Leadership in management of knowledge workers

Ludmila Mládková

*University of Economics Prague, Prague, Czech Republic

Abstract

Knowledge workers are important and growing group of employees. The major resource and tool of their work is knowledge. Due to its tacit dimension, knowledge is of intangible character which makes the management of knowledge workers difficult; managers cannot observe and control the most important part of the process of work of knowledge workers (it happens in their brains and is invisible) and they cannot use directive tools that fail with this group of employees. Managers of knowledge workers are advised to change their managerial role for the leadership one. The article discusses problematic of leadership of knowledge workers. Research on this problematic is a part of the research on knowledge workers, their management and leadership. The research started in autumn 2010 at the University of Economics Prague and the Police Academy of the Czech Republic in Prague and it still continues. The objective of the research is to verify some aspects of knowledge work and the management and leadership of knowledge workers. The research is a quantitative research based on the questionnaire. As both management and leadership are practical disciplines we decided to use Lee Iacocca’s concept of 9 Cs of leadership (leadership scorecard) as a basis for the research on leadership. The article provides the results of answers of 125 respondents and shows that managers in our country have great reserves in leadership techniques and skills.

Keywords: Knowledge workers, Knowledge, Leadership

Corresponding author. Tel. + 420224098456
Email address: mladkova@vse.cz
1. Introduction

The literature on knowledge workers offers many different concepts, definitions and approaches but all authors agree on the fact that knowledge workers represent important and growing group of employees. Simply said knowledge workers are people whose major working resource and tool is knowledge. Even though that the result of their work may be manual, the most important part of their work is done in their heads where they analyse large numbers of variables and adjust their work to the development of these variables. These days’ organizations cannot rely on tangible assets like technology. Especially in technically demanding sectors, tangible assets are commonly available. They do not create competitive advantage; they are basic prerequisite of doing business. Knowledge is a critical asset and success factor in such environment. Knowledge is created by two dimensions, explicit and tacit one. Explicit dimension can be transformed to data and widely shared in written or spoken form. Tacit dimension is partly or fully subconscious and difficult to isolate of its human owner; e.g. it is highly personal. Knowledge workers often posses tacit knowledge that is not widely available and even their managers do not have it which makes this group of employees very important for their organisations. Knowledge workers are usually willing to use and share their knowledge in benefit of their organisation, of course, unless mismanaged and demotivated. Management of knowledge workers is a tricky business. Knowledge workers are well educated or experienced, create their own work standards, and make decisions independently. Many of them make the final control of their product or service themselves. Managers cannot follow and control the process of work of knowledge workers as its most important part happens deeply in their brains. Managers of knowledge workers are advised not to rely on traditional managerial tools and methods and switch to leadership.

This article discusses problematic of leadership skills of managers of knowledge workers. It provides selected results of the research conducted at the University of Economics Prague and the Police University of the Czech Republic. The article starts with chapter on Literature Review and Hypotheses which provides basic background of our work. Chapter on Methodology follows. It explains research goal, sample and style of data collection and measures we used for our research. Chapter Analysis and Results gives results of our research. The article is finalised with chapter Conclusions that provides concluding comments.

2. Literature Review And Hypotheses

2.1. Knowledge Workers – Definitions and Concepts

The first to use the term knowledge worker was Peter Drucker [1]. Knowledge worker, by Drucker is a person who has knowledge important for the organisation and often is the only person who has it, a person who can use the knowledge in work and whose knowledge is partly subconscious. The worker may not know about it or may not understand its importance and other employees of the organisation have a limited approach to this knowledge or they cannot or are not allowed to use it (knowledge is linked to some certificate or diploma). By Drucker [1] knowledge workers often work intellectually, but this is not a rule. Jack Vinson from Northwestern University wrote that knowledge workers use their brain more than hands. Knowledge workers depend on their knowledge and ability to learn, even though they work with hands [2]. Lowe [3] limits knowledge workers to those with university degree. Thomas Davenport [4] sees knowledge workers as people with high degrees of expertise, education, or experience. By Davenport, the primary purpose of knowledge workers’ job involves the creation, distribution, or application of knowledge. Knowledge workers think for a living [4]. Robert Reich [5] was a bit more explicit in outlining what he terms as the ‘symbolic analysts’, the workers who engage in non-standardised problem solving using a range of analytic tools often abstract in nature. The
keys to these workers’ success include creativity and innovation and incorporate occupations ranging from lawyers to bankers to researchers to consultants [6].

