Health related quality of life in the female-headed households

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Received: 20/Apr/2015  Accepted: 6/Jul/2015

ABSTRACT

Background and aims: According to psychological research female-headed households have a lot of physical and mental problems because they experience stress and anxiety more than the other women in general population. The aim of this study was to determine the quality of life and the associated factors in female-headed households under the Welfare Organization coverage of Ilam Province.

Methods: In this descriptive analytical study, 787 female-headed households under the Welfare Organization coverage of Ilam in urban and rural in Ilam province participated in this study. Systematic random sampling was used as a sampling method. A validated questionnaire (SF-36) completed in a six-month interval and then the data were collected and analyzed.

Results: From 787 female-headed households contributing to the project, the numbers of missing subjects were 79 and 708 of the subjects completed the questionnaires (response rate 89.9%). Mean ± SD age of participants was 53.3±19.18. The results of this study showed an unfavorable health related quality of life in female-headed households spatially in role–physical (mean score 48.06) and mental health (mean score 40.80) demission. We found that having the chronic disease and living in rural area were associated with an unfavorable health related quality of life (P≤0.001).

Conclusion: According to the results, the most important reason affecting the quality of life in female-headed households is low level of illiteracy and having a chronic illness.

Keywords: Female-headed households, Quality of life, Ilam.

INTRODUCTION

Evolution of families in different parts of the world has shown an increasing rate of the female-headed household’s population.¹ Among the main reasons for this increase, we can name divorce, life expectancy rising of women compared to men, demographic and social factors, migration caused by the economic crisis-environmental, political and cultural patterns.² This increasing rate in this population group accompanied with increasing in the other difficulties such as risk of poverty and social damage, due to the high prevalence of depression among female-headed households.³

Statistical indicators show that the number of female-headed households is increasing in our country. Over the past three decades, female-headed households in the years 1986 and 1996 and 2006 were 4.9,
7.4, and 7.7, respectively, and this rate in 2011 reached to 12%.

Also according to the statistics, 30% of female-headed households are on disability. On the other hand, in total, only 46% of household’s women are covered by the supporting agency such as Welfare Organization and Relief Committee in Iran.

According to psychological research female-headed households have a lot of physical and mental problems because they experience more stress and anxiety. The rates of mental illness in female-headed households compared with the other women in general population is higher in previous reports.

The results of the above problem show that general health in these women has been reduced, so that in a recent research in capital city of Tehran showed that 22% of households’ women had a good general health. In another report, only 20% of female-headed households have a good quality of life.

In this study we explored the eight domains of the SF-36 questionnaire and then we determined associations between some related factors in female-headed households under the coverage of Welfare Organization of Ilam Province. After that we hope that this study pave the way for providing a finding that improves health-related quality of life in this group of women.

METHODS

In this descriptive analytical study, 787 Female-headed households under the coverage of Welfare Organization of Ilam in urban and rural Ilam province participated in this study. Systematic random sampling was used to as a sampling method. Sample sizes in this study were calculated by formula for simple random sampling by default of 30% ratio for good health, with precision of 4%. The coefficient of effect was considered as1.5 to increase the accuracy of sampling. Eventually the sample size was estimated to be 787 people.

A validated questionnaire (SF-36) was used to in eight domains of the SF-36 questionnaire as a tool to assess holistically health-related quality of life and to intervene in improving quality of life in female-headed households.

The SF-36 taps eight health concepts: physical functioning, bodily pain, role limitations due to physical health problems, role limitations due to personal or emotional problems, emotional well-being, social functioning, energy/fatigue, and general health perceptions. It also includes a single item that provides an indication of perceived change in health. Scores had a range of 0-100, with a higher score indicating a better health related quality of life.

Inclusion criteria were the head of the household at the time of completing the questionnaire and consent to participate in the study. Exclusion criteria were failure to cooperate in completing the questionnaire and absence in the wake of 2 successive visits. Person to person interview was used for all the participants using a standard questionnaire. Questionnaires were completed by the experts during 6 months. It was presented scores of the health related quality of life for female-headed households, in eight SF36 dimensions. Scores and the collected data were analysed using ANOVA and t-test. Leaner regression was used to determine potential prognostic factors of health related quality of life in female-headed households. Data analysis was conducted by SPSS statistical software.

