

Age-Friendly Hospital Environments: Qualitative Exploration of the Senior Citizens and Caregivers' Perspectives

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ABSTRACT

Introduction

Age-friendly hospital environments, and quality care are very crucial for maintaining the health and well-being of older adults. Globally, despite the growing concerns of age-friendly environment, limited research exists on how the senior citizens and their caregivers perceive the hospital environments. Hence, this study explores their perspectives to inform improvements in providing age- friendly care and services.

Methods

Descriptive phenomenological qualitative research was conducted at two tertiary-level hospitals in Nepal. A total of 28 participants were selected purposively and data were collected through in-depth interview using semi-structured interview guidelines and analysis was done by following Colaizzi's 7-steps of qualitative data analysis method.

Results

Four main themes were extracted from the data analysis : 'need to access healthcare facilities;' 'urgent need for expansion of age-friendly hospital services;' 'the age-friendly physical environment;' 'need for information, education, and effective communication in an age-appropriate manner. Participants expected for the availability of transportation facilities, affordable/free hospital services, priority, and prompt services with adequate facilities. Additionally, participants emphasized on continuous presence of care givers, a separate, no queues and digital payment system in billing counter, timely information, a separate geriatric ward/OPD with age-friendly physical infrastructure with religious and spiritual support as essential elements of an age-friendly environment.

Conclusion

This study highlights the need to create age-friendly hospital environment through development, implementation, promotion of policies, infrastructures, and age-sensitive approaches to enhance the well-being of senior citizens.

Keywords

Age-friendly hospital environment; care givers; elderly-friendly hospital environment; health policies for senior citizens

INTRODUCTION

The world's population is aging rapidly. It is expected to increase to 13.7% and 20.3% by 2030, and 2050, respectively.¹ In Nepal, Senior Citizens are defined as those age 60 years and above. There are 10.21% (2.97 million) older people in Nepal as of the 2021 census.² The burgeoning aging populations poses the numerous challenges in maintaining well-being of older adults³ due to increased need for long-term care and support,⁴ risk of declining functional ability and failure to return home while in hospital that demand the increase need of an aged-friendly hospital environment.⁵

The age-friendly hospital environment provides a variety of services including easy access to the hospital, health care and services both inpatient and outpatient services, age-appropriate physical environment, specified visiting time for older patients, and staff training.^{6,7} Tanyi and Pelsers³ mentioned age-friendly services, the expectation from government and hospital management, and health policy related to senior citizens as main themes towards an "age-friendly-hospital". The study in Ontario mentioned that the physical environments of hospitals impact in appropriate care for senior citizens.⁸ World Health Organization (WHO)⁹ has stated the age-friendly hospitals' principles and focused on creating age-friendly environments as the priority area for action to provide quality care to senior citizens. Various studies revealed that older patients explored the need for a homely, supportive environment, good physical infrastructure, personal space, and provision of recreation and leisure activities.^{10,11} Similarly, they often perceived persistent communication gaps, feeling unheard and difficulty in accessing services.¹² In this context, caregivers play a vital role by providing care, support, advocating for the unique needs and promoting the health and well-being of senior citizens.¹³

Despite the growing concerns and implementation of age-friendly hospital environment, in the Nepalese context, a handful of studies have been conducted regarding age-friendly environments. Hence, this study would help to explore the perception of an age-friendly environment from senior citizens and their care givers' perspectives which would help to improve the provision of age-appropriate health care services.

METHODS

Descriptive phenomenological research was conducted at two university hospitals in Nepal: Tribhuvan University Teaching Hospital (TUTH), and Manmohan Cardiothoracic Vascular and Transplant Center (MCVTC). Through the purposive sampling technique, 28 participants (14 senior citizens, age 60 years and above, hospitalized for at least 5 days, and their 14 primary caregivers) were selected.

Data were collected using semi-structured, in-depth interviews (IDIs) by using interview guidelines which were developed based on the "WHO Age Friendly PHC Toolkit"⁶, "Rashmi's checklist"⁷ and consultation with the experts.

