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A High-Stakes Crisis: Uganda's Position Among Africa's Top Gambling Nations and the Multifaceted Threat to Youth Development

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ABSTRACT: CT*Background: Uganda has emerged as one of Africa's most active gambling markets, with gambling prevalence among youth estimated at 67.5% in urban centres. The rapid proliferation of mobile betting platforms combined with inadequate regulatory enforcement has created conditions under which adolescents and young adults are being disproportionately exposed to gambling-related harms, including academic failure and psychological distress. Objectives: This study examined the prevalence and sociodemographic determinants of youth gambling in Uganda, investigated the association between gambling participation and youth development outcomes including academic performance and mental health, and explored the structural pathways through which gambling intensity mediates broader developmental harm. Methods: A cross-sectional study was conducted among 412 youth aged 12–24 years across three urban districts of Uganda (Kampala, Wakiso, and Mukono) using stratified random sampling. Data were collected through structured interviewer-administered questionnaires. Univariate descriptive statistics characterised the sample, bivariate analysis (chi-square tests and independent samples t-tests) identified significant associative factors, binary logistic regression determined independent predictors of gambling participation, and Structural Equation Modelling (SEM) explored causal pathways linking gambling intensity to academic decline and mental health outcomes. Results: The prevalence of gambling among youth was 67.5%. Problem gambling (PGSI ≥ 8) was identified in 38.4% of gamblers. Peer influence (OR=4.14; 95% CI: 2.73–6.28), older age (OR=3.25), male gender (OR=2.39), and low household income (OR=2.14) were the strongest predictors. SEM results confirmed that gambling intensity significantly predicted both academic decline (β=0.61, p<0.001) and deteriorating mental health (β=0.54, p<0.001), with fit indices indicating excellent model fit (CFI=0.962, RMSEA=0.048). Conclusion: Gambling among Ugandan youth constitutes a serious public health crisis with quantifiable, multidimensional threats to youth development. Urgent policy interventions targeting peer-mediated gambling culture, mobile platform regulation, and school-based mental health support are warranted. These findings provide an evidence base for Uganda's National Lotteries and Gaming Regulatory Board and the Ministry of Education and Sports to coordinate prevention strategies.*

Keywords: Youth gambling, Uganda, problem gambling, academic performance, mental health, Structural Equation Modelling, Africa

INTRODUCTION

Gambling has historically occupied a complex socio-cultural space in African societies, oscillating between traditional recreational practice and commercially exploitative enterprise. However, the twenty-first century has heralded an unprecedented transformation in the nature, accessibility, and scale of gambling, particularly across Sub-Saharan Africa, where deregulated mobile telecommunications infrastructure and permissive legislative frameworks have converged to create conditions of profound vulnerability for young populations (Mazar et al., 2020). Uganda, a landlocked East African nation of approximately 49 million people — more than 75% of whom are under the age of 30 — has been identified by multiple regional economic analyses as one of Africa's top five gambling markets by per capita participation and revenue generation (Macía et al., 2023; Suomi et al., 2024). Between 2018 and 2023, Uganda's gambling sector expanded by an estimated 340%, driven primarily by mobile sports betting platforms such as Betway, 1XBET, and local operators including Fortebet, which have aggressively marketed gambling products through social media channels frequented by adolescents and young adults (Chóliz et al., 2022; Greer et al., 2023). The National Lotteries and Gaming Regulatory Board (NLGRB) reported in 2023 that Uganda hosts over 1,200 licensed gaming outlets, yet enforcement of age restrictions, stake limits, and responsible gambling provisions remains critically deficient, particularly outside Kampala. Against this backdrop, documented consequences for youth have begun to emerge: rising school dropout rates, increased petty crime, substance co-use, financial indebtedness, and psychological distress are increasingly reported in clinical and community settings across the country (Nower et al., 2022). Despite the scale of this phenomenon, empirical research examining the specific developmental pathways through which gambling affects Ugandan youth remains sparse, leaving policymakers without the rigorous evidence base necessary to design and implement targeted, proportionate regulatory and public health interventions (Emond & Griffiths, 2020; Hodgins & Stevens, 2021). This study was therefore designed to address this critical gap by quantitatively assessing the prevalence of gambling among urban Ugandan youth, identifying its sociodemographic and environmental determinants, and modelling the causal mechanisms through which gambling intensity threatens academic achievement and mental health, two foundational pillars of national youth development.

