

The Effect of Flipped Model on Enhancing EFL Learners' Speaking Performance and Motivation

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Abstract:

The flipped classroom model (FCM) is regarded as one of the most significant educational debates that emerged recently. Despite its far-reaching impacts on the educational paradigm, few empirical investigations have been carried out concerning if the implementation of FCM can genuinely improve EFL learners' speaking ability. The aim of the study was to examine the extent to which the flipped model improves students' speaking proficiency. A quasi-experimental design was utilised with the application of the quantitative method. Two groups of non-English major university freshmen participated in the study; the experimental group (n=24), and the control group (n=23). The study included pretest and posttest on speaking, a speaking rubric, and a questionnaire of motivation at the beginning and the end of the experiment. The results showed that the experimental group performed remarkably higher than the control group in the posttest, they also had notably more positive outcomes in the post-motivation questionnaire. The findings of this study can be used in future works on EFL speaking skills development.

Keywords: Flipped classroom model, EFL, Speaking skills, Motivation.

الملخص:

يعتبر اسراطيحة الصف المقلوب (FCM) أحد أهم من أهم النقاشات التربوية التي ظهرت مؤخرًا. على الرغم من آثارها بعيدة المدى على النموذج التعليمي، فقد تم إجراء عدد قليل من التحقيقات التجريبية فيما يتعلق بما إذا كان تطبيق FCM يمكن أن يحسن حفًا القدرة على التحدث لدى متعلمي اللغة الإنجليزية كلغة أجنبية. كان الهدف من البحث هو دراسة مدى تحسين الصف المقلوب لكتفاعة الطلاب في التحدث. تم استخدام تصميم شبه تجريبي مع تطبيق الطريقة الكمية. شاركت في الدراسة مجموعتان من طلبة الجامعة الجدد غير الناطقين بالإنجليزية. المجموعة التجريبية (ع = 24)، والمجموعة الضابطة (ع = 23). اشتملت الدراسة على الاختبار القبلي والبعدي على التحدث، وخط تقييم المحادثة ، واستبيان الدافع في بداية التجربة ونهايتها. أظهرت النتائج أن أداء المجموعة التجريبية أعلى بشكل ملحوظ من المجموعة الضابطة في الاختبار البعدي ، كما كانت لديهم نتائج إيجابية أكثر بشكل ملحوظ في استبيان ما بعد التحفيز. يمكن استخدام نتائج هذه الدراسة في الأعمال المستقبلية لتطوير مهارات التحدث باللغة الإنجليزية كلغة أجنبية.

الكلمات المفتاحية: نموذج الفصل المقلوب، EFL، مهارات التحدث، الدافع.

پوختہ:

سیستمی پولی به رهواز به یهکیک له گرنگترین مشتومره پروره دیبه کان داده نزیت که بهم دووایانه سریه همداوه. سر مرای نهو کاریگمریه گرنگهی که لمسه ر بواری پروره ده همیه تی، تویزینه موهیمه که می دهرباره کراوه لمسه نهو بنه ماشه که نایا تا چند به کار هینانی نهم مودیله کاریگمری لمسه باشتر کردنی تو انستی ئاخاوتی فیر خوازانی ئینگلیزی و مکو زمانی بیگانه همیه. ئامانجی نهم تویزینه موهیه همسنگاندنی ریزه دی کاریگمری پولی به رهوازه له بهره مو پیشچونی لیهاتووی ئاخاوتند. دیزانی نهم تویزینه موهیه نیمچه (کواز ای) نهزمونیه، به به کار هینانی ریبازی چندایه تی. تویزینه موهیه لمسه دوو گروپ خویندکاری قوناغی یهکی زانکو ئنجام دراوه که له بخشی زمانی ئینگلیزی نین. زماره دی خویندکارانی گروپی نهزمونی بریتیه له ۲۴ و گروپی کونترولکراوه له ۲۳ به شدار بیو. تویزینه موهیه پینکدیت له دوو همسنگاندن لمسه تو انستی ئاخاوتون، پیوری ئاخاوتون، وه راپرسی تاییت به هاندان له سمره تاکو کوتاییدا. ئنجامی تویزینه موهیه نهوهی خسته ره و که ئهدای گروپه نهزمونیه که به ریزه میه کی بهرچاوه باشتر بیو له همسنگاندنی کوتاییدا به بمر اورد به گروپه کونترولکراوه که، به همان شیوه ئنجامی راپرسی کوتایشیان لمسه هاندان ئهرينی بیو. له کوتاییدا، لیکمومه کانی نهم تویزینه موهیه ده کریت له کاره کانی تاییت به بهره پیش بردنی تو انستی ئاخاوتند باهکار بهترین له بواری زمانی ئینگلیزیدا و مک زمانی بیگانه.

