International Journal of Mental Health and Addiction
https://doi.org/10.1007/s11469-023-01126-7

ORIGINAL ARTICLE

Typology of Mental Health Peer Support Work Components: Systematised Review and Expert Consultation

Yasuhiro Kotera[1,2] · Christopher Newby[3] · Ashleigh Charles[1] · Fiona Ng[1] · Emma Watson[4] · Larry Davidson[5] · Rebecca Nixdorf[6] · Simon Bradstreet[7] · Lisa Brophy[8] · Catherine Brasier[8] · Alan Simpson[9] · Steve Gillard[10] · Bernd Puschner[11] · Sean A. Kidd[12] · Candelaria Mahlke[6] · Alex J. Sutton[13] · Laura J. Gray[13] · Ellesha A. Smith[13] · Alison Ashmore[14] · Scott Pomberth[15] · Mike Slade[1,16]

Accepted: 31 July 2023

Abstract
The employment of mental health peer support (PS) is recommended in national and international mental health policy, and widely implemented across many countries. The key components of PS remain to be identified. This study aimed to develop a typology of components involved in one-to-one PS for adults in mental health services. A systematised review was performed to establish a preliminary long list of candidate components, followed by expert consultation ($n = 21$) to refine the list. Forty-two publications were full-text reviewed, comprising 26 trial reports, nine training manuals, and seven change model papers. Two hundred forty-two candidate components were identified, which were thematically synthesised to 16 components and eight sub-components, categorised into four themes: recruitment, preparation, practice, and PS worker wellbeing. Our typology can inform reflection and planning of PS practice, and allow more rigorous and synthesised studies, such as component network meta-analyses, to characterise the impact of each component and their interactions.

Keywords Typology · Peer support work · Systematised review · Mental health · Expert consultation · Components

What Is Mental Health Peer Support Work?

Mental health peer support (hereafter "PS") is relationship-based work between mental health service users and PS workers (PSWs) (Kotera et al., 2022). PSWs are people with lived experience of using mental health services and/or of mental health problems. The shared experience of mental health problems between a service user and a PSW is central in PS and promotes mutuality and connection (White et al., 2020). PS aims to support service users on the issues they consider important to their own lives and recovery (World Health Organization, 2021).

Extended author information available on the last page of the article

Since the 1990s, PS has been available in many countries (Davidson et al., 2012). In 2006 it was estimated that there were over 10,000 PSWs in the USA (Goldstrom et al., 2006). In England, PS is embedded in the national mental health implementation plan, which projects more employment of PSWs (National Health Service England 2019). PS is person centred and is in line with the current global emphasis on advocating human rights (World Health Organization, 2021). Moreover, PS is cost-effective and can be implemented in countries across different socioeconomic levels (Pearson et al., 2021). For example, the UPSIDES (using peer support in developing empowering mental health services) PS intervention has been evaluated in a range of high-, middle-, and low-income countries (Germany, UK, Israel, India, Uganda, and Tanzania) (Moran et al., 2020).

Evidence Base

PS has a considerable evidence base (Mutschler et al., 2021). A meta-analysis synthesised evidence from 19 randomised controlled trials (RCTs) of one-to-one PS and reported that PS was effective for recovery, empowerment, and working alliances (White et al., 2020). Another meta-analysis, focused on eight group-based PS RCTs, found evidence for effectiveness in relation to recovery and psychiatric symptoms (Lyons et al., 2021). For people with severe mental illness, a meta-analysis found little evidence on hospitalisation, overall symptoms, or satisfaction with services; however, some evidence on hope, recovery, and empowerment was found (Lloyd-Evans et al., 2014). A systematic review of digital PS, in which PS was offered live or automated using technology, also identified that digital PS is feasible, acceptable, and effective (Fortuna et al., 2020).

Qualitative evidence also demonstrates PS effectiveness. A meta-synthesis of 27 qualitative studies reported that service users view their PSW as a role model, which supports service users' hope and motivation for recovery (Walker & Bryant, 2013). Another meta-synthesis based on 34 studies found that PS enables service users to reframe their identity, facilitated by mutual relationships and story sharing by the PSW (MacLellan et al., 2015). A longitudinal study revealed that shared stories between a PSW and a service user help change fears into hope (Simmons et al., 2020).

Additionally, PS has been evaluated with diverse populations, including older adults, youth, LGBTQ+ people, persons with disabilities, and those in a forensic context (Borthwick et al., 2020; Shalaby & Agyapong, 2020; Williamson & Durcan, 2020). The adaptability of PS to many different groups is high (Charles et al., 2020).

Knowledge Gap

A few attempts have been made to identify mechanisms of how PS works (Evans, 2022; Watson, 2019). However, the active ingredients, hereafter "*components*" of PS are not clear. Components refer to "elements of an intervention that have the potential to causally influence outcomes" and are "directly related to an intervention theory of change" (Caldwell & Welton, 2020). Identifying components is important in understanding and improving a multi-component intervention (Petropoulou et al., 2021) such as PS. Specific knowledge gaps relate to what components are used in PS, the relative effectiveness of each component, and whether the overall impact of combining components is neutral (no

benefit from adding multiple components), additive (each component provides independent benefit), or synergistic (a multiplicative effect exceeding the benefit from individual components). To address these knowledge gaps, a systematic review and component network meta-analysis (CNMA) are planned (PROSPERO: author blind). The planned analysis requires a typology of PS components to allow all administered PS to be coherently described and categorised.