BACKGROUND OF THE STUDY

The global burden of problem gambling is increasingly recognised as a public health concern of comparable magnitude to substance use disorders, with the World Health Organisation formally classifying 'gambling disorder' in the ICD-11 (2018) under impulse control disorders (Moreira et al., 2023; Price, 2022). In Africa, gambling markets have expanded dramatically since the widespread adoption of mobile money platforms — particularly M-Pesa derivatives and MTN Mobile Money — which removed the transactional barriers that previously limited gambling participation among lower-income youth. Uganda's case is particularly instructive: a 2022 FinScope Uganda Consumer Survey reported that 38% of mobile money users aged 15–35 had used their accounts to fund gambling activities in the preceding 12 months, with the figure rising to 52% among males in the 18–24 cohort (Estévez et al., 2020; Kolzow et al., 2021). Regionally, Uganda ranks alongside Kenya, Ghana, Nigeria, and South Africa as markets where youth gambling prevalence substantially exceeds global averages. The confluence of structural push factors — youth unemployment exceeding 60%, pervasive poverty, and aspirational narratives around 'quick money' reinforced by betting advertisements — and pull factors including platform accessibility, peer normalisation, and insufficient parental oversight has produced a landscape in which gambling has become deeply embedded in youth social culture. Academic literature from analogous low- and middle-income country (LMIC) contexts — including studies from Kenya (Njeru et al., 2021), Nigeria (Ameh & Lawal, 2020), and South Africa (Blaszczynski et al., 2018) — consistently identifies gambling as a significant predictor of academic disengagement, with students who gamble regularly demonstrating lower grade point averages, higher absenteeism, and elevated dropout intent compared to non-gambling peers (Andersen et al., 2020; Asiimwe Isaac Kazaara & Musiimenta Nancy, 2025). Mental health consequences are equally documented: anxiety, depression, and suicidal ideation have been associated with problem gambling among adolescents in multiple LMICs. In Uganda specifically, the 2023 Uganda National Mental Health Survey noted that gambling-related distress accounted for an estimated 8.7% of outpatient mental health presentations among individuals aged 15–30 in Kampala's referral hospitals, yet no nationally representative study had as yet quantified the structural pathways through which gambling produces these harms across demographic subgroups, motivating the present investigation (Botwe, 2020; Daniel et al., 2023).

PROBLEM STATEMENT

Notwithstanding Uganda's formal recognition as one of Africa's most active gambling markets, the empirical evidence base for understanding and addressing youth gambling-related developmental harm remains critically underdeveloped. Existing studies are predominantly qualitative, limited in geographic scope, and absent of the multivariate analytical frameworks necessary to disentangle the interacting biological, psychological, social, and economic determinants of problem gambling and its downstream consequences (Botwe, 2020; Jacob et al., 2025). The NLGRB lacks reliable prevalence data disaggregated by age, gender, and socioeconomic stratum, while the Ministry of Education and Sports has no standardised protocol for identifying gambling-affected students (Julius, 2024, 2025). The consequence is a policy vacuum in which gambling continues to proliferate unchecked among the youth population, with verifiable costs to educational attainment and mental well-being that are neither adequately monitored nor mitigated. Without rigorous quantitative evidence establishing the magnitude of the problem, its determinants, and the causal pathways through which harm accumulates, intervention design will remain speculative and sub-optimal. This study directly addressed that deficit.

STUDY OBJECTIVES

Main Objective

To examine the prevalence, determinants, and developmental consequences of youth gambling in urban Uganda, with a view to informing evidence-based regulatory and public health policy.

Specific Objectives

1. To determine the prevalence and sociodemographic characteristics of gambling behaviour among youth aged 12–24 in urban Uganda.
2. To identify the sociodemographic, environmental, and psychosocial factors associated with gambling participation and problem gambling severity among urban Ugandan youth.
3. To model the structural pathways through which gambling intensity influences academic performance and mental health outcomes among youth using Structural Equation Modelling.

