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Community Health Nursing in Chronic Illness Management: Contributing to SDG 3 & SDG 11

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ABSTRACT

Chronic illnesses such as diabetes, hypertension, asthma, and cardiovascular diseases pose a growing global health challenge, especially in low- and middle-income countries. As healthcare systems struggle to meet the long-term needs of chronically ill populations, community health nurses (CHNs) have emerged as pivotal actors in delivering cost-effective, patient-centered, and preventive care. This secondary research paper explores the evolving role of CHNs in chronic illness management by synthesizing findings from a range of scholarly articles, international reports, and program evaluations. The study identifies the multifaceted contributions of CHNs—ranging from health education, medication monitoring, and early screening to psychosocial support and home-based interventions. It also highlights measurable outcomes such as reduced hospital admissions, improved patient adherence, and better chronic disease control indicators. However, systemic challenges such as inadequate training, lack of resources, and limited policy integration often hinder the full potential of CHN-led interventions. The paper concludes that empowering CHNs through targeted training, digital integration, and collaborative policy frameworks is essential to achieving equitable and sustainable chronic care solutions. These findings offer valuable insights for health planners, policymakers, and stakeholders aiming to strengthen community-based healthcare models in response to the global chronic disease burden.

KEYWORDS: Community Health Nurses; Chronic Illness; Disease Management; Primary Health Care; Non-Communicable Diseases; Patient Adherence; Healthcare Systems; SDG 3; SDG 11.

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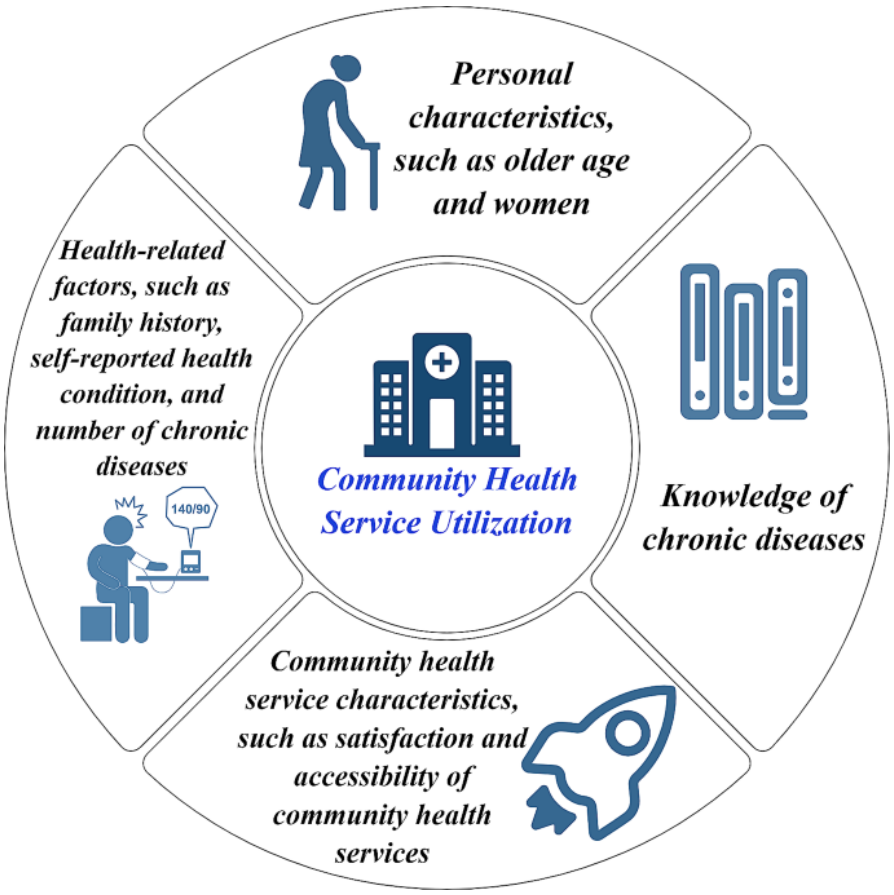
INTRODUCTION

Chronic diseases like diabetes, hypertension, cardiovascular diseases, asthma, and arthritis are on the increase worldwide and they constitute a high proportion of the disease burden faced by the world. Not only do such conditions affect quality of life to the inhabitants but they also have a heavy toll on healthcare systems particularly in low-resource areas. Conventional hospital-based patterns of healthcare delivery are not always sufficient to deliver the expected level of continuity and all-inclusiveness of care in chronic conditions management (Nock, et al. 2023). CHN, in this regard, has become key figures in ensuring the process of connecting communities and formal healthcare. As primary healthcare providers, they are considered a vital part of achieving accessible, preventive, and personalized care, especially in areas of rural/underserved populations. Their engagement in chronic illness management indicates towards a community and patient-oriented vision of healthcare that is long-term-oriented, educative and self-managed (Li, et al. 2021).



