# 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)	Voices from low-and-middle-income countries: a systematic review
	protocol of primary health care interventions within public health
	systems addressing intimate partner violence against women
AUTHORS	Signorelli, Marcos ; Hillel, Stav, de Oliveira, Daniel; Ayala
	Quintanilla, Beatriz; Hegarty, Kelsey; Taft, Angela

# **VERSION 1 – REVIEW**

REVIEWER	Manuel Contreras-Urbina The Global Women's Institute, George Washington University, USA
REVIEW RETURNED	01-Sep-2017

GENERAL COMMENTS	The manuscript "Voices from low-and-middle-income countries: a systematic review protocol of primary health care interventions within public health systems addressing intimate partner violence against women" presents the protocol the researchers will use to develop a systematic review on effective interventions to address intimate partner violence (IPV). I would like to congratulate the authors for using a very rigorous methodology to develop a systematic review on such important topic. The protocol is developed following the strictest scientific standards for doing a systematic review and is explained in a very clear way. In addition, the systematic review will provide very important information on what works to respond to survivors of IPV from the health sector and what could be improved. The systematic review will fill a gap in knowledge on the best practices to address IPV in middle- and low-income countries. However, in my opinion, I do not think that the methodology of how to conduct a systematic review, alone, is enough to be published in a high prestige peer-review journal. Instead, I think the methodology of how the protocol was developed to produce the systematic review should be part of the publication of the results of the review. I also encourage the authors to find other mechanisms to share details of the development of protocols, such as manuals or reports that cover methodological aspects, scholar's materials, etc.
	Other few comments:  Why does the systematic review only focus on quantitative studies? I understand that the meta-analysis could be done using mainly quantitative data, however, findings from qualitative studies could be very interesting to have a more comprehensive picture of the interventions.  The article mentions that the authors will consider 'survivors' as any women older than 16 years-old affected by IPV. I would

suggest explaining this age range and accounting for the limitations of not considering younger adolescents or boys.
of not considering younger addresserits of boys.
The search strategy should also include the review of other
systematic reviews on IPV that have been recently published to
make sure that all key articles are included.
I understand that grey literature is not included; however, a
lot of the knowledge on IPV interventions produced in regions such
as Latin America is not necessarily published in peer review articles.

REVIEWER	Abigail M Hatcher
	School of Public Health
	University of the Witwatersrand
REVIEW RETURNED	16-Oct-2017

## **GENERAL COMMENTS**

This protocol proposes to systematically examine an understudied topic: the efficacy of primary health care interventions for addressing intimate partner violence (IPV) in low- and middle-income settings (LMIC).

I have minor suggestions for how to strengthen what is a well-conceptualized and clearly articulated protocol.

### Introduction

- 1. On page 4, line 15-16, please provide evidence for how LMIC settings are home to higher prevalence of IPV and worse consequences.
- 2. Page 4, lines 16-23 are too specific for the Introduction and belong in the Methods section.
- 3. Page 4, lines 30-36 can be synthesized into a single sentence.

## **Review Questions**

- 4. Could the first question be "To what extent do primary health care..." to avoid the review coming up with a yes/no answer.
- 5. I think the second review question can be improved for clarity.

## Objectives

6. Would rephrase as: "...primary health care interventions in LMIC with the aim of prevention or reduction of IPV alongside the improvement of survivor health..."

### Methods

- 7. Page 6, line 13, the phrase "both a utopia and an aim" needs clarification.
- 8. Line 34, under "Intervention exposure" should read "The types of interventions may include..."
- Page 7, line 6, can be "PHC worker outcomes, including..."
- 10. In the exclusion criteria, study protocols are excluded under grey literature, but these are increasingly published in peer-reviewed literature. If the aim of the review is to be expansive, would consider including published protocols or at the very least covering them in the Discussion.
- 11. On page 8, line 36, the two authors will analyse abstracts "considering also full texts." It is unclear if they will abstract all full texts or sometimes consult when abstracts are unclear. Based on other systematic review designs, I might encourage the authors to only download full texts at the later (post-abstract review) step.

