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**LEISURE CRAFTING:**  
The Outcome of Crafting for Mastery,  
Crafting for Meaning, Job Demands and  
Home Demands on Finnish Workers'  
Subjective Vitality

Faculty of Social Sciences  
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## ABSTRACT

### **Toropainen, Laura: LEISURE CRAFTING: The Outcome of Crafting for Mastery, Crafting for Meaning, Job Demands and Home Demands on Finnish Workers' Subjective Vitality**

Master's thesis of Social Policy, 54 p. + references and appendices.

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The aim of this thesis was to explore how two psychological mechanisms, mastery and meaning, are associated with subjective vitality through leisure crafting. In addition, I was interested in investigating whether home demands and job demands are enhancing or buffering the negative effects of leisure crafting (mastery and meaning) on subjective vitality. Theories of the DRAMMA-model, Finnish work-life trends, serious leisure and social acceleration provided a background for the thesis's central concepts and hypotheses. Crafting for mastery and crafting for meaning were expected to have a positive association with subjective vitality but crafting for mastery was expected to have a more negative association with subjective vitality than crafting for meaning. Home demands and job demands were expected to enhance the negative effects of leisure crafting (mastery and meaning) on subjective vitality.

The data was collected via an online survey for the purpose of the project namely "Making Leisure Work: Leisure Crafting as Active Recovery from Stressful Work" (Academy of Finland, principal investigator dr. Jessica de Bloom). The data consists of 541 respondents of which 85% are female respondents, 61% are over 50 years old and 50% have graduated from comprehensive-, vocational- or upper secondary school.

The measures of the thesis consisted of demographics and averaged variables. Crafting for meaning and crafting for mastery were based on a new scale of off-job crafting that was founded on the DRAMMA-model. The rest of the averaged variables, subjective vitality, home demands and job demands, were founded on the scales that have been tested in earlier studies. The thesis focused on examining relationships by quantitative methods including descriptive analyses, as well as linear regression analysis and moderator analysis.

The results showed that leisure crafting through psychological mechanisms mastery and meaning is beneficial for subjective vitality in general but crafting for meaning was in a stronger positive association with subjective vitality than crafting for mastery. Also, home demands and job demands were negatively associated with subjective vitality which supported the assumption of demands' enhancing negative effects of leisure crafting (mastery and meaning) on subjective vitality, but the result was not actually consistent with the hypothesis. In fact, even if the home demands were high, the level of subjective vitality remained almost as high as with the group of low home demands, if the group of high demands managed to craft for meaning highly.

The thesis shed light on leisure crafting's vitality effects from the aspect of the DRAMMA-model's psychological mechanism mastery and meaning, as well as examined home demands' and job demands' relationship to vitality among Finnish workers. The results give valuable insights into how leisure should be crafted in order to maintain a good level of well-being. Workers could benefit from the training related to the balance between leisure and work from the view of leisure crafting, because they might lack sufficient knowledge about the pros and cons of leisure behaviors. Future studies should focus on the motives of individuals' leisure behaviors and to investigate which factors affect individuals' leisure behaviors. A deeper understanding of leisure crafting's benefits would be also a useful topic of future study.

**Keywords:** DRAMMA-model, Finnish work-life, serious leisure, social acceleration, leisure intensification, subjective vitality, leisure crafting, crafting for mastery, crafting for meaning, home demands, job demands

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# TIIVISTELMÄ

## **Toropainen, Laura: LEISURE CRAFTING: The Outcome of Crafting for Mastery, Crafting for Meaning, Job Demands and Home Demands on Finnish Workers' Subjective Vitality**

Sosiaalipolitiikan Pro Gradu- tutkielma, 54 s. + lähdeluettelo ja liitteet.

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Tämän tutkimuksen tavoitteena oli tarkastella miten kaksi psykologista mekanismia, taidonhallinta ja merkityksellisyys, ovat yhteydessä subjektiiviseen elinvoimaisuuteen vapaa-ajan tuunauksen kautta. Lisäksi tarkastelin lisäävätkö vai vähentävätkö kodin ja työn vaatimukset vapaa-ajan tuunauksen (taidonhallinta ja merkityksellisyys) negatiivista yhteyttä subjektiiviseen elinvoimaisuuteen. DRAMMA-mallin, suomalaisen työelämän trendien, vakavan vapaa-ajan ja sosiaalisen kiihtymisen teorit taustoittivat tämän tutkimuksen käsitteitä ja hypoteeseja. Oli odotettavissa, että taidonhallinnan tuunauksella ja merkityksellisyyden tuunauksella olisi positiivinen yhteys subjektiiviseen elinvoimaisuuteen, mutta taidonhallinnan tuunauksen odotettiin olevan heikommassa yhteydessä subjektiiviseen elinvoimaisuuteen verrattuna merkityksellisyyden tuunaukseen. Lisäksi oli odotettavissa, että kodin ja työn vaatimukset lisäävät vapaa-ajan tuunauksen (taidonhallinta ja merkityksellisyys) negatiivista yhteyttä subjektiiviseen elinvoimaisuuteen.

Aineisto kerättiin nettikyselyn kautta projektille nimeltä ”Työn ja vapaa-ajan yhteensovittaminen” (Suomen Akatemia, päätutkijana tohtori Jessica De Bloom). Aineisto koostui 541:stä työntekijästä, joista 85 % olivat naisvastaajia, 61 % yli 50-vuotiaita ja 50 % vastaajista oli valmistunut peruskoulusta, ammattikoulusta tai lukiosta.

Tutkimuksen mittarit koostuivat taustamuuttujista ja keskiarvosummamuuttujista. Merkityksellisyyden tuunauksen ja taidonhallinnan tuunauksen summamuuttujien asteikot perustuvat uuteen asteikkoon vapaa-ajan tuunauksesta, joka perustuu DRAMMA-malliin. Loput keskiarvosummamuuttujista, subjektiivinen elinvoimaisuus, kodin vaatimukset ja työn vaatimukset, perustuivat edellisissä tutkimuksissa testattuihin mittareihin. Tutkielma keskittyi tutkimaan yhteyksiä kvantitatiivisin menetelmin mukaan lukien kuvailevat analyysimenetelmät, sekä lineaarinen regressioanalyysi ja moderaatioanalyysi.

Tulokset osoittivat, että vapaa-ajan tuunauksella on positiivinen yhteys subjektiiviseen elinvoimaisuuteen psykologisten mekanismien taidonhallinnan ja merkityksellisyyden kautta. Merkityksellisyyden tuunauksella oli kuitenkin vahvempi positiivinen yhteys subjektiiviseen elinvoimaisuuteen verrattuna taidonhallinnan tuunaukseen. Myös kodin ja työn vaatimuksilla oli negatiivinen yhteys subjektiiviseen elinvoimaisuuteen. Tämä tuki oletusta siitä, että vaatimukset lisäävät vapaa-ajan tuunauksen (taidonhallinta ja merkityksellisyys) negatiivisia vaikutuksia subjektiiviseen elinvoimaisuuteen. Tulos ei kuitenkaan ollut linjassa hypoteesin kanssa. Itse asiassa, vaikka kodin vaatimukset olivat korkealla, subjektiivisen elinvoimaisuuden taso pysyi lähes samana kuin sen ryhmän kohdalla, joka koki vähäisiä kodin vaatimuksia, jos merkityksellisyyden tuunaus oli myös korkealla.

Tutkielma valaisi vapaa-ajan tuunauksen elinvoimaisuusvaikutuksia DRAMMA-mallin psykologisten mekanismien taidonhallinnan ja merkityksellisyyden näkökulmasta, sekä tarkasteli kodin ja työn vaatimusten yhteyttä elinvoimaisuuteen suomalaisten työntekijöiden keskuudessa. Tulokset antavat arvokasta tietoa siitä, miten vapaa-aikaa tulisi tuunata siten, että sillä olisi positiivisia hyvinvointivaikutuksia. Työntekijät hyötyisivät koulutuksesta, joka tähtäisi kouluttamaan vapaa-ajan ja työn välisestä tasapainosta vapaa-ajan tuunauksen näkökulmasta, sillä työntekijöiltä saattaa puuttua riittävä ymmärrys vapaa-ajan käyttäytymisen hyvistä ja huonoista puolista. Tulevien tutkimuksien pitäisi selvittää paremmin yksilöiden vapaa-ajan käyttäytymisen motiiveja, sekä tarkastella mitkä tekijät vaikuttavat näihin motiiveihin. Lisäksi syvempi ymmärrys vapaa-ajan tuunauksen eduista olisi hyödyllinen aihe tutkittavaksi tulevaisuudessa.

Avainsanat: DRAMMA-malli, suomalainen työelämä, vakava vapaa-aika, sosiaalinen kiihtyminen, vapaa-ajan kiihtyminen, subjektiivinen elinvoimaisuus, vapaa-ajan tuunaus, taidonhallinnan tuunaus, merkityksellisyyden tuunaus, kodin vaatimukset, työn vaatimukset

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## 1. Introduction

*Nowadays when somebody asks “what have you been doing?”, and you answer “nothing much”, the reaction will most likely be “are you ok? Is everything fine?”. We, especially younger generations, live in a socially accelerated world where everything is constantly connected via technological devices. We experience phenomenon namely fear of missing out (FOMO) when we want to be in two places at the same time. Also, we experience demands both in home and in job domain due to our lifestyle including qualities of pressure and busyness. Similar behavior transfers to leisure, where we keep performing things with a lack of meaning. An active leisure lifestyle has become natural for us. Even our leisure activities have to be as much accomplishing, developing and serious as they can be without making us feel guilty. Life becomes a chain of projects in the job-, home- and the leisure domains, where we push our boundaries by attempting to perform with maximum efficiency in order to get satisfaction and yet nothing is enough for us. Due to the lifestyle that has speeded up, we readily focus on performance in Western societies. This gives us reason to reconsider our life choices and way of life, where leisure crafting can play an important role. If a worker’s job is taxing and demands at home are high, leisure time should be balanced. By crafting our leisure in off-job time, we have a chance to recover and detach from work. Thus, leisure crafting is detrimental in terms of well-being.*

The thesis tackles current challenges that workers meet on the interface between leisure and work providing valuable information about leisure crafting. The thesis is conducted as a part of the project “Making Leisure Work: Leisure Crafting as Active Recovery from Stressful Work” (Academy of Finland, principal investigator dr. Jessica de Bloom), where data is collected with online self-report questionnaires from Finnish workers representing different organizations. The project examines leisure crafting, which refers to things and values that individual emphasizes in his or her leisure behavior. It means proactive pursuits towards meeting the goals related to “human connection, learning and personal development” (Petrou & Bakker, 2016). The pursuit of personal goals can turn life into a more meaningful and purposeful way (Ho, Cheung & Cheung 2010, Iwasaki 2007). Practically leisure crafting refers to tailoring free time, such as hobbies, sports or travel (Petrou et al., 2017) consistent with individuals’ needs. According to scholars, leisure

crafting, along with leisure, affects well-being in a positive way and enriches individuals (Sirgy, Uysal & Kruger, 2017). Leisure can be seen as time outside of work (Sirgy et al., 2017) and freely chosen activities (Robinson & Godbey, 1997, p. 13) that are pleasant and intrinsically rewarding (Sirgy et al., 2017). I decided to conduct quantitative research about leisure crafting's associations to subjective vitality by using linear hierarchical regression analysis as my main method. The results of this research are drawn from the subjective experiences of vitality among respondents.

The scale of project's data of off-job crafting, that I am going to examine in relation to subjective vitality, is based on the DRAMMA-model proposed by Newman, Tay and Diener (2014), which consists of psychological mechanisms (detachment, relaxation, autonomy, mastery, meaning and affiliation). The model assumes that leisure promotes subjective well-being via psychological mechanisms (Newman et al., 2014). These mechanisms occur in the thesis's data in off-job crafting -scale, such as in the form of crafting for mastery and crafting for meaning in leisure. Mastery refers to mastering own experiences, such as skill management and participating in challenging activities. Respectively meaning refers to meaningful leisure activities by which individuals gain something valuable in life. (Newman et al., 2014; Iwasaki, 2008.)

According to Newman et al. (2014), meaning and mastery are found to correspond with Stebbins's theory of serious leisure in 14 academic references. Stebbins (1992) finds certain kinds of leisure participation practiced in a serious way or some activities to be more serious than others. Serious leisure implies "systematic pursuit of an amateur, hobbyist or volunteer activity that participants find so substantial and interesting that, in the typical case, can launch themselves on a career centered on acquiring and expressing its special skills, knowledge and experience" (Stebbins, 1992, p. 3). Newman et al. (2004) believe that psychological mechanisms, such as meaning and mastery, could be considered as mediating factors relating leisure to subjective well-being.

This research set a light on serious leisure's dimensions of mastery and meaning. Serious leisure has a positive influence on well-being (Munusturlar & Argan, 2016), but it also involves features that challenge the development of well-being. Especially the experiences of mastery in serious leisure require effort and commitment that might exhaust an individual's energy (KangJae & Sunhwan, 2018). As a result, individuals might lose themselves in demanding and challenging leisure activities which can be seen related to the theory of social acceleration by Hartmut Rosa (2003, 2013, 2017). According to him, people have speeded up their pace of life where they navigate to reach the best possible benefits of their actions. This raises the question that has the

pursuit of accomplishments overcame the experience of meaning in leisure activities or do people manage to experience both mastery and meaning through activities they engage to? Which one is more beneficial in relation to subjective vitality – meaning or mastery? Individuals should consider their leisure behavior profoundly in order to get the maximum advantage of leisure while avoiding the excessive taxation of human resources. Due to this, I am going to investigate crafting for mastery's and crafting for meaning's relationship to subjective vitality, which I expect to show the direction to the beneficial leisure behavior. The results of this thesis's will give new insights of leisure behaviors and crafting that help the individual to maintain an overall well-being or institutions to utilize solutions in the interface between many-sided characters of leisure and demanding work.

In addition, I want to find out how home demands and job demands interact with crafting for mastery and crafting for meaning in predicting subjective vitality. The reason for including home and job demands in the moderator analysis is that the project's data focuses on workers, whose time management, leisure behavior and the level of well-being are interesting research themes from the demands' point of view. Both home demands and job demands should be examined together because they influence hand in hand to every dimension of life (Peeters, Montgomery, Bakker & Schaufeli, 2015). The leisure domain does not become counted among the home domain in this research, although the home domain is often considered as a part of the leisure activities. I will also examine demographics (age, gender, educational level, occupational level and domestic partner) as control variables in order to add social political and socioeconomic foundation for my research frame. The focus will not be on background variables, but they rather frame the research into a more comprehensive study.

In the following chapters, I am going to present the thesis's central concepts and theoretical frame including the overview of the earlier research related to the thesis's concepts, after which I present the aim of the research including research questions, hypotheses, data and measures. Then I move on to the data analysis -section, where I introduce the methods for statistical tests. After that, I deal with the results. I will end the thesis to the discussion including the interpretation of results, research strengths and limitations, practical implications, future research and conclusions.



## 2. Theoretical frame and central concepts

In order to provide a background for the research, I want to present trends of the working life and specifically of the development of Finnish working life as the research population consists of workers from Finland. The introduction to working life trends widens the reader's perspective of workers' job situations, which might explain also respondents' leisure behavior. The thesis focuses on investigating mainly relationships between research topics, which are consistently presented in the following literature review. First, I will discuss the relationship between leisure and well-being in general to introduce the research's target variable - subjective vitality. Then, I will look closely at leisure crafting, meaning and mastery and their well-being effects. After that, I present a theoretical frame of serious leisure, social acceleration and leisure intensification, that sheds light on human behavior in the leisure domain and society overall. I will also explain why serious leisure, meaning and mastery are related to each other. The relationships between job demands, home demands, leisure crafting and well-being, as well as demographics and well-being are introduced finally in the literature review as these topics are related to the research questions.

