# / The implication of overtime for well-being and desired working hours among office workers: The role of temporal flexibility 

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#### Abstract

Based on the Job Demands-Resources Model (Demerouti et al. 2001), we argue that overtime work is a job demand that negatively relates to employees' well-being and increases their desire to reduce their working hours. However, we argue that self-determined temporal flexibility enables individuals to cope with extended working hours. We hypothesized that temporal flexibility weakens the relationships between overtime and the desire to reduce working hours and conducted a survey among 159 Austrian employees who indicated that they did not desire to increase their working hours. In line with prior research, our results show that overtime relates negatively to employees' reported health, sleep quality, and work-life balance and positively to their desire to reduce actual working hours. Moreover, we found convex relationships between overtime hours and the desired reduction of actual and contractual working hours. Self-determined temporal flexibility was able to buffer the effects of overtime on the desire to reduce contractual working hours, which suggests that self-determined temporal flexibility is a job resource that enables employees to cope with work demands, albeit only when they do not become too intense.


Keywords: Overtime work, workload, temporal flexibility, reduction of working hours

## Die Auswirkung von Überstunden auf das Wohlbefinden und die gewünschten Arbeitszeiten von

 Büroangestellten: Die Rolle der zeitlichen Flexibilität
## Zusammenfassung

Basierend aufdem Job Demands-Resources Modell(Demeroutiet al. 2001) gehen wir davon aus, dasslängere Arbeitszeiten in Form von Mehrarbeit und Überstunden eine Arbeitsanforderung in derheutigen Arbeitswelt darstellen und sich negativ auf das Wohlbefinden von Arbeitnehmer*innen auswirken und mit dem Wunsch nach einer Arbeitszeitverkürzung einhergehen. Selbstbestimmte zeitliche Flexibilität hingegen wird als Arbeitsressource verstanden und wir nahmen an, dass diese Flexibilität die Beziehung zwischen längeren Arbeitszeiten und einer gewünschten Reduzierung der Arbeitszeit abschwächt. Die Analyse der Daten von 159 österreichischen Arbeitnehmer*innen, die angaben, ihre Arbeitszeit nicht erhöhen zu wollen, zeigte, dass Mehrarbeit und Überstunden negativ mit Gesundheit, Schlaf und Work-Life-Balance zusammenhängen. Die Beziehung zwischen längeren Arbeitszeiten und der gewünschten Reduzierung der tatsächlichen und vertraglichen Arbeitszeit war konvex. Selbstbestimmte zeitliche Flexibilität erwies sich als Puffer zwischen längeren Arbeitszeiten in Form von Mehrarbeit und Überstunden und gewünschter Reduzierung der tatsächlichen und vertraglichen Arbeitszeit. Das weist daraufhin, dass selbstbestimmte zeitliche Flexibilität eine Arbeitsressource darstellt und bei der Bewältigung von Arbeitsanforderungen unterstützt, jedoch nur, wenn diese nicht zu stark ausgeprägt sind.

Schlagwörter: Mehrarbeit, Überstunden, Arbeitsbelastung, zeitliche Flexibilität, Arbeitszeitverkürzung

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## 1. Introduction

Time is a scarce resource that needs to be distributed wisely. Working time determines our daily routines such as when we get up in the morning and when we go to sleep, but also how much time we have for recovery and our personal lives. Thus, a wide variety of research has investigated different aspects of working time such as the impact of the number of working hours in general (Fein/Skinner 2015: 448), shift work (e.g., Costa 2010: 112; Itani/Kaneita 2016: 231), long working hours (e.g., Bannai/Tamakoshi 2014: 5; Sato et al. 2020: 1), and overtime work (Wong et al. 2019: 1). Research, for instance, has demonstrated that long working hours are linked to poorer occupational health (Wong et al. 2019: 12) and overtime work to poorer sleep quantity, increased sleepiness, and exhaustion (Dahlgren et al. 2006: 318), as well as reduced employee satisfaction (Ko/Choi 2018: 282). Moreover, numerous studies demonstrate adverse effects on several aspects of mental health, such as depressiveness (Kikuchi et al. 2020: 1; Virtanen et al. 2012: 1).

In Austria, the number of working hours is relatively high compared to other European countries (Eurofound 2017) and overtime work is common (Lewis et al. 2008: 29). In 2021, for instance, Austrian employees worked almost 200 million overtime hours (Statistik Austria 2022) and $14.9 \%$ of employees reported having worked overtime (Statista 2022). However, research shows that overtime work impacts well-being negatively (e.g., Golden/Wiens-Tuers 2008: 25; Ohta et al. 2015: 297). Thus, we consider working overtime as a job demand and assume that employees aim to avoid working overtime and rather strive for a reduction of their working hours when they actually work more hours than stipulated in their work contract. In order to shed light on the relationship between overtime work and the desire to reduce working hours, we distinguish between a desired reduction in actual and contractual working hours and propose that overtime work positively relates to a desired reduction in both actual and contractual working hours. However, based on the Job Demands-Resources Model (Demerouti et al. 2001), we consider self-determined temporal flexibility at work as a resource that helps employees to cope with the demand of overtime work and thus attenuates the relationship between overtime work and a desired working hour reduction.

The present study aims to make the following contributions. Firstly, the study examines the relationship
between overtime work and several indicators of wellbeing among a unique sample of Austrian employees, which consists of mostly highly educated white-collar workers, and hence adds to the existing literature that associates overtime work with detrimental effects on health and well-being. In particular, we investigate non-linear effects of overtime, which differentiates the present study from previous studies. We define overtime as the surplus of hours worked on top of the contractually agreed working hours. Secondly, we examine overtime work as a potential antecedent of desired working time reduction. By complementing the quantitative results with qualitative data, we shed light on factors that speak for or hinder a reduction in working hours. Thirdly, this study examines the role of temporal flexibility and investigates whether employees' selfdetermined flexibility regarding their schedule and working hours enables them to cope with extended working hours. We thereby aim to further broaden the knowledge regarding the effects of self-determined temporal flexibility and provide useful insight into how to support employees with high workloads.

## 2. Theoretical background

2.1 Effects of overtime work

The Job Demands-Resources Model (JD-R; Demerouti et al. 2001) states that every job is characterized by job demands and resources. Job resources make it easier to cope with job demands and enable individuals to meet their work goals (Bakker/Demerouti 2007: 312, 2017: 273) and lead to motivation and well-being. Conversely, job demands may lead to strain and exhaustion (Bakker/Demerouti 2007:312) and refer to the physical, psychological, social, or organizational factors of a job that require employees to expend effort and that entail physical or psychological costs (Bakker/Demerouti 2007: 312). Working hours determine how long effort has to be expended and, thus, may be characterized as a primary job demand (Valcour 2007: 1512). We argue that this assertion can be extended to overtime work, i.e., hours that employees work in addition to their contractual obligations, because overtime work further determines how long employees have to exert themselves and even specifies how many hours they work on top of the contractually agreed hours.

Empirical findings support this reasoning. Although overtime work has been positively associated with expected future income (Pannenberg 2005: 177), there is widespread evidence that working overtime results in negative consequences for employee wellbeing and health. Overtime work has been related to poorer mental and physical health of employees (Ohta et al. 2015: 197; Taris et al. 2011: 352), as well as an increased risk of occupational injuries (Adane et al. 2013: 4; Dembe et al. 2005: 588; Shin et al. 2020: 658; Wu et al. 2018: 346). Moreover, there is consistent evidence that working hours, in particular long working hours, impair work-life balance (e.g., Albertsen et al. 2008: 14; Voydanoff 2004: 398) and result in work-family conflict (Golden/Wiens-Tuers 2008: 25; Grzywacz/Marks 2000: 111) and work-home interference (Van der Hulst/ Geurts 2001: 227). We aim to generate further evidence concerning these associations and hypothesize that overtime work negatively relates to several indicators of well-being and satisfaction.

Hypotheses 1a-c: Overtime work relates negatively to employees' (a) health, (b) sleep, and (c) work-life balance.

The same line of reasoning may be applied to the relationship between overtime work and a desired reduction in working hours. The reduction in working hours has gained increasing attention, particularly in popular media (e.g., Sommavilla 2021), and several countries have either implemented or begun testing various reduction schemes (e.g., Allinger 2021; Goodbody 2021; Thaler 2021). The underlying mechanisms that may explain why individuals seek to decrease their working hours, however, have rarely been studied. Employees may be motivated to decrease their working hours because shorter working hours ensure that more time can be spent on recovery and rest, as well as having more time available for family, friends, and hobbies, which promises better work-life balance (Albertsen et al. 2008: 14). Moreover, shorter working hours imply less strain and, in turn, better mental and physical health (Jansen-Preilowski et al. 2020: 339). We argue that a reduction in working hours may be appealing to individuals who work overtime. Employees who are required to work overtime face high work demands (in the form of working hours) and may therefore be motivated to decrease their actual working hours, even though monetary and career concerns may make a reduction less appealing (Pannenberg 2005: 177). Consequently, we hypothesize a positive relation-
ship between overtime work and a desired reduction in working hours.

Hypotheses 2a-b: Overtime work relates positively to a desired reduction in (a) actual and (b) contractual working hours.

### 2.2 Flexible working hours as a lever to cope with overtime work

In recent years, the psychological outcomes of work flexibilization have received much attention from researchers. There is a trend toward flexibilization and employees, particularly knowledge and office workers, now experience more flexibility regarding when, where, and how they perform their work duties (Allvin et al. 2013: 100; Putnam et al. 2014: 414). Due to the widespread use of information and communication technologies (ICT), many employees can perform their work tasks anytime and anywhere. Flexibility at work, also referred to as time-spatial flexibility, was further accelerated during the COVID-19 pandemic (Eurofound 2020). Although the pandemic mostly affected where employees worked, the shift toward spatial flexibility often increased temporal flexibility as well. Empirical evidence shows inconsistent effects of temporal flexibility, for instance on well-being (Anderson et al. 2015: 883; ter Hoeven/van Zoonen 2015: 237) and performance (De Menezes/Kelliher 2011: 460). While increasing flexibilization of work may entail new cognitive demands for employees to structure, plan, and coordinate their work, it may also increase people's motivation and, thereby, positively affect engagement (Prem et al. 2021: 13). Flexibilization enabled by ICT usage weakens boundaries between work and private life (Hellemans et al. 2019: 326; Nam 2014: 1028). This may hinder detachment and recovery after work (Mellner et al. 2016: 29) and, paradoxically, employees may find their autonomy threatened by the constant availability enabled by the use of ICT (Mazmanian et al. 2013: 1337).