12. On page 9, I was impressed to see that the authors will abstract information about barriers and facilitators. This will be an important conceptual addition to the field, since few IPV interventions are theorized or studied through this type of process evaluation lens.
13. On page 10, will relatively more weight be given to studies with a stronger design?
with a stronger design?  14. On page 10, line 12, why not reach out to study authors for relevant primary endpoint data? In my experience, authors are usually happy to be included in a meta-analysis and will quickly respond to requests for additional data. This allows your final publication to have more impact, since you can make a compelling policy statement about how effective IPV interventions are currently.  15. Please describe how qualitative synthesis will occur, especially in respect to intervention facilitators and barriers.  16. Another potential limitation may be that funding for rigorous studies of IPV interventions has only picked up in the past few years,
potentially limiting the ability of the authors to identify relevant
studies in the review time period. In a systematic review, this limitation also becomes a study finding, since a dearth of evidence is, in itself, useful. Nevertheless, it may be worth mentioning.

REVIEWER	Yvette Efevbera
	Harvard TH Chan School of Public Health, USA
REVIEW RETURNED	24-Oct-2017

### **GENERAL COMMENTS**

Dear authors,

17.

throughout.

Thank you for sharing such an interesting protocol. Your study aims to fill a missing voice from low and middle-income countries in addressing intimate partner violence through primary health care centers, which is an important aim. It is also evident that careful thought and consideration were put into this protocol, which, notably, is designed to include data from beyond the English language pool. A very important contribution!

Kindly ensure the citations match the journal style

What remained unclear to me from your current protocol is why this narrower systematic review is necessary. You reference one similar systematic review in LMICs and suggest that "it did not make reference to PHC," but without further contextualization of that review, it is unclear to me why focusing on PHC separately from other interventions is important. Building on your introduction to set the stage for your specific study will importantly situate your proposed work.

There were some other areas throughout the protocol that can be strengthened by defining, clarifying, and supporting key concepts that you discuss, noted in detail below. There are also one or two minor comments on grammar.

Overall, a very interesting protocol that has the potential to interest many readers. Thank you for your important work.

Detailed comments:

### Introduction

• Provide citation for first sentence

p.4

- No comma needed after "impacts" in line 8
- What do you mean in lines 7-11? My interpretation is that experiencing IPV causes women to have physical health, for example, but instead I think you want to communicate that this leads to negative health consequences. It is also unclear if these are associations you are describing or causal relationships. You might address this by also changing the word "impacts" to "consequences" or "effects," depending on what you intend to claim here.
- Lines 15-23 could be summarized in 1-2 sentence, saving space and allowing more attention to be on the main points you are trying to make.
- Line 24-25 needs citation. Additionally, what do you mean by public health systems? You refer to this throughout the paragraph so please define.
- Lines 39-48 can also be summarized by including a brief mention of the broader scope and focusing then on your definition.
- Line 51-52 needs clarification and citation. What evidence do you have that "mainstream researchers" from HICs are not noticing these interventions? This is a bold claim so please defend.
- Lines 52-58 also require citation where is this info coming from, or is this the authors' hypothesis?

p.5

- Lines 5-8 are among the most important for defending your study! Rather than put all of this information in one sentence, it would be stronger for you to explain each of the 3 major shortcomings separately. For example, it is not clear to me from the explanation that your study is distinctly different from reference 19. Isn't it possible for the same studies they identified to appear in your study, even if they "did not make reference to PHC?"
- Inclusion of Spanish and Portuguese is indeed a strength. You could further justify this by explaining why you think data is missing from previous reviews that exclude these languages.
- Was any thought given to including other major languages (e.g., French)?

### Review questions

- Unless this is per guidelines from the journal, would recommend including review questions in the introduction.
- Please clarify "impacts/outcomes" in line 16. Clearer to choose one and be consistent throughout the text.

# Objectives

- Unless this is per guidelines from the journal, would recommend including objectives in the introduction.
- This is the first mention of "pre- and post-primary health care." In your introduction section about how you define PHC, need to be more explicit in how you conceptualize it for this study.

### Methods

- In line 46 you say that you will "include studies with quantitative pre-and-post evaluation," then you later say you will consider different experimental approaches (lines 55-56) which may not all follow a pre/post evaluation design. How will you deal with that?
- Why are you excluding observational, qualitative, or prevalence studies?
- I would highly recommend noting and citing methodology and challenges from systematic review on integrated interventions for violence prevention in LMICs, which has highlighted possible limitations your study may face. For example, as quoted from Efevbera, Y., McCoy, D. C., Wuermli, A., & Betancourt, T. S. (in press). "Integrating early child development and violence prevention programs: A systematic review." New Directions for Child and Adolescent Development:
  - "Although five studies reported improvements in both ECD and VP outcomes as a result of intervention, only three used experimental study designs, limiting conclusions that can be drawn. There was also variability in the design of each intervention as well as the instruments, scales, and approaches to measure a variety of outcome constructs, further complicating comparison."

