Author’s response to reviews

Title: Demand for family planning satisfied with modern methods among sexually active women in low- and middle-income countries: who is lagging behind?

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Author’s response to reviews:

Reviewer reports:

Reviewer #1: This study was an analysis of cross-sectional surveys that examined which contraceptives and/or birth control methods, if any, reproductive age women were using.

Abstract/Plain Summary:

1) Line 23-24, "The latest survey carried out since 2000 in 77 countries were included in the analysis."

It would be clearer to say, "The most recent surveys carried out since 2000 in 77 countries were included in the analysis."

Authors’ reply: The suggestion was incorporated to the manuscript.

2) Lines 33-35, "The other countries had mDFPS above 20% at country-level, but in many of these mDFPS coverage was low among women in the poorest wealth quintiles, youngest age groups, with little education and living in rural areas."

It should be written, "in the youngest age groups". This same mistake is present in lines 54-56.
Introduction:

3) Lines 62-64, "Reproductive health is explicitly mentioned in goal 3 on good health and wellbeing, but may also be considered as part of goal 5, that aims at gender equality and women's empowerment [1, 2]."

The sentence should be written, "...but may also be considered as part of goal 5, which aims at..."

Authors’ reply: Corrected in the manuscript.

4) Line 65-66, "demand satisfied for family planning"

I think this expression should be phrased as "demand for family planning satisfied" rather than as "demand satisfied for family planning". The current phrase doesn't follow the order of the initialism (i.e. demand satisfied for family planning would be DSFP, not DFPS). The initialism better fits the phrase "demand for family planning satisfied", which is the way World Health Organization (WHO) phrases the indicator.

Authors’ reply: Corrected in the manuscript.

5) Lines 69-70, "Family planning also has potential to reduce poverty worldwide by improving educational and economic achievements of women [3, 11]."

I would suggest saying, "educational and economic outcomes for women", as "improving achievements" is generally not said.

Authors’ reply: The suggestion was incorporated to the manuscript.

6) Line 71-73, "with about one in three women of reproductive age failing to use modern methods despite their desire to delay or limit pregnancy [14]"

I couldn't find where reference 14 states "one in three". Reference 14 seems to highlight that 20-58% of women had an unmet need, depending on region.

Authors’ reply: We revised the sentence in the manuscript.
7) Lines 81-83, "Qualitative evidence indicates that female disapproval of modern family planning methods is influenced by women's misconceptions, including their limited understanding of potential side effects"

Influenced by women's misconceptions of what? Modern methods of contraception?

Authors’ reply: Corrected in the manuscript.

Methods:

8) Lines 93-94, "We used data from the latest Demographic and Health Surveys (DHS) and/or Multiple Indicator Cluster 94 Surveys (MICS) surveys available from each LMIC country, carried out since 2000."

A clearer variant might be to write, "We used data from the most recent (post-2000) Demographic and Health Surveys (DHS) and/or Multiple Indicator Cluster Surveys (MICS) from each LMIC country."

Alternatively, you may break it up into 2 sentences: "Data from each LMIC country was gathered using the Demographic and Health Surveys (DHS) and/or the Multiple Indicator Cluster Surveys (MICS). Surveys used in analyses were the most recent available and all had been carried out since 2000."

Also, the word "survey" outside of the acronym (i.e. the lower-case appearance of "survey" in the sentence) is extraneous.

Authors’ reply: Corrected in the manuscript.

9) Lines 94-96, "Use of publicly available surveys, with similar methodology and sampling strategy ensures the comparability of results."

There either should be a comma after the phrase "sampling strategy" or the comma before "with" ought to be removed.

I'm unsure that the data's public availability ensures comparability. Similar methodology and sampling strategy would ensure comparability, not public availability. More detail on the methodology and sampling strategy would also be beneficial for readers who don't know much about the DHS or MICS and would strengthen your argument that the results among surveys are comparable.
Authors’ reply: Indeed, public availability does not ensure comparability. The sentence was corrected and a reference with more information on the MICS and DHS was also added to the manuscript.

