

# Relationship between workload and organizational citizenship behavior in community nursing service management in Indonesia

Miftahul Munir,<sup>1</sup> Karyo Karyo,<sup>2</sup> Umu Qonitun<sup>3</sup>

<sup>1</sup>Department of Public Health; <sup>2</sup>Department of Nursing; <sup>3</sup>Department of Midwifery, Nahdlatul Ulama Institute of Health Sciences, Tuban, Jawa Timur, Indonesia

## Abstract

The management of community nurse services is essential for enhancing public health. Factors such as workload, organizational support, and job satisfaction influence organizational citizenship behavior (OCB), which impacts the quality of nursing gover-

nance. This research investigated the relationship among workload, OCB, and community nurse management using a quantitative correlational approach with 171 community nurses from health service centers in Tuban Regency, Indonesia. Simple random sampling was used to ensure equal representation of the participants. Data were collected using structured questionnaires that measured workload, OCB, and nurse governance. Spearman's correlation test was used to analyze the relationships between these variables. The findings indicated that 46.7% of respondents exhibited high OCB, while 45.8% rated community nurse governance as good. Regarding workload, 50% of respondents reported a moderate workload. Statistical analysis revealed a significant correlation among workload, OCB, and nurse governance ( $p < 0.05$ ). Higher OCB levels were associated with better governance, while a moderate workload contributed to more effective nurse management. Balancing workloads and fostering OCB is crucial to enhancing nursing governance and healthcare service quality. Strengthening organizational support, implementing targeted training programs, and improving nurse management strategies can contribute to more effective community health services. Future research should consider psychosocial stress and emotional burden when developing a comprehensive workload assessment model.

Correspondence: Miftahul Munir; Department of Public Health, Ilmu Kesehatan Nahdlatul Ulama Tuban Institute, Jawa Timur, Indonesia. E-mail: munir.stikesnu@gmail.com

Key words: community nurse; organizational citizenship behavior; workload.

Contributions: MM, conceptualization, data curation, formal analysis, methodology, validation, visualization, resources, investigation, writing – original draft, writing – review & editing; KK, conceptualization, investigation, methodology, validation, resources, supervision, writing – original draft, writing – review & editing; UQ, conceptualization, methodology, formal analysis, validation, resources, investigation, writing – original draft, writing – review & editing.

Conflict of interest: the authors declare no potential conflict of interest.

Ethics approval and consent to participate: the Health Research Ethics Committee at IKNU Tuban granted ethical approval with number 60/0084223523/LEPK.IKNU/XII/2023 in December 2023, with a validity period of one year. Subsequently, permission was obtained from the Tuban District Government, specifically from the Investment and Integrated One-Stop Service Office (PTSP). The research was then conducted meticulously, in alignment with its established ethical objectives.

Consent for publication: written informed consent was obtained for anonymized patient information to be published in this article.

Availability of data and materials: all data generated or analyzed during this study are included in this published article.

Acknowledgements: we express our gratitude to all the nurses willing to participate in this study, who played an essential role in its success. We also extend our thanks to all the lecturers at the Nahdlatul Ulama Institute of Health Sciences for their support.

Received: 31 December 2024

Accepted: 3 March 2025

Early view: 28 May 2025

This work is licensed under a Creative Commons Attribution 4.0 License (by-nc 4.0).

©Copyright: the Author(s), 2025  
Licensee PAGEPress, Italy  
Healthcare in Low-resource Settings 2025; 12(s2):13564  
doi:10.4081/hls.2025.13564

*Publisher's note: all claims expressed in this article are solely those of the authors and do not necessarily represent those of their affiliated organizations, or those of the publisher, the editors and the reviewers. Any product that may be evaluated in this article or claim that may be made by its manufacturer is not guaranteed or endorsed by the publisher.*

## Introduction

A critical issue in community nursing management worldwide is the shortage of nursing personnel, particularly in underserved areas.<sup>1</sup> This shortage exacerbates nurses' workloads owing to the additional burden of administrative responsibilities. Limited infrastructure and health resource support, including medical equipment and training, result in significant challenges in delivering optimal healthcare services. These challenges have become even more pronounced with the increasing complexity of public health issues, such as non-communicable diseases, mental health disorders, and infectious disease outbreaks.<sup>2</sup> Addressing these challenges requires strategic workforce planning, resource allocation, and effective management approaches to support community-based health care.

