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## EFFECTS OF CONVENTIONAL FLIPPED CLASSROOM INSTRUCTIONAL STRATEGY ON STUDENTS' INTEREST IN HISTORY IN JUNIOR SECONDARY SCHOOLS IN NSUKKA LOCAL GOVERNMENT, ENUGU STATE, NIGERIA

Ugah, J.C<sup>1</sup>, Asogwa, U.D<sup>2\*</sup>, Oforegbu, T.O<sup>3</sup>

<sup>1, 2 & 3</sup> University of Nigeria, Nsukka. Department of Arts Education

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\*Corresponding author: Asogwa, U.D

University of Nigeria, Nsukka. Department of Arts Education

### Abstract

*This study investigated the effects of the conventional strategies on students' interest in History in Nsukka Local Government Area. Three specific purposes with corresponding three research questions and three null hypotheses guided the study. Quasi-experimental design was adopted for the study. The study was carried out in Nsukka Local Government Area, Enugu State. The population of the study consisted of 3,043 Junior Secondary School class two students. A sample size of 41 Junior Secondary School II students was drawn using purposive and simple random sampling techniques. One instrument was used for the study namely: History Interest Inventory (HII). The instrument was trial tested and a reliability index of 0.95, and 0.92 were obtained using Cronbach's Alpha statistics and K-R 20 respectively. The research questions were answered using mean and standard deviation, while Analysis of Covariance (ANCOVA) was used to test the hypotheses at 0.05 level of significance. The result of the study showed that the students taught History using Conventional Flipped Classroom strategy had higher interest than before the students were exposed to conventional strategy. The difference was significant. Male students significantly had higher interest than female students in History. The interaction effect of instructional strategy and gender on the mean interest scores of students in History was statistically significant. In line with the findings of the study, the recommendations were equally proffered among others because the Conventional Flipped Classroom instructional strategy was more effective in teaching students and enhancing students' interest in History in Nsukka, Local Government Area, the Ministries of Education should ensure that curriculum planners incorporate a Conventional Flipped Classroom instructional strategy for students in secondary schools.*

**Keywords:** Conventional. Flipped classroom, instructional, strategy, teaching, learning, interest, history, gender.

## Introduction

History is the study of past events, particularly in human societies, cultures, and civilizations. It involves examining records, artifacts, and other evidence to understand how people lived, what they did, and how their actions or inactions and ideas shaped the present and influenced the future. History can encompass everything from political events and wars to social, cultural, economic, and technological developments. Omolewa (2015) asserts that history is a vast umbrella subject. Therefore, there is a huge knowledge in the study of history. It truly educates young minds and obliges them to reason, wonder, and think about the limitlessness, richness, and tragedy of the human condition. If history is taught engagingly, students learn about the significance of past events and personalities and can relate them to their own lives.

McDougall (2022) goes so far as to call history the religion in the modern curriculum. Therefore, there is no doubt about the fact that history contributes its quota to the general or overall development of society. That is why no individual or society can escape from the study or lessons of history. The study of history according to Fogo (2020) leads to understanding and wisdom. Although, the methods used in teaching history remain foundational in many educational systems, they can have several negative effects on students' interest.

The interest of students in learning history can be seen from their tendency to pay attention to the learning process. According to Lee (2017), if someone is interested and feels happy to participate in an activity, then they tend to participate and fully pay attention to the activity. John Dewey (1913) once describe interest as being engaged engrossed or entirely taken up with an activity, object or topic. Interest is important because they serve as a source of strong motivation to learn. Interest is often thought of as a process that contributes to learning and achievement; interest in a subject is a mental resource that enhances learning (Adam, 2023). In other words, being interested in a topic is a mental resource (Eyang, 2014) that enhances effective learning. Interest makes history more engaging, relatable and memorable for students, (Timothy, 2016; Eyang, 2016. According to the history teachers, the students' interest in history is very low which affects the students not to offer it in senior classes here in Enugu State.