### 2.1 Finnish working life trends

Nowadays the characteristics of Finnish working life are represented by stress, time pressure, fatigue, odd jobs and injustice (Julkunen, 2008, p. 9), as well as information overload, discontinuity of workdays and the expansion of workdays (Lehto, Sutela & Miettinen, 2006). These factors set risk for psychological symptoms (Lehto et al., 2006), which have yet become a more visible phenomenon in working life in the consequence of increased mental demands of work. Indeed, today's work requires even intellectual aspects from an individual, such as originality and initiative, which consumes the individual's human resources at work. (Julkunen, 2008, p. 10 & 16.) Pyöriä and Anttila (2017) emphasize that the negative characteristics of Finnish working life presented in the media's platforms are prone to strengthen the public's negative image of Finnish working life trends. For example, the fragmentation of working life is often on the media's table, but in reality, the majority of workers are working under the permanent work contracts (Sutela, Pärnänen & Keyriläinen, 2019, p. 68). Hence, the negative characteristics of Finnish working life should be approached critically, but it is also important to pay attention to the downsides of working life especially in this thesis where workers' job demands are being measured.

There is a certain kind of infinity in today's work, which refers to a situation where a worker feels that his or her workload never ends, neither he nor she knows when the work is fully completed (Järvensivu, 2010, p. 48). The experience of insufficient work time also blurs the line between work and leisure (Julkunen, 2008, p. 9; Lehto et al., 2006). Also, due to digitalization in working life, the work is leaking to the leisure domain when the work is performed at home via technological devices, which sets the challenge for the labor protection and the workers' recovery, and leads to the experience of busyness also in the leisure domain (Sutela et al., 2019). The meaning of work disappears when the increasing content of work is linked to the continuous reorganization of personal work (Järvensivu, 2010, p. 267). Järvensivu (2010) claims that today's work is more distinctive and personal, as well as controlled and devoted in a new way (p. 277). She also claims that workers have shifted from one job to multi-employment and from one organizational role to multi-role. (Järvensivu, 2014.) This all requires work engagement, but since workers experience job insecurity, the engagement does not increase (Pyöriä & Anttila, 2017). As a result, working life has become even more challenging, contradictive and mythical in some sense.

The intensity of work is driven by neoliberal and technological factors. The globalization of Finnish working life after the recession in the 1990s has brought the trend of strong competition principles into the working life, including result monitoring, saving and profit-making. (Julkunen, 2008, p. 9; Sutela & Lehto, 2014, p. 230; Lehto & Sutela, 2009, p. 141; Lehto et al., 2006.) As a result, workers were forced to adapt to layoffs and decreasing job security. The pace of work increased when the economy began to recover in the private sector, and this showed as an intense work pressure also in the public sector, where resources were cut and still the number of work tasks were not reduced. (Lehto & Sutela, 2009, p. 142.) In addition, technological development has challenged the limits of human resilience in working life, which can lead to slowing down, downshifting or exhaustion (Järvensivu, 2010, p. 269).

The Quality of Work Life Surveys has investigated changes in working conditions over a time series from 1977 to 2018 by Statistics Finland. These surveys have indicated the most important findings of the development of Finnish working life. Lehto and Sutela (2009) have identified three large problematic developments in Finnish working life: "problems in the working conditions of the public sector, upper white-collar workers' problems of coping with work and problems of reconciling work and family life". They also point out that the majority of occupations have become white-collared. (p. 141—142.) Lehto et al. (2006) emphasize that the level of education, quality of health, job security and job satisfaction determine the level of well-being at work.

Busyness has consistently increased in Finnish working life during the past 40 years (Sutela et al., 2019, p. 133). In fact, the busyness of Finnish working life has increased more than in other European countries (Sutela & Lehto, 2014, p. 70—71). The newest Quality of Work Life Survey manifests that the current era of working life is surrounded by digitalization, which is one of the main reasons for busyness. Already 90 % percent of workers use technological devices in their work. This has led to the acceleration of work because experiences of the efficiency of work and the pace of work have increased. Due to the digitalization, the transparency and supervision of work have increased too. Female workers have experienced that the digitalization has added the negative effects of work more than male workers. Indeed, technological devices have caused for example interruptions to the work due to IT-problems. However, workers that work with robots have experienced the robots useful in the work. (Sutela et al., 2019, p. 102—104.)

Technological development, busyness and the demands of working life show in workers' well-being. According to the newest survey, one-third of the salary and wage earners report that the busyness causes harmful strain very much or rather much. For example, insufficient resources and interruptions at work cause busyness at work. (Sutela et al., 2019, p. 133—140.) Also, both physical and psychical symptoms, regarding for example tiredness and nervousness, have increased. The most commonly experienced risk factor at work in 2018 was work exhaustion. Even half of the workers reported their work mentally rather straining or very straining. (Sutela et al., 2019, p. 312, 216 & 128.) Based on the interviews of workers, scholars observed that nowadays recognizing the signs of exhaustion, as well as the capability for setting boundaries for oneself is required from the employee. However, this requires the skill for self-management and self-reflection. (Sutela et al., 2019, p. 258 & 216.) The negative effects do not show only on the individual's level, but also on the team's level. It has been mentioned in the Quality of Work Life Survey from 2008 that emphasizing individual working contributions and increased competition can lead to conflicts in social relationships and even workplace bullying (Lehto & Sutela, 2009, p. 142).

Different groups involved in working life experience working life in different ways. It has been interpreted that different generations of working life employ different kinds of coping strategies (Järvensivu, 2010, p. 270). In the data I examine, more than half of the respondents are over 50 years old. The Quality of Work Life Survey from 2003 also shows that older workers rate their health on average better than the working-age population as a whole. This is an interesting result if considering the fact that older workers are less educated compared to younger workers (Sutela & Lehto, 2014, p. 229). Therefore, it seems that educational background does not directly reflect

the quality of health, but rather the age does. Indeed, certain psychological symptoms are more common within the young working population than within the old working population (Sutela et al., 2019, p. 313). In addition, the majority of respondents are women in the data I examine. From that point of view, The Quality of Work Life Survey from 2003 shows that white-collar female workers in the public sector, in particular, are facing greater problems of well-being and job satisfaction compared to other workers, as they face high demands from different directions (Lehto et al., 2006). For instance, according to the newest survey, almost half of the female salary and wage earners experienced some sort of physical symptoms weekly. Also, especially among the female workers, the strain on the job has increased. (Sutela et al., 2019, p. 312 & 128.)

Even though it seems that the current working life is both demanding and straining, it has also strengths that maintain job satisfaction. According to the newest survey, more and more employees are experiencing immersion in work and excitement, and the majority of workers are satisfied with their work. Workplaces have become a more family-friendly and the role of fathers in childbearing has strengthened. Also, accidents at work have reduced, male worker's sick leaves have decreased and the need for working capacity rehabilitation has lowered. When it comes to the development of work, leadership has improved, and workplaces have become a more equal and diverse. In addition, there has been a change in workers' attitudes in the 2000s in relation to temporary contracts. Fewer and fewer experience temporary work as a source of job insecurity. In fact, workers are more prepared to change between jobs nowadays. (Sutela et al., 2019.) Within the international comparison, Finland stands out positively for instance in terms of low hierarchies, high social support, the flexibility of working hours, fair treatment, opportunities for development in working life, discussions between employers and employees, frequency of teamwork and possibility to influence one's work. In addition, female workers in Finland are the most high-educated compared to the rest of the female workers in the European union. (Sutela & Lehto, 2014, p. 229; Lehto & Sutela, 2009, p. 141; Sutela et al., 2019, p. 351.)

The leisure domain should be emphasized similarly as family and home domain when talking about workers. The importance of leisure activities has been significantly increasing since 1984 among workers (Sutela et al., 2019, p. 33). According to Statistics Finland's Leisure Survey from 2017, less time is spent on work, while the amount of free time has increased. The unemployment rate might also influence this result. More than half of the respondents consider leisure time very important, while less than one-third experience work very important. (Hanifi, 2019.) It seems that leisure time has increased for certain groups, but at the same time workers are experiencing increasing busyness and time pressure, which of course reflects the amount of leisure time

available. Is this a phenomenon where working life is segregated into winners and losers of leisure time benefits? I will not address this question any further in this study, but I will look at the benefits of leisure crafting in terms of the well-being among the workers represented in the data.

## 2.2 Leisure and well-being

Well-being reflects a fundamental state of a person's vitality consisting of psychological-, physical- and social well-being. These components combine with subjective feelings, environment, genetic influences and personality. (Robertson & Cooper, 2011, p. 4—10.) Leisure has a positive influence on well-being and health (Sirgy et al., 2017). Many people participate in leisure activities because they are inherently interesting and intrinsically motivating while serving also some future purpose (Caldwell, 2005). Participation in leisure activities offers also benefits. Ketteridge and Boshoff (2008) studied with an interpretive qualitative methodology that physical activities offered psychological, social, health, emotional and self-developmental benefits for the adolescent participants. Leisure is a source of supporting positive moods (Hills & Argyle, 1998) and stress management (Iwasaki, 2003; Kimball & Freysinger, 2003; Kleiber, Hutchinson & Williams, 2002) but it can also be a source of stress, such as through sports (Kimball & Freysinger, 2003). Leisure activities decrease a sense of loneliness and isolation while improving an individual's social networks (Toepoel, 2013; Pöllänen & Voutilainen, 2018). Leisure activities also improve self-esteem and support lifelong learning (Pöllänen & Voutilainen, 2018). They help people to find meaning and optimism in life even after a negative life event (Caldwell, 2005). One component of well-being, subjective vitality, is being investigated in this research as the main research target.

### Subjective vitality

Subjective vitality functions as the dependent variable in this thesis. Ryan and Frederick (1997) have defined subjective vitality as “a positive feeling of aliveness and energy - -”, but Bostic, Rubio & Hood (2000) note that it should not be mixed with the feeling of being “driven or compelled”. Subjective vitality is a reflection of well-being representing an essential factor in resilience, creativity, energy, enthusiasm and spontaneity (Ryan & Fredrick, 1997). Subjective well-being is generally defined as the subjective experience consisting of mental or physical aspects (vanDijk, Schirmbeck & Haan 2018) and it refers to “individuals' affective and cognitive evaluations of the overall quality of their lives” (Diener, 2000). The major contributor of subjective

well-being is life satisfaction (Diener, Inglehart & Tay, 2013). As I am focusing on subjective vitality in this research, the term “subjective” reflects only certain persons’ vitality.

Subjective vitality is related to Deci’s and Ryan’s (1985) theory of intrinsic motivation and Heider’s (1958) and De Charms’s (1968) theory of control that affects the person’s actions with or without intentional control, as well as actions that are performed by internal perceived locus of causality or external perceived locus of causality. Ryan and Fredrick (1997) argue that vitality is indeed linked to the energy “that is perceived to emanate from the self” and thus it refers to the internal perceived locus of causality, where the action derives originally from the self. They also state that feelings of vitality should be accompanied by intrinsically motivated activities that offer pleasure, curiosity and novel experiences for the participant. However, one’s action can also be motivated by externally caused sources such as a threatening boss or mood swings, which will not lead to vitality.

Ryan and Fredrick (1997) argue that subjective vitality has links with psychological well-being including a person’s personality traits and dispositions, as well as physical well-being including physical functioning, such as pain and somatic factors. They also point out that the amount of subjective vitality might depend on how a person relates towards an impaired physical state, for instance, if the person experiences pain. Vitality has been negatively associated with people suffering from chronic pain and positively associated with self-motivation and maintained weight loss. Also, negative feelings such as anxiety or pressure, harmful somatic factors and health-related stressors are expected to be loosely related to vitality. They have found that subjective vitality correlated positively for instance with self-actualization, self-esteem, extraversion, conscientiousness, warmth, positive affect, activity and mental health, and negatively with anxiety, physical symptoms, neuroticism, gregariousness, assertiveness, excitability and depression.

### 2.3 Leisure crafting, mastery and meaning

Leisure crafting is a proactive effort that the individual can decide to do in order to reach personal goals during leisure. Crafting gives the individual an opportunity to consider the engagement to the activity before taking the action. Thus, it helps the individual to engage in such activities that support an individual’s personal “learning, human connection and personal development” (Petrou & Bakker, 2016). Leisure crafting’s relationship to subjective vitality is examined through two psychological mechanisms - meaning and mastery.

Meaning and mastery are two components differencing from each other and they presumably have a different relationship to subjective vitality. An interesting question would be that are mastery and meaning excluding each other or are they existing both at the same time in leisure participation. At least Loveday's, Lovell's and Christian's (2018) study showed that the majority of respondents wanted to use their leisure for learning, improving and contributing to society, where the experience of mastery and meaning are both clearly involved. The existence of meaning-making through leisure together with mastery during leisure strengthens the idea that if the participant is experiencing both meaning and mastery, he or she is committed to an activity that brings challenge and meaning in life, and this will most likely have a positive impact on well-being. However, this research will not examine whether meaning and mastery exist simultaneously in one leisure activity. On the contrary, the research will indicate their well-being effects through leisure crafting.

### Crafting for mastery's relationship to well-being

Crafting for mastery means that the individual tailors his or her leisure in such a way that the leisure activity gives mastery experiences, which fulfills an individual's needs and goals of leisure. Based on the Caldwell's (2005) study, people tend to engage in activities that offer a sense of competence, which heightens the chance to feel self-efficacy. According to earlier research, mastery in leisure activities promotes subjective and occupational well-being as it provides a sense of accomplishment, energy, feelings of control and flow experiences for participants (Newman et al., 2014; Pennonen, 2011). Feelings of mastery have been investigated to be related to positive activation (Demerouti, Bakker, Geurts & Taris, 2009) and negatively related to emotional exhaustion and depressive symptoms. (Sonnentag & Fritz, 2007.)

Mastery-related leisure activities are for instance practicing new sport or language or traveling to a foreign country (Pennonen, 2011). Learning has also been considered to represent one form of mastery and it has been studied that learning is associated with subjective well-being through cognitive processes in educational classes (Simone & Cesena, 2010). However, learning requires engagement and can thus be addressed as a demanding feature of mastery-related activities. According to Loveday's et al. (2018) study, mastery experiences among participants was opposite than "resting on laurels" and rather a state of recognizing and overcoming challenges.

Pennonen (2011) claims that although mastery-related off-job activities require effort investment, they should still challenge an individual without straining the individual's resources and

capabilities. According to Sonnentag's and Fritz's (2006) study, mastery experiences promoted recovery. Another Sonnentag's and Fritz's (2007) study also shows that mastery experiences promote recovery as mastery helps to develop "skills, competencies, self-efficacy and positive mood". However, they also point out that the engagement in mastery-related activities might cause an additional amount of demands on the individual (Sonnentag & Fritz, 2007), which might increase the need for recovery in some cases.

### Crafting for meaning's relationship to well-being

Crafting for meaning means that the individual tailors his or her leisure in such a way that the leisure activity becomes meaningful, which fulfills an individual's needs and goals of leisure. Crafting for meaning enables a sense of choice before taking the action. In other words, participants can search for an activity that brings the most meaningful sense of it. (Newman et al., 2014.) This kind of manner has been studied to lead to well-being (Newman et al., 2014; Iwasaki, 2007). According to Blackshaw (2010), leisure is mentioned to be found as a driving force toward "the human goal of satisfying our hunger for meaning and our thirst for giving our lives a purpose" (p. 120). Thus, the experience of meaning becomes indeed vital for our lives.

Sheldon, Elliot, Kim and Kasser (2001) argue that meaning is related to self-actualization, which offers a feeling that the person can utilize the best potentials and turn life into a more meaningful way rather than into a state of stagnancy. Meaningful activities promote positive emotions and life satisfaction while reducing negative emotions (Newman et al., 2014). Fredrickson (2002, p. 130) suggested that positive emotions can be achieved by finding positive meaning. Individuals can find positive meaning within leisure activities that support relatedness, personal achievement and detach from daily cares. According to Iwasaki (2007), the benefit of meaningful leisure involves both "remedying the bad" and "enhancing the good".

