



Delivering impact

c/can
in Kumasi,
Ghana.

Table of contents

Foreword	p. 3
Executive summary	p. 5
About City Cancer Challenge	p. 7
Introduction	p. 8
Key achievements	p. 10
Summary of impact	p. 16
Conclusion	p. 17
Next steps	p. 18
Our partners	p. 20
Contact	p. 21

Foreword

It has been an inspiring and transformative journey working alongside City Cancer Challenge (C/Can) in Kumasi. The impact we've made together in advancing cancer care has been nothing short of remarkable, demonstrating the power of collaboration and shared vision in tackling one of the most pressing health challenges of our time.

Kumasi's consistent commitment to improving cancer care is a powerful testament to the impact that local leadership, combined with global expertise, can have in overcoming barriers and transforming healthcare systems. We are proud to continue working alongside the Kumasi Metropolitan Assembly to deepen this impact and ensure lasting change

Isabel Mestres

CEO, C/Can

Since Kumasi's inclusion in C/Can's network in 2018, our city has experienced significant strides in improving cancer care, not just for our residents, but for the wider Ashanti region and beyond. This has been made possible through the dedicated efforts of over 578 stakeholders from 25 local institutions who have come together to co-create solutions that address our unique needs.

Among our key achievements are the establishment of a streamlined referral network for childhood cancer, the creation of a robust digital laboratory system, and the standardisation of treatment protocols that have dramatically improved the quality of care. Through these initiatives, we have significantly reduced delays in diagnosis and treatment, enhancing the chances of survival for many of our residents.

But our work is far from over. As we look to the future, we are committed to building on these foundations, expanding access to critical cancer medicines, and advancing our efforts to improve breast cancer care across Kumasi. With the ongoing second cycle of our partnership with C/Can, we are confident that we will continue to make meaningful progress in improving the lives of cancer patients.

The collaboration with City Cancer Challenge has been a decisive moment in our city's healthcare journey. Together, we are not only improving cancer care in Kumasi but are also setting a regional example of how concerted effort and local leadership can drive sustainable change.

Mr. Francis Dwira Darko

Metropolitan Coordinating Director, Kumasi Metropolitan Assembly

The Kumasi Metropolitan Assembly (KMA) is proud to play a pivotal role in this partnership, and we look forward to strengthening our collaboration with C/Can, local healthcare providers, and international partners to ensure sustainable improvements in cancer care for all. Together, we are transforming Kumasi into a model for cancer care across Ghana and the Africa region.



Mr Francis Dwira Darko

The Metropolitan Coordinating Director
Kumasi Metropolitan Assembly (KMA)



Isabel Mestres

CEO
City Cancer Challenge (C/Can)

Executive summary

Cancer causes almost 18,000 deaths per year in Ghana, with 1,100 new cases presenting to health facilities with 60-70% at advanced stages. Limited awareness of symptoms, delays in referrals, lack of resources and fragmentation across the health system remain huge challenges for the country.

Kumasi has one public tertiary cancer care facility which serves the entire population of the Ashanti region which is the Komfo Anokye Teaching Hospital (KATH). This hospital is also attended by patients from the entire northern region of Ghana, with some even travelling from neighbouring Togo and Burkina Faso to receive treatment. Two additional facilities offer diagnostic services, which are both private.

Efforts to improve cancer care in the city have been driven by 578 local health stakeholders across 25 institutions. To kick start the C/Can process, an extensive stakeholder mapping took place across every cancer care facility where national and local government, civil society organisations and local health institutions collaborated to put in place a core governance structure known as the City Executive Committee (CEC), led by the Mayor of Kumasi. There were a total of 15 institutions and leaders represented in the committee, including the Minister of Health, and were responsible for all key decisions related to the initiative.

To better understand and accurately quantify the most urgent needs, the CEC appointed a Technical Committee of local cancer specialists to assess the gaps and conduct a comprehensive needs assessment across the city. The analysis uncovered lengthy treatment delays following diagnosis, limited laboratory services in most health facilities, a lack of written standardised procedures, and human resource shortages for cancer. It also identified a need for better community access across the region, a protocol for palliative care and infrastructure needs for radiotherapy and diagnostics, highlighted in a designated city report.

