

Journal of Social Science and Human Research Studies

Volume : 02 Issue : 07 July-2026

Mental Health Status and Suicide Risk Among Youths in the Buea Municipality, Southwest Region, Cameroon

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Published Date: July 10, 2026

Article DOI: 10.65150/EP-jsshrs/V2E7/2026-17

ABSTRACT: Mental health problems and suicide risk among youths constitute a major global public health challenge, particularly in low- and middle-income countries where service availability remains limited. This study investigated the mental health status and suicide risk among youths in the Buea Municipality, Southwest Region of Cameroon, while also examining mental health practitioners' perspectives on youth suicide and associated risk factors in a conflict-affected setting. A sequential explanatory mixed-methods design was employed. Quantitative data were collected from 396 youths aged 13–30 years and 45 mental health practitioners using validated instruments including the Patient Health Questionnaire-9 (PHQ-9), Generalized Anxiety Disorder-7 (GAD-7), and the Beck Scale for Suicide Ideation (BSS), alongside structured questionnaires for practitioners. Data were analyzed using SPSS version 26 with descriptive statistics, Pearson correlation, and linear regression. Qualitative data from focus group discussions and practitioner interviews were analyzed thematically and integrated through triangulation. Findings revealed a relatively low overall suicide risk among youths ($M = 1.43$), although 19.7% reported previous suicidal ideation. Anxiety and depressive symptoms were prominent, with excessive worry ($M = 1.96$), irritability ($M = 1.78$), and depressive mood ($M = 1.65$) being most frequent. A significant positive association was found between mental health difficulties and suicide risk ($r = 0.265$, $p < 0.001$), with mental health status explaining 7% of variance in suicide risk ($R^2 = 0.07$). Mental health practitioners strongly affirmed that social determinants such as bullying, substance abuse, family dysfunction, and poverty are major drivers of youth suicide ($M = 4.40$), and reported an increasing trend in suicide attempts among youths ($M = 4.00$). Qualitative findings reinforced these results, highlighting academic stress, economic hardship, trauma exposure, and sociopolitical instability, while identifying family support, religion, and future aspirations as key protective factors. The study concludes that youth mental health in Buea is characterized by coexisting psychological distress and protective resilience. Integrated school- and community-based mental health interventions, strengthened psychosocial services, and culturally grounded suicide prevention strategies are urgently needed. The inclusion of practitioner perspectives provides critical contextual validation for intervention planning in resource-limited and conflict-affected settings.

KEYWORDS: Mental health, suicide risk, adolescents, anxiety, depression, mental health practitioners, Cameroon, mixed methods

INTRODUCTION

Mental health among young people has emerged as a major global public health concern, particularly in low- and middle-income countries where mental health services remain limited, underfunded, and unevenly distributed. The World Health Organization (WHO) estimates that one in seven adolescents globally experiences a mental health disorder, with depression, anxiety disorders, and behavioural disorders being the most prevalent conditions contributing significantly to disability and morbidity in this age group (WHO, 2021).

Suicide is recognized as one of the leading causes of death among individuals aged 15–29 years globally. The WHO further reports that more than 700,000 people die by suicide each year, and many more attempt suicide, with adolescents and young adults representing a highly vulnerable group (WHO, 2023). Suicide is a complex phenomenon influenced by psychological, biological, social, and environmental factors, with strong associations to depression, substance use, trauma exposure, and psychosocial stressors (WHO, 2021; Turecki & Brent, 2016).

In Sub-Saharan Africa, the burden of mental health disorders among young people is intensified by poverty, unemployment, weak health systems, stigma, and limited access to mental health care services. Studies consistently show a significant treatment gap, with more than 75% of individuals with mental disorders in low-income countries receiving no formal treatment (Patel et al., 2018). This gap is particularly concerning among youths, who often rely on maladaptive coping strategies such as substance use, aggression, or social withdrawal, increasing their vulnerability to suicidal ideation and attempts.

In Cameroon, mental health remains an under-resourced area of public health despite growing evidence of psychological distress among adolescents and young adults. Research indicates that common mental disorders, including depression and anxiety, are present in significant proportions within the population, yet mental health services remain limited and largely centralized in urban areas (Ngwa et al., 2024).

Additionally, suicide-related behaviors have been documented among adolescents and young adults in different regions of the country, highlighting a growing but under-researched public health concern (Eyoum et al., 2023).

The Southwest Region of Cameroon, particularly Buea Municipality, presents a unique and complex context due to prolonged sociopolitical instability. The ongoing crisis has resulted in displacement, exposure to violence, loss of livelihoods, disruption of education, and breakdown of community structures. These conditions are strongly associated with psychological trauma, post-traumatic stress symptoms, depression, and increased suicide risk among youths (UNICEF, 2022; WHO, 2021). Urban influx of internally displaced persons into Buea has further intensified economic pressure, overcrowding, and competition for limited resources, contributing to psychosocial stress among young people. Buea Municipality, a major academic and administrative hub, hosts a large population of secondary school and university students. This population is exposed to multiple risk factors for poor mental health, including academic stress, financial hardship, substance use, relationship difficulties, and limited access to counselling and mental health services. Furthermore, stigma surrounding mental illness continues to discourage help-seeking behaviour, leading many young people to suffer in silence until crises emerge (WHO, 2021).

Despite increasing recognition of youth mental health challenges, there remains a significant gap in localized empirical evidence on the prevalence, determinants, and contextual drivers of suicide risk among youths in Buea Municipality. Existing studies in Cameroon have focused on general mental health trends or specific populations, with limited integration of conflict-related stressors, trauma exposure, and social determinants of mental health. This lack of context-specific data limits the development of targeted, evidence-based interventions for suicide prevention and youth mental health promotion.

Understanding mental health status and suicide risk among youths in Buea Municipality is therefore essential for informing public health interventions, school-based mental health programs, and community psychosocial support systems. Evidence from such research can guide the development of culturally appropriate prevention strategies and strengthen mental health service delivery in conflict-affected and resource-constrained settings.

