Original Research Article

Prevalence of Health Problems among Elderly in Rural and Urban Areas of Dharwad, Karnataka, India

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A B S T R A C T

As people age, many age-related changes are common such as decline in vision and hearing, high blood pressure, muscle weakness, weakened immune system, diabetes, depression and dementia. The sample for the present study comprised of 90 rural and 90 urban elderly were selected through snowball method from Dharwad Taluk. Health status of elderly was assessed by using Ageing schedule Badiger and Kamat (2009). Results revealed that majority of the elderly from urban area had common health problems to a greater extent such as poor vision (54.5%), dental problems (52.4%), depression (51%), back pain (50%), uncontrollable bladder (47.7%) and reproductive problems (45.5%). With regard rural elderly most of them had common health problems to some extent like poor vision (65.5%), poor hearing (52.2%), dental problems (50%) and uncontrollable bladder (48.8%). About chronic health problems, more than half of rural elderly (to some extent) and urban elderly (to greater extent) had hypertension, diabetes, arthritis and respiratory problems. The rate of overall health status was good among rural elderly as compared to urban elderly. However, many elderly from both areas had no common/chronic health problems like skin issues, tremors, fatigue, dementia, headache, acidity, cardiovascular and respiratory problems. There is a need for the elderly to get immediate health facilities, financial assistance for medicines and services through Government and NGOs for better health status.

Introduction

Around 9% of the Indian population (10.4 crore) is aged 60 years or above (Census, 2011). Aging is an inevitable developmental phenomenon bringing along a number of changes in the physical, psychological, hormonal and social conditions. Which includes changes in biological, sensory, psychological, social, cardiovascular, lungs and respiratory, musculoskeletal, gastrointestinal and urinary tracts systems. It is characterized by the progressive degeneration of organ systems and tissues and is largely determined by genetics and influenced by a wide range of environmental factors. Ageing is associated with a progressive decline in the function of multiple organ systems thereby making individuals vulnerable to various diseases and illnesses. As aging brings progressive

changes in all parts of the body, sensory organs, including the brain. Ageing is associated with a progressive decline in the function of multiple organ systems thereby making individuals vulnerable to various diseases and illnesses. According to the National Council on Aging (2022), 80 per cent of elderly had at least one chronic disease, and 68 per cent had at least two. The most affected chronic condition is hypertension (58%) followed by high cholesterol (47%), arthritis (31%), coronary heart diseases (27%), diabetes (29%), chronic kidney diseases (18%), depression (14%), Dementia (11%) and respiratory diseases (11%). In India, the elderly people suffer from dual health problems, i.e., both common as well as chronic diseases. A decline in immunity as well as age related physiologic changes leads to an increased burden of these diseases in the elderly.

The main objectives of this study to know the prevalence of common health problems among rural and urban elderly. And also to know the prevalence of chronic health problems among rural and urban elderly

Materials and Methods

The study population consisted of elderly in the age group of 60 years and above were selected from Dharwad taluk, Karnataka state. Samples were taken from rural and urban areas of Dharwad taluk and Dharwad city. The 90 elderly were selected from rural areas of two villages and 90 elderly were selected from urban areas of Dharwad city through snowball technique. The total sample was comprised of 180 people which included elderly those who were residing at home with their family members and able to communicate. A self-structed questionnaire used to collect the general information, Health status of elderly was assessed by Ageing schedule developed by Badiger and Kamat (2008) and socio-economic status by using Aggarwal *et al.,* (2005) SES scale.

Results and Discussion

Demographic characteristics of the elderly

Table 1 indicates the details of demographic characteristics of the respondents. Age of the respondents ranged from 60 to 85 years of age. Among the respondent's majority (73%) of them belonged to young old (60-74 years) and 27 percent of elderly belonged, old

old (75-85) years group category respectively. With regard to gender wise distribution of elderly shows that 35 per cent of the male and 65 percent of the respondents were belonged to female group. About locality 50 per cent of the respondents are from rural areas while the remaining 50 per cent of the respondents are from urban areas were purposively selected. It is also observed from table 1 that 39 per cent of the respondents belonged to illiterate category followed by 23 per cent, 21 percent, 15 per cent, 12 per cent of the respondents belonged to primary, PUC and above and high school. About 35.5 per cent of the elderly work at shops, home, transport and own cultivation of land. While 30 per cent were self-employed with income <5000 (laborer, housewife). 23 percent were served in public/private sectors and 11.5 percent were self-employed e.g shops, rehdies or petty business with income>5000 respectively. Working status has been categorized into two groups such as working and non- working. About 51 per cent of elderly belonged to non-working whereas 49 per cent subjects were currently working. With regard to marital status 64 per cent were married and 36 per cent were widow/widower. Table 1 shows that about 57 per cent and 43 percent of the elderly respondents belonged to joint and nuclear category of family type respectively. It is noted in table 1 that 57 per cent of elderly had lower middle SES level, followed by upper middle (34%) and poor (9%) socio economic status respectively.

