

THE IMPLEMENTATION OF E-PORTFOLIOS TO SUPPORT SELF-DIRECTED ENGLISH LEARNING FOR SECONDARY STUDENTS

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ARTICLE INFO		ABSTRACT
Received:	16/4/2022	This study attempts to investigate the implementation of E-portfolios to support self-directed English learning for 11th graders in a Vietnamese local secondary during the second term of the academic year 2021-2022. This study employed action research design with the use of interviews and questionnaires as research instruments. A group of 35 students were invited to join an 8-week project during which they created their personal E-portfolios on Wordpress platform for their own English learning. The data collected from the interviews revealed that the participants did not only positively change their attitudes and increase their motivation towards English learning but also improved their self-directed learning skills such as goal-setting, evaluating, and problem-solving. The results shown in the questionnaires also demonstrated positive feedback of the students towards the use of E-portfolio as a tool to encourage their self-directed English learning. However, they expressed that they encountered several difficulties such as the lack of time to handle their own E-portfolios competently and the shortage of technology skills. Therefore, some recommendations and suggestions were proposed for further research.
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SỬ DỤNG HỒ SƠ HỌC TẬP ĐIỆN TỬ ĐỂ HỖ TRỢ TÍNH TỰ CHỦ TRONG HỌC TẬP TIẾNG ANH CỦA HỌC SINH TRUNG HỌC PHỔ THÔNG

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THÔNG TIN BÀI BÁO		TÓM TẮT
Ngày nhận bài:	16/4/2022	Nghiên cứu này triển khai việc sử dụng hồ sơ học tập điện tử để hỗ trợ tính tự chủ trong học tập tiếng Anh cho học sinh lớp 11 của một trường trung học phổ thông ở Việt Nam trong học kỳ 2 của năm học 2021-2022. Nghiên cứu hành động này sử dụng công cụ nghiên cứu là phỏng vấn và bảng câu hỏi. Một nhóm học sinh gồm có 35 người được mời tham gia dự án kéo dài trong 8 tuần, trong đó học sinh tạo hồ sơ học tập điện tử cá nhân trên nền tảng Wordpress phục vụ cho việc học tiếng Anh. Các dữ liệu thu được từ những cuộc phỏng vấn đã cho thấy những người tham gia không chỉ thay đổi thái độ đối với việc học tập tiếng Anh mà còn cải thiện được các kỹ năng học tập tự chủ như đặt mục tiêu, đánh giá, giải quyết các vấn đề... Kết quả trong bảng hỏi cũng cho thấy những phản hồi tích cực của học sinh đối với việc sử dụng hồ sơ học tập điện tử như là một công cụ để thúc đẩy tính tự chủ trong học tập tiếng Anh. Tuy nhiên, học sinh cũng gặp phải một số khó khăn như là thiếu thời gian thực hiện hồ sơ học tập điện tử một cách thành thạo và thiếu các kỹ năng công nghệ. Do đó, một số đề xuất và kiến nghị được đưa ra cho các nghiên cứu tiếp theo.
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TỪ KHÓA		
Hồ sơ học tập điện tử		
Tính tự chủ trong học tập		
Học tập tiếng Anh		
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1. Introduction

Self-directed learning (SDL) has become one of the most significant skills in various fields in the 21st century including English language education. SDL is an individual's ability to take initiative, set learning goals, recognize learning needs, choose materials to promote learning, and monitor progress toward those goals [1]. It means that self-directed learners (SDLers) are those who self-manage in terms of their independence and decision-making capacities. As discussed in [2], SDLers often demonstrate the 3 following characteristics. First and foremost, SDLers are able to manage their learning by planning, organising and evaluating their learning process. The second issue is the cognitive process that includes aspects belonging to the psychology of learning such as attention, reflection, and metacognitive knowledge. Last but not least, SDLers emphasize the significance of fostering their decision-making skills and their ability to determine the learning content by themselves. In brief, SDLers are independent, responsible and decisive people.

