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Collective learning in schools: exploring the perceptions of leadership trainees

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Abstract

Purpose – The purpose of this paper is to explore leadership trainees' perceptions of determinants of collective learning in school settings and of the principal's role in collective learning.
Design/methodology/approach – In total, 24 interviews were conducted with all leadership trainees in a university-based principal preparatory program. Data analysis inductively generated themes that were grounded in the various perspectives articulated by leadership trainees.
Findings – Leadership trainees pointed out three main difficulties facing collective learning: time and place; staff reaction to collective learning; and acceptance atmosphere. Trainees listed four main roles that principals have in shaping the collective learning process: administrator; team leader; collaborator; and visionary.
Research limitations/implications – The findings call for ongoing research on the connection between leadership trainees' conceptualizations of collective learning and their practical capabilities to initiate these learning processes in schools.
Originality/value – The results of this study can shed light on how to prepare leadership trainees in a university preparation program to initiate and sustain collaborative learning interactions among faculty members.

Keywords Schools, Leadership, Principals, Perception, Collective learning, Principal preparation programs
Paper type Research paper

Introduction

School leaders are instrumental in developing high-performing schools (Darling-Hammond *et al.*, 2007; Leithwood *et al.*, 2004). Leaders are expected to positively impact student outcomes (Lashway, 2003), yet little change has been made in principal preparatory programs to meet this challenge (Hess and Kelly, 2007). The issue at hand is whether the pedagogical curricula and strategies of preparation programs can be improved to better build the leadership capacities necessary to lead schools to excellence. One of the important leadership capacities for the principalship in the twenty-first century is the ability to initiate collective learning among school members (Louis, 2006; Schechter, 2005). Thus, principals are required to establish opportunities for teachers to collectively think and share information on an ongoing basis. To this end, collective learning in groups has become one of the central tenets of the leadership preparatory programs' pedagogy, especially in educational systems such as the UK and the USA.

This study is the first attempt to explore the perceptions of Israel's leadership trainees in a university principal-preparatory program, focussing on collective learning in school. The two aims are to examine leadership trainees' perceptions of determinants that foster and inhibit collective learning, and to examine leadership trainees' perceptions concerning the principal's role in collective learning in school. The findings of this study could help in creating guidelines for preparing leadership trainees in a university preparation program to initiate and sustain collaborative

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learning interactions among faculty members. The study can help in bridging between leadership trainees' conceptualizations of collective learning and their practical capabilities to initiate and sustain these learning processes.

Following a description of the theoretical framework that guides the study, the research context and methodology, will be detailed, alongside relevant data. On the basis of the analysis, provisional recommendations for collective learning in leadership programs will be discussed.

Theoretical framework

The conceptual framework is grounded in the literatures on collective learning, principal's role in collective learning, and principal preparatory programs. Therefore, these literatures are examined.

Collective learning

Collective learning structures and processes serve as an analogue to the individual nervous system and explain how the organization can learn in a non-metaphorical and non-paradoxical way (Lipshitz and Popper, 2000). Although organizations do not have a cognitive capacity, or put simply, "brains" (Hedberg, 1981, p. 6), organizations do have cognitive learning mechanisms that enable them to acquire, perceive, and interpret information in a way that is similar, although not identical, to the individual learning process. Consequently, collective learning mechanisms can solve the problem of anthropomorphism (attributing individual cognitive capacities of perceiving, reasoning, and remembering to organizations) and relates learning by individual members to learning by groups and organizations (Lipshitz *et al.*, 2002).

Louis (2006) argued that the capacity of schools to innovate and reform relies on their ability to collectively process, understand, and apply knowledge about teaching and learning. According to Barnes (2000), a focus on gathering and processing information within and between schools requires the establishment of opportunities for teachers to collectively think and share information on a sustained basis. Therefore, to revise their existing knowledge and keep pace with environmental changes, schools need to establish structures, processes, and practices that facilitate the continuous collective learning of all their members (Silins and Mulford, 2002).

Growing evidence suggests that extensive use of collective learning mechanisms related to curriculum and instruction promotes greater teacher commitment and student engagement in school practices (Bryk and Driscoll, 1988; Bryk *et al.*, 1999). Similarly, in a recent study in elementary schools (Schechter, 2008), collective learning mechanisms were positively related to both teachers' sense of collective efficacy and teachers' commitment to their school. Moreover, collegial learning increased teachers' inquiry into instructional materials and practices within the school, which in turn, facilitated the use of innovative pedagogical methods that were consistent with school reforms (Printy, 2002; Scribner *et al.*, 2002).

Principal's role in collective learning

To develop effective preparation programs for prospective school leaders, it is imperative to define the major leadership capacities necessary for schools (Davis *et al.*, 2005; Leithwood *et al.*, 2004; Schechter, 2005; Waters and Grubb, 2004). These capacities include:

(1) Constructing an understanding of how to support teachers in doing their work effectively by providing models of practice. Hence, leaders provide instructional leadership that empowers teachers to promote student learning.