کلیله و شه: مودیلی یولی برهواز، EFL، توانستی ئاخاوتى، هاندان.

Introduction

Since developing communication competence is a need for learning a language, exposure to speaking activities is essential for the successful acquisition of foreign languages and instruction. For concept exchange and meaningful discourse in a foreign language, oral ability is a need (Folse 2006). EFL learners, unlike ESL learners, are frequently taught or exposed to English in classes with short classroom time and usually large class numbers (Tulung 2008), therefore, speaking is a difficult skill to master and teach in EFL environments. As a result, several pedagogical techniques must be used to improve learners' oral competency in EFL courses. Traditional classrooms are accused of undermining students' communication ability owing to insufficient engagement and instructor authority, as well as reducing learners' capacity to begin suitable individual learning and speech performance (McLean 2012). According to Roehl, Reddy and Shannon (2013), the conventional technique does not meet the demands of learners. In such a case, providing technology in speaking courses enables language learners to be more engaged, autonomous, and productive in the world of technology, thus, implementing flipped teaching process to provide more time for oral practice in the classroom is critical since the approach exposes students to major inputs and practises both within and outside of the classroom. According to Rivero (2013), the majority of instructors who tried this strategy saw improvements in exam results and attitudes of students. Moreover, students see flipped learning as a good educational phenomenon, with enhanced motivational levels, self-conscious intelligence, and performance (Avdic & Akerblom 2015). Nevertheless, most studies have been on teaching substantive areas; only a few have been undertaken on English learning and teaching (Loi 2014).

In the Iraqi-Kurdish Region, English is not a second language, and learners only use it during classroom time, with the exception of a few who communicate with their friends from home. English language teachers in schools pay practically minimal attention to the coursebook's oral communication exercises. This is one of the key reasons why pupils' speaking abilities are deteriorating, despite the fact that they study the language for around five hours per week during the school year. Many EFL Students in tertiary education also struggle with the spoken performance of

the English language, although they study general English skills for more than two semesters. Thus, the current study aimed at examining the impact of flipped learning on undergraduate students' speaking proficiency, as well as their motivation toward English language learning.

The study attempted to answer the following research questions:

1. Does flipped classroom teaching have any significant effect on improving EFL learners' speaking skills?
2. Does flipped classroom teaching have any significant effect on improving EFL learners' motivation?
3. Is there a significant difference between achievement in speaking of learners taught in flipped versus traditional classrooms?
4. Is there a significant difference between improving the motivation of learners taught in flipped versus traditional classrooms?

1. Literature review

Flipped classroom teaching refers to employing technological instruments to facilitate information input inside and outside the class and is also known as teaching reversely, blended learning, and inverted classroom (Bergman & Sams 2012). It allows students to stop, playback, or repeat lessons, and it increases teacher availability and personalised learning. When the standard classroom is compared to the flipped classroom, the flipped classroom alters the typical sequence of face-to-face instruction; imparting the topic, assigning homework to students to reinforce provided material, and then practising after class. Rather, in a flipped classroom, instructors supply learners with instructional videos and other online materials for individual learning. While meeting, learners and their teacher engage in a variety of activities that aid in the explanation of challenges faced by students during their autonomous learning. Several researchers claim that instructional clips can't be the most important aspect of this model of learning approach; rather, it is the shift in teaching procedure and the focus placed on learning actively through student-centredness which is obtained via inquiry and project-based tasks (Sidky 2019). In flipped lessons, students often acquire new content as homework via online video presentations, freeing up class time that would otherwise be utilised for face-to-face education for more engaging and dynamic activities, and students may apply the gained knowledge in the classroom (Lage, Platt and Treglia 2000). The reasoning for shifting from face-to-face education to online lectures is based on a revised Bloom's taxonomy of cognitive stages. Cognitive domains are classified according to the taxonomy, ranging from the most basic to the most sophisticated. The six cognitive stages are stated as "remembering, understanding, applying, analysing, evaluating, and creating," with the final three levels requiring greater cognitive effort (Krathwohl 2002).