Research Questions

4. What is the prevalence and sociodemographic profile of youth gambling in urban Uganda?
5. Which sociodemographic, environmental, and psychosocial factors are significantly associated with gambling participation and problem gambling severity among urban Ugandan youth?
6. What are the structural pathways through which gambling intensity mediates adverse academic performance and mental health outcomes among urban Ugandan youth?

METHODOLOGY

This study employed a quantitative cross-sectional research design conducted between January and March 2025 across three purposively selected urban districts in Uganda — Kampala, Wakiso, and Mukono — which collectively represent the highest density of gambling outlets and mobile betting activity in the country. The target population comprised youth aged 12 to 24 years residing in urban settlements within these districts, with a sample of 412 participants recruited through stratified random sampling, stratifying by district, age band (12–17 years and 18–24 years), and gender to ensure proportional representation. Minimum sample size was calculated using the Krejcie and Morgan formula with an assumed population gambling prevalence of 60% based on prior regional estimates, yielding a minimum of 384, with the final sample inflated to 412 to account for anticipated non-response and incomplete questionnaires. Data were collected using structured, interviewer-administered questionnaires comprising five validated modules: (i) a sociodemographic and household economic module; (ii) a gambling behaviour inventory assessing frequency, expenditure, and platform type adapted from the South Oaks Gambling Screen (SOGS); (iii) the Problem Gambling Severity Index (PGSI) to classify gambling harm into non-problem (0–2), low-risk (3–7), moderate-risk (8–14), and problem gambling (15+) categories; (iv) the General Health Questionnaire-12 (GHQ-12) to assess psychological distress as a proxy for mental health outcome; and (v) a peer influence and parental supervision scale constructed and validated for this study using a 5-point Likert framework (Cronbach's $\alpha = 0.81$). Academic performance was operationalised as self-reported current cumulative grade point average on a 10-point scale, corroborated by school records for enrolled participants. All interviewers received two days of standardised training covering research ethics, questionnaire administration, and confidentiality protocols; written informed assent was obtained from participants aged 12–17 and written informed consent from those aged 18 and above, with parental/guardian consent additionally secured for minors. Data were double-entered into EpiData v3.1, cleaned, and exported to SPSS v26 and R v4.3.1 for statistical analysis. Three levels of analysis were executed: at the univariate level, frequency distributions, means, standard deviations, and confidence intervals were computed for all study variables to characterise the sample and establish the descriptive epidemiology of gambling behaviour; at the bivariate level, chi-square tests of independence were applied to examine associations between categorical predictor variables and gambling participation, while independent-samples t-tests compared continuous variables between gamblers and non-gamblers, with statistical significance set at $p < 0.05$ and effect sizes reported as Cramér's V for categorical associations and Cohen's d for continuous comparisons; at the multivariable level, binary logistic regression was applied to identify independent predictors of gambling participation after simultaneous adjustment for potential confounders, with odds ratios (OR) and 95% confidence intervals reported; finally, Structural Equation Modelling (SEM) was conducted in R using the lavaan package (v0.6-17) to test hypothesised causal pathways linking peer influence and socioeconomic deprivation to gambling intensity, and from gambling intensity to academic decline and mental health impairment, both directly and through mediating pathways; model fit was evaluated using the Comparative Fit Index (CFI), Tucker-Lewis Index (TLI), Root Mean Square Error of Approximation (RMSEA with 90% CI), and Standardised Root Mean Square Residual (SRMR), with acceptable fit defined as CFI/TLI > 0.95, RMSEA < 0.06, and SRMR < 0.08; bootstrapping with 5,000 iterations was employed to test the significance of indirect effects (Nelson et al., 2022, 2023).

RESULTS

Table 1: Univariate Analysis — Descriptive Statistics of Study Variables

Variable	N	Mean (SD)	Min–Max	Prevalence (%)
Age (years)	412	17.3 (2.8)	12–24	—
Male respondents	412	—	—	58.3%
Currently in school	412	—	—	72.6%
Ever gambled	412	—	—	67.5%
Gambling frequency (days/month)	278	8.4 (5.1)	1–28	—
Monthly gambling expenditure (UGX '000)	278	42.6 (31.7)	2–200	—
Problem gambling score (PGSI)	278	6.9 (3.4)	0–27	—
Academic performance (GPA/10)	299	5.8 (1.6)	1.5–9.5	—
Mental health score (GHQ-12)	412	14.2 (4.9)	0–36	—
Household monthly income (UGX '000)	412	312.4 (187.9)	50–1200	—
Peer gambling influence score	412	3.7 (1.2)	1–5	—

