Original Article

ADVANCING THE QUALITY OF HEALTHCARE IN NURSING HOMES

Jasmina Veličković[1], Jelena Bauder[2], Mitar Lutovac[3]

[1]Medika College of Vocational Studies in Healthcare, Belgrade, Serbia

[2]University Clinical Center, Belgrade, Serbia

[3]Faculty of Management, "Nikola Tesla' Union University, Belgrade. Sremski Karlovci, Serbia

Received: November 21, 2025; **Revised:** November 29**,** 2025; **Accepted:** December 8, 2025

Published: December 15, 2025

DOI: 10.5937/annnur3-62941

Abstract

Background: The significance of healthcare is especially critical for elderly individuals in residential homes, whose overall well-being depends on the integrated system's ability to manage their complex health and social needs.

Aim: To use survey data collected directly from nursing home residents to evaluate the conditions of social and healthcare services within their institutions.

Materials and Methods: This study was conducted between March and September 2024 across four gerontological centers in Belgrade, with approval obtained from institutional directors, healthcare staff, and participants. A seven-item questionnaire was administered to 100 users (40% male). The questionnaire employed a 5-point Likert scale for standardized responses, complemented by open-ended questions that allowed participants to provide qualitative feedback and suggestions.

Results: The majority of users rated the healthcare and social services in nursing homes as merely satisfactory (fair to excellent): a) significance of healthcare services (56%); b) punctuality of medical staff (80%); c) treatment by medical staff (77%); d) quality of life (70%); e) staff coordination and efficiency (70%); f) safety and security (85%); g) programmed activities (76%).

Conclusion: This study shows that the vast majority of nursing home residents are satisfied with the healthcare and social services they receive. However, our findings also indicate considerable room for improvement. Therefore, the immediate future demands a dedicated focus on advancing this critical dimension of healthcare services.

Keywords: healthcare, social welfare, nursing homes

Corresponding Author: Jasmina Veličković, jasminav.frad@gmail.com

Introduction

A high-quality healthcare system, defined by the full range of medical and protective services, is essential for a nation's societal and economic viability[1]. Therefore, continuous quality improvement in healthcare institutions is a necessity for any state—regardless of its stage of development—in order to effectively serve its citizens and society.

Quality management in healthcare can be examined from multiple perspectives. It is a heterogeneous field that can be approached from numerous angles and is inherently multidisciplinary, drawing upon knowledge from diverse scientific domains such as law (pertaining to legal frameworks), economics (concerning financial aspects), sociology, anthropology, and medicine. Moreover, the management of service quality is a core managerial concept, given that the primary tasks of top management are directed toward governance and the development of effective and efficient strategies[2].

The importance of health protection is also a category regulated by the Constitution of the Republic of Serbia. Specifically, under Article 66 of the current national Constitution, healthcare is guaranteed to every individual, stating that "everyone has the right to the protection of their physical and mental health" (The Constitution of the Republic of Serbia, *Official Gazette of RS*, No. 98/2006 and 115/2021). Users of social protection institutions are unequivocally included in this guaranteed right[3].

An interpretation of this provision leads to the conclusion that the right to health protection is recognized as a fundamental human right. This right falls within the domain of second-generation human rights—specifically, the group of social and economic rights[4]. The Constitution identifies particularly vulnerable categories and grants them additional health protection guarantees. These include children, pregnant women, mothers on maternity leave, and single parents with children under the age of seven, who are entitled to health protection financed from public revenues, provided they do not already receive such protection on other grounds.

Health protection is defined as an "organized and comprehensive societal activity aimed at achieving the highest possible level of preservation and improvement of citizens' health" (The Health Care Law, *Official Gazette of RS*, No. 25/2019). The comprehensiveness of health protection refers to the scope of its beneficiaries, meaning that medical assistance must be accessible to all individuals in need. The principle of comprehensiveness is established in Article 22 of the Health Care Law, which stipulates that this principle entails the inclusion of all citizens in the health protection system through the implementation of unified health measures and activities. These encompass health promotion, disease prevention, early diagnosis, treatment, health care, and rehabilitation (The Health Care Law,*Official Gazette of RS*, No. 25/2019). From this perspective, health protection can be regarded as a public good. Public goods are characterized by prohibitively high transaction costs associated with excluding additional users, while remaining universally accessible[5].

