



Effect of Self Instruction Technique on Generalized Anxiety among Secondary School Adolescents in Enugu State, Nigeria

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Authors' contributions

This work was carried out in collaboration among all authors. All authors read and approved the final manuscript.

Article Information

DOI: 10.9734/AJARR/2022/v16i930497

Open Peer Review History:

This journal follows the Advanced Open Peer Review policy. Identity of the Reviewers, Editor(s) and additional Reviewers, peer review comments, different versions of the manuscript, comments of the editors, etc are available here: <https://www.sdiarticle5.com/review-history/89212>

Original Research Article

Received 14 May 2022
Accepted 18 July 2022
Published 03 August 2022

ABSTRACT

The study is on the effect of Self Instruction Technique on generalized anxiety among secondary school adolescents in Enugu East Local Government area of Enugu State, Nigeria. Two research questions and two hypotheses guided the study. The research design is quasi experimental. The population of the research work consist of secondary school students who were identified as positing generalized anxiety in the area of study and they were two hundred and three in number (203). Out of these 203 students, 61 made up the sample for the study and were those that posited generalized anxiety in the two schools in the area with the highest number of generalized anxiety victims. In order to collect the data for the study, Beck Anxiety Inventory was used. The inventory consist of 21 items and was adopted for the research. In analyzing the Data that were collected, mean scores and Analysis of Covariance (ANCOVA) were used to answer the research questions and test the hypotheses respectively. The study in its findings revealed that the technique; Self Instruction has effect on secondary school students with generalized anxiety. On the retention effect the findings of the study also indicated that Self Instruction Technique was retained twelve weeks after the treatment. The researchers therefore, recommended among others that guidance counsellors should incorporate Self Instruction Technique while handling secondary school

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students with generalized anxiety. In addition, Guidance Counsellors should arrange for seminars and workshops for teachers, in order to inculcate the process of using Self Instruction Technique in behavior modification especially such behavioural problems like generalized anxiety.

Keywords: Self instruction technique; generalized anxiety; adolescents; secondary school; students.

1. INTRODUCTION

Adolescents in carrying out their tasks require an optimal level of anxiety but in a situation where the level of anxiety is above the optimal level there is usually a decline in performance, especially academic performance. In other words, learning is more effective when the scenario is free from anxiety or apprehension. This therefore makes generalized anxiety to be dysfunctional to the academic progress of the victims, who suffer from fear of the unknown, nervousness, lightheadedness, heart pounding, shaking, restlessness and panicking (Becks 1990).

However, According to Smith [1], something can be done to overcome behavioural problems like panic disorder, anxiety among others and this entails proffering ideal and long lasting solution to the negative impact of such problems even to the generation to come. In line with this assertion Zashow, [2] pointed out that when such behavioural problems are not treated, there is no doubt, that students with such problems may end up dropping out of school and if they eventually complete their education may come up with poor grades. Similarly, those who resort to taking of drugs to resolve the anxiety may not get a lasting solution [3]. These ugly developments should not be allowed to continue. In the bid to curb the harmful effects of generalized anxiety especially on learning Thompson [4], also posited that teachers have applied different forms of punishment and other measures to control generalized anxiety such as scolding, standing up in class, making the students to go to hospitals, yet these measures could not control the problem because these are external impositions on the victims of generalized anxiety. The minds of the researchers of this study were therefore, agitated to sought for techniques that could suit the reduction of such behavioural problems due to the inability of these measures to give lasting solutions to the behavioural problems. Furthermore, series of researchers like Okoye [5], Onwuka [6] have emphasized on the need to apply measures that modify the behavioural problems, since undesirable behaviours can be learned and unlearned. According to Obi, Nwankwo & Obi, [7] in the western world much

attention has been given to the reduction of generalized anxiety whereas in Nigeria such behavioural problems like anxiety may not be duly noticed and may not be given the proper attention.

