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**WORK RELATED SOCIAL MEDIA –
PARTICULARLY BENEFICIAL FOR
EMPLOYEES WITH LOW JOB RESOURCES**

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ABSTRACT

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The use of social media, both in people's personal lives and work lives, is rapidly expanding. This brings up new kinds of questions related to well-being at work and social media. One of the major concepts about well-being at work is work engagement. The positive and fulfilling mindset of work engagement is positively affected by job resources. Work related social media could be one of these job resources as it, for example, eases up the communication processes at work. In this master thesis, the relationship between work related social media use and work engagement is investigated. Also the moderative effect of job resources and age in this equation is examined. The participant pool included Finnish workers ($N=1817$) between the ages of 18 and 65 ($M=41.8$, $SD=12.2$) years with 53.2% being males ($n=966$). In addition to basic statistical analyses, regression and moderation analyses were run. The dependent variable investigated was work engagement and independent variable was a frequency of work related social media use. Results suggested that there is a positive relationship between work related social media use and work engagement. Also, it seems like less job resources one has the stronger the relationship is.

Keywords: *work engagement, job resources, work related social media, generational differences, quantitative research, regression analysis, moderation analysis*

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1 Introduction

In today's society, it is difficult to find an individual without even a one social media account. This is where technology has taken us, and what often arises opinions both for and against the current development. While many people argue that social media are detrimental for our social interactions others, however, counter argue that social media are what makes our interactions easier and better nowadays. The question here is if one argument is more valid than the other, or if neither of them is? The same kind of "whether-or-not" problem has been brought up in work environment and the question of whether social media have negative or positive effects on employees is currently more relative than ever.

Especially during the past couple of years and the global Covid-19 pandemic, the work life has changed dramatically. The jump from traditionally organized work to different types of remote work and hybrid models was quick and longer than we thought. Now it starts to look like those pandemic time changes are here to stay. This makes the research about well-being at work even more important as the employees are changing their ways of work and becoming more self-managing. In all this, technology and social media play huge roles. Without the communication tools they provide the remote work would not be even possible. However, all the effects in this, positives and negatives, are yet to discovered.

This master thesis aims to find answers for questions about work related social media and well-being at work by investigating the use of work related social media and their relationship with work engagement. While overall well-being of employees has become a popular topic within the field of organizational development, it seems more than relevant to take a look at the effects the new technology and, especially, social media have on employees. At first it is important to define the main concepts of the study: work engagement, job resources, and work related social media.

Work engagement is defined as a positive and fulfilling mindset about one's work (Bakker, Hakanen, Demerouti, & Xanthopoulou, 2007; Bakker & Leiter, 2010; Schaufeli & Bakker, 2004). It

is often characterized by high energy levels, high commitment levels, and high interest to one's own work and thus is generally broken down into three dimensions (vigor, dedication, and absorption). Previous research has suggested that high work engagement have positive effects on employees' job performance, job satisfaction, and overall well-being (Bakker & Leiter, 2010; Bakker et al., 2007). Work engagement seems to be especially important for employees' psychological well-being including better levels of mental resources, and internal work motivation (Kanste, 2011; Tisu, Lupsa, Virga and Rusu, 2020).

Job resources and job demands are suggested to be some factors affecting employees' work engagement in a way that job resources are positively associated with work engagement whereas job demands are negatively related to work engagement (Bakker et al., 2007). Particularly job resources are suggested to be one of the main antecedent of work engagement (Mauno, Kinnunen, Ruokolainen, 2007; Bakker & Leiter, 2010). Related to this, job demands-resources model (JD-R model) was introduced in a relation to employee burnout (Demerouti, Bakker, Nachreiner, & Schaufeli, 2001). The model suggests that an overwhelming amount of job demands or the lack of job resources makes it hard to meet the demands of the job, and an employee is likely to experience a burnout. Job demands are defined as physical, social, or organizational characteristics of the job that require continuous physical or mental work from an employee, and are connected to physical and mental strains. Job resources then are physical, psychosocial, social, or organizational characteristics of the job that can help an employee to meet work objectives, diminish job demands, or seek individual growth and development (Demerouti et al., 2001). Based on these definitions of job demands and resources, work related social media could fit into either of them.

Social media are defined as a group of applications, working via internet, that enable their users to produce and exchange a user generated content (UGC) (Kaplan & Haenlein, 2010). This UGC is what separates social media from other forms of internet-based media, such as online newspapers, as it is publicly available to whomever and not only related to professional use. For

example, while online newspapers are not considered as UGC, the comments about the articles on the newspapers' websites can be considered as UGC since anyone can create the content there. Yet, the definition of social media is quite broad.

While a use of social media is more often associated as a leisure time activity, lots of work places have noted that social media can be an asset for them as well. Just like for social media in general, also the definition of work related social media is somewhat vague and depending on the perspective used. In existing literature, terms like enterprise social media and enterprise social networking sites (ESNS) have been used to describe some forms of work related social media (Leonardi, Huysman, & Steinfield, 2013; Ellison, Gibbs, & Weber, 2015). For this master thesis, work related social media use is defined as a use of any social media platform as long as the communication in there is linked to a work community or colleagues and thus is somehow work related (Oksa, Kaakinen, Savela, Ellonen, & Oksanen, 2020).

As for most things, there are both negative and positive points of view to social media use at work as well. While work related social media use can create a stress and overwhelming feeling of connectivity (Bucher, Fieseler, & Suphan, 2013; Van Zoonen, Verhoeven, & Vliegenthart, 2017; Oksanen et al., 2021), it can also help people to connect, socialize, and find information (Van Zoonen et al., 2017; Oksa et al., 2020; Schmidt, Lelchook, & Martin, 2016). Studies done in a work environment have suggested that work related social media use can boost effective communication between employees and add social connectivity (Schmidt et al., 2016). Work related social media have found to even have a direct positive association with work engagement (Oksa et al., 2020) supporting the notion that it could be seen as a one job resource among the others.

In addition to technological developments having an impact on work places, the wide range of different generations attending to work life brings its own challenges to organizations. The term generation refers to group of people who all have lived through the same sociocultural experiences (e.g. economic depression or technological revolution) (Sessa, Kabacoff, Deal, & Brown, 2007). The

current workforce includes three to four generations of workers from Baby Boomers to Generation Y (Becton, Walker, & Jones-Farmer, 2014), or sometimes even to Generation Z. Generation Y, or Millennials, are considered as the first generation growing up with rapid technological advancements, such as development of social media (Wey Smola & Sutton, 2002; Wong, Gardiner, Lang, & Coulon, 2008).

As different generations have grown up with very different types of technology, the implementation of, for example, social media for work purposes can be experienced in very diverse ways by the individuals of different generations. For instance, the Millennial generation uses social media in work related issues more than their older coworkers (Holland, Cooper, Hecker, 2016; Oksa, Saari, Kaakinen, & Oksanen, 2021a) and thus might experience it more natural and fluent than former generations. This new way of online communications can be stressful for employees of older generations (Reinecke et al., 2017). However, because of the more frequent overall use of social media, Millennials experience more negative effects from it (e.g. technostress), than individuals in former generations, resulting distress and even burnout (Oksa et al., 2021a). Thus, the relationship between work related social media use and work engagement among different generations becomes an interesting question which should be considered in today's organizations.

Since the beginning of the Covid-19 pandemic, work related technology and social media use are more relevant to our lives than ever. The importance of studies done about the topic is enormous. The aim of my thesis is to investigate the possible relationship between work related social media use and work engagement. In addition, based on the JD-R model (Demerouti et al., 2001), the impact of job resources in this relationship is examined. Finally, the differences between the diverse working generations are studied to see whether an employee's age or generation has some impact on how he or she feels about the work related social media and their effect on work engagement.

First, in the chapter two I will take a look at the different theoretical backgrounds and definitional aspects of the first main concept considered in this master thesis: work engagement. The

concept is defined and differentiated from other similar kinds of concepts. Later in the chapter I will discuss about the outcomes of work engagement based on the previous literature. In the chapter three, I will introduce the JD-R model and review the relative literature and its theoretical background. Lastly, I will make connections between the model and work engagement. In the fourth chapter, I will talk about the last one of the main concepts in the study: work related social media. First, I will define the overall concept of social media continuing to the definition of work related social media. Then, I will introduce the possible connection of work related social media with JD-R model since it is likely that social media are experienced as either a job resource or a job demand. Finally, I will introduce the idea and the literature of generational differences in technology and social media use.

In the chapter five, I will shortly lay out the research questions and hypotheses as well as support for them. In the chapter six, I will discuss the sample of the study and the methods used for the data analyses. I will talk about data collection and give a brief insight about the theoretical aspects of research variables and afterwards provide the information about the variables used in this study. I also will review some theoretical aspects of the methods of analyses used in the study. In the chapter seven, I will reveal and explain the results of the study. Lastly in the chapter eight, I will discuss about the study, its results and implications as well as connections to previous research. I will take a closer look at how the results are aligned with previous research about the topic but also how they differ in some points. In addition, I will discuss about some limitations of the study and provide some ideas for the future research.

2 Work Engagement

2.1 Defining Work Engagement

Work engagement is most commonly defined as a positive and fulfilling work-related state of mind that contributes to the motivation and well-being of an employee (Schaufeli & Bakker, 2004; Bakker, Schaufeli, Leiter, & Taris, 2008; Bakker & Leiter, 2010). This state of mind is characterized by three behavioral components: vigor or high energy levels, dedication or enthusiasm and proudness of one's work, and absorption or full concentration of one's work and feeling that time flies (Schaufeli & Bakker, 2004). There are two different theoretical schools when it comes to defining and measuring work engagement. One sees the concept being on the other end of the continuum with employee burnout whereas the other sees those two concepts as separate individual concepts that are contrary to each other (Schaufeli & Bakker, 2004; Bakker et al., 2008; Bakker & Leiter, 2010). In this master thesis, I am considering work engagement as an individual concept that is separate from employee burnout.

Even though the interest towards research about work engagement has increased, the agreeable meaning and definition of the concept still remains somewhat unclear (Schaufeli & Bakker, 2010). Therefore, it is important to distinguish work engagement from other similar concepts. Schaufeli and Bakker (2010) list eight concepts that are close to work engagement, some even overlapping with it, yet are independent from it. On the following, I will briefly discuss each of them.

The first (1) concept under a discussion is *extra-role behavior* (Schaufeli & Bakker, 2010). While work engagement can include behaviors considered as "extra" there is a difference between the two concepts. Mainly, extra-role behavior refers doing something more whereas behaviors associated with work engagement refer doing something different. The second (2) concept is *personal initiative* which refers to work related behavior that employees engage with when they are self-starting and proactive (Frese & Fay, 2001). While personal initiative is overlapping with the concept of work engagement, the two are still independent as personal initiative refers more to one of the

behavioral components (vigor) of work engagement than the whole concept itself. The third (3) concept in to discuss is *job involvement* which is very closely related to work engagement, yet not equivalent to it (Schaufeli & Bakker, 2010). Schaufeli and Bakker (2010) write, “Lodahl and Kejner (1965) define job involvement as: ‘the degree to which a person is identified psychologically with his work, or the importance of work in his total self-image’ (p.24)” (Schaufeli & Bakker, 2010, 14). The fourth (4) concept, *organizational commitment*, refers to employee’s attachment and identification with an organization and is the connector between an employee and the organization (Schaufeli & Bakker, 2010). This concept describes more the relationship between an employee and the organization whereas work engagement refers to employee’s relationship with his or her work (Schaufeli & Bakker, 2010).

The fifth (5) concept, *job satisfaction*, is defined as an enjoyable and positive state that results from one’s work (Schaufeli & Bakker, 2010). Job satisfaction differs from work engagement mainly in that it refers to the feeling *toward or about* one’s work whereas work engagement considers more of the mood of the employee *at* work. The sixth (6) concept under discussion is *positive affectivity*. This concept can be considered to correspond with work engagement and its different domains as positive affectivity is a trait that one might have and can make one more prone to be engaged in work. The seventh (7) concept is *flow* which is defined as an optimal state including focused attention, clear mind, complete concentration, control, loss of self-consciousness, loss of sense of time, and intrinsic enjoyment (Schaufeli & Bakker, 2010). Similar to personal initiative, the concept of flow is close to one of the components of work engagement (absorption), yet separate from the total concept. Flow is also more of a short term peak of the positive mindset whereas work engagement is considered as a longer term state of mind. Lastly, the eighth (8) concept to distinguish is *workaholism*. The concept of workaholism has been referred to addiction to do work, which includes compulsive working without particular enjoyment of what one does (Aziz & Moyer, 2018; Snir, Harpaz, & Burke, 2006).

This compulsivity and lack of enjoyment of one's work is what differentiates workaholism from work engagement (Schaufeli & Bakker, 2010).