With reference to the learning tools that can foster SDL, an electronic portfolio (EP) is believed to empower learners to make decisions and participate in evaluating their work [3], [4]. EPs are defined as “a digital container (that is) capable of storing visual and auditory content including text, images, videos, and sound” [5], [6]. Another definition shows that an EP is a collection of digital artefacts that not only articulates learner's experiences, accomplishments, and learning but also aggregates their ideas, evidence and reflections [7]. Students can use EPs to manage and create content for a specific purpose, as well as self-evaluate and reflect on their learning progress [3]. It is believed that e-learning tools and the use of technology in teaching and learning will promote more learner-centred and personalised styles of learning in the 21st century [7]. As a result, EPs are viewed as a valuable educational tool for supporting SDL and evaluating students' progress [4].

In English as a Foreign Language (EFL) contexts, there has been a lot of research investigating different aspects of SDLers in Asian countries. Regarding learning styles and preferences, Asian learners, including Vietnamese learners seem to be centred on collectivism and authority respect [8]. Though they can manage their resources to attain their goals on their own, it seems that they lack essential SDL skills for example goal setting skills, material selection, and learning reflection. Therefore, great efforts have been made to improve the quality of second language instruction in those countries. Asian language educators have been attempting to increase SDL by using a variety of techniques including the use of EPs. In China, for instance, a study was conducted to examine whether EPs enhance students' autonomous learning or not and the problems they encountered. The results of this research revealed that EPs have provided the participants with a lot of benefits and the most significant one was the development and encouragement of independent learning [9]. Another research considering the effectiveness of webfolios on Saudi EFL students' readiness for SDL was [10], and it was concluded that adopting webfolios promoted the SDL readiness of Saudi EFL students. Therefore, it is highly recommended that web-based programs should be employed in order to teach English as a foreign language. In Vietnam, a growing interest in the study of SDL and the use of EPs have been mentioned in a number of research. [11], [12], for example, found that foreign language students developed their SDL via the use of EPs. These studies, however, only concentrate on university students who are more mature and more familiar with technology tools than secondary students.

For the aforementioned reasons above, this study was conducted with the aim of exploring the implementation of EPs to support self-directed English learning (SDEL) for secondary students. To be more specific, this paper focused on the changes made in SDEL of secondary students via the use of EPs and their feedback towards the implementation of EPs.

2. Methodology

This research attempts to investigate the contribution of EPs in supporting SDEL for 11th graders in a high school, which is located in an eastern province in the north of Vietnam, where

English is one of the three compulsory subjects in the National High School exam. Specifically, the study aims to answer the following questions: (i) What changes are made in SDEL via the use of EPs? and (ii) what are students' feedback towards the use of EPs?

2.1. Participants

A group of thirty-five students at grade 11th in the mentioned local school were recruited in the present study. There are 16 males and 19 females who are at the age range of 16-17. All of the participants have been learning English for at least 5 years and they have never used EPs for their English learning before. Their English proficiency is estimated at around A2(+) though it could vary from students to students. The students were invited to participate in an 8-week intervention in which they utilised EPs as a tool to develop their SDEL in the second term of school year 2021-2022.

2.2. Research design

The current study adopted an action research model, which is a self-reflective and systematic approach to inquiry with the purpose of identifying problems that participants faced and conducting additional research in order to make significant improvements in practice [13]. According to [14], an action research comprises four dynamic steps which are repeated frequently: plan, act, observe and reflect.

For planning and acting steps, in the first week, thirty-five students at grade 11th were invited to attend an online meeting session in which the concept of EPs, their benefits, and how to make an EP on Wordpress platform were thoroughly introduced. After that, the participants started creating their own EPs which consist of three phases: setting goals for their English learning, collecting and selecting their learning contents, and reflecting on their learning process. Firstly, the students set their English learning goals for the first week to make sure their goals were connected with the curriculum. Following this, they gathered and selected the artefacts related to their goals. The participants then evaluated their learning process, learning outcomes, and their feelings before moving on to the next week. In observation and reflection steps, specific responses from the students were collected via the use of interviews and questionnaires in order to propose and recommend modifications for the next study.

