Prestige Journal of Counselling Psychology, Vol. 8, No. 2, September 2025 ISSN: 2651-5687 (Print)
A publication of the Association for the Promotion of Innovation in Education (APIE) ISSN: 2651-5709 (Online)

Differential Efficacies of Rational Emotive Behavioural, Motivational Interviewing and Solution Focused Brief Therapies in Managing Online Gambling Disorder among Undergraduates in Universities in Edo State, Nigeria

[1]**Martins Noyosase Igbineweka, Ph.D**
martins.igbineweka@uniben.edu

[1]**Wellington Omosefe Jesuorobo, Ph.D**
wellington.jesuorob@uniben.edu
[1]*Department of Educational Evaluation and Counselling Psychology*
University of Benin, Benin City

Abstract
The study investigated the differential efficacy of Rational Emotive Behavioural, Motivational Interviewing and Solution-Focused Brief Therapies in managing online gambling among undergraduates in universities in Edo State, Nigeria. One research question was raised to guide the study with a corresponding hypothesis. The study adopted the quasi-experimental pre-test and post-test non-equivalent control group design. The study population consisted of all duly registered full-time undergraduates of the University of Benin in Nigeria. A multi-stage sampling procedure was used, while the Online Betting Scale was administered to the undergraduates. Three experts validated the instrument, and a reliability coefficient of 0.95 was obtained using Cronbach's alpha statistics, and the data collected was analysed. The study revealed that Rational Emotive Behavioural, Motivational Interviewing and Solution-Focused Brief Therapies were efficacious in managing online gambling among undergraduates in universities in Edo State, Nigeria. Based on the findings, it was recommended that counselling interventions should be regularly promoted among public and private university undergraduates and other educational settings. Guidance counsellors and counselling psychologists should be encouraged to use REBT, MI and SFBT counselling techniques and skills in managing undergraduates with online gambling addiction.

Keywords: differential efficacies, rational emotive behavioural therapy, motivational interviewing therapy, solution-focused brief therapy, gambling disorder.

Introduction
Gambling has become one of the most frequently reported addictions among young people (Secades-Villa et al., 2019). The global participation rate of gambling has increased astronomically, as literature has shown more adolescents or young adults to have participated in gambling, at least once in their lifetime (Kang et al., 2019; Sancartier et al., 2019; Bozzato

et al., 2020). Research has also shown that a typical problem gambler could affect up to six individuals, including their children, parents, spouses, siblings, and close friends, among others (Goodwin et al., 2017). The prevalence of gambling has also been found to be high in Africa, where the result of a survey conducted among 3,879 youths in Africa revealed that 54% of youths engaged in gambling at some time (Wangari, 2017). An African-based study reported that the most common gambling-related suicides were seen among university students who had used their school fees to gamble and lost (Kagawa et al., 2022). Internet gamblers are at a higher risk of developing gambling-related problems than non-internet gamblers (Chóliz et al., 2019; Effertz et al., 2018; Hing et al., 2017; Volberg et al., 2018), and they may also be more likely to engage in potentially harmful lifestyles than in-person gamblers, owing to their easy access to online facilities.

Online gambling is becoming increasingly popular worldwide, and in Africa, where problems associated with unemployment and poverty levels are on the rise, an increasing number of young people are becoming attracted to gambling (Elie et al., 2023). Studies have also revealed that gambling and gambling problems have a high prevalence rate among tertiary students (Oyeleke et al., 2017; Adenugba & Akhuetie, 2018; Omanchi & Okpamen, 2018; Offor et al., 2021; Akinlotan, 2022; Adeyemo & Aluko, 2023; Uwuimwonse, 2023). Studies have shown a connection between gambling and certain criminal conduct, such as theft and drug use offences (Banks & Waugh, 2019; Charles, 2020). Gambling addiction is insidious and could end up affecting students' academic performance, social and mental well-being, making them accumulate huge debts in the process of chasing losses, and may even place their valuables on distressed sales to raise money to pay debts accrued from gambling. Some students lose their school fees to gambling and end up being depressed or disturbed by other mental problems.

