# The Effects of New Ways of Working



An empirical study of municipalities in the Netherlands, looking at the relation between New Ways of Working and social cohesion, work life balance, and performance and the moderating role of leadership on these effects.

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## MANAGEMENT SUMMARY

In the last couple of years New Ways of Working (NWW) has become more popular. This flexible work concept of working anytime, anyplace, anyhow has been implemented in many organizations, including municipalities. Because Twynstra Gudde, an organizational advisory bureau, wants to be able to advise companies in this organizational change they want to oversee the consequences of implementing NWW. This research therefore explains the components of NWW and tests its relationship with social cohesion, work life balance, and performance. Another important aspect of this research is leadership. In this research a matching leadership theory and styles for NWW will be explained, and leadership will be tested as a moderator between NWW and its effects. The goal of this research is to test theory and to develop new insights. The findings will be discussed and practical implications will be given which can be used by Twynstra Gudde in order to advise their clients.

By developing a theoretical framework, hypotheses for this research were created. This framework also served as a way to operationalise the main variables in this research. In order to gather data, an online survey was used. This survey was based on two self-constructed, and five existing scales. Five municipalities participated in this research and the survey was completed by 117 respondents.

Based on an analysis of the data, six out of eight hypotheses were rejected, however new and unexpected relations were found. The most important findings are: (1) a positive relation between NWW and performance, (2) a positive relation between NWW and social cohesion, (3) positive relation between social cohesion and work life balance, and (4) positive relation between social cohesion and performance. The components of leadership, task and relationship behaviour are positively related to both social cohesion and performance. Leadership was found to be no moderator between NWW and its effects.

Based on these findings some practical implications can be made. Social cohesion influences organizational performance and work life balance and so therefore a focus on social cohesion is needed. When focusing on the preservation and improvement of social cohesion, training in communication media is recommended. It is also important to explain the importance of social cohesion, and make employees aware of the possible negative side effects of NWW. It is important for leadership to focus mainly on relationship behaviour because it has a positive influence on performance and social cohesion. In fact, it was even found in the data from the survey that 95% of the employees are self-directed which means that they do not need high task behaviour from their leaders. For improving both social cohesion and leadership, the use of Social Network Sites (SNS) for collaboration in teams and between a leader and his team is recommended.

Suggestions for further research include longitudinal research, objective measures of performance and a different measure of work life balance. It would also be interesting to assess the influence of social maturity on the readiness level of employees. Another possibility would be the use of a different leadership theory in order to define leadership styles.

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This report is a result of my master thesis which has been carried out at Twynstra Gudde. Twynstra Gudde is an organization advisory bureau active in both the public and private market. Their core competences are project and programme management, change management, organizational management, and cooperation management. Twynstra Gudde was founded by Dr. ir. Twynstra and Mr. Gudde in 1964 and in 2010 the organization had around 550 employees and a turnover of 70 million Euros. This master thesis is also the last part of my Master of Science degree in Business Administration at the University of Twente, Enschede.

After six months of hard work, I am proud to present to you my master thesis. Although this master thesis has taken all my energy for half a year, I found the total process a great experience. I had the possibility to work in a leading advisory bureau, surrounded by professionals. The past six months has been a journey of learning, accompanied with ups and downs. I would like to thank the people who helped me improve the quality of this thesis by encouraging me to think positively when there was a setback.

First of all I would like to thank my parents, who made it possible for me to study at the University of Twente and supported me mentally over the past six months. I would also like to thank my friend, Jeroen, who continually supported me, provided me with feedback and helped me get along with SPSS. I would also like to thank the rest of my family for supporting my choices and cheering me up when I really needed it. My friends have also made a contribution to this research because they understood when I had no time for them but were always interested in what I was doing.

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After all these words of thanks you can finally start reading my master thesis. I hope you all as enthusiastic as I am.

Linsey Pierik Amersfoort, July 2011

## **1. INTRODUCTION**

In this first chapter the relevance of this research and the research topic is explained. Consequently, the research questions will be discussed, followed by an overview of the goals of the different stakeholders with a research model and reading guide for this research.

## **1.1. Choice and justification of the research topic**

The Netherlands is a trendsetter when it comes to New Ways of Working (Arbobalans, 2010), which will be referred to as NWW from now on. The amount of companies in the Netherlands that use teleworking has almost doubled from 25% to 49% (CBS, 2009), and one out of five people telework (OSA, 2008). Telework is one of the most important components of NWW. During the last years NWW has become a very popular subject among organizations and employees. In 2009, 49% of businesses in the Netherlands were aware of what NWW was. We have seen an increase in this percentage to 96% in today's climate of 2011 (fmm.nl). However, what we need to consider is what NWW is exactly, and what the effects of implementing are. When carrying out an internet search one is presented with many topics related to NWW. Teleworking, flexibility, leadership and autonomy are the most common terms that will pop up on the screen. However, when looking for empirical research about the components of NWW there is some, but there is almost no concrete research on NWW and its effects on organizations and their employees. In this research, the level of NWW is based on components from bricks, bytes and behaviour (Baane et al., 2010) The level of how much components of NWW are implement will be referred to as maturity of NWW.

Because NWW is such a popular subject, more and more organizations are in the process of implementing NWW. In this research the focus is on municipalities. There are a lot of municipalities that have implemented NWW or are in the process of implementing NWW (van Houten, 2010). Because of the financial crisis, municipalities need to make financial savings and NWW can contribute to this. In addition to this, the nature of work within municipalities is changing to process working, which is supported by the numerous ICT developments. For municipalities that were already in need of a new building, the step to change this office into the "rules of NWW" is very attractive and again cost saving.

There are a lot of scholars (e.g. Bijl, 2007; Baane et al. 2010; Beck, 2000; Hameeteman et al. 2009) who have an opinion on how NWW should be implemented or which effects it could have. However these people mostly only make suggestions. In order to create distinctness about the effects of NWW, these popular theories and assumptions need to be explained and tested. According to Kleyngeld (2010), who wrote an article based on a research from Steelcase, leadership is the greatest obstacle when it comes to implementing NWW. He also stated that leadership and culture are connected to each other. According to Bijl (2009) social cohesion, which is a part of organizational culture, is expected to decrease when NWW is implemented. With teleworking the contact with the office decreases and therefore it can be expected that NWW negatively influences the social cohesion in a team. Maynard & Gilson (2004) found that shared understanding is more difficult to reach in a virtual team than in a team who experience face-to-face contact. Two other assumed effects of NWW that will be explained and tested in this research are: work life balance and performance. These two effects are in line with the expectations of

Bailey & Kurland (1999) about the influence of telework. A good work life balance is reached when someone's work and personal life do not interfere with each other. Performance will be measured by the perceptions of employees.

In this research the focus is not only on the effects of NWW but also on the role of leadership in the relationship between NWW and it effects. Many authors (e.g. Nonaka et al, 2006; Balogun and Johnson, 2005; Kirkman and Rose, 1999; Cohen et al. 1997) claim that the role of a leader is changing. Leadership always played a very important role in the creation of organizational context (Nonoka et al., 2006), and consequently leadership can be obstacle when implementing NWW. According to Hendriks (2010) the success of NWW depends on leadership. Although this source is not a piece of scientific literature, it highlights the importance of leadership. In the whitepaper from Ormit, leadership is also discussed to be the critical success factor for NWW. Therefore leadership will be tested as a moderator between NWW and its effects.

The main goal of this research is to test the relations between New Ways of Working, leadership, and social cohesion, work life balance, and performance and to test the moderating role of leadership. Another aim is to find new insights for NWW, its effects and leadership.

## **1.2. Research question**

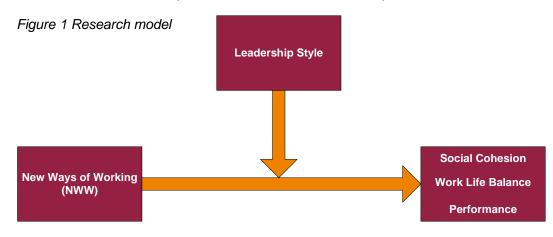
For this research one main research question was formulated.

Do relationships exist between New Ways of Working and: social cohesion, work life balance, and performance at municipalities, and does leadership influence these relationships?

In order to answer the research question, sub questions have been formulated

- What are the drivers of NWW?
- What are the components of NWW?
- What are the effects of NWW?
- What influence will NWW have on social cohesion?
- What influence will NWW have on work life balance?
- What influence will NWW have on performance?
- What kind of leadership theories exist?
- What is the importance of leadership?
- What is the most applicable theory for NWW?
  - Which styles represent this theory?

To illustrate the research question a model has been developed.



The model shows the main questions and sub questions of this research. How do the components of New Ways of Working influence social cohesion, work life balance and performance? Does leadership influence the relation between New Ways of Working and its expected effects?

## 1.3. Research goals

In this sub chapter the research goals from the involved parties are discussed and then compared with each other.

#### Stakeholder goals

This research has different stakeholders which have different, and sometimes similar, interests. The goals or benefits of the stakeholders are all discussed in this section.

#### Twynstra Gudde

As the principal and supervisor of this research the goals of TG are important. Although TG is the principal, there was the possibility to adjust and reshape the research questions, with keeping the preliminary goals intact. TG advises clients about NWW. For ICT and housing this is not a problem at all, and advice is concrete and well developed. However, human and organizational aspects of NWW are not as elaborated as they should be. TG is capable of giving advice, but wants to be able to advise on all the aspects and components of NWW. It is assumed that the results of this research can contribute to this "total package advice".

#### University of Twente

As supervisor of the author and as an educational institute their main goal is to accompany the student in their master course and to help the student with finalizing the thesis. Another goal is motivating the student to develop good research, which is done by giving feedback and being critical.

#### Cooperating municipalities

By voluntarily cooperating with this master thesis, the municipalities have the opportunity to test the maturity of their NWW and leadership styles. Their main goal is to receive the data analysis and results and use them for their own strategy and goals.

#### Author

I am the project manager of this research and I will take action in my best interest, keeping the principal and other stakeholders in mind. The main goal is to get my master degree by finishing my education with a qualitative good master thesis. Another aim of this research is to contribute to scientific literature.

#### Shared goals

Because the shared goals are in every stakeholder's interest, these can be seen as most important for this research:

1. Test and describe the effect of New Ways of Working on social cohesion, work life balance, and performance.

2. Describe a leadership style that is best suited to the elements of New Ways of Working.

3. Test if leadership is a moderator between NWW and its effects.

## 1.4. Abbreviations

INK:	Instituut Nederlandse Kwaliteit
HPWPs:	High Performance Work Practices
NWW:	New Ways of Working
LS:	Leadership Style
R1 t/m R4:	Employee Readiness level
SNS:	Social Network Sites
S1 t/m S4:	Situational leadership styles
TG:	Twynstra Gudde
TWQ:	Team Work Quality
WIPL:	Work Interference with Personal Life
Yammer:	Internal twitter network

## 1.5. Reading guide

Chapter Two consists of a theoretical framework in which the main subjects of this research are explained and defined in detail. The chapter starts with primary relations of this research, NWW and the assumed effects and after that leadership theories are described in detail.