Based on the needs assessment, eight projects were prioritised and co-created with local stakeholders to address the urgent needs with a system-wide view. These included projects on digital solutions to speed up referral processes, improved quality imaging procedures, protocols and standardisations and support with human resource planning. Following national endorsement by the Ministry of Health in December 2022, three of these projects are being expanded outside of the Ashanti region and on a national scale.

From 2024, C/Can is deepening its engagement with Kumasi and providing further support with project implementation. This includes a system readiness project for faster access to breast cancer medicine, projects related to the implementation of the World Health Organisation's Global Breast Cancer Initiative, and further capacity development and research opportunities for the local healthcare workforce.

578

Kumasi stakeholders
participated in the
C/Can process

25

Local institutions
working together

303

Healthcare
professionals
trained



About City Cancer Challenge (C/Can)

Where you live and who you are shouldn't determine the quality of cancer care you receive.

Yet across the world—and especially in low- and middle-income countries—millions face barriers to life-saving diagnosis, treatment, and care.

City Cancer Challenge (C/Can) is a global, impact-driven NGO that empowers cities to drive locally-led, sustainable change in cancer care. Founded on the belief that cities are the frontlines of health system transformation, C/Can works hand-in-hand from the ground up with local governments, healthcare professionals, and civil society to co-create solutions tailored to the realities of each city's health system.

Through our City Engagement Process Framework (CEPF), C/Can empowers cities to identify priorities, implement cancer care solutions, and strengthen health systems. By leveraging local ecosystems, we drive context-specific, community-owned change that improves access to care and builds the foundations for national scale-up. Our model strengthens local knowledge and partnerships—laying the groundwork for broader health system transformation.

Since launching, C/Can has supported over 5,500 healthcare professionals and reached 67.5 million people across 15 cities in LMICs. We know our model works. But we can't do it alone.

Read on to discover how Kumasi's journey with C/Can is transforming cancer care and setting a model for change across Ghana and beyond.

Introduction

Improving childhood cancer outcomes in the city of Kumasi and Ashanti region

A case study



The project has given me an idea on how to suspect and refer cancers and has enlightened me that children can also get cancer. I have benefited a lot and can now differentiate between normal growth and cancers in children.

A healthcare worker in Ashanti

Late-stage cancer diagnoses, delayed referrals, and treatment related complications remain significant challenges in delivering equitable childhood cancer care. These barriers are even more pronounced in Low-and Middle-Income Countries. Limited access to resources often means that children in these regions receive less timely medical attention than adults, leading to poorer outcomes. While paediatric cancer is not typically preventable, early diagnosis and access to care can dramatically increase survival rates.

In Ghana, lack of symptom awareness and a delay in referrals are major barriers to timely treatment. There are 150-250 annual childhood cancer cases, reported by the two paediatric oncology centres in the country, one located in Kumasi (established in 1998 with just 19 beds) and the other in the capital city of Accra. The city of Kumasi, in collaboration with the City Cancer Challenge Foundation, has demonstrated how targeted interventions can lead to meaningful change in cancer care.

A multisectoral group of local stakeholders launched a collaborative project in 2022 designed to improve childhood care in the wider Ashanti region with a focus on early detection and rapid referrals. The aim was to leverage digital technology and train healthcare workers through the creation of a network linked to the region's paediatric centre, the Komfo Anokye Teaching Hospital (KATH).

ACHIEVEMENTS

- Established a network of 24 healthcare facilities, currently being expanded to 50.
- Developed a digital platform designed on the previous paper-based-referral-system.
- 3.5 fold increase in referrals.
- 120 health professionals trained.

PROJECT SUMMARY

In order to speed up referrals, ensure continuity of care and reduce treatment abandonment, a comprehensive mapping was conducted to identify care sites and **establish a network of 24 healthcare facilities.**

Once the network was created, **a tailor-made app** called OncoKids was designed locally based on the existing referral system, ensuring that each facility can be easily connected to the Komfo Anokye Teaching Hospital (KATH). Replacing the previously cumbersome and paper-based process with a digital platform allowed speeding up and streamlining the referral directly to KATH's paediatric facility. The app also includes a **reminder system** to follow up with patients who don't show up for appointments.