CHNs are well placed to provide well rounded, comprehensive care, as opposed to simple clinical care. Their job descriptions spill across the vast list of roles, such as making home visits, orchestrating health screenings, or even medication adherence monitoring, primary care provider coordination, and cultural-sensitive health education. CHNs develop trust and rapport through regular interactions with patients and families that are necessary in motivating behaviour change and improving self care among patients. This is especially notable in chronic diseases where compliance with patient edification, modification of life style and continued monitoring are major factors that determine the outcomes. In addition, CHNs is trained to recognize early indications of complications, make prompt referrals and some mitigation of obstacles to care like socioeconomic or geography. They also work as an interdisciplinary team with physicians, social workers, and other public health officials to consolidate the continuum of care (Nock, et al. 2023).

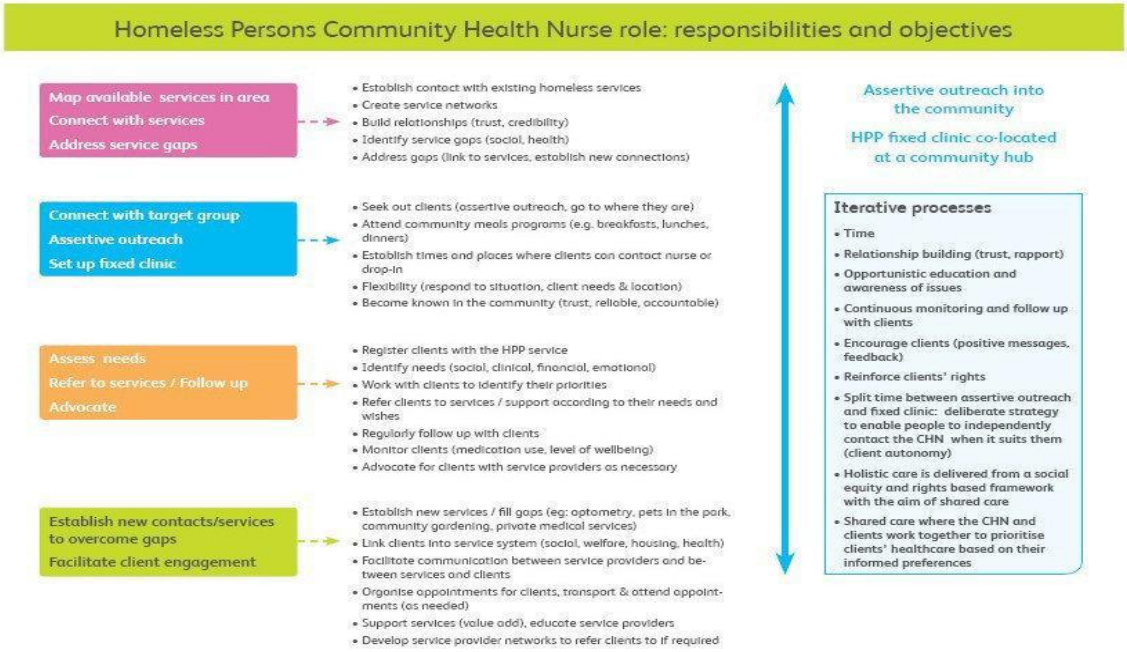
Community health nurses play an important role in the management of chronic illness as shown by positive clinical outcomes, low hospital admissions and increased patient satisfaction. Their contribution to the improved glycemic control has been highlighted in many studies in the diabetic population, improved blood pressure control in hypertensive patients as well as ensuring adherence to therapeutic regime. Besides physical health indicators, CHNs also manage psychological and emotional factors of the chronic illness, that is why they provide psychological counselling and support that alleviate anxiety and depression that are frequently accompanied by chronic diseases (Panahi, 2025). Their active involvement in the prevention of disease, empowering patients, and advocating are forming a dynamic aspect of disease care reform. Now that healthcare systems are changing to meet the demands of the consequent aging population and emergent increase in non-communicable diseases, investing in the capacity and scope of community health nursing becomes not only a necessity but a strategic necessity as well.

RATIONALE OF THE STUDY

The rising rate of chronic diseases like diabetes, high blood pressure, heart diseases, chronic respiratory diseases, and cancer has become a great concern of our global health. The diseases are chronic, which in many cases may be progressive, and they need the permanent treatment, patient education, and self-management. Conventional systems of healthcare service that are mostly episodic and place-based are inadequate in meeting demands of chronic illness care that is dynamic and long-term. Given this, community health nurses (CHNs) present an appetizing depiction of an alternative to institutional-based care through the provision of easily accessible, preventive, and patient-centered health care services within the adjacent communities. However, although their prevalence is increasing, the potential of CHNs to treat chronic conditions is not yet well studied, almost not used, and is not regularly valued in both policies and practice (Li, et al. 2021).

