

## Co-morbidity in Geriatric Patients Attend Elderly Clinic in Al-Yarmouk Teaching Hospital

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### **Abstract**

**Introduction:** Ageing is an inevitable stage of life, it carries two inconvenient events: physiologic decline and disease state. It is a challenge for the health system. By descriptive study the authors reviewed the medical record files organized to patients attend the clinic during last year starting from November 2016 through October 2017.

This study covered 72 elderly patients. Mean age of patients was 66.31+ 6.44. Quarter of patients presented with chest pain, followed by dyspnea at a rate of 23.6%. Patients with a combination of chronic diseases, hypertension, diabetes mellitus, and ischemic heart disease formed 30.6%. Hypertension alone was found in 18.1% of the total sample, diabetes mellitus in 4.2%, and ischemic heart disease in 11.1% of cases.

Ageing process cause deterioration in some functions of the body, also it increases the prevalence of chronic diseases.

**Key words:** Baghdad, chronic diseases, presenting symptom, age

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### **Introduction:**

Population aging will continue or even accelerated as a result of falling fertility rates and remarkable increases in life expectancy<sup>1</sup>. The world's population average age is increasing and those over the age of 80 are the fastest growing population worldwide<sup>2</sup>.

Ageing is an inevitable stage of life, it carries two inconvenient events: physiologic decline and disease state<sup>3</sup>. Becoming older brings many changes in our lives, such as dynamic shifts in our health across multiple domains. Physical, mental, behavioral, and social health all undergo transitions with aging<sup>4</sup>.

Medical and social support provided by family caregivers has important consequences for old people quality of life<sup>5</sup>.

The predominant health problems of older people are chronic rather than acute and are exacerbated by the normal changes of ageing and the increased risk of illness associated with old age. In some countries, the number of people entering older ages will challenge health system<sup>1</sup>. It is also a challenge for the community and government to find alternative care strategies to meet the specific demands of the elderly and their families<sup>6</sup>.

This study aimed at throwing light on the elderly patients regarding their main problems, presenting symptoms, and the most prevalent chronic diseases.

### **Methodology:**

Because of the improvement in health services the life expectancies rose in the last decades and the geriatric social class started to broaden and became larger. Beside that, because of the special needs and behavior of those patients a specialized clinic was established in 2001(Elderly Clinic) in the capital Baghdad to offer health services that meet their special need. This pioneer project faced some obstacles since it was a new concept. Reactivation of the clinic was achieved in 2009 with more mature view, more than one clinic were started to work in different hospitals in Baghdad. The Elderly Clinic in Al-Yarmouk teaching hospital is one of these clinics started to provide medical services to the geriatrics. Medical record files organized to patients attend the

clinic for further follow up.

This study is a descriptive one done by reviewing the medical files in the last year starting from November 2016 through October 2017.

**Statistical issue:** collected data were entered into a computer using SPSS software program v24 for grouping and analysis of data. Results presented in figures and tables using frequency and percent.

**Results:**

This study covered 72 elderly patients. Their range of age was 60-92 year with a mean age of 66.31+ 6.44. The first age group (60-69) year was the highest group forming 73.6%, followed by the second group (70-79) year constituted 18.1 year, and at last came the age group (80 & more) by 8.3 year (Fig-1). Female patients were slightly more than male (55.6%, 44.4%) with 1: 0.8 ratio (Fig-2).

Symptoms or diseases more frequently encountered in elderly patient included in this study are presented in table-1. Ten patients (13.9%) have poor hearing, while 27(37.5%) have poor vision. Urine incontinence was found in 23.6% of patients but fecal incontinence was low 1.4%.

Table-2 showed the main signs and symptoms leading the patients to attend the geriatric clinic seeking medical advices. Quarter of patients presented with chest pain, followed by dyspnea at a rate of 23.6%, other symptoms (epigastric pain, numbness left arm, left sided weakness, right loin pain, slurred speech) were at the bottom of the list at a rate of 6.9%.

Chronic disease prevalence among the study sample was explored and was found to occur either as a single disease or in combination. More than quarter of patients 30.6% had hypertension, diabetes mellitus, and ischemic heart disease. Hypertension alone was found in 18.1% of the total sample, diabetes mellitus in 4.2%, and ischemic heart disease in 11.1% of cases (Table-3).

**Discussion:**

The majority of the attendants to the elderly clinic were in the age group of 60-69 year this indicates that although there is some population transition toward older age group but it is still beyond that found globally. The life expectancy in the general population is 69.6 years<sup>7</sup>, this can be attributed to many factors such as the health care system is still not well developed as that found in the developed countries, social conflict in past years, internal displacement with low environmental hygiene, and broken infrastructure.

Male constitute 50.5% of the population and the female was close to that, it form 49.5%<sup>7</sup>. Female attendees were higher than male in this study.

Aging process carries deterioration in many systems' function. Among the various health problems affecting the elderly, hearing impairment remains one of the most important issues which need to be addressed<sup>8</sup>. Although it is common but it is under-reported problem among the elderly<sup>9</sup>. Loss of hearing is the most widespread sensory impairment in aging people. Hearing acuity declines with age<sup>10</sup>.

