PEER REVIEW HISTORY

BMJ Paediatrics Open publishes all reviews undertaken for accepted manuscripts. Reviewers are asked to complete a checklist review form and are provided with free text boxes to elaborate on their assessment. These free text comments are reproduced below.

ARTICLE DETAILS

TITLE (PROVISIONAL)	Comorbidities of Deformational Plagiocephaly in infancy: A
	scoping review protocol
AUTHORS	Charalambous, Lia Hadders-Algra, Mijna
	Yamasaki, Edna
	Lampropoulou, Sofia

VERSION 1 – REVIEW

REVIEWER	Reviewer name: Brent Collett
KEVIEWEK	
	Institution and Country: University of Washington Department of
	Psychiatry and Behavioral Sciences, Department of Psychiatry
	and Behavioral
	Competing interests: None
REVIEW RETURNED	19-Apr-2021

GENERAL COMMENTS	The authors have done a nice job of clearly outlining their planned systematic review of comorbidities associated with deformational plagiocephaly. I agree with the authors that systematic review may help to summarize this broad literature (ranging pediatrics, craniofacial medicine, occupational/physical therapy, neurosurgery, nursing, etc.) and guide future research and intervention efforts.
	My primary suggestion would be for the authors to address how they plan to deal with publication bias and whether some effort to solicit unpublished work is needed.
	I think that the focus on comorbidity is appropriate, as in many/most comorbidities causality is unclear (e.g., unclear whether developmental delay causes or is caused by DP). In the manuscript, the authors occasionally seem to imply that their focus will be on causal factors and I would encourage them to be cautious to avoid assumptions re: causality.

VERSION 1 – AUTHOR RESPONSE

To: Prof. Imti Choonara

Editor in Chief, BMJ Paediatrics Open

Cover Letter for the manuscript entitled: Comorbidities of deformational Plagiocephaly in Infancy: A scoping review protocol ID bmjpo-2021-001113

Dear Prof. Imti Choonara,

We would like to thank you and the reviewers for the helpful comments regarding our submission, they helped us to improve the paper. Please find attached the revised manuscript for further consideration by BMJ Paediatrics Open. We addressed the comments point by point below and highlighted the changes in the main document (MD)-marked copy. Yours sincerely and respectfully,

Lia Charalambous

Replies (RE) to Comments by Editor in Chief:

1. "Restricting your search to articles in English only is NOT acceptable. Better to include all languages and then exclude those you were unable to translate".

RE 1: thanks, we will follow your advice. No language restrictions will be applied during our initial search. We have therefore, modified the inclusion criteria (page 7 of the MD-marked copy) accordingly. We added: "No language restrictions will be applied during initial search."

2. "Extend the date of publication search from 2020 to April 2021. Will help you when you try and publish the actual scoping review"

RE 2: the publication search date was extended as suggested from 2020 to April 2021 in page 7 of the MD-marked copy.

Replies (RE) to Comments by Associate Editor Comments to the Author:

1. "This scoping review is fairly clearly described. In its first objective you state; "Which comorbidities are associated with DP.." but you have excluded the comorbidities of craniostosis and torticollis .. need to make this clearer."

RE 1: thank you very much for your encouraging comments. We rephrased the text on the exclusion of children with craniosynostosis and torticollis. It now runs: "To better serve the objectives of the study, this review will omit studies including infants with craniosynostosis, torticollis or any other neurological or genetic disorders that are considered as specific aetiological and pathogenetic categories associated with DP. Inclusion of specific disorders

would confound the associations between positional DP (our focus) and comorbidities" (page 6 of the MD-marked copy).

- 2. "In your exclusions you place "short communications, letters". This is not reasonable to exclude if case reports are being included. These are writing formats not study designs, and may well have as much information as in the case reports published in alternative structures."
- **RE 2:** Thanks for your comment. We changed our strategy accordingly. Now short communications, letters, editorials and comments related to the topic of investigation will be included. Changes in the manuscript were undertaken in the MD-marked copy and they have been highlighted on page 6.

Replies (RE) to Comments by Reviewer 1

Brent Collett, University of Washington Department of Psychiatry and Behavioral Sciences:

1. "The authors have done a nice job of clearly outlining their planned **systematic review** of comorbidities associated with deformational plagiocephaly. I agree with the authors that systematic review may help to summarize this broad literature (ranging pediatrics, craniofacial medicine, occupational/physical therapy, neurosurgery, nursing, etc.) and guide future research and intervention efforts."

RE 1: thank very much for your kind words.

- 2. "My primary suggestion would be for the authors to address how they plan to deal with publication bias and whether some effort to solicit unpublished work is needed."
- RE 2: The scoping review (ScR) methodology does not require to present a view regarding the 'weight' of evidence but rather present a narrative account of existing literature. However, although a ScR does not require quality appraisal and synthesis, this methodology involves collating, summarizing and reporting the results in a rigorous and transparent mapping method in order to cover in—depth available research (Arksey & O'Malley 2005). In other words, if we note that a paper published the results with clear bias (e.g. due to confounding comorbidities or non-representative samples) this will be noted. We added this information on page 9 of the MD-marked copy: "Clear publication bias, such as bias due to confounding comorbidities or non-representative samples, will be recorded and taken into account in data collation".

3. "I think that the focus on comorbidity is appropriate, as in many/most comorbidities causality is unclear (e.g., unclear whether developmental delay causes or is caused by DP). In the manuscript, the authors occasionally seem to imply that their focus will be on causal factors and I would encourage them to be cautious to avoid assumptions re: causality."

RE 3: we couldn't agree more with this comment. There is no clear agreed definition of what a comorbidity is and the term is used for different relationships between 'morbid' conditions [Bax & Gillberg 2010 (p.142)]. Therefore we added the following text to the manuscript: "As no clearly agreed definition of comorbidity exists (14), we defined comorbidity of DP for the purpose of this ScR as the functional problems (developmental, ocular, auditory etc) that co-exist with DP and require additional evaluation, documentation and sometimes specific management." (page 4-5 of the MD-marked copy).

New references:

Hilary Arksey & Lisa O'Malley (2005) *Scoping Studies: towards a methodological framework*, International Journal of Social Research Methodology, 8:1, 19-32, DOI: 10.1080/1364557032000119616

Bax, M. and Gillberg, C. eds., 2010. *Comorbidities in developmental disorders* (Vol. 187). John Wiley & Sons.