# GERIATRIC PROBLEMS AWARENESS AMONG ADULTS IN RAWALPINDI

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### **ABSTRACT**

**Objective:** To assess the knowledge, attitude and practice (KAP) regarding elderly age health problems among adults of Rawalpindi.

Study Design: Descriptive cross sectional study.

Place and Duration of Study: Airport Housing Society Rawalpindi from July 2011 to Nov 2011.

*Material and Methods:* A total of 200 households of age 50-59 years were included in the study by convenient sampling technique (115 males and 85 females). Adult population of the age 50-59 years with physical and mental disabilities were excluded from the study. Data collected after taking informed consent was analyzed by SPSS 17.

**Results:** Mean age of respondents was  $54.78 \pm 3.41$  years. Knowledge regarding age limit of senior citizens was 140 (70%). A total of 174 (87%) knew about increased incidence of fall with increasing age but only 53 (26.5%) did any practical change. About 152 (76%) considered that prior knowledge about geriatric age problems can help plan for old age; efforts to get information about elderly age problems were reported by 170 (85%). There was a significant association between level of knowledge and efforts to stay healthy (p<.001). The difference between level of knowledge of males and females was significant (p=.007).

**Conclusion:** Prior knowledge among residents of the society was found to be a more preferred option to give people information about optimal aging, but this should be started at a much earlier time by facilitating information, to restore physical health to have a healthy and functional elderly individual in the society.

**Keywords:** Elderly problems, Geriatrics, Gerontology.

## INTRODUCTION

An individual 60 years old or more is considered an older person<sup>1</sup>. Geriatrics is a subspecialty of internal medicine that aims to promote health in older adults. In today's world people are living longer and birth rate is falling, resulting in increased aged population presenting with chronic illnesses and the rise in the cost of treatment<sup>2,3</sup>.

Elderly personnel often do not seek medical help because of cost or a misconception that health problems are an expected part of aging<sup>1</sup>. Knowledge about diseases is limited<sup>2</sup> whereas mobility impairment, urinary incontinence and visual impairment have the worst impact<sup>3</sup>. There is an increased risk of

Correspondence: Dr Samren Misbah, 413, street 13 Sector I, Airport housing Society, Rawalpindi, Pakistan (Email: samreen.misbah@hotmail.com) Received: 30 Aug 2013; revised received: 03 Feb 2015; accepted: 06 Mar 2015 accidents. The most common accidents are falls with peak incidence in winter<sup>5</sup>. The period of most severe dependency are the last years of life with a greater percentage of women<sup>6</sup>. Persons caring for elderly have to think about the physical changes while designing health programs<sup>4</sup>. The Geriatric Education Centers (GECs) are federally funded programs for the education and training of health care professionals of older adults in US<sup>4</sup>.

The majority of increasingly elderly population is living in developing countries (60% of the 580 million globally). By 2020 this will increase up to 70% of total elderly population<sup>3,7</sup>. With more than 10 million older persons, seven are developing countries amongst 15 countries including Pakistan. It is further estimated that there will be over 43 million people (15.8% of the total population ) over 60 years in Pakistan by 2050, compared with 11.6 million (6.5 % of the total population) at present<sup>8</sup>.

In Pakistan there is an apparent increase in mortality at age 50-64 years which is likely in relation to the growing burden of non communicable diseases<sup>7</sup>, which currently account for 59% of the total disease burden<sup>9</sup>. Average life expectancy in Pakistan is now 66 years and rising<sup>10</sup>, Pakistan is ranked 167<sup>th</sup> in 222 countries with life expectancy at birth of

# **MATERIAL AND METHODS**

A descriptive cross sectional (Knowledge, Attitude and Practice) study was conducted in Airport Housing Society Rawalpindi over a period of 5 months (July to Nov 2011). Respondents were selected according to inclusion criteria that was male or female,

Table-1: Table showing relationship of level of knowledge (with scores) with respect to gender, education and efforts to stay healthy for N=200

