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# Ursula Liebhart $^{*}$

# Productive Energy Cycles in Mentoring Relationships. A Qualitative Investigation<sup>\*\*</sup>

Cross-Company Mentoring is an external form of business mentoring across organizational borders. Thereby it is important that the participants are able to quickly get into a high quality developmental relationship to reap the benefits of the learning opportunities. This paper thus focuses on the influence and impact of an essential power, namely the human energy that emerges and flows between two interactive individuals. Based on a study that provides a unique dyadic and qualitative empirical examination of the development of mentoring relationships, the relationship between the perceived energy level of 13 mentoring tandems and their outcomes are examined. The mentoring tandems are classified into high, medium and low-performing tandems. Similarities and differences between these performance groups as well as same-gender and crossgender tandems are worked out. Suggestions for a reflected and successful development of sustainable relationships are made.

# Produktive Energie-Zyklen in Mentoringbeziehungen. Eine qualitative Studie

Cross-Company Mentoring ist ein interorganisationales Programm für die Zeitspanne von zwölf Monaten, in dem Teilnehmer aus unterschiedlichen Organisationen in Tandems zusammengestellt werden. Es ist wichtig, dass die Teilnehmer schnell in eine hoch-qualitative Mentoringbeziehung einsteigen können, um die Vorteile aus den Lernmöglichkeiten umsetzen zu können. Deswegen fokussiert dieser Beitrag auf den Einfluss und die Wirkung einer essentiellen Kraft, nämlich der humanen Energie, die zwischen zwei interaktiven Personen entsteht und fließt. Basierend auf einer qualitativen empirischen Untersuchung der Entwicklung dieser Lernbeziehungen, wird der Zusammenhang zwischen dem wahrgenommenen Energieniveau der Tandems und deren Ergebnisse untersucht. Die Ergebnisse erlauben konkrete Vorschläge zur reflektierten und erfolgreichen Entwicklung von nachhaltigen Beziehungen.

# Key words: energy and performance, dyadic relationship, cross-company mentoring (JEL: M10, M12, M53)

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# 1. Introduction

Over the past decades, an impressive amount of research has been done in the field of mentoring. According to Mullen (1994), mentoring can be defined as a dynamic, reciprocal relationship in a work environment between an advanced career incumbent (mentor) and a beginner (mentee) aimed at promoting the career development of both. A large number of studies have examined the characteristics of the mentoring process, the mentor, the mentee, and their impact on the performance of the mentee, mentor, and organizations (Allen, Eby, Poteet, Lentz, & Lima, 2004; Underhill, 2006, p. 301; Weinberg & Lankau, 2011). Over the years, the research topics have shifted slowly but continuously from informal mentoring (Kram, 1985) to formal mentoring programs (Haggard, Dougherty, Turban, & Wilbanks, 2011). The lack of research on formal mentoring programs and their effectiveness has already been documented many times by the current mentoring literature (Egan & Song, 2008; Ensher & Murphy, 2011; Weinberg & Lankau, 2011). Thus, only few studies explicitly compare formal and informal mentoring (Allen, Day, & Lentz, 2005; Baugh & Fagenson-Eland, 2007; Chao, Walz, & Gardner, 1992; Ensher & Murphy, 2011; Fagenson-Eland, Marks, & Amendola, 1997; Noe, 1988; Ragins & Cotton, 1999). But the number of studies on formal mentoring and successful program characteristics has increased in the last decade. Studies comparing formal and informal mentoring indicate that informal mentees reported higher career-related support and higher levels of mentoring on almost all mentoring functions when compared to formal mentees. It was remarkable that Ragins et al. (2000) first suggested that formal mentees with high levels of satisfaction do not differ in their outcomes from informal mentees. This led Wanberg et al. (2003) to the conclusion, that "formal mentoring relationships have the potential to reap the same benefits as informal mentoring relationships". At a later date, Wanberg et al. (2006) found out that mentor pro-activeness and mentees' perceptions of similarity had an important impact on positive mentoring outcomes. Ensher and Murphy (2011) did not find any difference between formal and informal mentorship in their study.

Meanwhile, mentoring literature also focuses on internal formal mentoring programs (Allen, Finkelstein, & Poteet, 2009; Baugh & Fagenson-Eland, 2005, 2007; Eby, 2011; Godshalk & Sosik, 2003; Payne & Huffman, 2005). Results of the research called for important issues to be addressed when developing and supporting a formal mentoring program inside an organization and stressed the importance of highly facilitated formal mentoring programs (Egan & Song, 2008). Research identified the importance of a clear communication of program objectives, better matching, targeted participation in the program and better program monitoring (Eby & Lockwood, 2004), commitment of the mentor to the program (Feist-Price, 1994), careful screening of applicants, good preparation of the participants and tools for supporting the mentoring relationship (Givens-Skeaton et al., 2003).

Only few studies have examined external formal mentoring programs (Baugh & Fagenson-Eland, 2005; Baugh & Sullivan, 2005). One example for this type of program is the so-called Cross Company Mentoring (CCM). In these CCM programs, participating companies assign at least one mentor and one mentee to the program, so that the mentors and mentees are cross-matched over organizational boundaries. The programs show notable results for mentees, mentors and organizations (Liebhart, 2012). The present study also refers to a CCM program.

Another discussion of the mentoring research is about the impact of gender composition on functions and outcome of mentoring relationships. As women perceive greater barriers to finding a mentor than men, a range of formal programs has been installed to support the development and career of female mentees (Eby, 2011). The CCM program, which is examined focuses on female mentees with female or male mentors. From a gender perspective, the study also focuses on the differences and similarities between the development of cross-gender and same-gender tandems.

Ensher and Murphy (2011) have recently highlighted that only a few studies stress the importance of the mentor-mentee relationship and its development. This is remarkable as many definitions of mentoring mainly focus on the importance of giving advice and emotional support and other relevant advantages through an experienced person. Only few definitions focus on the social relationship level that builds the foundation for any kind of learning exchange. The definition of mentoring used in this study goes one step further and stresses the learning und development of both persons within the reciprocal developmental relationship. Hence, the definition used is consistent with the three core attributes set up by Haggard et al. (2011). (1) Reciprocity within the relationship, involving mutuality of social exchange as opposed to a oneway relationship; (2) Developmental benefits linked with the mentees' work and/or career as well as benefits for the mentors, so that mentoring is conceived as a "learning partnership" (Eby, 2007); (3) Regular and consistent interaction over the whole period of formal time.

To sum up, this mentoring approach emphasizes the fact that both participants of a mentoring tandem are learning individuals. They are highly interested in developing a fundamental and well-performing relationship to get the best out of it through regular interactions within a defined period of time. An effective performing relationship involves high levels of energy and engagement of all partners within the relationship (Dutton & Heaphy, 2003; Ragins & Klemm Verbos, 2007). The question arises how the mentoring dyad is able to develop a relationship full of energy and engagement with high outcomes for the mentee and the mentor. Thus, this study provides a unique dyadic and qualitative empirical examination of the developmental processes of energy in mentoring relationships in a Cross Company Mentoring program. Based on several criteria, the mentoring tandems were classified into high, medium and lowperforming tandems. The similarities and differences between these three groups were analyzed in terms of critical success factors between mentor and mentee to develop a dynamic concept of human energies in mentoring relationships. Additionally, it will be shown that both a same-gender and a cross-gender matching influence the energy of the tandem.

