

Post-writing form-focused instruction in process-genre-oriented writing classrooms: Effects on second language learners' writing accuracy

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ABSTRACT: Recent findings have provided growing evidence in support of process-genre-oriented writing pedagogy. However, these types of approaches tended to place form-focused instruction (FFI) in the background, particularly the explicit teaching of grammar (i.e., isolated FFI). As such, limited improvement in writing accuracy was reported by recent studies. It is, therefore, important to look into how isolated FFI might further improve this aspect of writing within process-genre-oriented writing classrooms. The current study investigates the effects of post-writing isolated FFI (post-FFI) on second language (L2) writing accuracy within this writing environment. Using mixed methods quasi-experimental design, the findings show that post-FFI benefits students as it improved their overall writing accuracy, particularly errors that impede meaning (levels 2 and 3 errors). This improvement was attributed to noticing, contextualised learning of forms, and students' psycholinguistic readiness as supported by students' qualitative responses. Nonetheless, some challenges were also reported by students regarding the intervention. Implications for L2 writing pedagogy and future research are discussed.

Key words: form-focused instruction, explicit instruction, L2 writing, process-genre approach, post-writing FFI

Enseñanza de la post-escritura centrada en la forma en los procesos de las clases de composición escrita orientadas hacia el género: Efectos en la precisión de la escritura de los estudiantes de segunda lengua

RESUMEN: Recientes hallazgos han proporcionado una creciente evidencia en apoyo de la pedagogía de la escritura procesual orientada al género. Sin embargo, estos tipos de enfoques tienden a colocar la instrucción centrada en la forma (FFI) en un segundo plano, en particular la enseñanza explícita de la gramática (es decir, FFI aislado). Por ello, los estudios recientes informan de una mejora limitada en la precisión de la escritura. Por lo tanto, es importante investigar cómo la FFI aislada podría mejorar aún más este aspecto de la escritura dentro de las aulas de escritura como proceso orientadas al género. El presente estudio investiga los efectos del FFI aislado en la post-escritura (post-FFI) en la precisión de la escritura de la segunda lengua (L2) dentro de este entorno de escritura. Utilizando un diseño cuasi-experimental de métodos mixtos, los resultados muestran que el post-FFI beneficia a los estudiantes, ya que mejora su precisión general en la escritura, particularmente los errores

que impiden el significado (errores de nivel 2 y 3). Esta mejora se atribuyó a la atención, al aprendizaje contextualizado de las formas y a la preparación psicolingüística de los estudiantes, tal y como se desprende de sus respuestas cualitativas. No obstante, los estudiantes también informaron de algunos problemas relacionados con la intervención. Se discuten las implicaciones para la pedagogía de la escritura en L2 y para futuras investigaciones.

Palabras clave: instrucción centrada en la forma, instrucción explícita, escritura de L2, enfoque de proceso-género, FFI post-escritura

1. INTRODUCTION

Form-focused instruction (FFI) has been the focus of much debate since the 1990s. While questions have been raised about its efficacy, research findings provide growing evidence in support of it (e.g., Kang et al., 2019; Ranta & Lyster, 2017; Spada, 2011). It is seen as an effective approach to draw learners' attention to linguistic forms and therefore is conducive to language learning (Spada & Lightbown, 2008). Unlike the traditional approach to teaching grammar, FFI involves the teaching and learning of language features in a meaningful and communicative context. Some ways to operationalise it in the language classrooms include corrective feedback, recast, and metalinguistic explanation. As second language (L2) scholars acknowledge the positive impact of FFI on language learning, most of the issues are no longer about whether it should be adopted or not but on how and when it is most effective (Spada, 2018).

One area where FFI is found useful is in the field of L2 writing pedagogy. Like many other fields of language teaching, L2 writing pedagogy has undergone many transitions. It began with the product approach, which highlights form and structure and requires students to imitate input provided by the teacher (Mehr, 2017). The lack of attention given by the product approach to the process gave rise to the process approach to writing, which centres on how a written text is produced rather than the output itself (Hyland, 2003). This approach emphasises the recursive nature of writing that involves prewriting, drafting, evaluating, and revising. However, critics pointed out that process approach views writing monolithically and as a fixed process regardless of content and audience (e.g., Atkinson, 2003). This is despite the observed differences in the writing practices of L2 writers (e.g., Lee, 2021). To address this issue, L2 writing scholars introduced the genre approach, which highlights writing as a social activity where students examine the text structure and recognise the rationale for using it (Hyland, 2007). Nonetheless, it has been criticised for viewing students as passive learners.