2.3. Research instruments

Two research instruments of questionnaires and interviews were employed in this study to have a grasp of students' feedback on the use of EPs and their changes in the SDEL. Initially, a close-ended questionnaire was distributed to 35 students to get their feedback towards the implementation of EPs. The questionnaires comprised 25 Likert-type items divided into such 4 sections as cognitive components, behavioural components, the use of Wordpress as an EP and the difficulties in using EPs as a tool to support students' SDEL with 5 response choices: strongly agree, agree, neutral, disagree and strongly disagree. The results of the questionnaire were analysed based on five levels as shown in table 1.

Table 1. Scoring range of Likert-scale of the survey [15]

Mean level	Value	Range
4.21 – 5.00	5	Strongly agree
3.41 – 4.20	4	Agree
2.61 – 3.40	3	Neither/Nor agree
1.81 – 2.60	2	Disagree
1.00 – 1.80	1	Strongly disagree

Moreover, a focus group of 9 students, who were most actively engaged in the project during 8 weeks, were interviewed with five questions to address the changes made in their SDEL after using EPs. To be more specific, the interview questions investigated the changes in the

participants' attitudes towards SDL, characteristics of being SDLers and SDL skills such as goal-setting skills, evaluating skills, etc. Moreover, students were asked about the changes in their English learning habits as well as their biggest changes after the use of EPs. The participants were coded from S1 to S9, whose answers were quoted and analysed in detail.

3. Results and Discussion

3.1. Results

3.1.1. Students' feedback towards the use of EPs

In general, most of the students had positive feedback towards the use of EPs to support their SDEL.

Table 2. Students' feedback towards their cognition after using EPs

After using E-portfolios,	Mean	Level of agreement
1. I thought deeply about what I have learned.	3.83	Agree
2. I understood my strengths and weaknesses.	3.74	Agree
3. I found e-portfolios irrelevant to my English learning	1.71	Strongly disagree
4. I engaged more actively and deeply in my own English learning.	3.71	Agree
5. I better understood what is expected from my English learning and set my own short and long-term goals.	3.69	Agree
6. I became more aware of the need to reflect critically on my English learning.	3.94	Agree
7. I felt exhausted with my English learning.	2.45	Disagree
8. I learnt to be a more autonomous learner.	3.94	Agree
9. I found that EPs are more ecological and economical than the use of paper-based portfolios.	4.09	Agree

Students' feedback towards cognitive components after they use EPs was presented in Table 2. It can be seen from the table that the participants agreed with nine given statements. To be more precise, they had a better understanding of their English learning, their strengths and weaknesses, their responsibility as an English learner, and the benefits of EPs in their English learning. It is worth noting that the participants generally expressed their agreement with the fact that they had better awareness of their English learning goals and they became more autonomous in their English study, shown in the average mean scores of 3.69 and 3.94 respectively.