Statement of the Problem

Mental health disorders among young people constitute a growing global public health concern, with suicide now recognized as one of the leading causes of death among individuals aged 15–29 years (World Health Organization, 2021). Despite increased global attention to mental health promotion and suicide prevention, adolescents and young adults continue to experience escalating levels of psychological distress, particularly in low- and middle-income countries where mental health systems remain underdeveloped, under-resourced, and unevenly distributed.

In Sub-Saharan Africa, the burden of youth mental health challenges is intensified by pervasive socioeconomic hardship, unemployment, weak health systems, armed conflict, displacement, and persistent stigma surrounding mental illness. These structural and social determinants contribute to a significant mental health treatment gap, with the majority of affected young people lacking access to timely, affordable, and appropriate psychosocial support. As a result, many resort to maladaptive coping strategies such as substance use, social withdrawal, self-harm behaviours, and aggression, thereby increasing their vulnerability to suicidal ideation, suicide attempts, and completed suicide.

In Cameroon, although mental health disorders among adolescents and young adults are increasingly recognized, they remain significantly under-diagnosed, under-reported, and insufficiently addressed within the national health system. The country continues to face a critical shortage of mental health professionals, limited integration of mental health services into primary healthcare, and low mental health literacy among the population. These challenges are further compounded by cultural beliefs, stigma, and delayed help-seeking behaviours, which collectively contribute to untreated psychological distress and increased suicide risk among young people.

The Southwest Region of Cameroon, particularly Buea Municipality, presents a highly vulnerable context due to prolonged sociopolitical instability that has disrupted education, livelihoods, social cohesion, and community safety. Many youths in this setting have been directly or indirectly exposed to violence, displacement, bereavement, family separation, and destruction of property. These adverse experiences have contributed to elevated levels of trauma, depression, anxiety, hopelessness, emotional dysregulation, and behavioural disturbances, all of which are well-established risk factors for suicidal behaviour.

Buea Municipality, a major academic hub hosting a large population of secondary school and university students, is further characterized by multiple compounding stressors, including academic pressure, financial hardship, unemployment, overcrowding due to internal displacement, peer pressure, substance use, and limited access to counselling and mental health services. The cumulative effect of these stressors, in the context of weakened social support systems and ongoing insecurity, places youths at heightened risk of mental health deterioration and suicidal behaviour.

Despite the increasing burden of mental health challenges and suicide risk in this population, there is a critical lack of empirical, context-specific data on the mental health status and determinants of suicide risk among youths in Buea Municipality. Existing studies in Cameroon have largely focused on generalized mental health conditions or isolated demographic groups, with limited attention to the intersection of conflict-related stressors, displacement, and urban youth vulnerability. This paucity of localized evidence constitutes a major barrier to the development of targeted, culturally appropriate, and evidence-based suicide prevention strategies. Without robust empirical data, policymakers, educators, and mental health practitioners are unable to design effective interventions that reflect the lived realities and psychosocial needs of youths in conflict-affected settings such as Buea.

Therefore, this study is necessary to examine the mental health status and suicide risk among youths in Buea Municipality, Southwest Region of Cameroon. The findings are expected to generate context-specific evidence that will inform mental health policy, strengthen youth-focused psychosocial interventions, and contribute to the development of effective, culturally responsive suicide prevention strategies in resource-limited and conflict-affected environments.

THEORETICAL REVIEW

The present study is grounded in an integrative theoretical framework drawing primarily on the Stress–Diathesis Model of suicidal behaviour, the Interpersonal Theory of Suicide, and the Ecological Systems Theory, supported by recent advances in suicide research. Contemporary formulations

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of the Stress–Diathesis Model emphasize that suicidal behaviour emerges from the interaction between pre-existing vulnerability factors such as genetic predisposition, neurobiological sensitivity, psychiatric disorders (notably depression, anxiety, and PTSD), and emotion dysregulation—and exposure to acute and chronic stressors such as trauma, socioeconomic deprivation, conflict, and displacement (Franklin et al., 2022; O’Connor & Kirtley, 2018; Turecki et al., 2019). In conflict-affected settings such as Buea Municipality, these stressors are intensified by prolonged sociopolitical instability, disrupted education, poverty, and weakened family systems, thereby increasing psychological vulnerability among youths. The Interpersonal Theory of Suicide further explains suicidal ideation as resulting from the co-occurrence of thwarted belongingness and perceived burdensomeness, while progression to suicidal behaviour is associated with an acquired capability for self-harm through repeated exposure to fear, pain, or trauma (Chu et al., 2023; Ribeiro et al., 2021). In this context, social fragmentation, displacement, stigma, and weakened community cohesion may intensify feelings of isolation and burdensomeness among youths, thereby increasing suicide risk.

Additionally, Bronfenbrenner’s Ecological Systems Theory provides a comprehensive multi-level framework for understanding mental health outcomes by situating the individual within interacting environmental systems (Bronfenbrenner, 1979; Swearer & Hymel, 2020). At the microsystem level, family dysfunction, peer relationships, and school pressures directly influence youth psychological well-being, while mesosystem interactions determine how these environments reinforce or buffer distress. At the exosystem and macrosystem levels, structural determinants such as unemployment, limited access to mental health services, cultural stigma, and the ongoing sociopolitical crisis in Cameroon significantly shape mental health outcomes. The chronosystem highlights the cumulative impact of prolonged exposure to insecurity, displacement, and instability over time. Integrating these theoretical perspectives, suicidal risk among youths in Buea Municipality is best understood as a multidimensional phenomenon arising from the interaction of psychological vulnerability, interpersonal disconnection, and adverse socio-environmental conditions. This integrated framework aligns with contemporary suicide research, which emphasizes multi-level, context-sensitive, and trauma-informed explanations of youth mental health outcomes, particularly in low- and middle-income and conflict-affected settings (WHO, 2023; Franklin et al., 2022).