Studies by Alordiah, Akpadaka and Oviogbodu, (2015) have shown that different variables do interact to influence students' interest. These variables, among others, include teaching strategies. Teaching strategies are deliberate techniques used by the teacher to facilitate learning. Teaching strategies are essential because they enhance students' interest, encourage critical thinking and problem solving and cater for diverse learning styles (Asogwa, 2020). The teaching of history in the past decades was dominated by teacher centered methods and strategies. Teacher-centered methods and strategies emphasize the teacher as primary source of knowledge, guiding and controlling the learning process. Reports from Basic Education Certificate Examination (BECE) have shown continuous decline in students' interest in history (Chief Examiners Reports, 2020, 2021, 2023).

This has become a serious concern to history teachers in Nigeria who are in dilemma because of the structure diminishing interest in the subject. Utilizing modern instructional strategies which incorporate/integrate online resources such as flipped classrooms should be considered in today's digital students of history.

Flipping a classroom may allow students to make more effective progress during class-time, having prepared for the lesson

beforehand and receiving more focused support and feedback from teachers and peers alike. The flipped classroom strategy is a teaching strategy where the learner is given text materials to read at home and equally taught how to interact with family members and also members of the general public bearing in mind the subject content objectives, and further come to the classroom during the in-classroom interactive session for deeper cognitive thinking among the learners under the guidance of the teacher, (Jala, 2016). He maintained that instead of the students listening to a lesson in class and then going home to work on a set of assigned problems, they read the content and assimilate lesson materials at home and engage in teacher-guided problem-solving, analysis and discussion in the class. In a flipped classroom, learners can conduct research in their homes while engaging in concepts in the classroom with the guidance of a mentor.

Proponents of the flipped classroom teaching and learning model has numerous advantages of flipping the classroom at the secondary education level to include the following: it allows the learners to learn at their own pace (Gillispie, 2016). It engages the learners with lesson materials. The flipped classroom strategy is a transition from teacher-centered teaching and learning to students centered teaching and learning with the guidance of a mentor. Evaluation and analysis take place in the classroom.

There are different types of flipped classrooms, namely the Virtual flipped Classroom, the Discussion-Oriented Flipped Classroom, the Demonstration-Focused Flipped Classroom, the Faux-Flipped Classroom, Flipping the Teacher, the Conventional Flipped Classroom and the Group-Based Flipped Classroom,

The conventional flipped classroom (CFC) is a specific implementation of the flipped classroom model where students watch pre-recorded teachings or complete readings at home before coming to class. The conventional flipped classroom is also known as standard inverted flipped classroom. Conventional flipped classroom can be seen as a pedagogical approach that reverses the traditional lecture-homework format by delivering instructional content at home through pre-recorded videos, readings, or other digital materials, and using the in-class time for interactive, collaborative, and hands-on learning activities, discussions, and applications. The instructor provides guidance, feedback and support during in-class activities.

The Conventional Flipped Classroom may be beneficial to JSS2 students. Some schools now share lecture videos and audios for student viewing and listening before other regularly scheduled time for brief one-on-one instructional based. Traditional teaching relies only on in-class lectures by the teacher as the primary means of content delivery. Students often receive the instruction passively and are assigned homework for practice. This independent variable is going to be used in this study to ascertain its efficacy in facilitating history instruction.

However, scholars have carried out studies on flipped classroom with varied results. According to Goodwin and Miller (2013) out of 453 teachers who flipped their classrooms, 67 percent reported increased test scores, with particular benefits for students in advanced placement classes and students with special needs; 80 percent reported improved student attitudes, and 99 per cent said they would flip their classrooms again next year. Badmus (2021) examined the impact of flipped classroom instruction on senior secondary school students' academic performance in Biology in two Local Government Areas of Lagos State. A pre-test, post-test non-

equivalent control group design of quasi experimental design was adopted for this study. 32 senior secondary school students from two secondary schools were selected just as it is in this present study. The results showed that students exposed to flipped classroom instruction FCIB had better academic performance on Biology than traditional teaching method and that the gender has no significant influence on their academic performance when taught with FCIB.

Another factor that influenced the students' interest in history was the gender of the students. Gender is the socially or culturally constructed characters, roles and qualities, behaviour which different societies ascribe to males and females varying from one society to another and at a different time in history. Gender is the set of traits that classify an organism as female or male, depending on its reproductive function (Ayodele and Adebisi, 2013). It is important to ascertain whether gender influences the teaching of history especially if it is taught with flipped classroom strategies.

