



Bridge Employment: A Systematic Literature Review on the Association Between Bridge Employment and Working Retirees' Well-Being and Mental Health.

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Abstract

Purpose: By employing the theoretical frameworks of both Role and Continuity theory, the primary purpose of this systematic literature review was to understand the effect participating in bridge employment as a retirement transition process has on working retirees' well-being and mental health. This review also identified potential bridge employment related personal, and contextual variables that influence older retirees' well-being and mental health in bridge employment. **Methods:** A comprehensive systematic review was conducted by using the PRISMA guidelines. Primary literature searches were performed on the scientific databases of *Web of Science* and *PsychInfo* up until October 2021, alongside a scooping search on the included articles respective reference lists. Articles were screened according to a previously devised set of inclusion and exclusion criteria. **Results:** 13 studies were included; out of them, seven studies found positive effects, two studies found negative effects, three studies found mixed results, and one study found no effect on participating in bridge employment and its effects on retirees' well-being and mental health. 16 factors that influence well-being and mental health in bridge employment were also found. **Conclusion:** In line with some past papers, engaging in bridge employment was found to be beneficial for retirees' well-being and mental health; although care should be taken concerning the job demands, job control, type, and the quality of bridge employment these retired workers engage in. Strengths and limitations in terms of the included studies and the review have been discussed. Future research directions and implications have also been explored.

Keywords: bridge employment, retired workers, working after retirement, occupational transition, well-being, mental health, systematic review

Introduction

Predominantly, retirement was often regarded as a close-ended process, that is, from full-time employment to complete withdrawal (Earl & Taylor, 2017). However, in the last decade, retirement has been reconceptualized as an open, ongoing active transition process. The current baby boomer generation is constantly undertaking multiple entries back into the workforce. This entry into the workforce, either during or before full retirement, is often termed as bridge employment. Working after retirement or bridge employment is undertaken by older working retirees, usually around the age of 55-65 years old (Alcover, 2017; Parry & Wilson, 2014). In addition, with well-developed health care systems, higher life expectancies, and detectable talent shortage of highly experienced persons, many governments around the world such as the Dutch, Japanese, German, Austrian, American, and the Canadian governments are supporting their older populations with various opportunities to work even after retirement (Chan, 2019).

The number of individuals partaking in work after retirement has steadily increased; statistics show that around 50 percent of retired individuals re-enter the workforce (Cahill et al., 2013). Although, less than 2 in 10 older adults decided to retire from the workforce altogether, the majority of the older retired population extended their work-life beyond retirement (Fasbender et al., 2014). Moreover, based on the data compiled by Bureau of Labor Statistics in 2017, 55 % of the retired people aged 60 were still noted to be working in part-time bridge employment jobs. In addition, the advancements in the field of research are also noteworthy; for instance, a general search on scientific databases for the keyword "bridge employment" as of August 2021 generates approximately 1,210,000 hits. These advancements and statistics have naturally raised and sparked queries about working beyond retirement and its effects on retirees' well-being and mental health, making it relevant for psychological and organizational research, discussion,

interventions, and debate. Therefore, understanding/identifying the possible associations between bridge employment and older working retirees' well-being and mental health forms the very basis of this present study. With ample research accumulated on bridge employment, the past literature was unable to locate a relevant systematic literature review that perceived it as an ongoing transitional/longitudinal process with potential effects on well-being and mental health.

Therefore, this paper's prime focus was to understand the type of effect bridge employment has on well-being and psychological health. To address this purpose, this current study deployed a systematic literature review focusing mainly on two straightforward research questions. The first question in this study was to understand the nature of the effect, i.e., positive or negative, participating in various bridge employment opportunities has on the working retiree's well-being and psychological health. The second research question was to determine and locate the different factors of bridge employment that might affect retirees' well-being and psychological health. These factors can be contextual (e.g., voluntary/involuntary retirement), personal (e.g., marital quality, family support, level of experience), or job-related (e.g., stress, working hours, job quality/engagement, commitment). In addition, a systematic review containing the previous year's research would thus be fruitful for policymakers, healthcare professionals and upcoming organizations arranging various bridge employment opportunities aimed at retired individuals.

Theoretical Framework

Occupational and Retirement Transitions

Within the occupational domain, shifting into retirement is the last of the most impactful human transitions that older adults (i.e., individuals above the age of 50) face, and as a result, they are constantly in the process of adapting and adjusting emotionally (Lahdenpera et al., 2021; Rodríguez-Monforte et al., 2020). They are mainly impactful because they directly affect mental

health and overall well-being (Svob et al., 2014). In this particular transition period, retirees go through a myriad of mixed emotions, such as happiness, satisfaction, relief, feelings of fear, uncertainty, unease, and burnout (Yeung & Zhou, 2019). Moreover, this period has very intense effects on emotional and subjective well-being, attitudes, behavior, and psychological health (Hawkley & Kocherginsky, 2018; Lee & Kim, 2017; Nikolaev et al., 2020). Even though transitions may reward individuals with a sense of growth, they could negatively affect them and thus may leave them feeling distressed, anxious, exhausted, or drained (Arya et al., 2021). Therefore, the effect of retiring on individuals' well-being and psychological health are mixed.

Based on the statistical data collected by the National Bureau of Economic Research from America in June 2017, full retirement leads to a 16-20 % decrease in mobility/general functioning and a 10-18 % increase in mental health conditions among older individuals. Also, ultimately leaving the workforce to retire wholly or early is associated with depression, early demise and predicts suicidal behavior (Page et al., 2020; Quaade et al., 2002). Therefore, for individuals in full retirement or retirement transitions, its adverse outcomes can outweigh its positive effects.

In support of the above research, the WHO (2013) recommends that older individuals partake in bridge employment opportunities to help them stay active and help improve their overall welfare. Nevertheless, with the upcoming opportunities/possibilities for older adults in bridge employment, the long-established interpretation of retirement thus adopts a different dimension and direction.

Bridge Employment

For this study, individuals will be termed "working retirees'" when they partake in bridge employment jobs after they have voluntarily or involuntarily left their previous long-term jobs

and are looking to transition towards full retirement. Furthermore, working after retirement, paid work after retirement, and post-retirement employment is collectively termed bridge employment (Jones & McIntosh, 2010). Therefore, they carry the same meaning, concept, and intention but differ only by their titles; hence this paper will follow the same.