In Chapter Three the methods used in this research are explained starting with an explanation of the type of research, then an explanation of the procedure for data collection and at the end a detailed explanation of the instruments for measuring the variables.

In Chapter Four an overview of the analysis is provided. The results are described and shown in tables and in models. The chapter also discusses the hypotheses of this research.

In Chapter Five the significant and insignificant findings are discussed and explained in more detail. After that a model is shown which is based on the significant findings. The chapter ends with the limitations of this research.

In Chapter Six suggestions for further research are given and the practical implications for TG are discussed. The chapter ends with a discussion where research questions are answered and the aim of the research is discussed.

## 2. THEORETICAL FRAMEWORK

In this chapter the key issues of this research (NWW, social cohesion, work life balance, performance, and leadership) are discussed and explained in order to develop hypotheses. The use of theory allowed making the topics measurable and translated them into concrete variables. The chapter starts with a definition of New Ways of Working followed by a discussion about the effects of NWW. The chapter then ends with an explanation of leadership theory and styles.

## 2.1. New Ways of Working

"The traditional way of working contradicts to the new reality that is characterized by connectedness, rapidity, flexibility, unlimited and maximal transparency. Try to answer that as a professional bureaucracy" – Baane et al.

The idea of working for a central organization from home or from one's own environment emerged in the seventies (Burch, 1991). NWW can be seen as a flexible work concept (Baruch, 2000). Flexible work concepts can be a solution to the rapid changes in the environment. In this chapter a closer look is taken at the drivers of the concept of "New Ways of Working" and at the components of NWW. There are different definitions for NWW. It all started with the white paper of Microsoft (2005) where NWW is defined as a different way of working and collaboration supported by the latest technology. When using NWW, people and organizations are more flexible with working times and working environment. This makes people feel more pleasant and it makes the organization more productive. According to Bijl (2009), NWW is a vision for working more effectively, efficiently, making this more pleasant for the organization and its employees. This vision is realised by putting a central emphasis on the employee and giving him space and freedom in how he works, where he works, when he works, whereby he works, and with whom he works. Baane et al. (2010) stated that NWW is time, and place independent working, focus on results, free access to information and flexible labour relations.

For this research the definition of New Ways of Working is *time, and place independent working, focus on results, free access to information and flexible labour relations* (Baane et al, 2010), this definition is most concrete and can be easily used for operationalisation of the variable NWW.

#### 2.1.1. The developments towards the New Ways of Working

According to Bijl (2009), NWW is driven by the developments in information technology. Another driver of NWW is the new generation that is entering the labour market. These new employees are familiar with using ICT, are higher educated, make more career changes and find a work-life balance important (Bijl, 2007). Tapscott (1998) adds that employees want to work more flexibly, more connected, more mobile, and want their own responsibilities. These preferences needed by (prospective) employees together with the tight labour market make it obvious that companies need to change to another concept of working. Because of all those high educated employees, the knowledge intensity of our economy is changing. According

to Bovenberg (2003) there is a shift from industrial economy towards service economy, this shift can be seen as a change in the nature of work (Lewis et al., 2007). In research from van den Hooff et al. (2007) it became clear that 25% of the workforce has professional occupations, and industrial jobs are decreasing.

Besides those developments there are also some very concrete problems that can be solved by NWW. A well-know problem in the Netherlands is the traffic jams which costs over one billion Euros per year. This problem can be solved when people work more from their homes can decide their own working hours and have the opportunity to travel outside the rush hour. Research from Microsoft NL found a decrease in traffic jams between 6% and 30%. This reduced amount of travel time can also decrease costs, and increase productivity (Schettler, 2002). Another concrete problem are the costs of absenteeism, the cost in the Netherlands is estimated to be around 10.8 billion Euros a year (ESLI, 2010). NWW is expected to decrease the absenteeism and research from Microsoft NL found a decrease between 1% to 5 % after the implementation of NWW.

## 2.1.2. Components of the New Ways of Working

As mentioned before, NWW can be seen as a flexible work concept. As with every concept, NWW comes with its own ingredients. According to Baane et al. (2010) NWW can be divided into three main components. The behaviour of employees and their leaders is important because employees form organization culture. They need to see the benefits of NWW and so they should be capable of taking own responsibilities and receiving a certain degree of freedom. According to Murphy (1996) an employee should be result oriented, self-disciplined, well organized, a good time manager, and trusted by his leader. The behaviour of a leader should involve releasing employees and giving them confidence and trust. The bricks represent the work spaces; the office is no longer a space to work, but should be seen as a meeting place. The interior should be inspiring, there must be room for different activities, and fixed workplaces per employee are no longer needed. The bytes represent the information and communication technology needed. Every employee should have a smart phone and a laptop, which allows them to work anytime, anyplace, anyhow. This is called teleworking, and is one of the most important components of NWW.

#### Teleworking

Teleworking is a component of NWW and can be classified as a one of the *Bytes* in the theory of Baane et al. (2010). According to Bredin (1996) the development of the internet, the low price of fast computers, and the developments of videoconferencing, groupware, digital phones and satellite communications have made teleworking and virtual offices more feasible and popular. Gainey et al. (1999) define telework as working at one's home or another location where employees use computers and communication technology to communicate with the main office, supervisors, coworkers, and customers. There are different types of teleworking (1) home-based, (2) satellite offices, (3) neighbourhood work centres, (4) mobile working (Kurland & Bailey, 1999). All those types of teleworking can be seen as a part of NWW. According to Chaudron (1995) teleworking can be successfully implemented when there is the right reason, right job, right employee, right manager, and right environment. These five conditions are more or less the same then the conditions of NWW.

For this research the definition used for teleworking is *working at one's home* or another location where employees use computers and communication technology

to communicate with the main office, supervisors, co-workers, and customers (Gainey et al., 1995).

## 2.2. Effects of New Ways of Working

Flexible work concepts are used to reduce costs, increase job satisfaction and increase productivity and performance (Bailey, 1993). However every organizational change has it pros and cons. According to Solomon (2000), NWW can increase morale and productivity, 22% (Verespej, 2001), improve retention and recruitment opportunities, and reduce absenteeism (Niles, 1998). Baruch (2000) suggests that those concepts can satisfy the need for autonomy for employees. However there are also some negative effects. Based on the book of Bijl (2009) the following table with pros and cons shows a quick overview.

Table 1 Advantages and disadvantages NWW

Advantages	Disadvantages
Increases revenues	Professionalization
Decreases costs	Only working alone
Increases sustainability	Decreases social cohesion
Good reputation	Never quit working
Satisfied employees	
Satisfied customers	

The following sections define and explain three effects of NWW that will be tested in this research.

## 2.3.1. Social Cohesion

"No one of us is as smart as all of us" - Blanchard

This statement of Blanchard refers to the importance of teambuilding. This does not directly mean that social cohesion is teambuilding, however social cohesion includes working together, working as a team and feeling good in a team, so it can be assumed that these two issues are related. Several authors suggested that the implementation of NWW is decreasing this important cultural component in organizations. Maslow (1943) stated decades ago with his theory of human motivation that people need social contacts. It is almost a basic need of a human being. When a person does not go to the office every day, but works from his home, it is obvious that there is a danger of loosing social contacts. Those social contacts are needed to form a team, and they are also needed so that an individual can identify themselves with a team and company. Adding to that Maynard & Gilson (2004) found that reaching a degree of shared understanding about a team, its task, structure and procedures tends to be more complex in a virtual team than in a faceto-face team context. According to Raub (1997) there is social cohesion in a team when there is a stable, sustainable, and close relation between team members. This definition of social cohesion is partly similar to the definition from Cartwright (1968) who stated that team cohesion refers to the degree to which team members desire to remain on the team.

When implementing teleworking Hamilton (1987) claims that employees miss the stimulation of exchanging ideas with colleagues and it also has a negative influence on communication and peer interaction (Nwqenyama, 1997). This is consistent with the social isolation, and decrease of social cohesion which is mentioned by Bijl (2009). According to Kurland & Cooper (2002) implementing telework can result in anxiety for isolation and reduced access to information. According to Bailey & Kurland (1999) the frequency of teleworking influences social and professional isolation. Pinsonneault & Boisvert (1996) stated that limiting the frequency of teleworking and oblige certain meetings decrease these feelings of isolation.

Hoegl & Gemuenden (2001) developed a concept called Team Work Quality (TWQ). This concept includes communication, coordination, balance of member contributions, mutual support, effort and cohesion (p.435). A team can be defined as a "social system of three or more people, which is embedded in a organization (context), whose members perceive themselves as such and are perceived as members by others identity, and who collaborate on a common task" (p. 436). According to Hoegl & Gemuenden (2001) an adequate level of cohesion and motivation to maintain the team is needed for high team work quality. Mullen and Copper (1994) also stated that social cohesion is an important determinant of team performance. Based on this literature it can be assumed that social cohesion is an important issue, but besides its influences on team performance, it is also expected to positively influence organizational performance. According to Mullen & Copper (1994) and Gully et al. (1995) there is a moderate but positive relationship between cohesion and organizational performance.

For this research the definition used for social cohesion is a stable, sustainable team, and close relation between team members (Raub, 1997).

## 2.3.2. Work Life Balance

A good work life balance means that work and personal life do not interfere with each other, which means that there is less work family conflict (Allen, 2001). When an employee has a good work life balance an organization can also benefit from that. Increased satisfaction (Frone, Yardley & Markel, 1997), less absenteeism and turnover are mentioned as positive effects. According to Konrad & Mangel (2000) a good balance also contributes to organizational performance and productivity.

Hudson (2005) defined work life balance as a satisfactory level of involvement or fit between the multiple roles in a person's life. Because this definition is too broad, a choice was made to use the scale of Fisher-McAuley et al. (2003). They divide work life balance into three dimensions: work interference with personal life (WIPL), personal life interference with work (PLIW), and work/personal life enhancement (WPLE).

Opinions vary when it comes to the relation between NWW and work life balance. Some authors suggest that the balance will increase because employees can divide their time better (Kirchmeyer, 1995). Others (Jenson, 1994; Illegems & Verbeke, 2004) state that because of the flexible work arrangements there is an increased satisfaction among work-life balance. However in contrast to those assumptions other authors (Pitt Catsouphes & Marchetta, 1991; Edwards & Rothbard, 2000) claim that because of the vague boundaries some employees are always working, and work-life balance can be influenced negatively. Bijl (2009) mentioned the same contradictions and is also not sure what influence NWW has on work life balance. What is for certain is that this work life balance becomes a very important working condition for employees. According to CBS the number of dual earners in the Netherlands is increasing. In 2002 68% of families existed of dual earners, in 2009 that percentage increased to 77% (CBS, 2010). It can therefore be assumed that the need for work-life balance is also increasing.

For this research the definition used for work life balance is *the degree that work interferes with personal life* (Fisher-McAuley et al., 2003), this is one of the three components of the work life balance scale.