In Nigeria, gambling has become firmly established as a normal practice among different age groups, genders, and socio-economic statuses (Omanchi & Okpamen, 2018; Bankole, 2019). Some people have argued that gambling in Nigeria will soon be a greater public health problem than substance misuse (Aguocha & George, 2021). The result of a meta-analysis review on the prevalence rates of problem gambling among adolescents, indicated 10.2% as the mean rate of problem gambling, with Nigeria having the highest rate among the countries reviewed: United States (3%), Canada (8.7%), Singapore (8.7%), Scotland (3.9%), Japan (4.2%), China (6.4%) and Nigeria (14.2%) (Nowak & Aloe, 2014). College students are the most vulnerable population to gambling-related problems (Lopez del Hoyo et al., 2022; Adenugba & Akhuetie, 2018; Omanchi & Okpamen, 2018). Ede et al. (2020) reported that over 39% of college students gamble excessively, and close to 80% of this demography have

placed their valuables or school fees on online gambling platforms. Given the complexity of gambling addiction, undergraduates manifesting gambling-related problems may not listen to mere advice from concerned individuals, due to the physiological connection associated with addiction. Therapeutic interventions may be of help to them.

REBT is one of the main pillars of cognitive-behavioural therapies (CBT) (David et al., 2018), and is the most commonly used therapy in treating gambling addiction. Meta-analyses of outcome-based studies revealed that REBT is effective in treating various psychopathological disorders (Ellis, 2003; David et al., 2018) such as gambling problems and comorbid conditions. Cognitive behavioural therapy (CBT) has been acknowledged as the most common psychological intervention for managing gambling addiction, while it has also demonstrated effectiveness in the management of gambling-related problems in some other climes (Jimenez-Murcia et al., 2015; Tolchard, 2017; Harris & Mazmanian, 2016; Ede et al., 2020); they can also improve other variables that can affect the quality of life of people with gambling problems, such as depression, anxiety, spending money, frequency of gambling and the score in the diagnosis of gambling (Casey et al., 2017; Nilsson et al., 2020; Oei et al., 2018). Group cognitive-behavioural therapy is an impactful therapy in reducing pathological gambling among Nigerian students (Ede et al., 2020).

The goal of using Motivational Interviewing (MI) on an individual having issues with gambling is to recognise and overcome those barriers and increase overall investment in therapy by supporting an individual's commitment to changing problem behaviours (Heinz et al., 2019). Motivational Interviewing (MI) is an effective treatment due to its simplicity and compact nature (Potenza et al., 2019). Studies suggest that the combination of Motivational Interviewing with other behavioural therapies such as cognitive behavioural therapy (CBT) can be very effective and lead to a major reduction in gambling (Choi et al., 2017; Potenza et al., 2019). The importance of including components of motivational interviewing and cognitive restructuring in CBT programmes (Tolchard, 2017; Chretien et al., 2017), as has been emphasised by literature in the field, is to facilitate patients' understanding of cognitive distortions related to gambling behaviour and to weaken other factors, perseveration patterns, irrational beliefs, and magical thinking associated with the disturbance. In a study in Kenya titled "Efficacy of Brief Motivational Interviewing Intervention (BMII) in Treating Gambling Disorder among University Students," involving 228 participants, BMII was found to be efficacious in treating gambling disorder among university students (Ogachi, 2020).

Solution-focused brief therapy (SFBT) is anchored on the premise that the solution does not necessarily correlate to the problem but to the future the client desires. SFBT focuses more

on helping clients rather than primarily on their current difficulties, and helps clients work towards an idealised goal state that represents what they would like their lives to be like. Several meta-analyses show SFBT to be effective (Carr et al., 2017; Franklin et al., 2020; Hsu et al., 2021; Zhang et al., 2018); for schools and among college students (Sadri et al., 2020; Franklin et al., 2020); for reducing test anxiety among university undergraduates (Egbochuku & Igbineweka, 2014; Aihie & Igbineweka, 2018); effectiveness in the treatment of depression (Liaqat & Saleem, 2021; Zhang, 2021); for reducing academic stress among college students (Ataha & Abhulimen, 2022); for increasing self-concept among adolescents in secondary schools (Egbochuku et al., 2017); for children, adolescents and families (Finlayson et al., 2020; Karakaya & Ozgur, 2019; Hsu et al., 2021). A study comparing short-term outcomes of three problem gambling treatments: a multi-group propensity score analysis, aimed to compare three psychotherapeutic problem gambling treatments: cognitive-behavioural therapy (CBT), solution-focused brief therapy (SFBT), and time-limited dynamic psychotherapy (TLDP). The findings suggested that the therapies were effective in reducing psychosocial distress for short-term problem gambling interventions (Soberay, 2015).