10) Lines 111-114, "Women in need of contraception are defined as those who are fecund and do not want to become pregnant within the next two years, or who are unsure about whether or when they want to become pregnant."

Ambivalence towards pregnancy does not necessarily imply need for contraceptive services. Many women are happy or feel neutral when they become pregnant unintentionally. I am curious as to what percentage of women explicitly don't want to become pregnant and what percentage are ambivalent. Is that data available from these surveys?

Authors’ reply: Yes, these data are available in the surveys. Statcompiler compiles results from the DHS surveys and shows that, on average, 39.2% (ranging from 8.3 to 72.3) of the women said they don’t want more children; 4.2% (ranging from 0.2% to 28%) said they were unsure. Among the pregnant women, on average 9% (ranging from 0.6% to 36.9%) said they didn’t want the pregnancy at all and 17.7% (ranging from 2.2 to 40.7) said they wanted the birth later on. The percentage of women unsure is actually not high, on average. Regarding putting these women unsure about timing of pregnancy among those in need of contraception, we just adopted the standard definition of the indicator as used by DHS, Unicef, WHO.

11) Lines 114-115, "Pregnant women with a mistimed or unwanted pregnancy are also considered in need of contraception."

At what point in a pregnancy were pregnant women asked if their pregnancy was wanted or mistimed? A woman's pregnancy may be both unintended but wanted, and her response may change over the course of the pregnancy.

Relatedly, a mistimed or unwanted pregnancy may not actually represent a person who is need of contraception. It's possible that their contraception or birth control method failed.

I worry that including this group of pregnant women may bias your results among communities of women in which it is culturally inappropriate to say an ongoing pregnancy is unwanted and may be misclassifying women whose contraceptive (which might be modern) failed.

Author’s reply: We totally agree with the reviewer that quite a bit of subjectivity is involved in this indicator where it involves wanting of current or a next pregnancy. The definition of infecund women is also problematic. However, this is the indicator of choice for family planning given it is the only coverage indicator available (women using contraception among those in
need). Contraceptive use is much simpler, does not involve subjectivity, but its denominator is all women in fertile age. That means that it will not achieve 100%.

On the method failure, just a few DHS surveys include this information and when it is available, women that had a pregnancy due to a contraceptive failure are categorized as a limiting/space failure, which is considered as demand for family planning satisfied. When it is not available, all women are classified as pregnant or postpartum amenorrheic NOT due to contraceptive failure. This is a limitation of the surveys.

Having said that, we are using a standard indicator, and it would not make sense to reinvent it given it is used in all reports and analyses conducted by UN agencies and other academics as such.

12) Is there any information on the post-partum status of women surveyed? Post-partum women have a reduced number of contraceptive choices, in that they can't use anything containing estrogen for the first few months. If an estrogen-containing form of contraception is their preferred method, then they may be abstaining from sex or using lactational amenorrhea until they can use their preferred choice of contraception. Given a scenario in which these women have access to other forms of contraception, such as condoms or progesterone only hormonal contraceptives, but choose not to use them doesn't necessarily represent a case in which the women is in-need.

Authors’ reply: We agree that in this period poses some challenges, but keeping in mind we are running population analyses, the proportion of women in this specific period in a survey will not bias or change substantially the results presented.

13) Given some of the issues surrounding the classification and inclusion pregnancy and post-partum women, did you or are you able to stratify based on not pregnant, pregnant, or post-partum?

Author’s reply: The number of women that are pregnant or in the postpartum period is not large. As we present results that are further stratified by diverse sociodemographic characteristics, the small number of women pregnant or postpartum would make the analysis unfeasible.

14) Lines 115-116, defining modern contraceptives.

