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Barriers and Facilitators to Implementing Cervical Cancer Clinical Practice Guidelines in Nigeria: A Mixed-Methods Study

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ABSTRACT

Across the globe, cervical cancer persists as a frequent contributor to women's deaths, with Africa bearing a disproportionate share. Nigerian statistics indicate that roughly 7093 women succumb to this illness every year. In response, the Society of Obstetrics and Gynecology of Nigeria (SOGON) formulated clinical practice guidelines to prevent cervical cancer. That said, the extent of these guidelines' penetration into gynecological practice has not been systematically mapped. The present work was designed to gauge the extent to which Nigerian gynecologists are cognizant of, comprehend, and have embedded the SOGON cervical cancer prevention clinical practice guidelines within their service delivery routines. The investigation followed a convergent parallel mixed methods blueprint. The quantitative strand consisted of a survey administered both electronically and on paper to gynecologists attending the 57th SOGON Annual General Meeting, held in Kano, Nigeria (November 2023). Completed surveys were received from 105 gynecologists, yielding an 80% response rate. Complementary qualitative perspectives were sought through key informant interviews with 12 participants. The quantitative arm was analyzed via descriptive and inferential statistical techniques, including logistic regression ($P < .05$), while the qualitative dimension underwent thematic analysis. The respondent pool of 105 individuals (mean age 50, SD 8.3 y; mean postresidency practice duration 12, SD 9.4 y) revealed that 98 (93.3%) were acquainted with the SOGON guidelines, and 74 (70.5%) affirmed their significance for cervical cancer prevention. Yet the proportion who had actually operationalized the guidelines within their regular clinical workflow stood at just 58.1% (61/105). Factors obstructing uptake included insufficient training opportunities (71/105, 67.6%), material and resource scarcity (64/105, 60.9%), and deficient institutional reinforcement (57/105, 54.3%). The qualitative strand corroborated appeals for guideline versions better calibrated to at-risk subgroups and remote practice environments. Additionally, 70.5% (74/105) of those surveyed urged a more inclusive, stakeholder-driven guideline revision cycle to safeguard both pertinence and practicability. Recognition of the SOGON guidelines appears widespread, yet systemic barriers hinder their translation into day-to-day clinical practice. Fortifying educational outreach, improving resource availability, and consolidating institutional commitment are indispensable measures to elevate guideline fidelity and advance cervical cancer prevention outcomes in Nigeria.

Keywords: Cervical cancer prevention (2), Clinical practice guidelines (21), Gynecologists (3), Implementation science (309), Nigeria (53)

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Introduction

On a worldwide scale, cervical carcinoma occupies the fourth spot among oncologic killers of women, annually generating about half a million incident cases and a third of a million deaths [1]. Roughly 80% of all cervical cancer–related fatalities across the globe are attributable to this disease [2, 3]. Within the African continent, it represents either the foremost or second-foremost oncologic cause of female death [4]. This is despite its status as

one of a handful of malignancies that are wholly preventable and curable upon early detection; yet sub-Saharan Africa (SSA) records close to 200,000 new cases and 80,000 deaths each year [4].

The lethality risk tied to cervical cancer is markedly amplified in SSA relative to contexts like Europe. Data from the International Agency for Research on Cancer place the age-standardized death rate at 18.9 per 100,000 women in SSA, a figure that dwarfs the 3.4 per 100,000 registered in Western Europe [5-7]. This divergence is rooted in curtailed access to preventive screening, prophylactic vaccination, and therapeutic interventions throughout SSA [8]. Substantial segments of the female populace in the region have no consistent entry point to cervical screening services, a reality that precipitates late-stage identification and diminished treatment success [9-11]. By the same token, coverage of the HPV vaccine—the principal etiological agent behind cervical cancer—lags considerably behind European benchmarks [8, 12].

Shifting focus to Nigeria, cervical cancer remains an imposing public health predicament, sustained by the absence of coordinated population-level screening, meager public insight into preventive pathways, and embedded structural deficiencies within the health apparatus [13, 14]. It ranks as the second most frequently encountered malignancy in the 15–44-year female age bracket, with 13,676 newly diagnosed cases and 7093 deaths cataloged in 2023 [15]. These numbers correspond to an age-standardized incidence of 18.4 per 100,000 and a mortality figure of 3.2 per 100,000 [15-17]. An estimated 60.9 million Nigerian women aged 15 years and above remain vulnerable to developing the condition should proactive countermeasures fail to materialize [15, 18]. Such estimates, however, plausibly understate the true disease burden owing to incomplete case notification, limited cancer surveillance infrastructure, and constrained data-harvesting capacity [19, 20]. Moreover, the condition exacts a disproportionate toll on women during their prime income-generating years, thereby magnifying its socioeconomic ramifications and entrenching poverty spirals [21, 22].

Internationally, momentum is building behind the ambition to stamp out cervical cancer, with particular urgency in low- and middle-income countries [8, 18]. The World Health Organization's global framework sets forth the "90–70–90" milestones for 2030: reaching 90% HPV vaccination coverage among girls, screening 70% of women at ages 35 and 45, and delivering treatment to 90% of those identified with precancerous abnormalities or invasive disease [18]. Modeling suggests that attaining these benchmarks across low- and middle-income nations, Nigeria included, could avert 97% of incident cervical cancer cases (equating to 74 million cases) and forestall 62 million deaths by the year 2120 [23]. Translating such aspirations into Nigerian reality, however, presupposes a vigorous health system countermove, durable political resolve, and the adept deployment of evidence-anchored measures [17, 21].

Clinical practice guidelines represent systematically assembled tools purposed to assist practitioners and patients in navigating healthcare choices for defined clinical circumstances [24]. They codify evidence-informed standards of care and carry implications that are at once clinical and legal. Still, their absorption into practice is contingent upon a constellation of determinants, among them familiarity, judged pertinence, and system-wide constraints [25-27]. Healthcare personnel in Nigeria, with gynecologists occupying a pivotal position in cervical cancer prevention, grapple with a distinctive set of hurdles: negotiating dilapidated infrastructure, navigating sociocultural sensitivities, and operating within severely stretched resource envelopes [28]. These realities lend weight to the argument for deliberate strategies designed to close the chasm between guideline promulgation and frontline enactment.

In an attempt to engage with this urgent matter, SOGON has articulated clinical practice guidelines specifically targeting cervical cancer prevention [29]. The document advances evidence-based recommendations spanning primary and secondary prevention, encompassing public health education [29]. Despite the considerable promise these guidelines hold for materially reducing both the occurrence of and death from cervical cancer, the actual contours of their uptake continue to elude comprehensive understanding. Structural-level deterrents—among them under-resourced healthcare facilities, insufficient provider capacity building, and ineffective distribution mechanisms—act as brakes on their integration. Compounding these are cultural belief systems, economic strictures, and the comparatively low ranking of women's health on the policy agenda, all of which conspire to further frustrate the embedding of these guidelines into habitual clinical conduct [10, 11, 30].

Drawing on implementation science concepts, this work investigates how Nigerian gynecologists perceive and engage with the SOGON clinical practice guidelines. Rather than centering on patient-level results, as is typical of most research, this inquiry prioritizes the practitioner's vantage point, seeking to bridge the "know-do" divide—the discord between what guidelines prescribe and what clinicians actually do. Through examining this rift, the study generates indispensable knowledge about how these recommendations can be feasibly embedded within

Nigeria's layered healthcare terrain, one molded by cultural dynamics, economic realities, and infrastructural shortfalls.

Materials and Methods

Study design

A convergent parallel mixed methods architecture was adopted. Within this framework, numerical and narrative data were amassed simultaneously, processed through separate analytical pipelines, and subsequently woven together to yield an integrated interpretation. The quantitative thread gauged gynecologists' familiarity with, understanding of, and routine use of the SOGON clinical practice guidelines. The qualitative strand supplied a nuanced entry into the on-the-ground realities, attitudes, and counsel of gynecologists vis-à-vis operationalizing the SOGON clinical practice guidelines for cervical cancer prevention.