In the current study hearing impairment reported in 13.9% of the sample. Hearing loss has been identified as one of the most frequent chronic conditions affecting older populations, reportedly affecting 30% to 46% of older adults in various populations<sup>11</sup>. In a study done in Saudi Arabia the prevalence of hearing loss was found to be 28% in people aged over 60year<sup>12</sup>. In Nigeria, the prevalence of age related hearing loss among the elderly have been documented to be about 6.1%, while up to 60% have been reported in some other developing countries<sup>13</sup>. In Malaysia about 30% of elderly above the age of 60 have some degree of hearing loss<sup>8</sup>. In the United States, the prevalence of hearing loss among community-dwellers above the age of 70 has been estimated at 33%<sup>9</sup>.

Visual impairment is a common and debilitating health problem among older adults<sup>14</sup>. Aging is associated with an increased risk of visual impairment<sup>15, 16</sup>. More than two thirds of all severely visually impaired people are 65 years old and above<sup>14</sup>. Impaired vision reported in 37.5% of the elderly patient in this study. In a study 17% of adults aged 65-74 and 26% of those aged 75 years and older have some form of visual impairment<sup>15</sup>. There are around two million people with vision impairment in the UK; the majority of them are aged over 60<sup>17</sup>.

Urinary incontinence is a very common and distressing problem amongst elderly population, and can affect men and women<sup>18, 19</sup>. It possesses significant physical, psychological and social consequences<sup>20, 21</sup>. It can lead to

impairments in overall functional status and is associated with significant negative effects on both overall and health-related quality of life<sup>16</sup>. Epidemiologic studies showed that the incidence of urinary incontinence increase with age<sup>22</sup>. Urine incontinence found in 23.6% of the patient in this study. Whereas the range of prevalence estimates among community dwelling patients vary from 2% - 58%<sup>24</sup>. In a study in Turkey the incidence rate in the population over 60 years is 15-30%<sup>23</sup>. In a study conducted by *Loh K Y. and Sivalingam N.* in Malaysia the prevalence of urinary incontinence in the elderly population varies from 30% to 50% according to age<sup>20</sup>.

In a community study the prevalence of urinary incontinence was 6% in the over 65 and 15% in the over 85 (both sexes)<sup>24</sup>. A prevalence study using a cross national data base found a prevalence of urine incontinence in five European countries, North America and Japan varying between 43 and 65%<sup>25</sup>. *Neki N. S.* described urinary incontinence as a very common condition with prevalence ranging from 10% to 34% especially amongst elderly where prevalence reported is one amongst every three persons<sup>19</sup>.

As all the patients in our sample were elderly people many of them have one or more of the chronic diseases. Chronic diseases conditions tend to cluster and people with one chronic condition are more likely to have other types of chronic conditions<sup>26, 27</sup>. Evidence-based medicine for treatment and care generally focuses on a single disease, and passes over concomitant diseases which can cause damage, treatment failure, and a decline of quality of life<sup>13, 28</sup>. In the United States, about one-half of all adults have one or more chronic health conditions. In India there are large and rising burdens of chronic diseases, which accounted for 53% of all deaths<sup>26</sup>. Less developed countries of Africa, Asia and Latin America will experience the biggest impact of this rising global burden of chronic diseases<sup>29</sup>.

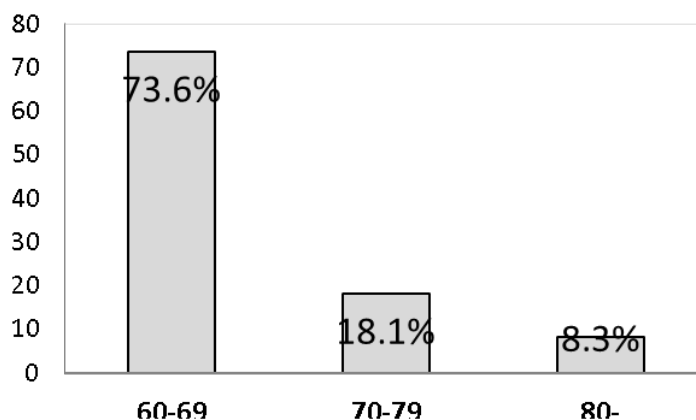


Figure-1 Sample's age group

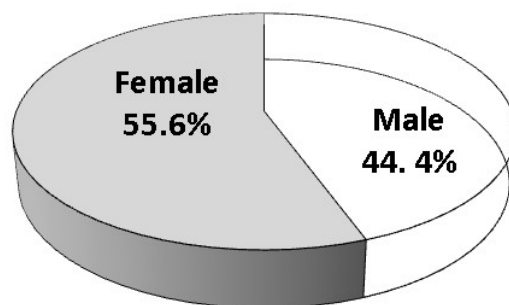


Figure-2: Distribution of the study sample according to gender.

	No.	%
Hearing loss	10	13.9
Impaired vision	27	37.5
Urine incontinence	17	23.6

Chief complaint	No.	%
Chest pain	18	25.0
Dyspnea	17	23.6
Dyspnea on exertion	8	11.1
Palpitation	8	11.1
Dizziness	6	8.3
Headache	5	6.9
Polyuria & polydipsia	5	6.9
Others	5	6.9
Total	72	100.0

Others (epigastric pain, numbness left arm, left sided weakness, right loin pain, slurred speech)

Chronic diseases	No.	%
Hypertension, diabetes mellitus & Ischemic heart disease	21	29.2
Hypertension	14	19.4
Hypertension & Diabetes mellitus	13	18.1
Ischemic heart disease	8	11.1
Hypertension & Ischemic heart disease	4	5.6
Diabetes mellitus	3	4.2
Diabetes mellitus Ischemic heart disease	2	2.8
Chronic renal failure	2	2.8
Cardiovascular accident	1	1.4
None	4	5.6
Total	72	100.0

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