**Working women’s wellbeing: The prevalence and enablers of flourishing at work**

**Words (excluding abstract and references)** = 4,939

Note: Abstract and Tables reproduced at the end of this review version also.

**Authors**

Rebecca Jarden (AUT)

Grant Schofield (AUT)

Aaron Jarden (Flinders University) – corresponding author

Lisa Mackay (AUT)

Kristen Hamling (AUT)

Prusana Reddy (University Technology Sydney)

Scott Duncan (AUT)

**Corresponding author**

Dr Aaron Jarden

[aaron.jarden@sahmri.com](mailto:aaron.jarden@sahmri.com)

South Australian Health and Medical Research Institute, North Terrace, Adelaide, 5000, South Australia.

+61 421 561802

**Abstract**

Research on work wellbeing approaches both genders, with little research specifically investigating the experience or wellbeing of working women. This cross-sectional study explores how New Zealand working women experience wellbeing, and the unique enablers for work wellbeing according to gender and context. In a representative sample of 5,490 workers we examined and compared the prevalence of flourishing (a global wellbeing outcome) and then more specific work related contextual wellbeing aspects (e.g., work-life balance, job satisfaction) for women. We also investigated if there were unique factors associated with flourishing and work-related aspects for women. Results revealed that women had greater flourishing but lower work-life balance. The specific enablers of flourishing and work-life balance also varied by gender, and these findings are discussed in the context of workplace wellbeing programs.

Keywords: Work wellbeing, Women’s wellbeing, Flourishing, Work-life balance

**Introduction**

The working lives of women are in a state of unprecedented change, with more women working outside the family home and simultaneously caring for both the younger and older generations. Coupled with a diverse range of social, economic, and political stressors, working women’s wellbeing should be at the forefront of research. Internationally, seeking to “achieve gender equality and empower all women and girls” (United Nations, 2015, p. 14), and beginning to measure women’s wellbeing (e.g., Organization of Economic Cooperation and Development “How’s Life”, 2015), both build upon a plethora of historical action in the promotion of women’s wellbeing. Women’s refusal to both accept the status quo and act as change agents have strong historical foundations (e.g., see Eckermann, 2016), and this change is increasingly evident in the workforce. Women are participating in the New Zealand workforce in higher rates than ever seen before (65%; Statistics NZ, 2017), exceeding the international average (60%; OECD, 2017). Around 67% of New Zealanders work (Statistics NZ, 2017) which is comparable to international rates of 67% (OECD, 2017), and they work on average 39 hours a week (Statistics NZ, 2017) meaning that work consumes a considerable amount of time. The increased prevalence of working women comes with the increase in part-time and flexible workforce roles (Marmot, Siegrist, & Theorell, 2006). As Litchfield, Cooper, Hancock, and Watt (2016) state “the changing roles of men and women at work has had dramatic impact on how people are managed, the right to request flexible working, the long hours culture, the glass ceiling for women and other diversity issues in the workplace” (p. 3). Given the extent of an individual’s time spent at work, the workplace is a key avenue to experience wellbeing (Cameron, Dutton, & Quinn, 2003; Jarden, 2016) and an opportunity to co-create change. The worthy endeavour of improving working women’s wellbeing needs strong empirical foundations to enable future workplace wellbeing intervention development. As such, this research seeks to contribute to the building empirical base of working women’s experiences in the NZ workplace.

Wellbeing

The term ‘wellbeing’ is not precise. Although it can be understood intuitively as how an individual is faring in life, this broad notion makes a concise and measurable definition of wellbeing challenging (Slade, Oades, & Jarden, 2017). Moreover, different academic disciplines (e.g., psychology, economics, philosophy, health, and sociology) mean slightly different things by the term ‘wellbeing’ and use similar terms (e.g., happiness, flourishing) interchangeably (Dodge, Daly, Huyton, & Sanders, 2012; Weijers & Jarden, 2016). By ‘wellbeing’ the present study means both ‘feeling good’ and ‘doing good’ (Huppert & So, 2013), and over the last decade there has been increased recognition that both feeling good and functioning well are important elements of psychological health (see Keyes & Annas, 2009). Within the field of psychology high levels of wellbeing are described as ‘flourishing’ (Hone, Jarden, Schofield, & Duncan, 2014), incorporating both the hedonic and eudemonic approaches to wellbeing (Dodge, Daly, Huyton, & Sanders, 2012; Jarden & Jarden, 2016). The definition of wellbeing also varies according to the particular framework from which it is considered. For example, Diener’s (2010) model focuses on psychological wellbeing (purpose/meaning, positive relationships, engagement, social contribution, competence, self-respect, optimism, social relationships), whereas Seligman’s (2011) model focuses on positive emotions, engagement, relationships, meaning in life, and accomplishments. So, there is some disagreement regarding the various component factors (e.g., ‘accomplishment’ is in Seligman’s model, but is absent from Diener’s model). Beyond models, research has shown that many other variables influence wellbeing, including culture (Diener, Shigehiro, & Lucas, 2003), personality types (Zhai, Willis, O'Shea, Zhai, & Yang, 2014), and age (Hone, Jarden, Schofield, & Duncan, 2015), for example.

At a broader level ‘wellbeing’ sits within the newly developing field of positive psychology (Jarden, 2010; Seligman & Csikszentmihalyi, 2000) which focuses on the scientific study of optimal functioning in various context (Hone, Jarden, & Schofield, 2015; Jarden & Jarden, 2015). When wellbeing is considered in a work context, most of the research conducted on work wellbeing has come from the fields of Positive Organisation Scholarship (Cameron, Dutton, & Quinn, 2003) and Positive Organisational Behaviour (Luthans, 2002; Nelson & Cooper, 2007).

Work Wellbeing

Work-related wellbeing is a specific facet of wellbeing that can be defined as a positive, fulfilling, affective-motivational state related to the workplace experience (Bakker et al., 2008). Wellbeing at work is most commonly captured as job satisfaction, and there is evidence that high wellbeing serves as a protective factor against a number of mental disorders (Keyes, Dhingra, & Simoes, 2010; Wood & Joseph, 2010), buffers against stress (Layous, Chancellor, & Lyubomirsky, 2014; Tugade & Fredrickson, 2004), promotes physical and psychological health (Boehm & Kubzansky, 2012) and is strongly linked with favourable workplace outcomes (Beyond Blue & PWC, 2014; Rooreno-Jiménez, de Rivas-Hermosilla, Álvarez-Bejarano, & Vergel, 2010). The case that both wellbeing and work wellbeing is beneficial across this literature is strong.