Study setting

Fieldwork was conducted during the SOGON 57th Annual General Meeting and Scientific Conference, held at the Bristol Palace Hotel in Kano, Nigeria, from November 20 through 24, 2023. The gathering was organized around the theme "The Tragedy of maternal deaths in Nigeria: our collective responsibility."

Study population

The source population consisted of clinically active gynecologists based in Nigeria who participated in the SOGON 57th Annual General Meeting and Scientific Conference, Kano.

Eligibility criteria

To qualify, individuals needed to be credentialed gynecologists possessing legitimate medical degrees and professional licensure entitling them to deliver care within Nigeria. Active involvement in service provision at government-run or privately operated healthcare facilities—including hospitals, clinics, or solo practices—was essential, as was physical location within Nigeria's territorial confines throughout the study window.

Gynecologists removed from clinical duties—whether due to retirement, extended absence, or a transition into purely administrative or academic portfolios—were screened out to ensure that the collected information faithfully reflected the prevailing clinical landscape and norms. Those who had yet to complete their medical qualification or specialized gynecological instruction, or who were practicing without a current license, were likewise barred to preserve professional threshold criteria. Health workers outside the gynecology specialty, including family physicians, nursing staff, and midwives, were excluded because the study focused on guideline implementation among gynecological specialists. Gynecologists who opted not to provide informed consent or declined to participate in either the questionnaire or interview segment were excluded. Finally, Nigerian-trained or Nigerian-born gynecologists stationed overseas were omitted, since the research centered on guideline assimilation within Nigeria's domestic health delivery context.

Sample size determination

As the percentage of gynecologists conversant with the SOGON guidelines remained undetermined, a conservative proportion of p=0.5 was employed, this being the value that maximizes the requisite sample size—paired with a standard 95% confidence level, yielding a z score of 1.96 [31]. The margin of error (e), denoting the permissible level of imprecision, was pegged at 5% (0.05), in line with common practice across social science research:

$$n = \frac{N(1-p)}{(N-1)e^2 + p(1-p)} \quad (1)$$

• n = sample size
• N = population size (total body of conference attendees)
• p = presumed proportion of the trait within the population (customarily assigned 0.5 to achieve peak sample size)
• e = margin of error (permissible inaccuracy threshold)

On this basis, a target sample of around 110 gynecologists was judged necessary.

The qualitative strand encompassed 12 deliberately chosen informants for key informant interviews (KIIs). These participants were singled out for their deep-seated professional immersion or singular outlooks regarding the application of SOGON guidelines. Deep-seated immersion was defined as a floor of 10 years spent in clinical gynecological work or holding stewardship positions—such as departmental chairpersons or appointees to guideline review committees—within their institutions or umbrella bodies like SOGON. Such participants were presumed to hold rich, granular familiarity with guideline deployment across heterogeneous care environments. Singular outlooks were harvested from professionals operating in hard-to-reach or non-urban catchments, where bespoke barriers to guideline execution routinely surface. Beyond this, individuals engaged in teaching or advocacy related to cervical cancer prevention were enrolled to unpack the dissemination and training mechanisms underpinning guideline diffusion.

Participant identification unfolded on the margins of the SOGON 57th Annual General Meeting, where likely candidates were sourced from colleague networks, delegate registries, and word-of-mouth referrals. Invitations were carefully dispatched to ensure reach across varied geographic territories and workplace configurations, to assemble a broad spectrum of experiential knowledge aligned with the research aims.

The recruitment ceiling of 12 informants was guided by the tenet of thematic saturation, a cornerstone of qualitative methodology [32]. Saturation marks the stage where fresh data cease to surface substantially new themes or interpretive angles, indicating that the sample adequately spans the conceptual terrain needed for the inquiry [33, 34]. This threshold emerged during the iterative interplay between fieldwork and analysis, when the material harvested from the dozen conversations yielded well-rounded insight into both the stumbling blocks and the catalysts surrounding SOGON guideline implementation.

Data collection instruments

The measurement tools utilized in this research were derived and recalibrated from previously validated instruments, engineered to register gynecologists' receptivity to evidence-based practice (EBP), specifically the SOGON cervical cancer screening protocols. These recalibrations drew on well-established scales and literature syntheses from earlier investigations, particularly the Evidence-Based Practice Attitude Scale [35] and scholarly examinations of deterrents to the utilization of clinical guidelines among medical practitioners [36]. The instruments were reshaped to capture the unique barriers Nigerian gynecologists encounter in adopting the SOGON guideline and were vetted by subject-matter experts to confirm content validity.

Quantitative data collection

Numerical information was collected through a pre-planned, internet-delivered questionnaire, partitioned into three thematic blocks. The instrument as a whole displayed considerable internal stability, as borne out by an aggregate Cronbach α reading of 0.890.

Section a: sociodemographic information

This cluster solicited foundational personal and occupational particulars from those surveyed: chronological age in years, sex, racial or ethnic background, annual household income bracket, board certification date (year), span of postresidency professional activity in years, mean caseload volume per working day, and designation of practice environment (metropolitan, peripheral urban, or countryside).

Section b: awareness and understanding of the SOGON guidelines

Those surveyed were asked to indicate their degree of alignment with propositions designed to gauge their familiarity with and understanding of the SOGON cervical cancer screening protocols. This cluster encompassed 8 propositions, with answers captured on a Likert-style gradient anchored from "strongly agree" through "strongly disagree." Section B achieved a Cronbach α of 0.734.

Section c: incorporation of the SOGON guidelines into clinical practice

This 8-proposition cluster measured the degree to which those surveyed had interwoven the SOGON protocols into their daily clinical routines. A Likert-style gradient registered levels of alignment with statements mirroring dispositions toward embracing novel protocols and procedures. Section C posted a Cronbach α of 0.932. The concluding slice of this questionnaire segment, comprising 7 items, incorporated hypothetical vignettes to trace

potential forces shaping the probability of SOGON protocol uptake, focusing on the weight of skills development, decrees from governing figures, modeling by professional peers, and self-assessed capability throughout the uptake journey. The Cronbach α for this terminal cluster was 0.867.

Qualitative data collection

Qualitative data were gathered through a loosely structured interview roadmap designed to elicit gynecologists' firsthand experiences and interpretations regarding operationalizing the SOGON protocols. This strand served to frame and amplify the statistical patterns, delivering thicker insight into practitioners' mindsets, sticking points, and impediments. The interview framework was organized into two parts: section A—sticking points and roadblocks to protocol execution —and section B—actionable proposals to increase uptake. These unbounded prompts were formulated to elicit layered storytelling that bundled together personal journeys, systemic choke points, and down-to-earth counsel for strengthening protocol absorption.

Data collection procedure

Quantitative phase

A self-completed, internet-hosted questionnaire platform (Google Forms) was tapped to relay the survey instrument. Dissemination took place during the SOGON 57th Annual General Meeting and Scientific Conference, directed at the gynecologists present.

Before accessing the questionnaire, would-be participants encountered a permission disclosure document. Solely those who signaled their agreement were allowed to continue and complete the instrument. The questionnaire was purpose-built to be straightforward and brisk, calibrated to maximize both return rates and the integrity of the data amassed.

To foster extensive reach, a layered propagation scheme was adopted. As a first move, delegates at the conference were engaged in person and, once their agreement was obtained, furnished with the digital survey hyperlink. In parallel, the hyperlink was broadcast inside the conference delegates' WhatsApp forum to galvanize engagement. As a closing tactic, the hyperlink was shared across the wider SOGON WhatsApp platform, prompting members who had attended the conference but still had outstanding responses.

Qualitative phase

The qualitative strand of this inquiry drew upon 12 deliberately sampled KIIs staged during the SOGON 57th Annual General Meeting and Scientific Conference. To underpin a disciplined, methodical fieldwork process, two seasoned research associates—who brought prior immersion in qualitative traditions and interview stewardship—led the conversations. Before fieldwork, both associates underwent a structured preparatory briefing to standardize their understanding of the research goals, ethical responsibilities, and interviewing techniques, thereby safeguarding procedural consistency across all interviews.

Interviewees were contacted well in advance to book sessions at times that suited their calendars, allowing flexibility around their work obligations. Before each session began, individuals provided written consent, including permission to record sound to ensure accurate documentation. The associates reiterated that all taped material would remain securely confidential and would be used for no purpose outside the study. Every interview was tagged with a unique code to protect participants' identities.

