Author's response to reviews

Title: Internalized stigma among patients with schizophrenia in Ethiopia: a cross-sectional facility-based study

Authors:

Dereje Assefa (aolinkdereverich@gmail.com)
Teshome Shibre (shibreteshome@yahoo.com)
Laura Asher (laura.asher@yahoo.com)
Abebaw Fekadu (abe.wassie@kcl.ac.uk)

Version: 2 Date: 23 September 2012

Author's response to reviews: see over
Reviewer's report

Title: Internalised stigma among patients with schizophrenia in a low income country: a cross-sectional facility-based study

Version: 1 Date: 16 June 2012

Reviewer: David Roe

Reviewer's report:

Title
Please change the wording from "in a low income country to "in Ethiopia" since the study was held in Ethiopia only, and this country does not necessary represents all low incomes countries.

A: NOW CHANGED AS PER REVIEWER’S RECOMMENDATION

Abstract

Methods: Please do not use the original full name of the hospital participants were admitted at in order to protect their identity.

A: NOW CHANGED AS PER REVIEWER’S RECOMMENDATION

Results: Number of participants as well as their description should appear in the method section and not in the results section.

A: WE RESPECTFULLY DISAGREE. IN PROSPECTIVE STUDIES, THE BASELINE SAMPLE CHARACTERISTICS OF THE COHORT IS DESCRIBED IN THE METHODOLOGY. DESCRIPTION OF SAMPLE CHARACTERISTICS FOR REPORTS OF OUR KIND (CROSS-SECTIONAL STUDY) IS INCLUDED MOSTLY IN THE RESULTS SECTION. THIS IS ALSO THE CASE IN THE LATEST BMC PSYCHIATRY PUBLICATIONS.

EXAMPLES

Conclusion: Please use better words to describe your sample rather than "this group".

A: WE HAVE NOW MODIFIED ACCORDING TO THE REVIEWER’S RECOMMENDATION

The last sentence of the conclusion section in the abstract sounds a bit detached and unrelated to the former parts of the abstract (re Internalised stigma and adherence).
Please make sure to refer it in one of these sections: background, objective and/or results or rather omit it from the conclusion section of the abstract.

A: THANK YOU. WE HAVE MODIFIED THE CONCLUSION.

Key words
Please delete "sub-Saharan Africa" from the list.

A: WE HAVE DELETED.

Introduction
Page 4 paragraph 1: Please change the word "all" to "many".

A: NOW MODIFIED

Please provide update reference to support your claim in the first sentence of this paragraph.

A: WE AGREE: IT WOULD HAVE BEEN BETTER TO HAVE A RECENT REFERENCE. UNFORTUNATELY WE DO NOT HAVE ONE FOR THIS PARTICULAR STATEMENT. HOWEVER, WE BELIEVE THE FACTS HAVE NOT CHANGED MUCH.

Please change the word "sufferer" to an acceptable PC term such as "a person with severe mental illness".

A: NOW MODIFIED TO SAY “A PERSON WITH SCHIZOPHRENIA”

Page 4 paragraph 2: This paragraph should be united with the previous one.

A: WE HAVE ADDED A SENTENCE TO LINK THE TWO PARAGRAPHS. THANK YOU.

Page 4 paragraph 3: Please provide an appropriate reference to support your claim in the first sentence. Please describe/explain/give example(s) to "worse outcomes" in the second sentence (maybe better to describe as "negative outcomes"). The third sentence is not true. In the last years, the field of studying self-stigma has quite expanded. Please note that you are basing your statement on only one reference from 2007. Since then, a number of studies have been published. Below are some examples of more literature re self-stigma among persons with SMI: Lysaker, P.H., Roe, D., & Yanos, P. (2007). Toward Understanding the Insight Paradox: Internalized Stigma Moderates the Association Between Insight and Social Functioning, Hope and Self-Esteem Among People with Schizophrenia Spectrum Disorders. Schizophrenia Bulletin, 33(1), 192-199.


A: WE ARE GRATEFUL TO THE REVIEWER FOR THIS HELPFUL LIST OF REFERENCES. WE HAVE INCLUDED MANY OF THESE AS APPROPRIATE. BY DOING SO WE BELIEVE WE HAVE ALSO ADDRESSED ALL THE CONCERNS DESCRIBED ABOVE BY THE REVIEWER.

On line 5 (abstract 3, page 1) you are contradicting what you wrote on line 3. Please provide examples for research of self stigma on western/high income countries.

A: WE HAVE PROVIDED REFERENCES AS APPROPRIATE.

Also, it seems like author were confused between stigma and internalized stigma.