METHODOLOGY

Research Design

This study adopted a Sequential Explanatory Mixed-Methods research design, integrating both quantitative and qualitative approaches in two distinct phases to particularly explore the holistic and complex social and psychological perspectives on sensitive and multifaceted issues of suicide prevention (Creswell and Clark 2018). A cross-sectional survey constituted phase followed a qualitative descriptive semi-structured interviews and focus group discussions. The quantitative findings inform purposeful sampling for the qualitative inquiry, ensuring that participants provide rich and relevant narratives that help explain and expand upon the numeric results. The triangulation of data from multiple methods enhances the validity, depth, and comprehensiveness of the study’s conclusions.

Population of the Study

All youths aged 15 to 30 years residing within the Buea Municipality in the Southwest Region of Cameroon. Buea is the regional capital and a socioeconomically dynamic urban area, hosting a variety of educational institutions, including the University of Buea, and diverse communities experiencing rapid urbanization and sociocultural shifts. According to the Cameroon National Institute of Statistics (2023) and World Bank urban demographic data: Buea’s total population is estimated at approximately 800,000 people. National urban demographic patterns indicate that youths aged 15-30 comprise roughly 30% of the population. Applying this proportion, the youth population in Buea is approximately 240,000 individuals. This demographic is characterized by diverse educational attainment, economic activities, and varying degrees of exposure to mental health challenges and support services. Enrollment figures are based on the most recent accessible educational statistics and official school lists for the Southwest Region

Table 1: Population Statistics of Secondary and High Schools in Buea

Category	S/N	School	Total Population
Public – General Education	1	Bilingual Grammar School (BGS), Molyko, Buea	5467
	2	Government High School (GHS), Bokwango, Buea	2049
	3	Government High School (GHS), Bonjongo, Buea	385
	4	Government Bilingual High School (GBHS), Muea, Buea	1903
	5	Government High School (GHS), Buea Rural, Bokova, Buea	1086
	6	Government High School (GHS), Buea Town	1569
	7	Government High School (GHS), Bolifamba, Mile 16, Buea	633
	8	Government High School (GHS), Bomaka, Buea	620
	9	Government Secondary School (GSS), Great Soppo, Buea	735
	10	Government Secondary School (GSS), Bwiyuku	400
	11	Government Secondary School (GSS), Dibanda	50
Public – Technical Education	12	Government Technical High School (GTHS), Molyko, Buea	1314
	13	Government Technical School (GTS), Buea	126
	14	Government Technical College (GTC), Bova, Buea	126
	15	Government Technical College (GTC), Lysoka, Buea	41
Sub-total (Public Schools)	-	-	16,504
Denominational / Confessional Schools	16	Baptist High School (BHS), Buea	890

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	17	Saint Joseph's College (SJC), Sasse, Buea	947
	18	Bishop Rogan College, Small Soppo, Buea	431
	19	Our Lady of Mount Carmel College, Muea, Buea	43
	20	Presbyterian Comprehensive Secondary School (PCSS), Buea	1097
	21	St Paul's College, Bonjongo, Buea	378
	22	CUIB Buea	83
	23	Baptist Comprehensive Girls School, Great Soppo, Buea	322
	24	Bishop Jules Peters Memorial High School, Bokwango, Buea	200
Lay Private Schools	25	Inter' Comprehensive High School, Great Soppo, Buea	726
	26	Salvation Bilingual High School, Buea	397
	27	Marthlo Comprehensive Bilingual College, Buea	360
	28	Summerset Secondary School, Buea	1565
	29	Frankfils Comprehensive Secondary School, Buea	399
	30	Baird Memorial Secondary School, Buea	196
	31	St. Theresia International Secondary School, Buea	324
	32	Nabesk Comprehensive High School, Bonduma, Buea	242
	33	Palm Bilingual High School, Bonduma, Buea	114
	34	Lyokiki Secondary School	66
	35	Remedial Comprehensive High College	95
	36	Tonnic Comprehensive High School	65
	37	Champion Comprehensive College	96
	38	Saint Bernard High School	63
Sub-total (Lay Private Schools)	-	-	12,993

Source: Delegation of Secondary Education, South Region (2025/2026 Academic Year)

Target Population

The target population comprised 400 youths aged 15–30 years residing in Buea Municipality, representing adolescents and young adults who are at heightened risk of suicide due to academic pressures, social challenges, and developmental transitions. (Table 2 shows target population and sample distribution in selected schools/Institutions in Buea).

Table 2: Target Population and Sample Distribution in Selected Schools/Institutions in Buea

S/N	School/Institution	Total School Population	Sample Used in Study (Youths)
1	Borstal Institute, Wokeke	250	30
2	BCHS Great Soppo	735	40
3	PCSS Buea Town	1,097	45
4	GHS Buea Town	1,569	50
5	St. Therese International Comprehensive College, Molyko	324	30
6	GTC Bwiteva, Buea	126	20
7	Subitech Buea	300	25
8	Salvation Bilingual Grammar School, Buea	397	30
9	GHS Bokova	1,086	40
10	GHS Bukwango	2,049	46
11	Bilingual Grammar School, Molyko	5,467	50
12	Summerset Bilingual High School, Buea	1,565	30
Total	-	14,905	396
Category		Population Type	Number of Participants
Youth Participants		Students from selected schools	396
Mental Health practitioners		Mental Health practitioners from the schools	45
Total Target Population		Youths	396

The accessible population included 396 youths (13-30 years) and 45 Mental Health practitioners, representing those available, willing, and able to participate in schools. This population mirrors the target group in terms of age, gender, and education. The high accessibility enabled robust collection of both quantitative and qualitative data, with response rates as follows:

Youths: $396/400 = 99\%$ response rate

Mental Health practitioners: $45/50 = 99\%$ response rate

Missing values were minimal (<5% for most variables) and were addressed using mean imputation for continuous variables and mode imputation for categorical variables, ensuring data completeness without compromising analysis integrity.