The domain of healthcare is also susceptible to moral hazard. This occurs when individuals—believing they will not require medical assistance or that they will not fall ill—are incentivized to forgo payment for such services. This reasoning is fundamentally irrational, as the principle of comprehensiveness in healthcare applies not only to health promotion but equally to disease prevention and early diagnosis. For many conditions,early detection is critical to the possibility of successful treatment. beneficiaries of social protection institutions are entitled to utilize state-provided health services. This access is part of a political program and policy action aimed at the public good—specifically, at improving the well-being of each user within a given societal context.

A second crucial concept requiring theoretical clarification in this research is that of social protection institutions. This domain is also governed by a specific legal framework. Social protection, likewise falling under constitutional guarantees, is a fundamental human right originating from the second generation of basic human rights. Accordingly, one can speak of the complementary nature of health and social protection.

Social protection constitutes a specific form of assistance guaranteed to citizens and families who require societal support to overcome social and existential difficulties and to create conditions for meeting their basic living needs (The Constitution of the Republic of Serbia, *Official Gazette of RS*, No. 98/2006 and 115/2021). This fundamental purpose represents the primary and essential distinction between health protection and social assistance.

Social assistance is not universal; rather, it is reserved for specific categories of individuals who are unable to attain a defined minimum quality of life. The provision of social protection is based on the principles of social

justice, humanism, and respect for human dignity. Both social assistance and the broader system of social protection embody the solidarity of the entire community with vulnerable individuals in need of support. While the concept of social justice is difficult to define precisely, for the purposes of this paper it will be understood as "a state in which the majority or all members of a society share the same fundamental rights, opportunities, obligations, and benefits"[6]. It follows from this definition that beneficiaries receive social assistance through state institutions. Humanism, in this context, implies an orientation toward and active assistance for other people—fellow citizens and community members.

Accordingly, "social protection institutions are established to realize rights in the field of social protection and to provide social protection services, as well as to perform developmental, advisory, research, and other professional tasks in social protection, and to fulfill other legally prescribed interests" (The Social Protection Law, *Official Gazette of RS*, No. 24/2011).

Similar to healthcare, social protection is defined under this law as an "organized societal activity of public interest, aimed at providing assistance and empowerment for an individual's independent and productive life within society, as well as preventing the emergence and mitigating the consequences of social exclusion" (The Social Protection Law, *Official Gazette of RS*, No. 24/2011). The ultimate objective of social protection is, therefore, the integration or reintegration of individuals into the societal fabric.

Cooperation constitutes a partnership established to resolve specific issues. Regarding elderly health, such collaboration is essential at the local community level, where it is most feasibly implemented and thus most effective in achieving solutions[7]. This collaborative model is equally applicable to beneficiaries of all age groups.The model necessitates, first and foremost, cooperation with local primary healthcare centers to provide assistance. A policy solution conceived in this way is logical, particularly considering it involves the lowest transactional implementation costs.

General practitioners operating within these primary care centers are equipped to provide adequate patient care when needed. This partnership fulfills the dual purpose of addressing user needs and fostering a problem-solving community. The collaboration's fundamental aim is to resolve the specific health-related challenges faced by residents of social welfare institutions. Research constitutes a logical and epistemological process in which "the application of scientific methods serves to verify pre-existing knowledge or generate new scientific understanding"[8]. The objectives of any study are framed by its problem statement and subject matter, focusing on the acquisition and application of empirical insights.

The specific aim of this investigation was to use survey data collected directly from nursing home residents about the conditions of social and healthcare services within their institutions. Guided by this aim, the study was designed to address the following research question**:** To what extent have social welfare centers also assumed the role of healthcare providers?

Following the formulation of the research question, a survey was developed to empirically test its premise and verify the study's central hypothesis, thereby achieving the primary research objective.The study utilized a theoretically representative sample. The nature of the research problem inherently determined the sample size and composition, guided by a specific methodological framework. It is noted that an insufficient understanding of research objectives often leads to inappropriate participant selection in qualitative studies. This investigation employed purposeful sampling, which entails selecting cases that provide the most significant insights relative to the study's core purpose.