Recognising the strengths and limitations of the process approach and genre approach, some L2 writing scholars (e.g., Barrot, 2018; Badger & White, 2000; Nordin & Mohammad, 2017) proposed the merging of these two approaches. These process-genre-oriented approaches allow learners to practise recursive writing processes, recognise the relationship between genre and form, and consider the cognitive and social dimensions of writing. In fact, recent studies have provided strong support for their adoption in writing classrooms (e.g., Huang & Zhang, 2020; Rahimi & Zhang, 2021; Xu & Li, 2018). However, these types of approaches tended to place FFI in the background, particularly the explicit teaching of grammar (Muncie, 2002). One study that employed a process-genre approach even reported that improvement in students' writing accuracy was less significant compared to content and

organisation (see Huang & Zhang, 2020). It is, therefore, important to look into how explicit instruction (also known as isolated FFI) might further improve students' writing accuracy within the context of process-genre-oriented writing classrooms. However, no study, to my knowledge, has explored this line of research. Thus, the current study was undertaken. Investigating this line of research is warranted for several reasons. First, it advances our understanding of how the availability of post-writing isolated FFI (post-FFI) could potentially improve writing accuracy. The adoption of post-FFI was based on Muncie's (2002) guidelines for the inclusion of grammar in a writing class. This study would also shed light on the type of error severity that is most amenable to post-FFI and help writing teachers recalibrate their practises. Finally, this study provides insights into how post-FFI could systematically complement a process-genre-oriented writing process for a more balanced improvement in students' writing performance.

2. LITERATURE REVIEW

2.1. Isolated form-focused instruction

Spada and Lightbown (2008) distinguished two types of FFI: isolated and integrated. Unlike the conventional approach to teaching grammar (e.g., grammar translation), these two occur in a communicative-oriented classroom and may involve explicit corrective feedback and metalinguistic explanations (Spada et al., 2014; Spada & Lightbown, 2008; Valeo & Spada, 2016). They are neither competing nor dichotomous; rather, they are complementary. The distinction between isolated and integrated FFI is one of timing; that is, at what point of the instructional sequence it is most efficient to draw learners' attention to form. Integrated FFI occurs when attention to form is done within a communicative-based practise. In an integrated FFI, learners fully integrate the language form to communicative practises, attend to language form contextually, and receive feedback and a brief explanation about their use of linguistic items for a more accurate and effective communicative act.

Unlike the integrated FFI, isolated FFI occurs when attention to form is done separately from the meaning-focused activities in a lesson. However, it should not be equated to meaningless drills and mechanical repetition. Instead, linguistic items are taught within a communicative-based practise (Spada et al., 2014). Isolated FFI is a separate segment from the communicative use of language and can either be done before or after the communicative activity. In the context of L2 writing, focus on form is isolated from the writing stages that focus on meaning. It can either be provided before the writing process begins or after the communicative segment of the writing task (Polio, 2012). Theoretically, isolated FFI is linked to the skills acquisition theory that advocates for the need to teach grammar explicitly, followed by some communicative activities to anchor the target forms solidly to students' consciousness in a declarative form (DeKeyser, 1998, 2015). This theory further argues that metalinguistically-learnt language forms can be automatised through constant use and practise. According to Tarone (2014), two assumptions inform this theory. First, the transition from interlanguage to target language norms resulted from the shift of attention. Second, an interface exists between implicit and explicit knowledge. This interface suggests that explicit knowledge may lead to implicit knowledge and therefore informs linguistic

production (Schmidt, 2001). Isolated FFI also finds theoretical support from the information processing theory, which argues that the human mind has limited attentional capacity making it difficult for learners to simultaneously focus on meaning and form (Ellis, 1997; VanPatten, 1996). VanPatten (1996, 2004) further highlighted the need to isolate certain features of the target language to facilitate language learners' processing of form-meaning mappings. In the case of post-FFI, it aligns with Schmidt's (1990) noticing hypothesis, which argues that learners acquire grammatical features if they consciously notice these features and the disparity between the target language and their output. As applied to the current study, we hypothesise that students' written output would elicit noticing and allow them to cognitively compare their written output with the input provided by the teacher during the post-FFI, thereby restructuring their interlanguage.