What builds workplace wellbeing is also starting to unravel. For example, Hamling, Jarden, and Schofield (2016) found that there were unique ‘recipes’ for wellbeing according to occupational context, and that different occupational groups had varying prevalence’s of wellbeing - in particular, between higher and lower status occupations. For example, for ‘professionals’ a sense of being satisfied with education was highly related to job satisfaction, whereas for ‘community or personal service workers’ giving and strong social relationships were highly related. What was highly related for all occupations though was a sense of work-life balance. Hone, Schofield, and Jarden (2016) also found that conceptualizations of wellbeing were different between workers (i.e., lay conceptions of wellbeing) and academically derived models of wellbeing (i.e., academic conceptions of wellbeing). For example, workers were less likely than academics to consider the presence of achievement, engagement, and optimism as important for wellbeing, and in contrast viewed physical health, work-life balance, and feeling valued as central components of wellbeing.

However, at a more practical level, work wellbeing programs are scarce (Spence, 2015), as to date prominence has largely been on preventative measures and programs to reduce the disease burden, and hence costs to organisations (e.g., absent employees, lost output, reduced work quality). Cooper, Field, Goswami, Jenkins, and Sahakian (2009) point out that only a tiny minority of organisations have embraced the notion of wellbeing as an enabler for sustained commercial success. This is despite worker wellbeing impacting on economic output (Black & Frost, 2011) and that increases in wellbeing at work have a material and significant effect on commercial outcomes, including the recruitment and retention of key staff (Marsden & Moriconi, 2009).

Working women’s wellbeing

Research on work wellbeing has largely neglected to investigate working women’s wellbeing. Of the research there is, most has focused on work-life balance (e.g., Gröpel & Kuhl, 2009) and the associated challenges for working women (e.g., domestic work, child care) (Walsh, 2013). Also, like much of the ‘wellbeing’ literature, the actual focus is on illbeing (e.g., depression, Lennon, 1994). Beyond work however, factors influencing women’s wellbeing is increasingly becoming clearer. For example, nature contact and connection (e.g., women have a greater affinity to nature, spend more time in nature, have higher rates of pro-environmental behaviours: Müller, Kals, & Pansa, 2009), and greater inner harmony (defined as including emotional stability, feelings of serenity and contentment, inner peace, acceptance, balance, and equipoise: Delle Fave, Brdar, Wissing, Araujo, Solano, Freire,…Nafstad, 2016 ). Regarding working women’s wellbeing, findings here are mixed, but suggest aspects such as women experience higher work-family conflict that impacts their work wellbeing (the incompatible pressures from an individual’s work and family roles: Rollero, Fedi, & De Piccoli, 2016), that higher levels of autonomy for women result in higher levels of psychological wellbeing at work (Lennon & Rosenfieid, 1992), and that work wellbeing is strained for women at managerial levels (Nyberg, Leineweber, & Magnusson-Hanson, 2015), for example. Others have been critical that work, and government policies that support work, are biased against the needs of women (Kahu, & Morgan, 2007). It is important to investigate work related aspects and their relationship to work wellbeing, because whilst research informs us of pathways to high wellbeing in life (e.g., Disabato, Kashdan, Short, & Jarden, 2016), very little is known about what promotes women’s wellbeing at a contextual level, in particular in the occupational context.

Measuring wellbeing

Seligman’s wellbeing theory (2011) suggests five elements: positive emotion, engagement, positive relationships, meaning, and accomplishment. Whilst wellbeing is thought to be operationalised through these elements, none individually is thought to either define or operationalise wellbeing as a whole. This is demonstrable in the varied theoretical views of the components of wellbeing (Huppert & So, 2013; Ryan & Deci, 2001; Ryff, 1989; Seligman, 2011). Flourishing is proposed as the epitome of wellbeing (Huppert & So, 2013). For Huppert and So (2013) flourishing is a combination of feeling good and functioning effectively. More specifically, flourishing is described as having high levels of both hedonic wellbeing and eudaimonic wellbeing (Schotanus-Dijkstra et al., 2016). Flourishing research frequently focusses on either hedonic or eudaimonic wellbeing (Schotanus-Dijkstra et al., 2016) as opposed to both (with the exceptions being: Huta & Ryan, 2010; Keyes, Shmotkin, & Ryff, 2002; Peterson, Park, & Seligman, 2005). It has been suggested that, for New Zealand workers, wellbeing is prototypically structured (Hone, Schofield, & Jarden, 2015). That is, some components of wellbeing are more typical than others. For example, good mental health, good relationships, work-life balance, and good physical health were endorsed as more central to their conception of wellbeing than spirituality, accomplishments, mindfulness, and engagement (Hone et al., 2015). Drawing from this literature, the aims of this study focus on both global and contextual wellbeing outcomes.

**Aims**

The research to date suggests that there are differences in both the prevalence and component factors of wellbeing between genders, and these are likely to flow into the working environment. Therefore there were three aims of this study. Firstly to investigate the prevalence of flourishing (a global wellbeing outcome) in working women. Secondly, to investigate more specific women’s work related contextual wellbeing aspects (e.g., work-life balance, job satisfaction). Lastly, to investigate if there were unique enablers for working women’s wellbeing.

**Methods**

Data Source

The Sovereign Wellbeing Index (SWI; Jarden et al., 2013; Mackay, Schofield, Jarden, & Prendergast, 2015) is an online survey containing a large range of wellbeing, health, lifestyle, work-related, and socio-demographic variables (total items = 324). It was designed specifically to measure the health and wellbeing of New Zealanders. The current study used data collected in 2014.

Procedure and Participants

The New Zealand office of TNS Global, an international market research company, collected data from one of the largest research panels in New Zealand (Smile City Ltd). Participants who completed a previous 2012 survey were invited to participate in a 2014 study, for which the completion rate was 44% (*n* = 4,435). Additional invitations were then sent to 53,628 new panel members that did not participate in 2012. Of these invitations, a total of 5,577 adults participated (10%). In combination (returning participants from 2012 and new participants in 2014) there were 10,012 survey respondents in total.

The sampling strategy was stratified against the 2006 NZ Census values. Sample characteristics indicated close alignment with the NZ Census, suggesting the sample to be nationally representative. All panel members aged over 18 were eligible and no further exclusion criteria were applied. As the focus of our analysis was occupational wellbeing, we used a reduced sample of only those participants in paid employment that specified gender (n = 13 did not specify gender). This was a total of N = 5,490, of which 50% were women (n = 2,759) and 50% (n = 2,731) were men.