Ethical clearance was obtained from the Institutional Review Committee of the Institute of Medicine, Tribhuvan University [Ref no. 478(6-11) E2 077-078], and administrative permission was obtained from concerned authorities before data collection. Written informed consent was obtained from all the participants for voluntary participation and audio recording of the interviews. They were assured of the confidentiality of the information. IDIs of senior citizens and their caregivers were carried out separately, maintaining privacy at their convenience time between 12:00-5:00 pm. Each participant was approached up to two times if needed to complete or clarify the interview. The interviews were audio recorded and note-taking was done simultaneously. The duration of each IDI was about 30-45 minutes. Throughout the IDI, safety and comfort of the participants were carefully considered. Data collection was continuously carried out till data saturation when no new themes or insights emerged from subsequent interviews.

Data collection and analysis were carried out simultaneously from 1st April 2022 to 31st July 2022. The audio records were transcribed and then translated into English. Data were analyzed manually, following 7 steps of Colizzi's (1978).¹⁴ Initially, the researchers listened to each audio recordings several times (4-5 times) to understand the clear meaning. Then, significant phrases and statements extracted from the transcripts, coded, and formulated meanings. These were grouped into clusters of themes, which were refined and finalized based on mutual agreement among the research team after thoroughly reviewing, rechecking the accuracy and consistency of the findings.

Trustworthiness was enhanced by taking measures to address the credibility, dependability, confirmability, and transferability of the findings. Credibility was ensured by encouraging the participants to share their perspectives, researchers' prolong engagement with data, and consulting with expert during analysis. Dependability was maintained by using the same guideline in each IDI, promptly transcribing and translating data and engaging in rigorous or open discussions with fellow researchers and the experts throughout the study period. Confirmability was achieved by reviewing the developed themes and interpretations to accurately reflect the participants' original narratives by cross-checking the codes and themes, reaching consensus through discussion and mutual agreement among the research team prior to finalizing the findings. Transferability

was addressed by using rich descriptions of the participants' perspectives that were mentioned with direct quotes.

RESULTS

Demographic Characteristics of the Participants

A total of 28 participants (14 senior citizens and their 14 caregivers) participated in in-depth interviews from both hospitals. Regarding senior citizens, 42.9% of participants were 80 years and above, and 35.7% were between the ages of 60-69 years. Among them, 57.1 % were male. Half of the participants had completed up to primary level education, and 57.1% were from MCVTC. The mean duration of hospitalization was 7.29±2.9. Among the care givers 50% of participants were more than 35 years old with a mean age of 33.86±6.3SD, 64.3% were male, and 50% had completed a bachelor's degree and above. Regarding relations with senior citizens, half of them were sons, and 21.4% were daughters.

The senior citizen and their care givers expressed various experiences and opinions toward age-friendly hospitals. Table 1 presents the themes that emerged from the analysis.

Theme 1. Need to Access Healthcare Facilities

1.1 Availability of transportation facility

Several participants highlighted the importance of transportation facilities, ambulance services, and the hospital's transportation system might be made accessible to health care services.

Ambulance services made it very easy to reach the hospital in time. (39 years, Female, CP-4)

Transportation services like a pick-up and drop system from the hospital would make it easy for access to health care. (62years, Female, SC-5)

...those who are from remote areas where there are no transportation facilities, such people might end their lives.... (79 years, Male, SC-13)

Some of the participants mentioned the financial barrier plays a major role in seeking treatment and suggested discounts and free travel costs to increase accessibility.

There are no proper transportation facilities, we have to come via flight which is costly. We have to face many difficulties in transportation and financial aspects. (36years, Male, CP-7, 81years, Male, SC-6)

Theme 2. Urgent Need for Expansion of Age-Friendly Services

2.1 Priority and prompt age-friendly services

The participants expressed the need for priority in OPD services, admission process, emergency services, and bedside inpatient services as well.

