Review of cancer control policy in Nigeria and comparison with selected African countries: implications for future policy making

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Abstract

Context: The public health importance of cancers in Nigeria is emerging. Robust cancer control policies are needed at all levels of government, especially the state.

Objective: To review cancer control policies in Nigeria, especially regarding breast and cervical cancers, with emphasis on policy development process, scope and policy implementation. Also to compare Nigerian cancer control policy with selected African countries and suggest ways through which Nigerian states, such as Abia, can develop evidence-informed, patient-centered cancer control policy.

Methods: A structured literature search was done using relevant subject headings and keywords. Boolean operators 'and'/or' were used to refine the search. Databases searched were Pubmed/Medline, Embase, PsychInfo, Cinahl, Global Health and ERIC. The search included articles published between 2008 and 2018. Data was also collected from the International Cancer Control Plan portal as well as focused Google search.

Results: Of the 194 abstracts retrieved, only 29 were included in this review. The 2018 Nigerian National Cancer Control plan (NCCP) showed significant improvement over the 2008 version, in terms of scope and policy development process. Literature search did not reveal any state-level comprehensive cancer control policy. The Nigerian policy lacked specific guidelines for breast cancer compared with the Ghanaian policy. Ghana allocated 12% of total budget to cancer research compared to 0.4% in Nigeria. The South African Breast Cancer policy was developed using more findings from local research and had the most encompassing, multiple perspectives approach.

Conclusion: Review shows the content, process, pearls and pitfalls of cancer control policy from Nigeria and five other African countries. Findings will inform the strategy for developing cancer control framework states in Nigeria and other countries. As more Nigerian states work towards developing state cancer control plans, it is important to address the shortfalls identified in the current NCCP, especially regarding the use of multiple perspectives analysis.

Keywords: cancer; policy making; Nigeria; public health; global health;

Introduction

The World Health Organization indicates that a national cancer control program is a public health initiative designed to reduce the number of cancer cases and deaths, as well as improve the quality of life of individuals diagnosed with cancer. This is done by implementing systematic, equitable and evidence-informed policies on the continuum of cancer control (prevention, early detection, diagnosis, treatment and palliation) using available
Cancer control refers to actions taken with the intent of reducing the burden of cancer in a community or nation. It includes activities such as advocacy, prevention and early detection, as well as treatment and palliative care. All cancer control activities are based on the best scientific evidence available. Cancer control is often supported by policy, also known as cancer control plan or cancer control framework. These policies, like any other health policy can be made at national or sub-national levels (e.g. states). The implementation of such plans results in cancer control programs. When policies are informed by best evidence, in consideration of the local context and with the participation of all relevant stakeholders, such policies have a better chance of being successfully and sustainably implemented. No matter what resource constraints are faced by the country or state, a well-conceived and well-implemented cancer control program reduces the burden from cancer and improves services for individuals/patients diagnosed with cancer and their families.

In Nigeria, cancer has become an increasingly important source of morbidity and mortality. This trend is largely attributed to improved survival from infectious diseases, increasing life expectancy, as well as rise in risk factors such as cigarette smoking, alcohol abuse, physical inactivity, obesity and changing dietary patterns. Between 2009 and 2010, 4,521 new cases of invasive cancers were reported in some population-based cancer registries (Abuja and Ibadan), with 66% of the cancers occurring in females. Common cancers in Nigeria are breast, cervical, prostate and colorectal. Despite the rising burden of cancer in Nigeria, the country does not have a robust national cancer control program, beyond the cancer control policy document. Similarly, most states in Nigeria neither have state cancer control plans nor programs. The absence of an effective cancer control program which is supported by a robust policy at both the national and state levels in Nigeria adversely affects patient outcomes. In order to understand the challenges regarding cancer control policy in Nigeria, specifically related to breast and cervical cancers, it is important to explore the historical approach to this policy issue and to ascertain the extent of the problem. This article provides an environmental scan of policies regarding cancers in Nigeria, with emphasis on breast and cervical cancers. It focuses on the availability of policy, process of policy development (e.g. stakeholders involved), its scope and the implementation of the cancer policy. It also reviews the perspectives of individuals/patients, healthcare providers and health managers/planners, with respect to breast and cervical cancer policy in Nigeria. The paper compares cancer control policy in Nigeria with those of other sub-Saharan African countries (i.e. Ghana, South Africa and Kenya). This review will form the background for on-going research in Abia State, which seeks to provide local evidence to inform the development of a state cancer control framework. It is expected that the findings from this paper can also guide other Nigerian states on how to develop patient-centered and evidence-informed cancer control policy.