Bridge employment is a type of paid employment that individuals take up either full-time or part-time after retiring from their previous long-term positions (Alcover et al., 2014). According to Shultz (2003), two distinct types of employment involve returning to work after retirement, i.e., bridge employment and career bridge employment. Individuals can either choose to work in the same field/organization they previously worked for i.e., career bridge employment or work in a completely different field/organization i.e., bridge employment. In general, bridge employment is more flexible than a regular job, in the sense that the type of work undertaken will not have a fixed day, date, or time (Kim & Feldman, 2000). Moreover, in contrast to a regular job, it has lesser task demands and is generally less stressful.

Older workers participate in bridge employment for personal, health, and financial reasons (Zitkyte, 2019). For example, if they do not have enough savings, they may take up bridge employment jobs to serve as a means of income. Moreover, taking up bridge jobs may help keep retired individuals mentally stimulated, and, in addition, it might even help to give some concrete structure to their days. It may help to prolong the retirees' working life and role (Ulrich & Brott, 2005). Lastly, working after retirement is beneficial from the organization's perspective since it might be a convenient way for them to reduce the shortage of labor by holding on to their older retired workers talents, wisdom, and expertise (Syed, 2017).

Bridge Employment, Well-being, and Psychological Health

This current paper will broadly focus on well-being facets such as subjective, emotional, occupational well-being, and mental health. The growing prevalence of bridge employment has raised concerns about its legitimate outcomes on occupational, emotional, and subjective well-being and psychological health in the lives of retired adults willing to partake in it. Firstly, according to Diener and Ryan (2009), subjective well-being denotes how an individual judges/evaluates his or her life at a certain point in time. It comprises of a cognitive judgment element, i.e., what an individual thinks of their life, and an emotional reaction element, i.e., an individual's feelings, state of mind, and mood. Subjective well-being is an umbrella term, and in literature, it mainly includes life satisfaction, positive affect, and negative affect. Secondly, occupational well-being is often related to the type of attitudes individuals have towards their workplace; it also comprises of how satisfied, engaged, and productive they feel concerning their workplace activities/settings (Cotton & Hart, 2003). Moreover, it denotes an individual's ability to manage stress, have work-life balance, and form healthy functioning relationships with their supervisors and other counterparts. Thirdly, emotional well-being is an individual's ability to be resilient and adapt/handle demanding situations. It mainly revolves around behaviours, thoughts, actions, and feelings, and it is an individual's ability to produce negative or positive emotions, feelings and moods about their life. Both well-being and mental health are very broad terms and are interconnected; low levels of subjective/emotional/occupational well-being may have consequences and lead to mental health issues such as anxiety, stress, and depression (Toussaint & Webb, 2005).

Concerning the topic at hand, with increasing age, older people's reasons to work after retirement are directly or indirectly linked to their subjective well-being (Dingemans, 2012). Old

age is often associated with a gradual decline in well-being and mental health (Neno et al., 2007; Sarabia-Cobo et al., 2020). The types of experiences older retirees' have as bridge workers will thus be an essential contributing factor to their mental health and well-being or life satisfaction levels (Topa et al., 2014). Even though there have been consistently positive results on how bridge employment influences psychological health (Homaie Rad et al., 2017), one should not ignore how some bridge employment opportunities can be very demanding and stressful and can thus, negatively impact the retirees' mental health.

Previous research highlights that engaging in work in very stressful environments is bound to impact an individual's mental health (Von Bonsdorff et al., 2017). The older retirees' might be prone to various workplace stereotypes (Manzi et al., 2019); that is, if they were forced to retire, they might be viewed as less capable/competent in their current bridge employment workplace. Moreover, based on the type of bridge employment, i.e., if they opt to work in the same organization or a different one, they might be prone to age-old negative workplace stereotypes. Additionally, they might not be welcomed because they may be viewed as bridge workers who take away existing jobs from the current generations (Mazumdar et al., 2021). In sharp contrast, authors observed that working in bridge employment jobs at a very advanced age has no significant effect on well-being and psychological health (Forbes et al., 2015). Therefore, there is a need to understand why these variations arise for well-being and mental health.

Furthermore, many factors under bridge employment may saliently influence psychological health and well-being (Wang et al., 2009). For example, the motivation and the attitudes or even the decision to engage in bridge employment might play a vital role in well-being. Besides motivation, other organizational or personal factors such as voluntary/involuntary retirement, daily wage, job satisfaction, number of hours, social support, and marital quality

could also potentially affect well-being and mental health of workers in bridge employment. Such factors are yet to be explored and identified since most of the earlier studies focused more on the attitudes, antecedents, benefits, and motivations of working after retirement (Kerry, 2018; Wang et al., 2008).

Theoretical Background

Few social, psychological, and organizational theories help researchers understand how individual psychological health/well-being could benefit or affect older individuals who continue to work even after retirement. From an organizational psychology perspective, concerning areas about work-life during retirement transitions and its association on retirees' well-being and mental health, the theories of Role and Continuity theory have heavily been relied on (Jones & McIntosh, 2012; Kim & Feldman, 2000; Von Bonsdorff et al., 2009). Human beings are fond of routines and structure (Zisberg et al., 2010), and full retirement supposedly takes that away. The loss of their previous work role identity, routine, social and financial support are the primary causes of constant worry and unhappiness among those trying to adjust to life after retirement (Hasam et al., 2019; Kim & Moen, 2002; Maketivila, 2019). This disruption/instability can give rise to depression and anxiety symptoms. To help tackle this, continuity theory highlights that older individuals in the process of retiring would want to sustain their previous work-role structure (Von Bonsdorff et al., 2009). To do so, they would engage in various activities that help preserve the continuity of any work-related role that they previously adhered to. In support of the continuity theory, people who engaged in bridge employment opportunities after their transition might have a better health status than individuals who wholly retired from the workforce. This might be because bridge employment helps individuals adjust to retirement by helping them maintain a continuity similar to their previous work role.

Role theory (Ashforth, 2000) stresses the significance of losing a work role when individuals transition into retirement. Due to this work role loss because of retirement, the individual might develop feelings of frustration, boredom, worthlessness, emptiness, and hopelessness. For retired individuals who have feelings of severe role loss or genuinely look forward to being in the workforce, bridge employment thus becomes highly favorable. Role theory helps one understand how the loss of a vital work role might potentially disturb an individual's well-being. Conversely, continuity theory helps provide an alternative intervention to curb the loss of this particular work role for individuals transitioning to retirement by effectively maintaining continuity (Wang et al., 2008). Thus, gathering from the perspectives of both continuity and role theorists, bridge employment is viewed as a chance and an opportunity that might bring some social support and connectivity and personal and financial stability (Von Bonsdorff et al., 2009).

