Mental Health Outcomes among Women with Cervical Cancer in Africa: A Scoping Review

Background: Cervical cancer is one of the major contributors to cancer-related morbidity and mortality in women in Africa. Even though there is conclusive evidence regarding the physical toll of this condition, there is little known about mental health outcomes in women who suffer from this condition. Objective: The aim of this scoping review was to map existing findings on mental health outcomes for women suffering from cervical cancer in Africa. Methods: The scoping review was carried out using the PRISMA-ScR. Electronic databases (PubMed, Scopus, African Index Medicus, and Google Scholar) were utilized for searching through peer-reviewed literature in English up until 2025. The inclusion criteria comprised literature studying the mental health outcomes of women with cervical cancer in Africa. The literature was examined for features and outcomes relating to mental health, alongside the key findings. Results: A total of 15 studies satisfied the inclusion criteria. The most reported outcome was depression, anxiety, psychological distress, and a compromised quality of life. Prevalence of depression was reported between 25% and 50% and anxiety was up to 38% in some studies. Factors that escalated psychological distress include stigma, fear of death, a lack of certainty regarding the treatment, a concern regarding infertile partners, and isolation. Quality of life, especially emotional and social aspects, was severely affected. Only a few studies assessed structured interventions. There was a lack of available mental health care. Conclusion: Mental health issues are found at a high level of prevalence among women with cervical cancer in Africa, but there is little treatment provided for mental health issues in cervical cancer treatment systems. There is a pressing need for cervical cancer treatment systems that include systematic mental health screening and culturally compatible mental health counselling components.

Keywords: *Cervical cancer, Mental health, Depression, Anxiety, Psychological distress, Africa*

Introduction

Cervical cancer is a major public health concern in Africa, with almost 90% of cervical cancer-related deaths reported among low and middle-income countries (LMICs) worldwide (Ginsburg et al., 2018). Infection with human papillomavirus (HPV), a viral disease, is considered the main causal factor, but lack of screening, vaccination, and treatment contributes to increased cervical cancer morbidity (Abate et al., 2020). Late stages are often encountered, and most affected females are found with cervical cancer after those symptoms started manifesting, hence increasing chances of death due to treatment difficulties and challenges (Mwaka et al., 2019). Overall physical suffering brought by cervical cancer is also accompanied by social stigma, financial burdens, and various sociocultural attitudes toward personal and global health

1 care and treatment adherence among affected females (Chidyaonga-Maseko et
2 al., 2017; Maree & Wright, 2010).
3   Problems in mental health are common among patients with cancer, where
4 depression and anxiety are identified as the frequently encountered psychiatric
5 comorbidities in these patients (Derbew et al., 2024). The patients encounter
6 powerful emotions, including shock, fear, loss, and uncertainty, which can
7 remain throughout the period of treatments (Ginsburg et al., 2018). Lack of good
8 mental health has been found to result in decreased compliance, late
9 presentation, and poor quality of life (Abate et al., 2020; Mwaka et al., 2019).
10   Globally, the estimated proportion of women with cancer suffering from
11 depression is around 30 to 40%, with even higher rates found in LMICs because
12 of added socioeconomic stressors (Derbew et al., 2024). Even so, the need for
13 psychosocial support seems to be overlooked in cancer care in Africa, with the
14 integration of mental health for cancer services being limited as stated in Maree
15 et al., 2025).
16   Depression is consistently cited as having the highest prevalence as a
17 psychological consequence for African women suffering from cervical cancer.
18 Major studies conducted in both Ethiopia and Uganda have shown that half of
19 all women suffering from cervical cancer are prone to depression (Dagne et al.,
20 2019; Okello et al., 2018; Mengistu et al., 2020). Depression contributes to lower
21 adherence and poorer quality of life related to treatment, and this makes it
22 essential to identify and treat it on a constant basis (Lubuzo et al., 2021).
23 Systematic reviews undertaken in Africa-related settings further affirm that
24 prevalence of this psychological disorder is higher than that of other women, and
25 this makes them psychologically more vulnerable (Derbew et al., 2024).
26   Anxieties, even if less extensively researched, are a serious issue. In
27 Morocco, for example, 38% of the cervical cancer-diagnosed women had
28 symptoms of anxiety (Khalfi et al., 2025). Anxieties are commonly associated
29 with ambiguous diagnoses, the fear of death, the sequelae of treatment, and
30 issues of reproduction (Ginsburg et al., 2018). Structured programs for anxiety
31 in the case of cervical cancer are limited and even less represented in the African
32 environment.
33   In addition to depression and anxiety, the psychological toll of mental
34 distress further covers emotional suffering, fear, stigma, and loneliness.
35 Qualitative research conducted in Nigeria, Zimbabwe, Malawi, and South Africa
36 indicates that women experience fear of diagnosis, fear of infertility, strains in
37 relationships, and stigma, thus increasing the emotional toll (Ojo et al., 2020;
38 Mutambara et al., 2021; Chidyaonga-Maseko et al., 2017; Maree & Wright,
39 2010). The onset of treatment, compliance, and quality of life have been
40 negatively influenced by psychological distress, thus making this area a vital
41 intervention point (Mwaka et al., 2019).
42   Cervical cancer has been shown to have a significant impact on QoL,
43 especially regarding emotional, social, and functional aspects of QoL. Emotional
44 well-being, fatigue, and participation in society have been reported to be
45 decreased by women undergoing radiotherapy in South Africa (Lubuzo et al.,
46 2021). Depression and distress have been shown to have a large relationship to