### p.6

- Context in lines 13-23 is very helpful in understanding what PHC includes for you.
- Lines 25-29 are confusing. What about addressing IPV in PHC centers for women below 16 years – how does that get accounted for in your study? This is especially important given high rates of child marriage in South Asia and Sub-Saharan Africa. See for example:
  - Godha, D., Hotchkiss, D. R., & Gage, A. J. (2013).
     Association between child marriage and reproductive health outcomes and service utilization: a multi-country study from South Asia. *J Adolesc Health*, 52(5), 552-558.
  - Efevbera, Y., Bhabha, J., Farmer, P., & Fink, G.
     (2017). Girl child marriage as a risk factor for early childhood development and stunting. Social science & medicine, 185, 91-101.
- If you are restricting your search to a certain target population, please clarify.

- How did you decide on these types of interventions? Is this based on previous studies?
- The decision to include studies regardless of control group is important because it is unclear the type of studies you will find.

## p.7

- Primary outcome d in lines 6-10 doesn't follow the same format as primary outcomes a-c. Please reword/reframe to focus on the outcome, not the target population. (This might mean that there are more than four primary outcomes as well.)
- The current framing of secondary outcomes is focused on target population, rather than the outcome itself (see above).
   Recommend reframing all outcomes so they follow the same format.
- Rationale for the search ending in July 2017?
- You identify several excellent databases. You may wish to use Pubmed to access Medline as well, given user functionality, and Web of Science, which interfaces with several databases.
- Might also be useful to share MeSH (medical subject headings) used in appendices, along with your general search strategy.
- Lines 40-41 are past tense (while remainder of methods section is present tense). Please remain consistent to avoid confusing reader.
- Inclusion criteria can be strengthened and clarified by separating out each criteria into its own bullet point.

# p.8

- How will your study account for PHC interventions that indirectly affect IPV (for example, maternal mental health interventions may have an impact on IPV)? This is related to exclusion criteria #4, and warrants additional discussion, as you may miss important interventions.
- What does "considering also full texts" mean in lines 36-37?
   Will reviewers 1 and 3 review title, abstract, and full text at first round to determine inclusion? If so, how is this different from step 2?
- Data extraction process thoughtfully explained.
- Will you study include countries that were LMICs at the time of the intervention, or at the time of the data extraction? (The former option would be recommended, but regardless, please clarify)
- Line 52 makes reference to survivors. Related to earlier comment, you may need to include details about your target population in the inclusion and exclusion guidelines.

### Ethics and dissemination

 Please clarify if you obtained exemption from your university's institutional review board to conduct this study.

### **VERSION 1 – AUTHOR RESPONSE**

- Please complete and include a PRISMA-P checklist, ensuring that all points are included and state the page numbers where each item can be found. The checklist can be downloaded from here: http://www.equator-network.org/reportingguidelines/prisma-protocols/Thank you, the PRISMA-P is included (Appendix 1) and we double checked the pages numbers.

Reviewer: 1

Reviewer Name: Manuel Contreras-Urbina

Institution and Country: The Global Women's Institute, George Washington

University, USA

2 The manuscript "Voices from low-and-middle-income countries: a systematic review protocol of primary health care interventions within public health systems addressing intimate partner violence against women" presents the protocol the researchers will use to develop a systematic review on effective interventions to address intimate partner violence (IPV). I would like to congratulate the authors for using a very rigorous methodology to develop a systematic review on such important topic. The protocol is developed following the strictest scientific standards for doing a systematic review and is explained in a very clear way. In addition, the systematic review will provide very important information on what works to respond to survivors of IPV from the health sector and what could be improved. The systematic review will fill a gap in knowledge on the best practices to address IPV in middle- and low-income countries. However, in my opinion, I do not think that the methodology of how to conduct a systematic review, alone, is enough to be published in a high prestige peer-review journal. Instead, I think the methodology of how the protocol was developed to produce the systematic review should be part of the publication of the results of the review. I also encourage the authors to find other mechanisms to share details of the development of protocols, such as manuals or reports that cover methodological aspects, scholar's materials, etc. Other few comments:

-Thank you very much for your thoughts, they are very encouraging. The BMJ Open has recently published other protocols of systematic reviews (see for example, v.5, issues 6, 7 and 8; or v.6, issues 6 and 10). We designed this specific protocol, as it is particularly different from all those previously published. Therefore, we felt confident to submit to this journal.