Methods
A structured search of the literature was undertaken using the following strategy: subject headings and keywords search using “[Nigeria.mp. or NIGERIA/; breast cancer.mp. or breast neoplasms/; cervical cancer.mp. or uterine cervical neoplasms/; cancer/neoplasms; (control or policy or framework or plan).mp. [mp=title, abstract, original title, name of substance word, subject heading word, keyword heading word, protocol supplementary concept word, rare disease supplementary concept word, unique identifier, synonyms]. Boolean operators 'and'/'or' were used to refine the search. Databases used for the search were Pubmed/Medline, Embase, PsychInfo, Cinahl, Global Health and ERIC. The search included articles published between 2008 and 2018. Data regarding national cancer control plans was also collected from the International Cancer Control Plan portal, a web-based repository of national cancer control plans. In addition, an internet (Google) search was conducted to find evidence of state cancer control plans. Sources within health professional networks were also consulted for updates on cancer control plans in various Nigerian States.

Eligibility criteria
The eligibility criteria for studies in this review were (1) studies that focused on cancer policy in Nigeria; (2) studies that focused on national and state cancer control in Nigeria; (3) studies published between 2008 and 2018. The literature search was conducted using a combination of PubMed, Medline, Embase, PsychInfo, Cinahl, Global Health and ERIC databases.
and, (2) studies that focused on policy regarding breast and cervical cancers. Studies were excluded from this review if they were focused on: epidemiology; clinical medicine (e.g. case reports/case series); laboratory medicine (e.g. molecular/biochemistry/metabolism/drug development/drug evaluation or bio-receptors); and, public awareness programs about various cancers.

Result
The literature search yielded 306 abstracts, with 112 of them excluded as duplicates. Of the 194 abstracts retrieved, only 29 were included in this review. The remaining were excluded due to: no full text (15); epidemiology (20); clinical medicine (62); awareness programs (40); extraneous to the cancers of interest (15); and, not focused on Nigeria (13). None of the full text articles reviewed was empirical research conducted regarding cancer policy in Nigeria (i.e. qualitative or quantitative studies that involved data collection). Most of them were review articles or commentaries. Figure 1 shows the flowchart for the review.

4. Discussion
Overview of cancer control policy in Nigeria
In 2008, Nigeria launched its first national cancer control plan (NCCP). The goal of this policy document was to collaboratively reduce the cancer-related mortality and morbidity in the country. It recognized the challenges of cancer control in Nigeria to include ‘underreporting, lack of appropriate diagnosis, limited access to care, deficiencies in technical manpower and infrastructure, as well as quality of cancer data systems’. With ten key goals ranging from improving public awareness to better palliative care, this plan outlined basic steps the nation must take in order to improve cancer control. It also sought to address key gaps, namely; materials, money, services, and staff.

The plan emphasized the following cancers: breast; cervix; colorectal; lung; prostate; and, skin, as well as leukemia. Some of the strategies outlined in the plan to address the gaps were: Increasing public awareness about cancers (e.g. dangers of cigarette smoking); integration of cancer prevention into primary health care (e.g. HPV vaccination); and

![Figure 1. Flowchart for literature review](https://www.ibommedicaljournal.org)
development of training programs on multidisciplinary cancer management. The plan was not specific on approaches for early detection of breast and cervical cancers. 10

Although the policy document was developed under the leadership of the Federal Ministry of Health with support from academics and clinicians, there was no evidence of the involvement of individuals/patients that had been diagnosed with cancer, their families or policymakers at other levels of government in developing this plan. 10 It also did not address the key issues of: funding for cancer control; access to cancer care; the surveillance of cancer survivors; and, integration into other health programs. Previous research on this issue showed that effective cancer control policy in Nigeria should be horizontally integrated with other services, make robust provisions for funding and be multi-sectoral. The 2008 national cancer control plan, unfortunately did not receive much publicity as it was largely not implemented. 11