A: WE ARE NOT SURE WHY THIS IS BEING SAID. AT ANY RATE WE HAVE NOW ATTEMPTED TO CLARIFY ALL OUTSTANDING ISSUES.

Page 5 paragraph 2: Please provide example(s) to the essentiality of stigma assessment to recovery process in mental illness.

A: THE INTRODUCTION SECTION IS NOW EXPANDED AND WE HAVE PROVIDED SPECIFIC EXAMPLES OF FACTORS RELEVANT TO THE
RECOVERY PROCESS IN MORE DETAIL UNDER THE INTRODUCTION SECTION.

Objectives
Page 6 paragraph 1: Please delete the full name of the hospital research took place at. See previous comment in the abstract section.
A: DELETED

In the last sentence ("…to explore the potential impact of stigma on medication adherence and risk behaviour… the recovery process"), the authors mentioned for the first time terms that were not previously discussed in the introduction or literature review such as meds adherence, risk behavior and recovery. Please revise your introduction to include this variable as well.
A: REVISED AND KEY FACTS INCLUDED. (PLEASE REFER TO PAGE 4 PARAGRAPH 3).

Methodology
Study design and setting
Page 7: Please delete all identifies details about the setting/hospital the study took place at (see precious comments on this matter). Please delete last sentence. This paragraph includes information about setting only.

It does not include any information regards the study design. Please revise this section and add the missing information.
A: THE STUDY WAS CROSS-SECTIONAL IN DESIGN. PLEASE NOTE THAT THE FIRST SENTENCE STARTS BY DESCRIBING THE STUDY DESIGN.

Participants
Page 7: The current participants section is more appropriate to be used as a study design (see precious comment). In the participants section should appear demographic information and are anonymous description of participants.
A: WE RESPECTFULLY DISAGREE WITH THIS RECOMMENDATION. THE CONTENT OF THIS SECTION RIGHTLY FOCUSES ON THE PARTICIPANTS AND HOW THEY WERE SELECTED. DEMOGRAPHIC INFORMATION IN A CROSS-SECTIONAL STUDY IS NORMALLY PRESENTED UNDER RESULTS.
Assessment

Page 7: How was the translation process been done? Please provide the missing info. Factor analysis of the new translated scale is needed to appear in the text (or at least to be reported) to know whether the translated version has received same or different factors than the original.


Page 8: First sentence-a dot is missing: "resistance. The".

A: THANK YOU. NOW CORRECTION MADE.

Why didn’t the authors use a well known established scale to assess suicide tendency? We are not sure that simply asking patients in a hospital setting about their suicide attempts may yield a reliable answer. Therefore we are not sure how much this assessment is reliable.

A: THE PURPOSE OF OUR QUESTION WAS TO ESTABLISH WHETHER THE INTERVIEWEE HAD EVER ATTEMPTED SUICIDE. WE BELIEVE THE QUESTION WE HAVE ASKED IS ADEQUATE FOR THAT PURPOSE. THE COMPOSITE INTERNATIONAL DIAGNOSTIC INTERVIEW (CIDI) DEVELOPED BY THE WORLD HEALTH ORGANIZATION HAS JUST ONE QUESTION TO ASK ABOUT SUICIDE ATTEMPT: “E20. Did you attempt suicide?” IF THE INTEREST WAS TO GET DETAILED INFORMATION ABOUT THE NATURE OF THE SUICIDE ATTEMPT, THEN OUR QUESTION IS DEFINITELY NOT ADEQUATE. BUT THAT WAS NOT OUR INTEREST.

Results

The demographic data should appear in text or tables, but there is no need for this info to overlap both in tables and texts.

A: INEVITABLY THERE IS SOME OVERLAP BETWEEN WHAT IS SUMMARISED IN TABLE AND GIVEN IN THE TEXT, BUT WE BELIEVE WE HAVE ONLY MENTIONED THE ESSENTIAL SUMMARIRES IN THE TEXT TO ALLOW THE READER TO GRASP THE CONTENT MORE EASILY.

The comparison between the study data to the European data is not valid.

A: WE ACCEPT THAT THE COMPARISON HAS LIMITATIONS AND WE HAVE NOW HIGHLIGHTED THE LIMITATION OF SUCH A COMPARISON. BUT WE DO NOT THINK IT IS JUSTIFIED TO DISMISS THE COMPARISON AS INVALID.
Discussion

Page 13 first paragraph: There is no need to present percentages. Please summarize very briefly all your major and significant results.
A: THANK YOU. NOW MODIFIED AS APPROPRIATE.

Page 13 first paragraph: Please provide references to support your statement on the pioneering of this study in Ethiopia and Africa.
A: THIS HAS BEEN DEALT WITH IN THE INTRODUCTION (3rd PARAGRAPH).