The article starts with a discussion of theoretical concepts for Cross-Company Mentoring, gender composition in mentoring tandems, aspects of high-quality relationships and dimensions and dynamics of human energy. Then the paper outlines the research method, followed by the presentation of results, discussion of findings and a dynamic conceptualization of tandem energy in mentoring relationships.

#### 2. Theoretical concepts

#### 2.1 Concept of Cross-Company Mentoring (CCM)

This study examines a Cross-Company Mentoring (CCM) program.<sup>1</sup> This kind of mentoring is defined as a formal, external, and facilitated business-mentoring program.

Many different models of mentoring exist. The process model of CCM used in this study refers to Liebhart (2012) and contains the following steps: (1) Cross Company Mentoring programs are established for the duration of 9 up to 12 months and the common goal is to support young executives (or those who will become executives within the next few months) in their future career development. Most CCM programs focus on young female executives. The programs are usually initiated and controlled by independent advisors whose tasks encompass the acquisition of participating companies, the matching of mentors and mentees in tandems, the design of the facilitating program for the participants, the evaluation of the program and whose role is that of trouble shooters for any problems within the program or the mentormentee-tandems. Some of the programs use a steering board consisting of human resource managers from the participating companies to support the advisor in the matching process and in designing the program. (2) Each participating organization nominates at least one mentor and one mentee in a round of mentoring program. The organizational selection criteria and process, as well as the incentives and organizational support through HR or the superiors, may differ between the participating organizations. Generally, the CCM advisor has no influence on the nomination of the mentees and mentors. (3) One of the critical success factors of the CCM program is the matching of the tandems across all participating companies. The question "how to pair the participants" is crucial for the development of the mentoring relationships. Information about the mentees and mentors are gathered based on interviews and questionnaires. In most CCM initiatives, the participants are matched according to criteria relevant to the goal of the mentoring program and the individual target. The results of the matching are tandems with members from different organizations and/or from different organizational sections. (4) The mentoring relationship is an ongoing and interactive learning process. Mentees contribute to the relationship energy by referring to their current job challenges and their know-how acquired in their academic training and their organization. Mentors contribute their reflective external perspective, their long-time experience in business as well as their energy. Both get feedback and know-how from the other person, new ideas as well as suggestions for improvement. This ongoing exchange between two people is nourished by a high interest in the other person and their challenging objectives. High-performing tandems are able to reach a high level of exchange of knowledge. (5) The program is facilitated by the advisor through a kick-off event, several training rounds and workshops for mentees and mentors, an evaluation and a closing event. All training rounds are focused on preparatory activities and on the goal of the mentoring program. (6) The relevant out-

<sup>&</sup>lt;sup>1</sup> In Europe, the term "Cross Mentoring" is generally accepted, whereas in America the term "Cross Company Mentoring" is better known. We appreciate and use the American naming because it includes the relevant and differentiating design element of the program.

comes of a Cross Company Mentoring program complement the traditional benefits. The mentees usually gain a broader perspective of the business and critically reflect on their own organization by means of the outside perspective of the mentor. Mentees find it easier to think "out of the box" by discussing their experiences with a person outside any given hierarchical restriction. As hierarchy inhibits openness, this cross company setting allows a quick start of trust-based relationships. Mentors gain an unfiltered insight into the requirements and expectations of young executives as well as into other organizations. This fosters the reflection of thinking patterns, dealings with a person outside the hierarchical line and the development of social competencies. The benefits for organizations are evident in two developed persons with a more reflective and, in most cases, more satisfied perspective on the organization. Through the implicit knowledge transfer, the organization gains specific know-how about processes and structures, strategies and cultures that could be important innovative impulses for organizational development.

#### 2.2 Gender composition in mentoring tandems

As mentioned in the introduction, many formal mentoring programs are installed to support the development and career of female mentees. Tong & Kram (2013) summarize that the empirical research indicates mixed empirical findings. Despite this, there are some results related to gender aspects in mentoring tandems that should be given more attention. A meta-analytic investigation of gender differences in mentoring (O'Brien, Biga, Kessler, & Allen, 2010) showed no gender differences in mentees' experience or mentees' results in career development. But the meta-analysis highlighted some significant effects on the functions and outcomes of the relationships. Regarding the mentees, studies found out that male mentees received more psychosocial support from female mentors (McKeen & Bujaki, 2007). But in total, they received less psychosocial support than female mentees. To sum up, same-gender mentoring relationships involved greater psychological support. From the mentees' perception, female mentors were perceived to provide more role-modeling than male mentors (Sosik & Godshalk, 2000). Mentees generally prefer same-gender relationships. But especially women are more likely than men to be in cross-gender mentoring relationships (McKeen & Bujaki, 2007). Explanations may be found in the organizational power and influence, which is assigned to a male mentor (Burke & McKeen, 1996), in the access to the "old-boys' network" (Rangins & Sundstrom, 1989), and in a coaching to deal with male management style (Giscombe, 2007). Concerning the mentors, some studies came to the conclusion that female mentors provided more psychosocial support than male mentors. But they were not able to provide comparable career-related assistance (Eby, 2011; O'Brien et al, 2010, Ragins, 1997; Sosik & Godshalk, 2000). Furthermore, female mentors provided significantly lower challenges to career goals and risk orientation than male mentors (Ensher & Murphs, 2011).

There are also differences concerning the influence of the gender composition on the mentoring relationship. Cross-gender relationships can be more difficult to manage and develop than same-gender relationships, due to the fact that they have to face certain specific challenges of cross-gender tandems like the absence of role modeling, intimacy and sexuality concerns, stereotypical roles, and public scrutiny (Bowen, 1985; Hurley & Fagenson-Eland, 1996; Feist-Price, 1994; Kram, 1985). Cherniss (2007) found out that emotional intelligence such as self-awareness, self-control and empathy help mentors and mentees to deal with gender stereotypes and emotional irritations that limit their own behavior and learning. Because of that, a highly emotional intelligent tandem can address the challenges posed by cross-gender relationships more successfully. Although cross-gender relationships are demanding because of the cross-gender challenges, they also offer positive effects due to the analysis of the mindset, values and principles of the other gender. Additionally, mentors in cross-gender mentoring relationships reported that their mentees utilized the mentoring relationship more effectively than mentors in same-gender relationship (Noe, 1988).

#### 2.3 Energy level in high-quality developmental relationships

Mentoring is traditionally seen as a dyadic concept between an advanced mentor and a less experienced mentee. Over more than 20 years, the approaches to mentoring and the trends linked with it have evolved (Ensher & Murphy, 2011; Haggard et al., 2011), creating manifold forms of mentoring relationships. The most important concepts of mentoring are group-mentoring, peer-mentoring, step-ahead mentoring, e-mentoring, reverse mentoring and Cross-Company mentoring. All these mentoring forms aim at the development of one or both persons within the defined relationship but use different context factors. Some authors emphasize the quality of the relationship between two people as an indicator for relationship satisfaction or as a construct that includes emotional affect, reciprocity, mutuality, interdependence, and mutual motivation to be responsive (Higgins & Kram, 2001; Ragins et al., 2000). In the context of relationship leading to instrumental outcomes. With a few exceptions (Allen, Eby, & Lentz, 2006; Eby & Lockwood, 2005; Ragins & Scandura, 1999), the benefits for mentors have not been clearly articulated or studied.