Till today, there is no prioritization for older adults in OPD services. I have some expectations regarding that as well because after the age of 60 or 70, there should be some provision of it. Let's see when this will happen in the future. (69years, Female, SC-4)

There is a need to have a separate line in the cash

Table 1. Sub-themes and themes regarding aged-friendly environment

Themes	Sub-themes
Need to access healthcare facilities	<ul style="list-style-type: none"> • Availability of transportation facility
Urgent need for expansion of age-friendly services	<ul style="list-style-type: none"> • Priority and prompt age-friendly services • Need for affordable quality health care services • Flexibility in hospital rule: visiting time and allow caregivers to stay together during hospitalization • Separate, no queues & digital payment system in billing counter • Separate, well- managed OPD
Age-friendly physical environment	<ul style="list-style-type: none"> • Comfortable, ideal height of bed, adequate light • Non-slippery floor & adequate furniture • Stair with side railing & spacious corridor • Toilets and bathroom with side rails/support • Availability of clock & calendar • Functional lift • Directions, and symbol for wayfinding & signboard • Environment for overall well-being
Providing information, education, and communication in an age-appropriate manner	<ul style="list-style-type: none"> • Behavior of health care provider • Enhancing appropriate communication • Providing information/education in age- appropriate manner

counter, pharmacy, and insurance counter as well for older adults. This will make easy and prompt access to services. (50years, Male, CP-6)

I feel that there should be a system in which all the in-patient services including investigations, and medicines are provided at the bedside which would be much easier. (32years, Male, CP-11)

2.2 Need for affordable quality health care services

Participants highly emphasized the affordable health service at a low cost, with some discount or concession or free services as they were not financially independent.

The senior citizens are financially weak and dependent upon their son/daughter-in-law. There is no guarantee that all children will take care of them. So, if some discounts are provided by the Nepal Government or this hospital, it will be the greatest gift for the senior citizens, that they don't have to die due to lack of money. (79years, Male, SC-13)

Many marginalized senior citizens are dying because they can't afford treatment costs. There should be provision of equal health facilities to all (28years, Male, CP-10)

Some participants mentioned that the hospital offer multispecialty quality health services by highly skilled doctors which provide them a sense of safety and security in receiving appropriate treatment.

The facilities here are good. I am here because I have heard about availability of the best doctors. I also feel confident that I will receive proper treatment and recover soon. (82 years, Female, SC-12)

2.3. Flexibility in hospital rules: visiting time and allow caregivers to stay together during hospitalization

Many participants reported that there should be sufficient visiting time and caregivers should be allow to stay continuously as the older adults are not able to carry out their activities of daily living independently. On the contrary, one of the participants was satisfied with the visiting time.

There should be sufficient time to visit the patients so that they can share their feelings, emotions, and fears. (77years, Female, SC-3), (29years, Female, CP-13)

There is a specified time for visitors but there should be provision for allowing the visitors to stay with the patient all the time. Sometimes they don't allow my near ones to come and visit saying this is not the time to visit. Sometimes they even don't allow single caretaker to stay with me, which is disturbing as I can't manage my daily activities on my own and need someone with me

continuously. (63years, Male, SC-1)

2.4 Separate, no queues and digital payment system in billing counter

The participants mentioned the need for a separate and additional billing counter with an advance payment system over there as they felt difficulties due to having the common counter for all, remaining in long queues, and not having digital payment system in the hospital.

I think older people should be given priority and there should be a separate billing counter. (32years, Male, CP-11)

I think digital payments options like Fonepay facility should be available at the pharmacy counter to make payment easier. I feel that the cash counter and pharmacy counter are fewer in number. It is awful to stay in a queue for hours. I think it would be better to open more counters in peak hours and less in off time. (28years, Male, CP-10)

If payment through electronic devices or through a card would be better for the billing system ...I have a card, but I was not able to use in emergency situation and I didn't have sufficient money to purchase the medicine. And without payment, the pharmacy did not give us medicine. So, I strongly recommend for payment system through card so that we will be able to treat our patients on time. (39years, Female, CP-4)

2.5 Separate geriatric ward/ OPD

The participants mentioned that it would be better to have a separate geriatric ward for better treatment and separate well-managed OPD such as separate queues, separate counters, and priority for senior citizens. The participants experienced waiting a long time in OPD caused delays in getting OPD services.