Page 13-14-comparison to European data: The authors should be very cautious with their comparisons to the European data.
A: WE HAVE EXPRESSED THE LIMITATION OF THIS COMPARISION AS MENTIONED ABOVE.

Page 14 last paragraph: Recovery is not identical to meds adherence. The authors should use the "meds adherence" and its relation to self stigma and not recovery.
A: WE AGREE THAT MEDICATION RECOVERY IS NOT THE SAME AS MEDICATION ADHERENCE. OUR ARGUMENT HERE IS THAT IN SEVERE MENTAL DISORDERS LIKE SCHIZOPHRENIA, USE OF PSYCHOTROPIC MEDICATIONS IS A KEY FACTOR PROSPECTIVELY ASSOCIATED WITH FAVOURABLE CLINICAL OUTCOME (E.G., ALEM ET AL. 2009; FEKADU ET AL 2006) AND EVEN REDUCED MORTALITY (TEFERRA ET AL 2012).

Page 15 first paragraph: Please do not mix between self stigma (or family stigma) of person with schizophrenia/smi to self stigma of the person with the illness. Since authors did not refer to family self stigma in their intro, they can chose to refer it in the conclusion but further elaborate on this issue.
A: WE HAD MENTIONED PERCEIVED STIGMA AMONG FAMILY MEMBERS IN THE BACKGROUND OF THE INITIAL VERSION OF OUR PAPER. WE HAVE NOW ELABORATED ON THIS FURTHER. BUT THE REFERENCE TO FAMILY STIGMA IS ONLY TO HIGHLIGHT THE FACT THAT THERE HAVE NOT BEEN STUDIES OF INTERNALIZED STIGMA IN ETHIOPIA.

The same goes for psychotic symptoms-authors did not assessed it or discussed it before so they should first add the missing information and only then discuss it in more details in the discussion section.
A: DETAILS ON THE ASSOCIATION OF PSYCHOTIC SYMPTOMS WITH STIGMA HAS BEEN PROVIDED IN THE RESULTS SECTION AND TABLE 3.

Conclusions
The last sentence "Particular attention should be paid to the potential for self-stigma
A: THIS CONCLUSION IS DERIVED FROM WHAT WE KNOW ABOUT INTERNALIZED STIGMA IN GENERAL AND FROM OUR OWN RESULTS. AMONG THOSE WHO DISCONTINUED THEIR MEDICATION, STIGMA WAS INDEPENDENTLY ASSOCIATED WITH MEDICATION NON-ADHERENCE (SHOWN UNDER “Association of socio-demographic and clinical factors with stigma”, 2ND PARAGRAPH).

Level of interest: An article of insufficient interest to warrant publication in a scientific/medical journal

Quality of written English: Needs some language corrections before being published

A: THE ENGLISH HAS NOW BEEN EDITED BY A NATIVE ENGLISH SPEAKER

Statistical review: Yes, and I have assessed the statistics in my report.

A: WE CONFIRM THAT WE HAVE ALSO SOUGHT STATISTICAL ADVICE.

Declaration of competing interests:

I declare that I have no competing interests
Reviewer's report
Title: Internalised stigma among patients with schizophrenia in a low income country: a cross-sectional facility-based study

Version: 1 Date: 19 June 2012
Reviewer: ilanit Hasson-Ohayon

Reviewer's report:
Dear Prof Lysaker,
Thank you for sending me the paper entitled “Internalised stigma among patients with schizophrenia in a low income country: a cross-sectional facility-based study” to review. In this paper, the authors use data collected from 212 persons with schizophrenia to study the extent and correlates of internalized stigma. The paper deals with an important and interesting issue that has clinical implications. However, the paper needs further substantial work in order to improve its clarity and its contribution to the field. In addition, the statistics that was applied is not clear and it's difficult to follow up the logic and rationale for conducting the various analyses. Below are few comments that I suggest to address:

Major revisions:
1. The paper needs editing to improve the English. Many sentences are not clear (for example: first sentence in abstract – the word ‘its’ seems to be missing between despite and potential) and the text is hard to follow. In addition, the word internalized is written with s instead of z.
A: WE HAVE MODIFIED AS PER THE RECOMMENDATION. BUT WE DO NOT SEE ANY PROBLEM WITH THE FIRST SENTENCE. “S” (UK ENGLISH STYLE) AND “Z” (US ENGLISH STYLE) CAN BE USED INTERCHANGEABLY DEPENDING ON THE JOURNAL’S PREFERENCE.
2. The statistics that was applied is not clear and it’s difficult to follow up the logic and rationale for conducting the various analyses.
A: WE ARE NOT CLEAR WHICH ASPECTS OF THE STATISTICAL ANALYSES ARE BEING REFERRED TO HERE. BUT WE HAVE ATTEMPTED TO SIMPLY THE PRESENTATION. WE WOULD LIKE TO MENTION THAT WE HAVE USED STANDARD DESCRIPTIVE AND ANALYTICAL METHODS. FOR THE MULTIPLE REGRESSION MODEL, WE USED THE MEAN SCORE AS A CUT OFF: THOSE SCORING ABOVE THE MEAN WERE CONSIDERED TO HAVE MODERATE TO HIGH STIGMA CORE.
3. There seems to be confusion between public stigma and personal/internalized stigma and focus of the study on internalized stigma might be better placed in the introduction and objectives sections.
A: WE ARE NOT CLEAR WHERE THIS APPARENT CONFUSION IS OBSERVED. AGAIN WE HAVE ATTEMPTED TO CLARIFY THIS WHERE WE THOUGHT THERE MIGHT HAVE BEEN SUCH CONFUSION. FOR EXAMPLE IN THE INTRODUCTION. ALTHOUGH WE MAKE REFERENCE TO PUBLIC STIGMA, WE HAVE ENDEAVOURED TO FOCUS ON INTERNALIZED STIGMA.
4. The assessment of the relationship between self stigma and adherence is limited when this association is asked directly with a simple question. This limitation should be addressed and accordingly conclusions might be spelled out more
cautiously.

**A: THIS IS AN IMPORTANT LIMITATION. WE HAVE NOW ADDED THIS AS A LIMITATION UNDER THE LIMITATIONS SECTION.**

Minor revisions:

1. First page of the introduction, last paragraph is not clear: to what other groups the authors refer to? Also – it would be beneficial to elaborate regarding the results of the studies that are reviewed.

   **A: WE HAVE NOW REMOVED THIS SENTENCE BECAUSE OF ITS LIMITED IMPORTANCE FOR THE PAPER AS A WHOLE.**

2. In the objectives section the statement “…explore the potential impact…” might be misleading since the study is cross-sectional.

   **A: THE CROSS-SECTIONAL NATURE OF THE STUDY IS HIGHLIGHTED AS AN IMPORTANT LIMITATION**

3. In method, exclusion criteria are mentioned. However, it is not clear how these criteria were assessed.

   **A: WE HAVE NOW INCLUDED A SENTENCE UNDER METHODOLOGY (FIRST PARAGRAPH UNDER PARTICIPANTS) TO CLARIFY THIS.**

3. Please provide alphas for all subscales of the ISMI.

   **A: AUTHORS ARE NOT CLEAR WHAT IS BEING REQUESTED HERE.**

4. In the results section referring to tables is missing. Also, the first sentences repeat the method.

   **A: AS FAR WE ARE ABLE TO ASCERTAIN ALL TABLES ARE REFERRED TO IN THE TEXT. THE FIRST SENTENCE OF THE RESULTS ALSO DOES NOT REPEAT THE METHODS.**

5. In results: what does it mean that most participants had indications of severe mental illness?

   **A: WE REFER TO SEVERE ILLNESS NOT SEVERE MENTAL ILLNESS. THE REASON FOR SAYING IS ALSO EXPLICIT WITHIN THE SAME SENTENCE.**

6. Last page of results: the sentence “….most important factor…” is an over statement since no other factors were examined in this study. In the same page the sentence “not shown in table 4” is not clear – wither show in table or delete this sentence.

   **A: WE HAVE EXPLORED OTHER CLINICAL (SYMPTOM LEVEL, EXTRAPYRAMIDAL SIDE EFFECTS) AND DEMOGRAPHIC FACTORS (EDUCATIONAL STATUS, RESIDENCE, EMPLOYMENT, AGE AND SEX) AS DESCRIBED IN TEXT. WE HAVE NOW DELETED THIS SENTENCE. THE MAIN REASON FOR EXCLUDING THIS IN THE TABLE WAS TO SAVE PUBLICATION SPACE. Also in results – it is not clear how the side effects were assessed.**

   **A: THIS WAS ASSESSED CLINICALLY AND IS NOW INCLUDED UNDER METHODOLOGY, LAST SENTENCE OF “ASSESSMENT” SUBSECTION.**

7. In the discussion the authors refer to the relationship between self stigma and level of education. Discussing literature on this issue might be beneficial.

   **A: WE HAVE NOW MADE THIS EXPLICIT BY MODIFYING THE SENTENCE.**

8. Second page of discussion, first paragraph, last sentence – what is meant by “the nature of stigma also….”.

   **A: WE HAVE NOW MADE THIS EXPLICIT BY MODIFYING THE SENTENCE.**
Please provide rationale for excluding people with impaired insight.