In 2018, the Federal Ministry of Health developed a new National Cancer Control Plan with input from a wider variety of stakeholders including federal policymakers, academics, clinicians, patient advocates, cancer survivors and international agencies. The new plan recognized some shortfalls in the implementation of the 2008 plan, such as integration of vaccination against human papilloma virus (HPV) into primary health care and better mobilization of palliative care resources. 12 The goal of the policy document was to reduce the incidence and prevalence of cancers in Nigeria. This was a more encompassing vision when compared to the focus on morbidity and mortality in the 2008 Policy. The policy also focused on the continuum of cancer control, from prevention to palliation with an additional section on data management. Although the 2018 plan enjoyed greater stakeholder engagement, there was no evidence of input from the State Governments. It also provided some picture of the financial costs related to cancer control in Nigeria, with 75% of the budget expected to come from governments. It did not address the specific role of health insurance in funding cancer control. 12 Although the national document recognized the role of various stakeholders, it did not address the role of some traditional institutions (e.g. town unions and market organizations) in implementing the plan. While the 2018 NCCP also mentioned traditional rulers it did not elaborate on their potential role as community leaders within the context of cancer control. The 2018 NCCP could prove to be the major stepping stone that will mobilize political will for cancer control in Nigeria, something that has dogged similar proposals in the past. 12,13,14 The plan would cost more than three-hundred million dollar to implement, 62% allocated to prevention and 0.4% budgeted for data management/research. The plan proposed that seventy-five percent of the funds would be expected from the Federal and State governments, but did not provide evidence of the input from the States in developing the plan. 12

Meanwhile, the 2018 policy recognized the roles of States in implementing the plan and for developing their state level cancer control plans/frameworks. This makes it imperative for each state to propose its framework/policy that would assist with achieving the goals outlined in the 2018 national cancer control plan. The state-level implementation framework should therefore be tailored to the realities of the state and building upon the perspectives of local stakeholders. 9 In the light of the foregoing, it is important to review the current scenario regarding the efforts of various state governments in developing local cancer control implementation frameworks.

There are thirty-six states in Nigeria, and all of them are expected to develop their local cancer control plans. In May 2017, the Lagos State government approved the law establishing the Institute for Cancer and Disease Control. 15 This was initiated as a Private Member’s Bill which passed through the House Committee on Health. Ondo State is working on a comprehensive cancer control bill that will include a state cancer center, while Enugu State is exploring ways to adapt the current national cancer control plan into their local context. In Enugu, the effort is led by the State Ministry of Health, supported by academics and patients advocates. Oyo State also adapted the National Cancer Control Plan, using almost the same content. 17,18 In addition to policy regarding cancer control, this paper considered policy regarding tobacco control in Nigeria. Tobacco is known to contribute to the development of breast and cervical cancers, amongst others. Extant literature shows that
Effective cancer control policy should also consider tobacco control.\textsuperscript{19,20} The first national tobacco control policy was introduced in 1951, with the policy focused on licensing and regulation, but not limiting exposure to this known carcinogen. In 1990, the national tobacco control decree was passed by a military government but converted to an Act in 2000 by a democratic government.\textsuperscript{21} The most recent tobacco control policy (National Tobacco Control Act, 2015) in Nigeria was passed and signed into law in May, 2015. This evolved from concerted actions from civil society organizations, the Federal Ministry of Health, the National Assembly and the Federal Executive Council. There was no literature regarding existing state-level tobacco control plans in Nigeria. However, existing research shows that States need to become more engaged in tobacco control policy, as an approach to effective cancer control.\textsuperscript{19,21-23}

Comparison of the context and content of Nigeria cancer control plan with other African countries

Ghana
The National Strategy for Cancer Control in Ghana was launched in 2011, with projections for the years 2012-2016.\textsuperscript{24} It was developed by a technical team comprised of expert clinicians. This is different from the process of developing the 2018 cancer control plan in Nigeria, which had greater involvement of patient advocates and non-clinicians. Under the leadership of the National Cancer Control Steering Committee in Ghana, nine technical working groups (TWG) developed the specific aspects of the plan. Each of the TWGs focused on specific cancers, while one TWG was responsible for the final format of the policy document (editorial).\textsuperscript{24} Thus, in comparison with the Nigerian plan, the Ghana NCCP provided more detailed information about strategies and objectives for specific diseases, such as breast and cervical cancers.\textsuperscript{12,24} It also had a clearer description of the guidelines related to the prevention for each cancer type, unlike the Nigeria 2018 Plan. For example, the Ghana Plan promoted the use of breast self-examination and clinical breast examination for the early diagnosis of breast cancer.\textsuperscript{24}