(2) Developing shared goals, identity, meaning, and purpose. Leaders encourage effective communication within a culture of shared knowledge, leadership, and responsibility for school events and processes.

(3) Fostering collaborative processes that cultivate better teaching and learning (e.g. collaboratively designing and implementing curricula).

(4) Recognizing individual and school accomplishments, thus furthering individual and collective efficacy.

(5) Situating teachers' learning in its unique educational context (contextualized leadership).

(6) Facilitating collective learning by establishing organizational structures, processes, and practices.

(7) Modeling learning as a shift in mind, thereby promoting learning in which teachers can construct, refine, and negotiate meanings. To this end, leaders take the role of facilitators and co-learners who guide stakeholders' collective learning.

Overall, school leadership is grounded in developing teaching and learning capacities and in the implementation of effective organizational learning structures and processes (Davis *et al.*, 2005). School leadership focusses on the influence of the leaders on teaching and learning issues (Orr, 2006) through generating learning opportunities for faculty and students (Browne-Ferrigno, 2007; Fullan, 2002; Leithwood *et al.*, 2004; Murphy, 2002; Young, 2008).

Generating organizational learning structures and processes as a core leadership capacity requires a shift in principals' leadership role. The "Galilean Shift" in the new leader's role, as proposed by Kofman and Senge (1993), advocates a shift from viewing the leader as the center around which all organizational participants revolve, to a broader view of leader as designer, steward, and facilitator. "[Leaders] are responsible for building organizations where people continually expand their capabilities to understand complexity, clarify vision, and improve shared mental models – that is, they are responsible for learning" (Senge, 1990, p. 340). Accordingly, leaders (e.g. principal, CEO), regardless of their higher position in the group hierarchy, are subordinate to the principles of deliberation, learning, and inquiry. Thus, leaders do not impose values, but instead they work to establish collaborative learning that respects different assets and voices (Furman and Starratt, 2002).

Willower (1994) posits that commitment to collective learning reflecting can replace the defensive stance held by hierarchical institutions. Consequently, principals are responsible for sowing the seeds of authentic discussion that eventually is practiced "naturally and routinely" (p. 16). To do so, principals lead from the center, not from the top, and concentrate on posing core questions, rather than imposing predetermined solutions (DuFour *et al.*, 2005). The obligation of the administrators, then, is to protect free inquiry and to reject teaching for a particular ideology. In order to frame decisions representing different choices from competing values, principals may serve as gatekeepers for any dispositional ideology, while empowering faculty members to engage in an authentic learning process (Willower, 1994).

Acquiring special expertise or technique is valuable but not sufficient for a leader. More importantly, a leader engaging in a collective learning process serves as the group facilitator, who explains the process, and moderates the discussion toward

shared group action. Thus, the leader conveys and integrates maximum ambitions, hopes, values, and plans for action into a shared group meaning. Similarly, to strengthen the social processes in collective learning, Putnam and Borko (1997) suggest cultivating discourse communities, based on mutual respect and joint responsibility to freely share and explore ideas. In these discourse communities, members share their expertise in meetings based on free-flowing and safe dialogic ways that foster new and creative approaches to school needs (Wenger and Snyder, 2000). Hence, principals are encouraged to create a safe practice field where multiple perspectives are crystallized as a means of overcoming complex school problems. To this end, leaders need to abandon the heroic management stance of knowing all, being all, and doing all. Instead of providing the right answers, leaders are obligated to search for the right questions, questions which foster communal learning.

It was suggested by Murphy *et al.* (2002) that in order to build capacity for collaboration, educational leaders may redefine collaboration to include specific knowledge about working together that can be thought and learned. With that knowledge, leaders can work to bring together different groups involved in education, to achieve specific research-based objectives. Furthermore, for collaboration to succeed at the school level, educators can be recognized and recognize themselves as change agents for building high-achieving learning communities.

Leaders need to be capable of building strong professional communities which can foster teacher collaboration, dialogue, and learning. Establishing such communities requires that principals become collective instructional leaders guiding the development of school improvement that, while based on methodical research, is tailored to school contexts. Collaboratively, principals support relations that create professional communities. They focus on the political conflicts that can interfere with group efforts and help teachers negotiate the tension between autonomy and whole school improvement (Crow *et al.*, 2002).

While responding to social and political pressures, leaders need to buffer staff from counterproductive policies, build school-improvement initiatives that address external reforms, and meet the needs of the school's students and community (Leithwood and Prestine, 2002). Principals can develop learning, which focusses the ongoing learning in school despite distracting social, political, and economic forces. Leaders commit to fair and ethical treatment of all students, considering different needs and learning styles. They use connections between professional and student learning to stimulate learning across levels. They can work with school community members to assess what they collectively believe makes their schools successful beyond the limits of accountability measures (Kochan *et al.*, 2002).