Sessions were held in a quiet, sectioned-off space inside the conference facility to foster ease and unguarded dialogue. Concurrently, the associates compiled observational jottings, cataloging nonverbal expressions and situational texture to round out the sound archives. Straight after each session, after-action reflections were drafted to thicken the interpretive lens and confirm thorough data triangulation.

Data analysis

Quantitative data analysis

Data wrangling and statistical operations were performed within SPSS (version 27; IBM Corp). The variable set was methodically labeled for analysis, designating sociodemographic features—age, sex, and professional tenure among them—as predictor variables, and the depth of SOGON protocol weaving into everyday clinical workflow as the outcome variable. For predictor variables measured on a continuum, such as age and professional tenure, means alongside SDs were summarized. Categorical predictor variables, including sex and board certification

status, were summarized using frequencies and percentages. The outcome variable was presented as frequencies and percentages arrayed across distinct rungs of concurrence or integration.

The propositions embedded in each instrument segment were specifically engineered to gauge participants' familiarity, conduct, and orientations using a Likert-style scale. To assess the internal soundness of those gradients, Cronbach's α values were computed for each segment. The output indicated strong reliability, with Cronbach's α values of 0.846 for familiarity, 0.849 for orientations, and 0.811 for conduct.

On the strength of demonstrated inter-item relationships, the Likert-style propositions were bundled into a coherent composite scale, and the central tendency across those propositions was worked out [37]. The investigation used the weighted mean as a yardstick: a central tendency value at or above the weighted mean denoted adequacy of the construct under measurement across the participant set. In contrast, a central tendency value below the weighted mean flagged a shortfall in the evaluated attributes.

Logistic regression was used to identify drivers of protocol assimilation, with the probability of guideline weaving as the outcome variable. Each predictor variable's independent contribution to the model was assessed, and ORs were computed to evaluate the strength of the association. A statistical significance cutoff (α) of .05 was applied uniformly, translating to the condition that findings associated with a P-value < .05 were treated as meeting the threshold for statistical meaningfulness.

Qualitative data analysis

The interpretation of the qualitative material was executed by three core team members (FTA, ORA, and OMO) in conjunction with two specialists in qualitative methodologies who brought expertise in implementation science and health policy analysis. The analytical framework selected was thematic analysis. This technique was chosen to detect, scrutinize, and chronicle recurring configurations (themes) woven through the data, capitalizing on its adaptable nature, which accommodates an array of research questions, and its capacity to foreground convergences and divergences within a body of evidence.

Every sound recording stemming from the extended interviews was transcribed in full. The resultant transcriptions were line-by-line verified against the original audio to ensure correctness, with paralinguistic annotations inserted where such details proved informative. NVivo software (Lumivero) served as the digital environment for structuring codes and linking them to corresponding stretches of transcript text. Once the opening round of coding was complete, thematic groupings were assembled by clustering related codes and consolidating the evidentiary base pertinent to each emerging theme, thereby drawing out recurrent threads of meaning or patterned responses. These provisional themes were subsequently measured against the source excerpts from which they were drawn and against the dataset as a whole. They were then honed to produce sharply contoured, internally logical thematic categories. Each theme received a precise delineation and a descriptive label, condensing its fundamental character and the segment of the evidentiary record it represented. The concluding analytical phase involved identifying striking and illuminating illustrative excerpts, dissecting those passages, and anchoring the resultant interpretation to the overarching research question and the wider scholarly discourse. The write-up fully amplified each thematic strand, attending to how the themes corroborate, stand in tension with, or push forward existing understandings.

Outlier cases and evidentiary threads that cut against the grain of the main findings were purposefully grappled with in the narrative, recognizing the dataset's layered quality and variability.

Triangulation and integration of data

The investigation was built on a convergent parallel mixed-methods logic, in which statistical and narrative evidence were gathered over the same period but channeled through distinct analytic pipelines to honor the unique assumptions of each research tradition. Synthesis was deferred until the interpretive moment, empowering the quantitative patterns to deliver range and inferential scope, while the qualitative accounts injected depth and contextual particularity. The integrative maneuver involved placing side by side the numerical outcomes—such as rates of guideline familiarity and variables predictive of uptake—with the qualitative thematic clusters that probed structural impediments, among them material scarcity and educational shortfalls.

This triangulation exercise yielded a more layered, holistic picture by flagging areas of alignment, friction, and mutual enrichment. Across both evidentiary streams, heightened awareness of the guidelines coincided with only partial incorporation, highlighting a disconnect between knowing and doing. The interview-based material decoded this fissure, bringing to light hesitancy tied to entrenched fidelity to individual clinical discretion and

location-specific difficulties. The merged analytical treatment lent additional weight to the study's conclusions, providing a fine-grained appreciation of the translation of the SOGON guideline into practice, while adhering to recognized conventions of mixed-methods scholarship suited to navigating health system intricacies.

Ethical considerations

Before the study's rollout, a formal application for ethical clearance was lodged with and granted by the National Health Research Ethics Committee (approval identifier: NHREC/01/01/2007).

Individuals taking part were furnished with thorough details regarding the investigation's rationale, procedural steps, foreseeable risks, and potential benefits. All gathered information was managed in accordance with uncompromising confidentiality protocols. Participants were informed that a digest of the study's conclusions could be requested upon completion of the project. No cash inducements were offered; however, those attending received light catering and conference-related items.

Results and Discussion

Overview

From a pool of 120 qualifying attendees registered for the 57th SOGON Annual General Meeting and Scientific Conference, 105 gynecologists returned completed questionnaires, yielding a response rate of 80%. The analytic dataset, therefore, comprised 105 eligible individuals. **Table 1** presents the sociodemographic characteristics of the respondent cohort. The mean chronological age was 50 (SD 8) years, alongside a mean postresidency professional span of 12 (SD 9.412) years and a mean daily patient throughput of 15 (SD 11.73). Regarding sex composition, women accounted for 33.3% (35/105) of respondents, while men accounted for 66.7% (70/105).

Table 1. Sociodemographic characteristics of respondents (n = 105).

Variable	Data
Age (years), mean (SD)	49.83 (8.346)
Years in practice after residency, mean (SD)	11.77 (9.412)
Mean daily patient volume, mean (SD)	15.2 (11.73)
Gender distribution, n (%)	
• Female	35 (33.3)
• Male	70 (66.7)
Practice setting, n (%)	
• Private (non-teaching hospital)	10 (9.5)
• Private (self-employed)	2 (1.9)
• Public (federal medical center)	12 (11.4)
• Public (federal teaching hospital)	59 (56.2)
• Public (MDAa)	1 (1.0)
• Public (state teaching hospital)	5 (4.8)
• Public (state specialist hospital)	16 (15.2)
Year of obstetrics and gynecology fellowship completion, n (%)	
• 1981–1990	3 (2.9)
• 1991–2000	11 (10.5)
• 2001–2010	29 (27.6)
• 2011–2020	45 (42.9)
• 2021 or later	17 (16.2)
Type of fellowship qualification, n (%)	
• FMCOGb	17 (16.2)
• FRCOGc	1 (1.0)
• FWACSd	39 (37.1)
• Dual fellowships	42 (40)
• Triple fellowships	5 (4.8)
• Other qualifications	1 (1.0)
Practice location classification, n (%)	
• Rural	4 (3.8)
• Semi-urban	20 (19)

• Urban	81 (77.1)
Use of additional cervical cancer prevention guidelines, n (%)	
• RCOGe only	4 (3.8)
• CSOGf only	4 (3.8)
• WHOg only	13 (12.4)
• ACOG	5 (4.8)
• ACOGh and RCOG	8 (7.6)
• WHO and ACOG	4 (3.8)
• WHO and RCOG	25 (23.8)
• WHO, ACOG, and RCOG	42 (40)

[a]MDA: ministries, departments, and agencies.
[b]FMCOG: Fellowship of the Medical College in Obstetrics and Gynecology.
[c]FRCOG: Fellow of the Royal College of Obstetricians and Gynecologists.
[d]FWACS: Fellowship of the West African College of Surgeons.
[e]RCOG: Royal College of Obstetricians and Gynecologists.
[f]CSOG: Clinical and Experimental Obstetrics and Gynecology.
[g]WHO: World Health Organization.
[h]ACOG: American College of Obstetricians and Gynecologists.

