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Development of a Social Phobia Scale for Assessing Undergraduate and Senior Secondary Students in Nigeria

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Abstract

This study developed, validated and standardised an instrument for measuring social phobia among Nigerian students. The instrument is called the Students' Social Phobia Scale (SSPS) and comprises of five subscales namely: fear of people in authority, fear of meeting new faces, fear of being criticized by others, fear of public speaking, and fear of performing in public. The research examined the overall level of social phobia, its manifestations across different subscales, and variations by gender and educational level. A total of 608 students, including 277 undergraduates and 331 senior secondary school students, participated in the study. This was composed of 284 male students and 324 female students of both undergraduates and senior secondary. Cronbach's alpha was used to establish the internal consistency of the instrument and exploratory factor analysis was used to establish its construct validity. The internal consistency of the entire instrument using Cronbach's alpha was 0.976 and that of the subscales ranged from 0.893 to 0.934. The stability reliability coefficient of the entire test was 0.940 while those of the subscales ranged from 0.864 to 0.918. These estimates confirmed the SSPS's stability over time. The findings suggest a moderate overall level of social phobia among the students, with significant differences across subscales and demographic variables. The maximum and minimum scores obtained were 200.00 and 40.00 respectively with a mean score of 115.87. Gender differences revealed that female students exhibited higher levels of social phobia (118.24) compared to male students (113.14), while senior secondary students showed greater anxiety (117.54) than undergraduates (113.82). The normative data provided benchmarks for interpreting individual scores, with senior secondary and female students reporting higher mean scores. The study recommends the use of SSPS for targeted interventions, including gender-specific programmes and age-appropriate strategies, to address the varying levels and manifestations of social phobia.

Keywords: Social Phobia, Students, Psychometric Properties, Gender Differences, Educational Levels

Introduction

Man expresses fear in several dimensions some of which are innate while others are learnt. Fear, which is also known as phobia, has approximately two thousand classifications and only the fear of falling and the fear of loud noise are said to be innate to man (Gibson & Walk, 1960). This implies that the rest of the various dimensions of fear are learnt. One of such learnt fear is the social phobia.

Social phobia is described as an intense fear of social situations, where the individual anticipates negative evaluation or embarrassment, leading to avoidance behaviours and significant distress (Adewale, 2017). The fear starts with anticipation of a phobia-provoking situation even before the individual finds himself in the actual situation. Individuals suffering from social phobia tend to avoid such situations. According to Ogunleye (2019), an instantaneous fear does not qualify as social phobia rather it is a persistent fear of one or more social or performance situations where embarrassment might occur, particularly under scrutiny by unfamiliar people. In the words of Adeyemi (2015), social phobia is a psychological disorder which is characterized by significant anxiety and self-consciousness in social or performance situations, resulting in avoidance and functional impairment. Still in the same vein, Nwosu (2016) and Balogun (2016) described social phobia as an excessive and unreasonable fear of social situations, driven by worries about being judged or behaving in a way that might lead to embarrassment or ridicule. Social phobia could then be described as an intense and a persistent fear of social interactions, situations or performance, resulting in significant avoidance and distress, often impairing social and occupational functioning. It is an intense fear of being embarrassed or judged in social situations or a chronic mental health condition marked by overwhelming anxiety and excessive self-consciousness resulting in significant distress and avoidance of everyday social situations. (Olawale, 2017, Okafor, 2018, Eze, 2018, Alabi, 2020 & Uche, 2019).

Social phobia, also known as social anxiety disorder, is characterized by a pervasive and intense fear of social situations where an individual may be exposed

to scrutiny by others. This fear can lead to significant distress and avoidance behaviours, impacting various aspects of life, including educational performance, social relationships, and overall well-being (American Psychiatric Association, 2013). Social phobia typically manifests during adolescence or early adulthood, making it a critical issue within the student population (Kessler *et al*., 2005). This assertion reveals that social phobia manifests most prevalently in students in the secondary schools and in the universities.