Religious activities, such as prayer or meditation, can be viewed as a meaningful activity (Newman et al., 2014). Engaging in productive activities and interpersonal relationships that are meaningful and purposeful are expected to maintain the link to subjective well-being. (Newman et al., 2014.) Meaning-making, as well as finding meaning during leisure are linked to positive identities, positive self-esteem, social connections, cultural connections and human development (Iwasaki, 2007). According to scholars, the preference for meaningful activities grows in later life (Nimrod, 2010; Brown, McGuire & Voelkl, 2008).



In Loveday's et al. (2018) study, the importance of meaning is essential during leisure, although it was not being referenced a high proportion of the total sentences in texts (11%). The study was conducted with conduct analysis by coding of the best-possible-selves texts sentence by sentence. Similarly, Sheldon et al. (2001) found that their study's participants found meaning to be less important psychological needs based on the participants' description of "most satisfying events" within their lives and the rating of the salience related to other needs, such as autonomy and competence. It might be that people are not that aware of the benefits of meaning-making during leisure, which impedes their attitude toward meaningful leisure activities.

#### 2.4 Serious leisure, social acceleration and leisure intensification

Serious leisure is claimed to be psychosocially beneficial (Munusturlar & Argan, 2016), have positive influence on well-being (Nimrod, 2010) and lead to successful aging (Brown et al., 2008), although it requires time, energy and effort (KangJae & Sunhwan, 2018) involving some inconveniences, such as strong commitment and identify to an activity that some scholars call as a "cost" in a serious leisure (Chen, 2014; Haworth & Lewis, 2005). Due to the serious leisure's demanding nature, it can cause conflicts between family and leisure. According to the study of the participants in amateur theater, serious leisure participation was linked to two divorces among the twenty-five respondents (Stebbins, 2004, p. 110) However Goff's, Fick's and Oppliger's (1997) study, that was conducted with hierarchical moderated regression analysis, showed that the spouse support in serious leisure participation can minimize the likelihood of conflict.

According to Nimrod (2010), participation in a serious leisure can become a "work replacement", as the participation requires commitment and perseverance, as well as belonging and identifying with a group that can result in exhausting rehearsals caused by a certain hobby. Also, Stebbins (2004) notes that belonging and identifying a certain group requires confidence and social skills to participate in a serious leisure activity. Thus, serious leisure has its unique requirements including the condition to commit to an activity and be prepared to encounter new people.

Some scholars reckon the possibility to end up in a situation, where worker experiences job intensification, and that behavior traces to the leisure domain (Haworth & Veal, 2004, p. 138—9; Parker, 1971, p. 101—102), which further leads to leisure intensification. Achievement-oriented workers might not limit their ambitions even outside the work domain, which leads to the pursuit of the activities that offer mastery experiences (Sonnetag & Fritz, 2007). Already loaded

individual might try to cram additional activities into his or her schedule to the extent where stress will be a result (Iso-Ahola & Mannell, 2004, p. 196). Other scholars, for example, Haworth and Lewis (2005), note that the existence of job intensification reduces time and energy for other activities in leisure. As a result, there might be an individual that does not experience much work demands or home demands and can happily participate in serious leisure activities, or an individual that does not have time and energy for serious leisure activities after loading work. On the contrary, there can be an individual that experiences high demands while putting lots of effort to serious leisure activities.

Rosa's theory of social acceleration (2003, 2013, 2017) fits well into the expression of the individual that experiences lots of pressure in different domains of life. The acceleration of social life in Western societies is due to technological change and capitalism, as well as encouragement to quick processes, efficiency and performance. People begin to consider time as scarce under time pressure. As a result, people have speeded up their pace in social life "in order to avoid the loss of potentially valuable options and connections". He calls that there is a mismatch between resources and temporal requirements on the to-do list, which can lead to behavior that seeks to get "two birds with one stone". In my estimation, this can lead to the intensification of life and thus to the intensification of leisure.

Even though there is not yet a clear link between serious leisure activities and leisure intensification, there still might be a chance that serious leisure causes leisure intensification because serious leisure activities require time, energy and effort (KangJae & Sunhwan, 2018). From another point of view, social acceleration can feed the positive mindset of an active actor to the individual and thus motivate the individual to engage in serious leisure activities that bring mastery experiences. In my opinion, serious leisure is a kind of reflection of social acceleration – they both empower each other by producing a societal mindset of an active actor that has a lot to give to its environment. In addition, to some extent the definition of leisure crafting including proactive pursuits towards the "human connection, learning and personal development" (Petrou & Bakker, 2016) adapts well to the equation between serious leisure, social acceleration, leisure intensification and mastery, which might endanger an individual's well-being in some cases. For example, it might not be the wisest decision to master skills in a busy life situation when the individual is exposed to various demands.

According to Iso-Ahola and Mannell (2004), human beings are naturally prone to explore and try new things, but "the adoption of an active leisure lifestyle becomes a psychological struggle as

people get older” (p. 189). However, another feature of serious leisure, which is crafting for meaning, can give space for the participant to consider properly whether the activity is meaningful or not. Hence, crafting for meaning ensures that the activities are meaningful which can prevent the individual to drift into multiple consuming activities simultaneously. Based on this interpretation, the balance between crafting for mastery and crafting for meaning would determine well-being. Hence, looking for beneficial qualities of leisure crafting, as well as emphasizing them becomes critically important.

### Serious leisure’s relationship to meaning and mastery

Mastery experiences, that are found in a serious leisure, refer to the experiences of new challenges and skill management which promote for instance self-actualization, growth and sense of accomplishment, whereas meaning is defended to be found in a serious leisure due to its condition to meaningful engagement. (Stebbins 1992; 1997; Newman et al., 2014; Loveday et al., 2018; Sonnentag & Fritz, 2007). As mentioned in the introduction, Newman et al. (2014) found links between serious leisure and mastery and meaning in 14 references from a total of 363 articles in order to find the mechanism relating leisure to subjective well-being. After searching for all 14 references, I personally found links in five articles. Next, I present these five articles shortly in order to introduce why serious leisure involves features of meaning and mastery.

First, Nimrod (2010) argues that the favor of meaningful activities grows when career’s and family care’s significance decreases. In such a way, leisure can become a replacement for work for older individuals, which turns leisure participation in serious leisure. Second, Brown et al. (2008) states that participation in a serious leisure brings up the role of meaning within the leisure activities that are intrinsically motivating, meaning that they bring favorable change in participants. Third, Iwasaki (2007) found the link between serious leisure and meaning on a theoretical level including certain mediators. For example, serious leisure can promote community’s quality of life through volunteering work in community. Here volunteering can be seen as a meaningful activity. Serious leisure can facilitate optimal human development, which was shown to be the mechanism that facilitates meaning-making through leisure. Fourth, Haworth and Veal (2004) claim that if the serious leisure participant, despite all the caused costs of a certain serious activity, decides to engage to an activity because it is meaningful, then the meaning of activity becomes crucial determinant ruling whether the participant will engage to serious activity or not (p. 204). Fifth, Kerr, Fujiyama and Campano (2002) found also the relationship between serious leisure and mastery. They claimed that the situation, where the individual seeks to take control over the

situation, refers to the mastery state. This state may be a motive for serious (telic) leisure group's functioning, whose leisure behavior is goal-oriented.

I found also that some references lacked proper links between serious leisure and meaning or mastery. These sources focused to deal only with mastery (Sirgy, Kruger & Lee, 2011) or serious leisure (Haworth & Lewis, 2005; Roberts, 2011; Heo, Lee, McCormick & Petersen, 2010; Iwasaki & Smale, 1998). Also, Haworth and Veal (2004) are dealing with mastery and serious leisure. According to them, human beings are oriented towards active leisure where they seek for challenges and attempt to master new experiences. They also write about serious leisure and its typical strive for skills and knowledge. (p. 189 & 201.) However, Haworth and Veal do not directly mention the link between serious leisure and mastery, but they describe similar features of mastery as within a serious leisure. Two of the sources did not exist nor did I find them after a proper search. Also, two other sources were not accessible.

Seems that Newman's et al. (2014) quantitative literature search from a total of 363 articles focuses on finding keywords from each article but the qualitative analysis of the links, for example, the link between serious leisure, meaning and mastery, has not been investigated. Also, searching for the word "meaning" can be a bit misleading because it is often used in a text to imply something. Thus, finding the word "meaning" from literature search does not directly mean that it would refer to the significance, which is a synonym of the meaning. However, the articles presented above create a sufficiently strong explanation for why meaning and mastery are related to serious leisure.

## 2.5 Job demands, home demands, leisure crafting and well-being

Leisure is not the only sector of human life. As the project fundamentally consists of employed people, they are certainly encountering home demands and job demands in their mundane life. According to Peeters et al. (2015), certain demands are domain specific, which supports to examine home and job domain separately from each other. Similarly, Sonnentag and Zijlstra (2006) state that home and job demands are independent from each other as job demands and housework were not significantly related to each other based on their research.

However, home and job domains are also affecting each other. For example, if work conditions are demanding and stressful, load reactions are more likely to spread out to the home domain (Geurts & Sonnentag, 2006). Similarly, Peeters et al. (2015) state that home demands, that require

much of effort, causes negative load on individual and can spread out to the work domain. While job demands are causing strain and negative outcomes in terms of well-being, home demands can be enjoyable to some extent depending on an individual's approach and the quality of motivation towards homework (Pennonen, 2011), but they can also cause excessive constraint in addition to work (Peeters et al., 2015).

### Home and job demands' relationship to well-being

Stressful working conditions are common in today's working life (Spector & Jex, 1998) and work-related stress together with burnout are universal problems in many countries (Demerouti et al., 2009). Job demands can be reflected through the Job Demands-Resources model (JD-R), which explains the job features' link to well-being. Job demands imply features that require constant physical, psychological, cognitive and emotional efforts from the worker. They can turn into demanding when crossing the line even though they are not intrinsically bad. However, there are also job resources that support a worker's well-being at work. (Demerouti, Bakker, Nachreiner & Schaufeli, 2001; Schaufeli & Bakker, 2004.) These resources function as a balancing force toward job demands.

In other words, a job is not always intrinsically a threat to well-being, but it has noted to contain features that can turn into risky demands in terms of well-being. For example, Totterdell's et al. (2006) study, that used a time-sampling methodology within the self-employed individuals, showed that high work demands were associated with greater anxiety and depression. Also, Teuchmann's et al. (1999) study, that used an intensive measurement approach, examined that time pressure at work was linked to emotional exhaustion and negative mood. Time pressure is also linked to high workload. The JD-R -model can be applied also to how home demands influence well-being.

Constant exposure to stressful demands is a risk to health and well-being (Demerouti et al., 2009). Psychological detachment from work and the absence of stressors are requirements for recovery processes and thus improved well-being (Geurts & Sonnentag, 2006). The study from Spector & Jex (1998) showed that interpersonal conflicts, organizational constrain, workload and physical symptoms correlate with job stress and are thus relevant to psychological well-being at work. Based on the Pennonen's (2011) mediation analysis of Finnish employees, job demands were linked to poor psychological detachment from work, which in turn was related to fatigue at work.

Peeters et al. (2015) found in their research, that was completed by using confirmatory factor analysis, that both home and job demands have a link to burnout among Dutch workers. The positive link between job demands and burnout have also been identified in earlier studies (Hakanen et al., 2008; Schaufeli & Bakker, 2004). At the same time, job demands increase the need for recovery, which has been found also in several studies (De Raeve, Vasse, Jansen, van der Brandt & Kant, 2007; Jansen et al., 2003; Machin & Hoare, 2008; Van Der Hulst, Van Veldhoven & Beckers, 2006; Sonnentag & Zijlstra, 2006).

According to Sonnentag (2001), housework requires other resources compared to those needed in job-related duties. He explored that household and child-care activities were unrelated to situational well-being before going to sleep. The study was conducted with multilevel analyses. Similarly, Sonnentag & Bayer (2005) found in their study, that was conducted also with multilevel analyses, that household activities were unrelated to fatigue at bedtime. Thus, housework might not bring any additional demands to the individual, which does not increase the need for recovery.

Indeed, Sonnentag and Zijlstra (2006) found that household activities were not related to the need for recovery in their daily survey study. However, home demands are not always beneficial for well-being. There are also exhausting household activities that consume an individual's resources (Sonnentag, 2001). Workload, person's own inclination towards housework and whether the housework is performed due to a person's own initiative or spouse's request affect how the home demands are experienced (Pennonen, 2011). Some individuals experience home demands positively and other individuals negatively (Sonnentag, 2001).

### Home and job demands' relationship to leisure crafting

During the period of high demands, the likelihood of the opportunity to relax and detach from work decreases (Sonnentag & Bayer, 2005). This kind of result can be expected also in leisure crafting behavior: when demands grow, leisure crafting decreases. According to Pennonen (2011), job demands can decrease mastery experiences during leisure time. If job demands are high and job resources low, the job strain will develop as job demands consume workers' mental resources and physical resources (Bakker & Demerouti, 2007), which can lead to the situation where individuals do not have enough resources left for mastery experiences, such as tackling new challenges during leisure time (Pennonen, 2011).

However, passive activities can be helpful for individuals that lack resources (Iso-Ahola & Mannell, 2004, p. 192), which, instead of challenging, can be meaningful activities being crafted. Leisure crafting was unrelated to demanding house situation based on the study of 80 Dutch employees completed with multilevel regression analysis. However, leisure crafting was pronounced during high job demands. (Petrou & Bakker, 2016.) In other words, there will be less leisure crafting if demands, especially if home demands grow, which presumably leads to weakened well-being. Also, if trying to force active leisure to happen from those who already experience high demands, it may lead to impaired stress (Iso-Ahola & Mannell, 2004, p. 196) and thus to weakened well-being. For those people, gaining better control over time and strengthening personality dispositions are more recommended than the participation in leisure activities (Haworth & Veal, 2004, p. 139). While some scholars have investigated that leisure crafting and mastery experiences decrease while experiencing demands, other scholars remind of the danger where job demands spill over to the leisure domain. I think there is a chance that job demands modify our leisure behavior and leisure crafting into a more unbeneficial way if load reactions and busyness reach leisure time.

## 2.6 Demographics and well-being

The examination of background variables is important because social differentiation exists in relation to aspects of diversity, such as social class, power and status, which causes unequal distributions in terms of subjective well-being (Yu & Blader, 2019). In the following paragraphs, I will list studies that examine the relationship between well-being and background variables. Demographics, which are presented below, reflect those background variables that are selected as a part of the research frame and are being investigated in results. I wanted to choose those demographics into the examination that seemed relevant in relation to the investigation between leisure crafting, home demands, job demands and subjective vitality, although I only investigate the relationship between demographics and subjective vitality.

### Background variables' relationship to well-being

First, I selected gender, specifically binary gender, into the examination among other demographics. Gender is a fruitful factor to be examined from the view of well-being especially when we talk about imbalanced roles that men and women share in different domains of life. Peeters et al., (2015) study found that home demands were related to burnout among Dutchmen

whereas job demands were related to burnout among Dutch women. Differences in well-being between men and women limits not only to home domain and job domain, but also extends to different life events such as widowhood, leisure goals, retirement and marriage (Iwasaki and Smale, 1998).

Second, I selected age into the examination among other demographics. The level of well-being changes during a lifetime. Physical and cognitive function, disease, engagement with life, activities, social networks and losses (Warren, 1998; Bennett & Soulsby, 2012) are examples of determinants of the relationship between well-being and age.

Third, I selected educational level into the examination among other demographics. Education affects well-being indirectly by providing, for example, higher incomes (Helliwell, 2003) that presumably have an influence on well-being. The benefits of education in terms of well-being are for instance resilience (KangJae & Sunhwan, 2018), increased participation, perceived trust, growing health (Helliwell, 2003), a sense of control, autonomy and a broad view on life (Jongbloed & Pullman, 2016). Scholars also state that education unequally distributes well-being in society (Jongbloed & Pullman, 2016).