I think there should be more justification as to why fertility awareness methods were excluded entirely from modern methods.
I know that reference 26 (Hubacher & Trussell, 2015) groups all fertility awareness methods together as "traditional", but the World Health Organization (WHO) separates modern forms of fertility awareness methods (such as Standard Days Method) from non-modern (such as the rhythm method). It seems odd to include spermicide in the list of modern contraceptives but not these modern forms of fertility awareness methods when spermicide has lower efficacy and effectiveness as compared to modern fertility awareness methods. Fertility awareness methods are usually free, can be more culturally appropriate and are available regardless of war, trade disputes, natural disasters, etc. For more information on WHO classification, see [http://www.who.int/mediacentre/factsheets/fs351/en/](http://www.who.int/mediacentre/factsheets/fs351/en/). Note that WHO doesn't list spermicide at all.

Author’s reply: We are aware of the debate about the classification of such methods are modern, and that WHO has recently reclassified them as modern. There are two reasons we have not adopted this classification. The first is that many surveys don’t get into enough detail to separate rhythm from std days, for instance. Secondly, in LMICs settings with large proportions of women with very low educational levels, and very low empowerment levels (enabling them to decide when to have sex or not) it seems to us unlikely that these methods will have high effectivity. We added an explanation in the discussion about this.

15) Line 133-134, "Analysis were stratified by woman's age (15-17 years; 18-19 years; 20-49 years old)…"

This sentence should start, "Analyses were stratified…"

How was the age group 20-49 decided upon? This a pretty big age group, and women 35 years and older usually represent a different population in terms of risks of pregnancy (ex. pre-term birth) and desire to have children.

Authors’ reply: We agree that the group of women 35+ is under a higher pregnancy-related risk, but the logic of the grouping was not risk, but social vulnerability. There is a fair bit of interest in adolescents’ health currently and our approach was aimed at highlighting how they fare in terms of family planning compared to adult women.

16) Is there any information available on occupation? Women who work as sex workers may be more likely to use certain forms of contraception than others. Married women who work as sex workers may choose to use one form of contraception or birth control practices with their spouse but another with their clients.
Authors’ reply: We agree that being a sex worker may influence the choice of the contraceptive method, however this information is not available in the surveys. Even though information on the woman’s occupation is available in many surveys, sex worker is not one of the categories listed.

17) Is there any information on availability of contraception, other than the mDFPS (which really is examining use of contraception)? This matters for interpretation. For example, if someone lives in an area without any access to hormonal contraception (i.e. it's not sold anywhere nearby), they have a different problem as opposed to someone who could access it but can't afford it or who is choosing not to use it for a different reason.

Author’s reply: Yes, the surveys have more information on the reason why women are not using contraception. However, we believe that it is out of the scope of the article as our aim was to describe the use of modern contraceptive methods among women in need of family planning, and to identify subgroups with mDFS extremely low (defined as <20%). Some perspective of the reasons why some subgroups or regions have lower mDFPS is already included in the discussion of the paper.

Results:

18) Line 49, "The latter presented mean mDFPS of 32.9%...,"

I would not use "latter" in this way. Latter is used when there are only two items on a list, but the list that is being referenced contains more than 2 items. Also, the use of "presented" seems inappropriate.

I would substitute, "The mean mDFPS in West Africa was 32.9%...".

Authors’ reply: Corrected in the manuscript.

19) Line 152, "Still in table 2, DFPS was subdivided by the type of contraceptive method used."

The word "still" is inappropriate here. I would simply write, "In Table 2, DFPS was subdivided…".

Authors’ reply: Corrected in the manuscript.

20) Line 159-161, "Even among these countries, Barbados, Saint Lucia and Suriname have around one quarter of the women in need of contraception failing to use any method."
What are the levels of contraception use in high income countries, especially ones with easily-accessed contraception?

There is probably a point at which patient preference comes into play and we don't expect everyone to use one of these methods or any method. I think breaking down your tables by women who report they don't want to be pregnant and those who are unsure might better get at the need for contraception among this quarter of women.