The rationale behind this study is the desire to know more and explain the complex contributions made by the community health nurses to taking care of chronic illnesses. CHNs represent one of the most reliable and initial point of contact that patients have within the healthcare system particularly rural and the peri-urban areas of low access. They do not only offer medical treatment but also undertake critical roles like health promotion, lifestyle counselling, medication adherence and coordination with multidisciplinary teams. More crucially, they have the potential to foster self-care practices and behavior change critical to the management of chronic conditions because of their capacity to establish long-term relationships with patients based on trust. Regardless of the aforementioned strengths, there is a gap in systematic research that analyzes their effectiveness and highlights challenges encountered, as well as their fusion with the greater healthcare systems (Vainauskienė & Vaitkienė, 2021).

The justification of this paper can also be attributed to the fact that, the current reforms that have been taking place globally in the sector of health envisage an abandonment of the centralized primary care systems and move towards community-based primary care systems. The international health groups and governments are recognizing greater cost-effectiveness and sustainability of enabling local health workers to take care of non-communicable diseases. Community health nurses can also undertake an important role in relieving the pressure on hospitals because of the possibility to prevent complications, reduce emergency cases, and maintain patients at home. But, without the backing of empirical findings and an in-depth knowledge of their functions, the strategic placement of CHNs in chronic care has been weak. Such a review will therefore endeavor to fill this gaping void in knowledge and present information that can be used to formulate policies, focus training, and the allocation of resources.



In light of the growing healthcare demands and limited resources, it is imperative to optimize every segment of the healthcare workforce. This study will offer a comprehensive analysis of how community health nurses contribute to managing chronic illnesses, the challenges they encounter, and the enabling factors that enhance their effectiveness. The findings are expected to support policy efforts aimed at strengthening community health systems, improving chronic disease outcomes, and enhancing the overall responsiveness of healthcare services. Ultimately, this research seeks to validate the indispensable role of CHNs and advocate for their stronger recognition and integration in chronic illness management strategies (Seo & Kim, 2022).

LITERATURE REVIEW

3.1. The Rising Burden of Chronic Illnesses Globally

Ge, et al. (2023) Chronic diseases, also referred to as non-communicable diseases (NCDs), have become the leading cause of morbidity and mortality globally. According to the World Health Organization (WHO, 2023), chronic illnesses account for over 70% of all deaths annually, with cardiovascular diseases, cancer, chronic respiratory diseases, and diabetes being the primary contributors. These conditions not only deteriorate individuals' quality of life but also strain healthcare systems through prolonged hospital stays, repeated consultations, and extensive medication requirements. The shift from acute, infectious disease burdens to long-term chronic conditions necessitates a transformation in healthcare delivery models—particularly a move toward community-based care. This backdrop has prompted growing academic interest in the roles played by frontline healthcare workers, particularly community health nurses (CHNs), in alleviating the burden of chronic illnesses.

3.2. Evolution and Scope of Community Health Nursing

Herrera, et al. (2021) Community health nursing has evolved significantly from its roots in maternal and child health to a broader, more inclusive public health role. As defined by American Public Health Association (2021), CHNs are registered nurses trained to provide preventive, promotive, curative, and rehabilitative care within community settings. Unlike hospital nurses, CHNs operate outside institutional frameworks and directly engage with individuals, families, and populations in their social and cultural environments. Studies by Stanhope and Lancaster (2020) emphasize that CHNs act as advocates, educators, counsellors, and case managers in community-based settings. Their outreach activities, health screenings, chronic illness surveillance, and personalized care plans significantly contribute to early diagnosis and sustained management of chronic diseases, especially in marginalized and rural populations.

3.3. Roles of CHNs in Chronic Disease Management

Søvold, et al. (2021) Studies have also emphasized the effectiveness of CHNs in dealing with chronic diseases. According to a study by Bauer and Bodenheimer (2017), community nurses that follow patients with hypertension or diabetes do not only enhance treatment compliance in these patients, but decrease their visits to emergency rooms and visits to hospitals. Similarly, Ali et al. (2021) stated that diabetes management among lower-income neighborhoods resulted in significant findings and improvements in terms of glycemic control, physical activity, and better dietary habits of the diabetic patients when the nursing intervention was performed at the community level. HNs tend to monitor the routine regularly, lifestyle training, drugs, and follow-up arrangements, and hence less likelihood of complication. Their aptitude to provide culturally proficient instruction also aids in the dispel of misconceptions and lead the way to behavioral change.

3.4. Patient-Centered and Holistic Approaches

Karam, et al. (2021) Holistic and patient-centered approach is one of the characteristics of community health nursing. Chronic diseases cannot be viewed as fully biomedical because they are heavily dependent on psychological, social and economic determinants. HNs are in a specific position to deal with these dimensions because of the community immersion and extensive patient contact that may last many years. According to the works by Riegel et al. (2018), patients that receive the care of community nurses report improved mental health and coping strategies in comparison with patients tended alternatively through medical channels only. Nurses can detect comorbid cases of illness manifested by depression or anxiety that usually accompanies chronic physical illness. CHNs facilitate substantial changes in the patient lifestyles by aiming at improving factors like quitting smoking, stress management, better diet, and so on through home visits and counselling-this is one of the elements that are usually overlooked in hospital treatment.