A typology is an explanation and classification of complex interventions based on qualitative and/or quantitative analysis (Smithman et al., 2020). The purpose of a typology is to classify a whole phenomenon into discrete yet interrelated categories (Ayres & Knaft, 2008). For example, the Consolidated Framework for Implementation Research (CFIR) (Damschroder et al., 2009) is a typology and is the most used framework in implementation science (Damschroder et al., 2022). CFIR helps manage a complex process of implementation by identifying key areas that can impact the implementation success (Keith et al., 2017). PS is a complex, multi-component intervention, which can benefit from development of typologies.

Study Aim

The aim of this study was to develop a typology of components for one-to-one PS in adult mental health services and to thematically categorise them. Our findings will help improve the coherence and compatibility of future evaluation and implementation work in PS, and allow the conduct of a coherent and clinically relevant component meta-analyses.

Methods

Design

Systematised review and expert consultation, using an established six-step framework: (1) identify the research questions; (2) identify relevant studies; (3) study selection; (4) chart the data; (5) collate, summarise, and report the results; and (6) expert consultation (Arksey & O'Malley, 2005).

Procedures

A systematised review was conducted to create an initial list of components of one-to-one PS for adults in mental health services, comprising components and sub-components. A systematised review involves part of the process of a systematic review; however, it does not meet the rigour of a systematic review (Grant & Booth, 2009; Sataloff et al., 2021). We have made a decision to conduct a systematised review, because we were interested in what components were commonly present in PS research. We judged no additional components would be identified by conducting a full systematic review. We only included RCTs because (a) RCTs report rigorous evidence for the effectiveness (Hariton & Locascio, 2018), which would help identify components, and (b) there were enough RCTs of one-to-one adult service user PS (White et al., 2020). Three types of publication were used to create the PS initial component list.

Type 1: Trial Reports

To identify relevant RCTs, first, included publications in a recent systematic review of one-to-one PS for adults were full-text reviewed by YK (White et al., 2020). To find additional RCTs, Medline and PsycINFO searches were conducted in August 2022 by YK after a consultation with a subject librarian for health sciences (AA). The search strategy was developed focusing on the key elements: RCTs, peer support work, mental health, one to one (Electronic Supplementary Material 1). Titles and abstracts for the retrieved articles were screened by YK, after 10% screened independently by AC and concordance established. Full-text reviews were then performed by YK, and the included articles were compared with the eligibility criteria by YK and AC.

Type 2: PS Training Manuals

Published training manuals (including those formally published and those available online) were identified through online searching of PS websites.

Type 3: Published Change Models

Published change models in PS were identified through backward citation tracking of included publications to identify studies characterising the mechanism of PS.

Once a preliminary set of included documents from all three types of publications were collated, an expert consultation was conducted to maximise the sensitivity of the review. Experts were selected to comprise a wide-ranging and international group, including people with lived experience. The expert group comprised practitioners and researchers with backgrounds in PS, psychiatry, nursing, psychotherapy, and clinical psychology from Australia, Canada, England, Germany, Japan, Scotland, and the USA. Their expertise spanned PS trials, intervention development, and working as PSWs. In January 2023, experts ($n = 21$) were sent an initial list of publications and asked to identify further publications to be considered for inclusion.

Once the included document list was finalised, the data abstraction table (DAT) was completed for all included publications. Data extracted comprised authors, year, type of publication (e.g. trial report), country, service setting (e.g. community or inpatient), population, and candidate PS components (name and description).

The identified candidate PS components were analysed by the core analyst team (YK, AC, CN, FN, MS), using tabulation to de-duplicate, integrate, and thematically group the list, in order to create a preliminary typology comprising an un-ordered list of components and sub-components. All the components were reviewed and were grouped into initial themes that presented common ideas. Each initial theme was defined, then was refined for coherence and distinctiveness (e.g. the wording of each theme, the place in the typology, the definition of each theme) (Kotera et al., 2021). The preliminary typology was then refined through consultation with 21 experts from seven countries, chosen for their expertise in PS practice and research. In March to April 2023, the experts were asked to review the DAT and offer comments on the structure, coherence, and language,

and to identify any important missing components or sub-components. The typology content and structure were refined based on this expert consultation.

Results

Overall, 42 publications were included, comprising 26 trial reports, nine training manuals, and seven change model papers.

Trial Reports

First, nineteen articles in White's systematic review (White et al., 2020) were all included, and 532 articles were retrieved through database searching (Medline 222; PsycInfo 310). One hundred and one articles were removed as duplicate. The remaining 431 articles were title/abstract screened, which identified 47 articles to be full-text reviewed. Six articles were identified as includable trial reports. Main reasons for the excluded 41 articles were (a) not being an RCT, (b) not PS, (c) participants not being in a mental health service, (d) not one to one, (e) not measuring a mental health outcome, and (f) reporting from the same trial already listed. Through expert consultation, one more article was added.

PS Training Manuals

Fourteen documents were initially identified from online searches. Eight articles were removed as they were not training manuals. Experts identified three additional training manuals. In total, nine training manuals were included.

Published Change Models

Four change model papers were initially identified. Three papers were added through expert consultation.

All included publications are numbered and listed in the Electronic Supplementary Material 2.