Furthermore, direct instructions of new grammatical and lexical information are transferred from the group learning environment to the personal learning space through flipping, allowing learners to study at their own speed. They can replay the lecture videos as many times as they like until they understand the material. As a result, students have more opportunities to obtain understandable information outside of the classroom, which is the foundation for L2 speaking. Since direct instruction

has been flipped to online learning, in face-to-face classes students have plenty of time to practice what they know in speaking activities with their instructor's monitor and peer cooperation.

In the EFL domain, a number of empirical studies were conducted to investigate the impact of the flipped model on enhancing learners' command of the language. Zamzami (2017) arranged an investigation on a group of university students at an Indonesian public university. The participants took part in a flipped EFL class. The findings showed that flipped learning raised the learners' passion for learning in advance to in-class lessons and expanded opportunities for student engagement. In terms of student perceptions, the majority of pupils were quite enthusiastic about the flipped classroom. Furthermore, the study demonstrated that learners achieved greater levels in Bloom's cognitive domain taxonomy.

Hamad (2016) evaluated the impact of an EFL flipped model approach on two higher-order thinking skills in graduate students: involvement and contentment. The study included 67 graduate female students from Taif University in Saudi Arabia who were separated into two groups: experimental and control. The results revealed statistically significant distinctions in higher-order thinking skills between the two groups, favouring the experimental group. There were also substantial variations in involvement and satisfaction scores between pre and post-administration, with the post-administration winning out.

Hamzeh et al. (2019) conducted research on sixty Iranian students from two institutions. The participants were split into two groups: traditional and experimental. Data revealed that the experimental group were further engaged with the studying materials and outscored their traditional counterpart considerably in the posttest. The majority of participants in the flipped group stated that they enjoyed studying English in a flipped learning setting.

2. Methodology

2.1. Research design

The current study employed a quasi-experimental design since the researcher was unable to perform his study using completely random selection to pick learners for both experimental and conventional groups; hence, pre-existing sampling was used to carry out the study. The study employed a quantitative quasi-experimental method that included a pre and posttest in speaking, and a motivation questionnaire for the participants at the start and the end of the study.

2.2. Participants

The study's population consisted of 47 first-year non-native students from Charmo University's College of Applied Science. Participants ranged in age from 18 to 21 years old, with 38 females and 9 males taking part. The experimental group employed 24 students (21 females and 3 males) from Pharmaceutical Chemistry Department, while the control group implemented over 23 students (17 females and 6 males) from the Medical Laboratory Science Department. The study duration was 9 weeks. Both groups started together, they both studied the same coursebook and same topics. The experimental group received videos approximately 5 days before class time, the researcher chose the videos from totally educational sources such as (www.engvid.com) and (www.bbclearningenglish.com). The videos were addressing grammatical structures in spoken

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language, lexical resources, and pronunciation. On the other hand, the control group studied those materials just in their face-to-face classes.

2.3. Instruments

Twelve IELTS official speaking test samples were prepared for the test; they were between the years 2011 and 2015. In the first week, six samples were used for the pretest and the other six were used for the speaking posttest in week 9. The assessment was done by three evaluators each time, including the researcher. The speaking rubric was retrieved from (www.geniuseducationalmedia.org) on the 10th of April 2022. A questionnaire of learners' motivation and attitudes regarding learning the English language, which has been developed by Salimi (2000), was used in the first and the last week of the study for both groups of participants. During the course of treatment, the experimental group received videos through Google Classroom. The videos were taken from two educational sources (www.engvid.com) and (www.bbclearningenglish.com). They contained information on grammar, new lexical items, expressions, and pronunciation.