For instance, looking onto social support, depending on the type of bridge employment they take up, they might be able to keep in touch with their previous colleagues or establish new connections. Participating in it might also help the sudden distress or disturbance retirees face when they leave the workforce and start transitioning towards retirement. Moreover, it also helps keep the continuity in the work routine. Therefore, the higher the continuity of that specific work role, the lower the negative consequences on individual mental health upon retiring.

Current Study

Concerning this present study's variables, only one systematic review by Maimaris et al. (2010) concluded that working beyond retirement may be beneficial for mental health. This literature study collected and reviewed studies that looked at working after retirement on cross-sectional data and volunteering beyond retirement on longitudinal data. Prior to that review, the

very first systematic review that looked at working after retirement transitions, well-being, and psychological health was done almost eight years ago by Wang et al. (2014). In that review only a tiny portion was dedicated to the antecedents of bridge employment and its effect on general health. Systematic literature reviews in the past focused more on how well-being is affected during retirement transitions on cross-sectional data (e.g. Henning et al., 2016). One scoping review protocol study focused on how working after retirement might influence physical health specifically (Lecours et al., 2019). Most of these studies reported a positive experience regarding bridge employment and how it affects mental health. Possible reasons for the positive results could be due to consistency in the research methodologies used by the researchers, i.e., most of the studies were highly cross-sectional. However, cross-sectional studies can be very limited in nature (Solem, 2015), as that they may only provide an inadequate snapshot of how these variables about transitions, well-being, or retirement influence one another over short durations. They do not provide information on the long term patterns or quality of the bridge employment jobs.

To study their long-term benefits, patterns, effects and particularly quality, it is necessary to examine longitudinal studies. Therefore currently, no systematic study has documented the outcomes of working after retirement or bridge employment on well-being and psychological health with data specifically collected longitudinally. This systematic literature review will be the first in its field. It focuses specifically on the effects of bridge employment on well-being and psychological health among people in retirement transitions. Moreover, with how common bridge employment is becoming in various developed and developing countries, there is a need to update the literature on its influence on mental health and well-being.

The following research questions stated below form the very basis of the current systematic literature study:

Q1 What effects does bridge employment have on retirees' psychological health and well-being?

Q2 What are the various factors (personal, job-related, and contextual factors) of bridge employment that influence retirees' well-being and psychological health?

This study will represent a comprehensive systematic review of the various effects of bridge employment on well-being and mental health variables on data specifically collected longitudinally. It will use the PRISMA guidelines alongside a unique set of inclusion and exclusion criteria. Relevant studies that fall within the inclusion criteria will be discussed in detail, and various implications that the review's findings will have on policymakers, health care workers, governmental bodies, individuals in retirement transitions, and bridge employment workers themselves will be highlighted.

Methodology

Search Strategy and Procedure

This systematic literature review was conducted by adhering to the PRISMA guidelines and principles (Page et al., 2021). The literature search procedure took place from September 2021 to October 2021 and included articles published up until October 2021. Initial searches were carried out through scientific databases such as Web of Science and Psych Info, with the help of Boolean search strings, i.e. (“bridge employment” OR “career bridge employment” OR “return to work after retirement” OR “phrased retirement” OR “working after retirement”) AND (“well-being” OR “life satisfaction” OR “quality of life” OR “anxiety” OR “stress” OR “happiness” OR “sense of purpose”). A pre-set time period filter/range was used, i.e., 1945-

2021. Based on the available hits, all the studies/research papers were directly collected, screened, and extracted autonomously by one reviewer and were stored on the Microsoft Excel platform. Inclusion and exclusion criteria were devised prior to the data collection stage. Lastly, the entire data collection process (from screening to full-text eligibility) will be visually represented in a PRISMA diagram (see Figure 1, Appendix A).

Inclusion and Exclusion Criteria

Inclusion criteria comprised of published studies that precisely adhered to the following criteria: 1) peer-reviewed, 2) written in English, 3) had a longitudinal study design, 4) did not comprise of the clinical patient population (individuals retiring due to disability or pre-existing mental health issues), 5) had a comprehensive range of variables covering facets of well-being and mental health (variables thought to influence well-being/mental health, directly may also be included alongside antecedents), 6) contained a minimum of 2 waves, 7) mixed (quantitative and qualitative) longitudinal studies, 8) published theses.

Exclusion criteria mainly comprised of studies that were: 1) published in languages other than English, 2) studies that looked purely into physical/physiological health, 3) cross-sectional studies, 4) grey literature, interviews, protocol papers, books, and generic articles, 5) general attitudes and intentions of bridge retirement employees, 6) participants from a clinical population, 7) individuals who volunteer as a part of their retirement transition.

Data Extraction

Based on the various data/information reported in the studies, the following details were specifically gathered 1) author name and the year of publication, 2) study and sample details (mean, sample size, country of collection, and the number of waves), 3) theoretical background, 4) well-being and mental health variables measured, 5) type of measurement and scales used, 6)

bridge employment factors influencing well-being and mental health, 7) overall effect of bridge employment on well-being and mental health, 8) key results, 9) overall quality of the study (see Table 2, Appendix C). This tabular form will provide an overview of all the characteristics of the studies included in this review.

Quality Assessment

Assessing the overall quality of studies in a systematic literature review is as compulsory as evaluating the studies' available/shortlisted data or evidence. This procedure was carried out so that both the researcher and the reader would be aware of the ethical issues, bias, validity, reporting clarity, and other errors that may or may not have arisen (Mallen et al., 2006). Hence, the comprehensive quality analysis of the included studies is observed as a stringent requirement. For the sole purpose of quality assessment, this respective review made use of the Critical Appraisal Skills Program (CASP) checklist for longitudinal studies.

Results

Search Results

The PRISMA flow chart represented in Figure 1(see Appendix A) shows the process of the full literature search. A corresponding table at the side also mentions reasons why some studies were excluded after screening. The Cochrane Library was used to see if any systematic literature reviews were published on the variables in line with this study, but no additional literature was found. From the figure, one can gather that the search resulted in 259 articles (combining Web of Science = 125 articles and Psych Info = 134 articles). Two additional studies were also found via scooping the reference lists of two included studies (Dingemans &

Henekins, 2015; Topa et al., 2014). After manually removing duplicates via the excel platform, it further resulted in 202 unique articles.