Turning to practice type, the dominant segment, 56.2% (59/105), was based in public federal teaching hospitals, whereas the smallest sliver, 1% (1/105), operated within public ministries, departments, and agencies. Thereafter, 15.2% (16/105) of those surveyed were situated in public state specialist hospitals, 11.4% (12/105) in public federal medical centers, 9.5% (10/105) in private non-teaching hospitals, 4.8% (5/105) in public state teaching hospitals, and 1.9% (2/105) reported working as self-employed independent clinicians. The timing of specialist fellowship attainment in obstetrics and gynecology varied, with the largest subgroup, 26.7% (28/105), completing their fellowship between 2016 and 2020.

The overwhelming majority of respondents (81/105, 77.1%) provided clinical services in city environments, while 19% (20/105) served in semi-urban areas and 3.9% (4/105) in rural areas. Participants reported following various cervical cancer prevention protocols. The single most prevalent approach, endorsed by 40% (42/105) of the sample, was a blended regimen drawing on guidance from the World Health Organization, the American College of Obstetricians and Gynecologists, and the Royal College of Obstetricians and Gynecologists.

The geographic spread of the respondent pool was broad, with denser clusters in principal urban centers—20.9% (22/105) in Lagos and 14.3% (15/105) in Abuja. This sweeping territorial coverage secured well-rounded representation, reinforcing the study's capacity to gather a heterogeneous collection of perspectives sourced from disparate regional and cultural settings across the nation.

Acquaintance with the SOGON guidelines

The preponderance of those surveyed (98/105, 93.3%) expressed cognizance of the SOGON cervical cancer prevention directives. Those confirming familiarity then rated their level of agreement with a series of propositions designed to assess the depth and accuracy of their understanding of the SOGON cervical cancer screening protocols.

Scrutiny of the cohort's familiarity with and understanding of the SOGON clinical practice directives for cervical cancer prevention reveals broadly elevated awareness, anchored by a weighted mean of 4.24 (SD = 0.833), against which adequacy was gauged across the full battery of evaluative indicators.

The cohort demonstrated strong recognition of cornerstone prevention strategies, as evidenced by a mean score of 4.63 (SD = 0.686). Respondents also expressed appreciation for the imperative of obtaining definitive diagnostic confirmation following positive screening results, with a mean of 4.26 (SD = 0.959). Taken together, these patterns indicate that the bulk of the sample held a solid intellectual command of the guidelines' central tenets.

Grasp of which patients qualify for screening, registering a mean value of 4.32 (SD = 0.830), alongside the stipulated screening interval, at a mean value of 4.27 (SD = 0.949), edged just past the weighted mean threshold, signifying passable but unremarkable levels of discernment.

Certain friction points materialized when examining the applied dimension of guideline use. Respondents' comfort with operationalizing SOGON-endorsed recommendations within their daily clinical workflows yielded a mean of 4.06 (SD = 0.858), and their facility with demarcating SOGON-preferred screening techniques from

alternative testing modalities yielded a mean of 3.76 (SD = 0.856), placing it below the weighted mean. These readings illuminate areas where supplemental educational interventions or hands-on decision-support tools may be necessary to bridge the gap between theoretical familiarity and bedside execution.

Command of the criteria for determining patient suitability under the guidelines fell somewhat shy of the standard, with a mean value of 4.10 (SD = 0.891). While this denotes a functional baseline of understanding, intensifying instructional efforts in this domain could further hone participants' capabilities **(Table 2).**

Table 2. Awareness and understanding of the Society of Obstetrics and Gynecology of Nigeria (SOGON) guidelines for cervical cancer prevention.

Evaluation item	Mean score (SD)
Awareness that the SOGON cervical cancer guidelines outline specific preventive approaches for women and girls	4.63 (0.686)
Understanding that individuals with positive screening outcomes according to SOGON guidelines require a confirmatory diagnosis before treatment	4.26 (0.959)
Recognition that a positive screening result under SOGON recommendations does not equate to a cervical cancer diagnosis	4.54 (0.638)
Awareness of eligibility criteria for screening based on the SOGON cervical cancer prevention recommendations	4.32 (0.830)
Knowledge of the recommended screening intervals for eligible women according to SOGON guidelines	4.27 (0.949)
Familiarity with the application of SOGON-recommended screening methods in routine clinical settings	4.06 (0.858)
Ability to distinguish SOGON-recommended screening techniques from other cervical cancer screening methods	3.76 (0.856)
Knowledge of how to evaluate patient eligibility for screening in line with SOGON guidelines	4.10 (0.891)
Overall weighted mean	**4.24 (0.833)**

The appraisal of the extent to which clinicians have assimilated the SOGON clinical directives into their professional routines provides telling insights into their underlying outlooks and behavioral patterns. The weighted mean of 3.40 (SD = 1.075) serves as the reference marker for interpreting overall resonance with the directives, with higher values indicating firmer endorsement and fidelity, and lower values suggesting possible spheres of reluctance or recourse to nonstandard pathways. The cohort demonstrated a pronounced readiness to incorporate evidence-based directives, as evidenced by an elevated mean of 4.60 (SD = 0.690) on receptivity to research-grounded practices. Likewise, a mean value of 4.15 (SD = 0.869) reflects a constructive stance toward acclimating to fresh directives, including when these break from longstanding habits. Both values, resting well above the weighted mean, underscore clinicians' recognition of the role of evidence-driven frameworks in shaping clinical choices. Yet, while the cohort broadly appreciated the directives, the mean of 3.32 (SD = 1.410) suggests that a considerable subset of professionals perceives a mismatch between the directives' content and the granular realities of bedside medicine. The data further betray a leaning toward privileging accumulated firsthand wisdom and individualized discretion over codified protocols, with readings on propositions such as "My clinical judgment often takes precedence over academic or formal guidelines" (mean 2.69, SD = 1.389) and "Relying on my clinical experience is often more crucial than strictly following a guideline" (mean 2.22, SD 1.374) registering substantially beneath the weighted mean. These signals collectively indicate a predilection for bespoke, case-specific decision-making, most conspicuously in scenarios involving difficult or outlier presentations. Alongside this, wariness toward rigid conformity with regimented directives is also evident in a low mean of 1.87 (SD = 1.177). This suggests that rigid fidelity may be perceived as operationally unfeasible or contextually misaligned across a range of clinical circumstances, underscoring the need for directives with sufficient elasticity. The mean value of 4.04 (SD = 1.012) for weaving fresh directives into daily workflows hovers modestly above the weighted mean, intimating that although respondents endeavor to assimilate the directives, appreciable latitude for

advancement persists. Accordingly, the weighted mean of 3.40 (SD = 1.075) maps onto a middling aggregate tier of assimilation, with marked dispersion observable across specific subdomains of directive uptake **(Table 3).**

Table 3. Evaluation of the extent to which you incorporate the Society of Obstetrics and Gynecology of Nigeria (SOGON) guidelines into your clinical practice.