Most importantly, work engagement is a motivational concept (Bakker & Leiter, 2010). Especially the feeling of fulfillment is highly related to intrinsic motivation of an individual (Bakker, 2011). It is not always that individual feels things like psychological fulfillment, flow, and dedication toward different tasks and when that happens we are often talking about highly motivated individuals. Thus, we can argue that work engagement is a motivational state of mind. This comes especially important later in the thesis when the antecedents of work engagement are discussed.

In addition to the motivational concept, work engagement is a positive concept highly related to mental health and overall well-being of employees. Often when talking about mental health, the focus is on the negative sides of it, in other words, on illnesses. The concept of work engagement, however, attempts to define issues through positive psychology by highlighting the importance of positive experiences and motivation in mental health of employees (Bakker et al., 2008).

2.2 Measuring work engagement

As there are different schools about the definition of work engagement, there are also different ways to assess the concept. However, in this master thesis I will focus on the measurement used in the data collection for the current research: The Utrecht Work Engagement Scale (UWES) (Schaufeli & Bakker, 2004). Schaufeli and Bakker (2004) argued that burnout and work engagement should be measured with separate assessments for two reasons. First, the two concepts are not perfectly negatively correlated so it is not certain that a person experiencing high levels of burnout would be experiencing low levels of work engagement, or vice versa. Second, they argued that if the concepts were measured with the same assessment, their relationship could not be empirically studied. For these reasons they came up with the UWES which purpose is to assess the positive motivational and fulfilling state of mind; work engagement.

The UWES is translated into 21 languages and is a commonly used work engagement measurement across different cultures, races, and occupational groups (Schaufeli & Bakker, 2010). It is a three-dimensional questionnaire including the three components of work engagement: vigor, dedication, and absorption (Schaufeli & Bakker, 2004). *Vigor* is measured by six items, for example “at my work, I feel bursting with energy” (Schaufeli & Bakker, 2004, 5), that all refer to high energy and resilience levels as well as willingness to put in effort at work and being persistent when facing obstacles. *Dedication* is assessed by five items, for example “my job inspires me” (Schaufeli & Bakker, 2004, 5), that all refer to sense making, enthusiasm at work, feeling proudness of one’s work, and being motivated and challenged by one’s work. Lastly, *absorption* is measured by six items, for example “time flies when I’m working” (Schaufeli & Bakker, 2004, 5), that all refer being fully focused and embedded to one’s job, having feeling that time flies, and enjoying the work so that it is hard for one to detach from it. Hence, the UWES includes total of 17-items that are measured on 7-point Likert scale from 0 “never” to 7 “always” (Schaufeli & Bakker, 2010).

In addition to the 17-item assessment, shorter versions of the UWES has been developed: the 9-item UWES (Schaufeli, Bakker, & Salanova, 2006) and even an ultra-shortened 3-item scale has been used in some studies (Schaufeli, Shimazu, Hakanen, Salanova, & De Witte, 2019). The ultra-shortened 3-item scale includes just a one item for each of the three dimensions of work engagement. This 3-item scale obtained satisfying results with reliability and validity. The benefits of 3-item scale are certainly its shortness and easiness for test takers. However, the 9-item scale can provide researchers more data, especially if the three dimensions are looked at separately (Schaufeli et al., 2019).

The 9-item scale is the recommended and mostly used measure of work engagement (Seppälä et al., 2009) and is also used in the current research so it is necessary to take a closer look at it. The study by Schaufeli et al. (2006) resulted a construction of shortened 9-item scale of the UWES which contains three items for each of three dimensions. The study included data from ten different countries

to provide information of the consistency of the scale. The psychometric analyses revealed that all the three-item scales of the 9-item UWES correlated well with the original scales. Furthermore, internal consistencies of all the three scales were satisfying with very few expectations. The internal consistency for the total 9-item UWES, however, was very satisfying across all the countries (Cronbach's alpha varied between .85 to .92). This and other studies (e.g. Seppälä et al., 2009) displays support for the shortened 9-item UWES scale to be a valid measure of work engagement across variety of countries.

2.3 Outcomes of Work Engagement

The measurements for work engagement started to develop as the importance of work engagement in employee well-being was understood. Plenty of research has found that work engagement can positively impact on organizations through, for example, increased performance, organizational commitment, and employee well-being (Bakker & Leiter, 2010; Bakker et al., 2007). In addition, the engaged employees can transfer the engagement to others (Van Mierlo & Bakker, 2017) which encourages actions towards developing employees' levels of work engagement within the organization. Because of the positive outcomes of work engagement, the concept has raised popularity among organizational researchers and is clearly relevant for both organizations in a big picture but also for individual employees.

On an organizational level, one of the most important outcomes of work engagement is employees' performance. Bakker (2011) listed a few explanations why employees with higher work engagement perform better than employees with lower work engagement. First, engaged employees have more positive feelings such as appreciation, happiness, and enthusiasm. Second, engaged employees tend to have better health which allows them to only focus on work and concentrate all their resources and skills towards it. Third, employees experiencing higher work engagement can eventually create their own job and personal resources which then helps them to be even more

engaged (Bakker, 2011). Finally, engaged employees can transfer the engagement to others in their near environment which then leads to better collective performance in the organization (Van Mierlo & Bakker, 2017).

Especially the last reason is interesting in terms of work related social media, which often act as communication tools and ways to connect with coworkers (e.g. Schmidt et al., 2016). The study by Bakker and Xanthopoulou (2009) found support for a crossover model of daily work engagement. Crossover is defined as a dyadic process where one's experienced psychological well-being has an impact on other's level of psychological well-being in a particular life domain (Westman, 2001). The results of the study showed strong support for work engagement transferring from one employee (actor) to another (partner) (Bakker & Xanthopoulou, 2009). It seems that this crossover happens on days when the frequency of communications and interactions between the coworkers, through email, phone, or face-to-face, is higher than usually.

Also Van Mierlo and Bakker (2017) suggested that work engagement as an active and positive psychological state is likely to be transferred between individuals in a group. Particularly the most engaged employee seemed to have the biggest effect on the fluctuation of engagement within the group (Van Mierlo & Bakker, 2017). These findings are interesting in terms of my investigation of work related social media and work engagement as social media can enable a frequent communication between coworkers and group members making the transfer and crossover of work engagement more easy between the individuals.

Even though lots of research about the outcomes of work engagement has touched the organizational aspects, there are evidence that work engagement can positively affect employees on a personal level as well. For example, Kanste (2011) investigated the relationship between work engagement and a few employee well-being indicators among 441 Finnish health care professionals. The results of her study suggested that work engagement was positively correlated with personal accomplishment, psychological well-being, mental resources, and internal work motivation (Kanste,

2011). Personal accomplishment was defined as accomplishing things meaningful to oneself. Psychological well-being was described as a feeling of pleasure about accomplishing something. Mental resources were explained as enjoyment of daily tasks. Lastly, internal work motivation was described as a feeling of satisfaction when doing the job well. An interesting finding was that work engagement was especially strongly correlated with psychological well-being and mental resources which then indicates work engagement being particularly beneficial for mental health of employees (Kanste, 2011).

Furthermore, Tisu et al. (2020) studied the effects of personality factors on mental health and this relationship being mediated by work engagement. Their results supported the notion that especially proactive personality and psychological capital are positively associated with work engagement (Tisu et al., 2020). Work engagement then was predictive of employees' mental health so that more engaged the employees were, the better mental health they possessed. As a conclusion, employees who were proactive and positively tried to change their work environment were likely to have higher work engagement resulting in positive health effects (Tisu et al., 2020).

In addition to employee well-being, work engagement has found to translate into employees' family lives (Greenhaus & Powell, 2006). Greenhaus and Powell (2006) presented a theoretical model for work-family enrichment where they explained the connections between positive performance and affect at work, and positive performance and affect at home. One's personal resources in life domain A (e.g. work) helped the individual to succeed in that domain. Then the positive affect from the domain A transferred to the domain B (e.g. home) and that way impacted individual's life more comprehensively.

Also Eldor, Harpaz, and Westman (2020) found support for work engagement enhancing a positive spillover between work and family lives. Their study suggested that employees' feelings of their work impacted on feelings of their overall life (Eldor et al., 2020). It appeared that work engagement can positively influence particularly on life satisfaction and community involvement of

individuals (Eldor et al., 2020). Thus, work engagement is an important matter when considering the quality of employees' overall lives.

Based on the existing literature and research, it seems evident that work engagement can positively impact on both organizations as a whole but also individual employees (e.g. Bakker & Leiter, 2010; Kanste, 2011; Tisu et al., 2020; Greenhaus & Powell, 2006; Eldor et al., 2020). Therefore, the concept of work engagement is definitely worth of more attention and important matter of organizational research. Thus, the ways to increase overall work engagement should be an interest of organizations. Some antecedents or building blocks of work engagement are job resources that are introduced next.

3 Job Resources

Research have suggested that job resources have a positive effect on work engagement (Bakker et al., 2007; Bakker & Leiter, 2010; Bakker, 2011). Some examples of job resources are social support, skill variety, feedback, autonomy, and different types of learning opportunities (Bakker, 2011). The important thing in all these is their capability to fulfill human's psychological needs and enhance motivation, as work engagement is highly motivation related concept (Bakker & Leiter, 2010). Job resources that positively impact work engagement are motivating in different ways, either intrinsically or extrinsically (Bakker, 2011). While job resources help to motivate employees towards higher work engagement, they also help them to overcome the demands of the job. To better connect all of this together, the theoretical background of motivation as well as the job demands-resources (JD-R) model (Demerouti et al., 2001) are introduced.

3.1. Development of motivation theories

The roots of different motivation theories can be traced all the way back to Maslow's (1940) theory of human motivation. Before the pioneer of humanistic psychology launched his book, *Theory*

of Human Motivation, motivation theories mostly were based on physiological factors of human motivation. Maslow's theory as well includes those physiological aspects but also considers other factors such as affiliation and competence (Maslow, 1940). Maslow suggested that human behaviors are motivated by basic human needs, however, there are different levels of needs from which the lower level needs must be fulfilled before moving on to the higher level needs. The most basic level of human needs contains the physiological needs including maintaining homeostasis and satisfying hunger. The next level of needs is called safety needs. This refers to a human need for love and feeling of belongingness and safety. The third level of needs is referred to as esteem needs. The esteem needs include two categories: 1) desire for strength, accomplishment, adequacy, confidence, independence, and freedom, as well as 2) desire for reputation, recognition, attention, importance, and appreciation (Maslow, 1940). On the highest level is the need for self-actualization, referring to the human need for fulfillment of one's potential and becoming the best that one can be (Maslow, 1940). Later we can see how parts of Maslow's theory are connected to more recent theories of motivation and well-being.

In 1960s, Frederick Herzberg started to study the motivation and job satisfaction of workers in industries. Herzberg (1966) came up with a motivation-hygiene theory (also called two-factor theory), which suggests that a set of variables results in job satisfaction whereas another set of variables results in job dissatisfaction (Herzberg, 1966). According to Herzberg, the five motivators that determine job satisfaction among employees are achievement, recognition, work itself, responsibility, and advancement. Some of these variables, such as achievement and recognition, are clearly based on Maslow's (1940) theory of human motivation. The hygiene factors, or factors leading to dissatisfaction, of motivation-hygiene theory are such as company policy, supervision, pay, social relationships, and working conditions (Herzberg, 1966). The theory then suggests that increasing the motivator factors has a stronger and longer lasting impact on worker motivation than just reducing

the hygiene factors. Later in this chapter, we can see how these factors are clearly connectable to the more recent job demands-resources model (Demerouti et al., 2001).

While Herzberg's (1966) theory still had a strong focus on the environmental factors of motivation, Deci (1975) started to look more into an intrinsic motivation of individuals. Deci defined the intrinsic motivation as a motivation to engage in behaviors that do not result in extrinsic rewards but rather are rewarding as themselves. According to Deci, competence and self-determination are two of the intrinsic motivators that affect human behavior. He suggested that individuals seek the feeling of competence, or the feeling of being effectively able to deal with their surroundings, and that this motivation to feel competent guides their behaviors. In addition, it appears that the human tendency towards self-determination is a key to intrinsic motivation. Self-determination refers to an individual's willingness to achieve certain standards, predict the future, and define themselves (Deci, 1975).

Furthermore, an individual's needs for competence and self-determination motivate two kinds of behaviors (Deci, 1975). First, individuals might seek appropriate challenge, either by increasing the challenge level or decreasing it. Second, individuals might reduce uncertainty, or "conquer" the challenge, they are facing. Both kinds of behaviors are essentially motivated by the intrinsic motivation of an individual. Deci's notion of self-initiated proactive behaviors toward fulfillment of the two psychological needs is important in terms of further developments in the research of job resources and demands and how they affect employee well-being (i.e. work engagement).