#### 2.3.3. Performance

Increased organization performance is one of the assumed positive effects of NWW. A possible reason for the increased performance is the simplification of people working together by the use of ICT developments. Those developments also make it possible to access needed information anytime, anyplace, anyhow, and therefore handling information can be more effective than ever.

To further explain the effect of NWW on organizational performance, a comparison with High Performance Work Practices (HPWPs) is made. There are studies that measure the effect of specific HRM practices on organizational performance (Bartel, 1994), but also studies that focus on the impact of a complete bundle of practices (Huselid, 1995). According to Pfeffer (1998) HPWPs include flexible work arrangements, employee participation and incentive compensations, these characteristics are in line with some of components from NWW. The implementation of HPWPs can result in improved organizational performance (Becker, Huselid, Pickus, & Sprat, 1997). This means that there is a positive relation between HPWPS and organizational performance (Becker & Huselid, 1998). Nevertheless the degree of influence from those practices is very hard to examine (Becker & Gerhart, 1996).

For this research, organizational performance is based on perceived organizational performance. This means that performance is assessed by employees' perceptions of their organization its performance (Delaney & Huselid, 1996). The measure of organizational performance consists of quality and development of the services, ability to recruit and retain employees, and the relation between managers and employees. Unlike financial measures this measurement of performance is subjective. Because this research focuses on the observations and opinions of employees, the measurement of organizational performance by the perception of the employee is in line with the other measures used.

For this research the definition of performance is the quality and development of the services, ability to recruit and retain employees, and the relation between managers and employees (Delaney & Huselid, 1996).

Based on this theoretical framework the following hypotheses are developed: **Hypothesis**<sub>1a</sub> New Ways of Working decreases social cohesion **Hypothesis**<sub>1b</sub> High frequency of telework is negatively related to social cohesion **Hypothesis**<sub>2</sub> Social cohesion increases performance **Hypothesis**<sub>3</sub> New Ways of Working increases work-life balance **Hypothesis**<sub>4</sub> New Ways of Working increases performance

## 2.3. Leadership

"Leadership is one of the most observed and least understood phenomena on earth" - Burns.

Leadership is one of the oldest professions (Bass, 1990), and it seems that it is also the most discussed and criticized occupation. According to Aitken & Higgs (2003) there are over 8.000 books regarding leadership, and probably even more articles. In this subchapter the development of leadership, the importance of leadership, theories for this research, and the relation with NWW will be discussed.

#### 2.3.1. The development of leadership

When looking into the history of leadership and its development it can be stated that leadership changes, the role of leader, the respect for a leader and the leaders themselves changes. According to Taylor and Kavanaugh (2005) the drive towards these changes is influenced by the globalization of business, competition, employee unrest, and the need to operate efficiently. When reviewing literature it can be concluded that there are four mainstreams of theories (Bryman, 1992; Bass, 1990; Stoker & Kolk, 2003) in describing leadership styles, which will be discussed chronologically.

With *trait theories* the focus is on identifying the personal characteristics of a leader. There are seven traits that were associated with a successful leader: drive, the desire lead, honesty and integrity, self-confidence, intelligence, job-relevant knowledge, and extraversion.

There are three well known studies on the subject of behavioural theories. The University of Iowa studies (Lewin), Ohio state studies (Stogdill, Fleishman, Harris and others), and University of Michigan studies (Likert, Katz & Kahn). Lewin identified three leadership styles. The autocratic style, which represents centralized authority and low participation, the democratic style, which represents employee involvement, high participation and feedback, and the laissez faire style, where leadership is not visible and therefore can be seen as "hands-off management". The Ohio state study identified two dimensions of leader behaviour, where initiating structure is the task of a leader to define his role and the role of his group members, and where consideration is based on leader its mutual trust and respect for group members' ideas and feelings. The Michigan study defined two dimensions of leader behaviour: employee oriented and production oriented. Another behavioural view is the Managerial grid (Blake & Mouton, 1994). The dimensions taken into account are the concern for people and the concern for production. This theory places leadership styles into five categories (1) Impoverished management, (2) Task management, (3) Middle-of-the-road management, (4) Country club management, and (5) Team management.

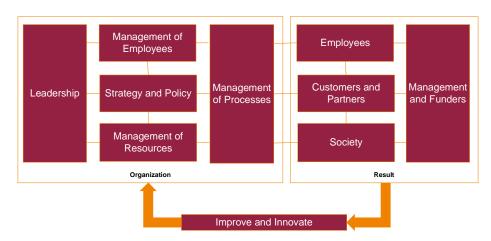
*Contingency theories* suggest that a certain kind of leadership style works best in a certain situation, and therefore leadership is contingent. The four most discussed and used in practice are the Fiedler model, the leader participation model, path-goal theory, and situational theory. Because in this research the focus is on the change of a certain situation in an organization, contingency theories are best suited. All four

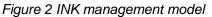
theories have different views on leadership, and will be explained in more detail in the final section of this subchapter.

The contemporary view contains the transactional, transformational, visionary, and team leadership. Transactional leadership is described as motivating and guiding followers by clarifying role and task requirements. With transformational leadership it is the same as transactional leadership, however instead of guiding and motivating followers, leaders inspire their followers to surpass their own self-interest for the good of the organization. Charismatic leadership assumes that a leader must be enthusiastic and self-confident. These characteristics should influence followers to behave in a certain ways. From the visionary view on leadership, a leader should be someone who articulates and creates a realistic vision of the future that is better than the current situation. With team leadership theory, the authors suppose that a leader should have patience to share information, should be able to give up authority, should be able to trust others and should understand when to intervene.

#### 2.3.2. Importance of leadership

According to Kotter (1996), leadership is an important factor in a process of change. Many authors (Conger & Kanungo, 1988; Osborn, Hunt & Jauch, 2002; Lok & Crawford, 1999) claimed that leadership styles are related to coping with change. According to Kotter (1996) a leader must be able to influence the employees in order to achieve less resistance with organizational changes. The INK management model focuses on the process of organizational change and management and also relates the issues of this research with each other and is therefore valuable to explain.





#### INK MANAGEMENT MODEL

The INK model is often used for evaluation of a company, and with this evaluation, strengths and weaknesses can be identified. The model names ten areas that can make an organization successful. As shown in the above model leadership is really important for managing an organization. Leadership influences the management of employees, the strategy and policy and the management of resources. These three areas are all needed in a process of change, like implementing or using the principles of NWW. Overall it is evident that a leader plays a very important role in this whole process of change, and implementing NWW.

#### New ways of working and leadership

NWW can be described as an organizational change which has an impact on leadership. According to Wang and Walumbwa (2007), leadership can be seen as a moderator of the adoption of telecommuting, which is one of the most important components of NWW. When implementing NWW, employees are becoming self-managers, and therefore leaders can perceive loss of power, influence and importance (Manz, Keating & Donnellon, 1990). According to Baane et al. (2010) the behaviour of a leader should involve releasing employees and giving them confidence and trust. According to Locke and Latham (1990) and Cascio (2000) a leader can no longer manage his/her employees by attendance but should manage employees by performance. This leadership is also described as coaching or serving leadership. According to McCready (2001) a leader becomes a facilitator, encouraging employees to make decisions on their own, but always being available for consultation.

#### 2.3.3. Leadership theories and styles for this research

For this research we define leadership from the view of contingency theory. Contingency theory means placing leadership in a context. When implementing NWW the context changes and leaders have to adapt to that. Instead of assuming that there is only one best practice, contingency theory assumes a best fit approach dependent on situational context. Four different contingency theories will be discussed in order to asses which one best suits in coping with NWW.

#### The Fiedler model (Fiedler, 1967)

This model assumes that group performance depends on a match between the interaction of a leader with his followers and the degree in which a leader can influence and control a situation. The model defines three situational factors (1) leader-member relations, (2) task structure, and (3) position power. Two styles were identified based on scores from a Least-Preferred Co-worker (LPC) questionnaire, which are a relationship-oriented style, and a task-oriented style.

#### Leader participation model (Vroom & Yetton, 1973)

The model assumes that leadership must be adjusted to reflect the task structure based of a sequential set of rules, also called contingencies, to determine the amount and form of follower participation in decision making. Vroom & Yetton (1973) defined five leadership styles based on contingencies (1) Decide, (2) Consult individually, (3) Consult group, (4) Facilitate, and (5) Delegate.

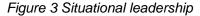
#### Path- goal theory (House, 1971)

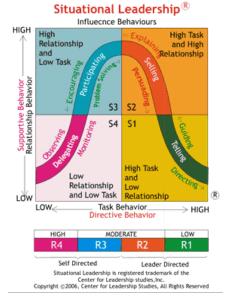
This theory evolved from expectancy theory of motivation and it assumes that it is the task of the leader to assist followers and provide the support and directions that are needed to achieve goals; this means that the leadership is related to guidance. In the same way as with other contingency theories, House (1971) discusses the fact that the type of leadership is dependent on the situation. The behaviour of the leader is viewed as a source of satisfaction, which influences the performance. House (1971) describes four different behaviours a leader can have (1) Directive, (2) Achievement-oriented, (3) Participative, and (4) Supportive. The path-goal model states that these behaviours are fluid and can be adopted depending on the situation.

#### Situational theory (Hersey, Blanchard & Johnson, 2001)

According to Hersey et al. (2001), situational leadership is based on the proposition that leadership is a process of influence, where a leader requires three basic

competencies. (1) Diagnosing is being able to understand the situation you are attempting to influence, (2) Adapting is being able to adapt your behaviour, and the other things you have control over, and (3) Communicating is being able to put the message in a way that people can easily understand and accept (p.295). The Fiedler model is the same as the situational theory in the way that it defines a distinction in two dimensions in leadership (1) task behaviour, and (2) relationship behaviour. Task behaviour involves telling people exactly how to do their work, and relationship behaviour involves listening, facilitating and supporting a subordinate (p.175). The authors identified four different styles (1) Telling, high task – low relationship, (2) Selling, high task – high relationship, (3) Participating, low task – high relationship, and (4) Delegating, low task – low relationship. Another aspect of situational theory is the readiness level of employees. Readiness is defined as the ability and willingness of an employee. There are four levels of readiness levels is applicable to a certain kind of leadership style. A model was developed to illustrate their theory.





Situational theory assumes that successful leadership is achieved by selecting the right leadership style which is contingent on the level of follower readiness. The job of a good leader is to asses the readiness level of an employee and chose the best matching leadership style. NWW requires that employees are self-direct (R4 and R3), therefore both the participating (S3) as the delegating (S4) leadership are suitable for the context of NWW. A problem with the delegating leadership may occur if at a certain point there is no leadership at all (laissez-faire), and employees are becoming fulltime self-managers.