The Village Health Service Center is a vital primary healthcare service designed to enhance public health at the village level. It provides essential health services, especially in rural communities with limited access to comprehensive healthcare facilities.<sup>3</sup> However, its implementation faces various challenges, including nurse shortages, inadequate facilities, and unbalanced work schedules.<sup>4</sup> Additionally, the lack of coordination among Village Health Service Centers, local governments, and health centers hampers service operations and case management.<sup>5</sup> Administrative inefficiencies, such as ineffective medical records and reporting, further increase nurses' workload.<sup>6</sup> These factors collectively affect the

service quality and well-being of healthcare professionals.

Furthermore, low recognition and insufficient incentives contributed to a decrease in motivation and commitment among nurses.<sup>7</sup> Therefore, improving organizational management is essential for enhancing service quality and ensuring the well-being of nurses, ultimately supporting national health development goals.<sup>8,9</sup> In East Java, the expansion of Village Health Service Centers from their inception in 2010 to the end of 2020 saw a 72.3% increase in facilities, with 3213 nurses operating in 4413 sub-districts across 27 cities and regencies.<sup>10,11</sup> This expansion significantly improved healthcare accessibility, particularly in rural areas, highlighting the need for further optimization of primary healthcare services.

An initial survey conducted on September 12, 2023, through interviews with nurses in Tuban Regency, revealed that 55% of respondents exhibited moderate Organizational Citizenship Behavior (OCB), while 45% effectively managed administrative and managerial tasks, achieving 100% of the expected targets. Since 2010, the East Java Provincial Government has implemented the Village Health Service Center program to enhance access to healthcare in rural areas.<sup>12</sup> These centers provide essential healthcare services, including immunization, maternal and child health, noncommunicable disease management, and health education. They also facilitate early disease detection and public health promotion, thereby reducing disparities between urban and rural healthcare access in East Java.<sup>13</sup>

Individual performance is the cornerstone of an organization's overall success. When each member performs effectively, it enhances overall productivity and contributes to achieving organizational goals.<sup>14-17</sup> Skilled and motivated personnel are crucial in meeting healthcare standards and operational targets. Effective performance management not only improves workplace efficiency but also fosters a supportive and productive environment.<sup>18,19</sup> Organizations that invest in training, motivation, and efficient management foster synergy and long-term sustainability.<sup>20,21</sup> Prior research has found that fairness and employee engagement significantly improve OCB, positively impacting overall productivity.<sup>22,23</sup> However, existing studies have not extensively explored the mediating role of work engagement in linking organizational justice with OCB, particularly in healthcare settings.<sup>5,24</sup>

This study differs from previous research in that it focuses on the relationship between OCB and workload among community nurses. Specifically, it explores how OCB, such as assisting colleagues and providing services beyond primary responsibilities, is influenced by the workload in community nursing. Previous studies have primarily examined this relationship in hospital settings, neglecting the unique challenges faced by community nurses, such as limited healthcare accessibility and resource constraints.<sup>25-27</sup> Furthermore, research on the correlation between high workload and OCB in developing countries, such as Indonesia, remains limited.<sup>28,29</sup> A more comprehensive approach is required to examine cultural factors, specific workload dimensions, and practical interventions to enhance OCB in community nursing.<sup>30</sup> Encouraging OCB among nurses fosters a supportive work environment, enhances team productivity, and improves healthcare service delivery.<sup>31-33</sup> Given these considerations, this study aimed to investigate the relationship between OCB and nurse workload in the Village Health Service Center in Tuban Regency, providing insights into strategies to enhance nursing performance despite high workloads.<sup>34</sup>

## Materials and Methods

### Research design

This study utilized a correlational quantitative design to analyze the relationship between workload, organizational citizenship behavior, and community nurse governance in the Tuban Regency. The workload perceived by community nurses and the OCB they exhibit are expected to impact nurses' governance in delivering health services to the community. The study population consisted of all community nurses employed at the Village Health Service Center in Tuban Regency, where they play a vital role in delivering preventive and promotive health services to the community.