Level of Knowledge	Score	Gender		Education				Efforts to stay healthy			
		Male	Female	Un Educated	10 Yrs Education	>10-14 Years	>14 Years	Walk	Careful in food selection	Both	None
Less Knowledgeable	1-5	3 2.6%	11 13%	3 60%	1 2.7%	5 7%	5 5.7%	2 13.3%	11 20%	10.8%	0
Satisfactorily Knowledgeable	6-10	49 42.6%	40 47%	0	22 59.5%	27 38%	40 46%	6 40%	24 43.6%	53 47%	6 35.3%
Well Knowledgeable	11-15	63 54.8%	34 40%	2 40%	14 37.8%	39 55%	42 48.3%	7 46.7%	20 36.4%	59 52.2%	11 64.7%
Total		115 57.5%	85 42.5%	5 2.5%	37 18.5%	71 35.5%	87 43.5%	15 7.5%	55 27.5%	113 56.5%	17 8.5%

67.05 yrs<sup>11</sup>, but people are getting older without better living conditions and access to good healthcare. Data studied from eight South Asian countries including Pakistan, revealed that South Asians were six years younger (53 vs. 59 years) at their first heart attack <sup>9,12</sup>.

Physical activity is one of the important factors to maintain the functional independence of the older adults to achieve a healthy elderly life<sup>13</sup>. Age-related physiological changes do not necessarily result in disease<sup>14</sup>. Day for geriatrics is celebrated all over the world as well as in Pakistan on 1st of October. The aim of this study was to assess awareness among adults of a community in Rawalpindi about elderly age problems, so that effective measures may be taken in future to give a healthy elderly to the community. The study was a small attempt to highlight this important issue, so that adults are able to better manage themselves at age 60 years and more.

educated or uneducated, married or unmarried, of 50-59 years of age in selected houses. Respondents (50-59 years) with physical and mental disabilities were excluded from the study. Using WHO sample size calculator, 200 sample size was calculated i.e., adult population male 115 (57.5%) and female 85 (42.5%) of 50-59 years of age in the selected houses, with confidence level of 95%, anticipated population proportion (p) of 0.25 and absolute precision (d) of 0.06. Non-probability convenient sampling technique was used to select houses with respondents that fulfill inclusion criteria.

Data was collected through a self-reported questionnaire in urdu with mostly closed and a few open ended questions given to subjects through informed consent. Questionnaire was modified after a pretrial. A door to door survey was conducted. Data was entered and analysed using (SPSS) version<sup>17</sup>. Frequencies were

calculated for the variables and chi-square test was used to determine association between

able to name any 4 types of changes. Ageing was considered an inevitable process by 128

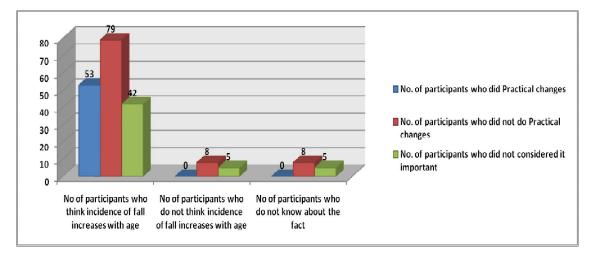


Figure-1: Opinion regarding increased incidence of fall with aging and practical changes done to decrease chances of fall.

different variables. Questions required to judge the level of knowledge were scored and the respondents categorized were as less knowledgeable (score 1-5), satisfactorily knowledgeable (score 6-10) and well knowledgeable (score 11-15).

It was not possible with sample size of 200 to present a true picture of an overall adult community in the country, but within limited resources it was a small effort to know problems as viewed for this coming age period. This study may provide some base line data to be used for further research.