However, this blurring of boundaries is not necessarily negative (Spilker 2016: 15) and flexibilization may simultaneously enable employees to gain control and autonomy over their schedules. Autonomy, or a sense of choice and volition (Ryan/Deci 2000: 70), has been positively associated with motivation, well-being, and performance (Van den Broeck et al. 2016: 1211). According to the Job Demands-Resources Model (Demerouti
et al. 2001), autonomy, as a job resource, buffers the negative effect of job demands on well-being (Bakker et al. 2005: 170; ter Hoeven/van Zoonen 2015: 237) and Dettmers and colleagues (2020: 809) found that work schedule flexibility can buffer the effect of demands on fatigue. Moreover, control over one's own schedule and working hours has been associated with a better worklife balance (Albertsen et al. 2008: 14; Allen et al. 2013: 345), work-related well-being (Kim et al. 2020: 892), and job satisfaction (Irak/Mantler 2018: 838).

Distinguishing between flexibility that is directed by others and flexibility that is directed by oneself may be vital for understanding the effects of flexibility. Indeed, research suggests that employees who are required to be temporally flexible are more exhausted and less satisfied than employees who can determine their working hours autonomously (Saupe/Stadler 2016: 130, 135). A cluster analysis shows that employees are least satisfied (with their lives, work, and work-life balance) when they can neither determine their working hours nor their place of work but are required to adjust their schedules flexibly to meet external requirements compared to individuals who can autonomously plan their work with or without external demands for flexibility (Hartner-Tiefenthaler et al. 2016: 158). Thus, self-determined flexibility constitutes a job resource for employees. In the case of overtime work, we argue that employees' ability to determine their own work schedules and working hours enables them to cope with extended working hours because it allows them to arrange their working hours autonomously according to their personal needs. Thus, self-determined flexibility may weaken the relationship between overtime hours and a desired reduction in working hours.

To account for employees' preferences, we investigate the desired reduction in actual working hours as well as the desired reduction in contractual working hours. Actual work reduction might not always include a reduction in pay as overtime work is often inadequately or not at all remunerated (Brautzsch et al. 2012: 308; Schönauer et al. 2016: 148). However, when employees aim for a reduction in contractual working hours, an accompanying reduction in pay is likely. Thus, we assume that the effect on actual working hours is stronger, albeit the proposed relationships are the same.

Hypotheses 3a-b: Self-determined temporal flexibility weakens the positive relationship between overtime work and a desired reduction in (a) actual and (b) contractual working hours.

## 3. Method

### 3.1 Procedure and sample

Participants were recruited via email from a list of participants from prior studies conducted by the Chamber of Labor for Lower Austria and the TU Wien. In addition, a link to the study was distributed online via social media. Prospective participants were informed that they were eligible to enter a raffle for a gift certificate for a grocery store chain ( $10 \mathrm{x} €_{50}$ ).

In total, 238 participants completed the online questionnaire between April 20 and May 6, 2021. We excluded 55 participants because they either indicated that they were neither employed nor selfemployed (i.e., unemployed or other), that they were currently doing short-time work due to the ongoing COVID-19 pandemic, or because they either failed to indicate their working hours or indicated that their contractual or actual working hours were zero. Moreover, we excluded 24 participants who indicated that they desired an increase in either their actual or contractual working hours ${ }^{1}$ because our aim was to study the effects of overtime work as a demand. We assume that individuals who desire an increase in their working hours do not perceive overtime hours as demanding. Therefore, we opted to exclude their data in our analyses. This yielded a final sample of $\mathrm{N}=159$ participants.

Of the final sample, $61.0 \%$ were women. The participants were aged between 20 and 63 years old ( $\mathrm{M}=42.01, \mathrm{SD}=10.97$ ). The sample was highly educated, with $74.8 \%$ having acquired at least a high school diploma (Matura) and/or university degree. 39.0\% of the respondents had at least one child. The respondents worked in various fields, the largest proportion came from the information and communication industry ( $15.2 \%$ ) and financial and insurance services ( $12.7 \%$ ). Participants' mean organizational tenure was 10.80 years ( $\mathrm{SD}=9.75$ ) and $15.8 \%$ indicated that they had leadership responsibilities. At the time of data collection, $35.8 \%$ of the participants worked (almost) exclusively from home, $29.6 \%$ worked at their organization's premises, and $29.6 \%$ worked both from home and at their organization's premises. Another $5.0 \%$ indicated that they worked from a different space. The high share of

1 We repeated all analyses including participants who indicated they desired to increase their contractual or actual working hours. The results are presented in the appendix.
individuals working remotely may be explained in part by the ongoing COVID-19 pandemic during the time of data collection.

### 3.2 Quantitative measures and analyses

### 3.2.1 Quantitative measures

Working hours, overtime work, and desired reduction in working hours: Contractual, actual, and desired working hours were each assessed with one item: "How many hours per week (a) are you contractually obligated to work, (b) do you actually work (including overtime hours), and (c) would you prefer to work if you had the choice?" To calculate the desired reduction in actual working hours, desired working hours were subtracted from actual working hours. To calculate the desired reduction in contractual working hours, desired working hours were subtracted from contractual working hours. To calculate overtime hours, contractual working hours were subtracted from actual working hours.

Work-life balance: We assessed work-life balance with one item that was adapted from Valcour (2007: 1517). The item read: "How satisfied are you with the balance between your job and personal life?" Participants responded on a 7 -point smiley scale (i.e., a smiling face indicating levels of satisfaction).

Sleep: To measure participants' subjective evaluations of their sleep, we assessed sleep quality and sleep quantity with one item each. Sleep quality was measured with one item adapted from Buysse et al.'s (1989: 210) Pittsburgh Sleep Quality Index. The item read: "How would you rate your sleep quality over the last two weeks?" Because we were interested in measuring participants' subjective overall evaluation of their sleep quantity, we developed one item that mirrored the structure of the sleep quality item, rather than measuring sleep length (e.g., Buyssee et al. 1989: 2010). The item read: "How would you rate the quantity of your sleep over the last two weeks?"). Participants indicated sleep quality and quantity on a 7 -point smiley scale. The two items were aggregated for analysis. To determine scale reliability, i.e., to what extent the items are related, we calculated Cronbach's alpha. Cronbach's alpha for the two-item scale was 0.89 .

Health: Participants rated their overall health with one item, adapted from Borg et al. (2000: 39) on a 7-point smiley scale: "How would you rate the state of your health over the last two weeks?"

Self-determined temporal flexibility: We used four items from the German flexible working scale from Gerdenitsch et al. (2014), which has been successfully used to assess self-determined working time flexibility (e.g., Hartner-Tiefenthaler et al. 2023: 5). One sample item reads "I have the option to organize my daily work hours autonomously." Participants indicated their response on a 7 -point Likert scale ranging from 1 $=$ not at all to $7=$ completely. Cronbach's alpha for the four-item scale was 0.92 .

Control variables: As control variables, we included gender and children living in the same household because prior research has indicated that these factors affect well-being (Wilks/Neto 2013: 875). We also included professional field, age, level of education, and place of residence as further control variables.

### 3.2.2 Quantitative data analysis

We used standardized values for all variables and analyses. Quadratic multiple regression analyses were performed to investigate the effects of overtime work on employees' health, sleep, work-life balance, and desired reduction in actual and contractual working hours. The regression equations for (a) the quadratic regression model and (b) the quadratic model with interaction term (moderation) read as follows ${ }^{2}$ :
(a) $\mathrm{Y}=\mathrm{m}_{1} \mathrm{x}_{1}+\mathrm{m}_{1} \mathrm{x}_{1}{ }^{2}+\mathrm{m}_{2} \mathrm{x}_{2}+$ $m_{3} x_{3}+m_{4} x_{4}+m_{5} x_{5}+m_{6} x_{6}+m_{7} x_{7}+b$
(b) $\mathrm{Y}=\mathrm{m}_{1} \mathrm{x}_{1}+\mathrm{m}_{1} \mathrm{x}_{1}{ }^{2}+\mathrm{m}_{\mathrm{w}} \mathrm{X}_{\mathrm{w}}+\mathrm{m}_{1} \mathrm{x}_{1}{ }^{*} \mathrm{~m}_{\mathrm{w}} \mathrm{X}_{\mathrm{w}}+\mathrm{m}_{1} \mathrm{x}_{1}^{2}$ ${ }^{*} \mathrm{~m}_{\mathrm{w}} \mathrm{X}_{\mathrm{w}}+\mathrm{m}_{2} \mathrm{X}_{2}+\mathrm{m}_{3} \mathrm{X}_{3}+\mathrm{m}_{4} \mathrm{X}_{4}+\mathrm{m}_{5} \mathrm{X}_{5}+\mathrm{m}_{6} \mathrm{X}_{6}+\mathrm{m}_{7} \mathrm{x}_{7}+\mathrm{b}$
$2 \mathrm{Y}=$ dependent variable, $\mathrm{m}=$ estimated slope, $\mathrm{b}=$ estimated intercept; $\mathrm{x}=$ predictor (1: overtime) and control variables (2: gender, 3: children, 4: age, 5: professional field, 6 : level of education, 7 : place of residence); $w=$ moderator (self-determined temporal flexibility)

### 3.3 Qualitative data and analysis

An open question was included in the survey to investigate employees' reasons, concerns, and needs regarding their working hours. The question read: "What reasons are there for your desired working hours and what prevents you from working your desired hours? Which factors affect considerations regarding your working hours? What would you need to be able to work your desired hours?"

For our analysis, we followed Mayring's (2015) qualitative content analysis, during which text is allocated to specific categories. Three categories were deductively established (monetary concerns, work-life balance concerns, and health concerns) based on prior research that links working time to salary (e.g., Pannenberg 2015: 177; Spurk/Abele 2011: 96), health (e.g., Ohta et al. 2015: 297; Taris et al. 2011: 352; Wong et al. 2019: 12), and work-life balance (e.g., Albertsen et al. 2008: 14). After viewing the data, the following four categories were inductively added: concerns regarding workload, customer demands, regulations and conventions, as well as other reasons. To capture interrater reliability, the categorization was performed by two independent raters, Cohen's kappa $\kappa=0.90$, indicating excellent agreement ${ }^{3}$ (Landis/Koch 1977: 165).