Literature has shown that Rational Emotive Behavioural (REBT), Motivational Interviewing (MI) and Solution-Focused Brief (SFBT) therapies are evidence-based psychotherapies that are effective in managing psychological disorders. However, no literature within the reach of the researchers has shown the combination of these therapies being used together in managing online gambling addiction, and neither has any study shown that researchers have attempted to manage online gambling addiction among undergraduates in universities in Edo State; these are gaps this study sought to fill.

Research question

1. What is the difference in pre-test and post-test mean scores in online gambling addiction of undergraduates exposed to rational emotive behavioural therapy, motivational interviewing therapy, solution focused brief therapy and the control group.?

Hypothesis

Ho1: There is no significant difference in pre-test and post-test mean scores in online gambling addiction of undergraduates exposed to Rational Emotive Behavioural Therapy, Motivational Interviewing Therapy, Solution Focused Brief Therapy and The Control Group.

Methodology

The study used the quasi-experimental pre-test and post-test non-equivalent control group design. This design investigated the possible cause-and-effect relationship using the 4x2x2x3 factorial design. The study consisted of one independent variable, which is in four levels: Rational Emotive Behavioural Therapy, Motivational Interviewing Therapy, Solution-Focused Brief Therapy (treatment groups) and Control group. The dependent variable was online gambling addiction of undergraduates.

The population for this study comprised of all duly registered undergraduates pursuing degrees in universities in Edo State in the 2023/2024 session. There are ten universities in Edo State. The target population was three hundred level undergraduates selected from the University of Benin, Ambrose Ali University, Wellspring University and Benson Idahosa University. The 3rd-year undergraduates were considered appropriate for the study, based on the assumption that they were young adults who are adjusting to independent living with the vested interest of building career and lasting relationships with others. However, the process of achieving independent living can predispose young adults to risky habits due to cognitive concerns for money and adjustments to the expectations of adult life.

The sample for this study was 132 undergraduates from four universities in Edo State, Nigeria. A multistage sampling procedure was used in selecting the samples for this study: In stage one, two universities each were randomly selected from the government owned universities, and privately owned universities, using the simple random sampling technique through balloting without replacement. From the four universities selected (Benson Idahosa University, Ambrose Ali University, University of Benin and Wellspring University), three of the schools were randomly assigned as experimental groups A, B and C while school D served as control.

In stage 2, a faculty was randomly selected from each of the university; thereafter, simple random sampling was used to select departments of study, one each from the four randomly selected faculties and these represented the four intact classes used for the study. In stage 3, the 300 level students were then pre-tested with the Online Betting Addiction Scale (OBAS), in order to identify those with online gambling addiction among them; those who scored 50 and above met the benchmark for selection and were identified as participants in the study.

The selection diagnostic criteria for the study followed the benchmark established by González-Cabrera et al. (2020) where higher scores indicate higher level of online gambling behaviour. The scale developers dichotomised responses to be > 3 for “problem” and item

scores < 3 to be "no problem" (González-Cabrera et al., 2020) from a 5-point scale. However, based on the modification made on the instrument by the researchers, where the response options were reduced to 4-point scale, > 2.5 indicated the presence of gambling problem while < 2.5 indicated no problem. Overall scores of the instrument range from possible 20 up to 80, being the total score of the sum of all item responses, where a higher score indicated higher level of problem gambling behaviour; below 50 indicated no problem and thus rejected, while those who score 50 and above were selected for participation in the study, as it indicated the presence of gambling problems.

132 students were found to be addicted to online gambling. But 110 students went through the treatment programme. School A (Benson Idahosa University) was exposed to Rational Emotive Behavioural Therapy (REBT), School B (Ambrose Ali University) was exposed to Motivational Interviewing Therapy (MIT), school C (University of Benin) was exposed to Solution-Focused Brief Therapy (SFBT), while school D (Wellspring University) which is the control group received Wealth Creation Lessons (WCL). Schools A, B, C and D had 31, 34, 26 and 19 students respectively.