These unique articles titles and abstracts were screened, and 178 articles were excluded since they did not meet the review's inclusion criteria. Out of 26 articles assessed for full-text eligibility, 13 studies were removed since they were not in line with the inclusion criteria (i.e., longitudinal: not covering more than a wave), not published in English, and generally measuring post-retirement health and assessing the type of individuals who would prefer to partake in bridge employment). Overall, 13 articles met the inclusion criteria and were included in the study. 12 studies had a quantitative research design, only one study had a mixed design. The year of publication for the 13 included studies ranged from 2007 to 2021.

Quality Assessment

The CASP checklist comprises various statements about research questions, methodologies, biases, and follow-ups. This checklist has a total of 12 statements, an example of an item from this checklist is "If the participants were recruited in an acceptable way" and "The follow up of the subjects over the years is complete and long enough."

All these 12 items are listed in Appendix B. By answering these individual items, a score for the quality assessment of each study was computed by giving an overall score. This, therefore, indicated if the quality of the study was good, fair, or poor. One statement was removed, i.e., regarding the absolute risk reduction since it was not directly applicable to the current review's direction. Based on the statement and the information given in the longitudinal studies, I answered the 11 statements with either Yes (Y), No (N), or Cannot tell (CT).

Regarding the overall scoring criteria for each study, no particular standardized procedure was given under the CASP checklist. When a study had more than two "no's" (N) it

was rated as poor, if it had more than two “cannot tell” (CT), it was rated as fair, and a combination of no’s and CT’s was fair. Keeping in mind the limited number of studies gathered from the scientific databases and the strict inclusion criteria, no studies were excluded if their quality was deemed poor at the end of the analysis. Seven out of the thirteen studies had a good quality rating, six had a fair quality rating, and one had a poor quality rating (see Table 1, Appendix B).

Descriptive Analysis

Based on the studies gathered, data from the 13 studies was collected (see Table 2, Appendix C) from the countries of Japan ($N=1$), Taiwan ($N=1$), Netherlands ($N=5$), Israel ($N=1$), Brazil ($N=1$), and the United States of America ($N=2$). Two studies (Dingemans & Henkens, 2020; Topa et al., 2014) used data from the SHARE study comprising of data collected from 11 European countries. Studies had also used data from panel surveys such as, Health Retirement Study, and Work and Retirement Panel. Some studies used a local temporary employment agency or recruited participants on their own based on some criteria. The sample size of all the 13 studies ranged from 57 to 6764 participants, with a mean range from 54 to 69 years of age. The percentage of females included in the 13 studies ranged from 24.90 % to 74.80 %. Only one study did not have any female participants (Nuttman-Shwartz, 2007).

In terms of measurement waves, six studies had two waves of measurement while seven studies had multiple waves (three to five waves). Observation periods usually ranged from 12 months to 72 months. The studies had a retention rate (i.e., percentage of individuals who participated from the start to the end of the survey in the waves) from 25 % to 76 %. The studies comprised participants transitioning from voluntary/involuntary retirement to work in post-retirement or bridge or career bridge jobs. All 13 studies used a self-report type of measurement.

Among the included studies, life satisfaction was the most frequently measured subjective well-being variable and some authors made use of the satisfaction with life scale (Diener et al., 1985). Other authors used short questionnaires adapted from the Mental health scale (Radloff, 1977) as well as their own tailored demographic/descriptive questions.

Lastly, this review found seven other theories that also help in understanding the reasons why older individuals participate in bridge employment and its outcomes on mental health. These are Stage theory (Wang et al., 2011), Old age developmental theory (Elder, 1995), Set theory and Adaptation theory (Dingemans & Henkens, 2014), Life Span/Course perspective (Elder & Johnson, 2003; Fuller-Iglesias et al., 2009), Karasek's Job demand control (Kain & Jex, 2010), and lastly, Conservation of resources theory (Hobfoll et al., 2000).

Bridge Employment Factors Influencing Mental Health and Well-Being

Six studies (Dingemans & Henkens, 2020; Lowden et al., 2021; Nuttman-Shwartz, 2007; Topa et al., 2014; Weber et al., 2019; Zhan et al., 2009) noted that the number of hours (16-32 hours per week) worked in bridge jobs influences retirees' static well-being and mental health during their retirement transitions. Other bridge employment factors that affect well-being and psychological health are job conditions, job suitability, job skills, job demand/job control (antecedents of well-being), task performance, work engagement, income, the timings they start their bridge employment. In addition, individual factors such as motivation, feelings of uncertainty, social support, financial resources, and contextual factors such as the type of bridge employment undertaken and psycho-social work conditions were also identified to have effects on well-being of the retirees' while they were in bridge employment.

Effect of bridge employment on well-being and mental health

Subjective Well-being

Under well-being and mental health, five papers measured the life satisfaction of individuals partaking in bridge employment as a part of their retirement transition. Three studies (Dingemans 2012 ; Dingemans & Henkens, 2015; Topa et al., 2014) observed that bridge employment helps individuals combat the adverse effects of full/involuntary retirement and improves their overall life satisfaction. Two studies showed mixed results (Dingemans & Henkens, 2014; Wu & Tsay, 2018), suggesting that the impact of bridge employment on life satisfaction is heterogeneous, depending on the type of occupation of the individual. One study (Dingemans & Henkens, 2014) noted that compared to individuals who were fully retired, individuals who had partaken in bridge employment did not show high levels of life satisfaction.

Psychological Well-being

Two studies (Nuttman-Shwartz, 2007; Wang, 2007) measured the psychological well-being of individuals with bridge employment jobs who were undergoing retirement transitions. The study by Wang (2007) found that individuals could maintain good levels of psychological well-being in bridge jobs while undergoing retirement transitions. However, Nuttman-Shwartz (2007) showed that working in bridge jobs had no effects on psychological well-being and distress levels. In the interviews held in his study, feeling scared of being entirely inactive and the fear of uncertainty had emerged as a common theme among the participants undergoing retirement transitions who were looking into various bridge employment opportunities.

