World Journal of Advanced Research and Reviews
eISSN: 2581-9615 CODEN (USA): WJARAI
Cross Ref DOI: 10.30574/wjarr
Journal homepage: https://wjarr.com/

(RESEARCH ARTICLE)

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From Accra to America: Lessons from Ghana's Health Access Systems to Advance Equity and Affordability in U.S. Oncology Care

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World Journal of Advanced Research and Reviews, 2025, 28(01), 982-987

Publication history: Received on 03 September 2025; revised on 11 October 2025; accepted on 13 October 2025

Article DOI: https://doi.org/10.30574/wjarr.2025.28.1.3523

Abstract

Affordability, quality, and accessibility to high quality oncology care in the United States is disproportionate with respect to cost barriers, fragmented funding and geographic differences. Ghana can be used to provide insights into the development of access in the environment of limited resources, by reforming health financing, task-shifting, and community-based service delivery. This paper uses the Ghana health access systems to learn how oncology care in the U.S can be scaled and equity-based, using lessons learned in Ghana.

Comparative policy analysis using a mixed method was done. Phase 1 included a systematic scoping review (2000-2025) of Ghanaian policies, program evaluation and grey literature on health insurance (NHIS), community-based primary care (CHPS) and cancer screening programs. Phase 2 involved key informant interviews on 25 stakeholders, including policy makers, oncologists and community health workers in Ghana and the U.S, and thematically analyzed them to extract success mechanisms. Phase 3 simulated the cost-effectiveness and cost implication of three modified Ghana-based interventions, including: (a) community-based screening and patient navigation, (b) nurse-led oncology care through task-sharing, and (c) tiered co-payment waivers with specific subsidies.

The results indicate that Ghanaian strategies encourage diagnosis at an early stage, less out-of-pocket payments, and primary-specialty care connections. It has been projected using simulations that changing the community screening and task-sharing within the U.S. safety-net environment will reduce cases of late-stage cancer and the costs associated with treatment. Nonetheless, payment reform, investing in the workforce and supportive regulation will be required to implement this.

Keywords: Oncology Access; Health Financing; Ghana; Equity; Task-Shifting; Policy Transfer; Community-Based Care

1. Introduction

The current inequity in cancer outcomes in the United States stems from the socioeconomic barriers, uneven financing, and inability to access affordable and high-quality care. In low-income or rural settings, even with the significant progress in the sphere of oncology, patients are disproportionately exposed to the risks of late diagnosis and astronomical costs of treatment. The equity in cancer care should thus be pursued through innovative financing and delivery models, which have the potential to close the gap of affordability and access among different population groups.

Compared to Ghana, the situation is beneficial. The two reforms that have enabled Ghana to increase the number of covered by health care over the last 20 years are the National Health Insurance Scheme (NHIS) and the Community-Based Health Planning and Services (CHPS) program. These programs combine task-shifting, neighborhood outreach as well as partnerships with the private sector to spread vital services in resource-constrained environments. Despite the

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fact that the Ghanaian model was developed in different socioeconomic conditions, transferable principles are applicable in the policy of equity-oriented oncology in the U.S.

In this paper, a policy-transfer approach will be used to analyze ways in which the Ghanaian health-access initiatives, particularly, the affordability, workforce, and decentralization of services, can be used to guide U.S. oncology reform. The research synthesized the evidence of Ghana on the multi-level health system and tested their adaptability to form a contribution to the world discourse of health equity and effective directions to enhance the outcomes of cancer.

1.1. Objectives

- Determine Ghanaian policies and service-delivery innovations that are enhancing access and affordability of chronic and cancer care.
- Determine the relevance, transferability and limitations to the U.S. context.
- Provide practical policy and practice suggestions on the provision of equitable oncology services among various populations.

