for influencing or changing education at school. According to the participants, change agents dare to take creative initiatives and calculated risks when experimenting with new educational approaches in their classrooms (see also Le Fevre, 2014). They do not seem to be afraid of moving away from their current (possibly traditional) teaching practices. Explanations for this might be that teachers as change agents: (a) feel and take ownership of their

own professional development and the quality of education at the school level in favor of their students; and (b) desire their work as a teacher to remain interesting and challenging. However, change agents also appear to be critical; they do not blindly embrace all new insights and changes at school. In line with the literature, they might take a critical stance or even resist educational change in their schools (Sannino, 2010).

Being innovative seems to be a crucial personal characteristic and a distinguishing feature of teachers as change agents. This study indicates that teachers as change agents use their agency in an entrepreneurial manner by taking creative initiatives accompanied with calculated risks. In line with the literature and in order to be able to bring about effective educational change in schools, it is necessary that teachers are willing to take risks (Le Fevre, 2014). For many teachers in schools, the fear of taking risks might be a barrier to educational change and also, to some extent, not being appreciated by school leaders in a culture where external accountability measures are very dominant (Day et al., 2005; Le Fevre, 2014).

Lifelong learning

Teachers as change agents appear to be lifelong learners. They might be described as teachers who are eager to learn. Teachers as change agents seem to learn from and through their work, from and with colleagues; they use their agency to take initiatives in order to develop themselves professionally and to improve or change their teaching practice. Furthermore, the results of this study indicate that real change agents regularly reflect on the quality of their daily teaching practice and education at the school level and act accordingly. For example, by asking themselves questions and by searching for information to construct and reconstruct knowledge and ideas in order to be able to adapt their teaching practice or to solve problems (see also Hattie, 2012). An explanation for this might be that teachers as change agents want to grow and develop themselves professionally from the 'inside' (see also Fullan, 1993a). Furthermore, they seem to strive to increase their expertise in teaching because they want to have a large impact on their students' learning and achievement (see also Hattie, 2012).

Collaboration

Teachers as change agents seem to be able and willing to collaborate with colleagues and others. The results of this study indicate that teachers as change agents possess collaborative skills and actively take initiatives in working with their colleagues. An explanation for this might be that teachers as change agents are aware of needing others to further develop themselves, their teaching practice, and education at the school level. It is generally agreed that collaborative expertise and being a member of a professional community are interconnected and relevant for changing education and professional development (see also Doppenberg et al., 2013; Fullan, 1993a, 1993b; Hattie, 2012; Lukacs, 2009; Meirink et al., 2010).

This study provides a better insight into what characterizes teachers as change agents. The results suggest that being a change agent does not necessarily depend on experience or age, as the years of experience of the interviewed change agents ranged from 2.5 to 38, and their ages ranged from 26 to 64 years. This result partly

differs from that found by Lukacs (2012) in her study into teachers as change agents; she found that age matters and years of experience do not.

In this study, all participants agreed that the attributed characteristics are important for change agents to demonstrate at the classroom level. However, the importance of demonstrating these at the school level was weighed more heavily by experts and principals than by teachers. An explanation might be that teachers view teaching in the classroom as their core business, at least more than their principals who are predominantly held responsible for the quality of education at the school level.

The results of this study reflect attributed characteristics of teachers as change agents by all participants. It can be argued that among teachers different profiles may be distinguished regarding the extent to which they meet these characteristics, since every teacher has, at least to some extent, a unique sense of his/her professional self and identity as a teacher, and because of the many different influences of the immediate working environment and broader sociocultural context on the work of teachers (see also Beijaard et al., 2004; Day et al., 2007; Kelchtermans, 2009; Lasky, 2005). A follow-up study will be conducted to further investigate these possible influences as explained below.

Limitations and further research

This study reports on results of a small-scale, exploratory research project in which the data collection focused on participants' perceptions. To further investigate teachers as change agents, it is worthwhile to observe and videotape them in their schools along with interviewing them to provide an objective view of the way they act in their schools. Given the limited scale of this study, the results should be treated with caution. The study aimed to gain more insights into the characteristics of teachers as change agents; it was not meant to generalize outcomes. A follow-up questionnaire study on a much larger scale will investigate to what extent teachers in primary schools recognize themselves in the attributed characteristics. The extent to which the attributed characteristics are resourced, constrained, or bounded by immediate and larger contextual factors will also be investigated in that study.

Conclusions

Notwithstanding the limitations mentioned above, this study has provided a more differentiated picture of primary school teachers as change agents. The four general characteristics derived from the literature (lifelong learning, mastery, entrepreneurship, and collaboration) appeared to be helpful for the categorization of the data: they were an adequate framework for accommodating all the data. In turn, these four general characteristics were refined with 11 subcategories and 28 descriptions. Teachers as change agents seem to be distinguished, also in their own view: (a) by the way they practice their teaching profession, for example as skilled, successful, passionate, motivated, and accessible teachers; and (b) by being innovative and eager to learn. The characteristics and descriptions derived from the data appear to be closely related and mutually reinforce each other. For example, teachers as change agents are perceived as teachers who constantly renew themselves as professionals and who strive to provide students with the best education possible. To realize this, they take initiatives to share their views and work together with colleagues

and others (e.g. experts or researchers) to change or influence education and to find answers to new questions.