Yet, the mentoring relationship can be a source of mutual growth and development for both mentor and mentee. Dutton and Heaphy (2003) defined it as highquality connection with three characteristics of the connection itself. First, high-quality connections show a higher emotional carrying capacity and positive as well as negative emotions. Second, the tensile strength of the tie is an indicator of the resilience or the capacity of both tandem partners to get back on board after setbacks. Third, the degree of connectivity is a measure of a relationship's generativity and openness to new ideas, possibilities for action and creativity and, in the complex systems thinking, the ability to discard aspects that prevent possibilities and avoid behavior that will shut down generative processes. The highest-quality connection measured at the highest quality dyadic outcome can be called "a close mentoring bond" (Ragins & Klemm Verbos, 2007). People in high-quality connections share three experiences that can be seen as important barometers of the quality of a connection between people (Dutton & Heaphy, 2003). High-quality connections lead to subjective experiences of vitality, positive regard and mutuality. Thereby, mutuality is more than just reciprocity as it gives people the feeling of potential movement in the connection. Additionally, Ragins and Verbos (Ragins & Klemm Verbos, 2007, p. 97) assume higher levels of commitment in the relationship the closer the mentoring bonds are. In their continuum of quality of mentoring, the focus of relational mentoring widens our perspectives from a one-sided, exchange-based relationship focusing on the mentee's career outcomes, to a dyadic communal relationship with cognitive and affective processes that lead to mutual learning, growth, and development.

People who describe high-quality connections frequently use the term "full of energy" to express the perceived feelings in productive moments. But what is energy? Some research results define energy as nothing but emotional experience. Groundbreaking research by Quinn, Spreitzer, and Lam (2012) identified six approaches to human energy by searching organizational and social science databases. Yet, even these approaches fall short of explaining the joint power, common engagement, and committed search for excellence in social systems. As human energy in social systems is a social phenomenon, the authors stress the need for more research on collective levels of analyses (Barsade, 2002; Cole, Bruch, & Vogel, 2012; Vogel & Bruch, 2012). In this paper we follow the concept of Cole et al. (2012) where energy encompasses three domains. First, affective energy refers to people's shared experience of positive feelings and emotional enthusiasm due to work-related issues (e.g., feeling of excitement). Second, *cognitive energy* refers to the shared intellectual processes that propel people to think constructively and in a solution-focused way as well as being alert and having a desire to focus attention in order to make good things happen. Third, behavioral energy reflects people's joint efforts to achieve benefit. It encompasses joint work and influence, pace, intensity, and volume of purposefully investing physical resources. Energy can be found at an individual level and at a collective (tandem) level within a mentoring relationship. Studies emphasize the positive correlation between energy and outcomes for both individuals and organizations, or the social system (Bruch & Ghoshal, 2003; Cole et al., 2012; Cross, Baker, & Parker, 2003; Dutton & Heaphy, 2003; Quinn, 2007; Spreitzer, Sutcliffe, Dutton, Sonenshein, & Grant, 2005). In this study, the coherence of the perceived energy through mentoring tandems and the perceived outcomes are relevant.

#### 2.4 Reinforcing energy-cycles in high-quality developmental relationships

Energy is not a given fact, but from an interpersonal view, energy is an emerging phenomenon between two persons with a reciprocal influence between energy and connection. Some scholars, such as Collins (1990, 1993), describe the effect of relationships on energy. For this approach, energy is an output of the interaction because he treats entire social interaction chains between the individuals as single units of analysis. For others scholars, such as Dutton/Heaphy (2003) and Quinn/Dutton (2005), energy is also an outcome of high-quality connections, but in addition they seek to explain why relationships affect energy as a form of input. They discuss several theoretical lenses (exchange, identity, growth and learning theory) and then explain their theory of coordination for connections where conversation can be considered as a primary means for connection (Quinn & Dutton, 2005). They argue that conversational acts raise energy when they increase a person's perceived belongingness, competence and autonomy. Based on this perception, Quinn (2007) developed a reinforcing model of energy cycle in a relationship. Through the mechanism described above energy in a relationship will increase. And conversely, energy itself influences the quality of the relationship. Mutual resources and feedback give structure to the connection, attachment enhances the creation, preservation, or improvement of connections. Therefore, Quinn (2007) characterizes the relationship between energy and connection as a reinforcing feedback loop. Constructs reinforce each other in a virtuous cycle. The study not only examines the energy levels in the mentoring tandems but also evaluates how energy cycles influence the level of performance in tandems.

### 3. Methods

#### 3.1 Design and guideline-based interviews

The study was conducted with mentees and mentors from a Cross-Company Mentoring Program in Austria. It aims at answering two questions: (1) what distinguishes high performance tandems from low performance tandems, (2) does the energy level of the mentoring tandems influence the outcomes, and, regarding these goals, (3) to what extent does the gender composition of the tandem matter?

The guideline-based interviews were used to gain insights into the motives to participate in the program, the organizational context factors as well as the perceived support through the framework and the facilitating program. The interviews contributed to an understanding of the interactive learning relationship, the discussed issues, the effective working methods of the tandems, and the perceived energy level of the tandem over the duration of the program. Finally, the interviewees were asked about the perceived outcomes in the cross-organizational setting.

Interview data were prepared by using qualitative and some selected quantitative data-gathering techniques in an integrative manner. Each interviewee was asked a standard set of questions which were designed to be open-ended. Apart from that, the interviews contained some forced-choice and scaled items that quantified information. Each interviewee received two sheets. The first sheet showed a horizontal time line from the starting point to 12 months and a vertical line from lowest (minus 70) to highest (plus 70) level of energy perceived in the mentoring relationship. Because there was no fixed starting point, the interviewees were free to draw their respective curves of energy on the sheets. After drawing the energy curve, the participants explained why the curve went up or down and what they had done to stop a decreasing energy level or to energize the tandem relationship. They were further asked to describe perceived changes in the quality of their relationships. The second sheet asked the interviewees to assess the level to which their expectations had been fulfilled. Then the interviewers encouraged them to explain their judgment.

Two trained interviewers conducted 27 face-to-face interviews and 3 telephone interviews during spring 2010. The first interviews with mentees were conducted by both interviewers to test the initial protocol and to ensure consistency across interviewers. Some marginal changes were necessary in the phrasing of the questions. The adaptation of the protocol proved to be appropriate. The interviews lasted from 70 to 90 minutes. All interviews were audio-taped and transcribed.

#### 3.2 Participants

The participants in this study were employees from over 20 organizations in Carinthia (Austria). They ranged in size from 250 up to 2500 employees. The CCM program

supported young female executives in their career. It started in 2003, took place six times and lasted for 12 months. In total, between 2003 and 2010, 75 tandems participated in six rounds of the program. In the examined CCM program all male and female mentors belonged to the management board or at least to the highest level of the hierarchy. The mentees were young female executives who had made their first steps into leadership positions or had stepped into a new job with wider responsibility. Participants represented a diverse range of industries, including health care, the energy or financial sectors, manufacturing, tourism, and IT-companies. The tandems were matched by the advisor of the program, who interviewed the nominated mentors and mentees according to her criteria, i.e. the goals of the mentee, the experience of the mentor as well as the similarity of the personalities and working styles. The mentees were also asked to specify gender preferences in the choice of their mentors. Some mentees were "indifferent" in their preference, the advisor tried to fulfill the expectation.