Occupational Well-being

Two studies (Dingemans & Henkens, 2020; Müller et al., 2015) measured job control, job demand, cognitive functions, and stress as antecedents towards occupational well-being in

retirees partaking in bridge employment jobs as a part of their retirement transitions. One study reported positive effects towards their occupational well-being if the retirees felt that they had some job control (Müller et al., 2015), while the other study reported adverse effects since the retirees' felt that they had low levels of freedom/autonomy towards their assigned bridge employment jobs (Dingemans & Henkens, 2020). In the study by Müller and colleagues (2015), individuals considered themselves productive in bridge jobs only if they had some control over their jobs. The study by Dingemans and Henkens (2020) observed that individuals partaking in bridge jobs felt under constant pressure. In addition, they did feel that they had low levels of control over their careers, autonomy and freedom in decision-making.

Psychological and Mental Health

Three studies (Noguchi et al., 2021; Weber et al., 2019; Zhan et al., 2009) measured individuals' psychological and mental health in bridge jobs by measuring their emotional exhaustion levels, job quality and stress, mental health-related to the quality of life. One study (Weber et al., 2019) showed that females are more prone to job stress in bridge employment than men. In line with this, two studies (Noguchi et al., 2021; Zhan et al., 2009) observed the type of conditions, the job field individuals work in their bridge employment jobs, the skills they use, and the contribution they make is vital for their mental health.

Discussion

The core elements of the review were to evaluate and document the type of effect and quality bridge employment has on the working retirees' mental health and well-being on data that had previously been collected longitudinally. In addition, particular bridge employment variables/factors impacting well-being, its antecedents and mental health were also found and mentioned. Broadly speaking, seven studies found positive effects; two studies found adverse

effects, three studies found mixed effects, and one study found no effect on bridge employment and its effects on well-being and mental health of working retirees. That is a large majority of the studies found positive effects on working in bridge employment and its effect on quality of life, life satisfaction, happiness, job satisfaction, sleep quality, occupational and subjective well-being. Two studies found negative effects on emotional exhaustion, work engagement and job satisfaction. Job suitability was specifically related to lower mental health in women. In addition, in these studies women also showed high levels of emotion exhaustion and work stress in bridge employment. One mixed method study found no effect, i.e., working after retirement did not lower the levels of distress on individuals partaking in bridge employment in Israel.

This review also managed to identify 16 factors that mainly affect the well-being and mental health of those individuals partaking in bridge employment. They are bridge employment- related work factors such as job conditions, job suitability, job skills, job demands, job control, task performance, work engagement, number of hours worked, income, the timings they start their bridge employment. Personal factors such as motivation, feelings of uncertainty, social support, financial resources, and lastly contextual factors such as the type of bridge employment undertaken as well as the quality of the bridge jobs, and psycho-social work conditions i.e., the type of job control or job demand they are granted.

Based on the included research articles, the study by Dingemans and Henkens (2014) noted that retirees unable to find bridge employment have less satisfaction during their post-retirement lives. In qualitative interviews given by working retirees, the uncertainty and the fear of being inactive had emerged as the main central theme to partake in work after retirement (Nuttman- Schwartz, 2007). Noticeably, two in five older retirees engaged in bridge employment (Dingemans & Henkens, 2015). Generally, more men were noticed to take part in bridge

employment in comparison to women and this is in line with descriptive findings of the past that also mainly noticed large number of men to partake in them (Davis, 2003). This review noticed both similarities and slight contradictions regarding the type of bridge employment and its effects on well-being and mental health among the studies in this review. This section will map out three major findings based on the included studies.

Firstly, the quality of bridge employment job in itself is very important as it is directly observed to have a significant/strong positive effect on quality of life, job satisfaction and life satisfaction on the retirees partaking in it. Three studies by Dingemans and Henkens (2015), Dingemans (2012), and Wang (2007) noted that individuals who engaged in bridge employment after voluntarily retiring from their previous jobs reported high levels of life satisfaction and psychological well-being while undergoing retirement transitions. That is, their overall life satisfaction and psychological well-being appeared to be more positively enhanced and very well-maintained. Bridge employment was also observed to diminish the negative consequences of forced/involuntary retirement on life satisfaction. In addition, partaking in bridge employment was also observed to prevent the adverse effects that complete retirement brings. Also, compared to those who retired fully, those who experienced bridge employment had high satisfaction levels. From the above included studies, this is because partaking in bridge employment gives retirees the structure they need and were missing, a better work-life balance and gives them a sense of personal control.

Secondly, two studies by Weber et al. (2019) and Noguchi et al. (2021) looked at the gender differences in occupational well-being in bridge employment, except for a more significant rise in levels of emotional exhaustion for women compared to men; gender differences were relatively small and inconsequential. Compared to men, women had less job

control, low income, worked longer hours, and had high-stress levels while working in bridge employment. They also had low levels of job satisfaction and in turn worked in unsuitable bridge employment jobs that had detrimental effects to their mental health. These results may be due to the placement positions of women and the power of decision-making they are given in their bridge employment organization. In light of this, it is also noteworthy that women's marital quality in bridge employment was either single, divorced, or widowed. This finding holds hand with a past study that observed individuals who are married are less likely to engage in bridge employment for their well-being (Davis, 2003). Thus, a change in the individual's significant other or partner status, i.e., marital quality, could, thus, have an effect on well-being in bridge employment. It may be because in the absence of a partner, they are the sole breadwinners for their family and are motivated to participate in it for financial needs. In line with this finding, another included study also observed that those intrinsically motivated individuals showed high levels of life satisfaction compared to those extrinsically motivated to participate purely for financial purposes (Dingemans & Henekins, 2014). These findings are slightly contrary to Wang et al. (2008), who observed that financial motivation might not be the main reason people engage in bridge employment.

Thirdly, three studies observed that the type of bridge employment occupation (i.e., bridge employment or career bridge employment) older individuals participate in has varying effects on both mental health, well-being and life satisfaction. For instance, one study found mental health to be more positively related to career bridge employment than bridge employment, i.e., mental health was better in individuals who pursued bridge employment in the same environment as their previous jobs (Zhan et al., 2009). These findings can be explained with the framework of the role theory, as participating in career bridge employment would give

the same work role identity similar to the older individuals' previous jobs. Moreover, their mental health would not be severely affected. They may not be exposed to stress, or not feel exhausted as they are participating in the bridge employment opportunities in the same career they previously worked in, but with limited work hours. This finding is also in line with Wang et al. (2008), who also observed that older workers would engage in career bridge employment as they might have had high life satisfaction and overall good mental health in their previous jobs.