When comparing the sexes on the National Educational Longitudinal Survey (NELS: 88), Ineke and Mineke (2001) found that men performed significantly better on the physical science subtest, while women performed somewhat better on the life science subtest. Carmen and Josephson (2014) was on gender differences in the learning and teaching of surgery, the finding stated that there are differences in personality among male and female students in surgery. In this study, gender is focused on the roles and behaviours which secondary school male and female students exhibit in the areas of interest in the study of History as a secondary school subject using flipped classroom instructional strategies

From the background so far, it has been shown that several strategies have been used to arrest students' lack of interest in yet the problem of lack of interest persisted. Therefore, the search for a more efficient and effective strategy for teaching History becomes imperative. The current research investigated the effects of conventional flipped classroom in teaching History concepts, using gender as a moderating factor in the interest of students in Nsukka Local Government Area, Enugu State, Nigeria.

## Purpose of the Study

The main purpose of this study is to investigate the effects of conventional flipped classroom instructional strategies on students' interest in History in junior secondary schools in Nsukka Local Government Area, Enugu State. Specifically, the study seeks to find out the:

1. Effects of conventional flipped classroom instructional strategies on students' interest in History.
2. Influence of gender on students' interest in History.
3. Interaction effect of instructional strategies and gender on students' interest in History.

## Research Questions

The following research questions guided the study.

1. What are the effects of the Conventional Flipped Classroom on the mean interest rating of students in History?
2. What is the influence of gender on the mean interest rating scores of students in History?
3. What is the interaction effect of instructional strategy and gender on the mean interest rating scores of students in History?

## Hypotheses

The following null hypotheses guided the study and were tested at 0.05 level of significance:

- Ho1: There is no significant difference in the mean interest rating score of students taught History using conventional flipped classroom instructional strategies.
- Ho2: There is no significant difference in the mean interest ratings score of male and female students in History.
- Ho3: The interaction effect of instructional strategy and gender on the mean interest ratings score of students taught History using conventional flipped classroom instructional strategies is not statistically significant.

## Significance of the Study

The fundamental underlying idea is that students must be meaningfully engaged in learning activities through interaction with others and worthwhile tasks.

Practically, this study would be beneficial to secondary school students, teachers, curriculum planners, school administrators and researchers. Thus, this study will help in developing the mental abilities of the students. Students can also benefit from this study because the use of a Flipped Classroom Strategy might increase their interest in History. This might in turn help them retain what they are taught in History and so improve their academic achievement. The students will benefit when the study is published in a journal or kept in the school library.

It may sensitize teachers of secondary schools to adopt Flipped Classroom Approach as a new strategy in the teaching of History. The study would make curriculum planners aware of the effects of Flipped Classroom Approach on students' interests. This study will be beneficial to secondary school administrators or principals because it will help them achieve the objectives of their educational programmes and management.

## Scope of the Study

The study was carried out in the Nsukka Local Government Area of Enugu State Nigeria, which has a total number of 32 public Secondary Schools. The study was limited to the Junior Secondary class two (JSS2) students in the zone.

## Method

The design adopted for this study was a pretest-posttest non-equivalent control quasi-experimental. This is because the aims are to compare the students' interest in history before and after implementing flipped classroom strategies with a control variable (gender).

The study was carried out in the Nsukka Local Government Area (LGA) of Enugu State in Nigeria. Nsukka Local Government Area is bounded in the East by Uzo-Uwani LGA, in the West by Udenu LGA, in the North by Igbo-Eze South LGA and the South by Igbo-Etiti LGA. The area consists of urban and suburban areas where the main occupation of people are farming. The researcher chose this area because the students' interest in History as a subject in this area have been poor. Also, the researcher considers the schools in the area that have access to technology.