Measures

The SWI survey contains validated psychometric scales and is largely based on wave six of the

European Social Survey (ESS: http://www.europeansocialsurvey.org/) Personal and Social Wellbeing module (European Social Survey, 2012). Questions were drawn from a variety of sources including the NZ Health Survey (Ministry of Health, 2006), and it has been used across 26 European countries (Huppert & So, 2013). In addition, this module was supplemented with additional scales, including the Flourishing Scale which is a self-reported measure of psychological wellbeing (Diener et al., 2010), two questions on strengths use (Govindji & Linley, 2007), and a life domains satisfaction scale. Table 1 below provides a description of each construct that has been included in our analysis, including the corresponding items and response scales.

Table 1.

*Questions and Response Scales of the Lifestyle, Health, Psychosocial, Life Satisfaction, and Work-related Constructs Used.*

|  |  |  |
| --- | --- | --- |
| Construct | Question | Response scale |
| **Lifestyle behaviours** |  |  |
| Connect1 | How often do you meet socially with friends, relatives or work colleagues? | 1 = never, to 7 = every day |
| Give1 | To what extent do you provide help and support to people you are close to when they need it? | 0 = not at all, to 6 = completely |
| Take Notice1 | On a typical day, how often do you take notice and appreciate your surroundings? | 0 = never, to 10 = always |
| Keep learning1 | To what extent do you learn new things in life? | 0 = not at all to, 6 = a great deal |
| Be Active1 | How much time do you spend in physical activity with others? | 0 = not at all, to 6 = a great deal |
| Be Active | How much time do you spend in physical activity on your own? | 0 = never to, 5 = five days a week |
| Volunteering | In the past 12 months, how often did you get involved in work for voluntary or charitable organizations? | 1 = never to, 6 = at least once a week |
| **Subjective health** | How is your health in general? | 1 = very bad to, 5 = very good |
| **Psychosocial** |  |  |
| Strengths2 | I know my strengths well. | 1 = strongly disagree to, 5 = strongly agree |
| Strengths2 | I always try to use my strengths. | 1 = strongly disagree to, 5 = strongly agree |
| Autonomy | I feel I am free to decide for myself how to live my life. | 1 = strongly disagree to, 5 = strongly agree |
| Engaged | How much of the time would you generally say you are absorbed in what you are doing? | 0 = none of the time to, 10 = all of the time |
| Feeling respected | To what extent do you feel that people treat you with respect? | 0 = not at all to, 6 = a great deal |
| Social support | To what extend to you receive help and support from people you are close to when you need it? | 0 = not at all to, 6 = completely |
| Relationships | How many people are there with whom you can discuss intimate and personal matters? | 1 = none to, 7 = 10 or more |
| Resilience  Resilience | When things go wrong in my life, it generally takes me a long time to get back to normal.  How difficult or easy do you find it to deal with important problems that come up in your life? | 1 = strongly agree to, 5 = strongly disagree  0 = extremely difficult to, 10 = extremely easy |
| Meaning / purpose | I generally feel that what I do in my life is valuable and worthwhile. | 1 = strongly disagree to, 5 = strongly agree |
| Self esteem | In general I feel very positive about myself. | 1 = strongly disagree to, 5 = strongly agree |
| **Work related** |  |  |
| Job satisfaction | All things considered, how satisfied are you with your present job? | 0 = extremely dissatisfied to, 10 = extremely satisfied |
| Work life balance | All things considered, how satisfied are you with the balance between the time you spend on your paid work and the time you spend on other aspects of your life? | 0 = extremely dissatisfied to, 10 = extremely satisfied |
| Financial security | Which of these descriptions comes closest to how you feel about your household’s income nowadays? | 1 = finding it very difficult on present income to, 4 = living comfortably on present income |
| **Satisfaction with major life domains** | How satisfied are you with each of these aspects in your life?  Intimate relationships, Family, Friends, Leisure time, Time on your own, Politics, Work, Education, Religion, Spirituality, and Community Involvement. | 0 = extremely dissatisfied to, 10 = extremely satisfied |
|  |  |  |
| **Diener Flourishing Scale** | I lead a purposeful and meaningful life.  My social relationships are supportive and rewarding.  I am engaged and interested in my daily activities.  I actively contribute to the happiness and wellbeing of others.  I am competent and capable in the activities that are important to me.  I am a good person and live a good life.  I am optimistic about my future.  People respect me. | 1 = strongly disagree to, 7 = strongly agree |

1The SWI includes items assessing participation in the *Five Ways to Wellbeing* (Connect, Give, Take Notice, Keep Learning, and Be Active) identified by the New Economics Foundation as evidence-based behaviours to improve population wellbeing (Aked, Marks, Cordon, & Thompson, 2009).

2Strengths were assessed via two questions from the Strengths Knowledge and Strength Use Scales (Govindji & Linley, 2007).

**Results**

The data were analysed using SPSS version 22 (Field, 2013). Given the large sample size the Shapiro-Wilks test of normality, which is only appropriate for small samples (i.e. < 2,000: Field, 2013), could not be used. As such, preliminary analysis of the data (Flourishing Scale score, work related variables) included visual inspection of histograms for skewness and kurtosis, and normal Q-Q Plots, which suggested these variables to be negative skewed. The Levene’s *F* test also revealed that the homogeneity of variance assumption was not met (*p* < .001). Therefore, the non-parametric tests of the Kruskal-Wallis and Mann–Whitney *U* tests were used with an alpha level of .05 for all subsequent analyses.

Flourishing

First we investigated the prevalence of flourishing between genders. Cronbach alpha, mean and standard deviation of the Flourishing Scale (*α* = .92; *M* = 44.35, *SD* = 7.87) were similar to previous research (e.g., Diener et al., 2010, reported: *α* = .87; *M* = 44.97, *SD* = 6.56). The Kruskal-Wallis test revealed that there was a statistically significant difference in average Flourishing Scale scores between the groups, *x*2(1, n = 5,375) = 17.61, *p* < .01. The median and Interquartile Range (IQR) of Flourishing Scale scores for women was *Md* = 47 and *IQR* = 9, and for men it was *Md* = 46 and *IQR* = 9. Having established that there was a significant difference between genders, a Mann-Whitney *U* test (with Bonferroni corrections) was conducted to examine the individual differences between genders. This test revealed a significate difference in Flourishing Scale scores of women compared to men, although with a small effect size[[1]](#footnote-1): *r* = *z* / √N), *U* = 3372900, *z* = -4.20, *p* = .01, *r* = -.06.