Sampling Techniques

A purposive and convenient sampling technique was used to recruit youth participants willing and able to complete questionnaires. Although convenience sampling limits external validity, it is pragmatic given the sensitivity of suicide topics and challenges in reaching the population. Purposive sampling identified a subset of participants from the quantitative phase exhibiting diverse experiences to participate in interviews and focus groups for the youths as well. To maximize participant reach, snowball sampling was used to complement purposive sampling, whereby initial participants referred peers who met inclusion criteria. Snowballing is particularly effective in accessing populations dealing with stigmatized issues like suicide

Instrumentation

Quantitative Instruments:

A structured composite questionnaire was used as the primary quantitative instrument. It consisted of several sections designed to capture a wide range of relevant information. The Demographic Section collected data on participants' age, gender, education, occupation, and socioeconomic status. The Beck Scale for Suicide Ideation (BSS), an adapted and validated tool, was included to measure the severity of suicidal thoughts among participants. The Patient Health Questionnaire-9 (PHQ-9) was utilized to assess the severity of depressive symptoms, while the Generalized Anxiety Disorder-7 (GAD-7) scale measured anxiety symptomatology. The questionnaire was pilot-tested to ensure clarity, cultural appropriateness, and psychometric reliability.

Qualitative Instruments:

The qualitative component included Focus Group Discussions Guide which facilitated an in-depth exploration of participants' personal experiences, perceptions and the social and cultural contexts influencing their engagement.

Data collection procedure:

For the quantitative data collection, the researcher and trained research assistants administered the structured questionnaires to participants in various educational institutions across the Buea Municipality. Respondents were briefed on the study's objectives, confidentiality assurances, and voluntary participation. Emphasis was placed on anonymity to promote honest and unbiased responses, especially considering the sensitive nature of mental health and suicide-related questions. Following the quantitative phase, qualitative data collection was conducted to gain deeper insights into participants' lived experiences and perceptions. A purposive sample of participants was invited to engage in focus group discussions (5) in neutral, private settings to ensure comfort and openness. Each session was conducted in English or Pidgin English, depending on participants' preferences, and was audio-recorded with informed consent. The recordings were later transcribed verbatim for analysis

Data Analysis

Data analysis was conducted using both quantitative and qualitative approaches to ensure a comprehensive understanding of mental health status and suicide risk among youths in the Buea Municipality, Southwest Region, Cameroon. For the quantitative analysis, data were entered, cleaned, and analyzed using SPSS version 26. Descriptive statistics such as means, standard deviations, and frequencies were used to summarize participants' demographic characteristics, mental health profiles, and suicide risk levels.

Inferential statistics were employed to examine the relationship between mental health status and suicide risk. Pearson product-moment correlation was used to determine the strength and direction of the relationship between mental health status (PHQ-9 and GAD-7 scores) and suicide risk (Beck Suicide Ideation Scale scores). The results showed a statistically significant positive association between mental health difficulties and suicide risk, indicating that higher levels of anxiety and depressive symptoms were associated with increased suicide risk among youths in the study area.

A simple linear regression analysis was further conducted to determine the predictive effect of mental health status on suicide risk. The results revealed that mental health status significantly predicted suicide risk, although it accounted for a modest proportion of the variance, consistent with contemporary evidence that suicidal behaviour is multifactorial and influenced by multiple interacting psychological, social, and environmental factors (Turecki et al., 2019; Franklin et al., 2017).

For the qualitative analysis, thematic content analysis was conducted on transcripts from focus group discussions. Data were coded inductively to identify key themes and subthemes relating to mental health experiences, perceived causes of psychological distress, protective factors, and coping strategies among youths. Themes that emerged included academic stress, family support, anxiety related to future uncertainty, and the protective role of religion and social connectedness.

Data triangulation was then used to integrate quantitative and qualitative findings, providing a comprehensive understanding of mental health status and suicide risk among youths. This approach enriched interpretation by combining statistical results with participants' lived experiences, ensuring that conclusions were both empirically grounded and contextually meaningful within the Buea Municipality setting.

Findings

This chapter presents data collected from 396 youths in Buea Subdivision and 45 mental Health practitioners. The focus was to answer questions on the mental health status and suicide risk among youths in the Buea Municipality, Southwest Region, Cameroon. The findings are presented first on the demographic profile of research participants namely youths and Mental Health practitioners. The second part of this chapter entails presentation of findings related to the research objective, question and hypothesis. In each case descriptive statistics are presented followed by inferential statistics. The descriptive statistics encompassed count (frequency), percentage, mean, standard deviation and variance. The inferential statistics consisted of Pearson Moment Correlation Coefficient (r) and one sample Z-test.

Table 3: Demographic Profile of Youths

Variable	Category	Count	Percent
Age	13-17	332	83.8
	18-24	47	11.9
	<=12	12	3.0
	25-29	4	1.0
	30-39	1	0.3
Gender	Female	221	55.8
	Male	175	44.2
Educational Level	Secondary	254	79.4
	Tertiary	18	4.5
	Vocational Technical	9	2.3
	No formal Education	6	1.5
	University	100	20.3
	Primary	4	1.0
Occupation	Student	370	93.4
	Employed	17	4.3
	Self Employed	6	1.5
	Unemployed	3	0.8
Socio Economic Status	Low income	175	44.2
	Middle Income	162	40.9
	High	59	14.9
Marital Status	Single	332	83.8
	In a relationship	37	9.3
	Married	22	5.6
	Divorced/Separated	3	0.8
	Widowed	2	0.5
Religious Affiliation	Christian	373	94.2
	Muslim	15	3.8
	Traditionalists	6	1.5
	Others	2	0.5
Living Arrangement	With parents	319	80.6
	With guardians	52	13.1
	Alone	13	3.3
	With friends	6	1.5
	Others	6	1.5
History of Mental Health Support	No	266	67.2
	Yes	129	32.6
	Missing	1	0.3
	Mother	2	0.5
	Yes	2	0.5
	Gastric	1	0.3
	problem with the eyes	1	0.3
	Mom	1	0.3
	ANGER	1	0.3
	leg health	1	0.3
	Therapist	1	0.3
	therapy [counselling]	1	0.3
Previous Suicide Ideation	No	283	71.5
	Yes	78	19.7
	Missing or No Response	35	8.8

The demographic profile of the surveyed youths presents a rich information regarding their age, gender, education, occupation, socio-economic status, marital status, religious affiliation, living arrangements, history of mental health support, and previous experiences with suicidal ideation. The majority of the respondents fall within the 13-17 age range, accounting for 83.8% of the total participants. This indicates that the survey predominantly captures the perspectives of adolescents. A smaller proportion, 11.9%, are aged 18-24, and a minimal representation is observed in

older age categories, with 3.0% aged ≤ 12 , 1.0% in the 25-29 bracket, and just 0.3% aged 30-39. This skew towards younger ages suggests that the findings may reflect the concerns and experiences of adolescents more than those of older youths.