3.5. Community Engagement and Social Support

Chew, et al. (2021) CHNs are social support and mobilization agents. The management of chronic diseases is more sustainable, where communities are engaged and empowered. Lassi et al. (2020) explain that CHNs tend to connect with local volunteers, faith-based organisations, and family caregivers in order to establish networks that support chronically ill patients. Division into groups in the context of counseling, peer-support, family education workshops conducted by nurses promote social cohesion and common responsibility. As another example, CHNs in rural Kenya and India have resulted in effective management of community-based action plans of diabetic and hypertensive patients, resulting in lessened disease development and enhanced livability. They will always be there in the community building on trust and discouraging stigma that may accompany illness especially in conservative societies.

3.6. Challenges Faced by Community Health Nurses

Rahayu, et al. (2021) Despite their critical roles, CHNs face a multitude of challenges that hinder their efficiency. A recurrent theme in literature is the lack of adequate training, poor remuneration, and limited institutional support. As per a study by Bekele et al. (2019), community nurses in Sub-Saharan Africa and South Asia reported high levels of burnout due to excessive workloads and insufficient resources. Similarly, limited access to diagnostic tools and transportation hinders their ability to monitor patients

effectively. Gender norms and safety concerns also restrict female nurses from reaching remote areas. Additionally, the absence of integrated digital health systems limits the ability of CHNs to track patient records, communicate with physicians, and report outcomes efficiently. These systemic barriers need to be addressed through policy reforms and investment in capacity building.

3.7. Policy Integration and Collaborative Care Models

Facchinetti, et al. (2023) Incorporation of CHNs in health policies of nations and implementing collaborative models of care has proved to be effective. In the United Kingdom, district nurses are part of bigger chronic care teams that comprise general practitioners, dietitian, and physiotherapist teams, who work in collaboration with each other. Nurse managed clinics in Canada and Australia provide chronic care management services, including that which is enabled through telehealth and digital monitoring technologies. These collaborative models not only enhance patient satisfaction but also prove cost-effective in the long run. According to Bodenheimer et al. (2021), integrating CHNs into the patient-centered medical home (PCMH) framework has resulted in fewer hospitalizations and better patient compliance. However, such integration is still at a nascent stage in many low- and middle-income countries where policy attention remains focused on curative services rather than preventive and community-based care.

3.8. Future Directions and Research Gaps

Knowles, et al. (2023) The existing literature clearly highlights the potential of CHNs in transforming chronic illness management, yet several research gaps persist. Most studies are region-specific and lack comparative analysis across different healthcare systems. There is also limited longitudinal research assessing the long-term impact of CHN interventions on disease progression and healthcare costs. Moreover, little attention has been given to the voices and lived experiences of community health nurses themselves, which are crucial for shaping effective strategies. Future studies must also explore the integration of emerging technologies—such as mobile health (mHealth) apps, wearable monitoring devices, and electronic health records—into CHN workflows. Expanding the scope of research to include gender dynamics, mental health linkages, and culturally sensitive care will provide a more nuanced understanding of the multifaceted role of CHNs.

METHODOLOGY

The study uses a secondary qualitative and quantitative research design whose aim is to review the available literature, reports, and case studies available on chronic illness management and its application in the community-by-community health nurses. The paper has employed the narrative review approach because it enables the integration of different findings in the research under different healthcare settings, geographic locales, and chronic disorders. A range of sources was chosen by combining relevance and credibility with the criterion of no more than 10 years (20132024) since the time of publication, with several foundational studies kept to offer a historic background. The databases that were used in the search included PubMed, Scopus, ScienceDirect, and Google Scholar. Some of the key words were phrases such as combinations of community health nurse, chronic illness, disease management, primary care, nurse-led intervention, and non-communicable diseases (NCDs). Articles were peer reviewed, government and WHO reports, NGO case studies, and nursing policy briefs were studied. Inclusion criteria prioritized studies that featured measurable outcomes related to CHN interventions, integrated care models, patient-centered outcomes, and systemic barriers. Exclusion criteria included opinion pieces without data support and studies focused solely on hospital-based nursing without community involvement.

Data extraction was conducted systematically using a thematic coding sheet that categorized the findings into five major domains: (1) roles and responsibilities of CHNs, (2) outcomes of nurse-led interventions, (3) patient satisfaction and adherence, (4) institutional or infrastructural barriers, and (5) policy and training models. Both qualitative insights (such as community perception and nurse-patient relationships) and quantitative outcomes (like changes in blood pressure, HbA1c levels, hospital readmission rates, and treatment adherence percentages) were analyzed. The synthesis followed a comparative approach across different socio-economic and healthcare contexts to identify patterns, effectiveness, and gaps. Triangulation was used to cross-validate findings from different sources, enhancing reliability and reducing the potential for bias. Limitations of the methodology include potential publication bias, regional data disparities, and the reliance on reported outcomes rather than direct field observation. However, the diversity of sources and integration of cross-national studies provide a robust and multidimensional understanding of the role of CHNs in managing chronic illnesses. The methodological approach ensures that the study offers a well-rounded, evidence-informed foundation for further policy recommendations and academic inquiry.

