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Neill, R. D., Wake, J., Ohwa, M., Manthorpe, J., Gillen, P., & Mc Fadden, P. (2022). Comparing the Mental Wellbeing and Quality of Working Life among Nurses and Social Care Workers in the UK and Japan in Older Adults' Care Services during the COVID-19 Pandemic. *Psych*, 4(4), 843-855.
<https://doi.org/10.3390/psych4040062>

[Link to publication record in Ulster University Research Portal](#)

Published in:
Psych

Publication Status:
Published (in print/issue): 31/12/2022

DOI:
[10.3390/psych4040062](https://doi.org/10.3390/psych4040062)

Document Version
Publisher's PDF, also known as Version of record

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Article

Comparing the Mental Wellbeing and Quality of Working Life among Nurses and Social Care Workers in the UK and Japan in Older Adults' Care Services during the COVID-19 Pandemic

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Abstract: This study explored and compared the psychological wellbeing, burnout, coping strategies and work-related quality of life amongst health and social care workers in older adults' care homes and community settings during the COVID-19 pandemic in the United Kingdom (UK) and Japan. A cross-sectional online survey was conducted in the UK (May–July 2021) and a postal survey conducted in Japan (September–October 2021). Participants recruited were health and social care professionals within nursing, social care and social work occupations working in care home or community settings in the UK and Japan during the pandemic. Data were analysed using SPSS. 1327 respondents across the UK and Japan completed the survey. Respondents' psychological wellbeing was significantly lower in Japan compared to the UK ($p \leq 0.001$). UK respondents had significantly higher personal burnout ($p < 0.05$) and work-related burnout ($p < 0.05$) while those in Japan had significantly higher client-related burnout ($p < 0.001$). The novelty of this study relates to exploring mental wellbeing and quality of working life in two culturally contrasting countries. The overall psychological wellbeing and work-related quality of life of staff who work with older adults in the UK and Japan during the COVID-19 pandemic were lower than the population norm. Greater support and flexible working conditions for this workforce are needed to reduce burnout by improving wellbeing and work-related quality of life.

Keywords: COVID-19; social care workforce; aged services; wellbeing; quality of working life



Citation: Neill, R.D.; Wake, J.; Ohwa, M.; Manthorpe, J.; Gillen, P.; McFadden, P. Comparing the Mental Wellbeing and Quality of Working Life among Nurses and Social Care Workers in the UK and Japan in Older Adults' Care Services during the COVID-19 Pandemic. *Psych* **2022**, *4*, 843–855. <https://doi.org/10.3390/psych4040062>

Academic Editor: Mosad Zineldin

Received: 2 September 2022

Accepted: 20 October 2022

Published: 1 November 2022

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1. Introduction

The Coronavirus disease (COVID-19), a severe acute respiratory syndrome, was declared a pandemic in March 2020 [1]. Globally, the pandemic has created many challenges for individuals, families, communities, and organisations [2–4]. Public Health guidance and regulations changed working practices with the enforcement of social distancing restrictions, mask wearing, use of other Personal Protective Equipment (PPE) and requirements for good hygiene practices such as hand washing. While vaccinations have reached most of the developed world, new variants of the virus are emerging with variations in pathogenesis and increased transmissibility [1], thus at the time of writing (September 2022) COVID-19 still impacts working life, particularly among those employed in the health and social care sectors [5].

Previously under-resourced health and social care systems have struggled to cope in many countries. The pressure of working during the pandemic has taken a disproportionate toll on health and social care employees' work-related quality of life and wellbeing, thus

leading to higher staff turnover and burnout [6–9]. In Japan, those working in health and social care have experienced increased psychological distress over the course of the pandemic due to greater stress, reduced coping, and more difficult working conditions [10,11]. Matuso et al. [12] reported that one-third of Japanese healthcare workers were dealing with burnout. Similarly, many UK health and social care workers developed mental health conditions such as anxiety and depression due to the pressures of increased workload and longer hours resulting in burnout [13,14]. Those working in older adults' (aged 65 years and older) health and care services during the COVID-19 pandemic were substantially affected as daily working practices and staff roles changed on top of increasing responsibilities and workloads with many feeling they were insufficiently appreciated by government, other agencies and employers [15]. Older adults are often at higher risk of contracting COVID-19 and developing severe illness or dying due to underlying health conditions [16], which partly explains why such services are challenging to work in. Despite shared achievements of increased life expectancy that both the UK and Japan are celebrating, cross-cultural comparisons of the workforces supporting the minority of older adults in poor health are scarce particularly in the COVID-19 context. While comparing the UK and Japan is of interest as both countries are economically developed and have ageing populations, there are some differences in cultural values and services. In the COVID-19 context, these may give rise to variations in staff burnout, turnover, retention and mental health variables, such as mental wellbeing and work-related quality of life which this paper addresses.

