

## Feature Article

# Authentic and Incidental Learning in English-medium Instruction for EFL Students

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### Abstract

There is a consensus in language learning and teaching that the concept of authenticity in the classroom is beneficial to the learning process. This phenomenology case study explored 31 EFL high school students' perceptions about the authenticity of using English as the language of instruction during synchronic lessons with U.S. teachers. Data was collected from two synchronous interactive lessons and students' open-ended reflections. A thematic content analysis was adopted to examine themes on perception, motivation, and participation. The findings revealed students' insights into their learning experiences through synchronous interactions with teachers, highlighting how authentic learning gave them opportunities to practice communication strategies and learn vocabulary incidentally. This study provides pedagogical implications for integrating authenticity in foreign language classrooms.

**Key words:** authenticity, incidental learning, synchronous communication, English-medium instruction

### Introduction

A student who studies English as a foreign language (EFL) learns the language in their home country where English is not the country's home language. These learners may not have access to opportunities to communicate with speakers of the target language, and classrooms become the major venues for them to be exposed to English ([Zoubi, 2018](#)). Language educators can leverage technology to maximize language-use

opportunities in the classroom for EFL learners to practice English as effectively and efficiently as possible. Studies have shown that interactive technology platforms provide several benefits when learning a language (Guillén & Blake, 2016; Trego, 2021; Utomo & Utama, 2022; Yu, 2022).

## **Literature review**

### **English-medium instruction (EMI)**

English as a medium of instruction (EMI) can be defined as “the use of the English language to teach academic subjects (other than English itself) in countries or jurisdictions where the first language of the majority of the population is not English” (Macaro, et al., 2018, p. 37). This approach is embraced because it is believed that it will help students to learn not only the content knowledge, but also the language. With the emergence of EMI in the language teaching/ learning process, language proficiency is achieved by shifting the focus from the language learning process to the learning of content areas. Brinton (2003) stated that it is the teaching of language through exposure to content that is a more relevant experience to learners. Similarly, Lightbown and Spada (2021) emphasized that what sets content-based instruction apart from traditional methods is the expectation that students can learn both the content area and a new language simultaneously.

### **Challenges when implementing EMI in EFL contexts**

Despite the benefits of implementing EMI, many teachers and students in EFL contexts face some challenges. For example, Karabassova (2020) reported listening to anxiety issues shared by EMI teachers, or “teachers who struggled with the comprehension of students’ answers relied on stronger students” as a way to “overcome their fears and anxiety” (p. 1542). Similarly, Ifah and Basthomi (2024) found that the most frequent challenge stated as a barrier to EMI implementation was the low English proficiency that faculty members in non-English speaking countries had. Moreover, teachers were not trained to plan lessons specifically for EMI contexts. Students also mentioned different issues when EMI was implemented. Hoang, et al. (2023) identified several challenges including students’ emerging language interaction in English, lack of vocabulary, EMI instructors’ pedagogical approaches, and students’ motivations.

The challenges when implementing EMI could also be associated with coping strategies in language use (Soruc & Griffiths, 2018). Their study indicated that while coping strategies varied, participants employed numerous techniques to overcome their challenges, such as negotiating meaning, translating, guessing from context, and paying attention. Moreover, unlike language learning in ESL contexts where most second language learners can typically expect to encounter content in English inside and outside the classroom, EFL learners have fewer opportunities to communicate with speakers of the language being learned, engage in after-school/ extracurricular programs, language tutoring, or receive family support, making it harder for EFL students to learn English through incidental contexts. Although students may face challenges in an EFL context, EMI can provide incidental learning opportunities and authentic learning.