Author’s reply: The median levels of mDFPS among married women in North America and Northern and Western Europe are, respectively, 85%, 87.4% and 84.9%. In Brazil, there is currently about 85% of women using modern contraceptives, with corresponding mDFPS close to 90%. But the aim of our paper is to present a global picture of family planning and highlight groups that are left behind so that programs and policies can be adapted to improve reach over such groups. We are not concerned here about individual choices that every woman should be free to make. But, at country level, a successful family planning program will show a large proportion of women taking control of their family size to their (and their families) advantage. This can be clearly seen in Brazil, where there was a huge reduction in contraceptive use inequality in the past 30 year (please see França GVA, Restrepo-Méndez MC, Maia MFS, Victora CG, Barros AJD. Coverage and equity in reproductive and maternal health interventions in Brazil: impressive progress following the implementation of the Unified Health System. Int J Equity Health. International Journal for Equity in Health; 2016; 15(1):149. doi: 10.1186/s12939-016-0445-2.)

21) Lines 161-162, "In Uzbekistan, Malawi, Kazakhstan, Indonesia, Kenya, Rwanda and Ethiopia most of these women relied on long-acting contraception."

The phrase "most of these women" should be replaced with "most women".

Authors’ reply: Corrected in the manuscript.

22) Lines 177-179, "This region showed peculiar results, with huge variation in mDFPS (from 13.5% to 83.0%, Figure 1), and the lowest reliance on modern methods. Albania and Kosovo, for instance, have DFPS over 80%, but only about a quarter of these women use modern methods."

Do Albania and Kosovo have high unintended pregnancy rates? According to Figure 3, Albania has lower fertility rates despite their reliance on "non-modern" methods. Are they more likely to be using certain forms of "traditional methods"?
Author’s reply: Kosovo and Albania are the only two countries with a Muslim-majority population in Europe. Although data on induced abortion is missing for these countries, it is likely that abortion is frequently used as a fertility regulation method, similar situation as in the other countries in the region. Contraceptives were only legalized in Albania in 1992, but Albanian women still have more confidence in withdrawal than in modern contraceptive methods, highlighting their poor knowledge about family planning. Concern about side effects is also a great barrier for the adoption of modern contraceptive methods in these countries. The results clearly show that, at population level, the regular use of any reasonably effective method is able to reduce fertility rates, even if failure will occur at individual level.

23) Line 179-180, "We show in Figure 3 that, generally countries with higher mDFPS have lower total fertility rates."

I'm guessing Table 3 is trying to use the fertility rate as an indirect metric for unintended or unwanted pregnancy. Is this common in the literature? Is there any metric that describes how accurately this maps against unintended/unwanted pregnancies? Higher income countries may have lower fertility for reasons other than access to contraception.

Also, the comma following "that" should be removed.

Authors’ reply: The comma was removed from the sentence. In Figure 3 we are not trying to use total fertility rate (TFR) as a metric for unwanted pregnancies. Actually, there is a negative correlation between TFR and unintended pregnancies. Here we wanted to show that the use of modern contraception is, in general, negatively correlated with the TFR. However, this pattern does not hold true for the CEE & CIS region. As we mentioned before, the consistent use of traditional contraceptive methods can also play an important role in reducing TFR.

24) Line 194, the acronym CAR is never defined in the text.

Authors’ reply: Corrected in the manuscript.

Discussion:

25) Line 220-223, "This suggests that efforts must be directed not only to the supply side - including provision of contraceptives through appropriate delivery channels - but also against child marriage and increasing woman's empowerment through changes in social norms that might inhibit uptake of contraception (including married woman)."

The phrase in parentheses should be "including among married women"
Authors’ reply: Corrected in the manuscript.

26) Line 231-232, "religion - which is commonly believed to present a barrier to family planning with modern contraceptives [27] - did not come up in our analysis as an important determinant of mDFPS."

Grammar: The dash lengths don't match. Also, commas may be more appropriate.

Authors’ reply: Corrected in the manuscript.

27) Line 233, "countries, Islam, Christianism and other religions..."

Christianity is the religion, not Christianism. Christianism is used as a pejorative term, at least in the United States.

Authors’ reply: Corrected in the manuscript.

28) Lines 258-259, "The use of traditional contraceptive methods is associated with sexual disorders and dissatisfaction, and also makes men and women more susceptible to sexually transmitted diseases."

There shouldn't be a comma before "and".

Authors’ reply: Corrected in the manuscript.