The research instrument used for the collection of data for the study was the Online Betting Addiction Scale (OBAS). The OBAS comprises sections A and B. Section A had the demographic information or bio-data of the respondents, while section B consisted of 20 self-report items to diagnose and assess online gambling addiction among undergraduates in the universities. The instrument was adapted from the Online Gambling Disorder Questionnaire (OGD-Q), an 11-item instrument originally developed by Gonzalez-Cabrera et al. (2020), to capture online gambling disorder in young people, based on current diagnostic criteria and the components model of addiction (González-Cabrera et al., 2020). The instrument served as a diagnostic and assessment tool for online gambling disorder among young people. OGD-Q was adapted and modified by the researchers and was used to obtain data to test the hypotheses formulated for this study. OGD-Q uses a 5-point response scale for item responses: Never (1); Once in a While (2); Sometimes (3); Often (4); Every Day (5). However, the researchers modified the responses to a 4-point Likert-type scale for ease of administration and all the items were therefore changed from question forms to statements, with a descending scoring pattern as follows; Strongly Agree (4); Agree (3); Disagree (2); Strongly Disagree (1), where a higher score indicated a higher level of online gambling behaviour. Some of the items were changed from complex and compound sentences to simple statements for easy comprehension. A completely new item (1) was introduced to direct the focus of the instrument: "Online betting is of great benefit". The OGD-Q items were constructed to meet the DSM-5 criteria for gambling disorder

ISSN: 2651-5687 (Print)
ISSN: 2651-5709 (Online)

diagnosis and specifically modified in this study to serve the same purpose. The data was analysed using analysis of covariance (ANCOVA) and pairwise comparisons of differences.

Presentation of results

Ho1: There is no significant difference in pre-test and post-test mean scores in online gambling addiction of undergraduates exposed to rational emotive behavioural therapy, motivational interviewing therapy, solution focused brief therapy and the control group.

Table 1: Mean and standard deviation of pre-test and post-test mean scores in online gambling addiction of experimental and control groups

Therapies	**N**	**Pre-Test**		**Post-Test**	
		Mean	**Std.Dev**	**Mean**	**Std.Dev**
REBT	31	51.84	7.98	34.14	7.23
MI	34	52.24	5.68	32.57	4.43
SFBT	26	51.81	8.83	32.83	4.08
Control	19	50.00	6.02	50.95	7.26
Total	**110**	**51.47**	**7.13**	**37.62**	**5.75**

Table 1 contains the mean and standard deviation of undergraduates' scores in online gambling addiction and the number of participants in the experimental (REBT, MI and SFBT) and Control groups at both pre-test and post-test. Testing for significant differences at post-test, their pre-test mean scores were used as a covariate in the analysis by using the Analysis of Covariance (ANCOVA) statistics.

Table 2: Analysis of Covariance (ANCOVA) of differences in pre-test and post-test mean scores in online gambling addiction among the experimental and control groups

Source	**Type III Sum of Squares**	**Df**	**Mean Square**	**F**	**Sig. (p-value)**
Corrected Model	3957.024[a]	4	989.256	11.588	.000
Intercept	959.678	1	959.678	11.242	.001
PRETEST	698.892	1	698.892	8.187	.005
GROUP	3722.537	3	1240.846	14.535	.000
Error	8963.530	105	85.367		
Total	180777.000	110			
Corrected Total	12920.555	109			

.000<.05 = Significant

Table 2 contains an F-value of 14.535 and a p-value of .000. Testing at alpha level of 0.05, the p-value is less than the alpha level. Therefore, the null hypothesis which states that there is no significant difference in pre-test and post-test mean scores in online gambling addiction of undergraduates exposed to rational emotive behavioural therapy, motivational interviewing therapy, solution focused brief therapy and the control group is rejected. Hence, there was a significant difference in their mean scores. Pairwise comparison is then used to reveal the groups that differ, one from the other.

Table 3: Pairwise comparisons of differences between the groups

(I) Group	(J) Group	Mean Difference (I-J)	Std. Error	Sig. (p-value)
REBT	MI	-.558	2.295	.808
	SFBT	.222	2.457	.928
	Control	-15.791*	2.726	.000
	SFBT	.780	2.408	.746
	Control	-15.232*	2.690	.000
	Control	-16.013*	2.821	.000

Table 3 contains the comparisons between groups. From the table the mean score in online gambling addiction of undergraduates exposed to REBT was not significantly different from that of the participants in the MI groups (.808> .05) and also those in SFBT group (.928> .05). However, the mean score for those in REBT was significantly different from the control group (.000 < .05). Also, it can be observed that the mean score for those in MI group was not also significantly different (.746> .05) from the mean score of those in SFBT, but it was, for the control group (.000< .05). And also, the mean score for those in SFBT was significantly different from the mean score of participants in the control group (.000 < .05). From these analyses, REBT, MI and SFBT were effective in the treatment of online gambling addiction because they all show significant difference from the control group mean score; they were not significantly different from one another.

Discussion of the findings

The finding of the hypothesis showed a significant difference in post-test mean scores in online gambling addiction of undergraduates exposed to rational emotive behavioural therapy, motivational interviewing therapy, solution focused brief therapy and the control group. The findings of the study further revealed that participants exposed to each of the treatment groups (REBT, MI and SFBT) were not significantly different from one another.