A: This exclusion is due to fear that these patients may lack capacity to give consent to participate in the study. Assessing capacity would not have been feasible.

Level of interest: An article of importance in its field
Quality of written English: Not suitable for publication unless extensively edited
Statistical review: Yes, but I do not feel adequately qualified to assess the statistics.
Declaration of competing interests:
i declare that i have no competing interests.
Reviewer's report

Title: Internalised stigma among patients with schizophrenia in a low income country: a cross-sectional facility-based study

Version: 1 Date: 19 June 2012
Reviewer: Philip T Yanos

Reviewer's report:

This manuscript makes a valuable contribution to the literature on internalized stigma in non-Western countries by reporting on the experience of internalized stigma among individuals in Ethiopia. Nevertheless, the manuscript has several problems, which, if addressed, would strengthen the manuscript. Below are some ways that the manuscript could be improved by section.

Introduction

General: intro could be improved to be a bit clearer and more complete, to enhance the authors’ argument for why this research is important.
Description of what internalized/self-stigma is could be explained better.
It is true that cross-cultural research on topics like self-stigma (particularly given the role of society/cultural beliefs in this construct), but it would be helpful to include some more detail on the importance of investigating something like stigma/self-stigma of mental illness in low-income as compared to high-income countries (e.g., theory on experience of mental illness across these cultures/countries—they touch on this in the discussion). Including this type of information will enhance the reader’s understanding of the importance of conducting this type of cross-cultural research.

A: WE HAVE NOW PROVIDED MORE DETAIL EXPLAINING WHAT INTERNALIZED STIGMA IS AND HOW CULTURE MAY BE RELEVANT

• Probably the biggest gap in the intro is that it doesn’t mention substantial research on self-stigma of mental illness (e.g., studies looking at its relationship with self-esteem, treatment compliance, hopelessness, using cross-sectional, longitudinal, & meta-analysis methods)

A: THANK YOU. WE HAVE NOW EXPANDED ON THE IMPACT OF SELF-STIGMA ON RECOVERY.

Methods

Why did the researchers decide to just collect data from individuals with diagnoses of schizophrenia? Why did they exclude individuals with substance use disorders? There is a vague comment about this exclusion being “necessary to achieve the objectives of the study” in the discussion, but this explanation doesn’t really make sense.

A: OUR INTEREST WAS TO HAVE A MORE HOMOGENEOUS SAMPLE
AND THAT WAS THE MAIN REASON FOR FOCUSING ON SCHIZOPHRENIA. ADDITIONALLY WE EXCLUDED SUBSTANCE ABUSE TO ENHANCE HOMOGENEITY AND BECAUSE OF CONCERNS THAT SUBSTANCE ABUSE MAY INTRODUCE ADDITIONAL STIGMA EXPERIENCE. BUT WE AGREE THIS DOES LIMIT GENERALIZABILITY. THIS IS INCLUDED AS A LIMITATION (PAGE 18).

- Did participants complete the ISMI on their own, or was the questionnaire administered to them verbally?
  A: THE ISMI WAS OBSERVER-RATED (COMPLETED BY SENIOR PSYCHIATRIC RESIDENTS). WE HOPE THIS IS NOW MORE EXPlicit.

Results

- Authors report percentage of participants who discontinued treatment due to stigma—how did they assess this? They only mention this variable in the methods—seems necessary to know how this question was asked (e.g. “Did stigma impact your decisions to stop taking meds? Versus open-ended “What led you to decide to stop taking meds”). Later in the results, they also say they controlled for other demographic variables when investigating participants’ decision to discontinue medication—again, need to be clear about these analyses (it seems in the methods that they only asked about whether stigma specifically led participants to discontinue, in which case this analysis doesn’t really get at whether or not other reasons contributed to participants’ decision to discontinue meds)
  A: WE HAVE NOW INCLUDED THE QUESTIONS THAT WERE ASKED REGARDING TREATMENT ADHERENCE AND SUICIDE ATTEMPT (PAGE 9). ALTHOUGH WE HAVE ASKED SIMPLE QUESTIONS ABOUT SUICIDE ATTEMPT, THIS KIND OF SIMPLE QUESTION IS USED IN WELL KNOWN INSTRUMENTS, FOR EXAMPLE THE WHO INSTRUMENT, THE CIDI. PLEASE NOTE THAT, AS WE EXPLAIN IN RESPONSE TO REVIEWER 1, OUR INTEREST WAS NOT IN GETTING DETAILS ABOUT THE SUICIDE ATTEMPT BUT TO ESTABLISH WHETHER THE PERSON HAS OR HAS NOT ATTEMPTED SUICIDE.