2.4. Procedure

The study was done in 9 weeks. In the first week, the researcher distributed a motivation questionnaire among the students and conducted a speaking pretest on both the experimental and the control groups. Each student was assessed individually and they were evaluated by three raters, each of the assessors worked independently in the marking process. The questionnaire completion, together with the speaking pretest endured 3 hours for each group. Within the following 7 weeks, the researcher applied flipped model of teaching by sending the experimental group videos prior to class time. The videos addressed grammatical structure, vocabulary, and pronunciation, which students watched and answered questions about before they attended the lessons. Therefore, in-class lessons were devoted to speaking activities and discussion of students' problems. In contrast, the control group studied the same elements but only in the lessons with their teacher. The last week (week9) was dedicated to the speaking posttest and questionnaire of motivation, the same strategy and procedure of the pretest were employed.

2.5. Data analysis

The present study used both pretest and posttest on speaking skills and motivation over 47 participants to attain its data. The data were then compared and analysed in terms of speaking performance and motivation rate using a quantitative method. The outcome was run into SPSS to demonstrate the extent of achievement that the experimental and the control group of learners gained. The research questions raised in this study were analysed through a Paired-Samples t-test and one-way analysis of covariance (One-Way ANCOVA) both of which assume normality of the data.

3. Result and Discussion

This study is an attempt to explore the effects of flipped and traditional methods on the improvement of speaking ability, and motivation of EFL learners. For this purpose, the data were examined for normality. Table 4.1 shows skewness and kurtosis indices and their ratios over the standard errors. As noted by (Raykov and Marcoulides 2008, Coaley 2010, Field 2018, and Abu-

Bader 2021), if the ratios of skewness and kurtosis over their standard errors are lower than $+\/- 1.96$, as is the case in this study, it can be concluded that the collected data do not show any significant deviation from a normal distribution. It should be noted that the IBM SPSS Documentation¹ suggested the criteria of $+\/- 2$.

Table 4.1 Skewness and Kurtosis Indices of Normality

Group		N	Skewness			Kurtosis		
			Statistic	Statistic	Std. Error	Ratio	Statistic	Std. Error
Experimental	Pre-Motivation	24	.062	.472	0.13	-.647	.918	-0.70
	Pre-SP	24	.122	.472	0.26	-.252	.918	-0.27
	Post-Motivation	24	-.710	.472	-1.50	-.627	.918	-0.68
	Post-SP	24	.471	.472	1.00	-.497	.918	-0.54
Control	Pre-Motivation	23	.183	.481	0.38	.256	.935	0.27
	Pre-SP	23	-.066	.481	-0.14	-1.218	.935	-1.30
	Post-Motivation	23	.669	.481	1.39	.088	.935	0.09
	Post-SP	23	.345	.481	0.72	.949	.935	1.01

To explore the first research question, A paired-samples t-test was run to compare the flipped classroom teaching group's means on the pretest and posttest of speaking skills in order to probe the first null-hypothesis. Based on the results shown in Table 4.2 it can be claimed that the flipped group had higher mean on the posttest of speaking skills ($M = 13.67$, $SD = 3.26$) than pretest ($M = 11.49$, $SD = 3.56$).

Table 4.2 Descriptive Statistics; Pretest and Posttest of Speaking Skills (Flipped Group)

	Mean	N	Std. Deviation	Std. Error Mean
Posttest	13.67	24	3.265	.667
Pretest	11.49	24	3.561	.727

The results of the paired-samples t-test ($t (23) = 5.51$, $p < .05$, $r = .754$ representing a large effect size²) (Table 4.3) indicated that the flipped classroom teaching had a significantly higher mean on the posttest of speaking skill than pretest. Thus, the first null-hypothesis as “flipped classroom teaching did not have any significant effect on improving EFL learners' speaking skills” was rejected.

Table 4.3 Paired-Samples t-test; Pretest and Posttest of Speaking Skills (Flipped Group)

Paired Differences	Mean	Std. Deviation	Std. Error	95% Confidence Interval of the Difference		T	df	Sig. (2-tailed)
				Lower	Upper			
	2.182	1.937	.395	1.364	2.999	5.519	23	.000

¹ <https://www.ibm.com/docs/en/spss-statistics/25.0.0?topic=summarize-statistics>

² The r effect size was computed using the following formula; $r = \sqrt{\frac{t^2}{t^2 + df}}$ (Field 2018, p 609); and it should be interpreted based on these criteria; .10 = Weak, .30 = Moderate, and .50 = Large.