### **Incidental learning**

Incidental learning is unplanned learning, and it can be an addition to formal instruction because students can develop their language knowledge via constant exposure of comprehensible input (Pigada & Schmitt, 2006). Additionally, some studies confirmed that incidental vocabulary learning is a by-product of encountering meaning-focused input, playing an essential role in language learning (Gass, 1999; Chen & Truscott, 2010). For example, when students focus on understanding a task within the lesson, the context can help students grasp the vocabulary encountered incidentally. Moreover, Chen, Tang, and Zheng (2021) found that high schoolers preferred the incidental acquisition mode, showing higher retention rates compared to exam-oriented studies. Considering previous studies, learners can develop vocabulary through implicit lexical instruction that involves a more relaxed approach than explicit teaching (Nation, 2003). In an incidental learning environment, Nation described the relationship between vocabulary knowledge and language use as complementary. That is, vocabulary knowledge enables language use, and language use expands vocabulary knowledge. In conclusion, to increase incidental learning in EFL contexts, teachers can utilize technology to add authentic activities or extensive readings to create opportunities to expose students to incidental language use (Jin & Webb, 2020; Webb & Chang, 2015).

### **Authenticity in language learning**

Classrooms should promote authentic communicative activities to facilitate communication. The concept of authenticity refers to exposing learners to “real English with intrinsically communicative quality” (Lee, 1995, p. 324) so that learners can perform in future job markets (Nunan, 2004). Additionally, implementing authenticity calls for a paradigm shift from structural language teaching to communicative language teaching (Nunan, 1991). Nunan (2004) stated that language learning should no longer be viewed solely as learning grammatical rules, but it should also be viewed as the acquisition/learning of communication systems. Recently, Egbert (2020) and Jacobs et al. (2022) have highlighted that meaningful learning aims to facilitate the application of what is learned in authentic contexts. Students should understand the purpose and relevance of why they are studying a language and how it will be used in real life.

Authenticity has been defined in various ways. Herrington and Oliver (2000) stated, “When learning and context are separated, knowledge itself is seen by learners as the final product of education rather than a tool to be used dynamically to solve problems” (p. 23). Herrington and Oliver provided a comprehensive framework to define authenticity in learning environments suggesting nine elements that teachers can use: (1) real-world connection, (2) authentic activities, (3) expert performances and the modeling of processes, (4) multiple roles and perspectives, (5) collaborative construction of knowledge, (6) reflection for enabling abstractions, (7) articulations for tacit knowledge to be explicit, (8) coaching and scaffolding by teacher, and (9) integrated assessment of learning in tasks.

### **Computer-mediated communication (CMC) in language learning**

CMC tools have equipped EFL teachers and researchers with exciting and innovative platforms to implement language instruction. Many advantages are worth mentioning. Students can work simultaneously in a shared place either orally or in the written form. Recent studies (Safdari, 2021) have reconfirmed the benefits of maximizing the use of the linguistic skills when interacting via CMC.

Besides developing language skills, studies have found other benefits: Intercultural learning in foreign language instruction (Arnold, 2007), and authentic communication (O’Dowd, 2012). Other studies also found that participants stated that instructors’ teaching styles were more authentic and engaging (Bailey & Rakushin-Lee,

2020; Ulla & Perales, 2021). CMC can be a powerful tool to teach and learn languages, as it provides a platform for authentic and interactive learning. Not only can students interact with their classmates, but they can also interact with speakers of English. Research has also shown that CMC can increase students' motivation and engagement to learn foreign languages (Martin & Bolliger, 2018; Utomo & Utama, 2022), lower their anxiety (Victoria, 2020), and lead to intercultural competence, language immersion, and democratize classroom communication (Trego, 2021; Yu, 2022). Considering the benefits of CMC in education, our study examined EFL students' perceptions about their language learning experience through a synchronous CMC platform.

### **Methodology**

This work is a phenomenology case study (Creswell, 1994) that explored EFL high school students' perceptions regarding the authenticity of using English as the language of instruction. This research design was selected to explore the context in which the participants experience the phenomenon and then connect such experiences to events (Barnham, 2015) to understand the complexities of a specific set of issues in an EFL context.

### **Research questions**

Two research questions guided this study:

1. What are vocational EFL high schoolers' perceptions when having an English-medium class with proficient language speakers?
2. What are the incidental and language learning opportunities occurring in synchronous interactions?

### **Research Context**

The research context is a private high school that offers academic and vocational tracks for students in Taiwan. This study was conducted with vocational-track students where their curricula prioritized practical outcomes. Students are required to attend three sessions of English totaling six hours. Typically, English classes are led by Mandarin-speaking English teachers. These learners take fewer hours of English compared to

regular senior high schoolers who follow a college-oriented path, which typically offer eight weekly hours of English instruction.