Authors should report reliability statistics for ISMI—particularly given that this study translated it into a new language and used it in a new population.
WE HAVE PROVIDED KAPPA STATISTICS FOR INTER-RATER RELIABILITY (PAGE 10)

Rephrase the sentences about the trend for relationship between education and self-stigma (p.11)
A: WE HAVE MODIFIED THE SENTENCE. WE HOPE THAT THIS IS NOW CLEARER.

The authors should more clearly identify what “the three factors” are on p.11
A: THANK YOU. WE HAVE DONE SO NOW.

Based on parts of the results, it seems that the authors divided participants into age groups. However, they do not say how/why they divided participants in this way.
A: IT IS COMMON IN DESCRIPTIVE STUDIES TO GROUP CONTINUOUS VARIABLES SUCH AS AGE INTO CATEGORIES. IN OUR CASE WE DIVIDED AGE INTO 10-YEAR INTERVALS TO EXPLORE IF SPECIFIC AGE GROUPS WERE PREDOMINANTLY AFFECTED. THE GROUPING WAS INEVITABLY GUIDED BY THE NUMBER OF PARTICIPANTS AVAILABLE IN EACH AGE GROUP TO ALLOW MEANINGFUL ANALYSIS.

For the “Exploratory analyses of individual stigma items”—did the authors do any correction for multiple comparisons in the significant findings that they report?
A: WE HAVE DELETED THIS SECTION BECAUSE IT IS PRIMARILY EXPLORATORY AND NOT RELATED TO OUR PRIMARY OBJECTIVES AND HYPOTHESIS.

They report factor loadings, which are a bit different from past reports of the factors (although they don’t directly compare with past factor analyses). The authors should report more information about their factor analysis; their approach is only briefly mentioned in previous analyses section. I’m a bit confused, did they do exploratory factor analysis—if so, why did they decide to do this over confirmatory (given existing research on the ISMI)? They should also report fit statistics in the results. Also, did the authors use their own factors, or the factors identified in past research, in their previous analyses? In terms of organization, this section on factor analysis should be included before other results sections that use the measure (e.g., relating it to demographics and other variables).

A: WE HAVE USED EXPLORATORY FACTOR ANALYSIS. WE CHOSE THIS OVER CONFIRMATORY FACTOR ANALYSIS BECAUSE THERE HAVE NOT BEEN PREVIOUS STUDIES THAT USED ISMI IN ETHIOPIA. THE NAMES FOR THE FACTOR LOADINGS WERE BASED ON PREVIOUS WORK BECAUSE THE LOADINGS WERE IN LINE WITH PREVIOUS WORK DESPITE SOME DIFFERENCES.

Similarly, should report on reliability of ISMI before other sections in the results.
A: WE HAVE REPORTED ON INTER-RATER RELIABILITY

Discussion
The authors say that this study is “the second addressing the issue of stigma among patients with schizophrenia”—didn’t they say that the previous study in Ethiopia was with family members of people with schizophrenia, not people with schizophrenia themselves? I have not read the article that they reference, but based on its title it appears they authors should better describe the study in their introduction (or, if correctly described in the intro, they should make this comment in the discussion consistent with it).

A: WE HAVE DESCRIBED THE STUDY IN THE INTRODUCTION IN MORE DETAIL.

Not sure it’s appropriate to say that the proportion of participants with high levels of self-stigma is higher in this study (p.13)—the percentages are fairly close,
and they didn’t do a significance test

**A: WE HAVE NOW CORRECTED THIS**

Are there other explanations in the literature for findings on outcome differences in low versus high-income countries for people with SMI?

**A: FAMILY LIFE, SOCIAL ROLES, WORKING SITUATIONS, CAUSAL ATTRIBUTIONS OF MENTAL ILLNESS HAVE BEEN HYPOTHESIZED EXPLANATIONS FOR THE DIFFERENCE. BUT WE BELIEVE ELABORATE DISCUSSIONS ABOUT THIS IS BEYOND THE SCOPE OF THE PAPER.**

Authors discuss why it’s important to look at treatment adherence (e.g. most important predictor of positive outcome in other studies)—this could be included in the intro. Similar with their citation of studies on relationship between self-stigma and negative outcomes (p. 15)

Since they mention it a few times, the authors should also cite research on the relationship between self-stigma and help-seeking attitudes/behaviors

**A: WE HAVE NOW ADDED REFERENCES ABOUT THIS.**

A significant limitation of the study is that many of the variables included were assessed in a very unreliable way (e.g., "prominent psychotic symptoms" was measured through informal observation, suicid attempts through self-report, and contribution of stigma to non-adherence through self-report). The study is still valuable despite these limitations, but the authors need to be more open about this as a limitation in the discussion section.