Fourth, I selected a domestic partner, specifically the investigation of having a child or children, or a spouse living in the same household, into the examination among other demographics. The relationship between spouses and the level of well-being have been studied by various scholars. Based on the studies, personality (Ruiz, Matthews, Scheier & Schulz, 2006), marriage (Iwasaki & Smale, 1998), transition to parenthood (Roeters, Mandemakers & Voorpostel, 2016), parental practices, interaction in the family (Coser, Martinez & Pamplin, 2013), family's social support and strain (Thomas, Liu & Umberson, 2017), and even vision impairment among older couples (Strawbridge, Wallhagen & Shema, 2007) affected spouses' well-being. The research of how having a child or children affects well-being in families has not been investigated largely, but the emphasis has rather been on the determinants that influence families' well-being overall. Scholars from Finnish Institute for Health and Welfare have investigated that well-being between the families is distributed by factors such as family size, the state of parenthood, constraints in parent's working life, socioeconomic factors, lifestyle, economic situation and access to the services intended for the families. For instance, the risk for poverty increases in a family with a single parent or with many children. (Lammi-Taskula & Karvonen, 2014.)



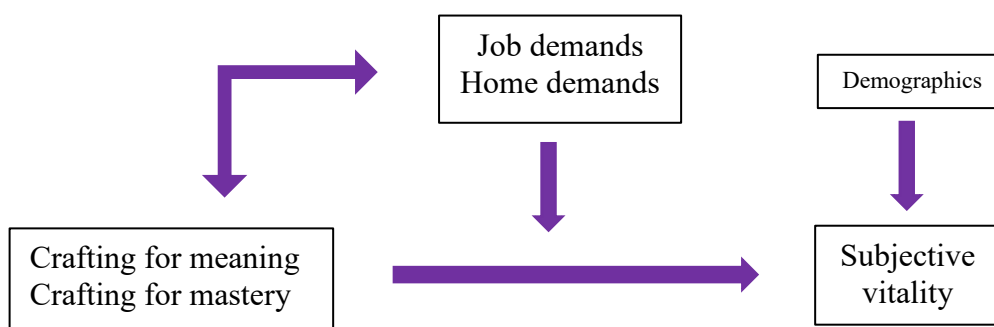
Fifth, I selected occupational level into the examination among other demographics. The relationship between occupational level and well-being have been researched in many studies. Based on previous studies, socioeconomic status (Saloniemi, Romppainen, Strandh & Virtanen, 2014), occupation's security level (Dembe, 2005, p. 397 & 407) and workload (Zeike, Choi, Lindert & Pfaff, 2019) including physical workload (Andersen, Fallentin, Thorsen & Holtermann, 2016) affected workers' well-being.

### 3. The aim of the research

This research will show how crafting for meaning and crafting for mastery are associated with subjective vitality among Finnish workers from Pirkanmaa region who have responded to the project's online survey on the first measurement time. I will also find out how home and job demands, as well as crafting for mastery and crafting for meaning interact with each other in predicting subjective vitality. The research will direct the attention to how these workers experience subjective vitality when they perform leisure crafting, as well as how they are affected by home and job demands. The investigation of demographics will provide a background for actual research questions, for instance how demographics are associated with subjective vitality among research population.

The research questions are following: 1) *How are crafting for meaning and crafting for mastery associated with subjective vitality among workers in Finland?* 2) *How do home demands and job demands interact with crafting for mastery and crafting for meaning in predicting subjective vitality among workers in Finland?*

The research frame interpreted in visual form:



### 3.1 Hypotheses

My first research question was “*how are crafting for meaning and crafting for mastery associated with subjective vitality among workers in Finland?*”. Based on the earlier literature of serious leisure’s and leisure crafting’s positive link to well-being, I assume that there is a positive relationship between subjective vitality and leisure crafting through psychological mechanisms - mastery and meaning. However, I expect that crafting for meaning is stronger positively associated with subjective vitality than crafting for mastery because mastery activities require effort in order to gain skills (Pennonen, 2011) and focus on overcoming challenges rather than resting on laurels (Loveday et al., 2018), which can turn into a stressor in mundane life especially for those who experience high home and job demands for example (Iso-Ahola & Mannell, 2004, p. 196). Crafting for meaning, on the other hand, is expected to have a positive impact on well-being even when it comes to crafting productive activities that involve mastery experiences, if those activities are meaningful and purposeful (Newman et al., 2014).

My second research question was “*how do home demands and job demands interact with crafting for mastery and crafting for meaning in predicting subjective vitality among workers in Finland?*” I have not yet encountered the exactly similar research question in earlier studies, but based on the findings which present that constant exposure to the demands can have a negative impact on well-being (Demerouti et al., 2001), as well as that demands, especially home demands, decrease leisure crafting (Petrou & Bakker, 2016), which is expected to have a positive influence on well-being (Newman et al., 2014), I anticipate that the higher the demands are, the lower the amount of leisure crafting will be, which is negatively associated with subjective vitality. In other words, home demands and job demands are expected to enhance the negative effects of leisure crafting (mastery and meaning) on subjective vitality.

H1=Crafting for meaning and crafting for mastery are positively associated with subjective vitality

H1a=Crafting for meaning is associated with subjective vitality more positive than crafting for mastery

H2=Home- and job demands are negatively associated with subjective vitality

H2a=Higher home demands and job demands constitute an enhancer for the negative relationship between leisure crafting (mastery and meaning) and subjective vitality

### 3.2 Data

I will conduct the thesis as a part of the project “Making Leisure Work: Leisure Crafting as Active Recovery from Stressful Work”. The project is financed by the Academy of Finland and the University of Groningen. The principal investigator is Dr. Jessica De Bloom. The project focuses on leisure crafting that is assumed to enhance a person’s well-being and performance. Interdisciplinary and cross-cultural (including Finland, the United States and, Japan) research project will use methodological approaches from recovery and leisure sciences to understand and facilitate crafting with the goal to preserve and improve quality of life, long-term workability, and individual performance. The study’s questions concern work, leisure and well-being. The study consists of three online self-report questionnaires (T1, T2, T3). There was 3 months’ time between the three measurements. The purpose of the questionnaires is to get new knowledge on if and how people adjust their work and leisure to their needs and how this may affect their health, well-being and performance. The data is cross-sectional, which allows the examination of non-linear relationships. Thus, I rather investigate the associations than effects between the measures.

I will focus only on questionnaires collected in Finland in the first measurement time (T1). The data was collected in two samples. The first sample was recruited from various sources in Finland from September till October 2018 via the organization’s HR managers who sent the participation invitation to their employees. Another source was social media. 356 persons agreed to participate in the study including 59 people from a previous study who had indicated that they would be interested in another study on the same topics. Of these people, in total, 316 persons responded to the survey (response rate 89%). Participants came from various organizations, such as cities, municipalities, churches and trade unions. Respondents were mainly public sector workers. Three attention checks were included to check if participants paid attention while responding. As a result, two persons’ answers were deleted for “failing” all attention checks.

The second sample was recruited via a large Finnish trade union consisting of employees aged 45-60. Data collection took place in November 2018. A total of 3180 e-mails were sent to employees with matching demographics in the Pirkanmaa region in Finland. Of these people, 225 responded to the survey (response rate 7%). This time one person’s answers were deleted for “failing” all attention checks. As a result of two sample rounds, the data consists of 541 different respondents who responded to the survey in the first measurement time (T1). Non-respondents have been deleted from this count.

From the whole research population 85% of the respondents were women (n=460), 14% men (n=78) and 0,4% (n=2) others. Respondents were 23-68 years old: 6% of the respondents were under 31 years old, 33% were 32-49 years old and 61% were over 50 years old. Most of the respondents live only with their spouse (41%) and second-biggest number of respondents reported to live both with their spouse and children (31%). The third biggest number of respondents live alone (19%). The fewest amount lives only with their children (7%). Half of the respondents' highest education level was a comprehensive school, vocational school or, upper secondary school (50%). Secondly comes lower academic degree (27%), thirdly upper academic degree (20%) and fourthly, academic postgraduate degree (3%). A bit under half of the respondents are blue-collar workers (40%). Secondly comes lower level white collar workers (29%), thirdly upper-level white-collar workers (23%) and fourthly, high management (7%). The remarkable number of respondents are working in health care and social services (37%) and public sector (19%). Most of the respondents have a permanent contract in their workplace (87%) doing 39 hours of work per week in average.

### 3.3 Measures

I have chosen variables to examine based on what is relevant to the research questions. Some variables under the same concept have been converted to averaged variables, such as subjective vitality, crafting for meaning, crafting for mastery, job demands and home demands. In addition to averaged variables, I have decided to include the examination of demographics, such as gender, age, domestic partner, educational level and occupational level to the research frame. They will function as control variables. The examination of control variables will widen the perspective of the research frame and turn it into a more comprehensive. I will use control variables in their original form without recoding them in One-way ANOVA in order to enable more profound examination, but for the rest of the statistical tests, they are recoded into dichotomous variable. Most of the original control variables were categorical, which influenced my decision to convert all control variables into dichotomous variables, including also age, in order to enable effortless interpretation for the reader, as well as consistent style in tables.

#### Demographics

Demographics consist of background variables which were all categorical variables apart from the age that was a continuous variable. The year of birth was sorted out with the open answer: *what is*

*your year of birth?* (range 1948-2001). Categorical background variables' original distributions are the following: *what is your gender?* (1=male, 2=female, 3=other), *what is your highest completed level of education?* (1=comprehensive school, 2=vocational- or upper secondary school, 3=bachelor's degree, 4=master's degree, 5=postgraduate degree), *how would you classify your current job?* (1>manual/blue collar worker, 2=lower level white collar worker, 3=upper level white collar worker, 4=high management) and *do you live by yourself or with someone else?* (1=I live by myself, 2=I live with my spouse, 3=I live with my spouse and a child/children, 4=I live with a child/children). These background variables are investigated in their original form in one-way variance analysis where I have named as follows: gender, age, educational level, domestic partner and occupational level.

For correlation coefficients and regression analysis, I have narrowed all background variables' distributions into dichotomous variables. I have recoded *age* (0= 23-49, 1= 50-68), *gender* (0=man, 1=woman), *educational level* (0=comprehensive school or upper secondary education, 1=academic degree) and *occupational level* (0=lower level worker, 1=upper level worker or management). The categorical variable, which measures whether someone lives in the same household with the respondent or no, have been split into two separate dichotomous variables namely *child/children* and *spouse*. One shows the number of child/children living in the same household (0=no child/children, 1=has child/children) and the other one shows whether the respondent lives with a spouse or no (0=no spouse, 1=has spouse).

The categories of the variables' distributions influenced how I decided to create dichotomous variables. Hence, I left out the category of "Other" from gender-variable, as well as the category of "I live by myself" from the variable describing whether someone lives with the respondent or no from the examination because these categories lacked responses relative to other categories under the same concept, which would have caused strong skewness. Due to this, I considered normal distributions before forming the dichotomous variables. For instance, age distribution is carried out with a median split (39% are under 49 years old and 61% are over 50 years old). Educational level is even in terms of distributions (50% have completed comprehensive- or upper secondary school and 50% have completed academic degree) and child/children -variable is almost even in terms of distributions (61% no child/children living in the same household and 39% has child/children living in the same household). However, gender-, occupational level- and spouse -variables' distributions are skewed (15% are male respondents and 85% are female respondents, 30% are working in upper level -or management professions and 70% are working in lower level

professions, 26% have no spouse living in the same household and 74% have spouse living in the same household). Next, I'm going to present the process of averaged variables' formation.

### Averaged variables

Averaged variables' reliability was tested with Cronbach's alpha. It has to be a minimum  $\alpha .60$ , which indicates that variables measure the same thing reliable enough (Metsämuuronen, 2009, p. 531). Every averaged variable tested for the purpose of this research exceeded  $\alpha .60$ , so they are suitable for use.

*Subjective vitality.* Based on the scholars' scale (Ryan & Frederick, 1997; Bostic et al., 2000) of subjective vitality. Original 7 item scale was shortened to 4 items and adapted to one month: Over the past month "I felt alive and vital", "I felt very energetic", "I had energy and spirit" and "I looked forward to each new day". Responses were given on a scale from 1 to 5 (*1=very rarely or never, 2=rather seldom, 3=sometimes, 4=rather often, 5=very often or all the time*). The mean of averaged variables (n=4) was reliable ( $\alpha=.93$ ).

*Home demands.* Based on the Peeters et al. (2015) scale consisting of quantitative (3 items), emotional (3 items) and mental (3 items) home demands. Items have been adapted to one month. Home demands measure home demands concerning the pace and work burden at home (How often have you been busy at home over the past month?", "How often did you have to do many things in a hurry when you were at home over the past month?", "How often did you carry out a lot of tasks at home (e.g., household/caring tasks) over the past month?", "How often did emotional issues arise at home over the past month?", "How often did you get frustrated about things concerning your private life over the past month?", "How often did your housework confront you with things that touch you personally over the past month?", "How often did you have to remember a lot of things with regard to your private life over the past month?", "How often did you have to do many things simultaneously at home over the past month?", "How often did you have to plan and organize a lot of things in relation to your private life over the past month?"). Responses were given on a scale from 1 to 5 (*1=never, 2=rarely, 3=sometimes, 4=often, 5=very often*). The mean of averaged variables (n=9) was reliable ( $\alpha=.92$ ).

*Job demands.* Based on Spector's and Jex's (1998) Quantitative Workload Inventory of workload (3 items), De Jonge's et al. (2007) and Pejtersen's, Kristensen's, Borg's and Bjorner's (2010) DISC Questionnaire of cognitive demands (3 items) and Pejtersen's et al. (2010) Copenhagen

Psychosocial Questionnaire II of emotional demands (3 items), of which 2/4 items were measured and one replaced. Items have been adapted to one month. Job demands measure the amount of work in terms of pace and volume, as well as cognitive demands and emotional demands (“How often did your work require that you remember a lot of things over the past month?”, “How often did your work require you to make complex decisions over the past month?”, “How often did you need to display high levels of concentration and precision at work over the past month?”, “How often was your work emotionally demanding over the past month?”, “How often did your work evoke unpleasant feelings over the past month?”, “How often did your work put you in emotionally disturbing situations over the past month?”, “How often did your job require you to work very fast over the past month?”, “How often did your job leave you with little time to get things done over the past month?”, “How often did your job require you to work under time pressure over the past month?”). Responses were given on a scale from 1 to 5 (*1=very rarely or never, 2=rather seldom, 3=sometimes, 4=rather often, 5=very often or all the time*). The mean of averaged variables (n=9) was reliable ( $\alpha=.86$ ).

*Crafting for Mastery*. Based on the project’s (Reconciliation between work and leisure) new scale of off-job crafting (3 items). Mastery is one of the psychological mechanisms of the DRAMMA-model that is claimed to promote subjective well-being through leisure (Newman et al., 2014). Crafting for Mastery measures skill management crafting experiences during off-job time (“I’ve arranged my off-job time so that I experience proficiency in the things I undertake”, “I’ve made sure to familiarize myself with new ideas, expand my knowledge or interests during off-job time” and “I’ve organized my off-job activities so that I put my skills, knowledge or abilities into action.”). Responses were given on a scale from 1 to 5 (*1=never, 2=rarely, 3=sometimes, 4=often, 5=very often*). The mean of averaged variables (n=3) was reliable ( $\alpha=.73$ ).

*Crafting for Meaning*. Based on the project’s (Reconciliation between work and leisure) new scale of off-job crafting (3 items). Meaning is one of the psychological mechanisms of the DRAMMA-model that is claimed to promote subjective well-being through leisure (Newman et al., 2014). Crafting for Meaning measures crafting experiences concerning personal values and sense of purpose during off-job time (“I’ve made sure to experience meaning in my life during off-job time”, “I’ve organized my off-job activities so that I achieve a sense of purpose in what I am doing” and “I’ve arranged my off-job time so that the things I do align with my personal values.”). Responses were given on a scale from 1 to 5 (*1=never, 2=rarely, 3=sometimes, 4=often, 5=very often*). The mean of averaged variables (n=3) was reliable ( $\alpha=.88$ ).