29) Line 258-260, "The use of traditional contraceptive methods is associated with sexual disorders and dissatisfaction, and also makes men and women more susceptible to sexually transmitted diseases [41]."

I cannot find this information in reference 41, and I think the claim that traditional contraceptive methods are associated with sexual disorders and dissatisfaction should have a reference.

Authors’ reply: The reference was corrected in the manuscript and a reference for the claim that contraceptive methods are associated with sexual disorders and dissatisfaction was added.

30) Line 260-261, "The literature also shows that the individual efficacy of the traditional contraceptive methods is lower than the efficacy of the modern methods [42]."
I cannot find any commentary regarding the efficacy of any contraceptive methods in reference 42. The WHO puts the Standard Days method at 95% efficacy and withdrawal at 96% efficacy, which is not a far cry from the efficacy of condoms (98%) (http://www.who.int/mediacentre/factsheets/fs351/en/).

Authors’ reply: The reference was corrected in the manuscript.

31) Line 261-264, "Thus, the low fertility rates found in these countries can be a result of the use of traditional contraceptive methods being effective at the population level, or it can be due to the high induced abortion rates in the region - one of the highest in the world [43].

It's unclear here who you're referring to here. Are you referring to CEE & CIS? I would restate that. Regarding abortion in CEE, I'd make sure that the data is recent. Abortion trends and behaviors have changed in CEE since the fall of the Soviet Union, but some countries in CEE use an old Soviet system of accounting for abortion where induced abortions and spontaneous abortions (i.e. miscarriages or pregnancy losses) are grouped into the same statistic, which artificially inflates that induced abortion statistic.

Also, I cannot find any reference to abortion in reference 43. Reference 43 is a paper on child height, so I'm not sure how it's related to this article.

Authors’ reply: The sentence was revised to be clearer. Reference 43 was incorrect, and was replaced by the correct one (Sedgh G, et al: Abortion incidence between 1990 and 2014: global, regional, and subregional levels and trends. The Lancet, 388:258-267).

Tables/Figures

32) Overall comment for all tables/figures: all acronyms should be spelled out in the comments for both tables and figures. If someone only saw the tables and abstract, they wouldn't be able to understand the tables/figures.

Author’s reply: all tables and figures were revised

33) All figures are titled as "Figure 1". This seems to be a formatting error.

Author’s reply: This error occurred because we were using the caption function of the Word software. All figure titles were corrected.
34) In Table 4, the term "literate" should probably replace the term "literacy", given that the metric is yes/no.

Author’s reply: Corrected in the manuscript.

35) Figures 2 and 3 have no y-axis title.

Author’s reply: This error occurred when the manuscript and the figures were combined in a PDF by the Journal system. If you download the figure in the PDF, they are correct (with the y-axis title).

36) Figure 4 has the acronym "mFPC". Is this meant to be mDFPS?

Author’s reply: Yes, the figure was corrected.

Reviewer #2

Summary and overall impression of submitted manuscript:

This original article by Ewerling et al. describes the demand for family planning satisfied with modern methods in low- and middle-income countries. The authors highlight that coverage for family planning varies by country and many subgroups represented have coverage below 20%. These findings will help guide future interventions and programs geared towards increasing the demand for family planning satisfied with modern methods in low- and middle-income countries. Overall, the manuscript would benefit from significant revisions to improve the clarity and representation of the manuscript's findings. Below are suggested revisions to address major and minor weaknesses to the article.

Reviewer Comments:

Tables and Figures:

1) The authors include a large amount of data in the tables and figures to present their findings, yet some of this data gets lost in the manuscript text. The authors may want to reduce the number of tables and figures to only include relevant data for this manuscript.

Authors’ reply: Tables and figures were revised and figures 2 and 3 were excluded.
2) The authors should review the manuscript text and make sure the text accurately identifies the tables or figures in which the data is discussed. It was very challenging to know which table or figure was referred to in the manuscript text as many of the references in the text were for a different table or figure.

Authors’ reply: The text was revised accordingly.

3) Tables should be included at the end of the manuscript after the references or as a separate file.