## 4. Results

Participants' contractual working time was, on average, 36.02 ( $\mathrm{SD}=6.37$ ) hours per week. Their actual working hours were longer with $\mathrm{M}=39.63$ ( $\mathrm{SD}=8.92$ ) and their desired working hours shorter with $M=31.00$ ( $\mathrm{SD}=7.72$ ). Women with children under the age of 14 more frequently worked part-time and worked fewer hours than women without children or men (women without children $\mathrm{p}_{\text {vert }}<0.001 ; \mathrm{p}_{\text {tats }}<0.001$; men with children: $p_{\text {vert }}<0.001 ; p_{\text {tats }}=0.003$; men without children: $\left.\mathrm{p}_{\text {vert }}<0.001 ; \mathrm{p}_{\text {tats }}<0.001\right)^{4}$. Overall, participants

[^2]worked, on average, 3.61 hours more than contractually obligated ( $\mathrm{SD}=5.74$ ). The desired reduction in contractual working time amounts to $\mathrm{M}=5.03$ ( $\mathrm{SD}=6.46$ ) working hours per week, and, for actual working time, to $\mathrm{M}=8.64$ ( $\mathrm{SD}=7.81$ ) working hours.

### 4.1 Effects of overtime work

Offering support for hypotheses 1 a and b , overtime work as well as its quadratic term ${ }^{5}$ significantly predicted health, $\beta_{\text {overtime }}=-0.20, p_{\text {overtime }}=0.01$; $\beta_{\text {overtime }}{ }^{26}=-0.18, p_{\text {overtime }}{ }^{2}=0.01$ and sleep, $\beta_{\text {overtime }}=-0.33$, $\mathrm{p}_{\text {overtime }}<0.001 ; \beta_{\text {overtime }}{ }^{2}=-0.19, \mathrm{p}_{\text {overtime }}{ }^{2}=0.02$. The results indicate that overtime only negatively affects health and sleep after a certain threshold and that few overtime hours do not negatively impact health and sleep. Providing support for hypothesis 1c, overtime predicted work-life balance, $\beta_{\text {overtime }}=-0.25, \mathrm{p}_{\text {overtime }}=$ o.002. We did not observe a quadratic effect of overtime on work-life balance, $\beta_{\text {overtime }}{ }^{2}=0.10, \mathrm{p}_{\text {overtime }}{ }^{2}=$ o.21, as can be seen in table 1 .

With regard to the relationship with the desired reduction in working hours, our results support hypothesis 2a. Overtime work and its quadratic term significantly predicted a desired reduction in actual working hours, $\beta_{\text {overtime }}=0.59, \mathrm{p}_{\text {overtime }}<0.001 ; \beta_{\text {overtime }}{ }^{2}$ $=0.29, \mathrm{p}_{\text {overtime }}{ }^{2}<0.001$, indicating that the relationship between overtime hours and a desired reduction in actual working hours becomes stronger with increasing overtime hours. Moreover, we found partial support for hypothesis 2 b . While overtime negatively predicted the desired reduction in contractual work hours, $\beta_{\text {overtime }}=$ $-0.18, \mathrm{p}_{\text {overtime }}=0.02$, the quadratic effect was positive, $\beta_{\text {overtime }}{ }^{2}=.35, \mathrm{p}_{\text {overtime }}{ }^{2}<0.001$. These results indicate that there is a negative relationship between overtime hours and a desired reduction in actual working hours for low overtime hours but an increasingly strong positive relationship after a certain threshold. The curvilinear relationships are visualized in Figure 1. Table 2 displays the results of the quadratic multiple regression analysis of overtime work predicting desired reduction in contractual and actual working hours.

[^3]Table 1. Regression coefficients for the multiple regression predicting health, sleep, and work-life balance.

| Predictor | Health |  |  |  | Sleep |  |  |  | Work-lifebalance |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\begin{gathered} B \\ \text { (std.) } \end{gathered}$ | Std. error | t | p | $\begin{gathered} \beta \\ \text { (std.) } \end{gathered}$ | Std. error | t | p | $\begin{gathered} \beta \\ \text { (std.) } \end{gathered}$ | Std. error | t | p |
| Constant |  | 0.08 | 0.04 | 0.97 |  | 0.08 | -0,39 | 0.69 |  | 0.08 | -0.07 | 0.94 |
| Overtime hours | -0.20 | 0.98 | -2.58 | 0.01 | -0.33 | 1.09 | -4.00 | <0.001 | -0.25 | 1.01 | -3.20 | 0.002 |
| Overtime hours ${ }^{2}$ | $\underline{-0.18}$ | 0.97 | $\underline{-2.36}$ | 0.02 | $\underline{-0.19}$ | 1.15 | $\underline{-2.38}$ | 0.02 | 0.10 | 0.10 | 1.25 | 0.21 |
| Gender | 0.15 | 0.08 | 1.88 | 0.06 | 0.11 | 0.08 | 1.32 | 0.19 | 0.01 | 0.08 | 0.17 | 0.87 |
| Age | -0,04 | 0.08 | -0.51 | 0.61 | 0.01 | 0.08 | 0.11 | 0.91 | 0.03 | 0.08 | 0.33 | 0.74 |
| Children | -0.08 | 0.08 | -1.05 | 0.30 | 0.04 | 0.08 | 0.51 | 0.61 | -0.07 | 0.08 | -0.83 | 0.41 |
| Level of education | 0.18 | 0.08 | 2.20 | 0.03 | 0.18 | 0.08 | 2.17 | 0.03 | 0.16 | 0.08 | 1.91 | 0.06 |
| Professional field | 0.03 | -0.08 | 0.35 | 0.73 | 0.02 | 0.08 | 0.25 | 0.81 | -0.04 | 0.08 | -0.53 | 0.60 |
| Place of residence | -0.03 | 0.08 | -0.43 | 0.67 | -0.01 | 0.08 | -0.16 | 0.87 | -0.01 | 0.08 | -0.17 | 0.87 |

The primary predictors are underlined. Significant predictors are bold. Health: $R^{2}=0.09, F(8,145)=2.97, p=0.004 ;$ sleep: $R^{2}=0.10, F(8,143)$ $=3.13, p=0.003 ;$ work-life balance: $R^{2}=0.05, F(8,147)=2.01, p=0.049$.

Table 2. Regression coefficients for the multiple regression predicting a desired reduction in contractual and actual working hours.

|  | Desired reduction in actualworking hours |  |  |  | Desired reduction in contractual working hours |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Predictor | $\begin{gathered} B \\ \text { (std.) } \end{gathered}$ | Std. error | t | p | $\begin{gathered} B \\ \text { (std.) } \end{gathered}$ | Std. error | t | p |
| Constant |  | 0.06 | 0.08 | 0.94 |  | 0.07 | 0.08 | 0.94 |
| Overtime hours | 0.59 | 0.78 | 9.45 | <. 001 | -0.18 | 0.95 | $\underline{-2.35}$ | 0.02 |
| Overtime hours ${ }^{2}$ | 0.29 | 0.78 | 4.62 | <. 001 | 0.35 | 0.95 | 4.62 | <. 0001 |
| Gender | 0.01 | 0.07 | 0.08 | 0.94 | 0.01 | 0.08 | 0.08 | 0.94 |
| Age | -0.09 | 0.07 | -1,37 | 0.17 | -0.11 | 0.08 | -1.37 | 0.17 |
| Children | 0.01 | 0.06 | 0.17 | 0.87 | 0.01 | 0.08 | 0.17 | 0.87 |
| Level of education | 0.02 | 0.07 | 0.31 | 0.76 | 0.02 | 0.08 | 0.31 | 0.76 |
| Professional field | 0.02 | 0.06 | 0.30 | 0.77 | 0.02 | 0.08 | 0.30 | 0.77 |
| Place of residence | 0.03 | 0.06 | 0.47 | 0.64 | 0.04 | 0.08 | 0,47 | 0.64 |

The primary predictors are underlined. Significant predictors are bold. Desired reduction in actual working hours: $R^{2}=.41, F(8,149)=14.37$, $p<0.001$; desired reduction in contractual working hours: $R^{2}=.13, F(8,149)=3.95, p<0.001$.


Figure 1. Plots of the quadratic relationships between overtime work and health (top left), sleep (top right), work-life balance (middle left), desired reduction in actual working hours (middle right), and desired reduction in contractual working hours (bottom).

## 4. 2 Flexible work hours as moderator

To test hypotheses 3 a and 3 b , we included interaction terms in the quadratic multiple regression analysis and investigated whether self-determined working time flexibility moderates the relationship between overtime work and the desired reduction in (a) actual and (b) contractual working hours. Table 3 displays the coefficients. Supporting hypothesis 3a, the results indicate that the convex relationship between overtime work and a desired reduction in actual working hours is stronger for individuals with high self-determined flexibility (see Figure 2). Similar results were found
for contractual working hours. In line with hypothesis 3 b, self-determined temporal flexibility moderated the effect of overtime work ${ }^{2}$ on the desired reduction in contractual working hours, $\beta=1.92, p=0.049$. Figure 2 visualizes the convex relationship that is stronger for individuals with high self-determined temporal flexibility.

