



## **Health services needs of older persons: emerging findings from Tarakan City, East Kalimantan**

**Rina Kusumaratna\*, Mohammad Afzal Mahmood\*\*,  
Maskito Asmadi Soerjoasmoro\*, and Khairul\*\*\***

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### **ABSTRACT**

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\*Department of Public Health,  
Faculty of Medicine, Trisakti  
University

\*\*Dicipline of Public Health,  
University of Adelaide, South  
Australia

\*\*\*District Health Office,  
Tarakan City, East Kalimantan

#### **Correspondence**

Dr. Rina K. Kusumaratna, dr,  
M.Kes.

Department of Public Health,  
Faculty of Medicine,  
Trisakti University  
Jln. Kyai Tapa no. 260, Grogol  
Jakarta Barat – 11440

Phone: 021-5672731 ext.2504

Email:

rkusumaratna@gmail.com

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As older persons are steadily increasing in number and there are no specialized comprehensive healthcare services for older persons in Indonesia, including East Kalimantan, the aim of the present study was to determine the extent of the problems facing healthcare staff and officials in Tarakan City, East Kalimantan, in providing comprehensive healthcare services attuned to the needs of older persons. This study was a qualitative interview-based survey with focus group discussions, involving heads and healthcare officials of seven *puskesmas* in Tarakan City, East Kalimantan district, with the addition of a number of district health planning officials. The results revealed a difference between daily hospital referral rate of older persons by *puskesmas* staff and actual daily hospital admission rate for the referrals. None of the consulted healthcare staff had any speciality education in geriatrics or older persons health. The older persons most frequently presented to the hospital with hypertension, diabetes, and myocardial insufficiency. On the other hand, at the health centers the presenting conditions were hypertension, gastroenteritis, rheumatism, sleep disorders, and upper respiratory tract infections. Improved access to healthcare for older persons should be achieved by improving knowledge and skills of human resources, including communication skills, and of supporting healthcare service infrastructure at *puskesmas*, specifically oriented towards the needs of and designed for use by older persons, such as ramps for wheelchairs, and handrails in corridors. Local governments should strengthen the appropriate service delivery to older persons, and provide support for the maintenance, sustainability and strengthening of community-based care for older persons.

**Keywords:** Health services, community based-care, older persons, Tarakan City

### **INTRODUCTION**

Currently the ideal of old age does not only focus on the added number of years, but has

the additional requirement of quality of life (QOL), with emphasis on healthy lifestyle as determinant of QOL. This shift in concept necessitates the implementation of a

comprehensive health care program from health center up to hospital level. Populations in developing countries are aging more rapidly than those in the developed world, and this has implications for medical training in these health institutions. By knowing older persons' health care needs it should be possible to build a strong health program for older persons.

Improvements in life expectancy have resulted in incremental growth of the older population group, accompanied by a correspondingly smaller increase in the younger population groups, thus altering the balance between the younger and older population groups. The average life expectancy is predicted to rise continuously from 67 to 74 years by the year 2025. The increasing age and size of the older population group lead to public health issues, the solution of which should be implemented through appropriate policies and programs that stress the right of older persons to stay healthy.<sup>(1-4)</sup> Up to the present time, the health centers in South Jakarta have not yet implemented community-based primary healthcare services for older persons, who still receive the same kind of treatment as the other age groups, while there are only few hospitals with geriatric wards and specialists in geriatric medicine.<sup>(5-7)</sup>

Primary healthcare services for older people can play an integral part in healthy aging and the life course approach. Primary healthcare services can support health promotion, disease reduction and prevention, early diagnosis, and effective management of chronic illnesses. The reality of primary healthcare services in the developing countries is that healthy aging and the life-course approach is not well-understood or applied by the healthcare providers at the primary level. In the area of health promotion, health care providers typically do not spend time with older persons to encourage the development of behavioral changes (for example, healthy diets and routine exercise) that can reduce the risks of chronic illnesses. In Indonesia there has so

far been little research conducted to identify the preparedness of the health services in the public sector for providing specialized care to older persons, particularly in places outside Jakarta. Like other provinces, the East Kalimantan health service system is decentralized at the district level. District health services are striving to improve access to care and quality of care, particularly for the socio-economically disadvantaged, including older persons. The East Kalimantan government has launched initiatives to strengthen its health system. Because of the need to build access for older persons due to their increased needs for health services, the East Kalimantan government is keen to increase the health services access for every resident of East Kalimantan, including older persons. The objective of the present study was to determine the extent of the problems facing healthcare staff and officials with regard to health services for older persons in Tarakan City, East Kalimantan. In particular, the study aimed to obtain input from these officials on challenges and opportunities of a decentralized district health service system to improve access to comprehensive and integrated care for older persons.