It becomes necessary therefore to determine approaches on how best to eliminate or reduce generalized anxiety among adolescents through measures applied by the clients themselves, in order to ensure that this group would not only achieve their set educational goals but also develop into socially and emotionally balanced personalities. Thus this research work sought behavioural technique that mobilize the will power on the generalized anxiety victims with the bid to overcome it. It is pertinent to buttress Nutt-Williams & Hill [8], who pointed out the views of Aristotle; the philosopher and the founder of psychology as a separate study, when he, Aristotle said that, he count himself braver, when he overcomes his desires, than when he overcomes his enemies, for the best victory is the victory over self. Besides, individuals are capable of controlling their behaviour when taught how to and hence the result will be more lasting than when the control measures are applied by someone else. One fundamental basis of this technique is the mobilization of the will power of the victims to control oneself.

Following Meichembaum's Cognitive Behavioural theory [9], Self Instruction Technique, was posited as a behaviour modification technique based on the idea of monitoring ones thought, developing verbal mediators, stopping negative thoughts and replacing them with positive thoughts. It is directed at influencing and reversing what one says to oneself. The proponent is of the view that when thoughts are negative it could influence behaviour and these negative thoughts could be reversed to positive thoughts. Hence, Self Instruction technique is aimed at reversing what one says to oneself. According to Thompson [4], ones thought reflects in ones actions and when the thoughts are negative could result to fear, as such to reverse what students say to themselves Self Instruction technique can be applied.

Obviously it is the duty of counsellors to carry out behaviour modification in their schools. This has been observed as being done by school counsellors but they may not specifically use this technique. It is pertinent to point out that the researchers observed that just like in every other environment the area where this study was carried out have trained counsellors who are aware of behaviour modification and have been carrying out their duties and may not have been restricted to Self Instruction technique in their regular schedule of duties. Hence the research assistants that manned the control group of this study were instructed to use the usual conventional counselling adopted by counsellors and not self instruction technique.

However, according to researchers like Corey [10], Ventis, [11], Wine [12], Beck [13], and many more, to change ones behavioural pattern, the first thing is to instruct the client on how to identify the negative thoughts that are encouraging ones actions. Furthermore, different techniques have different roles and Literature have showed evidence of the effectiveness of Self Instruction Technique in reducing undesirable behaviours such as test anxiety, phobia and aggression, [14-17]. These therefore calls for the need to ascertain if Self Instruction Technique has effect on Generalized Anxiety of Adolescents. Hence, the content scope of this study is on the effect of Self Instruction Technique and the retention of the effect on secondary school adolescents with Generalized Anxiety in the study area. Being a quasi- experimental research, only one Local Government Area was used as the Area of study. Specifically, the research covered senior secondary school adolescents, excluding the examination class (SSS3) students. The SSS3 students being examination class were exempted owing to the fact that they are busy with examinations and no school management will allow such a class to be used for research at such periods.

1.1 Statement of the Problem

It is pertinent to reaffirm that adolescents in carrying out their tasks require an optimal level of anxiety but in a situation where the level of anxiety is above the optimal level there is usually a decline in performance, especially academic performance. Adolescents in their transition to adulthood, learn adaptive and maladaptive modes of reacting to experiences in their environment, but observations made by most counsellors show that in secondary schools,

generalized anxiety appears to be on the increase among adolescents and may become a threat to effective teaching and learning if not checked. It is worthy to point out that based on some anxiety inventories like the one used in this work, adolescents who are victims of generalized anxiety report fear of going to school, physical symptoms of illness, some level of depression, nervousness, progressive lower level of self-esteem and diminished ability to learn in school.

Previous observations show that School teachers and administrators have tried to solve the problem of generalized anxiety among adolescents in schools by employing various measures such as scolding, sending students away during lessons, and even sending the students for medical treatment whereas the signs posited may not be of medical case. Furthermore, school counsellors have been adopting the routine conventional counselling, emphasizing on the need to study, organizing orientation for students and seminars stressing study skills, study habits among others, with the view that most students are exposed to anxiety because they do not have study skills. These measures have not solved the problem of generalized anxiety among adolescents. These measures are impositions and external to the victims of generalized anxiety.