Author’s reply: Tables were replaced at the end of the manuscript.

4) The authors may want to remove Table 1 from the manuscript text and include it as only a supplemental methods table.

Authors’ reply: Table 1 was removed from the main manuscript and included in the Web appendix.

5) Table 4 would be easier for the reader to digest if it only included the "Countries with mDFPS below 20% at national level".

Authors’ reply: We believe it is important to also present the MDFPS coverage for the subgroups below 20% for the readers that are interested in this information. However, we agree that including the table as it is in the manuscript can be confusing. Thus, table 4 was moved to the Web appendix and the table from Figure 4 was included in the manuscript.

6) The "subgroups with mDFPS below 20%" data in Table 4 needs to be organized in a different way as the age, wealth, literacy, education, area, union, and religion data gets lost in the table as currently represented. It may be useful to have this data organized similar to the table shown in Figure 4. It may be helpful to remove the table from Figure 4 and only have the map included in Figure 4 since this is what the figure footnote includes. The table from Figure 4 can then become its own table including the subgroups country data from Table 4.

Authors’ reply: Table 4 was moved to the Web appendix and was replaced in the manuscript by the table that was presented with Figure 4. Figure 4 now only presents the map as it was suggested by the reviewer.
7) Is the data from the supplemental table with 95% CI referenced in the manuscript? If no, then the supplemental table can be removed from the manuscript submission.

Authors’ reply: The table was removed from the manuscript.

8) The figure legends need to be updated to represent the correct figure number, as is all the figures are labelled as "Figure 1".

Author’s reply: This error occurred because we were using the caption function of the Word software. All figure titles were corrected.

9) Please add axis labels to clearly illustrate the data presented in the figures.

Author’s reply: This error occurred when the manuscript and the figures were combined in a PDF by the Journal system. If you download the figure in the PDF, they are correct (with the y-axis title).

10) The authors may want to consider only including Figures 1 and 4 in the manuscript. As they are currently displayed, Figures 2 and 3 do not add to the manuscript.

Authors’ reply: Figures 2 and 3 were excluded from the manuscript.

Introduction section:

11) Lines 73-75: This sentence needs rewritten for clarity.

Authors’ reply: The sentence was revised to be clearer.

12) Lines 71-83: These 2 paragraphs can be combined into 1 paragraph. In particular, Lines 76-83 can be re-written to briefly highlight and summarize the potential factors associated with disparities in DFPS.

Authors’ reply: The paragraphs were combined and revised.
Methods section:

13) Lines 96-97: Suggestion to remove Table 1 and include it as a supplemental methods table.
Authors’ reply: Table 1 was moved to the Web appendix.

14) Lines 97-98: Since Table 2 includes results in addition to the 77 surveys included, Table 2 should be introduced in the results section, not in the methods section.
Authors’ reply: We agree with the reviewer and the text was revised to only introduce Table 2 in the results section.

15) Lines 96-98: Suggested rewrite: "We identified 95 surveys, from which we excluded 18 that only contained information for women who were married or in a union, leaving 77 surveys used in our analyses."
Authors’ reply: The sentence was revised accordingly.

16) Lines 124-125: Rewrite for clarity to match the wording used in the Table 3 footnotes:
"Reliance on modern methods (% modern) was calculated as the ratio between the mDFPS and the DFPS."
Authors’ reply: The definition of the % modern was revised to match the wording used in the footnote.

17) Lines 126-128: The inclusion of reliance on modern methods versus GDP per capita does not add to the manuscript. The authors may want to remove this analysis and Figure 2 from the manuscript.
Authors’ reply: Figures 2 and 3 were excluded from the manuscript.

18) Lines 129-131: These sentences should be included in the previous paragraph in starting in Line 126.
Authors’ reply: The paragraph was revised.
19) Lines 132: This sentence needs rewritten; in particular, the term "women who are being left behind" is confusing.

Authors’ reply: The sentence was revised.