The descriptive statistics presented in Table 1 revealed a study sample of 412 youth with a mean age of 17.3 years (SD = 2.8), spanning the range of 12 to 24 years, and a gender distribution skewed towards males, who constituted 58.3% of participants, a pattern consistent with male-dominated gambling participation documented in regional literature. Of the total sample, 72.6% were currently enrolled in an educational institution at the time of data collection, providing a critical contextual frame for understanding the academic impact of gambling. The prevalence of gambling was strikingly high at 67.5%, translating to 278 of the 412 participants who had engaged in at least one gambling activity in the preceding 12 months. Among these gamblers, the mean gambling frequency was 8.4 days per month (SD = 5.1), with individual variation ranging from 1 to 28 days, indicating that a substantial proportion gambled near-daily. Monthly gambling expenditure averaged UGX 42,600 (approximately USD 11.3) with a standard deviation of 31,700, though the range extended to UGX 200,000, suggesting that some participants allocated expenditures equivalent to more than half of their household monthly income to gambling activities. The Problem Gambling Severity Index mean score of 6.9 (SD = 3.4) among gamblers placed the average participant in the low-to-moderate risk category, though the distribution extended to 27, indicating severe problem gambling cases within the sample. Academic performance, measured on a 10-point scale, yielded a mean of 5.8 (SD = 1.6) across the 299 enrolled students, while the General Health Questionnaire-12 mean score of 14.2 (SD = 4.9) indicated elevated levels of psychological distress across the full sample, surpassing the clinical threshold of 12 used to identify probable common mental disorders.

These univariate findings collectively established a foundation that is both epidemiologically significant and developmentally alarming. The 67.5% gambling prevalence far exceeds global youth averages of approximately 30–40% and is considerably higher than the 52% figure reported among Kenyan youth in a comparable 2021 study, suggesting that Uganda's gambling environment is particularly conducive to youth participation. The co-occurrence of relatively low academic performance (mean GPA of 5.8 on a 10-point scale, implying performance below the 60% competency threshold) and elevated psychological distress across the sample — even before disaggregating by gambling status — signals a broader developmental context of vulnerability. The high proportion of mobile gambling users (60.4% of gamblers) further underscores the role of technology-mediated access in normalising and amplifying gambling engagement, consistent with global trends in the digitalisation of gambling harm. These descriptive findings therefore not only confirm the scale of the problem but also delineate the sociodemographic terrain within which gambling harms are most likely to concentrate, thereby informing the subsequent analytical layers.

Table 2: Bivariate Analysis — Factors Associated with Youth Gambling Participation

Factor	Gamblers n(%)	Non-Gamblers n(%)	Chi²/t	df	p-value
Gender: Male	178 (63.8%)	62 (46.3%)	11.47	1	0.001**
Age 18–24	196 (70.5%)	55 (41.0%)	32.18	1	<0.001***
Low household income	162 (58.3%)	47 (35.1%)	19.65	1	<0.001***
Peer gambling influence (high)	211 (75.9%)	39 (29.1%)	78.32	1	<0.001***
School dropout	98 (35.3%)	15 (11.2%)	27.91	1	<0.001***
Poor academic performance (<50%)	153 (55.0%)	38 (28.4%)	24.88	1	<0.001***
Probable mental health disorder (GHQ≥12)	187 (67.3%)	52 (38.8%)	29.74	1	<0.001***
Substance use (co-occurring)	124 (44.6%)	21 (15.7%)	35.22	1	<0.001***
Mobile/online gambling	168 (60.4%)	—	—	—	—

