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## Flipped Teaching with CALL in EFL Writing Class: How Does It Work and Affect Learner Autonomy?

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**Abstract:** This paper presents how the process of flipped teaching with Computer Assisted Language Learning (CALL) works in teaching English as a Foreign Language (EFL) writing in the Indonesian context. As well, it also elaborates how the teaching model affects learner autonomy. This flipped teaching with CALL was experienced by some lecturers of private universities in East Java, Indonesia. This study used a multi-site case study research design. The data were yielded from in-class observation, lesson plan analysis, focus group interviews, and questionnaires. The total of 5 EFL writing teachers and 150 students from 5 private universities in East Java, Indonesia had participated in this study. Experimenting with flipped teaching with CALL in teaching EFL writing enabled the teachers, as course developers, to get an idea of their students' response to the challenges of new ways, methods, and techniques of their study. The flip-class environment fostered better communication amongst learners and learner autonomy as well. The flip-class atmosphere also had a beneficial impact on the motivation of learners. The qualitative results from interviews of the learners showed that the learners had inspired themselves to engage in in-class learning activities and self-regulated teaching environments. The findings gave reflection to the teachers on several vitally necessary conditions enabling a course in a flipped teaching with CALL format to contribute to developing students' professional competencies.

**Keywords:** *Flipped teaching, CALL, EFL writing, multi-site case study, learner autonomy.*

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### Introduction

Creative and innovative teaching techniques, methods, or approaches should be implemented in the teaching and learning process. It should be taken into account by teachers in their classes. By doing so, it is expected that the quality of learning will significantly be improved. In this fourth industrial revolution era, technology plays a significant role in almost every humans' life, including language education. Benosa (2015) states that in the English language schools, technology has been discovered to accelerate the learning process and urge numerous teachers to revise strategies and methods to meet new learning requirements, teaching styles and new literature.

One of the methods that integrate the use of technology into the teaching and learning process is a flipped teaching method. To modify the traditional classrooms, some teachers now highly support 'flipped teaching' method which enhances students' understanding of the main ideas and information through videos, e-books, web sites and blogs in their home study (Benosa, 2015; Han, 2015). Further, Leis, Cooke, & Tohei (2015) describe a flipped classroom as a methodology of learning in which training exercises and tasks generally finished by learners in a regular classroom are performed under the teacher's supervision during the class. In contrast, lectures and textbook explications traditionally carried out by teachers with students listening in front of the school are recorded and made available to students through a website such as YouTube®, which is internet video sharing.

With omnipresent social media and internet, hybrid and cooperative teaching, the Flipped Learning Initiative has accelerated the implementation of more significant education technology (Zainuddin & Perera, 2019). It resulted in a paradigm shift in educational technology, which reversed the possibility of student learning from teachers (Sohrabi & Iraj, 2016). This contributes to the autonomy of students and empowers the student. This implies that learners are free

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to take time to work with pairs or teams to participate in group-based projects, lectures, and class conversations (Baepler, Walker, & Driessen, 2014). They learn through active project-based operations which encourage students' skills to think critically, resolve creatively, and work as part of teamwork.

In flipped instruction, learners research the subject themselves first, generally by viewing audio classes that are generally downloaded by the internet. Flipped class students can view and learn from the video contents that can be evaluated at their speed outside class hours. They use the understanding derived from the video classes, which the teacher has scheduled for practical class operations. They usually initiate group discussions and discuss video lessons learned online (Butt, 2014). In a flipped lesson, students learn through practical learning activities and are given a chance to have time in class face to face. In order to solve problems, discuss ideas, and take part in groups, learners will use their face-to-face moment in schools, as active learning is underway.

Some experts have conducted several studies dealing with flipped teaching. Recently, students and instructors are encouraged to interact with each other by flipping the class (Sun & Wu, 2016; Yu & Wang, 2016; Zainuddin & Attaran, 2016). Zainuddin and Halili (2016) noted that school teaching period permits the interaction of learners with colleagues and instructors, while Cakici and Oflaz (2012) have demonstrated that collaborative teaching in a flipped classroom can give rise to greater self-confidence and self-esteem. The class moment has therefore proven useful both for debating and sharing thoughts and for solving problems.

In 2011, Hubackova and Ruzickova (2011) suggested that traditional face to face classroom operations is integrated with an internet technology-based learning setting in advanced training in teaching a foreign language. Also, the incorporation of face-to-face living in an online learning setting promotes self-directed study education and research knowledge (Cakici & Oflaz, 2012; George-Walker & Keeffe, 2010). The flipped learning in the school is, therefore regarded as an ideal model to be used in EFL lessons as it combines class and out-of-class learning.

This study was conducted to describe the process of how flipped teaching with CALL takes place in EFL writing class. Besides, it is also aimed at elaborating how flipped teaching with CALL affects learner autonomy in EFL writing class. Although the increase of computer-assisted language learning has revealed a fresh dimension by incorporating dynamics to language learning, little study has been performed on the flipped teaching strategy in the region of foreign language learning, particularly in the Indonesian context.

### Literature Review

Motivation is a force within which human beings are mobilized and led to intervention, aiming at one objective (Harmon-Jones & Price, 2013). Boo, Dornyei, and Ryan (2015) report on the motive of learners as they describe their spiritual essence and their desire to study by taking the lead in lessons. This research looks at the motive of learners in English as a Second Language (ESL) or EFL schools due to combined technology. Giesbers, Rienties, Tempelaar, and Gijsselaers (2013) and Ahlfeldt, Mehta, and Sellnow (2005) assert that learners would be more comfortable to participate in class and deeper understand the ideas of the course.