## Population of the Study

The population of the study comprised all 3,043 (1,534 males and 1,509 females) Junior Secondary School class two students (JSS II) in Nsukka Local Government Area that offer History. (PPSMB



Nsukka Education zone, 2023). There are 32 public Secondary Schools in Nsukka Local Government Area. Out of the 32 public secondary schools, 25 are co-educational while 7 are single-sex. Out of the 7 single-sex schools, 3 schools are male while 4 schools are female. The study was limited to the Junior Secondary class two (JSS 2) students in the area. JSS 2 was chosen for the study because they are not in examination class and also are more mature academically than class one students

Sample and Sampling Technique

The sample was consist of 84 junior secondary school two (JSS 2) students in Nsukka LGA of Enugu State. There are 1534 males and 1509 females for the JSS2 2024/2025 academic session. They are 19 males and 22 females students thereby making it 41 students in total. This was formed the sample size for the study. To take care of the issue of extraneous variable, the history interest inventory (HII) was administered to the students simultaneous and the history teacher was trained so as to avoid the occurrence of hallow effect.

Instruments for Data Collection

The instrument for data collection was on a History Interest Inventory (HII). The History Interest Inventory (HII) was developed by the researcher. The HII consists of two sections. Section A and Section B. Section A seeks for the student’s demographic data while section B consists of 25 items, using a four-point rating scale, with options of Strongly Agree (SA-4 points), Agree (A-3 points), Disagree (D- 2 points), and Strongly Disagree (SD- 1 point) respectively. The HII was used to get information on the interest of students in History. The researcher prepared lesson plans for the levels (Conventional flipped classroom).

Validity of the Instrument

Face and content validity was established for the instruments. The instrument was validated by 3 experts, one from History and International Studies, one from Educational Technology, and one

from Measurement and Evaluation, at the University of Nigeria, Nsukka. The experts scrutinized the instruments in terms of relevance, general format, suitability, structure and adequate timing. The instruments were reorganized to reflect the opinions of the experts.

Reliability of the Instruments

To determine the reliability of the instrument, the researcher administered the instruments (HII) to 30 JSS 2 students respectively in two public secondary schools which were not be part of the sampled schools. The responses obtained from the students in HII were subjected to Cronbach’s Alpha statistic. Cronbach’s Alpha was used because the instrument was dichotomously scored.

Method of Data Analysis

Research questions were answered using mean and standard deviation, while the hypotheses were tested using the Analysis of Covariance (ANCOVA) at an alpha level of 0.05. The pretest scores were used as a covariate for the posttest scores. The use of ANCOVA served as a control for the initial difference as well as increase the precision due to the extraneous variables thus, reducing the error variance. Effect size (Eta-squared) was used to determine how important any observed differences are: effect size of 0.50 to 1.0 (Large); .30 to .49 (Medium) and .10 to .29 (Small) (Cohen *d*, 1988).

Results

The results of data analysis were based on three research questions and three null hypotheses that guided the study. Results were presented in tables in line with research questions and in two tables for the three hypotheses.

Research Question 1

What are the effects of the Conventional Flipped Classroom on students’ mean interest ratings in History?

Table 1

Mean (  $\bar{x}$  ) and Standard Deviation (SD) Interest Rating Scores of Students Taught History using Conventional Flipped Classroom Strategies

STRATEGY	N	PRETEST	INTEREST	POST-TEST	INTEREST	ADJUSTED MEAN
		$\bar{x}_1$	SD <sub>1</sub>	$\bar{x}_2$	SD <sub>2</sub>	$\bar{x}$
Conventional	41	56.05	7.67	67.27	6.43	67.00

Table 1 revealed that the pretest interest mean score for students taught History using the conventional Flipped Classroom Strategy were (  $\bar{x}$  = 56.05, SD = 7.64). Table 1 also revealed that the post-test interest mean score for students taught History using the Conventional Strategy was( $\bar{x}$  = 67.27, SD = 6.43) and an adjusted mean of 67.00. The students before the exposure to the instructional

strategy and after the exposure shows a significant difference in their level of arousing interest in history.

Research Question 2

What is the influence of gender on students’ mean interest rating in History?