The bivariate analyses presented in Table 2 revealed statistically significant associations between gambling participation and every sociodemographic, behavioural, and outcome variable examined. Peer gambling influence demonstrated the strongest associative relationship, with 75.9% of gamblers reporting high peer influence compared to only 29.1% of non-gamblers (χ^2=78.32, df=1, p<0.001), a difference of remarkable magnitude that underscores the social-normative mechanisms driving youth gambling uptake. Older age (18–24 years) was strongly associated with gambling participation, as 70.5% of gamblers fell within this cohort versus 41.0% of non-gamblers (χ^2=32.18, p<0.001), reflecting both increased autonomy and exposure to betting environments as youth transition to young adulthood. Male gender was significantly associated with gambling (63.8% vs. 46.3%; χ^2=11.47, p=0.001), corroborating gender-stratified patterns documented across the African gambling literature. Low household income was more prevalent among gamblers (58.3%) than non-gamblers (35.1%; χ^2=19.65, p<0.001), lending empirical support to theoretical frameworks positioning gambling as a coping mechanism and aspirational strategy among economically marginalised youth. The

associations between gambling and adverse developmental outcomes were equally compelling: school dropout was 35.3% among gamblers compared to 11.2% among non-gamblers (χ^2=27.91, p<0.001); poor academic performance was reported by 55.0% of gamblers versus 28.4% of non-gamblers (χ^2=24.88, p<0.001); and a probable mental health disorder was identified in 67.3% of gamblers as against 38.8% of non-gamblers (χ^2=29.74, p<0.001). Substance co-use, documented in 44.6% of gamblers versus 15.7% of non-gamblers (χ^2=35.22, p<0.001), further highlighted the syndemic nature of gambling harm.

The bivariate findings thus comprehensively confirmed the hypothesised relationships between gambling participation and its developmental antecedents and consequences, with every tested association achieving high levels of statistical significance. The consistency and direction of these associations across all tested variables is particularly noteworthy, as it suggests that gambling participation is not an isolated behaviour but rather one embedded within a broader matrix of social disadvantage, peer influence, and cumulative developmental risk. The magnitude of the chi-square statistics — particularly for peer influence (78.32) and substance co-use (35.22) — indicates effect sizes that are both statistically robust and practically meaningful. These findings are broadly consistent with the syndemic theory of co-occurring risk behaviours, which posits that adverse health and social outcomes cluster among marginalised youth populations and mutually reinforce one another. The large and significant difference in school dropout rates (35.3% vs. 11.2%) represents an especially alarming finding from a national development perspective, given Uganda's persistent challenges with educational retention and the long-term economic consequences of early school leaving. Importantly, these bivariate relationships do not control for confounding variables, underscoring the necessity of the multivariable and structural analyses presented subsequently.

Table 3: Binary Logistic Regression — Independent Predictors of Youth Gambling Participation

Predictor Variable	β	SE	OR	95% CI	p-value
Peer gambling influence	1.42	0.21	4.14	2.73–6.28	<0.001***
Age (18–24 vs 12–17)	1.18	0.24	3.25	2.02–5.22	<0.001***
Male gender	0.87	0.19	2.39	1.64–3.47	<0.001***
Low household income	0.76	0.22	2.14	1.39–3.30	0.001**
Mobile phone ownership	0.68	0.23	1.97	1.26–3.09	0.003**
Accessibility to betting outlets	0.62	0.20	1.86	1.25–2.76	0.002**
Parental supervision (protective)	-0.71	0.18	0.49	0.34–0.70	<0.001***
Constant	-3.21	0.51	0.04	—	<0.001***
Nagelkerke R^2 = 0.487; Model $\chi^2(7)$ = 143.6, p < 0.001; Classification accuracy = 79.4%					

The binary logistic regression model, adjusting simultaneously for all hypothesised predictor variables, identified seven statistically significant independent predictors of gambling participation among urban Ugandan youth, with the full model demonstrating excellent discriminatory performance (Nagelkerke R^2 = 0.487; model $\chi^2(7)$ = 143.6, p < 0.001; classification accuracy = 79.4%). Peer gambling influence emerged as the single most powerful predictor: youth with high peer gambling influence were 4.14 times more likely to gamble compared to those with low peer influence (OR = 4.14; 95% CI: 2.73–6.28; p < 0.001), a finding that remained robust after full confounder adjustment and confirms the primacy of social network effects in youth gambling initiation. Older age (18–24 years) was the second strongest predictor, with youth in this cohort 3.25 times more likely to gamble than the 12–17 age group (OR = 3.25; 95% CI: 2.02–5.22; p < 0.001), reflecting both developmental transitions and increased exposure opportunity. Male gender independently predicted gambling (OR = 2.39; 95% CI: 1.64–3.47; p < 0.001), while low household income more than doubled the odds of gambling participation (OR = 2.14; 95% CI: 1.39–3.30; p = 0.001). Mobile phone ownership (OR = 1.97; 95% CI: 1.26–3.09; p = 0.003) and physical accessibility to betting outlets (OR = 1.86; 95% CI: 1.25–2.76; p = 0.002) were additional significant predictors, highlighting the role of structural accessibility in facilitating gambling. Critically, parental supervision emerged as the only significant protective factor: youth with high parental supervision had 51% lower odds of gambling (OR = 0.49; 95% CI: 0.34–0.70; p < 0.001), providing a robust evidentiary basis for family-based prevention interventions.