The concept of self-determination listed by Edward Deci and Richard Ryan in the mid-1980s is related to student motivation and learner autonomy (Deci & Ryan, 1985). The importance of independent learning in language learning has been identified in (Little, 1991, 2007, 2014), and (Kvashnina & Martynko, 2016). Therefore, as an adequate theoretical structure for this research, self-determination theory (SDT) is chosen. It highlights the self-directed learning of learners (Vansteenkiste, 2004). Here, 'autonomy' means that learners study the material independently and that they create adequate teaching objectives for themselves.

Motivation can be grouped into intrinsic and extrinsic motivation (Abeysekera & Dawson, 2015; Zainuddin & Halili, 2016) in the concept of self-determination. Intrinsic motivation is related to the readiness of learners to carry out their actions because they are fun, engaging, pleasant and exciting, and the extrinsic motivation is generally motivated by expected benefits or the purpose of avoiding penalty (Deci & Ryan, 2002). Intrinsically motivated students will study independently because they are merely concerned with doing work (Giesbers et al., 2013). This is the situation in which learners join courses or do homework because of their pure intention, pleasure, and fun and not seeking a prize (Coon & Mitterer, 2012). In comparison, internal benefits influence extrinsic driven learners. The organizations of learning naturally non-self-employed people, according to Reiss (2012), can join courses for other purposes, like excellent grades or prevent penalty.

Based on SDT, three fundamental cognitive demands are widely relevant, i.e., competence, autonomy, and relatedness. Competence can help students enhance their abilities, knowledge, and attitudes. 'Relatedness' is dealing with social networking that allows for social interaction with colleagues and teachers during or after school hours. 'Autonomy' is the capacity of learners, according to their rates and requirements, to control and regulate their studies (Ryan & Deci, 2000). Autonomy also means learning independently after-courses or at the home study.

## Methodology

### *Research Goals and Design*

The goals of this study were to describe the process of how flipped teaching with CALL takes place in EFL writing class and to elaborate on how flipped teaching with CALL affects learner autonomy in EFL writing class from different sites. To deal with those goals, the research design used in this study was a multi-site case study research design (Creswell, 2012; Yin, 2003). The research methodology of case studies was implemented on several sites because it enabled the accurate answer to research issues in an environment where various types of information were used (Merriam, 1998; Yin, 2003). The objective of this multi-site case study was to get comprehensive data dealing with how flipped teaching with CALL takes place in EFL writing class and how flipped teaching with CALL affects learner autonomy in EFL writing class from different sites.

### *Participants of the Study*

This study involved 5 EFL writing teachers and 150 English Education Program students from 5 private universities in East Java, Indonesia. All of the English Education Programs have been nationally accredited by the Board of National Accreditation for Higher Education (BAN-PT) with 'B' category. From this, it is concluded that the study programs have the same quality. The choice of participants was based on the principles of purposive sampling technique. In this case, the participants were chosen based on criterion sampling. Criterion sampling is a choice of the sample which involves the cases that meet some predetermined criterion of importance (Patton, 2002). The participants of this study were chosen based on these criteria: for teachers, (1) they should be conducting a project of teaching EFL writing using flipped teaching method; (2) they should be willing to participate in this study; meanwhile, for students, (1) they should be from the EFL writing class in which the teacher conducts the flipped teaching method; (2) they should be willing to take part in this study.

### *Instruments*

There are four instruments used in this study which were used to gather the information dealing with the problems of the study. Those four instruments are observation sheet, lesson plan, interview protocol, and questionnaires.

The observation sheet was used by the researchers during in-class observation. This in-class observation was conducted directly and indirectly. The direct in-class observation means that the researchers observed the teaching and learning process directly by attending the class. On the contrary, the indirect in-class observation means that the researchers did not directly observe the teaching and learning process by attending the class, but they recorded the process using a video camera and analyzed it after they got the video file. Through observation, the researchers will be able to identify the step-by-step of the flipped teaching implemented by the teachers during in-class teaching and instruction given to the students for out-of-class learning activity.

The lesson plan made by the teachers was also analyzed by the researchers. The lesson plan analysis was done in order to check whether or not the in-class teaching and learning process is in line with the procedures written in the lesson plan. Therefore, if there is an improvement made by the teacher, it will be easily identified by researchers. Then, the researchers will be able to conclude that the teaching and learning process is in line with the principles of flipped teaching method or not.

The interview protocol was used by the researchers to guide them in conducting focus group interviews (Creswell, 2012). The focus group interviews were done by the researchers to gather information from students dealing with motivation and learner autonomy. The interview protocol for focus group interviews were in the form of specific questions list referring to the students' motivation and learner autonomy. The specific questions were written to result similar answers from the different groups. There were 5 different groups from 5 different universities involving in this study. During in its implementation, the focus group interviews were led by a highly trained moderator to lessen the problem of reliability. Further, in order to test the consistency of qualitative data gained from focus group interviews, a triangulation technique was used (Creswell & Miller, 2000).

The researchers used a questionnaire of motivation and learner autonomy for triangulation. The questionnaires were distributed to 150 students who took part in this study. The survey questionnaires of motivation consisted of 10 items (this survey questionnaire was adapted from Zainuddin & Perera's (2019) instrument). The 5-point of Likert scale was used in this survey. The ranges of the responses are from *strongly disagree* to *strongly agree*. The validity of the instrument was measured by using Exploratory Factor Analysis (EFA) through Statistical Package for the Social Sciences (SPSS) program version 22, and Confirmatory Factor Analysis (CFA) through Lisrel program version 8.51. Meanwhile, the reliability of the instrument was measured by using *Alpha Cronbach*.