Agreeing with Gibson et al. (2002), I think that the situational leadership model is a suitable tool to influence employees that are working by the principles of NWW. The model is very popular; it has been used over 10,000 times by managers in over 1.000 of the world's leading organizations. The model is well known for its easy application in practice. Another reason for using this theory are the two dimensions used in this theory; task and relationship behaviour, both dimensions are applicable for describing leadership styles for NWW. As stated before, leadership changes into facilitating the development of self-controls, so that employees can manage their work (Cohen, Chang & Ledford, 1997). This means that task behaviour is no longer necessary; however relationship behaviour can be an important factor. Another asset

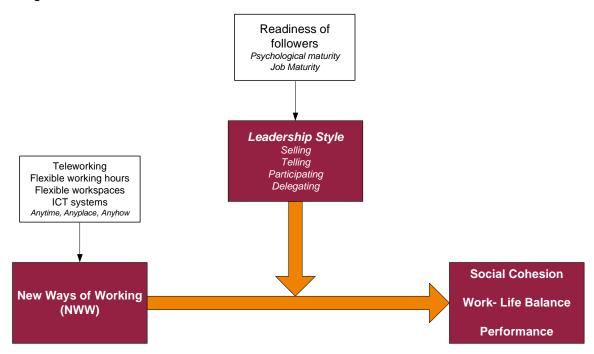
of situational theory is the described readiness levels of employees, which consists of psychological maturity (willingness) and job maturity (ability). The readiness level is a clear way to describe maturity of employees. Besides job and psychological maturity, social maturity could also influence leadership and maybe even the effects NWW. Social maturity can be described as the way in which a person stands in society and follows certain standards and values. The way people live and act at their job and in their personal life can influence the required leadership style. Because this research is based on situational theory, social maturity will not be measured. Employees that work following the "rules" of NWW are expected to manage themselves and therefore must be willing and able to do so. Therefore readiness levels three and four are in line with the conditions of NWW.

Based on this theoretical framework the following hypotheses are developed: **Hypothesis**<sub>5</sub> Leadership is a moderator between NWW and social cohesion. **Hypothesis**<sub>6</sub> Leadership is a moderator between NWW and work life balance. **Hypothesis**<sub>7</sub> Leadership is a moderator between NWW and performance.

## 2.4. Research model – revised

Based on this theoretical framework the research model was reformulated

Figure 4 Research model - revised



The theoretical framework was used to revise the existing research model. New Ways of Working can be summarized as working "anytime, anyplace, anyhow", and also the main components are mentioned in the model. For the variable leadership, the situational theory is used, which describes four leadership styles. Another important factor of this theory is the readiness of the followers, which can be divided into psychological maturity, also known as willingness, and job maturity and as ability. The model has not changed regarding to the effects of NWW.

## **3. METHODOLOGY**

This chapter starts with an explanation of the type of research, where after the operationalisation of the variables is explained in the second sub chapter. In the final sub chapter the procedure of data gathering is explained and a description of the sample is provided.

## 3.1. Type of research

In this sub chapter the type of research, purpose of the research, and research design are discussed.

#### 3.1.1. Aim

In general there are two different aims for a research; applied and basic (fundamental). Applied research is used when there is a practical problem that needs to be solved. For basic research there is no, so called, commercial value of the research. The aim of this research is fundamental, because it is based on interest to a certain scientific question.

#### 3.1.2. Purpose

One can distinguish three different types of research; explanatory, exploratory, and descriptive. Exploratory research involves developing new theories and ideas about problems and contexts. For descriptive research, the name speaks for itself; describing a problem, context or a situation, which is often done by creating a complex model. Explanatory research involves testing causes. This research has two aims; testing expected relations from popular theory, and developing theory by empirical research. This means that this research can be classified as both explanatory and exploratory. Explanatory research hypothesis are often being tested by the use of quantitative methods.

#### 3.1.3. Time

When developing a research design, a choice can be made between a cross sectional and a longitudinal research design. Longitudinal research involves gathering data from different moments in time and making series of observations. Cross sectional design involves data gathering at one moment in time. Because this research has a time limitation of approximately six months, longitudinal research was not possible. Data was gathered at one moment and therefore this research can be classified as a cross sectional design.

## 3.1.4. Type of data

Before gathering data a choice had to be made between a qualitative and a quantitative research. Qualitative research involves analyses of data as words derived from for example interviews. Quantitative research involves numerical data.

Because a high amount of respondents are needed to test relationships and develop new ones the data was gathered through a survey which provides quantitative data. As stated before, quantitative data is often used in explanatory research.

## 3.2. Procedure

In the following sections the methodological steps and choices taken during this research are discussed.

## 3.2.1. Sample selection

Choosing a sample or a sampling method is one of the most important steps in a research (Trochim, 2000). Because the main focus of this research is testing relations between NWW and its effects, the population of interest are employees that work with the concept of NWW. Because of validity issues it is important that these employees are in a similar working environment. The research focuses on employees working at a municipality. The participating municipalities differ in size, and there were no selections based on geographical location.

To find municipalities that were willing to participate, about 40 different municipalities were called and, in most cases, received an email with information about the research. Many of them were not willing or able to participate in this research for different reasons. Two of the most common reasons were the anxiety of agitation of the employees and an employee commitment research that was planned in the same time as this research. After a period of six to eight weeks, five municipalities agreed to participate.

## **3.2.2. Data collection**

Because the goal of this research is to test relations and develop new insights, a quantitative data collection method is chosen. Because of practical reasons an online survey (Appendix B) was used (surveygizmo.com). This method has multiple advantages because it is cheap and easy to use for the respondent (Heerwegh & Loosveldt, 2002) and all data is directly converted to a SPSS data file, which rules out the possibility of making mistakes when entering the data (Smith, 1997). According to Dillman, Tortora and Bowker (1999) there are eleven principles for a successful survey. All principles which were applicable were used in the design of the survey. For instance, a welcome screen that is motivating, a simple first question, no use of obliged questions, all options for answers are visible in one screen, a figure that shows how long it will take to complete the survey. Also, the language of the survey was Dutch, because this is the native language of the respondents.

Participation in this survey was possible by using the link to the website. The link was posted on Yammer and the internal websites of the different municipalities and was open for about four weeks. Every week a reminder with the link was sent through yammer. In one case there was the possibility to directly send an email with the link to a group of employees; this email has been sent three times.

#### 3.2.3. Description of the sample

The sample exists of employees from five different municipalities in the Netherlands. Their jobs and departments vary a lot and there was also variation in the number of years of their service, the mean number of year being 9.7. 58% of the respondents are full time employed, and 42% are part-time workers. The greatest part (>65%) of the respondents' age lies between 30 and 50, 54% of the respondents are male, and 46% are female. The educational level does not vary a lot; about 85% of the respondents are higher educated (HBO/WO). A graphic view of the sample can be found in Appendix C.

## 3.3. Instruments

For measuring the constructs different validated scales are used, two selfconstructed, and five existing scales. The survey existed of 19 questions and a total of 92 items (Appendix A).

Chronbach's Alpha was used to asses the reliability of the survey. According to Nunnally & Bernstein (1994) the reliability of a variable is good when alpha is higher than .70, sufficient when the alpha is between .60 and .70, and insufficient when alpha is lower than .60 (p.265). For this research all variables can be used, six out of seven variables scored "good" and one variable scored a "sufficient" alpha.

#### 3.3.1. New Ways of Working

The NWW scale was specially developed for this research. For measuring the maturity of using NWW items were used from "Telewerken Waterschappen" and some items were developed by the author. Items were based on the theory of Baane et al. (2010) who divides the main components of NWW in bricks, bytes and behaviour. Examples are for bricks "*In our organization the office is a meeting place*", for bytes "*In our organization there are sufficient ICT facilities to support working from home*", and for behaviour "*In our organization the culture is aimed at collaboration on distance*". Adding to these bricks, bytes, and behaviour are two items to measure the frequency of teleworking were included. The variable exists of 16 items ( $\alpha$ =.71), which could be rated by a five-point likert scale from strongly disagree (1) to strongly agree (5). Items two, six, and nine are recoded. For dividing the respondents into phases of NWW the minimum and the maximum score were calculated which is 16 to 80 points. Because the two extremes of a question are rarely chosen the points per phase are not equally divided. Phase 1, score 16 – 40; Phase 2, score 41 – 55; Phase 3, score 56 - 80.

## 3.3.2. Social Cohesion

For measuring the degree of social cohesion a validated questionnaire from Hoegl & Gemuenden (2001) was used. The variable consisted of six items ( $\alpha$ =.89) on a four point likert scale from strongly disagree (1) to strongly agree (4). An example is: *"Team members in my team have a strong relationship*". Item four is recoded.

#### 3.3.3. Work-life balance

For measuring work-life balance, a part (WIPL) of a validated questionnaire of Hayman (2005) was used. The variable consisted of seven items ( $\alpha$  =.83) on a five point likert scale from always (1) to never (5). An example is *"I neglect personal needs because of work"*. Item seven is recoded.

#### 3.3.4. Performance

For measuring the performance a research of Delaney and Huselid (1996) was used. The items for measuring Perceived Organizational Performance are somewhat altered into the context of a service organization. The variable consisted of six items ( $\alpha$ =.73) on a five point likert scale from very bad (1) to very well (5). An example is: *"The quality of our service"*.

## 3.3.5. Leadership

Situational leadership can be measured by a combination of scores, from task and relationship behaviour. A part of a validated and consistent questionnaire, the Leader Behaviour Description Questionnaire (LBDQ XII) was used to develop two variables. In the LBDQ, initiation of structure represents task behaviour and consideration represents relationship behaviour.

For measuring task behaviour nine items ( $\alpha$ =.68) on a five-point likert scale from never (1) to always (5) were used. An example is *"My leader encourages the use of uniform procedures"*. The original variable consisted of ten items, but because of a fault made in the questionnaire one item needed to be deleted. This can also be an explanation for the moderate Chronbach's Alpha.

For measuring relationship behaviour ten items ( $\alpha$ =.93) on a five point likert scale from never (1) to always (5) were used. An example is *"My leader is friendly and approachable"*. Items nine, and 10 are recoded.

To measure the readiness of the employees a new scale was developed based on an article Vechhio et al. (2011). The variable consist of four items ( $\alpha$ =.95) on a five point likert scale from strongly disagree (1) to strongly agree (5). Readiness was divided into ability and willingness, where ability is the job maturity and willingness is the psychological maturity. An example is "*I have the right knowledge to accomplish my tasks*".

## 4. RESULTS

In this chapter all data analysis will be presented in tables and figures. Through extensive data analyses the hypothesis of this research will be accepted or rejected. Further explanation of all analysis will be given in Chapter Five.

The sample consisted of 153 respondents with 117 completed surveys. The greatest part (>65%) of the respondents' age lies between 30 and 50, 54% of the respondents are male, and 46% are female.

## 4.1. Analysis per variable

In this sub chapter all the variables from the questionnaires are analysed and described.

#### 4.1.1 New Ways of Working

Table 2 shows that the scores of New Ways of Working are not wide spread (22 – 47), knowing one can score from 16 till 80 points. When taking this into account, together with the mean of 40, it is not longer possible to split up the data into three different phases of maturity in NWW. Phase three of NWW consists of only three respondents and therefore no significant tests are possible when comparing the phases. NWW will therefore be measured by maturity based on the used likert scales per item.