As with any conceptualization, limitations and critiques can be directed at the collective learning conceptual framework: Whose interests are being served by extensively using collective learning? Does collective learning help to secure the hegemony of the administration? Does collective learning assume that knowledge can be free of coercion or deception? Does collective learning represent an organization-centered philosophy at the expense of workers' needs? How can the development of the individual be integrated with the promotion of shared organizational identity through collective learning?

Moreover, the growing efforts to pursue the merits of collective learning can perpetuate practitioners' skepticism toward any kind of communal learning. For example, the social arrangements wherein teachers share and create knowledge are always arenas for potential competition with regard to professional legitimacy and

political power, often inhibiting authentic interactions. Because legitimacy is conferred by its stakeholders, rather than given automatically to individuals or a group, learning in the communal arena can induce fear and vulnerability in light of possible change in members' perceived professional legitimacy. Furthermore, time is perhaps the most salient issue toward productive collegial interactions (Collinson and Cook, 2001), but in light of teachers' heavy workloads, these learning interactions generally become updating mechanisms. Put differently, administrators tend to colonize these blocks of time for collective learning, using them to advance their administrative agenda instead of focussing on instructional practices (Hargreaves, 1994). Collective learning, then, can serve as a political arena, especially in the current era of a global tendency toward standardization.

Principal preparatory programs

Educational leadership programs' content, rigor, and relevance are currently being scrutinized by professoriate who are external to the educational leadership (e.g. Hess and Kelly, 2007) and by educational leadership faculty (e.g. Murphy *et al.*, 2008). The widespread criticism of leadership training programs mainly focusses on the inadequate preparation for the exigent demands of principalship (Copland, 2001; Hale and Moorman, 2003; Levine, 2005), and on their failure to provide prospective principals with the capacities to generate change in their school (Grogan and Andrews, 2002). Often, this shortcoming is coupled with a focus on developing managerial skills, rather than leadership capacities (Browne-Ferrigno, 2007; Kelley and Peterson, 2000).

The transformation of principals from managers to leaders involves preparing principals to be active learners throughout their career, a capacity that needs to be initiated in their training program in the university (Drago-Severson *et al.*, 2008). Such programs can be designed to develop leadership skills for a workplace characterized by high levels of collaboration and rapid change. For this end, attention may focus on specific learning experiences and the curriculum constructed to support the delivery of these experiences (Davis *et al.*, 2005), emphasizing higher-order learning-leadership capacities in a university-based preparatory program (Hallinger and Bridges, 1997). This list of leadership skills and capacities calls for rethinking traditional methods of preparing administrators to meet the current leadership challenges of accountability, standardization, and growing competition faced by today's schools (Elmore, 2000; Levine, 2005).

Collective learning, wherein school members can develop their teaching and learning capacities (Davis *et al.*, 2005), is one path to develop these capabilities. To this end, a growing number of principal preparation programs group students into cohorts. As a social structure, the cohort emphasizes shared learning, collaboration, and teamwork, which help learners think creatively and analyze problems from multiple perspectives (Barnett *et al.*, 2000; Davis *et al.*, 2005). With cohorts as a framework for collective learning, principal preparatory programs can change their focus from content-driven lectures (where the student is a passive receiver of knowledge) to a collaborative and active approach to learning (Copland, 2001; Murphy, 2006). Curricula may be designed to promote ongoing deliberation about actual pedagogical experiences, and encourage questioning the tacit assumptions underlying daily practices (Schechter, 2005). Ongoing inquiry-based deliberation in a sharing and forthcoming community allows prospective principals to apply multiple perspectives and frameworks to situations.

Research context

The Israeli educational system has been traditionally highly centralized both structurally and procedurally (Iram and Schmida, 1998). The Ministry of Education has controlled schools in areas such as, writing and distribution of curriculum materials, standards, testing, and hiring and firing of school staff (Gibton *et al.*, 2000). Schools have followed a basic national curriculum although allowed to conduct "experiments" under administrative direction from the Ministry (Oplatka, 2006). However, in recent years, the tendency toward neo-liberal ideas of competition and privatization has resulted in more open and flexible registration opportunities for urban schools (with weaker links between residential location and school attendance zones). These processes (open enrollment zones, school choices, increased strength of local education authorities in municipalities) have transpired much more in the urban schools, which operate in a competitive environment, whereas suburban and rural schools operate in a less competitive environment. This tendency toward flexible registration opportunities has been coupled with attempts (since late1980s) to decentralize the school system through efforts such as school-based management, autonomous schools, and so forth (Nir, 2006). Although enabling school autonomy is a declared policy of the Ministry of Education, principals are still hesitant to undertake professional autonomy due to the Ministry's attempt to retain a strong centralized control system in operation, generally perceived by principals as bounded autonomy (Inbar, 2009).