Later on Deci's (1975) thoughts and ideas of self-determination continued to develop and as a result self-determination theory (SDT) was generated by Deci and Ryan (1985) (Cagné & Deci, 2005). The SDT attempts to explain peoples' motivations to engage in different behaviors and suggests that satisfaction of psychological needs results human development, integrity, and psychological health. The recent work about SDT includes six mini-theories that all contribute to the total SDT (Ryan & Deci, 2017). First, the cognitive evaluation theory (CET) considers different

factors, such as extrinsic events of reward or punishment or individual's interpersonal environment, affecting intrinsic motivation (Ryan & Deci, 2017, 123). Second, the organismic integration theory (OIT) considers the differences between autonomous and controlled motivation regulations (Ryan & Deci, 2017, 179). Often, a bit mistakenly, we make a cold cut distinction into intrinsic and extrinsic motivations when hearing words autonomous and controlled. However, according to the SDT the distinction is not as clear at all. The SDT suggests that there is a self-determination, or autonomy (Ryan & Deci, 2017, 191) continuum which includes both extrinsic and intrinsic motivation as well as amotivation (Cagné & Deci, 2005). Amotivation refers to lack of self-determination resulting an absence of motivation towards an action.

While amotivation lacks any self-determination of an individual, extrinsic motivation includes varying levels of self-determination (Cagné & Deci, 2005). According to the SDT and its mini-theory of OIT, external motivation involves four different possible motivational stages from controlled end to more autonomous end of the continuum: external regulation, introjected regulation, identified regulation, and integrated regulation (Cagné & Deci, 2005; Ryan & Deci, 2017, 184). The self-determination and autonomous motivation of an individual strengthen as a controlled motivation weakens when moving forward on the continuum. The most self-determinant stage of extrinsic motivation is the integrated regulation where an individual is already autonomously motivated as certain behaviors, resulted by a coherence of his or her values, attitudes, and regulations, feel instrumentally important and become central to individual's identity. After the stage of extrinsic motivation, the self-determination continuum only includes intrinsic motivation. The difference between the extrinsically motivated integrated regulation and intrinsic motivation is the individual's pure interest towards the behavior. While the both stages are autonomously motivated, an individual experiencing the integrated regulation feels the behavior to be important but an intrinsically motivated individual, however, is truly interested in the behavior or activity completed (Ryan & Deci, 2017).

While different extrinsic and intrinsic factors influence individual's motivation, there are also differences in motivational styles of each individual. This is what the third mini-theory of the SDT, causality orientations theory (COT), is all about (Ryan & Deci, 2017, 217). According to the COT there are three orientations, autonomy, controlled, and impersonal, and the strength of each varies between individuals. The dominant orientation then guides the focus of the individual and affects their situational motivations. The fourth mini-theory, the basic psychological needs theory (BPNT), focuses on subjective well-being of an individual. The BPNT in the SDT claims that competence, autonomy, and relatedness are basic psychological needs for all individuals and satisfying them promotes, for instance, personal development and mental health (Cagné & Deci, 2005; Ryan & Deci 2017, 242). The aim to satisfy these basic psychological needs motivates individuals for different behaviors and actions. This becomes important when considering work engagement and the effects job resources have on it.

Last two mini-theories of SDT are the goal contents theory (GCT) and the relationships motivation theory (RMT) (Ryan & Deci, 2017). The GCT concerns the two different types of life goals: extrinsic and intrinsic. Briefly, the theory claims that strong focus on extrinsic life goals is related to lower well-being than strong focus on intrinsic life goals (Ryan & Deci, 2017, 272). The RMT then focuses on qualities of individual's close relationships. As relatedness is one of the humans' basic psychological needs, it encourages people to engage in close relationships. When the relationship is successfully fulfilling the needs of individual, the results are positive, such as authenticity and emotional resilience (Ryan & Deci, 2017, 293). Here it can be concluded that overall the fulfillment of basic psychological needs for competence, autonomy, and relatedness is a key for motivation to engage in different behaviors.

All the motivation theories discussed above have affected and created a starting point for theories about motivation in organizational research today. Understanding the history and development of motivation is essential on a path to understanding motivational concept of work

engagement and its relationships with job resources and social media. Next, a widely used model, the job demands-resources model (Demerouti et al., 2001), for achieving work engagement and employee well-being is introduced and it can be seen how some of the previous motivation theories have impacted on this particular case.

3.2 The JD-R Model

Based on the existing motivation theories, Demerouti et al. (2001) started to create the job demands-resources (JD-R) model. Their study was primarily focused on human burnout but burnout was looked at from the perspective of their proposed model of job demands and job resources (JD-R model). *Job demands* were defined as physical, social, or organizational components of the job that require continuous physical or mental work and thus can relate to physical and mental strains. On the other hand, *job resources* were defined as physical, psychological, social, or organizational components of the job that can either help to meet work objectives, diminish job demands, or support individual growth and development (Demerouti et al., 2001). In the JD-R model, job demands and resources activate two types of psychological processes: a motivational process and a health impairing process (Albrecht, 2015).

Based on the JD-R model, employee burnout results either from an overwhelming amount of job demands or a lack of resources which makes it hard for an individual to meet the demands (Demerouti et al., 2001). More specifically, if one's job demands are higher than resources, results will be strain enhancing and will activate the health impairing process (Demerouti et al., 2001; Albrecht, 2015). However, if one's job resources are high, even when the demands are high, results will be motivation-enhancing and will activate the motivational process. This can be, for example, work engagement boosting.

While the JD-R model emphasizes the importance of an appropriate balance with job demands and resources (Demerouti et al., 2001), it is likely that just the job resources themselves can positively

impact on employee well-being (e.g. Bakker, 2011; Mauno et al., 2007; Bakker & Leiter, 2010). They do so by enhancing an intrinsic motivation of employees. In this, the fulfillment of individuals' psychological needs, for instance, for autonomy, relatedness, and competence is the key (Deci, 1975; Ryan & Deci, 2017; Bakker, 2011). In addition to the intrinsic motivation, availability of job resources can also result in an extrinsic motivation, which as well promotes well-being of employees by helping them, for example, to meet work goals (Bakker, 2011). All this suggests that existence of job resources is motivating and thus positively relates to the motivational concept of work engagement. Additionally, the high level of job demands makes job resources more beneficial and motivating (Bakker, 2011).

Even though the basic idea of the JD-R model is that job resources activate the motivational process whereas job demands activate the strain enhancing process, the role of job demands is not as simple. Job demands can be divided into two categories: challenge and hindrance demands (Albrecht, 2015). Challenge demands are things like workload, information processing, and problem solving, whereas hindrance demands are things like emotional demands, role ambiguity, and role conflict. Supposedly, challenge demands are positively correlated with work engagement while hindrance demands are more likely to be negatively correlated with work engagement. Similar to job resources, challenge demands can motivate employees by fulfilling their basic psychological needs and thus enhance work engagement (Albrecht, 2015).

Job resources then are those physical, social, or organizational characteristics of the job that can diminish stress and help employees to achieve their work objectives as well as boost individual growth, learning, and development (Demerouti et al., 2001). Some examples of job resources are social support from coworkers and supervisors, performance feedback, skill variety, autonomy, and learning opportunities (Albrecht, 2015). As noted, job resources exist in different levels, such as, personal, social, and organizational (Demerouti et al., 2001). Bakker et al. (2008) listed job resources and personal resources as couple of main factors affecting on work engagement. Further, it is

commonly agreed that job resources are the main antecedent of work engagement (Mauno et al., 2007; Bakker & Leiter, 2010).

In their 2-year longitudinal study, Mauno et al. (2007) indeed found that job resources were the best predictors of work engagement. The particular value of this longitudinal study was that the researchers could see the possible developing connections between the variables (i.e. job resources and work engagement) during a longer period of time. The two most predictive job resources were found to be job control and organizational-based self-esteem (Mauno et al., 2007). Overall job resources were better determinants of work engagement than job demands and, for example, demographics.

Similar to findings of Mauno et al. (2007), Suomäki, Kianto, and Vanhala (2018) suggested that factors considered as job resources were the main antecedents of work engagement. Factors such as learning opportunities, autonomy, functioning teamwork, and appropriate amount of work were considered to be some building blocks of work engagement (Suomäki et al., 2018). These antecedents seemed to apply to employees among all ages and generations suggesting that work engagement is mostly an individual experience which mainly builds up from different resources individuals have.

While work engagement is an individual experience, it has suggested also to be quite stable across different time points (Mauno et al., 2007; Oksa, Kaakinen, Savela, Hakanen, & Oksanen, 2021b). These properties of the concept can make some individuals more likely to be engaged at work than others and even create an accumulation of work engagement and its antecedents. Supporting this notion, Bakker (2011) displayed a work engagement model (Figure 1) illustrating the relationships that individual's resources, demands, work engagement, and job performance has with each other. The model suggests that one's personal and job resources are positively related to one's work engagement. Then, job demands moderate this relationship so that the higher the demands are the stronger the relationship between the resources and work engagement is. Furthermore, work

engagement is positively related to job performance which again is positively related to employees' ability to create more job and personal resources for themselves.

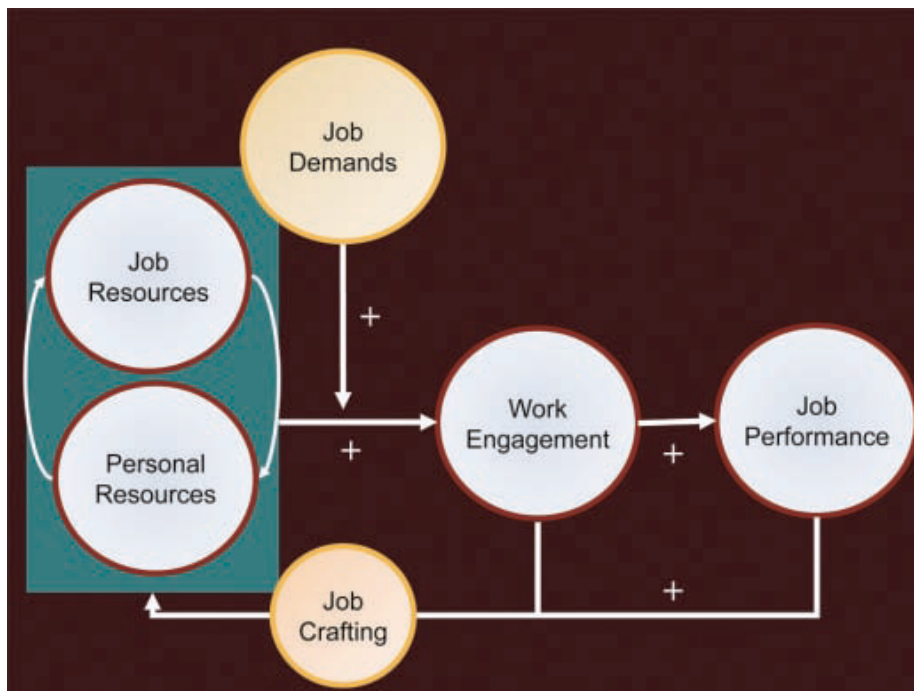


Figure 1. *The model of work engagement (Bakker, 2011, 267).*

As, for example, the model of work engagement (Bakker, 2011) suggests, it is possible to see a positive cycle around work engagement and job resources. When an employee has a good amount of job resources, it certainly can boost work engagement. This again creates a positive feeling and resourceful mind which then gives the employee more energy to create more resources for oneself. This type of cycle can help with adapting to, for example, new technologies and social media which then again provides more resources to feel engaged. As the positive cycle is certainly a good thing, its contrast, a negative cycle, then can be very hard to exit, thus having a negative “snowball” effect. As work engagement has suggested to be relatively stable state of mind (Mauno et al., 2007; Oksa et al., 2021b), exiting the cycle can become even more difficult.

The measurement of Job demands and resources widely varies between the studies conducted. There is no one clear measurement for the either construct but rather researchers choose the

appropriate measurements for their studies. However, Schaufeli (2017) writes about the Energy Compass (EC) which is a measurement based strictly on the JD-R model. It includes around 60 constructs, depending on the extent of the research, which mainly measure job resources, job demands, personal resources, employee well-being, and outcomes. Even with this JD-R model based measurement, there is plenty of room for researcher's personal choice when it comes to deciding the individual constructs used in the questionnaire.

Overall, when the JD-R model is used in a research, it tends to be measured in variety of ways and the chosen measurements are highly based on the main interest of a researcher. For example, Mauno et al. (2007) chose to include three job demands and three job resources into the study and investigated each of them by using separate and particularly appropriate measurement scales for each construct. Another popular measurement with variety of constructs to use is the Copenhagen Psychosocial Questionnaire (COPSOC) (Schaufeli, 2017). Even though the COPSOC is not based on the JD-R model, it includes wide range of constructs to measure job demands and resources and is often used in this particular purpose. It is used to measure the basic resources and demands in the job, for instance in Oksa et al., (2020), Oksa et al. (2021b), and this current thesis.