Why does the systematic review only focus on quantitative studies? I understand that the meta-analysis could be done using mainly quantitative data, however, findings from qualitative studies could be very interesting to have a more comprehensive picture of the interventions.

-This is a good question and we are happy to explain. We also think that qualitative studies can bring interesting reflections. However, qualitative and quantitative interventions have different theoretic and methodological approaches and their outcomes can vary significantly. Our group considered that it would be too extensive to include both types in only one review, making it difficult to compare and synthesize the outcomes. But certainly, a good opportunity for the future would be to develop a review focusing only in qualitative studies and we noted this suggestion. However, we will consider papers that have process evaluation of studies that are included,

so these qualitative components will not be excluded.

The article mentions that the authors will consider 'survivors' as any women older than 16 years-old affected by IPV. I would suggest explaining this age range and accounting for the limitations of not considering younger adolescents or boys.

- Well observed. Considering that interventions targeting primarily adult women may have different approaches, particularities and outcomes compared to those focused on children, we decided to focus this review on adult women. This is the purpose of this age group. On page 6 from line 27 we inserted an explanation about this.

The impacts for children will be a secondary outcome, if the studies bring additional information about them.

The search strategy should also include the review of other systematic reviews on IPV that have been recently published to make sure that all key articles are included.

-Our group discussed it before and again, after your recommendation. We agreed that other systematic reviews are fundamental and we will refer to them in our discussions. However, we decided to not include them in the search strategy, targeting only studies with primary source of data.

I understand that grey literature is not included; however, a lot of the knowledge on IPV interventions produced in regions such as Latin America is not necessarily published in peer review articles.

- This is very well observed and we agree. However, grey literature can vary significantly and their quality and inclusion criteria may be questionable. That could led to bias and we are aiming for the most rigorous process possible. That is the reason that we are including regional databases, trying to include studies published in peer review journals from areas such as Latin America and others from LMIC.

Reviewer Name: Abigail M Hatcher

Institution and Country: School of Public Health, University of the Witwatersrand 7 This protocol proposes to systematically examine an understudied topic: the efficacy of primary health care interventions for addressing intimate partner violence (IPV) in low- and middle-income settings (LMIC).

I have minor suggestions for how to strengthen what is a well-conceptualized and clearly articulated protocol.

- Thank you for your encouraging comments.

On page 4, line 15-16, please provide evidence for how LMIC settings are home to higher prevalence of IPV and worse consequences.

-We reorganized the phrase to clarify this aspect.

Page 4, lines 16-23 are too specific for the Introduction and belong in the Methods section.

- We agree and we summarized this paragraph, making it clearer, instead of

moving to Methods.

Page 4, lines 30-36 can be synthesized into a single sentence.

-Very good suggestion, we synthesized the paragraph.

Could the first question be "To what extent do primary health care..." to avoid the review coming up with a yes/no answer.

-You are absolutely right. We corrected.

I think the second review question can be improved for clarity.

- This suggestion was very important for our reflection and we improved the second question for clarification.

Objectives - Would rephrase as: "...primary health care interventions in LMIC with the aim of prevention or reduction of IPV alongside the improvement of survivor health..."

-We agree with the suggestion and corrected it.

Methods - Page 6, line 13, the phrase "both a utopia and an aim" needs clarification.

-Thank you for flagging this issue. We rephrased it, mentioning that the definition of PHC can be very complex and subjected to conceptual debate.

Line 34, under "Intervention exposure" should read "The types of interventions may include..."

-Yes, amended.

Page 7, line 6, can be "PHC worker outcomes, including..." -Yes, rewritten.

In the exclusion criteria, study protocols are excluded under grey literature, but these are increasingly published in peer-reviewed literature. If the aim of the review is to be expansive, would consider including published protocols or at the very least covering them in the Discussion.

- We appreciate this suggestion and we will cover them on the discussion, as the focus of the review will be in measured quantitative outcomes of interventions.

On page 8, line 36, the two authors will analyse abstracts "considering also full texts." It is unclear if they will abstract all full texts or sometimes consult when abstracts are unclear. Based on other systematic review designs, I might encourage the authors to only download full texts at the later (post-abstract review) step.