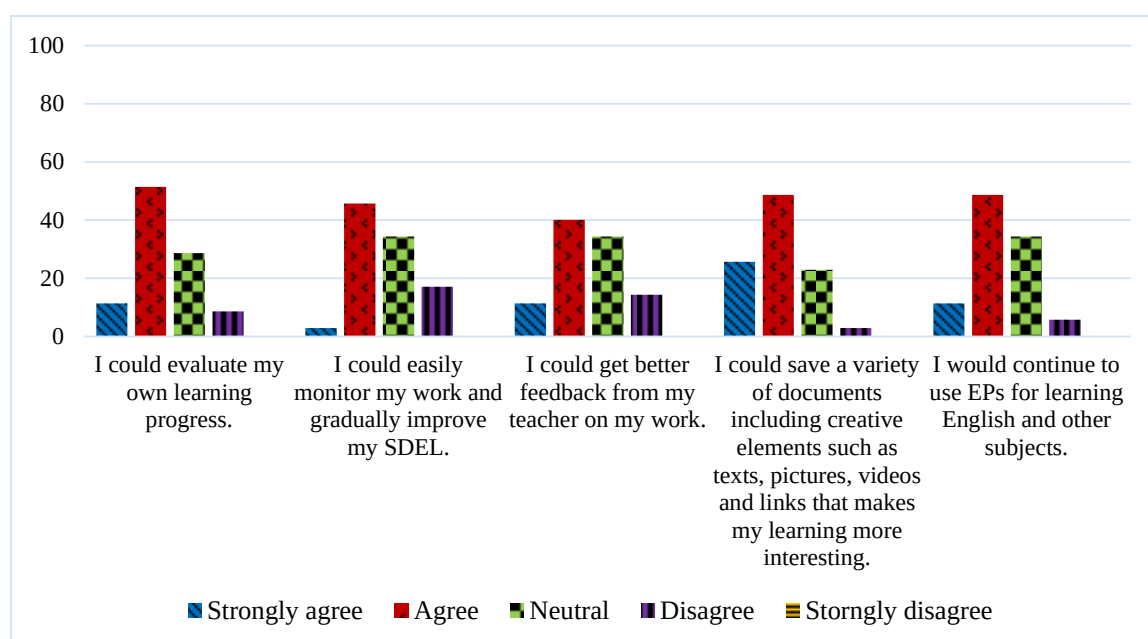


Figure 1. Students' feedback towards their behaviour after using EPs

Figure 1 demonstrates student's feedback towards their behaviour after using EPs. Overall, the students demonstrated positive behaviour via the use of EPs. Over 60% of the participants agreed and strongly agreed that EPs helped them evaluate their learning progress. In addition, nearly a half of surveyed students said they could manage their work easily and gradually improve their SDEL thanks to EPs, which is roughly three times as much as those who claimed this was not true for them. Regarding the third statement, 18 students (equivalent to 51.4%) strongly agreed and agreed that by using EPs, they could get feedback from their teacher better than before. With reference to the diversity of documents the participants could use in their EPs, approximately 80% of them were in agreement with this statement that they could use various documents to promote their interest in learning English. Therefore, when being asked about their commitment to EPs in the future, the majority of participants confirmed that they would continue to use EPs for studying English and other subjects.