4 Social Media

4.1 Defining Social Media at work

Use of social media has rapidly increased in past years. It has become a major way of communication for people in their personal as well as professional lives. After the beginning of the social media era, organizations have started to use social media primarily for two reasons (Leonardi, et al., 2013). First, and most commonly studied, organizations use social media for external communications with, for example, customers. Second, and a bit less studied, social media are used for internal communications within members of an organization (Leonardi et al., 2013). As this

revolutionary trend is taking over the lives of people, it has raised an interest of researchers (Van Zoonen et al., 2017). Yet, the importance of even more particular research on social media at work is huge. The research done about work related social media use specifically from the employee perspective is quite limited. In order to fully understand the challenges, opportunities, and consequences of social media, it is necessary to first define the concept.

The development of social media already started in 1960s when Bruce and Susan Abelson formed something called “Open Diary” (Kaplan & Haenlein, 2010). The Open Diary was a social networking internet page where online diary writers could get together. About 20 years later Tom Truscott and Jim Ellis founded the “Usenet” which allowed internet users to publish messages publicly online (Kaplan & Haenlein, 2010). While the very first social networking sites were created earlier than you think, the road to the definition of social media as we know it today has been a quite long one.

There are two major concepts that needs to be distinguished in order to understand what are actually considered as social media: Web 2.0 and User Generated Content (UGC) (Kaplan & Haenlein, 2010). The term Web 2.0 was first used in 2004 for the content of World Wide Web platform that could be modified by all users instead of only individual users. It is often seen as a conceptual and technical foundation of social media. When talking about UGC Kaplan and Haenlein write that it is “the sum of all ways in which people make use of Social Media” (Kaplan & Haenlein, 2010, 61). For an internet content to be UGC there are three requirements that it needs to fill. First, the content needs to be published on a public website or networking site that can be accessed by a particular group of individuals. Second, the content has to show creative effort. Lastly, the content cannot be generated for professional practices (Kaplan & Haenlein, 2010). While the definition of UGC is seen as a definition of social media, it is still notable how broad this definition is. There are so many different types of social media that it is hard to distinguish between clear groups among them but some examples of social media platforms to mention are Facebook and Whatsapp.

The definition of social media as user generated content is extremely broad and sometimes confuses people with what all it includes. One of the most common forms of social media are social networking sites (SNSs) which contain many of the social media we use today, such as Instagram and Facebook. SNSs are defined as applications where people create personal information profiles to contact and keep in touch with other people (Kaplan & Haenlein, 2010). Often, the goal for SNS users is to gain social capital, maintain social relationships, and seek for entertainment (Ellison et al., 2015). These goals are attempted to be achieved by consuming and producing user generated content, for example, in forms of photos or texts.

Whereas the different social media sites are a one thing, the other thing worth of considering is the different kinds of purposes of social media use. As this master thesis aims to examine the relationship between work related social media use and work engagement, it is important to define what is considered as work related social media use. Work related social media use can sometimes be hard to separate from a personal use of social media. However, Van Zoonen et al. (2017) argue that work related social media use can be recognized by its content. The content in social networking sites, like Facebook and Twitter, that refers to work experiences, organizational news or information sharing can be considered as a work related social media use (Van Zoonen et al., 2017). Additionally, work related social media use can include document editing, collaboration, and self-development happening in social media (Oksa et al., 2020).

There is even its own term of enterprise social networking site (ESNS) for a form of SNS used in work places (Ellison et al., 2015). The idea of an ESNS is similar to a SNS but only it is formed for organizational use. Many ESNSs are mimicked from different SMSs. However, the users of the ESNS can be limited only for individuals within the organization and are often approved by management. Also, the communications happening in ESNSs can be monitored by authorities or the organization and is limited only for the users of the particular ESNS so that no inappropriate content goes out to public social media. Similar to SNSs, goals and purposes of use of ESNSs are to enable

connections and social relationships between individuals. However, in ESNSs the connections and communications happen only between the individuals within the user organization (Ellison et al., 2015).

In addition to ESNSs, existing literature introduces a broader concept of enterprise social media (Leonardi et al., 2013; Sharma & Bhatnagar, 2016). Enterprise social media differs from the ESNS in that it is not actually a one social networking site but rather an online platform where the members of an organization can interact with each other in different ways despite whether or not they are normally “communication partners” (Leonardi et al., 2013). This enterprise social media platform includes variety of functions in the same place and allows employees to communicate and share messages with everyone in the organization, connect with a particular coworker as a “communication partner”, post, edit, and sort texts and other different kinds of documents, and see other employees’ shared, posted, and edited work at any time. Enterprise social media have arisen strong interest and some organizations have implemented them into their employee engagement strategies (Sharma & Bhatnagar, 2016). As enterprise social media allow diversity of employees to connect despite the time and place, share ideas and solutions, quickly resolve problems, and help new employees to socialize, they have noted to be very potential tools for work engagement and collaboration of employees.

Overall, it seems like when defining work related social media the important aspect to consider is the content of the social media publications and communications (Leonardi et al., 2013; Van Zoonen et al., 2017; Oksa et al., 2020). Thus, work related social media use can be communications in an internal platform between coworkers and members of an organization (Leonardi et al., 2013) or it can be communications related to work in any social media platform (Van Zoonen et al., 2017). In this thesis, the definition is based on the definition of Oksa et al., (2020) who describe work related social media use as a use of any type of social media platform (e.g. Microsoft Teams, Yammer, Whatsapp, Skype, Facebook) as long as the communication in there is linked to the work, the work community or colleagues.

In the following section, I will discuss about the ways work related social media use impacts on organizations and their employees. Previous literature has suggested that work related social media can, for example, help to bring employee voice heard in workplaces and enable effortless communication within organization (e.g. Holland et al., 2016; Schmidt et al., 2016; Van Zoonen et al., 2017; Oksa et al., 2020). Literature also has brought up some negative effects of work related social media use, such as boundary conflicts, technostress, and communication overload (e.g. Bucher et al., 2013; Van Zoonen, Verhoeven, & Vliegenthart, 2016; Yu, Cao, Liu, & Wang, 2018; Oksa et al., 2021a; Oksanen et al., 2021). Yet the evidence for work related social media to positively impact on organizations and their employees is strong.

4.2 Connecting It All: Social Media, JD-R Model, and Work Engagement

As the JD-R model suggests, job demands and resources need to be in balance for employees to not burnout in their jobs but rather feel engaged (e.g. Demerouti et al., 2001). When connecting work related social media use to this model, there have been quite mixed findings about its impact (Van Zoonen et al., 2016; 2017). Especially the impact of work related social media in work-life conflict has been an interest of researchers (e.g. Van Zoonen et al., 2016, Oksa et al., 2021a; Oksanen et al., 2021). Work-life conflict refers to individual's problematic state where the demands of work and life overlap creating an overwhelming feeling in both domains (e.g. Bucher et al., 2013; Mauno, Rantanen, & Kinnunen, 2009). The demands of one domain make it hard to meet the demands of the other domain. This conflict can happen in both ways, from work to life or from life to work.

Especially the constant connectivity through social media makes the borders of different life domains almost invisible (Bucher et al., 2013) and creates feelings of different overloads (Yu et al., 2018). The excessive social media use at work can form stressors like information and communication overloads which then create a strain of social media exhaustion (Yu et al., 2018). This strain can have a negative impact on, for example, job performance. The fact that social media are constantly on and

easily available through phones, laptops, and tablets, makes it possible for people to be connected at any time of the day. This continuous connectivity among possible increased workload through multiple social media channels can certainly create an information overload and boost work-life conflicts (Bucher et al., 2013; Yu et al., 2018).

Another term related to the information overload and the possible negative effects of social media is technostress. The term refers to negative effects on mindsets, thoughts, actions, or bodily physiology that are caused by new technological devices and inability to cope with them due to an information overload or feeling of constant connectivity (Brooks, 2015; Tarafdar, Tu, Ragu-Nathan, & Ragu-Nathan, 2007). Technostress can even cause people to have severe physical symptoms such as heavy breathing and light-headed feeling, as well as mental problems such as fear, anxiety, and feeling of being out of control. It is suggested that a continuous and heavy use of social media is positively related to technostress (Brooks, 2015; Oksanen et al., 2021) which then is negatively related to well-being and happiness of an individual, for example (Brooks, 2015).

This technostress caused by continuously developing technology and social media again increases a likelihood of work-life conflicts (e.g. Bucher et al., 2013; Van Zoonen et al., 2016). Van Zoonen et al., (2016) found that work related social media use was indeed positively related to both work to life and life to work conflicts. These both conflicts again were positively related to emotional exhaustion (Van Zoonen et al., 2016). In their later study, Van Zoonen et al. (2017) found that work related social media use was positively related to exhaustion through increased work-life conflict and additionally negatively related to work engagement through this conflict. However, they also found that work related social media use was positively associated with work engagement through improved communication and accessibility.

Research findings like the ones of Van Zoonen et al. (2017), Oksa et al. (2020), Oksa et al. (2021a), and Oksa et al. (2021b) are interesting as it seems like when work related social media use is seen as a resource rather than a demand, it can help boost work engagement of employees. Thus,

the individual perception comes important here. In their study Oksa et al. (2021a) interviewed the participants about their motivations for work related social media use. The two basic divisions for motivations they came up with were extrinsic and intrinsic. Extrinsic motivations were based on the outcomes the action results, for example using work related social media to connect with coworkers to get an obligatory job done. When it came to extrinsic motivations, individuals mentioned the feeling of pressure from their work organization or the overall outside world for social media use and the fact that social media just are a part of our lives today, whether we wanted or not (Oksa et al., 2021a).

On the other hand, intrinsic motivations to use work related social media were based on person's genuine interest to engage with certain actions (Oksa et al., 2021a). For example, the action of connecting with a coworker in work related social media with a mindset of learning something from him or her is more likely to be intrinsic motivation than extrinsic. With intrinsic motivation the drivers for social media use were more based on individuals' willingness to connect, share, and keep up with peers and professional news, for example, and through that to fulfill their psychological needs (Oksa et al., 2021a). It seems like the important distinction between the extrinsic and intrinsic motivators is how the individual experienced the use of social media: whether one is somewhat forced to use them or one has intrinsic will to use them. The type of motivation the individual experiences can certainly make a difference whether or not the work related social media use is work engagement enhancing.

Even though the individual's perception of work related social media use can impact on its effect, there are evidence that the relationship between work related social media use and work engagement is positive (e.g. Oksa et al., 2020; Oksa et al., 2021b). Oksa et al. (2020) found that work related social media use was positively associated with work engagement, particularly because of its communication aspect. In addition to a direct effect of work related social media use on work engagement, there was an indirect effect where organizational identification and social support acted

as a mediating factors (Oksa et al., 2020). Social media as a communication enabler is a one great instrument for social support and can certainly boost work engagement (Oksa et al., 2021b). There are other similar findings in the literature supporting the positive outcomes of work related social media use (e.g. Schmidt et al., 2016; Van Zoonen et al., 2017).

As mentioned, a one of the reasons for using social media is that it is an efficient way to make social connections and keep up with them (Schmidt et al., 2016). Schmidt et al. (2016) studied how much people connected with their professional peers in social media. They also were interested in how did the percentage of co-worker connections in social media relate the perceived organizational support and organizational spontaneity of employees. They found that the average percentage of co-worker connections in social media was 12.5%, and higher the percentage was the higher the perceived organizational support and organizational spontaneity among employees were (Schmidt et al., 2016). These findings are supportive of a positive relationship between work related social media use and work engagement as work engagement can be achieved through social support and a positive atmosphere in work place.

In addition, Van Zoonen et al. (2017) found that even though social media can have a negative impact on work engagement by the possible increases in level of work-life conflict, it is also evident that work related social media use is positively related to work engagement through improved communication in work. These findings are in line with the existing work engagement research which strongly suggests that the one of the main antecedents of work engagement is job resources provided by the work place (Bakker et al., 2008; Bakker & Leiter, 2010). Social media as a social connector, a communication enabler, and an easy access to information can certainly be a resource conducive element at work.

4.3 Social Media and Generational Differences

Many work places are currently in a situation where the age range of employees is quite wide including workers from a few generations. As different generations have grown up with different work life expectations and especially very different technological opportunities, there can be some issues that need to be considered regarding the generational differences. For example, Holland et al., (2016) found that a younger generation, called Millennials or Generation Y, was more likely to use social media to voice work related issues than their older colleagues.

Currently workforce includes about four generations of workers: Baby Boomers who were born post-war between early 1940s and middle of 1960s, Generation X who were born between 1965 and 1979, Generation Y or Millennials who were born after 1980 (Becton et al., 2014), and Generation Z who is sometimes considered the newest generation in workforce. Definitions for each generation vary (Holland et al., 2016; Wey Smola & Sutton, 2002; Wong et al., 2008; Oksa et al., 2021a) and there is no one clear range of birth years for any of the generational groups. For the purpose of the current master thesis, the concept of the Millennial generation needs to be more specifically defined.