### *Data Analysis*

The qualitative data yielded from this study were analyzed descriptively. Descriptive analysis was done by following Creswell's (2012) principles. This analysis started from developing a general sense of the data, and then coding

description and themes about the central phenomenon (Ghufron & Ermawati, 2018). In this study, the transcripts of focus group interviews were coded separately by two analysts. The use of multiple analysts was to evaluate the reliability of coding at least in relation to important issues and topics. Meanwhile, the quantitative data yielded from the questionnaires were statistically described.

### *Context and Procedures*

In Indonesian higher education context, especially in the English Education Program, EFL writing course is one of the compulsory courses that students must take. It is usually taught from the first semester until the fourth, and even, the fifth semester. This course was taught in order to train the students on how to write academically. Because, at the end of their study, they must write a research report (thesis) as one of the requirements before they passed from the university level (Ghufron, Saleh, Warsono, & Sofwan, 2016). Each EFL writing course consists of 2 to 3 credit hours in each semester, depending on the curriculum. In this study, five private universities in East Java, Indonesia, which have English Education Program were selected as research sites. These English education study programs have almost similar quality since they have been nationally accredited by the Board of National Accreditation for Higher Education (BAN-PT) with 'B' category. These English education study programs also have an EFL writing course as one of their compulsory courses in which the students must take. During its implementation, the EFL writing teachers from the five English education programs have implemented the flipped teaching method in teaching EFL writing course. They implemented the flipped teaching method by incorporating technology such as CALL. Some of them use weblogs, Schoology platform, YouTube® videos, and so forth, in their out-of-class learning activities. Then, during in-class teaching activities, the teachers, as facilitators, lead the students to have a group discussion of what they have learned in out-of-class learning, and practice writing both in group and individual. This study was focused on describing the process of in-class activities in which it follows the rule of flipped teaching method and elaborating on how the flipped teaching affects learner autonomy. This study was conducted in 5 different places; therefore, it is called as multi-site research.

## **Findings / Results**

### *The process of flipped teaching method in EFL writing courses*

#### *1. Students' Out-of-class Activities*

The data dealing with the students' out-of-class activities were yielded from the lesson plan analysis. From the lesson plan analysis, it was known that the time allotment (duration) of each class meeting in this EFL writing course is 100 minutes since it has 2 credit hours, in which each credit hour is 50 minutes face-to-face learning. There is one meeting in a week. Therefore, there are 16 meetings during one semester, including 2 examinations (middle test and final test). From the lesson plans made by the lecturers, it was known that not every meeting was flipped. The flipped meetings are 60% of the total meetings, four meetings before the middle test, and four meetings before the final test. The two major topics discussed during the semester were expository essay and argumentative essay. The topic of the expository essay was taught in the first-half semester (before the middle test), and the topic of argumentative essay was taught in the second-half semester (before the final test). The things that differentiate among those 5 research sites were the CALL media integrated into the flipped teaching method. Some of the teachers used YouTube® videos and online articles dealing with the topics; some of them combined YouTube® videos and online articles with learning management system (LMS), in this case, was Schoology Apps.

For the teachers who used YouTube® videos and online articles in their flipped activities, first, they instructed the students during the previous meeting that they should access the YouTube® videos dealing with the forthcoming topics. To ensure that the students access the same videos, the teachers directly shared the particular links that the students should access during out-of-class activity. The followings links are some of the YouTube® videos that students must access.

- 1) [https://www.youtube.com/watch?v=bzrpi93Rq\\_M](https://www.youtube.com/watch?v=bzrpi93Rq_M)
- 2) <https://www.youtube.com/watch?v=bhxRWDgPt3o>
- 3) <https://www.youtube.com/watch?v=57qLMT6tZp0>
- 4) <https://www.youtube.com/watch?v=pxksY-O74og>

Meanwhile, for the online articles, the teachers allowed the students to choose the most complete and comprehensive ones freely. Besides, the teachers also reminded the students always to take notes the crucial points they get from the videos and online articles, including difficult words, phrases, and sentences that they do not understand. If possible, they were asked to find the solution of the difficulties by themselves, but if not, the teachers would help them during face-to-face/in-class meeting. The teachers also reminded the students that those activities require internet access. The students must prepare everything, including the additional budget to buy internet data package. If possible, the students were urged to collaboratively with their peers during out-of-class activity. This would enable them to have peer discussion and resulted in a deep understanding of the topics or materials.

For the teachers who used Schoology Apps and combined YouTube® videos and online articles with the Apps, they firstly explain to the students how to use it. It was started from how to install the Schoology Apps to students' gadget, how to sign up for creating an account, how to do login, how to select courses, and how to get the course access code and join courses. In that LMS, the teachers have already prepared the materials that students should access during out-of-class activity. The students should follow the instruction from teachers of which videos or online articles they should access. The access to this LMS also requires internet access. Therefore, the teachers also reminded the students to prepare their internet connection, including an additional budget for buying internet data package.