Regarding the second research question, A paired-samples t-test was run to compare the flipped classroom teaching group's means on the pretest and posttest of motivation in order to probe the second null-hypothesis. Based on the results shown in Table 4.4 it can be claimed that the flipped group had higher mean on the posttest of motivation ($M = 136.67$, $SD = 11.57$) than pretest ($M = 134.00$, $SD = 13.51$).

Table 4.4 Descriptive Statistics; Pretest and Posttest of Motivation (Flipped Group)

	Mean	N	Std. Deviation	Std. Error Mean
Posttest	136.67	24	11.571	2.362
Pretest	134.00	24	13.516	2.759

The results of the paired-samples t-test ($t (23) = 1.25$, $p < .05$, $r = .252$ representing a weak effect size) (Table 4.5) indicated that the flipped classroom teaching did not have a significantly higher mean on the posttest of motivation than pretest. Thus, the second null-hypothesis as “flipped classroom teaching did not have any significant effect on improving EFL learners' motivation” was supported.

Table 4.5 Paired-Samples t-test; Pretest and Posttest of Motivation (Flipped Group)

Paired Differences

Mean	Std. Deviation	Std. Error	95% Confidence Interval of the Difference		T	df	Sig. (2-tailed)
			Lower	Upper			
2.667	10.437	2.130	-1.740	7.074	1.252	23	.223

As for the third research question, the third null-hypothesis aimed at comparing the experimental and control groups' means on posttest of speaking skills after controlling for the effect of pretest. A One-Way Analysis of Covariance (ANCOVA) was run to compare the experimental and control groups' means on posttest of speaking skills after controlling for the effect of pretest in order to probe the third research question. Besides the assumption of normality which was discussed under Table 4.1, One-Way ANCOVA has three more assumptions; i.e., homogeneity of variances of groups, linearity, and homogeneity of regression slopes whose results are discussed below.

First, One-Way ANCOVA assumes that the variances of the groups are roughly equal on posttest of speaking skills after controlling for the effect of pretest i.e. homogeneous variances groups. The non-significant results of Levene's test (Table 4.6) indicated that the assumption of homogeneity of variances was retained on posttest of speaking skills ($F (1, 45) = .278$, $p > .05$). Thus, it can be concluded that the statistical null-hypothesis that (there was not any significant difference between two groups variances on posttest of speaking skills) was supported. That is to say, the experimental and control groups enjoyed homogenous variances in posttest of speaking skills.

Table 4.6 Levene's Test of Homogeneity of Variances; Posttest of Speaking Skills by Groups

F	df1	df2	Sig.
.278	1	45	.601

Tests the null hypothesis that the error variance of the dependent variable is equal across groups.

Second, One-Way ANCOVA assumes that there is a linear relationship between dependent variable (posttest of speaking skills) and covariate (pretest). Table 4.7 shows the results of the linearity test. The significant results of the linearity test i.e. ($F (1, 46) = 168.13, p < .05, \eta^2 = .916$ representing a large effect size³) indicated that the statistical null-hypothesis that the relationship between posttest and pretest of speaking skills was not linear was rejected. In other words, there was a linear relationship between pretest and posttest of speaking skills.

Table 4.7 Testing Linearity of Relationship between Pretest and Posttest of Speaking Skills

			Sum Squares	of df	Mean Square	F	Sig.
Posttest Pretest	* Groups	(Combined)	448.708	26	17.258	8.435	.000
		Between Linearity	343.978	1	343.978	168.132	.000
		Deviation from Linearity	104.730	25	4.189	2.048	.053
		Within Groups	40.918	20	2.046		
		Total	489.626	46			
Eta Squared			.916				

Finally, One-Way ANCOVA assumes that the linear relationship between pretest and posttest are roughly equal across the two groups, with homogeneity of regression slopes. That is to say, the relationship between pretest and posttest of speaking skills should be linear for the experimental and control groups. The non-significant interaction (Table 4.8) between covariate (pretest) and independent variable (types of treatment) i.e. ($F (1, 43) = 1.04, p > .05$, Partial $\eta^2 = .024$ representing a weak effect size⁴) indicated that the statistical null-hypothesis that the relationship between pretest and posttest of speaking skills was non-linear across groups was rejected. In other words, there were linear relationships between pretest and posttest of speaking skills across the two groups.