As mentioned above, the definitions of the different generations can be quite vague. However, literature seems to agree with the fact that Millennials are the first generation that grew up with technology and thus differs in that from previous generations (Wey Smola & Sutton, 2002; Wong et al., 2008). The argued birth years of Millennials range between 1977-2000 depending on the source. For the purpose of this study, the term Millennials refers to individuals born in 1980s and 1990s and whose early life has been shaped by rapid technological developments (Oksa et al., 2021a). This means that they were 39 years old or younger at the time of the data collection for this master thesis. Some of the participants included as Millennials or Generation Y might actually belong into Generation Z. However, generations can also be defined by the sociocultural experiences (e.g. war, economic depression, technological revolution) common for every individual in the generation (Sessa et al., 2007). Thus, as Generation Z is similar to Millennials in terms of technology use there is no need

for separation. What it comes to older generations in this study, Generation X and Baby Boomers are included as a one group based on their similarities in terms of technology use.

As suggested, generational definitions are not only based on the age or birth years of individuals but also the major sociocultural circumstances existing during the generation's years of development (e.g. Sessa et al., 2007; Oksa et al., 2021a). Those circumstances shape the mindsets of individuals of different generations. It is agreed that Baby Boomers are loyal and collective group while Generation X's are more individualistic and comfortable with changes (Wey Smola & Sutton, 2002; Wong et al., 2008). However, individuals in both of these generations can be referred as Digital Immigrants meaning that they have not grown up with technology and all its improvements (Prensky, 2001). Thus, technology is something Baby Boomers and Generation X's had to learn to use later in their lives. Contrary to the two former generations, Millennials or Generation Y are "first to be born into a wired world; they are 'connected' 24 hours a day" (Wey Smola & Sutton, 2002, 365). In other words, Millennials have grown up with technology and all its rapid developments and are its natural users, thus also called Digital Natives (Prensky, 2001). Other than that, Millennials are socialized and collective group of individuals who are optimistic, achievement focused, as well as comfortable with change and fast paced environment (Wong et al., 2008).

Not much research is yet done about the different generations' work related social media use. However, Oksa et al. (2021a) investigated work related social media use among Finnish Millennials and former generations. The findings were interesting as Millennials experienced more negative effects, such as technostress and burnout, from work related social media use than former generations did (Oksa et al., 2021a). Overall, Millennials used work related social media more and were usually a bit better equipped with it than their older coworkers. According to Millennials, the benefits and reasons for social media use at work were easy access to information as well as possibility for rapid communication and collaboration. On the other hand, downsides of social media included constant connectivity and external pressure to use it.

While the generational gap in work related technology and social media use might have not been studied quite much yet, some research has been done about the generational gap in technology use in general (e.g. Vaterlaus, Jones, and Tulane, 2015; Reinecke et al., 2017). Vaterlaus et al. (2015) studied young adults and their parents in the US to find out their perceived knowledge about interactive technology. Interactive technology included, for example, social networking, email, and video chat. They found that there were significant differences in self-reported perceptions of interactive technology knowledge between young adults and their parents. The difference was bigger, the newer the interactive technology was (e.g. social networking).

As the younger population might be more familiar with the new technology and social media in hands, it also likely makes them use it more (Oksa et al., 2021a). Reinecke et al. (2017) studied the effect of an internet multitasking and a communication load caused by social media on health and well-being. They took an age into a consideration on their analyses and obtained some interesting results of generational differences. Their results suggested that an internet multitasking was more strongly associated with stress and negative psychological health effects for participants between ages of 14-49 than for participants over 50 years of age and older. Contrary to that, a communication load seemed to be more strongly related to stress and negative psychological health effects for the participants over 50 years of age and older than for the younger participants.

While the younger population (i.e. Millennials) uses technology and social media more in their overall lives than the older generations do, they also use it more for specifically work related purposes (Oksa et al., 2021a). On a downside, the high overall use of social media can cause information load to be too much creating a strain (e.g. Bucher et al., 2013; Oksa et al., 2021a; Oksanen et al., 2021) and evidently Millennial employees do experience higher technostress, burnout, and psychological distress than older employees (Oksa et al., 2021a). However, as Millennials' use of social media is more frequent than their older colleagues', they also might benefit from it more. Thus the association with work engagement could naturally be stronger for Millennials than it is for the older generations.

Yet, maybe more than age, the perspective of social media as a resource and individual's own motivation to use it might be important aspects affecting the relationship between work related social media use and work engagement (Oksa et al., 2021a).

5. Research Questions and Hypothesis

Even though work engagement and social media have been studied independently quite a bit, the connection between them is yet in a need of more throughout research. The goal of this master thesis is to give a contribution to that particular research by investigating the connections between work related social media use, job resources, work engagement, and the related age factors. Following are the more specified research questions under the investigation:

- 1 *How is work related social media use related to work engagement?*
- 2 *Does the availability of job resources affect to the relationship between work related social media use and work engagement?*
- 3 *Is there difference in the relationship of work related social media use and work engagement between the employees of generation Y and the employees of older working generation?*

It has been suggested that work related social media are a way to connect with coworkers and gain social support (Schmidt et al., 2016; Oksa et al., 2020; Van Zoonen et al., 2017). There seems to be a direct positive relationship between work related communication on social media and work engagement (Oksa et al., 2020). In addition to the direct relationship, there is indirect association between variables via, for example, social support and organizational identification. These among other positive aspects of work related social media can boost work engagement.

H1: Work related social media use is positively related to work engagement.

Previous research has supported the notion that job resources are one of the main antecedents of work engagement (Bakker & Leiter, 2010; Mauno et al., 2007). Work related social media are

found to be positively associated with positive elements at work, such as social support (Oksa et al., 2020), that can be considered as job resources (Demerouti et al., 2001). Based on the existing literature then, it can be proposed that work related social media can act as an additional job resource. Thus, employees with lower levels of job resources might benefit work related social media more than those with already high levels of job resources. Here the availability of job resources moderates the relationship as suggested in hypothesis 2.

H2: Job resources moderate the relationship between work related social media use and work engagement so that the less job resources reported the stronger the positive relationship is.

While most individuals of the Millennial generation have been raised alongside with the technological developments, these developments, such as social media, have emerged as a very new concept for individuals in older generations (Prensky, 2001; Oksa et al., 2021a). It could be that social media would have a negative effect on older generation's work engagement as they are a bit unfamiliar with the concept, thus experiencing it more as a demand than a resource. Based on previous literature, work related social media use is positively related to work engagement (Oksa et al., 2020) and as the millennial generation's overall use of social media is higher than it is for older generations (Oksa et al., 2021a), it can be proposed that they would benefit more from it in terms of work engagement. Thus, it might be that the positive relationship between work related social media use and work engagement is stronger for employees of the millennial generation than for older employees, as suggested in hypothesis 3.

H3: The positive relationship between work related social media use and work engagement is stronger among the employees of Generation Y than among the employees of older generations.

6. Methods

6.1 Sample and Procedure

The social media at work in Finland project collected data from Finnish employees in variety of occupational fields (Oksanen et al., 2020; Oksa et al., 2020). The purpose of the project was to gain more information about the work related social media use and its effect to, especially younger adults', work engagement. Data for the project was collected during March and April of 2019 and includes a total of 1817 participants ($N=1817$). 53.2% of participants were male ($n=966$) and 46.8% of participants were female ($n=851$). The age of the participants varied from 18 to 65 ($M=41.8$, $SD=12.2$) years.

Participants were recruited via Norstat, which created a volunteer pool for participant recruitment (Oksa et al., 2020). Participants were informed about the study and its voluntary nature. They were also informed about the anonymity of the participation. Thus, the ethical rules of the participant recruitment were met. The response rate for the survey was 28.3% (Oksa et al., 2020). The studied population is well comparable to main population and thus the results can be quite well generalized to the Finnish working population.

6.2 Variables

Variables are commonly divided into two different categories: categorical and quantitative (Morling, 2018, 117). Categorical, or nominal, variables are usually coded with numbers but those numbers do not alone represent anything meaningful. They need an explanation, such as 1 = *male* and 2 = *female*, to be meaningful in a data set. However, quantitative variables have measurement scales where numbers are meaningful. There are primarily three different types of measurement scales associated with quantitative variables: ordinal, interval, and ratio. In this master thesis the main

variables of interest (i.e. work engagement, job resource, and work related social media use) are assessed by using the Likert-scale which is theoretically categorized as an ordinal scale.

When using quantitative research methods, even the variables themselves give us plenty of information about the participant pool. Therefore, it is important to consider validities and reliabilities of each measurement scale. The term validity refers to the question whether or not the variable really measures what it is supposed to measure (Morling, 2018, 117). The concept of reliability, on the other hand, refers to the question of how consistent results the measure gives. These two concepts provide us some insight about how well we can trust the results of the study and how generalizable the results are within a larger population.

In the current analyses, Cronbach's Alpha was run for each measure. Cronbach's Alpha assesses the internal reliability of measurement scales that include more than one item (Morling 2018, 117). Internal reliability of a construct considers the internal consistency of the items used in the measure. In other words, Cronbach's Alpha tells us whether or not the similar items in the measure gives us similar results. Cronbach's Alpha is based on the inter-correlations between the items within the measurement scale. The formula results one value by using the average of all possible correlations and the number of items in the measurement scale. The closer the value is to 1.0, the better internal reliability the measurement scale has. However, the value of .70 is generally considered the value required for measurement scale to be reliable.

Work Engagement

Work engagement acts as a dependent variable in the current analyses. The variable is assessed by using the shortened version of The Utrecht Work Engagement Scale (UWES) (Schaufeli et al., 2006) which includes nine items and is validated for Finnish population (Hakanen, 2009). The nine items include three different dimensions, three items each dimension, of work engagement: vigor, dedication, and absorption (Schaufeli et al., 2006). The items are assessed by 7-point Likert scale where 0 = *never*, 1 = *a few times a year*, 2 = *once a month*, 3 = *a few times a month*, 4 = *once*

a week, 5 = *a few times a week*, 6 = *daily*. Items are scored such that greater positive values indicate higher level of work engagement. The total score for the scale can range between 0-54. After creating a sum variable of the nine items in the UWES used in the study, descriptive statistics were calculated. The mean was 38.67 and the standard deviation was 12.30. In addition, the reliability of the scale was measured and Cronbach's Alpha for the scale was .95 indicating high internal reliability.

Job Resources

Participants' job resources act as a possible moderator in the model proposed. Job resources were assessed by shortened version of The Copenhagen Psychosocial Questionnaire (CPSQII) (Pejtersen, Kristensen, Borg, & Bjorner, 2010). 15 items out of 127 were selected to be included in the questionnaire used. These 15 items measured both job demands and resources so for the purpose of the current analysis, a sum variable of eight (8) items measuring only job resources was created (see appendix A). Six of the selected items (e.g. "Can you influence on the amount of work assigned to you?") were assessed by 5-point Likert scale where 1 = *never/hardly ever*, 2 = *seldom*, 3 = *sometimes*, 4 = *often*, 5 = *always*. Two of the items (e.g. "Is your work meaningful?") were assessed by 5-point Likert scale where 1 = *to a very small extent*, 2 = *to a small extent*, 3 = *somewhat*, 4 = *to a large extent*, 5 = *to a very large extent*. Items are scored such that greater positive values indicate higher level of job resources. The total score for the variable can range between 8-40. After creating a sum variable of the eight items, descriptive statistics were calculated. The mean was 28.35 and standard deviation was 4.94. In addition, the reliability of the scale was measured and Cronbach's Alpha for the scale was .776 indicating high internal reliability.

Work Related Social Media Use

Work related social media use acts as an independent variable in the current analyses. In the questionnaire, participants were asked about their use of work related social media by a single-item question: "*How often do you use social media to keep in touch with your colleagues or work community regarding work-related matters (e.g. information sharing or agreeing timetables)?*"

(Oksa et al., 2020; Oksanen et al., 2020; Oksa et al., 2021, Oksanen et al., 2021). The item was assessed by 5-point Likert scale where 0 = *no use*, 1 = *less than weekly*, 2 = *weekly*, 3 = *daily*, 4 = *multiple times during the day*. Item is scored such that greater positive value indicates more frequent use of work related social media. The total score for the variable can range between 0-4. The mean was 1.36 and standard deviation was 1.20.

Demographics

In the regression analysis, gender and age of the participants are controlled. 53.2% of participants were male ($n=966$) and 46.8% of participants were female ($n=851$). The gender variable was coded so that 1 = *male* and 2 = *female*. The age of the participants was assessed by asking their age in number of years. The age of the participants varied from 18 to 65 ($M=41.8$, $SD=12.2$) years. In addition to the continuous age variable, a categorical age variable was created dividing the participants into two groups: Millennials or Generation Y (<40 years) and older (≥ 40 years). This was done for the purpose of detecting differences in means between the different generations and for the moderator analysis. Age groups were coded so that 1 = *Generation Y* and 2 = *older*.