### Population, sample, sampling

The total population in this study consisted of 171 respondents, who were community nurses working at the Village Health Service Center in the Tuban Regency. The inclusion criteria were nurses who had worked for at least one year, were willing to participate as respondents, and were not on leave or work permits during the study. Simple random sampling was used, ensuring that every member of the population had an equal chance of being selected. The sample size was determined using the Slovin formula with a confidence level of 95% and a margin of error of 5%, resulting in 120 respondents. The sample size was sufficient to ensure the research results were representative and valid.

### Variables

Three variables were analyzed in this study. The independent variables were the workload and OCB. Workload refers to the level of burden perceived by community nurses, which includes factors such as the number of tasks, working hours, and pressure experienced in performing their tasks. OCB refers to nurses' behavior beyond their formal responsibilities, encompassing dimensions such as altruism, conscientiousness, sportsmanship, courtesy, and civic virtue. The dependent variable was community nurse governance, which evaluates nurses' performance in carrying out their duties in accordance with the established standard operating procedures, as the quality of services provided to the community.

### Instruments

OCB was measured using a questionnaire based on Organ's (1988) theory, which included the dimensions of altruism, conscientiousness, sportsmanship, courtesy, and civic virtue. The dependent variable, *i.e.*, community nurse governance, was assessed using a performance checklist based on community health service standards in Indonesia. The research instruments included a workload questionnaire, which used a Likert scale ranging from 1 to 5. Before implementation, the questionnaire underwent validity and reliability testing through statistical analysis, including construct validity testing using methods such as Exploratory Factor Analysis (EFA) or Confirmatory Factor Analysis (CFA), as well as reliability testing using Cronbach's alpha. All the questionnaires that met the validity and reliability criteria were deemed suitable for further research.

### Data collection

This study was conducted in Tuban in December 2023. Before participating, the respondents signed an agreement with the researcher stating their willingness to participate by completing an informed consent form. Data collection was conducted using several methods, including the direct distribution of questionnaires to community nurses at the Village Health Service Center, structured interviews to explore factors influencing nurse governance, and

performance observation using a checklist based on community health service standards. This process was implemented to ensure that the obtained data provided a clear and comprehensive understanding of the factors affecting community nurse governance.

## Analysis

The collected data were statistically analyzed to derive meaningful conclusions from the responses. Univariate analysis was conducted to describe the characteristics of the respondents, including demographic factors such as age, education level, years of service, and other relevant background information. This analysis also examined the distribution of the research variables and provided an overview of the dataset before further examination. Bivariate analysis was performed to explore relationships between two variables at a time. To determine the strength and direction of these relationships, Pearson's correlation (for normally distributed data) or Spearman's correlation (for non-normally distributed data) was applied, depending on the nature of the data.

## Ethical clearance

This research was approved by the Health Research Ethics Commission of the Nahdlatul Ulama Institute of Health Sciences, Tuban, ensuring compliance with ethical standards and guidelines for conducting research involving human participants. Approval was granted under the reference number 60/0084223523/LEPK.IIKNU/XII/2023. During data collection, the researcher ensured the confidentiality of data and respondents' identities. All information provided was used solely for research purposes and not disclosed to any third party without permission. An anonymity procedure was applied, ensuring respondents' personal identities were neither recorded nor linked to the collected data. This approach protected respondents' privacy and ensured they felt safe providing honest and open responses.

## Results

Table 1 presents the characteristics of research respondents, highlighting key demographic and professional attributes. Most respondents were aged 37-42 (66, 38%), followed by those aged 31-36 (60, 35%). Most respondents were female (93, 55%) and held a professional nursing degree (*Profesi Ners*) (96, 56%). Regarding OCB, nearly half of the respondents (56, 46.7%) exhibited high OCB, indicating strong engagement in behaviors that support their organization. In terms of community nurse management, the majority (55, 45.8%) perceived governance in their area as good. Additionally, half of the respondents (60, 50%) reported experiencing a moderate workload, suggesting a balanced distribution of responsibilities among community nurses.

Table 1 indicates that most community nurses in the area experience a balanced workload, which may influence their ability to manage tasks and responsibilities efficiently.