decreased overall QoL, indicating that mental issues have a direct effect on functional findings and satisfaction with life (Mengistu et al., 2020; Ginsburg et al., 2018). Mental health outcomes in African women with cervical cancer are influenced by the sociocultural environment. The sociocultural environment creates barriers such as a lack of availability of psychosocial support services, financial struggles, and a shortage of mental health practitioners (Ginsburg et al., 2018; Mwaka et al., 2019). Additionally, the stigma associated with cervical cancer because of sexual practices results in social discrimination, relationship conflicts, and the patient withholding information, hence exacerbating mental health problems (Maree et al., 2025; Chidyaonga-Maseko et al., 2017).

Cervical cancer is a major cause of cancer-related death among women in Africa, but its impact on mental health is not sufficiently characterized (Ginsburg et al., 2018). Women with cervical cancer often experience depression, anxiety, mental distress, and poor QOL due to factors of late presentation of cervical cancer, societal stigma, and lack of access to mental health and psychosocial resources (Dagne et al., 2019; Mengistu et al., 2020). However, there is clearly a lack of mental health-related resources in cancer care in Africa (Mwaka et al., 2019; Lubuzo et al., 2021). An integration of evidence on mental health outcomes is therefore urgently required for informing mental health-related interventions in Africa.

Materials and Methods

The study made use of a Scoping Review approach in order to map out systematically available data on mental health outcomes in women with cervical cancer in Africa. Scoping reviews are extremely useful in research that is broad in nature and aims at filling research gaps (Peters et al., 2020). The study adhered strictly to the guidelines outlined in the extension of PRISMA for Scoping Reviews (PRISMA-ScR) (Tricco et al., 2018).

Eligibility criteria included studies with participants composed of women with cervical cancer, regardless of age and disease progression. Studies had to include mental health outcomes, such as depression, anxiety, psychological distress, emotional functioning, or quality of life. There was a restriction that only studies done within African countries would be included. Acceptable research designs included primary quantitative, qualitative, mixed-methods studies, as well as systematic/scoping reviews, provided they included mental health outcomes. Articles published in English that included peer reviews up to the end of 2025 were only included. Exclusion of articles included studies that only revolved around cervical cancer prevention, HPV vaccination, as well as studies that included general oncology populations that did not relate to cervical cancer. Conference abstracts, editorials, as well as grey literature, would also be excluded.

A comprehensive search was carried out on various electronic databases, such as PubMed/MEDLINE, Scopus, African Index Medicus, and Google Scholar. The search strategy consisted of a combination of keywords related to