Over **120 healthcare professionals have been trained to recognise early symptoms of childhood cancer**, and a survey conducted after the project launch concluded that healthcare workers felt confident and empowered to make referrals through Oncokids. This resulted in a **3.5-fold increase in referrals** in 2023, from just eight in the previous year to 28.

The initial success of the project means that it has been expanded in 2024, with 26 additional facilities currently being integrated into the network, trained on symptom detection and the Oncokids app. A further 200 healthcare professionals will receive training across the Ashanti region and a paediatric e-learning course is set to be rolled out in collaboration with the Catalan Institute of Oncology (ICO).



Key Achievements

Kumasi's health stakeholders designed, planned and executed multiple cancer care projects with the technical support of C/Can and its international partners.

01 | Improving the laboratory information ecosystem

02 | Strengthening Kumasi's cancer registry

03 | Creating contextualised guidelines and standardisations

04 | Improvements to cancer care infrastructure

05 | Building capacity for the local health workforce

01 | Improving the laboratory information ecosystem

- ◆ Projected improvement of quality and turnaround times for the diagnosis of breast and cervical cancer.
- ◆ Creation of a digital Laboratory Information Management System across facilities and a digital Laboratory Network System where samples are to be exchanged according to capacity.
- ◆ Enhanced capacity development for human resources including a training curriculum.

Project summary

The project aim is to create a network to standardise and operationalise a Laboratory Information Management system across 9 private and public laboratories in Kumasi. Prior to the city joining the C/Can initiative, labs operated independently, resulting in limited information sharing, inconsistent standards, variable turnaround times and unreliable diagnostic quality.

After conducting a city-wide feasibility study, a tailored Laboratory Information System and Digital Laboratory Network System have been developed and are currently being piloted in 4 laboratories. Following the pilot, the aim is to install both digital systems across the entire network in 2025. The project has also involved the development of a pathology training curriculum for additional training of staff in labs.



02 | Strengthening Kumasi's cancer registry

- ◆ Quality improvements to existing data collection for cancer and expansion of cancer registry to ensure it is city-wide.
- ◆ Comprehensive training of new and existing staff for cancer data assessment.
- ◆ Installation of a designated cancer registry office with IT and office equipment.

Project summary

Kumasi's cancer registry, originally established in 2012, has been improved through targeted interventions to better understand the city's mortality and morbidity caused by cancer. Previously hospital based, the C/Can initiative brought together a Registry Advisory Committee to help ensure all city facilities were on-boarded and could be included in a city-wide data collection.

In order to boost qualitative data collection, the project supported the training of new and existing staff and the installation of a designated registry office with IT and office equipment. Cancer care providers were also trained on the existence of the improved registry and best practices for the collection, recording and quality assurance of data. Four cancer registry staff members have since been employed directly by the Ministry of Health full-time to ensure sustainability of the initiative.



03 | Creating contextualised guidelines and standardisations

- ◆ Developed operational plans for cancer care, including medical oncology, radiotherapy, palliative care and laboratory services.
- ◆ Implemented a standardised pathology reporting system and developed context adapted guidelines for the imaging of breast and cervical cancers, as well as treatment and management.
- ◆ Creation of an essential medicines list and operating procedures.

Project summary

A key gap identified in the Kumasi needs assessment was a requirement for standardisation and context appropriate guidelines that outline the provision for quality care. Local project teams worked together to produce an essential medicines list for oncology, development plans for radio and nuclear medicine, palliative care and a comprehensive roadmap for how to build capacity in human resources for cancer care. In December 2022, the Ministry of Health approved the guidelines for the management of breast and cervical cancers with the aim to use them as reference documents.



04 | Improvements to cancer care infrastructure

- ◆ Upgraded diagnostic facilities including the provision of teaching microscopes across five institutions.
- ◆ Supported the operationalisation of a SPECT-CT machine and a fully equipped nuclear medicine unit at the Komfo Anokye Teaching Hospital (KATH).
- ◆ The construction of a Hot Laboratory at KATH equipped to handle radioactive materials.