Table 2

Mean (  $\bar{x}$  ) and Standard Deviation (SD) Interest Rating Scores of StudentsBased on Gender

GENDER	N	PRETEST	INTEREST	POST-TEST	INTEREST	ADJUSTED MEAN
		$\bar{x}_1$	SD <sub>1</sub>	$\bar{x}_2$	SD <sub>2</sub>	$\bar{x}$
Male	39	57.03	6.83	72.49	2.93	72.06
Female	45	52.13	6.26	66.09	6.20	66.46

Table 2 showed that the pretest interest mean score for male students was ( $\bar{x} = 57.03$ ,  $SD = 6.83$ ) while female students were ( $\bar{x} = 52.13$ ,  $SD = 6.26$ ). Post-test interest mean score for male students was ( $\bar{x} = 72.49$ ,  $SD = 2.93$ ) and an adjusted mean of 73.67 while the female students were ( $\bar{x} = 66.09$ ,  $SD = 6.20$ ) and an adjusted mean of 61.00.

Male students, therefore, had higher interest than female students in History.

### Research Question 3

What is the interaction effect of instructional strategy and gender on students' mean interest rating in History?

**Table 3**

*Mean ( $\bar{x}$ ) and Standard Deviation (SD) Interest Rating Scores By Strategy and Gender*

Strategy	n	Gender	Mean	SD		n	Gender	Mean	SD
Conventional Pretest Interest	19	Male	60.74	5.48	Posttest Interest	19	Male	72.32 (71.02)	2.47
	22	Female	52.00	7.03		22	Female	62.91 (64.03)	5.53
	41	Total	56.05	7.67		41	Total	67.27 (67.00)	6.43
Total	39	Male	57.03	6.83	Total	39	Male	72.49 (73.67)	2.93
	45	Female	52.13	6.26		45	Female	66.09 (61.00)	6.20

Note: Adjusted mean are in parentheses

Table 3 revealed that male students who were taught with Conventional Flipped Classroom Strategy had an adjusted interest mean score of 71.02 while their female counterparts had an adjusted interest mean score of 64.03. The results show that the adjusted mean score of male is higher than female which shows that male students had higher interest than female students

### Hypotheses

The three hypotheses were tested using the Analysis of Covariance. The summary of the analysis for the three null hypotheses is shown in Tables 4.

**Table 4**

*Analysis of Covariance of Students' History Interest Rating Scores by Strategy and Gender*

Sources of Variation	Sum of Squares	df	Mean Square	F	Sig.	Partial Eta Squared
Covariates Pretest Interest	227.732	1	227.732	5.7965	.001	
Main Effects	485.251	1	242.625	6.156	.000	
Strategy	403.797	1	403.797	10.278	.000	.070
Gender	566.704	1	566.704	14.425	.000	.145
2-Way Interactions	124.611	1	124.611	3.172	.007	.037
Strategy * Gender						
Model	661.442	2	165.355	4.209	.000	
Residual	775.929	39	9.822			
Total	1437.3715	41	175.177			

- Posttest Interest by Strategy, Gender with Pretest Interest
- Covariates entered first

**H01:** There is no significant difference in the mean interest ratings of students taught History using conventional flipped classroom instructional strategies.

Results in Table 4 revealed a statistically significant main effect for strategy  $F(1,39) = 10.278$ ,  $p = .000$ , partial  $\eta^2 = .070$ . The null hypothesis, therefore, was rejected, indicating that there was a significant difference in the mean interest rating scores of students taught History using the Conventional Flipped Classroom Strategy and before the exposure to the instructional strategy. The adjusted mean score for students taught with the Conventional Flipped Classroom Strategy was 67.00. The actual difference in mean scores

between the stages was substantial. The effect size, calculated using partial eta squared, was .070.

**H02:** There is no significant difference in the mean interest scores of male and female students in History.

Table 4 revealed a significant main effect of gender  $F(1,39) = 14.425$ ,  $p = .000$ , partial  $\eta^2 = .145$ . The null hypothesis was rejected, indicating that there was a significant difference in the mean interest scores of male and female students in History. The eta-squared statistic (.145) indicated a substantial effect.

**H03:** The interaction effect of instructional strategy and gender on students' interest in History is not statistically significant.

Table 4 indicated a significant interaction effect of strategy and gender  $F(1,39) = 3.172$ ,  $p = .007$ , partial  $\eta^2 = .037$ . The null hypothesis was rejected. The interaction effect of strategy and

gender on students' mean interest scores in History was, therefore, statistically significant. The eta-squared statistic (.037) indicated a very small effect.