Given that women workers had slightly higher flourishing than men, next we investigated if there was a unique formula for flourishing for each gender. A series of standard multiple regression analysis were used to assess the ability of lifestyle, health, psychosocial, satisfaction with major life domains, and work-related aspects to predict levels of flourishing (Flourishing Scale scores) for workers of both genders. Prior to conducting the regression analysis, an analysis of standard residuals was carried out on the data to identify extreme outliers (Tabachnick & Fidell, 2007, p. 128). A scatterplot graph was generated for each gender and was used to visually confirm outliers. Fourteen of the 5,490 participants had standardised residual values above +/- 3.3, and were removed. An examination of correlations revealed that no independent variables were highly correlated, and the collinearity statistics (i.e., Tolerance and Variance Inflation Factor (VIF) were all within accepted limits; Pallant, 2011, p. 158). The assumption of multicollinearity was deemed to have been met, suggesting that all scales were measuring independent constructs. A significant (*p* < .001) regression equation was found across genders, demonstrating that the items selected for the regression analysis were able to predict a large proportion of the variance in Flourishing Scale scores for each gender.

Next, we examined which of the lifestyle, health, psychosocial factors, satisfaction with major life domains, and work-related aspects explained the greatest amount of variance in Flourishing Scale

scores for each gender. Beta weights were used to identify the five largest factors of the 33 possible (see Table 1 above). The total variance explained by the model as a whole for women was 69.2%, *F* (33, 1786) = 121.56, *p* < .01, and for men was 70.2%, *F* (33, 1831) = 130.83, *p* < .01. Table 2 below displays the five largest factors by gender group.

Table 2.

*The Five Items that Explain the Greatest Amount of Variance in Flourishing Scale Scores for Each Gender Group.*

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Gender | Factor | Beta | Sig. | 95% CI |
| Women | 1. Meaning and purpose 2. Self-esteem 3. Friendship satisfaction 4. Work satisfaction 5. Strengths use | .230  .181  .102  .097  .094 | .00  .00  .00  .00  .00 | [1.77, 2.44]  [1.13, 1.73]  [0.23, 0.50]  [0.17, 0.48]  [0.59, 1.31] |
|  |  |  |  |  |
| Men | 1. Self-esteem 2. Meaning and purpose 3. Feeling respected 4. Strengths use 5. Spirituality | .238  .230  .107  .086  .081 | .00  .00  .00  .00  .00 | [1.79, 2.43]  [1.83, 2.53]  [0.47, 0.90]  [0.56, 1.33]  [0.09, 0.37] |
|  |  |  |  |  |

As depicted in Table 2, the factors most strongly associated with the Flourishing Scale scores for working women were meaning and purpose, self-esteem, friendship satisfaction, work satisfaction[[2]](#footnote-2), and strengths use, and for working men were self-esteem, meaning and purpose, respect, strength use, and satisfaction with spirituality.

Work related variables

Next we investigated the prevalence rates across the gender groups of more contextual work wellbeing aspects compared to the more global aspect of flourishing. In this case we used job satisfaction, work domain satisfaction, financial security and work-life balance and we also used a similar analysis strategy. The Kruskal-Wallis tests for job satisfaction (*p* = .20), satisfaction with work (*p* = .85), and financial security (*p* = .20) were all non-significant. However, the Kruskal-Wallis test revealed a significant difference in work-life balance between gender groups, *x*2 (1, n = 5,375) = 3.82, *p* = .05. The median and Interquartile Range of work-life balance scores for women was *Md* = 7 and *IQR* = 3, and for men it was *Md* = 7 and *IQR* = 3. Having established that there was a significant differences between genders, a Mann-Whitney *U* test (with Bonferroni corrections) was conducted to examine the individual differences between genders. This test revealed a significate difference in work-life balance scores of women compared to men, although with a very small effect size, *U* = 3597670, *z* = -1.95, *p* = .05, *r* = .03.

Next, we examined which of the lifestyle, health, psychosocial factors, satisfaction with major life domains, and work-related aspects explained the greatest amount of variance in work-life balance

scores for each gender type. Beta weights were used to identify the five largest factors of the 33 possible (see Table 1 above). The total variance explained by the model as a whole for women was 50.2%, *F* (33, 1786) = 54.57, *p* < .01, and for men was 56.6%, *F* (33, 1831) = 72.23, *p* < .01. Table 3 below displays the five largest factors by gender group.

Table 3.

*The Five Items that Explain the Greatest Amount of Variance in Work-Life Balance Scores for Each Gender Group.*

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Gender | Factor | Beta | Sig. | 95% CI |
| Women | 1. Job satisfaction 2. Leisure time 3. Time on own 4. Take notice 5. Community involvement | .425  .264  .085  .060  .059 | .00  .00  .00  .01  .01 | [0.37, 0.48]  [0.22, 0.32]  [0.04, 0.12]  [0.02, 0.11]  [0.01, 0.10] |
|  |  |  |  |  |
| Men | 1. Job satisfaction 2. Leisure time 3. Receive help and support 4. Take notice 5. Physical activity (on own) | .490  .272  .095  .062  .056 | .00  .00  .00  .01  .01 | [0.43, 0.53]  [0.23, 0.34]  [0.08, 0.21]  [0.02, 0.11]  [0.06, 0.12] |
|  |  |  |  |  |

As depicted in Table 3, the factors most strongly associated with work-life balance scores for women were job satisfaction, satisfaction with leisure time, satisfaction with time on own, taking notice, and community involvement, and for working men were job satisfaction, satisfaction with leisure time, receiving help and support when needed, taking notice, and physical activity on their own.