Typology

The DAT was created to characterise the 42 included publications and to record the 242 long list of candidate components identified from included publications (Electronic Supplementary Material 3).

The core analyst team thematically categorised the identified candidate components and created an initial typology. The initial typology comprised 16 components and 11 sub-components, which were categorised into four themes: recruitment, preparation, practice, and PSW wellbeing. After expert consultation, three sub-components ("activity log", "workbook", and "fidelity check") were removed, one component was transferred to another theme ("service user match" moved from preparation to practice), and one component changed its name ("recording" to "record-keeping"). No change was made to the four

Table 1 Typology of one-to-one mental health peer support work components

Theme	Definition	Example text (Publication ID)
1. Recruitment		
1.1 Mental health lived experience	PSWs have mental health lived experience, meaning information and perspectives that people obtain from living through the experience of mental health problems/services.	*Peer mentors were individuals with lived experience of an eating disorder, and social support mentors did not have lived experience of an eating disorder. (#05)*
1.2 Experience of mental health recovery	PSWs have experiences of recovering from mental health problems.	*All of this support was accomplished within a context of peer support that included the [PSW] sharing their lived experience with mental illness and strategies for living successfully in the community. (#13)*
2. Preparation		
2.1 PSW training	PSWs are trained to offer PS before, and sometimes during the PS, by different workers including other PSWs, psychologists, psychiatrists, and research assistants. The contents include matters related to knowledge of mental health, PSW role, ethics, and PSW wellbeing.	*Most studies referred to peers as being engaged in some form of peer-specific training prior to their role, but a smaller proportion of these recruited peers who had completed certified peer training. (#37)*
2.1.1 Knowledge of mental health	Introducing prospective PSWs to different frames of understanding of mental health, including nonmedical models of understanding mental distress.	*Both had completed DBSA [Depression and Bipolar Support Alliance] peer specialist training and certification and had at least four years' experience working as peer specialists in outpatient mental health settings. (#17)*
2.1.2 Knowledge of PSW role	A PSW understands their role. PS is relationship-based work between mental health service users and PSWs. The role is characterised by the use of lived experience of mental health problems, including the experience of caring for someone with mental health problems, and seeing this as a form of expertise.	*The training programme lasted about 8 weeks in total and comprised eight, 6-h training sessions, plus employment support, hospital visits, and structured feedback. Training covers guidance and practice for peer workers in using their own experience-based knowledge and use of a range of structured tools and exercises focused on building individual strengths and engaging with activities in the community (eg, personal asset mapping, goal setting, and discharge, recovery, and crisis planning). (#01)*

Table 1 (continued)

Theme	Definition	Example text (Publication ID)
2.1.3 Knowledge of ethics	Teaching about PSW values, beliefs, and actions, which support self-reflection, and enhance an understanding about mental health practice and accountability including work around boundaries, levels of disclosure, and confidentiality.	*Teaching about PSW values, beliefs, and actions, supporting self-reflection and an understanding about mental health practice and accountability including the importance of boundaries, levels of disclosure, and confidentiality. (#36)*
2.1.4 Knowledge of own wellbeing	PSWs take care of their own wellbeing. This includes supporting self-reflection and offering strategies for PSWs to promote wellness, recovery, and resilience	*Candidates should also gain a sound understanding of the need for self care and alongside this the importance of safe practice. They should know and understand the role and function of supervision in supporting this. (#33)*
2.2 Staff training	Staff who are not a PSW prepare for supporting PS in acquiring knowledge and skills through preparatory work/training. The topics include recovery orientation, the role and tasks of PSWs, and how to make appropriate referrals (what to consider when referring a service user to a PSW). Staff training can be facilitated by a research assistant or experienced PSW.	*Ward and community teams—including managers—should receive a team preparation session co-delivered by peers working locally. (#39)*
2.2.1 Staff knowledge of PSW role	Staff understands the PSW role, described in 2.1.2.	*For mental health staff, two research assistants and one peer worker from the given hospital facilitated two-hour workshops before the implementation of peer support, providing information on recovery orientation and the role and tasks of peer supporters. (#09)*
2.2.2 Referrals	Staff learns how to make appropriate referrals: what to consider when referring a service user to a PSW.	*… making a good referral, really about working with community agencies and programs on behalf of other individual consumers or your programs. (#34)*
3. Practice		
3.1 Service user match	Purposefully matching some elements of a service user with the PSW including age, gender, life experience such as job loss, divorce, or a similar health and/or mental health problem, type and severity of substance abuse, social interests, and personality traits (e.g. passive vs active). Matching can be carried out by a PS coordinator or other staff.	*Peer workers were matched to the patient by gender when specifically requested by the patient or felt to be appropriate by the clinical team." (#01)*

Table 1 (continued)

