Author's response to reviews

Title: Changes in perceived well-being of patients one year after stroke in general practice - Recommendations for quality aftercare

Authors:

Leonie de Weerd (l.de.weerd@med.umcg.nl)
Wijnand A.F Rutgers (rutgersa@mzh.nl)
Klaas H Groenier (k.h.groenier@med.umcg.nl)
Klaas van der Meer (k.van.der.meer@med.umcg.nl)

Version: 2 Date: 27 May 2010

Author's response to reviews: see over
Dear Sir / Madam,

We would like to submit the attached revised manuscript, "Changes in perceived well-being of patients one year after stroke in general practice - Recommendations for quality aftercare," for reconsideration for possible publication in the BMC Neurology.

We highlighted with red underlines all changes made when revising the manuscript.

In the following text a point-by-point response to the concerns of the reviewers is given.

**Reviewer: Jorunn Drageset**

1) There are missing literatures regarding the importance of the study. You describe that it is important, but do not have any relevant literature that shows that?
   *We added more literature regarding the importance of the study (4-8): about the growing problem of more and more people living with the consequences of stroke and living with handicap. And thus having attention for this is very important.*

2) Unclear purpose. Was not the data from the study compared with the general population?
   *We changed the section about the purpose of the study: the purpose of this study is to examine changes in well-being of patients one year after stroke, who returned to their home immediately after discharge from a hospital, in comparison with the general Dutch population of the same age and to determine factors that may influence changes in well-being.*

3) Move the last 6 sentences (last paragraph p. 5) before purpose.
   *We changed this in the article.*

4) Write more clearly in other sections regarding when the data was collected first time.
   *See last paragraph of study design.*
5) Could all give their consent to participate?
Yes, see first paragraph of methods. (We underlined this part)

6) Were all patients without cognitive impairment? Did some patients have diagnosed of dementia?
There were 3 patients with mild dementia living at home, but they knew they had a stroke and the consequences of stroke. Furthermore there were no patients with cognitive impairment. Patients with mild dementia are given in basis characteristics of the study population.

7) Was all the patients interviewed by one person face to face?
Yes. See last paragraph of study design.

8) Some places SF-36 is called QOL and elsewhere HRQOL? SF-36 was developed as a health goal? I miss references of Ware. How is the SF-36 measured?
We added references of Ware and now call it HRQOL everywhere. The original 0-100 scoring algorithm was used based on the summated ratings method. We changed it in the text and table.

9) Changes in habits-description of this section unclear:
We changed the paragraph and hope it is more clear now. (last paragraph of methods: measures at 12 months)

10) The descriptive statistics. Unclear what is meant with "no correction for multiple testing".
We changed this section: Despite the large number of statistical tests that were taken, we decided to do no correction for ‘multiple testing’ like the Bonferroni test. Instead, the p-values are given as an indication of the magnitude of the difference that was found. And are given when we expect that when repeating the research, this difference in the study will hold.

11) Low number, I miss the response rate.
This is given in figure 1: 68 patients selected, 6 non-respondents and 5 died, so 57 interviewed.

12) Regarding functions; The last 4 sentences are too strong according to the analysis method. It is also to much explanatory information – put it in the discussion.
This part is deleted and only the results are given.

13) In the heading you call it HRHRQOL and in the text you call it HRQOL? It is described as health-scale.
See 8. It is now called HRQOL.

14) Table 3 is unclear, where are the values from the Dutch population?
We compared the SF-36 scores from our study (heading: patients in this study) with values of the of the Dutch population. Because we only have from this population data for each of the age classes 65-75, 75-85, and >85 we compared our results with the population age class 75-85. Although the range of ages in our study is wider (65–91) we think that the mean value of the population age class 75-85 nevertheless gives a good comparison value. We used the one sample t-test to test whether the mean of our study group differs from the population mean of the 75-85 year old group. We changed the table accordingly.
15) Discussion: Second paragraph. The more patients are ADL dependent ... I miss reference.
We added no reference in first instance because it was a result from our study (table 2), but there are studies who can confirm our results, so we added them as references (32,33).

16) p. 14. HRQOL is high, relative to what?
In comparison with other studies and with the Dutch elderly population (reference: 35,36,37).
We changed the section to make it more clear.