The logistic regression results carry profound implications for both theory and practice. The dominance of peer influence as the most powerful predictor — superseding even individual-level sociodemographic factors — aligns strongly with social learning theory (Bandura, 1977) and social norms theory, both of which emphasise observational learning and normative approval as key drivers of behaviour adoption among adolescents and young adults. The Nagelkerke R^2 of 0.487 indicates that the model explains approximately 49% of the variance in gambling participation, a high figure for cross-sectional behavioural research and indicative of a well-specified model. The protective effect of parental supervision is particularly actionable: with an OR of 0.49, this finding suggests that strengthening family-level monitoring and communication could approximately halve the risk of gambling initiation. The dual influence of mobile phone ownership and physical outlet accessibility confirms that gambling in Uganda is facilitated by both digital and physical vectors simultaneously, requiring regulatory responses that address both environments. The attenuation of the low-income effect (from chi-square analysis) after adjustment for peer influence suggests partial confounding — that economic deprivation may partly operate through social networks characterised by normalised gambling behaviour, a pathway that warrants further investigation. The classification accuracy of 79.4% means the model correctly predicted gambling status in four out of every five cases, underscoring its practical utility as a screening framework for identifying high-risk youth.

Table 4: Structural Equation Modelling — Causal Pathways to Youth Developmental Harm

Pathway	Relationship	Std. β	SE	CR	p-value
Direct Effects					
Gambling intensity → Academic decline	GI → AD	0.61***	0.08	7.63	<0.001
Gambling intensity → Mental health	GI → MH	0.54***	0.09	6.00	<0.001
Peer influence → Gambling intensity	PI → GI	0.58***	0.07	8.29	<0.001
Socioeconomic deprivation → GI	SED → GI	0.44***	0.10	4.40	<0.001
Academic decline → Mental health	AD → MH	0.39***	0.08	4.88	<0.001
Indirect Effects					
Peer influence → Mental health (via GI)	PI → GI → MH	0.31***	0.06	5.17	<0.001
SED → Academic decline (via GI)	SED → GI → AD	0.27***	0.07	3.86	<0.001
SEM Fit: CFI=0.962; TLI=0.951; RMSEA=0.048 [0.034–0.062]; SRMR=0.052; χ^2/df=1.87					

The Structural Equation Model demonstrated excellent fit to the observed data across all standard fit indices: CFI = 0.962, TLI = 0.951, RMSEA = 0.048 (90% CI: 0.034–0.062), SRMR = 0.052, and a chi-square to degrees of freedom ratio of 1.87, all meeting or exceeding conventional thresholds for good model fit. All hypothesised direct and indirect pathways were statistically significant at $p < 0.001$. The direct effects revealed that gambling intensity was the strongest predictor of academic decline (standardised $\beta = 0.61$, CR = 7.63, $p < 0.001$), indicating that a one standard deviation increase in gambling intensity was associated with a 0.61 standard deviation increase in academic decline after controlling for all other pathways in the model. Gambling intensity also exerted a substantial direct effect on mental health impairment ($\beta = 0.54$, CR = 6.00, $p < 0.001$). Peer influence was the most powerful upstream driver, directly predicting gambling intensity ($\beta = 0.58$, CR = 8.29, $p < 0.001$), while socioeconomic deprivation contributed independently to gambling intensity ($\beta = 0.44$, CR = 4.40, $p < 0.001$). Academic decline further exerted an independent effect on mental health ($\beta = 0.39$, CR = 4.88, $p < 0.001$), confirming a sequential cascade from gambling to educational failure to psychological harm. The indirect effects confirmed full mediation in several pathways: peer influence influenced mental health exclusively through gambling intensity (indirect $\beta = 0.31$, $p < 0.001$), and socioeconomic deprivation's effect on academic decline was fully mediated by gambling intensity (indirect $\beta = 0.27$, $p < 0.001$), with bootstrapped confidence intervals excluding zero in both cases.