## 4. Data analysis

Research questions and the quality of data affect the choice of research method (Jokivuori & Hietala, 2007, p. 23). As I am studying relationships, for instance, the relationship between crafting for mastery and subjective vitality, my research method will be quantitative. The data analysis consists of both descriptive statistics and regression analysis -multivariable method. I have conducted statistical analyses with IBM SPSS Statistics 25 -software.

One-way variance analysis indicates if there is deviance between more than two group's means. (Metsämuuronen, 2009, p. 783.) The results of variance analysis will help to perceive how variables' means used in this research are distributed in terms of y-variable (subjective vitality). Correlations between averaged variables are studied with Pearson's correlation coefficient in order to sort out the relationships between background variables, subjective vitality, home demands, job demands, crafting for meaning and crafting for mastery. This step helps to perceive the overall situation of the target variables' relationships.

In addition to correlation coefficient, I will use linear regression analysis in order to find out how strongly crafting for meaning, crafting for mastery, home demands, job demands and demographics explain subjective vitality. Different from correlations, the linear regression model as a multivariable method enables several independent variables' examination in view of the dependent variable, while correlations indicate the strength of the relationship between two variables (Jokivuori & Hietala, 2007, p. 38; Black, 1999, p. 659). Regression analysis is a beneficial addition to correlations as the correlation coefficient alone cannot predict measurement results of research subjects (Nummenmaa, 2004, p. 297). Together with the regression analysis, I will perform moderator analysis, which shows how a third variable fits into the relationship between the independent and dependent variable. This third variable called moderator can influence the strength or direction of the relationship between x- and y-variables. (statisticssolutions.com.) I will find out how the interaction between home demands and job demands, as well as crafting for mastery and crafting for meaning predict subjective vitality.

### 4.1 One-way variance analysis



One-way variance analysis (One-way ANOVA) sorts out how means between more than two groups differs from each other and is the variance deviation between groups bigger than within groups (Metsämuuronen, 2009, p. 783; Nummenmaa, 2004, p. 179). It is important to be aware of which factors may affect the variances between the groups. For instance, sampling error and individual differences are good examples of the influencing factors. Thus, the examination of variances within groups and between groups is beneficial. (Nummenmaa, 2004, p. 176.) ANOVA's null hypothesis assumes that the means are similar in the groups of certain variables. I perform the test with the random effect model, where cases are randomly selected to test the differences in terms of the mean of a certain variable. (Metsämuuronen, 2009, p. 783.) In this case the only dependent variable is subjective vitality. The measurement assumes that the findings are independent from each other, independent variables are categorical and the dependent is measured with interval scale, each group's size exceeds 20 cases, each group's populations are normally distributed enough, as well as each group's variances are equal (Metsämuuronen, 2009, p. 788; Nummenmaa, 2004, p. 182). Statistical significances between means are described with F-test which corresponds to the p-value. If the value is less than .05, null hypothesis will be rejected and thus the means differ from each other statistically significant. (Metsämuuronen, 2009, p. 788.)

#### 4.2 Pearson's product-moment correlation coefficient

Pearson's product-moment correlation coefficient is a parametric correlation coefficient, which requires normally distributed variables with interval scales. In addition, the number of observations should be at least 50, rather than over 100. (Nummenmaa, 2004, p. 267.) These requirements are filled in terms of the data and the variables. Correlation coefficient's value that is close to -1 implies strong negative relationship (implying when one variable's values grow, other variable's values reduce), whereas value that is close to +1 implies strong positive relationship (when one variable's values grow, other variable's values grow as well). If the value is close to 0, there is no linear relationship detected between the variables. (Nummenmaa, 2004, p. 268; Metsämuuronen, 2009, p. 370.) Statistical significances can be identified from the correlation matrix (\* $p < .05$ . \*\* $p < .01$ . \*\*\* $p < .001$ ) (Metsämuuronen, 2009, p. 578). If p-value is under .05, correlation deviates from zero statistically significant. Even the smallest correlations can be statistically significant in big populations, whereas in small populations the biggest correlations can be statistically significant. (Nummenmaa, 2004, p. 278; Metsämuuronen, 2009, p. 451.)

The data I am working with covers over 500 respondents, which gives the chance to the appearance of statistically significant small correlations. However, statistical significance does not mean that the relationship between the variables would be strong: it only implies that correlation deviates from zero statistically significant. Correlations under  $\pm 0.5$  should be interpreted with caution. (Nummenmaa, 2004, p. 280.) According to another source, 0.20-0.40 correlation can be seen strong and explaining essentially the deviation of y-variable (Jokivuori & Hietala, 2007). In human sciences, the explanatory power between two variables is not usually big, except in the situations where phenomena are close to each other in terms of their content (Jokivuori & Hietala, 2007).

### 4.3 Linear regression analysis

Similar to correlations coefficient, also linear regression analysis is based on examining correlations, which makes them both suitable to use in same kind of research frames (Nummenmaa, 2004, p. 297). It has stranded to social sciences in 60's (Jokivuori & Hietala, 2007) and it's one of the most used methods when the intention is to model reality. Its fundamental starting point is that independent factors correlate with dependent factors but not necessarily with each other. (Metsämuuronen, 2009, p. 710.) The regression model seeks to explain y-variable's deviation of values with the help of x-variables (Nummenmaa, 2004, p. 297). Regression analysis contains an assumption that the relationships between effects are causal where the independent variable is a cause and the dependent variable an effect (Jokivuori & Hietala, 2007). Y-variable has to be continuous and x-variables continuous or dummy-variables (Jokivuori & Hietala, 2007). The accuracy of modeling improves when there are more independent variables predicting dependent variable's values (Nummenmaa, 2004, p. 302). Model's explanatory power  $R^2$  informs how much of dependent variable' deviation can be explained with the model. Adjusted  $R^2$  gives a truthful image of the model's suitability in the actual population, where the sample is from. Also,  $R^2$  takes into account the number of variables when it counts the explanatory power. (Nummenmaa, 2004, p. 309.)

There are different approaches when creating the regression analysis model. One of them is a confirmatory approach, where independent variables are decided in advance based on a certain theory. Another approach is called exploratory, where the model receives all potential variables that are relevant relative to outcome variables and research frame. (Jokivuori & Hietala, 2007.) In this research I have ended up with confirmatory approach as I have decided which variables I am going to use after the familiarization with the literature and theories. There are also different ways

to add variables into the model. I have chosen to use enter-method, where research hypotheses determine the variables that should predict the dependent variable well, after which the test can be performed and evaluated (Metsämuuronen, 2002, p. 305). Similarly, the forced model, which I perform, consists of prespecified variables whose influence on the dependent variable will be found out (Metsämuuronen, 2009, p. 725). I have added variables into the model hierarchically. With the hierarchical regression I can test if the predictors that I use show a statistically significant amount of variance in the dependent variable when entering demographics and averaged variables into the model in different steps (Bommae, 2016).

In order to use linear regression analysis, certain pre-conditions have to be met. One of them is that continuous variables should be normally distributed in order to produce statistical tests that are as reliable as possible (Nummenmaa, 2004, p. 142). There are various ways to test normal distributions. I will perform the test with Kolmogorov-Smirnov -test and check variables' histograms shape, as well as their skewness and kurtosis. According to Kolmogorov-Smirnov -test, only variables with p-value exceeding 0,05 are normally distributed (Nummenmaa, 2004, p. 143). Of these variables I examined only home demands to be normally distributed (Sig. 0,06). Job demands -variable is almost normally distributed (Sig. 0,04). All the remaining variables are not normally distributed (Sig. 0,00). However, even small deviations in normal distributions turn the result not normally distributed in Kolmogorov-Smirnov -test (Nummenmaa, 2009, p. 155), which makes the test sensitive to small changes. This gives the reason for examination of normal distributions in other ways too.

From variables' histograms I shall check if the distribution resembles Gaussian curve (Reunamo, n.d.). Turns out that every variable is resembling it (see example from graph 1. from appendix). After this, I shall look at the parameters' skewness and kurtosis. If the skewness locates between -2 and 2, the distribution is symmetric (Rasi, Lepola, Muhli & Kanniainen 2006, p. 43). In this case every variable's skewness locates between -2 and 2. Apart from Kolmogorov-Smirnov -test, other tests showed variables to be normally distributed enough. In addition, normally distributed residuals (inexplicable parts), as well as equally distributed variances, are prerequisite within the method (Metsämuuronen, 2009, p. 711). I examine residuals with Normal probability plot -test. According to figures, residuals are normally distributed as they are following the same trend (see example from graph 2. from appendix).

Linear regression analysis expects that independent variables are not linked to each other in order to avoid collinearity problems. Otherwise the same variation of the independent variable would

perform in the model more than once. (Nummenmaa, 2004, p. 304), which adds the defectiveness of the regression model (Metsämuuronen, 2003, p. 578). In order to create well-functioning regression analysis, independent variables shouldn't correlate with each other too strongly (Nummenmaa, 2004, p. 311). The closer to zero the variable's tolerance is, the more collinear the independent variable is (Nummenmaa, 2004, p. 311). According to another source, the tolerance's value that is close to .20 and VIF-value (variance inflation factor) that exceeds the value of 4 indicate big multicollinearity and should be considered to be outlined (Jokivuori & Hietala, 2007). Tolerance values (.55-.91) together with VIF-values (1.1-1.8) are acceptable in terms of the limit values in this research. However, if the value of Durbin-Watson exceeds 2 in the model summary-table, there is multicollinearity (Heikkilä, 2014). The value I got in regression analysis is 2,094. Also, independent variables shouldn't correlate with each other more than .50 (Kirves, 2013). There are four correlations exceeding the limit value .50.

Correlations' scatter plots should be investigated in addition to limit values and normal distributions. The plot will show a linear fit line and explanatory power  $R^2$ . Based on the linear fit line we see whether the relationships are linear, which is crucial determinant in terms of statistical significances in regression analysis results. If the relationship is not linear, the relationship between variables is not statistically significant. Even though the relationship is not strictly linear, the result would give a reasonably good approximation of the relationship between variables. (KvantiMOTV, 2003) Scatter plots describe usually more than two continuous variables or variables with interval scales and show their deviations between groups (Metsämuuronen, 2009, p. 605—606). Scatter plots will also show outliers (deviated findings) between variables (Metsämuuronen, 2009, p. 616), which distorts the effect on correlations. If the variable has many outliers, it's recommended to leave it out from the analysis. (Metsämuuronen, 2009, p. 641—642.) For instance, outliers should be checked doing regression analysis as they have an influence on the value of the correlation coefficient (Metsämuuronen, 2009, p. 711). According to Grace-Martin (n.d.), sometimes outliers can be also legitimate observations. It turns out that the relationships between examined continuous variables are linear showing whether the relationship is positive or negative. However, I detected few outliers from the variables (see example from graph 3. from appendix), but I decided not to filter them off because few outliers do not disturb in bigger data.

#### 4.4 Moderator analysis

Moderator analysis shows how a third variable affects the relationship between the independent and dependent variable. This third variable is a moderator, which specifies conditions under which a given predictor (x-variable) is related to an outcome (y-variable) and shows *when* they are related. Moderator analysis evolves moderation (interaction effect) that indicates how the moderator determines the strength or direction of the relationship between two predictors and outcome variables. A moderation effect can be “enhancing (increasing the moderator would increase the effect of the predictor on the outcome), buffering (increasing the moderator would decrease the effect of the predictor on the outcome) or resistive (increasing the moderator would reverse the effect of the predictor on the outcome)”. (Elite Research LLC, 2004—2013.) Using moderation requires hierarchical multiple regression. Continuous variables included in interaction term are standardized before the actual moderation test is implemented in order to decrease the multicollinearity problem. If the interaction term turns out to be statistically significant, the results should be developed in the form of the table and simple slopes (Kirves, 2013).

## 5. Results

### 5.1 Descriptive results

The descriptive results provide background for research and show the distributions of central variables, their relationships to each other and statistical significances. First, I am going to present one-way variance analysis’s results (table 1.) and second I present correlation coefficient’s results (table 2.)

#### Variables’ means related to subjective vitality

Subjective vitality is experienced averagely sometimes or rather often in every group. Averaged variables are statistically significant, whereas background variables are not. Higher crafting for mastery and crafting for meaning are related to higher subjective vitality. The group that experiences high crafting for mastery experiences slightly higher level of subjective vitality compared to the group that experiences high crafting for meaning. There are much fewer people that experience high crafting for mastery than high crafting for meaning, which can influence the result of subjective vitality’s distribution between these groups.

Low home demands and job demands are related to higher subjective vitality. The group that experiences low, medium or high job demands seems to enjoy slightly higher vitality levels compared to the group that experiences low, medium or high home demands.

The level of subjective vitality in groups that experience low or medium demands is higher than in the groups whose crafting level is low or medium. On the contrary, the level of subjective vitality in groups that experience high demands is lower than in the groups whose crafting level is high.

Statistically insignificant background variables show that the highest level of subjective vitality is experienced among men, those whose level of education is comprehensive school, those who live with a child or children and a spouse, and those who are working in high management. Those, who have vocational- or upper secondary school as their highest level of education, who live with their spouse and who work at lower level jobs, experience the lower-level of subjective vitality.

<b>Table 1. Distributions of subjective vitality among all measures</b>		N	Mean	SD	F-test / X2
Gender	Male	76	3,7	0,8	1,97
	Female	452	3,5	0,9	
Age	23-49	209	3,6	0,9	0,019
	50-68	321	3,6	0,9	
Educational level	Comprehensive school	13	4	1	1,336
	Vocational- or upper secondary school	250	3,5	0,9	
	Bachelor's degree	143	3,6	1	
	Master's degree	106	3,7	0,8	
	Postgraduate degree	17	3,6	0,9	
Domestic partner	I live by myself	99	3,6	0,9	0,942
	I live with my spouse	212	3,5	0,9	
	I live with my spouse and a child/children	169	3,6	0,9	0,023
	I live with a child/children	38	3,6	1	
Occupational level	Manual/blue collar worker	211	3,6	0,9	2,364
	Lower level worker	157	3,4	0,9	
	Upper level white collar worker	123	3,6	0,9	
	High management	37	3,8	0,8	
Home demands	Low	78	3,8	0,9	9,679***
	Medium	22	3,6	0,8	
	High	97	3,2	1	
Job demands	Low	14	4	0,8	5,923**
	Medium	25	3,8	0,9	
	High	154	3,4	1	
Crafting for mastery	Low	33	3	1	30,403***
	Medium	74	3,3	0,8	
	High	117	4	0,7	
Crafting for meaning	Low	29	3	1	20,537***
	Medium	46	3,3	0,8	
	High	253	3,9	0,8	

\*=p<.05. \*\*=p<.01. \*\*\*=p<.001.

Outcome variable: Subjective vitality (Range from 1 to 5 (very rarely or never-very often or all the time))

## Variables' correlations

Averaged variables' means show that respondents averagely feel for example vital, energetic and alive sometimes or rather often, experience quantitative-, emotional -and mental home demands sometimes, experience workload and cognitive- and emotional job demands sometimes or rather often, craft for mastery sometimes and craft for meaning sometimes or often over the past month. Based on these results respondents are not hopelessly lacking vitality experiences or experiencing demands excessively.

Crafting for mastery and subjective vitality are positively linked to each other ( $r=.36$ ,  $p<.01$ ) similarly as crafting for meaning and subjective vitality ( $r=.39$ ,  $p<.01$ ). Crafting for meaning has a stronger positive association with subjective vitality than crafting for mastery, though the difference is unnoticeable. Interestingly, in relation to this result, table 1. showed opposite the result, where high crafting for mastery was slightly more beneficial in terms of subjective vitality compared to the high crafting for meaning.