In 2007, the Israeli Ministry of Education launched a national reform program in primary schools known as "New Horizons" (Ofek Hadash). The "New Horizons" reform, which involves a significant salary increase for teachers, is intended to raise student achievement levels, improve school climate, and provide equal opportunities for all students. The design of the program centers on the formation of "small-group" learning formats in which teachers work with small groups of students on a daily basis. Complementing the "small-group" format, schools are provided with additional resources for professional development that are intended to prepare teachers to work effectively within the small group format. To this end, teachers' professional development process should be structured and systematic, facilitating the development of accountability and professional commitment (Glickman *et al.*, 2011). The New Horizons reform is currently undergoing the process of implementation. Moreover, the new reform "Oz Le-Tmura" in middle and secondary schools in Israel aims at significantly improving the status of teachers, their level of wages, working conditions, and teaching methods. Similar to the focus in primary schools, this reform provides schools with additional resources for professional development that are intended to prepare teachers to work effectively within learning groups. Since the beginning of the 2011-2012 academic year, the reform was implemented in 50 schools in Israel. The remaining schools will enter into the new reform gradually over the next four years.

In Israel, those seeking to hold a principalship position are required to complete either an MA program in educational administration or a principal preparatory program. Principal preparatory programs are held in major research universities and in colleges of education (12 locations). These two-year (600-hour) programs are supervised by the Ministry of Education and partially funded by it. The programs are meant for educators with a minimum of five years teaching experience, and a small percentage of the trainees are active principals who participate in the program in order to retain their leadership position. About 1,000 teachers apply every year and some 300 are accepted, of whom about a third hold an MA degree (not in educational

administration). Study is in cohort groups wherein prospective principals can develop their capacity to both participate in and facilitate collective learning sessions. Collective learning that emphasizes shared learning, collaboration, and teamwork, is a required pedagogy for universities and colleges operating principal preparation programs.

Research design

The current study attempted to explore leadership trainees' conceptualization of determinants that foster and inhibit collective learning in schools; and the principal's role in collective learning in school. The methodology chosen was that of a qualitative topic-oriented study (Guba and Lincoln, 1994). Using this methodology, I examined leadership trainees' conceptualizations (see also Clandinin and Connelly's, 1996 notion of landscapes) of collective learning. Conceptualizations are like road maps that "provide rules, images and principles that define what the [collective learning] is and how its practice should unfold" (Sergiovanni, 1995, p. 30). Conceptualizations, in this regard, function as personal theories that help leadership trainees navigate in a complex educational context.

Participants

The study population was comprised of professionals who were enrolled in the principal preparatory program in a major research university in central Israel. The majority of those accepted (an average of 24 students each year – a 25-30 percent acceptance rate) had already assumed administrative positions and some were acting principals. Of the 24 professionals in the research group, four were educational counselors, three school vice principals, four acting principals, six grade-level coordinators, four school instructors, and three senior teachers. Students in this principal preparatory program represented a wide spectrum of subject areas, years of teaching experience (seven to 33 years), and school levels (elementary, middle, and high schools). Students taught in various educational systems, such as the State Education System, the Religious State Education System, and the Special Education System. The vast majority of students taught in urban school contexts and the others in suburban contexts. Almost half of them hold an MA degree.

Data collection

Data were collected in the beginning of the 2009-2010 academic year, via semi-structured, individual interviews with all 24 participants to explore the leadership trainees' personal conceptualizations regarding collective learning. The semi-structured interview method to collect data enabled exploration of participants' personal perspectives, while interviewing the different individuals more systematically (Marshall and Rossman, 1999; Patton, 2002). These face-to-face interviews (in the Hebrew language) were conducted with participants by four research assistants (MA level students who successfully completed a graduate course on qualitative research and were trained by the principal investigator with regard to this particular study's data collection and analytic processes. The principal investigator lectured on this topic in the principal trainees program). The 45-minute interviews were audiotaped and transcribed verbatim. Transcriptions were translated from Hebrew to English by a specialist in both languages. All participants were fully informed of the aims of the study. Participants were promised complete confidentiality and received full retreat options.

Data analysis

The analysis process exposed, expanded, and verified leadership trainees' perceptions of collective learning through ongoing simultaneous data collection and analysis (Charmaz, 2003; Strauss and Corbin, 1994). The analysis was performed in two phases: first, vertical analysis, in which participants' voices were analyzed separately; and second, comparative horizontal analysis in which the researcher sought common themes, contrasting patterns, and elucidated the differences among participants' "voices" (Cohen *et al.*, 2000; Merriam, 2009; Miles and Huberman, 1994). Thus, generating themes was an inductive process, grounded in the various perspectives articulated by leadership trainees (Flick, 2009; Marshall and Rossman, 2006; Rossman and Rallis, 2003). Specifically, the analysis of interview data followed Marshall and Rossman's (1999) four stages, namely, organizing the data, generating tentative themes, testing the emergent themes, and searching for alternative explanations.