6.3 Methods of Analysis

Descriptive Analyses and Correlations

The goal of descriptive statistics is to make especially big data sets more clear and easily understandable and transform the scores into a more useful form (Welkowitz, Cohen, Lea, 2011, 5). The statistics of central tendency are commonly used to describe a location of a set of scores (Welkowitz et al., 2011, 55-61). The most used and stable measure of central tendency is a mean which gives us an average of the scores from a participant pool. Another descriptive statistic commonly reported is a variability of the scores. Variability refers to how spread out the scores of a certain measure are and how far away from the mean scores typically fall (Morling, 2018, 462-464). One of the most commonly used measures of variability is a standard deviation. It describes the

average of how far each score falls from the mean. The summary of descriptive statistics of the studied variables can be seen in Table 1.

Table 1.

Descriptive statistics.

Variables	<i>n</i>	<i>%</i>	<i>M</i>	<i>SD</i>	<i>range</i>
Age			41.75	12.185	18-65
Generation Y	900	49.50			
Older	917	50.50			
Gender					1-2
Male	966	53.20			
Female	851	46.80			
Work Engagement			38.67	12.30	0-54
Work related Social Media Use			1.36	1.20	0-4
Job Resources			28.35	4.94	8-40

In addition to tables, these descriptive statistics can be displayed by different charts, for example frequency histograms. The purpose of these visual aids is to make data even more meaningful for their readers (Morling, 2018, 458). Frequency distribution is often used to visually represent the descriptive statistics of a variable. It can get different shapes and can be symmetric or skewed. One particular frequency distribution that is often discussed in research is the normal distribution, or the normal curve. It lies on a theoretical assumption that certain scores of data are a result of multiple, independent, and random causes thus distributed in a shape of normal curve (Bakeman & Robinson, 2005, 89). The normal distribution can be recognized from its bell-like symmetric shape where the area under the curve theoretically represents 100% of the total population (Welkowitz et al., 2011, 91-92). Another characteristic of the normal distribution is that theoretically it contains infinite number of scores and thus its tails keep getting closer and closer to x-axis but never

quite catches it. The normal distribution can be checked and assumed, for example, for variables, samples, or residuals. When the sample is big enough, however, the expectation for normal distribution can be ignored. This is a case for the present study as the sample includes 1817 participants. Additionally, a linear regression does not assume variables, but only the residuals, to be normally distributed. The residual distribution can be seen in Appendix B.

As the analyses of the current master thesis are strongly based on the association claims between different variables, I used bivariate correlations to find basic starting points for further analyses. A bivariate correlation refers to association between two variables (Morling, 2018, 204-206). Correlations are most often described by the correlation coefficient r which strength ranges from one (1) to zero (0) and direction can be either positive or negative. The closer to one (1) is, the stronger the association between the two variables is. The commonly used guidelines for the strength of correlations are following: when $r \geq .50$ the relationship is strong and when $r \leq .10$ the relationship is weak. When r is positive both the Y-variable and the X-variable increases whereas when r is negative the Y-variable decreases as the X-variable increases or vice versa. In addition to strength and direction of the r , its significance needs to be taken into account when making association claims.

To detect the significance of obtained correlations, the p value needs to be calculated. This p value represents the probability of obtaining the results from zero-association population (Morling, 2018, 215). In other words, the p value describes the probability of the null-hypothesis (no association) to be true. The smaller the p value, more significant the results are. The value of p where the results are considered significant is called the alpha-level (Morling, 2018, 483). The commonly used alpha-level in behavioral sciences is $p < 0.05$. Sometimes even smaller levels, such as, $p < 0.01$ are used.

While a measurement of the correlation coefficient r , usually requires both measured variables to be quantitative, we are sometimes interested of associations between quantitative and categorical variables. When one of the variables of interest is categorical, instead of using one data point per each

individual, it is better to compare the means of each category (Morling, 2018, 208-209). This comparison is usually done by a statistical test called *t* test. This test helps us to determine whether the differences between the means of two independent groups are statistically significant (Morling, 2018, 491). For example, I will use the *t* test for independent samples to measure the difference in means for work related social media use and for work engagement between two generations of employees (i.e. “generation Y” and “older”). The null-hypothesis for this case is that there is no difference between the means of the two generations. After running the *t* test with SPSS, it can be seen whether the null-hypothesis is rejected or retained. If it is rejected, the difference between the means is statistically significant ($p < 0.05$) meaning that the difference did not happen just by a chance (Morling, 2018, 492).

Regression Analysis

I used linear regression (ordinary least squares regression, OLS) as a main method for the analysis. This particular analysis allows us to predict one variable (dependent) based on the other variable (independent) (Welkowitz et al., 2011, 254-257). Usually the dependent variable is referred as an Y-variable and the independent as an X-variable. The prediction of Y on X is based on the correlation between the two variables. However, as a correlation only tells us how strong the relationship between two variables is, a regression helps us to predict how much of Y is accounted by X. Even though the prediction of Y is never perfect, regression provides us a way to make more accurate predictions than correlations alone.

The regression line is the best fit line representing correlation dots in a scatter plot (Welkowitz et al., 2011, 257). In a linear regression this line is straight. As the line is set to where it best fits the correlation dots, in reality, not all the dots will fall onto the regression line. Thus, there will be errors in predictions done by the regression analysis. The difference between an actual Y score and a predicted Y score is called a residual score, or just an error, and it indicates the error in prediction (Bakeman & Robinson, 2005, 106). The predicted linear regression line attempts to minimize the sum

of squared errors (the least-squares regression line) in order to make the prediction as close to correct as possible.

Regression analysis provides a variety of different coefficients offering an information about the fit of the variables in the regression model (Bakeman & Robinson, 2005). From these coefficients a few are worth of a closer look. First, the coefficient b is a simple regression coefficient defining a slope of a regression line. It tells us what is a change in Y for a one unit change in X . However, as the b is unstandardized, the b values for different variables are hard to compare (Morling, 2018, 248). More comparable measure of associations is the coefficient beta (β) which describes the relationship between X and Y , when another predictor variables are controlled for. It is a standardized coefficient meaning that its values for different variables can be compared. Second, the coefficient of determination, or r^2 , describes the proportion of Y that is accounted by X (Bakeman & Robinson, 2005, 146). It is argued that, in purpose of regression analysis, the r^2 is better statistics to report than just the r as it gives us more purposeful statistics (i.e. percentage of an Y accounted by an X).

Linear regression is a good way to find associations between variables but there are some assumptions for linear regression that need to be considered in the data analysis process. First, there needs to be a statistically significant linear correlation between X and Y to predict the Y with linear regression analysis (Nummenmaa, 2009, 315). Second, the closer to zero (0) the correlation between X and Y is, the greater is the amount of prediction errors (Welkowitz et al., 2011, 261). So, very weak correlations, even when statistically significant, can be useless for regression in terms of prediction purposes. Third, there should not be collinearity between the predictor variables (Nummenmaa, 2009, 323). Collinearity can be checked by running correlations between the variables or by checking the collinearity tolerance (VIF) from SPSS regression output. The problem with these statistics is that there is no clear value that indicates what is too big of a collinearity but the decision is left for the individual researcher. Lastly, there should be homoscedasticity within the residuals (Coolican, 2019, 600). This means that the variance of residuals for each case should be similar. Homoscedasticity can

be simply checked by visualizing a scatterplot from all the residuals (Nummenmaa, 2009, 324). Basically the residuals should be as normally distributed as possible so that the regression model tested works similarly with any Y-values.

The independent variable used in current analysis, work related social media use, is measured in 5-point Likert scale which is theoretically an ordinal scale. However, the independent variable used in regression analysis should be measured at least in an interval scale or it needs to be recoded into a dummy variable (Nummenmaa, 2009, 325). This was done for the work related social media variable in a way where 1=*does not use work related social media* and 2=*uses work related social media*. In terms of other assumptions for linear regression, scatterplots for linear correlations and homoscedasticity for residuals as well as collinearity statistics can be found under the section Appendices (see appendices B and C).

Moderation Analysis

In addition to a linear regression analysis, moderation analysis was conducted for this master thesis. Simply explained the concept of moderation refers to the effect a third variable has on the strength of the relationship between two other variables (Morling, 2018, 262-263). Hayes (2017) explains the moderation as a model of X, Y, and W, where X is an independent variable, Y is a dependent variable, and W acts as a moderator (Figure 1) (Hayes, 2017, 220). The effect of X on Y is moderated by W if the size, sign, or strength of the effect can be predicted or is depended on the W. When diving deeper into computational bases of moderation analysis, it somewhat reminds of a linear regression analysis (Caron, Valois, & Gellen-Kamel, 2020). Just like a linear regression, the moderation analysis attempts to predict Y from X. Only this time there will be two more predictors in addition to X: W and XW. In other words, the value of Y is affected by X, W and the interaction between X and W.

Moderation analysis can be computed with either categorical or continuous variables, but depending on the variables of interest the computation method varies (Caron et al., 2020). When using

a regression based procedure, the types of variables do not matter thus the moderation analysis can be done for continuous variables (Hayes, 2017, 223). For this reason, I will conduct the moderation analysis by using the regression based procedure and the PROCESS macro for SPSS. This macro was developed by Hayes.

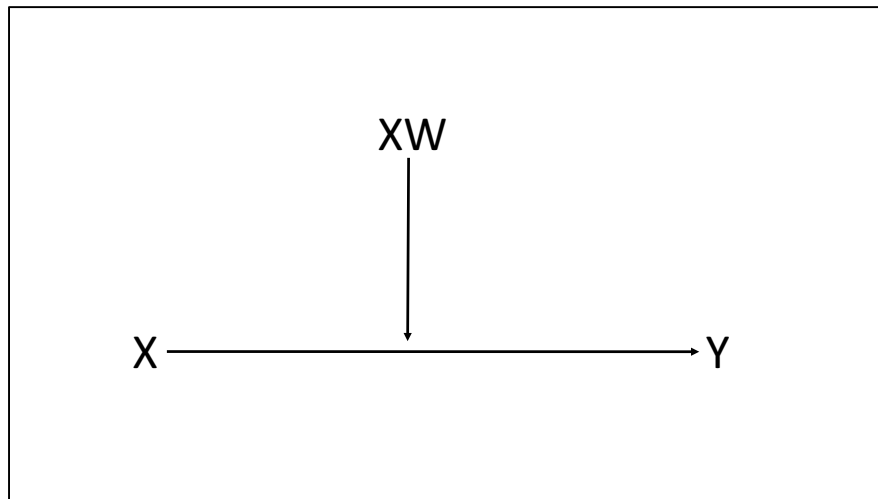


Figure 2. Based on Hayes (2017, 8), “The simple moderation model with a single moderator variable *W* influencing the size of *X*’s effect on *Y*”.

7. Results

The data analysis was conducted by using SPSS data analysis program. I began by detecting the correlations that describe the basic interactions between the different variables. The results of correlation testing are displayed in Table 2. The biggest interest for me was the correlation between work related social media use and work engagement ($r=.156, p<.01$). The significant positive correlation suggests that when work related social media use increases, work engagement increases as well. The significance of this correlation is important in terms of the regression analyses for the hypothesis testing. Correlation analyses also revealed that there is a significant correlation between work related social media use and job resources ($r=.165, p<.01$) in a way that when work related

social media use increases the level of job resources increases as well. In addition, an interesting correlation was found between age and work related social media use ($r=-.120, p<.01$). This suggests that older employees might use work related social media less than the younger employees, which is in line with the previous studies concerning the hypothesis 3.

To get more support for the hypothesis 3, *t*-test was conducted to see if there actually were differences on the means of work engagement and work related social media use between the two generations. The results of the *t*-test supported a notion that there indeed would be a difference between the two generations in social media use ($t(1815)=5.39, p=.000$). This indicates that the younger generation uses social media slightly more than the older one. Interestingly results also suggested that there was a difference in the levels of work engagement between the generations ($t(1815)=-4.34, p=.000$), so that the older generation reports higher levels of work engagement than does the younger one.

Table 2.

Correlations.

Variable	1	2	3	4	5
1. Work Engagement	1				
2. Job Resources	.60**	1			
3. Work related social media use	.16**	.17**	1		
4. Age groups	.10**	.04	-.13**	1	
5. Age	.11**	.04	-.12**	.85**	1

** Correlation is significant at the 0.01 level (2-tailed).

After going through the basic correlations between the variables of interest, I moved onto the main analysis method for this master thesis: the linear regression. First, I run the regression analysis to test the hypothesis 1 stating that there is a positive connection between work related social media use and work engagement. In the regression model I entered work related social media use as a

predictor variable and work engagement as a prediction variable. Age, gender, and job resources were controlled in this model. The hypothesis 1 was supported as the regression coefficient b was at .07. with significance of $p=.000$ meaning that for a one-unit increase in work related social media use there is a .07 unit change in work engagement. R^2 for the first regression model was .39, which means that 39% of work engagement was accounted by work related social media use and the control variables. The results of regression analysis for model 1 can be seen in Table 3.