Evaluation item	Mean score (SD)
I frequently incorporate updated recommendations or approaches, such as the SOGON guidelines, to improve patient management	4.04 (1.012)
My decisions in practice are often guided more by personal clinical experience than by formal or academic guidelines	2.69 (1.389)
I am open to adopting evidence-based recommendations, including those from the SOGON guidelines	4.60 (0.690)
Research-based guidelines, such as those from SOGON, do not always reflect real-world clinical situations	3.32 (1.410)
Dependence on my own clinical expertise is often more important than rigid adherence to guidelines	2.22 (1.374)
I am reluctant to follow structured guidelines in my clinical work strictly	1.87 (1.177)
I am willing to modify my usual practice patterns to accommodate new guidelines, even when they differ considerably	4.15 (0.869)
Overall weighted mean	**3.40 (1.075)**

Table 4 presents an overarching perceptual tendency toward espousing new directives and procedures, as indicated by a weighted mean of 4.45 (SD = 0.782). This standard highlights the cohort's affirmative orientation toward integrating EBPs into their quotidian professional rhythms. The highest concordance was registered on statements tapping the congruence between incoming directives and respondents' clinical instincts (mean 4.69, SD = 0.640) as well as their self-perceived grasp of what constitutes efficacious practice (mean 4.70, SD = 0.484). These readings, positioned comfortably above the weighted mean, suggest that clinicians are most disposed toward directives that harmonize with their internal convictions and settled procedural habits. While trailing the weighted mean fractionally, the reading for uptake spurred by directives from supervising authorities (mean 4.12, SD = 0.978) points to a tempered degree of influence exercised through hierarchical command structures. That said, conformity with larger regulatory imperatives (mean 4.39, SD = 0.860) and with national- or state-level edicts (mean 4.32, SD = 0.826) approached the weighted mean more closely, mirroring professionals' broad preparedness to align with standardized expectations as circumstances dictate. The mean value of 4.32 (SD = 0.904) for uptake swayed by practices and informal feedback from professional peers indicates that colleague conduct serves as a meaningful shaper of postures toward incoming directives. This finding underscores the importance of collegial ecosystems and peer networks as levers for nurturing directive assimilation. An elevated mean of 4.60 (SD = 0.780) indicates that respondents regarded themselves as suitably prepared and proficient in implementing incoming directives. This figure, landing noticeably beyond the weighted mean, foregrounds the indispensable function that sustained professional learning and skill reinforcement play in cultivating assurance and smoothing the pathway toward EBP integration.

Table 4. Attitudes toward adopting new guidelines and practices.

Evaluation item	Mean score (SD)
It was consistent with your clinical judgment and intuition	4.69 (0.640)
It matched your perception of what constitutes effective clinical practice	4.70 (0.484)
Its use was required by your immediate supervisor or authority	4.12 (0.978)
A regulatory organization mandated it	4.39 (0.860)
It was enforced at the state or national level	4.32 (0.826)
It was widely adopted by colleagues who also shared favorable feedback	4.32 (0.904)
You felt adequately trained and confident in applying it	4.60 (0.780)

Overall weighted mean	4.45 (0.782)

Table 5 shows that respondents with multiple fellowship credentials and those registering elevated awareness levels exert a meaningful influence on the assimilation of the SOGON clinical practice directives for cervical cancer prevention. Output from the adjusted analytical model demonstrated that clinicians holding more than a single fellowship were 4 times as likely to weave the SOGON clinical practice directives into their routines (OR = 4.200, 95% CI = 1.369-12.888). Analogously, those in the elevated awareness stratum had a ninefold greater likelihood of integrating SOGON clinical practice directives into their everyday clinical practice (OR = 9.610, 95% CI = 3.146-29.357).

Table 5. Factors affecting the incorporation of the Society of Obstetrics and Gynecology of Nigeria (SOGON) guidelines into practice.

Factors and categories	Unadjusted OR[a] (95% CI)	P value	Adjusted OR (95% CI)	P value
Fellowship status				
• 1 fellowship	Reference	—[b]	Reference	—
• More than 1 fellowship	3.462 (1.354–8.849)	.01[c]	4.200 (1.369–12.888)	.01[c]
Awareness of SOGON				
• No	Reference	—	Reference	—
• Yes	0.662 (0.234–1.869)	.44	0.529 (0.529–0.150)	.32
Level of awareness				
• Low	Reference	—	Reference	—
• High	8.719 (3.104–24.488)	< .001[d]	9.610 (3.146–29.357)	< .001[c]

[a]OR: odds ratio.
[b]Not applicable.
[c]Statistically significant at P < .05
[d]Statistically significant at P < .05

The thematic unpacking of the qualitative corpus revealed that, notwithstanding broad familiarity with the SOGON directives among gynecologists, substantial impediments continued to hamper their thorough operationalization in everyday clinical environments. Interviewees recounted a heterogeneous array of lived experiences related to their engagement with the SOGON clinical practice directives, with prominent thematic currents encompassing pragmatic stumbling blocks during implementation, the pressing need for supplemental skill-strengthening opportunities, and the weight of institutional scaffolding on directive fidelity (Textbox 1). The assembled evidence thus delivers a multidimensional rendering of the dynamics shaping directive assimilation. It advances tangible recommendations for honing the practical potency of the SOGON clinical practice directives within the crucible of routine care provision.

Textbox 1. themes and subthemes
Specificity and relevance
• Suitability for patients' circumstances
• Tailoring for high-risk populations
Accessibility
• Ease of obtaining
• Simplicity of interpretation
Training and capacity building
• Past training encounters
• Unmet training requirements
Institutional support and resources
Patient education and awareness
• Function in guideline execution
Feedback and improvement
• Offering suggestions

• Collaborative guideline renewal
Comparison with other guidelines
• Invoking alternative protocols
Guideline implementation successes
• Favorable episodes

Theme 1: specificity and relevance

This thematic strand examines the obstacles and outlooks articulated by gynecologists regarding the implementation of the SOGON clinical practice directives, focusing on their resonance with the distinctive circumstances of the individuals they treat and their calibration for subgroups at elevated risk. The commentaries revealed a wide range of opinions, reinforcing the imperative to harmonize the directives with indigenous and context-specific patient realities.

Subtheme 1.1: suitability for patients' circumstances

Gynecologists recounted their own observations on the extent to which the SOGON directives accommodate the diverse needs of the people they serve, with particular attention to those in remote areas. The reflections highlight a felt misalignment between the directives and the lived conditions of these groups, suggesting a need for more tailored responses.

While the directives furnish a general architecture, a converging sentiment among informants holds that they prove insufficiently pliable when deployed in rural and materially deprived settings, thereby mandating routine revision and workforce skill refreshment:

"What the SOGON guidelines offer is thorough in scope, yet they do not always slot neatly into the particular realities I face with rural patients. There remains a tremendous amount of work to be done in outlying communities. I know fellow practitioners who have struggled to make headway in their localities; consistent refresher sessions and guideline revisions are essential. Socioeconomic hardships also weigh heavily, and in my view, we require solutions far more customized than what the current guidelines deliver."

[Participant 009].

Subtheme 1.2: tailoring for high-risk populations

Gynecologists stressed the significance of reshaping the directives for vulnerable patient segments, citing as examples women bearing a hereditary predisposition to cervical malignancy and those managing HIV.

Those interviewed articulated a pressing shortfall of granular, sharply focused counsel when attending to high-stakes patient groups. They advanced the view that added precision would fortify clinical reasoning and elevate the quality of outcomes:

"I value what the guidelines set out to do, but there remains a real hunger for greater precision, particularly when we are handling patients in high-risk categories. Our efforts need to go further."

[Participant 001].

"In specific scenarios—high-risk patients come to mind—access to more layered and explicit instruction would genuinely lift the standard of our work."

[Participant 002].

Theme 2: accessibility

The effective translation of clinical practice directives into everyday care rests on how readily they can be located and how easily their content can be absorbed by those delivering health services. This thematic area engages with gynecologists' accounts of obtaining and internalizing the SOGON directives.

Subtheme 2.1: ease of obtaining

Participants reflected on the degree to which the directives can be sourced, accepting this as a worthwhile foundation while simultaneously raising misgivings about how many practitioners actually know the documents exist.

While being able to lay hands on the directives is foundational, an unmistakable message surfaced that far heavier investment is called for to broaden familiarity, above all among newly arrived residents and rural-based health workers, if universal adoption is to take root:

"The fact that the guidelines are obtainable represents a sound foundation upon which practitioner adherence can be constructed."
[Participant 004].
"Being able to get hold of the guidelines matters enormously; that first move opens the door for everyone to align with the strongest evidence. Still, I must point out that segments of our community remain entirely unaware that these documents are in circulation, especially among incoming residents. It forces me to ask—what exactly are we engaged in, then? My conviction is that a much louder drumbeat of awareness is needed, even at a gathering such as this one, even though the guidelines can indeed be sourced."
[Participant 002].