Thanks to a grant awarded by the German development agency (GIZ), several infrastructure improvements were made to KATH, a key cancer facility in Kumasi through the C/Can initiative for improved diagnostic services.



05 | Building capacity for the local health workforce

- ◆ 28 local clinicians and healthcare workers took part in sponsored scientific visits to international cancer reference centres in Africa and overseas.
- ◆ 2 breast and cervical cancer specialists completed a one month fellowship overseas.

Local health workers who have contributed to the C/Can initiative in Kumasi participated in international scientific visits to learn about best practices in radiology, palliative care, imaging, oncology nursing, multidisciplinary care and medical oncology. Cancer care teams visited reference centres in India, Kenya, Uganda, Algeria, the USA and South Africa.

A breast cancer specialist completed a one month fellowship at the Tata Memorial Hospital in India, while a cervical cancer specialist spent one month training at the Aberdeen Royal Infirmary in Scotland. These professionals have since been sharing their new knowledge and skills with peers in Ghana.



Summary of impact

Local coordination and Multi-sectoral Engagement

The C/Can initiative convened and provided a platform for collaboration across multiple sectors from government, public and private health facilities as well as patient organisations which resulted in improved coordination between service providers, and a stronger local cancer community united around a shared goal. It also allowed for an extensive assessment of the gaps in cancer care and the development of comprehensive solutions that address the prioritised challenges.

Localised solutions

C/Can supported the development of solutions driven by local health professionals to strengthen Kumasi's health system. This approach means that contextualised guidelines and tailored solutions directly address the challenges they face, also ensuring project sustainability.

Increased political commitment for cancer

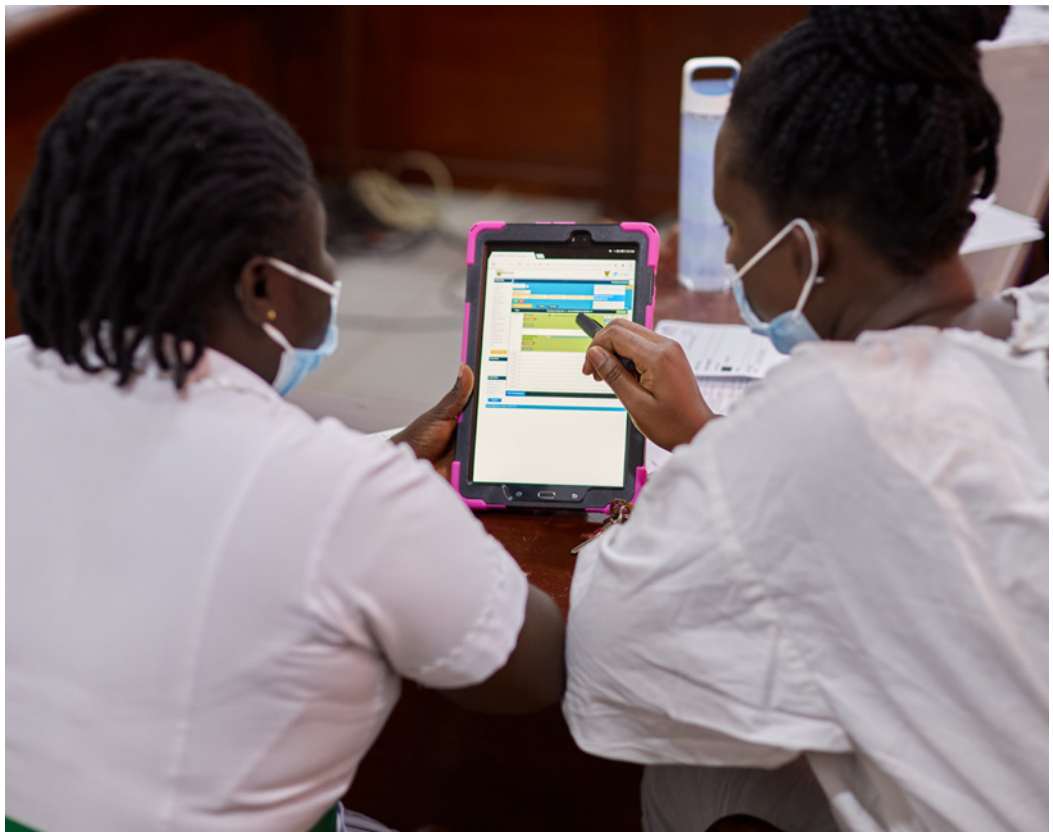
Energised by the achievements from the first city implementation cycle, the Kumasi Metropolitan Assembly, led by the Mayor of Kumasi, is committed to ensuring the sustainability of the initiative. With the active contribution of KMA successful fundraising efforts have been undertaken in collaboration with C/Can to further improve breast cancer services and access to care. The ongoing second city implementation cycle will be spanning from 2024 to 2026.