1   cervical cancer, mental health outcomes, and Africa, using MeSH terms as well
2   as free-text terms. An example of a PubMed search strategy would be: ("Cervical
3   Neoplasms"[MeSH] OR " AND ("Mental Health" [MeSH] OR "psychological
4   distress" OR depression OR anxiety OR "quality of life") AND ("Africa"[MeSH
5   Terms] OR "Ethiopia" OR "Uganda" OR "Nigeria" OR "South Africa" OR
6   "Kenya"
7   For a more comprehensive approach, a search of the databases was followed
8   by a review of the reference lists of relevant articles for further potential studies
9   to include. All identified records were further imported into the reference
10 management software, EndNote, after which the removal of duplicates was done
11 before the screening process. The procedure of selecting the studies adopted a
12 two-stage process. In the first stage, two authors assessed the titles and abstracts
13 of the identified records by comparing them to the selected criteria. Studies that
14 fit the criteria were considered in the second stage, which involved the evaluation
15 of the full texts of the articles to establish if they fit the selection criteria. Any
16 discrepancies in the process of selection of the articles were resolved by seeking
17 the input of a third party. The process of selection of the articles was tracked and
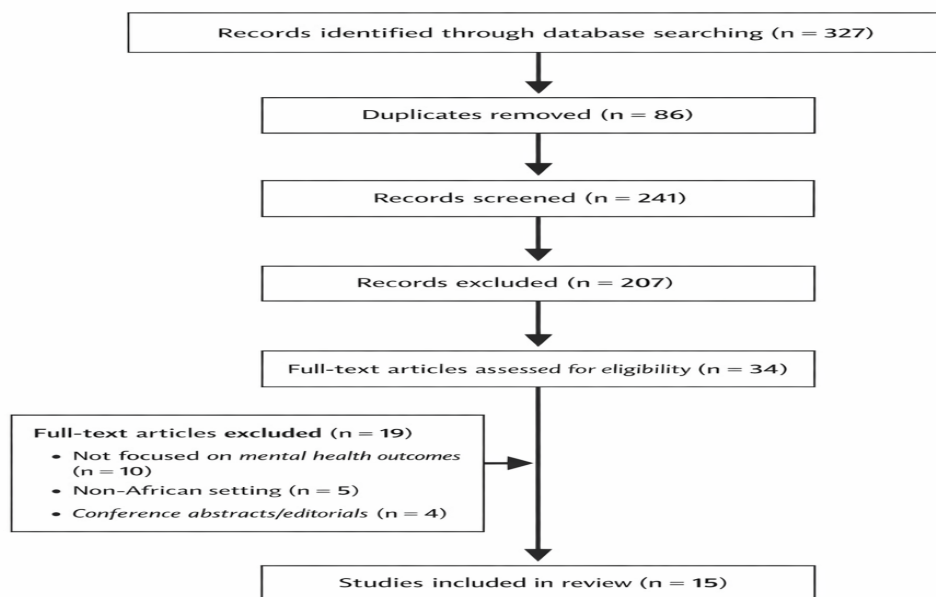18 represented in a PRISMA-ScR flow diagram (Figure 1).
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Figure 1. PRISMA-ScR flow diagram of study selection for scoping review on *mental health outcomes among women with cervical cancer in Africa.*

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22   The data extraction form was developed and pilot-tested to ensure that there
23 are uniformity and a systematic approach. The following information was
24 extracted from each included paper: the authors and year of publication, country
25 and setting, design and size of the sample, mental health outcome measured,
26 methods employed, and major mental health findings. The two authors

1   independently extracted the data. Any discrepancies that arose were settled
2   through discussion.
3   The extracted data were integrated in a descriptive manner. Results are
4   presented in three main themes: characteristics of studies (which include country
5   of studies, design, and sample size), the outcomes of mental health (such as
6   depression, anxiety, psychological distress, and quality of life), and the
7   contextual factors that include the socio-cultural, economic, and healthcare
8   system aspects. Since there are variations in the study design, outcome measures,
9   and the tools used in the studies cited in the literature, a meta-analysis was not
10   conducted.
11   Although scoping reviews are intended for the purpose of evidence mapping
12   and not effect size estimation, a risk of bias assessment was not formally carried
13   out, in accordance with the PRISMA-ScR statement (Tricco et al., 2018).
14   However, the designs of the studies, sample sizes, and methodological
15   constraints considered.
16   Since the research conducted was a literature analysis, obtaining ethical
17   approval was not required. All the information procured was from publications
18   accessible to the public.
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21   **Results**
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23   In Table 1 below, the features of the included studies are presented. The 15
24   articles range in publication date from 2010 to 2025 and in geographical
25   distribution cover a range of regions in Africa including Ethiopia, Uganda, South
26   Africa, Nigeria, Zimbabwe, Malawi, Kenya, Morocco, and other parts of Africa
27   (Table 1).
28   Based on the method and design of the studies, there were six cross-sectional
29   quantitative studies, five qualitative studies, two mixed-design studies, and two
30   systematic=scoping reviews. The sample size for the primary studies ranged
31   from 15 to 422 participants. The primary studies were conducted in the oncology
32   department of the hospital.
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1 **Table 1.** *Characteristics of Included Studies on Mental Health Outcomes among*
2 *Women with Cervical Cancer in Africa (n = 15)*