## Summary of Findings

Based on the data analysis and the interpretation of results, the following findings emerged.

1. The result of the study showed that the students' interest in History is higher than before the students were exposed to Conventional Flipped Classroom instructional strategy. And the difference was significant.
2. Male students significantly had higher interest than female students in History.
3. The interaction effect of instructional strategy and gender on the mean interest scores of students in History was statistically significant.

## Discussion of Findings

Discussion of the findings is presented under the following subheadings:

Effects of Conventional Flipped Classroom instructional strategy on students' interest in History.

The result of the study showed that the students exposed to Conventional Flipped Classroom instructional strategy had higher interest in History than before the students' exposure. The difference was significant. The differences in interest might have been because the students were actively engaged when using the Conventional Flipped Classroom strategy than normal teaching method. Students are more interested in whatever they are doing if the teacher engages them than when they are passive. They are often bored when they are not actively engaged in any activity, especially in teaching and learning. In most cases, when the teacher does not engage them in the teaching and learning process, they will be bored and sleep during the lesson period. The nature of History demands that the teacher should engage the students actively for a better understanding of the lesson thereby enhancing their maximum interest in the lesson.

The findings of this study are in line with that of a similar study by Erol-Sahin (2020) who researched using the Flipped Classroom Model in the History Course. The role of interest in learning and attitude towards school, Erol-Sahin maintained that most of the participants see many opportunities in this model. These include permanent learning, entertaining lessons, interaction, functionality, high motivation, attitude towards school, interest in learning, study habits, attributes, self-efficacy, and intelligence.

Influence of gender on students' interest in History.

Results showed that male students significantly had higher interest than female students in History. The different socialization processes of male and female persons in which the male persons are expected to explore their environment while the female ones are to conform or maintain their existing environment. This may be the reason why male students significantly performed better than female students. This may be because the male students seem to be more serious and have an interest in learning History which influences governance.

The findings support that of Kipkorir (2013) who conducted a study on differences in performance between boys and girls in secondary school science subjects. The study analyses the differences in

performance between boys and girls in science subjects and probes the possible causes of these differences in the context of interest borne by learners, teachers and school heads.

Interaction effect of instructional strategy and gender on students' interest in History

The interaction effect of instructional strategy and gender on students' interest in History was statistically significant. However, male students' interest is higher than female students irrespective of the instructional strategy. The differences in the mean scores were statistically significant.

This finding is in disagreement with Obodo and Ani (2023) who conducted a study on the interaction effect of gender and teaching method on academic achievement and interest of basic science students in upper basic education. The result revealed that there was no significant interaction effect of teaching method and gender on the mean interest scores of students in Basic Science. Male students had higher interest than their female counterparts. But the difference was significant.

## Conclusions

The results obtained in the study on the effects of Conventional Flipped Classroom Instructional Strategies on students' interest in History in junior secondary schools in Nsukka Local Government Area, Enugu State. The result of the study showed that the students taught History using the Conventional Flipped Classroom Strategy had a higher interest than before the students were exposed to the instructional strategy. The difference was significant. Teaching students History using a conventional Flipped Classroom produced better result than students taught with normal classroom method. Male students significantly had higher interest than female students in History. The small effect size revealed it. The interaction effect of instructional strategy and gender on students' interest in History was statistically significant. This showed that the students had higher interest effectively in History irrespective of gender. This showed that the conventional flipped classroom instructional strategy is comfortable for both male and female students.

## Recommendations

Based on the findings of the study, the following recommendations are made:

1. The Conventional Flipped Classroom Instructional Strategy was more effective in teaching students and enhancing students' interest in History in Nsukka, Education Zone, Enugu State. The Ministries of Education should ensure that curriculum planners incorporate a Conventional Flipped Classroom instructional strategy for students in secondary schools.
2. History teachers should be trained on how best to involve students in a Conventional Flipped Classroom Instructional Strategy to facilitate History instruction. This could be achieved through seminars and workshops for teachers in secondary schools.
3. The Conventional Flipped Classroom Instructional Strategy had differential effects on male and female students' interest in History. As such, the present system of teaching both males and females in the same class should be reviewed in terms of the strategy to accommodate female students.

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