A study of the prevalence of various psychosocial problems of geriatric population in urban area of district-Hapur

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ABSTRACT

Background: With advancing age, ill-health becomes a major hindrance for the well-being of the elderly. Therefore, not only physical but even psychosocial health is an important predictor for their living happily. Objective was to study the prevalence of various psychosocial problems, including dependence in study population.

Methods: A cross sectional study was carried out in geriatric age group in the urban field practice areas of Department of Community Medicine, Saraswathi Institute of Medical Sciences, District-Hapur.

Results: Out of 580 elderly the overall prevalence of psychosocial problems was 270 (45.6%). This includes psychosocial disorders in 34.8%, functional dependency in 12.4%, sad attitude towards life in 13.4% and low social adjustment in 8.3%.

Conclusions: The psychosocial problems were higher in females as compared to males and were significantly associated with functional dependency, social adjustment and attitude towards life.

Keywords: Geriatric, Functional dependency, Psychosocial problems

INTRODUCTION

Health is the single most important determinant of the quality of life among elderly.¹ The health status of the elderly is determined at the cost of economic, social, psychological and physiological factors.

With advancing age, ill-health becomes a major hindrance for the well-being of the elderly. Therefore, not only physical but even psychosocial health is an important predictor for their living happily. The needs of the old are distinct and mostly related to health, comfortable and dignified living, psychological wellbeing (including recreation and social networking), meaningful occupation (with or without economic gains) and security aspects.²

Aims and objective

To study the prevalence of various psychosocial problems, including dependence in study population.

METHODS

Study period

The study was conducted from March 2014 to September 2015. Data collection was done from May 2014 to April 2015.

Data entry was done simultaneously during data collection. Data analysis and report writing was done from May 2015 to September 2015.
Inclusion criteria

The elderly aged ≥60 years living in study area and elderly persons eligible to participate in the study.

Exclusion criteria

People aged less than 60 years and those who were non-co-operative/non-responsive.

Methodology

A cross sectional study was carried out in geriatric age group aged 60 years and above in the urban field practice area of Department of Community Medicine, UHTC-Hapur which comprises of 22 localities. The overall population as per the base line survey conducted by Department of Community medicine was 26,092. For the study 5 urban and 2 slum localities were selected randomly to get the desired number of study subjects. By using systematic random sampling technique, all the eligible persons from alternate household were included into the study till the required sample size of 580 was met. Data was collected on pretested semi structured schedule.

Calculation of sample size

The prevalence of psychosocial problems was taken as the basis for sample size calculation. This rate was reported as 42% in a study by Prakash et al.³ The sample size was calculated by using the following formula:

\[ n = \frac{4pq}{L^2} \]

Where-  
\( n \) = sample size
\( p \) = Prevalence of psychosocial morbidities in geriatric population
\( q = 100-p \)

\( L \) = is taken to allow for margin of error which was 10% of \( p \)

\[ n = \frac{4 \times 42 \times 58}{4.2^2} \]

\[ = \frac{9744}{17.64} \]

\[ = 552 \]

Adding 5% to it as the dropout rate, it comes out to be 580.

Procedure

For collection of data, house to house visits were made to each of study subjects in selected areas. In case of non-availability of the selected person during study, the next person in the list was included. Each individual was told about the purpose of the study and confidentiality of the information was assured. Written consent was obtained from the respondents/family members before interviewing them. If in any case the study subjects was unable to understand/answer question due to illness the information was collected from family members/relative.

Data analysis was done by using statistical SPPS 20 version.

Ethical approval for the study was obtained from Institutional Ethical Committee before starting the study.

RESULTS

A total of 580 elderly individuals surveyed for this study to know the prevalence of various psychosocial problems.

Table 1: Prevalence of psychosocial problems.

| Psychosocial problems       | Male (%) | Female (%) | Total (%) |
|-----------------------------|----------|------------|-----------|
| n=291                       |          | n=289      | n=580     |
| Psychosocial disorders      | 87 (29.9)| 115 (39.8) | 202 (34.8) |
| Functional Dependency       | 29 (9.9) | 43 (14.9)  | 72 (12.4)  |
| Sad attitude towards life   | 22 (7.6) | 56 (19.4)  | 78 (13.4)  |
| Low social adjustment       | 15 (5.2) | 33 (11.4)  | 48 (8.3)   |
| Total having psychosocial problems | 270 (45.6) |

Table 1 revealed the overall prevalence of psychosocial problems 270 (45.6%). This includes psychosocial disorders in 34.8%, functional dependency (partial and total) in 12.4%, sad attitude towards life in 13.4% and low social adjustment in 8.3%. The psychosocial problems were higher in females as compared to males.