Author(s), Year	Country	Study Design	Sample Size	Mental Health Outcomes Assessed	Key Findings
Mengistu et al., 2020	Ethiopia	Cross-sectional	254	Depression, Quality of Life	Depression significantly associated with poorer overall and emotional QoL
Dagne et al., 2019	Ethiopia	Cross-sectional	422 (mixed cancers)	Depression	High prevalence of depressive symptoms; cancer severity associated with depression
Abate et al., 2020	Multiple (incl. Africa)	Systematic review & meta-analysis	–	Depression	High pooled prevalence of depression among cancer patients in LMICs
Mwaka et al., 2019	Uganda	Mixed methods	134	Psychological distress, Depression	Emotional distress, fear, and social disruption common
Okello et al., 2018	Uganda	Cross-sectional	149	Depression	45% of participants reported depressive symptoms
Lubuzo et al., 2021	South Africa	Cross-sectional	227	Emotional functioning, QoL	Poor emotional wellbeing during radiotherapy
Maree & Wright, 2010	South Africa	Qualitative	15	Psychological distress	Fear, uncertainty, and emotional suffering following diagnosis

Balogun et al., 2021	Nigeria	Cross-sectional	120	Psychological distress, QoL	Financial hardship significantly worsened distress
Ojo et al., 2020	Nigeria	Qualitative	28	Emotional distress	Stigma, social isolation, and marital strain reported
Mutambara et al., 2021	Zimbabwe	Qualitative	20	Psychological distress	Fear of death, infertility concerns, and emotional trauma
Chidyaonga-Maseko et al., 2017	Malawi	Qualitative	32	Psychological distress	Diagnosis shock, fear, and unmet psychosocial needs
Ginsburg et al., 2018	Kenya	Mixed methods	94	Psychological distress, Psychosocial needs	Limited psychosocial support within cancer care services
Khalfi et al., 2025	Morocco	Cross-sectional	100	Anxiety, Depression	38% anxiety; 25% depression prevalence
Derbew et al., 2024	Multiple African countries	Systematic review & meta-analysis	–	Anxiety, Depression	High pooled prevalence across African cancer patients
Maree, Nkosi & Huiskamp, 2025	Sub-Saharan Africa	Scoping review	–	Psychosocial outcomes	Identified widespread distress and lack of interventions

Mental Health Outcomes Assessed

The outcomes for mental health showed differences in the studies that were considered. The primary outcomes measured in the studies that appeared in the research included the assessment of depression and psychological distress. Other notable outcomes in terms of their prominence in the studies conducted included the evaluation of anxiety and the quality of life. Some studies undertaken for their qualitative insights involved in-depth interviews with the subjects to

determine their experience. The instruments applied in the studies showed considerable variability.

Depression and Anxiety

Depressive symptoms had a high prevalence in women diagnosed with cervical cancer. Cross-sectional studies done in Ethiopia and Uganda showed 45% to 50% of the participants showed clear symptoms of depression. Overall, in the cited studies, symptoms of depression had a definite link to the stage of the illness, the intensity of pain experienced by the patients, and the quality of life.

Anxiety was assessed to a lower extent, but it still remained a serious issue. Based on a Moroccan study, it has been seen that the prevalence of anxiety symptoms in women was 38%, while the symptoms of depression in patients were 25%. Systematic reviews supported the high prevalence rate of anxiety and depression in African cancer patients, including women with cervical cancer.

Psychological Distress and Emotional Experiences

Psychological distress was revealed as a theme that cut across qualitative studies, as well as mixed-methods studies. These studies revealed that female participants experienced a fear of death, emotional distress after receipt of a positive diagnosis, concerns regarding treatment outcome, and other sources of distress related to female infertility and body image. Studies were carried out among South African, Nigerian, Zimbabwean, and Malawian participants.

Women in numerous studies spoke about insufficient preparation for diagnosis, treatment, as well as lack of access to counselling or mental health services. Problems caused by lack of finances, as well as caregiving obligations, added to the psychological risks.

Quality of Life and Emotional Functioning

Four studies directly examined quality of life issues related to health. For women undergoing radiotherapy, there were subjective experiences of problems with emotional functioning, fatigue, and reduced social participation. Depression and psychological distress were strongly related to lower quality of life scores. Emotional well-being stood out as a domain seriously impacted for women with cervical cancer.