It becomes necessary therefore to determine approaches on how best to eliminate or reduce generalized anxiety among adolescents through measures applied by the clients themselves, in order to ensure that this group would not only achieve their set educational goals but also develop into socially and emotionally balanced personalities. Thus this research work sought behavioural technique that mobilize the will power on the generalized anxiety victims with the bid to overcome it. It becomes reasonable to ascertain the effect of Self Instruction Technique on Generalized Anxiety of Adolescents in Enugu East Local Government of Area Enugu State.

1.2 Purpose of the Study

The study determined effect of Self Instruction Technique on Generalized Anxiety among Adolescents in Secondary Schools in Enugu East Local Government Area of Enugu State. Specifically, the study determined the:

1. Effect of Self Instruction Technique on Secondary School Adolescents with Generalized Anxiety using pretest post test mean scores.

2. Retention mean scores of Secondary School Adolescents with Generalized Anxiety exposed to Self Instruction Technique and the retention mean scores of Secondary School Adolescents with Generalized Anxiety in the Control group.

1.3 Research Questions

The following research questions were formulated to guide the study:

1. What is the difference in the pretest posttest generalized anxiety mean scores of students treated with Self Instruction Technique and those in the control group?
2. What is the difference in the posttest and retention generalized anxiety mean scores of Students treated with Self Instruction Technique and those in the Control group?

1.4 Hypotheses

The following null hypotheses were tested at 0.05 level of significance:

1. There is no significant difference in the effect of Self Instruction Technique in reducing students' generalized anxiety when compared with those in the control group using their mean scores.
2. There is no significant difference in the effect of Self Instruction technique in the retention of reduced student's generalized anxiety when compared with those in the control group using their mean scores.

2. LITERATURE REVIEW

This section presents the review of related literature for the study under the following sub headings

2.1 Self Instruction Technique

Self Instruction technique is based on the premix that human feelings and thoughts influence the way they handle certain things in real life situation. Paris and Paris [18], concurred that Self Instruction involves the individual monitoring, directing and regulating actions towards goals for self-improvement. Dwecky [19], expatiated that individuals who are aware of their thoughts influence on their behaviour and attitude apply these Self Instruction strategies to tackle daily life challenges. The advocates of Self Instruction like Perry, Phillips & Hutchinson [20], posited that

students who imbibe the process of Self Instruction, belief that opportunities to take on challenges, help them to develop a deep understanding of self and efforts will aid them face the challenges of life without fear of failure. Pintrich and Schunk [21], asserted that development of self-regulated attitude usually aid the individual's self efficacy. Thus, Halderman and Baker [22], pointed out that often times the Counsellor hears adolescents saying such things like: - I cannot do that, I will not be able to meet up with school activities, which according to him indicate self-defeating thoughts. In line with this, Richard [23], noted that Self Instruction technique was designed to help individuals with anxiety in becoming aware of their self-defeating and irrelevant thoughts, which interfere with their preparation and effective functioning in the society. Goldstein, Levin and Goldman (2009), opined that Self Instruction is a Cognitive technique that uses self talk to give clients control over their behaviour, these self talks according to them gradually become covert and self-generated.

A lot of studies have been conducted using Self Instruction technique as a self-control strategy, for instance, Wild & Duinn [24], carried out a study on the effect of corporative competitive and individual use of self instruction method on learner's Achievement in library skills. In the study a self-instructional mode is combined with cooperative, competitive and individualized techniques in the teaching of library skills. The result showed that self instruction is effective in the learning of library skills. The researchers therefore concluded that students should be taught how to adopt library skills using self instruction techniques.

In other words Self instruction therapy aims to give clients control over their behaviour through guided self-talk that gradually becomes self-generated. Several studies have been conducted using Self instruction technique and most of the results show that it is effective while some show ineffective results.