³ Eta Squared was computed as Sum of Squares Between Groups / Sum of Squares Total; and should be interpreted using these criteria, .01 = Weak, .06 = Moderate, and .14 = Large (Gray and Kinnear 2012, p 244; Field 2018, p 737).

⁴ Partial Eta Squared should be interpreted using the following criteria; .01 = Weak, .06 = Moderate, and .14 = Large (Gray and Kinnear 2012, p 323; and Pallant 2016, p 285).

Table 4.8 Testing Homogeneity of Regression Slopes; Posttest Speaking Skills by Groups with Pretest

Source	Type III Sum of Squares	df	Mean Square	F	Sig.	Partial Eta Squared
Group	.104	1	.104	.036	.850	.001
Pretest	136.787	1	136.787	47.887	.000	.527
Group * Pretest	2.973	1	2.973	1.041	.313	.024
Error	122.828	43	2.856			
Total	7106.558	47				

Table 4.9 shows the descriptive statistics for the experimental and control groups on posttest of speaking skills after controlling for the effect of pretest. The results showed that the experimental group ($M = 12.58$, $SE = .368$) had a higher mean than the control group ($M = 11.11$, $SE = .377$) after controlling for the effect of pretest.

Table 4.9 Descriptive Statistics; Posttest of Speaking skills by Groups with Pretest

Group	Mean	Std. Error	95% Confidence Interval	
			Lower Bound	Upper Bound
Experimental	12.585 ^a	.368	11.843	13.327
Control	11.114 ^a	.377	10.354	11.874

a. Covariates appearing in the model are evaluated at the following values: Pretest = 9.99.

Table 4.10 shows the main results of one-way ANCOVA. The results ($F (1, 44) = 6.94$, $p < .05$, partial $\eta^2 = .136$ representing a moderate effect size) indicated that the experimental group significantly outperformed the control group on the posttest of speaking skills after controlling for the effect of pretest. Thus; the third null-hypothesis as, “there was not any significant difference between achievement in speaking of learners taught in flipped versus traditional classrooms” was rejected.

Table 4.10 Tests of Between-Subjects Effects; Posttest of Speaking skills by Groups with Pretest

Source	Type III Sum of Squares	df	Mean Square	F	Sig.	Partial Eta Squared
Pretest	204.612	1	204.612	71.565	.000	.619
Group	19.847	1	19.847	6.942	.012	.136
Error	125.801	44	2.859			
Total	7106.558	47				

Finally, to explore the last research question, the fourth null-hypothesis aimed at comparing the experimental and control groups' means on posttest of motivation after controlling for the effect of pretest. A One-Way Analysis of Covariance (ANCOVA) was run to compare the experimental and

control groups' means on posttest of motivation after controlling for the effect of pretest in order to probe the third research question. Besides the assumption of normality which was discussed under Table 4.1, One-Way ANCOVA has three more assumptions; i.e. homogeneity of variances of groups, linearity, and homogeneity of regression slopes whose results are discussed below.

First, One-Way ANCOVA assumes that the variances of the groups are roughly equal on posttest of motivation after controlling for the effect of pretest i.e. homogeneous variances groups. The non-significant results of Levene's test (Table 4.11) indicated that the assumption of homogeneity of variances was retained on posttest of motivation ($F(1, 45) = .428, p > .05$). Thus, it can be concluded that the statistical null-hypothesis that (there was not any significant difference between the two groups' variances on posttest of motivation) was supported. That is to say, the experimental and control groups enjoyed homogenous variances in posttest of motivation.

Table 4.11 Levene's Test of Homogeneity of Variances; Posttest of Motivation by Groups

F	df1	df2	Sig.
.428	1	45	.516

Tests the null hypothesis that the error variance of the dependent variable is equal across groups.

Second, One-Way ANCOVA assumes that there is a linear relationship between dependent variable (posttest of motivation) and covariate (pretest). Table 4.12 shows the results of the linearity test. The significant results of the linearity test; i.e. ($F(1, 46) = 25.33, p < .05, \eta^2 = .720$ representing a large effect size) indicated that the statistical null-hypothesis that the relationship between posttest and pretest of motivation was not linear was rejected. In other words; there was a linear relationship between the pretest and post-test of motivation.