The above analytic processes were conducted by both the research assistants and the principal researcher. Thus, research assistants analyzed the data independently and then collaboratively reflected on the tentative themes. The principal researcher analyzed the entire data set independently, while reflecting on the tentative analytic themes generated by research assistants. Then, the principal researcher and research assistants met to reflect on the emerging themes, searching the data for disconfirming and confirming evidence to support the themes. Moreover, to evaluate the soundness of the data, a member check with all the participants was conducted. Transcriptions were sent back to participants, requesting to evaluate their responses to the interview questions, and if needed, to add or refine their responses. In doing so, the descriptive data were refined in light of the participants' reactions, thus crystallizing participants' conceptualizations regarding collective learning.

Findings

Determinants of collective learning

Leader trainees pointed out three determinants of collective learning: time and place, staff reaction to collective learning, and supportive atmosphere.

Time and place. Six trainees pointed out that their difficulties are technical, having to find the time and place for collective learning, and said that in order to succeed in a collective learning process they need structured time during their working hours. One of the participants in the preparatory program said, "My fear is that despite my good will to create collective learning teams, the principal will not find the time within school day to make it happen." Another participant said: "The main difficulty is in the technical details. If those details can be ironed out, it will be easier to execute the process." A tenth-grade coordinator added: "There is so much work during the year, and I'm afraid that because of the 'race' we're in, the teachers will put aside the collective learning process."

A school vice principal added her fear that initiating a collective process at her school would suffer from lack of spare time: "I'm concerned with the technical side of a collective learning project, meaning, free time, the endless work at school, the continuing educational program as a result of the new reforms, all of which do not leave enough time to promote collective learning processes among staff members." A senior high-school teacher added that "Without structured and defined time for this process, nothing can get promoted. Random, diffuse meetings miss the whole point of collective learning."

It seems as if the need for a structured time and place overshadows the benefit of the collective learning, as heard in this statement by a sixth-grade coordinator:

> It's a process which can bring about a better understanding but there is a time problem. The educational system is not built for that kind of learning. It needs continuity. Usually it [collective learning] can happen after working hours. Years ago we studied in the afternoon and it was a success. We used to have great dialogues but it was very hard to meet in the afternoon. We need to be very precise in order to derive something from the learning process, and usually teachers are tired after seven hours of teaching.

Staff reaction to collective learning. In order to succeed in creating a collective learning process, teachers should have a positive attitude and feel that they are part of the process. One of the trainees described the positive attitude as an understanding coming from the staff: "When the process that a school wants to engage in is clear to the staff and is not imposed, chances are that it will encounter less resistance." Another trainee described the resistance that can come from the staff as an obstacle to implementation:

> Teachers who won't be interested in the process will oppose it, and will not show up to meetings. There is unwillingness on the part of teachers to start something new again. Teachers will hinder the process, they'll talk about similar processes that failed in other places. There is also the administration that will not support the process and therefore will not ensure that it is implemented.

Another trainee supported the importance of enlisting the staff's support:

> As soon as the teachers are convinced and become part of the process, they cooperate and are ready for an open discussion of their difficulties. To put it more explicitly: the biggest fear is of teachers' resistance to the process, and that teachers will avoid collective learning. When not everyone involved is dedicated to in the process, the learning can lose its value and just fade away. If teachers feel that they can benefit from the process it will be a success, but if they feel that it's a waste of time, the process will not take off.

The idea of introducing collective learning can be thought of as reeducation, and this can be strongly resisted by the teachers: "My biggest fear is that the collective learning process will be interpreted as reeducation of the rest of the staff." Another trainee described the exact persons in the staff that would resist collective learning:

> There is always resistance to every method in the world. I try to explain, understand, cooperate with the rest of the teachers, but there's a fear of resistance to a collective learning process. I think that the teachers who usually oppose innovation and modernism are those who don't want to learn together and don't want to take responsibility for this kind of learning.

One of the trainees gave a possible solution to the fear of teachers' resistance. She thinks that teachers can be actively involved, and that they can raise the subjects for possible deliberation in staff meetings:

> My biggest fear is that teachers won't be interested in cooperating. I mean that they feel that taking part in the collective learning process is a waste of time. This is why I think it's important that the issue deliberated will be relevant to teachers and that teachers will determine the content of meetings. The content of the meeting will rise by the teachers.

A ninth-grade coordinator expressed her perception of the staff's reaction to collective learning processes:

> A teacher who finished a workday, and he is tired and exhausted, will not be emotionally available for the collective learning process. He'll have a "short fuse," especially if one team

> has some skeptical people who are not connected to the process. Those people can raise resistance or be passive aggressive toward the collective learning process and will not take part in the learning.

A high-school educator added:

> More than once I encounter a wall of resistance. The teachers that I work with are mostly senior teachers. Sometimes it's very hard for them to accept the fact, that I, the young and new one, will teach them new things during our faculty meetings, […] so I decided that any change that I want to implement, I'll introduce slowly and gently, and I'll give my colleagues all the tools they'll need to cope with the change.