2.2. Related studies

Although several studies have explored the use of isolated FFI, usually in conjunction with integrated FFI (e.g., Barrot, 2014; File & Adams, 2010; Spada et al., 2014; Xu & Li, 2021), very few focused on isolated FFI within the context of L2 writing. One such study was by Shintani and Donellan (2016), who examined the comparative effects of pre-task (pre-task ME) and post-task metalinguistic explanation (post-task ME) on the accuracy of Japanese learners of English. Their findings revealed that both the pre-task and post-task groups outperformed the control group suggesting the positive impact of ME on accuracy. However, students from the post-task group appeared to have developed their explicit knowledge only which was less durable than implicit knowledge. Shintani (2017) extended her previous work by considering students' prior knowledge, adding another treatment group, and expanding study participants, which included 123 Japanese students. They were divided into +prior knowledge group and -prior knowledge group. Each group was further divided into four conditions: pre-writing+during explicit instruction (Pre+During-EI), pre-writing explicit instruction (Pre-EI), post-writing explicit instruction (Post-EI), and control (no explicit instruction). This study further confirmed the benefits of EI and explained that Pre-EI and Post-EI involved different cognitive processes. Post-EI helped learners in doing revisions, especially those who already had prior knowledge of language forms. On the other hand, Pre-EI assisted in the development of explicit knowledge, particularly those without fully developed ability to produce certain linguistic forms.

A parallel study was undertaken by Khezrlou (2021), who examined the effects of timing and availability of isolated FFI on EFL learners' writing accuracy and fluency through task repetition. Four groups were used in the study: pre-writing EI (Pre-EI), pre-writing EI also available during task enactment (Pre + Online-EI), post-writing EI (Post-EI), and no EI (control). The results indicated that students exposed to the three EI groups outperformed those from the no EI group in terms of writing accuracy. From her findings, she posited that writing accuracy was most conditional to the availability of isolated FFI rather than its timing because of the observed improvement in all EI groups.

While the above studies have provided us with a nuanced understanding of the potential and appropriateness of post-FFI, information as to how it could complement a process-genre-oriented writing instruction and how it could impact errors at different severity levels remain extremely limited. Thus, we looked into this area by addressing the following specific

research questions: (1) Is there a significant gain in students' writing accuracy after being exposed to post-FFI? (2) How did the post-FFI affect the errors at different severity levels? (3) What impact did post-FFI have on students?

3. METHODOLOGY

3.1. Participants

The study participants (N = 92) were students from a Philippine university enrolled in an English writing class that aimed to develop their academic writing skills. As a mixed-methods quasi-experimental study, two intact classes were assigned to the control group (N = 44), while the other two were assigned to the treatment group (N = 48). The participants' age ranged from 17 to 19 with an intermediate level of English proficiency based on the institutional diagnostic test for writing, which was validated by the university language teaching experts. The results of the pretest revealed that there is no significant mean difference between the control and the treatment group ($t[90] = 0.940$, $p = 0.349$, $d = 0.20$). We also made sure that respondents from both the treatment and control groups had a homogenous background. This is in accordance with Ortega (2015) and Lu and Ai (2015) who argued that the L1 background of learners should be probed before making them part of any study. To mitigate instructional differences which might influence results, both groups were taught by the same teacher.

3.2. Instruments

Both groups took the pretest and the posttest in writing, which were administered during the first and the last week of the term, respectively. We made sure that the writing conditions in both tests were uniform. The students were asked to write an argumentative essay of not less than 300 words in no more than 90 minutes. An argumentative essay was used because it allowed students to incorporate the rhetorical patterns of other essays covered during the instructional period. Moreover, participants were given topics familiar to them so as not to affect their writing performance (Atak & Saricaoglu, 2021; Yoon, 2021). They used a different but familiar topic during the posttest to control for the topic familiarity. Below are the writing prompts used during the pretest and the posttest:

- Pretest. *Choose one current social issue that is most familiar to you. In at least 300 words, state your position on your selected issue and provide arguments to support it. You have 90 minutes to complete the essay without using any reference materials.*
- Posttest. *Choose one current social issue that is most familiar to you. Note that your topic for this posttest should be different from the one you used during the pretest. In at least 300 words, state your position on your selected issue and provide arguments to support it. You have 90 minutes to complete the essay without using any reference materials.*

To complement the quantitative data, we fielded a questionnaire asking the students from the treatment group about the specific impact post-FFI had on them. It is divided into two

parts. The first part (i.e., personal information section) asked about students' name, course, year level, sex, and age, while the second part (main section) asked about the specific impact that post-FFI had on students. Both instruments were validated by two language teaching experts who had at least seven years of teaching and research experience. Informed consent was obtained before data were obtained from the participants.

3.3. Data collection

The classes for both the control and treatment groups were scheduled for three hours each week in 14 weeks. Both groups were taught the same types of essays which were bifurcated into major and minor essays. The major essays included the definition and argumentative essays, while the minor essays covered the narrative, expository, and cause-and-effect essays. Both the control and treatment groups were allocated 12 weeks of instruction. The first and the last weeks were dedicated to the pretest and posttest in writing, respectively. The students in both groups were taught using the same process-genre-oriented teaching approach, except for the inclusion of post-FFI in the treatment group. These stages are preparation, modelling, planning, collaborative writing, individual writing, revising, editing, and publishing (Barrot, 2018). During the preparation phase, the teacher helped the students identify the context of their writing, activate their prior knowledge on the topic, and predict the structural features of the target text. After that, the students were provided some model texts, which they analysed in terms of the target audience, structural features, and content organisation. Then, the students were grouped into three members each and proceeded to the planning stage. At this junction, the students came up with an initial outline, gathered references for their essays, and finalised their outline based on the gathered materials. Thereafter, they drafted their essays collaboratively. Collaborative writing was deemed as a significant aspect of the writing process as it provides scaffolding to the students before they begin their individual writing. During individual writing, students underwent the same process they did during collaborative writing (i.e., preparation, modelling, and planning). Once they finished their first draft, they exchanged paper with a peer and evaluated each other's work in terms of clarity, content, and text organisation using the designated rubric as a guide. Then, each of them revised their own work based on the comments of their peers (second draft). After finalising their second draft, the students handed over their work to their teacher. The teacher, upon receiving the essays, evaluated them and provided the students with feedback that focused on content, organisation, and structure. The paper that incorporated all the feedback they received from their teacher became their final draft. Note that the teacher in both the control and experimental groups provided written corrective feedback (WCF) only on grammatical lapses that obstructed the meaning in the text.