Conceptually, human health represents a system's capacity to maintain homeostasis and implement adaptive mechanisms across multiple organizational levels—from cellular and individual to societal structures—in response to environmental demands and changes[9]. The World Health Organization expands this definition further, conceptualizing health as a unified construct comprising multiple interdependent factors—personal, social, and economic—that collectively determine an individual's well-being.

Following comprehensive analysis and consideration of methodological advantages, this investigation employed a quantitative research design for the following reasons:

- The questionnaire presented clearly defined research questions, ensuring precise and unambiguous responses
- Hypotheses were formulated through rational theoretical grounding
- A systematic research protocol was developed and implemented
- External variables that could potentially bias participant responses were effectively controlled
- A statistically sufficient sample size was secured
- Data analysis employed rigorous statistical proceduresThe questionnaire design carefully balanced comprehensive data collection with the specific needs of the elderly demographic. Instrument structure and length

- were optimized to align with research objectives while respecting the particular sensitivities of this population. Individual items underwent rigorous evaluation to ensure reliability, content validity, and alignment with research goals. The final instrument was designed to generate robust data while maintaining accessibility for elderly respondents.

Patient satisfaction measures served dual purposes as indicators of institutional performance and tools for healthcare quality improvement[10]. However, the implementation of this assessment mechanism is itself contentious. Key points of debate include the core parameters, the processing time, the entities tasked with analyzing the results, and the subsequent actions taken based on those analyses[11].

This scientific research examines quality management in healthcare services within social protection institutions. These institutions—including Social Work Centres, educational facilities for children and youth, social care institutes, and other legally recognized entities—are primarily responsible for the residential care of vulnerable minors and individuals from directly or indirectly marginalized groups. The central focus of this paper is user satisfaction with the healthcare services provided in these settings and the improvement of healthcare quality within the social protection system. Given the complexity of the social protection system, the study specifically concentrates on nursing homes for the elderly.

This study aims to assess user satisfaction levels within social welfare institutions—specifically nursing homes—and to systematize the resulting quantitative data. To determine how the quality of healthcare services in these institutions has evolved, it is necessary to identify both past areas of user dissatisfaction and current levels of satisfaction across various dimensions of service delivery. An additional research objective is to evaluate whether a symbiotic integration between the social protection and healthcare systems has been achieved.

The primary scientific contribution of this research lies in its qualitative enrichment of academic knowledge concerning the division and overlap of responsibilities—as well as the *de facto* and *de jure* demarcation of competencies—between the social welfare and healthcare sectors.

Results

The majority of participants originated from rural areas (65%), whereas one-quarter of the sample (25%) had lived in urban settings for more than five decades. Only a small proportion (10%) identified as lifelong urban residents.

The majority of users rated the healthcare and social services in nursing homes as merely satisfactory (fair to excellent): a) Significance of healthcare services (56%; Figure 1.); b) Punctuality of medical staff (80%; Figure 2.); c) Treatment by medical staff (77%; Figure .3); d) Quality of life (70%; Figure 4.); e) Staff coordination and efficiency (70%; Figure 5.); f) Safety and security (85%; Figure 6.); g) Programmed activities (76%; Figure 7).

Discussion

A large proportion—if not the majority—of participants assigned the highest ratings to the healthcare workers who provided their daily care. This pattern can be better understood in light of the study's context within a gerontological institution. Residents in such settings often experience considerable social isolation, with limited interaction from relatives, friends, or the wider community. As a result, their social needs increasingly shift toward relationships with fellow residents and, more importantly, with the medical staff. This dynamic frequently leads to the development of emotional dependence, as caregivers become the residents' primary link to the outside world. This reliance highlights an essential difference within the broader system of social protection: while social security offers universal coverage for all citizens, the social welfare system is specifically structured to support individuals facing acute social or existential vulnerability[12].

