PEER REVIEW HISTORY

BMJ Open publishes all reviews undertaken for accepted manuscripts. Reviewers are asked to complete a checklist review form (http://bmjopen.bmj.com/site/about/resources/checklist.pdf) and are provided with free text boxes to elaborate on their assessment. These free text comments are reproduced below.

ARTICLE DETAILS

TITLE (PROVISIONAL)	Methodology for task-shifting evidence-based psychological
	treatments to non-licensed/lay health workers: Protocol for a
	systematic review
AUTHORS	Kanzler, Kathryn; Kilpela, Lisa; Pugh, Jaqueline; Garcini, Luz; Gaspard, Christine; Aikens, James; Reynero, Erick; Tsevat, Joel; Lopez, Eliot; Johnson-Esparza, Yajaira; Ramirez, Amelie G.; Finley, Erin

VERSION 1 – REVIEW

REVIEWER	Miya Barnett University of California, Santa Barbara, USA
REVIEW RETURNED	03-Oct-2020

GENERAL COMMENTS	This manuscript describes the protocol for an ambitious systematic review of task-sharing and task-shifting of evidence-based psychological treatments. The topic of task-shifting is an important strategy to address workforce limitations in low resource settings. A few points of clarity might benefit the manuscript (and potentially the eventual review).
	1. The inclusion criteria says that a lay provider must be involved in delivering the intervention an the exclusion criteria says that the intervention can not include a specialist. Is this saying that the review is only looking at studies where task-shifting is completely to a lay provider? This will not include other forms of task-sharing/shifting, such as stepped-care models as conducted by Patel et al. in India. Clarifying these decision rules will be helpful. It might also be helpful to clarify other roles that lay health workers can serve in regards to mental health, even if these studies are not included in the review (e.g., promotoras conducting outreach and serving as bridges to treatment)
	2. The use of Proctor's model adds strength to identify implementation processes and outcomes, which have generally been understudied with lay health workers. Will implementation trials without clinical outcomes (e.g., testing training and supervision models on fidelity) be included? It appeared that clinical outcomes were required, but was not explicitly stated.
	3. It is not clear why telehealth, telemedicine, and telepsychiatry are included as search terms for lay health workers. Similarly, integrated care and staff development seem to be broader than the workforce that is being considered. I would consider limiting to terms used for providers. Some terms related to children's mental health that might be included: family navigator, parent support partner.

REVIEWER	Christopher G Kemp
	University of Washington, USA
REVIEW RETURNED	08-Oct-2020

GENERAL COMMENTS Thank you for the opportunity to review this manuscript. The authors describe a protocol for a systematic review of implementation strategies for task-sharing psychological interventions in lower-resource settings, with a focus on understanding best practices for clinical intervention adaptation, provider training, implementation and promotion of fidelity, and sustainment. The approach is rigorous, the research question is novel, and the results will be useful to the field. I have no major concerns with the manuscript, which is well-written and comprehensive. My minor comments are below. Your research question at the end of the introduction is perhaps overly narrow – adaptation is only the first step of implementation that you are interested in. Might this be better phrased as, "What are the best practices in adapting an EBPT for delivery by..., training lay personnel, implementing the treatment and maintaining fidelity, and sustaining the program over time..."? Why did you exclude teachers and school-based task-sharing? Schools are a major potential platform for the delivery of mental health services to children in lower-resource settings. Please expand your justification for this exclusion or consider revising vour protocol. I like your use of the Proctor implementation strategy specification framework to structure data extraction. However I think you will

need to be very clear on which 'level' of implementation strategy you are specifying: the task-sharing itself (in the ERIC framework, this would be called revision of professional roles), or the approaches used to successfully embed the task-sharing program (e.g., adaptation, supervision, audit and feedback). Or maybe the focus is on all of the above? In either case, I think you will likely need to specify multiply implementation strategies per study in order to capture variation in best practices across the dimensions of adaptation, training, implementation, and sustainment. Table 3, Study A would therefore consist of at least four rows, with specification of temporality and dose that is specific to each particular implementation strategy used. I also think it would be useful to align each strategy to the ERIC framework. Please expand your justification for not describing the justification, action target, and implementation outcomes components of the implementation strategy specification.

VERSION 1 – AUTHOR RESPONSE

Reviewer: 1

- We appreciate that the reviewer values the importance of this work by highlighting that task-shifting is an important strategy to address workforce limitations in low resource settings.
- 1. The inclusion criteria says that a lay provider must be involved in delivering the intervention and the exclusion criteria says that the intervention cannot include a specialist. Is this saying that the review is only looking at studies where task-shifting is completely to a lay provider? This will not include other forms of task-sharing/ shifting, such as stepped-care models as conducted by Patel et al. in India. Clarifying these decision rules will be helpful.

- We agree with the reviewer's suggestion to further clarify our decision rules. We have updated our decision rules to indicate that studies delivering care solely using a licensed or specialist/non-lay person will be excluded (p.8), as these interventions ultimately do not shift the task of evidence-based psychotherapy onto lay providers. We do plan to include stepped-care approaches like those described by Patel et al., and studies that incorporate supervision of lay providers by specialists.