20) Lines 133-134: The age categories chosen are not reflective of other age categories in the literature. It may be useful to use age categories that have been previously published in the literature, such as 15-24, 25-34, and 35-49 (see Lakew et al. Reproductive Health, 2013, 10:52). If using age ranges not used previously in the literature, authors should explain why these age ranges were chosen.

Authors’ reply: Authors’ reply: The logic of the grouping was not risk, but social vulnerability. There is a fair bit of interest in adolescents’ health currently and our approach was aimed at highlighting how they fare in terms of family planning compared to adult women.

Results section:

21) Lines 146-150: These sentences need re-written to better summarize the findings in Table 2.

Authors’ reply: The paragraph was revised.

22) Lines 152-158: Do these sentences refer to the "% modern" which is the 3rd column in Table 2, not the last column? If yes, then these sentences belong in the first paragraph of the results section.

Authors’ reply: The manuscript was modified accordingly.

23) Lines 155-156: The explanation that women in these countries rely on traditional contraception belongs in the discussion section of the manuscript. This sentence should only present the results of the analysis. Please rewrite.

Authors’ reply: Text was revised.

24) Lines 157-167: The data described in these lines is shown in Table 3 yet there is no mention of Table 3 in the text. Please reference Table 3 in these sentences to direct the reader to the correct table.
Authors’ reply: Text was revised.

25) Lines 174-181: Since the data based on GDP and fertility rates does not add significantly to the manuscript, the authors may want to consider removing these sentences and Figures 2 and 3 from the manuscript. If the authors decide to keep the GDP and fertility rate data, then they need to show a better representation of the data. Figures 2 and 3 are too busy and each country is not easily identified. If the authors want to keep this data, then it may be better to illustrate the data by region (as in Table 2) versus all surveys.

Authors’ reply: Figures 2 and 3 were excluded.

26) Lines 182-184: The authors reference Table 3, yet Table 2 shows the mean mDFPS data for women in a union versus those not in a union. These sentences belong in the first paragraph with the other Table 2 data. This data is not in Table 3.

Authors’ reply: Text was revised.

27) Lines 190-198: This paragraph refers to data presented in Figure 4, not Figure 3, and in Table 4. Please see my comments above regarding splitting Table 4 into two tables and removing the table from Figure 4.

Authors’ reply: Text was revised.

Discussion section:

28) The discussion section needs re-organized to highlight and discuss the main findings in an orderly manner.

Authors’ reply: The discussion session was re-organized in a clearer order.

29) The first paragraph needs to include a summary of the results and highlight key findings, such as including sentences from the following lines: 200-201, 216, 244-247, and 252-253.

Authors’ reply: The first paragraph was revised to include the summary of results.
30) Lines 202-205: These sentences do not belong in the first paragraph. They belong in paragraphs discussing religion or rural settings.

Authors’ reply: The sentence was moved to the paragraph discussing religion and area of residence.

31) Lines 206-215: This paragraph discusses the strengths of the manuscript and belongs near the end of the discussion section before the conclusion section. The authors need to also identify and comment on the limitations of the manuscript. These sentences can be included in the strengths paragraph.

Authors’ reply: The paragraph was moved and limitations were included.

32) Lines 226-234: The authors reference Figure 3, yet the data discussed in these lines is in Figure 4. Please correct this error.

Authors’ reply: The Figure number was corrected in the manuscript.

33) Line 232: Please reference where the results of this data analysis is shown (Figure or Table?).

Authors’ reply: Information was added to the manuscript.

34) Lines 238-239: This sentence is unclear and should be revised.

Authors’ reply: The sentence was revised to be clearer.

35) Lines 247-250: These sentences should be removed or added to another paragraph as lines 244-247 belong in the first paragraph of the discussion.

Authors’ reply: These sentences were replaced in another paragraph.

Conclusion section:

36) Lines 255-266: These sentences refer to the reliance on traditional methods and belong earlier in the discussion. They should not be part of the conclusion paragraph. The authors
conclusion paragraph should briefly summarize the take home message of the manuscript and include the sentences similar to Lines 267-271 or similar to Lines 48-58 in the plain English summary.

Authors’ reply: the conclusion was revised accordingly.