The prevalence of social phobia among students is notably high, with studies indicating that approximately 7% to 13% of adolescents are affected by this disorder (Burstein *et al*., 2011; Merikangas *et al*., 2010). This anxiety can be triggered by a variety of social interactions common in academic settings, such as speaking in class, participating in group activities, or interacting with peers and teachers. The chronic nature of social phobia often results in significant academic challenges, including poor attendance, reduced participation, and lower academic achievement (Essau *et al*., 2014).

Research highlights the profound impact of social phobia on students' lives. Affected individuals frequently experience difficulties in forming and maintaining social relationships, which can lead to isolation and loneliness (Beidel *et al*., 2007). Additionally, the fear of negative evaluation and embarrassment often results in the avoidance of situations that are crucial for personal and professional development, such as public speaking, networking, and collaborative projects (Stein & Stein, 2008). Consequently, students with social phobia are at a higher risk of underachieving academically and failing to reach their full potential.

Accurate assessment of social phobia is essential for identifying affected students and providing appropriate interventions. Early detection and intervention can mitigate the adverse effects of social phobia, improve academic and social outcomes, and enhance the overall quality of life (Heimberg *et al*., 1999). Several assessment tools have been developed to measure social anxiety, including self-

report questionnaires, clinician-administered interviews, and observational methods.

Self-report scales are particularly valuable in educational settings due to their ease of administration and cost-effectiveness. Among the most widely used instruments are the Social Phobia and Anxiety Inventory (SPAI) and the Liebowitz Social Anxiety Scale (LSAS), both of which have demonstrated good reliability and validity in various populations (Garcia-Lopez *et al*., 2008; Heimberg *et al*., 1999). However, these scales often focus on general social anxiety symptoms and may not fully capture the unique experiences and challenges faced by students in academic environments.

Despite the availability of several assessment tools, there is a need for instruments specifically tailored to students' population. Existing scales may lack sensitivity to the specific contexts and situations that trigger social anxiety in students. For instance, the Social Phobia and Anxiety Inventory (SPAI) and the Liebowitz Social Anxiety Scale (LSAS) include items related to general social interactions, such as attending parties or meeting strangers, which may not be directly relevant to the academic experiences of students (Turner *et al*., 1989; Liebowitz, 1987). The Adolescent Social Phobia Scale (ASPS) developed by Kpolovie and Awaji-Inom (2011) made use of university students only, but this present investigation aimed at both the secondary school and university students which cover the age bracket at which social phobia is most prevalent.

Moreover, cultural and contextual factors play a significant role in the manifestation and perception of social phobia. Students from diverse cultural backgrounds may experience and express social anxiety differently, necessitating the development of culturally sensitive assessment tools (Hofmann *et al*., 2010). The need for a comprehensive, reliable, and valid scale that addresses these nuances and accurately reflects the experiences of students in educational settings is evident.

In response to the limitations of existing tools, this study aims to develop and validate the Students' Social Phobia Scale (SSPS), a new instrument designed to

assess social phobia specifically within student populations. The SSPS will incorporate items that reflect the unique social and academic challenges faced by students, ensuring a more accurate and relevant measurement of social anxiety in this group. By addressing the specific needs of students and incorporating the latest insights from social anxiety research, the SSPS aims to provide a valuable tool for researchers, educators, and clinicians. The scale's development and validation will contribute to the field of social anxiety research and enhance the identification and support of students with social phobia, ultimately improving their academic and social outcomes.

Research Questions:

1. What is the internal consistency of the Students' Social Phobia Scale (SSPS)?
2. What is the internal consistency of each of the Students' Social Phobia subscales?
3. What are the validities of each of the Students' Social Phobia subscales?
4. What is the validity of the Students' Social Phobia Scale (SSPS)?
5. What are the norms of the various groups of students on the Students' Social Phobia Scale (SSPS)?
6. How is the instrument administered, scored and interpreted?

Literature Review

The study of Social phobia, or social anxiety disorder among students has gained significant attention in recent years, both in Nigeria and internationally. This disorder is characterized by a persistent fear of social situations where individuals may be exposed to scrutiny by others. According to Obodo (2016), this condition affects a significant proportion of students, especially during adolescence and young adulthood, when social pressures intensify. The rise of social phobia among students, especially in educational settings, has been documented by Olaitan *et al*. (2020), who emphasized the academic and social challenges faced by those affected. Hence, there is need to develop instruments for detecting and handling this menace to our students' mental and emotional health.

