Author's response to reviews

Title: Seroepidemiology of Toxoplasma gondii infection in pregnant women in a public hospital in northern Mexico

Authors:

Cosme Alvarado-Esquivel (alvaradocosme@yahoo.com)
Antonio Sifuentes-Alvarez (siful55@hotmail.com)
Sergio Narro-Duarte (alvaradocosme@yahoo.com)
Sergio Estrada-Martinez (sem@mexico.com)
Juan Humberto Diaz-Garcia (tepehuan@dgo.magared.net.mx)
Oliver Liesenfeld (oliver.liesenfeld@charite.de)
Sergio Arturo Martinez-Garcia (sergiomicro@att.net.mx)
Arturo Canales-Molina (alvaradocosme@yahoo.com)

Version: 2 Date: 30 June 2006

Author's response to reviews:


Re. MS: 1985399275102379 "Seroepidemiology of Toxoplasma gondii infection in pregnant women in a public hospital in northern Mexico"

Dear Editor,

Attached please find a revised version of our manuscript that had been modified according to the reviewers' comments. In addition, please find below our response to each of the reviewers' comments on a point-by-point basis.

We hope the new version of the manuscript may have more success for publication in BMC Infectious Diseases.

Kind regards,

Dr. Cosme Alvarado Esquivel.
Facultad de Medicina
Avenida Universidad y Fanny Anitua
34000 Durango, Dgo. Mexico.
Tel.: 0052 618 8 128009
Fax: 0052 618 8 130527
Email: alvaradocosme@yahoo.com

RESPONSE TO THE REVIEWER'S COMMENTS

Reviewer: Eskild Petersen

1. The main item which I would like the authors to expand on is the surprisingly low seroprevalence in the study. The authors themselves speculate that the reason is a dry climate, but perhaps temperature also play a role. Durango City is located at an altitude of between 1000 and 2000 meters, but a discussion of this would help to explain the findings.
Further comments to explain the low prevalence were added to the Discussion section. Environment characteristics as dryness, temperature and altitude of Durango city were considered.

2. The fact that having a soil floor was a risk factor of infection could be discussed in more details as having a cat was not a risk factor. Clearly having a soil floor indicate infection by oocysts which are only excreted by cats.

Comments on this finding were added in the Discussion section. A number of likely explanations were given.

Reviewer: Jorg Heukelbach.
1. Background: I suggest to transfer the detailed description of other studies done in Mexico into the Discussion section.
The detailed description of other studies done in Mexico was changed into the Discussion section.

2. Methods: Study population - describe the target population: How many pregnant women were attended in the study period? If not all women were selected for this study, describe the selection criteria.
Information concerning the number of pregnant women attended during the study period and inclusion criteria was added to the Methods section.

3. Statistical analysis: detail the description of the multivariate analysis.
We have added information on the multivariate analysis in the Statistical analysis section.

4. Tables: Table 1: there are too many variables in this table, describing socio-demographic and clinical characteristics of the study population. The variables "Number of deliveries", "Number of caesareans" and "Number of abortions" may be omitted.
The number of variables in Table 1 was reduced. We have deleted the following variables: "Number of deliveries", Number of Cesarean sections", and "Number of abortions".

5. Tables 2,3 and 4 can be integrated into one table. Exclude the columns "Negative test for anti-T gondii antibodies", as it gives redundant information. Only use one decimal point for p values >0.2.
Tables 2, 3 and 4 were integrated into one table (Table 2). The column "Negative test for anti-T. gondii antibodies" was deleted. One decimal point for p values >0.2 were used.

6. Results: Restructure the presentation of results: 1. Sociodemographic description of study population, 2. Serology and prevalence, 3. Factors associated with soropositivity. Describe with two to three phrases the results of the bivariate analysis (such as "In the bivariate analysis, only.......". Include the results of the multivariate analysis in the results section (maybe as a table).
We have restructured the presentation of results as recommended. Results of the bivariate and the multivariate analysis were added to the Results section. Results of the multivariate analysis are shown in Table 3.

7. Discussion: When citing other studies on the prevalence, detail the study populations: Are these studies done in pregnant women, or in the general population?
We have detailed all study populations of the prevalence studies cited in the discussion section.

8. Poor housing (which is a sign of low socio-economic status) has been found to be associated with seropositivity, but the authors state that poor people do not have money to buy meat on a regular basis. Please comment on that possible contradiction.
Comments to clarify this apparent contradiction were added in the Discussion section.

9. - Change "OD" into "adjusted odds ratio" or "adjusted OR".
"OD" was deleted and changed by "adjusted odds ratio" or "adjusted OR". In the original manuscript we did not show adjusted OR because we did not perform such analysis. We showed only crude OR. Nevertheless, we have now performed adjusted OR analysis, and we now show the adjusted OR in the revised version of our manuscript.

10. - Include the data presented in the discussion on the multivariate analysis in the results section.
Results of the multivariate analysis presented in the Discussion section is now also included in the Results section.
11. - all characteristics are "epidemiological". I suggest using the terms "socio-demographic", "clinical" and "behavioral" to classify the variables. In the revised version of our manuscript, we have classified variables as follows: 1) socio-demographic; 2) clinical; and 3) behavioral.

12. - Background: change "...we performed a descriptive and cross sectional study" into "we performed a cross-sectional study...". We have changed "...we performed a descriptive and cross sectional study" by "we performed a cross-sectional study...".

13. - Statistical analysis: Delete the phrase "A p value of less than 0.05 was considered significant." We have deleted the phrase "A p value of less than 0.05 was considered significant".

14. Written English was revised.