### 4.3 Considerations regarding desired working hours

To explore the underlying reasons for reducing working hours, we asked participants which aspects determined their desired working hours and which

Table 3. Regression coefficients for the multiple regression predicting a desired reduction in contractual and actual working hours, including self-determined temporal flexibility as a moderator.

|  | Desired reduction in actual working hours |  |  |  | Desired reduction in contractual working hours |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Predictor | $\begin{gathered} \hline \beta \\ \text { (std.) } \end{gathered}$ | Std. error | t | p | $\begin{gathered} \beta \\ \text { (std.) } \end{gathered}$ | Std error | t | p |
| Constant | 0.03 | 0.06 | -0.49 | 0.63 | -0.04 | 0.07 | -0.49 | 0.63 |
| Overtime hours | 8.16 | 0.91 | 8.95 | <. 0001 | -1.31 | 1.10 | -1.19 | 0.24 |
| Overtime hours ${ }^{2}$ | $\underline{2.28}$ | 1.01 | 2.26 | $\underline{0.03}$ | $\underline{2.76}$ | $\underline{1.22}$ | 2.26 | $\underline{0.03}$ |
| Self-determined temporal flexibility | -0.04 | 0.07 | -0.68 | 0.50 | -0.05 | 0.08 | -0.68 | 0.50 |
| Overtime hours * self-determined flexibility | -0.89 | 0.81 | -1.11 | 0.27 | -1.08 | 0.97 | -1.11 | 0.27 |
| Overtime hours ${ }^{2 \star}$ <br> self-determined flexibility | 1.59 | 0.80 | 1.98 | 0.049 | 1.92 | 0.97 | 1.98 | 0.049 |
| Gender | 0.01 | 0.07 | 0.20 | 0.84 | 0.02 | 0.08 | 0.20 | 0.84 |
| Age | -0.06 | 0.07 | -0.87 | 0.38 | -0.07 | 0.08 | -0.87 | 0.38 |
| Children | 0.03 | 0.06 | 0.40 | 0.69 | 0.03 | 0.08 | 0.40 | 0.69 |
| Level of education | 0.02 | 0.07 | 0.30 | 0.77 | 0.02 | 0.08 | 0.30 | 0.77 |
| Professional field | 0.01 | 0.06 | 0.19 | 0.85 | 0.01 | 0.08 | 0.19 | 0.85 |
| Place of residence | 0.04 | 0.06 | 0.65 | 0.52 | 0.05 | 0.08 | 0.65 | 0.52 |

The primary predictors are underlined. Significant predictors are bold. Desired reduction in actual working hours: $\mathrm{R}^{2}=0.42$, $\mathrm{F}(11,145)=11.48, \mathrm{p}<0.001$; desired reduction in contractual working hours: $\mathrm{R}^{2}=0.14, \mathrm{~F}(11,145)=3.39, \mathrm{p}<0.001$.


Figure 2. Plot of the moderated quadratic regression of overtime work on a desired reduction in actual (left) and contractual (right) working hours for low, medium, and high self-determined temporal flexibility.
factors prevented them from working their desired number of hours. Moreover, we asked what they would need to work their preferred number of hours and then categorized their answers. A total of 113 individuals ( $72.0 \%$ ) provided answers to the open questions. Of those, $38.1 \%$ indicated monetary concerns, $31.9 \%$ workload, $20.4 \%$ regulations and conventions, $16.8 \%$ work-life balance concerns, $6.2 \%$ health concerns, $6.2 \%$ customer demands, and $14.2 \%$ indicated other reasons (see Table 4 for examples from the respondents' replies).

One reason given for a desired work reduction and for why respondents already worked under 40 hours per week encompassed the positive effect on their work-life balance. Managing professional duties
and family life seems to be a concern and being able to spend more time with family was mentioned as an advantage. Moreover, individuals indicated being able to pick up children from day care and having more time to care for elderly parents as further reasons. Finally, health concerns were brought up by some respondents. A reduction in working hours was considered beneficial for both mental and physical health.

On the other hand, monetary concerns seem to hinder a reduction in working hours. These concerns center on a reduced salary as a consequence of a reduction in working hours and seem to be particularly relevant for single parents. Other participants refer to the detrimental effect of a reduction in working hours

Table 4. Reasons and hindrances for a reduction in working hours.

| Reasons for | Work-life | better work-life balance"; "more leisure time"; "a better organization of |
| :--- | :--- | :--- |
| a reduction | balance | personal duties and interests"; "more time for myself and my interests"; "more <br> time for physical exercise"; "family"; "more time with family" |


| Mental and "health"; "mental and physiological health"; "work would be less physically |  |
| :--- | :--- |
| physical health | and mentally burdensome if work hours were reduced" |


| Hindrances <br> to a reduction | Monetary concerns | "salary"; "loss of salary"; "lower salary"; "income"; "smaller income"; "financial concerns"; "Because I am dependent on the money, I have to accept a 4Oh week"; "if I were to receive the same salary, I would work fewer hours"; "Single mother-reduced income would massively burden the household budget"; "my pension is already a catastrophe"; "negative consequences for |
| :---: | :---: | :---: |
|  | Workload | "workload"; "too much work to manage in 30h"; "work cannot be handled part-time"; "would not be able to complete all tasks"; "workload increased"; "staff shortages"; "understaffed"; "workload increased enormously and because of that [employees] have to work overtime regularly. However, contracts were not adapted"; "tasks cannot be managed in the allocated time"; "due to staff shortages, it would be fewer actual working hours, but overtime hours would be compensated worse" |
|  | Customer demands | "it depends on the number or wishes of customers"; "I am dependent on customers"; "in customer service you have to be available 40 hours [a week]" |
|  | Regulations and conventions | "societal conventions"; "what speaks against [a reduction] is the societal pressure to work full-time"; "it is unusual [...] to work less"; "the employer's consent", "boss does not consent"; "acceptance by my own supervisors and of the board"; "I wanted partial retirement, it was denied"; "I wanted parental part-time, but that was forbidden" |
| Other |  | "more flexibility"; "job is fun"; "corona crisis"; "lean structures"; "performancerelated pay"; "job change"; "I am part of a dual studies program"; "better stand-in"; "my wish for a reduction developed only recently because I want to become self-employed on the side"; "fixed days for working from home" |

on pension entitlements. Moreover, respondents indicated that a wage compensation is needed to facilitate a reduction in working hours. Only one participant noted that their high income rendered a reduced salary acceptable. Next to monetary concerns, workload seems to be an important factor in determining working hour preferences. Respondents indicated that they have to cope with a workload that cannot be handled in fewer hours and that workloads have increased in recent years, while noting that offices are understaffed. Participants also referred to overtime demands. One respondent, for instance, questioned whether a contractual reduction in working hours would lead to a reduction in actual work hours or if it would not, instead, increase the discrepancy between contractual and actual working hours. A few participants referred to customer demands that make a reduction unfeasible. Furthermore, societal conventions and company/ supervisor demands and expectations impede a worktime reduction. Several respondents indicated that they would need their employer to agree to and accept a reduction or that they were denied a reduction by their employer.

## 5. Discussion

This study aimed to investigate the relationships ${ }^{7}$ between overtime work and well-being as well as a desired reduction in working hours among Austrian white-collar workers who expressed no desire for an increase in their working hours. Further, we investigated the role of self-determined temporal flexibility as a potential lever to cope with extended work hours. In line with earlier empirical findings (e.g., Dahlgren et al. 2006: 318; Ohta et al. 2015: 297; Taris et al. 2011: 352; Wong et al. 2019:12), the present study found a negative relationship between overtime work and health as well as sleep. Moving beyond the previously established linear effects, we found that overtime hours only negatively affect health and sleep above a certain threshold and that the relationship becomes stronger with increasing overtime hours. Moreover, we found a negative relationship between overtime work and work-life

7 Mellner, C. (2016): After-hours availability expectations, work-related smartphone use during leisure, and psychological detachment: The moderating role of boundary control. International Journal of Workplace Health Management, 9 (2), 146-164.
balance, which provides further support for the wellestablished association between long working hours and several indicators of work-life imbalance (e.g., Albertsen et al. 2008: 14; Voydanoff 2004: 398), such as work-family conflict (Golden/Wiens-Tuers 2008: 25; Grzywacz/Marks 2000: 11) and work-home interference (Van der Hulst/Geurts 2001: 227). However, additional analyses indicate that the findings for health and work-life balance do not extend to individuals who aim to increase their working hours (see appendix for more detailed findings).

Various underlying mechanisms have been proposed and studied in an attempt to understand the negative health implications of long working hours and overtime work. We argued that working hours in general and overtime work in particular are primary job demands that have negative implications for well-being and motivation. In addition, scholars have proposed that when people work longer hours, they have less time for health behaviors, such as physical activity (Taris et al. 2011: 353). Others refer to the Effort-Recovery Model (Meijman/Muldner 1998), which asserts that individuals need to expend effort to be productive, but that this exertion is physically and psychologically demanding and entails short-term tolls, such as a depletion of energy. To reverse these consequences on their mental and physical health, individuals subsequently need to recover from the exertion (Zijlstra/Sonnentag 2006: 130). Recovery can take place during the working day, for instance in the form of breaks (Trougakos et al. 2014: 405), or after work (Sonnentag/Zijlstra 2006:331). If employees are not afforded sufficient possibilities for recovery, the consequences of continued exposure to job demands, such as a high workload, may persist. Supporting these basic premises, research links recovery to physical and psychological well-being as well as performance (Steed et al. 2021: 867) and insufficient recovery to fatigue (Bennet et al. 2018: 269). Recovery can only occur when individuals are no longer exposed to stressors for a certain period of time and no longer need to expend effort to cope with their workload. Long hours or working overtime lengthens the time span during which effort needs to be expended, while also shortening the hours left for recovery (Van der Hulst/Guerts 2001: 228). Accordingly, Rau and Triemer (2004: 51) link overtime work to negative effects and a poorer recovery.

While the adverse effects of overtime work on wellbeing had been established previously, we contribute to the literature by linking overtime work with employees'
desired working hours and investigating the link between overtime work and a desired reduction in working hours. As hypothesized, overtime work positively related to the desired reduction in actual working hours, i.e., individuals who had to work overtime desired a greater reduction in their actual working hours. However, similar to the effect on health and sleep, we only found a positive relationship above a certain threshold. Beyond this threshold, however, the relationship between overtime and a desired reduction in actual working hours becomes stronger with increasing overtime hours. Overtime hours were positively associated with a desired reduction in contractual working hours beyond a certain threshold. Below that threshold, the relationship was negative, i.e., for individuals who had to work few overtime hours, overtime was negatively related to a desired reduction in contractual working hours. Here it becomes apparent that distinguishing between contractual and actual working hours is necessary. Contractual hours (i.e., the number of hours that employees are contractually obligated to work) are the result of a conscious agreement between employer and employee and remain stable over time (unless the agreement is revoked). While employees' bargaining power may be affected by their financial and professional circumstances as well as the economic situation and conventions in certain professions (e.g., in retail), contractual working hours reflect the number of hours that employees have agreed and expect to work when entering into employment. Conversely, actual working hours may fluctuate depending on employer needs and workload and, thus, are less predictable. Moreover, a reduction in contractual working hours entails tangible and durable consequences because it directly affects income, while not necessarily changing the number of hours actually worked.