Rural elderly had common health to a greater extent such as Constipation (15.5%), uncontrollable bladder (13.3%), back pain (13.3%), poor vision (12.2%) and dementia (11%). While some of them had health problems 'to some extent such as Poor vision (65.5%), poor hearing (52.2%), dental problems (41.2%), uncontrollable bladder (37.7%), reproductive problems (47.7%) and back pain (38.8%). It is interesting that majority of the rural elderly had no health problems at all such as Depression (81%), **s**kin issues (74.5%), headache (68.8%), acidity (64.5%), dementia (64.5%), tremors (62.3%) and fatigue (61%). The reason could be that age related changes, stressful events, death of loved ones, financial constraints, lack of access to health care service, poor food intake, deficiency of nutrients and self-medication practices results in declined health status among elderly. Lena *et al.,* (2009) also in similar line with the study indicated that majority of the elderly had chronic health problems like hypertension followed by arthritis, diabetes and cataract. Barua *et al.,* (2017) also revealed that more than two-third of urban elderly were suffering from common and chronic morbidities like

poor vision, dementia, hypertension, arthritis and diabetes compared to rural areas of Assam.

Majority of urban elderly health problems were present to a greater extent among urban elderly such as Hypertension (71%), diabetes (67.7%), and arthritis (66.6%). While some of them had health problems 'to some extent such as Respiratory problems (39%), arthritis (29%), cardiovascular problems (26.6%), diabetes (25.7%) and hypertension (22.4%). Higher percentages of the elderly had no health problems such as Cardiovascular problems (65.7%) and respiratory problems (55.5%), Few of the Barua *et al.,* (2017) also revealed that more than two-third of urban elderly were suffering from common health problems. Kalyan *et al.,* (2015); Soni *et al.,* (2016) and Kishore *et al.,* (2015) revealed that majority elderly had one or more chronic health problems such as hypertension, cardiovascular problems, musculoskeletal disorder, genitourinary problems, respiratory related problems resulted in common psychiatric disorders, obesity and depression.

More than half of the rural elderly had chronic health problems were present to a greater extent in some of the rural elderly such as Respiratory problems (42%), hypertension (38%), arthritis (26.6%), diabetes (15.5%) and cardiovascular diseases (3.3%). It is interesting to note that in the present study that majority of the rural elderly had no health problems of Cardiovascular problems (72.2%) and respiratory problems (38%).

The reason could be that a person gets older, as aging process molecular and cellular changes over time leads to decrease in physical and mental capacity, growing risk of diseases, acute illness and depression result in declined health status. Lena *et al.,* (2009) observed that majority of the elderly had high level of chronic health problems like hypertension followed by arthritis, diabetes and cataract.

Table.1 Demographic characteristics of the respondents

N=180

Characteristics	Category	Frequency (%)
Age	Young old (60-74)	131(73.0)
	Old-old (75-85)	48(27.0)
Gender	Male	63(35.0)
	Female	117(65.0)
Locality	Rural	90 (50.0)
	Urban	90(50.0)
Education	Illiterate	70 (39.0)
	Primary	41(23.0)
	High school	27(15.0)
	PUC	38(21.0)
	Graduation and above	4(2.00)
Occupation	Worked in Govt./private sectors	42(23.0)
	Work at shops, home, transport, own cultivation of land	64(35.5)
	Self-employed eg: shops, petty business with income> 5000	21(11.5)
	Self-employed with income<5000	53(30.0)
Working status	Working	92(51.0)
	Non- working	88(49.0)
Marital status	Married	115(64.0)
	Widow /widower	65(36.0)
Type of family	Nuclear	77(43.0)
	Joint	103(57.0)
Socio- economic status	Upper middle	61(34.0)
	Lower middle	103(57.0)
	Poor	16(9.00)

Figures in parenthesis indicates percentages

Table.2 Percentage distribution of common health problems among rural elderly

Sl. No	Common health problems	To greater extent	To some extent	Not at all	Total n=90
		N (%)	N (%)	N (%)	
1	Poor Vision	11(12.2)	59(65.5)	20(22.3)	90(100.0)
2	Poor Hearing	9(10.0)	47(52.2)	34(37.8)	90(100.0)
3	Dental problems	8(8.80)	45(50.0)	37(41.2)	90(100.0)
4	Back pain	12(13.3)	43(47.7)	35 (38.8)	90(100.0)
5	Tremors	7 (7.70)	27(30.0)	56 (62.3)	90(100.0)
6	Fatigue	6 (6.8)	29(32.2)	55 (61.0)	90(100.0)
7	Acidity	9(10.0)	23 (25.5)	58 (64.5)	90(100.0)
8	Constipation	14(15.5)	39 (42.2)	37(41.3)	90(100.0)
9	Skin issues	7 (7.70)	16 (17.7)	67 (74.5)	90(100.0)
10	Headache	3(3.50)	25 (27.7)	62 (68.8)	90(100.0)
11	Uncontrollable bladder	12(13.3)	44 (48.8)	34(37.7)	90(100.0)
12	Reproductive problems	7(7.70)	43(47.7)	40(44.4)	90(100.0)
13	Dementia	10(11.0)	22(24.5)	58(64.5)	90(100.0)
14	Depression	2(2.4)	15 (16.6)	**73 (81.0)**	90(100.0)