It can be argued that teachers as change agents are needed in today's schools, and will continue to be needed in the future: teachers who use their professional agency to learn and to influence or change education at school. Furthermore, teachers who act as change agents may build a necessary bridge between working and learning individually and collectively in schools to bring about a successful change (Fullan, 1993b, 2007). Therefore, teacher education and schools (and school boards) might benefit from knowing what characterizes teachers as change agents. The results of this study provide a better insight into the way teachers as change agents act in daily practice. This insight can be used in teacher education to help prospective teachers to complete or adjust their picture of the future profession. For example, the characteristics and their descriptions can be used as a tool for reflection and to contribute to both the development of their professional identity and the way they (currently) act in their practical teacher training (internship). This insight can furthermore be used in teacher education to evaluate to what extent the current curriculum does sufficiently equip students to develop these teacher characteristics. For schools, the results of this study can be helpful to reflect on the extent to which their teachers meet the characteristics of being a change agent. The characteristics and descriptions can be used by schools as a source for dialog about their ability to change education and the ways their teachers operate and use their professional agency. At the school level, it might then become (more) clear what teachers are needed to enhance schools' ability to change and to foster a collaborative learning environment in order to positively influence education and students' learning. In the long term, this might have an impact on personnel and/or mobility policies in schools.

Disclosure statement

No potential conflict of interest was reported by the authors.

Funding

This work was supported by the Netherlands Organization for Scientific Research (NWO) [grant number 023.002.035].

References

- Ajzen, I. (2001). Nature and operation of attitudes. *Annual Review of Psychology*, 52, 27–58.
- Ajzen, I., & Fishbein, M. (2000). Attitudes and the attitude–behavior relation: Reasoned and automatic processes. *Special Issue: European Review of Social Psychology*, 11, 1–33.
- Bakkenes, I., Vermunt, J. D., & Wubbels, T. (2010). Teacher learning in the context of educational innovation: Learning activities and learning outcomes of experienced teachers. *Learning and Instruction*, 20, 533–548.
- Bandura, A. (2001). Social cognitive theory: An agentic perspective. *Annual Review of Psychology*, 52, 1–26.
- Beijaard, D., Meijer, P. C., & Verloop, N. (2004). Reconsidering research on teachers' professional identity. *Teaching and Teacher Education*, 20, 107–128.
- Centraal Bureau voor de Statistiek. (2009). *Aantal kinderen op Limburgse basisscholen neemt sterk af* [The number of elementary school students in Limburg has strongly decreased]. Den Haag: Author. Retrieved from <http://www.cbs.nl/nlNL/menu/themas/onderwijs/publicaties/artikelen/archief/2009/2009-2798-wm.htm>