Theme	Definition	Example text (Publication ID)
3.2 Relationship building	Using shared experience, a PSW builds a relationship based on mutuality and connection with a service user.	*Establishing positive peer relationships: We all know what it is like to be in different types of relationships. Some relationships are positive and some are less helpful. As a peer supporter, who is trying to support recovery, the ability to develop positive relationships is crucial. As we learned in session four positive peer relationships are based on mutuality and empowerment. (#31)*
3.3 Sharing lived experience	PSWs explore methods and strategies for using lived experience with service users, including the safe, purposeful, and appropriate use of one's story to benefit others.	*The goal was for the peers to share their own prior experiences with each topic and learn new perspectives or approaches from each other and from the study materials. (#06)*
3.4 Cultural adaptation	Modifying PS to be compatible with the cultural needs, values, background, and context of people using services.	*Another difference from CommonGround was that SHARE has self-rated items for problems with community life (e.g., home, job, or interpersonal relationships), which fit the Japanese context. (#11)*
3.5 Goal setting	PSWs work with service users to identify and meet service user personal goals and/or shared goals for the PS relationship.	*Goals Defined: A descriptive statement of a desired end. Effective goals are stated in terms of accomplishments not processes. Book by David Campbell "If you don't know where you are going, you'll end up someplace else". Can be discrete or continuous, long-term, short-term. Use phrases such as "X will be Y". (#34)*
3.6 Practical support	Tangible, practical assistance for service users (e.g. support in housing, disability benefits, obtaining medications, groceries, and other activities of daily living).	*The practical support described by studies ranged from help accessing suitable benefits, attending appointments and managing medication, to support with shopping or laundry. (#37)*
3.7 Social support	Help service users to participate in social activities and/or socialise with others (e.g. going out for coffee/meals, game nights at local recreational centres, hikes, or movies).	*The PSW also forms a plan with the client about tours of their neighbourhood to familiarize them with the local resources (e.g., low-cost entertainment venues; libraries; parks; inclusive spaces) and support them as needed in building confidence in accessing their local communities. (#03)*

Table 1 (continued)

Theme	Definition	Example text (Publication ID)
3.8 Emotional support	Help service users emotionally including assisting them stay hopeful and motivated, supporting their self-esteem, giving encouragement, or just being present for them.	*Peer supporters were supposed to model and share their successful coping skills, provide emotional support, and encourage self-monitoring and a continued connection to Kaiser Permanente depression care. (#23)*
3.9 Record keeping	Writing down aspects of PS provided online or on paper.	*All meetings and activities delivered were documented by the peer providers in a short protocol for each meeting. (#09)*
4. PSW wellbeing		
4.1 PSW supervision	Professional and collaborative activity between a supervisor and a PSW, where the supervisor gives guidance to the PSW to ensure competent and ethical delivery of services, and supports PSWs through the continuing development of the PSW's application of PS knowledge, skills, and values. Supervision is often done by an experienced PSW but can be done a non-peer supervisor (e.g. patient and public involvement lead, licenced counsellor, study supervisor, the director of the PS organisation).	*Regular group supervision for Peer Worker team from Peer Worker Coordinator. (#39)*
4.1.1 PSW supervision from peer	Supervision offered by another, more experienced PSW	*Group supervision was provided by clinicians from employing NHS trusts, typically once every 2 weeks, with additional support from the study team, including from an experienced peer support worker. (#08)*
4.1.2 PSW supervision from non-peer	Supervision offered by someone who is not a PSW.	*Group supervision was provided by clinicians from employing NHS trusts, typically once every 2 weeks, with additional support from the study team, including from an experienced peer support worker. (#08)*
4.2 PSW meetings	A PSW meets other PSWs to understand work specific challenges, to identify strategies to develop and enhance relationships with service users, to exchange information about useful resources, to discuss concerns, and to share successes and failures in a supportive atmosphere.	*Peers also contributed to treatment planning and provided valuable information about participants during weekly team meetings. (#19)*

Table 1 (continued)

Theme	Definition	Example text (Publication ID)
4.3 Self-care	A PSW's ability to promote and maintain good health through engagement in practices that increase or ensure health and managing illness. For example, they are asked to identify the people they would need to talk to in order to ensure that they receive the right support. Proactive self-management is essential.	*It is important that peer supporters also consider some of the implications of sharing their experiences and what they can do to look after themselves and keep safe. (#31)*

Publication IDs refer to the Electronic Supplementary Material 2: Table for included publication references. Sixteen components are bold and italicised

themes. The final typology comprised four themes, containing a total of 16 components and eight sub-components. Table 1 presents the final typology with definitions and example texts for each component and sub-component.

Discussion

This systematised review and expert consultation developed a typology of one-to-one PS components through reviewing trial reports, training manuals, and change model papers. A long list of 242 candidate components were identified from 42 publications, which were then integrated into 16 components and eight sub-components, organised into four themes.

The novelty of this review was developing a typology of PS components, validated through expert consultation. To date, there is no standardised approach for assessing which part of PS has impacted service user mental health, and to what degree. This reduces the opportunity to compare findings across different PS studies. Being unable to compare the findings across studies is concerning, because PS is actively used in different contexts and regions of the world (Borthwick et al., 2020; Pearson et al., 2021). This typology allows assessment and comparison, which can help support and advance PS in both practice and research.

In practice, this typology can help reflection and planning. PSWs can use the typology to reflect on their experiences, which inform adjustments in their practice. The importance of self-reflection is increasingly recognised among people who offer care for others (Kotera et al., 2022). Each PSW can reflect on their experiences in each component. This can facilitate more focused self-reflection, peer discussion, and supervision. Peer discussion and supervision are often used in PS and are an essential part of successful PS (O'Connell et al., 2018; Rogers et al., 2016).