Home demands and subjective vitality are negatively linked to each other ( $r=-.20$ ,  $p<.01$ ) similarly as job demands and subjective vitality ( $r=-.19$ ,  $p<.01$ ). Home demands has a stronger negative association with subjective vitality than job demands, though the difference is unnoticeable.

Other results show that women experience more home demands compared to men ( $r=.16$ ,  $p<.01$ ). Under 49 years old respondents experience more home demands compared to over 50 years old respondents ( $r=-.27$ ,  $p<.01$ ). Highly educated respondents experience more home demands ( $r=.16$ ,  $p<.01$ ) and job demands ( $r=.26$ ,  $p<.01$ ) compared to those with lower-level education. Job demands ( $r=.31$ ,  $p<.01$ ) are higher with the group who work in higher positions and management than in lower-level positions. Those, who have a child or children living at home, experience more home demands compared to those who did not have a child or children as domestic partners ( $r=.43$ ,  $p<.01$ ). Job demands is positively linked to home demands ( $r=.23$ ,  $p<.01$ ), which reveals that one domain grows another domain's demands among this research population. Variables, that measure almost the same phenomenon, might correlate with each other highly (Jokivuori & Hietala, 2007), such as crafting for meaning and- mastery ( $r=.66$ ,  $p<.01$ ).



**Table 2. Relationships between all measures**

	Range	N	Mean	SD	1.	2.	3.	4.	5.	6.	7.	8.	9.	10.
1. Subjective vitality	1-5	530	3.6	0.90										
2. Gender	0-1	538	0.9	0.35	-0,061									
3. Age	0-1	540	0.6	0.49	-0,006	-0,068								
4. Educational level	0-1	537	0.5	0.50	0,044	0,031	<b>-0,508**</b>							
5. Child/children	0-1	528	0.4	0.49	0,060	0,050	<b>-0,382**</b>	<b>0,261**</b>						
6. Spouse	0-1	528	0.7	0.44	-0,006	-0,035	-0,005	0,038	<b>0,148**</b>					
7. Occupational level	0-1	533	0.3	0.46	0,063	<b>-0,099*</b>	<b>-0,310**</b>	<b>0,580**</b>	<b>0,192**</b>	0,055				
8. Home demands	1-5	519	3	0.88	<b>-0,204**</b>	<b>0,156**</b>	<b>-0,271**</b>	<b>0,156**</b>	<b>0,431**</b>	<b>0,097*</b>	<b>0,128**</b>			
9. Job demands	1-5	485	3.6	0.72	<b>-0,187**</b>	<b>0,120**</b>	<b>0,135**</b>	<b>0,261**</b>	<b>0,126**</b>	<b>0,002</b>	<b>0,310**</b>	<b>0,226**</b>		
10. Crafting for mastery	1-5	509	3	0.76	<b>0,361**</b>	-0,060	<b>0,093*</b>	-0,030	-0,037	<b>0,117*</b>	0,023	-0,060	0,025	
11. Crafting for meaning	1-5	509	3.7	0.87	<b>0,391**</b>	0,047	<b>0,087*</b>	-0,043	0,073	0,034	0,015	-0,048	-0,034	<b>0,645**</b>

\*\*p<.05. \*\*\*p<.01.

\*\*\*p<.001.

2. (0=male, 1=female)

3. (0=23-49, 1=50-68)

4. (0=comprehensive school or upper secondary education, 1=academic degree)

5. (0=no child/children, 1=has child/children)

6. (0=no spouse, 1=has spouse)

7. (0=lower level worker, 1=higher level worker or management)

## 5.2 Main results

The main results are introduced in two different tables. The results are showed separately because of the distinctions in tables' formation as for linear regression analysis the variables are unstandardized and for moderator analysis continuous variables included in interaction terms are standardized. In addition, both tests follow different kind of manner in entering variables into models. Linear regression analysis responds to the first research question of how crafting for meaning and crafting for mastery are associated with subjective vitality. The table also shows how independent variables are linked to subjective vitality, such as demographics, home demands and job demands. Moderator analysis responds to the second research question of how home demands and job demands, as well as crafting for mastery and crafting for meaning interact in predicting subjective vitality. First, I am going to present linear regression's results (table 3.) and second moderator analysis's results (table 4 and 5.)

### Demographics, demands and leisure crafting predicting subjective vitality

The third table (table 3.) of regression analysis is created with the help of Heikkilä's (2014) table model of regression analysis. I have added only background variables to the first step. X-variables were included to the second step. Variables are unstandardized. The model's coefficient of determination was 24 percent after the second step, which shows how much independent variables explained the dependent variable's variation. F-statistics was statistically highly significant, which implies that the model explains subjective vitality statistically highly significant. Next, I am going to present the results of the hierarchical linear model (table 3.)

Crafting for meaning has a stronger positive association with subjective vitality (.227,  $p < .001$ ) compared to crafting for mastery (.204,  $p < .001$ ) when control variables are included in the model. However, the coefficients are very similar. In conclusion, leisure crafting seems to be positively associated with subjective vitality and the result is consistent with the hypotheses (H1 and H1a).

There is a stronger negative association between home demands and subjective vitality (-.213,  $p < .001$ ) compared to job demands and subjective vitality (-.193,  $p < .001$ ), although the coefficients are very similar. Both home demands and job demands are negatively associated with subjective vitality and the result is consistent with the hypothesis (H2).

From control variables only child/children -variable was statistically significant (.149,  $p < .01$ ) in the second step, which indicates that having a child or children living in the same household is associated with subjective vitality positively when x-variables are included in the model. There is no difference or deviance between subjective vitality and gender, age, educational level and occupational level as these variables were not statistically significant (Nummenmaa, 2004, p. 137—138).

<b>Table 3. Independent variables predicting subjective vitality</b>				
N=470	Step 1.		Step 2.	
<b>Demographics</b>	B	$\beta$	B	$\beta$
Gender (0=male, 1=female)	-.218	-.084	-.084	-.032
Age (0=23-49, 1=50-68)	.073	.040	-.062	-.034
Educational level (0=comprehensive school or upper secondary education, 1=academic degree)	.070	.039	.105	.058
Child/children (0=no child/children, 1=has a child/children)	.169	.093	.271	.149**
Spouse (0=no spouse, 1=has spouse)	-.095	-.046	.022	.011
Occupational level (0=lower level worker, 1=higher level worker or management)	.067	.034	.145	.075
<b>Averaged variables</b>				
Home demands			-.215	-.213***
Job demands			-.242	-.193***
Crafting for mastery			.241	.204***
Crafting for meaning			.236	.227***
<b>Model fit statistics</b>				
Adjusted R2	.007		.244	
R2 Change	.020		.240	
F-statistics	1,577		16,134***	
F Change			37,230***	

\*= $p < .05$ . \*\*= $p < .01$ . \*\*\*= $p < .001$ .

Home demands' interaction with crafting for meaning in predicting subjective vitality

I have created four interaction terms (crafting for meaning\*home demands, crafting for mastery\*home demands, crafting for meaning\*job demands, crafting for mastery\*job demands), which I added to the regression model one at the time in order to enable effortless interpretation of the model. Continuous variables included in interaction term are standardized in order to avoid multicollinearity problems (Kirves, 2013). As guided in Kirves's (2013) methodology guide, I added first background variables, second the first independent variable of the interaction term, third the second independent variable of the interaction term and fourth the whole interaction term when performing the test. I have created a simple slope- plot from statistically significant interaction term with the help of Excel-worksheet downloaded from Jeremy Dawson's website (Dawson, n.d.) He has created the worksheet based on the procedures by Aiken and West (1991), Dawson (2013) and Dawson and Richter (2006) to plot the interaction effect.

Only one interaction term (home demands\*crafting for meaning) was statistically significant (.11,  $p < .01$ ), which results are seen in the hierarchical linear regression model with moderation (table 4.) The results show that three of the interaction terms were not statistically significant. This means that job demands and crafting for meaning did not interact with each other in enhancing or buffering the effect on subjective vitality, nor did home demands or job demands interact with each other in enhancing or buffering the effect on subjective vitality. Model's coefficient of determination was 20 percent after the fourth step, and that much the independent variables explained the dependent variable's variation. F-statistics were statistically highly significant on the second, third and fourth step, which implies that the model explains subjective vitality statistically highly significant.

Table 5 shows that highest amount of subjective vitality is associated with low home demands and high crafting for meaning, whereas lowest amount of subjective vitality is associated with high job demands and low crafting for meaning. Crafting for meaning constitutes a buffer for the negative relationship between home demands and subjective vitality. Respondents, who experience high home demands but craft for meaning highly, achieve nearly similar experience of subjective vitality as respondents who experience low home demands and craft for meaning highly. In other words, the level of subjective vitality is maintained during the time of high home demands, if the level of crafting for meaning is also high. Therefore, crafting for meaning is beneficial in terms of subjective vitality despite the high home demands. This result is not consistent with the hypothesis (H2a).

Table 4. Four interaction terms' moderating effect on subjective vitality	Model 1. (N=492)				Model 2. (N=491)				Model 3. (N=472)				Model 4. (N=471)				
	Step 1.	Step 2.	Step 3.	Step 4.	Step 1.	Step 2.	Step 3.	Step 4.	Step 1.	Step 2.	Step 3.	Step 4.	Step 1.	Step 2.	Step 3.	Step 4.	
	β	β	β	β	β	β	β	β	β	β	β	β	β	β	β	β	
<b>Demographics</b>																	
Gender <sup>1</sup>	-0.07	-0.03	-0.05	-0.06	-0.07	-0.03	-0.02	-0.02	-0.08	-0.05	-0.08	-0.08	-0.09	-0.05	-0.04	-0.04	-0.04
Age <sup>2</sup>	.05	-0.01	-0.03	-0.03	.04	.01	-0.02	-0.02	.04	.04	-0.01	-0.01	.04	.04	.00	.00	.00
Educational level <sup>3</sup>	.03	.02	.04	.02	.03	.03	.02	.02	.03	.05	.07	.07	.04	.06	.06	.06	.06
Child/children <sup>4</sup>	.08	.18***	.12*	.12*	.08	.18***	.17***	.17***	.09	.10*	.05	.05	.09	.11*	.10*	.10*	.10*
Spouse <sup>5</sup>	-0.04	-0.02	-0.00	.00	-0.04	.03	.02	.02	-0.04	-0.04	-0.02	-0.02	-0.04	-0.04	.01	.02	.02
Occupational level <sup>6</sup>	.06	.07	.05	.06	.06	.07	.05	.05	.03	.09	.06	.06	.03	.09	.08	.08	.08
<b>Home- and job demands</b>																	
Home demands																	
Job demands																	
<b>Leisure crafting</b>																	
Crafting for meaning																	
Crafting for mastery																	
<b>Interaction term</b>																	
Home demands*Crafting for meaning																	
Home demands*Crafting for mastery																	
Job demands*Crafting for meaning																	
Job demands*Crafting for mastery																	
<b>Model fit statistics</b>																	
Adjusted R2	.01	.06	.19	.20	.01	.06	.18	.18	.01	.05	.19	.19	.01	.05	.18	.18	.18
R2 Change	.02	.06	.13	.01	.00	.06	.11	.00	.02	.04	.14	.00	.02	.05	.13	.00	.00
F-statistics	1.42	5.5***	15.5***	14.3***	1.51	5.50***	14.1***	12.7***	1.44	4.4***	14.9***	13.3***	1.53	4.7***	13.9***	12.7***	12.7***
F Change	29.3***	75.7***	6.9**	6.9**	29.3***	75.7***	68.8***	2.5	22.2***	82.9***	0.7	23.2***	72.7***	2.9	72.7***	2.9	2.9

\*=p<.05. \*\*=p<.01. \*\*\*=p<.001.

1. (0=male, 1=female)

2. (0=23-49, 1=50-68)

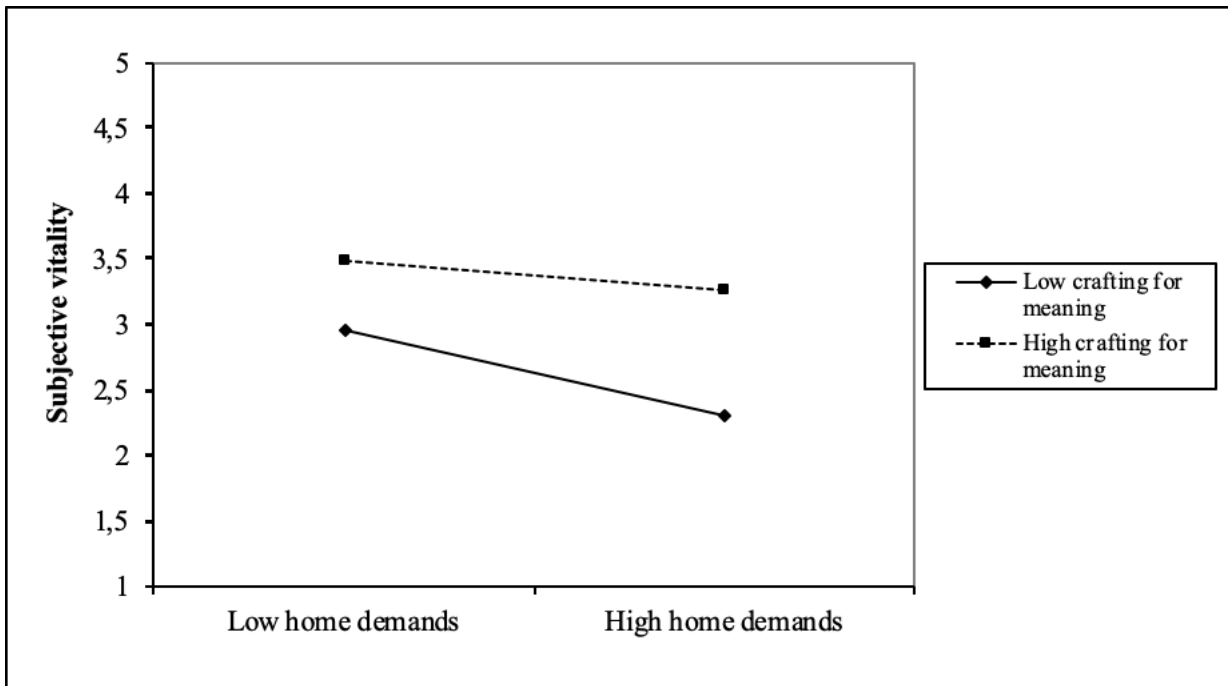
3. (0=comprehensive school or upper secondary education, 1=academic degree)

4. (0=no child/children, 1=has child/children)

5. (0=no spouse, 1=has spouse)

6. (0=lower level worker, 1=higher level worker or management)

Table 5. The interaction between home demands and crafting for meaning in predicting subjective vitality



## 6. Discussion

Research questions in this research were 1) *how are crafting for meaning and crafting for mastery associated with subjective vitality among workers in Finland?* and 2) *how do home demands and job demands interact with crafting for mastery and crafting for meaning in predicting subjective vitality among workers in Finland?* The data consisted of 541 respondents. I selected linear regression analysis and moderator analysis as main methods. According to research's statistical results, crafting for meaning and crafting for mastery were positively linked to subjective vitality. The result indicates that the DRAMMA's psychological mechanisms, meaning and mastery, are beneficial in terms of well-being. The result is consistent with Newman's et al. (2014) suggestion of psychological mechanisms' positive effect on the link between leisure crafting and well-being. Thus, leisure should be crafted from the perspective of two psychological mechanisms: mastery and meaning. In addition, high crafting for meaning constituted a buffer for the negative relationship between home demands and subjective vitality. Based on this result, vitality experiences are well protected, if workers continue to craft for meaning highly despite the high home demands. In the following chapters I will elaborate these results further.

### 6.1 Higher experience of subjective vitality is predicted by having a child or children living in the same household

Bringing demographics into examination in the thesis was expected to add social political and socioeconomic foundation for the thesis. Only one control variable in relation to subjective vitality was statistically significant in linear regression analysis. The results showed that having a child or children living in the same household is associated with subjective vitality positively. The result was consistent with earlier research. Transition to parenthood has been showed to increase the level of well-being of both parents, however, fathers have experienced fewer positive effects compared to mothers (Roeters et al., 2016; Abbey, Andrews & Halman, 1994).