1.1. United Kingdom (UK) Context

Since first identified in the UK in March 2020, by March 2022 there were over 22 million confirmed cases of COVID-19 (the fifth highest globally) and over 155,000 cumulative deaths in the country [17]. The UK is a developed European nation with a population of over 88 million, with citizens aged 65 years or older accounting for over 18% of the population [18]. Many UK older adults prefer to remain within their own homes for as long as possible and therefore only a small minority of them live in care homes [19]. Residents of such homes are often frail. In the UK there is virtually no long-term hospital care. During the data collection period of this study, COVID-19 restrictions were still very prominent across most of the UK in the health and social care sector but more socialization and travel were allowed particularly for those vaccinated in the general population. As the vaccination programme was accelerated, visiting care home resident was allowed but limited, wearing of face masks was compulsory in these settings but only guidance in other settings. Death rates initially slowed in May 2021 but cases rose throughout June with deaths reaching new daily highs in July of that year [20].

1.2. Japanese Context

As of May 2022, there had been over 7.8 million confirmed cases of COVID-19 and over 29,000 cumulative deaths in Japan, with the first identified case there in January 2020 [17]. Japan is a developed nation with a population of over 125 million. It has the highest proportion of older citizens in the world with nearly 30% of its population aged 65 years or older [18]. This was an initial cause of concern in the COVID-19 context as the virus was identified as being significantly more lethal among vulnerable and older populations. According to the Ministry of Health, Labour and Welfare [21], the number of specialist nursing homes in Japan in October 2020 was 8306, with 576,442 residents. These were staffed by 13,480 social workers (3791 certified social workers, i.e., holding national licenses), 27,022 nurses, and 292,875 (social) care workers (of whom 83,998 are certified care workers). Estévez-Abe and Ide [22] noted that specialist nursing homes were particularly at high risk of COVID-19 viral transmission due to their older populations and a study of rural nursing homes outlined some of the measures put in place to restrict viral transmission, such as requiring residents to eat alone in their rooms to avoid social contact [23]. Within this health and social care context, in Japan during the time of data collection, COVID-related travel restrictions were very much still in place with high compliance rates on

mask wearing and social distancing, with many Japanese prefectures being in States of Emergency which were only lifted in October 2021. Unlike the UK culture, Japan was one country where people generally wore masks to protect against allergies, viruses and so on before the pandemic [24].

1.3. Cultural Differences between UK and Japan

Cultural context differences are important when examining the UK and Japan data. Whilst at risk of generalisations, we have considered the relevance of some literature describing contrasting cultures. For example, in contrast to the UK, Saka [25] described Japan as operating on a highly coordinated system which nurtures a more collectivism culture, enabling more informal group decisions and tighter knit networks. Ng and Indran [26] have described Japan as having a strong culture of caring, contributing to a high value of being associated with its care system. Additionally, the spread of COVID-19 was different across the countries with initially less severity evident within Japan due to different cultural approaches such as strict adherence to guidelines, no culture of hugs or kissing greetings and general cleanliness [24]. Unlike the UK, specialist nursing homes in Japan are mostly run on a non-profit/publicly funded Social Welfare Organisation basis and are mostly funded (70–90%) through a public insurance scheme.

To acknowledge the challenges of working through the pandemic, health and social care workers in some parts of the UK (not England), received a £500 pro rata staff recognition payment [27]. This non-consolidated payment was not pensionable, moreover tax and national insurance were still payable therefore an actual payment of £735 per individual was made meaning that if the employee qualified for the main award, they received £500 (approximately 82,000 yen) as pay after tax. In comparison, within Japan virtually all social care workers received benefits during the pandemic. The Japanese government provided COVID-19 payments to social care workers with no restrictions based on job type [28], and all long-term care services for older adults and disabled people were covered. Both social care workers and clerical staff were eligible if they had direct contact with residents, whether working full-time or part-time. Employees in facilities whose residents had been infected with COVID-19 or those who had close contact with residents were eligible for a flat 200,000 Yen (Approx. £1238 UK Pound Sterling) benefit. Even if there were no infected residents, a tax-exempt sum of 50,000 Yen (Approx. £305) was paid.