Alvin Toffler [7] understands typical knowledge worker as a scientists, an engineer or a person who operates sophisticated technology. By him, knowledge worker must be able to create and improve his technological knowledge or manage technological knowledge of co-workers. Alle [8] and Shawn [9] think that the term 'knowledge worker' is now a meaningless concept in developed countries because the shift Drucker started to notice in the '50s from jobs requiring manual work to jobs requiring knowledge work is now complete [10]. Sveiby [11] relates knowledge workers with software and advertising firms. Alvesson [12] sees knowledge workers as people who work in knowledge intensive organisations, R&D and high tech companies. Jonathan B. Spira in internet discussion concludes: “We can, in part, describe knowledge workers in terms of what they are not. They are not factory workers, they are not laborers, they are not farm or field workers (the term "out in the field" notwithstanding). But that doesn’t tell us very much. Many, but not all, knowledge workers are office workers. Some, but not all, are managers or white-collar workers. Some, but not all, are professionals, such as doctors or lawyers [13]”. Kidd [14] identifies knowledge workers as people who work in design, marketing, management and consultancy, advertising, broadcasting, law, finance and research. Nomikos [15] classifies knowledge workers as a group that includes scientists, engineers, professors, attorneys, physicians and accountant. But he concludes that knowledge workers are highly qualified and highly educated professional. Their work consists largely of converting information to knowledge using their competencies for the most part, sometimes with the assistance of suppliers of information or specialised knowledge. Tomlinson [16] identifies them as managers, people in technical and professional occupations and associate professionals.

Reboul et al [17] summarizes:

- Knowledge worker’s main work tool is his brain. Therefore losing a KW for a company is a loss of its knowledge capital, too.
- Knowledge worker uses knowledge at his work – he creates, distributes or applies explicit as well as tacit knowledge.
- Knowledge worker’s position requires continuous learning and improving.
- Processing information and data requires creating a high added value on this information.
- The individuals change the job. He goes his own way. Two knowledge workers would not do the same job.
- Productivity and quality of his work are hard to measure.

Knowledge worker manage their days. Their positions require creativity, innovation and problem solving skills. That is why knowledge workers don’t like to be told how to do things.

2.2. Leadership – Definitions and Concepts

There are many leadership definitions in the literature. Kouzes and Postner [18] define leadership as a relationship between those who aspire to lead and those who choose to follow. Schein [19] understands leadership as the ability to step outside the culture…, to start evolutionary change processes that are more adaptive. Richards and Engle [20] believe that leadership is about embodying values, and creating the environment within which things can be accomplished. Northouse writes [21] that leadership is a process whereby an individual influences a group of individuals to achieve a common goal. Roach and Behling [22] see leadership similarly as the process of influencing the activities of an organized group toward goal achievement. Veber [23] defines leadership as creation of vision and activation of people to achieve it.

There are also many theories, concepts and approaches on leadership in literature. For example, leadership traits approach, leadership skills approach, leadership style approach, situational leadership,
leadership contingency theory, leadership path goal theory, leadership leader member exchange theory, transformational leadership and team leadership are listed by http://www.bealeader.net/ [24], Yukl mentions transformational and charismatic leadership [25].