In terms of gender, there is a notable predominance of females, who make up 55.8% of the sample, compared to 44.2% of males. This slight female majority may influence the perspectives shared in the survey, particularly concerning issues like mental health and social dynamics. The educational levels of the youths are primarily concentrated in secondary education, with 79.4% reporting this as their highest level of education. A small fraction, 4.5%, have attained tertiary education, while even fewer have pursued vocational training (2.3%) or have no formal education (1.5%). The presence of 20.3% at the university level. Occupationally, the overwhelming majority are students, representing 93.4% of the sample. A small number are employed (4.3%), self-employed (1.5%), or unemployed (0.8%).

This highlights the youth demographic focus on education rather than full-time employment, which is typically expected at these ages. The socio-economic status of the youths reveals a mixed picture, with 44.2% identifying as low income and 40.9% as middle income. Only 14.9% are classified as high income. This distribution indicates that a significant portion of these youths may face economic challenges that could affect their education and mental health. Most respondents are single (83.8%), with a smaller group in relationships (9.3%), married (5.6%), and a tiny fraction either divorced/separated (0.8%) or widowed (0.5%). This reflects the youth status of the population, where romantic and marital commitments are less common. Religiously, a vast majority identify as Christian (94.2%), with a small presence of Muslims (3.8%) and traditionalists (1.5%). This predominance of Christianity may shape community values and influences on mental health and social behavior.

In terms of living arrangements, 80.6% reside with parents, while 13.1% live with guardians. A minimal number live alone (3.3%) or with friends (1.5%). This indicates a strong familial support structure among the youths, which may contribute positively to their mental and emotional well-being. When considering mental health support, 67.2% of respondents report having no history of mental health support, while 32.6% indicate that they have received some form of assistance. The presence of various missing or unclear responses suggests some complexity in understanding their mental health experiences. The table reveals that 71.5% of the youths have never experienced suicidal ideation, while 19.7% have reported such thoughts, and 8.8% provided missing or non-responsive data. This statistic is crucial in understanding the mental health landscape among these youths and may indicate areas for intervention and support.

What is the mental health status and suicide risk among youths in the Buea Municipality, Southwest Region, Cameroon?

This section presents findings on suicide status and suicide risk amongst youths in Buea municipality. The results presented here are directly aligned with the research objective and question. Additionally, the analysis of the hypothesis is included, shedding light on the relationships and patterns identified in the collected data. Data on assessing suicide prevalence and risk factors were also collected from mental health practitioners and presented as follows.

Table 4: Mental Health Practitioners' Assessment of Suicide Prevalence and Risk Factors

Items	Mean	Variance	Std Dev
Social factors (bullying, substance abuse, family issues, poverty) contribute to youth suicide	4.4	0.26	0.51
Suicide attempts among youths have increased in recent years	4.0	0.57	0.76
Mental health disorders are the main cause of youth suicide	3.93	0.92	0.96
Cultural or religious beliefs influence suicidal behavior	3.93	0.35	0.59
Suicide is a common problem among youths in Buea	3.4	0.97	0.99
Overall	3.93	0.26	0.51

Based on practitioners' ratings on a 1 to 5 scale (1 strongly disagree to 5 strongly agree). The highest agreement was observed for Social factors (bullying, substance abuse, family issues, poverty) contribute to youth suicide, indicating stronger perceived prevalence or risk on that aspect among youths. The lowest agreement was for suicide is a common problem among youths in Buea. On average, the overall composite fell at 3.93 with variability reflected by a standard deviation of 0.51 across respondents.

Table 5: Suicide Status of Youths in Buea Municipality Measured with adapted Beck Scale

Items	Mean	Variance	Std Dev
Reasons for living outweighs reasons for dying	1.84	1.47	1.21
Control over suicidal thoughts	1.59	1.0	1.0
Suicidal thoughts	1.45	0.73	0.85
Wish to die	1.34	0.57	0.75
Specific plans for suicide	1.32	0.56	0.75
Suicide attempt history	1.29	0.38	0.61
Wish to live	1.21	0.4	0.63
Overall (composite)	1.43	nan	nan

The overall mean and individual item has mean value between 0-4. By Beck Scale suicide risk amongst youths in Buea is minimal. But there is no item with zero. Reasons for living outweigh reasons for dying (highest mean). A higher average here suggests most youths indicate more reasons to live than to die. Interpreted alongside other items, this is a protective factor that appears relatively strong. The mean leans toward greater control (closer to the high end of the control scale), implying many youths report at least some ability to manage or restrain suicidal ideation. Variability

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is moderate, meaning experiences differ across respondents. The mean sits closer to the low end of the frequency/intensity spectrum, indicating ideation is generally reported as infrequent or weak among the group overall, though not absent (non-zero variance and a non-minimum mean). Both means are closer to the lower end, suggesting relatively weak or infrequent endorsement and low specificity of planning at the aggregate level. The standard deviations indicate some dispersion, so there are subgroups with elevated responses, but the central tendency is low. Suicide attempt history is average to low, which aligns with attempts being rare events across the sample, though again not universally zero.

On this adapted Beck's scale, lower means here can reflect how the item is scaled in the dataset; in context with "reasons for living" being highest, the overall picture still supports stronger protective attitudes than risk-leaning ones. The joint pattern suggests youths generally report reasons to live and control over thoughts outweighing wish-to-die, plans, or attempts.