Subtheme 2.2: simplicity of interpretation

Gynecologists addressed the pressing need for materials designed with the busy practitioner in mind, enabling swift absorption and immediate application of directives within time-pressured clinical workflows.
The evidence signals that mere availability of the directives does not guarantee their practical deployment, as their density limits day-to-day usefulness. Participants called for stripped-down versions—incorporating visual summary aids and ongoing educational reinforcement—to deepen understanding and consistency of use:
"While the documents exist, pulling out what you need in the middle of a packed schedule is not straightforward. My recommendation would be to produce them in heavily visual, diagram-heavy layouts so the key points land faster. Beyond that, consistent workshops and refresher sessions would go a long way toward making the content stick."
[Participant 001].
"If we genuinely want uptake to climb, the presentation has to become far friendlier, especially when the clinic is bursting at the seams. I trust you grasp the scenario I am describing. My typical day involves more than ten consultations, stacked atop committee duties and countless other demands. A gathering such as this, carved out from our regular duties, could serve as an ideal moment to walk through the guidelines afresh—and perhaps not only SOGON's but others as well."
[Participant 005].

Theme 3: training and capacity building

Instruction and skill development are foundational to enabling gynecologists to embed clinical practice directives into their routines faithfully. This thematic strand mirrors their firsthand experiences and articulated requirements for instruction aligned with the SOGON directives.

Subtheme 3.1: encounters with training programs

Interviewees recognized the value of the instruction received to date but underscored the indispensability of uninterrupted, tightly targeted sessions that zoom in on the directives.
A prevailing sentiment acknowledged that instructional initiatives have yielded dividends yet remain inadequate in scale and frequency. Those surveyed articulated a hunger for more deliberately sequenced and recurring educational touchpoints to keep pace with shifting best-practice benchmarks:
"I have been through some capacity-building sessions, yet the appetite for more sharply concentrated workshops on the SOGON directives remains. Getting this area right carries enormous weight."
[Participant 009].
"The instruction provided so far has been valuable, but it cannot be a one-off affair if we are to stay current with evolving recommendations and evidence. Why not anchor a dedicated preparatory training immediately before this annual meeting? That would be a step of real consequence."
[Participant 007].

Subtheme 3.2: unmet training requirements

Those interviewed pinpointed specific facets of the directives where deeper instructional investment would measurably improve their execution competence.
The commentary betrayed a clear readiness among participants for richer, more granular educational encounters, above all concerning the more layered segments of the directives that resist easy application:

"Zeroing in on precisely which domains demand deeper training could tangibly boost our capacity to roll out the directives with confidence."
[Participant 009].
"A heavier lift is needed on the support side, above all in zones where the guidelines presume a sophistication of understanding that is not yet universal. Recurrent, structured instruction is the path forward."
[Participant 011].

Theme 4: institutional support and resources

Gynecologists carry out their duties within organizational architectures that can either catalyze or cripple the operationalization of directives. This theme probes how the presence or absence of institutional reinforcement shapes fidelity to clinical practice directives.

The material exposes institutional championship as a pivotal fulcrum upon which implementation fortunes pivot. The gynecologists conveyed that where backing is threadbare, consistent adherence proves unattainable, eroding the quality of services delivered to patients:

"When the institution itself does not throw its weight behind the guidelines, staying faithful to them turns into an uphill struggle, and patient care inevitably bears the cost. Within my own setting, persuading senior leadership to get on board with the directives remains a formidable hurdle."
[Participant 012].
"The moments that stay with me—the ones where guideline implementation genuinely worked—were those where our institution stepped up and provided the necessary scaffolding. I can say from direct observation that institutional backing is the linchpin, and I saw this firsthand in my previous place of employment."
[Participant 011].

Theme 5: patient education and awareness (subtheme 5.1: function in guideline execution)

The gynecologists affirm that combating cervical cancer reaches well beyond the procedural dimensions of care, requiring deliberate and sustained patient-facing educational outreach to anchor directive adherence.

Those interviewed noted that bringing patients into the knowledge fold is an indispensable gear in the machinery of successful guideline deployment.

The responses drive home the necessity of a joined-up approach between care providers and the communities they serve. Imparting understanding to patients not only shores up compliance but also arms them with the agency to pursue protective health actions on their own initiative:

"Bringing patients into the fold through education sits at the very heart of making implementation work; it is fundamentally a joint undertaking linking those delivering care and those receiving it."
[Participant 009].
"The manner in which we approach the task of educating those we treat leaves a deep imprint on how thoroughly the guidelines are both grasped and acted upon."
[Participant 008].

Theme 6: feedback and improvement

This thematic cluster examines the indispensability of systematized feedback loops for honing and periodically refreshing the SOGON directives.

Subtheme 6.1: channels for providing input

The gynecologists underscored the worth of relaying frontline observations as a vehicle for sharpening the directives through the lens of real-world application.

The remarks betray a pronounced appetite for a more methodically organized conduit through which clinicians can lodge their experiential knowledge and observations, thereby feeding into an ongoing cycle of enhancement.

A number of those interviewed expressed the following:

"Putting forward feedback carries real weight; it stands as a meaningful avenue for shaping how the guidelines evolve."
[Participant 012].
"There is an unmet call for an orderly mechanism that would allow practitioners to relay what they are encountering on the ground without undue friction."

[Participant 009].

Subtheme 6.2: collaborative guideline renewal

Beyond this, 70% (74/105) of the sample pressed for a more inclusive, stakeholder-driven architecture around the revision cycle, so that their accumulated field experience visibly shapes subsequent iterations.

The sentiments expressed by the gynecologists suggest that a collaborative blueprint would deepen trust and cultivate a sense of shared ownership across the practitioner community, thereby paving the way for more robust assimilation of directives.

A selection of interviewees remarked:

"Broadening the revision process so it genuinely draws in practitioners ensures that the perspectives forged in daily practice leave their mark on the final output."

[Participant 008].

"Our aspiration is to be folded into the undertaking, feeding our lived experiences into the machinery so the guidelines are honed in ways that resonate with reality."

[Participant 007].

"Let me be clear—this is not about doubting the SOGON directives; as a matter of fact, throughout my residency years, the guidelines never once surfaced. However, operating within a discipline grounded in science, I believe the prevailing expectation is that any determination or recommendation we are asked to embrace must be accompanied by a clear rationale—' We are pursuing this path because the evidence shows it is safer. It offers the greatest protection for those under our care'—rather than a bare pronouncement—' This is what we are doing'—devoid of explanation, which risks leaving one to think: well, you are simply taking this route because SOGON has declared it effective."

[Participant 009].

Theme 7: comparison with other guidelines (subtheme 7.1: invoking alternative protocols)

This thematic strand spotlights how gynecologists align SOGON directives with other benchmark standards to deliver well-rounded care.

Those surveyed elaborated on their practice of drawing on a range of protocols to safeguard breadth in patient management.

The practice of cross-referencing directives is widespread among gynecologists, aiming to incorporate superior practices from disparate origins into their clinical repertoire, suggesting that the SOGON directives might benefit from selectively incorporating insights embedded in parallel frameworks.

The gynecologists noted the following:

"On occasion, we find ourselves turning to other protocols; upholding a panoramic approach to how we look after patients demands it."

[Participant 002].

"Placing different directives alongside one another illuminates the relative positioning of SOGON's recommendations and reveals how the strongest practices from each source can be woven together."

[Participant 001].

Theme 8: guideline implementation successes (subtheme 8.1: constructive accounts)

This thematic cluster centers on episodes in which directive deployment has unfolded successfully and the enabling conditions that underpinned those outcomes.

The gynecologists related productive strategies they have marshaled, drawing attention to the decisive roles of teamwork and flexibility.

The narratives of achievement testified that, furnished with appropriate backing and thoughtfully chosen methods, meaningful implementation lies within reach. Such illustrations double as instructive reference points for the wider clinical community:

"Putting our wins into circulation creates a climate where everyone can draw lessons from one another and reproduce approaches that have proven their worth."

[Participant 003].

"The ingredients that made certain implementation efforts come together successfully hold instructive value for the entire professional community."

[Participant 006].

Overview

The impetus for this investigation stemmed from the rollout of SOGON clinical practice directives to strengthen cervical cancer prevention across Nigeria. Notwithstanding the existence of these directives, empirical evidence charting their uptake within the gynecological community remains sparse. Grasping the levels of awareness, actual deployment, and impediments to directive fidelity is a vital prerequisite for elevating cervical cancer prevention efforts.