Mean	SD	Min.	Max.
40.0	7.2	22.0	57.0

Phase 1	Phase 2	Phase 3	
80	70	3	Number
52.3	45.8	2.0	Percentage

#### 4.1.2. Teleworking

Table 3 shows that although about two thirds of the employees have the possibility to work from outside the office, however only half uses this possibility.

Table 3 Working outside the office (days per w
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	Never	Max. 1 day	Max. 2 days	Max. 3 days	Over 3 days
Possible to work outside the office	32.7%	40.0%	9.3%	1.3%	16.7%
Works outside the office	52.0%	38.2%	8.6%	0.0%	1.3%

## 4.1.2. Goals and obstacles New Ways of Working

Table 4 shows an analysis of the opinion from the respondents about the goals for implementing NWW and table 5 shows the obstacles in the implementation of NWW.

Table 4 Goals New Ways of Working (N=135)

Goal	Strongly disagree	Disagree	Neither agree nor disagree	Agree	Strongly agree	Mean
Less office space needed (less m2)	2.2%	3.7%	11.9%	61.5%	20.7%	3.95
Improved work life balance	2.2%	3.7%	17.0%	55.6%	20.7 %	3.90
Being an attractive employer	3.0%	2.2%	17.8%	55.6%	21.5%	3.90
Decreases travel time	1.5%	7.4%	11.9%	63.7%	15.6%	3.84
Costs saving	1.5%	10.4%	17.0%	55.6%	15.6%	3.73
Higher productivity	4.4%	6.7%	29.6%	44.4%	14.8%	3.59
Improved focused working	4.4%	11.1%	21.5%	48.1%	14.8%	3.58
Saving of the environment by less home work traffic	3.7%	11.2%	20.1%	55.2%	9.7%	3.56
Improved alignment work task and work space	3.0%	11.1%	40.7%	34.8%	10.4%	3.39
Improved services to citizens and customers	6.0%	28.4%	39.6%	20.1%	6.0%	2.92
Improved communication	5.2%	35.6%	41.5%	14.8%	3.0%	2.75

Table 5 Obstacles New Ways of Working (N=135)

Obstacle	Strongly disagree	Disagree	Neither agree nor disagree	Agree	Strongly agree	Mean
There are no clear procedures and rules of behaviour	1.5%	9.6%	27.9%	48.5%	12.5%	3.61
Our culture is not aimed at NWW	2.2%	12.5%	25.7%	42.6%	16.9%	3.60
Our office is not designed for NWW	3.7%	14.7%	25.7%	40.4%	15.4%	3.49
Leaders don not support NWW	2.2%	13.2%	39.3%	27.4%	17.8%	3.45
The top of our organization does not supports NWW for 100%	2.2%	11.0%	45.6%	25.0%	16.2%	3.42
The HR support is insufficient	1.5%	17.8%	43.0%	25.9%	11.9%	3.29
It is difficult to collaborate with all teleworkers	4.4%	20.0%	37.8%	31.1%	6.7%	3.16
Our business processes are not suitable for NWW	4.4%	36.8%	22.1%	30.9%	5.9%	2.97
The working hours are not flexible enough	6.6%	30.1%	27.9%	30.9%	4.4%	2.96
The employees have too little discipline	7.4%	31.6%	38.2%	19.1%	3.7%	2.80
The task allocations is not suitable for NWW	4.4%	41.9%	29.4%	19.1%	5.1%	2.79
Teleworkers are too less reachable	11.9%	35.6%	37.8%	12.6%	2.2%	2.58

Based on the means of the different goals, a top three of the opinions from the respondents was conducted. For goals: (1) Less office space, (2) Improved work life balance, and (3) being an attractive employer. The second goal supports the assumption that is made in the theoretical framework; NWW improve work life balance. The top three for obstacles were as follows: (1) There are no clear rules, (2) Our culture is not aimed at NWW, and (3) Our office is designed for NWW.

#### 4.1.3. Effects NWW

In this section the three assumed effects of NWW are discussed. Significance of the analyses will be assessed at the p = < .05.

#### Social Cohesion

Table 7 shows that a big part (>70%) of the respondents found that the social cohesion in their team is good. This is the opposite of what was suggested as  $H_{1A}$  suggests that NWW decreases social cohesion. A correlation test is needed to assess the hypothesis.

Table 7 Social Cohesion (N=119)	

Very poor	Poor	Well	Very well	Mean
1.7%	26.9%	62.2%	9.2%	2.79

#### Work Life Balance

Table 8 shows that work life balance is experienced as good (>70%). To see if this is in line with  $H_3$ , which suggests that NWW improves Work Life Balance, the next sub chapter will provide a correlation analysis.

Table 8 Work Life Balance (N=118)

Very poor	Poor	Moderate	Well	Very well	Mean
0.0%	1.7%	26.5%	62.4%	9.4%	3.79

#### Performance

Table 9 shows that performance is between moderate and well (m:3.47). To test if this is in line with  $H_4$ , which suggests that NWW improves the performance the next sub chapter will provide a correlation analysis.

Very poor	Poor	Moderate	Well	Very well	Mean
0.0%	3.4%	46.6%	50.0%	0.0%	3.47

## 4.1.4. Effects and differences independent variables

In this section the differences between the groups of independent variables will be discussed. An overview of all analyses is given in table 10 till 14. The analyses showed that there are differences in age groups. The analysis shows that social cohesion is higher till the age of 40 and after the age of 60. When analysing the differences in education there seems to be a difference in level of social cohesion, where the lowest educational level has the highest degree of social cohesion. There is the same distribution between the educational levels for the effect performance. Further

employees with more than 16 years of service seem to experience a better work life balance, than employees with less than 16 years experience.

Although there are some differences in groups, nothing was classified as significant at p = <.05.

Gender	Social Cohesion		Work Life	Balance	Performance	
	Mean	SD	Mean	SD	Mean	SD
Man	2.79	0.48	3.83	0.51	3.38	0.42
Woman	2.76	0.60	3.64	0.61	3.48	0.49

Table 10 Differences between gender

Age	Social Co	Social Cohesion		Balance	Performance	
	Mean	SD	Mean	SD	Mean	SD
20 - 30	2.85	0.39	3.87	0.50	3.31	0.42
30 - 40	2.86	0.49	3.70	0.54	3.45	0.49
40 - 50	2.67	0.58	3.67	0.65	3.41	0.45
50 - 60	2.67	0.63	3.81	0.54	3.45	0.43
> 60	3.00	0.45	3.80	0.60	3.39	0.45

#### Table 11 Differences between age

#### Table 12 Differences between educational level

Education	Social Cohesion		Work Life Balance		Performance	
	Mean	SD	Mean	SD	Mean	SD
Lower general	3.75	0.12	3.86	0.20	3.93	0.30
secondary education						
Higher general	3.04	0.42	3.82	0.36	3.68	0.38
secondary education Intermediate Vocational Training	2.69	0.47	3.84	0.66	3.37	0.51
Higher Vocational	2.76	0.54	3.76	0.58	3.42	0.44
Education University education	2.77	0.56	3.65	0.56	3.41	0.47

#### Table 13 Differences FTE

FTE	Social C	Social Cohesion		Balance	Performance	
	Mean	SD	Mean	SD	Mean	SD
< 12 hour 12 - 20 hour						
20 - 35 hour	2.79	0.58	3.75	0.64	3.49	0.46
> 36 hour	2.77	0.46	3.74	0.51	3.39	0.45

Table 14 Differences between municipalities

Municipality	Social Cohesion		Work Life	Balance	Performance	
	Mean	SD	Mean	SD	Mean	SD
Х	2.74	0.44	3.75	0.54	3.50	0.45
Y	2.81	0.66	3.80	0.60	3.26	0.48
Х	2.77	0.48	3.48	0.34	3.49	0.30

Years of Service	Social Cohesion		Work Life Balance		Performance	
	Mean	SD	Mean	SD	Mean	SD
0 – 3	2.79	0.48	3.65	0.59	3.32	0.51
4 – 9	2.69	0.58	3.65	0.60	3.34	0.44
9 – 15	2.93	0.49	3.86	0.53	3.62	0.44
16 – 24	2.72	0.39	4.10	0.39	3.40	0.35
25 – 40	2.73	0.74	3.89	0.52	3.53	0.36

Table 15 Differences between years of service

## 4.1.5. (Situational) leadership

Figure 5 shows that the majority of the employees (>70%) have a leader that suites the expected leadership style for NWW, participating (S3) and delegating (S4). However Table 1 showed that NWW was not mature in every situation which means that it is possible that the leadership style was already present before implementing NWW. Therefore it can be assumed that leadership style changes not only dependent on a situation but also on employees/followers. About 95% of the respondents have readiness level four, according to situational theory we expected the readiness level to be in line with the leadership style. Nevertheless only 33% are delegating leaders (S4). This means that the proportions of leadership styles and readiness levels are not in line. A possible explanation for this is that leaders do not adapt their leadership style to the readiness level of their employees.

Figure 5	Situational	leadership
----------	-------------	------------



Hi	gh		Мос	lerate	L	-ow	
	<b>4</b> Illowers ,1%	R 0 follo 0%		<b>R2</b> 2 followers 1,7%		<b>R1</b> 5 followers 4,2%	
	Self-di	rected	1,770		Leader-directed		_ /0

To analyse the differences between the leadership styles an Anova test for means was performed. From table 16 it can be concluded that there are no big differences between the four leadership styles. The only significant difference was found between the social cohesion from telling (S2) and participating (S3) with p = < .05, and there was also a significant difference between the social cohesion from telling (S3) and delegating (S4) with p = < .05.

LS	Matu NW		Soc Cohe		Work Bala		Perfor	mance	Ν
	Mean	SD	Mean	SD	Mean	SD	Mean	SD	
Telling (S1)	2.94	0.35	3.00	0,29	3.90	0.66	3.90	0.58	3
Selling (S2)	2.46	0.46	2.96	0,44	3.71	0.54	3.54	0.46	33
Participating (S3)	2.59	0.49	2.71	0,61	3.73	0.57	3.38	0.45	45
Delegating (S4)	2.41	0.43	2.69	0,53	3.75	0.60	3.35	0.43	40

Table 16 Differences between leadership styles

## 4.2. Correlations

This sub chapter focuses on identifying and analysing correlations between variables. First, the independent variables are analysed and then the dependent variables. Based on the results from these tests hypotheses can be accepted and rejected.

## 4.2.1. Correlation independent variables

Although the earlier comparison between the groups of the independent variables showed no significant difference, a correlations test was performed to support this statement. Table 17 shows that there is only one significant relationship, which is a small one between years of service and task behaviour. This means the m ore the years of service, the higher the task behaviour of a leader.