We decided to select two tandems of each round, each of them with a female and a male mentor. The age of the mentors varied from 45 up to 63 years. The age of the mentees ranged from 21 to 39 years. In total, we asked 34 individuals for interviews and collected data from at least 30 individuals. Due to the dyadic approach of the research, we ended up with 13 complete tandems to analyze. Five tandems started with female mentors and eight with male mentors.

#### 3.3 Procedure of data analysis

The design permits a mixed method approach. In a first step, the quantitative data were analyzed according to the research questions of the study. One dominant question was to identify the differences between high-performance and low-performance tandems. Therefore, we defined three factors regarding the performance. First, we measured the expectations of the mentees and mentors at the beginning of the program as described in the interviews. This coding process led to the definition of three categories of expectations for the mentees: expectations concerning the mentor, expectations concerning the solution of some aspect in the working field, and expectations concerning the CCM program. Based on the coded data, we assessed the data from "none" (value 0), to "modest" (value 1), "some general" (value 2), "articulated" (value 3), to "very concrete" (value 4) expectations in each expectation category. Second, we evaluated the fulfillment of the expectations (FE) of mentees and mentors, which they assessed on a separate sheet on an interval scale from a minus 2 value for "not reached" to a plus 2 value for "decisively exceeded". The value of 0 means that the benefit has reached the expectations. Finally, we measured the perceived *curve of energy* by taking into account all positive and negative deviations from the horizontal line for each individual, and cumulated them for each tandem and transferred the data into a calculation program. The data were analyzed to find consonance or differences within and between the tandems. The cumulative energy level of each tandem was calculated. The energy curves of each participant were measured on a scale from minus 70 to plus 70 each month. The value of each month was added to a cumulative energy level of each participant. Based on these quantitative data, we built performing groups.

Afterwards a multistep content-analytic procedure was used to analyze the qualitative data, encompassing 600 pages. The software-tool atlas.ti supported the methodical procedure. Content analysis was used to set up construct categories according to the research questions and to apply the constructed systems to individuals and tandems.

#### 3.4 Building performance groups

As described above, we fixed three factors of success for the tandems: the expectations of the mentees and mentors, the cumulative level of energy of the tandem, and the level of fulfillment of the expectations of the mentees and mentors. The expectations of the mentees and mentors regarding the benefits and level of fulfillment of the expectations are relevant indicators for the satisfaction of the participants. We added up each mentee's different expectation values assigned to three categories of expectations, which then varied from a very low cumulative expectation of 3 up to a very concrete cumulative expectation up to 10. The mean of the cumulative expectations of the mentees amounted to 7.23, as seen in Table 1. All mentors were highly motivated to support and advise young female mentees, and to pass knowledge and experience on to them. But the mentors mentioned less concrete expectations: only two mentors came up with concrete personal expectations concerning their role as mentors and the managing of the mentoring process, three mentors wanted to know about the impact of the CCM program and one mentor wanted to get feedback from the mentee. The mean of the mentors' expectations amounted to 1.00. The data showed a distinct gap between the expectations and the level of their fulfillment in the group of mentors. For instance, Table 1 shows that seven mentors did not have any concrete expectations. Despite this fact, they stated that their expectations had been fulfilled. This led to the assumption that the mentors still had some undefined and not yet mentioned expectations and that they were unexpectedly satisfied with the outcome for themselves and their mentees. Because of the fact that there were only thirteen tandems, the mentors' data of expectations and their fulfillment did not allow for a deeper analysis. Therefore, a strict assumption is necessary for any further analysis. For building the performance groups it has to be taken into consideration that the program focused on the positive outcome and development of the mentees. The first premise is that only those tandems were successful where the mentees confirmed that the benefit had at least reached their expectations. The second premise is that in highly successful tandems mentees stated a higher fulfillment of expectations than their mentors. Because of the importance of the mentee's expectation and fulfillment, only the mentees' data were taken into account for the group building.

The analysis of the *level of energy* of the tandems showed remarkable results. For our description, the cumulative energy level is relevant in a developmental relationship. Both individuals have an important impact on the dynamics and the development of their perceived energy. The cumulative tandem energy values amount to values from -528 up to 1301. The average cumulative level of energy amounts to 712.92.

The research examined eight tandems with a high cumulative energy, two tandems with a medium level of energy and three tandems with a low or negative level of energy. Table 1 gives an overview of the criteria for the performance groups as well as the gender of the mentors. All mentees were female, so that the sample encompassed five same-gender and eight cross-gender tandems.

			Expectations			Fulfillment of Expectations			Perceived Energy			Gender
			Mentee	Mentor	sum	Mentee	Mentor	sum	Mentee	Mentor	sum	
top performinf tandems		TAN 31	6	1	7	2,0	1,5	3,5	509	622	1131	male
		TAN 32	7	4	11	2,0	0,8	2,8	450	345	795	male
		TAN 12	10	0	10	2,0	0,0	2,0	427	344	771	male
		TAN 23	9	0	9	2,0	0,0	2,0	799	502	1301	male
	1	TAN 55	4	0	4	2,0	0,0	2,0	445	460	905	male
		TAN 53	6	1	7	1,5	1,0	2,5	492	629	1121	male
		TAN 63	9	0	9	1,5	0,0	1,5	415	650	1065	female
		TAN 11	10	3	13	1,0	1,0	2,0	533	556	1089	female
medium erforming	tandems	TAN 51 TAN 61	3 10	3 0	7 10	1,0 0,0	1,5 1,5	2,5 1,5	235 256	386 427	621 683	female male
d	•											
low performing	tandems	TAN 42	5	0	5	-1,0	1,0	0,0	23	270	293	male
		TAN 62	7	0	7	-1,0	0,5	-0,5	-51	72	21	female
		TAN 21	8	1	9	-2,0	0,2	-1,8	-77	-451	-528	female
		Means										
		All tandems	7,23	1,00	8,31	0,85	0,69	1,54	342,77	370,15	712,92	
		Top tandems	7,63	1,13	8,75	1,75	0,54	2,29	508,75	513,50	1022,25	
		Medium tandems	6,50	1,50	8,50	0,50	1,50	2,00	245,50	406,50	652,00	
		Low tandems	6,67	0,33	7,00	-1,33	0,57	-0,77	-35,00	-36,33	-71,33	

#### Table 1: Criteria for the performance groups

**Note.** The rows are sorted according to the level of fulfillment of expectations (FE) of the mentees, clustered into three groups top-, medium-, and high performing tandems. The right column shows the gender of the mentor.

We categorized three performance groups of CCM tandems based on the criteria of the mentees' expectations, their level of fulfillment and the cumulated energy of the tandem as shown in Figure 1.