Current scales may not adequately capture the unique experiences of Nigerian students, as highlighted by Adewuya (2006), who noted cultural and educational variations in the presentation of social anxiety in African contexts. Social phobia manifests in fear of social interactions, avoidance behaviours, and physical symptoms like sweating and shaking (Stein & Stein, 2008). Adegoke (2017) noted that in Nigerian students, symptoms often manifest in school settings, impacting their participation in class and extracurricular activities.

The cognitive-behavioral model, widely recognized in the literature, proposes that distorted thoughts and beliefs about social situations lead to anxiety (Clark & Wells, 1995). In Nigeria, Olatunji (2010) adapted this model, emphasizing the role of cultural expectations in amplifying social anxiety.

Adeyemi (2017) conducted a study focused on the development of a social phobia scale specifically for Nigerian senior secondary students. The research addressed social anxiety among adolescents in Lagos State, with a population comprising senior secondary school students. A total of 600 students were selected using stratified random sampling to ensure a representative sample. The instrument used was a 30-item social phobia scale designed for adolescents, covering key dimensions of social anxiety. Adeyemi employed factor analysis and Cronbach's alpha to analyze the data, identifying three main dimensions of social phobia: fear of negative evaluation, social avoidance, and performance anxiety. The scale demonstrated good internal consistency ($\alpha = 0.86$), making it reliable for assessing social phobia in Nigerian senior secondary students. The study is closely related to the present research in terms of its goal of developing a social phobia scale for this demographic. However, while Adeyemi's study is restricted to senior secondary students, the present research also includes undergraduate students, thereby expanding the age range and the social contexts under investigation.

Okon and Ekanem (2019) explored the psychometric properties of a social phobia scale among Nigerian adolescents. Their research population included adolescents in Cross River State, with a sample size of 700 students selected through

purposive sampling. The researchers developed a new Social Phobia Scale for Adolescents (SPSA), which they validated using exploratory factor analysis and Pearson correlation. The results showed a strong validity and reliability of the scale, with a significant correlation between social phobia and academic performance ($r = 0.73$). This study is related to the present research in that both aim to develop reliable measures of social phobia, although Okon and Ekanem's focus was specifically on adolescents, while the current study expands the scope to include university students.

Igbokwe (2020) developed and validated a social anxiety scale for Nigerian students, targeting both senior secondary school and undergraduate students in the South-East region. The study used a cluster sampling method to select 900 participants, aiming to ensure that the sample was representative of both secondary and undergraduate student populations. The instrument was developed through a rigorous process of item selection and expert review, followed by exploratory factor analysis to confirm the scale's structure. Igbokwe's findings indicated that the scale was highly valid and reliable, with strong internal consistency ($\alpha = 0.91$). This study aligns closely with the present research in its focus on both senior secondary and undergraduate students, making it particularly relevant. However, while Igbokwe's research was limited to students in the South-East region, the present study aims to cover a broader geographical scope.

Among international researchers, Smith *et al*. (2015) developed a social phobia scale tailored for high school students in the United States. The population included 500 students selected through random sampling, and the instrument was based on a comprehensive review of social phobia symptoms in adolescents. Using factor analysis, the researchers identified three key dimensions of social phobia: fear of negative evaluation, social avoidance, and performance anxiety. The scale demonstrated good reliability ($\alpha = 0.85$). This study is relevant to the present research as it provides a framework for developing social phobia scales, though the

cultural context differs. The present study focuses on Nigerian students, where social norms and expectations may affect the experience of social phobia differently.

Johnson and Davies (2018) expanded the scope by developing a social phobia scale for undergraduate students, recognizing the unique social challenges of university life, such as presentations and group work. The study involved 1,200 undergraduates from various U.S. universities, selected through random sampling. Using qualitative interviews, the researchers identified four dimensions of social phobia: fear of social judgment, social avoidance in academic settings, social performance anxiety, and fear of authority figures. The scale showed high internal consistency ($\alpha = 0.90$) and was validated through criterion validity testing. Johnson and Davies' work is related to the present study in its focus on undergraduates, but the present research extends to both secondary and university students, examining social anxiety in a wider age range.