Variable	NWW	Task Behaviour	Relationship behaviour	Readiness	Social Cohesion	Work Life Balance	Performance	М	SD
Gender	.04	.15	.11	04	02	17	.11	1.46	0.5
Age	06	.14	16	.08	07	.02	.02	3.76	1.05
Educational level	.06	.07	.03	.01	02	.11	03	4.15	.82
FTE	04	.12	13	.00	01	.01	11	3.58	.50
Years of service	.09	.18*	16	.18	.01	.16	.14	9.77	9.25

Table 17 Correlation independent variables, means, standard deviations

\* Correlation is significant at p < .05 (two tailed)

#### 4.2.2. Correlation between dependent variables

Table 18 shows the correlations, means and standard deviations of the variables. It can be concluded that relationship behaviour of a leader is positively related to NWW (r=.31). Social cohesion is positively related to NWW (r=.20), to both task (r=.33) and relationship (r=.37) behaviour of a leader. Work life balance is positively related with social cohesion (r=.26). Performance is positively related to NWW (r=.39), task behaviour (r=.28), relationship behaviour (r=.41), and to social cohesion (r=.40). The only negative significant relations are the relations between leadership style, performance (r=.21) and social cohesion (r=.20).

Variable	1	2A	2B	2C	3	4	5	6	М	SD	Ν
										. –	
1. New ways of Working	х								2.50	.45	153
2A. Leadership - task behaviour	.11	х							3.20	.49	121
2B. Leadership - relationship behaviour	.31**	.57**	х						3.55	.72	121
2C. Leadership Styles (1-4)	10	72**	47**	х					3.01	.84	121
3. Readiness	13	04	05	03	х				4.23	.69	118
4. Social Cohesion	.20*	.33**	.37**	20*	.04	х			2.78	.54	119
5. Work life Balance	04	.16	.14	.01	.03	.26**	х		2.26	.57	117
6. Performance	.39**	.28**	.41**	21*	.01	.40**	.07	х	3.43	.46	118

Table 18 Correlation, means, standard deviations

\* Correlation is significant at p < .05 (two tailed)

\*\* Correlation is significant at p < .01 (two tailed)

**Hypothesis**<sub>1a</sub> New Ways of Working decreases social cohesion is rejected. **Hypothesis**<sub>2</sub> Social cohesion increases performance is accepted. **Hypothesis**<sub>3</sub> New Ways of Working increases work-life balance is rejected **Hypothesis**<sub>4</sub> New Ways of Working increases performance is accepted.

To test Hypothesis<sub>1b</sub> a correlation test was performed on the frequency of people working from outside the office and social cohesion. Table 19 shows the results. There is no significant relation between teleworking and social cohesion.

Table 19 Frequency of teleworking

		Social Cohesion
	Pearson Correlation	.10
Teleworking	Sig. (2-tailed)	.26
	Ν	118

 $Hypothesis_{1b}$  High frequency of telework is negatively related to social cohesion is rejected

## 4.3. Moderator Analyses

Tables 20 to 22 show the moderator analyses per assumed effect of NWW. Leadership has, for all three effects, no moderating role. The data is not significant and the moderating relations are very small (r = <.10).

Table 20 Leadership moderator NWW - Social cohesion
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Model		Beta	Sig.
	NWW	.186	.041
	Leadership	182	.045
	NWW*LeaderShip	.073	.416

Dependent variable: social cohesion

#### Table 21 Leadership moderator NWW - Work Life Balance

Model		Beta	Sig.
	NWW	029	.757
	Leadership	.002	.987
_	NWW*LeaderShip	.091	.332

Dependent variable: Work Life Balance

#### Table 22 Leadership moderator NWW - Performance

Model		Beta	Sig.
	NWW	.368	.000
	Leadership	.166	.055
	NWW*LeaderShip	.000	.996

Dependent variable: Performance

**Hypothesis**<sub>5</sub> Leadership is a moderator between New Ways of Working and social cohesion is rejected.

**Hypothesis**<sub>6</sub> Leadership is a moderator between New Ways of Working and work life balance is rejected.

Hypothesis, Leadership is a moderator between New Ways of Working and performance is rejected.

## **5. DISCUSSION**

In this chapter the findings of this research are discussed and the limitations and suggestions for further research are explained. The chapter ends with some practical implications based on findings and literature.

## 5.1. Findings

In this sub-chapter the most important findings, both significant and insignificant, are discussed. This subchapter ends with a model of the important significant findings.

## **5.1.1. Significant results**

#### Social Cohesion

There is a small positive relation between NWW and social cohesion. However, the hypothesis,  $H_{1a}$  New Ways of Working decreases social cohesion, suggests the opposite. One possible explanation may be that because NWW was had relatively short implementation (with 60% shorter than one year) such cultural change is not visible yet. According to some advisors<sup>1</sup> cultural change takes three years: 'it takes one year to deploy the change, one year to accept the change and one year to fully embrace the change'. Rijnconsult (2011) agrees and states that a cultural change takes between three and four years. Another plausible reason for the fact that NWW increases social cohesion can be the awareness of people. Employees are aware of the fact that working from home can create isolation, difficulties in communication and difficulties in teambuilding and so they focus on maintaining contact with their colleagues and team. Therefore it is important that the threshold for communication from their homes is very low and easily applicable.

#### Performance

There is a medium positive relationship between NWW and performance. This means that the hypothesis,  $H_4$  New Ways of Working increases performance, is found to be true. According to Sanchez et al. (2007) it is mainly the flexibility in work that increases performance. If an employee receives flexibility in forms of autonomy and, for instance, teleworking, they can become more committed to their firm. This means that employees feel more responsible for the organizational performance. H<sub>2</sub> Social cohesion increases performance is therefore found to be true. There is a medium positive relationship between social cohesion and performance meaning that a good social cohesion contributes to good performance.

#### Work Life Balance

There is a small positive relationship between social cohesion and work life balance. This means that a good social cohesion contributes to a good work life balance. Working from home requires trust and collaboration in a team, this party corresponds with the definition of social cohesion. According to Holton (2001) trust and collaboration in a team has a positive impact on the quality of working life, which can be compared to an improvement of work life balance. A plausible explanation can be

<sup>&</sup>lt;sup>1</sup> http://workingsmarter.typepad.com/my\_weblog/2008/07/the-timeframe-for-culture-change.html

that if employees feel good in a team and feel responsible for the team and for each other they also help each other when this is needed. This can result in helping colleagues in balancing their work and personal life by dividing (over)work.

#### Leadership

There is a small negative relationship between leadership style social cohesion, and a medium negative relation between leadership style and performance. This means that the leadership style delegating (S4) negatively influences both social cohesion and performance. A possible explanation is the probability of a laissez-faire leadership style, which can result in no leadership. This partly corresponds with the findings for task and relationship behaviour. High task and relationship behaviour correspond with high social cohesion and performance. For situational theory this means that the style of telling (S2) positively influences both social cohesion and performance. However, for both social cohesion and performance the correlation with relationship behaviour is higher than with task behaviour. This finding suggests that relationship behaviour is more important than task behaviour, which can be interpreted as moving towards the leadership style participating (S3).

About 95% of the employees have a readiness level of four (self-directed). According to situational theory this readiness level is best suited to the leadership style delegating (S4). However, the findings of this research suggest a negative influence on social cohesion and performance when using this leadership style. In addition relationship behaviour is found to be important. Altogether this means that the participating leadership styles (S3) probably suites best with NWW and its effects.

#### **5.1.2.** Insignificant results

#### Social Cohesion

For social cohesion the hypothesis<sub>1b</sub> *High frequency of telework is negatively related to social cohesion* was rejected. A possible explanation for this rejection is in line with the explanation of the increase of social cohesion. Employees are aware of the fact working from home can isolate them and put more effort in the relationship with their team and leader.

#### Performance

A finding that was insignificant and not hypothesized is that there are no significant differences in leadership styles and performance. Although task and relationship behaviour both influence performance positively, a significant difference between the four styles could not be found.

#### Work Life Balance

 $H_3$  New Ways of Working increases work-life balance is rejected. There seems to be no relation between those variables. This corresponds with earlier findings in theory where contradictions about work-life balance were found. Another explanation is that for the operationalisation of Work Life Balance the literature uses different scales. In addition to this, Kirchmeyer (2000) stated that the definition of work life balance varies in many research.

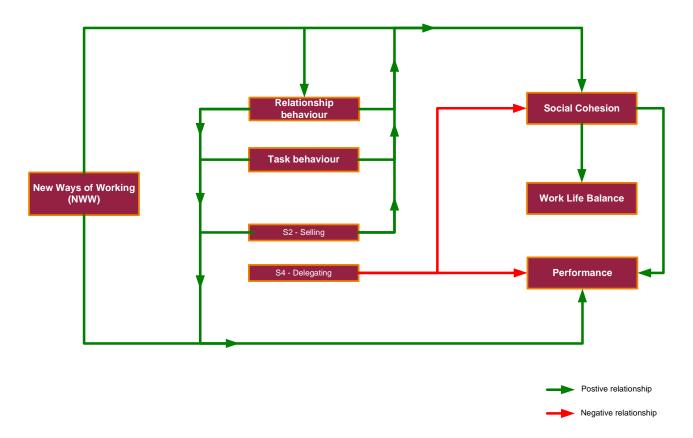
#### Leadership

All three hypotheses of leadership being a moderator were rejected. What is interesting is that both NWW and leadership style separately do influence social cohesion and performance. The fact that leadership style is not a moderator may be due to the fact that the focus was only on situational theory leadership styles.

## 5.1.3. Model of significant findings

In this research a model was developed based on the theoretical framework. Since some hypotheses are rejected and some new insights are obtained a new model of significant findings was developed.

Figure 6 Model of significant findings



The model describes all significant relations found by data analyses. The model illustrates which variables are related to each other. For example, work life balance is only influenced by social cohesion and task and relation behaviour influences both performance and social cohesion.

## 5.2. Limitations

The number of respondents is relatively small, which could be a reason that splitting up the maturity of NWW in phases was not possible. According to standardized formulas (Krejcie & Morgan, 1970) the minimal sample size for this research should be 361 respondents (appendix D). Another plausible explanation for the fact that NWW could not be divided into phases is that the used scales for the three phases were incorrect. There is also the possibility that NWW has no stage of full maturity, this assumption corresponds with the relative low total scores on all the items of NWW.

According to Dorenbos et al. (2008) about two third of all employees working in Dutch municipalities are higher educated. This is not in line with the 85% higher educated respondents identified in this research. This means that more high educated employees completed the survey than expected. This finding could imply that an unintentional selection effect on the respondents occurred. Although there were no significant differences from educational level on the effects of NWW, the high percentage of higher educated employees may have affected the level of social cohesion and performance. This is because the greatest differences between educational levels were found on those two effects.

Another limitation is that the research only focused on municipalities in the Netherlands, which makes it impossible for this research to conclude in generalizations for other organizations or countries.

Although there was an extensive motivation by comparing literature, this research is focused on situational theory, which means that only one leadership theory is examined. Situational theory only defines four leadership style based on task behaviour and relationship behaviour, there could be another type of behaviour or variable influencing the leadership style that is not dealt with in situation theory. On top of that situational theory assumes leaders to adapt their style to the readiness level of the employee, which is probably not the case at the five municipalities. According to the data of the survey 95% of the employees found them selves in readiness level four, however only 33% of the leaders represent leadership style four.

Research, with the use of a survey, has its own limitations. There is no way of telling that everything was answered truthfully. In an online survey you never know who is answering the question. According to Stanton (1998) the mental state (attention and focus) of a respondent is also unknown.