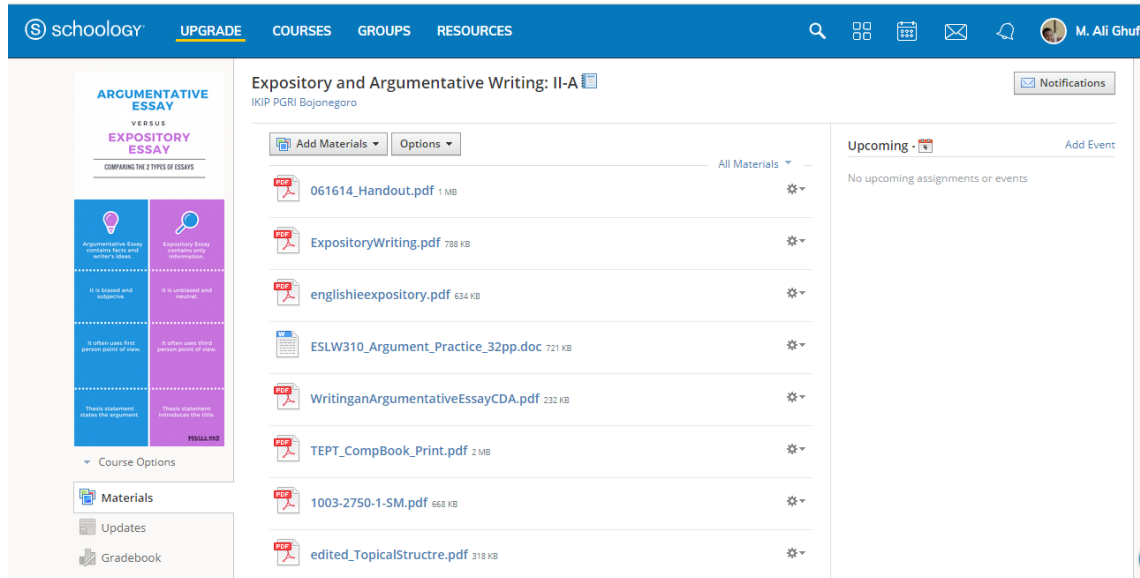


Figure 1. Overview of the Course Layout in Schoology Apps

From Figure 1, it is seen that the teachers have prepared the teaching materials for out-of-class activities in the LMS. The instruction of what the students must do was given in the previous face-to-face meeting. The teacher could check the students' participation as well as students' attendance in online learning through LMS by checking the member list in the Apps' menu. Through Schoology Apps, the students also had the opportunity to demonstrate that they grasped the contents of the materials they learned from videos or online articles by answering questions via an online quiz.

	Jul 1 Monday	Jul 2 Tuesday	Jul 3 Wednesday	Jul 4 Thursday	Jul 5 Friday	Jul 6 Saturday
Class Attendance Status				Not Saved		
Alif, Eka Surya				✓		
Alvi Jannatin, Nila				◇		
Amalia, Regita Rizky				✓		
Andika Lepi, Luluk Merinela				✓		
Anggi, Dwi				✓		
Fajri, Thalia				✓		

Figure 2. Overview of Online Class Attendance in Schoology Apps

Through Schoology Apps and other CALL media, students were therefore anticipated to view preliminary course items. Many lectures and handouts were also allocated to be finished in the house so that the course products could be synthesized and evaluated. Since learners wasted time at school observing Schoology Apps and other CALL media, the classes offered them higher possibilities to interact with the material through a multitude of student-centered work such as class discussion and writing practices.

## 2. *Students' in-class or Face-to-face Learning Activities*

The data related to the students' in-class activities were gathered through in-class observation. From the in-class observation, the general process of teaching and learning activities of the flipped teaching in EFL writing course from the 5 universities is described as follows.

The first-in-class activity was reviewing the out-of-class activities. The teachers asked the students dealing with the materials that they had learned through online learning out of the class. They asked about the crucial points of materials or topic which the students had learned. Some students confidently answered the questions given. It was also found that some students are less confident to answer the questions by merely kept silence and did not have self-initiation to answer the questions. However, when they were appointed individually to answer the question, they could answer it correctly. Besides, the teachers also reviewed the difficulties that the students faced during out-of-class activities. Sometimes, from the difficulties found by the students, the teachers asked to do a class discussion to solve the problem with the teachers as the guide.

After reviewing the materials, the teachers started the main activities. The learning activities followed the principles of the scientific method, i.e., observing, questioning, practicing, evaluating, revising, and finishing the final draft. In the context of EFL writing course, the activities were started by observing the model of text given by the teachers. The students observed the text by matching the theories they have learned from YouTube® videos or online articles during out-of-class activities. For example, they observed and analyzed the structure of the Expository Essay and Argumentative Essay from the model essays. They did it in a small group activity or pairs. Through the small group discussion and paired discussion, the students built the understanding of the model essays given. When they found some difficulties, they would question the teachers and ask for more explanation. After that, the students would do a writing practice by following the pattern of the model essays.

Sometimes, the teachers gave the particular topic for students to write; and sometimes the students were allowed to choose the topic for writing freely. For the first writing practice, the students were asked to have a collaborative writing practice, mostly in pairs. Once they have finished writing the draft, they continued to the evaluation process. In this step, the evaluation process was conducted through peer evaluation by exchanging students' works. The teachers explained the indicators of writing that they should evaluate, i.e., content, organization, diction, grammar, and mechanics (spelling and punctuation). After the peer evaluation was done, the students return the draft to the writers. The writers, then, revised their writing based on their mates' feedback. Unfortunately, the negative findings were found in this step. Some of the students could not give correct feedback to their friends' works. Even, some of them gave an incorrect evaluation. Therefore, the teachers always reminded the students to recheck their works even though the works had been evaluated in peer evaluation. After revising the draft, the students recheck their writing and finishing the final draft. Once the final draft was completed, they submitted their works to the teachers for the evaluation and grading process.

The learning process, from observing, questioning, practicing, evaluating, revising, and finishing the final draft, could not be achieved in one meeting. It needs two or more meetings to complete all steps. The writing practice was done in two steps, collaborative writing and individual writing. The steps of individual writing were similar to the process of collaborative writing, i.e., observing model essays, questioning model essays, individual writing by imitating the structures of model essays, peer evaluation, revision of the draft, finishing the final draft, and submitting the final draft to the teacher for second evaluation and grading process. These steps of individual writing also could not be finished in one meeting. They need at least two meetings.