Mental Health Services and Support

There has been a pervasive absence of organized mental health/psychosocial support services integrated into cervical cancer programs. Even among the settings that support a range of oncology services, the provision of psychosocial support sometimes was unorganized, irregular, or absent. Several multi-country reviews, qualitative research, and a qualitative examination have identified

1 unmet psychosocial needs. There has also been a pervasive absence of mental
2 health screening.
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4 *Evidence Gaps*
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6 Although the prevalence of mental health issues is a significant problem,
7 few studies have measured anxiety. Additionally, no studies have explored
8 mental health intervention programs designed specifically for women with
9 cervical cancer. There is a need for longitudinal research that focuses on mental
10 health changes at various points along the continuum of cancer care.
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13 **Discussion**
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15 This scoping review brings together the current body of evidence of the
16 mental health issues affecting women with cervical cancer in Africa and shows
17 the significant level of mental health issues present. The evidence suggests that
18 depression, anxiety, mental distress, and poor quality of life impact women
19 significantly in Africa, but these issues are not being adequately addressed in
20 cancer care systems.
21
22 *High Burden of Depression and Anxiety*
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24 As found in the results of the present study, the common observed mental
25 health problem in the female cervical cancer patients was depression. The
26 prevalence of depression was found to range from 45% to 60%, which was
27 higher compared to the general female population in Africa, as the prevalence of
28 mental health problems, including depression, among the general female
29 population of Africa was 25% (Okello et al., 2018; Dagne et al., 2019). The study
30 found agreement with the previously conducted studies in the field of African
31 oncology, which stated that the prevalence of cancer was associated with higher
32 occurrences of depression and anxiety (Derbew et al., 2024).
33 Anxiety, although to a lower extent than distress, continued to be a critical
34 issue, especially regarding diagnoses and treatment uncertainty. The Moroccan
35 study that found a prevalence of anxiety of 38% corresponds to others carried
36 out in low- and middle-income countries, where the anxiety caused by having a
37 malign disease is related to death and to treatment and prognostic uncertainties
38 (Khalfi et al., 2025; Ginsburg et al., 2018). This lack of studies on anxiety might
39 be indicative of a gap in measurement and not a lack of importance.
40
41 *Psychological Distress, Stigma, and Sociocultural Context*
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43 Research on qualitative and mixed methods has found that living with
44 psychological distress is a common experience associated with fear, shock at the
45 time of diagnosis, emotional suffering, and withdrawal. This may be exacerbated
46 by stigma and sociocultural perceptions associated with cervical cancer and their

connections with sexuality, infertility, and conjugal instability (Maree & Wright, 2010; Ojo et al., 2020).

Distress associated with stigma has been found to result in delayed help-seeking, decreased social support, and worsening mental health symptomatology in women with cervical cancer in sub-Saharan Africa (Chidyaonga-Maseko et al., 2017; Mutambara et al., 2021). Thus, the results of the present review confirm the pressing need to view mental health results in the broader context of social and cultural milieus, rather than in isolation.

Quality of Life and Emotional Functioning

Poor quality of life, especially related to emotional and social functioning, has appeared as a significant result. Studies carried out among populations from Ethiopia and South Africa have shown a significant correlation between depressive symptoms and poor quality of life. These effects tend to be most significant among female patients with depressive symptoms undergoing radiotherapy (Mengistu et al., 2020; Lubuzo et al., 2021). Of course, it has already been established that left untreated, mental disturbances tend to increase symptoms and impede treatment among cancer patients (Ginsburg et al., 2018). Interestingly, emotional well-being has suffered the most among various quality-of-life indicators, suggesting that mental health programs could have a profoundly positive impact even under resource-constricted conditions.

Lack of Integrated Mental Health Services

Despite the established prevalence of mental health issues, the literature review has established the absence of organized mental health services in cervical cancer management. The psychosocial support that existed was unstructured and dependent on individual practitioners (Mwaka et al., 2019; Maree et al., 2025). This is similar to the current challenges in the integration of mental health at non-communicable diseases in Africa despite the WHO guidelines that champion a comprehensive and patient-centered approach to cancer management. The lack of intervention studies in the mental well-being of women with cervical cancer is an unexplored area with immense potential to be effective in-patient outcomes.

Practical Implications

Among the findings contained in this systematic review are the following directions that should receive a high level of priority. First, the screening for both depression and anxiety should therefore be included in the cervical cancer services using simple and valid tools. The second direction would involve the development of psychosocial programs using appropriate strategies for the cultures found in Africa. The final research direction would therefore involve the conduct of further studies using different methodologies.

Strengths and limitations

The scoping study presents a thorough mapping of the current state of the literature. Nevertheless, it is important to interpret the results in the context of a number of issues. Firstly, outcome measures varied between studies, the studies concentrated on hospital-based samples, and there was a restriction to studies published in English. Despite the above, the consistency and generalizability of the results strengthen the validity of the inferences.

Conclusion

This literature review reflects the large problem of mental morbidity in women suffering from cervical cancer in Africa, as a result of clinical, social, as well as structural issues. For the problem to be properly addressed, mental health support must be strategically incorporated into the cancer services they offer.

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