In their study, Peters *et al*. (2012) developed and validated a social anxiety scale designed for adolescents and young adults. The study utilized a sample of 800 participants, employing stratified random sampling to ensure diverse representation. The researchers constructed the scale by refining items from existing social anxiety measures to enhance its applicability to younger populations. To evaluate its psychometric properties, they applied confirmatory factor analysis and measured internal consistency using Cronbach's alpha, which resulted in a reliability coefficient of 0.88. Their findings are relevant to the present study, particularly in the adaptation and validation of social anxiety assessments for specific demographic groups. However, while Peters *et al*. focused on adolescents and young adults, the current study extends its scope by encompassing both secondary school and undergraduate students, offering a more comprehensive perspective on social anxiety across different educational stages.

In an international study, Chen *et al*. (2016) focused on developing a social phobia scale for Chinese high school students. The sample consisted of 700 students selected through random sampling. The scale was designed based on cultural-

specific indicators of social anxiety, such as fear of social judgment in large groups. Using exploratory factor analysis, the researchers identified two major dimensions: fear of negative evaluation and social avoidance. The scale demonstrated high internal consistency (α = 0.87). While Chen *et al*.'s work offers insights into social phobia among high school students, the present study differs in its Nigerian context, where social interactions and expectations may vary significantly from Chinese culture.

Garcia and Perez (2017) conducted a study on the development of a social phobia scale for Spanish adolescents. The study involved 900 students selected through random sampling, and the researchers utilized both exploratory and confirmatory factor analysis to validate the scale. The scale identified three dimensions of social phobia: fear of negative evaluation, performance anxiety, and social avoidance. The reliability of the scale was high, with a Cronbach's alpha of 0.89. Garcia and Perez's study is relevant to the present research in its focus on adolescents, though it was conducted in a Spanish cultural context, which may have different social norms than Nigeria.

Finally, Kawamura and Shimizu (2019) developed a social anxiety scale for Japanese university students. The sample included 600 students selected through stratified random sampling. The researchers identified two major dimensions of social anxiety: fear of judgment from peers and avoidance of social situations. The scale demonstrated strong reliability (α = 0.86) and validity. This study is related to the present research in its focus on undergraduates, but the cultural context differs, and the present study also includes senior secondary students.

These studies provide an understanding of the development and standardization of social phobia scales across different cultures and educational levels. While most studies share common dimensions of social phobia, such as fear of negative evaluation and social avoidance, the present study distinguishes itself by focusing on both senior secondary and undergraduate students within the Nigerian context.

Method

The study adopted an instrumentation design and made use of purposive sampling technique to draw a sample of 300 students from two public secondary schools and three higher institutions of learning in Rivers State, Nigeria. This sample comprised of 150 secondary school students and 150 undergraduate students of polytechnics/universities. The researchers developed a Likert type instrument of 100 items with five subscales. Each subscale comprised of 20 items and was subjected to face and content validation by three experts: two in the area of educational measurement and evaluation and one in educational Psychology. Bad items were replaced while faulty ones were rephrased after the face and content validation. The initial administration was conducted on this sample and scores were subjected to factor analysis using Statistical Package for Social Sciences (SPSS) after which 40 items were selected, 8 for each subscale. Final administration was done on a sample of 608 students shown as follows: undergraduate students = 277 (male = 140, female = 137); senior secondary students = 331 (male = 144, female = 187). These gave a total of 284 male students and 324 female students of both undergraduates and senior secondary. The entire instrument had a reliability coefficient of (0.886, 0.94). The reliability coefficients of the various subscales are as follows: Subscale A: Fear of people in authority (0.848, 0.918), Subscale B: Fear of meeting new faces (0.837, 0.911), Subscale C: Fear of being criticized by others (0.799, 0.888), Subscale D: Fear of public speaking (0.761, 0.864), and Subscale E: Fear of performing in the public (0.780, 0.876).

This instrument was adapted from SIAS by Brown, *et al* (1997) and ASPS by Kpolovie and Awaji-Inom (2011). It is made up of five subscales which measure the various ways in which social phobia could manifest in an individual. The various subscales are as follows: Subscale A: Fear of people in authority; Subscale B: Fear of meeting new faces; Subscale C: Fear of being criticized by others; Subscale D: Fear of public speaking; Subscale E: Fear of performing in the public.