The *high-performance tandems* encompassed eight tandems. The basic characteristic of the high performing tandems is that the mentees assessed their benefits as having exceeded their expectations. Their expectations were fulfilled to a larger extent than those of their mentors and were evaluated as being above the mean. Additionally, the cumulative values of energy of the tandems were high and showed energy values above the average. Regarding the expectations, all mentees, with only one exception, had medium to high expectations. The mean of the mentees' expectations in the top performing tandems was higher than the mean of all mentees' expectations from all tandems. The group of *medium-performing tandems* is made up of two tandems. In both cases the mentors assessed their benefits higher than the mentees. Moreover, the energy line of the mentors was higher than the energy line of the mentees. But the cumulative energy lines of the tandems and the average expectations were only slightly

below the average of all tandems. Three *low-performing tandems* showed that the benefits of the mentees did not reach their expectations. The expectations were medium sized, but on a slightly higher level than in the medium-performing group.



Figure 1: Clustering of the performance tandems

After the building of performance groups, we set up family codes for these performance groups using the primary documents in atlas.ti, and once again coded the qualitative data to gain answers to the research questions.

# 4. Results

# 4.1 Outcomes mentees and mentors

As for the benefits of the CCM program, the mentees made a total number of 68 statements that were initially grouped into two high-order dimensions following Kram's objective and subjective benefits (Kram, 1985). Revisions after intensive discussions resulted in 68 statements and four high-order dimensions according to Kram and Ragins (2007). The quotations and higher-order factors are presented in Table 2.

#### Table 2: Results from mentees

Factors and dimensions	Number of	Sample quotations				
Factors and dimensions	quotations	Sample quotations				
Learning & Socialization						
To be proactive	5	<ul> <li>"If I wanted to get something, I was proactive"</li> </ul>				
		• "Now I'm working harder and only say to my				
	-	superior that I want to do that."				
Promotion and more responsibility	5	• "I got a promotion this year."				
Salary increase	2	• "Asking for a salary increase was his idea.				
Develop one's own working and loadership	7	Then I tried and I got it."				
style	/	• "I learned the art of saying NO."				
style		• At that time i learned my first steps to delegate."				
Learning through experienced person	2	• "I also learned by observing my mentor."				
Changed perspective through the outside	6	• "The others put their pants on like everybody				
perspective oft he mentor		else, one leg at a time."				
		• "You can see some daily problems which are				
		the same in every company. That is calming."				
Quality of connections						
Job related exchange and support through	2	• "It was extremely interesting to get to know				
other mentees		the other mentees, how they work and what				
		challenges they have to master."				
Perception that the network is underutilized	3	<ul> <li>"The networking was intensive, but</li> </ul>				
		unfortunately it broke up afterwards."				
Personality development						
Getting more self-confidence	5	• "I'm more self-confident to assign new tasks				
e		and responsibilities"				
Recognize and define the own goals	4	• "From then on I started to define my goals in				
		another way, more consciously.				
		• "I took with me a more goal-oriented				
To be patient with myself	2	uninking. "To leave atop by atop"				
Perceived personality development	5	<ul> <li>TO KHOW: Step-by-Step</li> <li>"Mentoring has accelerated the developmental."</li> </ul>				
referived personantly development	5	<ul> <li>Mentoring has accelerated the developmental process."</li> </ul>				
		• "I never thought that mentoring would leave				
	7	such positive marks."				
Change of personal attitude/mindset	/	• "A complete mind-shift took place".				
		<ul> <li>The awestruck respect disappeared in a positive way."</li> </ul>				
Physical and mental health						
Coming to terms with oneself	6	• "My biggest benefit? Trust in my competence				
		combined with courage and openness."				
Better Work-Life-Balance	7	• "I need this foundation for my vocational				
		future."				

The mentees mentioned more benefits especially in the categories of "learning & socialization" and "personal growth". Less benefit was seen regarding the quality of connections to and networking with other participants.

Afterwards the quotations were clustered according to the defined performance groups. Clear differences can be seen in the results. Mentees from the top-performing

tandems mentioned an average of 6.6 benefits from the CCM. Mentees from the medium-performing tandems mentioned an average 4.0 benefits, and mentees from lowperforming tandems only 2.3 benefits. Mentees of the top-performing tandems mentioned many concrete results having a positive impact on their workplace due to personality development. Mentees from medium-performing tandems stated most benefits regarding the "learning & socialization" dimension and registered hardly any personality development. Mentees in low-performing tandems mentioned some results in the personality dimension, but they were far from experiencing a learning relationship regarding workplace issues.

Overall the mentors identified 33 quotations of different benefits for them. Among the *benefits for the mentors* they mentioned cross-organizational insights, reflecting and developing their competence, and being inspired by their role as mentors. The differences between the three performance groups were low, but interesting: in the low-performance tandems, the mentors assessed more benefits than mentors in highperforming tandems.

#### 4.2 Energy curves of the performance groups

The evaluation of the average energy lines of all performance groups shown in Figure 2 illustrates significant differences between the groups of both mentees and mentors.



Figure 2: Mentees' and mentors curves of energy

The comparison of the lines shows that the mentees and the mentors of the *high (top)-performing tandems* started at the mean on a medium sized level of energy and continuously increased until the defined CCM program reached a high level. The mentees of the *medium-performing tandems* started modestly during the first six months, and then the energy line increased but remained below the high-level group. The mentors of the medium-performing tandems started at a higher level and stayed on this level until the end of six months. During the second period of six months they decreased a little but stayed at the same level as their mentees. The *low-performing tandems* started at a high level and continuously decreased until the end of the defined mentoring period. Whereas the mentees of this group show a continuously falling energy line, the mentors' lines show an increase after 2 to 3 months and within the second period of six months.

#### 4.3 Development of the Relationships of the Performance Groups

The participants of the program were asked to explain the development of their relationships and their energy lines. Combining their statements with the energy lines, it is obvious that the participants underwent three stages in the 12 months (Fig. 2).

In a first step, we tried to explain the stages by reference to the top-performing tandems. The orientation stage is characterized by the goal of the participants to get used to one another through reciprocal scanning. In the Cross-Company mentoring setting the participants did not know each other because they came from different companies. In many cases, contrary to the mentees, the mentors were well-known personalities who were acknowledged beyond their companies' borders. Therefore, the mentees had to learn that their mentors were living persons and not "heroes". This scanning and getting used to each other was achieved through comprehensive vocational analyses of the mentees' concerns. The mentors tried to understand the situation, problems and challenges of the mentees in order to set up an upfront analysis. Then, they made a profound target clearing by challenging the targets of the mentees as well as testing the mentees' willingness for change. The mentees reported that their mentors always challenged them to think outside the box, to make clear decisions and to implement tasks. Many of them started full of energy and intensity, sometimes driven by the curiosity of the mentor. This stage lasted between two and four months. After a clear and mutual orientation period, the tandems moved on to a working phase. The tandems found a good working mode and consequently worked on their challenging issues. Sometimes the energy slightly decreased because the factor of curiosity was no longer prevalent. But overall, they reported to be working on a high level of energy. After another five to eight months, the tandems became aware of their relationships coming to a close. They finally reached the completion stage. Some tandems reached the goal by implementing and completing all tasks at full speed and other tandems that had also reached their goals were satisfied with just waiting for the end. All tandems worked on a high energy level, which declined as soon as the defined goals were reached.