Table 2 illustrates the cross-tabulation of OCB and community nurse management. Among respondents with moderate OCB, most rated their community nurse management as good, with 28 respondents representing the largest subgroup in that category. In contrast, among those with high OCB, the majority perceived their community nurse management as moderate, with 29 respondents comprising the largest subgroup in that row. These majority trends underscore a significant association between the levels of OCB and the perceptions of nurse management, as supported by the Spearman correlation test result of 0.002.

Table 3 presents the relationship between workload and community nurse management. The majority of respondents with a moderate workload (30, 25%) perceived their community nurse management as moderate, indicating a balanced distribution of responsibilities. Meanwhile, among those with a high workload, the largest proportion (32, 27%) rated their community nurse management as good, suggesting that despite increased work demands, these nurses maintained effective governance. The Spearman correlation test result of 0.001 indicates a significant relationship between workload and community nurse management. This suggests that nurses with higher workloads may develop better management capabilities, possibly influenced by experience, skills, and organizational support.

## Discussion

This study investigated the relationship between workload and organizational citizenship behavior in community nursing management. The findings of this study indicated a significant relationship between OCB and workload with community nursing management, as evidenced by a p-value <0.05 in the Spearman test. This relationship reflects the influence of individual factors and workload on nurses' management of community nursing services. OCB, which represents proactive attitudes, commitment, and initiative at work, has been shown to contribute to the improvement of community management quality. Meanwhile, a high workload, which is generally perceived as a burden on performance, is correlated with increased effectiveness in community management. Nurses with high OCB had better community nursing management, with 45.8% classified as good, whereas those with low OCB were entirely classified as poor. This suggests that strong OCB enhances commitment, efficiency, and effectiveness of community healthcare services. These findings align with previous research emphasizing

**Table 1.** Characteristics of research respondents.

Characteristics	n	%
Age		
25-30 years	45	27
31-36 years	60	35
37-42 years	66	38
Gender		
Male	78	45
Female	93	55
Education		
Level 3 diploma in nursing	75	44
Bachelor's degree in nursing	96	56
Organizational citizenship behavior		
Low	10	8.3
Moderate	54	45.0
High	56	46.7
Community nurse management		
Low	14	11.7
Moderate	51	42.5
Good	55	45.8
Workload		
Low	5	4.2
Moderate	60	50
High	55	45.8

Source: primary data of researchers in 2023.

that well-managed community nursing improves nurses' roles, optimizes resources, and fosters collaboration in integrated healthcare.<sup>35-37</sup> Effective governance enhances resource allocation, work environment, and public health outcomes.<sup>38-40</sup> According to Alex *et al.* (2024), good governance plays a crucial role in achieving public health goals, such as reducing disease prevalence, increasing healthcare access, and strengthening community health systems.<sup>41</sup> Through structured management, community nurses can improve health program efficiency, reduce costs through preventive care, and enhance community engagement. Strengthening OCB and management strategies is essential for improving service quality and ensuring the sustainability of healthcare interventions.<sup>42</sup> These findings strengthen the vital role of OCB and effective management in enhancing the quality of community nursing services and ensuring the long-term sustainability of healthcare interventions. Altruism emerged as the most influential factor in this study as it fostered collaboration and strengthened community-based nursing services. Nurses who demonstrate high levels of altruism are more likely to support their colleagues and patients, thereby contributing to a positive and cohesive healthcare environment.<sup>43</sup> Jepma *et al.* highlight that altruistic nurses offer assistance without expecting personal gain, promoting teamwork and mutual trust.<sup>44</sup> These behaviors enhance cooperation in delivering healthcare services and increase commitment to patient welfare, even in challenging situations. Nurses prioritizing altruism go beyond formal job responsibilities, offering voluntary support that benefits their organization and the broader healthcare system.<sup>45-47</sup> Consequently, altruism positively influences health care outcomes by improving service quality and efficiency.<sup>48,49</sup> This study identified a significant relationship between workload and community nursing management, with nurses experiencing high workloads demonstrating better management performance (27%) than those with moderate (19%) or low workloads (0%). This suggests that high workloads may drive nurses to develop better adaptation mechanisms and enhance task management efficiency. Supporting research indicates that when effectively managed, high workloads improve time management, decision-making, teamwork, and innovation use.<sup>50-52</sup>