**Discussion**

In the present study we explored the impact of gender on worker wellbeing and found evidence to suggest that the prevalence of flourishing and work-life balance varied between genders –working women had greater flourishing and less work-life balance. These results are in line with previous research (e.g., Gröpel & Kuhl, 2009). We also found that there were unique factors associated with flourishing between genders. The most notable differences were that for working women, meaning and purpose, self-esteem, friendship satisfaction, work satisfaction, and strengths use were most strongly associated with flourishing, whereas for working men self-esteem, meaning and purpose, respect, strengths use, and satisfaction with spirituality were most strongly associated with flourishing. The strengths of these associations here with flourishing also provides some insight into the relative contribution of each aspect. For example, the beta weight for meaning and purpose was .230 for both genders, meaning it is equally contributable, whereas a sense of self-esteem was much higher for men (i.e., beta = .238) compared to women (beta = .181), meaning this aspect could have slightly more importance for work wellbeing programs targeting men. In addition, that meaning and purpose, self-esteem, and strength use were in the top five for both genders provides some guidance for the development of workplace wellbeing programs.

There were also unique factors associated with the work related aspect of work-life balance across genders. Previously, NZ workers have identified work-life balance as a central component of wellbeing (Hone, Schofield, & Jarden, 2016). Additionally, work-life balance is the strongest factor associated with job satisfaction across occupational groups (Hamling, Jarden, & Schofield, 2016), and is a predictor of job satisfaction (Brough, Timms, O'Driscoll, Kalliath, Siu, Sit, & Lo, 2014; Haar, Russo, Sune, & Ollier-Malaterre, 2014; Haar, 2013). The results in the present study indicated that for women, job satisfaction, satisfaction with leisure time, satisfaction with time on own, taking notice, and community involvement were most strongly associated with work-life balance. Comparatively, for working men, job satisfaction, satisfaction with leisure time, receiving help and support when needed, taking notice, and physical activity on their own were most strongly associated with work-life balance. The large beta weight of job satisfaction for both gender (women = .425 & men = .490) suggests that job satisfaction is an important element in obtaining work-life balance, as is leisure time (women = .264 & men = .272) but to a lesser extent. Similarly, that having a satisfying job, being satisfied with leisure time, and taking notice were in the top five for both genders provides opportunities for the future development of workplace wellbeing programs.

It is also interesting to note that there was no overlap between the variables related to flourishing (Table 2) and the variables related to work-life balance (Table 3), suggesting that unique aspects are contributing to work-life balance, which can also be considered in the development of work wellbeing programs which are predominately aimed at present at increasing flourishing.

Limitations

There are several limitations to the current study. These include the non-specific nature of many questions asked. For instance, to assess participants’ experience of meaning and purpose they were asked, “I generally feel that what I do in my life is valuable and worthwhile”. This is not specifically related to the workplace and it may be that participants derive meaning and purpose in other facets of their life (e.g., children), which affected the results. A scale such as Steger, Dik, and Duffy’s (2012) Work and Meaning Inventory would be more appropriate. However, our survey instrument was limited by trying to explore a broad range of constructs which necessitated using abbreviated measures. Secondly, the cross-sectional study design prevents us from making causal conclusions (not all variables in wave two were in wave one). While our findings indicate that there are a number of core and unique associations with worker flourishing and work-life balance between genders, we cannot be sure that these indicators cause flourishing or work-life balance. Future investigations would benefit from examining such factors in longitudinal studies. Thirdly, the small effect sizes (e.g., *r* = -.06 & *r* = -.03.) between the genders for both flourishing and work-life balance mean that these results should be interpreted with the magnitude of these size differences in mind, and given the small sizes the need for replication is also present. Lastly, consideration of ethnicity should also be considered in future research to investigate if Māori working woman’s wellbeing is different to European working woman’s wellbeing. Despite the limitations, the current findings are consistent with the literature and extend this literature, suggesting that the study makes a valuable contribution to the field of occupational wellbeing. In addition, the large representative nature of the dataset provides confidence in the findings and is a major strength of this contribution.

Conclusion

Work wellbeing is valued, with many benefits of high wellbeing in workplaces. Organisations that are looking to increase working women’s wellbeing are realising that a more nuanced approach is needed, a strategic and tailored method, rather than a standard blanket approach. Insight into what contributes and builds women’s wellbeing at work is one part of the puzzle. The current findings confirm meaning and purpose, self-esteem and strength use are important for flourishing, just as for work-life balance a sense of job satisfaction, leisure time, and taking notice are. Such knowledge should contribute to the development workplace wellbeing programs to increase working woman’s wellbeing. Whilst this study has provided some unique insights into how women experience flourishing and work-life balance, further in-depth research that examines the unique gender pathways to worker wellbeing is warranted.

**References**

Aked, J., Marks, N., Cordon, C., & Thompson, S. (2009). *Five ways to well-being: A report presented to the Foresight Project on communicating the evidence base for improving people's well-being*. England: New Economics Foundation.

Bakker, A. B., Schaufeli, W. B., Leiter, M. P., & Taris, T. W. (2008). Work engagement: An emerging concept in occupational health psychology. *Work & Stress, 22*(3), 187–200.

Beyond Blue & Price Water House Coopers. (2014). *Creating a mentally healthy workplace. A return on investment analysis*. Retrieved from https://www.headsup.org.au/docs/default-source/resources/beyondblue\_workplaceroi\_finalreport\_may-2014.pdf.

Black, D.C., & Frost, D. (2011). *Health at work – an independent review of sickness absence*. London: The Stationery Office.

Boehm, J. K., & Kubzansky, L. D. (2012). The heart's content: the association between positive psychological well-being and cardiovascular health. *Psychological Bulletin, 138*(4), 655-691.

Brough, P., Timms, C., O'Driscoll, M. P., Kalliath, T., Siu, O. L., Sit, C., & Lo, D. (2014). Work–life balance: A longitudinal evaluation of a new measure across Australia and New Zealand workers, *The International Journal of Human Resource Management, 25*, pp. 2724-2744.

Cameron, K. S., Dutton, J. E., & Quinn, R. E. (2003). *Positive organizational scholarship*. San Francisco: Berrett-Koehler.

Cooper, C. L., Field, J., Goswami, U., Jenkins, R., & Sahakian, B. J. (2009). *Mental capital and mental well-being*. Oxford: Wiley-Blackwell.

Delle Fave, A., Brdar, I., Wissing, M., Araujo, U., Solano, A., Freire, T., . . . Nafstad, H. (2016). Lay definitions of happiness across nations: The primacy of inner harmony and relational connectedness. *Frontiers in Psychology, 7*(30), 1-23. doi:10.3389/fpsyg.2016.00030

Diener, E., Oishi, S., & Lucas, R. E. (2003). Personality, culture, and subjective well-being: Emotional and cognitive evaluations of life. *Annual Review of Psychology, 54*, 403-425.