The placement of sleep at the most primary level in Maslow's Hierarchy of Needs can easily be interpreted as a necessity for the proper functioning of an individual's well-being and mental health across all ages (Hopper, 2020). In slight contrast to the previous study, sleep quality or the sleep cycles of those in bridge employment was not widely researched in the past, but this review came across one very recent study. In this study by Lowden et al. (2021), individuals who have engaged in bridge employment in a different work environment than their previous full-time jobs showed better sleep quality patterns than individuals who engaged in bridge employment jobs in the same work environment. This could be because of the shorter number of work hours (36 work hours) undertaken by bridge employment workers than career bridge employment workers who reported to work more hours in contrast. Past studies showed that extended work hours among older individuals are often associated with restlessness, inadequate sleep, and poor sleep quality (Takahashi, 2012).

Lastly, in terms of skill use, for manual workers making use of their skills improved their life satisfaction (Wu & Tsay, 2018), and for men, being able to use their previously acquired professional skills in their bridge employment jobs had benefitted their mental health and improved their levels of self-esteem (Noguchi et al., 2021).

Limitations

Even though this current review has yielded some intriguing findings and outcomes, there are also limitations with regards to both the included studies and the review in itself. Concerning the included studies, firstly, the particular type of jobs or the occupations (blue or white-collar worker, corporate worker) the workers take in bridge employment was not explicitly mentioned in any of the studies. Secondly, some studies used a very general measure of well-being or mental/psychological health, and they also adapted shorter scales. This could potentially cause small effect sizes and reduce the power of the analyses. Also, some scales used in the study had very few questions and thus had poor reliabilities. Thirdly, with the longitudinal data collected in the included studies, it was also prone to low response and follow-up rates over the years.

Regarding the current review's limitations, firstly, due to the author's language limitations, studies only in English were included for further assessment, studies in other foreign languages were automatically excluded. This may have easily given rise to an unintentional language bias. Secondly, only one author was involved in screening and reviewing the thirteen included studies. Thus, it may be prone to interpretational biases. Thirdly, it would have been ideal/relevant for the author to have provided a supplementary meta-analysis. As it gives the readers some overview of statistical significance with certain studies that had slightly contradictory results.

Strengths

Despite the shortcomings and limitations, the literature search initiated for this review was thorough on the two scientific/academic databases, coupled with an in-depth screening/scooping of the included studies' reference lists. The different keyword searches deployed were inclusive and representative of bridge employment, well-being, and mental

health. PRISMA guidelines were strictly followed, which may benefit future research replicability purposes. This current review is very important as it is the first to systematically map the effects of working after retirement on the well-being and psychological health of working retirees' with longitudinal data. Around ten studies included in this review are from the last decade, therefore providing a very recent and up-to-date findings of all the relevant literature in one place.

Previously, most of the studies on bridge employment were primarily conducted and carried out in the United States of America. The literature saw a shift towards more research conducted in many European and Asian countries as reported in this review. Thus, one observes how widespread bridge employment has become over the past decade. Findings from this review will be beneficial to various organizational psychologists, researchers, advisory consultants, and HR employees involved with older workers in retirement transitions; it can help them give realistic advice/guidance for those looking to join in bridge employment opportunities. Given how prominent bridge employment has become in comparison to the last few years, this review could also aid/serve as a starting point of reference for developing standardized guidelines and rules for policymakers and organizations having bridge employment opportunities.

Implications for Future Research

Although research in bridge employment is increasing, some variables used in the studies have received extensive attention by researchers, while some have been mainly ignored or remain unexplored. Future research should specifically focus on the particular wellbeing and mental health measures such as depression, anxiety, loneliness, happiness, and stress of older individuals in bridge employment. In addition, most of the well-being and mental health scales

used in the included studies were either outdated, short/adapted, or had limited reliabilities; thus, it would be essential for future studies to make use of scales that have strong psychometric properties. Furthermore, from a methodology point of view, the majority of the longitudinal data used in the included studies are from archival data gathered more than 15 years ago (i.e., SHARE, HRS, etc.). Thus future research should be carried out with the working retirees in the current or very recent labour force.

Based on this review, retirees are observed to participate in bridge employment either voluntarily or for financial motives/intension/reasons (Dingemans & Henekins, 2014), and these have an effect on the mental health and well-being of retirees; future research should explore/map other underlying reasons to partake in bridge employment and how they might potentially affect the wellbeing of the working retirees. Two studies in this review noticed that both men and women's well-being and mental health in bridge employment differed. Also, some studies did not have any female participants, or their representation was low compared to the male participants; more research in the future should try to include more female participants and focus on why these gender differences/variations arise. The included studies did not mention/describe the type of occupations the working retirees' undertook in bridge employment. Therefore, it would also be relevant to understand the kind of professions or preferred career paths individuals would most likely engage in bridge employment jobs. Similarly, it would also be interesting to study how wellbeing changes for retirees' who previously held positions of power (i.e., leaders, managers, presidents) and the type of jobs they'd most likely undertake in bridge employment, and if loss of power has any effect on their wellbeing. Research could also use variables such as level of education, personality, and work experience of the retirees' as

potential moderators and fear, authority, autonomy and uncertainty as potential mediators in bridge employment to see the effect they might have on their well-being and mental health.

The review also identified seven other theories on the association between that of bridge employment, well-being and mental health, research could also use these new theories as relevant frameworks. Future research should also be attempted via a qualitative study design to understand the point of views, attitudes, and perceived productivity levels of those in bridge employment. This would help broaden one's understanding of how their experiences could be improved and outline hinderances. Moreover, it would be insightful to see how older bridge employees from different economic, social, cultural (individualistic or collectivistic) backgrounds' mental health/well-being would differ. That said, it would also be noteworthy to look at the type of influence self-employment or volunteering benefits older retirees' well-being and mental health.

Conclusion

In conclusion, older workers should diligently decide if they want to participate in bridge employment. If so, the kind of bridge employment is crucial. For the most part, partaking in bridge employment can mostly be seen as an intervention/strategy designed to help prevent older individuals from having their mental health, subjective, occupational, and psychological well-being deteriorate during their retirement transitions. Appropriate working conditions are vital for sustaining the occupational well-being of older workers in bridge employment; attention should be given so that their skill-sets, motivations, and intentions complement their bridge employment jobs. This review saw the emergence of retired bridge workers as a prominent heterogeneous group; therefore, employers/organizations should consider the degree of job demand and control that retirees have, especially women. Volunteering and other leisure activities coupled with

bridge employment may also ease the transition into full retirement and help life satisfaction levels. The engagement in bridge employment thus could be viewed as a potential strategy for older workers in retirement transitions to preserve their existing work-life structures, well-being, and mental health without a sudden disturbance.