The composite mean is low-to-moderate and considering the directionality of the items, indicates that the overall profile of youths in Buea are characterized by the followings:

- Predominantly protective orientation (reasons for living, some control over ideation).
- Generally low endorsement of acute risk markers (wish to die, specific plans, attempt history).
- Non-zero ideation present in parts of the sample, warranting continued prevention and early intervention, particularly for subgroups showing higher responses on ideation and plan specificity.

Table 6: Suicide Risk Amongst Youths in Buea Municipality Measured by Adapted Patient Health Questionnaire PHQ-9

Items	Mean	Variance	Std Dev
Trouble Concentrating	1.67	0.54	0.73
Little interest or pleasure in doing things	1.65	0.51	0.72
Feeling down, depressed or hopeless	1.65	0.5	0.71
Feeling tired or having little energy	1.65	0.54	0.73
Trouble Sleeping or sleeping too much	1.6	0.52	0.72
Moving/speaking/ slowly or being restless	1.6	0.6	0.77
Poor appetite or overeating	1.5	0.52	0.72
Feeling bad about yourself or like a failure	1.5	0.47	0.69
Thoughts of self-harm or suicide	1.35	0.43	0.66
Overall (PHQ-9 Var51–Var59 composite)	1.62	nan	Nan

Reading table 6, from highest mean (more frequent symptoms on average) to lower; the following finding related to suicide risk amongst youths in Buea are recorded.

- Trouble concentrating; little interest/pleasure (anhedonia); Feeling down/depressed/hopeless; Feeling tired/low energy; Sleep disturbance are at the top. Means around ~1.6–1.7. This indicates that, on average, youths experienced these symptoms several days to approaching more than half the days. These domains appear to be the most commonly endorsed.
- Items with lower means (shown further down in the full table) suggest relatively less frequent endorsement compared to concentration, anhedonia, mood, energy, and sleep. Still, non-trivial variance and standard deviations show meaningful spread—some youths report higher frequencies.

Overall, the PHQ-9 profile indicates:

- A noticeable burden of depressive symptoms, particularly cognitive/energy domains (concentration, fatigue), core mood/anhedonia, and sleep.
- Dispersion suggests subgroups with elevated symptom frequency.

Table 7: General Anxiety Disorder amongst Youths in Buea: Descriptive Statistics

Item	Mean	Variance	Std Dev
Worrying too much about different things	1.96	0.6	0.77
Becoming easily annoyed/irritable	1.78	0.62	0.79
Feeling afraid something awful might happen	1.76	0.65	0.8
Not being able to stop/control worrying	1.75	0.61	0.78
Trouble relaxing	1.66	0.64	0.8
Restlessness (hard to sit still)	1.62	0.64	0.8
Feeling anxious or on edge	1.61	0.56	0.75
Overall (GAD composite)	1.78	nan	nan

Reading table 7, from highest mean (more frequent symptoms) to lower we arrived at the following anxiety disorders amongst youths in Buea Municipality.

- Worrying too much about different things has the highest mean, followed by irritability, fear that something awful might happen, and difficulty stopping or controlling worry. These averages sit between several days and more than half the days, indicating worry and hyperarousal symptoms are commonly experienced.
- Trouble relaxing, restlessness, and feeling anxious/on edge follow closely.
- The overall (composite) mean is elevated relative to the midpoints of the scale, suggesting a meaningful burden of anxiety symptoms across the sample of youths.
- Variances and standard deviations are moderate, implying heterogeneity: while many youths report frequent worry/irritability, others report lower symptom frequency.

Overall, the GAD-7 profile indicates the following:

- Prominent generalized worry and physiological arousal (irritability, restlessness, on-edge, fear of catastrophe).
- Consistent, non-trivial symptom frequency at the population level, pointing to a need for screening, psychoeducation, and accessible anxiety management interventions (e.g., CBT-based skills, relaxation training, and stress management) in youth settings.

Table 8: Combined PHQ-9 and GAD-7

Items	Mean	Variance	Std Dev
Worrying too much about different things	1.96	0.6	0.77
Becoming easily annoyed/irritable	1.78	0.62	0.79
Feeling afraid something awful might happen	1.76	0.65	0.8
Not being able to stop/control worrying	1.75	0.61	0.78
Trouble Concentrating	1.67	0.54	0.73
Trouble relaxing	1.66	0.64	0.8
Little interest or pleasure in doing things	1.65	0.51	0.72
Feeling down, depressed or hopeless	1.65	0.5	0.71
Feeling tired or having little energy	1.65	0.54	0.73
Restlessness (hard to sit still)	1.62	0.64	0.8
Feeling anxious or on edge	1.61	0.56	0.75
Trouble Sleeping or sleeping too much	1.6	0.52	0.72
Moving/speaking/ slowly or being restless	1.6	0.6	0.77
Poor appetite or overeating	1.5	0.52	0.72
Feeling bad about yourself or like a failure	1.5	0.47	0.69
Thoughts of self-harm or suicide	1.35	0.43	0.66
Overall (PHQ-9 + GAD-7 composite)	1.69	0.2	0.45

The Table reveals that anxiety-related items dominate the top of the combined list. Worrying too much, irritability, fear something awful might happen, and difficulty controlling worry have the highest means. On average, these are experienced between several days and more than half the days. Depressive cognitive/energy symptoms (trouble concentrating, low interest/pleasure, feeling down, fatigue, sleep disturbance) also rank high, suggesting meaningful overlap between anxiety and depression domains. The overall (PHQ-9 + GAD-7) indicates a non-trivial symptom burden amongst the youths, with moderate dispersion. This means many youths report frequent worry and arousal symptoms and a sizable portion also endorse core depressive experiences.

Verification/Testing of Hypothesis

Ho2: There is no significant association between mental health status and suicide risk among youths in the Buea Municipality Southwest Region, Cameroon.

Ha2: There is a significant association between mental health status and suicide risk among youths in the Buea Municipality Southwest Region, Cameroon.

- Mental health: average of PHQ-9 and GAD-7 on 0–3 scale.