The reduction in actual working hours in the face of overtime work may reflect individuals' desire to reduce job demands and to increase time available for recovery and their personal lives. However, individuals who work overtime may not be interested in reducing their contractual working hours. The Effort-Reward Imbalance Model (Siegrist 1996) argues that the effort that employees need to expend ought to be met with corresponding rewards. Rewards may appear in the form of money, esteem, or career opportunities (van Vegchel et al. 2005: 1117). An imbalance between effort and rewards results in strain (Tsutsumi/Kawakami 2004: 2337; van Vegchel et al. 2005: 1117). With regard to working hours, contractual hours may reflect expected rewards (i.e., income and status),
while actual working hours reflect effort spent. Working overtime indicates increased effort, which may not be met with adequate rewards because overtime hours are often not adequately compensated (Brautzsch et al. 2012: 308; Schönauer et al. 2016: 148) or because the extra income does not justify the extra effort. Consequently, individuals who work overtime may be motivated to decrease their actual working hours. They might, however, not be interested in reducing their contractual working hours because they might fear that a reduction in contractual working hours would not entail a reduction in workload. Findings from the analysis of qualitative data corroborate this conjecture. Here, individuals frequently cited workload, staff shortages, and customer demands as factors that deter or prevent them from working their preferred hours or reducing their contractual working hours.

In addition to the direct relationships, we investigated self-determined temporal flexibility as a lever to cope with overtime work. Self-determined temporal flexibility may be of particular importance for employees with long working hours or employees who are required to work overtime. Correspondingly, we found that, below a certain threshold, overtime hours were associated with a lower desire to reduce actual working hours among individuals who experience high selfdetermined temporal flexibility. Similarly, self-determined temporal flexibility strengthened the convex relationship between overtime hours and the desire to reduce contractual working hours. In line with prior empirical observations that identified schedule flexibility (Dettmers et al. 2020: 809) and autonomy (Bakker et al. 2005: 176) as resources, our findings suggest that self-determined temporal flexibility is able to buffer the negative effects of overtime work on a desired reduction in actual and contractual working hours, likely because employees who experience temporal flexibility may decide for themselves when they work, which facilitates the maintenance of balance between extended working hours and private needs and obligations.

However, our findings highlight that this only applies when individuals have to work few overtime hours. Conversely, when individuals have to work many overtime hours, self-determined flexibility may even increase individuals' desire to reduce their contractual working hours. This mirrors research findings that suggest that too much autonomy and responsibility can have negative effects (Stiglbauer/Kovacs 2018: 520), probably because employees feel overwhelmed when
they are burdened not only with overtime hours but also the responsibility to plan, structure, and organize their working days as well (Prem et al. 2021: 1).

### 5.1 Limitations and future directions

This study generated valuable insights into potential consequences of overtime work and the role of self-determined temporal flexibility in reducing the impact of work demands, and was able to add qualitative findings regarding the underlying reasons for the desire of a reduction in working hours and common hindrance factors. Nevertheless, several limitations need to be considered. First, the present study is cross-sectional and therefore does not permit causal inferences. Secondly, we only included participants in the analysis who indicated no desire to increase either their actual or contractual working hours. Additional analyses suggest that the relationship between overtime hours and work-life balance may only be relevant for individuals who do not desire an increase in their working hours (see appendix). Moreover, the sample was not representative of all Austrian employees. Consequently, the findings may only be applicable to highly educated white-collar workers. Further studies ought to examine the conjectures of the present paper for a more diverse sample and extend the findings to other occupational groups. Thirdly, the observed effect of overtime hours on health should be regarded carefully as overall health was assessed only with one item and with regard to the previous two weeks. Respondents may have overestimated momentary health issues while undervaluing long-term health issues, such as chronic diseases. Lastly, data for this study was collected during the ongoing COVID-19 pandemic and during a time characterized by rather strict policies to prevent the spread of the virus. The ongoing threat of the virus and the restrictions imposed on everyone may have affected participants' responses and, thus, may have distorted our results.

Despite these limitations the present study sheds light on the consequences of overtime work and its relationship with a desire to reduce working time. Future research may consider including other factors, such as the role of pay, and adding to the findings of the present study by investigating the hypotheses of this study with a longitudinal design to determine the direction of the observed relationships as well as longterm effects. While we investigated the relationships between overtime work and the expected benefits of a
reduction in working hours (e.g., improved health and work-life balance), the effects of an actual reduction in working hours (either actual or contractual working hours) warrant investigation.

### 5.2 Practical implications

Several practical implications arise for managers and policymakers. Our findings corroborate prior research by negatively associating overtime work with health and work-life balance. Overtime work ought to be discouraged to reduce the discrepancy between actual and contractual working hours and to avoid impacts on employees' well-being. It is important to stress that contractual working hours reflect a conscious agreement between employees and employers. In general, besides issues of bargaining power, contractual working hours echo employees' needs (e.g., regarding income and time they need for recovery and the fulfillment of personal obligations). Thus, employers ought to respect and value employees' choices by not expecting them to work longer hours.

This being said, fluctuations in workload may not be avoidable at all times. We suggest that increasing employees' self-determined temporal flexibility may help employees to cope with high work demands for a limited period of time when workloads cannot be reduced and overtime cannot be avoided. However, regulations need to be put in place to avoid the extensive use of overtime and remove the perceived pressure to work overtime. Moreover, it needs to be ensured that overtime work is adequately compensated, either financially or by compensatory time off. It may also be advisable to discuss overtime demands with employees to determine whether and how many additional hours they are willing and able to work during times of high workload and to ensure that they are able to cope with varying actual working hours.

Generally, employees may benefit from schedule flexibility because it enables them to cope with work demands more effectively. Our results suggest that self-determined flexibility enables employees to work longer hours and even impacts their preferred working hours, i.e., employees with high temporal flexibility desire a smaller reduction in their working hours than employees with low temporal flexibility. This may be particularly relevant for employees with care responsibilities, such as caring for children. Even though the employment rates of women with children have risen over recent decades (Riederer/Berghammer 2020: 284),
women, and women with children in particular, still work part-time more often than men (Riederer/Berghammer 2020: 284; Stadler/Mairhuber 2017: 12). Riederer and Berghammer (2020: 284) find that mothers often work part-time for several years, and this not only impacts their career prospects and current financial situation (Bünning 2016: 597) but also entails negative consequences for pension entitlements (Sorger et al. 2020) and may explain why women are more often affected by poverty in old age (Zaidi 2010: 9). Increasing self-determined temporal flexibility at work may enable mothers to return to work and allow them to choose to work longer hours, which may protect them from poverty in old age.

While temporal flexibility may therefore be a useful lever to enable women with children to increase their working hours, organizations and governments need to address issues regarding overload strains. Because women in general, and mothers in particular, continue to provide more free labor (e.g., childcare, elder care, household chores) than men (Sorger et al. 2020), regulations and policies need to be implemented to ease their burden. Moreover, innovative or individualized working time arrangements may further allow employees to balance personal and professional demands. Encouraging fathers to decrease their working hours may help to distribute paid and unpaid labor more equally. Organizations could, for instance, support their employees by allowing them to vary their working hours across different life phases to flexibly match working hours and personal demands (Rump/Eilers 2016: 351-352). Thus, employees could increase their working hours flexibly when their work and career are more central to their lives but reduce their working hours during times in which other life domains, such as family, need particular attention.

## 6. Conclusion

In the present study, we investigated the effect of overtime and observed associations between overtime work and a desired reduction in actual and contractual working hours. We found non-linear, convex relationships between overtime hours and the desired reduction in actual and contractual working hours. In particular, we found that overtime hours only contributed to a desired reduction of actual working hours after a certain threshold. Moreover, overtime hours
were positively associated with a desired reduction in contractual working hours after a certain threshold, but negatively below this threshold. Turning to the analysis of qualitative data, we propose and discuss explanatory mechanisms suggesting that primarily monetary concerns and workload issues prevent individuals from working their desired quantity of hours. Our results reveal that self-determined temporal flexibility can buffer the effect of overtime work and the desire to reduce working hours, at least when individuals only have to work few overtime hours. Thus, flexible working hours function as a lever to cope with extended working hours and enable employees to deal with overtime work when it cannot be avoided. Because of the negative implication of overtime work and the limited power of self-determined temporal flexibility, we nonetheless stress the importance of reducing overtime to avert negative consequences for employees' wellbeing and health.

## 7. References

Adane, M. M./Gelaye, K. A./Beyera, G. K./Sharma, H. R./Yalew, W. W. (2013): Occupational injuries among building construction workers in Gondar City, Ethiopia. Occupational Medicine \& Health Affairs, 1 (5), 1000125.
Albertsen, K./Rafnsdóttir, G. L./Grimsmo, A./Tómasson, K./ Kauppinen, K. (2008): Workhours and worklife balance. Scandinavian Journal of Work, Environment \& Health Supplement, 5, 14-21.
Allen, T. D./Johnson, C. R./Kiburz, K. M./Shockley, K. M. (2013): Work-family conflict and flexible work arrangements: Deconstructing flexibility. Personnel Psychology, 66 (2), 345-376.
Allinger, B. (2021): Mehr Beschäftigung durch Arbeitszeitverkürzung: das Solidaritätsprämienmodell in der Praxis. Online: https://awblog.at/mehr-beschaeftigung-durcharbeitszeitverkuerzung/ [Jun 22, 2022].
Allvin, M./Mellner, C./Movitz, F./Aronsson, G. (2013): The diffusion of flexibility: Estimating the incidence of lowregulated working conditions. Nordic Journal of Working Life Studies, 3 (3), 99-116.
Anderson, A. J./Kaplan, S. A./Vega, R. P. (2015): The impact of telework on emotional experience: When, and for whom, does telework improve daily affective well-being? European Journal of Work and Organizational Psychology, 24 (6), 882-897.
Bakker, A.B./Demerouti, E./Euwema, M.C. (2005): Job resources buffer the impact of job demands on burnout.

Journal of Occupational Health Psychology, 10 (2), 170180.

Bakker, A. B./Demerouti, E. (2007): The Job Demands-Resources model: state of the art. Journal of Managerial Psychology, 22 (3), 309-328.

Bannai, A./Tamakoshi, A. (2014): The association between long working hours and health: A systematic review of epidemiological evidence. Scandinavian Journal of Work, Environment \& Health, 40 (1), 5-18.

Bennet, A. A./Bakker, A. B./Field, J. G. (2018): Recovery from work-related effort: A meta-analysis. Journal of Organizational Behavior, 39 (3), 262-275.
Borg, V./Kristenseon, T. S./Burr, H. (2000): Work environment and changes in self-rated health: A five year followup study. Stress Medicine, 16 (1), 37-47.
Brautzsch, H.-U./Drechsel, K./Schultz, B. (2012): Unbezahlte Überstunden in Deutschland. Wirtschaft im Wandel, 18 (10), 308-315.