Table 4.12 Testing Linearity of Relationship between Pretest and Posttest of Motivation

			Sum Squares	of df	Mean Square	F	Sig.
		(Combined)	6037.684	29	208.196	1.510	.188
	Between Groups	Linearity	3494.581	1	3494.581	25.354	.000
PostMotivation	* Groups	Deviation from Linearity	2543.103	28	90.825	.659	.841
PreMotivation		Within Groups	2343.167	17	137.833		
		Total	8380.851	46			
Eta Squared					.720		

Finally, One-Way ANCOVA assumes that the linear relationship between pretest and posttest are roughly equal across the two groups, homogeneity of regression slopes. That is to say, the relationship between pretest and posttest motivation should be linear for the experimental and control groups. The non-significant interaction (Table 4.13) between covariate (pretest) and independent variable (types of treatment) i.e. ($F(1, 43) = .234, p > .05$, Partial $\eta^2 = .005$ representing a weak effect size) indicated that (the statistical null-hypothesis that the relationship between pretest and posttest of motivation

was non-linear across groups) was rejected. In other words, there were linear relationships between pretest and posttest in motivation across the two groups.

Table 4.13 Testing Homogeneity of Regression Slopes; Posttest of Motivation by Groups with Pretest

Source	Type Sum Squares	III of df	Mean Square	F	Sig.	Partial Squared	Eta Squared
Group	56.107	1	56.107	.579	.451	.013	
Pretest	3553.515	1	3553.515	36.694	.000	.460	
Group * Pretest	22.681	1	22.681	.234	.631	.005	
Error	4164.172	43	96.841				
Total	844292.000	47					

Table 4.14 shows the descriptive statistics for the experimental and control groups on posttest of motivation after controlling for the effect of pretest. The results showed that the experimental group ($M = 137.14$, $SE = 1.99$) had a higher mean than the control group ($M = 129.41$, $SE = 2.03$) after controlling for the effect of pretest.

Table 4.14 Descriptive Statistics; Posttest of Motivation by Groups with Pretest

Group	Mean	Std. Error	95% Confidence Interval	
			Lower Bound	Upper Bound
Experimental	137.144 ^a	1.993	133.128	141.160
Control	129.415 ^a	2.036	125.313	133.518

a. Covariates appearing in the model are evaluated at the following values: Pretest = 134.77.

Table 4.15 shows the main results of one-way ANCOVA. The results ($F (1, 44) = 7.33$, $p < .05$, partial $\eta^2 = .143$ representing a large effect size) indicated that the experimental group significantly outperformed the control group on the posttest of motivation after controlling for the effect of pretest. Thus; the fourth null-hypothesis as, “there was not any significant difference between improving motivation of learners taught in flipped versus traditional classrooms” was rejected.

Table 4.15 Tests of Between-Subjects Effects; Posttest of Motivation by Groups with Pretest

Source	Type III Sum of Squares	df	Mean Square	F	Sig.	Partial Squared	Eta Squared
Pretest	3658.306	1	3658.306	38.445	.000	.466	
Group	699.416	1	699.416	7.350	.010	.143	
Error	4186.854	44	95.156				
Total	844292.000	47					

4. Conclusion

There has been an increasing emphasis on the value of employing technology in language instruction. With the accessibility of today's developed technology, learners may view videos whenever, wherever, and as many times as they desire. The current study sought to investigate the impact of the flipped model lectures on the oral proficiency of non-English major EFL learners, as well as to determine whether the incorporation of FCM could influence their motivation toward English language learning and to demonstrate the benefits and drawbacks of FCM in terms of speaking skills and motivation. According to the findings, the experimental group's oral competency had significant improvement compared to the control group, also the implementation of flipped classroom positively influenced their motivation. Pre-class assignments that were self-directed and collaborative, as well as in-class activities, boosted their convenience with FCM, inspired them to be more involved, and encouraged them to be more active in speaking activities. Despite the fact that the experiment was relatively brief and the concentration was on learning accomplishment, this study, together with earlier studies asserting the usefulness of blended learning in language learning and teaching, offered more evidence of the influence of flipped classrooms on the EFL learning process. Future studies might explore student progress in language competence in diverse skills and circumstances by extending the experiment length.