Acceptance atmosphere. Another determinant was teachers' concern about their colleagues' reaction to the ideas presented in the collective learning process. A high-school teacher said: "I want to create a situation in which teachers can express their opinion freely; to try and reduce resistance in order to promote school goals by explaining and arranging discussions about the advantages and disadvantages of the various proposals." One of the trainees explained the importance of setting an atmosphere of acceptance:

> It's very difficult to give constructive criticism and feedback to the educator who is integral part of the staff. Because feedback isn't only about success, I'm afraid that my feedback will hold back the staff's creativity and initiative, and undermine teachers' confidence.

A high-school vice principal explained her way of initiating a successful collective learning process:

> I start by showing the teacher's good points in class and in the teachers' room, so that the first thing I'll do is display her success for all to see. Once each teacher can bring something from his or her work to the general assembly, I've already created an empathetic group because we all succeeded. Now the point of departure is that we all made it happen and it's really important that each one in the group feel the empathy. After each one brought his knowledge from his private and safe place I begin with a collective learning process.

A teacher perceived the competition between staff members as a situation which can bring about jealousy and gossip. Her most difficult situation stems from the fact that "collective learning has a lot of competition in it. If you are good at something or excel at it, there'll be people who get jealous. Jealousy is bad especially among teachers with such a close relationship. Then gossip starts and it's the hardest thing with teachers' staff." To diffuse the competitive stance between staff members, another trainee talked about the process as a give-and-take situation and said that each member can benefit from it:

> One should lead to an understanding that eventually collective learning benefits everyone involved. Just as I can give something to the process, I can gain from it. The principal should have the capacity to create a good atmosphere of respect and collaboration, reduce competition, and direct everyone toward the same organizational goals.

An important quality identified by the participants, was openness. Three participants pointed out that a good collective learning process is tantamount to an open environment between members of the staff. This means that the learning group has "the capability of sharing personal knowledge and ideas, and passing them from one to the other, and the capability of self-exposure without recoiling or fear, knowing that personal information will stay in the room."

If there is a decision that anything said in the room remains there, trust grows, and participants can stop worrying about saying unsuitable words. This makes them more

open to receive criticism. A senior high-school teacher said, "Openness is agreeing to open to other members of the staff, to be exposed to them and to be ready to receive criticism from them." According to another trainee, openness increases team responsibility. "I think that it's important to create a good environment in the team, because the teachers in the team will be more dedicated to strenuous work and be more responsible toward the team."

Principal's role in developing the collective learning process

Trainees pointed out that the educational leader's role is crucial to the development of a collective learning process. They talked about four main roles that principals have in shaping the collective learning process: administrator, team leader, collaborator, and visionary.

Principal as administrator. Trainees argued that a principal should create optimal conditions for his staff, in order to engage the collective learning process. The principal creates the physical conditions for collective learning, set times, and establish regulations. Trainees focussed on the role of the principal in initiating the collective learning process:

> I think that the capability that a principal needs is initiative. The principal should initiate meetings in which staff members can share their successful experiences, their problems and solutions. I think that the principal should make time for staff meetings. The principal needs to make sure these meetings are all scheduled during school day.

A teacher said that the principal should be sensitive to his staff, and not bring outside professionals to arrange teachers' gatherings: "Principals should understand that collective staff learning is essential. Sometimes the principal arranges for unnecessary meetings while the important thing is for the teachers to have time and be able to talk and share their work."

A secondary-school principal explained that her capacity regarding collective learning is scheduling time for the staffs to meet and plan the learning process together:

> Today, when I construct a schedule, I consciously include regular hours for the staff to get together. In other words, for each echelon and professional staff there is an hour in the schedule for collective learning and for promoting the learning process. I set a permanent time frame for the long term, in which teachers get together, planning, sharing their thoughts and knowledge, and taking collaborative responsibility.

Similarly, a high-school educational counselor perceives the importance of the capability to create technical conditions for collective learning:

> I think that the important capability for a principal should be creating the opportunity for collective learning. Right now as a counselor, I provide the professional aspect of the meetings […] but collective learning process can rise and fall over the technical details which the principal must handle and organize: time, place, instructors, and even refreshments.

Another aspect of the administrative role of the principal is the budget, and how the principal uses it in order to improve collective learning process. As one of the trainees said:

> In my opinion, the most important capability of a principal is backing-up, meaning, to do whatever is needed in order to allow collective learning. Many times at school we sit as a team and engage in collective learning, but there are times that we requested outside professionals, and the principal pays for those hours, even if it costs a lot of money. The budget issue is very important in initiating and especially sustaining collective learning among the staff.

Principal as team leader. According to trainees, principals should have the capability to manage a team, meaning that they need to have the skill to identify the strengths in each member of the staff in order to make learning efficient. An elementary-school teacher who participated in the program said: "The capability which we need in the principal is to know how to map his staff. Create interest groups and appoint a leading teacher to head each team."