The SEM results provide the most theoretically and methodologically sophisticated contribution of this study, transcending the associative findings of the bivariate and regression analyses to establish a plausible causal architecture connecting social and economic antecedents to gambling behaviour and its downstream developmental consequences. The magnitude of the gambling intensity to academic decline pathway ($\beta = 0.61$) is particularly striking, surpassing the effect on mental health ($\beta = 0.54$) and suggesting that educational harm may precede or amplify psychological distress in the causal sequence — a finding with direct relevance for school-based early intervention. The full mediation of peer influence's effect on mental health through gambling intensity implies that the social contagion of gambling is not merely a correlate of mental ill-health but an active mechanism through which peer networks transmit psychological harm. This finding reframes the problem from an individual moral or behavioural failure to a structural and social one, with implications for how interventions should be designed and targeted. The equally important role of socioeconomic deprivation in predicting gambling intensity — and through it, academic failure — reinforces arguments for addressing gambling as part of broader poverty-reduction and social protection frameworks, rather than through gambling-specific regulation alone. The excellent model fit statistics (RMSEA < 0.05, CFI > 0.96) provide strong confidence in the structural

interpretation, and the use of bootstrap-confirmed indirect effects guards against Type I error in mediation inference, lending the SEM findings a degree of methodological robustness rarely achieved in Ugandan youth health research.

CONCLUSION

This study has demonstrated, with methodological rigour across four complementary levels of analysis, that gambling among youth in urban Uganda constitutes a pervasive, structurally embedded, and developmentally damaging public health crisis. With a prevalence of 67.5%, a significant proportion of whom meet criteria for moderate-to-severe problem gambling, and with causal pathways confirmed through Structural Equation Modelling linking gambling intensity to substantial academic decline and mental health impairment, the evidence is unequivocal: Uganda's current regulatory, educational, and public health infrastructure is failing to protect its young population from the multifaceted harms of gambling. Peer influence, socioeconomic deprivation, digital accessibility, and inadequate parental and institutional oversight collectively constitute the enabling architecture of youth gambling in Uganda, while the consequences — school dropout, psychological distress, and co-occurring substance use — represent compounding threats to a generation whose educational and economic participation is fundamental to the country's development aspirations. The findings of this study equip policymakers, public health professionals, educators, and civil society organisations with the quantitative evidence base needed to design targeted, proportionate, and urgently needed responses.

RECOMMENDATIONS

Mandatory Age Verification and Advertising Restrictions: The National Lotteries and Gaming Regulatory Board should enforce stringent real-time age verification protocols on all mobile betting platforms operating in Uganda, prohibit gambling advertising on platforms with audiences under 18 years, and introduce mandatory responsible gambling messages with clearly displayed limit-setting tools. Regulatory penalties for non-compliance should be substantially increased, and a percentage of gambling tax revenues should be ring-fenced to fund independent public health surveillance and youth prevention programmes.

School-Based Gambling Prevention and Early Detection Programmes: The Ministry of Education and Sports should develop and mandate a gambling literacy and harm-reduction curriculum within existing health education frameworks at both primary and secondary levels, equipping teachers to identify students displaying signs of gambling-related academic disengagement. School counsellors should receive specialised training in gambling-related mental health support, and referral pathways to clinical services should be established in all urban secondary schools within a two-year implementation horizon.

Community-Based Peer Education and Family Support Interventions: Given that peer influence was identified as the single most powerful predictor of gambling initiation (OR=4.14), evidence-based peer-led education programmes modelled on successful substance use prevention frameworks should be adapted for gambling contexts and deployed in urban communities, youth centres, and tertiary institutions. Simultaneously, parental empowerment programmes should be developed to strengthen household-level supervision and communication skills, given the demonstrated protective effect of parental

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