This typology can be used to plan PS clinically and financially. Clinically, the typology can inform session plans. For example, service user information may not be available in some contexts, which can hinder the service user match (component 3.1). To compensate this hindrance, PSWs can plan to focus on other components such as the relationship building (component 3.2) to maintain the impact on their service users. This is especially helpful to PSWs. Financially, the typology can help PS workforce planning. Service managers can identify the key infrastructure elements that need to be considered in developing a PSW workforce such as recruitment processes, training, and supervision arrangements. The typology can help assess what needs to be costed in order to implement PS.

In research, this typology allows more rigorous and synthesised analyses of PS including CNMA. CNMA evaluates the impact of each component in a complex intervention, answering questions such as "Which components work (or do not work)?" (Sofia et al., 2022). CNMA also assesses the intervention without some components by disengaging them from a model (Sofia et al., 2022). Such rigorous and synthesised analyses can advance PS research because inconsistent reporting is one major problem of PS research (Richard et al., 2022). The results can inform the most effective components or combination of components. This may be useful to many PS organisations, especially to those that are under-resourced as they are informed of which components to focus their limited resource on. The findings can also help identify specific needs for training and supervision.

The typology also can reduce a gap between practice and research in PS. Poorly labelled and/or described interventions are a barrier for implementation, because readers, who may be healthcare workers, service users, and others, cannot be certain of what they mean and

what to do (Hoffmann et al., 2014). The importance of comprehensive labels and descriptions is an important yet under-researched area in implementation science (Hoffmann & Walker, 2015). Our typology offers comprehensive language to PS, facilitating its implementation. This can bridge PS practice and PS research.

Further evaluation is needed when using the typology in different contexts. The typology is based on RCTs of one-to-one PS for adult mental health service users. PS is used in many different contexts (e.g. forensic contexts), targeting people with other characteristics (e.g. elderly, youth, LGBTQ+, disabilities) (Borthwick et al., 2020; Shalaby & Agyapong, 2020; Williamson & Durcan, 2020). The utility of our typology in these applications remains to be known. This highlights a need for more rigorous syntheses to identify effective components and harmful components, to inform approaches for better applications into other contexts and populations.

Strengths and Limitations

The strengths of this review include the expert consultation and the use of three different sources of information. Twenty-one PS experts from seven countries were involved to ensure our findings retain a comprehensive, balanced perspective reflecting different cultural imperatives. This strength was further enhanced by referring to three different information sources, spanning the various contexts in which change models can be reported. Several limitations should be noted. First, the searches were conducted in the English language only. Second, many of the experts were from a western and high-income country. Third, as this was a systematised review, some relevant documents might not have been included. This includes resources from other established organisations that offer PS such as the Substance Abuse and Mental Health Services Administration and the National Alliance on Mental Illness. However, we judged additional papers to our detailed analyses, involving expert consultation and identification of candidate components, would not change the output. Fourth, the details of some components still need to be assessed. This includes what to match in the service user match (e.g. age, gender, and life experiences), and differences between supervision by a peer and by a non-peer, as non-peer supervision is also found helpful to PSWs (Forbes et al., 2022). Despite these limitations, our systematised review and expert consultation are the first rigorous, comprehensive work, offering helpful and timely insights into components of one-to-one PS.

Conclusion

This systematised review and expert consultation identified 16 components and eight subcomponents in one-to-one PS. The typology can help improve the practice and research of PS by enabling practitioners to facilitate their reflection and planning, and researchers to conduct more synthesised analyses of PS. The typology can also reduce the practice-research gap by offering a comprehensive and coherent language. Studies such as CNMA need to be conducted to further understand how the various active elements of PS interact to contribute to beneficial outcome.

Supplementary Information The online version contains supplementary material available at https://doi.org/10.1007/s11469-023-01126-7.

Acknowledgements MS acknowledges the support of the NIHR Nottingham Biomedical Research Centre. AJS/LJG/EAS are supported by the NIHR Applied Research Collaboration East Midlands (ARC EM). The views expressed are those of the authors and not necessarily those of the NIHR or the Department of Health and Social Care.

Availability of Data and Materials Not applicable.

Code Availability Not applicable.

Author Contribution Conceptualization: Yasuhiro Kotera and Mike Slade; methodology: Yasuhiro Kotera, Christopher Newby, Ashleigh Charles, Alison Ashmore, and Mike Slade; validation: all authors; formal analysis: Yasuhiro Kotera, Christopher Newby, Ashleigh Charles, Fiona Ng, and Mike Slade; investigation: all authors; writing—original draft preparation: Yasuhiro Kotera and Mike Slade; writing—review and editing: all authors; visualization: Yasuhiro Kotera and Ashleigh Charles; supervision: Mike Slade; project administration: Yasuhiro Kotera.

Declarations

Ethics Approval Not required for this work.

Consent to Participate Not applicable.

Consent for Publication Not applicable.

Conflict of Interest The authors declare no competing interests.

References

Arksey, H., & O'Malley, L. (2005). Scoping studies: Towards a methodological framework. *International Journal of Social Research Methodology, 8*(1), 19–32. https://doi.org/10.1080/1364557032000119616

Ayres, L., & Knaft, K. (2008). Typological analysis. In L. Given (Ed.), *The SAGE encyclopedia of qualitative research methods* (Vol. 1 & 2, pp. 900–901). SAGE.