1.4. Aims and Objectives

The current study aimed to compare cross-sectional data from the UK and Japan across different occupations working in health and social care services (nurses, social care workers and social workers) working with older adults, excluding in hospitals. We expected to see significant differences between the outcomes due to the cultural differences between the countries. The specific study objectives were to: (1) identify the similarities and differences between UK and Japanese workers in community settings (including Japanese nursing homes, and in the UK; care homes and nursing homes, domiciliary or home care services, and day care); (2) assess any significant differences in wellbeing, burnout, work-related quality of life and coping between health and social care workers in the two countries.

2. Materials and Methods

2.1. Study Design and Population

Two datasets of survey results are included in this paper, one each from UK and Japan. Demographic and work-related characteristics of the final included samples are presented in Table 1 by country. The first was the Phase 3 dataset from the wider UK-based study [6,7] which investigated the impact of the COVID-19 pandemic on UK nurses, midwives, allied health professionals (AHPs), social care workers and social workers employed in settings such as hospitals, care homes (including nursing homes), community and day services. This phase of the UK survey took place between May–July 2021. For this paper the UK dataset was reduced to only include nurses, social care workers and

social workers working in community or care home and nursing home settings with older adults; a sample of 534 respondents. In the UK study, convenience sampling was used to recruit participants voluntarily through professional associations, workplace unions and regulators, professional communications, employers, and regulatory bodies as well as through social media platforms (e.g., Facebook and Twitter). Data were collected anonymously online through Qualtrics, enabling any IP addresses to be deleted making the survey confidential. Participants followed an electronic link or QR code which linked them to the Participant Information Sheets, consent and survey.

Table 1. Demographic and work-related characteristics of the final sample.

Variable	UK (N = 425) 10 May–5 July 2021	Japan (N = 902) September–October 2021
Age		
16–29 (in Japan respondents had to be 20 or over)	37 (8.7%)	2 (0.3%)
30–39	65 (15.3%)	67 (9.6%)
40–49	100 (23.6%)	232 (33.4%)
50–59	159 (37.5%)	316 (45.5%)
60+	63 (14.9%)	78 (11.2%)
Sex		
Female	386 (91.9%)	563 (62.5%)
Male	34 (8.1%)	338 (37.5%)
Occupational group		
Nurse	42 (9.9%)	197 (21.8%)
Social Care	321 (75.5%)	472 (52.3%)
Social Work	62 (14.6%)	233 (25.8%)
Employment status		
Full time	315 (74.1%)	852 (95.2%)
Part time	110 (25.9%)	43 (4.8%)
Turnover intention (wanting to leave)		
No	212 (49.9%)	639 (71.2%)
Yes, because I want to have a variety of work experiences.	6 (1.4%)	12 (1.3%)
Yes, because the stress of the job is too much	43 (10.1%)	149 (16.6%)
Yes, because I found that my work was affecting my health and comfort	133 (31.3%)	53 (5.9%)
Yes, not for any of the above reasons, but simply because I wanted to change jobs.	14 (3.3%)	32 (3.6%)
Other	17 (4.0%)	13 (1.4%)

The second was a Japanese study using a similar protocol and survey of nurses, social care workers and social workers working in specialist nursing home settings. In Japan, the survey was conducted by post between September–October 2021. Questionnaires for two social workers, two nurses, and five care workers were sent to 500 randomly selected specialist nursing homes for older adults in Tokyo and surrounding six prefectures in the Kanto region, along with request letters and return envelopes. These specialist nursing homes for older people operate under the public long-term care insurance system and provide services to those needing moderate or substantial care. Completed questionnaires were returned directly to the study team. The 919 respondents came from many different specialist nursing homes across one metropolis and six prefectures in Japan.

2.2. Ethical Considerations

For the UK study, ethical approval was received a local university Institutional Review Board (Research Ethics Filter Committee of the School of Nursing at Ulster University (Ref No: 2020/5/3.1, 23 April 2020; Ulster University IRAS Ref No: 20/0073). Clicking on the arrow after these details and completion of the survey indicated participant consent. Participants were able to withdraw from the study at any time by not completing the survey. In Japan, ethical approval was obtained from the Ethics Committee of Tokyo Metropolitan University. A consent form for participation in the study was attached to the questionnaire, and the date of consent was written (but not the name) and returned with the questionnaire. Potential respondents were provided with an information sheet, and consent, confidentiality and anonymity were addressed at this stage. Permissions to use the scales in the questionnaire were provided by their original authors.

2.3. Measures

2.3.1. Sociodemographic Variables

The survey asked about age, gender, employment status (full-time, part-time employment), and turnover intention (intention to change job). These variables provided the opportunity for cross-cultural comparison and, while there were slight differences in the wording of the questions and the sample setting due to cultural differences, most variables were comparable.