However, each of the treatment groups was significantly different from the control group. The result indicated that the three treatments (REBT, MI and SFBT) were equally effective in the treatment of online gambling addiction.

The significant effect of the study's finding may not be unconnected with the twelve-week treatment programmes that the treatment groups (REBT, MI and SFBT) were exposed to, while the control group was not. The three therapies employed for use on the undergraduates manifested effectiveness in managing online gambling addiction of undergraduates in the universities. The finding conforms with the results of several studies that used Rational Emotive Behavioural Therapy (Ede et al., 2020; Harris & Mazmanian, 2016; Soberay, 2015), Motivational Interviewing Therapy (Ogachi, 2020) and Solution-Focused Brief Therapies (Soberay, 2015; Egbochuku et al., 2017; Aihie & Igbineweka, 2018; Ataha & Abhulimen, 2022) in managing psychological problems. The three therapies were found to be effective as evidence-based therapies for managing online gambling addiction among Benson Idahosa University, Ambrose Ali University, and University of Benin undergraduates.

Conclusion

On account of the high prevalence rate of participation in online gambling activities by the teeming youth population, especially the university undergraduates, the study revealed that rational emotive behavioural, motivational interviewing and solution-focused brief therapies were effective in managing online gambling addiction among university undergraduates. These therapies should be major psychological interventions for managing online gambling addiction, as they have proven to be efficacious in this regard, as each of the experimental groups was significantly different from the control group.

Recommendations

Counsellors are trained to modify the educational behaviour of all categories of persons, including helping students or clients who are confused or experiencing educational difficulties, develop a positive attitude with the sole aim of adjustment. Thus, it was recommended as follows:

1) Regular seminars/workshops should be organised by counsellors to create awareness on the need for counselling of undergraduates struggling with online gambling addiction.

2) Students should be given orientation on the importance of visiting counsellors/psychologists who would employ psychological interventions, including rational emotive behavioural, motivational interviewing and solution-focused brief therapies in managing their problems.

3) Schools, religious bodies and other agencies saddled with the responsibilities of training young people, should ensure the establishment of counselling centres and appoint qualified counsellors/psychologists who would encourage the use of counselling interventions, as well as the principles of rational emotive behavioural, motivational interviewing and solution-focused brief therapies in managing online gambling addiction.

References

Adenugba, A., & Akhuetie, R. (2018). Knowledge and perception of gambling among youths in Ibadan North Local Government, Oyo State, Nigeria.

Adeyemo, S. & Aluko, E. T. (2023). Psychosocial Predictors of Problem Gambling Among Male College Students in Nigeria. *Iranian Journal of Health Psychology, 6*(1), 21-30.

Aguocha, C. M., & George, S. (2021). An overview of gambling in Nigeria. *British Journal of Psychiatry*, *18*(2), 30-32. doi: 10.1192/bji.2020.28.

Aihie, O. N. & Igbineweka, M. N. (2018). Efficacy of Solution Focused Brief Therapy, Systematic Desensitization and Rational Emotive Behavioural Therapy in Reducing the Test Anxiety Status of Undergraduates in a Nigerian University. *Journal of Educational and Social Research,* 8(1), 19-26. www.mcser.org/Journal/index/search/result

Akinlotan, R. A. (2022). Causes and Effect of Gambling Attitude among Private University Students: A Study of Crawford University, Igbesa, Ogun State. *Sapientia Global Journal of Arts, Humanities and Development Studies (SGOJAHDS), 5*(2), 265-283

Ataha, U. C., & Abhulimen, P. I., (2022). Efficacy of Solution-Focused Brief Therapy in Reducing Academic Stress among Students of Igueben College of Education, *International Journal of Studies in Education (IJOSE), 18*(1).

Bankole, T. E. (2019). Patterns and Prevalence of Gambling Behaviour among Youths in South-West Nigeria: A case Study of Youths in Oyo and Ekiti State. *British Journal of Psychology Research, 7*(2), 22-46.

Banks, J., & Waugh, D. (2019). A taxonomy of gambling-related crime. *International Gambling Studies, 19*(2), 339-357. https://doi.org/10.1080/14459795.2018.1554084

Bozzato, P., Longobardi, C., & Fabris, A. (2020). Problematic gambling behavior in adolescents: Prevalence and its relation to social, self-regulatory, and academic self-efficacy. *International Journal of Adolescence and Youth, 25*(1), 907–919.