- This suggestion was very important and we agree. Modified.

On page 9, I was impressed to see that the authors will abstract information about

barriers and facilitators. This will be an important conceptual addition to the field, since few IPV interventions are theorized or studied through this type of process evaluation lens.

- Thank you for the encouraging words.

On page 10, will relatively more weight be given to studies with a stronger design?

- Yes, that is correct. We inserted a phrase clarifying it on page 10.

On page 10, line 12, why not reach out to study authors for relevant primary endpoint data? In my experience, authors are usually happy to be included in a meta-analysis and will quickly respond to requests for additional data. This allows your final publication to have more impact, since you can make a compelling policy statement about how effective IPV interventions are currently.

- This was a great suggestion for our protocol and we modified it on page 10.

Please describe how qualitative synthesis will occur, especially in respect to intervention facilitators and barriers.

- We will refer to them descriptively, in a narrative descriptive manner. We inserted this explanation on page 10.

Another potential limitation may be that funding for rigorous studies of IPV interventions has only picked up in the past few years, potentially limiting the ability of the authors to identify relevant studies in the review time period. In a systematic review, this limitation also becomes a study finding, since a dearth of evidence is, in itself, useful. Nevertheless, it may be worth mentioning.

- Thank you for the suggestion, which was incorporated on page 11, last paragraph of conclusions and implications, as a potential limiting factor of this review.

Kindly ensure the citations match the journal style throughout.

- Double checked.

Reviewer Name: Yvette Efevbera

Institution and Country: Harvard TH Chan School of Public Health, USA 25 Thank you for sharing such an interesting protocol. Your study aims to fill a missing voice from low and middle-income countries in addressing intimate partner violence through primary health care centers, which is an important aim. It is also evident that careful thought and consideration were put into this protocol, which, notably, is designed to include data from beyond the English language pool. A very important contribution!

What remained unclear to me from your current protocol is why this narrower systematic review is necessary. You reference one similar systematic review in LMICs and suggest that "it did not make reference to PHC," but without further contextualization of that review, it is unclear to me why focusing on PHC separately from other interventions is important. Building on your introduction to set the stage for your specific study will importantly situate your proposed work.

There were some other areas throughout the protocol that can be strengthened by defining, clarifying, and supporting key concepts that you discuss, noted in detail below. There are also one or two minor comments on grammar.

Overall, a very interesting protocol that has the potential to interest many readers. Thank you for your important work.

- Thank you for your dedication to carefully evaluate our article. We are happy to provide additional information about the differences between our review and the other systematic review focused on structural interventions in LMIC (Bourey et al., 2015). Structural interventions aim to change structural factors, which are aspects of the economic, politico-legal, physical, and social environment that produce and reproduce risk (Bourey et al. 2015). According to table 1 from that review, potential structural interventions to reduce IPV may include: microfinance programs for women; unconditional and conditional cash transfer programs; community meeting spaces for women and girls; limitations on alcohol outlet density; legislation to facilitate women's access to divorce; legislation to protect survivors and prosecute perpetrators; training for and monitoring of criminal justice and legal professionals on IPV-related policies and legislation; social empowerment through community activities; educational entertainment media; and transformation of gender norms among men. Despite the fact that some of these components could be targeting public health systems, they are much broader and more structural initiatives, rather than strategies focused on primary healthcare centres. Our systematic review wants to focus on evidence from interventions specifically in the health system. We believe that bringing evidence from interventions developed within health systems could provide outcomes to support public health policy makers and managers to implement feasible interventions in other places. It is very different from structural interventions, which are broader, requiring the involvement of different sectors (health, education, finance, legal system, media) and thus, much more difficult to implement in other scenarios.

Additionally, the focus on PHC rather than the whole health system is because PHC is usually the first point of entrance for women in the health system, especially in LMIC. From our previous studies and literature searching, we noticed that PHC approaches to deal with IPV have some particularities, which are different from other levels of care, such as hospitals, for example. The routines, professional training and strategies to prevent or reduce IPV can be very different across different levels of care, especially if we consider low-and-middle-income contexts. Consequently, the aim of this review on PHC is to bring visibility to strategies conducted in this specific level of care, which is the least expensive and with greatest coverage. This is an issue of particular interest for LMIC, that has a great opportunity to handle the problem in the PHC system, with less resources and covering more people compared to other levels of care. And this is the main reason for our 'narrow' systematic review.