The *medium-performing tandems* did not show such high level of energy lines. Compared to the high-performing tandems, they explained that they were very careful getting to know each other and vague in determining the targets during the orientation phase. They started more slowly and cautiously. This led to a lower challenge to the mentees in the working stages and the mentors missed the problems being tackled. Only during the completion stage were the participants able to build on trust and accepted and implemented the discussed points. This can be seen in the increase of the energy line.

Discussions about non-achievable goals, unidentified expectations on both sides and talking at cross-purposes characterized the orientation phase of the *low-performing tandems*. As in two of the tandems, business connections between the companies of the mentee and the mentor existed, the mentees proved to be very careful in clarifying the goals. Therefore, their motivation decreased before the relationship came to life. In the working stage, the tandems were characterized by reduced motivation, long intervals between meetings and a lack of benefits drawn from meetings. The energy leveled out and the participants showed hardly any intensive committment. In the completion stage, the energy of the mentors increased compared to the energy of the mentees and they tried to summarize the results.

#### 4.4 Gender Performing Results

In this study five out of the examined thirteen tandems had female mentors, as can be seen in the last column in Table 1. All in all, six out of the eight cross-gender and two out of the five same-gender tandems are part of the high-performing group. One same-gender and one cross-gender tandem are in the medium performance group, two same-gender and one cross-gender tandem are part of the low performance group.

The outcome of mentees of same-gender tandems differentiates from the outcome of mentees of cross-gender tandems. The two same-gender tandems in the topperforming group mentioned more benefits than did the average of this performance group. They stated an average of 9.0 benefits compared to mentees with male mentors, who stated 5.8 benefits. However, the same-gender tandems in the medium and low performance groups mentioned fewer benefits than the cross-gender tandems in these groups. Not a single same-gender tandem mentioned any outcome regarding the "quality of connections", which means that female mentors did not give any support to build up new networks or to utilize existing networks.

Fig. 3 shows the averages of energy lines of the same-gender and cross-gender tandems. There are two lines of the same gender tandems. One energy line includes all same gender-tandems; the other same-gender energy line excludes TAN 21. This became necessary because the tandem broke up after a few months and only few meetings. The energy line of TAN21 started at a high level, but declined continuously till the end of the program. Mentee and mentor were still part of the CMM program, but without having any contact. For that reason, TAN 21 had an impact on the average same-gender energy line in a negative way and was therefore excluded. The adjusted comparison of the gender-lines shows a lower starting level of energy in cross-gender tandems than in same-gender tandems. But cross-gender tandems continuously increased their energy throughout the program whereas the energy level in same-gender tandems decreased at half-time of the program.

Surprisingly, the energy level of same- and cross-gender tandems in high performance groups is completely different. Same-gender tandems started on a very high energy level and maintained their energy level with only a slight downswing in the third quartile of the program. Cross-gender tandems, however, started on an obviously lower level, but their energy curve rose continuously. Fig. 4 shows the lines of the top-performance groups. No differences can be found in the energy lines of sameund cross-gender tandems of the medium and low-performing groups.









To sum up, the study comes to the conclusion that gender influences the energy and performance of the tandems. This did not happen in medium and low-performing tandems, but was significant in top-performing tandems. The mentees of same-gender tandems mentioned more benefits and the energy was on a high level throughout the relationship. Cross-gender tandems mentioned fewer benefits and started on a low energy level which increased and was on a higher level than the same-gender energy line at the end of the mentoring relationship.

#### 5. Discussion

#### 5.1. Energy domains in developmental relationships

A focus on the construct of energy can explain some important influencing and differentiating factors of developmental relationships. As seen in this investigation, all high-performing tandems show a markedly higher energy level than other tandems. According to Cole et al. (2012), three energy domains can be identified. The affective energy is given in each tandem. Especially at the beginning of the relationship, the participants reported that they were excited and curious about the other person and the whole mentoring program. Based on positive mutual experiences the affective energy was expressed by positive feelings like multiple feedback, an appreciative discussion of the situation and the targets of the mentees, and a relaxed atmosphere. According to Dutton and Heaphy's (2003) criteria of the quality of connections, the feelings per se were not always positive - like challenging demands of mentors (Ensher & Murphy, 2011), different perspectives on career options, etc., but high-performing tandems showed higher emotional carrying capacities and strength to carry tensile situations. They were able to handle disappointing moments in a more constructive way by facing them courageously and reflecting on the mutual relationship. Moreover, highperforming tandems showed a higher ability to integrate energy and issues from the facilitating CCM program into their own discussions.

The *cognitive energy* refers to the shared intellectual processes, which were pointed out by the mentors to identify their commitment and their interest in the developmental process of their mentees. As Allen (2004) figured out, the mentee's willingness to learn has an important influence on the mentor's willingness to accompany a mentee. Our results underline this statement. The mentors investigated the vocational situation, the intellectual ability and the willingness of the mentees to develop. One mentor explicitly mentioned that the intellectual capacities are very important to him. This intellectual analysis went parallel to the analysis of the vocational situation and the profound target definition. If both had the impression that they could work on the solution in a constructive and focused way, they were able to let good things and processes happen. High-performing tandems reported that kind of assessment in the first mutual meetings. In lower performing tandems, the participants reported dissatisfying results of the analysis. They did not find common energy on an intellectual level due to different targets, anxieties and different approaches to working and living. In highperforming tandems, cognitive energy is further shown by the strong willingness of both parties to go beyond the limit and think out of the box. Profound reflections require a lot of power and energy and both parties in the high-performing tandems had the intellectual capacity for it. In lower-performing tandems, they reported more mutual refusals of suggestions and the feelings of cross talking probably based on a lack of profound debates and reflections. Additionally, the participants reported their impression that their counterparts in the tandems avoided receiving and giving feedback. But feedback is a crucial component of mentoring relationships and individuals with an anxious attachment style may be reluctant to seek and accept feedback (Allen, Shockley, & Poteat, 2010). Quality and frequency of feedback are associated with a high acceptance as the basis for a cognitive energy.

According to the survey, the *behavioral energy* is a strongly influencing energy source as it reflects the joint efforts of the tandem. The results display that in all tandems, the energy increased as soon as one part showed commitment through his/her behavior. The often-mentioned energy sources are time as well as challenging decisions and tasks. All high-performing tandems reported the visible expression of mutual energy at least throughout the first stages. Low-performing tandems reported less contact and less commitment. A recent study about effective and ineffective behavior confirms and illustrates the impact of behaviors within the relationships (Allen et al., 2010, p. 77; Hamlin & Sage, 2011). But other examinations are useful to get more detailed information about the impact of different behaviors and their energies along the energy curves of developmental relationships.

Proposition 1: The energy curve of a mentoring tandem is highly influenced by all three energy domains (emotional, cognitive and behavioral energy) that are driven by the interactions of the tandem partners.