Table 3.

Results of regression analysis, work engagement as a dependent variable.

Variable	$SE(B)$	β	95% CI
Constant	1.79(-14.25)		[-17.77, -10.74]
Work related social media use	.50(1.76)	.07	[.785, 2.73]
Job resources	.05(1.45)	.58	[1.36, 1.54]
Age	.02(.09)	.09	[2.47, 4.25]
Gender	.45(3.36)	.14	[.06, .13]

Notes. $N=1817$. $R^2=.39$. $F= 286.38$. $p=.000$.

For the hypothesis 2 testing, more complex regression based analysis was required. Hypothesis 2 stated that job resources moderate the relationship between work related social media use and work engagement so that less job resources there are the stronger positive relationship there is. The moderation analysis was conducted by using the PROCESS macro for SPSS. Work engagement was entered as a dependent variable, work related social media use as an independent variable, and job resources as a moderator variable. In addition, age and gender were controlled in this model. The results supported the hypothesis 2 as they suggested that job resources indeed moderate the relationship between work related social media use and work engagement ($B=-.09$,

$p < .05$). The results showed support for the moderation in hypothesis as the association between work related social media use and work engagement was stronger among those having lower job resources. So it is likely that work related social media use is more beneficial for those employees whose job resources are low than for those whose job resources are high. The results for the second model are displayed in Table 4 and Figure 3.

Table 4.

Results of moderation analysis, work engagement as a dependent variable.

Variable	<i>SE(B)</i>	<i>t</i>	<i>p</i>	<i>95% CI</i>
Constant	2.04(-14.88)	-7.30	.000	[-18.88, -10.89]
Work related social media use	1.07(3.15)	2.94	.003	[1.05, 5.26]
Job resources	.06(1.55)	24.00	.000	[1.43, 1.68]
Work related social media use x Job resources	.04(-.09)	-2.34	.020	[-.16, -.01]
Age	.02(.09)	4.71	.000	[.05, .13]
Gender	.45(3.38)	7.45	.000	[2.49, 4.26]

Notes. $N=1817$. Model Summary: $R=.62$, $R^2=.39$, $p=.000$.

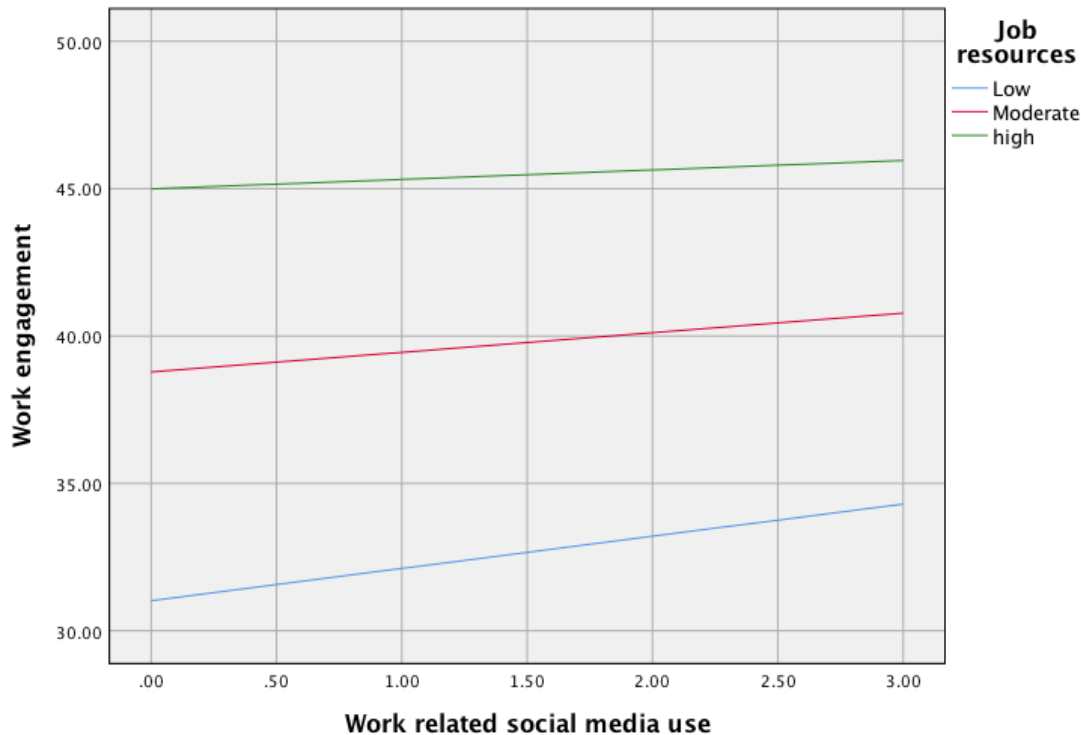


Figure 3. *The moderation effect of job resources on the relationship between work related social media use and work engagement.*

The third hypothesis stated that the positive relationship between work related social media use and work engagement is stronger among the employees of the Millennial generation than among the employees of the older generation. To test this hypothesis moderation analysis was run so that dependent and independent variables stayed the same than for hypothesis 2 testing but the moderator variable changed into age groups variable. Gender was controlled in this model as well. The results did not support the hypothesis 3 as they suggested that the positive relationship between the two variables is stronger for employees of the older generations than for Millennials. However, the moderation of age group variable in the relationship between work related social media use and work engagement is non-significant ($B=-.53, p=.260$) as the slopes of regression lines for both age groups are so close to the same that the difference is not statistically significant. The results for the third model are displayed in Table 5 and Figure 4.

Table 5.

Results of moderation analysis, work engagement as a dependent variable.

Variable	<i>SE(B)</i>	<i>t</i>	<i>p</i>	<i>95% CI</i>
Constant	1.62(25.85)	15.95	.000	[22.67, 29.03]
Work related social media use	.75(2.52)	3.36	.001	[1.05, 4.00]
Age Group	.86(3.60)	4.21	.000	[1.92, 5.28]
Work related social media use x Age group	.47(-.53)	-1.13	.260	[-1.46, .39]
Gender	.56(3.42)	6.07	.000	[2.31, 4.52]

Notes. $N=1817$. Model Summary: $R=.24$, $R^2=.06$, $p=.000$.

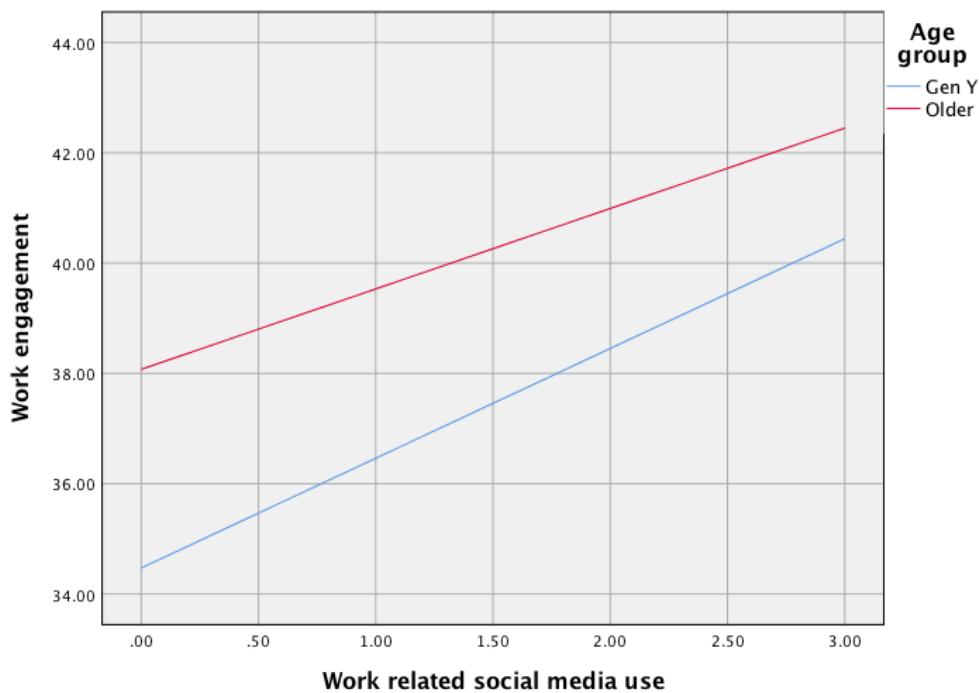


Figure 4. *The moderation effect of age groups on the relationship between work related social media use and work engagement.*

8. Discussion

Worklife is rapidly and continuously changing alongside with technological developments and new types of jobs and workplaces. Especially information based expert jobs are becoming more common and technology keeps speeding up the rhythm in all kinds of jobs. Additionally, traditional nature of workplaces is changing, partly because of the Covid-19 pandemic. People are working more and more from home remotely out of the physical workplace as technology and social media have enabled it. With this big worklife revolution, there will and need to be changes in how we think and strategize employee well-being. One important form of employee well-being is work engagement, which together with work related social media use has been the main interest in this master thesis.

8.1. Summary of the results

This master thesis has demonstrated the positive relationship between work related social media use and work engagement. The first hypothesis, stating that there is a positive relationship between work related social media use and work engagement, was supported by the results of my data analysis. The more work related social media was used the higher levels of work engagement was reported. This is in line with most of the previous studies (e.g. Oksa et al., 2020; Oksa et al., 2021b; Van Zoonen et al., 2017).

The second hypothesis stated that job resources moderate the relationship between work related social media use and work engagement so that less job resources one has the stronger the positive relationship between work related social media use and work engagement is. The results supported the hypothesis as they suggested that the relationship between work related social media use and work engagement is stronger among those employees whose job resources are low compared to employees with higher job resources. It might be then that work related social media actually act as a useful job resource for employees and thus help more of those employees who experience lower levels of job resources.

The third hypothesis suggested that age of the employee would moderate the relationship between work related social media use and work engagement so that the relationship is stronger for employees of the Millennial generation than for older employees. Interestingly it seemed like the positive relationship between work related social media use and work engagement was higher for older generations than it was for Millennials. However, the results for the hypothesis 3 model were not statistically significant. The reason for non-significant results might be in fact that the experience of work engagement and the perceptions of social media use are more of personal matters than an age related issues.

8.2. Discussion about the results in a light of previous literature

As social media and their work related applications are continuously developing and becoming more and more popular, the research about their impact is highly relevant. The topic has already been an interest of researchers and supposedly the interest is only raising. The results obtained in the previous research as well as in this particular master thesis are good news for today's organizations and employees: work related social media use certainly can have a positive impact on work engagement.

This current master thesis demonstrated significant positive association between work related social media use and work engagement. These results are in line with previous research (Oksa et al., 2020; Oksa et al., 2021b, Van Zoonen et al., 2017). However, even though an empirical research mostly supports the positive relationship between work related social media use and work engagement, there are some studies that have found results contrary to this (Van Zoonen et al., 2016; 2017). Social media have suggested to positively relate to work-to-life and life-to-work conflicts (Van Zoonen et al., 2016) which again are likely to create an emotional exhaustion which usually weakens work engagement. This is a possible scenario especially with employees who are really committed to their work and find it hard to distance themselves from it during their spare time. The easiness of

social media and their connections to work can make the distancing oneself from work even harder. It is possible that work related social media have a negative impact on work engagement through boundary conflicts, emotional exhaustion, and difficulties to distance oneself from work (e.g. Bucher et al., 2013; Van Zoonen et al., 2016). Yet, a direct relationship between work related social media use and work engagement has mostly found to be positive (Oksa et al., 2020; Oksa et al., 2021b).

Now the interesting question here is, why does this positive relationship between work related social media use and work engagement exist? As we know, conceptually work engagement contains three behavioral components: vigor, dedication, and absorption (Schaufeli & Bakker, 2004). Social media can, for example, enable employees to easily contact their coworkers without interrupting the work flow, make finding information easy and energy saving, as well as promote connectivity and sense of proudness of work community. All these functions, and much more, can increase the levels of the different components of work engagement.

In addition, work engagement is highly motivation related concept (Bakker & Leiter, 2010). As work related social media allow employees easily and quickly to connect with people and gather information, they can help individual workers to fulfill their psychological needs for relatedness, competence, and autonomy (Cagné & Deci, 2005; Ryan & Deci, 2017) at work. Belonging in a community is a one important aspect of the psychological need for relatedness. Work related social media are positively associated with, for example, organizational identification and social support (Oksa et al., 2020) which can create a feeling of community among the employees helping them to satisfy the need for relatedness. The feeling of competence then, could be accomplished by learning to use new social media channels or publishing professional work out on there, whereas the feeling of autonomy can be created by the social media enabling remote work. The baseline here is that the fulfillment of these psychological needs enhances well-being and can activate a motivational state of mind (e.g. JD-R model by Demerouti et al., 2001; Deci, 1975; Cagné & Deci, 2005; Bakker, 2011)

to boost a construction of work engagement, and work related social media can certainly help to achieve this fulfillment.