**A: WE HAVE INCLUDED THESE AS LIMITATIONS, UNDER THE LIMITATIONS SECTION**

**Level of interest:** An article whose findings are important to those with closely related research interests

**Quality of written English:** Needs some language corrections before being published

**A: AS WE HAVE INDICATED IN RESPONSE TO REFEREE 1, THE ENGLISH IS NOW EDITED BY NATIVE ENGLISH SPEAKER**

**Statistical review:** Yes, but I do not feel adequately qualified to assess the statistics.

**A: AS WE HAVE ALSO INDICATED IN RESPONSE TO REFEREE 1, WE HAVE OBTAINED STATISTICAL ADVICE.**

**Declaration of competing interests:**

I declare that I have not competing interests.
Reviewer's report

Title: Internalised stigma among patients with schizophrenia in a low income country: a cross-sectional facility-based study

Version: 1 Date: 26 June 2012
Reviewer: Megan Grant

Reviewer's report:
The authors present the results of their analysis of internalized stigma within a population of individuals with schizophrenia, noting that there is currently a lack of such research that has addressed this matter in Ethiopia. The article is well organized, with the purpose and rationale for the study clearly stated. Relevant research is discussed in a manner that explains this rationale. The authors discuss the implications for their findings as well as some of the limitations of their work.

The following comments are offered in the interest of further increasing the quality of this article:

Major Compulsory Revisions
1 It seems necessary to further detail a number of aspects of the methodology that was employed for this study. Further information is needed with regard to the inclusion criteria used to select participants. Under the “Participants” heading of the Methodology, for example, it is unclear what exactly constitutes a “significant level of substance abuse.” Furthermore, it is mentioned in the Discussion section that “patients with significant cognitive impairment, substance dependence, and impaired insight,” were excluded, though there is no information provided on how these determinations were made. It seems essential to note whether these factors were evaluated using relatively objective measures/criteria or through more subjective means. This information not only allows for the evaluation of claims made given the results of this study, but would also be an important consideration in replicating the work done here by the authors.

A: THIS IS AN IMPORTANT POINT. THE ASSESSMENT OF THESE FACTORS WAS BASED ON CLINICAL ASSESSMENT AND IS THEREFORE SUBJECTIVE ASSESSMENT. THIS IS INCLUDED AS A LIMITATION BOTH IN TERMS OF GENERALIZABILITY OF THE STUDY AND METHODOLOGICAL RIGOR. BUT THE ASSESSMENTS WERE MADE BY SENIOR PSYCHIATRIC RESIDENTS WITH EXTENSIVE EXPERIENCE IN THE ASSESSMENT OF THESE DOMAINS.

2 Similarly, it would be beneficial to detail the procedure that was used for asking participants the questions about medication adherence and suicide attempts, and perhaps the associated rationale for using this procedure. It was unclear whether the researchers had used a standardized questioning format for addressing whether stigma was a contributing factor to medication non-adherence, for example. The manner in which this question was asked, as well as whether the issue was discussed beyond simple questioning with each participant, seems relevant in this case. Were participants required to give yes/no responses to a direct question about stigma, for example, or did the researcher explain and/or discuss the issue of stigma before the participant gave a response that was later dichotomized into yes/no categories? This information seems necessary when evaluating whether response style could have influenced the observed results, and again, is important when
considering replication of the procedure.

A: AGAIN THE QUESTIONS WERE PHRASED IN TERMS OF SIMPLE “YES/NO” CATEGORIES. FOR EXAMPLE FOR SUICIDE WE ASKED: “have you ever felt so desperate that you even attempted to harm yourself or end your life?”. WE WERE NOT INTERESTED IN EXPLORING THE DETAILS OF THE ATTEMPT PER SE. BUT THIS IS THE STYLE USED EVEN IN STRUCTURED INSTRUMENTS SUCH AS THE COMPOSITE INTERNATIONAL DIAGNOSTIC INTERVIEW (WHO 1997). SIMILARLY WE ASKED IF RESPONDENT EVER DISCONTINUED THEIR MEDICATION AND THEN WHETHER EXPERIENCE OF STIGMA CONTRIBUTED TO THEIR DECISION TO DISCONTINUE. ALTHOUGH WE BELIEVE THAT THE FINDINGS ARE INFORMATIVE AND RELEVANT, ARE ALSO LIMITED BY THE NATURE OF THE QUESTIONS. WE HAVE THEREFORE ADDED THESE AS LIMITATIONS.