2.2 Generalized Anxiety

Generalized anxiety can be developed as a child, adolescent and adult, not minding that one under normal condition can have anxiety when exposed to stress, but when the apprehension affects ones activities is an indication of generalized anxiety. Mitchel (2009), pointed out, that the tendency of having difficulty in the learning and teaching

process can aggravate nervousness, having difficulty organising thoughts, restlessness, among others. These go to say that the clients do not feel normal, once the learning process is presented before them, and the tendency will be to avoid the situation and its circumstances, which make the academic environment uncomfortable for them. Bower [24], enumerated the physical signs of generalized anxiety as, sweaty palms, stomach upset, headache, rapid heartbeat, mental block, going blank on questions and many more. In the view of Goliath [25], victims of generalized anxiety usually have negative perception of self, which they display in their attitude and habit which in turn predispose them to be afraid.

Goberman, Hughess, and Haydock, [26], in their study; the acoustic characteristics of public speaking anxiety and practice effects, the main purpose of the study was to examine the effects of anxiety and practice of speech and voice during public speaking. Self rating and acoustic speech data were reported on two separate speech produced by 16 college aged individuals completing course work in interpersonal communication. However, the results showed that there were significant relationships between acoustic characteristics of speech and both self and listener ratings of anxiety in public speaking. Furthermore, Fitzpatrick [27], reported that in a study conducted by the National Institute of mental health 5.1% - 12.5% of Americans are hit with different forms of anxiety and phobias, the design was a survey type using both men and women of about 250; 125 each, in number, using percentages. According to the report, they are the most common behavioural problem among women of all ages and are the second most common problem among men older than 25.

2.3 Adolescents

Adolescents are faced with the task of biological, sexual and physical developments. Adolescents according to Atwell [28], is the period between the age 12 and 20, a time of rapid psychological and neurological development, during which children develop morally, cognitively and socially. To this Uwakwe [29], concurred that Adolescence is a period of transition from childhood to adulthood, that it is probably the most challenging and tasking phase in the developmental process of human beings. Thus, Ahmed and Bower [30] asserted that adolescents struggle to cope with these changes and may develop emotional disorders, such as phobia, depression and

anxiety. The adolescent years are periods when individuals can be helped to identify their self-defeating irrational ideas and learn how to cope with such thoughts.

3. METHODS

The population of this study was 203 adolescent students with generalized anxiety in all the Public Senior Secondary Schools in Enugu East Local Government Area, Enugu State, Nigeria. The researchers got the Population of Study from the result of the Pre test administered to the students in the Senior Secondary Schools of all the Government owned Secondary Schools in the Local Government Area. These students were identified using Becks Anxiety Inventory, (BAI). The pre test administered had a score of 36 as the base line. Thus, students who scored 36 and above, were selected as clients for concern as per this research and formed the norm of the study.

Using the pre test results of each of the public senior secondary schools the sample for the study was gotten as 61 senior secondary school students and was derived from the population of 203 adolescent students in the Local Government Area, the two schools who exhibited the highest number of students with generalized anxiety were selected to form the sample size. The sample size comprises of students in Senior Secondary School one and two within the age of 13 to 16 years and the two schools were coeducational schools, thus the groups had both male and female students. The number of students with generalized Anxiety in each of the schools were recorded, and then the schools were arranged hierarchically from the school with the highest number of students with generalized anxiety to the least. The students both males and females, in the two schools that have the highest number of students with generalized anxiety were purposively selected and formed the sample for this work. The two schools were referred in this work as group B and group C.