Carr, A., Hartnett, D., Brosnan, E., & Sharry, J. (2017). Parents Plus systemic, solution-focused parent training programs: Description, review of the evidence-base, and meta-analysis. *Family Process, 56*(3), 652–668. https://doi.org/10.1111/famp.12225

ISSN: 2651-5687 (Print)
ISSN: 2651-5709 (Online)

Casey, L. M., Oei, T. P. S., Raylu, N., Horrigan, K., Day, J., Ireland, M., & Clough, B. A. (2017). Internet-based delivery of cognitive behaviour therapy compared to monitoring, feedback and support for problem gambling: A randomised controlled trial. *Journal of Gambling Studies, 33*, 993-1010. https://doi.org/10.1007/s10899-016-9666-y

Charles, T. L. (2020). Gambling among Nigerian Youths; Implications for Counselling. *International Journal of Research and Scientific Innovation (IJRSI), 7*, *179-183*

Choi. S. W., Shin, Y. C., & Kim, D. J. (2017). Treatment modalities for patients with gambling disorder. *Annals of General Psychiatry, 16*, 23. DOI: 10.1186/s12991-017-0146-2

Chóliz, M., Marcos, M., & Lázaro-Mateo, J. (2019). The risk of online gambling: A study of gambling disorder prevalence rates in Spain. *International Journal of Mental Health and Addiction, 19*(2), 1–14. DOI: 10.1007/s11469-019-00067-4.

Chretien, M., Giroux, I., Goulet, A., Jacques, C., & Bouchard, S. (2017). Cognitive restructuring of gambling-related thoughts: A systematic review. *Journal of Addictive Behaviours, 75.* DOI: 10.1016/j.addbeh.2017.07.001

David, D., Cotet, C., Matu, S., Mogoase, C., & Stefan, S. (2018). 50 years of rational-emotive and cognitive-behavioral therapy: A systematic review and meta-analysis. *Journal of Clinical Psychology, 74*(3), 304–318. https://doi.org/10.1002/jclp.22514

Ede, M., Omeje, J., Ncheke, C., Agah, J., Chinweuba, N., Chijioke, V., & Amoke, I. (2020). Assessment of the Effectiveness of Group Cognitive Behavioural Therapy in Reducing Pathological Gambling. *Journal of Gambling Studies, 36*, 1325–1339. DOI: 10.1007/s10899-020-09981-y

Effertz, T., Bischof, A., Rumpf, H. J., Meyer, C., & John, U. (2018). The effect of online gambling on gambling problems and resulting economic health costs in Germany. *European Journal of Health Economics, 19*(7), 967–978. DOI: 10.1007/s10198-017-0945z

Egbochuku, E. O., & Igbineweka, M. N. (2014). The effectiveness of solution-focused brief therapy in the reduction of test anxiety amongst students in private tertiary institutions. *Edo Journal of Counselling, 7*, 95-110.

Egbochuku, E. O., Oduh, W. A., & Agboola, J. O. (2017). Effect of Solution Focused Brief Therapy on Adolescents' Self Concept among Secondary School Students in Ikpoba-Okha Local Government Area in Edo State. *American Journal of Educational Research, 5*(11), 1162-1166. DOI: 10.12691/education-5-11-8

Elie, A. I. N., Kemo, S., Sinet, K. D., Djibrilla, M., Oumou, O. Z., Elodi, A. Y., Elvire, D. S. E., Ignace, T. C. N., Anselme, D., Francis, T. T., Prosper, G. & Josiane, E. H. (2023). Online Gambling Addiction on Parakou. *Open Journal of Psychiatry, 13*, 421-437. https://doi.org/10.4236/ojpsych.2023.135031

Ellis, A. (2003). Early theories and practices of rational emotive behavior theory and how they have been augmented and revised during the last three decades. *Journal of Rational-Emotive & Cognitive-Behaviour Therapy, 21*(3/4).

Finlayson, B. T., Hall, G. N., Jordan, S. S., (2020). Integrating Solution-Focused Brief Therapy for Systemic Posttraumatic Stress Prevention in Paediatrics. *Australian and New Zealand Journal of Family Therapy, 41*(2), 133–144.

Franklin, C., Guz, S., Zhang, A., Kim, J., Zheng, H., Hai, A. H., Cho, Y. J., & Shen, L. (2020). Solution-focused brief therapy for students in schools: A comparative meta-analysis of the English and Chinese literature. *Society for Social Work and Research.* https://doi.org/10.1086/712169.