Studies by Sibilio *et al.* and Park *et al.* highlighted that nurses in demanding roles develop superior prioritization skills, resource allocation strategies, and adaptability, ultimately improving service quality and public health outcomes.<sup>53-56</sup> However, this study is limited by its workload measurement, which primarily focuses on work quantity rather than psychological factors such as stress, emotional burden, and psychosocial challenges.<sup>57-60</sup> Additionally, assessing OCB remains challenging due to reliance on subjective evaluations, which may impact measurement accuracy in community nursing practice.<sup>61-63</sup> Future research should adopt a more holistic approach by incorporating psychological dimensions into workload assessments, providing a more accurate understanding of their impact on nursing performance, mental health, and behavioral indicators of commitment and care quality in community nursing.<sup>64-66</sup> Therefore, while the findings of this study indicate a positive relationship between high workload and effective community nursing management, it remains essential to implement policies that promote work-life balance for nurses. Institutional support, including time management training, improved workplace facilities, and equitable task distribution, can help nurses maintain productivity without experiencing excessive work-related stress. Overall, this study confirms that both OCB and workload play significant roles in shaping community nursing management, emphasizing the need for strategies that foster OCB among nurses and optimize workload distribution. Healthcare institutions and policymakers can leverage these findings to design targeted training programs and implement evidence-based work policies that enhance nurses' effectiveness, ultimately ensuring sustainable delivery of high-quality community healthcare services.

## Conclusions

This study highlights the positive impact of effective community nurse management on nurses' roles, collaboration, and healthcare quality. Altruism fosters collaboration and trust, whereas ele-

**Table 2.** Cross tabulation of organizational citizenship behavior and community nurse management.

Organizational citizenship behavior	Community nurse management			Total
	Low	Moderate	Good	
Low	10 (8%)	0 (0%)	0 (0%)	10 (8%)
Moderate	4 (3%)	22 (18%)	28 (23%)	54 (45%)
Good	0 (0%)	29 (24%)	27 (22%)	56 (46%)
Total	14 (11%)	51 (42%)	55 (45%)	120 (100%)

Spearman test = 0.002

Source: primary data of researchers in 2023.

**Table 3.** Cross tabulation of workload and community nurse management.

Workload	Community nurse management			Total
	Low	Moderate	Good	
Low	4 (3%)	1 (1%)	0 (0%)	5 (4%)
Moderate	7 (5%)	30 (25%)	23 (19%)	60 (50%)
High	3 (0.2%)	20 (16%)	32 (27%)	55 (45%)
Total	14 (11%)	51 (42%)	55 (45%)	120 (100%)

Spearman test = 0.001

Source: primary data of researchers in 2023.

vated workloads can enhance management when balanced with effective strategies, including time and resource management. These findings provide valuable insights into strengthening rural healthcare by optimizing collaboration and resource utilization. Implementing targeted strategies and providing nurses with the necessary support and training can enhance healthcare delivery, particularly in resource-limited areas.