# 6. CONCLUSION AND IMPLICATIONS

In this chapter some practical implications are given and suggestions for further research are discussed. The chapter ends with a conclusion where main and sub question of this research are answered.

# **6.1. Practical implications**

Writing practical implications based on quantitative research is always difficult, because you work with numbers, not opinions. However, because of some unexpected results, possible explanations were discussed and these explanations contribute practical implications.

For those that are still wondering if NWW contributes to a firms' performance, the answer is yes. This statement does not mean that organizations should directly implement NWW. As stated before NWW is an umbrella term. For this the research Baane et al. (2010) was used as a founder for the components of NWW. Those components have proven to contribute to the performance of NWW. So conditions as bricks, bytes and behaviour mentioned in this research are the ones that should be content or implemented for increasing the performance.

What seems to be a totally false assumption of this research was the suggestion that the social cohesion decreases when implementing NWW. Significant results tell the opposite. Adding to that social cohesion also positively influences the performance and the work life balance, which means that social cohesion is a very important issue to take into account. A possible explanation for the increase in social cohesion is the possibility that people are aware of the disadvantages NWW can bring. They will focus on maintaining contact with the office. Therefore good communication is necessary. A firm can contribute to that by making the communication media as accessible as possible. Another aspect is the ease of use because not every employee knows how to use all those new technologies. A suggestion is helping and training people in different communication media. Because the assumption that the frequency of telework negatively influences social cohesion was rejected, I do not think it is necessary to formally limit the frequency of teleworking in an organization. I do think it is important to require certain formal meetings at the office, and adding to those meetings, informal meetings like trips and getaways can also contribute to the social cohesion in a team.

All three hypotheses of leadership as a moderator were rejected. Despite those rejections, leadership has its influence on social cohesion and performance. As stated before, both task and relationship behaviour have a positive influence on social cohesion and performance. Relationship behaviour is more strongly related than task behaviour. When translating that to situational theory it can be stated that the telling (S2) or participating (S3) styles will make most contribution to positively affecting the effects of NWW. In fact, the leadership style delegating (S4) is negatively related to both social cohesion and performance. This means that the delegating style decreases performance and social cohesion in a NWW context.

About 95% of the employees have readiness level four, which means that they are willing and able to do their job. Therefore a suggestion for leadership in the context of NWW is the leadership style participating (S3). While maintaining this style the focus should be on the relationship behaviour but also pay a little attention to task behaviour. A point to take into consideration is the definition of task behaviour, this

does not necessarily mean that an employee receives a list of tasks to be handled every day, but can also mean that there are certain routines a leader likes to pay attention to. The findings of this research do not mean that there is only one fitting leadership style in the context of NWW; the style depends on the readiness of an employee. By adjusting the leadership style based on assessment of the readiness level situational theory will be maintained.

Besides training people in communication media, Social Network Sites (SNS) can contribute to collaboration and coherence in a team. SNS can also contribute to relationship behaviour of a leader. According to Kaplan and Haenlein (2010) social media is the top agenda for many business executives (p.59). By sharing a mix of professional and personal information a leader becomes more accessible for his/her followers (Hagel et al, 2009). Besides the previous mentioned advantage, Qualman (2009) stated that top-down communication makes less of an impression than peer-mediated influence. One of the functions of SNS, writing blogs, can also contribute to bottom-up communication.

### 6.2. Suggestions for further research

In the future it would be interesting to use a longitudinal research design in order to follow the process of the implementation phase. A possibility is to have observation moments in the orientation phase, implementation phase and, after about three years, the maturity phase.

In this research, job and psychological maturity were assessed to define the readiness level of an employee. However social maturity could also influence the required leadership style. For further research it would be interesting to asses the social maturity of an employee and analyse if this is related to leadership style and also to job and psychological maturity of an employee.

Existing literature and this research has proven that there is a positive relationship between social cohesion and performance, but for further research I would be interested in working to determine how much cohesion is needed for a team to perform well. Another aspect is the measurement of performance. Because this research uses a subjective measure based on perception of an employee it would be interesting to measure performance objectively, for instance financial outcomes. Also, Work Life Balance could be differently defined to make the variable as specific as possible.

Finally, future research could use different leadership theories for finding a moderating role and examine the effects. For example, one can use charismatic leadership because it also fits into the context of NWW and it is partly comparable with the relationship behaviour of situational theory. Followers of charismatic leaders have a strong relationship with the leader and identify themselves with the goals and vision of their leader (Bass, 1985)

# 6.3. Conclusion

In this sub chapter the main question, sub questions and aim of this research are discussed and explained

The main question of this research is:

'Do relationships exist between New Ways of Working and: social cohesion, work life balance, and performance at municipalities and does leadership influence these relations?'.

There is a relation between NWW and social cohesion and performance. There is no relation between NWW and work life balance, and leadership does not have a moderator function.

The sub questions of this research are:

- What are the drivers of NWW?

The rapid changing environment and a new generation entering the workforce are two important drivers. Besides those drivers, the practical problems of traffic jam and high cost for absenteeism contributed to the idea of working with NWW.

- What are the components of NWW?

For this research the definition of Baane et al. (2010) was used. This means that NWW can be divided into bricks (like workspaces), bytes (like laptops), and behaviour (like self-directed employees).

- What are the effects of NWW? NWW has a positive influence on social cohesion and performance and on relationship behaviour of a leader.
- What influence will NWW have on social cohesion? New ways of working can have influence of different issues. For this research the focus is on social cohesion, work life balance, and performance.
- What influence will NWW have on work life balance?

New Ways of Working has no significant influence on work life balance.

- What influence will NWW have on performance? New Ways of Working has a positive influence on performance. This means that when the maturity of NWW increases the level of performance also increases.
- What kind of leadership theories exist? Leadership theory can be divided into trait studies, behavioural studies, contingency studies, and contemporary studies.
- What is the importance of leadership?

Leadership can be described as a critical success factor for organizational change. For NWW leadership has to change from managing on attendance to managing on performance. A leader should become a coach and a facilitator.

- What is the most applicable theory for NWW?

The situational theory of Hersey and Blanchard was used in this research. The main components, task and relationship behaviour, could be used in the context of NWW. Another component of this theory is the readiness level of an employee which was assessed by psychological and job maturity.

Which styles represent this theory?

Situational theory consists of four different leadership styles: telling (S1), selling (S2), participating (S3), and delegating (S4). Readiness could also be defined into four categories: unable and unwilling (R1), unable and willing (R2), able and unwilling (R3), and able and willing (R4).

One goal of this research was to test theory and create some new insights into NWW. Theory was tested, a lot of hypotheses were rejected, and some were accepted. However some new insights about NWW were found. This means that with keeping in mind the limitations of this research this thesis contributes to the theory of NWW.

Because of the extensive description of the variables, the validated scales, and the attached survey this research is easy reproducible for other municipalities. This means that with the use of this research all municipalities in the Netherlands that have implemented NWW can asses there maturity of NWW, NWW effects and leadership.

Not only for Twynstra Gudde, but also for the participating municipalities this research, especially the practical implications can be a guide for dealing with NWW. The findings can serve as an eye-opener for those companies who are in the process of implementing NWW.

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# **APPENDIXES**

#### **Appendix A - Survey**

#### Welkom

Vanuit mijn opleiding Bedrijfskunde aan de Universiteit van Twente ben ik onder begeleiding van Twynstra Gudde bezig met een onderzoek naar de gevolgen van Het Nieuwe Werken op de sociale cohesie en leiderschap binnen gemeenten. Om data te verzamelen maak ik gebruik van een vragenlijst die binnen verschillende gemeenten in Nederland is uitgezet.

De vragenlijst bestaat uit vragen betreffende Het Nieuwe Werken, Leidinggeven, Sociale Cohesie, Werk privé balans en Performance Naar verwachting neemt deze vragenlijst maximaal 10 minuten van uw tijd in beslag. De resultaten zullen worden gepresenteerd op basis van anonimiteit.

Ik bedank u voor de medewerking.

Met vriendelijke groet, Linsey Pierik

In deze vragenlijst zal gebruik worden gemaakt van het begrip Het Nieuwe Werken, het is mogelijk dat deze principes binnen uw organisatie onder een andere naam zijn geïmplementeerd (anders werken, flexibel werken).

#### <u>Algemeen</u>

#### 1.) Bij welke gemeente bent u werkzaam?

- 2.) Wat is uw geslacht?
- () Man

() Vrouw

# 3.) Wat is uw leeftijd?

- () Jonger dan 20 jaar
- () Tussen de 20 en 30 jaar
- () Tussen de 30 en 40 jaar
- () Tussen de 40 en 50 jaar
- () Tussen de 50 en 60 jaar
- () 60 jaar of ouder

# 4.) Wat is uw hoogst genoten opleiding?

- () VMBO (MAVO)
- () HAVO/VWO
- () MBO (Middelbaar Beroepsonderwijs)
- () HBO (Hoger Beroepsonderwijs)
- () WO (Wetenschappelijk Onderwijs)

# 5.) Hoeveel uur werkt u per week?

- () Minder dan 12 uur
- () Tussen de 12 en 20 uur per week
- () Tussen de 20 en 35 uur per week
- () 36 uur of meer

# 6.) Hoeveel jaren bent u werkzaam binnen deze gemeente?

### 7.) Op welke afdeling bent u werkzaam?

# 8.) Wat is uw functie(naam)?

# Het Nieuwe Werken

#### 9.) In onze organisatie...

	Geheel		Eens	1	
	mee	Mee	noch	Mee	Geheel
	oneens	oneens	oneens	eens	mee eens
zijn er voldoende ICT faciliteiten om	()	()	()	()	()
thuiswerken mogelijk te maken					
heeft iedereen een vaste werkplek	()	()	()	()	()
is het kantoor een ontmoetingsplaats	()	()	()	()	()
deelt vrijwel iedereen zijn/haar	()	()	()	()	()
werkplek met anderen					
zijn alle gegevens digitaal beschikbaar	()	()	()	()	()
is de cultuur gericht op samenwerking	()	()	()	()	()
face-to-face					
worden de werkplekken leeg en	()	()	()	()	()
opgeruimd achtergelaten na een dag					
werken					
zijn er voldoende ICT faciliteiten om	()	()	()	()	()
werken buiten kantoor (niet thuis)					
mogelijk te maken					
word ik geacht om tijdens blokuren op	()	()	()	()	()
kantoor te zijn					
zijn de leidinggevenden voldoende	()	()	()	()	()
effectief in het managen van Het					
Nieuwe Werken			()		
kan ik probleemloos vergaderen op	()	()	()	()	()
afstand			()		
is de cultuur gericht op samenwerking	()	()	()	()	()
op afstand					
bepaal ik zelf mijn werktijden		()	()		()
zijn de HR / P&O regelingen goed	()	()	()	()	()
afgestemd op Het Nieuwe Werken					

Onder principes van Het Nieuwe Werken wordt o.a. verstaan: (1) Flexibele werktijden, (2) Flexibele werkplekken, (3) Mogelijkheid om buiten kantoor (waaronder thuis) te werken, (4) Flexibilisering van de arbeidsvoorwaarden / P&O regelingen