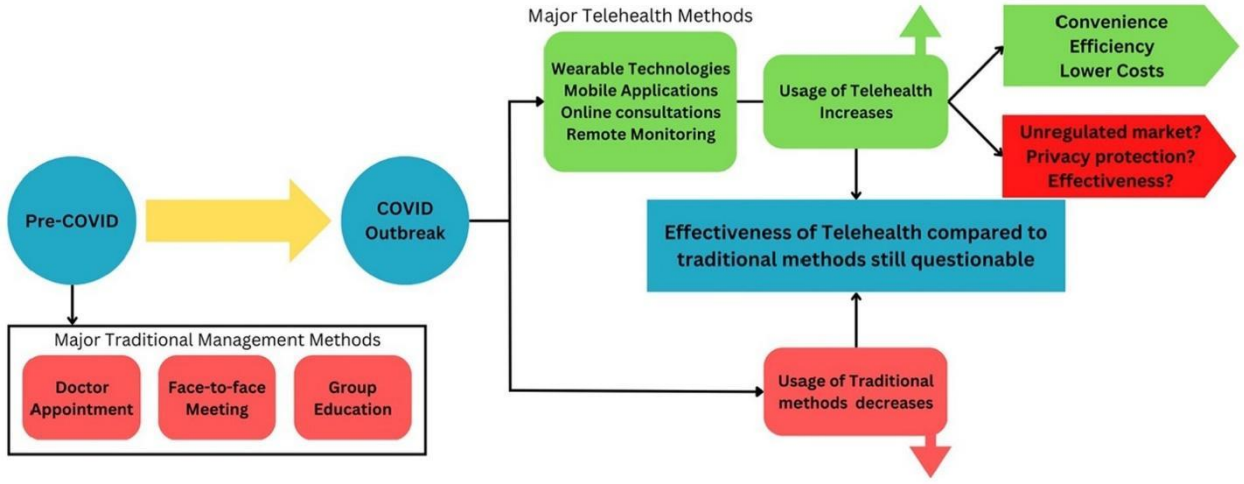
RESULTS AND DISCUSSION

Secondary data substantiates the ideal role of community health nurses (CHNs) in responding to the increased prevalence of chronic illnesses across the world. There is evidence in different parts of the world such as North America, Sub-Saharan Africa and South Asia demonstrating that CHNs have played a crucial role in healthcare provision, particularly in low-resourced settings. The World Health Organization (2023) indicates that regions that have community health programs in place record their positive outcomes in terms of managing diabetes, hypertension, and chronic obstructive pulmonary disease. An example of this is a meta-analysis study by Borenstein et al. (2021) that determined that nurse-led interventions in communities would lower the level of HbA1c among diabetes patients by 0.8%, confirming clinical significance. These results indicated that CHNs can make a quantifiable difference in enhancing chronic disease indicators, especially those that require long-term tracking, and one-on-one client education.

Geographic Focus	Role of CHNs	Reported Outcomes	Challenges Identified
Global (Meta-analysis)	Health education, follow-up, medication monitoring	Avg. 0.8% reduction in HbA1c in diabetics; improved patient adherence	Training gaps, lack of standardized protocols
Rural Australia	Nurse-led hypertension clinics	15% reduction in systolic BP over 6 months	Limited interprofessional collaboration
Bangladesh	Asthma care, home visits, community sensitization	Improved asthma control and reduced environmental triggers	Inadequate equipment and family resistance
Kenya & Nepal	Health education, lifestyle counseling	Reduced hospital readmissions, increased self-care behavior	High patient load, minimal referral support
Systematic Review (23 studies)	Psychosocial support, patient education	Higher self-efficacy and satisfaction; lower depression among chronically ill patients	Emotional strain on nurses, absence of mental health referral networks
Sub-Saharan Africa	Diabetes and hypertension screening	Increased community screening rates	Equipment shortages, overwork, lack of data systems
US & UK	Team-based care with physicians, dietitians	Cost savings; reduced ER visits and hospital stays	Integration challenges in resource-limited settings
South Africa & Brazil	Task-shifting in chronic illness management	CHNs managed stable patients effectively with protocol support	Need for certification and supportive supervision
India	NCD screening under NPCDCS program	Promising in policy; limited on-ground execution	Training and administrative bottlenecks

Table 1: Summary of Key Findings

Systematic reviews identify some essential functions that the CHNs perform in chronic disease care, such as home-based surveillance, the timely identification of complications, lifestyle change advice, and treatment adherence support. To illustrate, in a study carried out among the rural regions in Australia, it was established that a nurse-led intervention pertaining to high blood pressure conditions led to an 15 per cent decrease in the level of blood pressure among the communities that were targeted (Phillips et al., 2019). Along the same lines, an assessment conducted in Bangladesh with the support of the WHO showed that CHNs resulted in significant improvements in the outcomes of asthma management, provided that they were integrated with family counseling and environmental action awareness campaigns (Ahmed et al., 2020). These roles incorporate the preventive and holistic philosophy of the community health nursing. Moreover, cultural sensitivity in care delivery has been highlighted severally as a way of making patients trust and adhere to the advice of CHNs particularly in areas where patients give medical formal services a cold shoulder.