Here 62 years, 15 years, and 30 years patients are kept in the same ward but if there is a provision for keeping the patients in the same ward, they can communicate with each other and share their problems, here what 62 years old patients would share with 15 years old child? (39years, Female, CP-4)

...there is a lack of special care and services focused on elderly patients. (25 years, Male CP-2)

I am upset regarding OPD services and the treatment of senior citizens. We waited for 4 to 5 hours to receive OPD services. After taking an OPD ticket if we are in the 10th position in the queue, we will be called at the 20th or 25th number; lots of outsiders will go secretly; some might be in the emergency which is negotiable. But if someone goes for a check-up through their personal connection, then this is not fair. They are not given priority to senior citizens. (28years, Male, CP-10)

Hospital policies need to be made in such a way that emphasizes senior citizens (63 years, Male SC-1)

Theme 3. Age-friendly Physical Environment

3.1 Comfortable, ideal height of the bed and adequate light

The participants expressed that the physical environment should be different for senior citizens. Several participants perceive the need of appropriate physical infrastructure that includes soft and comfortable manually operated beds or electrical bed. However, some of them felt difficult due to the increased height of the bed and suggested for ideal height suitable for older adults.

Umm... it would be better if there is availability of electric bed. (36years, Male, CP-7)

...the height of the bed should be ideal. The bed here is too height and it makes difficult to get out of bed. It would have been better if the height of the bed was slightly low with side rails (63years, Male, SC-1)

Light should be adequate everywhere even in the toilet. Here is a very dim light in the toilet. (CP-13)

3.2 Non-slippery floor and adequate furniture

The participants stated that the floor and furniture are good. It is non-slippery, clean, and dry. They suggested the need for additional furniture including lockers with lock system, separate cupboards for each patient, tool, cardiac table and screen for privacy.

There is good lighting, the furniture is good, and the floor is also clean. The staff clean the floor twice a day. (63years, Male, SC-1)

The cupboard provided here is common for 2 patients which makes some difficulty. Therefore, the cupboard must be separate for each patient. (71years, Male, SC-7, 39years, Female, CP-4)

The screen should be added as there is only one screen that does not maintain privacy properly and more than one patient might need the screen at the same time. (32years, Male, CP-11)

3.3 Stair with siderail and spacious corridor

The participants said that there should be a railing on the stairs and a spacious passage for wheelchair mobilization.

...stairs should have railing/ bars so that we can hold onto them for going up and down. (81years, Male, SC-6)

The passage should be spacious so that the wheelchair can be moved easily. (29years, Female, CP-13)

3.4 Toilets and bathroom with side rails/ support

Many participants focused on importance of age-

friendly toilets and bathrooms stating that it should be safe, clean and dry and should be close to the patient. The participants further added to have a commode toilet for ease and comfort. Besides this, they suggested increasing the number of toilets, and it would be better if there were attached bathrooms.

I think the bathroom and the floor should be clean and dry. (82years, Female, SC-12)

The bathroom and toilet need to be at a near distance (71years, Male, SC-7)

Though the toilet is available, I am not able to sit due to joint and back problems. I felt difficulties in using the pan toilet. So, if a commode system were provided, it would be easy for us. (62years, Female, SC-5)

The tap in the bathroom and toilets are difficult to open and the toilets are not clean enough. "Toilet gets clogged every other day." The condition is the same with the bathroom as well. It would be easier and safer for us if this problems were managed promptly. (63years, Male, SC-1) (28years, Male, CP-10)

There must be handles or bars on either side of the toilet seat so that senior citizens can stand and sit by gripping them. (50years, Male, CP-6)

3.5 Availability of clock and calendar

The participants also mentioned the need for a big-sized wall clock in each block near their eyesight, and the need for a calendar to know dates and days.

There must be big-sized wall clocks near my sight. (81years, Male, SC-6)

It would be better to have a calendar, we did not remember the date and days after the longer duration of hospitalization. (39years, Female, CP-4)

3.6 Functional and separate Lift

Participants stated that there is a limited number of lifts and it needs maintenance. They should be functioning all the time. One of the participants added to have a separate lift for patients' use only.