Bünning, M. (2016): Die Vereinbarkeitsfrage für Männer: Welche Auswirkungen haben Elternzeiten und Teilzeitarbeit auf die Stundenlöhne von Vätern? Kölner Zeitschrift für Soziologie und Sozialpsychologie, 68 (4), 597-618.
Buysse, D. J./Reynolds, C. F./Monk, T. H./Berman, S. R./Kupfer, D. J. (1989): The Pittsburgh Sleep Quality Index: A new instrument for psychiatric practice and research. Psychiatry Research, 28 (2), 193-213.
Costa, G. (2010): Shift work and health: Current problems and preventive actions. Safety and Health at Work, 1 (2), 112-123.
Dahlgren, A./Kecklund, G./Åkerstedt, T. (2006): Overtime work and its effects on sleep, sleepiness, cortisol and blood pressure in an experimental field study. Scandinavian Journal of Work, Environment \& Health, 32 (4), 318-327.
Dembe, A. E./Erickson, J. B./Delbos, R. G./Banks, S.M. (2005): The impact of overtime and long work hours on occupational injuries and illnesses: New evidence from the United States. Occupational and Environmental Medicine, 62 (9), 588-597.
De Menezes, L. M./Kelliher, C. (2011): Flexible working and performance: A systematic review of the evidence for a business case. International Journal of Management Reviews, 13 (4), 452-474.
Demerouti, E./Bakker, A. B./Nachreiner, F./Schaufeli, W. B. (2001): The job demands-resources model of burnout. Journal of Applied Psychology, 86 (3), 499-512.
Dettmers, J./Wendt, C./Biemelt, J. (2020): Already exhausted when arriving at work? A diary study of morning demands, start-of-work-day fatigue and job performance and the buffering role of temporal flexibility. European Journal of Work and Organizational Psychology, 29 (6), 809-821.
Eurofound. (2017): European quality of life survey 2016: Quality of life, quality of public services, and quality of so-
ciety. Luxembourg: Publications Office of the European Union.
Eurofound. (2020): Living, working and COVID-19. CO-VID-19 series. Luxembourg: Publications Office of the European Union. Online: https://www.eurofound.euro-pa.eu/publications/report/2020/living-working-and-co-vid-19 [May 11, 2023].
Fein, E. C./Skinner, N. (2015): Clarifying the effect of work hours on health though work-life conflict. Asia Pacific Journal of Human Resources, 53 (4), 448-470.
Gerdenitsch, C./Dorn, R./Prem, R./Korunka, C. (2014): Flexible working - Autonomy and restriction? Paper presented in the context of the eleventh conference of the ÖGP.

Golden, L./Wiens-Teurs, B. (2008): Overtime work and wellbeing at home. Review of Social Economy, 66 (1), 25-49.
Goodbody, W. (2021): Pilot programme to test four-day working week. RTE. Online: https://www.rte.ie/news/ business/2021/0622/1229588-four-day-work-week-ireland/ [Jun 22, 2022].
Grzywacz, J. G./Marks, N. (2000): Reconceptualising the work-family interface: An ecological perspective on the correlates of positive and negative spillover between work and family. Journal of Occupational Health Psychology, 5 (1), 111-126.

Hartner-Tiefenthaler, M./Mostafa, A. M. S./Koeszegi, S. T. (2023): The double-edged sword of online access to work tools outside work: The relationship with flexible working, work interrupting nonwork behaviors and job satisfaction. Frontiers in Public Health, 10, 1035989.
Hartner-Tiefenthaler, M./Feuchtl, S./Koeszegi, S. T. (2016): Von Avantgarde bis Fremdbestimmt: Chancen und Risiken unterschiedlicher Arbeitstypen. WISO 4/2016, 154-169.

Hellemans, C./Flandrin, P./van de Leemput, C. (2019): ICT use as mediator between job demands and work-life balance satisfaction. In: Nah, F. H./Siau K. (eds.). HCI in Business, Government and Organizations. Information Systems and Analytics. HCII 2019. Lecture Notes in Computer Science, vol. 11589: Cham: Springer International Publishing, 326-337.
Irak, D./Mantler, J. (2018): The role of temporal flexibility on person-environment fit and job satisfaction. Journal of Management \& Organization, 24 (6), 829-845.
Itani, O./Kaneita, Y. (2016): The association between shift work and health: A review. Sleep and Biological Rhythms, 14, 231-239.
Jansen-Preilowski, V. V./Paruzel, A./Maier, G. W. (2020): Arbeitseitgestaltung in der digitalisierten Arbeitswelt: Ein systematisches Literatur Review zur Wirkung von Arbeitszeitverkürzung in Bezug auf die psychische Gesundheit. Gruppe. Interaktion. Organisation. Zeitschrift für Angewandte Organisationspsychologie (GIO), 51, 331-343.
Kikuchi, H./Odagiri, Y./Ohya, Y./Nakanishi, Y./Shimomitsu, T./Theorell, T./Inoue, S. (2020): Association of overtime work hours with various stress responses in 59,021 Japa-
nese workers: Retrospective cross-sectional study. PLoS ONE, 15 (3), e0229506.
Kim J./Henly J. R./Golden, L.M./Lambert, S. J. (2020): Workplace flexibility and worker well-being by gender. Journal of Marriage and Family, 82 (3), 892-910.
Ko, Y. J./Choi, J. N. (2019): Overtime work as the antecedent of employee satisfaction, firm productivity, and innovation. Journal of Organizational Behavior, 40 (3), 282-295.
Landis, J.R./Koch, G.G. (1977): The measurement of observer agreement for categorical data. Biometrics, 33 (1), 159-174.
Lewis, J./Campbell, M./Huerta, C. (2008): Patterns of paid and unpaid work in Western Europe: Gender, commodification, preferences and the implications for policy. Journal of European Social Policy, 18 (1), 21-37.
Mayring, P. (2015). Qualitative Inhaltsanalyse. Grundlagen und Techniken. Weinheim: Beltz Verlagsgruppe.
Mazmanian, M./Orlikowski, W. J./Yates, J. (2013): The autonomy paradox: The implications of mobile email devices for knowledge professionals. Organization Science, 24 (5), 1291-1600.

Meijman, T. F./Mulder, G. (1998): Psychological aspects of workload. In Drenth, P. J. D./Thierry, H./De Wolff, C. J. (eds.): Handbook of work and organizational psychology. Vol 2: Work psychology, (2nd ed.). Over: Psychology Press, 5-33.
Mellner, C. (2016): After-hours availability expectations, work-related smartphone use during leisure, and psychological detachment: The moderating role of boundary control. International Journal of Workplace Health Management, 9 (2), 146-164.
Nam, T. (2014): Technology use and work-life balance. Applied Research in Quality of Life, 9, 1017-1040.
Ohta, M./Higuchi, Y./Yamato, H./Kumashiro, M./Sugimura, H. (2015): Sense of coherence modifies the effect of overtime work on mental health. Journal of Occupational Health, 57 (3), 297-301.
Pannenberg, M. (2005): Long-term effects of unpaid overtime evidence for West Germany. Scottish Journal of Political Economy, 52 (2), 177-193.
Prem, R./Kubicek, B./Uhlig, L./Baumgartner, V./Korunka, C. (2021): Development and initial validation of a scale to measure cognitive demands of flexible work. Frontiers in Psychology, 12.
Riederer, B./Berghammer, C. (2020): The part-time revolution: Changes in the parenthood effect on women's employment in Austria across the birth cohorts from 1940 to 1979. European Sociological Review, 36 (2), 284-302.
Putnam, L. L./Myers, K. K./Gailliard, B. M. (2014): Examining the tensions in workplace flexibility and exploring options for new directions. Human Relations, 67 (4), 413-440.
Rau, R./Triemer, A. (2004): Overtime in relation to blood pressure and mood during work, leisure, and night time. Social Indicators Research, 67, 51-73.

Ryan, R.M./Deci, E. L. (2000): Self-determination theory and the facilitation of intrinsic motivation, social development, and well-being. American Psychologist, 55 (1), 68-78.
Rump J./Eilers S. (2016): Flexible Arbeitszeitmodelle - Die Lebensphasenorientierte Personalpolitik als ganzheitlicher Ansatz zum Umgang mit dem Wandel in der Arbeitswelt. In: Klaus, H./Schneider H. J. (eds.): Personalperspektiven: Human Resource Management und Führung im ständigen Wandel. Wiesbaden: Springer Gabler, 347-358.
Sato, K./Kuroda, S./Owan, H. (2020): Mental health effects of long work hours, night and weekend work, and short rest periods. Social Science \& Medicine, 246, 112774.
Saupe, B./Stadler, B. (2016): Flexible Arbeitszeiten - die Perspektive der ArbeitnehmerInnen: Endbericht im Auftrag der Arbeiterkammer Wien, Niederösterreich und Oberösterreich. FORBA-Forschungsbericht 11/2016.
Schönauer, A./Astleithner, F./Nocker, M./Mairhuber, I./Mittelberger, T. (2016): Überstunden und Mehrarbeitsstunden in Österreich: Entstehung und Verbreitung in Österreich; Umgang im internationalen Vergleich. Report no. 5. FORBA.
Shin, S./Oh, S. J./Kim, J./Lee, I./Bae, S.-H. (2020): Impact of nurse staffing on intent to leave, job satisfaction, and occupational injuries in Korean hospitals: A cross-sectional study. Nursing \& Health Sciences, 22 (3), 658-666.
Siegrist, J. (1996): Adverse health effects of high-effort/lowreward conditions. Journal of Occupational Health Psychology, 1 (1), 27-41.
Sommavilla, F. (2021): Vier Tage Arbeit, drei Tage frei: Ist die Zeit reif für die Viertagewoche? Online: https://www. derstandard.at/story/2000125616439/vier-tage-arbeit-drei-tage-frei-ist-die-zeit-reif [Jun 22, 2022].
Sonnentag, S./Zijlstra, F. R. H. (2006): Job characteristics and off-job activities as predictors of need for recovery, wellbeing, and fatigue. Journal of Applied Psychology, 91 (2), 330-350.
Sorger, C./Bergmann, N./Danzer, L. (2020): Teilzeitbeschäftigung in Niederösterreich: "Teilzeit - ist das wirklich mein Wunsch?" Online: https://noe.arbeiterkammer.at/ teilzeitstudie [Jun 16, 2022].
Spilker, M. (2016): Epilog: Am Beginn einer neuen Zeit-Rechnung. In Seiler, M. (ed.): Wem gehört die Zeit? Stuttgart: Schäffer-Poeschel, 15-34.
Stadler, B./Mairhuber, I. (2017): Arbeitszeiten von Paaren. Aktuelle Verteilungen und Arbeitszeitwünsche. FORBA.
Statista (2022). Anteil der unselbständigen Überstunden-/ Mehrstundenleistenden in Österreich nach Geschlecht von 2011 bis 2021. Online: https://de-statista-com/statis-tik/daten/studie/829410/umfrage/ueberstundenquote-in-oesterreich-nach-geschlecht/ [Jan 24, 2023].