Diener, E., Wirtz, D., Tov, W., Kim-Prieto, C., Choi, D. W., Oishi, S., & Biswas-Diener, R. (2010). New well-being measures: Short scales to assess flourishing and positive and negative feelings. *Social Indicators Research, 97*(2), 143-156.

Disabato, D. J., Kashdan, T. B., Short, J. L., & Jarden, A. (2016). What predicts positive life events that influence the course of depression? A longitudinal examination of gratitude and meaning in life. *Cognitive Therapy and Research*, Online First 30th May, 1-15.

Dodge, R., Daly, A., Huyton, J., & Sanders, L. (2012). The challenge of defining wellbeing. *International Journal of Wellbeing, 2*(3), 222-235. doi:10.5502/ijw.v2i3.4

European Social Survey. (2012). *ESS Round 6 Source Questionnaire*. England: Centre for Comparative Social Surveys, City University.

Field, A. (2013). *Discovering statistics using IBM SPSS statistics*. New Delhi: Sage.

Govindji, R., & Linley, P. A. (2007). Strengths use, self-concordance and well-being: Implications for strengths coaching and coaching psychologists. *International Coaching Psychology Review, 2*(2), 143-153.

Gröpel, P., & Kuhl, J. (2009). Work–life balance and subjective well‐being: The mediating role of need fulfilment. *British Journal of Psychology, 100*(2), 365-375.

Hamling, K., Jarden, A., & Schofield, G. (2016). Recipes for occupational wellbeing: An investigation of the associations with wellbeing in New Zealand workers. New Zealand Journal of Human Resource Management, 12(2), 151-173.

Haar, J. M., Russo, M., Sune, A., & Ollier-Malaterre, A. (2014). Outcomes of work-life balance on job satisfaction, life satisfaction and mental health: A study across seven cultures. *Journal of Vocational Behavior, 85*, pp. 361-373.

Haar, J. M. (2013). Testing a new measure of work-life balance: A study of parent and non- parent employees from New Zealand.*The International Journal of Human Resource Management, 24*, pp. 3305–3324.

Hone, L., Jarden, A., & Schofield, G. (2015). An evaluation of positive psychology intervention effectiveness trials using the re-aim framework: A practice-friendly review. *Journal of Positive Psychology, 10*(4), 303-322.

Hone, L., Jarden, A., Schofield, G. M., & Duncan, S. (2015). Flourishing in New Zealand workers: Associations with lifestyle behaviours, physical health, psychosocial, and work-related indicators. *Journal of Occupational and Environmental Medicine, 57*(9), pp. 973-983.

Hone, L., Jarden, A., Schofield, G. M., & Duncan, S. (2014). Measuring flourishing: The impact of operational definitions on the prevalence of high levels of wellbeing. *International Journal of Wellbeing, 4*(1), 62-90. doi:10.5502/ijw.v4i1.1

Hone, L., Schofied, G., & Jarden, A. (2015). Conceptualizations of wellbeing: Insights from a prototype analysis on New Zealand workers. *New Zealand Journal of Human Resource Management, 15*(2), 97-118.

Huppert, F. A., & So, T. T. (2013). Flourishing across Europe: Application of a new conceptual framework for defining well-being. *Social Indicators Research, 110*(3), 837-861.

Huta, V., & Ryan, R. (2010). Pursuing pleasure or virtue: The differential and overlapping well-being benefits of hedonic and eudaimonic motives. *Journal of Happiness Studies, 11*, 735-762.

Jarden, A. (2010). Flourish and thrive: An overview and update on positive psychology in New Zealand and internationally. *Psychology Aotearoa, 4*, 17-23.

Jarden, A. (2016). Introducing workplace wellbeing to organizations: The “Me, We, Us” model. *Positive Work and Organizations: Research and Practice, 1*, 1-4.

Jarden, A., & Jarden, R. (2015). Applied positive psychology in higher education (Chapter 5). In Marcus Henning, Chris Krägeloh, & Glenis Wong-Toi (eds.), *Student motivation and quality of life in higher education*. London: Routledge.

Jarden, A., & Jarden, R. (2016). Positive psychological assessment for the workplace. In M. Steger, L. Oades, A. Delle Fave, & J. Passmore (Eds.), *The Wiley-Blackwell Handbook of Positive Psychology at Work*, pp. 415-437. Published Online: 19 Nov 2016: DOI: 10.1002/9781118977620.ch22

Jarden, A., MacKay, L., White, K., Schofield, G., Duncan, S., Williden, M., Hone, L., & McPhee, J. (2013). The Sovereign New Zealand Wellbeing Index. *Psychology Aotearoa, 5*(1), pp. 22-27.

Kahu, E., & Morgan, M. (2007). A critical discourse analysis of New Zealand government policy: Women as mothers and workers. *Women's Studies International Forum, 30*(2), 134-146. doi: http://dx.doi.org/10.1016/j.wsif.2007.01.003

Keyes, C., & Annas, J. (2009). Feeling good and functioning well: Distinctive concepts in ancient philosophy and contemporary science. *Journal of Positive Psychology, 4*, 197-201.

Keyes, C. L., Dhingra, S. S., & Simoes, E. J. (2010). Change in level of positive mental health as a predictor of future risk of mental illness. *American Journal of Public Health, 100*(12), 2366-2371.

Keyes, C., Shmotkin, D., & Ryff, C. (2002). Optimizing well-being: The empirical encounter of two traditions. *Journal of Personality and Social Psychology, 82*(6), 1007-1022. doi:10.1037//0022-3514.82.6.1007

Layous, K., Chancellor, J., & Lyubomirsky, S. (2014). Positive activities as protective factors against mental health conditions. *Journal of Abnormal Psychology, 123*(1), 3-12.

Lennon, M.C. (1994). Women, work, and well-being: The importance of work conditions. *Journal of Health and Social Behavior, 35*(3), 235-247.

Lennon, M. C., & Rosenfield, S. (1992). Women and mental health: The interaction of job and family conditions. *Journal of Health and Social Behavior, 33*(3), 16-27.

Litchfield, P., Cooper, C., Hancock, C., & Watt, P. (2016). Work and wellbeing in the 21st Century. *International Journal of Environmental Research and Public Health, 13*(11), pp. 1-11.

Luthans, F., (2002). The need for meaning of positive organisational behaviour. *Journal of Organisational Behaviour, 23*(6), 695-706.