Results

Table 1: Descriptive statistics of sample

Gender/Level of Education	Undergraduates	Senior Secondary	Total
Male	140	144	284
Female	137	187	324
Total	277	331	608

Table 1 indicates that a total of 284 male and 324 female students were used for the study. This figure consists of 277 undergraduates and 331 secondary school students.

Research Question One: What is the internal consistency of the Students' Social Phobia Scale (SSPS)?

Research Questions Two: What is the internal consistency of each of the Students' Social Phobia subscales?

Table 2: Internal Consistency of each Subscale

Description	Cronbach Alpha
Entire instrument	0.976
Subscale A: Fear of people in authority	0.928
Subscale B: Fear of meeting new faces	0.934
Subscale C: Fear of being criticized by others	0.919
Subscale D: Fear of public speaking	0.893
Subscale E: Fear of performing in the public	0.896

Table 2 shows the validities of the entire instrument and its subscale using the internal consistency method. The internal consistency of the entire instrument had a Cronbach Alpha coefficient of 0.976. The internal consistencies of the various subscales each had a Cronbach Alpha coefficient as follows: Subscale A: Fear of people in authority (0.928), Subscale B: Fear of meeting new faces (0.934), Subscale C: Fear of being criticized by others (0.919), Subscale D: Fear of public speaking (0.893), and Subscale E: Fear of performing in the public (0.896). These provide answers to research questions 1 and 2 which seek to find out the internal consistency of the entire instrument (SPSS) as well as those of each of its subscales.

Research Question Three: What are the norms of the various groups of students on the Students' Social Phobia Scale (SSPS)?

Table 3: Norms of the various groups.

Description	Mean Scores
Maximum score	200.00
Minimum score	40.00

All students	115.87
Undergraduates	113.82
Senior secondary students	117.54
Male students	113.14
Female students	118.24

Table 3 shows the norms of the various groups. The maximum and minimum scores that could be obtained were 200.00 and 40.00 respectively. All the students had a mean score of 115.87. Each of the norming groups had their mean scores as follows: undergraduates (113.82), senior secondary school students (117.54), male students (113.14) and female students (118.24). These provide answer to research question 1 which seeks to find out the norms of the various groups of students on the Students' Social Phobia Scale (SSPS).

R**esearch Question Four:** What are the validities of each of the Students' Social Phobia subscales?

Table 4: KMO and Bartlett's Test for each Subscale

	FACTOR A	**FACTOR B**	**FACTOR C**	**FACTOR D**	**FACTOR E**
Kaiser-Meyer-Olkin Measure of	.939	.938	.925	.918	.917
Bartlett's Test of Sphericity:					
Approx. Chi-Square	3152.036	3322.645	2939.158	2666.797	2651.323
Df	28	28	28	28	28
Sig.	.000	.000	.000	.000	.000

Table 4 shows the Kaiser-Meyer-Olkin (KMO) measure of sampling adequacy yielded coefficients ranging from 0.917 to 0.939 which indicated that the data were suitable for factor analysis (KMO≥ 0.6). The table also shows the Bartlett's Test of Sphericity (X^2 = 2651.323 to 3322.645, df = 28, sig. = 0.00) is significant ($p < 0.05$) and indicated that the eight items for each of the five subscales were sufficient for the analysis.

Table 5: Communalities, Factor Loadings and Total Variance Explained for each subscale

ITEMS	FACTOR A		FACTOR B		FACTOR C		FACTOR D		FACTOR E	
	Comm	**Loadin**	**Comm**	**Loadin**	**Comm**	**Loadin**	**Comm**	**Loadin**	**Comm**	**Loadin**
ITEM 1	.637	.798	.506	.711	.530	.728	.245	.495	.325	.570
ITEM 2	.603	.777	.604	.777	.541	.735	.618	.786	.689	.830
ITEM 3	.563	.750	.581	.763	.627	.792	.675	.821	.615	.784
ITEM 4	.584	.764	.695	.834	.550	.742	.663	.814	.420	.648
ITEM 5	.657	.811	.745	.863	.579	.761	.563	.750	.449	.670
ITEM 6	.691	.831	.727	.852	.647	.804	.537	.733	.621	.788