Lift is quite good here, but I think there is a limited number. (79years, Male, SC-13)

The lift facility needs to be improved and made functional. (68years, Male, SC-2)

There should be a separate lift for the patient and all the people, even the doctor, and nurses should give priority to the patients. (39years, Female, CP-4)

3.7 Directions and symbol for way finding and signboard

Participants expressed need of clear and proper directional sign instead of using the code number for wayfinding. Many emphasized that signboard

should be clear, visible, and written in large and bold letters. One of the participants added that though the signboard was placed it was not easily visible and the information was not enough to understand and suggested placing the signboard at the center and pictorial presentation for those who are not able to read and write.

There should be proper directions. They only provide code numbers which is difficult to understand and we need to ask every single person about the direction. (29years, Female, CP-1)

Though sign boards are there, they are placed at the corner and not visible clearly and the information is not enough to understand where to go for what. Those who are literate can understand but those who are not able to read and the older adults find it very difficult to understand. So, signboard should be placed at the center and should be clear and directive. (25years, Male, CP-2)

It would be effective for the illiterate to use large pictorial signs that would be more effective (79years, Male, CP-13)

3.8 Environment for overall well-being

Some of the participants explored the need of an environment that helps to maintain the overall well-being of senior citizens i.e. warm, peaceful, greenery environment as well as a religious and spiritual environment where they fulfill their religious and spiritual needs.

I feel a need for an area for Bhajans and there should be a place to keep the photo of God in the ward. (82years, Female, SC-12)

Long term hospitalized senior citizens without mobility issues, may prefer a religious/ spiritual environment. According to their religious belief, Bhajan Kirtan, visiting the temples inside the hospital premises, and staying in a greenery environment; will help to maintain health. (79years, Male, SC-13)

There must be a safe environment to stay in the hospital not only for patients but also for visitors. Our utilities and stuff must be safe. There should not be any fear of our things getting stolen. (36years, Male, CP-3)

Besides this, facility of bathing and canteen facility at low cost were also expressed.

We have a problem regarding the bathing facility. I have not seen any place for bathing here so far. There is a facility of hot water here but no facility for having a bath. (32years, Male, CP-11)

There must be a canteen and some extra space for the mobilization of older patients. (50years, Male, CP-6)

Theme 4. Providing Information, Education, and Communication in Age-appropriate Manner

4.1 Behavior of health care provider

Many participants experienced good behavior from the healthcare provider whereas other participants experienced a mixed attitude toward healthcare providers. They said that some nurses are polite whereas others get irritated and speak rudely which makes them feel unpleasant. Sometimes they feel bad due to the misbehavior of the doctors.

...the way the doctor provides advice by saying Dai-Bhai, Didi-baini, Ama-Buba, etc. makes us feel belongingness and friendly making us feel more comfortable to share our feelings. (36years, Male, CP-7)

The behavior of nurses is too good. They are polite and come regularly to assess, encourage nutrition and provide medication. (77years, Female, SC-3)

Some nurses are polite, but some are irritated. It might be because of the childish nature of the senior citizens or the need to take care of more patients (39years, Female, CP-4)

Doctors are like God to me as they are always here for me and save my life. (62years, FemaleSC-5)

4.2 Providing information /education in an age-appropriate manner

The participants said that healthcare providers give their dedicated time, frequently visit them, and provide services, health education, and counseling as per needs in simple, easy -to - understand and age appropriate manner.

They provide information in simple and understandable words. If not, we need to ask for it again and they need to make sure that given information is understood by us. (71years, Male, SC-7)

4.3 Enhancing appropriate communication

Several participants mentioned the positive attitude of health care providers. They were caring, well-manner and doing their best. However, one of the participants expressed in rage that the doctors rudely behaved to them, they did not give any reassurance and they were not treated properly.