RESULTS

Of 787 female-headed households contributing to the project, the numbers of subjects missing were 79 and 708 of subjects completed the questionnaires (response rate 89.9%). Mean ± SD age of participants was 53.3±19.18.
The scores of the SF-36 dimensions in the female-headed household’s population are shown in Table 1. The internal consistency for the different SF-36 subscales was acceptable to good, varying from 0.64 (social functioning) to 0.92 (physical functioning).

Table 1: Scores on SF-36 in total population

<table>
<thead>
<tr>
<th>SF-36 (mean scores)</th>
<th>Score</th>
<th>SD</th>
<th>Internal consistency (Cronbach’s)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Physical functioning</td>
<td>48.06</td>
<td>33.46</td>
<td>0.92</td>
</tr>
<tr>
<td>Role–physical</td>
<td>43.51</td>
<td>36.53</td>
<td>0.90</td>
</tr>
<tr>
<td>Bodily pain</td>
<td>46.75</td>
<td>23.49</td>
<td>0.86</td>
</tr>
<tr>
<td>General health</td>
<td>52.12</td>
<td>17.49</td>
<td>0.81</td>
</tr>
<tr>
<td>Vitality</td>
<td>49.09</td>
<td>18.65</td>
<td>0.77</td>
</tr>
<tr>
<td>Social functioning</td>
<td>55.64</td>
<td>23.49</td>
<td>0.64</td>
</tr>
<tr>
<td>Role–emotional</td>
<td>45.92</td>
<td>37.89</td>
<td>0.087</td>
</tr>
</tbody>
</table>

The results of all female-headed household’s and all quality of life domains showed that it was found that having the chronic disease and living in rural area was associated with an unfavourable health related quality of life (P≤0.001) (Table 2).

Table 2: Mean Score of SF-36 of related variables

<table>
<thead>
<tr>
<th></th>
<th>N</th>
<th>Mean Score of SF-36</th>
<th>SD</th>
<th>P</th>
</tr>
</thead>
<tbody>
<tr>
<td>Urban area</td>
<td>399</td>
<td>43.6</td>
<td>18.9</td>
<td>&lt;0.001</td>
</tr>
<tr>
<td>Rural area</td>
<td>309</td>
<td>49.2</td>
<td>20.4</td>
<td></td>
</tr>
<tr>
<td>With Chronic Disease</td>
<td>283</td>
<td>37.2</td>
<td>16.2</td>
<td>&lt;0.001</td>
</tr>
<tr>
<td>Non Chronic Disease</td>
<td>425</td>
<td>51.9</td>
<td>19.8</td>
<td></td>
</tr>
<tr>
<td>Poor economic status</td>
<td>345</td>
<td>46.3</td>
<td>21.6</td>
<td>0.522</td>
</tr>
<tr>
<td>Average economic status</td>
<td>385</td>
<td>45.7</td>
<td>17.8</td>
<td></td>
</tr>
<tr>
<td>Good economic status</td>
<td>15</td>
<td>48.7</td>
<td>2</td>
<td></td>
</tr>
</tbody>
</table>

Mean scores of SF36 according to chronic disease and economic status are given in figure 1. The scores showed that the differences in health related quality of life between subjects with chronic or non-chronic disease were significant (A) but according to economic status statistical difference were not found (B). Results of leaner regression are shown in Table 3. According to results, potential prognostic factors of health related quality of life in female-headed households were: educational level (P=0.002), having the chronic disease (P≤0.001) and age (P≤0.001). While place of residence (P=0.078), economic status (P=0.265) and job status (P=0.892) were not significant in a linear regression model.
Figure 1: Health related quality of life by economic status

(A) having disease (B) bp, bodily pain; gh, general health; mh, mental health; pf, physical functioning; re, role emotional; rp, role—physical; sf, social functioning; vt, vitality.