More specifically, a high-school teacher said that as a team leader the principal should trust his staff, and should know how to delegate authority to others, and just watch the process taking shape. "Principals should allow the team to engage in a collective learning process while helping and supporting the actual process, even if sometimes the process fails." Another trainee said that the principal should create an opening to allow communication. "The principal should enable an open communication, interpersonal dialogue, permit staff members to ask questions, voice criticism, and convey different viewpoint."

A different perspective of the principal's role is "backup." Principals should back their management team to motivate the professional staffs toward a collective learning process. Their job is to maintain an overview of the process and voice an opinion about the way it is proceeding, without playing an active part. As one trainee said: "With management back up, the collective learning process can happen. The principal has to be in the room and support the staff in their collective learning – the principal's presence in the learning team is important."

Principal as collaborator. Six trainees pointed out that the important capability of the principal should be sharing in decisions. Accordingly, principals cannot be separated from the collective learning, and should share their opinions and decisions with staff members. In this regard, the management team should be partner to all of the collective learning and subsequent decisions that affect the entire school. One 12th-grade coordinator gave an example of the importance that she sees in collaboration on decisions:

> I was chosen to lead a project in my school. Obviously, for the project to succeed I had to plan ahead. Therefore from the moment I got the job I collected all relevant material. I called a meeting, in which I did not dictate my opinion, I just said what the subject would be and asked the staff to share their feelings and thoughts […]. I clarified that we are a thinking team and that our target is to use our various opinions to create a wide and interesting plan, and that the most important thing is to create a collective product, produced by the team.

Furthermore, trainees pointed out the principal's role in sharing his/her thoughts and agenda during the collective learning process. For example, one trainee said that "the principal should convey his agenda to his leading crew during the learning meetings, and then bring it to the entire staff." Another trainee emphasized the effect of a shared learning with the staff. He said that such sharing makes staff members feel more committed to the process and to the principal: "If the principal openly shares his goals during these meetings, the staff is much more committed, which will lead to a good will on the part of the staff toward collective learning for the long term."

Principal as visionary. Principals lead a process that is consistent with their thinking. It is the principal's vision that can lead and promote collective learning, and can also lead it to destruction. One of the trainees defined this vision as a crucial step in starting and moving forward a collective learning process:

> The principal's capability is vital in endowing and organizing teachers' staffs to learn in a collective learning process. The principal himself should be certain that the collective

learning is the right way to motivate his staff. There is no doubt that a principal can help or halt the collective learning process.

One trainee said that in a collective learning process, the principal's role is to define the underlying assumptions of the process. Thus, "to motivate the staff toward collective learning, the principal should explain the concept and the goal of the collective learning process, as well as its benefits." To emphasize the principal's vision as a major influence on the collective learning process, one trainee said that the two qualities needed in the principal are persistence and faith. The principal is a model for the entire staff for how a collective learning process can happen in class: "The capability needed from a principal is to transmit a message of faith and persistence in the collective learning process. As soon as the principal transmits confidence in this learning type, teachers are more willing to engage in collective learning."

Furthermore, one trainee pointed out that it is important that principals be able to lead their staff toward collective learning, adhering to their vision and acting upon it, despite obstacles. Thus, a "principal who is interested in leading staff toward a collective learning process has to be a person with a strong vision and initiative. A principal with a vision and a defined way will succeed in recruiting his staff and leading it toward collective learning." Another trainee, reiterating that point of view, said that if the staff knows and feels that its leader has strong and clear vision regarding the need for collective learning they more willingly support him and act according to his directions. Her exact words were, "if the teaching staff sees that their leader has a clear path, defined vision, and clear aims and goals, and if the staff feels that the management truly believes in collective learning, teachers will be happy to be harnessed to the action of the management."

Moreover, a high-school teacher said that the principal should have a vision which supports open dialogue, and this would be his contribution to collective learning in his school. Put bluntly, "school must have a certain and significant vision which will emphasize open dialogue in decision making, relating to school as a learning organization." According to a vice principal, the path of the principal is very important, because it sets the school's organizational culture. For collective learning to work in a school, it needs to run through the entire organization, so that "the collective learning idea has to be a part of the school policy and go through all systems inside the school – duty holders, coordinators, educators, and students."

Discussion

Leadership trainees pointed out the lack of structured time for collaborative learning during their workday. Thus, the way the school day is organized limits the possibility to create both informal and formal learning processes. Reed *et al.* (2001) argue that unlike the business sector, time for communal learning cannot be carved out of a teacher's workday. Altering traditional structural arrangements in schools and reorganizing school schedules to allow for teacher-administrator deliberations are problematic and challenging. This structural change requires a mental shift from viewing the school day as limited to teaching hours only to one in which learning occurs continuously among all practitioners in schools. In other words, schools can become learning organizations based on continuous communal deliberation, rather than narrowing their functions to teaching hours only.