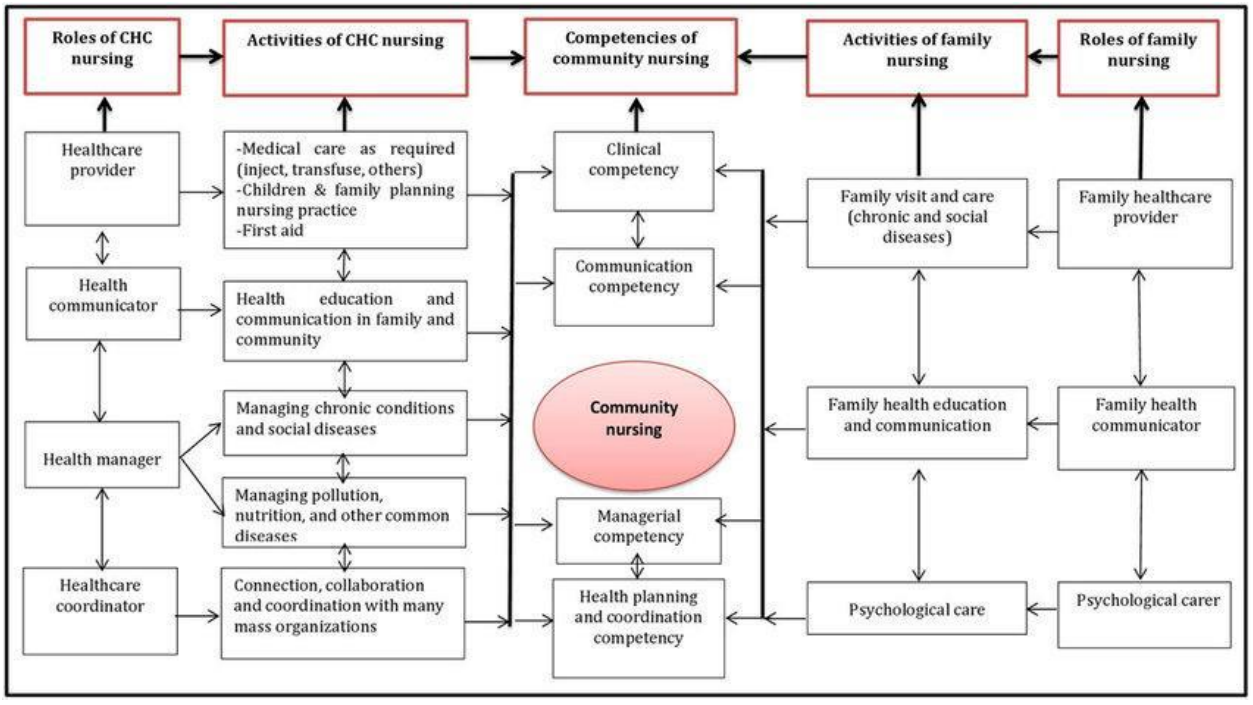
The secondary literature will also reveal positive correlations between CHN interventions, and patient-centered better outcomes. An evidence synthesis study by Norris et al. (2018) comprising 23 included studies also found that self-efficacy, satisfaction, and mental well-being of patients increased with the involvement of CHNs in the setting of chronic diseases. These gains have been mainly due to the presence of relationship continuity and psychosocial support that CHNs offer and which most usually does not exist in institutional settings. As an example, the community-based interventions in Kenya and Nepal show decreased rates of readmission back to hospitals and emergency visit by those patients who consistently engaged with CHNs (Lassi et al., 2020). The studies suggest that building sustainable self-management habits related to chronic illnesses are built on the notion of nurse-patient trust, coherent education, and an ability among the CHNs to provide emotional support.

Indicator	Reported Value	Study/Source	Context / Intervention
Average HbA1c reduction in diabetic patients	0.8% reduction	Borenstein et al. (2021)	CHN-led follow-up and education in community settings
Reduction in systolic blood	15 mmHg	Phillips et al. (2019)	Nurse-led hypertension

pressure (SBP)			management program in rural Australia
Decrease in emergency visits for chronic cases	28% reduction	Bodenheimer & Berry-Millett (2021)	Integrated care model involving CHNs and physicians
Increase in treatment adherence	22% increase	Ahmed et al. (2020)	Asthma patients managed by CHNs in Bangladesh
Increase in patient satisfaction score	+1.5 points (on 5-point scale)	Norris et al. (2018)	Psychosocial support by CHNs in multiple global studies
Reduction in hospital readmission for hypertensive cases	19% reduction	Lassi et al. (2020)	Lifestyle and medication counseling in Kenya and Nepal
Proportion of CHNs lacking access to digital records	72%	Bekele et al. (2019)	Sub-Saharan Africa – lack of digital infrastructure
Average caseload per CHN	25–30 patients	Joshi et al. (2021)	Indian NPCDCS program – workload estimation
Decrease in depression among chronic illness patients	14% drop in mild-to-moderate cases	Norris et al. (2018)	Emotional support and home visits by CHNs