Other interesting results drawn from demographics based on the descriptive results showed that higher demands are predicted by womanhood, younger age, high education and high-level position at work. For instance, female respondents, under 49 years old respondents and highly educated respondents experienced more home demands. Similarly, highly educated respondents and workers in high-level positions experienced more job demands. These results are expected based

on the earlier research. For example, women experience more home demands based on many types of research (Thrane, 2000; Robinson & Godbey, 1997, p. 101). Highly educated people work most likely in high-level positions, which explains these groups' experiences of high demands as the work can be more demanding in high-level positions (Zeike et al., 2019; Rothmann & Joubert, 2007) due to the bigger responsibility and overload for example.

## 6.2 Crafting for meaning has a stronger positive association with subjective vitality than crafting for mastery

Leisure crafting was positively associated with subjective vitality among the research population. Vitality experiences are linked to the individual's sense of being autonomous actor, which is further related to intrinsic motivation and feeling of control (Deci & Ryan, 1985; Heider, 1958; deCharms, 1968). Indeed, feelings of vitality should be accompanied by intrinsically motivated activities that offer pleasure, curiosity and novel experiences for the participant (Ryan & Fredrick, 1997). Thus, leisure crafting is expected to enhance an individual's experience of self-determination through intrinsically motivating activities that have positive impact on subjective vitality.

Crafting for meaning was in a stronger positive association with subjective vitality than crafting for mastery, although the difference between the coefficients was quite small. The result was expected. Even though mastery experiences bring well-being (Newman et al., 2014; Pennonen, 2011), the experiences of meaning can be more beneficial in terms of well-being. A reason for this may lay on mastery's conditions, as crafting for mastery requires engagement and effort to overcome challenges (Pennonen, 2011; Loveday et al., 2018). In other words, mastery refers to the urge to become "better at stuff" and its characteristics are found in Stebbins's definition of serious leisure. In my estimation, mastery in leisure involves only leisure actions that include mastery experiences. Crafting for meaning, on the contrary, does not include similar conditions as crafting for mastery. Meaning has an ideological background effect on leisure actions, including a person's life values, which directs the participant to engage in meaningful leisure activities. Indeed, crafting for meaning supports stronger the original concept of subjective vitality, which is linked to the energy that derives from the self (Ryan & Fredrick, 1997), compared to crafting for mastery.



It is impossible to deal with mastery and meaning entirely separate factors as they might exist in one leisure activity at the same time. Even a high correlation between crafting for mastery and crafting for meaning proved that they have a similar aim. Thus, they cannot be completely differentiated from each other even though they have different functions definition-wise. Mastery's and meaning's coexistence in one activity might explain why Newman et al. (2014) found the link between serious leisure and mastery and meaning, as serious leisure does not only consist of mastery experiences, but also meaningful activities. However, it is also possible that the person is mastering serious leisure activities that are not meaningful, which is not as beneficial as mastering meaningful activities in terms of well-being. This might also explain the result of why crafting for meaning had a stronger relationship to subjective vitality than crafting for mastery. For instance, the participant might have made sure to experience proficiency in leisure activities but has not considered the importance of leisure activities from the view of meaning. Meaningful leisure activities, though, promote positive emotions and satisfaction (Newman et al., 2014), and thus the experience of meaning during leisure is crucial in terms of well-being.

Haworth and Veal (2004) have brought up that meaning is a ruler that determines whether the participant will engage to the serious activity that requires effort or not (p. 204). From my point of view, mastery experience becomes beneficial in terms of well-being when the person gets a purpose for mastering, which requires that the person is intrinsically motivated towards the activity that becomes meaningful (Brown et al., 2008). However, it might be a lot easier for an individual to end up with crafting for mastery than crafting for meaning because meaning-making processes require the knowledge of true self, which has been found to be a source of meaning (Schlegel, Hicks, King & Arndt, 2011). In order to craft for meaning, the individual should know what the most meaningful things are in his or her life, as well as choose to do the activities that are consistent with the personal values. Some scholars underline that most human beings engage in developmental processes involving their capacities and interests that are intrinsic to their nature (Deci & Ryan, 1991) and that engagement to leisure activities is determined by intrinsic motivation, as well as their role to serve some future purpose (Caldwell, 2005). Thus, the engagement to the meaningful leisure activities does not always require the knowledge of true self if human beings are naturally directed towards intrinsically motivating activities.

Even though there is an assumption that individuals are naturally directed towards activities that involve their interests and capacities, there is still a chance to experience dissatisfaction and strain caused by a certain activity. The influence of social acceleration and leisure intensification on

mastery experiences in terms of time devotion and multitasking might affect participant's leisure behavior in an unwanted way. For instance, if the person multitasks in order to gain new skills and knowledge under time pressure without deeply processing the action, or if the person is too committed in demanding activity that begins to distract social life, the well-being effects might be poor in the end. However, the negative consequence of social acceleration and speed up of life is not a self-evident fact. For example, Garhammer (2002) claims that the growing pace of life has not affected life satisfaction and happiness negatively. According to him, the most active people are the happiest. However, Iso-Ahola and Mannell (2004) claim that an active leisure lifestyle might become a psychological struggle for people (p. 189).

Indeed, the acceleration of life has led to desire for relaxation techniques, such as meditation. The desire to practice relaxation techniques indicates that being a full-time active person is not benefitting well-being unless there are no counterbalancing activities. (Garhammer, 2002.) Stebbins (2004) refers to this with his idea of optimal leisure lifestyle, which is a combination of serious and unserious leisure, that forms an ideal combination in terms of well-being. Especially among this research population, which consists of workers, the importance of counterbalancing activities is emphasized as the recovery from job and home demands becomes impossible with only high-set goal activities, which would have harmful effects on well-being. This idea is strengthened by Iso-Ahola and Mannell (2004) who claim that mastery experiences can be loading especially to workers that experience demands already in job and home domain (p. 196).

Stebbins's idea of counterbalancing activities applies well to the counterbalance between leisure and work. If the work requires sitting in front of a computer for a long time, then leisure should offer alternative experience such as outdoor activities. In the end, all these conclusions are linked to finding a balance between serious and unserious leisure, as well as crafting for mastery and crafting for meaning. Individuals should know which features of serious leisure support their well-being the best in order to avoid downsides of serious leisure and crafting for mastery. On the one hand, the participant might be completely aware of the challenges and demands that mastery experiences can bring while crafting for mastery but on the other hand, downsides of the mastery experiences are not necessarily always clear for the participant, which might show in crafting for mastery's poorer well-being effects. This also questions the leisure crafting's inherent feature of goal setting during leisure. Indeed, leisure crafting itself involves the assumption that the participant tailors the activities consistent with the participant's needs in order to reach some goal targeted at learning, social connections or human development. This interpretation is actually

closely consistent with mastery's features, which encourages to widen the purpose of this definition from the aspect of the DRAMMA's mechanisms.

The importance of crafting for mastery and crafting for meaning, and their influence on well-being presumably alters between ages, home situation and job situation. When looking at the results, it is important to recognize that most of the respondents in the thesis are over 50 years old. For example, mastery experiences can lead to successful aging (Brown et al., 2008) and the preference for meaningful activities grows in later life (Nimrod, 2010; Brown et al., 2008). Older people might have more time to engage in leisure activities compared to the families that have a child or children living in the same household. Also, the quality of job demands might be different between new workers and old workers. The significance of counterbalancing activities becomes emphasized as the research population is still engaged to working life.

### 6.3 Home and job demands are negatively associated with subjective vitality

The results showed that both home demands and job demands weakened subjective vitality. The result was expected based on earlier literature. For example, the JD-R -model explains that demands can turn loading if they are excessive (Demerouti et al., 2001; Schaufeli & Bakker, 2004). Thus, long-term demands are risk to health and well-being (Demerouti et al., 2009).

Home demands had a stronger negative association with subjective vitality than job demands, although the difference between the coefficients was very small. Thus, the difference between job demands' and home demands' straining effect on individual are not necessarily strong from each other in daily practice. However, there was a little difference between the coefficients, and in the light of earlier literature, this result was unexpected. There is no clear explanation for why home demands cause more harm than job demands in relation to well-being, especially when most of the respondents are living without child or children, which might understandably add the amount of home demands. Work, though, can expose to stressful working conditions due to busyness, competition, insecurity, toxic environments, technological change and long workdays (Spector & Jex, 1998; Avey, Luthans & Jensen, 2009).

However, job demands are not instantly a threat to well-being if demands maintain a good state of flow at work. This refers to Cavanaugh's, Boswell's, Roehling's and Boudreau's (2000, p. 68)

theory of challenge-hindrance stressors, where demanding work can bring potential gain for individuals. Perhaps this theory also applies to the research population. On the other hand, work can also become loading, where achievements of work are not necessarily linked to potential gains for individuals. Presumably, this research population, where most of the respondents are over 50 years old, the job demands' negative weight become fewer as the working life goes by. Perhaps they have already experienced the most stressful times at work and now they go with the flow as they have used to the manners of working life. Based on this similar logic, older work generation with steady work careers might not meet similar pressure and busyness in accelerated social life similarly as younger work generation who are facing modern challenges due to rapid technological development for example.

One explanation to home demands' stronger negative association with subjective vitality can be that the individuals do not enjoy completing housework or completing them is not an autonomous decision, which most likely affects well-being negatively (Pennonen, 2011; Sonnentag 2001). Also, workload affects the individual's attitude towards home demands (Pennonen, 2011). Job demands correlated positively with home demands, which reveals that one domain grows another domain's demands. The reason for this can be that both home and job demands appear at the same time in an individual's life. When there are job demands, there is less time for homework, which increases home demands. The same logic applies to other way around as well. Peeters's et al. (2015) explain that one domain's demands transition to another domain is a risk to well-being. However, home demands are not self-evidently a threat to well-being (Sonnentag, 2001).

#### 6.4 High home demands do not endanger subjective vitality remarkably when crafting for meaning is high

The interaction effect showed that the highest amount of subjective vitality is associated with low home demands and high crafting for meaning, and the lowest amount of subjective vitality is associated with high home demands and low crafting for meaning. Also, scholars, such as Petrou and Bakker (2016), investigated that demands, especially home demands, decrease leisure crafting. The explanation for this is logical as when demands grow, there is presumably less time for leisure or leisure crafting. Even the correlations between leisure crafting and demands, apart from the correlation between crafting for mastery and job demands, were negative, which proposes that

Petrou's and Bakker's investigation would apply in this data as well. However, the correlations were small and insignificant.

High crafting for meaning constituted a buffer for the negative relationship between home demands and subjective vitality. In other words, crafting for meaning is beneficial in relation to subjective vitality even when home demands are high. The result was unexpected. I anticipated that higher demands constitute an enhancer for the negative relationship between leisure crafting and subjective vitality. The results showed that during the times of high crafting for meaning, the level of subjective vitality does not fluctuate strongly between low home demands and high home demands. In other words, high home demands did not endanger the level of subjective vitality noticeably, if respondents crafted for meaning highly. Thus, the level of vitality was nearly similar with the group who experienced low home demands and high crafting for meaning.

Crafting for meaning buffered the negative effects of home demands on subjective vitality. Petrou's and Bakker's investigation of demands' negative effect on leisure crafting becomes interesting when being examined together with this thesis's results. Based on the results I propose that home demands are not always a threat to well-being, if the person manages to craft for meaning at the same time. This strengthens the idea that the most active people are the happiest (Garhammer, 2002) and that high demands and leisure crafting are not necessarily exclusive to each other. In fact, this result shows that leisure crafting, especially crafting for meaning, is beneficial in terms of vitality when demands and pressure specifically on behalf of home domain are high. However, home demands are found to affect well-being also positively based on earlier studies, which can explain partly the result. From this point of view, I assume that home demands have not been only a burden for respondents despite home demands' strong negative association with subjective vitality.

Iso-Ahola and Mannell (2004) state that if the person forces active leisure to happen while experiencing high demands, the attempt can be harmful to well-being (p. 196). However, the result did not support this idea strongly. High home demands do not necessarily exclude crafting for meaning if the housework is considered as a meaningful activity. Also, despite high demands, the participation to active leisure does not necessarily endanger well-being as long as the active leisure is meaningful. Iso-Ahola and Mannell might be right in their argument if crafting for meaning is replaced with crafting for mastery in moderator analysis. In fact, crafting for mastery's link to subjective vitality was tested with job demands and home demands in accordance with the second

research question. However, only one interaction term showed to be statistically significant. This means that job demands and crafting for meaning did not interact with each other in enhancing or buffering the effect on subjective vitality, nor did home demands or job demands interact with each other in enhancing or buffering the effect on subjective vitality.

## 6.5 Research strengths and limitations

Research's validity refers to how well the topic that was supposed to be investigated is actually researched. Internal validity indicates the research's own reliability, whereas external validity indicates research's generalization. In addition to validity, research's reliability refers to research's repeatability on different measurement points. It also refers to how reliable the research methods measure the phenomenon. (Metsämuuronen, 2003, p. 42 & 35.) From the validity's point of view, the thesis follows the regularity of academic research including literature review, data analysis and the results. Research questions support in cohesive development of research's structure. Measures and methods, that have been used in this thesis, are carefully chosen to serve the research frame and its target population. For instance, good values of Cronbach's alphas established the suitability of averaged variables in further statistical examination. Also, averaged variables were formed from the variables in the same scale. Linear regression analysis suited very well to the research frame as well, as the goal was to investigate the dependence between subjective vitality and other valid measures. The regression model's coefficient of determination was 24 percent, which is high enough to explain of the variation of the dependent variable.

Given research's reliability, the data being investigated is cross-sectional implying that the data consists of only one-time measurement of certain measurement points. The significances of statistical tests, including p-values and Cronbach's alphas, have proven that the reliability applies in this research. Together with a large number of respondents (N=541), the strength of certain phenomenon is more accurate and reliable within the population (Nummenmaa, 2004, p. 141—142), which strengthens the reliability of results and implications in the research. However, human behavior changes in accordance with the living environment and that is why these kinds of researches should be repeated over certain times. In addition, the research's results are drawn by one group's experiences. Hereby, the results cannot be generalized to the whole Finnish population.

The National Advisory Board on Research Ethics (2009) suggests three predominant principles: “respecting the autonomy of research subjects, avoiding harm, and privacy and data protection”. I was not personally responsible of the data collection, but I agreed to deal with the data confidentially in the data set transfer agreement. Therefore, the data set has been purposefully in my personal use. I have stored the data set in the file in my laptop, which is password protected. The laptop has not been kept in public premises, which would have increased the risk for theft. In other words, I have always carried the laptop with me safely and dealt with the data set in private spaces, for example when I work solo at home. In addition, the protection of privacy is ensured through the anonymization of data. Hence, there is no chance to track the respondents personally that have voluntarily agreed to respond to the surveys. Once the thesis is returned, I am going to destroy the data set from my computer so that I will not have access to it anymore.

Based on the Academy of Finland’s (2003) guidelines on research ethics, I have followed good scientific practice regarding honesty, general accuracy in research work and carefulness in presenting the results and saving them. I have also applied ethically sustainable, open and scientific procedures related to evaluation of measures, methods and results. In addition, I have noted Kuula’s (2011) recommendations on research ethics including respect of academic scholars’ scientific work in references and careful planning of the research frame. In practice, I have respected respondents’ subjective experiences by using relevant measures and methods in relation to the target population. For instance, the examination of subjective vitality, leisure crafting, home demands and job demands are well-grounded when the research population consists of workers and especially when other scholars have dealt with same topics in earlier studies as well. I have read literature versatilely and referred to the studies that are valid in term of the research frame and research questions without the danger of plagiarism. In addition, I have agreed that the relevancy of measures, methods and results is checked on behalf of the project’s head investigator Dr. Jessica De Bloom. This procedure ensures the validity, openness and honesty of the thesis’s scientific information.