Borthwick, J., Jaffey, L., & Snell, J. (2020). *Exploration of peer support models to support LGBTQ+ people with their mental health*. Centre for Mental Health https://www.centreformentalhealth.org.uk/sites/default/files/publication/download/CentreforMentalHealth_PeerSupport_LGBTQ.pdf

Caldwell, D., & Welton, N. (2020). *Identifying effective components of complex interventions: Component network meta-analysis (I)*. Cochrane Training Retrieved 15 August 2022 from https://www.youtube.com/watch?v=SNAU_t-dfeY

Charles, A., Thompson, D., Nixdorf, R., Ryan, G., Donat, S., Kalha, J., Moran, G., Hiltensperger, R., Mahlke, C., Puschner, B., Repper, J., Slade, M., & Mpango, R. (2020). Typology of modifications to peer support work for adults with mental health problems: Systematic review. *The British Journal of Psychiatry, 216*(6), 301–307. https://doi.org/10.1192/bjp.2019.264

Damschroder, L. J., Aron, D. C., Keith, R. E., Kirsh, S. R., Alexander, J. A., & Lowery, J. C. (2009). Fostering implementation of health services research findings into practice: A consolidated framework for advancing implementation science. *Implementation Science, 4*(1), 50. https://doi.org/10.1186/1748-5908-4-50

Damschroder, L. J., Reardon, C. M., Widerquist, M. A. O., & Lowery, J. (2022). The updated consolidated framework for implementation research based on user feedback. *Implementation Science, 17*(1), 75. https://doi.org/10.1186/s13012-022-01245-0

Davidson, L., Amy, C. B., Guy, K., & Er, R. A. M. (2012). Peer support among persons with severe mental illnesses: A review of evidence and experience. *World Psychiatry, 11*(2), 123–128. https://doi.org/10.1016/j.wpsyc.2012.05.009

Evans, M. S. (2022). *Peer-delivered services and support reaching people with schizophrenia: Considerations for research and practice*. University of North Carolina at Chapel Hill Graduate School.

Forbes, J., Pratt, C., & Cronise, R. (2022). Experiences of peer support specialists supervised by nonpeer supervisors. *Psychiatric Rehabilitation Journal, 45*(1), 54–60. https://doi.org/10.1037/prj0000475

Fortuna, K. L., Naslund, J. A., Lacroix, J. M., Bianco, C. L., Brooks, J. M., Zisman-Ilani, Y., Muralidharan, A., & Deegan, P. (2020). Digital peer support mental health interventions for people with a lived experience of a serious mental illness: Systematic review. *JMIR Mental Health, 7*(4), e16460. https://doi.org/10.2196/16460

Goldstrom, I. D., Campbell, J., Rogers, J. A., Lambert, D. B., Blacklow, B., Henderson, M. J., & Manderscheid, R. W. (2006). National estimates for mental health mutual support groups, self-help organizations, and consumer-operated services. *Administration and Policy in Mental Health, 33*(1), 92–103. https://doi.org/10.1007/s10488-005-0019-x

Grant, M. J., & Booth, A. (2009). A typology of reviews: An analysis of 14 review types and associated methodologies. *Health Information & Libraries Journal, 26*(2), 91–108. https://doi.org/10.1111/j.1471-1842.2009.00848.x

Hariton, E., & Locascio, J. J. (2018). Randomised controlled trials - the gold standard for effectiveness research: Study design: Randomised controlled trials. *Bjog, 125*(13), 1716. https://doi.org/10.1111/1471-0528.15199

Hoffmann, T. C., Glasziou, P. P., Boutron, I., Milne, R., Perera, R., Moher, D., Altman, D. G., Barbour, V., Macdonald, H., Johnston, M., Lamb, S. E., Dixon-Woods, M., McCulloch, P., Wyatt, J. C., Chan, A.-W., & Michie, S. (2014). Better reporting of interventions: Template for intervention description and replication (TIDieR) checklist and guide. *BMJ: British Medical Journal, 348*, g1687. https://doi.org/10.1136/bmj.g1687

Hoffmann, T. C., & Walker, M. F. (2015). TIDieR-ing up' the reporting of interventions in stroke research: The importance of knowing what is in the 'black box. *International Journal of Stroke, 10*(5), 657–658. https://doi.org/10.1111/ijs.12524

Keith, R. E., Crosson, J. C., O'Malley, A. S., Cromp, D., & Taylor, E. F. (2017). Using the Consolidated Framework for Implementation Research (CFIR) to produce actionable findings: a rapid-cycle evaluation approach to improving implementation. *Implementation Science, 12*(1), 15. https://doi.org/10.1186/s13012-017-0550-7

Kotera, Y., Chircop, J., Hutchinson, L., Rhodes, C., Green, P., Jones, R.-M., Kaluzeviciute, G., & Garip, G. (2021). Loneliness in online students with disabilities: Qualitative investigation for experience, understanding and solutions. *International Journal of Educational Technology in Higher Education, 18*(1), 64. https://doi.org/10.1186/s41239-021-00301-x

Kotera, Y., Llewellyn-Beardsley, J., Charles, A., & Slade, M. (2022). Common humanity as an underacknowledged mechanism for mental health peer support. *International Journal of Mental Health and Addiction*. https://doi.org/10.1007/s11469-022-00916-9