## METHODS

### Research design

Qualitative methods were used through in-depth interviews involving different stakeholders, such as health care providers, officials at *puskesmas* and district health officers. The research project was completed in 4 months, from September to December 2010.

### Study subjects

The study interviewed 14 respondents from 7 *puskesmas*, consisting of two healthcare staff from each *puskesmas*, namely the head of *puskesmas* and the healthcare provider or official for older persons. In

addition, the respondents included 3 district government officials responsible for older persons' healthcare planning at district level.

**Data collection**

After obtaining informed consent from the respondents for the qualitative interviews, initial guided conversations were held, for determining the main topics for the interviews, which were conducted by personal face-to-face contacts. During the interviews, all of the conversation were recorded using an audio recorder, which were subsequently confirmed by the respondents. However, due to difficulties in the field, most of the data were recorded by handwritten notes only, with the important points of the interviews being transcribed afterwards. The qualitative data were converted into electronic format and stored in secure password-protected computer for the duration of the project. Any data not in electronic format (e.g. completed copies of surveys) were stored in a locked filing cabinet at the Faculty of Medicine, Trisakti University, Jakarta.

**Statistical analysis**

The data analysis provided a description of a narrative explaining the main issues, marking the underlying ideas in the data, grouping similar information together, and relating different ideas and themes to one another. In the final stages of the analysis, the data and links were organized to create a clear description of an issue topic. Analysis of the issues of discussion with healthcare providers and officials identified their perspectives on factors determining the quality of care, and the need of comprehensiveness of integrated care for older persons.

**Ethical clearance**

The study was approved by the Medical Research Ethics Committee of the Faculty of Medicine, Trisakti University, Jakarta and the Human Research Ethics Committee of the University of Adelaide.

**RESULTS**

In focus group discussions with 17 healthcare officials at health center and Health District level, the issues included their knowledge on geriatric medicine and gerontology, and older persons' health, and their training in these areas. Additionally, they were asked about the main type of illness of older persons and the readiness of the healthcare services for older persons. Table 1 shows the characteristics of officials responsible for the healthcare of older persons.

**Extent of service provision and health center-to-hospital referrals**

The healthcare staff at the health centers reported that every day on average between 5 and 15 older patients visited each *puskesmas*, and that on average they referred about four patients to hospitals every day. However, the daily hospital admittance rate was reported to be only about one older person. According to *puskesmas* staff, they provided the history of the disease, symptoms, and information on use of medicines with their referral letters. Most of these referrals were for hypertension, diabetes mellitus complications, heart disease and stroke. It was mentioned that these *puskesmas* have access to 24-hour ambulance service, and if needed the patient could be transferred from the *puskesmas* to the hospital using the *puskesmas* ambulance.

Table 1. Characteristics of officials responsible for older persons' healthcare

Variables	n (%)
Age (mean,SD) yr	35 ± 7
Gender	
Male	9 (53)
Female	8 (47)
Location	
<i>Puskesmas</i>	14 (82)
District Health Office	3 (18)
Specialty	
Physician / dentist	11 (65)
Nurse / midwife	6 (35)

### Education, training, and experience in older persons' health

None of the consulted healthcare staff had any speciality education in geriatrics or older persons' health, and only one had received some training about healthcare for older people. This training focussed on nutrition, mental health, and health promotion. One of the healthcare staff had attended a seminar two years ago, on disease prevention and maintenance of the health of the elderly. The healthcare staff mentioned that their experience was based on their examining older persons on a daily basis. They also pointed to the availability of some manuals on management of diseases among older persons. However, these healthcare providers were not familiar with various screening instruments, except the Geriatrics Depression Scale, that was used in hospitals, and helped identify mental health issues among older persons.