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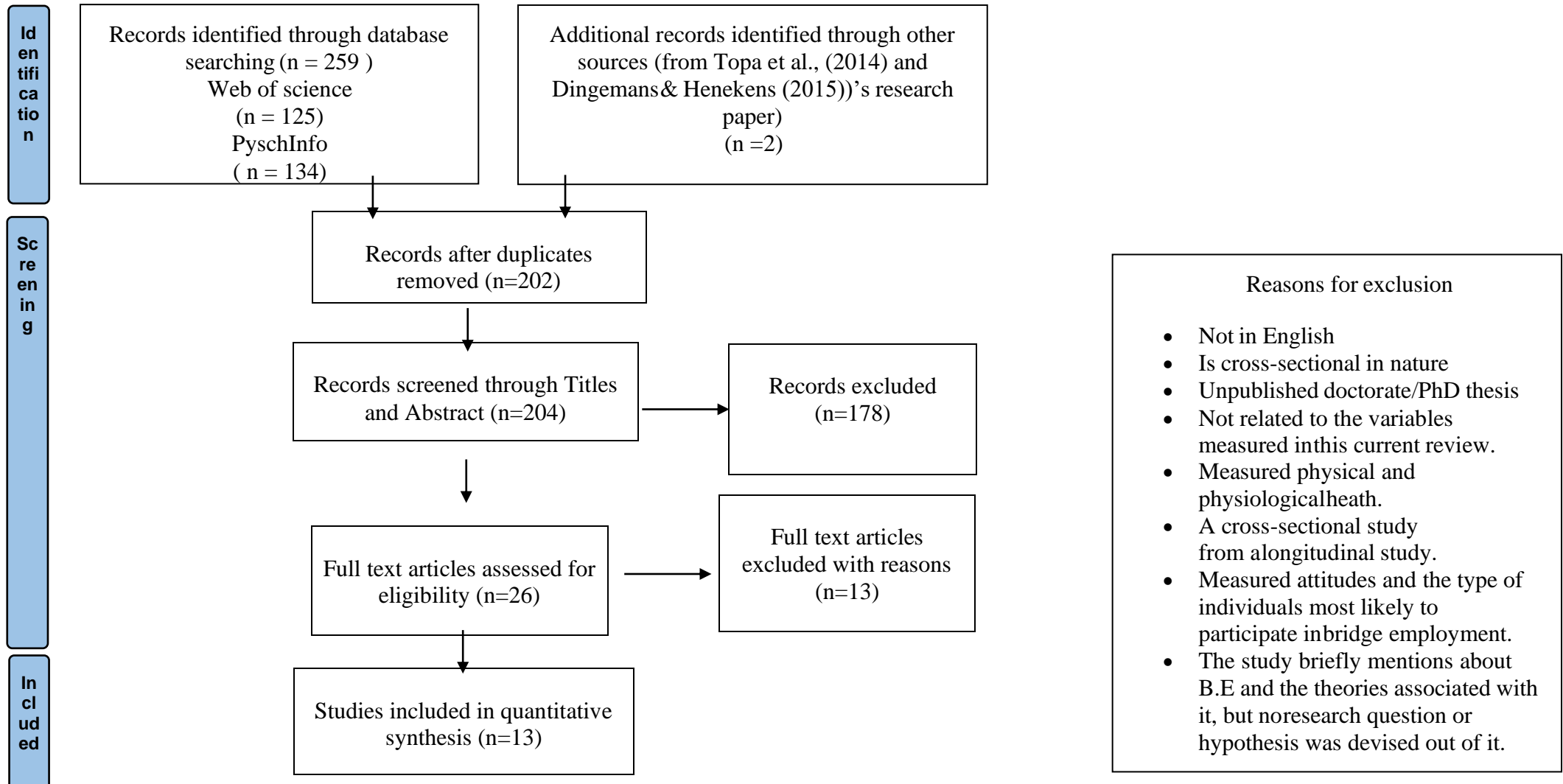
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Appendix A

Figure 1 - PRISMA FLOW CHART



Appendix- B

Table 1

Quality Assessment of the included studies using the CASP check list for longitudinal studies

[illegible]

Wang (2007)	Y	Y	CT	Y	N	Y	Y	Y	Y	Y	Y	Fair
Weber et al., (2019)	Y	Y	Y	CT	Y	Y	Y	Y	Y	Y	Y	Good
Wu & Tsay (2018)	Y	Y	Y	Y	Y	Y	Y	Y	CT	Y	Y	Good
Zhan et al., (2009)	Y	Y	Y	Y	Y	Y	Y	Y	Y	Y	Y	Good

Note the table above demonstrates the quality assessment of the 13 studies using the CASP checklist for cohort studies. Y = Yes, N= No, CT= Cannot Tell. Q1) The longitudinal study had a clearly focused research issue, Q2) The older participants in the study were recruited in an acceptable way, Q3) The self- report scales measured the well-being or mental health variables that was intended to be measured, Q4) The measurements were similar in different groups, Q5) The researchers were able to find confounding variables and they were taken into consideration for data analysis, Q6) The follow up of the subjects over the years is complete and long enough, Q7) The reporting of the results is precise, Q8) The results are believable, Q9) The results can be applied to the general older population undergoing or in the process of retirement transition/adjustment, Q10) The results of the current study fit in with the previously established results from previous studies, Q11) The study has listed some relevant implications and recommendations for future practice.

Appendix - C

Table 2

Overview of data extracted from 13 included studies.