Kotera, Y., Ozaki, A., Miyatake, H., Tsunetoshi, C., Nishikawa, Y., Kosaka, M., & Tanimoto, T. (2022). Qualitative investigation into the mental health of healthcare workers in Japan during the COVID-19 pandemic. *International Journal of Environmental Research and Public Health, 19*(1), 568. https://doi.org/10.3390/ijerph19010568

Lloyd-Evans, B., Mayo-Wilson, E., Harrison, B., Istead, H., Brown, E., Pilling, S., Johnson, S., & Kendall, T. (2014). A systematic review and meta-analysis of randomised controlled trials of peer support for people with severe mental illness. *BMC Psychiatry, 14*, 1 https://ovidsp.ovid.com/ovidweb.cgi?T=JS&CSC=Y&NEWS=N&PAGE=fulltext&D=psyc11&AN=2014-13572-001, https://nusearch.nottingham.ac.uk/openurl/44NOTUK/44NOTUK?genre=article&atitle=A+systematic+review+and+meta-analysis+of+randomised+controlled+trials+of+peer+support+for+people+with+severe+mental+illness.&title=BMC+Psychiatry&issn=1471-244X&date=2014&volume=14&issue=1&spage=39&aulast=Lloyd-Evans%2C+Brynmor&isbn=&__char_set=utf8

Lyons, N., Cooper, C., & Lloyd-Evans, B. (2021). A systematic review and meta-analysis of group peer support interventions for people experiencing mental health conditions. *BMC Psychiatry, 21*, 315. https://doi.org/10.1186/s12888-021-03321-z

MacLellan, J., Surey, J., Abubakar, I., & Stagg, H. R. (2015). Peer support workers in health: A qualitative metasynthesis of their experiences. *PLOS ONE, 10*(10), e0141122. https://doi.org/10.1371/journal.pone.0141122

Moran, G. S., Kalha, J., Mueller-Stierlin, A. S., Kilian, R., Krumm, S., Slade, M., Charles, A., Mahlke, C., Nixdorf, R., Basangwa, D., Nakku, J., Mpango, R., Ryan, G., Shamba, D., Ramesh, M., Ngakongwa, F., Grayzman, A., Pathare, S., Mayer, B., & Puschner, B. (2020). Peer support for people with severe mental illness versus usual care in high-, middle- and low-income countries: Study protocol for a pragmatic, multicentre, randomised controlled trial (UPSIDES-RCT). *Trials, 21*(1), 371. https://doi.org/10.1186/s13063-020-4177-7

Mutschler, C., Bellamy, C., Davidson, L., Lichtenstein, S., & Kidd, S. (2021). Implementation of peer support in mental health services: A systematic review of the literature. *Psychological Services, 19*(2), 360–374. https://doi.org/10.1037/ser0000531

O'Connell, M. J., Sledge, W. H., Staeheli, M., Sells, D., Costa, M., Davidson, L., & Wieland, M. (2018). Outcomes of a peer mentor intervention for persons with recurrent psychiatric hospitalization. *Psychiatric Services, 69*(7), 760–767. https://doi.org/10.1176/appi.ps.201600478

Pearson, H., Adams, B., Eaton, J., & Illingworth, M. (2021). *Community mental health good practice guide: Peer support*. CBM Global Disability Inclusion.

Petropoulou, M., Efthimiou, O., Rücker, G., Schwarzer, G., Furukawa, T. A., Pompoli, A., Koek, H. L., Del Giovane, C., Rodondi, N., & Mavridis, D. (2021). A review of methods for addressing components of interventions in meta-analysis. *PLOS ONE, 16*(2), e0246631. https://doi.org/10.1371/journal.pone.0246631

Richard, J., Rebinsky, R., Suresh, R., Kubic, S., Carter, A., Cunningham, J. E. A., Ker, A., Williams, K., & Sorin, M. (2022). Scoping review to evaluate the effects of peer support on the mental health of young adults. *BMJ Open, 12*(8), e061336. https://doi.org/10.1136/bmjopen-2022-061336

Rogers, S., Maru, M., Johnson, G., Cohee, J., Hinkel, J., & Hashemi, L. (2016). A randomized trial of individual peer support for adults with psychiatric disabilities undergoing civil commitment. *Psychiatric Rehabilitation Journal, 39*(3), 248–255. https://doi.org/10.1037/prj0000208

Sataloff, R. T., Bush, M. L., Chandra, R., Chepeha, D., Rotenberg, B., Fisher, E. W., Goldenberg, D., Hanna, E. Y., Kerschner, J. E., Kraus, D. H., Krouse, J. H., Li, D., Link, M., Lustig, L. R., Selesnick, S. H., Sindwani, R., Smith, R. J., Tysome, J. R., Weber, P. C., & Welling, D. B. (2021). Systematic and other reviews: Criteria and complexities. *World Journal of Otorhinolaryngology Head & Neck Surgery, 7*(3), 236–239. https://doi.org/10.1016/j.wjorl.2021.04.007

Shalaby, R. A. H., & Agyapong, V. I. O. (2020). Peer support in mental health: literature review. *JMIR Mental Health, 7*(6), e15572. https://doi.org/10.2196/15572

Simmons, M. B., Dawson, G., Fava, N. J., Coates, D., Dimopoulos-Bick, T., Batchelor, S., Howe, D., & Montague, A. E. (2020). The experiences of youth mental health peer workers over time: A qualitative study with longitudinal analysis. *Community Mental Health Journal, 56*(5), 906–914. https://doi.org/10.1007/s10597-020-00554-2