Findings showed that trainees thought that the educational leader should be a person who reveals each team member's strength, and can trust his staff to promote the collective learning process. Leaders engage the people in the organization to work as a

community (Wenger and Snyder, 2000). A leader who invests in his organizational "social capital" is a leader who emphasizes the relationship between the individuals and their working environment. In an organization based on "social capital," the leader invests in developing the people through collective negotiation of meanings.

According to the findings in the present study, trainees thought that when the principal strongly believes in the collective learning process, the staff will gain confidence, which, in turn, could better motivate them to engage in the process. Hence, the role of principals is of the utmost importance in reframing schools as learning organizations (Leithwood and Prestine, 2002; Silins and Mulford, 2002). Whereas schools are still perceived as operating according to hierarchical and rational bureaucratic models (Schechter, 2005), learning in schools demands leadership that "is about learning together and constructing meaning and knowledge collectively and collaboratively" (Lambert, 1998, p. 5). Principals are key players in introducing reflexive spaces, forums, and mechanisms into the ongoing school structure and promoting a learning culture necessary for a productive learning process (Louis, 2006). Leadership for collective learning, then, requires establishing time and space and instilling a learning culture.

In order for staff members to share their ideas, leadership trainees argued that principals are required to nurture a supportive environment. In this regard, structured collective learning processes can be embedded in a culture of trust and accountability (Schechter and Feldman, 2010). Fullan (2002) argues that we need to begin with structural efforts, or that these can be made while initiating a reculturing process in which teachers collaboratively become continuous learners. As it takes considerable time and effort for teachers to feel comfortable in collective learning mechanisms, it is imperative to establish a supportive learning culture prior to curricular, instructional, or structural reforms.

Trainees underscored their concern that attempts to implement collective learning would flounder due to the predominant lack of a learning culture in the educational system, a culture in which educators could be generous in sharing their capabilities. Trainees even described a contemporary anti-learning culture in their schools, which manifests itself in stakeholders' fears about the learning process (fear of criticism, fear of having one's professional legitimacy threatened, and so on). It may be the case that collective arena tends to stimulate reflection about colleagues with regard to individuals' professional knowledge and skills. When teachers within schools or principals at the district level compare the competencies presented in their peers' practices with their own professional work and skills, they can perceive themselves as less professionally capable, thus reducing perceived self-efficacy, or vice versa. By extension, as perceived self- and collective efficacy influence one another in reciprocal ways (Goddard and Goddard, 2001), collective learning can revitalize or demoralize faculty's shared belief in its conjoint capabilities to organize and execute the courses of action needed to attain their school's mission.

Implications for principal preparatory programs

Collective learning, rather than individualism and separation, may serve as one of the core tenets underlying principal preparatory programs (Murphy, 2006). However, the continuous efforts to develop prospective principals' collective learning skills as a core leadership capacity have not had a significant impact. This suggests the need to rethink the instructional framework of leadership preparation in order to meet the current leadership challenges faced by schools (e.g. accountability, standardization).

Can principal preparation programs focus more on communal learning so that future principals acquire the skills of communal thinking, and if so, how? Most schools are not organized for collective interactions among their members. Therefore, future principals can gain experience and be accustomed to work collectively from the onset of their professional preparation.

In order to do so, principal preparation programs may concentrate on posing core questions, rather than imposing predetermined administrative solutions and tools (DuFour *et al.*, 2005). The obligation of the faculty would then be to protect free inquiry and to reject advocating for a particular ideology. Instead of adhering to a priori/established theories, prospective administrators will benefit by incorporating their sociological, political, and psychological perspectives in the deliberative process. For decisions to represent different choices from competing values, prospective principals can experience serving as gatekeepers for any dispositional ideology, while empowering their colleagues to engage in an authentic communal learning process (Willower, 1994).

Initiating and expanding the communal learning process into common practice requires designing a practice field – a field of play (Kofman and Senge, 1993). Principal preparation programs can construct their own practice fields or virtual worlds, for the sole use of experimentation. Although this communal learning practice field resembles the real action domain, it allows taking risks because no move is irreversible. This "microworld" or "reflective practicum" (Schon, 1987) provides a safe arena for prospective principals to transform their points of view.

It is important for both researchers and practitioners to scrutinize the following questions: to what extent is the actionable knowledge generated in the collective learning sessions in the university preparation relevant and useful in school/classroom practices? Can leadership trainees take the role of facilitator in school-wide collective learning? Therefore, what are the skills or dispositions leadership trainees need to enact these collective learning practices? How should collective learning be taught and practiced in principal preparatory programs?

To conclude, in today's era of accountability, generating organizational learning structures and processes is a core leadership capacity. The current paper highlights the need to conceptualize and empirically investigate collective learning as an instructional framework to develop effective leaders. Nevertheless, we need also to consider the possibility that with so many educators (e.g. prospective principals) opposed to collective learning as well as stressing its difficulty in school settings, collective learning might be the wrong path to pursue. It is important to further explore whether instructional practices centered on collective negotiation of meanings develop leaders who can facilitate structural and pedagogical changes that positively impact student achievement.

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