- Clardy, A. (2000). Learning on their own: Vocationally oriented self-directed learning projects. *Human Resource Development Quarterly*, 11, 105–125.
- Cohen, J. (1960). A coefficient of agreement for nominal scales. *Educational and Psychological Measurement*, 20, 37–46.
- Commission of the European Communities. (2009). *Key competencies for a changing world*. (COM(2009) 640). Brussels: Author.
- Day, C., Elliot, B., & Kington, A. (2005). Reform, standards and teacher identity: Challenges of sustaining commitment. *Teaching and Teacher Education*, 21, 563–577.
- Day, C., Sammons, P., Stobart, G., Kington, A., & Gu, Q. (2007). *Teachers matter: Connecting lives, work and effectiveness*. Berkshire: Open University Press.
- Delmotte, J. (2008). *Evaluating the HR function: Empirical studies on HRM architecture and HRM system strength*. Leuven: Catholic University of Leuven.
- Doppenberg, J. J., den Brok, P. J., & Bakx, A. W. E. A. (2013). Relationships between primary school teachers' perceived learning outcomes of collaboration, foci and learning activities. *Learning and Individual Differences*, 28, 1–8.
- Eteläpelto, A., Vähäsantanen, K., Hökkä, P., & Paloniemi, S. (2013). What is agency? Conceptualizing professional agency at work. *Educational Research Review*, 10, 45–65.
- Fullan, M. (1993a). *Change forces. Probing the depth of educational reform*. New York, NY: Falmer Press.
- Fullan, M. (1993b). The professional teacher. Why teachers must become change agents. *Educational Leadership*, 50, 12–17.
- Fullan, M. (2007). *The new meaning of educational change* (4th ed.). New York, NY: Teachers College.
- Fullan, M. (2013). *Stratosphere: Integrating technology, pedagogy, and change knowledge*. Toronto: Pearson Canada.
- Hargreaves, A., & Fullan, M. (2012). *Professional capital: Transforming teaching in every school*. New York, NY: Teachers College Press.
- Hattie, J. (2012). *Visible learning for teachers. Maximizing impact on learning*. New York, NY: Routledge.
- Kelchtermans, G. (2009). Who I am in how I teach is the message: Self-understanding, vulnerability and reflection. *Teachers and Teaching*, 15, 257–272.
- Kwakman, K. (2003). Factors affecting teachers' participation in professional learning activities. *Teaching and Teacher Education*, 19, 149–170.
- Lasky, S. (2005). A sociocultural approach to understanding teacher identity, agency and professional vulnerability in a context of secondary school reform. *Teaching and Teacher Education*, 21, 899–916.
- Le Fevre, D. M. (2014). Barriers to implementing pedagogical change: The role of teachers' perceptions of risk. *Teaching and Teacher Education*, 38, 56–64.
- Lukacs, K. (2009). Quantifying 'the ripple in the pond': The development and initial validation of the Teacher Change Agent Scale. *International Journal of Educational and Psychological Assessment*, 3, 25–37.
- Lukacs, K. (2012). Exploring 'the ripple in the pond' – A correlational study of the relationships between demographic variables and the Teacher Change Agent Scale. *Current Issues in Education*, 15(2), 1–12. Retrieved from <http://cie.asu.edu/ojs/index.php/cieatasu/article/view/956>
- Lukacs, K., Horak, A., & Galluzzo, G. (2011). Does teaching how to make a difference make a difference? A pre/post study of an 'educational change' course. *Focus on Teacher Education*, 10, 7–11.
- Maso, I., & Smaling, A. (Eds.). (1990). *Objectiviteit in kwalitatief onderzoek* [Objectivity in qualitative research]. Meppel: Boom.
- Meirink, J. A., Imants, J., Meijer, P. C., & Verloop, N. (2010). Teacher learning and collaboration in innovative teams. *Cambridge Journal of Education*, 40, 161–181.
- Price, J., & Valli, L. (2005). Preservice teachers becoming agents of change: Pedagogical implications for action research. *Journal of Teacher Education*, 56, 57–72.
- Priestley, M., Biesta, G. J. J., & Robinson, S. (2012). Teachers as agents of change: Teacher agency and emerging models of curriculum. In M. Priestley, G. J. J. Biesta, & S. Robinson (Eds.), *Reinventing the curriculum: New trends in curriculum policy and practice* (pp. 187–206). Retrieved from <http://books.google.nl/>

- Sannino, A. (2010). Teachers' talk of experiencing: Conflict, resistance and agency. *Teaching and Teacher Education*, 26, 838–844.
- Scribner, J. P. (1999). Professional development: Untangling the influence of work context on teacher learning. *Educational Administration Quarterly*, 35, 238–266.
- Snell, J., & Swanson, J. (2000). *The essential knowledge and skills of teacher leaders: A search for a conceptual framework*. ERIC Document Reproduction Service No. ED444958. New Orleans, LA: Annual Meeting of the American Educational Research Association.
- Ulrich, D. (1997). *Human resource champions: The next agenda for adding value and delivering results*. Boston, MA: Harvard Business School Press.
- Vähäsantanen, K. (2013). *Vocational teachers' professional agency in the stream of change*. Jyväskylä: University of Jyväskylä, Faculty of Education.
- Vähäsantanen, K., & Eteläpelto, A. (2011). Vocational teachers' pathways in the course of a curriculum reform. *Journal of Curriculum Studies*, 43, 291–312.
- Van der Bolt, L., Studulski, F., Van der Vegt, A. L., & Bontje, D. (2006). *De betrokkenheid van de leraar bij onderwijsinnovaties – Een verkenning op basis van literatuur* [The involvement of the teacher in educational innovations – An exploration on the basis of literature]. Utrecht: Sardes.
- Van Eekelen, I. M., Vermunt, J. D., & Boshuizen, H. P. A. (2006). Exploring teachers' will to learn. *Teaching and Teacher Education*, 22, 408–423.
- van Oers, B. (2014). Implementing a play-based curriculum: Fostering teacher agency in primary school. *Learning, Culture and Social Interaction*, 4, 19–27. doi:10.1016/j.lcsi.2014.07.003
- Villegas, A. M., & Lucas, T. (2002). Preparing culturally responsive teachers. Rethinking the curriculum. *Journal of Teacher Education*, 53, 20–32.
- Vrijnsen-de Corte, M. C. M. (2012). *Researching the teacher-researcher: Practice-based research in Dutch professional development schools*. Eindhoven: Eindhoven University of Technology.
- Wester, F., & Peters, V. (2004). *Kwalitatieve analyse. Uitgangspunten en procedures* [Qualitative analysis. Principles and procedures]. Bussum: Coutinho.
- York-Barr, J., & Duke, K. (2004). What do we know about teacher leadership? Findings from two decades of scholarship. *Review of Educational Research*, 74, 255–316.