It might also be helpful to clarify other roles that lay health workers can serve in regards to mental health, even if these studies are not included in the review (e.g., promotoras conducting outreach and serving as bridges to treatment)

- The reviewer makes an important point that lay health workers can serve a variety of critical roles in the health and well-being of their communities. We have added further discussion of these roles into the introduction (p.5).
- 2. The use of Proctor's model adds strength to identify implementation processes and outcomes, which have generally been understudied with lay health workers. Will implementation trials without clinical outcomes (e.g., testing training and supervision models on fidelity) be included? It appeared that clinical outcomes were required, but was not explicitly stated.
- We do require clinical outcomes for each study included in the review. However, we have designed the protocol to include non-clinical outcomes such as fidelity wherever possible. Since many studies publish multiple articles, we will include articles focused on non-clinical outcomes if they are from a study with clinical outcomes that may be described in a different article. We have edited our language for clarity (p.8; also please note description of study screening and selection on p. 11).
- 3. It is not clear why telehealth, telemedicine, and telepsychiatry are included as search terms for lay health workers. Similarly, integrated care and staff development seem to be broader than the workforce that is being considered. I would consider limiting to terms used for providers. Some terms related to children's mental health that might be included: family navigator, parent support partner.
- We agree that some of these terms are too broad and have deleted, as suggested (p. 10)
- Additionally, the reviewer raised concerns regarding the scope of the review, which we have considered at length. We agree that the review as originally proposed was "ambitious" and since the goals and needs of adult and youth-focused interventions may be different, we have elected to focus on interventions aimed at adult populations (age 18 years and older) and have edited our search terms accordingly. We believe this refined protocol is better poised to describe current knowledge regarding task-shifting for adult psychotherapy, and recommend a separate targeted review examining literature on task-shifting in support of children's mental health.

Reviewer: 2

- We thank this reviewer for their kind comments, highlighting that our approach is rigorous, the research question is novel, and the results will be useful to the field.

Your research question at the end of the introduction is perhaps overly narrow – adaptation is only the first step of implementation that you are interested in. Might this be better phrased as, "What are the best practices in adapting an EBPT for delivery by..., training lay personnel, implementing the treatment and maintaining fidelity, and sustaining the program over time..."?

- We appreciate this recommendation and have edited our research question so that it better reflects the scope of our work (p.6).

Why did you exclude teachers and school-based task-sharing? Schools are a major potential platform for the delivery of mental health services to children in lower-resource settings. Please expand your justification for this exclusion or consider revising your protocol.

- We agree that schools are an excellent platform for the delivery of mental health services. In response to comments from both Reviewers, and as noted in response #3 above, we have revised

our protocol to focus exclusively on task-shifting in provision of mental health services for adults aged 18 and older. After much reflection, we believe a separate review of steps in task-shifting EBPTs for children and adolescents is needed, given the different actors, actions, and targets associated with this work (e.g., different EBPTs, inclusion of parents and caregivers, school as well as clinical environments, need for developmental considerations, etc.).

I like your use of the Proctor implementation strategy specification framework to structure data extraction. However I think you will need to be very clear on which 'level' of implementation strategy you are specifying: the task-sharing itself (in the ERIC framework, this would be called revision of professional roles), or the approaches used to successfully embed the task-sharing program (e.g., adaptation, supervision, audit and feedback). Or maybe the focus is on all of the above? In either case, I think you will likely need to specify multiply implementation strategies per study in order to capture variation in best practices across the dimensions of adaptation, training, implementation, and sustainment. Table 3, Study A would therefore consist of at least four rows, with specification of temporality and dose that is specific to each particular implementation strategy used. I also think it would be useful to align each strategy to the ERIC framework.

- This reviewer has offered thoughtful guidance on refining this portion of our data extraction plan. We appreciate these points and concur. For each study included, we will specifically define each implementation strategy outlined to the extent possible based on data available. We are mindful that multiple implementation strategies are likely to be used for adaptation, training, implementation and sustainment, and agree that there is significant value in describing strategies used for each of these tasks. Our initial review of studies indicates that not all studies provide adequate detail on strategies to allow for full description; however, we believe it remains useful to (a) provide clarity on implementation strategies used at different phases of the implementation process where possible; and (b) identify gaps in the literature where implementation strategies have been under-described. We will also seek to use the ERIC naming categories for the implementation strategies.

Please expand your justification for not describing the justification, action target, and implementation outcomes components of the implementation strategy specification.

- We appreciate the encouragement on this point, and have amended the protocol to describe all seven components of Proctor et al.'s framework for operationalizing implementation strategies. This will provide a more thorough review and we hope it will be a useful tool for researchers and "real world" systems seeking to implement their own task-shifting programs. Please see the table included in supplemental material (previously, Table 3).

Again, we thank the Editor and Reviewers for their careful review, which has resulted in a meaningfully stronger protocol and manuscript.

Miva Barnett

REVIEWER

VERSION 2 - REVIEW

	University of California, Santa Barbara USA
REVIEW RETURNED	07-Dec-2020
GENERAL COMMENTS	Thank you for your careful revision of this manuscript. I believe it has been strengthened and I look forward to seeing the outcomes of this review.
REVIEWER	Christopher Kemp University of Washington, USA

REVIEW RETURNED	02-Dec-2020
GENERAL COMMENTS	Thanks to the authors for addressing my comments. I have no
	further concerns.