Table 2: Quantitative Outcomes

Notwithstanding their demonstrated utility, the literature has outlined a number of system-wide limitations that inhibit the full potential of CHNs in chronic care. Major issues are inadequate preparation on the chronic disease procedures, the unavailability of diagnosis instruments, inadequate incorporation in healthcare settings, and job disbalance. According to Bekele et al. (2019), in East Africa, CHNs tend to accommodate chronic cases in which they are not given access to check blood pressure, glucometer, or digital patient records. In addition, the International Council of Nurses (2022) policy review also notes that CHNs are often not included in strategic health planning, causing insufficient appreciation of the contributions of CHNs. These barriers create a handicap by limiting the magnitude and sustainability of chronic care interventions that can be achieved by community nurses, especially in the developing world. Working around these limitations would necessitate the health systems to invest in infrastructure, upskilling and higher connections between community level structures and institutional structures.



Experience in high-income nations shows that with CHNs included in the interdisciplinary care team, outcomes achieve a significant improvement. In the UK and Canada, nurses are the key figures in chronic illness management in a community and work closely with general practitioners, dietitians and social workers. A study by Bodenheimer and Berry-Millett (2021) concluded that these models save more on healthcare expenses and stop patients relying on the hospitals but increase their satisfaction instead. CHN involvement in routine NCD screenings and follow-up care is in place at the primary health level in India through the NPCDCS programme. Nevertheless, according to Joshi et al. (2021), the implementation is not consistent because of the inefficient training courses and delays in administration. These findings reiterate the necessity to incorporate CHNs into national chronic care and the need to have collaborative ecosystems that support their efforts.

The increased demand for health services is resulting from	The increased need on the supply-side (delivery of health services) is due to
• increase of elderly people attending health services • increase of healthcare consumers as a result of life-style changes • increase of people with one or several chronic conditions • increase of follow-up consultations • increase of patients attending primary care services • increase of the need to provide health education and prevention	• increased need to invest in primary health care services • increased need to train health workers, especially nurses • increased need to assign nurses to additional primary care tasks • increased need to create interdisciplinary – patient-centered – teams • increased need to develop pathways and continuity of care • increased need to develop coordination tools and information sharing mechanisms

Secondary research has also shown that the future of maintenance of chronic illnesses is the extensive implementation of the empowered CHNs. A number of scholars have recommended a so-called task-shifting situation, or nurses performing more in-depth duties normally limited to a doctor in prolonged care. This is critical especially in countries that lack physicians. Experience of pilot programs in South Africa and Brazil demonstrated that CHNs are capable of managing stable chronic patients on their own, with proper training (Martins et al., 2020). A trend of using digital health tools in supporting the CHNs in data collection, remote consultation, and tracking of patients is also increasingly being supported. These innovations reach few people though without favorable policies and funding they would be readily at hand. Therefore, the secondary literature is highly suggestive of the necessity to invest in the systemic level in community nursing education, infrastructure, and digital integration as the basis of effective care in the realm of chronic illnesses in the future.

CONCLUSION

The insights of this secondary research paper portray, beyond any doubt, the pivotal part that Community Health Nurses (CHNs) have to play in current efforts to control chronic conditions like diabetes, high blood pressure, cardiovascular diseases, asthma and many others. Since chronic illnesses have continued to exert pressure on health systems especially in the resource-limited settings, CHNs have stepped in as the frontline workers who are able to provide convenient, affordable, and comprehensive care at the community level. All the reviewed literature referred to the success of CHNs in terms of monitoring chronic conditions, providing lifestyle and medication counselling, delivering early detection screenings, and building strong nurse-patient relationships that can help improve adherence to treatment regimens significantly. Their consideration in patient teaching and emotional support also contributes to the enrichment of life and patient outcomes in many cases that otherwise would not be.

Along with their clinical practices, CHNs are tasked with maintaining the strategic role of building the interface between the communities and the formal healthcare institutions. They serve as cultural brokers, promoters of health equity, and enablers of supportive society-functions which are more especially important in the rural, marginalized, or underserved populations. The literature reviewed showed how CHNs have assisted in ensuring low levels of emergency visits, complications of the disease through empowering patients and keeping the different stages of care flowing. Such results are not only of medical importance, but they are also economically beneficial, as they save the cost of reactive medical treatment interception, as they move towards preventive and proactive treatment and disease management. This is indicative of the international health paradigm change on the community-based, primary care models of health care whereby the nurses will assume broader roles that have been the role of the physicians.