### **Participating bilingual teachers**

The participating teachers were four in-service bilingual teachers actively engaged in dual language programs and pursuing a master's degree in the field of Bilingual Education. They were selected for the study through random sampling and all possessed teacher certification in Bilingual Education, demonstrating their qualification to teach a variety of lessons. By the end of the semester, they had to design ESL-content lessons, and they agreed to teach the lessons to EFL students.

### **Participating EFL students**

Thirty-one Taiwanese vocational high schoolers who took English and were enrolled in the Department of Aircraft Maintenance participated in this study, comprising of 27 males and 4 females aged between 16 to 17 years. These students started learning English when they entered middle school, so their English proficiency level was still considered to be beginner. Participation in the research was voluntary, but for those choosing to participate, it did not impact their academic grades, as the study was designed as an enrichment experience.

### **Data collection and instrument**

The research instruments comprised of lesson plans for content-based instruction, which were both designed and taught by the teachers, along with 31 open-ended reflections administered to the students. These activities are recognized as authentic activities for EFLs students because they facilitate connections to real-life experiences, supported by scaffolding and coaching strategies during teaching (Herrington & Oliver, 2000).

The two lesson plans for the content-based instruction were designed for a 50-minute class period. Lesson activities included the activation of prior knowledge, peer/group interaction, and reflection. Materials included short reading passages, magazines, and videos. The teachers conducted their lessons with students via Google Meet, and the interactions were recorded using Google Meet's recording service, subsequently transcribed by the researchers.

### **Reflective Essays**

Essays administered to students asked them to reflect on how they perceived and experienced authentic language, challenges in participating in a content-medium instruction, and learning modalities (see Appendix A). After two synchronous ESL-content classes, participants were asked to submit their 100-150 words reflective essays in Mandarin Chinese.

### **Data analysis**

Thematic content analysis, as outlined by Anderson (2007), was adopted to uncover common themes and patterns across the collected data. This process involved systematically categorizing segments of the reflective essay content based on recurring ideas. Thus, thematic analysis included identifying overarching themes within the coded data, allowing for a deeper understanding of the participants' views on the participation of an English-medium instruction through a CMC context. To ensure objectivity in this qualitative study, confirmability was documented by a clear coding schema that identified the codes and patterns in the data collected. Triangulation and member checking of the data were also conducted to further enhance confirmability. Teachers provided feedback from the researchers to students, and collaborative discussions between the researchers and the teachers were held to explore perceptions, experiences, and learning outcomes, thereby minimizing bias in data analysis.

### **Findings**

The primary research question addressed was: What are vocational EFL high school students' perceptions when having an English-medium class with native speakers? The following findings emerged from the data.

#### *Authenticity*

Participants conveyed that the lessons were perceived as more authentic for learning English, as opposed to merely receiving information from the classroom teacher. More importantly, these students have rarely had the chance to interact with English speakers. Thus, the synchronous class interaction was a great opportunity for them. Participants shared the following:

“我真得覺得這樣上課好有趣，而且真得要用英文互動交談像是在生活中學習”

(Lead author's translation: "I think the teaching modality is very interesting because I have to use English to interact, and it made me feel like this is like real-life.")

“這是我第一次和外國老師交流， 所以是非常不一樣的經驗”

(Lead author's translation: "This is my first time interacting with foreign language teachers, and it is a very different learning experience.")

The previous quotes showcase participants' perceptions when learning English. Some participants shared that authentic learning experiences helped them see the purpose of learning English because they felt motivated to use English for real communication purposes. They also had the unique opportunity to be taught by English speakers.

#### *Motivation*

Since participants knew that the lesson objective was to learn about the U.S. culture with U.S. teachers, they demonstrated heightened attentiveness throughout the learning process. They were also prepared to do their best when asking questions. Despite encountering challenges during the lessons, students remained motivated to engage with the teachers due to the interactive teaching styles and authentic experiences when using English. Participants mentioned:

“我們老師有跟我們說要學二個美國文化課， 所以我就有先想可以問的問題”

(Lead author's translation: "My teacher told us that we had two lessons in learning American culture, so I thought of what questions I could ask during the lesson.")