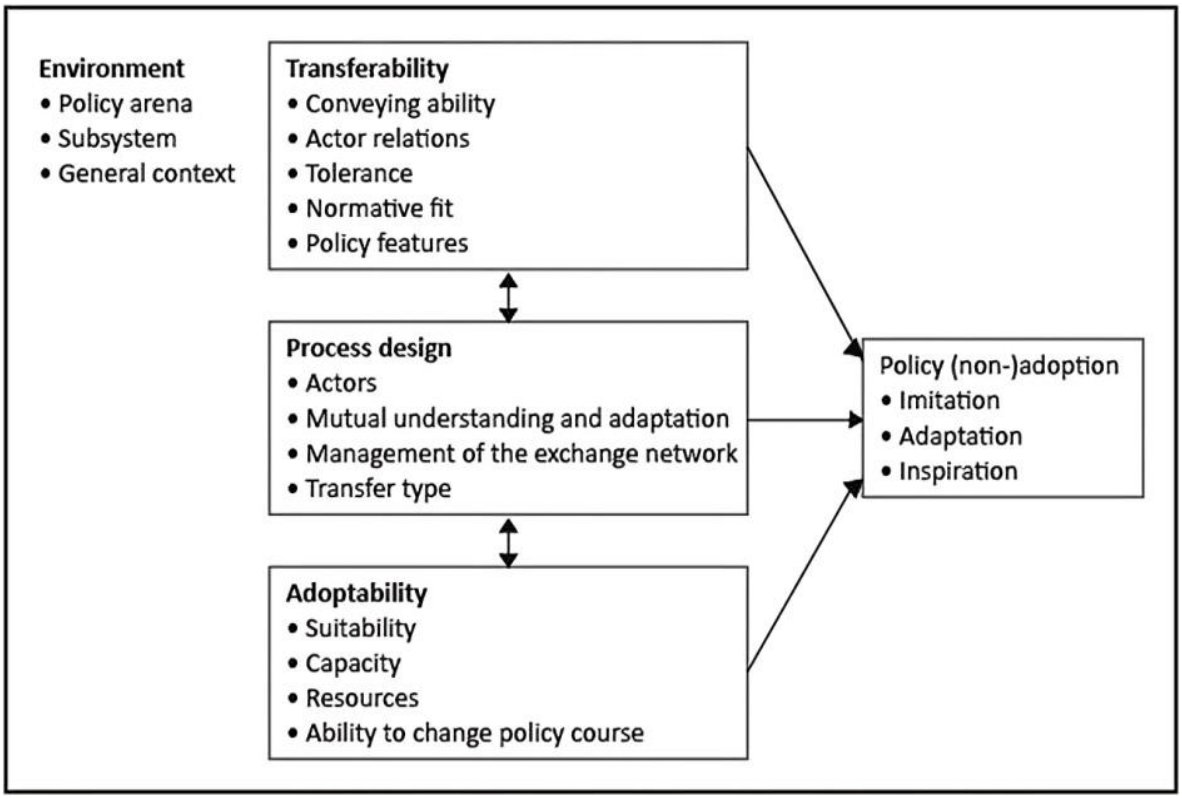

Figure 1 Conceptual model of health policy transfer.

2. Materials and methods

2.1. Study Design and Approach

This paper adopted a comparative policy analysis of both mixed-methods to discuss the health-access mechanisms in Ghana and how they can be adapted to provide equitable oncology care in United States. The design was organized in terms of three stages: (1) attempt to conduct a systematic scoping review of health policies and implementation programs in Ghana, (2) use of key informant interviews with stakeholders in Ghana and the U.S., and (3) cost-effectiveness and budget-impact quantitative modeling of the selected interventions.

2.2. Phase 1: Scoping Review

The systematic review was performed on the base of publications and policy documents published between 2000 and 2025. PubMed, Scopus and government repositories were searched using databases. There was also a review of grey literature like health ministry report and program evaluation.

The inclusion criteria was Ghanaian programs that targeted health financing (NHIS), community-based service delivery (CHPS), task-shifting and cancer screening or linkage programs. The information was mined on financing mechanisms, structure of implementation, outcomes and equity indicators.

2.3. Phase 2: Key Informant Interviews

In order to supplement the document review, 25 semi-structured interviews were conducted with the stakeholders of the health system namely policy makers, oncologists, nurses, community health officers, and both United States and Ghanaian patient advocates. The selection of participants was done purposely to cover the public sector, the private sector, and the community sector.

Interviews touched on practice issues and facilitating factors of applying equity-based care models. Informed consent was given by all the participants before they could participate and ethical approval through appropriate institutional review boards was obtained.

2.4. Phase 3: Quantitative Modeling

Based on the first two steps, simulations were conducted on the cost-effectiveness and budget-impact to evaluate three Ghana-inspired interventions in safety-net settings in the United States:

- Community-based screening and navigation,
- Oncology task-sharing by nurses, and
- Tiered co-payment waivers with specific subsidies (c).

In the model, the changes in the rates of late-stage presentation, cost of treatment, and incremental cost-effectiveness ratios (ICERs) were estimated using publicly available U.S. healthcare data.

2.5. Data Analysis

The thematic content analysis was used to analyze the qualitative data of interviews and policy documents in order to identify repetitive mechanisms of success, barriers, and contextual facilitators. Descriptive statistics and comparative metrics were used to summarize quantitative simulation results. Qualitative and quantitative evidence triangulation increased validity and gave a multidimensional insight on the potential transferability.

2.6. Ethical Considerations

Every practice was in accordance with the human-subject research ethics. All interviewees were given informed consent. No experimental interventions were done.

2.7. Research Team and Partnerships

The research was a collaborative effort of Ghanaian and U.S.-based investigators who had specialization in health economics, oncology, and health policy analysis. The alliances with the local community organizations and hospital networks made sure that the study was contextually accurate and relevant to the local health care delivery systems.

3. Results and discussion

3.1. Overview of Key Findings

The synthesis of Ghana's health-access strategies brought out three interrelated mechanisms of success: (1) early detection and treating by decentralized screening, (2) financial security through insurance and co-payment reduction, and (3) manpower development through task-shifting and community partnerships. These mechanisms, in unison, not only achieved equity in health outcomes but also marked the establishment of a close relationship between primary and specialized care, and consequently, diagnosis and treatment took place with less delay. Such learning from the Ghana's case may lead to the reconsideration of the already very low-cost yet equitable delivery models as a means of addressing the long-standing issue of disparity existing in cancer care access and affordability for the low-income and minority groups in the U.S.