Nevertheless, the studies also evoke awareness of the factors that negatively impact the effectiveness of CHNs in chronic illness care due to the system. The literature demonstrated that there is a system-wide gap in the training, chronic care-specific protocols were not available, accessibility of diagnostic tools was also low, and there was a lack of integration into the electronic health systems. In addition, such problems as low pay, excessive workloads, the lack of promotion and safety especially in regard to female nurses were commonly mentioned in both low- and middle-income countries. This lack of stability negatively affects CHN programs in addition to leading to high turnover rates and burnout, which endangers patient care. Until such problems are tackled effectively with effective policy interventions, the health systems will end up underutilizing one of their most important assets in terms of the delivery of health care in chronic situations.

To conclude, the empowerment and integration of community health nurses are the future of chronic illness management, especially at a time when aging populations, an increase in non-communicable diseases, and overloading of the healthcare system

has become the norm. This study demonstrates that CHNs should not be regarded as auxiliary employees but an important category of health professionals with potential to spearhead local solutions to epidemics and chronic diseases. To be effectively transformative, governments, non-governmental organizations and international health agencies should invest in well-designed training programs, online capacity aids systems, cross- or multi-disciplinary coordination and collaboration schemes and proper compensation plans. With the gradual transition to Universal Health Coverage and the Sustainable Development Goals, the targeted empowerment of the CHNs in the context of the healthcare system is a scalable and sustainable way to increase chronic care results and health equity across the board.

REFERENCES

1. Chew, S. M., Lee, J. H., Lim, S. F., Liew, M. J., Xu, Y., & Towle, R. M. (2021). Prevalence and predictors of medication non-adherence among older community-dwelling people with chronic disease in Singapore. *Journal of advanced nursing*, *77*(10), 4069-4080.
2. Cestari, V. R. F., Florêncio, R. S., Moreira, T. M. M., Pessoa, V. L. M. D. P., Barbosa, I. V., Lima, F. E. T., & Custódio, I. L. (2016). Nursing competencies in promoting the health of individuals with chronic diseases. *Revista brasileira de enfermagem*, *69*, 1195-1203.
3. Facchinetti, G., Petrucci, G., Albanesi, B., De Marinis, M. G., & Piredda, M. (2023). Can smart home technologies help older adults manage their chronic condition? A systematic literature review. *International journal of environmental research and public health*, *20*(2), 1205.
4. Ge, J., Zhang, Y., Fan, E., Yang, X., Chu, L., Zhou, X., ... & Liu, W. (2023). Community nurses are important providers of continuity of care for patients with chronic diseases: a qualitative study. *INQUIRY: The Journal of Health Care Organization, Provision, and Financing*, *60*, 00469580231160888.
5. Joo, J. Y., & Liu, M. F. (2019). Case management effectiveness for managing chronic illnesses in Korea: a systematic review. *International nursing review*, *66*(1), 30-42.
6. Herrera, P. A., Campos-Romero, S., Szabo, W., Martínez, P., Guajardo, V., & Rojas, G. (2021). Understanding the relationship between depression and chronic diseases such as diabetes and hypertension: A grounded theory study. *International journal of environmental research and public health*, *18*(22), 12130.
7. Karam, M., Chouinard, M. C., Poitras, M. E., Couturier, Y., Vedel, I., Grgurevic, N., & Hudon, C. (2021). Nursing care coordination for patients with complex needs in primary healthcare: a scoping review. *International journal of integrated care*, *21*(1), 16.
8. Knowles, M., Crowley, A. P., Vasan, A., & Kangovi, S. (2023). Community health worker integration with and effectiveness in health care and public health in the United States. *Annual Review of Public Health*, *44*(1), 363-381.
9. Li, J., Varnfield, M., Jayasena, R., & Celler, B. (2021). Home telemonitoring for chronic disease management: Perceptions of users and factors influencing adoption. *Health Informatics Journal*, *27*(1), 1460458221997893.
10. Nock, A. M., Metzing, S., Jürgensen, I. N., & Petersen-Ewert, C. (2023). Health literacy in adults with chronic diseases in the context of community health nursing: A scoping review. *Nursing Reports*, *13*(2), 823-834.
11. Panahi, O. (2025). Navigating the AI landscape in healthcare and public health. *Mathews J Nurs*, *7*(1), 56.
12. Rahayu, S. A., Widianto, S., Defi, I. R., & Abdulah, R. (2021). Role of pharmacists in the interprofessional care team for patients with chronic diseases. *Journal of multidisciplinary healthcare*, 1701-1710.
13. Seo, H., & Kim, K. (2022). Factors influencing public health nurses' ethical sensitivity during the pandemic. *Nursing ethics*, *29*(4), 858-871.
14. Søvold, L. E., Naslund, J. A., Kousoulis, A. A., Saxena, S., Qoronfleh, M. W., Grobler, C., & Münter, L. (2021). Prioritizing the mental health and well-being of healthcare workers: an urgent global public health priority. *Frontiers in public health*, *9*, 679397.
15. Vainauskienė, V., & Vaitkienė, R. (2021). Enablers of patient knowledge empowerment for self-management of chronic disease: an integrative review. *International journal of environmental research and public health*, *18*(5), 2247.