## References

- World Health Organization. Nursing and Midwifery [Internet]. 2024 [cited 2024 May 1]. Available from: <https://www.who.int/news-room/fact-sheets/detail/nursing-and-midwifery#:~:text=The%20largest%20needs-based%20short-ages,midwives%20by%20the%20year%202030>
- Wong NWM. Exploring the motivations behind environmental volunteering and the development of environmental citizenship in Taiwan. *Soc Sci Humanit Open* 2024;10:100986.
- Davis JM, Agrawal D, Austin R. Fostering security-related citizenship through the employee-supervisor relationship: An examination of supervisor security embodiment. *Comput Secur* 2024;142:103896.
- Al-shami SA, Al mamun A, Rashid N, Cheong CB. Happiness at workplace on innovative work behaviour and organisation citizenship behaviour through moderating effect of innovative behaviour. *Heliyon* 2023;9:e15614.
- Rahman MHA, Karim DN. Organizational justice and organizational citizenship behavior: the mediating role of work engagement. *Heliyon* 2022;8:e09450.
- Liu Z, Chen C, Cui H, Hu Y. The relationship between nurses' social network degree centrality and organizational citizenship behavior: The multiple mediating effects of job satisfaction and work engagement. *Heliyon* 2023;9:e19612.
- Subongkod M, Sinlapasawet W, Lalaeng C, Hongsakul B. The Relationship Between Organizational Politics and Organizational Citizenship Behavior in The Management Perspective: Evidence in Thailand. *Procedia Comput Sci* 2024;237:819–26.
- Alqhaiwi ZO. A bright side to unethical pro-organizational behavior: Improving work performance by satisfying psychological needs. *J Bus Res* 2024;184:114879.
- Efendi F, Aurizki GE, Pradipta RO. Nursing beyond borders: The Indonesian diaspora. *Nursing Beyond Borders: The Indonesian Diaspora*. 2024, pp. 1-110.
- Efendi F. Transforming Health in Indonesia: A Pathway to Sustainable Development. *Gac Med Caracas* 2023;131.
- Jin M, Qian R, Wang J, et al. Influencing factors associated with mental workload among nurses: A latent profile analysis. *Int J Nurs Sci* 2024;11:330–7.
- Croushore A. A Chronic Pain Management Nurse Practitioner Brings Her Skills to Community Clinics. *Pain Manag Nurs* 2024;25:e160–1.
- Alex J, Ramjan LM, Ferguson C, et al. Development and psychometric evaluation of the catheter assessment, management and performance (CAMP) scale for nurses. *Nurse Educ Pract* 2024;80:104122.
- Love S, Cunningham N, Reid M, Adler M. Training Michigan School Providers (Nurses And Mental Health Specialists) In Pediatric Pain Management Strategies: Increasing Access To Care In Rural Communities. *J Pain* 2023;24:89.
- Noor S, Nursalam N, Sukartini T. Determinants of organisational commitment on nurse's performance. *Int J Innov Creat Chang* 2020;13:235–48.
- Wilandika A, Pandin MGR, Yusuf A. The roles of nurses in supporting health literacy: a scoping review. *Front Public Heal* 2023;11.
- Wijaya D, Supriyanto S, Yusuf A. Organisational Citizenship Behaviour (OCB) Model in Hospital Nurses in Indonesia. *Malaysian J Med Heal Sci* 2023;19:165–72.
- Komppa J, Eronen K, Korpela E. Work community support in professional language learning among culturally and linguistically diverse nurses : Implementation of action research in a hospital setting. *Lang Heal* 2024;2:100033.
- Dewi YS, Danasari TM, Sudarmaji WP, et al. Critical Cultural Competence of Nurses in Intensive Care Unit: A Review. *Malaysian J Med Heal Sci* 2023;19:173–9.
- Diriba D. IDF21-0155 Effectiveness of a nurse-led community-based self-management program among adults with diabetes-family dyads in Ethiopia. *Diabetes Res Clin Pract* 2022;186:109478.
- Kenwright M, Fairclough P, McDonald J, Pickford L. Effectiveness of community mental health nurses in an integrated primary care service: An observational cohort study. *Int J Nurs Stud* 2024;6:100182.
- Dauvergne JE, Bruyneel A, Caillet A, et al. Workload assessment using the nursing activities score in intensive care units: Nationwide prospective observational study in France. *Intensive Crit Care Nurs* 2024.
- Sánchez-Sánchez MM, Campos-Asensio C, Arias-Rivera S. Workloads of intensive care nurses. Validity of their estimation using mobile applications and comparison with Nursing Activities Score. Systematised review of the literature. *Enfermeria Intensiva (English ed)* 2024;35:229–41.
- Gunawan DR, Eliyana A, Angraini RD, et al. Organizational citizenship behavior in correctional institutions: Does meaning of work matter? *Kybernetes*. 2024.
- Bayadsi J, Drach-Zahavy A, Cohen M, Sruловичi E. Unraveling the impact of subjective and objective workload on patient experience: Mediation and moderation by missed nursing care assessments in a nested multisource diary design. *Int J Nurs Stud* 2025;161:104919.
- Sallach T, Mönke FW, Schäpers P. Cybervetting of organizational citizenship behavior Expectations: Profile summary as a Key in LinkedIn-based assessments. *Comput Human Behav* 2024;154.
- Sembiring MJ, Eliyana A, Papien M, et al. Antecedents of organizational citizenship behavior of marketing and supply chain employees. *Probl Perspect Manag* 2023;21:255–66.
- Thomas G, Albishri NA. Driving employee organizational citizenship behaviour through CSR: An empirical study in the context of luxury hotels. *Acta Psychol (Amst)* 2024;245:104231.
- Hsieh CC, Li HC, Liang JK, Chiu YC. Empowering teachers through principals' emotional intelligence: Unlocking the potential of organizational citizenship behavior in Taiwan's elementary schools. *Acta Psychol (Amst)* 2024;243:104142.
- Schlindwein LF, Montalvo C. Energy citizenship: Accounting for the heterogeneity of human behaviours within energy transition. *Energy Policy* 2023;180:113662.
- Chant K, Meek J, Hayns-Worthington R, et al. Live stream webcams on the neonatal unit: 'An additional responsibility' for nursing workload? *J Neonatal Nurs* 2024;30:33–7.
- Agbejule OA, Ekberg S, Hart NH, Chan RJ. Supporting cancer-related fatigue self-management: A conversation analytic study of nurse counsellor and cancer survivor consultations. *Eur J*