The in-class learning activities were also used to learn automated feedback program for the peer evaluation process. The automated feedback programs used were Grammarly, Google docs and Microsoft Word. However, the most frequent program they used was Grammarly. They created an account in [www.grammarly.com](http://www.grammarly.com) for free access.

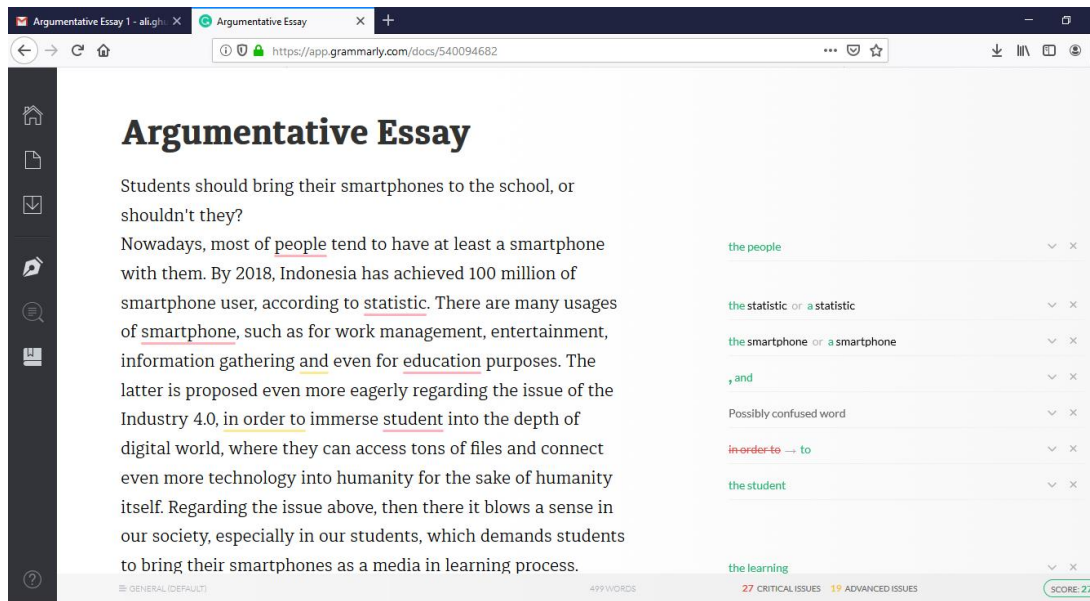


Figure 3. Overview of Peer Evaluation Activity through Grammarly

This automated grammar checker enables the students to check, effectively, their grammatical mistakes and mechanics as well. They could immediately 'click' on the suggested feedbacks provided by the program. However, for those who do not master the grammar rules well, sometimes they would be confused and could not choose the correct feedbacks. Therefore, the teachers should not rely on the students' evaluation results of using automated grammar checker since some students could not adapt and use the program correctly.

#### *How the flipped teaching method affects learner autonomy*

Learner autonomy is positively correlated with motivation. Therefore, before this section goes to learner autonomy, motivation is first discussed as follows.

#### *1. The students' intrinsic and extrinsic motivation during and after experiencing the flipped teaching method*

As previously mentioned in the instruments section, the data of students' motivation during and after experiencing the flipped teaching method, the researchers used survey questionnaires and focus group interviews. The followings are the results of the survey questionnaire of motivation.

Table 1. The Results of Survey Questionnaire of Students' Motivation

No.	Statement	Number of Respondents	Mean	Standard Deviation (SD)
<b>How important is each item in describing your intrinsic motivation in your flipped classroom?</b>				
1	I felt excited while learning EFL writing course in the flipped classroom	150	4.02	0.89
2	I was able to manage my own learning in the flipped classroom	150	3.83	0.81
3	I was able to interact with peers during and after class hours	150	3.91	0.85
4	Using the video lessons and/or weblogs outside the class enabled me to better understand the subject	150	3.98	0.81
5	I attended class because I wanted to explore new ideas	150	4.10	0.74
<b>How important is each item in describing your extrinsic motivation in your flipped classroom?</b>				
6	I learned EFL writing course because it was a compulsory course	150	3.83	0.71
7	I wanted to do well in this class because it was important to show my ability to my lecturer, family, friends or others	150	3.98	0.71
8	I learned EFL writing in order to be able to write a thesis and find a good job	150	4.05	0.73
9	The most satisfying thing to me would be to get a good grade in the EFL writing class	150	3.97	0.70
10	I learned EFL writing course because I would be punished by my lecturer if I didn't	150	3.32	0.94



Items 1 to 5 are about students' intrinsic motivation. The first item of the survey is about the students' excitement while learning the course with the flipped teaching method. The mean score of the students' answer is 4.02, which means that the majority of the students agree that they felt excited about learning with the flipped teaching method. The second item is about the students' ability to manage their learning in the flipped teaching method. The mean score of this item is 3.83, which means that the majority of the students were able to manage their learning during the flipped teaching method. The third item is about the students' ability to interact with their classmates during and after class hours. The mean score of this item is 3.91, which means that the majority of the students assert that they were able to interact with their classmates during and after class hours. The fourth item is about the effect of using video lessons and/or weblogs during out-of-class activity to their understanding in materials. The mean score of this item is 3.98, which means that the students agree that using video lessons and/or weblogs during out-of-class activity could help them to understand the lesson better. The fifth item is about the students' aim to attend the class. The mean score of this item is 4.10, which means that the students agree that their aim to attend the class was because they wanted to explore new ideas. The results of the survey items 1 to 5 imply that the majority of students have high intrinsic motivation.