The current study presented support for work related social media's positive impact on work engagement by the results obtained in a linear regression analysis. The positive relationship was found even when job resources, age, and gender were controlled for. Yet, the size of an effect was rather small as job resources did have a quite large effect on the appearance of work engagement. This, however, has been noted already in previous research as job resources, such as social support, has found to be some mediating factors in the relationship between work related social media use and work engagement (Oksa et al., 2020; Van Zoonen, 2017). Largely, the easy and quick ways to connect with people is one of the main reasons for work related social media use (Schmidt et al., 2016) and it seems like one of the major factors affecting in the relationship between the work related social media use and work engagement.

Job resources have found to be one of the main antecedents for work engagement with these two having a positive relationship (e.g. Demerouti et al., 2001; Bakker et al., 2007; Bakker, 2011). The relationship between job resources and work related social media then is interesting as they do positively correlate with each other. It certainly could be that work related social media act as a one type of job resource to improve work engagement. For example, social support fits into a job resources category (Albrecht, 2015) and, as it was suggested above, social support is one positive aspect related to work related social media (Oksa et al., 2020). This idea of social media as a job resource would explain my results suggesting that work related social media might be more beneficial for individuals with fewer job resources than individuals with more job resources as work related social media add one more resource to a resource bank of employees. If the bank is very empty (i.e. resources are low) the work engagement would likely to be low whereas when the bank gets filled with one more resource (i.e. work related social media) the relationship gets stronger, like suggested in prior literature (e.g. Van Zoonen et al., 2017; Oksa et al., 2020; Oksa et al., 2021b).

Since the Covid-19 pandemic hit the World, remote work has become one of the top topics in working life. During the pandemic, many employees have suffered from psychological distress because of the long going remote work situation. Even then the positive relationship between work related social media use and work engagement has stayed quite stable (Oksa et al., 2021b). Throughout the pandemic time work related social media have probably been used more than ever before and their benefits for easy communication and connectivity have become familiar for plenty of organizations and employees. Especially now that managing work is changing slightly more towards self-managing, easy availability for social support and connectivity is above important. Many workplaces today also use group and teamwork practices and, for example, the members of project teams can be easily connected with each other through social media. The easy access of communication tools and efficient way to be in contact with people in different places certainly can make work more simple and fluent.

While work related social media can act as a resource for some people it can also act as a demand for others. The different motivations for social media use can indeed affect the ways individuals feel about it, thus having an impact on how work related social media use is connected to each individual's work engagement. Generally, those whose motivations for social media use are intrinsic enjoy the use and see benefits in it (Oksa et al., 2021a). Overall then the intrinsically motivated social media users can satisfy their psychological needs, for example, for relatedness and competence which again contributes the increase in positive state of work engagement. On the other hand, extrinsically motivated social media users are not enjoying the use as much and do not necessary feel the fulfillment of their psychological needs through social media (Oksa et al., 2021a) which then does not result as a positive effect of work related social media use on work engagement.

In addition to different motivations, demographical factors may have an influence on the use of work related social media and its effect on work engagement. One of those demographical factors could be individual's age, or generation he or she grew up in. In this current thesis two different

generations were investigated: Millennials or Generation Y and the older generations. The distinctions were based on previous literature suggesting that Millennials are the first generation to grow up with technologies and their rapid developments and thus can be called digital natives while previous generations were less or more forced to adapt to technological developments (Wey Smola & Sutton, 2002; Wong et al., 2008). This likely influences the way the generations use technologies and social media. Hypothesis proposed that the relationship between work related social media use and work engagement was stronger for Generation Y than the older generations as previous literature suggested that Millennials use social media more (Wey Smola & Sutton, 2002; Oksa et al., 2021a) and thus it could be proposed that it naturally affected their work engagement more as well. Yet, the results obtained were interesting as they suggested that the relationship between work related social media use and work engagement would be actually stronger for older employees than for the Millennials. However, the results were not statistically significant.

A one reason for results contrary to hypothesis can be the same than the support used for the hypothesis: Millennials' higher overall levels of social media use. As Millennials are wired almost every hour of their awake time, they are more likely to experience some type of overload from social media than their older colleagues who use social media less (e.g. Bucher et al., 2013; Oksa et al., 2021a; Oksanen et al., 2021). Thus, it can be that for work related social media use to have a positive effect on work engagement it needs to be limited in certain extent so that it does not cause a strain via different overloads related to social media.

In addition, the possible reasons behind the nonsignificant results for hypothesis 3 can possibly be explained by a couple of reasons. First, it might be that the common properties of the Millennial generation can have affected the results. The Millennials are used to fast phased environment where constant connectivity through technology and social media shape their lives (Wey Smola & Sutton, 2002; Wong et al., 2008). They want to be socialized and collective group and often do this via social media. All this can make them prone even for distress and burnout and it might be possible

that work related social media's positive impact gets lost in the overall wired World of Millennials. Thus the relationship between work related social media and work engagement can be impacted more by these general properties of Millennials than by the social media use itself.

Furthermore, work engagement has suggested to be relatively stable personal state of mind (Mauno et al., 2007; Oksa 2021b). For example, some employees might have a more positive and proactive personality than others which then makes them more prone for higher levels of work engagement. Thus, even though Millennials might be more natural users of social media than the older generations, the perceptions of the helpfulness of social media use can be more of a personality related than an age related matter. Another reason for nonsignificant results for hypothesis 3 analysis could be found from the differences in the overall levels of work engagement between the generations. The results in my data analysis as well as results of previous studies (e.g. Oksa et al., 2021a) suggest that older generations experience higher overall levels of work engagement than Millennials do. It might be then that there are some other factors than work related social media use affecting the work engagement levels of the different generations.

Overall the results of my study as well as the results of previous research strongly suggest that work related social media use does have a positive impact on work engagement. The use of work related social media can be particularly beneficial for those employees whose job resources are on low level as the work related social media can act as a resource helping to boost work engagement. However, when considering this relationship, differences between individual employees' age and personality should be taken into account.

8.3 Limitations

Like in every research study, this master thesis as well had some limitations to consider when interpreting the results. First, the definition of work related social media use is a bit vague and hard to clearly distinguish from personal social media use. This might have confused the participants and

somewhat affect their answers. Second, as the data used was collected only in a one time-point instead of during a longer time period, there is a bigger chance of coincidence in the results obtained than if the data was collected longitudinally.

8.4 Suggestions for future research

As technology and social media only will keep growing in future, both in people's personal life and in work environment, it is crucially important to keep studying their impact on people and work. One of the important aspects of well-being at work is work engagement and as suggested work related social media can be a one thing having an impact on it. Now we generally know that work related social media can have a positive impact on work engagement possibly because of its resourcefulness (e.g. easy connectivity and way to gain social support). Thus, social media can act as a job resource and boost work engagement that way. However, the different ways that social media could be better utilized at work to boost employee well-being should be considered in future research.

Some literature about work and especially work engagement have introduced a concept of job crafting (e.g. Tims & Bakker, 2010) which refers to ways employees can actively change their work to make it more meaningful and feel more engaged. One way to craft one's job is, for example, to increase surrounding job resources to make work more manageable. As work related social media clearly can act as a resource for employees, it could be one quite simple way to craft one's job. For instance, an employee who felt like keeping in touch with coworkers about some important work issues is hard, could try to incorporate the use of work related social media in his or her work more. Of course, the possibility for it needs to be provided and allowed by the employer. However, social media could be a great job crafting tool. It would be interesting to see the results of longitudinal intervention study where work related social media were introduced to employees as a way to boost their work engagement and make their work load easier. In that way research could more confidentially state that work related social media indeed can increase work engagement.

As the nature of work has dramatically changed in a way where work now is probably more flexible and self-manageable than ever before, as the pandemic has forced people to work from home with limited social contacts, the question of employees' levels of work engagement when working from home is important. When job resources are likely limited and distractions from, for example, other family members happen during the day, maintaining work engagement can be in danger. Here work related social media could really be helpful. As suggested by the results in this study, work related social media use might have stronger impact on those employees' work engagement whose job resources are low. This is something that future research definitely should look at as remote work might become almost a new norm, even after the pandemic.

In addition to work life changes in technology development and, hopefully, increased consideration of employee well-being, the age distribution of workers is shifting all the time. This means that there are more generations in one work place than before, which brings up a new challenge for organizations. Therefore, a research about the generational differences in work places is an important one. Especially a research about generational gaps in technology and social media use would provide significant information for organizations and their age management practices. Like it was suggested in this master thesis, there is some differences between the generations in how they use social media and how they feel about them so it might be that employees from different generations need a bit different management practices when it comes to technology and social media use.

8.5 Conclusion

This master thesis contributed to work engagement research by investigating the impact of work related social media on work engagement among the sample of Finnish workers in variety of occupational fields. Based on the results, work related social media can certainly have a positive impact on work engagement of employees. This is likely happening especially when work related

social media are experienced as a job resource that can help meet the demands of the work and make work more motivating. Organizations should find out ways to reduce the stressful aspects of work related social media and instead make them a resource for employees.

9. Appendices

Appendix A.

The eight items measuring job resources based on The Copenhagen

Psychosocial Questionnaire (CPSQII) (Pejtersen et al., 2010; Oksanen et al., 2020).

1. Can you influence on the amount of work assigned to you?
2. Do you have any influence on what you do at work?
3. How often do you get help and support from your nearest superior?
4. How often do you get help and support from your colleagues?
5. Is there a good atmosphere between you and your colleagues?
6. Do you feel part of a community at your place of work?

Never/Hardly ever [1]

Seldom [2]

Sometimes [3]

Often [4]

Always [5]

7. Can you use your skills and expertise at work?
8. Is your work meaningful?

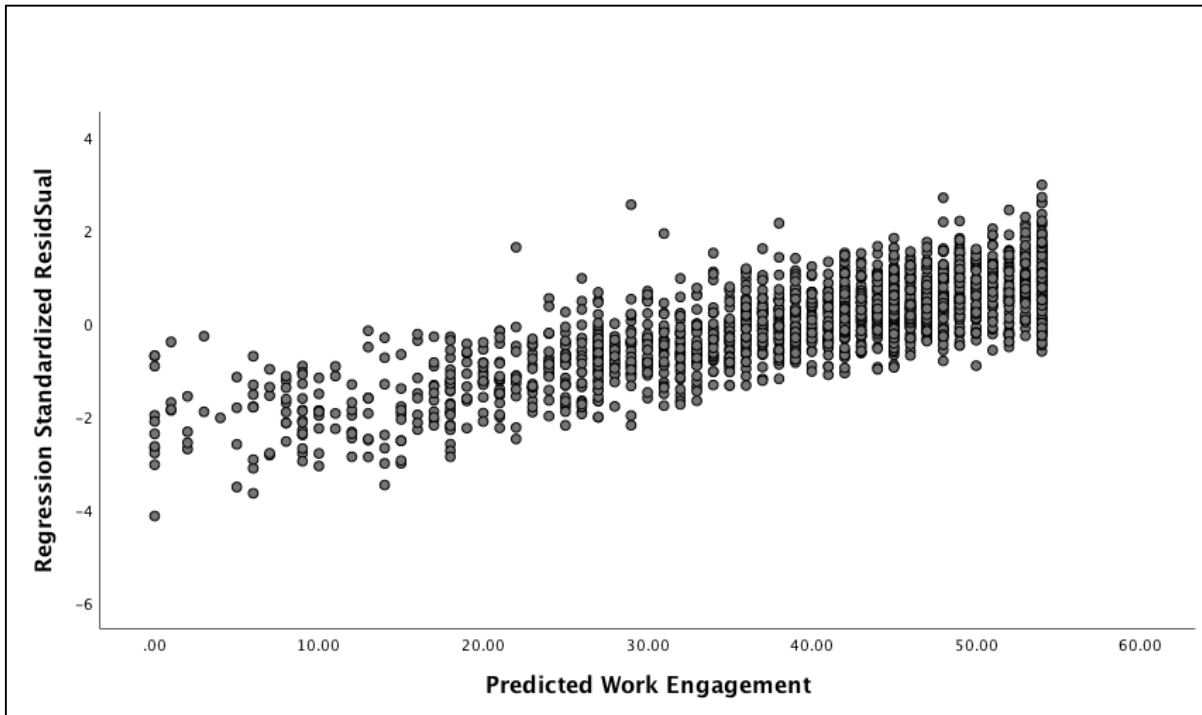
To a very small extent [1]

To a small extent [2]

Somewhat [3]

To a large extent [4]

To a very large extent [5]



Appendix B. *Scatterplot of regression residuals.*

Appendix C.

Collinearity statistics of the regression analysis.

	Tolerance	VIF
Work related social media use	.96	1.04
Job resources	.98	1.02
Gender	1.00	1.00
Age	.97	1.03

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