Given that the study involved respondents from four nursing homes, the data should be treated with considerable weight. These findings are particularly significant within a national context where reports of inadequate treatment of care home residents are prevalent, especially in private centers operating without proper state oversight or licensing, often staffed by unqualified personnel.Regarding the implications for the health of the elderly, collaboration at the level of the local community is indispensable. This is the level at which such cooperation is most readily realized and, consequently, is fundamental to successfully addressing these complex problems[7].

A plurality of users reported satisfaction with staff organization within the centers. The efficacy of this organizational structure was particularly evident during the COVID-19 pandemic, a period when residents' opportunities for in-person communication with family members were severely restricted.Safety and security in nursing homes involve not only maintaining the physical protection of the facility but also ensuring that residents are shielded from any type of disruption or harm.

Conclusion

The findings of our study indicate that most residents of nursing homes report satisfaction with the healthcare and social services they receive. Nevertheless, the results also reveal significant need for improvements in these areas. .

Conflict of Interest: The authors declare no conflicts of interest related to this article.

NOTE: Artificial intelligence was not used as a tool in this study.

Funding: No

References

1. Lazibat T,, Burcul E, Bakovic T. Application of Quality Management Systems in Croatian Healthcare. Business Excellence 2007; 1 (2), 31-44.

2. Gavrilovic, A. Application of Modern Management in Primary Health Care Institutions. Faculty of Applied Management, Economics and Finance, University Business Academy, Novi Sad, Belgrade, 2014.

3. Constitution of the Republic of Serbia. Official Gazette of the Republic of Serbia, 98/2006 and 115/2021.

4. Boskovic S, Spevan M. Conscientious Objection in Healthcare Professionals: A Fundamental Human Right. Nursing Journal 2021; 26 (1), 35-40. DOI:10.11608/sgnj.26.1.6

5. Begovic, B., Labus, M., & Jovanovic, A. Economics for Lawyers. Faculty of Law, University of Belgrade, Belgrade,(2020; p. 348.

6. Petrovic M. The Social Component of Local Self-Government in the Republic of Serbia. Social and Human Sciences 2020; 3 (2), 121-130.

7. Ancelski, H. Cooperation Between Health Centers, Gerontological Centers, and Other Social Welfare Institutions. Health Care 2006;. 6, 37-39.

8. Milovanovic V. The Impact of Total Quality Management on Business Performance. Faculty of Economics, University of Kragujevac, Kragujevac.

9. Joksimovic O. Insurance and Health Insurance. Megatrend University of Applied Sciences, Belgrade. (2005).

10. Filipovic V, Cicvaric V, Stavljanin V. et al. The Impact of Proactive Health Institution Managers' Communication Activities on Patient Satisfaction. Vojnosanit Pregl 2010; 67(4), 267-271. DOI: 10.2298/vsp1004267f

11. Zivaljevic A., Vrcljev N. Quality Management of the Healthcare System Through Monitoring and Measuring Quality Parameters. Business Economics 2015; 9 (2), 297-320.