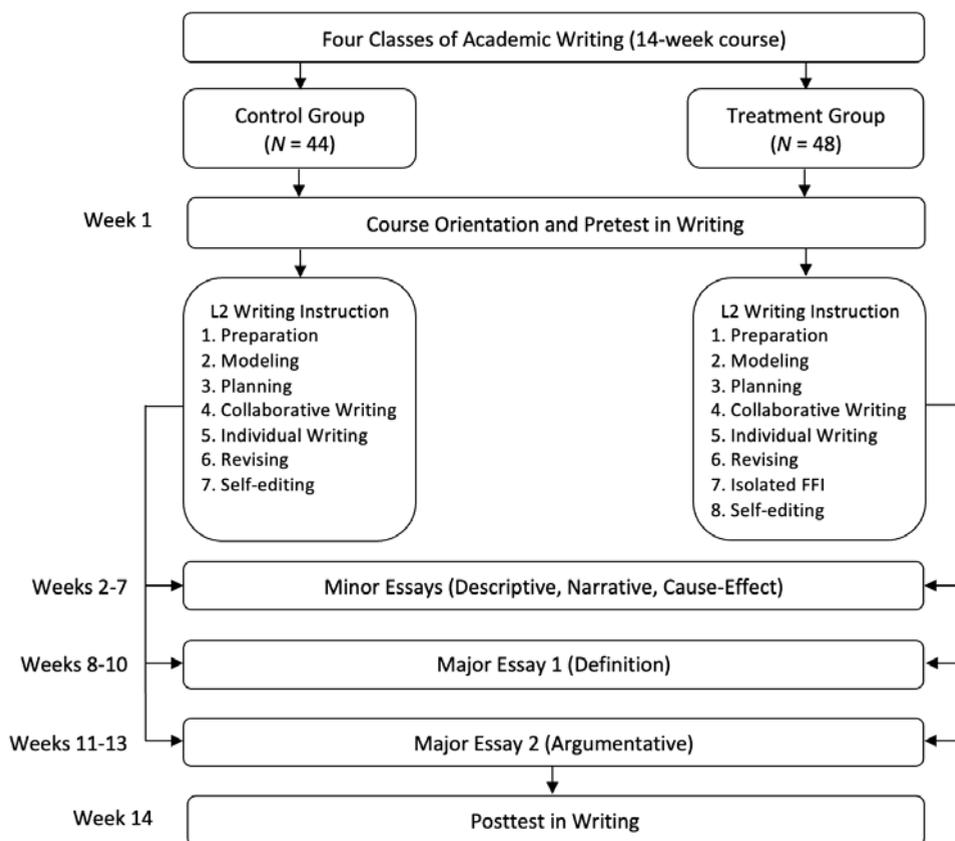


Figure 1. Experimental procedure

Unlike the control group, the treatment group was exposed to post-FFI prior to self-editing. Post-FFI session followed three stages: analysis of errors, EI, and communicative written activities. First, the teacher identified the common errors committed by students in their second draft during the teacher feedback stage. Then, the teacher conducted EI of the target linguistic items. This phase is similar to Ellis's (2002) incidental FFI where the target linguistic items have occurred incidentally. Growing evidence from empirical studies has indicated the critical role and the potential of EI in facilitating writing development (Polio, 2012). Finally, students were asked to complete communicative grammar activities but in the context of the essay they were writing. In these activities, students were asked to identify and correct linguistic errors in the sample essay. The teacher concluded the session by explaining the correct answers to the class to further reinforce learning.

The treatment group proceeded to self-editing after their post-FFI session, while the control group went straight to self-editing after the teacher feedback stage. It is expected that self-editing would further reinforce their mastery of grammatical form and structure as

predicted by skills acquisition theory. After editing, the students were instructed to publish their work on a free-of-cost blogging website. Figure 1 shows the schematic of the experimental procedure.

3.4. Data analysis

Two coders hand-coded the errors in the students' essays during the pretest and the posttest separately. To further identify additional errors that they might have missed, the two coders used Grammarly, which is an automated grammar editing tool that identifies errors in mechanics, grammar, vocabulary, and language style. This tool has been used by a number of studies investigating errors in L2 writing (e.g., Barrot & Agdeppa, 2021; Guo et al., 2021; Kotsyuk, 2015). The two coders discussed any divergence in their error analysis to arrive at a complete agreement. Thereafter, they encoded the data in the spreadsheet.

To compute for the writing accuracy, we used weighted clause ratio (WCR). Unlike other measures of accuracy (e.g., holistic scores, error-free units, weighted error-free T-unit, and error-free counts), WCR accounts for error severity and provides information on what type of errors learners commit in certain conditions (Foster & Wigglesworth, 2016). The following protocol was used in computing for WCR: (1) unit boundary (clause) was identified using the L2 Syntactic Complexity Analyser (Lu, 2010); (2) each unit/clause was categorised based on error severity with their corresponding weighted scores, that is, entirely accurate (1.00), level 1 error (0.80), level 2 error (0.50), and level 3 error (0.10); (3) the weighted score of each clause in a given text was added to get its total weighted score; (4) the total weighted score is divided by the total number of clauses in a given essay to get its WCR. Level 1 error means that the clause contains minor errors that do not obstruct meaning. Level 2 error suggests that the clause has errors that obstruct meaning, which is recoverable. In the case of level 3 error, the clause also contains serious errors, but the meaning is partly recoverable. To illustrate, if the total weighted score of an essay is 40 and the total number of clauses is 52, the essay has a WCR of 0.77.

We used both descriptive and inferential statistics to determine if there is a significant gain in students' writing accuracy after being exposed to post-FFI and how post-FFI affects errors at different severity levels. Means (\bar{x}) and standard deviation (SD) were used to measure students' overall writing accuracy level and errors at different severity levels. Additionally, frequency (f) and percentage (%) were used to determine the proportion of each type of error to all clauses. Specifically, we divided the frequency of errors in each severity level by the total number of clauses in a given essay and converted the score into percentage. We also employed t-test for independent samples to determine if statistical difference exists between the control group and the experimental group, while paired t-test was used to compare the pretest and the posttest scores. Assumptions of a parametric test, namely linearity, homogeneity of variances, and normality, were ensured prior to subjecting the data to parametric statistical tests.