Understanding of the relation between management and leadership also differs in relation to authors preferences. Some authors understand both disciplines as separate ones; some understand leadership as the part of management. For example Ricketts [26] see management as an activity that exercises executive, administrative, and supervisory direction of a group or organization; leadership is a process whereby an individual influences a group of individuals to achieve a common goal in her opinion. Kouzes and Postner [18] also understand both disciplines as different; management is more analytical activity focused on objectives, leadership is more creative activity focused on visions in their opinion. Bartošová [27] sees leadership as one of managerial functions that covers managerial styles and motivation while Veber [23] sees leadership as a method of managerial function implementation. The author of this article believes that management and leadership are different disciplines. She also believes that leadership methods used in everyday management bring great results, especially when used with knowledge workers. When thinking about leadership concept for our research, Lee Iacocca’s [28] leadership scorecard was chosen. This practical concept fits perfectly managerial environment. Managers of organisations are often appointed to their functions for different reasons than their skills and personality (opposite to natural leaders who emerge in critical situations and politicians); for example personal relationships and power games are important. E.g. they do not need to be leaders to become managers. So Iacocca’s scorecard let us analyse not only how managers manage and lead their subordinates but also whether they are the right people; e.g. if their organisation choose right people for managerial roles. As Buckingham and Coffman [29] write, whatever is the corporate policy and rules, the behaviour and performance of knowledge workers influences mostly the person who is above them, their direct manager.

2.3. Lee Iacocca’s leadership scorecard (9 C’s)

Lee Iacocca’s leadership scorecard is the result of Mr. Iacocca life experience in Ford and Chrysler companies and work in various foundations and functions. His scorecard includes nine features the leader should have and use. They are curiosity, creativity, communication, character, courage, conviction, charisma, competence, common sense [28].

2.4. Development of Hypotheses

Works of authors cited in the literature review [1],[2],[15],[17] indicate that knowledge workers are not easy to manage. Knowledge, the major resource and tool of knowledge workers is of intangible character which limits efficiency of traditional managerial tools based on direct control. Therefore the main hypothesis of the research is that managing knowledge workers in the traditional way is contra productive. We think that knowledge workers perform better under different style of management and that leadership approach may bring better results with this group of employees.

H1: Managing knowledge workers in the traditional way is contra productive.

3. Methodology

3.1. Research Goal
The research on knowledge workers, their management and leadership started in autumn 2010 and it still continues. The objective of the research is to verify some aspects of knowledge work and the management of knowledge workers. Attention is, for example, paid to the importance of tacit knowledge for knowledge workers, the way in which they develop their knowledge and to the shift in the style of management and leadership. We are interested in how the problems of knowledge workers and knowledge work are seen by knowledge workers and by their managers. This article covers part of the research focused on leadership skills of managers of knowledge workers. As both management and leadership are practical disciplines we decided to use Lee Iacocca’s concept of 9 C’s of leadership as a background for the question on this topic. Up to Iacocca’s 9 C’s we amended two factors that we think are important from the point of view of knowledge workers. They are: Manager communicates with his superiors and can explain his and his subordinate’s standpoints. Manager stands up for his subordinates.

3.2. Sample and Data Collection

Respondents of the research are combine and distant students of the University of Economics Prague and the Police University of the Czech Republic. We decided for them because many of them work in knowledge intense jobs. Professions of respondents are different. Respondents interviewed at the University of Economics Prague work mostly in business and finances; respondents of the Police University of the Czech Republic work in security services as policemen, firemen, soldiers, and in public administration. 125 respondents answered the questionnaire with the question on the leadership by Iacocca. All of them were classified as knowledge workers. 37 respondents out of 125 were policemen. Most of respondents of the research belong to the age group 25-45 years, 66% (83 respondents). 30% respondents (37 people) are younger than 25 years, 4% (5 respondents) are older than 46 years. There are more men than women in the sample; men represent 61% (76 respondents), female 37% (46 respondents). Majority of respondents have high school education, 78% (98 respondents), 11% already has university education (14 respondents).