Minor Essential Revisions
1. There is a slight grammatical error in the second sentence in the “Results” section of the Abstract. This sentence could either read “46.7% had a moderate to high mean stigma score,” or “had moderate to high stigma scores.”
A: THANK YOU. CORRECTION MADE.
2. There is a period missing at the end of the second sentence under the “Assessment” heading in the Methodology section.
A: THANK YOU. CORRECTION MADE.
3. It seems that the section of the Discussion on the top portion of page 15 could benefit from a review with a focus on sentence structure and quality. There are a number of instances where the word “this” is used without a clear sense of what it is referencing. Some of the sentences (e.g., “This may have an impact on help seeking, families attempting to hide the patient away.”) require revising to clarify their meaning and connection to the ideas being presented.
A: WE HAVE MADE CORRECTIONS.

Discretionary Revisions
1. At the authors’ discretion, there are a few sections that could benefit from added detail and further explanation. One such instance is in the Discussion section at the top of page 14. It is not entirely clear what the authors meant when they said “having characteristics attributable to a European culture.” While this statement is likely related to the points discussed earlier in this particular paragraph (i.e., income, education level, etc.), the author’s may wish to consider their word choice in this sentence and perhaps consider identifying the characteristics they are referring to directly.
A: PARAGRAPH NOW MODIFIED AS PER THE SUGGESTIONS OF REVIEWER
2. The paragraph of the discussion on page 15 (before the “Limitations” section) presents a great number of ideas and references to relevant literature. While the reader is aware that these ideas are related to the results and to the implications noted by the authors, the statements seem limited by their brevity and somewhat disjoint presentation. It would be beneficial to expand on these ideas to further highlight the connections between previous research, the current findings, and implications for future work, as well as to increase the sense of logical flow between
these ideas.

A: THANK YOU THIS PARAGRAPH HAS NOW BEEN MODIFIED.

**Level of interest:** An article whose findings are important to those with closely related research interests

**Quality of written English:** Needs some language corrections before being published

**Statistical review:** No, the manuscript does not need to be seen by a statistician.

**Declaration of competing interests:**
I declare that I have no competing interests
Reviewer's report
Title: Internalised stigma among patients with schizophrenia in a low income country: a cross-sectional facility-based study

Version: 1 Date: 27 June 2012
Reviewer: Jamie Ringer

Reviewer's report:
This paper by Assefa et al, regarding the prevalence of internalized stigma in Ethiopia is a timely, scholarly and relevant one. It will aid in understanding of internalized stigma, potentially help support education about stigma, and could serve as a baseline measure of internalized stigma prior to anti-stigma campaigns the authors propose will be initialized in the area. Internalized stigma is related to recovery, quality of life, and treatment adherence and is clearly relevant for identifying impediments to recovery from schizophrenia.

The revision of the ISMI into Amharic seems to have been done thoughtfully and cautiously. The comparison offered between this study and the Brohan study of a European population is interesting and provides a thoughtful comparison group.

Minor Essential Revisions:
Despite the many strengths of the study, there were some areas where clarification is needed. When describing the exclusionary criteria, the authors said that “individuals with a significant level of cognitive impairment…” were excluded, however they did not explain how cognitive functioning was determined. Additionally, they excluded patients with “impaired insight”. No mention is made of what criteria were used to exclude these persons.

A: THE ASSESSMENT OF COGNITIVE IMPAIRMENT AND INSIGHT WAS BASED PRIMARILY ON A CLINICAL INTERVIEW BY SENIOR PSYCHIATRIC RESIDENTS AND WE HAVE NOW MADE THIS EXPLICIT IN THE PAPER.

The discussion section explains that the participants in the study have socio-economic variables that are more similar to patients from Europe than patients from low-income countries. Despite this finding, the researchers use the results in both the discussion and conclusion sections to make claims about stigma in low-income countries. Perhaps some clarification can be made regarding the specific participants in the study and how this group might compare to the population as a whole in terms of income, education, etc.

A: WE HAVE NOW MADE REFERENCE TO THE GENERAL POPULATION’S BACKGROUND, SPECIFICALLY EDUCATION AND URBANICITY.

Finally, in the conclusion section, the authors recommend that there is a need to incorporate culturally appropriate methods of addressing internalized stigma into rehabilitation treatment…do the authors have any suggested methods for doing so?

A: WE AGREE THAT THIS IS AN IMPORTANT POINT. HOWEVER, DEVELOPING SUCH AN INTERVENTION REQUIRES SUBSTANTIAL FORMATIVE WORK TO
UNDERSTAND THE EFFECTIVE COMPONENTS OF THE INTERVENTION.

**Level of interest:** An article whose findings are important to those with closely related research interests

**Quality of written English:** Acceptable

**Statistical review:** No, the manuscript does not need to be seen by a statistician.

**Declaration of competing interests:**
I declare that I have no competing interests