### Signs and symptoms

The older persons in this study most frequently presented to the hospital with hypertension, diabetes, and myocardial insufficiency. On the other hand, at the health centers the presenting conditions were hypertension, gastroenteritis, rheumatism, sleep disorders, and upper respiratory tract infections.

### Challenges to provision of care to older persons

In addition to the lack of training and education in geriatrics, the staff pointed to the issue that many older persons presented with multiple and complex problems. Diagnosis and treatment of a combination of diseases is quite difficult and challenging for the local staff. The staff also pointed to the difficulty in communication with older patients.

### Suggestions by the healthcare staff to improve care for older persons

It was suggested that there is a need for training in geriatrics and in communication skills

Table 2. Experiences in older persons' healthcare

Variables	n (%)
Geriatric medicine / Gerontology conference	4 (24)
Geriatric assessment tools	4 (24)
Problems in diagnosis	10 (59)
Problems in therapy	11 (65)

while providing care to older persons, as only a small percentage (24%) of healthcare officials had attended workshops or seminars in geriatrics and had some knowledge of geriatric assessment tools (Table 2). Additionally, more than 50% of the respondents had problems related to diagnosis and therapy. It was also highlighted that medicines needed for treating multiple complex issues were at times not available, as is the case with the needed laboratory investigations. Therefore, the staff also suggested improving the availability of medicines and providing a comprehensive range of laboratory tests for older persons. Furthermore, the healthcare staff at *puskesmas* pointed to the need for a special emphasis on older persons care by providing specific areas within the health center for interacting with older persons and administering prompt treatment. The interviewed staff mentioned that improving the quality of healthcare necessitates improvement of the skills and knowledge of the staff, and of the available infrastructure, including allied health.

### DISCUSSION

The findings revealed several issues that could be listed for improving and strengthening the existing programs that have been implemented in the field. The point of view of the healthcare staff indicated that education and training skills in older persons' healthcare system needs to be improved, including the infrastructure, so that the quality of services for older persons thereby will also improve. These

needs are equivalent to the factors affecting the chances of older persons for accessing comprehensive healthcare at the health center.

Improvement of communication skills between medical practitioners and older persons or their caregivers is essential for improving the quality of care. Service providers could directly support medical management, especially adherence to medication (compliance) and provide patients with accurate information related to health education, that they might need for understanding and managing their illness. Healthcare service providers should have sufficient knowledge and skills to provide services of high quality and give satisfaction to their clients. In addition, healthcare workers should also have an awareness of their negative attitudes to older people and the lack of involvement of older people in decision-making about their care and treatment.

As stated by the WHO,<sup>(8)</sup> the community health care (CHC) framework has proposed the Primary Health Care (PHC) approach to better address the needs of older persons. The approach provides a framework for integrating health and welfare systems and strengthening of older peoples' relations with their family and communities, regardless of abilities or disabilities.

Current impediments to holistic patient-centered care are to be found in the short time allocated for consultations and the single-disease approach in consultations. Older persons frequently suffer from co-morbidities and therefore need a multidisciplinary approach that is focused on their individual needs, instead of the medically oriented singular approach, which leads to fragmentation of care and treatment. Other arguments for implementing a multidisciplinary approach include both raised community expectations for health care as well as economic considerations of cost-effectiveness.

In Indonesia, accessibility of health services is relatively good, while accessibility of public services is still limited. Since 2001, the Indonesian Ministry of Health has launched the

“*Puskesmas Santun Usia Lanjut*” program for older persons, consisting of five levels of preventive activities, but the results were limited.<sup>(5,8)</sup> Thus it is important to maintain the accessibility of older persons' health services at the highest level and improve the existing public health services to support older persons' accessibility to public facilities.

The need is for a comprehensive and holistic approach<sup>(9-11)</sup> with an overview of all important health problems, in order to arrange and reduce these into a unified treatment scheme. This approach should be divided into two stages, i.e. accomplishment of a comprehensive health overview, and selection of important health problems to develop a holistic care plan.