Unlike the Nigerian Plan, the Ghana national cancer control plan did not outline the roles for different stakeholders (e.g. traditional rulers). However, it outlined implementation strategies at different levels of the healthcare system (e.g. national cancer treatment centers and district hospitals). It also emphasized surveillance by making cancer a notifiable disease. At least forty-six million US dollars was required to implement the Ghana plan, with about 23\% allocated to early detection, 17\% earmarked for prevention and 12\% budgeted for cancer registry/ and research.\textsuperscript{12,24} Most of the funds were expected to be raised from government allocations. The plan also advocated for the inclusion of cancer medicines in the national health insurance coverage.\textsuperscript{24}

Kenya
In June 2017, the Kenya Ministry of Health published its National Cancer Control Plan.\textsuperscript{25} It was built on the gains of the previous version of their cancer control plan (2011-2016). It also included findings from the integrated mission of Program for Action on Cancer Therapy (impact) study, which sought to assess the status of Kenya’s capacities for implementation and delivery of cancer control plans and activities.\textsuperscript{26} The overarching goal of the 2017 NCCP was to reduce cancer incidence, morbidity, mortality as well as improve the survival rates from cancer in Kenya. It sought to accomplish these objectives/goals through access to: population based primary prevention; early detection; quality diagnostics; treatment; and, palliative care services.\textsuperscript{25} Kenya has made tremendous progress in the implementation of their national cancer control plan in the last several years.\textsuperscript{7,26}

Unlike the Ghana NCCP\textsuperscript{24} but like the Nigeria NCCP\textsuperscript{12}, the Kenyan NCCP does not contain specific framework for various cancers.\textsuperscript{25} Rather, it has more detailed action plan for different stakeholders. Although the policy described committee consultation meetings, it was not clear what each committee contributed to the final policy document. This is unlike the approach that was used in the Nigerian NCCP.\textsuperscript{12,25}

South Africa
Cancer control policy documents in South Africa dates back to 1999 with the publication of the National cancer control programme baseline
document.27 Since then, the country has published series of guidelines for different cancers and for health providers. The Strategic Plan for the Prevention and Control of Non-Communicable Diseases is a key document which outlines their overall strategy to manage non-communicable diseases.27 Regarding cancers, this policy document recognized the importance of controlling risk factors such as tobacco, alcohol and human papillomavirus.27 It also targets to screen every woman with history of sexually transmitted diseases for cervical cancer at a five-yearly interval.

Although South Africa does not have a current national cancer control plan, it published its Breast Cancer Control Policy in 2017. This policy sought to “(I) reduce breast cancer morbidity and mortality by promoting breast healthcare awareness and access to early breast cancer detection and, diagnosis, appropriate treatment and palliative care; and (ii) streamline the overall breast care service outlines”.28 The breast cancer control policy outlined eight key policy areas with actions aligned to them. The areas include 1.) Prevention and early detection, screening and genetic assessment; 2.) Timely access to care; 3.) Assessment, diagnosis and staging; 4.) Treatment of breast cancer; 5.) Palliative care in breast cancer; 6.) Follow-up and surveillance in breast cancer; 7.) Data, monitoring and research; and, 8.) Community outreach and engagement.28

The process of policy development in South Africa was slightly different from those of the other countries reviewed. Matsoso, et al27 described the collaborative, multisectoral approach involved in developing the Strategic Plan for the Prevention and Control of Non-Communicable Diseases. A summit was hosted by the Minister of Health where users and survivors, government representatives, non-profit organizations, academics and other experts made contributions to the document. The policy document also included findings from relevant research done within the country.27 The development of the breast cancer control policy also followed a similar approach. That policy document acknowledges the importance of multiple perspectives in policy development, although it did not describe the procedure for analyzing and merging those perspectives.28 Currently, efforts are being made to develop a robust national cancer prevention and control plan. As part of the policy development process, the Cancer Association of South Africa (CANSA) submitted its contribution to the draft policy document.29 Their contribution echoes the need to include multiple perspectives in policy development, as each perspective adds unique pieces to the final policy document.