Statistik Austria (2022). Geleistete Arbeitszeit, Arbeitsvolumen, Überstunden. Online: https://www.statistik.at/sta-tistiken/arbeitsmarkt/arbeitszeit/geleistete-arbeitszeit-arbeitsvolumen-ueberstunden [Jan 24, 2023].

Spurk, D./Abele, A.E. (2011): Who earns more and why? A multiple mediation model from personality to salary. Journal of Business and Psychology, 26 (1), 87-103.
Steed, L. B./Swider, B. W./Keem S./Liu, J. T. (2021): Leaving work at work: A meta-analysis on employee recovery from work. Journal of Management, 47 (4), 867-897.
Stiglbauer B/Kovacs C. (2018). The more, the better? Curvilinear effects of job autonomy on well-being from vitamin model and PE-fit theory perspectives. Journal of Occupational Health Psychology, 23 (4), 520-536.
Taris, T. W./Ybema, J. F./Beckers, D. G. J./Verheijden, M. W./ Geurts, S. A. E./Kompier, M. A. J. (2011): Investigating the associations among overtime work, health behaviors, and health: A longitudinal study among full-time employees. International Journal of Behavioral Medicine, 18 (4), 352-360.
ter Hoeven, C. L./van Zoonen, W. (2015): Flexible work designs and employee well-being: Examining the effects of resources and demands. New Technology, Work and Employment, 30 (3), 237-255.
Thaler, S. (2021): Nach Experiment in Island: Viertagewoche bleibt für viele Beschäftigte. Online: https://www. derstandard.at/story/2000128010173/nach-experiment-in-island-viertagewoche-bleibt-fuer-viele-beschaeftigte [Jun 22, 2022].
Trougakos, J. P./Hideg, I./Cheng, B. H./Beal, D. J. (2014): Lunch breaks unpacked: The role of autonomy as a moderator of recovery during lunch. Academy of Management Journal, 57 (2), 405-421.
Tsutsumi, A./Kawakami, N. (2004): A review of empirical studies on the model of effort-reward imbalance at work: Reducing occupational stress by implementing a new theory. Social Science \& Medicine, 59 (11), 2335-2359.
Van den Broeck, A./Ferris, D. L./Chang, C.-H./Rosen, C. C. (2016): A review of self-determination theory's basic psychological needs at work. Journal of Management, 42 (5), 1195-1229.

Valcour, M. (2007): Work-based resources as moderators of the relationship between work hours and satisfaction with work-family balance. Journal of Applied Psychology, 92 (6), 1512-1523.
Van der Hulst, M./Geurts, S. (2001): Associations between overtime and psychological health in high and low reward jobs. Work \& Stress, 15 (3), 227-240.
Van Vegchel, N./de Jonge, J./Bosma, H./Schaufeli, W. (2005): Reviewing the effort-reward imbalance model: Drawing up the balance of 45 empirical studies. Social Science \& Medicine, 60, 1117-1131.
Virtanen, M./Stansfeld, S. A./Fuhrer, R./Ferrie, J. E./Kivimäki, M. (2012): Overtime work as a predictor of major depressive episode: A 5 -year follow-up of the Whitehall II study. PLoS ONE, 7 (1), e30719.
Voydanoff, P. (2004): The effect of work demands and resources on work-to-family conflict and facilitation. Journal of Marriage and Family, 66 (2), 398-412.

Wilks, D. C./Neto, F. (2013): Workplace well-being, gender and age: Examining the "double jeopardy" effect. Social Indicators Research, 114, 875-890.
Wu, Y./Zhengh, J./Liu, K./Baggs, J. G./Liu, J./Lui, X./You, L. (2018): The association of occupational hazards and injuries with work environments and overtime for nurses in China. Research in Nursing \& Health, 41 (4), 346-354.
Wong, K./Chan, A. H. S./Ngan, S. C. (2019): The effect of long working hours and overtime on occupational health: A meta-analysis of evidence from 1998 to 2018. International Journal of Environmental Research and Public Health, 16 (12), 2102.
Zaidi, A. (2010): Poverty Risks for Older People in EU Countries - An Update. Policy Brief 1/2010. Vienna: European Centre.
Zijlstra, F. R. H./Sonnentag, S. (2006): After work is done: Psychological perspectives on recovery from work. European Journal of Work and Organizational Psychology, 15 (2), 129-138.
8. Appendix
8.1 Means, standard deviations, and correlations of the study variables

| Variable | M | $S D$ | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 | 15 | 16 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| 1. Gender | 1.39 | 0.49 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 2. Age | 42.01 | 10.97 | 0.14 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 3. Children | 0.61 | 0.49 | -0.15 | -0.19 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 4. Level of education | 3.98 | 1.07 | -0.20 | -0.20 | -0.00 |  |  |  |  |  |  |  |  |  |  |  |  |  |
| 5. Professional field | 6.65 | 3.27 | -0.13 | 0.12 | -0.13 | -0.01 |  |  |  |  |  |  |  |  |  |  |  |  |
| 6. Place of residence | 4.06 | 2.43 | 0.05 | -0.12 | -0.02 | 0.23** | -0.03 |  |  |  |  |  |  |  |  |  |  |  |
| 7. Contractual working hours | 36.02 | 6.37 | 0.24** | -0.09 | 0.29** | -0.03 | -0.07 | 0.16* |  |  |  |  |  |  |  |  |  |  |
| 8. Actual working hours | 39.63 | 8.92 | 0.17* | 0.00 | 0.17* | -0.03 | -0.06 | 0.18* | 0.77** |  |  |  |  |  |  |  |  |  |
| 9. Desired working hours | 31.00 | 7.72 | $0.21^{* *}$ | 0.05 | 0.17* | -0.05 | -0.07 | 0.11 | 0.60** | 0.57** |  |  |  |  |  |  |  |  |
| 10. Desired reduction in contractual working hours | 5.03 | 6.46 | -0.01 | -0.14 | 0.08 | 0.03 | 0.01 | 0.02 | 0.28** | . 08 | -0.61 ** |  |  |  |  |  |  |  |
| 11. Desired reduction in actual working hours | 8.64 | 7.81 | -0.01 | -0.04 | 0.02 | 0.01 | -0.01 | 0.09 | 0.29** | 0.58** | -0.34** | 0.59** |  |  |  |  |  |  |
| 12. Overtime hours | 3.60 | 5.74 | 0.00 | 0.10 | -0.06 | -0.02 | -0.02 | 0.11 | 0.08 | 0.70** | 0.22** | -0.18* | 0.58** |  |  |  |  |  |
| 13. Self-determined temporal flexibility | 4.17 | 1.87 | 0.01 | -0.12 | 0.08 | 0.19* | -0.08 | 0.09 | 0.10 | -0.05 | 0.07 | 0.01 | -0.13 | -0.19* |  |  |  |  |
| 14. Employee health | 4.60 | 1.65 | 0.12 | -0.04 | -0.12 | 0.17* | 0.02 | 0.01 | -0.05 | -0.17 | 0.02 | -0.08 | -0.22* | -0.21* | 0.20** |  |  |  |
| 15. Sleep | 4.37 | 1.59 | 0.09 | -0.04 | 0.04 | 0.14 | 0.01 | -0.01 | 0.11 | -0.09 | 0.08 | 0.01 | -0.18* | $-0.28^{*}$ | 0.22** | 0.62** |  |  |
| 16. Satisfaction with work-life balance | 4.81 | 1.55 | -0.00 | -0.03 | -0.05 | 0.14 | -0.03 | -0.01 | -0.15 | -0.27** | -0.02 | -0.12 | -0.28* | $-0.25^{*}$ * | 0.33** | 0.50** | 0.52** |  |

8.2 Regression coefficients for the multiple regression predicting health, sleep, and work-life balance for the sample including participants who indicated a desired increase in their actual or contractual working hours.

| Predictor | Health |  |  |  | Sleep |  |  |  | Work-life balance |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\beta$ (Std.) | Std. error | t | $p$ | $\beta$ (Std.) | Std. error | t | $p$ | $\beta$ (Std.) | Std. error | t | p |
| Constant |  | 0.07 | 0.02 | 0.99 |  | 0.07 | -0.34 | 0.73 |  | 0.07 | -0.04 | 0.97 |
| Overtime hours | $\underline{-0.08}$ | $\underline{0.96}$ | $\underline{-1.14}$ | $\underline{0.26}$ | $\underline{-0.17}$ | 1.03 | $\underline{-2.37}$ | 0.02 | $\underline{-0.14}$ | $\underline{1.02}$ | $\underline{-1.90}$ | $\underline{0.06}$ |
| Overtime hours ${ }^{2}$ | $\underline{-0.27}$ | 0.95 | $\underline{-3.73}$ | $\leq 0.001$ | $\underline{-0.30}$ | $\underline{1.04}$ | $\underline{-4.06}$ | $\leq .001$ | $\underline{-0.11}$ | $\underline{1.01}$ | $\underline{-1.43}$ | $\underline{0.16}$ |
| Gender | 0.14 | 0.07 | 1.93 | 0.05 | 0.11 | 0.07 | 1.53 | 0.13 | 0.01 | 0.08 | 0.08 | 0.93 |
| Age | -0.03 | -0.07 | -0.34 | 0.74 | 0.04 | 0.07 | 0.59 | 0.55 | 0.02 | 0.08 | 0.20 | 0.84 |
| Children | -0.11 | 0.07 | -1.54 | 0.13 | 0.04 | 0.07 | 0.51 | 0.61 | -0.03 | 0.08 | -0.33 | 0.74 |
| Level of education | 0.19 | 0.08 | 2.47 | 0.01 | 0.19 | 0.08 | 2.58 | 0.01 | 0.11 | 0.08 | 1.45 | 0.15 |
| Professional field | 0.02 | 0.07 | 0.24 | 0.81 | -0.002 | 0.07 | -0.03 | 0.97 | 0.01 | 0.08 | 0.18 | 0.86 |
| Place of residence | -0.06 | 0.07 | -0.86 | 0.39 | -0.05 | 0.07 | -0.72 | 0.47 | -0.03 | 0.08 | -0.35 | 0.73 |