In addition to strengths, there are also some limitations in the thesis that are important to acknowledge. The research population is skewed representing only certain qualities of Finnish workers. Thus, the data represents subjective experiences of workers and the results cannot be generalized to the whole population. For instance, the examination limits to persons that live around one of the biggest cities in Finland and mainly to female respondents. Gender distribution in data shows that the research questionnaire appealed to women. Also, binary gender was the only

way to examine gender as other genders and sexes were not significantly represented in this research population. Concerning variables' content, the examination of domestic partner allowed only the examination of a child, children and a spouse that live in the same household. However, it would have been important to take into account those individuals that have a child or children, or a spouse living in a different household because living separated might have similarly significant effects on well-being as living together. Indeed, spouses living separately, for example, is becoming gradually popular as workers mobility between workplaces increases because of the unstable labor market.

Some limitations are concerning also results and measures. For example, the results are based on one-time measurement which implies that the phenomena drawn from the results are not generally applicable as the relationships are not linear. Also, the differences of the sizes of coefficients both in regression analysis and in correlations coefficients are not huge, which implies that the differences presented in the discussion, for example between crafting for mastery and crafting for meaning, are not necessarily strong in daily practice. In addition, measures of crafting for mastery and crafting for meaning were formed based on a new scale of off-job crafting that has not been tested in earlier studies. However, similar kind of scales, such as Petrou's and Bakker's (2016) leisure crafting -scale, which is closely related to off-job crafting -scale, has been used in earlier studies.

## 6.6 Practical implications and future research

Leisure is an important field of research among workers because it is central domain of life in addition to work. The behaviors during leisure determine the quality of other domains, such as work and family life. The DRAMMA-model, that consisted of six psychological mechanisms (detachment, relaxation, autonomy, mastery, meaning and affiliation), suggested that leisure is positively linked to well-being through the fulfillment of mechanisms (Newman et al., 2014). The model fits well to the research frame that investigates well-being effects of leisure, which increases our understanding of psychological mechanisms' role in leisure life. The results strengthened that the examination of the link between leisure crafting and well-being is essential as the research showed that different types of crafting habits affect the level of well-being differently. The DRAMMA-model's psychological mechanisms' association with well-being through leisure



crafting should be examined in addition to mastery and meaning in future studies as deeper understanding of leisure's benefits would help individuals to avoid negative outcomes of leisure.

In addition, the role of home demands and job demands in relation to well-being and leisure behavior varies between individuals, which is always an important topic of further study because altogether these components form worker's everyday life and it is useful to gain information about these components' relationship to well-being in order to avoid negative health symptoms. In the case of this study, home demands turned out to be more harmful in terms of subjective vitality compared to job demands, which is a very interesting result. This thesis brought new light on the relationship between leisure crafting and well-being when a third part, job demands or home demands, is involved. The results showed that the level of subjective vitality is not necessarily endangered when home demands are high, if the level of crafting for meaning is also high.

This research covered only certain workers' subjective experiences in Pirkanmaa region, which is one of the biggest regions in Finland. The results can be different in more isolated countryside, not to mention other cultures and countries. Due to this, similar research should be conducted also in different regions, areas and countries. For example, leisure crafting behavior might be different in the countryside because there might be fewer opportunities for leisure activities and thus the life might be less accelerated. In addition, the working life balance between leisure and work might be different in some other country, which affects leisure crafting behavior and well-being.

Stronger representation of private sector workers, high management professions and male workers, as well as of workers with temporary work contracts would have perhaps brought something new alongside the existing results. For example, the role of home demands and job demands might alter between public and private sector workers, blue collar and high management workers and female and male workers. Also, the importance of leisure crafting and its emphasis might differ between similar groups. I also believe that if there were more respondents with temporary work contracts represented in data, the level of subjective vitality and the role of leisure crafting would have been different compared to those with a permanent work contract. The examination of subjective vitality does not necessarily indicate comprehensively an individual's state of well-being. Thus, leisure crafting's well-being effects should be investigated also from the aspect of psychological symptoms and social well-being in the future.

Collection of longitudinal data should be considered in further study as for now the cross-sectional data only focuses examining relationships of one-time measurement over the period of past month. Thus, the longitudinal data would show comprehensively if the quality of respondents' reply changes during the data collection. In this way, the examination of results would be more objective due to the investigation of causal relations. For now, non-linear relationships might contain sudden and surprising events, which would not show similarly in linear relationships. In addition, the examination of qualitative data would have complemented this research's results as it could have deepened the aspect of the motives for certain kinds of leisure crafting behaviors. Hence, further research should focus on what are the respondents' motivations to do a certain kind of leisure crafting. We might need to look deeper what are the factors affecting the motives for leisure behaviors. Thus, the examination between speed up of life, leisure crafting and well-being in an individual's life becomes crucially significant. In this way we would understand which qualities increase social acceleration and to what kind of leisure goals these qualities guide us. The existing research frame, as well as future studies, should also be tested among other groups in addition to workers, such as unemployed people, students or volunteer workers.

Themes of the thesis covered the fields of social policy, psychology and work-life research, which adds the thesis's value in many layers of society. Research results benefit workers in Western societies, as thesis's population represented Finnish workers. With the help of this research, workers can realize how to balance work domain and non-work domain with the help of leisure crafting and what are the benefits of crafting for mastery and crafting for meaning in relation to well-being. Due to this research's results, I encourage workplaces to educate their workers in leisure crafting. In addition, I hope that the leisure domain will be even more significant field of research in the work-life research, and that different work organizations and employers would pay more attention to the importance of leisure's role in worker's life together with family and home domains.

## 7. Conclusions

The thesis showed that psychological mechanisms of the DRAMMA-model, meaning and mastery, have a positive association with subjective vitality through leisure crafting. On the contrary, home and job demands have a negative association with vitality among respondents. However, leisure

crafting, specifically high crafting for meaning, protected the level of vitality despite high home demands. Due to the hypothetical factors of mastery's downsides including requirement of effort, engagement and time devotion connected to social acceleration and serious leisure, crafting for mastery was less beneficial for subjective vitality than crafting for meaning. According to this result, I believe that when it comes to the workers' well-being, recovery and detachment of work, the most essential thing is to spend leisure meaningfully. In other words, the experience that one can get from the certain activity and the attitude towards the activity is crucial, not the activity itself. For instance, one's motivation for mastering, such as learning to play guitar, must derive from genuine willingness to learn rather than forcing oneself to learn. Leisure should not be experienced with maximum efficiency especially when we are exposed to home demands and job demands. However, the busy lifestyle of workers in Western societies is easily followed by leisure intensification. We might cram our schedule full of activities, spend our time to activities that are not necessarily meaningful, and try to endlessly seek for activities where we can master our skills. This thesis introduced us to leisure crafting, which is proposed to be a relevant solution for protecting well-being in worker's everyday life, especially when today's working life is mentally very demanding.

The results of the thesis are challenging the modern development of social acceleration in the home-, job- and leisure domain. With the help of the results, one can improve the quality of life, which will bring positive societal results in relation to maintaining workability and work well-being. I have personally learned that leisure is crucial domain alongside other spheres of life, which is why it should be re-considered in everyone's life in order to keep the leisure domain separate from other domains. I think that authentic happiness and well-being are followed by presence and perseverance in anything we do during leisure. I also think that the newest skill that we should learn is the skill for relaxation and grounding instead of multitasking and hastening. We would benefit of constantly reflecting our behavior during leisure unless we want to drift along with the modern challenges that our environment feeds us. The awareness of this thesis's results helps individuals, families, organizations and societies to increase well-being through leisure crafting. Hopefully the findings will also help institutions to reorganize in the long run and see the importance of leisure and how it is spent. Future studies should scrutinize our leisure behavior and find out comprehensively which factors are predicting our leisure behavior by combining the knowledge of social sciences and psychology. Hence, we will gather a stronger understanding of cause-and-effect relationships related to leisure behavior and well-being, and thus scholars are able to give clearer proposals of the most useful ways to craft one's leisure.

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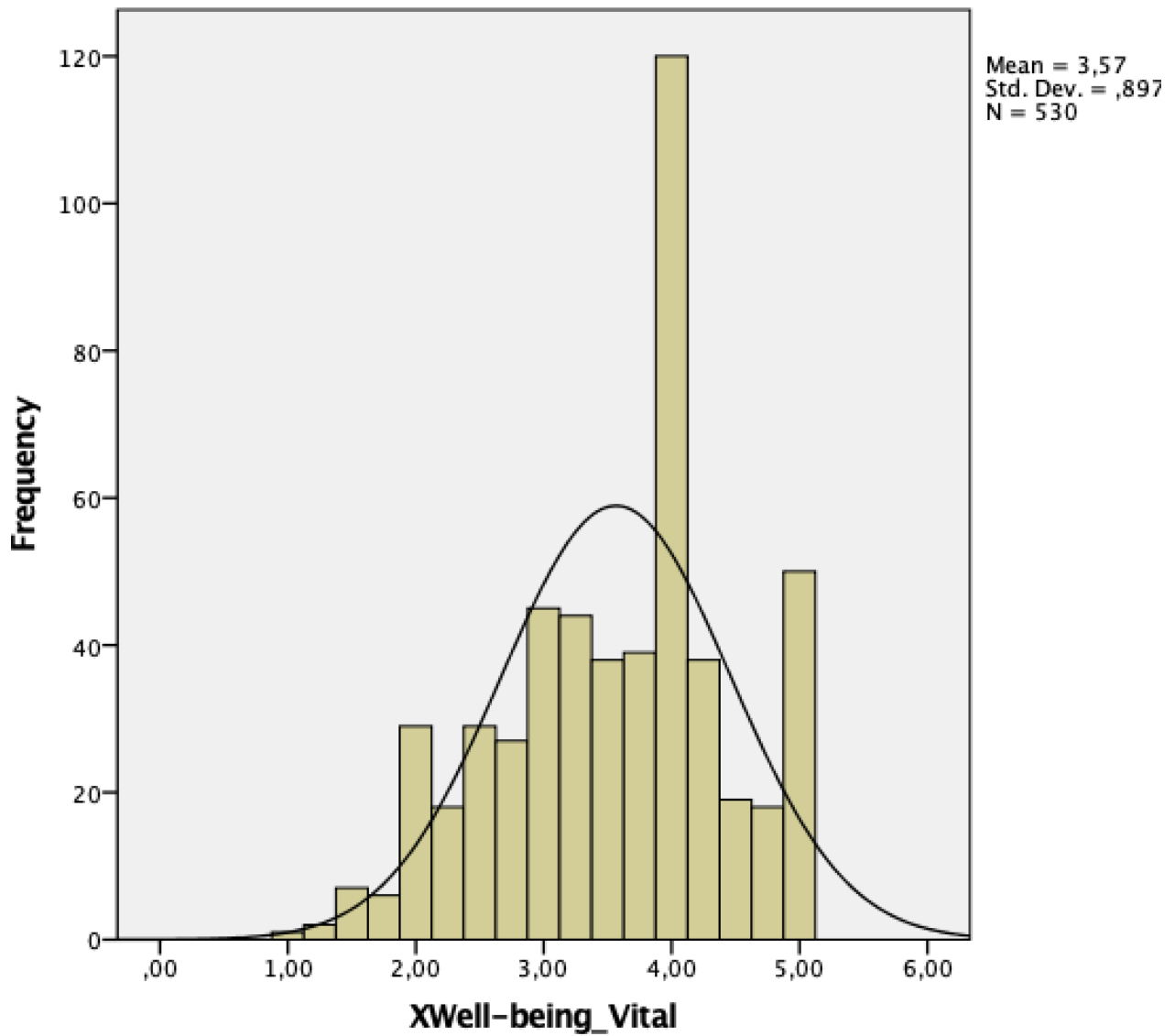


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## Appendix

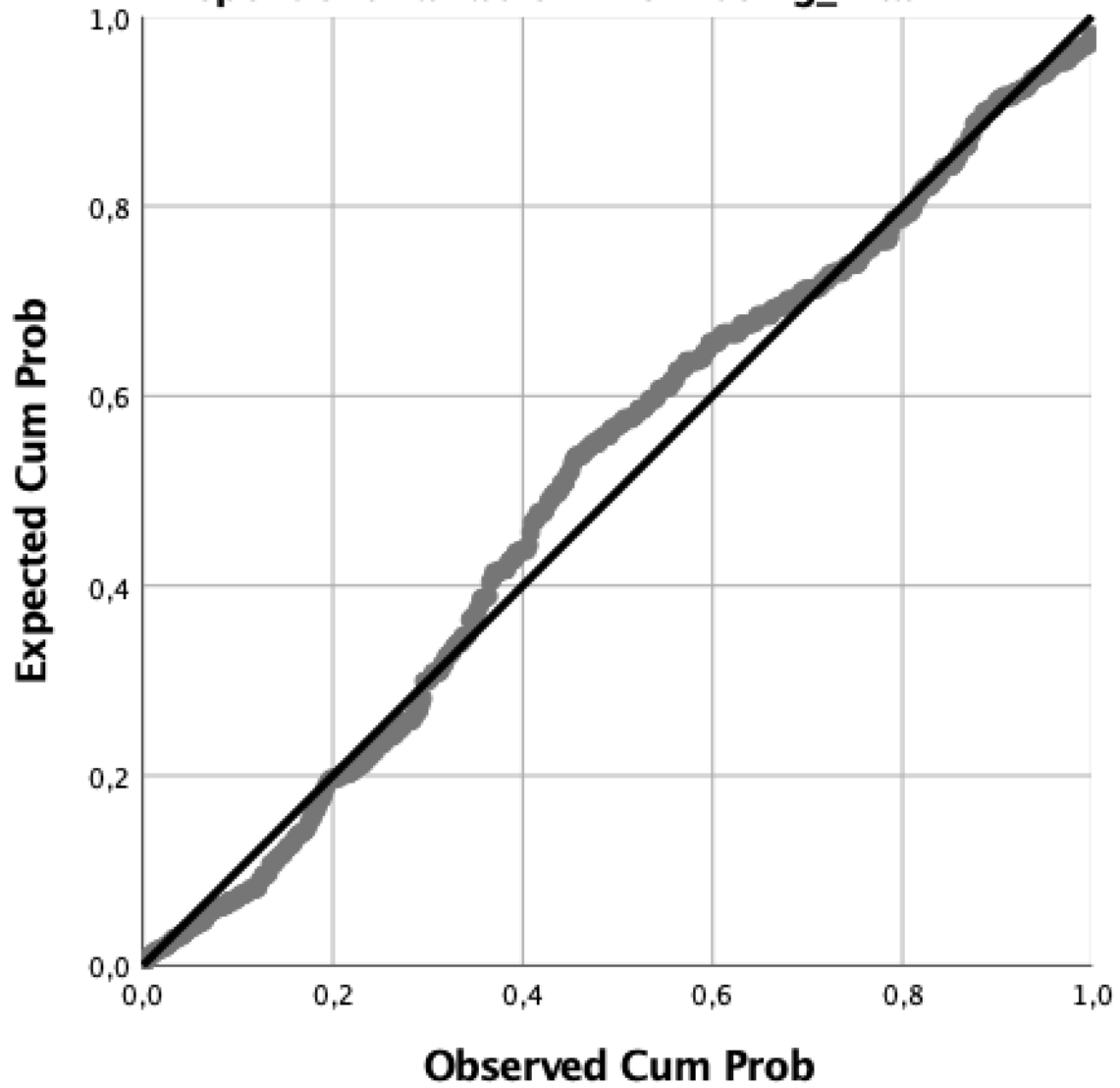
Graph 1. Subjective vitality's Gaussian curve.



Graph 2. Residual between subjective vitality and home demands.

### Normal P-P Plot of Regression Standardized Residual

Dependent Variable: XWell-being\_Vital



Graph 3. Reference picture of variables' outliers from box plot.