Table 2: Distribution of study participants according to psychosocial disorders.

| Psychosocial disorders | Male (%) | Female (%) | Total (%) |
|------------------------|----------|------------|-----------|
| Anxiety                | 51 (17.5)| 67 (23.2)  | 118 (20.3) |
| Depression             | 10 (3.4) | 19 (6.6)   | 29 (5.0)  |
| Others                 | 26 (8.9) | 29 (10.0)  | 55 (9.5)  |
*Figures in parenthesis are percentages of column total

Table 2 depicts that among psychosocial disorders, anxiety was more common than depression (20.3% and 5.0%), others being 9.5% and being more prevalent in females as compared to males.
Table 3: Distribution of study participants according to leading psychosocial factors.

| Psychosocial Factors | Male (%) | Female (%) | Total (%) |
|----------------------|----------|------------|-----------|
|                     | n=291    | n=289      | n=580     |
| **Functional ability** |          |            |           |
| Independent          | 262 (90.1) | 246 (85.1) | 508 (87.6) |
| Partially dependent  | 19 (6.5)  | 25 (8.7)   | 44 (7.6)  |
| Total dependent      | 10 (3.4)  | 18 (6.2)   | 28 (4.8)  |
| **Attitude towards life** |          |            |           |
| Happy                | 161 (55.3) | 102 (35.3) | 263 (45.3) |
| Indifferent          | 108 (37.1) | 131 (45.3) | 239 (41.2) |
| Sad                  | 22 (7.6)  | 56 (19.4)  | 78 (13.4) |
| **Social adjustment** |          |            |           |
| High                 | 40 (13.7)  | 42 (14.5)  | 82 (14.1) |
| Moderate             | 236 (81.1)| 214 (74.0) | 450 (77.6)|
| Low                  | 15 (5.2)  | 33 (11.4)  | 48 (8.3)  |

*Figures in parenthesis are percentages of column total

Table 3 depicts that only 7.6% and 4.8% of elderly were either partially or totally dependent on family members for daily living while rests 87.6% were living independently. Partial and total dependency was more common in females as compared to males (8.7% and 6.2%). Higher proportion of elderly was a happy attitude toward life (45.3%), followed by 41.2% having an indifferent attitude and 13.4% were having sad attitude towards life. Higher proportion of Female was having sad attitude as compared to males (19.4% versus 7.6%). Maximum i.e. 77.6% of elderly were having moderate level of social adjustment. Low social adjustment was high in females (11.4%).

Table 4 depicts that the prevalence of psychosocial problems was higher in ‘oldest old’ group (52.8%). It also shows that these problems were more common in females (39.8%) and those who belong to single group (43.7%), in ever alcoholic (40.5%) and those who belong to lower socioeconomic class (35.2%). It was also observed that those elderly who were economically dependent and functionally dependent either totally or partially had higher prevalence of psychosocial problems (37.4%, 60.7% and 43.2%). Psychosocial problems were also higher in those with sad and indifferent attitude i.e. (70.5% and 41.8%) and with low social adjustment (81.2%). The difference was found statistically significant with sex, marital status, functional dependency, social adjustment and attitude towards life.

Table 4: Prevalence of psychosocial problems according to socio demographic characteristics and lifestyle factor.

| Characteristics                  | Psychosocial Problems | Total n=580 | Chi square test |
|----------------------------------|-----------------------|-------------|----------------|
|                                  | Present (%) | Absent (%) | χ² value | P value |
| **Age (years)**                  |            |            |          |         |
| 60-69                            | 125 (33.4) | 249 (66.9) | 374 | 5.47  | 0.06 |
| 70-79                            | 58 (34.1)  | 112 (65.9) | 170 | 170   | 0.03 |
| >80                              | 19 (52.8)  | 17 (47.2)  | 36  | 36    | 0.03 |
| **Sex**                          |            |            |          |         |
| Male                             | 87 (29.9)  | 204 (70.1) | 291 | 291   | 6.25 |
| Female                           | 115 (39.8) | 174 (60.2) | 289 | 289   | 6.25 |
| **Marital status**               |            |            |          |         |
| Married                          | 112 (29.9) | 262 (70.1) | 374 | 374   | 11.05 |
| Widower/widow/separated          | 90 (43.7)  | 116 (56.3) | 206 | 206   | 11.05 |
| **Current occupation**           |            |            |          |         |
| Employed                         | 69 (34.3)  | 132 (65.7) | 201 | 201   | 0.03 |
| Unemployed                       | 133 (35.1) | 246 (64.9) | 379 | 379   | 0.03 |
| **Socio economic status**        |            |            |          |         |
| Upper class                      | 35 (33.0)  | 71 (67.0)  | 106 | 106   | 0.18 |
| Lower class                      | 167 (35.2) | 307 (64.8) | 474 | 474   | 0.18 |
| **Alcohol user**                 |            |            |          |         |
| Never                            | 172 (34.0) | 334 (66.0) | 506 | 506   | 1.22 |
| Ever                             | 30 (40.5)  | 44 (59.5)  | 74  | 74    | 1.22 |
| **Economic dependency**          |            |            |          |         |
| Independent                      | 65 (30.4)  | 149 (69.5) | 214 | 214   | 2.96 |
| Dependent                        | 137 (37.4) | 229 (62.6) | 366 | 366   | 2.96 |
| **Functional dependency**        |            |            |          |         |
| Totally dependent               | 17 (60.7)  | 11 (39.3)  | 28  | 28    | 10.65 |
| Partially dependent              | 19 (43.2)  | 25 (56.8)  | 44  | 44    | 10.65 |
| Independent                      | 166 (32.7) | 342 (67.2) | 508 | 508   | 10.65 |