3.3. Measures

The research is a quantitative research and is based on a questionnaire. Questions are constructed as closed questions. Respondents choose from given options or evaluate given options on the Likert 1-5 scale. Likert scale options are as follows: 1 - factor is poor, 2 - factor is under average, 3 - factor is average, 4 - factor is over average and 5 - factor is excellent. Some of the closed questions offer the option of commentary. Respondents fill the questionnaire without the supervision of researchers. Questions are constructed so that they did not indicate what may be a “correct answer”.

4. Analyses and Results

Table 1 gives results on leadership skills of managers of interviewed knowledge workers. Eleven skills were examined. If the summation of responses is not equal to 125 or 100%, it means that respondents decided not answer the question. Percentages are rounded off.

Table 1. Leadership Abilities of Managers of Knowledge Workers
As results listed in the table 1 show, respondents decided in favour of over average and excellent options when answering 9 questions out of 11 (question ‘Is your manager interested in his subordinates more than his duties require?’ achieved similar results for both sides of the Likert scale and answers to question on creativity were in favour of negative side of the Likert scale), only 4 questions were evaluated as over average and excellent options by at least 50% respondents. They are ‘Does your manager keep his word; has courage to bear responsibility for his acts?’, ‘Is your manager competent’, ‘Does your manager act on his belief?’ and ‘Does your manager use his common sense?’ The worst result shows question ‘Is your manager creative, does he try new things and work procedures?’ only 26% of respondents decided for over average and excellent options. Results on answers to questions on leadership indicate that most of managers of respondents of our research lack important leadership skills.
5. Conclusion

The objective of the article was to discuss results of the research on leadership skills of managers of knowledge workers. This topic is a part of the research on knowledge workers, their management and leadership. The research started in autumn 2010 and still continues. Respondents answers of whom are discussed in this article were distant and combined students of the University of Economics Prague and the Police Academy of the Czech Republic Prague. All of mentioned respondents met requirements of researchers and applied to the group of knowledge workers. The research is a quantitative research based on the questionnaire. The article includes answers from 125 respondents. The part of the research covered by this article provides answers inspired by Lee Iacocca’s leadership 9 C’s. Eleven questions were asked. Respondents evaluated these questions on the Lickert’s scale, 1-5. 1 represents evaluation factor is poor, 2 factor is under average, 3 factor is average, 4 factor is over average and 5 factor is excellent.

Answers to our 11 questions show that managers of knowledge workers in organisations in the Czech Republic do not meet requirements of Lee Iacocca’s 9 C’s. Only 4 questions out of 11 were evaluated as over average and excellent by at least 50% of respondents. Up till now, the results of the research validate our hypothesis. Many of our respondents, knowledge workers, are mismanaged and their managers are not good leaders. On the other hand, the number of respondents is still small. The questionnaire has been answered by 260 respondents, the question on leadership only by 125 respondents. The research continues and we must wait for more specific data that might alter our current results.