Items 6 to 10 are about students' extrinsic motivation. The sixth item is about the students' purpose in learning EFL writing course was because it is a compulsory course. The mean score of this item is 3.83, which means that the students' extrinsic motivation in joining the course since it is a mandatory course is high. The seventh item is about the reasons why the students should do well in the EFL writing course. The mean score of this item is 3.98, which means that their extrinsic motivation to learn the course due to their willingness to show their competence to others is high. The eighth item is about the students' intention to learn EFL writing course due to their willingness to be able to write a thesis and find a good job. The mean score of this item is 4.05, which means that their extrinsic motivation in dealing with this statement is high. The ninth item is about the students' satisfaction in the EFL writing class was due to getting a high score. The mean score of this item is 3.97, which means that their extrinsic motivation at this point is high. The last item is about the reason why the students learned the EFL writing course due to they were afraid of being punished by the teachers if they did not. The mean score of this item is 3.32, which means that they have an average extrinsic motivation at this point.

The qualitative data dealing with the students' motivation was yielded from the focus group interviews. The students were grouped into five based on their universities. Then, the researchers raised some questions dealing with learning motivation during and after the implementation of the flipped teaching method. The results of the focus group interviews from the five groups were mostly similar. The results are described as follows.

From the first group, it can be revealed that the students' motivation in EFL writing course increase significantly after they experienced the flipped teaching method. They asserted that the teachers' way of teaching the course was challenging. The students were challenged with the various activities outside and inside the class. They also asserted that in-class learning that integrates technology and innovative method made them more motivated. The in-class activities were not dull since the activities were always different from one meeting to another. Dealing with flipped learning, they state that the use of online application could make their motivation higher. The following is the interview excerpt.

*"..... Ummm, right. The things that make us motivated are challenging learning activities. The teacher always sets different activities day-by-day. Mmm.. Another thing that motivates us is the use of technology in teaching and learning process and outside the class. We were asked to learn through an online application, Schoology I mean, and we could access the materials everywhere as far as we have an internet connection". (Student from group 1)*

The second group added that they were motivated in the flipped class learning since it is a new method for them. They usually learn everything in the class, started from listening to the teacher's explanation, doing tasks, and submitting the task. Now, after they were introduced to flipped teaching method, they got a new experience that materials could be learned outside the class with exciting media such as watching videos, reading online articles, and so on. They could understand the materials not only through listening teacher's explanation but also through different way such as from watching the video. The following is the interview excerpt.

*"Yeah, we think that because it is a new method for us. That's why we were motivated. Usually, we only sit in the class, listening to the teacher's explanation, doing an assignment, and submitting it to the teacher. However, now, we were asked to learn outside the class by watching specific videos from YouTube®, taking important notes from the videos and trying to understand the materials from them... ummmm that's very interesting". (Student from group 2)*

From the results of the survey questionnaire and the focus group interviews, it implies that the flipped teaching with CALL media affects students' motivation. The teaching and learning activities set by the teachers inside and outside the class during the implementation of the flipped teaching method and the learning media used could increase students' motivation in learning EFL writing course. Later on, the increase in students' motivation will lead to learner autonomy.



### 1. The students' learning autonomy during and after experiencing the flipped teaching method

Autonomy relates to the learners studying the contents separately and establishing their own learning objectives to hold responsibility for themselves. To deal with this, the researchers used a survey questionnaire and focus group interview in order to gather the data. The survey questionnaire of learner autonomy was divided into five parts based on the aspect of evaluation. The first part is dealing with the aspect of the English teachers' aims and requirements. The results are presented in Table 2 below.

Table 2. The Results of Survey Questionnaire on Learner autonomy from Aspect 1

No.	Statement	Number of Respondents	Mean	Standard Deviation (SD)
<b>A. Evaluation of the English teacher's aims and requirements</b>				
1	I clearly understand the learning goals set by teachers	150	3.96	0.80
2	It is easy for me to make the teacher's goals into my own goals	150	3.82	0.77
3	I clearly understand the importance of making the teacher's goals my own, as well as studying hard to achieve those goals	150	3.92	0.71
4	I clearly understand the teacher's intention during in-class learning activities	150	3.93	0.78
5	In class, it is easy for me to keep up with the teacher's pace	150	3.81	0.78

From Table 1 above, to measure learner autonomy from the aspect of the English teachers' aims and requirements, the researchers used five indicators, they are: 1) the students' understanding of the learning objectives set by the teachers, 2) the students' ability to make the teachers' goals into their own goals, 3) the students' understanding about the importance of making the teachers' goals into their own and, consequently, they have to study hard to achieve the goals, 4) the students' understanding of the teachers' intention during in-class learning activities, and 5) the students' ability to follow the teachers' pace. From the five indicators being measured, the mean score of each indicator is >3.80, which is nearly 4.0. This means that the learner autonomy in dealing with the first aspect is high.

The second aspect is the establishment of studying goals and plans. The results of the survey questionnaire dealing with this second aspect are presented in the following table.

Table 3. The Results of Survey Questionnaire on Learner autonomy from Aspect 2

No.	Statement	Number of Respondents	Mean	Standard Deviation (SD)
<b>B. Evaluation of establishing studying goals and plans</b>				
1	Outside of assignments given by the teacher, I have a clear plan for studying on my own	150	3.94	0.80
2	When studying EFL writing course, I establish practical goals for myself based on my true level of competence	150	3.91	0.71
3	I am good at adjusting my studying plans based on my progress	150	3.81	0.75
4	I am good at creating a practical studying schedule for myself	150	3.83	0.79
5	I am good at establishing study goals based on the requirements outlined by the class	150	3.86	0.71

From Table 3 above, it is clearly seen that there are five indicators to measure the second aspect of learner autonomy. The five indicators are: 1) the students' plans for self-learning outside the tasks assigned by the teachers, 2) the students' ability to set practical goals for themselves based on their level of competence, 3) the students' ability to adapt their learning plans based on their progress, 4) students' ability to make practical learning schedule, and 5) the students' ability to set learning goals based on the class' requirements. From the five indicators, the mean score of each indicator is >3.80, which means that the learner autonomy dealing with the aspect of the establishment of learning goals and plans is high.