Mackay, L. M., Schofield, G. M., Jarden, A., & Prendergast, K. (2015). *The Sovereign New Zealand Wellbeing Index 2014. Executive Report, the 2014 Sovereign New Zealand Wellbeing Index. (Methodology Report)*. Auckland University of Technology: Human Potential Centre.

Marmot, M., Siegrist, J., & Theorell, T. (2006). Health and the psychosocial environment at work. In Wilkinson (Eds.) *Social Determinants of Health* (2nd ed.) (pp. 97-130). New York: Oxford University Press.

Marsden, D., & Moriconi, S. (2009). *The value of rude health’: Employees wellbeing, absence and workplace performance*. CEP Discussion Paper 919, London School of Economics: London.

Ministry of Health. (2006). *2006/07 New Zealand Health Survey: Adult Questionnaire*. New Zealand: Ministry of Health. Retrieved from: www.health.govt.nz/system/files/documents/publications/nzhs-adult-questionnaire-may08.pdf

Müller, M. M., Kals, E., & Pansa, R. (2009). Adolescents’ emotional affinity toward nature: A cross-societal study. *The Journal of Developmental Processes, 4*, 59-69.

Nelson, D., & Cooper, C. L. (Eds.). (2007). *Positive organizational behavior. Accentuating the positive at work*. Thousand Oaks: Sage Publications.

Nyberg, A., Leineweber, C., & Magnusson Hanson, L. (2015). Gender differences in psychosocial work factors, work–personal life interface, and well-being among Swedish managers and non-managers. *International Archives of Occupational and Environmental Health, 88*(8), 1149-1164. doi:10.1007/s00420-015-1043-0

OECD. (2017). *OECD Quarterly Employment Situation News Release: 1st Quarter 2017.* Retrieved 08/09/2017 from http://www.oecd.org/std/labour-stats/employment-situation-first-quarter-2017-oecd.htm

Pallant, J. (2011). *SPSS Survival Manual. (4th ed.).* Australia (Crows Nest): Allen & Unwin.

Peterson, C., Park, N., & Seligman, M. (2005). Orientations to happiness and life satisfaction: The full life versus the empty life. *Journal of Happiness Studies, 6*(1), 25-41. doi:10.1007/s10902-004-1278-z

Rodríguez-Carvajal, R., Moreno-Jiménez, B., de Rivas-Hermosilla, S., Álvarez-Bejarano, A., & Vergel, A. I. S. (2010). Positive Psychology at Work: Mutual Gains for Individuals and Organizations Psicología Positiva en el Trabajo: Ganancias Mutuas para Individuos y Organizaciones. *Revista de Psicología del Trabajo y de las Organizaciones, 26*(3), 235-253.

Rollero, C., Fedi, A., & De Piccoli, N. (2016). Gender or occupational status: What counts more for well-being at work? *Social Indicators Research, 128*(2), 467-480. doi:10.1007/s11205-015-1039-x

Ryan, R., & Deci, E. (2001). On happiness and human potentials: A review of research on hedonic and eudaimonic well-being. *Annual Review of Psychology, 52*, 141-166. doi:10.1146/annurev.psych.52.1.141

Ryff, C. (1989). Happiness is everything, or is it? Explorations on the meaning of psychological well-being. *Journal of Personality and Social Psychology, 57*(6), 1069-1081.

Schotanus-Dijkstra, M., Pieterse, M., Drossaert, C., Westerhof, G., de Graaf, R., Ten Have, M., . . . Bohlmeijer, E. (2016). What factors are associated with flourishing? Results from a large representative national sample. *Journal of Happiness Studies, 17*(4), 1351-1370. doi:10.1007/s10902-015-9647-3

Seligman, M. E. (2011). *Flourish: A visionary new understanding of happiness and well-being*. North Sydney (Australia): Random House.

Seligman, M. E. P., & Csikszentmihalyi, M. (2000). Positive psychology: An introduction. *American Psychologist, 55*(1), 5-14.

Slade, M, Oades, L., & Jarden, A. (2017). *Wellbeing, recovery and mental health*. Cambridge: Cambridge University Press.

Spence, G. (2015). Workplace wellbeing programs: If you build it they may NOT come…because it’s not what they really need! *International Journal of Wellbeing, 5*(2), 109-124.

Statistics NZ. (2017). *Labour Market Statistics: June 2017 Quarter*. Retrieved 08/09/2017 from http://www.stats.govt.nz/browse\_for\_stats/income-and-work/employment\_and\_unemployment/labour-market-statistics-information-releases.aspx.

Steger, M. F., Dik, B. J., Duffy, R. D. (2012). Measuring meaningful work: The Work and Meaning Inventory (WAMI). *Journal of Career Assessment, 20*(3), 322-333.

Tabachnick, B. G., & Fidell, L. S. (2013). *Using multivariate statistics*. Boston: Pearson.

Tugade, M. M., & Fredrickson, B. L. (2004). Resilient individuals use positive emotions to bounce back from negative emotional experiences. *Journal of Personality and Social Psychology, 86*(2), 320-333.

Walsh, J. (2013). Gender, the Work-Life Interface and Wellbeing: A Study of Hospital Doctors. *Gender, Work & Organization, 20*(4), 439–453. http://doi.org/10.1111/j.1468-0432.2012.00593.

Weijers, D., & Jarden, A. (2016). The science of happiness as an instrument in the public policy design: An Overview. In D. Gómez- Alvarez, & V. Ortega (Eds.), *Policies and subjective wellbeing: Happiness in the public agenda*, (pp. 149-175.). Banco de Desarrollo de America Latina and Ariel.

Wood, A. M., & Joseph, S. (2010). The absence of positive psychological (eudemonic) well-being as a risk factor for depression: A ten year cohort study. *Journal of Affective Disorders, 122*(3), 213-217.

Zhai, Q., Willis, M., O’Shea, B., Zhai, Y. & Yang, Y. (2013). Big Five personality traits, job satisfaction, and subjective well-being in China. *International Journal of Psychology, 48*(6), 1099-1108.

**Abstract**

Research on work wellbeing approaches both genders, with little research specifically investigating the experience or wellbeing of working women. This cross-sectional study explores how New Zealand working women experience wellbeing, and the unique enablers for work wellbeing according to gender and context. In a representative sample of 5,490 workers we examined and compared the prevalence of flourishing (a global wellbeing outcome) and then more specific work related contextual wellbeing aspects (e.g., work-life balance, job satisfaction) for women. We also investigated if there were unique factors associated with flourishing and work-related aspects for women. Results revealed that women had greater flourishing but lower work-life balance. The specific enablers of flourishing and work-life balance also varied by gender, and these findings are discussed in the context of workplace wellbeing programs.