Author and Year of Publication	Study and Sample Details	Theoretical Background	Well-being and mental health variables	Measurement Type and Scales used	B.E factors influencing well-being and mental health	Overall effects of B.E on well-being and mental health	Key Results	Quality of the study
Dingemans (2012)	N= 2403 Country = Netherlands Mean age = 54,59,64 Number of Waves = 3	Continuity, Stage and Role theory	Life satisfaction, subjective well-being	Measurement type = Self – report Scale = Satisfaction with Life scale	Social and financial resources	Positive	Participating in B.E can help combat against the negative effects of full retirement and helps in having high levels of life satisfaction.	Good
Dingemans & Henekins (2014)	N= 1248 Country = Netherlands Mean age = 64 Number of Waves = 3	Adaptation, Set, Role and Continuity Theory	Life satisfaction	Measurement type = Self – report Scale = Satisfaction with Life scale	Financial Incentive	Mixed	B.E jobs can have both positive and negative effects on well-being and mental health for retirees' participating in them.	Good

Dingemans & Henekins (2015)	N= 1615 Country = Netherlands Mean age = 54 Number of Waves = 3	None mentioned	Self-efficacy and Life Satisfaction	Measurement type = Self – report Scale - General Self- efficacy scale and Satisfaction with Life scale	Social support, Financial incentive	Positive	Participating in B.E jobs helped reduce the involuntary forced effects of retirement on well- being.	Fair
Dingemans & Henkens (2020)	N= 2926 Country = 11 EU Countries Mean age = 67 Number of Waves = 3	Job demand control model and strategic selection	Mental job demands and job control	Measurement type = Self – report Scales = Authors own descriptive scales.	Psycho-social work conditions and the number of hours worked (16-32 hours per week)	Negative	Retirees' working in B.E jobs felt exhausted since they were subjected to constant time pressure, they also felt that they had freedom in the decision making processes.	Good

Lowden et al.,(2021)	<p>N= 1454 (Bridge workers N = 760 and Career Bridge workers (N-760))</p> <p>Country = Brazil</p> <p>Mean age = 65</p> <p>Number of Waves = 2</p>	None mentioned	Daytime fatigue, sleep quality/duration, insomnia and morbidity.	<p>Measurement type = Self – report</p> <p>Scale = Authors own descriptive questions.</p>	Work hours, B.E environment.	Positive	<p>Sleep quality is better for retirees' working in a different workplace than retirees' working in the same workplace as their post retirement jobs.</p> <p>Poor</p>
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Müller et al., (2015)	<p>N= 6538</p> <p>Country = Netherlands</p> <p>Mean age = 69</p> <p>Number of Waves = 2</p>	Conservation of resources theory and life span theory of control	Stress, cognitive functioning, job demand and job control	<p>Measurement type = Self – report</p> <p>Scales = Cognitive failure questionnaire and Job content questionnaire</p>	Psycho-social job characteristics and task performance	Positive	Cognitive functioning is necessary for productivity in older retirees' as it predicts task performance in B.E.	Fair
Noguchi et al., (2012)	<p>N= 1668 (F=522, M=1146)</p> <p>Country = Japan</p> <p>Mean age = 69 for males and 68 for females</p> <p>Number of Waves =5</p>	Job demand resources model	Mental health related quality of life, job satisfaction and job stress	<p>Measurement type = Self – report</p> <p>Scales = Mental Health-related quality of life and Brief job stress questionnaire.</p>	Job conditions, job skills and job suitability	Positive for men and negative for women	<p>The type of job conditions older individuals work in their post retirement is very important for their mental health.</p> <p>Skill use was associated with mental health in older adults. Low or poor levels of satisfaction and job suitability was related to mental health in women.</p>	Fair

Nuttman-Shwartz (2007)	<p>N= 56</p> <p>Country = Israel</p> <p>Mean age = 65</p> <p>Number of Waves =2</p>	<p>Life story theory, Old age developmental theory and Adult adjustment model.</p>	<p>Qual =Life scenarios and stories.</p> <p>Quant = Distress and Psychological well-being, subjective well-being.</p>	<p>Measurement type = Self – report</p> <p>Scales = Mental Health Inventory and Multi-Dimensional Health Scale</p>	<p>Qual Interviews = scared of being in active and the uncertainty emerged as common themes.</p> <p>Quant =low salary hours and financial outcomes.</p>	No effect	Working after retirement does not lower levels of distress for working retirees'	Fair
Topa et al., (2014)	<p>N= 5403</p> <p>Country = 11 EU countries</p> <p>Mean age = 62</p> <p>Number of Waves =2</p>	<p>Continuity Theory & Life Span perspective</p>	<p>Quality of life, Job & Life satisfaction.</p>	<p>Measurement type = Self – report</p> <p>Scales = Control Autonomy, Self-realization Pleasure – 12 scale</p>	<p>Hours worked (18.5 hours weekly bases)</p>	Positive	The quality of B.E positively predicted quality of life, job and life satisfaction in retirees' participating in it.	Good

Wang (2007)	<p>N= 1066</p> <p>Country = USA</p> <p>Mean age = Not mentioned</p> <p>Number of Waves =2</p>	Role and Continuity theory and Life course perspective	Psychological well-being	<p>Measurement type = Self – report</p> <p>Scales = Psychological well-being from the Mental Health scale.</p>	Bridge status	Positive	Retirees' who held bridge jobs were able to maintain their psychological well-being.	Fair
Weber et al., (2019)	<p>N= 784</p> <p>Country = Netherlands</p> <p>Mean age = 69</p> <p>Number of Waves =2</p>	Job demand control model	Work engagement, Occupational well-being and emotional exhaustion	<p>Measurement type = Self – report</p> <p>Scales = Maslach burnout Inventory, Utrecht work engagement scale and job content questionnaire.</p>	Work engagement, working conditions and hours worked.	Negative	Females showed higher stress n post -retirement work than men. For emotional exhaustion no gender differences in B.E was found	Good

Wu & Tsay (2018)	<p>N= 1228</p> <p>Country = Taiwan</p> <p>Mean age = 60</p> <p>Number of Waves =4</p>	Life course perspective	Life satisfaction, happiness, perceived economic status.	<p>Measurement type = Self – report</p> <p>Scales = TSLA life satisfaction scale</p>	Type of B.E occupation	Mixed	Effects of B.E on life satisfaction are heterogeneous, for manual workers B.E is useful as it positively effects their life satisfaction but it is not the same for non-manual workers	Good
Zhan et al., (2009)	<p>N= 6764</p> <p>Country = USA</p> <p>Mean age = 60</p> <p>Number of Waves =4</p>	Role and Continuity Theory	Psychological and mental health	<p>Measurement type = Self – report</p> <p>Scales = Mental health scale</p>	Hours worked	Positive	Individuals engaging in career bridge employment than just bridge employment had better mental health	Good