Furthermore, the other systematic review (Bourey et al., 2015) also did not include regional databases, neither languages other than English, what could be a limit to increase the visibility of health components within structural interventions.

The last argument, is that it was published in 2015, so as mentioned by the 2nd reviewer, it is only more recently that interventions from LMIC have

been granted with funds, evaluated and published. Thus, we will have an additional 2 years of search interval that can bring new and innovative findings to our systematic review.

We inserted a new paragraph on page 5 to strength and clarify these arguments.

Introduction - Provide citation for first sentence

- Inserted.

p. 4

No comma needed after "impacts" in line 8

- Corrected.

What do you mean in lines 7-11? My interpretation is that experiencing IPV causes women to have physical health, for example, but instead I think you want to communicate that this leads to negative health consequences. It is also unclear if these are associations you are describing or causal relationships. You might address this by also changing the word "impacts" to "consequences" or "effects," depending on what you intend to claim here.

- Yes, you are correct, we changed for "consequences" to clarify.

Lines 15-23 could be summarized in 1-2 sentence, saving space and allowing more attention to be on the main points you are trying to make.

- We agree and we summarized.

Line 24-25 needs citation. Additionally, what do you mean by public health systems? You refer to this throughout the paragraph so please define.

- Thank you for this important observation, we inserted a definition to cover this aspect

Lines 39-48 can also be summarized by including a brief mention of the broader scope and focusing then on your definition.

- Thank you, we synthesized.

Line 51-52 needs clarification and citation. What evidence do you have that "mainstream researchers" from HICs are not noticing these interventions? This is a bold claim so please defend.

Lines 52-58 also require citation – where is this info coming from, or is this the authors' hypothesis?

- As these two considerations (32 and 33) are linked, there is only one response: yes, it is our hypothesis. We clarified it in the paper.

p.5

Lines 5-8 are among the most important for defending your study! Rather than put all of this information in one sentence, it would be stronger for you to explain each

of the 3 major shortcomings separately. For example, it is not clear to me from the explanation that your study is distinctly different from reference 19. Isn't it possible for the same studies they identified to appear in your study, even if they "did not make reference to PHC?"

- Please, see comment number 25.

Inclusion of Spanish and Portuguese is indeed a strength. You could further justify this by explaining why you think data is missing from previous reviews that exclude these languages.

- We believe this is already explained on page 4, lines 54-57 ("high publication costs in prestigious academic journals, accompanied by high standards which are difficult to achieve by LMIC researchers given scarce resources, and; 3) linguistic barriers, as writing papers in English—the dominant language for publication in prestigious journals of high income countries—can be very expensive for non-English speaking researchers.")

Was any thought given to including other major languages (e.g., French)?

- Yes, we thought about that, but nobody in our team is fluent in French, neither French-native speaking. So, we decided to focus only in English, Portuguese and Spanish aiming to rigorously evaluate studies in these three languages.

## Review questions

Unless this is per guidelines from the journal, would recommend including review questions in the introduction.

- It is not a guideline of the journal, but we think that separating the review questions in a specific topic makes the reading more attractive to the reader.

Please clarify "impacts/outcomes" in line 16. Clearer to choose one and be consistent throughout the text.

- These are very different concepts, especially in controlled studies. Outcomes are measured quantitatively and process evaluation of the impact on key stakeholders is very important and may be best measured qualitatively. We accept Oakley et al's argument that process evaluation is vital to strengthening the understanding of controlled studies. (Oakley A, Strange V, Bonell C, Allen E, Stephenson J, RIPPLE Study Team. Process evaluation in randomised controlled trials of complex interventions. Brit Med J. 2006;332(18 Feb):413-6.)

## Objectives

Unless this is per guidelines from the journal, would recommend including objectives in the introduction.

- Please, see comment 37.

This is the first mention of "pre- and post-primary health care." In your introduction

section about how you define PHC, need to be more explicit in how you conceptualize it for this study.

- We reformulated the phrase to clarify this issue.

### Methods

In line 46 you say that you will "include studies with quantitative pre-and-post evaluation," then you later say you will consider different experimental approaches (lines 55-56) which may not all follow a pre/post evaluation design. How will you deal with that?