# **RESULTS**

Total population surveyed comprised of 200 adults; 115 (57.5%) men with mean age  $55.73 \pm 3.28$  years and 85 (42.5%) women with a mean age of  $53.48 \pm 3.14$  years (mean age for all participants was  $54.78 \pm 3.41$  years). Among participants of the study there were different levels of education as shown in table-1. Majority (198) 99% were aware of the word "senior citizen", while 140 (70%) respondents knew about the age limit of senior citizen. A total of 187 (93.5%) knew that ageing is linked with many physical changes, but only 66 (33%) were

(64%). Among respondents 10 (5%) had diagnosed heart disease, 47 (23.5%) were hypertensive, 29 (14.5%) were diabetic, 17 (8.5%) had joint problems and 15 (7.5%) had stomach complaints and 82 (41%) did not have any complaints. Total 81 (40.5%) people were of the view that inappropriate diet intake in young age is the main reason of imperfect health in advanced age. In this study 89 (44.5%) were of the view that loneliness in old age is another important factor to be considered. Remarkably 174 (87%) knew the fact regarding increased incidence of fall with ageing, but, practical changes done to decrease incidence of falls by them was only 53 (31%). The computed chi square among various opinion groups do not appear to be homogenous towards practical changes to decrease chance of fall, shown in fig-1.

Opinion regarding how prior knowledge about geriatric age problems can help, was analyzed separately for three options, 152 (76%) respondents were of the view that prior knowledge about geriatric age problems can help them in preparation for old age, 68 (34%) were of the view that prior knowledge can help in reducing health expenditures and 111 (55.5%)

were of the view that prior knowledge can help reduce illnesses, illustrated in fig-2.

Efforts to get information about elderly age problems, and ways to stay healthy were reported by 170 (85%). Few questions were scored to judge the level of knowledge and awareness. There was a significant difference between level of knowledge of males and females (p=.007). A significant association between level of knowledge and efforts to stay healthy (p<.001) and knowledge level and education (p<0.001) was found, as shown in table-1.

### DISCUSSION

It is important that older people remain as independent as possible because the population of Pakistan is expected to age over the next fifty years<sup>15</sup>. In this study 23% population was hypertensive and 71% had a heart problem,

cardiovascular diseases, joint pains and respiratory diseases.

In this study 40.5% of the people were of the view that inappropriate found intake in young age was the main reason for bad health in advanced age and 152 (76%) were of the view that prior knowledge can help them avoiding such consequences. This is comparable to the study conducted in Taiwan to see the knowledge and attitude of elderly people about the prevention of coronary heart disease which showed that increasing age does not weaken the relation between health beliefs and health behaviors<sup>15</sup>.

A number of studies conducted previously have shown that lay persons have very little knowledge towards modifiable risk factors<sup>1</sup>, similarly 64% of this study group were of the view that changes with ageing are inevitable. About 87% participants in this study knew the

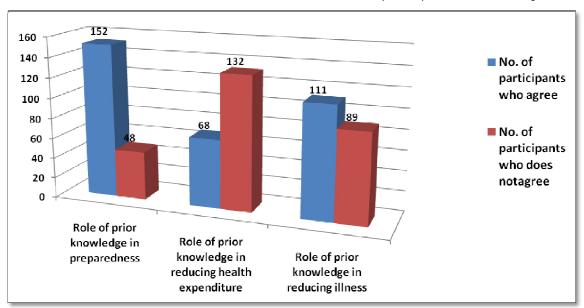


Figure-2: Opinion regarding role of prior knowledge in preparedness, reducing health expenditure and reducing illness.

diabetes mellitus and gastric problems which is comparable to a survey on health and living conditions of the elderly population with ages above 60 years conducted by Pakistan Medical Research Council<sup>7</sup>. The major health problems were chronic illnesses, particularly

fact regarding increased incidence of falls with ageing; it is consistent with the prospective study conducted in Hong Kong from 2006-2007<sup>5</sup> which has shown a co-relation between increased number of falls in older people of age 60 years or above, and low temperature.

Another study conducted in UK<sup>16</sup> identified patients at high risk of fall.

In this study 89 (44.5%) were of the view that loneliness in old age is another important factor, which is comparable to the study in Bangladesh which showed that roughly equal numbers of elderly men and women are living alone<sup>7</sup>.

Practically 85% of study population was doing efforts to get their knowledge updated about health changes with increasing age and this population can be prepared for optimal ageing. The process of education and awareness should have been started long before the actual disease as middle/old aged people have limited knowledge regarding health problems and healthy ageing, which is consistent with the study done in Taiwan<sup>15</sup>.