Table 2.

*The Five Items that Explain the Greatest Amount of Variance in Flourishing Scale Scores for Each Gender Group.*

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Gender | Factor | Beta | Sig. | 95% CI |
| Women | 1. Meaning and purpose 2. Self-esteem 3. Friendship satisfaction 4. Work satisfaction 5. Strengths use | .230  .181  .102  .097  .094 | .00  .00  .00  .00  .00 | [1.77, 2.44]  [1.13, 1.73]  [0.23, 0.50]  [0.17, 0.48]  [0.59, 1.31] |
|  |  |  |  |  |
| Men | 1. Self-esteem 2. Meaning and purpose 3. Feeling respected 4. Strengths use 5. Spirituality | .238  .230  .107  .086  .081 | .00  .00  .00  .00  .00 | [1.79, 2.43]  [1.83, 2.53]  [0.47, 0.90]  [0.56, 1.33]  [0.09, 0.37] |
|  |  |  |  |  |

Table 3.

*The Five Items that Explain the Greatest Amount of Variance in Work-Life Balance Scores for Each Gender Group.*

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Gender | Factor | Beta | Sig. | 95% CI |
| Women | 1. Job satisfaction 2. Leisure time 3. Time on own 4. Take notice 5. Community involvement | .425  .264  .085  .060  .059 | .00  .00  .00  .01  .01 | [0.37, 0.48]  [0.22, 0.32]  [0.04, 0.12]  [0.02, 0.11]  [0.01, 0.10] |
|  |  |  |  |  |
| Men | 1. Job satisfaction 2. Leisure time 3. Receive help and support 4. Take notice 5. Physical activity (on own) | .490  .272  .095  .062  .056 | .00  .00  .00  .01  .01 | [0.43, 0.53]  [0.23, 0.34]  [0.08, 0.21]  [0.02, 0.11]  [0.06, 0.12] |
|  |  |  |  |  |

Table 1.

*Questions and Response Scales of the Lifestyle, Health, Psychosocial, Life Satisfaction, and Work-related Constructs Used.*

|  |  |  |
| --- | --- | --- |
| Construct | Question | Response scale |
| **Lifestyle behaviours** |  |  |
| Connect1 | How often do you meet socially with friends, relatives or work colleagues? | 1 = never, to 7 = every day |
| Give1 | To what extent do you provide help and support to people you are close to when they need it? | 0 = not at all, to 6 = completely |
| Take Notice1 | On a typical day, how often do you take notice and appreciate your surroundings? | 0 = never, to 10 = always |
| Keep learning1 | To what extent do you learn new things in life? | 0 = not at all to, 6 = a great deal |
| Be Active1 | How much time do you spend in physical activity with others? | 0 = not at all, to 6 = a great deal |
| Be Active | How much time do you spend in physical activity on your own? | 0 = never to, 5 = five days a week |
| Volunteering | In the past 12 months, how often did you get involved in work for voluntary or charitable organizations? | 1 = never to, 6 = at least once a week |
| **Subjective health** | How is your health in general? | 1 = very bad to, 5 = very good |
| **Psychosocial** |  |  |
| Strengths2 | I know my strengths well. | 1 = strongly disagree to, 5 = strongly agree |
| Strengths2 | I always try to use my strengths. | 1 = strongly disagree to, 5 = strongly agree |
| Autonomy | I feel I am free to decide for myself how to live my life. | 1 = strongly disagree to, 5 = strongly agree |
| Engaged | How much of the time would you generally say you are absorbed in what you are doing? | 0 = none of the time to, 10 = all of the time |
| Feeling respected | To what extent do you feel that people treat you with respect? | 0 = not at all to, 6 = a great deal |
| Social support | To what extend to you receive help and support from people you are close to when you need it? | 0 = not at all to, 6 = completely |
| Relationships | How many people are there with whom you can discuss intimate and personal matters? | 1 = none to, 7 = 10 or more |
| Resilience  Resilience | When things go wrong in my life, it generally takes me a long time to get back to normal.  How difficult or easy do you find it to deal with important problems that come up in your life? | 1 = strongly agree to, 5 = strongly disagree  0 = extremely difficult to, 10 = extremely easy |
| Meaning / purpose | I generally feel that what I do in my life is valuable and worthwhile. | 1 = strongly disagree to, 5 = strongly agree |
| Self esteem | In general I feel very positive about myself. | 1 = strongly disagree to, 5 = strongly agree |
| **Work related** |  |  |
| Job satisfaction | All things considered, how satisfied are you with your present job? | 0 = extremely dissatisfied to, 10 = extremely satisfied |
| Work life balance | All things considered, how satisfied are you with the balance between the time you spend on your paid work and the time you spend on other aspects of your life? | 0 = extremely dissatisfied to, 10 = extremely satisfied |
| Financial security | Which of these descriptions comes closest to how you feel about your household’s income nowadays? | 1 = finding it very difficult on present income to, 4 = living comfortably on present income |
| **Satisfaction with major life domains** | How satisfied are you with each of these aspects in your life?  Intimate relationships, Family, Friends, Leisure time, Time on your own, Politics, Work, Education, Religion, Spirituality, and Community Involvement. | 0 = extremely dissatisfied to, 10 = extremely satisfied |
|  |  |  |
| **Diener Flourishing Scale** | I lead a purposeful and meaningful life.  My social relationships are supportive and rewarding.  I am engaged and interested in my daily activities.  I actively contribute to the happiness and wellbeing of others.  I am competent and capable in the activities that are important to me.  I am a good person and live a good life.  I am optimistic about my future.  People respect me. | 1 = strongly disagree to, 7 = strongly agree |

1The SWI includes items assessing participation in the *Five Ways to Wellbeing* (Connect, Give, Take Notice, Keep Learning, and Be Active) identified by the New Economics Foundation as evidence-based behaviours to improve population wellbeing (Aked, Marks, Cordon, & Thompson, 2009).

2Strengths were assessed via two questions from the Strengths Knowledge and Strength Use Scales (Govindji & Linley, 2007).

1. All effect sizes are Cohen’s *d* [↑](#footnote-ref-1)
2. Note this variable refers to satisfaction with the life domain of ‘work’, and not ‘job satisfaction’. [↑](#footnote-ref-2)