12. Radovanovic, J. Social Assistance as a Social Security System. Faculty of Law, University of Niš, Niš. 2013

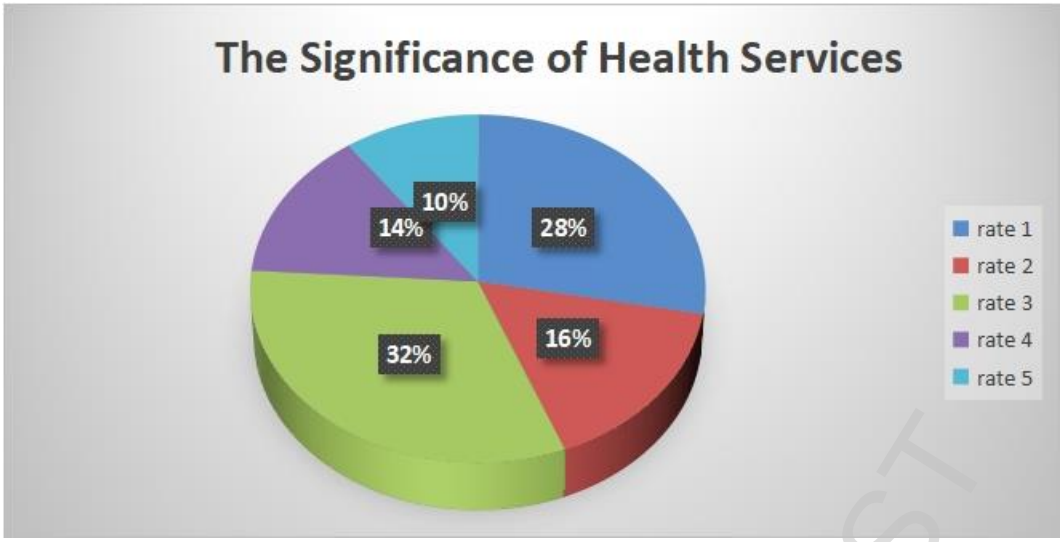

Figure 1. Percentage distribution of nursing home residents' Likert-scale responses to a significance of health services question

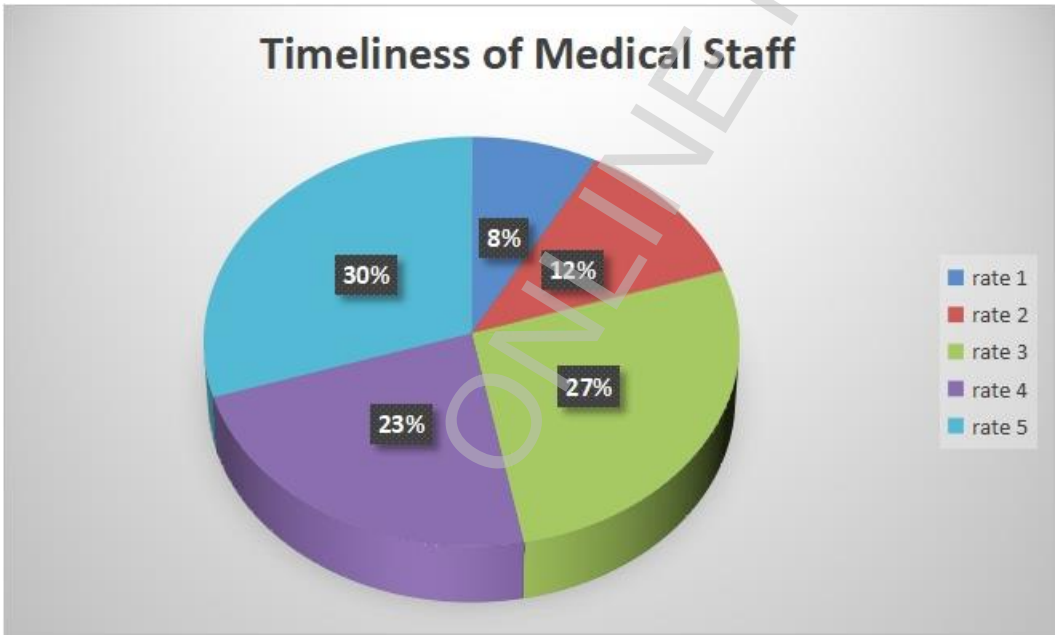

Figure 2. Percentage distribution of nursing home residents' Likert-scale responses to a stimeliness of medical staff question