Thematic analysis was employed to determine the impact post-FFI had on students as they perceived it. To do this, we identified the relevant codes from students' responses progressively; that is, we coded the responses of the first student and clustered the conceptually related codes into a theme. Thereafter, we analysed the responses of the succeeding student, identified the codes and themes, and integrated them into the previous data. We undertook

this progressive analysis until we completed analysing all data. The two coders performed the analysis separately and discussed any differences to reach a full agreement.

4. RESULTS

The current study examined the effects of post-FFI on students' writing accuracy. Specifically, we investigated whether there is a significant gain in students' writing accuracy after being exposed to post-FFI and how it affected errors at different severity levels. We also qualitatively examined the impact post-FFI had on students based on how they perceived it.

Table 1. *Students' writing accuracy during the pretest and the posttest*

	Pretest WCR		Mean Difference	Posttest WCR		<i>p</i> value
	\bar{x}	<i>SD</i>		\bar{x}	<i>SD</i>	
Non-FFI group	0.746	0.06	+0.022	0.768	0.06	0.022
Post-FFI group	0.758	0.06	+0.042	0.800	0.05	<0.001

significance: $p < .05$

Table 1 presents the pretest and posttest results of students' overall writing accuracy for the control and treatment groups. As measured by WCR, the data shows that both groups recorded higher mean scores during the posttest (+0.022 for non-FFI group and +0.042 for post-FFI group). Although the two groups reached significant statistical difference when their respective pretest and posttest scores were compared, the treatment group registered a larger effect ($t[47] = 5.917$, $p = <0.001$, $d = 0.85$) than the control group ($t[43] = 2.384$, $p = 0.022$, $d = 0.36$). The results further revealed that treatment group outperformed the control group with a medium effect size when their posttest scores were compared ($t[90] = 2.658$, $p = 0.009$, $d = 0.55$).

Table 2. *Proportion of level errors to total number of clauses during pretest and posttest*

Groups	Levels of Error	Pretest WCR		Mean Difference	Posttest WCR		<i>p</i> value
		\bar{x}	<i>SD</i>		\bar{x}	<i>SD</i>	
Non-FFI group	Level 1	6.34	7.8	-1.06	5.28	5.3	0.479
	Level 2	27.19	11.0	-2.06	25.13	6.8	0.262
	Level 3	11.69	6.7	-1.01	10.68	6.9	0.699
Post-FFI group	Level 1	5.96	6.9	-1.70	4.26	5.8	0.217
	Level 2	27.49	7.8	-5.41	22.08	5.6	<0.001
	Level 3	10.61	6.2	-3.78	6.83	6.6	<0.001

significance: $p < .05$

Table 2 shows that the errors across the three severity levels for both the control group (-1.06 for level 1, -2.06 for level 2, and -1.01 for level 3) and treatment group (-1.70 for level 1, -5.41 for level 2, and -3.78 for level 3) are lower during the posttest. However, only level 2 ($t[47] = 5.273$, $p = <0.001$, $d = 0.76$) and level 3 ($t[47] = 3.661$, $p = <0.001$, $d = 0.53$) errors of the treatment group reached a statistically significant decrease with medium effect sizes. In the case of the control group, no significant decrease in errors was observed across three severity levels. After comparing the posttest results of the two groups in each severity level, the data reveal that the treatment group outperformed the control group in level 2 ($t[90] = 2.365$, $p = 0.02$, $d = 0.49$) and level 3 errors ($t[90] = 2.754$, $p = 0.007$, $d = 0.57$) with medium effect sizes. However, no significant difference was seen in level 1 errors with a small effect size ($t[90] = 0.877$, $p = 0.383$, $d = 0.18$).