Goodwin, B. C., Browne, M., Rockloff, M., & Rose, J. (2017). A typical problem gambler affects six others. *International Gambling Studies, 17*(2), 276-289. doi: 10.1080/14459795.2017.1331252

González-Cabrera, J., Machimbarrena, J. M., Beranuy, M., Pérez-Rodríguez, P., Fernández-González, L., & Calvete, E. (2020). Design and measurement properties of the online gambling disorder Questionnaire (OGD-Q) in Spanish adolescents. *Journal of Clinical Medicine, 9*(1), 120. DOI: 10.3390/jcm9010120.

Harris, N., & Mazmanian, D. (2016). Cognitive behavioural group therapy for problem gamblers who gamble over the internet: A controlled study. *Journal of Gambling Issues, 33*(33), 170–188. https://doi.org/10.4309/jgi.2016.33.10

Heinz, A., Romanczuk-Seiferth, N., & Potenza, M. N., (2019). *Gambling Disorder*. doi:10.1007/978-3-030-03060-5.

Hing, N., Russell, M. & Browne, M. (2017). Risk Factors for Gambling Problems on Online Electronic Gaming Machines, Race Betting and Sports Betting. *Frontiers in Psychology, 76*(6), 1123-1141.

Hsu, K.-S., Eads, R., Lee, M. Y., & Wen, Z. (2021). Solution-focused brief therapy for behavior problems in children and adolescents: A meta-analysis of treatment effectiveness and family involvement. *Children and Youth Services Review, 120*, 105620. https://doi.org/10.1016/j.childyouth.2020.105620

ISSN: 2651-5687 (Print)
ISSN: 2651-5709 (Online)

Jimenez-Murcia, S., Granero, R., Fernandez-Aranda, F., Arcelus, J., Aymami, M. N., Gomez-Pena, M., Tarrega, S., Moragas, L., Del Pino-Gutierrez, A., Sauchelli, S., Fagundo, A. B., Brewin, N. & Menchon, J. M. (2015). Predictors of Outcome among Pathological Gamblers Receiving Cognitive Behavioural Group Therapy. *European Addiction Research., 21*(4), 169-178. Doi: 10.1159/000369528

Kagawa, M. M., Mamun, M. A., Najjuka, S. M., Muwanguzi, M., Kule, M., Nkola, R., Favina, A., Kihumuro, R. B., Munaru, G., Arinaitwe, I., Rukundo, G. Z. & Griffiths, M. D. (2022). Gambling-related suicide in East African community countries: Evidence from press media reports. *BMC Public Health, 22*, 158.

Kang, K., O. K., J. S., Kim, H., & Lee, K. S. (2019). The gambling factors related with the level of adolescent problem gambler. *International Journal of Environmental Research and Public Health, 16*(12), 2110. DOI: 10.3390/ijerph16122110.

Karakaya, D., & Özgür, G. (2019). Effect of a Solution-Focused Approach on Self-Efficacy and Self-Esteem in Turkish Adolescents with Attention-Deficit/Hyperactivity Disorder. *Journal of Psychosocial Nursing and Mental Health Services, 57*(11), 45–55. doi:10.3928/02793695-20190708-01

Liaqat, H., & Saleem, A. (2021). Solution-Focused Brief Therapy for Major Depressive Disorder: A Single Case Study. *Journal of Social Sciences and Humanities, 7*(2), 248–259. https://doi.org/10.51732/njssh.v7i2.93

Lopez-del-Hoyo, Y., Monreal-Bartolomé, A., Aisa, P., Pérez-Aranda, A., Plana, C., Poblador, J. A., Casterad, J., García-Campayo, J., & Montero-Marin, J. (2022). The Gambling Habits of University Students in Aragon, Spain: A Cross-Sectional Study. *International Journal of Environmental Research and Public Health*, *19*, 4553. doi: 10.3390/ijerph19084553.

Nilsson, A., Magnusson, K., Carlbring, P., Andersson, G., & Hellner, C. (2020). Behavioral couples therapy versus cognitive behavioral therapy for problem gambling: A randomized controlled trial. *Addiction, 115*, 1330-1342. https://doi.org/10.1111/add.14900

Nowak, D. E., & Aloe, A. M. (2014). The prevalence of pathological gambling among college students: A meta-analytic synthesis, 2005–2013. *Journal of Gambling Studies*, *30*(4), 819–843. Doi:10.1007/s10899-013-9399-0.