“上完課之後其實真得覺得這樣上課很有趣， 但是真心覺得還要繼續學很多東西才可以在真得可以使用語言時不怕”

(Lead author's translation: "After two lessons, I think that I still have to study more when I have to speak the language, or I need to overcome the fear of using the language.")



上完二堂文化課的其中一堂是講美國籃球，有很多字句無法在當下馬上理解但是課堂內容是有趣的，所以我會很想聽下去“

(Lead author's translation: "I wanted to pay attention to the content because the topic was about basketball in the U.S.").

Some participants were highly motivated to get more information about the U.S. so they thought of asking unique questions. They also expressed their desire to "study more" or "to overcome the fear of language use," which is a typical fear ESL/EFL learners experienced when communicating with home language speakers.

#### *Uses of communication strategies*

The second research question addressed was: What are the incidental and language learning opportunities occurring in synchronous interactions? Findings show that students used different communication strategies leading to incidental learning opportunities. Communication strategies are strategies that students use to overcome challenges when wanting to convey an intended meaning. Ellis (1997) stated that communication strategies were ways to make the conversation keep going because learners have an idea of what they want to communicate because of their background knowledge and language proficiency. Communication strategies such as gestures, language modifications, and recasts were used by the participants as exemplified below.

#### *Physical responses and gestures*

“鏡頭前的老師開始用手勢”

(Lead author's translation: "Teachers started to use gestures to show what they were asking.")

“有一些單字老師會開始用比的來提示”

(Lead author's translation: "When referring to some words, teachers used gestures to give hints.")

### *Modeling and modification*

“鏡頭前的老師會先說一次，然後再跟我們說你們可以這樣回答”

(Lead author’s translation: “Teachers demonstrated how to answer a question, and they told us that we could say either way.”)

“很多時候一開始很多地方聽不懂，所以只能先保持安靜 但是美國的老師開始引導怎麼回答把問題變得再短一點，我也會想說有沒有其它方法可以來表達我想回答的”

(Lead author’s translation: “I did not understand much of the information, but the teachers guided us, and they broke down the sentences to understand. I also tried to think about if I can use any ways to express my thoughts”)

### *Asking for clarification*

“我聽不懂的時候，我有想說要怎麼叫老師再解釋一次” 我覺得我在用一個語言來表達到一個功能”

(Lead author’s translation: “When I did not understand what the teacher said, I needed to think about how to ask”)

### *Contextual language uses*

#### *Incidental vocabulary and phrase/s learning*

“這次的體驗很多單字，好像有背過，但是這次真得聽到老師怎麼用這些字詞，我聽到了老師怎麼用我就再用到我下一句話”

(Lead author’s translation: “I heard many words in class, and I memorized some of them previously. However, I started to learn how these words are used in contexts. I will try to use it when I need to say it in a sentence.”)

“在這堂課中會一直注意老師在講某個單字，想說它是如何用在句子中，我就會覺得這是在學怎麼用在真實的情境”

(Lead author’s translation: “I paid attention to words I heard in the lesson, and I learned how they were used in a sentence.”)

The responses provided revealed that teachers scaffolded lessons in various ways so that learners communicated. Consequently, incidental learning took place, especially when learning vocabulary or wanting to craft questions/sentences.

### **Discussion and implications**

The main findings revealed that authentic learning experiences helped students see the purpose of learning and feel motivated even when experiencing their silent period during classes or felt embarrassed and pressured to participate straightaway. To overcome such situations, more on-the-spot communication activities will be welcome. Interacting with home English speakers provided learners with positive learning experiences. Findings also showed that many students have never had an opportunity to interact with home English speakers when learning English nor had they experienced language immersion opportunities such as studying abroad or participating in student exchanges, as these options are not always affordable for foreign students, calling for ways to rethink how to better teach languages. Teachers will also benefit from incorporating cross-cultural synchronous sessions in foreign language classes to promote more authenticity when teaching languages. This study also connects with other studies in that videoconferencing can effectively bring authenticity to learners and support them to advance their language proficiency and cultural understanding (Alshahrani, 2016; Sevy-Biloon and Chroman, 2019).