Principal findings

This inquiry employed a convergent parallel mixed-methods architecture to assess Nigerian gynecologists' familiarity with, understanding of, and practical application of the SOGON directives. The numerical stream, drawn from survey returns, furnished measurable estimates of cognizance (98/105, 93.3%) and the distribution of practice settings (81/105, 77.1% metropolitan), whereas the narrative stream, harvested through KIIs, supplied situated understanding of obstructions such as inadequate instructional opportunities and thin institutional reinforcement. Synthesis unfolded at the interpretive juncture, where statistical outputs—among them the pronounced link between cognizance and directive assimilation (OR: 9.610, 95% CI: 3.146-29.357)—were deepened by qualitative storylines that foregrounded the hunger for professional growth and the cleavages separating metropolitan from rural practice. This dual-lens strategy laid bare both structural and setting-specific frictions, including reluctance to bend to compliance, traceable to an over-anchoring in personal clinical discretion. These patterns echo the established scholarly record, which affirms the value of braiding quantitative and qualitative traditions to grapple with the intricacies of operationalizing clinical directives [38, 39].

The elevated plane of cognizance and comprehension among gynecologists aligns with evidence-based paradigms aimed at maximizing patient outcomes [18, 40]. Those surveyed grasped the imperative of securing definitive diagnostic verification on the heels of affirmative screening findings, a practice that curtails unwarranted procedures and spares patients undue distress [29, 41]. Even so, the tempered congruence between day-to-day clinical conduct and the directives betokens persistent frictions in spanning the chasm separating knowing from doing. Investigations from other geographies similarly flag that shortfalls in real-world execution frequently stem from threadbare training and constrained resource envelopes, underscoring the indispensable role of sustained educational investment in strengthening directive adherence [38, 42, 43].

Embedding the SOGON directives into clinical workflows showed a moderate alignment with the stipulated recommendations. A constructive disposition toward novel directives signals that health care practitioners are broadly receptive to evidence-based innovations [42]. This observation aligns with evidence from Lehane *et al*. [39], who highlighted the decisive role of instructional programming and aligned curricula in shaping the knowledge base, competencies, and outlooks of health professionals, which, in turn, govern the caliber of services rendered. Such programming provides the bedrock support indispensable for narrowing the gap between written directives and bedside application [39, 44]. Alongside this encouraging orientation, the investigation brought to light a pronounced leaning toward privileging clinical instinct over codified protocols, coupled with a wariness toward unbending conformity to regimented recommendations. This lays bare the intricate push-and-pull between clinical mastery and directive fidelity within authentic practice environments, where those delivering care must continually weigh patient-specific exigencies against system-wide constraints. Striking an equilibrium between honoring seasoned clinical judgment and foregrounding evidence-based directives is pivotal to maximizing patient outcomes [44, 45]. A comprehensive review of the literature has delineated three core approaches to building EBP competencies: composite educational interventions that weave in mentorship and guided practice, stand-alone instructional strategies, and composite approaches structured around the five foundational steps of EBP. These strategies have proven their mettle in strengthening health professionals' capacity to embed evidence-based directives into daily routines, underscoring the importance of precisely targeted instructional initiatives in cementing directive uptake [39, 46].

The evidence generated by this study casts light on the readiness with which Nigerian gynecologists welcome incoming directives, including when these depart meaningfully from their entrenched routines. Such receptivity speaks to a genuine investment in ongoing learning and in raising the standard of patient care, mirroring the broader ambition of nurturing an ethos of career-long growth and professional enrichment within health delivery structures [44, 47]. This stance aligns with prior scholarship, which emphasizes that the ramifications of adopting

new directives ripple well beyond their surface-level provisions, shaping the broader landscape of attitudes and behaviors in clinical settings [26, 27, 39, 48].

The data yield fertile insights into the forces shaping gynecologists' outlooks on and responses to new directives. The cohort registered firm consensus on the significance and utility of adopting directives, most notably when these dovetail with their seasoned intuition and their internalized sense of what constitutes sound practice. This finding spotlights the quiet authority exerted by clinical acumen and professional discernment, reservoirs that health care providers habitually draw upon to steer through the dense and variegated terrain of real-world clinical encounters. A parallel pattern has been documented in global studies, in which clinical reasoning routinely integrates evidence-based guidelines with situational sensitivity to patient realities [11, 21, 49]. The investigation further brings into sharp relief the value of folding clinicians into the directive formulation enterprise itself, so that the final recommendations ring true against the grain of their daily experience. Directives sculpted to incorporate the vantage points of frontline practitioners are more likely to gain traction, precisely because they address not only theoretically optimal pathways but also the granular, day-to-day frictions that color care delivery across heterogeneous settings. This finding aligns with a body of scholarship advocating participatory architectures in directive development to amplify relevance and practicality [38]. Strikingly, the study found that while regulatory stipulations and formal mandates do nudge adherence forward, they do not constitute the primary driver of directive uptake. The comparatively subdued mean score for the sway of supervisory decrees suggests that clinicians draw greater motivation from the perceived inherent merit of directives and their consonance with professional judgment than from hierarchical imposition. That said, participants aligned closely with expectations set by regulatory authorities and nationwide policy frameworks, a pattern that underscores the role of oversight architecture in entrenching standardized conduct and safeguarding care quality. Congruent observations in the scholarly literature support the supplementary role of regulatory scaffolds in cementing the assimilation of EBPs [50-53].

The investigation brings into sharp relief the substantial role of collegial reinforcement and professional relationship networks in shaping how participants regard and take up incoming directives. The bearing of fellow practitioners' uptake and informal commentary proved to be a linchpin in advancing directive fidelity and the circulation of know-how among Nigerian gynecologists [48]. Cooperative arrangements and peer-driven learning forums create channels for exchanging effective approaches, fostering an organizational climate oriented toward iterative refinement. These observations sit comfortably alongside earlier scholarship documenting that tightly knit professional webs and the seal of approval from trusted colleagues amplify the perceived trustworthiness and palatability of EBPs [38, 54]. The assurance and perceived capability participants reported regarding the deployment of the SOGON directives were closely tied to their conviction that they had been suitably equipped and prepared. This finding spotlights the indispensability of sustained instructional investment and career-long professional development initiatives in safeguarding health care professionals' competence in delivering evidence-based care. A steady drumbeat of research confirms that thoughtfully architected training interventions boost clinicians' confidence and proficiency in operationalizing clinical directives, especially when they embed experiential practice and bespoke content tailored to specific knowledge gaps [9, 55].

The inquiry likewise provides insight into the factors shaping the assimilation of the SOGON directives. A standout discovery was the pronounced imprint of scholastic grounding and breadth of cognizance on directive weaving. Gynecologists with multiple fellowship credentials were markedly more inclined to incorporate the directives into their routines than peers with only a single fellowship. This finding underscores the value of advanced training and subspecialty concentration in deepening competency and aptitude. This pattern aligns with a global body of evidence demonstrating that enhanced professional development enhances clinicians' capacity to interpret and translate EBPs across diverse care settings [44, 45]. Going further, the investigation disclosed that gynecologists registering greater familiarity with the SOGON directives were nine times more likely to deploy them in daily practice than their counterparts reporting lesser awareness. This throws into dramatic relief the decisive place of knowledge diffusion and sensitization drives in propelling directive adherence and standardizing clinical conduct. Antecedent studies have similarly shown that precisely focused educational initiatives—exemplified by workshops and symposia—meaningfully enhance directive uptake by addressing informational deficits and deepening understanding of guideline content [47, 56]. These revelations carry tangible ramifications for clinical workflow design and career-long learning architecture within Nigerian health delivery structures. To grease the wheels of broad-based EBP assimilation, health care institutions and governance actors ought to accord primacy to instructional programming and sensitization initiatives concentrated on deepening health

professionals' working knowledge of the SOGON directives. This might encompass weaving guideline-oriented instruction into residency training, convening periodic interactive workshops, and crafting readily navigable reference materials that are attuned to the realities clinicians face. Beyond this, incentivizing sustained professional advancement and opening doors to higher-level training will further bolster health care professionals' capacity to faithfully integrate directives into their clinical repertoires, yielding dividends for patient outcomes over the long arc [47, 57].