Furthermore, in assigning treatment models to the two groups, non random sampling was used, to which students with generalized anxiety in School B as group one and were treated with Self Instruction Technique, while students with generalized anxiety in School C served as the control group and were given conventional counselling. As earlier stated, the instrument used in this study is Beck anxiety Inventory (BAI) and was adopted by the researchers. The

inventory served as the pretest, post test and retention test instrument. The instrument has been validated in numerous studies for use in Nigeria for instance Elliegwu, (2002), in his validation of BAI in adolescents found the Beck Anxiety inventory to be an accurate measure of anxiety symptoms in adolescents. However, the inventory was further content validated and approved by experts in the Department of Guidance and Counselling, Faculty of Education, Nnamdi Azikiwe University, Awka, Anambra State, Nigeria. The internal consistence for the inventory according to Beck (1990), ranged from .86 to .95 and the test retest reliability coefficient ranged from 70 to 75 as indicated in the instrument. The treatment was administered using Self Instruction technique in their group counselling process by the research assistants who are counsellors in the experimental school, while the control group received conventional counselling by their school counsellor. The Counselling period for the SIT was one session per week respectively, each session lasting at least 45 minutes, for 6 weeks and was done during the class counselling period as was agreed with the school guidance counsellors. At the end of the counselling period, a post test was administered to the two groups. Three months later a retention test was given to the treatment group to verify if the effect of the treatment was retained. This enabled the researchers to answer and test the Research questions 1 and 2 and the hypotheses of this study respectively.

3.1 Control of Extraneous Variables

This work has we have the dependent variable which is Generalized Anxiety and independent variable which is Self Instruction technique and in a study like this, there is the probability that other independent variables not being studied could influence the results if not checked. These independent variables other than the ones being studied were what we called extraneous variables.

Hence, the following extraneous variables were identified in this study and were checked or controlled as follow:

3.1.1 Interaction between the actual treatment group and the control group

To avoid interaction between the students who are receiving treatment and those students in the control group, different secondary schools at a

distance were used which were selected purposively as earlier explained.

3.1.2 Reducing test-wiseness by the students

This was checked by rearranging the numbers on the inventory, to avoid the students feeling they were being retested, which if they knew may make them mechanical in their response. Furthermore, the Counsellor of each of the schools were used as research assistants.

3.1.3 Experimental mortality

Where the experiment lasts for a longer time, incidence of mortality may arise, that is a situation whereby clients used for experiment reduce in number before the end of the treatment. Thus experimental mortality like death, illness, transfer of students to another school or withdrawal was taken care of by the moderate time gap of six weeks that was used for the treatments. Furthermore, with the use of reinforcement, the clients were motivated and did not find the programme boring, rather interesting that at the end of each session the counsellor inquired from the clients how educative the Counselling was and if they enjoyed it.

Selection biases: The treatment group and the control group were selected purposively. Each of the groups was not aware that another group existed. The researchers did not select all SS1 and SS 2 students with lower scores on anxiety for the experimental group, or all SS1 and SS2 students with higher scores on generalized anxiety for the control group, thus the internal validity of between groups was not threatened. The criterion for any client to be a member of a group was the result of the BAI. Hence any difference between the Pre test and the Post test results is attributed to the treatment given to the experimental groups.

3.2 Method of Data Collection

The establishment of a baseline before treatment is of paramount importance in behavior modification. This gives direction to the study and helps the researchers in ascertaining if treatment is effective or not. Therefore the entry anxiety level of students was considered, using the pre test. This enabled the researchers in the establishment of the baseline for this study and also showed if it has any effect on the treatment and final generalized anxiety level of the subjects.

3.3 Method of Data Analysis

The Data collected for the study were organized in tables and analysed. Mean scores were used in answering the research questions while Analysis of Covariance (ANCOVA) was used in testing the hypotheses and was tested at 0.05 level of significance. ANCOVA was used in order to check for pre-test and post-test differences.

4. RESULTS

After the collection of the data, they were presented in tables and analysis was done.

Question 1: What is the difference in the Pretest and Posttest generalized anxiety mean scores of students treated with Self-Instruction and those who received Conventional Counselling?

Table 1 indicates pretest mean score of 33.97 and posttest mean score of 12.81 with lost mean 21.16, for the students with generalized anxiety who received treatment using Self Instruction Technique, while the students in the control group who received conventional counselling had pretest mean score of 33.00 and posttest mean score of 27.68 with lost mean 5.32. Therefore self-instruction technique is effective in reducing the students' generalized anxiety.