Oei, T. P. S., Raylu, N., & Lai, W. W. (2018). Effectiveness of a self-help cognitive behavioural treatment program for problem gamblers: A randomised controlled trial. *Journal of Gambling Studies, 34*, 581-595. https://doi.org/10.1007/s10899-017-9723-1

Offor, U. I., Ngozi, A. O., Chukwuma, O. M., & Chukwuemeka, O. (2021). On-line gambling among students of Nnamdi Azikiwe University, Awka: Causes, Consequences and Measures. *Unizik Journal of Educational Research and Policy Studies, 7*, 387-399. Retrieved from http://sjifactor.com/passport.php?id=21363

Ogachi, M. F. (2020). *Efficacy of Brief Motivational Interviewing Intervention for Treating Gambling Disorder Among University Students in Kenya: A Randomized Controlled Trial* [Doctoral dissertation]. Kenyata University, Kenya.

Omanchi, S. A., & Okpamen, K. O. (2018). The changing pattern of gambling in Benue State: The case of emerging role of ICT (Information and Communication Technology) in contemporary Makurdi Metropolis. *AASCIT Communications, 5*(2), 29-36. http://doi.org/10.590/mjss.2014.v5n27p1086.

Oyeleke, J. T., Ajibewa, D., & Adedayo, O. (2017). Personality traits and cognitive distortions as predictors of pathological gambling among lottery youths who gamble in Ibadan Nigeria. *International Journal of Social Sciences, 11*(2), 104–114.

Potenza, M. N., Balodis, I. M., Derevensky, J., Grant, J. E., Petry, N. M., Verdejo-Garcia, A. & Yip, S. W. (2019). Gambling disorder. *Nature Reviews Disease Primers*, *5*, 51. doi: 10.1038/s41572-019-0099-7

Sadri, D. E., Mohammadyari, E., Jafari, M. S., & Hosseinian, S. (2020). The impact of solution- focused group counseling on the students' academic motivation. *Quarterly Journal of Child Mental Health, 6*(4), 23-34.

Sancartier, M. D., Shen, J. & Edgerton, J. D. (2019). Gambling among emerging adults: How gender and risk level influence associated problem behaviours. *Journal of Gambling Issues, 41*, 101–123.

Secades-Villa, R., Martínez-Loredo, V., Grande-Gosende, A., & Fernández-Hermida, J. R. (2019). The relationship between impulsivity and problem gambling in adolescence. *Frontiers in Psychology, 7*, 1–7.

Soberay, A. D., (2015). *Comparing Short-Term Outcome of Three Problem Gambling Treatment: A Multi-Group Propensity Score Analysis*. (Electronic Theses and Dissertations). Retrieved from https://digitalcommons.du.edu/etd/615

Tolchard, B. (2017). Cognitive-behaviour therapy for problem gambling: A critique of current treatments and proposed new unified approach. *Journal of Mental Health, 26*(3), 283–290. DOI: 10.1080/09638237.2016.1207235

Uwuimwonse, I. (2023). Prevalence of online gambling among undergraduates of a Nigerian public university. An unpublished research work carried out at the Faculty of Education, University of Benin.

ISSN: 2651-5687 (Print)
ISSN: 2651-5709 (Online)

Volberg, R. A., McNamara, L. M., & Carris, K. L. (2018). Risk factors for problem gambling in California: Demographics, comorbidities and gambling participation. Journal of Gambling Studies, 34(2), 361–377. DOI: 10.1007/s10899-017-9703-5.

Wangari, N. (2017). Understanding the Kenyan Gambling Consumer: Insights on Sports Betting. Retrieved from https://www.geopoll.com/blog/understanding-the-kenyan-gambling-consumer-insights-on-sports-betting.

Zhang, A. (2021). Solution-Focused Brief Therapy for Depression Among Adolescents and Young Adults Diagnosed with Cancer: An Open Pilot Trial. *Research on Social Work Practice, 32*(4), 388–401. doi:10.1177/10497315211062508

Zhang, A., Ji, Q., Currin-McCulloch, J., Solomon, P., Chen, Y., Li, Y., Jones, B., Franklin, C., & Nowicki, J. (2018). The effectiveness of solution-focused brief therapy for psychological distress among Chinese parents of children with a cancer diagnosis: a pilot randomized controlled trial. *Supportive Care in Cancer*, 26(8), 2901–2910. doi:10.1007/s00520-018-4141-1

Acknowledgment

This research was funded by the TETFund Institutional Based Research Fund (2024).