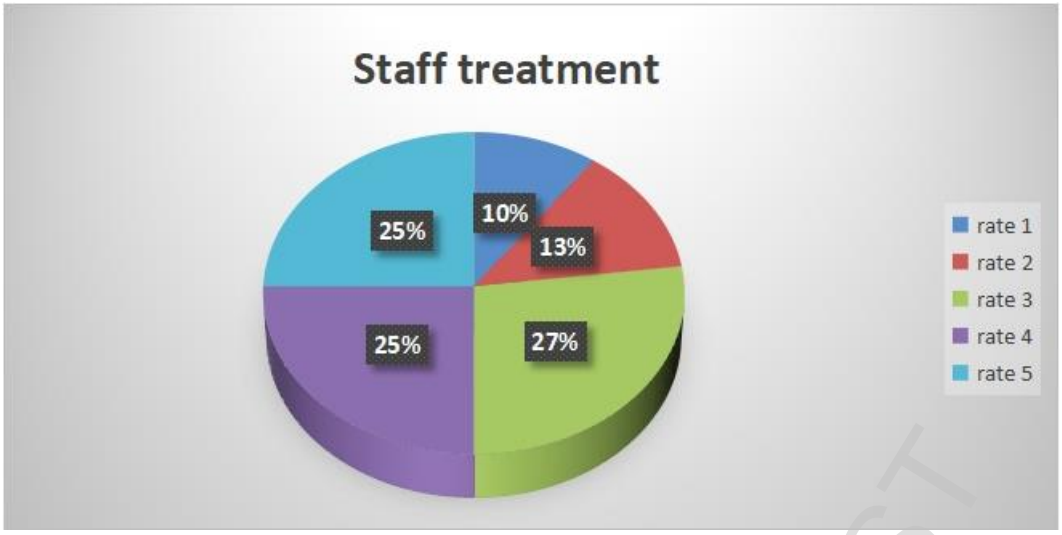

Figure 3. Percentage distribution of nursing home residents' Likert-scale responses to a treatment by staff question

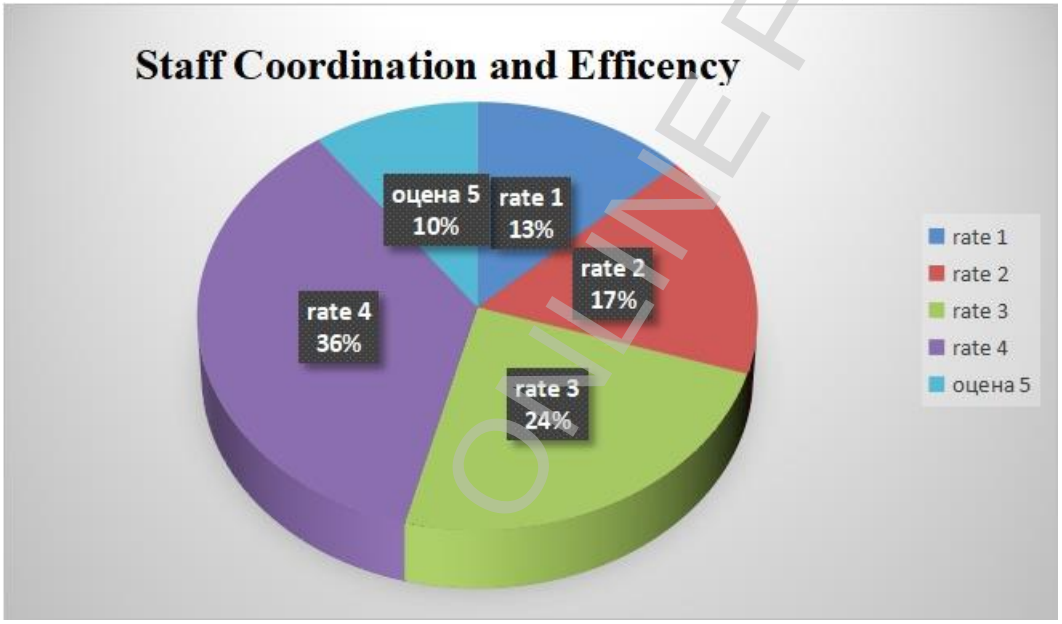

Figure 4. Percentage distribution of nursing home residents' Likert-scale responses to a staff coordination and efficiency question

Figure 5. Percentage distribution of nursing home residents' Likert-scale responses to a staff organization question