Two further additions to highlight. First, EFL classrooms can utilize CMC to provide an immersion-like experiences if study abroad opportunities are not accessible for learners. Second, EFL teachers should promote different incidental learning environments beyond the learning in classes. For example, students can be provided with authentic materials (e.g., digital materials or videos) as supplementary material for vocabulary use in different contexts. Interestingly, authentic learning projects provide

contexts for incidental vocabulary learning, and the contextual clues can provide comprehensible input for learners. As Herrington and Oliver (2000) remind us, the context is one of the nine elements of authentic learning because it “provide [s] authentic context that reflects the way the knowledge is used in real life” (p. 25). Typically, many foreign language students memorize vocabulary, but contextual uses of the language will also be beneficial.

### **Conclusion**

In this study, we described how authenticity brought positive effects in language learning experiences in an online exchange that resulted in authentic experiential learning opportunities for EFL students. The findings showed that providing authentic learning experiences beyond classroom increased motivation, engagement, and the practice of communication strategies.

### **Research Limitations**

The sample size of this study limits generalizability of the findings, and its inception as a classroom project limits the scope of our research design. Thus, implementing a classroom ethnography research design (e.g., observing students’ interactions and obtaining more individual learner characteristics) can offer deeper insights into the role of CMC in language learning contexts.

### **References**

- Alshahrani A. A. (2016). Communicating authentically: enhancing EFL students’ spoken English via videoconferencing. *CALL-EJ*, 17, 1–17.
- Anderson, R. (2007). *Thematic content analysis (TCA): Descriptive presentation of qualitative data*.  
<http://rosemarieanderson.com/wpcontent/uploads/2014/08/ThematicContentAnalysis.pdf>
- Arnold, N. (2007). Technology-mediated learning 10 years later: Emphasizing pedagogical or utilitarian applications? *Foreign Language Annals*, 40(1), 161–181. <https://doi.org/10.1111/j.1944-9720.2007.tb02859.x>

- Bailey, D. R. & Lee, A. R. (2020). Learning from experience in the midst of COVID-19: Benefits, challenges, and strategies in online teaching. *Computer-Assisted Language Learning*, 21(2), 178-198
- Barnham, C. (2015). Quantitative and qualitative research. *International Journal of Market Research*, 57(6), 837–854.  
<https://doi.org.tamusa.idm.oclo.org/10.2501/ljmr-2015-070>
- Brinton, D. (2003). Content-Based Instruction. In Nunan, D. (Ed.), *Practical English language teaching*. McGraw-Hill Contemporary.
- Chen, C., & Truscott, J. (2010). The effects of repetition and L1 lexicalization on incidental vocabulary acquisition. *Applied Linguistics*, 31, 693-713.
- Chen, S. Tang, M. and Zheng, M. (2021). Incidental acquisition and intentional learning in second language acquisition, *Advances in Social Science, Education and Humanities Research*, 58, 475-486
- Creswell J. W. (1994). *Research design: Qualitative and quantitative approaches*. Sage.
- Egbert, J. (2020). The new normal? A pandemic of task engagement in language learning. *Foreign Language Annals*, 53(2), 314–319.  
<https://doi.org/10.1111/flan.12452>
- Ellis, R. (1997). Communication strategies and the evaluation of communicative performance. *ELT Journal*. 38(1), 39-44.
- Gass, S. (1999). Discussion: Incidental vocabulary learning. *Studies in Second Language Acquisition*, 21(2), 319-333.
- Herrington, J., & Oliver, R. (2000). An instructional design framework for authentic learning environments. *Educational Technology Research and Development*, 48(23), 23–48. <https://doi.org/10.1007/BF02319856>
- Hoang, N. T., Bui, T. N., Le, D. H., & Pham, V. D. (2023). Students’ challenges on learning EMI courses at a technical university in Vietnam: An investigation from students’ voices. *Proceedings of the AsiaCALL International Conference*, 1, 131–151. <https://doi.org/10.54855/paic.2319>
- Ifah, B., & Basthomi, Y. (2024). English as medium of instruction (EMI): What training is needed by the faculty members? *Pegem Egitim Ve Ogretim Dergisi Pegem*