Table 3. *Students' perception of the impact of post-FFI on them*

Impact	<i>f</i>	Sample Responses
Noticed the form and the gap	38	<i>I see why I was wrong after the discussion. I noticed that I'm always wrong prepositions. (S9)</i> <i>I immediately notice my errors and relate them to my paper. (S27)</i>
Helped identify and correct errors during editing	28	<i>I can compare my work with the examples of my teacher and it helps me edit my essay more accurately. (S32)</i> <i>I was able to correct my errors during editing. I just need to read my notes and recall the examples given. (S35)</i>
Helped practise grammar in context	19	<i>Our grammar lesson helps me use grammar as how I used them in my paper. Unlike during high school when my teacher just gave us multiple choice. (S43)</i>
Developed mastery of form	18	<i>It made me understand the why's of grammar. I don't only know the rules, but also the reasons behind each rule. (S21)</i>
Applied learnt linguistic form in other writing tasks	16	<i>I became more conscious of my grammar. So I compiled all my errors and avoid them in my next essays. (S15)</i>
Boosted confidence	11	<i>I learned a lot of grammar. So it makes me confident in editing my paper. (S18)</i>
Helped focus on content and organisation during drafting	6	<i>I didn't focus much on grammar during drafting because I know we have a session for editing and grammar. Well, because of this my focus was on the substance and flow. (S40)</i>
Promoted adaptive grammar learning	2	<i>Helps me asked question during discussion based on what I used and how I used grammar (S5)</i>

Table 3 presents the treatment group's responses when asked about the impact of post-FFI on them. As a caveat, the total responses do not necessarily equal the number of students from the treatment group because each response contained multiple ideas spanning different themes. As shown, the majority of respondents reported that post-FFI helped them notice the form and the gap between their output and the target form ($N = 38$). For instance, S27 commented that she immediately noticed her errors and linked them back to her essay. More than half of them ($N = 28$) also claimed that the intervention allowed them to identify and correct errors during editing, as in the case of S32 and S35. Other positive impacts that post-FFI had on students include helping them practise grammar in context ($N = 19$), developing their mastery of form ($N = 18$), applying the learnt linguistic form in their succeeding writing tasks ($N = 16$), and boosting their confidence ($N = 11$). For instance, S43 shared that "our grammar lesson helps me use grammar as how I used them in my paper", while S21 noted that "I don't only know the rules, but also the reasons behind each rule". With regard to boosting confidence, S18 commented that post-FFI made him confident in editing his work. Although not as frequent as other responses, the data indicate that post-FFI helped students be more focused on content and organisation during the drafting stage and reserved editing during the latter stages of writing (e.g., S40). Meanwhile, two students reported that they tended to be focused on which forms to learn during post-FFI based on how they use these forms in their essays (e.g., S5).

Overall, students' responses provided strong support for post-FFI. However, several challenges were also raised. For instance, a few students reported that they experienced cognitive overload during the editing because of the many errors they needed to attend to given the limited time (S2, S11) and the need to simultaneously refer to their notes while editing their essay and recall what their teachers explained (S4). Some of them also highlighted the need for explicit instruction on mechanics, such as spelling, capitalisation, and punctuation (S23, S47). In the case of S45, he lamented that the teacher should have provided a longer explanation and several examples for each grammar rule. Another student (S42) commented that she did not know what to do with errors not discussed by the teacher during post-FFI.

5. DISCUSSION

This quasi-experimental study compared two groups of students to determine the effects of post-FFI on students' accuracy within process-genre-oriented writing classes. The overall results indicate that post-FFI benefits students, as it improved their overall writing accuracy. These findings have been corroborated by earlier studies (e.g., Bitchener & Ferris, 2012; Khezrlou, 2021; Shintani, 2017; Shintani & Donellan, 2016), which reported the significant improvement in writing accuracy after being exposed to post-FFI. From an L2 writing pedagogy perspective, the current study also complemented the previous works by strategically embedding post-FFI within a process-genre-oriented writing process and targeting the common linguistic errors committed by students in a particular text type.