Healthcare providers should be polite and communicate properly. (62years, FemaleSC-5)

I don't want to say anything else. I just want to feel relieved and healed. The doctor did not even look at me. They spoke rudely which hurt me. (38years, Male, CP-9)

When doctors come for rounds, they just review the case, speak 2-3 words to the patients, and leave. If they could spend at least 5 minutes discussing about patients' condition and offering them suggestions/ advice, then it would be far better. (31years, Male, CP-14)

DISCUSSION

The present study explores that easy access to transportation, provision of hospital transportation facilities, and financial aspects are the main factors in accessing healthcare facilities. Many participants highlighted the transportation services from the hospital may help to access health care services. Similarly, the non-availability of transportation facilities, the distance between home to health facility, and financial constraints are the hindering factors in accessing hospital services. Similar to this, Smith et al.¹⁵ stated that there is an increasing need for transportation especially in rural areas, the travel distance between home and healthcare facilities reduces the possibility of access to healthcare. Additionally, transportation expenses have been shown significantly impact on access of healthcare among the older population.¹⁶ Older adults with financial hardship especially those residing in the disadvantage areas often struggle to reach healthcare facilities.¹⁷

The present study highly emphasized the need for affordable and quality healthcare services with more facilities for senior citizens. In consistent with this, Adatara and Amooba¹⁸ mentioned that financial constraints, increased costs of healthcare services, and geographical inaccessibility to healthcare, were found as barriers in the utilization of healthcare. Moreover, participants expected to get medicine free of cost as they could not afford expensive medicine to treat their illness.¹⁹ Several participants highly emphasized giving priority to older adults in all services and some of them explore to have separate geriatric wards for better treatment and well-managed OPD services. Senior citizens expected priority but they didn't get priority in queues and complained of long waiting times to get services in the healthcare center.²⁰ Additionally, the need for easy access to inpatient services, sufficient visiting time for older adults, separate or additional billing counter with digital payment system along the provision of volunteer services were emphasized in this study, which is similar to the study conducted by Rashmi.⁷

Many participants perceive the need for appropriate/age-friendly physical infrastructure with additional supportive facilities. Farid and et al.²⁰ stated that seniors perceived the physical environment of the health center as clean, well-ventilated, and well-lit with appropriate infrastructure to meet their needs. The present study highly focused on the bed, toilets, bathrooms, and signboards in age-friendly physical environments of the hospital. Among those, the participants were highly dissatisfied with toilet facilities. Similar to these findings, Karki, Bhatta, and Aryal,¹⁹ also reported that slippery, poor toilet hygiene, difficulty in using pan toilet for patient with mobility issue were the common problems .

The senior citizens mentioned the health care providers' attitude was positive and they were giving their dedicated time in providing care and services, but the care giver experienced a mixed attitude. Similar to this study, Karki, Bhatta, and Aryal,¹⁹ reported that most older adults were satisfied with the behavior of health personnel. Care givers emphasized on timely and adequate information about health insurance and facilities provided to senior citizens. Similar to this, inadequate information from health staff was reported by Adatara, and Amooba²² in which older adults received insufficient information from nurses in OPD and from different departments in hospitals.

CONCLUSION

This study highlights a critical need to enhance healthcare accessibility and services for senior citizens across multiple dimensions. Transportation facilities and financial support as key factors in enabling access to healthcare. Prioritizing senior citizens, emphasizing the need for prompt, age-friendly affordable care, services and timely provision of adequate information in an age-appropriate manner are key concerns. These emphasized the urgent need for comprehensive management of hospital environment including the provision of a warm, peaceful, environment along with religious and spiritual support. Additionally, the study highlights the implementation of senior-centric hospital policies, importance of adopting comprehensive, aged-friendly environment to enhance the well-being of senior citizens.

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CONFLICT OF INTEREST

The authors declared no potential conflicts of interest for the research, authorship, and/or publication of this article.

AUTHORS CONTRIBUTION

Krishna Devi Shrestha: Research concept, design,

literature review, data collection, data analysis, statistical analysis, manuscript preparation and review; Takma K.C: Research concept, design, literature review, data analysis, manuscript review. Archana Pandey Bista: Research design, literature review, manuscript review; Saraswati Manandhar: literature review, data analysis, manuscript preparation. All authors approved the final manuscript.

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