- We made modifications in the text in order to clarify the point that you have mentioned. In this case, we will include experimental studies whose definition according to the Dictionary of Epidemiology (Last et al, 4th edition, 2001) is "a study in which the investigator intentionally alters one or more factors and controls the other study conditions in order to analyze the effects of so doing". Therefore, to this systematic review the selected experimental studies must clearly present a pre-and-post evaluation

Why are you excluding observational, qualitative, or prevalence studies?

- Because our intention is to systematically review outcomes from quantitative interventions, thus excluding observational or prevalence studies, that are not related to interventions. We believe that it would be difficult to compare and synthesize in the same systematic review both qualitative and quantitative interventions, as approaches are very different. Also we will include some of these in our introduction and discussion where relevant.

I would highly recommend noting and citing methodology and challenges from systematic review on integrated interventions for violence prevention in LMICs, which has highlighted possible limitations your study may face. For example, as quoted from Efevbera, Y., McCoy, D.

- C., Wuermli, A., & Betancourt, T. S. (in press). "Integrating early child development and violence prevention programs: A systematic review." New Directions for Child and Adolescent Development:
- o "Although five studies reported improvements in both ECD and VP outcomes as a result of intervention, only three used experimental study designs, limiting conclusions that can be drawn. There was also variability in the design of each intervention as well as the instruments, scales, and approaches to measure a variety of outcome constructs, further complicating comparison."
- Thank you for sending this reference and raising this topic. This is so important that we highlighted this issue in the beginning of the paper (Strengths and limitations). We believe that in Page 3, lines 47-50 this is already clearly explained: "It is expected that there will be some variability related to methodological diversity and outcomes of the reviewed studies, due to the broad scope of PHC interventions addressing IPV, making it challenging to compare outcomes across different scenarios." Furthermore, in the conclusions (page 11) we again flag this important issue: "Another limitation is the possible diversity of interventions, that can

be challenging to be compared and systematised."

p.6

Context in lines 13-23 is very helpful in understanding what PHC includes for you.

- Thank you, yes we agree.

Lines 25-29 are confusing. What about addressing IPV in PHC centers for women below 16 years – how does that get accounted for in your study? This is especially important given high rates of child marriage in South Asia and Sub-Saharan Africa. See for example:

- o Godha, D., Hotchkiss, D. R., & Gage, A. J. (2013). Association between child marriage and reproductive health outcomes and service utilization: a multi-country study from South Asia. J Adolesc Health, 52(5), 552-558.
- o Efevbera, Y., Bhabha, J., Farmer, P., & Fink, G. (2017). Girl child marriage as a risk factor for early childhood development and stunting. Social science & medicine, 185, 91-101

If you are restricting your search to a certain target population, please clarify.

- Thank you for the references. Please, see comment number 4 for both items 45 and 46.

How did you decide on these types of interventions? Is this based on previous studies?

- This is a list of examples from present literature, but it will not exclude others that are not mentioned. We rewrote the phrase to clarify.

The decision to include studies regardless of control group is important because it is unclear the type of studies you will find.

- Yes, we shared the same thought.

p.7

- Primary outcome d in lines 6-10 doesn't follow the same format as primary outcomes a-c. Please reword/reframe to focus on the outcome, not the target population. (This might mean that there are more than four primary outcomes as well.)
- We reorganized the outcome 'd' to follow the same format of outcomes ac.

The current framing of secondary outcomes is focused on target population, rather than the outcome itself (see above). Recommend reframing all outcomes so they follow the same format.

-We reorganized, following the same pattern.

Rationale for the search ending in July 2017?

- It was the moment we registered the protocol in the PROSPERO and we had to specify this information in the registration. We were also starting our preliminary searches

You identify several excellent databases. You may wish to use Pubmed to access Medline as well, given user functionality, and Web of Science, which interfaces with several databases.

# - Thank you for your comment.

We accessed Medline via Ovid, given this is the preferred platform at the institution supporting our research.

Moreover, PubMed automatically conflates MeSH and keywords (the search strategy is, thus, always "highly specific," contra "highly sensitive") so Ovid allowed us to ensure we did not miss anything relevant (highsensitivity), and that we captured everything that is highly relevant (high specificity), following recommendations by the Cochrane Collaboration (cf.: pp. 135-139, 141-142, Cochrane Handbook for Systematic Reviews, 2008) and support from our institution's library and medical librarian (co-author #2).

Web of Science was deemed superfluous here, given that Medline indexes all of the relevant journals for our question. Moreover, similar to PubMed, indexing (MeSH) is automatically built into the search, which means our results would be "highly sensitive."