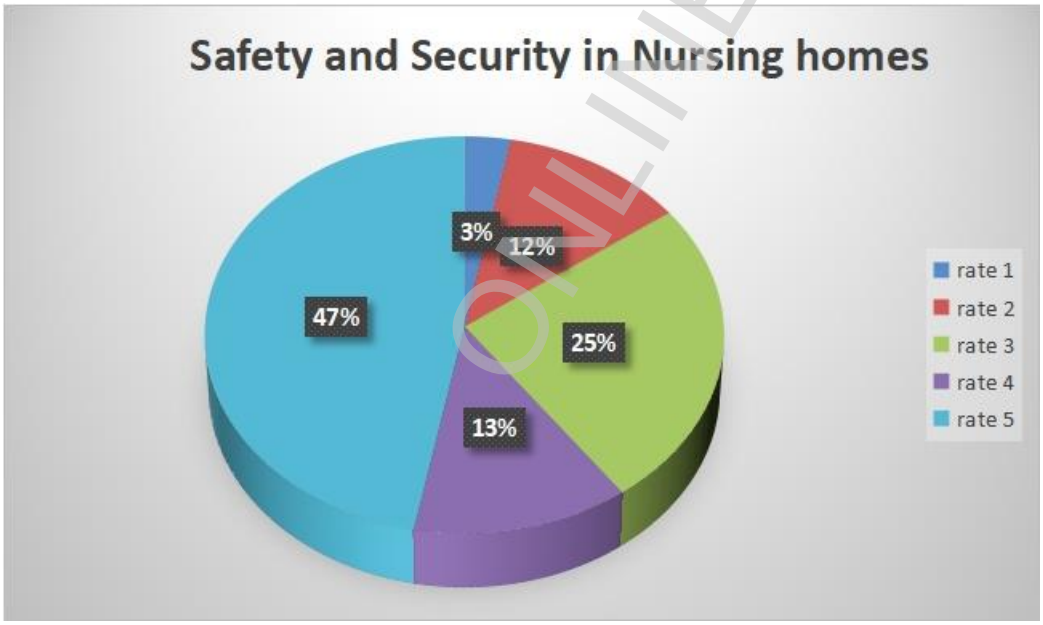

Figure 6. Percentage distribution of nursing home residents' Likert-scale responses to a safety and security question

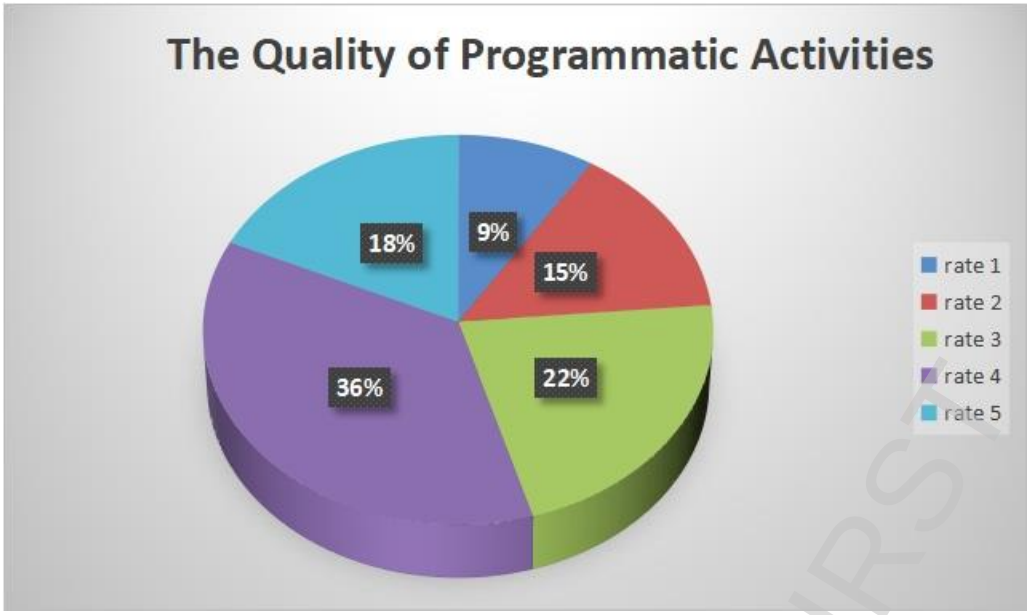

Figure 7. Percentage distribution of nursing home residents' Likert-scale responses to a programmed activities question

Legend to Figures 1-7. rate 1 = Very Poor; rate 2 = Poor; rate 3 = Fair; rate 4 = Good; rate 5 = Excellent