Regarding the outcomes of the present study, the researcher put the following suggestions forward for future practice.

1. It is feasible to successfully use the flipped classroom model in the educational process of EFL speaking courses. This type of educational application allowed students to be active, motivated, and involved in speaking exercises, hence improving their speaking abilities.
2. It is crucial for students to engage in FCM activities at home. To guarantee that learners complete assignments before class time, educators need to understand how to track learners' improvement throughout the process.
3. Since non-English major university students in Iraqi Kurdistan have very little exposure to English speaking, which is almost 3 hours per week along with listening, it is essential to provide them with videos to watch at home in order to fill the learning gap between one week to the other. Therefore, introducing FCM to teachers and instructors and encouraging them to apply it will accelerate learning outcomes.

Reference

Abu-Bader, S.H., 2021. *Using statistical methods in social science research: With a complete SPSS guide*. Oxford University Press, USA.

Avdic, A. and Åkerblom, L., 2015, October. Flipped classroom and learning strategies. In *Proceedings of 14th European Conference on e-learning* (pp. 41-49).

Bergmann, J. and Sams, A., 2012. *Flip your classroom: Reach every student in every class every day*. International society for technology in education.

Classroom, H.A.A.E.F., 2016. Teaching Model: Effects on English Language Higher-order Thinking Skills, Student Engagement and Satisfaction. *Journal of Education and Practice*, 7(9), pp.108-121.

Coaley, K., 2010. *An introduction to psychological assessment and psychometrics*. Sage.

Folse, K.S., 2006. *The art of teaching speaking: Research and pedagogy for the ESL/EFL classroom* (No. Sirsi) i9780472031658.

Hamzeh, H. et al., 2019. Impact of flipped classroom on EFL learners' appropriate use of refusal: achievement, participation, perception. *Computer Assisted Language Learning*; Oxford, 32(3), 261-293. DOI:10.1080/09588221.2018.1504083

Krathwohl, D.R., 2002. A revision of Bloom's taxonomy: An overview. *Theory into practice*, 41(4), pp.212-218.

Lage, M.J., Platt, G.J. and Treglia, M., 2000. Inverting the classroom: A gateway to creating an inclusive learning environment. *The journal of economic education*, 31(1), pp.30-43.

Li, Y., Zhang, M., Bonk, C.J. and Guo, Y., 2015. Integrating MOOC and Flipped Classroom Practice in a Traditional Undergraduate Course: Students' Experience and Perceptions. *International Journal of Emerging Technologies in Learning*, 10(6).

McLEAN, A.C., 2012. Destroying the Teacher: The Need for Learner-Centered Teaching. In *English Teaching Forum* (Vol. 50, No. 1, pp. 32-35). US Department of State. Bureau of Educational and Cultural Affairs, Office of English Language Programs, SA-5, 2200 C Street NW 4th Floor, Washington, DC 20037.

Raykov, T. and Marcoulides, G.A., 2008. *An introduction to applied multivariate analysis*. Routledge.

Raykov, T. and Marcoulides, G.A., 2008. *An introduction to applied multivariate analysis*. Routledge.

Rivero, V., 2013. A new model to reach all students all ways. *Internet@ school*, 20(1), pp.14-16.

Roehl, A., Reddy, S.L. and Shannon, G.J., 2013. The flipped classroom: An opportunity to engage millennial students through active learning strategies. *Journal of Family & Consumer Sciences*, 105(2), pp.44-49.

Sidky, G.S., 2019. The flipped classroom enhances students' speaking skills. *مجلة دراسات في المناهج وطرق التدريس* 243(243), pp.22-50.

Tulung, G.J., 2008. *Communicative task-generated oral discourse in a second language: A case study of peer interaction and non-native teacher talk in an EFL classroom* (Doctoral dissertation, University of Ottawa (Canada)).

Zainuddin, Z., 2017. First-Year College Students' Experiences in the EFL Flipped Classroom: A Case Study in Indonesia. *International Journal of Instruction*, 10(1), pp.133-150.