17) First paragraph p. 15, may it be due to low n? other factors that may interfere??
Method Criticism?
This part is removed after comments of the other reviewer.

18) S 17 to make "major collector Generalization" You cannot generalization due to the sampling procedure.
We don’t understand what is meant with this comment. We gave some limitations and strong points of the study and possible improvements for in the future.

19) Conclusion. Regarding "Provide insight into well-being", I think your conclusions are overstated.
Maybe it is. We changed this part into: In conclusion, this study provides some insight into aspects of well-being in the group of elderly one year after stroke.... and further.

20) Further, "Physical functioning and HRQOL are reasonably good", what is good? I think that it is for strong conclusions, do to the low n (57), and the statistical procedure.
See text. We altered this part in the text.

21) Table 2, the heading is unclear (what means with "different variables")? What means with BI? Why are not the variable "visiting" present with “in more”?
We changed the heading and BI. More visiting wasn’t described because there were no patients who said they were more visiting. It is altered in the table.

22) Table 3 is confusing, where are the values from the Dutch population?
The table is changed after recommendation of the other reviewer and the elderly population is marked with #.

Reviewer: Timothy Kwok

1) This was a one year follow up study of a small group of mild stroke patients discharged directly from hospital to the community. Functional status, social functioning, mood, quality of life and caregiver strain were measured by questionnaire interviews by the general practitioner at the patients’ home. The stated aim was to identify remedial factors in order to improve the patients’ quality of life. Unfortunately the data analysis and the discussion did not achieve this stated aim. The presentation of results was largely descriptive and a lot of cross correlations were performed.
This research indeed is a descriptive cohort study, to analyze where improvements are possible in primary care patients. After this, further research has to be done to check if these
improvements can be made and how these improvements can be made. We are sorry the reviewer has the opinion that the stated aim was not achieved, however we think we now know where improvements might be made.

2) The main findings were that basic functional status, quality of life and caregiver strain of spouses were satisfactory, but there were limitations in higher functions, hobbies and social functioning, and there was more anxiety and depression. Unfortunately, there was not much discussion on what family physicians can do to improve on any of the problems identified. This is true. See also our comment in point 1. In the discussion is written that in a next research interventions by the GP to improve problems of patients with stroke will be studied.

3) The paper should be more focused on HRQOL as suggested by the title. We tried to do this and changed the title a little bit.

4) Presenting cross sectional data in the following order: functioning, occupation, mood, HRQOL and caregiver strain. We changed the order in the article.

5) Correlations with side of brain infarct are not consistent with the objective of this investigation and should be deleted. The results would have been difficult to interpret in any case, as the sample size was small, and the sites of infarcts were heterogenous. We removed all correlations with ‘side of the brain’.

6) It is not valid to compare HRQOL with general population in different ages. Suggest confining the comparison with those in the age range of 75-85 years. We understand this and now compare our group only with age class 75-85 years.

7) Barthel index measures basic functional status. Barthel index score of 20 indicates independence in basic functional status. Yes, there are two measures for the BI. One is from 0 to 20 and one is from 0 to 21. In this questionnaire patients get 3 points for eating independently instead of 2 points. 20 or 21 points means independence. We have made this more clear in the methods.

8) Define depression and anxiety in Table 2 and 4. If they were based on HADS, please specify. It was based on the HADS, we specified this in the tables.

9) In discussion, review literature on interventions that have been tried to improve participation and mood in long-term stroke survivors. See the discussion (references 39-43).

10) Compare the HRQOL of your study with those reported in the literature. See the discussion about HRQOL (references 35-37).

11) The presentation of the paper should be generally more concise. We tried to be more concise and changed a lot of things in the article. We hope it is sufficient now.
All authors have read and agreed to the content of the manuscript. The research that is reported in the manuscript has been performed with the approval of an ethics committee. 'All authors declare that they have no competing interests'.

This article has not been published or accepted for publication. It is not under consideration at another journal. No other papers using the same data set have been published.

I am looking forward to your reply.

Yours faithfully,

Ms L. de Weerd

Also on behalf of,

A.W.F. Rutgers, K.H. Groenier and K. van der Meer