Continued.
9% had psychosocial problems and corresponded to the social morbidity profile of the elderly respectively. 2) In the study conducted by De Venkatarao et al, reported that 9% of elderly had psychiatric problem and it was lower than present study.

| Characteristics | Psychosocial Problems Present (%) | Psychosocial Problems Absent (%) | Total n=580 | Chi square test χ² value | P value |
|-----------------|-----------------------------------|---------------------------------|-------------|------------------------|--------|
| Social adjustment |                                   |                                 |             |                        |        |
| High            | 31 (37.8)                          | 51 (62.2)                        | 82          | 51.87                  | 0.00*  |
| Moderate        | 132 (29.3)                         | 318 (70.7)                       | 450         |                        |        |
| Low             | 39 (81.2)                          | 9 (18.8)                         | 48          |                        |        |
| Attitude towards life |                               |                                 |             |                        |        |
| Happy           | 47 (17.9)                          | 216 (82.1)                       | 263         |                        |        |
| Indifferent     | 100 (41.8)                         | 139 (58.2)                       | 239         |                        |        |
| Sad             | 55 (70.5)                          | 23 (29.5)                        | 78          |                        |        |

*p value <0.05 (sig) Result was statistically significant by chi-squared analysis, Figures in parenthesis are percentages of row total.

DISCUSSION

The present cross sectional study was aimed to know the prevalence of psychosocial problems including dependence in age group 60 years and above in the urban field practice areas of Department of Community Medicine, Saraswathi Institute of Medical Sciences, District-Hapur. The study consists of 580 subjects.

Psychosocial problems including dependence

Psychosocial disorders

In the present study overall prevalence of psychosocial disorders was (34.8%). Prevalence was more in females (39.8%) as compared to males (29.9%) and the difference was statistically significant.

In a study by Kishore et al in geriatric population revealed that 28.9% had psychosocial problems and Kumar et al in a study among elderly found that psychological distress and symptoms were present in 29.2%, these findings corresponds to present study. In the psychiatric study of the elderly in Madurai, Ray et al reported that 9% of elderly had psychiatric problem and it was lower than present study.

Present study reported proportion of depression in 5% of elderly. In the study conducted by Dey et al reported depression in 8.5% of elderly, corresponds to the present study.

Functional dependency

In present study majority of elderly (87.6%) answered that they did not require anyone to help in their daily activities, when asked in details for each that is eating, dressing, walking, toileting and bathing, while 7.6% were partial dependent and 4.8% were totally dependent.

A study conducted in an urban area of Delhi (2000) reported that 93.9% of elderly are totally independent and 0.4% was totally dependent respectively. In another study by Venkatarao et al reported that more than two-third of the elderly had functional limitation. These findings were different from the present as criteria for functional ability may be different and due difference in study areas.

As Hapur is a newly formed district, so lacking in district specific data. Many studies have been conducted in different parts of the world which have accorded statistical credence to our age old presumptions, yet till very date very few studies in India that provide information on the psychosocial morbidity profile of the elderly population are carried out. So, very few studies were there to compare with the present study.

CONCLUSION

The present study highlighted a high prevalence of morbidity among the elderly and identified more common existing health problem like psychosocial problems. Out of 580 elderly the overall prevalence of psychosocial problems was 270 (45.6%). The leading psychosocial stress being psychosocial disorders, functional dependency, mal adjustment and sad attitude towards life.

Recommendations

From the observations made during the course of the study and considering the results and discussion of the present study, the following recommendations are advised: 1) Geriatric care should become an integral part of the primary health care delivery system. 2) Geriatrics as a specialty should be started in all major government and private health care institutions. 3) Counselling for the family members to encourage elderly to seek health care, through home visits by trained community health workers should be provided. 4) Domiciliary care by physicians qualified in geriatric care is recommended for which training programs of medical officers should be conducted.

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