The next aspect of learner autonomy is the learning strategy's implementation. The results of the survey questionnaire are presented in the following Table 4.

Table 4. The Results of Survey Questionnaire on Learner autonomy from Aspect 3

No.	Statement	Number of Respondents	Mean	Standard Deviation (SD)
C. Evaluation of the learning strategy's implementation				
1	I have a complete understanding of the learning strategy	150	3.87	0.77
2	I can consciously employ effective strategies to improve my written English skills	150	3.89	0.71

There are two indicators of the third aspect of learner autonomy. The first indicator is the students' understanding of learning strategy, and the second indicator is the students' ability to implement the strategy to, effectively, improve their writing skills. The mean score of each indicator is >3.86, which means that the learner autonomy in the aspect of learning strategy's implementation is high.

The fourth aspect of learner autonomy is the ability to monitor the usage of learning strategies. The results of the survey questionnaire are presented as follows.

Table 5. The Results of Survey Questionnaire on Learner autonomy from Aspect 4

No.	Statement	Number of Respondents	Mean	Standard Deviation (SD)
D. Evaluation of the ability to monitor the usage of learning strategies				
1	I can consciously monitor the usage of writing strategies during practice	150	3.88	0.73
2	I am able to find and solve problems in my method of studying	150	3.85	0.80
3	I am conscious of whether or not my method of studying is practical	150	3.81	0.75
4	If I realize that my method of study is impractical, I quickly find a more suitable one	150	3.85	0.74

There are four indicators dealing with the fourth aspect, i.e., the students' ability to monitor the writing strategies, the students' ability to find and solve problems dealing with the method of study, the students' understanding dealing with the practicality of learning method, and the students' ability to find the most practical method quickly. The mean score of each indicator is >3.80, which means that the learner autonomy dealing with the aspect of the ability to monitor the usage of learning strategy is high.

The last aspect of learner autonomy is the EFL writing process. The results of the survey questionnaire are presented in Table 6.

Table 6. The Results of Survey Questionnaire on Learner autonomy from Aspect 5

No.	Statement	Number of Respondents	Mean	Standard Deviation (SD)
E. Evaluation of EFL writing process				
1	Outside of class, I take advantage of various opportunities to practice my EFL writing (e.g., Practice writing independently the help of YouTube videos or weblogs)	150	4.03	0.98
2	I make an effort to overcome emotional issues that may hinder my EFL writing skills, such as anxiety and inhibition	150	3.93	0.80
3	I use available learning resources such as the library, internet, dictionaries, etc. to improve my EFL writing skills	150	4.13	0.81
4	It is easy for me to put newly learned English into practice	150	3.96	0.85
5	I often study together with other people, such as practicing with a language partner, or practicing and reviewing materials with classmates	150	4.02	0.70
6	While practicing EFL writing, I am able to realize my own mistakes and correct them	150	4.02	0.72

Table 6. Continued

No.	Statement	Number of Respondents	Mean	Standard Deviation (SD)
7	When I discover my mistakes, I understand the underlying reason for making them (e.g. interference from my mother tongue, or a lack of familiarity with grammar rules, etc.)	150	3.97	0.71
8	I select effective methods to become a better language student (such as speaking with successful English students about their experiences, taking a journal of my own progress, reading English newspapers, magazines, novels, etc.)	150	3.93	0.72
9	During the process of completing a certain writing task, I keep in line with my predetermined plan	150	3.87	0.73
10	During the process of completing a certain writing task, I often check and correct my comprehension of the previously studied material	150	3.92	0.71

For the last aspect of learner autonomy, there are ten indicators, they are: 1) the students practice English writing outside the class, 2) the students' ability to deal with emotional issues that could affect their writing skills, 3) the students' willingness to use available resources to improve their writing skills, 4) the students' ability to use newly learned English into writing practice, 5) the students frequently practice their English with their partners, 6) the students' ability to recognize their mistakes and correct them during writing practice, 7) the students' ability to recognize the cause of mistakes they have made, 8) the students' ability to select effective method to practice writing, 9) the students' ability to stay on their predetermined plans during finishing writing task, and 10) the students' ability to recheck and correct their comprehension of previously learned materials during completing the writing tasks. From the results of the survey, the mean score of each indicator of this fifth aspect is >3.86, which means that the learner autonomy in term of EFL writing practice is high.

Further, the focus group interview dealing with learner autonomy was conducted by grouping the students into five based on their university. The results of the focus group interview are described as follows.

Generally, most of the students from the five groups had similar opinions. They stated that after experiencing the flipped teaching method in the EFL writing course, they started to raise their independent learning. When the teachers instructed them to learn and understand the teaching materials during out-of-class activities, most of them would do it as good as possible. For instance, they would watch YouTube videos based on the links given by the teachers and understand the materials explained in the video. They also took crucial points and some difficulties they found from the videos.

Another example is when the teachers instructed them to join online course through Schoology Apps for their out-of-class activities. They always followed the teachers' instruction. They did the online quizzes provided through the Apps. The following is the interview excerpt.

*"We think that since our teacher introduced the flipped teaching method in writing course, we were urged to learn independently. When they asked us to learn materials through watching YouTube videos, we always did it well. We took notes for some important points, some difficult words, phrases, or sentences uttered by the speaker or narrator in the videos in which later, it will be used for discussion in the class. We did the entire teacher's instruction sincerely". (Student from group 3)*

The students from group 4 also added the following statements.