2.3.2. Main Outcome Variables

All scales used in this research have adequate psychometric properties. Psychological wellbeing was assessed using the short version of the Warwick-Edinburgh Mental Wellbeing Scale (SWEMWS) [29]. The 7-item scale contains a series of statements about feelings and thoughts, with scores on a five-point Likert scale of 1 to 5 (None of the time to All of the time). The SWEMWS scale is scored by summing the scores for each item, then the total raw scores are transformed by the SWEMWS conversion table into metric scores. Total scores range from 7 to 35, with higher scores indicating positive wellbeing. The scale showed good psychometric properties within the UK study ($\alpha = 0.85$). The 23-item WRQoL scale [30] was used to assess Work-Related Quality of Life. Using a five-point Likert scale, respondents were asked to rate the scale items from 1 (Strongly disagree) to 5 (Strongly agree). Higher scores indicate better work-related quality of life. The scale showed good psychometric properties within the current study ($\alpha = 0.86$). To assess burnout, the Copenhagen Burnout Inventory (CBI) [31] was used. The 19-item scale assessed burnout across three different domains (personal, work-related and client-related) on a five-point Likert scale from 0 (Never) to 100 (Always). For each domain of burnout, a mean score was calculated, with higher scores indicating a higher level of possible burnout. The scale showed good psychometric properties within this study (personal burnout: $\alpha = 0.90$, work-related burnout: $\alpha = 0.90$, client-related burnout: $\alpha = 0.88$).

Coping was assessed by two scales. The Brief COPE scale is a 28 item self-report tool which measures ways of coping under stressful events [32]. Within this only 20 items from the BRIEF COPE scale were used to assess ten different coping strategies from the scale (active coping, planning, acceptance, positive reframing, use of emotional support, use of instrumental support, venting, substance use, behavioural disengagement, self-blame). The scale uses a four-point Likert scale ranging (1 = 'I haven't been doing this at all' to 4 = 'I've been doing this a lot') to understand the frequency of the different coping strategies people use in relation to stressors. Cronbach's alpha for the 20-item scale was acceptable in this present study ($\alpha = 0.82$). The second scale used was the Strategies for Coping with Work and Family Stressors Scale [33]. Five different coping strategies on a 15-item scale (family-work segmentation, work-family segmentation, working to improve skills/efficiency, recreation and relaxation and exercise) were assessed by a six-point Likert scale (1 = 'Never have done this' to 6 = 'Almost always do this') to indicate how often they had been doing what was

indicated by the statements. Each coping strategy is represented by three items and a mean score for each domain computed.

2.4. Data Analysis

Prior to analysis, the Japanese dataset was translated into English by (Professor Wake and Professor Ohwa,) who were responsible for the Japanese version and distribution of the survey. After completing the translation, the Japanese dataset was recoded and variables renamed to enable comparison with the UK dataset. To facilitate comparisons, the two datasets were merged and irrelevant variables were removed. A new variable named 'Country' was created to allow for analysis between UK and Japan data. Missing data were addressed prior to the analyses. The initial dataset, once reduced to relevant variables, included 1453 respondents (534 UK; 919 Japan). Initially, respondents who did not complete any items on one or more of the scales (SWEMWBS, WRQOL, Brief COPE, Clark's coping), were excluded ($n = 126$). The remaining missing data on the variables relevant to the analyses were minimal—less than 5%. The SWEMWBS, WRQOL and the coping items were treated as continuous variables and missing data on these items were estimated using the EM algorithm in SPSS. Missing values on the demographic and work-related variables were minimal and they were not estimated. Instead, listwise deletion was used in the analyses. After missing data were reduced, this left a final sample of 1327 respondents (425 UK; 902 Japan).

All analyses were conducted in SPSS 27 [34]. Parametric tests were conducted as the data are normally distributed ($p > 0.05$). t -tests for independent samples were conducted to analyse the mean difference between those in Japan and those in the UK. Effect sizes were estimated with Cohen's d , with values of 0.20, 0.50, and 0.80 representing small, medium, and large effects [35]. A one-way ANOVA (with post hoc tests) was used to check the difference between the three recorded occupations (Nurses, Social Care Workers and Social Workers). A multivariate multiple regression was conducted to explore the variance of the predictor variables on wellbeing and work-related quality of life. In the first step, the analysis controlled for the effects of respondents' demographic and work-related characteristics (sex, age, ethnic background, country of work, occupational group, number of years of work experience, disability status). In the second step, coping strategies (10 Brief COPE strategies and 5 Clark's coping Strategies) and burnout domains were added to the model. To compare how well the predictor set predicts the criteria for the two groups (UK and Japan), a Fisher's Z -test was conducted. Variables were centred before inputting the interaction terms to examine if coping strategies had an interaction between the phases, to help reduce the problem of any multicollinearity.