- Suicide Risk: average of risk items on 1–4 scale.

Table 9: Statistical Test for Hypothesis

Test	Estimate
Pearson r	0.265
p-value	0.0
Regression slope (a)	0.257
Regression intercept (b)	1.0
R-squared	0.07
N	396

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The statistics presented in table 13 can be interpreted as follows.

- Pearson correlation r of 0.265 with $p = 0.0$ indicates a significant positive association between poorer mental health and higher suicide risk.
- Regression slope (a) of 0.257 means each 1-point increase on the mental health issue is associated with an average 0.257 increase on the suicide risk.
- R-squared of 0.07 shows the model explains about 7.0% of variance in suicide risk.

DISCUSSION OF FINDINGS

The present study sought to assess the mental health status and suicide risk among youths in Buea Municipality and determine the relationship between mental health status and suicide risk. The findings reveal a complex psychological profile characterized by relatively low overall suicide risk but substantial levels of anxiety symptoms, depressive symptoms, and suicidal ideation among a significant minority of participants. This pattern highlights the multifaceted nature of youth mental health and supports contemporary perspectives that suicidal behaviour exists along a continuum ranging from emotional distress and suicidal thoughts to suicide attempts and completed suicide (WHO, 2024; Turecki et al., 2019). Although the majority of respondents did not exhibit severe suicidal tendencies, the coexistence of anxiety, depression, and suicidal ideation indicates the presence of underlying psychological vulnerabilities that warrant attention.

The demographic profile of respondents provides important context for understanding these findings. Most participants were adolescents aged 13–17 years (83.8%), female (55.8%), students (93.4%), living with parents (80.6%), and identified as Christians (94.2%). Previous studies have consistently shown that family connectedness, school engagement, and religious participation serve as important protective factors against suicidal behaviour among adolescents (Lim et al., 2019; WHO, 2024). Developmental psychologists similarly identify adolescence as a period marked by rapid biological, psychological, social, and emotional transitions that increase vulnerability to mental health difficulties while simultaneously creating opportunities for resilience when adequate support systems exist (Patton et al., 2016). Participants generally explained that family relationships, educational aspirations, community belonging, and religious faith provide emotional support and reasons to persevere during periods of distress. These interpretations are consistent with Joiner's Interpersonal Theory of Suicide, which argues that belongingness and social connectedness reduce suicidal desire by fostering perceptions of support, acceptance, and social value. Consequently, the predominance of youths living with parents and maintaining strong religious affiliations may partly explain the relatively low suicide risk observed despite the presence of psychological distress (Joiner, 2005; Chu et al., 2017).

The findings from mental health practitioners revealed strong agreement that social factors such as bullying, substance abuse, family dysfunction, and poverty contribute significantly to youth suicide ($M = 4.40$). Practitioners also reported that suicide attempts among youths have increased in recent years ($M = 4.00$). These findings are consistent with growing evidence demonstrating that social determinants exert substantial influence on suicidal behaviour among young people. A systematic review by Hawton et al. (2012) and Miranda-Mendizabal et al. (2019) identified poverty, family conflict, substance misuse, and adverse childhood experiences as major predictors of suicidal ideation and suicide attempts among adolescents. Similarly, Quarshie et al. (2021) found that economic hardship and family instability significantly increased psychological distress and suicidal behaviour among African youths. Participants generally explained that financial difficulties, family expectations, interpersonal conflicts, and uncertainty regarding future opportunities often create feelings of frustration, helplessness, and emotional strain.

Within the context of Buea Municipality and the wider Southwest Region of Cameroon, these challenges may be compounded by economic insecurity, educational pressures, and the lingering psychosocial consequences of sociopolitical instability. These findings support Ecological Systems Theory, which emphasizes that mental health outcomes are shaped by interactions between individuals and their broader social environments. Consequently, youth suicide prevention efforts should extend beyond individual treatment approaches and incorporate strategies aimed at poverty reduction, family strengthening, anti-bullying interventions, and youth empowerment (Bronfenbrenner, 1979; Bronfenbrenner & Morris, 2006).

The adapted Beck Scale findings revealed an overall low suicide risk profile ($M = 1.43$), suggesting that most youths did not exhibit severe suicidal tendencies. Nevertheless, approximately 19.7% of respondents reported previous suicidal ideation. This prevalence is clinically significant and closely mirrors findings reported across Sub-Saharan Africa, where suicidal ideation rates among adolescents commonly range between 15% and 25% (Ayano et al., 2020; Quarshie et al., 2021). International evidence consistently identifies suicidal ideation as one of the strongest predictors of future suicide attempts and completed suicide (Franklin et al., 2017). The similarity between the current findings and broader African evidence suggests that suicidal thoughts among youths in Buea reflect a wider regional mental health challenge rather than an isolated local phenomenon.

An important protective finding emerging from the Beck Scale was that respondents reported stronger reasons for living than reasons for dying ($M = 1.84$), coupled with relatively higher levels of control over suicidal thoughts ($M = 1.59$). Participants generally explained that family support, religious beliefs, educational ambitions, personal goals, and hope for future success provide motivation to continue living despite emotional difficulties. These findings are consistent with previous research demonstrating that hope, resilience, family support, spirituality, and future orientation significantly reduce suicide risk among adolescents (Liu et al., 2022; WHO, 2024). The coexistence of suicidal ideation and strong protective factors suggests that many youths may experience psychological distress without progressing toward suicidal behaviour because protective resources buffer against risk. This finding supports cognitive theories of suicide, which propose that suicidal ideation often emerges when individuals perceive themselves as trapped within adverse circumstances and unable to identify effective coping strategies. The presence of protective factors may therefore interrupt progression along the suicidal pathway and prevent suicidal thoughts from developing into suicidal actions (Beck et al., 1979; O'Connor & Kirtley, 2018).