References

[1] Drucker, P. F. (1954), Landmarks of Tomorrow, A Report on the New ‘Post-Modern’ World, Transaction Publisher London, ISBN 1-56000-622-6.
[2] www.vinson.com, 2009, 12.3.2009.
[3] Lowe, G.S. (2002), Leveraging the skills of Knowledge Workers, Isuma, Spring.
[4] Davenport, T. (2005), Thinking for Living, HVB School Publishing, ISBN 1-59139-423-6.
[5] Reich, R. B. (1992), The Work of Nations, New York, Vintage Books.
[6] Brinkley, I., Fauth, R., Mahdon, M., Theodoropoulou, S. (2009), Knowledge Workers and Knowledge Work, A Knowledge Economy Programme Report, http://www.theworkfoundation.com/Assets/Docs/Knowledge%20Workers-March%202009.pdf, 20.3.2009. 11.7.2011 14:16.
[7] Toffler, A. (1990), Powershift: Knowledge, Wealth and Violence at the Edge of the 21st Century, 1990, Bantam Books, ISBN 0-553-29215-3.
[8] Allee, V. (2002), Presentation at International Conference KM Europe 2002, 13-15 Nov. 2002, London. UK.
[9] Shaw: http://www.anecdote.com.au/archives/2007/11/our_need_for_th.html, 22.5.2009, 13:53.
[10] Mládková, L (2009), Management of Knowledge Workers, Tallinn 14.06.2009 – 16.06.2009, In: Economies of Central and Eastern Europe, Tallinn, Universita, 2009, ISBN 978-9949-430-28-4.
[11] Sveiby, K. E. (1997), The New Organisational Wealth: Managing and Measuring Knowledge-Based Assests, 1997, Berrett-Koehler.
[12] Alvesson, M. (2002), Management of Knowledge Intensive Companies, 1995, De Gruyter.
[13] Spira, J. B. (2008), http://www.kmworld.com/Articles/News/News-Analysis/Knowledge-worker-Do-you-relate-40808.aspx, 22.5.2009, 13:50, Posted Feb 5, 2008.
[14] Kidd, A. (1994), The Marks are on the Knowledge Worker, Human Factors in Computing Systems, CHI94, Boston.
[15] Nomikos, G.E. (1989), Managing Knowledge Workers for Productivity, National Productivity Review, 8(2), 1989.
[16] Tomlinson M. (1999), The Learning Economy and Embodied Knowledge Flows, Centre for Research on Innovation and Competition, Discussion paper 26, University of Manchester, 1999.
[17] Reboul, C. and col. (2006), Managing Knowledge Workers: The KWP Matrix, Conference Proceedings MOMAN 06, Prague 2.2.2006, ISBN 80-86596-74-5.
[18] Kouzes, J., Posner, B. (2002), The Leadership Challenge, (3rd Ed), Jossey Bass, San Francisco, ISBN 0-7879-5678-3.
[19] Schein, E. H. (2010), Organizational Culture and Leadership, Jossey-Bass, S. Francisco, ISBN 978-0-470-19060-9.
[20] Richards, D., Engle, S. (1986), After the vision: Suggestions to corporate visionaries and vision chapmions, In Gray, J.H.,
Densten I.L., Sarros, J.C. (2003), Profiling Australian small business leadership, Working Paper Series, ISBN 1327-5216, www.buseco.monash.edu/mgt/research/working-papers, 13.9.2011, 14:16
[21] Northouse, P.G. (2010), Leadership: Theory and Practice (5th Ed), Sage Publications, ISBN 978-1-4129-7488-2.
[22] Roach, C.F., Behling, O. (1984), Leaders and managers: International perspectives on managerial behavior and leadership, In James G Hunt J.G.; et al (1984), Pergamon Press, NY, ISBN 103-377-107.
[23] Veber, J et al. (2000), Management, základy, prosperita, globalizace, Management Press, Praha, ISBN 80-7261-029-5.
[24] http://www.bealeader.net/ (2011), 13.9.2011, 14:35
[25] Yukl, G. (1999), An evaluation of conceptual weaknesses in transformational and charismatic leadership theories, The Leadership Quarterly, Volume 10, Issue 2, Summer 1999, Pages 285-305.
[26] Ricketts K. G. (2009) Leadership vs. Management, AGRICULTURE, LEXINGTON, KY, 40546. In http://www.ca.uky.edu/agc/pubs/elk1/elk1103/elk1103.pdf, 14.9.2011, 20:52
[27] Bartošová, H. (1998) Management: : teorie a praxe policejní činnosti. PČR v Praze, ISBN 80-85981-96-3.
[28] http://www.leeiacocca.net/scorecard/Default.aspx, (2010), 15.9.2011, 10:49.
[29] Buckingham, M., Coffman, C. (2005): First, Break All the Rules, London: Simon&Schuster UK. ISBN 1-4165-0266-1.