3. Results

3.1. Sample Characteristics

The final combined workforce sample contained 1327 respondents (425 from the UK and 902 from Japan). They were predominately female (91.9% in UK; 62.5% in Japan), and most were in the 50–59 age range (37.5% in UK; 45.5% in Japan). Most respondents were working in social care occupations (75.5% in UK; 52.5% in Japan). Most also worked full time (74.1% in UK; 95.2% in Japan). However, just over half respondents in the UK (51.1%) reported considering leaving their current jobs compared to less than a third (29.2%) in Japan. Table 1 reports the main demographics.

3.2. Preliminary Analysis—Mean Difference Analysis—Outcome Comparison across Countries

Table 2 shows the descriptive statistics of the outcome variables by country. When the mental wellbeing scores were converted to indicate probable or possible cases of anxiety/depression, we found that, UK wide, 16.9% were probable (likely) cases of anxiety or depression and a further 22.8% were possible cases of anxiety or depression. Within the Japanese sample, 22.4% were probable (likely) cases of anxiety or depression and a further 23.7% were possible cases of anxiety or depression. When the burnout scores for

each domain (personal, work and client) were converted to low, moderate, high or severe burnout, we found that UK-wide, 76.0% faced moderate to severe personal burnout, while in Japan this was 69.3%. UK-wide 68.2% faced moderate to severe work-related burnout while in Japan this was 62.2%. However, more Japanese respondents faced moderate to severe client-related burnout (45.0%) than UK respondents (17.2%).

Table 2. Means and standard deviations (in brackets) for Wellbeing, Work-Related Quality of Life (WRQoL), Coping strategies and Burnout across the two countries.

Variable	UK (N = 425)	Japan (N = 902)	Mean Difference	Country Comparison <i>p</i> -Value
	M (SD)			
Wellbeing	20.15 (3.57)	19.36 (3.57)	−0.79	<0.001
Quality of working life	70.99 (15.91)	69.42 (12.53)	−1.54	0.057
	Coping strategies			
Active coping	5.42 (1.77)	6.07 (1.12)	+0.65	<0.001
Planning	5.42 (1.80)	5.49 (1.42)	+0.007	0.430
Positive reframing	5.55 (1.72)	5.28 (1.38)	−0.27	0.002
Acceptance	6.16 (1.52)	6.09 (1.09)	−0.07	0.292
Use of emotional support	4.68 (1.90)	4.78 (1.49)	+0.10	0.308
Use of instrumental support	4.33 (1.76)	5.55 (1.35)	+1.22	<0.001
Venting	4.24 (1.73)	4.56 (1.31)	+0.32	<0.001
Substance use	2.85 (1.51)	3.45 (2.01)	+0.60	<0.001
Behavioural disengagement	3.24 (1.56)	3.48 (1.52)	+0.24	0.011
Self-blame	4.23 (1.91)	3.62 (1.55)	−0.61	<0.001
Family-work segmentation	5.18 (0.94)	4.41 (0.99)	−0.77	<0.001
Work-family segmentation	4.65 (1.22)	4.68 (0.90)	+0.03	0.600
Working to improve skills/efficiency	4.06 (1.13)	3.66 (0.88)	−0.40	<0.001
Recreation and relaxation	3.40 (1.27)	3.02 (1.01)	−0.38	<0.001
Exercise	3.54 (1.39)	3.05 (1.16)	−0.49	<0.001
	Burnout			
Personal	62.51 (21.21)	59.14 (19.75)	−3.37	0.005
Work-related	58.56 (23.29)	55.42 (19.85)	−3.14	0.011
Client-related	26.38 (22.00)	45.85 (18.51)	+19.47	<0.001

The results showed that respondents' psychological wellbeing was significantly lower in Japan compared to the UK ($t = 3.77$, $p \leq 0.001$). However, work-related quality of life showed no significant difference between the countries ($t = 1.95$, $p = 0.052$). There was a significantly greater use of active coping ($t = 8.12$, $p < 0.001$), use of instrumental support ($t = 13.82$, $p < 0.001$), work-family segmentation ($t = 0.53$, $p < 0.001$), behavioral disengagement ($t = 2.55$, $p = 0.01$), venting ($t = 3.71$, $p < 0.001$) and substance use ($t = -5.48$, $p < 0.001$) among Japanese respondents compared to the UK cohort. However, in the UK there was a significantly greater use of self-blame ($t = 6.142$, $p < 0.001$), positive reframing