# CONCLUSION

Prior knowledge among residents of the society was found to be more preferred option to give people information about optimal ageing. The current study revealed that majority of people want to improve their health but this should be started at a much earlier time. Government as well as non-government organizations should work together to improve the conditions of senior citizens for which prior information and preparedness is a key factor. There is a dire need to work at various levels to improve knowledge by facilitating information about optimal ageing, to restore physical health as best as possible to have healthy and functional elderly individuals in the society. This concept to live independent lives in advanced old age is needed more in developing countries.

# **CONFLICT OF INTEREST**

This study has no conflict of interest to declare by any author.

### REFERENCES

- A strategy for active, healthy ageing and old age care in the Eastern Mediterranean Region 2006–2015. World Health Organization. cairo: Regional Office for the Eastern Mediterranean: 2006.
- Mahjabeen S. Geriatric Health Problems and Health Care Seeking Practice Among Elderly People Attending One Selected Geriatric Hospital. Bangladesh Journal of Physiology and Pharmacology. 2007; 23
- Nabeel Z, Hammad G, Sarah T, Waris Q. Health and needs assessment of geriatric patients: Results of a survey at a Teaching. Students' Corner.; 56(10): p. 470-474.
- John A T. Geriatric mental health disaster and emergency preparedness Therese M. Mierswa aeJLHae, editor. New York, NY 10036: Springer Publishing Company, LLC; 2010.
- Pui-Yee Y, Pui-Hing C, Jean W, Wai TY, Timothy HR. Higher incidence of falls in winter among elderly in Hong Kong. Journal of clinical Gerontology and Geriatrics. 2011; 2(1): p13-16.
- Mayhew L. Health and Elderly Care Expenditure in an AgingWorld. policy report. International Institute for Applied Systems Analysis, Laxenburg, Austria; 2000.
- Jehangir K, Abdu Q, Huma Q, Rizwan-Ullah, Kaverri H. Survey on the health and living conditions of the Elderly population of Pakistan. 2005
- Li SM. Tribune Pakistan Aging Population. [Online].; 2012 [cited 2014 may tuesday. Available from: HYPERLINK "tribune.com.pk/story/464108/pakistans-aging-population" tribune.com.pk/story/464108/pakistans-aging-population
- world bank report pitET. Heart disease, diabetes on the rise in Pakistan. [Online].: 2011 [cited 2014 may 13. Available from: HYPERLINK "1.%09tribune.com.pk/./world-bank-report-heart-disease-diabetes-on-the-rise-i"1. tribune.com.pk/./world-bank-report-heart-disease-diabetes-on-the-rise-i.
- Mundi I. Pakistan Demographics Profile 2013. [Online].; 2013 [cited 2014. Available from: HYPERLINK "www.indexmundi.com" www.indexmundi.com.
- 11. The world fact book.Country comparison: life expectancy at birth. [Online].: 2014 [cited 2014 may 13. Available from: HYPERLINK "https://www.cia.gov/library/publications/...world-factbook/../2102rank.h."https://www.cia.gov/library/publications/.world-factbook/./2102rank.h.
- Abbas S, kitchlew AR, Abbas S. Disease Burden of ischaemic heart disease in Pakistan and its Risk factors. Ann.Pak.Inst.Med.Sci. 2009; 5(3): p. 145-150.
- Yan T. Translating two physical activity programs for older adults into Home and community based settings. Active start and healthy moves for aging well. 2009.
- Nnual Report Training the Next Generation. Geriatric medicine fellowship., Department of Internal Medicine 2008 Annual Report; 2008.
- Wei-Chien C, Yi-Cheng Y, Karen G. The Knowledge and Attitudes of Coronary Heart Disease Prevention among Middle and Older Aged People in a Community in Taipei. Lay People's knowledge and attitudes of CHD prevention. 2009; 4: p. 252.
- Miedany Y, Gaafar M E, Toth M, Palmerd D, Ahmed I. Falls risk assesment score (FRAS): Time to rethink. Journal of clinical Gerontology and Geriatrics. 2011; 2(1): p. 21-26.