Connection to the international community

C/Can facilitated and is committed to continue facilitating valuable networking opportunities with the global cancer community and capacity development projects that allowed for knowledge exchange. This enabled local healthcare professionals to share best practices on contextualised solutions for resource constrained cities.

Conclusion

Working together with stakeholders in Kumasi, C/Can's approach in developing contextualised cancer care interventions has driven sustainable change for the city's health system. C/Can's role in bridging the gap between evidence and practice and between practice and policy translates local insights into action. This has proved pivotal for Kumasi where the commitment to improving cancer care now serves as a model for other cities across the region and world.



Next steps

To build on existing progress, the Kumasi City Executive Committee and C/Can have agreed upon these next steps for the city's cancer care:

■ Expansion of the paediatric oncology project

A further 26 facilities inside the Ashanti region are currently being integrated into the paediatric referral network, with an upgrade to the OncoKids platform. These facilities will also be trained to use the OncoKids app. An e-learning course is also set to be rolled out so that additional centres outside of the region can also benefit.

■ Digitalisation for Multidisciplinary Teams

A digital platform for multidisciplinary teams (MDTs) is being developed for Kumasi in collaboration with the Ministry of Health. The project will allow KATH's MDT team to support seven additional hospitals by managing cases digitally from 2025, further strengthening delivery of care.

■ Partnership with the International Finance Corporation (IFC)

C/Can has partnered with the IFC to conduct a preliminary financial assessment across 16 regional and 5 teaching hospitals to explore opportunities for private sector involvement in healthcare. The report has been delivered to the Ministry of Health for further action.

■ Global Breast Cancer Initiative in Kumasi

Local experts and healthcare professionals have created a Breast Cancer Action Plan (BCAP) for the city of Kumasi that builds on actionable recommendations from the World Health Organisation's Global Breast Cancer Initiative (GBCI). The plan aims to ensure.

[Click here](#) to know more about the GBCI targets



Based on these recommendations, four breast cancer specific projects are being developed to support early detection, faster diagnostics and improved treatment.

- Having established a successful multisectoral approach in this first cycle of city project delivery, Kumasi is now championing efforts to streamline the cancer patient journey across its health system. Together with C/Can, Kumasi is moving into a second cycle focusing on four prospective projects;
- Continuity of essential care services
- Timely and quality diagnosis of breast cancer
- Quality of multimodal treatment planning and delivery
- Downstage presentation at diagnosis through primary healthcare-oriented interventions

Our partners

Together, we look forward to building on our joint vision and improving the quality and accessibility of cancer care for the city.

City Cancer Challenge and the KMA would like to thank all partners that have been involved in the initiative in Kumasi, Ghana including:

Financing partners

Foundation S (Sanofi), GIZ, MSD, Novartis, Roche, Varian/Siemens

Technical partners

American Society of Clinical Oncology (ASCO), American Society of Clinical Pathology (ASCP), Aberdeen Royal Institute, International Atomic Energy Agency (IAEA), International Society of Nurses in Cancer Care (ISNCC), African Palliative Care Association (APCA), Institute of Palliative Medicine, Tata Memorial Hospital, Mayo Clinic, Princess Margaret Cancer Centre, Project ECHO.



Contact

CONTACT INFORMATION



Sophie Bussmann-Kemdjo

Regional Director for Africa and Europe

bussmann@citycancerchallenge.org

+41 79 590 65 22



<https://citycancerchallenge.org/>