- Oncol Nurs 2024;73.
33. McBride M. The role of community and district nurses. *Clin Integr Care* 2019;27:100231.
  34. Choi S, Jeong KS, Park SR. ESG activity recognition enhances organizational commitment and service-oriented organizational citizenship behavior among insurance call center staff. *Heliyon* 2024;10:e31999.
  35. Lo Presti A, Ambrosino G, Barattucci M, Pagliaro S. Good guys with good apples. The moderating role of moral competence on the association between moral disengagement and organizational behaviours. *Rev Eur Psychol Appl* 2023;73:100891.
  36. Kamil NLM, Idris MA. The Effect of Proactive Personality as a Buffer Mechanism on Organisational Citizenship Behaviour: The Role of Contextual Factors and Work Engagement. *Saf Health Work* 2022;13:S301–2.
  37. Karupaiah V, Idris MA. The effects of organizational justice and stressors on organizational citizenship behavior and health among employees in Malaysia: A Multilevel Approach. *Saf Health Work* 2022;13:S304.
  38. Li YX, Chen CH. The impact of employee-perceived CSR on organizational citizenship behavior - evidence from China. *Asia Pacific Manag Rev* 2023;28:487–500.
  39. Hermanto YB, Srimulyani VA, Pitoyo DJ. The mediating role of quality of work life and organizational commitment in the link between transformational leadership and organizational citizenship behavior. *Heliyon* 2024;10:e27664.
  40. Sridadi AR, Eliyana A, Gunawan DR, et al. The mediating role of work engagement: A survey data on organizational citizenship behavior. *Data Brief* 2022;42:108243.
  41. Tear MJ, Reader TW. Understanding safety culture and safety citizenship through the lens of social identity theory. *Saf Sci* 2023;158:105993.
  42. Alex J, Ferguson C, Ramjan LM, et al. Development and evaluation of a spaced eLearning intervention for nurses in enhancing urinary catheter management - A co-design study in partnership with research end-users. *Nurse Educ Today* 2025;144:106448.
  43. Jiang W, Zhang Y, Yan F, et al. Effectiveness of a nurse-led multidisciplinary self-management program for patients with coronary heart disease in communities: A randomized controlled trial. *Patient Educ Couns* 2020;103:854–63.
  44. Jepma P, Eijk R, Bos AAE, et al. International Journal of Nursing Studies Advances Feasibility of a new transmural care pathway for advance care planning for older persons : A qualitative study into community care registered nurses' perspectives. *Int J Nurs Stud Adv* 2024;7:100264.
  45. Liu WI, Liu CH, Liao CY, et al. Mobile community learning programme's effectiveness in case management for psychiatric nurses: A preliminary randomised controlled trial. *Nurse Educ Today* 2020;85:104259.
  46. Arefadib N, Cooklin A, Nicholson J, Shafiei T. Postnatal depression and anxiety screening and management by maternal and child health nurses in community settings: A scoping review. *Midwifery* 2021;100:103039.
  47. Bozzetti M, Soncini S, Bassi MC, Guberti M. Assessment of Nursing Workload and Complexity Associated with Oncology Clinical Trials: A Scoping Review. *Semin Oncol Nurs* 2024;40:151711.
  48. Moore LD, Arbogast JW, Robbins G, et al. Drastic hourly changes in hand hygiene workload and performance rates: a multicenter time series analysis. *Am J Infect Control* 2024;52:1371–6.
  49. Landry V, Kilpatrick K. Essential Elements of a Workload Measurement Instrument for Nurse Practitioners. *J Nurse Pract* 2024;20.