ITEM 7	.611	.798	.634	.796	.615	.784	.592	.769	.636	.798
ITEM 8	.599	.774	.501	.708	.612	.782	.499	.706	.627	.792
Total Variance (%)	61.819		62.414		58.747		54.893		54.777	

Table 5 reveals the communalities of the eight items for each of the five subscales ranged from 0.3.25 to 0.691 except Item 1 for Factor 4 (0.245). They indicated that the items were well represented by the factor. The factor loadings for the eight items of each of the five subscales were all greater than 0.3 ranging from 0.495 to 0.863 which showed that each of the items contributed meaningfully to their respective factor. The extracted factor accounted for 61.819%, 62.414%, 58.747%, 54.893% and 54.777% for Factors 1 to 5, respectively, of the total variance in the items.

Research Question Five: What is the validity of the Students' Social Phobia Scale (SSPS)?

Table 6: KMO, Bartlett's Test and Total Variance Explained for the Whole Test

	FACTORS
Kaiser-Meyer-Olkin Measure of Sampling Adequacy	.977
Bartlett's Test of Sphericity:	
Approx. Chi-Square	19142.283
Df	780
Sig.	.000
Total Variance (%)	52.320

Table 6 shows the Kaiser-Meyer-Olkin (KMO) measure of sampling adequacy for the whole test yielded a coefficient of 0.977 which indicated that the data were suitable for factor analysis (KMO≥ 0.6). Bartlett's Test of Sphericity (X^2 = 19142.283, df = 780, sig. = 0.00) is significant ($p < 0.05$) and indicated that the 40 items of the entire test were sufficient for the analysis. The extracted factor accounted for 52.32% of the total variance in the items.

Table 7: Communalities and Factor Loadings for the Whole Test

Items	**Commu**	**Loadings**	**Items**	**Commu**	**Loadings**	**Items**	**Commu**	**Loadings**	**Items**	**Commu**	**Loadings**
ITEM 1	0.579	0.761	ITEM 11	0.489	0.699	ITEM 21	0.566	0.752	ITEM 31	0.519	0.721
ITEM 2	0.551	0.742	ITEM 12	0.543	0.737	ITEM 22	0.609	0.781	ITEM 32	0.526	0.726
ITEM 3	0.457	0.676	ITEM 13	0.591	0.769	ITEM 23	0.586	0.766	ITEM 33	0.316	0.563
ITEM 4	0.501	0.708	ITEM 14	0.586	0.766	ITEM 24	0.607	0.779	ITEM 34	0.559	0.748
ITEM 5	0.545	0.738	ITEM 15	0.541	0.736	ITEM 25	0.195	0.442	ITEM 35	0.548	0.74
ITEM 6	0.562	0.75	ITEM 16	0.554	0.744	ITEM 26	0.512	0.715	ITEM 36	0.398	0.631

ITEM 7	0.589	0.767	ITEM 17	0.495	0.703	ITEM 27	0.571	0.756	ITEM 37	0.416	0.645
ITEM 8	0.565	0.752	ITEM 18	0.504	0.71	ITEM 28	0.636	0.798	ITEM 38	0.487	0.698
ITEM 9	0.504	0.71	ITEM 19	0.572	0.757	ITEM 29	0.563	0.751	ITEM 39	0.538	0.733
ITEM 10	0.55	0.742	ITEM 20	0.535	0.731	ITEM 30	0.448	0.67	ITEM 40	0.515	0.717

Table 7 shows the communalities of the 40 items of the entire test ranged from 0.398 to 0.636. They indicated that the items were well represented by the factor (social phobia). The factor loadings for the 40 items were all greater than 0.3 ranging from 0.442 to 0.798 which showed that each of the items contributed meaningfully to the factor (social phobia) being assessed.

Research Question 6: How is the instrument administered, scored and interpreted?

Administration:

SSPS should be administered individually or in a group after establishing rapport with the respondents. It should be well explained to them that the information that will be provided will be treated with utmost confidentiality. They should be encouraged to read through carefully and respond to each statement to the best of their knowledge/ability.