($t = 3.06, p = 0.002$), family work segmentation ($t = 13.51, p < 0.001$), working to improve skills and efficiency ($t = 7.05, p < 0.001$), recreation and relaxation ($t = -5.72, p < 0.001$) and exercise ($t = 6.75, p < 0.001$). In terms of burnout domains, UK respondents had significantly higher personal burnout ($t = 2.84, p = 0.005$) and work-related burnout ($t = 2.54, p = 0.01$). Client-related burnout was significantly higher amongst Japanese respondents ($t = 16.80, p < 0.001$).

3.3. Bivariate/Multivariate Analysis—Regression Analysis

A series of regression analysis was run to examine the relationships between wellbeing, coping strategies and burnout as well as the relationship between WRQoL, coping strategies and burnout. The models derived from the UK and Japanese datasets were then compared. Tables 3 and 4 shows the regression outputs. Comparison of the wellbeing fit of the model from the UK and Japanese data revealed a significant difference between countries in respect of the R^2 values, $Z = 2.45, p < 0.05$. Comparison of the WRQOL fit of the model from the UK and Japanese data revealed a significant difference between countries regarding the R^2 values, $Z = 2.35, p < 0.05$. Therefore, based on these results the predictors in each group (coping strategies) are similar across the countries regarding predicting wellbeing and work-related quality of life.

Table 3. Regression analysis examining coping strategies as predictors of wellbeing.

Predictor Variable	UK (N = 425)			Japan (N = 902)			Country Interaction (N = 1325)
	b	β	p-Value	b	β	p-Value	p-Value
Active coping	−0.004	−0.002	0.664	0.199	0.063	0.108	0.133
Planning	0.176	0.089	0.972	−0.072	−0.029	0.506	0.165
Positive reframing	0.057	0.027	0.096	0.360	0.137	<0.001	0.168
Acceptance	0.230	0.098	0.540	0.258	0.088	0.025	0.530
Use of emotional support	0.184	0.098	0.009	0.336	0.138	<0.001	0.202
Use of instrumental support	−0.123	−0.060	0.025	−0.046	−0.017	0.634	0.975
Venting	−0.074	−0.036	0.185	0.331	0.121	<0.001	<0.001
Substance use	0.170	0.071	0.332	0.049	0.028	0.330	0.203
Behavioural disengagement	−0.334	−0.146	<0.001	0.040	0.017	0.579	0.275
Self-blame	−0.339	−0.181	<0.001	−0.431	−0.190	<0.001	0.780
Family-work segmentation	−0.075	−0.020	0.585	0.083	0.023	0.501	<0.001
Work-family segmentation	0.166	0.057	0.145	0.231	0.058	0.098	0.524
Working to improve skills/ efficiency	0.059	0.019	0.606	0.656	0.160	<0.001	0.310
Recreation and relaxation	0.064	0.023	0.530	0.054	0.015	0.637	0.412
Exercise	0.034	0.013	0.697	0.068	0.022	0.487	<0.001
Personal burnout	−0.061	−0.365	<0.001	−0.023	−0.126	0.007	0.001
Work-related burnout	−0.010	−0.064	0.287	−0.039	−0.217	<0.001	0.021
Client-related burnout	−0.024	−0.0148	<0.001	−0.009	−0.050	0.156	0.262

Note. b = unstandardised estimate; β = standardised estimate. All analyses controlled for respondents' sex, age, ethnic background, country of work, occupational group, number of years of work experience, and disability status.

Table 4. Regression analysis examining coping strategies as predictors of WRQOL.