- Journal of Education and Instruction*, 14(1), 357-368.  
<https://doi.org/10.47750/pegegog.14.01.40>
- Jacobs, G. M., Asmawi, A., & Renandya, W. A. (2022). Teacher authenticity in language education. *International Journal of Education*, 15(2).  
<https://doi.org/10.17509/ije.v15i2.50394>
- Jin, Z., & Webb, S. (2020). Incidental vocabulary learning through listening to teacher talk. *Modern Language Journal*, 104(3), 550–566.
- Karabassova, L. (2020). Is top-down CLIL justified? A grounded theory exploration of secondary school science teachers' experiences. *International Journal of Bilingual Education and Bilingualism*, 25(4), 1530-1545,  
<https://dx.doi.org/10.1080/13670050.2020.1775781>
- Lee, W. (1995). Authenticity revisited: text authenticity and learner authenticity, *ELT Journal*, 49(4), 323–328.
- Lightbown, P., & Spada, N. (2021). (5th ed.). *How languages are learned*. Oxford University Press.
- Macaro, E., Curle, S., Pun, J., An, J., & Dearden, J. (2018). A systematic review of English medium instruction in higher education. *Language Teaching*, 51(1), 36-76. doi:<https://doi.org/10.1017/S0261444817000350>
- Martin, F., and Bolliger, D. U. (2018). Engagement matters: Student perceptions on the importance of engagement strategies in the online learning environment. *Online Learn Journal*, 22, 205 – 222. Doi: 10.1186/s12913-016-1423-5
- Nation, P. (2003). Effective ways of building vocabulary knowledge. *ESL Magazine*, 6(4), 14-15.
- Nunan, D. (1991). *Language teaching methodology: A textbook for teachers*. Prentice Hall.
- Nunan, D. (2004). *Task-based language teaching*. Cambridge University Press.
- O'Dowd, R. (2012). Intercultural communicative competence through telecollaboration. In J. Jackson (Ed.), *The Routledge handbook of language and intercultural communication* (pp. 342–358). Routledge/Taylor & Francis.
- Pigada, M., & Schmitt, N. (2006). Vocabulary acquisition from extensive reading: A case study. *Reading in a Foreign Language*, 18(1), 1-28.

- Sevy-Biloon J., & Chroman T. (2019). Authentic use of technology to improve EFL communication and motivation through international language exchange video chat. *Teaching. English Technology*, 19, 44–58.
- Soruc, A., & Griffiths, C. (2018). English as a medium of instruction: Students' strategies. *ELT Journal*, 72(1), 38–48. <https://doi.org/10.1093/elt/ccx017>
- Trego, D. (2021). TalkAbroad. *CALICO Journal*, 38(1), 160-169.doi: <https://doi.org/10.1558/cj.40822>
- Ulla, M. B., & Perales, W. F. (2021). Facebook as an integrated online learning support application during the COVID19 pandemic: Thai university students' experiences and perspectives. *Heliyon*, 7(11), <https://doi.org/10.1016/j.heliyon.2021.e08317>
- Utomo, P. S., & Utama, M. R. (2022). Enhancing students' engagement using interactive applicates in online lectures. *Jurnal Pendidikan Kedokteran Indonesia: The Indonesian Journal of Medical Education*, 11(3), 326-331.
- Victoria, R. (2020). Language anxiety and online learner, *Foreign Language Annal*, 53(2), 338-352. <https://doi.org/10.1111/flan.12461>
- Webb, S., & Chang, A. C.-S. (2015). How does prior word knowledge affect vocabulary learning progress in an extensive reading program? *Studies in Second Language Acquisition*, 37(4), 651–675. <https://doi.org/10.1017/S0272263114000606>
- Yu, L-T. (2022). The effect of videoconferencing on second language learning. A meta-analysis. *Behav Sci (Basel)*, 12(6), 169, doi: 10.3390/bs12060169. PMID: 35735379; PMCID: PMC9219809.
- Zoubi, S. A. (2018). The impact of exposure to English language on language acquisition. *Journal of Applied Linguistics and Language Research*. 5(4), 151-162.

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