*"Since the teacher introduced us with Schoology Apps and instructed us to use it for our out-of-class activities, we started to learn independently. We read the materials provided by the teacher in the Apps. We watched the videos related to the materials in the Apps. Moreover, we also did online quizzes in the Apps. Then, in the class, we discussed what we have learned during out-of-class activities with our teacher". (Student from group 4)*

Further, for in-class activities, the students also asserted that they always listened to their teachers' explanation of learning goals and made them as their own goals. Based on the learning goals, they made some learning plans in order to achieve those goals effectively. They used practical learning method and strategy based on their competence, such as by small group discussion, peer tutoring (during peer evaluation process), etc. They also made a lot of writing practice during in-class and out-of-class activities. During their writing practice, they always tried to recognize the mistakes of their writing and revise it once they found it. The following is the interview excerpt.

*"In the class, the teacher always explains to us about learning objectives. We set the learning objectives explained by the teacher as our own goals. Then, we set a study plan in order to achieve the goal". (Student from group 5)*

Then, the student from group 1 added the following statements.

*"We usually use practical learning method or strategy to finish our writing task. Sometimes, we have small group discussion for brainstorming activities, peer tutoring for evaluating our writing draft, and so on".* (Student from group 1)

The students from group 2 also give their elaboration as follows.

*"To have better writing skills, we always do a lot of writing practices. We do it during in-class and outside the class learning. We also try to recognize our writing mistakes and revise them when we realize the mistakes".* (Student from group 2)

From the results of survey questionnaire of learner autonomy and the results of focus group interview, it is found that the students have high learner autonomy during and after experiencing the flipped teaching method in the EFL writing course.

### Discussion and Conclusion

The process of implementation of the flipped teaching method in the EFL writing course was divided into two phases. The first phase was the out-of-class activities. The teacher instructed the students to learn and understand the teaching materials through some ways, i.e., watching YouTube videos, reading online articles, joining Schoology apps and access the materials that had been provided there, doing online quizzes through the Schoology Apps. The second phase was the in-class activities. In this phase, the teachers first reviewed the students' understanding of the teaching materials that have been previously learned during out-of-class activities by raising some questions and making small group discussion. Then, the teachers continued the learning process by asking the students to observe model essays, giving opportunities to students to ask questions related to the model essays, asking the students to do writing practice, asking the students to evaluate evaluating the writing draft, asking the students to revise their writing draft and submit it to the teachers. These results were in line with the theory proposed by Cockrum (2014) in which he proposes two types of the flipped classroom, i.e., First Iteration Flips and Second Iteration Flips. These results were following the First Iteration Flips. It consists of two steps, i.e., traditional flip and writing workshop flip. The traditional flip pre-loads the content video, followed by problem, activity, or class writing based on it. The writing workshop flip refers to the activities in which the learners should be writing in class, working in class, making choices personal to them, and having the teacher model and guide. Further, dealing with the learning process, implemented by the teachers during in-class activities, which consists of observing, questioning, practicing, evaluating, and revising, these were in line with the scientific approach applied in Indonesian 2013 curriculum (Ahmad, 2014; Nur & Madkur, 2014).

During the evaluation process of the writing draft, the teachers also asked the students to use an automated feedback program in order to optimize the students' works. The use of the automated feedback program had been investigated by some experts (Daniels & Leslie, 2013; Dodgson, Tariq, Alauyah, & Yusof, 2016; Godwin, 2016; Qassemzadeh & Soleimani, 2016; Schraudner, 2014). The results of the study were mainly positive. Further, Ghuftron & Rosyida (2018) the students' works which are evaluated with the automated feedback program will significantly be improved in terms of grammar, vocabulary (diction), and mechanics (spelling and punctuation). However, the automated feedback program does not have much effect on the content and organization of writing.

Learner autonomy is closely related to motivation. Based on the results of this study, it is revealed that after experiencing the flipped method with CALL media in the EFL writing course, the students have high learning motivation and learner autonomy. According to Nguyen (2018), the flipped classroom can influence learning time, scaffolding, learning autonomy, accessibility, and functioning knowledge. Santikarn & Wichadee (2018) assert that the flipped classroom approach helps foster learner autonomy through online video lessons and class activities at school.

Further, Gavranović (2017) argues that reversing the content of lecture delivery and students' work outside of classes needs students' active participation, and flipped classes can enhance both students' and teachers' motivation, their creative and critical thinking skills, and they can also improve performance and communication skills. Later on, learner autonomy is encouraged through the opportunity given to students to find, evaluate, and analyze information themselves.

In brief, this study was intended to describe the process of the flipped teaching method in the EFL writing course and to explain how the flipped teaching method affects learner autonomy. To implement the method in the EFL writing course, the teachers divided the students' learning activities into two phases, i.e., out-of-class learning activities and in-class learning activities. Experimenting in EFL writing with the flipped teaching method with CALL media allowed educators to gain a sense of the student's reaction to the problems of current forms of learning, methods, and techniques, as curriculum designers. The flip-class atmosphere promoted stronger communication between students and autonomy. The flip-class environment also benefited the motive of students. The qualitative findings of the student surveys indicated that the students were encouraged to participate in a self-regulatory learning environment in the classroom.

### Suggestions

The results of this study reflected educators on several circumstances that were vital to help develop students' skills through the flipped teaching method with CALL media. Future studies exploring the integration of CALL into EFL learning should include analysis of the learning materials used in flipped teaching, such as videos and other pedagogical materials. A recommendation should be compiled and validated with data from students that present their beliefs on the efficacy of these materials for sites and materials which are best suited for university students. Further collaborative projects should be carried out both within the single university programme and between universities in different contexts.

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