Scoring:

Direct Scoring: for direct statements, the responses should be scored as follows - A= 5, M= 4, S= 3, R=2, N=1.

Reverse Scoring: for reverse statements, the responses should be scored as follows - A= 1, M= 2, S= 3, R=4, N=5.

The direct statements are items number: 1, 4, 6, 7, 9, 12, 13, 15, 16, 17, 19, 20, 21, 23, 25, 26, 28, 30, 32, 34, 36, 38, 39 and 40.

The inverse statements are items number: 2, 3, 5, 8, 10, 11, 14, 18, 22, 24, 27, 29, 31, 33, 35 and 37.

Discussion

The maximum and minimum scores that could be obtained were 200.00 and 40.00 respectively. All the students had a mean score of 115.87. Each of the norming groups had their mean scores as follows: undergraduates (113.82), senior secondary school students (117.54), male students (113.14) and female students (118.24).

These scores reveal that social phobia is more prevalent in secondary schools than in universities. It therefore implies that this disorder reduces with age, hence one's ability to combat it can improve with advancement in age. Leigh and Clark (2020) highlighted the role of age in social phobia, demonstrating that social anxiety tends to peak during adolescence and early adulthood. Their findings suggest that as individuals transition from family reliance to peer interactions, they experience heightened self-consciousness, increasing their susceptibility to social anxiety. Furthermore, their study emphasized the role of social media in amplifying social fears and avoidance behaviors among younger individuals. These findings support the present study's conclusion that age significantly influences the prevalence and intensity of social phobia. However, the finding of the present study is discordant with that of Hashempour (2017) and Campbell (1996) who discovered that age had no significant influence on social anxiety disorder. This difference in findings could have been as a result of early detection of social anxiety disorder conditions among children which improved with treatment and intervention and subsequently prevented social anxiety disorder at later ages.

The results on the norming groups further revealed that social phobia is higher in females than in males. It implies that sex might be factor that correlates with social phobia. This is in consonance with the findings of Asher, *et al* (2017) who discovered that women are more likely to have social anxiety disorder (SAD) and report greater clinical severity than men. Campbell (1996) and Kuusikko-Gauffin, *et al*. (2012) also discovered that Women nearly twice as often develop social anxiety disorder compared to men and that social anxiety was more prevalent in women than in men. However, the finding of the present study is discordant with that of Campbell (1996) who discovered no significant difference between male and female categories in social anxiety. This difference could have been as a result of early detection of social anxiety disorder among male and female children and treatment which improved the conditions of the individuals used in the study. Hence, no significant difference was recorded.

Internal consistency reliability coefficient of the entire test was 0.976 while those of the subscales ranged from 0.893 to 0.934. This coefficient implies that the items of the various subscales of the instrument measured the same trait which is social phobia. The stability reliability coefficient of the entire test was 0.940 while those of the subscales ranged from 0.864 to 0.918. The entire instrument had a stability coefficient of 0.94 while those of the various subscales ranged from 0.893 to 0.934. These indicate high level of stability. In other words, the instrument as well as its subscales measured consistently the level of social phobia in the respondents over time. These results are in consonance with the findings of Kpolovie and Awaji-Inom (2011) who discovered high reliability coefficients of both the entire tests for assessing social phobia and its sub scales.

Conclusion

The findings of this study highlight the prevalence of social phobia among students, with higher levels observed in secondary school students and females. The strong internal consistency and validity of the Students' Social Phobia Scale (SSPS) confirm its reliability as a measurement tool. The results suggest that social phobia tends to decrease with age, emphasizing the need for early interventions. Given the significant gender differences, targeted support programmes are necessary. Overall, the study underscores the importance of structured interventions and further research to mitigate social phobia's impact on students' academic and social development.

Recommendations

Based on the study's findings, early intervention programs should be introduced in secondary schools to help students develop social confidence. Gender-sensitive support services, particularly for female students, should be implemented to address their unique challenges. Awareness campaigns on social phobia and coping strategies are essential for students, teachers, and parents. Schools should incorporate social skills training into curricula through activities like public

speaking and group interactions. Finally, further research should explore the long-term impact of social phobia to develop more effective interventions.

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