Analysis of the process of policymaking for cancer control in Nigeria

It is important to consider the process through which cancer policies have been developed and implemented in Nigeria. Both cancer control plans (2008 and 2018) were developed through sub-committees that focused on different aspects of the policy.10,12 The team of experts which drafted the 2018 NCCP was divided into seven priority areas of action which were: (1) prevention; (2) diagnosis and treatment; (3) supply chain management (logistics); (4) hospice and palliative care; (5) advocacy and social mobilization; (6) data management and research; and, (7) governance and finance.12 The members of each of the sub-groups were drawn from health-related disciplines.10,12 It does not appear that either of these cancer control plans (2008 and 2018) received input from other sectors of the society which could be impacted by the activities proposed in the policy such as the Ministries of Finance, Education and Women’s Affairs. Also, there was no evidence of the involvement of representatives of the various State governments.10,12 Effective health policy development often requires multidisciplinary and multi-sectoral collaboration.4,30 The lack of such collaboration had disastrous effects on previous attempts to pass the Tobacco Control Act in Nigeria21 as some ministries felt ‘left out’ of the process of policy development. However, the input from other relevant Ministries in the government was not evident in the 2018 national cancer control plan.10,12 In addition, stakeholders such as traditional rulers, state governments and religious organizations appeared not to have been engaged in the development of the policy. This omission could lead to difficulties in implementation. It is imperative that future efforts to improve on the national cancer control plans should be more inclusive. For instance, States seeking to develop local cancer control plans should involve more stakeholders, such as
individuals/patients that had been diagnosed with cancer, traditional rulers, religious leaders and the leadership of other government ministries. This would make the policy more locally-relevant. Meanwhile the evidence base for some of the projections of the 2018 national cancer control plan is not clear. For example, Goal 1B in the plan, (i.e. Make screening services and early detection of cancer available for all Nigerians), proposes to achieve 50% coverage of screening for the eligible population by 2022 but does not provide any current data on the trends of cancer screening in Nigeria. Although it proposed to conduct a baseline survey in order to effectively monitor this policy target, the projection could have been better contextualized if more individual/patients’ perspectives had been included. This would have provided a more realistic picture of the current state of screening for those diagnosed with cancer. Thus, States seeking to develop local cancer control frameworks would make their policy more context specific by including local data related to cancer screening. This is similar to the strategy used in South Africa. Pattern of cancer diagnosis in Nigeria and policy implications

One key improvement of the 2018 national cancer control plan over the previous policy was the emphasis on data management and research. Although the plan recognized the absence of comprehensive local data on cancer incidence and prevalence, it placed emphasis on strengthening cancer registration for improved policymaking. The most common cancers in Nigeria include breast, cervical, prostate liver and colorectal. The 2018 NCCP promotes screening for common cancers whereas not all of them would yield mortality reductions with screening programs, e.g. liver cancer. It will be important for state cancer control plans to be more specific about modalities for screening, based on local evidence, just like the Ghana Plan.

While the science around early cancer detection is evolving, established screening programs globally focus on breast and cervical cancers, amongst others. Among the cancers that can be detected early through screening, breast cancer has however been reported to cause the greatest mortality in Nigeria followed by cervical cancer. Most people diagnosed with cancer in Nigeria generally present late and as a result have advanced disease. The high incidence of breast and cervical cancers makes them diseases of public health importance, and thus deserve more attention. The 2018 cancer control plan set a target of having 90% HPV vaccination coverage by 2022; that would be achieved through integration into the current national immunization schedule. However, immunization has become a divisive issue in the Nigeria society based on religious and cultural beliefs. Ophori et al described regional variations in immunization coverage in Nigeria, with the northern region reporting lower vaccine acceptance. Any future cancer control policy by the states should engage the community leaders more effectively so that the targets (e.g. HPV vaccination coverage) can be co-created and be made more realistic. This is one area where multiple stakeholders could help improve the co-creating, co-implementation and co-evaluation of the cancer control policy. Local evidence also suggests that this approach is very effective.

Policy Implications of the Nigerian Cancer Control Experience

Cancer places an enormous financial burden on patients and their families due to the cost of treatment and loss of income. The economic burden of cancer treatment affects adherence with therapy, as up to 66% of cancer patients do not complete their chemotherapy due to poverty. According to Nuhu et al, up to 33% of cancer patients in Nigeria reported having a poor quality of life, with males faring worse than females. Although the 2018 national cancer control plan proposed increased funding by the government for cancer services, it did not sufficiently address the issue of cost. The role of health insurance and other financial services partners in improving access to screening, treatment and survivorship services was not clear. Perhaps this is due to lack of representation by the National Health Insurance Scheme on the team of experts which developed the plan. There is limited data on the cost of cancer services in Nigeria and how this might be improved. Such information could provide better situational analysis: which could be achieved by involving more individuals/patients, families and frontline health care providers in the development of cancer control policy. Thus, states seeking to
adapt the present plan need to further explore the role of health insurance organization and how to mobilize financial resources for sustainable cancer control.