  50. Thumm EB, Smith D, Giano Z. Evaluating the roles of workload and practice climate in workforce retention across the midwifery career lifespan: A latent profile analysis of early-, mid-, and late-career US midwives. *Women and Birth* 2024;37:101833.
  51. Hess LM, Das S, Asaithambi R, et al. Impact of EHR on Realism, Skills, and Workload in Sepsis Simulation. *Clin Simul Nurs* 2024;93:101560.
  52. Reguera-Carrasco C, Barrientos-Trigo S. Instruments to measure complexity of care based on nursing workload in intensive care units: A systematic review. *Intensive Crit Care Nurs* 2024;84:103672.
  53. Sibilio S, Zabolli A, Parodi M, et al. Objective assessment of nursing workload in an intermediate care unit: A prospective observational study. *Intensive Crit Care Nurs* 2025;86:103767.
  54. Park S, Yoo J, Lee Y, et al. Quantifying emergency department nursing workload at the task level using NASA-TLX: An exploratory descriptive study. *Int Emerg Nurs* 2024;74:101424.
  55. Lashley M. Unleashing the Power to Serve: Engaging Nurses in the Community. *J Radiol Nurs* 2024.
  56. Johnson HL, Cruthirds DF, Taylor LA, et al. Redefining faculty workload metrics: A data-driven approach. *J Prof Nurs* 2024;55:112–8.
  57. Pohl S, Battistelli A, Djediat A, Andela M. Emotional support at work: A key component for nurses' work engagement, their quality of care and their organizational citizenship behaviour. *Int J Africa Nurs Sci* 2022;16:100424.
  58. Qalati SA, Zafar Z, Fan M, et al. Employee performance under transformational leadership and organizational citizenship behavior: A mediated model. *Heliyon* 2022;8.
  59. Jiang C, He L, Xu S. Relationships among para-social interaction, perceived benefits, community commitment, and customer citizenship behavior: Evidence from a social live-streaming platform. *Acta Psychol (Amst)* 2024;250:104534.
  60. Mulazdi FM, Cur M, Littet Phil D, Gundo R. The views of nurses and healthcare users on the development of Ubuntu community model in nursing in selected provinces in South Africa: A participatory action research. *Nurs Outlook* 2024;72:102269.
  61. Su L, Cheng X, Zarifis A. Passengers as defenders: Unveiling the role of customer-company identification in the trust-customer citizenship behaviour relationship within ride-hailing context. *Tour Manag* 2025;107.
  62. Wang M, Armstrong SJ, Li Y, et al. The influence of leader-follower cognitive style congruence on organizational citizenship behaviors and the mediating role of trust. *Acta Psychol (Amst)* 2023;238:103964.
  63. Ross P, Sheldrake J, Ilic D, et al. An exploration of intensive care nurses' perceptions of workload in providing extracorporeal membrane oxygenation (ECMO) support: A descriptive qualitative study. *Aust Crit Care* 2024;37:585–91.
  64. Vauhkonen A, Saaranen T, Cassar M, et al. Professional competence, personal occupational well-being, and mental workload of nurse educators – A cross-sectional study in four European countries. *Nurse Educ Today* 2024;133.
  65. Lawrence PR, Spratling R. Resources, Workload, and Care Coordination Hours Predict Depressive Symptoms in Parents of Children with Medical Complexity. *J Pediatr Heal Care* 2024;38:781.
  66. Ditlopo P, Rispel LC, Van Bogaert P, Blaauw D. The impact of the nurse practice environment, workload, and professional support on job outcomes and standards of care at primary health care clinics: A structural equation model approach. *Int J Nurs Stud Adv* 2024;7:100241.