Table 3: Leaner Regression Analysis for health related quality of life in female-headed households

<table>
<thead>
<tr>
<th>Variables input</th>
<th>Unstandardized Coefficients</th>
<th>Standardized Coefficients</th>
<th>t</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>Std. Error</td>
<td>Beta</td>
<td></td>
</tr>
<tr>
<td>(Constant)</td>
<td>-.514</td>
<td>.288</td>
<td>-1.787</td>
<td>0.074</td>
</tr>
<tr>
<td>Educational level</td>
<td>0.122</td>
<td>0.039</td>
<td>0.128</td>
<td>3.091</td>
</tr>
<tr>
<td>Job status</td>
<td>0.008</td>
<td>0.057</td>
<td>0.005</td>
<td>0.136</td>
</tr>
<tr>
<td>Place of residence</td>
<td>0.128</td>
<td>0.072</td>
<td>0.064</td>
<td>1.763</td>
</tr>
<tr>
<td>economic status</td>
<td>-0.075</td>
<td>0.067</td>
<td>-0.041</td>
<td>-1.115</td>
</tr>
<tr>
<td>having the chronic disease</td>
<td>0.582</td>
<td>0.075</td>
<td>0.285</td>
<td>7.789</td>
</tr>
<tr>
<td>Age</td>
<td>-0.013</td>
<td>0.002</td>
<td>-0.258</td>
<td>-6.011</td>
</tr>
</tbody>
</table>

DISCUSSION

Despite the existence of a large number of female-headed households in our country (12% of all household heads), little information about the quality of life of this population have been published. Therefore we conducted the present study to evaluate the quality of life of women heads of household and we well hope to provide basic information for possible interventions.

The results of this study show an unfavourable health related quality of life in female-headed households spatially in role–physical and mental health remissions. The worst dimension was mental health and highest mean score in dimensions was in social functioning dimension. Previous studies have reported physical functioning and mental health as the highest and lowest mean score of
health related of quality of life. A possible explanation for this fact might be in the number of samples, geographic and cultural of regions.

Our results show that aging was associated with decreasing of quality of life. These findings of the current study are consistent with the study of Montazeri who found that quality of Life in female-headed households’ decreases with increasing the age. This study showed that having the chronic disease is related to low quality of life in female-headed households. We hypothesized that age is a confounding variable for this relationship. Therefore, after elimination of age in final analysis the result did not changed. This reveals the important influence of co morbidity of disease on the health related quality of life. These results are based on co morbidity such as cardiovascular diseases, cancer, chronic obstructive pulmonary disease, or diabetes but may be these chronic diseases have a different effect on quality of life. Future studies are needed to work on this type of disease as well.

Other finding of this study shows no significant relationship between economic statues and health related quality of life but among of 8 dimensions, we found significant relationship among general health, role-emotional and economic statues. The impact of economic statues on female-headed household’s health related quality of life has already been shown in few studies. According to the previous records female-headed households compared with the other population groups; usually have the lowest health related quality of life. It seems that these results may be due to several difficulties such as divorce, death of spouse, low level of education and having no permanent job.

Limitations of our data should be taken into account in their interpretation.

First, self-reporting of data has obvious limitations, especially for economic status excluding self-diagnosed or imagined diseases by asking respondents to indicate whether or not a physician had ever told them that they had the disease. It is still possible, however, that diseases which are reported were not diagnosed by a physician. Another limitation of our study is the relatively high rate of non-response?

This finding was showed a worse unfavourable health related quality of life for female-headed household’s and suggests that relaying on the results of the consideration of an individual’s experience of health-related quality of life and general health, interventions is useful for improving individual’s quality of life. Specific interventions, such as the administration of medicine or psychological counselling, can be done in order to improve the physical, psychological and social well-being.

**CONFLICT OF INTEREST**

The authors declare no conflict of interest.

**ACKNOWLEDGEMENT**

This present paper is part of a research project approved by Ilam University of Medical Sciences.

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