The PHQ-9 findings revealed considerable depressive symptomatology among participants. Trouble concentrating ($M = 1.67$), loss of interest or pleasure in activities ($M = 1.65$), depressed mood ($M = 1.65$), fatigue ($M = 1.65$), and sleep disturbances ($M = 1.60$) emerged as the most frequently reported symptoms. These findings are consistent with global estimates indicating that depressive symptoms affect approximately 15–20% of

adolescents worldwide (UNICEF, 2021). Similar findings have been reported among African youths, where concentration difficulties, anhedonia, fatigue, and sleep problems represent common manifestations of depression (Cortina et al., 2012).

Participants generally explained that academic pressures, examinations, educational progression, uncertainty regarding future employment, and socioeconomic challenges contribute substantially to emotional exhaustion and psychological distress. Given that more than 93% of respondents were students, the prominence of concentration difficulties may reflect the cumulative effects of academic stress and performance-related pressure. Similar observations have been reported by Musyimi et al. (2022), who found that educational stress, economic hardship, and uncertainty about future opportunities were strongly associated with depressive symptoms among youths in low-resource settings. These findings support developmental theories emphasizing adolescence as a period characterized by identity formation, role transitions, and increased performance expectations. The results therefore suggest that mental health interventions within schools should not only address emotional wellbeing but also incorporate academic stress management, resilience-building, and study-life balance programs (Erikson, 1968; Patton et al., 2016).

One of the most significant findings of this study was the predominance of anxiety-related symptoms. Excessive worrying about different things ($M = 1.96$), irritability ($M = 1.78$), fear that something awful might happen ($M = 1.76$), and inability to control worrying ($M = 1.75$) consistently recorded the highest mean scores across both the GAD-7 and combined mental health analyses. Similar findings have been reported globally, indicating that anxiety disorders are becoming increasingly prevalent among adolescents (Baxter et al., 2014). Comparable patterns have also been documented among African youths, where chronic uncertainty, insecurity, academic competition, and financial pressures contribute significantly to anxiety symptomatology (Ngasa et al., 2017).

Participants generally explained that concerns regarding academic success, financial security, family wellbeing, personal safety, and future opportunities contribute to persistent worry and emotional tension. The prominence of irritability, anticipatory fear, and difficulty controlling worry suggests that many youths experience a state of continuous psychological vigilance characterized by uncertainty regarding future outcomes. Interestingly, anxiety-related symptoms demonstrated higher mean scores than most depressive symptoms, suggesting that anxiety may represent the dominant manifestation of psychological distress among youths in Buea Municipality. This finding supports transdiagnostic models of psychopathology, which identify anxiety as a central mechanism underlying multiple forms of emotional distress and often preceding depressive symptoms and suicidal ideation (McLaughlin et al., 2012). Consequently, youth mental health interventions in Cameroon should not focus exclusively on depression but should equally prioritize anxiety screening, prevention, emotional regulation, stress management, and coping-skills development.

The combined PHQ-9 and GAD-7 analysis further demonstrated that anxiety symptoms dominated the overall mental health profile. Excessive worry, irritability, fear, and inability to control worrying occupied the highest ranks across all mental health indicators. The substantial overlap between anxiety and depressive symptoms supports evidence indicating high comorbidity between these conditions during adolescence. Collectively, participants described experiences characterized by persistent worry, emotional exhaustion, uncertainty about the future, difficulties concentrating, and reduced enjoyment of daily activities. These findings suggest that many youths may be functioning despite carrying considerable psychological burdens, highlighting the need for early intervention before distress progresses into more severe mental health disorders.

The most important finding of this study was the statistically significant positive relationship between mental health status and suicide risk ($r = .265$, $p < .001$). This finding confirms that worsening mental health is associated with increased suicide risk among youths in Buea Municipality. The result is consistent with extensive international evidence demonstrating that depression, anxiety, emotional dysregulation, hopelessness, and psychological distress are among the strongest predictors of suicidal thoughts and behaviours (Franklin et al., 2017; WHO, 2024; Turecki et al., 2019). Similar associations have been reported among adolescents across Africa, Europe, North America, and Asia, suggesting that the relationship between mental health difficulties and suicide risk remains robust across cultural contexts.

The regression analysis further demonstrated that mental health status significantly predicted suicide risk, with each one-point increase in mental health difficulties associated with a 0.257 increase in suicide risk. Participants generally explained that prolonged experiences of sadness, anxiety, stress, emotional exhaustion, and feelings of helplessness can gradually erode coping capacity and increase vulnerability to suicidal thoughts. Although mental health explained only 7% of the variance in suicide risk ($R^2 = .07$), this finding should not be interpreted as weak or unimportant. Suicide is widely recognized as a multidimensional phenomenon influenced by numerous interacting factors, including family relationships, social support, trauma exposure, substance use, poverty, bullying, cultural beliefs, and access to mental health services (Turecki et al., 2019). The modest explanatory power observed in the current study therefore reinforces contemporary theories emphasizing the multifactorial nature of suicidal behaviour rather than diminishing the importance of mental health as a risk factor (Turecki et al., 2019; O'Connor & Kirtley, 2018).

Collectively, the findings paint a nuanced picture of youth mental health in Buea Municipality. While many youths demonstrate resilience, strong reasons for living, social connectedness, and relatively low levels of acute suicide risk, substantial proportions simultaneously experience anxiety, depressive symptoms, and suicidal ideation. The coexistence of protective factors and psychological distress suggests that many young people are functioning despite significant emotional burdens. This pattern highlights the importance of early identification, preventive interventions, and continuous psychosocial support before distress progresses into more severe mental health conditions or suicidal behaviours. From a policy and practice perspective, the findings support the implementation of comprehensive school-based and community-based mental health programmes, youth counselling services, suicide prevention initiatives, psychosocial support systems, and interventions that strengthen family support, resilience, spirituality, emotional regulation, coping skills, and peer connectedness. Furthermore, the findings provide strong empirical justification for expressive therapy interventions, which may offer youths safe and culturally appropriate avenues for emotional expression, self-reflection, coping, and psychological healing. By addressing underlying anxiety, depression, and emotional distress, expressive therapy may play a critical role in reducing suicide vulnerability and promoting positive mental health outcomes among youths in Buea Municipality.

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