Research Question 2: What is the difference in the Posttest and Retention Generalized Anxiety mean scores of students treated with Self-Instruction Technique and those in the conventional counselling?

Table 2 indicates that the clients who were exposed to Self Instruction Technique had mean score of 12.81 and their retention mean score was 10.74 which gives a lost mean of -2.07 in their generalized anxiety, while the students in the control group who were exposed to conventional counselling had posttest mean score of 27.68 and retention mean score of 26.50 which entails lost mean of -1.18 Therefore the students who were treated with Self Instruction Technique retained better than those in the control.

Hypothesis 1: There is no significant difference in the effect of Self Instruction Technique in reducing generalized anxiety of secondary school students when compared with those in the control group who received conventional counselling using their mean scores.

In Table 3 it was observed that at 0.05 level of significance, 1df numerator and 59df denominator, the calculated F 173.98 is greater than the critical F 4.01. Therefore, the null hypothesis is rejected. So, the effect of self instruction technique on secondary school students with generalized anxiety is significant when compared with those in the control group.

Hypothesis 2: There is no significant difference in the effect of Self-Instruction Technique in the retention of the reduced secondary school students' generalized anxiety when compared with those in the control group who received Conventional Counselling using their mean scores.

Table 1. Pretest and posttest generalized anxiety mean scores of students treated with Self-Instruction Technique and those in the Control group

Source of Variation	N	Pretest Mean	Posttest Mean	Lost Mean
Self-instruction	33	33.97	12.81	21.16
Control	28	33.00	27.68	5.32

Table 2. Posttest and Retention Generalized Anxiety mean scores of students treated with selfinstruction technique and those in the control group

Source of Variation	N	Posttest Mean	Retention Mean	Lost Mean
Self-instruction Tech.	33	12.81	10.74	-2.07
Control	28	27.68	26.50	-1.18

Table 3. ANCOVA Summary of the posttest Generalized Anxiety mean scores of students treated with Self-Instruction Technique and those who received Conventional Counselling

Source of variation	SS	df	MS	Cal. F	Crit. F	Remarks
Corrected Model	3992.716	2	1996.358			
Intercept	127.278	1	127.278			
Pretest	738.746	1	738.746			
Treatment Model	3424.290	1	3424.290	173.98	4.01	P< .05 (less than 0.05)
Error	1102.200	56	19.682			
Total	28376.000	59				
Corrected Total	5094.915	58				

Table 4. ANCOVA Summary of the retention generalized anxiety mean scores of students treated with Self Instruction Technique and those who received Conventional Counselling

Source of variation	SS	df	MS	Cal. F	Crit. F	Remarks
Corrected Model	5155.367	2	2577.684			
Intercept	0.470	1	0.470			
Posttest	1502.167	1	1502.167			
Treatment Model	28.708	1	28.708	5.57	4.01	P< .05 (less than 0.05)
Error	450.769	56	8.049			
Total	25193.000	59				
Corrected Total	5606.136	58				

1. Table 4 showed that at 0.05 level of significance, 1df numerator and 59df denominator, the calculated F5.57 is greater than the critical F 4.01, the hypothesis is therefore rejected. So, the retention effect of Self Instruction Technique in the reduction of secondary school students' generalized anxiety is significant when compared with those in the control group.

5. DISCUSSION

5.1 Effect of Self Instruction Technique on Generalized Anxiety of Adolescents

As shown in Table 1 the findings of the study indicated that Self Instruction has effect on the reduction of adolescent secondary school students' generalized anxiety. Owing to the uniqueness of self instruction technique with the target to give the clients opportunity to control their self talk which invariably control their behaviour. The findings is in line with Wild & Duinn [23], who carried out a study on the effects of Corporative competitive and individual use of Self Instruction on learner's achievements in

library skills and the findings showed that self instruction is effective in the learning of library skills.