The primary predictors are underlined. Significant predictors are bold. Health: $\mathrm{R}^{2}=0.12, \mathrm{~F}(8,168)=3.88, \mathrm{p}<0.001$; sleep: $\mathrm{R}^{2}=0.11, \mathrm{~F}(8$, $166)=3.78, \mathrm{p}<0.001$; work-life balance: $\mathrm{R}^{2}=0.002, \mathrm{~F}(8,171)=1.07, \mathrm{p}=0.39$.
8.3 Regression coefficients for the multiple regression predicting a desired reduction in actual and contractual working hours for the sample including participants who indicated a desired increase in their actual or contractual working hours.

| Predictor | Desired reduction in actual working hours |  |  |  | Desired reduction in contractual working hours |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\begin{gathered} \boldsymbol{\beta} \\ \text { (Std.) } \end{gathered}$ | Std. error | t | $p$ | $\begin{gathered} \boldsymbol{\beta} \\ \text { (Std.) } \end{gathered}$ | Std. error | t | $p$ |
| Constant |  | 0.06 | 0.07 | 0.94 |  | 0.07 | 0.07 | 0.95 |
| Overtime hours | 0.58 | 0.83 | 9.48 | $\leq 0.001$ | $\underline{-0.21}$ | 0.98 | -2.84 | $\underline{0.005}$ |
| Overtime hours ${ }^{2}$ | $\underline{0.09}$ | $\underline{0.82}$ | $\underline{1.44}$ | $\underline{0.15}$ | $\underline{0.10}$ | $\underline{0.97}$ | 1.44 | $\underline{0.15}$ |
| Gender | 0.04 | 0.06 | 0.63 | 0.53 | 0.05 | 0.08 | 0.63 | 0.53 |
| Age | -0.12 | 0.06 | -1.89 | 0.06 | -0.14 | 0.08 | -1.89 | 0.06 |
| Children | 0.12 | 0.06 | 1.87 | 0.06 | 0.14 | 0.07 | 1.87 | 0.06 |
| Level of education | 0.04 | 0.06 | 0.62 | 0.54 | 0.05 | 0.08 | 0.62 | 0.54 |
| Professional field | 0.05 | 0.06 | 0.79 | 0.43 | 0.06 | 0.07 | 0.79 | 0.43 |
| Place of residence | 0.05 | 0.06 | 0.75 | 0.46 | 0.06 | 0.07 | 0.75 | 0.46 |

The primary predictors are underlined. Significant predictors are bold. Desired reduction in actual working hours: $\mathrm{R}^{2}=0.34, \mathrm{~F}(8,173)=$ $12.43, \mathrm{p}<0.001$; desired reduction in contractual working hours: $\mathrm{R}^{2}=0.08, \mathrm{~F}(8,173)=2.87, \mathrm{p}=0.005$.
8.4 Regression coefficients for the multiple regression predicting a desired reduction in contractual and actual working hours, including selfdetermined temporal flexibility as a moderator.

| Predictor | Desired reduction in actual working hours |  |  |  | Desired reduction in contractual working hours |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\beta$ | Std. error | t | $p$ | $\beta$ | Std. error | t | $p$ |
| Constant | -0.03 | 0.06 | -0.45 | 0.65 | -0.03 | 0.07 | -0.45 | 0.65 |
| Overtime hours | 7.87 | $\underline{0.80}$ | 9.80 | $\leq 0.001$ | $\underline{-2.73}$ | $\underline{0.95}$ | $\underline{-2.88}$ | $\underline{0.004}$ |
| Overtime hours ${ }^{2}$ | 1.48 | $\underline{0.82}$ | $\underline{1.81}$ | $\underline{0.07}$ | 1.75 | $\underline{0.97}$ | 1.81 | $\underline{0.07}$ |
| Self-determined temporal flexibility Overtime hours * | -0.07 | 0.06 | -1.12 | 0.26 | -0.07 | 0.07 | -1.12 | 0.26 |
| self-determined flexibility | -3.84 | 0.85 | -4.50 | < 0.001 | -4.52 | 1.00 | -4.50 | < 0.001 |
| $\frac{\text { Overtime hours }^{2} *}{\frac{\text { self-determined }}{\text { flexibility }}}$ | 4.04 | 1.21 | 3.35 | 0.001 | 4.77 | 1.43 | 3.35 | 0.001 |
| Gender | 0.06 | 0.06 | 1.00 | 0.32 | 0.07 | 0.07 | 1.00 | 0.32 |
| Age | -0.06 | 0.06 | -1.04 | 0.30 | -0.07 | 0.07 | -1.04 | 0.30 |
| Children | 0.13 | 0.06 | 2.21 | 0.03 | 0.15 | 0.07 | 2.21 | 0.03 |
| Level of education | 0.04 | 0.06 | 0.61 | 0.54 | 0.04 | 0.07 | 0.61 | 0.54 |
| Professional field | 0.04 | 0.06 | 0.78 | 0.44 | 0.05 | 0.07 | 0.76 | 0.44 |
| Place of residence | 0.07 | 0.06 | 1.19 | 0.24 | 0.08 | 0.07 | 1.19 | 0.24 |

The primary predictors are underlined. Significant predictors are bold. Desired reduction in actual working hours: $\mathrm{R}^{2}=0.42, \mathrm{~F}(11,169)=$ $12.70, \mathrm{p}<0.001$; desired reduction in contractual working hours: $\mathrm{R}^{2}=0.18, \mathrm{~F}(11,169)=4.54, \mathrm{p}<0.001$.
8.5 Means and standard deviations for contractual working hours, actual working hours, overtime hours, desired working hours, desired reduction in contractual working hours, and desired reduction in actual working hours for women and men with and without children.

|  | $N$ | Contractual working hours |  | Actual working hours |  | Overtime hours |  | Desired working hours |  | Desired reduction in contractual working hours |  | Desired reduction in actual working hours |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | M | SD | M | SD | M | SD | M | SD | M | SD | M | SD |
| Women with children | 32 | 30.61 | 7.82 | 35.31 | 9.96 | 4.70 | 5.32 | 27.16 | 8.22 | 3.45 | 5.58 | 8.16 | 7.33 |
| Women without children | 65 | 36.86 | 5.86 | 39.91 | 9.21 | 3.05 | 5.89 | 30.95 | 8.49 | 5.90 | 8.06 | 8.95 | 8.12 |
| Men with children | 30 | 37.10 | 5.64 | 40.37 | 7.33 | 3.27 | 4.36 | 31.67 | 5.93 | 5.43 | 4.35 | 8.70 | 7.34 |
| Men without children | 32 | 38.73 | 2.16 | 42.69 | 7.17 | 3.95 | 6.94 | 34.27 | 5.31 | 4.47 | 5.00 | 8.42 | 8.38 |

8.6 Distribution of contractual, actual, and desired working hours for women and men with and without children.

|  |  | $N$ | Contractual working hours |  | Actual working hours |  | Desired working hours |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Frequency | Percentage | Frequency | Percentage | Frequency | Percentage |
| Women with children | Up to 20h |  |  | 5 | 15.6 | 2 | 6.3 | 8 | 25.0 |
|  | $>20$ to 30h |  | 11 | 34.4 | 10 | 31.3 | 16 | 50.0 |
|  | $>30$ to 36h | 32 | 6 | 18.8 | 8 | 25.0 | 5 | 15.6 |
|  | $>36$ to 40h |  | 10 | 31.3 | 4 | 12.5 | 3 | 9.4 |
|  | $>40 \mathrm{~h}$ |  | 0 | 0.0 | 8 | 25.0 | 0 | 0.0 |
| Women without children | Up to 20h |  | 2 | 3.1 | 3 | 4.6 | 10 | 15.4 |
|  | $>20$ to 30h |  | 10 | 15.4 | 5 | 7.7 | 20 | 30.8 |
|  | $>30$ to 36h | 65 | 6 | 9.2 | 9 | 13.8 | 17 | 26.2 |
|  | $>36$ to 40h |  | 45 | 69.2 | 20 | 30.8 | 17 | 26.2 |
|  | $>40 \mathrm{~h}$ |  | 2 | 3.1 | 28 | 43.1 | 1 | 1.5 |
| Men with children | Up to 20h |  | 1 | 3.3 | 1 | 3.3 | 2 | 6.7 |
|  | $>20$ to 30h |  | 3 | 10.0 | 2 | 6.7 | 15 | 50.0 |
|  | $>30$ to 36h | 30 | 2 | 6.7 | 3 | 10.0 | 6 | 20.0 |
|  | $>36$ to 40h |  | 21 | 70.0 | 9 | 30.0 | 7 | 23.3 |
|  | $>40 \mathrm{~h}$ |  | 3 | 10.0 | 15 | 50.0 | 0 | 0.0 |
| Men without children | Up to 20h |  | 1 | 3.1 | 1 | 3.1 | 2 | 6.3 |
|  | $>20$ to 30h |  | 0 | 0.0 | 0 | 0.0 | 7 | 21.9 |
|  | $>30$ to 36h | 32 | 0 | 0.0 | 0 | 0.0 | 13 | 40.6 |
|  | $>36$ to 40h |  | 30 | 93.8 | 16 | 50.0 | 9 | 28.1 |
|  | $>40 \mathrm{~h}$ |  | 1 | 3.1 | 15 | 46.9 | 1 | 3.1 |


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[^2]:    3 Cohen's kappa varied slightly for the categories. Excellent agreement was achieved for monetary concerns ( $\kappa=0.96$ ), work-life balance ( $\kappa=0.97$ ), health concerns ( $\kappa=0.93$ ), workload ( $\kappa=0.92$ ), customer demands ( $\kappa=0.93$ ), and regulations and conventions ( $\kappa=0.89$ ). Substantial agreement was achieved for other reasons ( $\kappa=0.65$ ).

    4 More details regarding the distribution of contractual, actual, and desired working hours, as well as the preferred work reduction scheme, can be found in the appendix.

[^3]:    5 Quadratic terms are marked with as overtime