# 10.) Hoe lang zijn principes (van HNW) gemiddeld genomen ingevoerd binnen uw organisatie?

() Korter dan 1 jaar

() Tussen 1 en 3 jaar

() Langer dan 3 jaar

# 11.) In onze organisatie is het mogelijk om thuis en/of buiten het kantoor te werken.

() Nee

- () Maximaal 1 dag per week
- () Maximaal 2 dagen per week
- () Maximaal 3 dagen per week
- () Onbeperkt

# 12.) Hoeveel werkt u zelf gemiddeld thuis of buiten het kantoor?

() Niet

- () Maximaal 1 dag per week
- () Maximaal 2 dagen per week
- () Maximaal 3 dagen per week
- () Meer dan 3 dagen per week

### Doelstellingen en mogelijke blokkades

#### 13.) Wat zijn de doelstellingen van de invoering van Het Nieuwe Werken

	Geheel mee oneens	Mee oneens	Eens noch oneens	Mee eens	Geheel mee eens
Kostenbesparing	()	()	()	()	()
Reistijdbesparing	()	()	()	()	()
Hogere productiviteit	()	()	()	()	()
Betere afstemming tussen werk en privé	()	()	()	()	()
Betere dienstverlening aan de klanten/burgers	()	()	()	()	()
Milieubesparing (CO2 reductie) door minder woon-werkverkeer	()	()	()	()	()
Beter geconcentreerd werken	()	()	()	()	()
Minder kantoorruimte nodig (minder m2)	()	()	()	()	()
Aantrekkelijker werkgever zijn	()	()	()	()	()
Verbeterde afstemming werktaak en werkplek	()	()	()	()	()
Verbeterde communicatie	()	()	()	()	()

	Geheel mee oneens	Mee oneens	Eens noch oneens	Mee eens	Geheel mee eens
De top van onze organisatie staat er niet 100% achter	()	()	()	()	()
De leidinggevenden ondersteunen het niet	()	()	()	()	()
De medewerkers hebben te weinig discipline	()	()	()	()	()
Ons kantoor is er niet op ingericht	()	()	()	()	()
Onze bedrijfsprocessen lenen zich er niet voor	()	()	()	()	()
Taakverdeling is er niet geschikt voor	()	()	()	()	()
Onze cultuur is niet gericht op Het Nieuwe Werken	()	()	()	()	()
De HR / P&O ondersteuning is niet voldoende	()	()	()	()	()
De werktijden zijn niet flexibel genoeg	()	()	()	()	()
Het is lastig overleggen met alle telewerkers	()	()	()	()	()
Er zijn geen duidelijke afspraken / gedragsregels	()	()	()	()	()
Thuiswerkers zijn te weinig bereikbaar	()	()	()	()	()

# 14.) Wat zijn (mogelijke) blokkades bij Het Nieuwe Werken

# <u>Leidinggeven</u>

# 15.) Vragen over uw leidinggevende

	Altijd	Vaak	Af en toe	Zelden	Nooit
Mijn leidinggevende geeft mij volledige vrijheid bij het uitvoeren van mijn werk	()	()	()	()	()
Mijn leidinggevende is vriendelijk en toegankelijk	()	()	()	()	()
Mijn leidinggevende moedigt het gebruik van uniforme procedures aan	()	()	()	()	()
Mijn leidinggevende doet kleine dingen om lid van ons team te zijn aangenaam te maken	()	()	()	()	()
Mijn leidinggevende probeert zijn ideeën uit in ons team	()	()	()	()	()
Mijn leidinggevende neemt actie bij suggesties die door het team genoemd worden	()	()	()	()	()
Mijn leidinggevende maakt zijn houding duidelijk in ons team	()	()	()	()	()
Mijn leidinggevende behandelt alle	()	()	()	()	()

1				
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# Taakvolwassenheid en Sociale Cohesie

# 16.) Taakvolwassenheid

	Zeer mee oneens	Mee oneens	Eens noch oneens	Mee eens	Zeer mee eens
Ik heb de juiste kennis om mijn taken uit te voeren	()	()	()	()	()
lk heb vertrouwen dat ik mijn taken	()	()	()	()	()
kan uitvoeren Ik heb de juiste vaardigheden om	()	()	()	()	()
mijn taken uit te voeren Ik ben bereid om mijn taken uit te	()	()	()	()	()
voeren	()	()	()	()	

# 17.) De sociale cohesie binnen uw team

	Geheel mee oneens	Oneens	Mee eens	Geheel mee eens
Teamleden in mijn team hebben onderling een sterke band	()	()	()	()
Teamleden zijn trots om deel van ons team uit te maken	()	()	()	()
Wij zijn een hecht team	()	()	()	()
Er zijn veel persoonlijke conflicten in mijn team	()	()	()	()
Elk teamlid voelt zich verantwoordelijk voor het behoud en beschermen van ons team	()	()	()	()
Er bestaat een aantrekkingskracht tussen al mijn teamleden	()	()	()	()

# Werk Privé Balans & Performance

## 18.) Uw werk en privé balans.

	Nooit	Zelden	Af en toe	Vaak	Altijd
Mijn privé leven lijdt onder mijn werk	()	()	()	()	()
Mijn werk maakt mijn privé leven moeilijk	()	()	()	()	()
Ik negeer privé behoeften door mijn werk	()	()	()	()	()
lk zet mijn privé leven opzij voor mijn werk	()	()	()	()	()
Ik loop privé activiteiten mis door mijn werk	()	()	()	()	()
Ik heb moeite om werk en privé te scheiden	()	()	()	()	()
Ik ben blij met de hoeveelheid vrije tijd voor	()	()	()	()	()
privé activiteiten					

# 19.) Hoe beoordeelt u het functioneren van uw organisatie op de volgende punten?

	Heel goed	Goed	Matig	Slecht	Heel slecht
De kwaliteit van onze service	()	()	()	()	()
De ontwikkeling(en) van onze service	()	()	()	()	()
De mogelijkheid nieuwe medewerkers aan te trekken	()	()	()	()	()
De mogelijkheid medewerkers te behouden	()	()	()	()	()
De tevredenheid van de klant	()	()	()	()	()
De relatie tussen het management en medewerkers	()	()	()	()	()
De relaties tussen de medewerkers	()	()	()	()	()

# Bedankt!

Hartelijk bedankt voor het invullen van de vragenlijst. Uw antwoorden zijn erg belangrijk voor dit onderzoek. Mocht u nog vragen of opmerkingen hebben kunt u contact met mij opnemen. Linsey Pierik xli@tg.nl

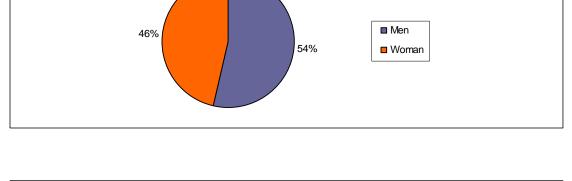
# Appendix B – Lay out online survey

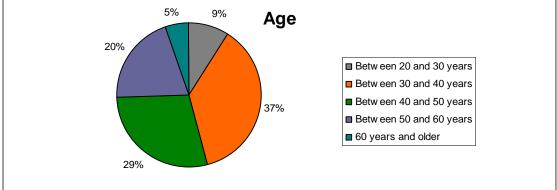
In this appendix two examples from the lay out of the online survey are given.

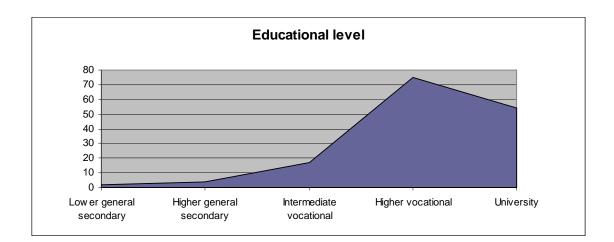
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	Het Nieuwe Werken bij Gemeenten	gemeen		
	1. Bij welke gemeente bent u werkzaam?	_		
	2. Wat is uw geslacht?			
	O Man			
	O Vrouw			
	3. Wat is uw leeftijd?			
	O Jonger dan 20 jaar			
	O Tussen de 20 en 30 jaar			
	○ Tussen de 30 en 40 jaar			
	○ Tussen de 40 en 50 jaar			
	○ Tussen de 50 en 60 jaar			
	O 60 jaar of ouder			

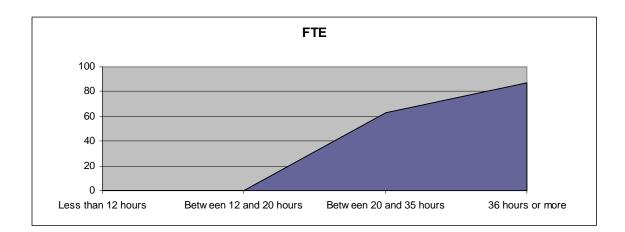
Image: Problem in the second secon
Teamleden zijn trots om deel van ons team uit te maken       O       O       O         Wij zijn een hecht team       O       O       O         Er zijn veel persoonlijke conflicten in mijn team       O       O       O
Wij zijn een hecht team     O     O     O       Er zijn veel persoonlijke conflicten in mijn team     O     O     O
Er zijn veel persoonlijke conflicten in mijn team OOOOO
Elk teamlid voelt zich verantwoordelijk voor het behoud en beschermen OOOOO
Er bestaat een aantrekkingskracht tussen al mijn teamleden OOOOO
Er bestaat een aantrekkingskracht tussen al mijn teamleden 000000

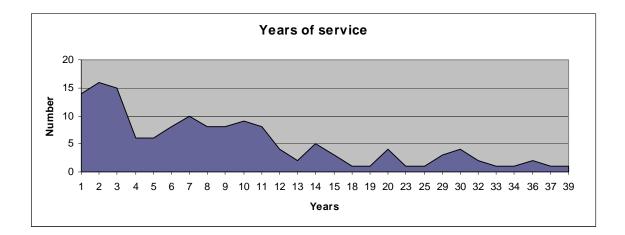
# Appendix C – Graphical description of the sample Gender











# Appendix D – Sample size

For calculation of the minimum sample size two standardized formulas were used.

 $n = P\% x Q\% x [z : E\%]^2$ 

- n Minimum sample size
- P% Percentage specific category
- Q% Percentage non-specific category
- z z-value for validity level
- E% Margin for error

To calculate maximum sample size a value of 50% is used for both P and Q. The level of validity will be 95%, and there fore Z value of 1.96. For the margin of error 5% (a standard) is used.

#### N = 50% x 50% x [1.96:5%]2 = 384.16

Because the total population is under 10,000 people, a correction on previous calculated sample size is needed. In order to calculate the corrected sample size the following formula was used:

N' = n : (1 + (n : N))

- N' Corrected minimum sample size
- n Uncorrected minimum sample size
- N Total population size

#### N' = 384.16 : (1 + (384.16:6000) = 361.04

This calculation means that a minimum sample size of 361 respondents is needed.