3.2. Mechanisms Driving Access and Equity in Ghana

3.2.1. Community-Based Screening and Navigation (CHPS):

Ghana's CHPS program introduced the services of nurses and community health officers who performed outreach, screening, and navigation. Reports from the program and interviews with health officials corroborated that the early detection of chronic and cancer-related diseases was substantially better in rural areas because of this initiative.

3.2.2. Health Financing Reform (NHIS):

The introduction of the National Health Insurance Scheme benefited the poor by reducing their out-of-pocket (OOP) costs and by paying for their health insurance. Although the NHIS still does not cover specialized oncology services in full, the model of tiered subsidies and pooled financing used by the NHIS is a way of reducing the burden of catastrophic health expenditures to a large extent.

3.2.3. Task-Shifting and Workforce Strengthening:

Ghana's strategy of nurse-led oncology support and employment of mid-level practitioners for basic oncology care not only increased access in the areas where specialists were missing but also led to better continuity of care and reduced the number of patients in tertiary hospitals.

3.3. Transferability to the U.S. Context

Applying these strategies in U.S. safety-net systems requires structural adaptation.

- Community-based screening and navigation could be implemented through existing federally qualified health centers (FQHCs) and public health networks.
- Nurse-led oncology care can extend workforce capacity in under-served regions, though regulatory flexibility and training programs are prerequisites.
- Tiered co-payment waivers and targeted subsidies could mitigate financial barriers for uninsured or underinsured patients.

However, the transferability of these models is influenced by differences in health financing, political context, and workforce regulation between Ghana and the United States. Policy adaptation will thus require alignment with Medicaid expansion, payment reform, and community health infrastructure.

3.4. Modeling and Quantitative Insights

Simulation results suggested that implementing Ghana-inspired interventions in U.S. safety-net settings could significantly reduce late-stage cancer presentations.

- The community-based screening model decreased projected late-stage cases by approximately 15–20%, depending on population coverage.
- Nurse-led oncology task-sharing was associated with a 10–12% reduction in outpatient cost per patient, due to improved continuity and reduced specialist dependency.
- Tiered co-payment waivers improved adherence rates and financial protection, with positive budget impact when combined with preventive interventions.

Overall, the modeling results indicated that hybrid adoption of these strategies could yield substantial long-term cost savings while enhancing care equity.

3.5. Policy Implications

The case of Ghanaian experience evidences that even low-resource settings can be equipped with innovation that is driven by equity. Among the lessons to the U.S. policymakers, there are:

- The use of community health workers and nurses as part of oncology pathways can improve screening coverage and screening at the earliest stage.
- Flexible financing mechanisms- including subsidies and waiver of co-payment- should be included in lowering out-of-pocket burden.

- The cross-sector partnership between the public agencies, non-profits, and the private institutions contributes to the sustainability of equity interventions.

To be adopted in the U.S. context, it may be possible to incorporate these practices into value-based care models and federal-state funding mechanisms to make it sustainable over time and align with the current health equity reforms.

3.6. Limitations

- The research findings lack the context and data limitation.
- The Ghanaian population is small and health governance is centralized whereas in the U.S. it is decentralized and multi-payer.
- The sample of the interview was purposive and might not represent all the perspectives of the stakeholders.
- Simulation modeling was based on secondary data; the results of the implementation in the real world can be different.
- In spite of these shortcomings, the comparative design and the mixed-method triangulation give good evidence on the potential transferability of equity-oriented interventions.

4. Conclusion

This paper has shown that the health-access strategies in Ghana, which focus on financial protection, community-based service provision, and task-shifting, provide practical implications towards promoting equity and affordability in U.S. oncology care. The experience of Ghana demonstrates that low- and middle-income countries can devise innovative resource-efficient strategies that enhance the early diagnosis and the continuity of care even when it comes to fiscal and workforce limitations.

Application of the models in the United States would help alleviate the chronic disparities in cancer outcomes attributed to high treatment prices and broken care system. The modeling results of the study indicate that community screening, nurse-led oncology care, and specific co-payment waivers may contribute to a significant decrease in late presentations and increase affordability in safety-net health systems.

Yet, effective adjustment requires structural changes especially in payment systems, workforce controls, and policy incorporation in order to maintain such strategies in the multifaceted U.S. healthcare context. The U.S. can also get a step closer to universal access to high-quality care in oncology by adopting equity-based innovation and cross-national education.

Compliance with ethical standards

Acknowledgments

The authors give recognition to the efforts made by the officials in the field of public health, oncology practitioners, and community health workers in Ghana and the United States who were involved in this research and provided us with helpful information.

Disclosure of conflict of interest

The authors declare that they have no conflict of interest.

Statement of ethical approval

This paper entailed the conducting of qualitative interviews with stakeholders in policy and health sector. In Ghana and the United States institutions of higher learning approved the study ethically.

Statement of informed consent

All participants were informed in advance before data collection. No animal research was done.

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