Figures in parenthesis indicates percentages

Table.3 Percentage distribution of common health problems among urban elderly

Sl. No	Common health problems	To greater extent	To some extent	Not at all	Total (n=90)
		N (%)	N (%)	N (%)	
1	Poor Vision	49(54.5)	32(35.5)	13(14.0)	90(100.0)
2	Poor Hearing	4(4.50)	38(42.2)	66(73.3)	90(100.0)
3	Dental problems	47(52.4)	35(38.0)	6(6.60)	90(100.0)
4	Back pain	45(50.0)	26(28.8)	19(21.2)	90(100.0)
5	Tremors	4 (4.50)	19(21.2)	67 (74.3)	90(100.0)
6	Fatigue	5(5.50)	20(22.2)	65 (72.3)	90(100.0)
7	Acidity	9(10.0)	32 (35.5)	49 (54.5)	90(100.0)
8	Constipation	12(13.5)	44 (48.8)	34 (37.7)	90(100.0)
9	Skin issues	2 (2.50)	16(17.5)	72(80.0)	90(100.0)
10	Headache	7 (7.70)	24 (40.0)	48 (52.3)	90(100.0)
11	Uncontrollable bladder	43(47.7)	26 (29.0)	21(23.3)	90(100.0)
12	Reproductive problems	41(45.5)	22(24.5)	27 (30.0)	90(100.0)
13	Dementia	22(24.5)	27(30.0)	49(54.5)	90(100.0)
14	Depression	46 (51.0)	37 (41.0)	7 (8.0)	90(100.0)

Figures in parenthesis indicates percentages

Table.4 Percentage distribution of chronic health problems among rural elderly

Sl. No	Chronic health problems	To greater extent	To some extent	Not at all	Total n=90
		N (%)	N (%)	N (%)	
1	Cardiovascular disease	3(3.3)	22 (24.5)	65 (72.2)	90(100.0)
2	Diabetes	14 (15.5)	57 (63.5)	19 (21.1)	90(100.0)
3	Arthritis	24 (26.6)	53 (59.0)	13 (14.4)	90(100.0)
4	Hypertension	34 (38.0)	47(52.0)	9 (10.0)	90(100.0)
5	Respiratory Problems	38 (42.0)	18 (20.0)	34 (38.0)	90(100.0)

Figures in parenthesis indicates percentages

Table.5 Percentage distribution of chronic health problems among urban elderly

Sl. No	Chronic health problems	To greater extent	To some extent	Not at all	Total (n=90)
		N (%)	N (%)	N (%)	
1	Cardiovascular disease	7 (7.70)	24(26.6)	59(65.7)	90(100.0)
2	Diabetes	61 (67.7)	23 (25.7)	6 (6.60)	90(100.0)
3	Arthritis	60 (66.6)	26 (29.0)	4 (4.40)	90(100.0)
4	Hypertension	64 (71.0)	20 (22.4)	6 (6.66)	90(100.0)
5	Respiratory Problems	5 (5.50)	35 (39.0)	50(55.5)	90(100.0)

Health problems were present to be a greater extent among urban elderly such as Poor vision (54.5%), dental problems (52.4%), depression (51%) and back pain (50%). While some of them had health problems 'to some extent such as Constipation (48.8%), poor hearing (42.2%), depression (41%) and headache (40%). Majority of the urban elderly had no health problems such as Skin issues (80%), tremors (74.3%), poor hearing (73.3%), fatigue (72.3%), dementia (54.5%) and acidity (54.5%), Similarly, Devi *et al.,* (2022); Ahmed *et al.,* (2018) and Barua *et al.,* (2017) revealed that majority of elderly had more than two health problems such as poor vision, hearing problems, knee pain and blood pressure.

Majority of the elderly from urban area had to greater extent common health problems such as poor vision, dental problems, depression, back pain, uncontrollable bladder and reproductive problems. Most of the elderly from rural area had to some extent common health problems such as poor vision, poor hearing, dental problems, uncontrollable bladder and reproductive problems. With regard to chronic health problems urban and rural elderly had to greater and to some extent such as diabetes, arthritis, hypertension, cardiovascular diseases and respiratory problems. The rate of overall health status was good among rural elderly as compared to urban elderly. Immediate health facilities and financial assistance and services through government hospitals and medical camps should be available to the elderly for better health status.

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Author Contribution

Sunkara Hanna: Investigation, formal analysis, writing—original draft. Lata Pujar: Validation, methodology, writing—reviewing.

Data Availability

The datasets generated during and/or analyzed during the current study are available from the corresponding author on reasonable request.

Declarations

Ethical Approval Not applicable.

Consent to Participate Not applicable.

Consent to Publish Not applicable.

Conflict of Interest The authors declare no competing interests.

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