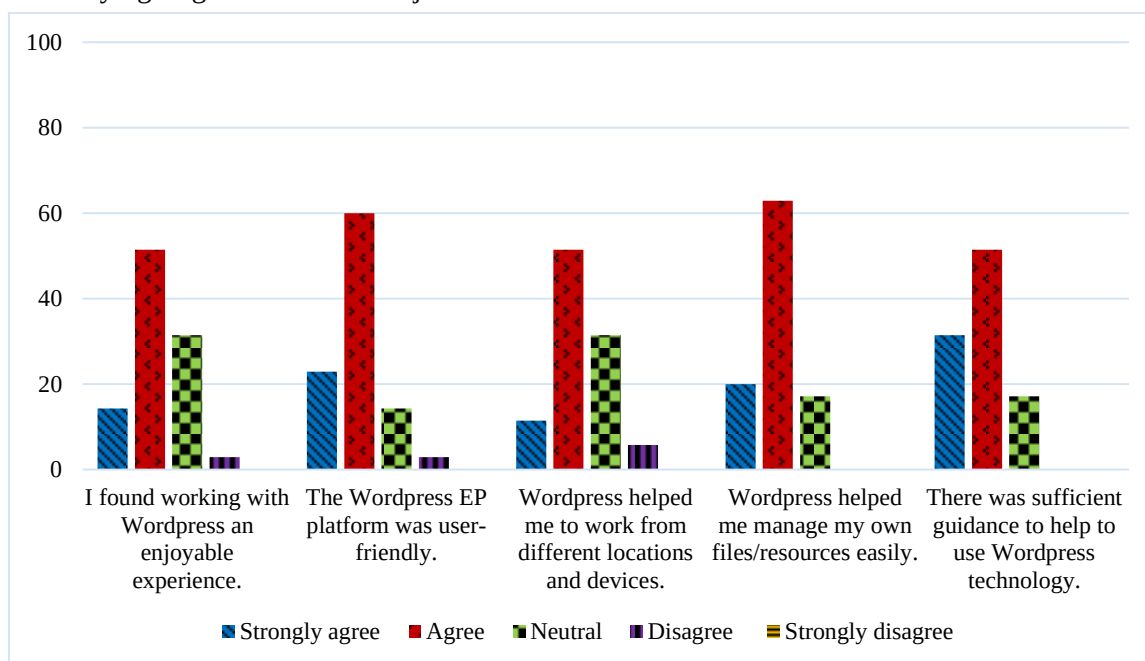


Figure 2. Students' feedback towards the use of Wordpress

Figure 2 shows students' opinions about using Wordpress as a tool for EP. It can be seen from the Figure that their feedback on Wordpress EPs seemed to be optimistic. 65.7% of the respondents reported that working with Wordpress EPs brought them an enjoyable experience. Moreover, 22.9% of the students strongly agreed and 60% of them agreed with the statement that the Wordpress EP platform was user-friendly. Most of them also agreed with the flexibility of Wordpress since they could work in different places on different devices. In addition, over 80% of the participants said Wordpress helped them monitor their work easily and they were supplied with specific guidance to create their EPs on Wordpress platform.

Figure 3 reveals the feedback of participants towards difficulties while using EPs. Overall, a large proportion of the students agreed that it was a bit difficult to handle and use Wordpress EPs competently in a short time. Another problem that 40% of the students encountered during the course was related to technology skills and internet connection problems. There were about 30% of the respondents agreeing and strongly agreeing that creating Wordpress EPs was time-consuming while a half of them disagreed and strongly disagreed. Less than 20% of the surveyed students reported they struggled with artefacts selection and addition whereas the percentage of those who did not agree doubled. Moreover, about 30% of them could not get their work completed due to loading and uploading problems.

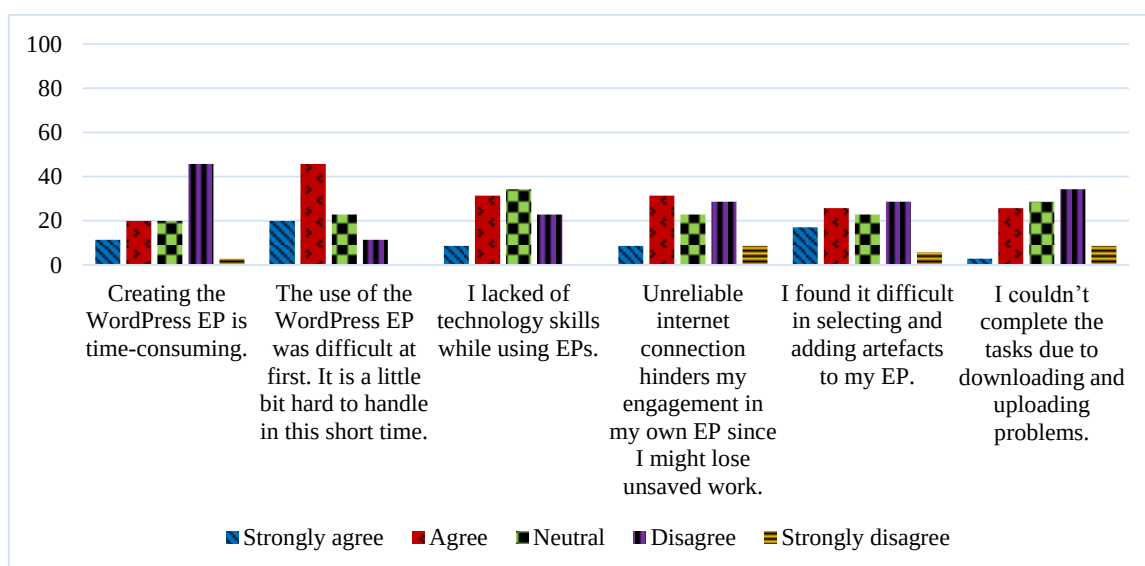


Figure 3. Students' feedback towards difficulties in using EPs

3.1.2. Students' changes in their SDEL via the use of EPs

The data collected from nine interviewed students have shown the positive perceptions of SDEL by using EPs. All of them reported that they have changed not only attitudes towards SDL, characteristics of being SDLers and SDL skills but also their English learning habits.