This inquiry delivers a granular understanding of gynecologists' lived encounters and outlooks vis-à-vis operationalizing the SOGON directives for cervical cancer prevention. While those surveyed acknowledged the breadth of the directives, a considerable share flagged the need for greater calibration to meet the distinctive circumstances of rural and high-risk patient cohorts. These observations mesh with an extant literature that presses for situation-sensitive refinements to clinical directives as a precondition for safeguarding their pertinence and workability across nonuniform health care landscapes [25, 38].

Ease of reach surfaced as a decisive determinant steering fidelity to the directives. Despite participants' acknowledgment that the directives were obtainable, misgivings about practitioners' awareness of their existence, their interpretability, and their usability arose regularly, above all in the crucible of overburdened clinic sessions. Those surveyed offered recommendations to enhance accessibility through intuitively designed renditions—stripped-down language, graphic representations, and technology-enabled platforms. These proposals dovetail with antecedent research documenting that lucid, visually arresting content and applied demonstrations significantly elevate directive absorption within health care provider communities [39, 58]. Side by side with this, cyclical instructional touchpoints were insisted upon as nonnegotiable to stimulate directive fidelity and fortify gynecologists' mastery and competencies in the cervical cancer prevention domain. Unbroken learning pathways keep health care practitioners current on the shifting frontier of EBPs while simultaneously incubating an ethos of career-spanning intellectual growth and professional maturation [52, 59-61].

Those surveyed also highlighted the role of organizational scaffolding in facilitating adherence to directives. Fruitful translation of the SOGON directives into practice was recurrently coupled with vigorous institutional championship, including the provisioning of resources, stewardship endorsement, and physical and operational infrastructure upgrades. This finding underscores the pivotal role of organizational resolve in advancing EBPs. Bolstering evidence harvested from studies across multiple countries reveals that health care establishments that elevate directive mainstreaming through earmarked assets and unwavering leadership post markedly stronger compliance metrics among their workforce [52, 53]. As an illustrative case, research conducted in Germany found that institutions cultivating a culture of quality advancement, underpinned by robust leadership and infrastructure investment, registered substantial gains in directive fidelity [48, 62].

Hung *et al*. [52] examined the imprint of organizational culture on directive adherence in first-contact care milieus. Their outputs demonstrated that establishments nurturing a climate of ongoing quality refinement, paired with consistent support structures and instructional provisions for health care personnel, proved substantially more adept at bedding down clinical directives [52]. These insights strengthen the evidentiary case for the pivotal role of organizational dedication and institutional reinforcement in facilitating directive mainstreaming. The participants in the present study mirrored this emphasis on institutional championship, insisting that robust infrastructure, stewardship backing, and sustained instructional investment were foundational to entrenching fidelity to the SOGON directives.

Equipping patients with knowledge surfaced as another pivotal ingredient in the faithful execution of the directives. Those interviewed pressed the case for practitioners to inform those under their care actively and to embrace a partnership-driven ethos in clinical encounters. They further championed the establishment of input loops, pressing for inclusive, stakeholder-informed revision cycles as a guarantor of ongoing refinement. These positions resonate with a well-developed evidentiary base demonstrating that health care providers who meaningfully engage patients as participants in their own care, deliver lucid and digestible explanations of therapeutic pathways, and foster joint deliberation are measurably more likely to stay faithful to clinical directives [63]. Scholarly work has moreover established that health care organizations that systematically harvest and weave provider and patient perspectives into their directive revision cadres register superior adherence metrics and lift the overall standard of service delivery [64, 65]. This body of evidence underscores the indispensability of involving stakeholders in both the origination and ongoing refinement of directives, ensuring that the resulting recommendations remain tethered to reality, operationally feasible, and anchored in the patient's best interests.

Those surveyed placed considerable weight on the experiential knowledge and grounded observations of fellow practitioners as the substrate for meaningfully sharpening and periodically refreshing the directives. The investigative outputs reveal that participants saw value in placing multiple directives alongside one another as a tactic for distilling the strongest practices and safeguarding a panoramic orientation toward patient care. Invoking alternative protocols was regarded as a useful adjunct for steering both clinical reasoning and bedside action. These observations find echoes in prior scholarship that exposes how clinical directives can elevate the quality of bedside judgments by providing unambiguous signposts, steadying clinicians grappling with procedural uncertainty, and ironing out unwarranted variation in care delivery. Directives anchored in methodical scientific appraisal single out interventions of demonstrable benefit while simultaneously flagging those wanting robust evidentiary footing, thereby steering practitioners clear of approaches that are unproductive, injurious, or squander limited resources [25, 39, 48]. Directives forged in this mold cultivate habits of critical reflection among clinicians and fortify the uniformity and fitness of the care dispensed.

Recommendations

Drawing from the evidentiary record assembled through this inquiry, a suite of proposals emerges with the potential to strengthen the operationalization of the SOGON directives and lift cervical cancer prevention outcomes among Nigerian gynecologists. Broad-based instructional programming ought to be architected to directly address the specific requirements of gynecologists, spanning refreshed instructional content, pragmatic deployment toolkits, and frameworks for navigating clinical decision-making junctures. Cyclical interactive workshops, symposia, and digitally delivered seminars should undergird career-long professional maturation, keeping health care practitioners abreast of the shifting frontier of evidence-based cervical care. Braiding the SOGON directive instruction into the residency curriculum for obstetrics and gynecology would seed familiarity with evidence-based cervical care at the formative stage, laying a durable foundation for lifelong directive fidelity. In parallel, championing institutional, zonal, and nationwide policy reinforcement becomes imperative. Concerted energy should be directed toward enacting policies that codify directive adherence as a standard, channel earmarked resources toward instructional undertakings, and structure incentives for compliance to secure both breadth and durability of assimilation.

Strengths and limitations

The assets of this investigation encompass its blended methods architecture, which wove together expansive quantitative patterning with textured qualitative excavation, yielding a multi-layered comprehension. This inquiry numbers among the earliest to systematically interrogate the assimilation of cervical cancer prevention directives within the Nigerian gynecological community. Moreover, the recruitment of participants at the 57th SOGON Annual General Meeting provided access to a geographically dispersed, professionally diverse assembly of subject-matter experts drawn from across Nigeria. Against these merits, the study carries several caveats that warrant circumspection when weighing its findings. To begin with, the tight framing around gynecologists leaves unexamined the contributions of other cadres enmeshed in cervical cancer prevention—nursing professionals and primary care clinicians among them—thereby tempering the portability of the conclusions. In the second instance, although participants were sourced from disparate regions, the overall sample size remained modest. It may fall short of capturing the full texture of experiences among gynecologists stationed in the countryside or medically marginalized zones, where the frictions attending directive execution may assume markedly different contours. Third, reliance on self-reported accounts opens the door to systematic distortion, as respondents might amplify their reported adherence or soft-pedal impediments to conform to presumed normative expectations. Fourth, the single-timepoint architecture of the study rules out any capacity to trace causal chains linking the forces that shape directive uptake to downstream consequences. Finally, the resource and organizational frictions recounted by those surveyed may only partially mirror the landscape confronted by gynecologists operating in other geographies, given the patchwork character of health care infrastructure and institutional buttressing mechanisms across Nigeria's diverse regions.

Conclusion

This body of work illuminates the standpoints of Nigerian gynecologists toward the SOGON directives for cervical cancer prevention, unmasking a broad, affirmative understanding and intellectual command of their

content. The evidentiary harvest underscores the importance of directive fidelity as a vehicle for advancing EBPs and safeguarding the delivery of care aligned with the highest attainable benchmarks. While pockets of unrealized potential persist—most notably in deepening the bedside translation of the directives—the receptiveness of health care professionals to new guidance signals an authentic investment in the iterative elevation of patient care standards. The actionable pathways emerging from this inquiry converge on the urgency of constructing multi-layered instructional programming purpose-built for gynecologists, buttressing sustained career-long learning architectures, and mustering policy-level championship to vault directive mainstreaming to the forefront of institutional and national agendas.

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