Predictor Variable	UK (N = 425)			Japan (N = 902)			Country Interaction (N = 1325)
	b	β	p-value	b	β	p-Value	p-Value
Active coping	−0.175	−0.020	0.699	−0.197	−0.018	0.641	0.980
Planning	−0.366	−0.042	0.430	0.744	0.085	0.044	0.021
Positive reframing	0.421	0.045	0.301	0.240	0.025	0.485	0.156
Acceptance	0.367	0.035	0.341	−0.253	−0.022	0.520	0.158
Use of emotional support	0.488	0.059	0.174	2.18	0.258	<0.001	<0.001
Use of instrumental support	−0.162	−0.018	0.689	0.071	0.008	0.830	0.468
Venting	−0.488	−0.053	0.146	0.488	0.051	0.093	0.009
Substance use	−0.206	−0.019	0.563	0.106	0.017	0.538	0.042
Behavioural disengagement	−1.09	−0.109	0.006	−0.957	−0.117	<0.001	0.411
Self-blame	−0.030	−0.004	0.931	−0.153	−0.020	0.535	0.759
Family-work segmentation	−1.09	−0.065	0.070	−0.671	−0.053	0.110	0.441
Work-family segmentation	0.117	0.009	0.814	−0.189	−0.014	0.692	0.610
Working to improve skills/ efficiency	0.929	0.066	0.066	1.64	0.115	<0.001	0.042
Recreation and relaxation	1.47	0.118	0.001	1.20	0.096	0.002	0.764
Exercise	−0.738	−0.065	0.053	−0.054	−0.005	0.871	0.674
Personal burnout	−0.101	−0.136	0.016	−0.085	−0.135	0.004	0.876
Work-related burnout	−0.234	−0.344	<0.001	−0.206	−0.331	<0.001	0.155
Client-related burnout	−0.109	−0.151	<0.001	−0.002	−0.003	0.928	0.006

Note. b = unstandardized estimate; β = standardized estimate. All analyses controlled for respondents' sex, age, ethnic background, country of work, occupational group, number of years of work experience, and disability status.

4. Discussion

This is the first study to the best of our knowledge to undertake an in-depth comparison of the wellbeing, work-related quality of life, burnout and coping across this specific workforce respondents in the UK and Japan. The objective of this paper was to compare cross-sectional data from the UK and Japan across different occupations of the health and social care workforce (nurses, social care workers and social workers) working with older adults. Our findings suggest that respondents' psychological wellbeing was significantly lower in Japan compared to the UK ($p \leq 0.001$). While it cannot be fully determined where these differences stem from, it is possible that these differences exist due to different social restrictions, lockdowns and pressures within the workplace within each country. However, they may also reflect long-standing differences in care of older adults and of staff providing such care in the two systems. These findings could be linked to greater pressures within specialist nursing homes within Japan. As of the time of the surveys some stricter COVID-19 regulations were in force in Japan particularly with regard to testing of nursing home staff [23]. These may have made the Japanese sample more anxious and could have led to this lower score in wellbeing.

Within this study, the average wellbeing scores in both the UK (20.15) and Japan (19.36) cohorts were below those previously reported population norms of wellbeing of 23.6 [36] suggesting the pandemic has had a major impact on the wellbeing of those working with older adults. An Australian study [37] examined self-help mindfulness programmes to improve wellbeing during the COVID-19 pandemic. The authors reported a general population mean of 20.16 which is similar to the findings of the UK cohort in this study, however this was a finding from a general population and was not exclusively social care

respondents. Li et al. [37] reported that those who used an online self-help mindfulness programme had higher wellbeing levels during the pandemic than those before. It must be noted that there are limited comparisons available for the health and social care workforce in the community/care home setting when using the Short Warwick Edinburgh Wellbeing Scale, therefore comparisons have been made with the population norm and the general health and social care workforce particularly within a UK sample.

Work-related quality of life showed no significant difference between the countries ($p < 0.05$). Regarding work-related quality of life scores, the findings of this study for the UK sample ($70.99/23 = 3.09$) and Japanese sample ($69.42/23 = 3.02$) are lower than the mean normative score of 3.44 ($78.09/23 = 3.40$) from a pre-pandemic UK National Health Service (NHS) workforce study [30]. During the pandemic, these professionals worked longer hours which has been associated with poorer home-work interface. Work-life imbalance can result in decreased job satisfaction and quality of working life [38]. However, cultural differences may account for the slight differences in work-related quality of life scores between the Japanese and UK samples within this study as Easton and Van Laar [30] suggested that in Japan greater value is placed on working hours rather than quality of work.

Long-term care facilities in Japan for the older adults recorded relatively fewer deaths than care homes within Europe possibly due to effective communication pathways between government authorities and the facilities, and substantial prevention and control protocols being put in place nationally [22]. However, the stricter protocols and regulations in Japan could lie behind the slight difference in scores from the UK sample in this study. In comparison to other literature on the health and social care workforce, Mendes and Pereira [39] reported a value of 3.40 in the general Portuguese working population, suggesting that health and social care workers supporting older adults may have lower WRQoL. These findings suggest that any differences may be attributed to variations in working practices, conditions and COVID regulations/practices within in each country as this could influence total WRQoL.