Health services could play an important role in this regard by provision of comprehensive curative, preventive, and promotive care. However, many of the health services lack resources and structures to prioritise and provide better quality and comprehensive services for older persons. Barriers to delivery of services need to be removed by prioritising older persons' needs, assessing the current situation and introducing needed changes in provision of care for older persons and inter-service cooperation for achieving integrated care. An innovative and comprehensive approach to improving the health and well-being of older people by promoting healthy living at home needs to be developed, especially in the health centers for first level of prevention and also in the hospitals for second and third levels of prevention. However, all levels should have a better referral system to make the system optimally functional and relevant to the complex needs of older persons.

The spectrum of older persons' care often require both outpatient and inpatient care due to chronic disease affecting them.<sup>(4,5,12)</sup> The community setting should encourage healthy living, and healthcare services should be able to cater to complex needs. The health services can do this by reorienting towards comprehensive care, care that is cost effective and affordable,

and where referral pathways are well established and easy to follow and maintain. Working together requires good discharge planning as well. Service access needs to be flexible and responsive to short-term care needs, as the number and types of health services used by older persons are influenced by many factors. Frequency and intensity of service use are related to health status, level of impairment and access factors.

Many older persons suffer from co-morbidities. A study in Malaysia involving older persons with knee joint osteoarthritis showed that more than 90% of those older persons had more than one disease. Even in the early 1990s, older persons in Indonesia had a high incidence of CVD and hypertension.<sup>(4,12)</sup> With increasing population aging, these issues have become a highly important public health issue, requiring immediate attention. Older people become more vulnerable as they grow older because of the gradual onset of physical and mental disabilities. Family assistance given to older persons may be limited, particularly among poor families, and the support for older persons' welfare provided by the Government and the community is very limited and practically inaccessible to many older persons.<sup>(4)</sup> The incidence of disability is known to increase with old age, and the first most likely causal factor of disability is mobility. Impaired mobility increases dependence on caregivers. In a number of cases the disability may be permanent, which makes older persons person dependent until death. As such, the required intensity of care for older persons increases with disability.<sup>(10,11)</sup> Thus, older persons with a disability, particularly those who are bed-ridden, need special care. Current trends in the aging population of East and South-East Asia imply that there will be a growing need for providing such special care facilities for an increasing proportion of the population of older persons.<sup>(13)</sup>

Economic considerations may also have an impact on the behavior of providers and patients, as both parties have to consider the economics of the provided health care. Financial incentives

created by healthcare systems to providers and caregivers may affect the implementation of health care services to older persons, both qualitatively and quantitatively.

Therefore, to improve the cost-effectiveness of healthcare for older persons requires a thorough understanding of the intricacies of the healthcare system. Priority setting involves changes in organizing consultations, by initially obtaining health overviews for the majority of older patients, followed by systematic processing of the various health problems affecting a patient, to be completed within one consultation. Finally, to reduce the number of treatable problems to an ideal minimum through shared priority setting, an essential tool is patient-centered communication.

Person-centered holistic health care requires not only medical competency of caregivers, but also empathy for older persons as patients, ensuring a mutually respectful relationship and cooperation between caregivers, patients and their family, and thus transcending traditional ideas of individualised care.<sup>(14)</sup> In this connection, to arrive at optimal health care decisions, the health care workers must also take into consideration the personal history of the older patients and their perceptions, aspirations and concerns, frequently provided by the patients' family.<sup>(15,16)</sup>

One limitation of this study was the small number of healthcare officials as respondents, due to the scope of this study, which was restricted to governmental health offices and therefore did not include private institutions or clinics.

## CONCLUSIONS

Improvements are needed in providing access to health care, especially for older persons. Some aspects should be developed, such as knowledge and skills of human resources, and the supporting healthcare service infrastructure at *Puskesmas* for implementing

primary healthcare for older persons. Local governments should make plans for strengthening the appropriate service delivery to the growing numbers of older persons, and should provide support for the maintenance, sustainability and strengthening of community-based care for older persons.

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## Author contributions

All authors (RK, MAM, MAS and Kh) contributed equally to the conduct of the field work and data management, including data analysis. RK and MAM were also responsible for conceptualization of the study and preparation of the research report, and take full responsibility for the content of this report.

## Declaration of conflicting interest

The authors declare no potential conflicts of interest with respect to the authorship and/or publication of this article. 

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