As supported by the qualitative data, students' writing accuracy improvement may be due to post-FFI's ability to elicit noticing, allowing them to make cognitive comparisons between the two versions (i.e., input and students' output) and restructure their interlanguage system as previously argued elsewhere (Doughty, 2001; Polio, 2012; Rahimi & Zhang, 2016;

Schmidt, 1990). Post-FFI also directed students' attention to linguistic form during the editing phase enabling them to identify the gaps between what they used and what the correct form is and correct their errors for a more accurate text. This result aligns with previous reports that pushed output led students to notice the gap between the input and what they produced (e.g., Lozano et al., 2014). This combination of noticing, cognitive comparisons, and contextualised application of correct forms might have developed students' explicit knowledge. Anchoring on skills acquisition theory, this knowledge could have pushed learners to write better and could have been automatised as they constantly used them in a series of writing tasks and editing. Consequently, the students might have tapped the same knowledge during their completion of the posttest essay. Such a phenomenon is in accordance with the transfer appropriate processing, which claims that learners efficiently access knowledge in a condition similar to how they learnt it (Franks et al., 2000).

Aside from noticing, the improvement in writing accuracy may be rooted in the students' psycholinguistic readiness for certain linguistic items (Pica, 2005). It should be remembered that the target linguistic items during post-FFI were based on the common errors committed by the students. Their attempt to use these linguistic items suggests that they had prior knowledge about the linguistic items and might be psycholinguistically prepared to learn them, thus, facilitating language learning during post-FFI (Barrot, 2020; Benati, 2017; Ellis, 2007; Pica, 2005; Pienemann, 2015). For instance, one student commented that it was easier for him to master the rules presented by the teacher because he was already familiar with them and had been attempting to use these forms previously (S7). This finding found support from Shintani (2017), who argued that learners with prior knowledge of the target forms benefited from the opportunity to revise their essays during post-FFI.

Looking at the errors per severity level, results reveal that improvement was only observed in level 2 and level 3 errors, which are both associated with errors that adversely affect the clarity of meaning. The non-improvement in level 1 errors may be attributed to the limited attention that the teacher devoted to the teaching of mechanics, as reported by some students (S23, S47). Instead, the teacher gravitated towards focusing on serious errors during the teacher feedback phase and post-FFI as dictated by a process-genre-oriented approach. Another viable reason for the non-improvement in level 1 errors is the limited opportunity for students to connect form and meaning, unlike in levels 2 and 3 errors. Nonetheless, further studies are required to confirm this hypothesis. Interestingly, the writing accuracy of the control group also improved, although no significant improvement was seen at the fine-grained levels (levels 1, 2, and 3 errors). These results may be linked to the WCF that the control group received during the drafting phase. As earlier discussed in the procedure, teacher provided WCF on grammatical lapses that obstructed the meaning in the text. The result accords with the findings of earlier studies on the effects of a process-genre-oriented approach on writing accuracy even without EI (e.g., Barrot, 2018; Huang & Zhang, 2020).

6. CONCLUSION

The study investigated the effects of post-FFI on students' overall writing accuracy and on errors at different severity levels. We also examined qualitatively how the intervention impacted students. Overall findings show statistical difference between the posttest results of

the treatment group and the control group and between the pretest and the posttest results of the treatment group. These data indicate that post-FFI further boosted the improvement in students' writing accuracy, as has been attested by previous studies. This improvement was attributed to noticing, contextualised learning of forms, and students' psycholinguistic readiness.

The findings have some useful implications for L2 writing pedagogy. Pedagogically, this study provides empirical support on the value of post-FFI and the strategic phase in which it should be placed to improve students' writing accuracy significantly. Methodologically, the study highlighted the value of students' qualitative responses in providing rich information on how an intervention, post-FFI in this case, may impact them in different ways. This information can then be used by teachers as a guide in recalibrating their practises and reinforcing the effects of post-FFI, such as making explicit instruction more adaptive and making editing automated through the use of technology. Finally, this study expanded our theoretical understanding of the critical role of noticing and prior knowledge in selecting the timing of isolated FFI, which would better facilitate writing accuracy.

While the current study provided relevant insights, some limitations need to be acknowledged and addressed in future research. First, the study used a relatively small sample size. Future studies may employ the same intervention in multiple contexts using a larger sample size to generate more robust findings. We also did not examine the viability of pre-FFI as an alternative to post-FFI. Future studies may investigate their differential effects within the context of process-genre approach to determine if writing accuracy improvement is sensitive to the timing of isolated FFI. Finally, although we provided important insights into how post-FFI affects errors at different severity levels, it may be useful to examine the specific linguistic forms amenable to post-FFI.

7. REFERENCES

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