## 5.2 Reciprocal influence of energy domains

Energy emerges between two persons. When people feel energy in their interactions, they can use their broadened thought and action repertoires to discover or create new means for getting things done (Frederickson, 2001, 2004). By doing this in an energized way, the thoughts and actions require resources from both participants to be of use. In our examination, all participants showed positive energy at the beginning, but in some tandems they were not able to use and develop it. The challenge is to recognize these energy domains and to build up a positive, reinforcing feedback loop to continuously develop positive energies. It shows that all high performing tandems reported high levels of energy in all energy dimensions. The affective energy enables a greater capacity for emotions and their accepted variances. If cognitive energy is sensible, mutual resources for challenging issues and reflections broaden the repertoire and create forces to go beyond the comfort zone. From this perspective, mentoring can be seen as a micro-level knowledge producing entity as it transfers tacit knowledge and und supports cross-organizational learning (Singh, Bains, & Vinnicombe, 2002). Behavioral energy displays the investments of the participants and empowers both participants. All three energy dimensions lead to a higher quality of the connection and increase the sound basis of the tandem. The quality of connection gives the participants a feeling of belonging and personal trust. High quality benefits the competence of both and leads to improved mental openness for new ideas and responsibilities. And moreover, a high quality connection supports the autonomy and voluntary basis of people to invest further energy. This ongoing spiral increases or decreases the

collective energy of a mentoring tandem in the form of a reinforcing feedback loop (see Fig. 5).





The affective energy opens up capacity for more variances in emotions and tensility of the ties (Dutton & Heaphy, 2003), which leads to a sense of psychological safety as well as to increased learning processes (Carmeli & Hoffer Gittell, 2008). When people feel the same emotions at the same time and place, they tend to feel increased solidarity (Collins, 1993). Moreover, the positivity of the emotion should increase openness and generativity of the relationships. Cognitive energy permits mutual resources for issues and reflections because positive emotions enable people to broaden their momentary repertoires of thoughts and actions and to build enduring personal resources, ranging from physical to intellectual resources to social and psychological resources. Through experience of positive emotions people undergo a change, become more creative, knowing, and resilient. This vitality and learning is driven by the partners' interactions (Frederickson, 2001, 2004; Spreitzer & Porath, 2012). Finally, behavioral energy displays visible investments of the participants to empower the tandem. These investments are expressed by the invested physical resources, like time of the participants (Murrell, Blake-Beard, Porter, & Perkins-Williamson, 2008), the intensity and pace of the discussion, the frequency of meetings, and other visible efforts to deal with the issues (Cole et al., 2012). The frequency of the reinforcing cycles depends on the number of meetings and interactions of the participants. The more contacts a tandem has, the more possibilities are created to mobilize the productivity spiral.

Proposition 2: The performance of the mentoring relationship is highly influenced by reinforcing cycles between the level of energy and the quality of the mentoring relationship.

In general, all tandems had the possibility to design their learning relationship. There were some context factors and inputs from the facilitating program, which could be used or incorporated in their discussions. If there were any problems, they also had the possibility to actively contact the advisor and ask for support. High-performance tandems proactively and constantly worked on the quality of their connection and the relational challenges. This can be seen as an important success factor for developmental relationships (Creusen, Dautzenberg, Eschemann, & Müller-Seitz, 2011; Ensher & Murphy, 2011). High-performing tandems started a continuously upwards spiral with reinforcing mechanisms by responding to all energy dimensions. They activated the cognitive energy by intensive challenges, made use of the behavioral energy by demanding decisions and visible changes and allowed the emotional energy to grow through mutual appreciation. Medium-performing tandems reported some positive changes concerning a higher quality connection. But the changes were either too slow within the remaining time of the program or too small to invest the relationship with sustainability. Low-performing tandems reported changes in a continuously downwards spiral. Because of missing openness and competence to reflect the development, a perceived interdependency due to the business linkage and low trust, the few investments were misinterpreted or refused. The time lines of the tandems confirm this insight. They show that within the first two or four months, the tandems set up their reinforcing feedback loop, which could only marginally be changed over the remaining months.

The reciprocal influence of the three energy dimensions is proved by literature and obviously occurs throughout all interviews. Analyzing the data, it cannot be assessed which energy dimensions emerged first. Some tandems stressed the emotional domain as very important to get into working at the beginning. Other tandems underlined the cognitive domain as valuable energize the tandem. But as time passed, highperformance tandems mentioned high levels on all three dimensions (Fig. 6). Highperforming tandems balance emotional, cognitive and behavioral dimensions and generate a high quality of tandem relationship. This relationship further leads to a high performance and satisfaction. But what happens if an energy dimension cannot be activated between the tandem partners? There are three possible ways for an unbalanced use of energy. (1) If tandems show evidence of emotional and cognitive energy, but no evidence of behavioral energy, they collaborate on a slow level for development and change. These "low change" relationship tandems can hardly profit from the inspiring and intensive discussions. The lack of visibility for the learning and development process or visible investments of the partners over time leads to a negative energy spiral. Trust and commitment will decrease and disappointment will increase. Challenging discussions and interest as a whole are reduced. (2) If tandems show evidence of emotional energy and behavioral energy, but no evidence of cognitive energy, they collaborate with a mentality of "easy going" tandem relationships. The partners like each other, but do not promote a shared intellectual process. Although the high level of emotional variances they do not foster reflection and feedback which is necessary for development.

They invest time and resources and also change behavior and routines. But without a common cognitive energy the tandem will remain stable and not be able to reach its potential. (3) If tandems show no evidence for emotional energy, they run into danger to break up. This might be sensible if the emotional energy is too negative. But tandems do not inevitably break up, because some outside constraints like the company development program or the feeling of failing will keep the tandem partner on board. In this case the *"tough guy" tandem relationship* works hard to discuss issues, challenges the other person and demonstrates their investments in the relationships. But the lack of emotional energy leads the tandem into an abuse of their energy potential for mutual proofs and defenses. After some time the tandems will reach some outcome, but far below their possibilities.





High performing tandems are able to mobilize all energy dimensions on a positive and high level - not one energy dimension after the other, but simultaneously with reciprocal influence. Of course, the focus of the energy varies during the program, but nearly all high performing tandems show evidence for energy on all dimensions during the formal relationship. Proposition 3: High-performing tandems are able to positively influence the reinforcing cycle on their own and to release energy towards all energetic dimensions in a balanced way from the beginning of the relationship.

#### 5.3 Gender influence on dyadic energy

At first sight, some outcomes of this study fall into line with previous studies. A tendency of mentees receiving more psychosocial support from female mentors (Eby, 2011; O'Brien et al, 2010; Ragins & Cotton, 1999) and more "learning & socialization" benefits like salary increase, developing one's leadership style from male mentors can be observed. Moreover, the energy curves of cross-gender and same-gender tandems differentiate and point out a better development of the tandems with male mentors. But an in-depth investigation of the different performance groups shows quite interesting results and differences: Same-gender tandems from the topperformance group mentioned obviously more benefits than the cross-gender tandems of this group. In the other performance groups the results of same- and cross gender tandems did not differ significantly. Same-gender tandems from the performance group started on a very high energy level and were able to hold the energy level, whereas cross-gender tandems of this group started on a low level, but increased continuously and showed a higher energy level than the same-gender tandems at the end of the formal relationship. No difference could be found in the other performance groups. How can these results in the high-performance group be explained?