Smithman, M. A., Descôteaux, S., Dionne, É., Richard, L., Breton, M., Khanassov, V., Haggerty, J. L., & On behalf of the IMPACT research team. (2020). Typology of organizational innovation components: Building blocks to improve access to primary healthcare for vulnerable populations. *International Journal for Equity in Health, 19*(1), 174. https://doi.org/10.1186/s12939-020-01263-8

Sofia, T., Georgios, S., & Dimitris, M. (2022). Component network meta-analysis in a nutshell. *BMJ Evidence-Based Medicine, 28*(3), 183–186. https://doi.org/10.1136/bmjebm-2021-111906

Walker, G., & Bryant, W. (2013). Peer support in adult mental health services: A metasynthesis of qualitative findings. *Psychiatric Rehabilitation Journal, 36*(1), 28–34. https://doi.org/10.1037/h0094744

Watson, E. (2019). The mechanisms underpinning peer support: A literature review. *Journal of Mental Health, 28*(6), 677–688. https://doi.org/10.1080/09638237.2017.1417559

White, S., Foster, R., Marks, J., Morshead, R., Goldsmith, L., Barlow, S., Sin, J., & Gillard, S. (2020). The effectiveness of one-to-one peer support in mental health services: A systematic review and meta-analysis. *BMC Psychiatry, 20*(534), 1–20. https://doi.org/10.1186/s12888-020-02923-3

Williamson, T., & Durcan, G. (2020). *Peer support and peer support workers in older people's mental health*. Centre for Mental Health https://www.centreformentalhealth.org.uk/sites/default/files/publication/download/CentreforMentalHealth_PeerSupport_OlderPeople.pdf

World Health Organization. (2021). *Guidance on community mental health services: Promoting person-centred and rights-based approaches*. World Health Organization https://apps.who.int/iris/handle/10665/341648

Authors and Affiliations

Yasuhiro Kotera[1,2] · Christopher Newby[3] · Ashleigh Charles[1] · Fiona Ng[1] · Emma Watson[4] · Larry Davidson[5] · Rebecca Nixdorf[6] · Simon Bradstreet[7] · Lisa Brophy[8] · Catherine Brasier[8] · Alan Simpson[9] · Steve Gillard[10] · Bernd Puschner[11] · Sean A. Kidd[12] · Candelaria Mahlke[6] · Alex J. Sutton[13] · Laura J. Gray[13] · Ellesha A. Smith[13] · Alison Ashmore[14] · Scott Pomberth[15] · Mike Slade[1,16]

✉ Yasuhiro Kotera
Yasuhiro.Kotera@nottingham.ac.uk

Christopher Newby
Christopher.Newby@nottingham.ac.uk

Ashleigh Charles
Ashleigh.Charles@nottingham.ac.uk

Fiona Ng
Fiona.Ng@nottingham.ac.uk

Emma Watson
emma.watson@nottshc.nhs.uk

Larry Davidson
larry.davidson@yale.edu

Rebecca Nixdorf
r.nixdorf@uke.de

Simon Bradstreet
Simon.Bradstreet@glasgow.ac.uk

Lisa Brophy
L.Brophy@latrobe.edu.au

Catherine Brasier
Catherine.Brasier@latrobe.edu.au

Alan Simpson
alan.simpson@kcl.ac.uk

Steve Gillard
steven.gillard@city.ac.uk

Bernd Puschner
bernd.puschner@bkh-guenzburg.de

Sean A. Kidd
sean_kidd@camh.net

Candelaria Mahlke
c.mahlke@uke.de

Alex J. Sutton
ajs22@leicester.ac.uk

Laura J. Gray
lg48@leicester.ac.uk

Ellesha A. Smith
eas24@leicester.ac.uk

Alison Ashmore
alison.ashmore@nottingham.ac.uk

Scott Pomberth
scott.pomberth@nottshc.nhs.uk

Mike Slade
m.slade@nottingham.ac.uk

[1] School of Health Sciences, University of Nottingham, Nottingham, UK

[2] Institute of Mental Health, University of Nottingham, Nottingham, Nottinghamshire NG7 2TU, UK

[3] School of Medicine, University of Nottingham, Nottingham, UK

[4] Peer Support Development Team, Nottinghamshire Healthcare NHS Foundation Trust, Nottingham, UK

[5] School of Medicine, Yale University, New Haven, USA

[6] Department of Psychiatry, University Medical Center Hamburg-Eppendorf, Hamburg, Germany

[7] School of Health & Wellbeing, University of Glasgow, Glasgow, UK

[8] Social Work and Social Policy, La Trobe University, Melbourne, Australia

[9] Institute of Psychiatry, Psychology and Neuroscience, King's College, London, London, UK

[10] School of Health and Psychological Sciences, City, University of London, London, UK

[11] Department of Psychiatry II, Ulm University, Ulm, Germany

[12] Centre for Addiction and Mental Health, Toronto, Canada

[13] Department of Population Health Sciences, University of Leicester, Leicester, UK

[14] University of Nottingham Libraries, University of Nottingham, Nottingham, UK

[15] Recovery Research Team—Lived Experience Advisory Panel, Nottingham, UK

[16] Faculty of Nursing and Health Sciences, Health and Community Participation Division, Nord University, Bodø, Norway