It has been suggested that many health and social care workers were facing burnout and used more negative coping strategies as the pandemic continued [12,40]. This study's findings showed Japanese respondents had significantly higher scores in behavioural disengagement and venting than the UK sample, however the UK sample made greater use of self-blame. The use of these avoidant type strategies could be associated with increased pressures on this workforce during the pandemic. Such stressors can influence coping strategies and increase burnout [5,12,41]. Therefore, as the pandemic continues and work pressures remain, employers and organisations need to promote positive coping strategies to reduce burnout and prevent further deterioration of work-related quality of life and wellbeing within the workforce.

4.1. Limitations

The results should be interpreted in the context of the study limitations. Ideally, it would have been beneficial to have identical sample sizes and profiles from the Japan and UK, however this was not possible due to the different procedures and service provision within each country, for example the surveys were conducted at two months apart, but it must be noted both countries were still dealing with COVID-19 restrictions. Therefore, it remains unclear whether any significant differences between the countries would remain if there had been similar sample sizes and the representativeness of the respondents may not be optimal. Another limitation arises from the different recruitment methods, however this was a response to practical research imperatives, such as many UK researchers working from home during the survey period and the closure of many offices. The study is cross-sectional which means no casual relationships can be determined between the variables under examination [42]. A strength of this approach is that multiple outcomes and exposures can be studied at one time point to generate a hypothesis [43]. Finally, the current findings in this study should be viewed as exploratory with further investigations

required to explore them in greater detail and to consider their implications for pandemic recovery and planning for future crises.

4.2. Practical Implications

In both countries there are implications for policy, practice and research. Although the long-term effects of the COVID-19 pandemic cannot be determined, the short-term effects of the pandemic are evident. The current study highlighted the importance of creating new organisational practices to help minimise the effect of the pandemic on this workforce and help the workforce develop and recover. The increased pressures on this workforce have made jobs more challenging therefore access to acceptable psychological services and support is imperative to prevent further staff burnout and possible future mental health problems. This research can inform employers and regulators, about interventions necessary to support and sustain this critical workforce, which can assist government in preparation for future crises.

5. Conclusions

The novelty of this study relates to exploring mental wellbeing and quality of working life in two culturally contrasting countries. The overall psychological wellbeing and work-related quality of life of social care workers in the UK and Japan during the COVID-19 pandemic are lower than the population norm. The findings of the study demonstrate the need for more support services and flexible working conditions within the social care workplace to reduce burnout while improving wellbeing and work-related quality of life.

Author Contributions: Conceptualization, R.D.N., J.W., M.O., J.M., P.G. and P.M.; formal analysis, R.D.N.; investigation, J.W., M.O., P.G., and P.M.; data curation, R.D.N., J.W., M.O., J.M., P.G. and P.M.; writing—original draft preparation, R.D.N.; writing—review and editing, R.D.N., J.W., M.O., J.M., P.G. and P.M.; visualization, R.D.N., J.W., M.O., J.M., P.G. and P.M.; project administration, J.W., M.O., P.G. and P.M. All authors have read and agreed to the published version of the manuscript.

Funding: This work was supported by Health and Social Care Research and Development Division of the Public Health Agency, Northern Ireland (COVID Rapid Response Funding Scheme COM/5603/20), the Northern Ireland Social Care Council (NISCC) and the Southern Health and Social Care Trust, with support from England's National Institute for Health and Care Research (NIHR) Policy Research Unit in Health and Social Care Workforce—PR-PRU-1217-21002. Funders had no involvement in study design, analysis and interpretation of results, writing or reviewing manuscript.

Institutional Review Board Statement: For the UK study, ethical approval was received a local university Institutional Review Board (Research Ethics Filter Committee of the School of Nursing at Ulster University (Ref No: 2020/5/3.1, 23 April 2020; Ulster University IRAS Ref No: 20/0073). Clicking on the arrow after these details and completion of the survey indicated participant consent. Participants were able to withdraw from the study at any time by not completing the survey. In Japan, ethical approval was obtained from the Ethics Committee of Tokyo Metropolitan University.

Informed Consent Statement: Informed consent was obtained from all participants involved in the study.

Data Availability Statement: No new data were created or analyzed in this study as data was collected as part of a wider study. Data sharing is not applicable to this article.

Acknowledgments: We are most grateful to all participants and to those who facilitated contact with them. For the UK study, the wider study team includes John Mallett, John Moriarty, Heike Schroder, Jermaine Ravalier, Denise Currie, Patricia Nicholl and Susan McGrory.

Conflicts of Interest: The authors declare no conflict of interest. The funders had no role in the design of the study; in the collection, analyses, or interpretation of data; in the writing of the manuscript, or in the decision to publish the results. The views expressed are those of the authors and not necessarily those of the funders, or the NIHR or Department of Health and Social Care.

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