Meanwhile, evidence showed that Nigerian health care professionals have limited knowledge about cancer care, and the need to improve cancer-related education among health professionals in Nigeria has been recognized. The national cancer control plan also acknowledged the dearth of adequately-skilled clinicians who provide cancer services. It proposed increasing the number of skilled providers by 15% annually. This target would be relevant to the health institutions which are funded by the federal government. Thus, state governments seeking to create a cancer control policy would have to make projections and develop education strategies which are more locally-relevant.

Optimizing cancer control policy in Nigeria
From the foregoing, there needs to be more work on cancer control policies in Nigeria, especially at the level of the state governments. The present national cancer control plan has provided a good first-step and identified some challenges to its implementation. Some of these include but are not limited to: low political will among policy makers; low public awareness; inadequate engagement of relevant stakeholders; poor availability of suitably-trained healthcare providers; and, others. However, the NCCP did not sufficiently address how State governments might address these, as the plan focused largely on the role of the Federal Government.

Evidence also suggests that practitioner-led, community-engaged research which would use local knowledge to build effective, horizontal cancer control strategies within specific health systems would be most effective. In order to sufficiently address the policy issue of cancer control at the state level, further research will need to be done to capture the perspectives of multiple stakeholders. Multiple perspective analysis (MPA) is a method of gaining deeper understanding of policy issues and their potential solutions by systematically exploring multiple perspectives (personal, organizational and technical) to the issue being addressed. The technical perspective focuses on functional aspects of the system being analyzed (e.g. what screening methods to use); the organizational perspective dwells on the structural and procedural aspects (e.g. who will be responsible for the policy); while the personal perspective focuses on outcomes (e.g. ease of access to treatment by patients). Linstone specifically developed this approach to help the systems practitioner bridge the gap between analysis and action, between model and real world. Each perspective has separate underlying assumptions and is essential to understanding complex technical systems that are meant to interact with a group of people. Originally proposed by Linstone, multiple perspectives analysis approach has been used to develop sustainable water policy in Australia as well as in describing physicians and patients’ roles in point-of-care health decisions. In Uganda, the multiple perspectives approach was used by Ssengooba et al to inform HIV policy. Key perspectives required to build on the proposals outlined in the 2018 NCCP must include those of individuals/patients (personal), healthcare providers (technical) and policymakers (organizational), at the state level. These perspectives represent different interests regarding the issue of cancer control policy and need to be considered jointly in order to find a balance. In the light of the cancer control policy, analysis of these three perspectives will provide local knowledge, understanding and evidence on local realities related to the issue (cancer control). This could potentially lead to the development of more nuanced adaptations of the national cancer control plan in Nigeria, which would then be re-framed and co-created with communities to meet the needs of the people being served prior to implementation at the state level.

Evidently, none of the cancer control plans reviewed adopted a multiple perspective analysis (MPA), and there has been no previous research conducted in Nigeria on how to use a MPA to structure health policy issue. By using this approach, it would be more feasible for future research to explore the perspectives of all relevant stakeholders to policy issues. For example, such research would make it easier to mobilize political will locally as policymakers would be engaged in the process. Low political will has been identified as challenge to
effective cancer control in Nigeria by the 2018 national cancer control plan. This could potentially develop a more patient-centered policy as the individuals/patients diagnosed with cancer would be involved in co-creating the policy. Prior to the finalizing a future policy, other relevant stakeholders (e.g. health insurance, community leaders, relevant government ministries) would also be able to provide input into the document. The engagement of several stakeholders in formulating local health policy through research has been shown to lead to more local ownership and subsequently to a more sustainable implementation. More research needs to be done to explore how multiple perspectives analysis might be applied in the Nigerian setting. This could change the scenario of cancer control policy in Nigerian states and other resource-limited settings sustainably.

Conclusion
This review focused on the cancer control policies in Nigeria between 2008 and 2018, especially regarding breast and cervical cancers. It found that Nigeria has made some progress in the last ten years towards having a national cancer control policy. However, more work needs to be done for each state of the country to develop a robust framework for implementing a nuanced adaptation of the national plan to their local context. Multiple perspectives analysis is a potentially viable approach to structuring the complex policy issues of cancer control as it has the potential to engage various stakeholders. More research needs to be done to explore how multiple perspectives analysis might be applied in the Nigerian setting. This could enhance the effectiveness of cancer control in Nigerian states and make it more sustainable.

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