One important distinction can be found in the orientation phase. At the beginning of the mentoring relationships same-gender tandems had a higher energy level due to their excitement and their feelings. The perceived similarity of same-gender composition emotionally supports the beginning of becoming acquainted with each other. This emotional support allows same-gender tandems to quickly build a relationship of trust that allows concentration on the challenges and work on a cognitive level. The tandem members mentioned examples in all energy dimensions, but the emotional energy between women in this phase seems to be especially high. In cross-gender tandems, the fact of the counterpart's different gender makes tandem participants work on the emotional and cognitive levels in the first steps. Thereby, it seemed that at the beginning, they behaved in a more restrained and controlled way than the samegender tandems. With the increase of mutual trust they opened up. In line with the study of Ensher et al. (2011), male mentors showed a very clear set of expectations and style of interaction with their mentees and tried to challenge their mentees to exhibit clarity, purpose and an orientation towards risk and initiative. Mentees explicitly mentioned that they felt challenged by the male mentors. It seemed that the mentees were pushed by their male mentors towards their willingness to learn and develop. Mentees had to earn their recognition and time. By testing the mentees male mentors quickly built up a sound basis. In contrast to Ragins and Cotton (1999), the samegender tandems did not report receiving more challenging assignments.

In the following working phase the energy lines of same- and cross-gender tandems developed in different ways. Same-gender energy lines started at a high level and were able to keep up their energy level with a little downswing in the third quartile of the program. Same-gender tandems mentioned high energy, but not on all dimensions.

They mentioned very high emotional energy ("we felt emotionally exhausted because of our intensity"), but less behavioral process-oriented energy. The stagnation and downswing of the same-gender energy line may be explained by the perception of the tandem participants to be exhausted. Maybe all main problems seemed to be solved, no new issues came up and time had to be spent on other vocational challenges. Whereas cross-gender tandems started at a lower level, their energy curve inclined continuously till it exceeded the same-gender energy line. From the beginning, the participants of cross-gender tandems stated growing energy levels on all energy dimensions. Some research (Bowen, 1985; Clawson & Kram, 1984; Kram, 1985) states that participants in cross-gender relationships assume more sex-stereotypical roles. This was not confirmed in this study. On the contrary, all female mentees emphasized the respect and appreciation they got from their male mentors. Most of the mentors were explicitly interested in gaining insights into working conditions and challenges of female high-potentials. Another explanation may be found in the goal of the female mentees to utilize the gender difference (Noe, 1988). All mentees showed eagerness to learn from the man's view on some career issues. This may be based on the perception, that most managers are male (Schein & Davidson, 1993) and the necessity to gain male insights. How does the male mentor manage work-life-balance? What is his attitude towards gender diversity openness and how will it be experienced in other companies? How does he decide in specific situations? The young women proved to be highly interested in male attitudes and management styles and, vice versa, this influenced the interests of the mentors (Allen, 2004). This interest from both partners may be an explanation for the continuous development of the energy levels and their reciprocal influence. A further explanation may be the aspect that male mentors are clearly seen as natural authorities by the younger female mentees.

In the medium- and low-performance tandems there are fewer differences between these two gender tandem groups. It is remarkable that in same-gender tandems the energy line declines strongly after a few months. The high emotional energy in same-gender tandems at the beginning may be elusive, because the mutual trustbuilding check of perceived similarity will take place later in the relationship. The perceived similarity is important for the mentoring received (Turban, Dougherty, & Lee, 2002). This leads to the explanation why same-gender tandems from the lower performance groups broke away after some months. In one case the female mentee refused to accept the female mentor as a role model because of their "tough and masculine leadership style". The desire not to become like the mentor led to highly negative emotional energy where mutual trust and working on relevant issues proved to be impossible. Another female mentee had great problems with the female mentor because she was the only female mentor of the mentoring round and could be seen as a tokenwoman (Kanter, 1977; Simpson, 1997). This exerted high pressure on the mentee to draw benefits from her mentor. Additionally, divergent goals of the tandem partners resulted in the break-up of their relationship. Compared to cross-gender tandems of the lower-performing groups the same-gender tandems gave up earlier and were not prepared to go through hard times, or were not able to stop the negative development of the energy cycle and change it into a more productive direction.

# 5.4 Limitations

The study is quite unique because of its dyadic approach to the mentoring relationship. But there are some distinct limitations. First, the *number of examined tandems* is rather small. Although the results show coherent insights, further research with wider sampling is necessary to support them. Second, the *participants' perceptions* are the only measures for the central variables. In many traditional studies, the objective and subjective outcomes of the mentees have been measured. This also happened in this study as part of the "learning & socialization" dimension. But the central measures like the energy level or the benefit are quite subjective. Third, the mentors' expectations were measured, but turned out to be very low or not explicitly mentioned. We explain this by the program's strict focus on the mentees' learning. Finally, the study was conducted by means of *retrospective interviewing*, which could lead to some form of distorted perception, forgetfulness and weaker tendency of emotions and perceived incidents. But at the same time, the participants are more reflective in their answers after some time.

# 6. Conclusion

In summary, the present study goes beyond previous mentoring research by contributing a qualitative base of information regarding the energy dimensions that influence the developmental relationships. Not all of the results of this study of Cross-Company Mentoring could be dealt with, but a number of common issues emerged that should be helpful in designing future quantitative research. One important piece of evidence is shown in the concept of productive energy, which is an indicator to distinguish and explain successful mentoring relationship.

The results provide three insights: First, high-performance tandems differ from low-performance tandems not only in the perceived benefits and outcomes, but also especially through the high quality of the cross-company mentoring relationship. They worked intensively to elaborate the starting situation and to define the realistic targets. By doing this, both parties continuously challenged and tested the limits of their partners. Parallel to the cognitive analysis, they expressed positive as well as negative emotions and visibly invested thoughts and resources into the tandem. In the course of the following months the relationship built up trust, emotional capacity, a mutual cognitive awareness and is characterized by a visible implementation of the discussed issues. High-performing tandems shared similar agendas at the beginning and similar working methods throughout the relationship. The participants got deeply involved in the relationship. Second and consequently, the close mentoring bond of high-performing tandems is highly influenced by the energy level of the tandem. The results of the study confirm the influence of energy on the outcomes of the mentees by significantly influencing the quality of the relationship. All high-performing tandems experienced higher energy levels than the medium or low-performance tandems. They showed higher energetic levels on all three energy dimensions in a balanced way. The results show that successful tandems are better able to manage their energy levels by combining three different sources of energy. The results highlight the relevance of the energy level within developmental relationships as an important indicator for high performing tandems. Third, the gender composition illustrates that within the group of topperforming tandems the same-gender tandems mentioned more benefits on high energy level than did the cross-gender tandems. Within the medium and low performing groups the results are the opposite.

Two central implications for practice can be drawn from the study: (1) Participants should have to be trained to reflect and improve both their energetic impact on others and their energetic "feeling" for situations. The ability to do this could be a relevant target of the mentors. (2) In a developmental relationship both parties should learn. In practice, this means that mentors also have to define their learning goals. What do they want to learn from other business concepts? Which abilities do they want to improve by mentoring another person? Mentors should become aware of the fact that they are learners, too. By doing so, the mentors' commitment will become stronger and the relationship will automatically develop into a more mutual learning setting. (3) Cross-gender tandems might imply many advantages in a men dominated context, but also same-gender tandems are able to provide the mentee with excellent benefits.

The article contributes to the existing literature by examining the development of mentoring relationships from an energetic perspective. But there are also some implications for future research: At this point, future research could start to examine the impact of the three energy sources on the development of the mentoring relationship more thoroughly. What kind of energy source generates which impact? How do the energy sources correlate? What about the correlation between the energy source and the outcome?

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