Self Instruction is effective on generalized anxiety of secondary school students owing to the fact that it provides the opportunity to replace dysfunctional thoughts through self talk and this guides the clients to exhibit adaptive responses to anxiety. This finding is in line with Thompson [4], research on the verbal self guidance on the self efficiency and performance of selective interview, where the result showed that clients who received training on verbal self guidance had higher self efficacy than the clients in the control group.

Self Instruction Technique is effective because it is carried out in a therapeutic session with the school counsellor as the research assistant being involved directly with the clients. This involves the counsellor and the clients in group counselling process in a period, where the clients start by performing the task while the counsellor instructs around. Then the client performs the tasks talking aloud, later whispering, and lastly performing the task with covert self instruction.

From the numerous literatures, one will see that Self instruction treatment aims to give clients control over their behaviour through guided self-talk that gradually becomes self-generated. Several studies have been conducted using Self instruction technique and most of the results show that it is effective while some show ineffective results.

Self Instruction Technique emphasis on self – confidence makes it effective on reduction of generalized anxiety, bearing in mind that among the strategies used in the process of treatment is the enhancement of self -confidence to face daily activities without fear. Available literatures show that clients with anxiety tend to perceive challenging situations as personally threatening and apprehensive. But for Phillips [32], adequate monitoring and application of the inner voices removes fear and enhance confidence in students. Lewis [33], emphasized on adequate preparation of students in their learning process for enhanced self -confidence. When confidence is built, daily activities are enhanced and done duly because they are things one should not be having apprehension about.

5.2 Retention of the Effect of Self Instruction Technique

The findings of the retention of the effect of Self Instruction technique on generalized anxiety portrays that the treatment was retained, this is indicated in Table 2. The findings tallies with Kovel [34] who posited that Self Instruction Technique assist to bring about a real lasting change in the client that goes beyond therapeutic feelings. This is also in line with Becks (2008) in his assertion that Self Instruction technique imbibe on clients the ability to be in complete control of their thought process and make proper mental adjustment. In addition, Wachella and Katz [35] are not left out in their findings in the treatment of anxiety using self instruction where the participants indicated reduction in their level of anxiety. Goberman, Hughess, and Haydock, [26], in their study; the acoustic characteristics of public speaking anxiety and practice effects, the results showed that there were significant relationships between acoustic characteristics of speech and both self and listener ratings of anxiety in public speaking.

The difference in the mean scores of the posttest and retention test showed that there is not much difference in the retention mean scores of the

students, which means that when self instruction is imbibed on a client it becomes part and parcel of the person thus the clients put what they have acquired into practice in their daily activities. From the numerous literatures, one will deduce that Self Instruction technique is to assist clients to master how to monitor, control and use their self talk to control their behaviours [36-42].

6. CONCLUSION

The researchers based on the findings of the study conclude that to reduce generalized anxiety of secondary school adolescents, Self Instruction technique can be used. In addition the effect of reduction of generalized anxiety using self instruction technique can be retained.

7. RECOMMENDATIONS

The following recommendations are made based on the findings of the research work:

1. Thorough and intensive diagnosis should be conducted often in secondary schools to identify victims of such behavioural problems like generalized anxiety and those identified should be offered referral services by referring them to the appropriate personnel for counselling.
2. Students should be observed by teachers even after class, so as to pick those exhibiting generalized anxiety and refer same to the counselling unit of the school for one on one counselling with the school guidance counsellor.
3. Secondary school Counsellors should incorporate the technique; Self Instruction as one of the techniques they use in modifying generalized anxiety.

8. LIMITATION OF THE STUDY

The generalizations made with respect to this study are however subject to limitations. Generalization should be done with caution, as results in other areas, may or may not be the same.

This makes the research not the final bus stop, but the researchers suggest that further studies on same topic on other areas of the country and beyond can be carried. However, the fact that the study is an experimental one allows the use of small manageable samples as were the case of this study and the representativeness in terms of

sampling and the rigors of the experiment are enough to counter such limitation.

COMPETING INTERESTS

Authors have declared that no competing interests exist.

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