Knowledge of automatic conflation via PubMed and on Web of Sciences comes from: Bell, S. S., 2015. Librarian's Guide to Online Searching: Cultivating Database Skills for Research and Instruction, Libraries Unlimited: Santa Barbara, and the databases' respective manuals.

Might also be useful to share MeSH (medical subject headings) used in appendices, along with your general search strategy.

- Appendix 2 – General Search Strategy does give this information. We apologise if it is unclear. Following conventions set by Medline, those words that are capitalised, followed by an /, are MeSH. (Similarly, those words in lower case, except for proper nouns, are keywords.) But if the journal has a different preference for indicating MeSH, we are happy to change.

Lines 40-41 are past tense (while remainder of methods section is present tense). Please remain consistent to avoid confusing reader.

### - Corrected

Inclusion criteria can be strengthened and clarified by separating out each criteria into its own bullet point.

- Improved.

## p.8

- How will your study account for PHC interventions that indirectly affect IPV (for example, maternal mental health interventions may have an impact on IPV)? This is related to exclusion criteria #4, and warrants additional discussion, as you may miss important interventions.
- Very well noted, this is extremely important for our review not to miss important interventions. We will not exclude these studies that indirectly affect IPV. We rewrote inclusion criteria number 4 and exclusion criteria number 4 to clarify it.

- What does "considering also full texts" mean in lines 36-37? Will reviewers 1 and 3 review title, abstract, and full text at first round to determine inclusion? If so, how is this different from step 2?
- Already corrected, please see comment number 18.
- Data extraction process thoughtfully explained.
- Thank you.
- Will you study include countries that were LMICs at the time of the intervention, or at the time of the data extraction? (The former option would be recommended, but regardless, please clarify)
- This is already mentioned on the 3rd paragraph of the introduction: the LMIC according to the World Bank classification as of March/2017.
- Line 52 makes reference to survivors. Related to earlier comment, you may need to include details about your target population in the inclusion and exclusion guidelines.
- In accordance, we included.

### Ethics and dissemination

- · Please clarify if you obtained exemption from your university's institutional review board to conduct this study
- The Ethic board from the 1 st author's institution was consulted and they confirmed that systematic reviews are exempted from ethics approval. Thank you again for your question and time. We made this point clearer in the protocol.

Thanks!

## **VERSION 2 - REVIEW**

REVIEWER	Abigail Hatcher School of Public Health, University of the Witwatersrand, South Africa
REVIEW RETURNED	29-Nov-2017
GENERAL COMMENTS	The authors addressed the reviewer comments thoroughly and I believe the manuscript is ready for publication. One small suggestion for responding to future reviews: It can be nice to cut/paste the actual rephrased sentence or paragraph into the author responses. This allows reviewers to quickly see the edits without needing to refer back to the tracked changes manuscript.

REVIEWER	Manuel Contreras-Urbina
	George Washington University

	Global Women's Institute
	Washington DC
REVIEW RETURNED	06-Dec-2017
·	
GENERAL COMMENTS	The protocol is really great. Congratulations for that. I think it could
	be very useful for future systematic reviews in this field. However, I
	still not sure why just the methodology needs to be published in a
	peer review journal. My recommendation is to publish the
	methodology as part of the systematic review. No need for two
	publications.

## **VERSION 2 – AUTHOR RESPONSE**

### Dear Dr. Groves and reviewers:

I am pleased to resubmit the reviewed version of our original research article entitled "Voices from low-and-middle-income countries: a systematic review protocol of primary health care interventions within public health systems addressing intimate partner violence against women" by Marcos Signorelli, Stav Hillel, Daniel Oliveira, Beatriz Ayala-Quintanilla, Kelsey Hegarty and Angela Taft for publication in The BMJ Open.

We are very grateful for your time and dedication to carefully analyse our article. All considerations from the reviewers were very valuable to improve the quality of the paper and our team is very proud to submit this final version.

The last recommendations from the reviewers were very important and we will certainly take them into consideration for our future publications. We are very grateful for their encouraging thoughts and compliments.

As a final step following your suggestions, we revised the PRISMA-P checklist (Appendix 1), including all page numbers. Additionally, we will also be very happy to review the proofread version of the paper, to ensure that all page numbers listed in the PRISMA-P checklist correspond exactly to the items described in the article.