In the first question, these nine students claimed that they were more responsible for their English learning by following their own study plan written in EPs. Moreover, they also possessed a stronger desire to learn English and to change to become a SDLER:

Since I used the Wordpress EP, I was more aware of what I had been learning; therefore, I felt that I developed my personal responsibility for English learning. I stuck to my plan every week and always thought of completing all the goals I had written in my personal EP. I was more interested in learning English as I could find a lot of fantastic things that encouraged my studying in my EP. (S1)

The Wordpress EP helped me be more passionate about learning English and it was really important to be a self-directed learner while learning English. (S2)

Secondly, the students were asked about the changes in their characteristics. All of them responded that they had become more independent and more self-disciplined since they always tried to complete their weekly goals in their EPs. In addition, some of them reported that they were a bit more confident about their English as they learnt more words and structures frequently which helped them speak more fluently than before (S4, S6 and S7). Nine interviewed students also admitted that EPs enhanced their persistence through writing EPs to learn English, which is one of the significant characteristics of SDL.

Thirdly, the students reflected on their changes in SDL skills including goal-setting skill, time-management skill, gathering information skill, evaluation skill and problem-solving skill.

With reference to goal-setting skill, all of participants realised that setting learning goals helped them learn more autonomously and effectively. They also admitted this skill enabled them to have a clear picture of the work they need to do in the week. They also shared that after using EPs the goals they set were much more specific and related to their learning needs. Some of the 11th graders in that selected school, who have never set goals for their English learning, said they started learning how to set their own goals since they used EPs.

I actually have never set goals for any subjects. Since I wrote my own EPs, I started setting goals for my English learning. At first, my goals covered a wide range of knowledge so that I

could not complete my work, but then, my learning goals were more and clearer and connected with my learning needs thanks to my teacher's help. This skill really brought a lot of benefits. I wish I had known about this sooner so that I learnt more effectively. (S5)

Regarding time-management skills, they all reported that they use their time more wisely compared to the past. For instance, S3 said he arranged proper time for each goal and tried to follow this time-line to achieve his goals. He found that he spent less time doing nonsense activities like surfing social media and paid more attention to my learning.

Since the students wrote EPs, they had to search and gather the information by themselves. Therefore, they expressed that they were better at choosing pieces of information involved in their learning.

Before using EPs, I rarely read or find the sources of information for my learning as my teacher had told me about that. Sometimes, I surfed Facebook and saw several English learning pages but I did not care about them. However, when I wrote EPs, I was motivated to explore new things and I tried to find the information that was really useful for my learning goals. (S1)

Another important skill of SDL is evaluation skill. Based on the data collected from nine interviews, most of them shared that they rarely or never looked back and evaluated what they had learnt. However, things have changed since they used EPs. On every Sunday, they sat down and thought of their learning process in that week. By evaluating the work achievements and their feelings after each week, they were aware of their learning and figured out strengths and weaknesses. In addition, this self-assessment also motivated them to expand their goals and explore new things.

Last but not least, the researcher asked the respondents about their problem-solving skills. S1, for example, said *"Before applying EPs to my English learning, I often skipped all the obstacles I encountered. However, since I set weekly goals in my EPs, I force myself to try to solve the problems by asking my teacher, my friends and online websites to accomplish those goals"*. A small proportion of students revealed that they have not met any problems while using EPs for their English learning; therefore, they have no changes in this skill.

Turning to the fourth interview question, the participants were asked about their changes in their English learning habits. They expressed that their routines have changed a lot since applying EPs to learning English.

In the past, I just learnt what the teacher required me to learn and I only learnt before tests and exams so I was under a lot of pressure and hated English. Nevertheless, since using EPs, I learnt English more frequently. I divided the work into small parts and tried to accomplish them everyday and every week. By doing this, I found learning English much easier than before and now I have started developing interest in English. (S5)

I was always nervous about my English tests as I had no preparation for them. I also could not memorise what I have learnt for a long time. Since I learnt English regularly with the use of EPs, I have improved my retention a little bit and I was a bit more confident when taking English tests. (S7)

The last question was about their biggest changes after using EPs. It was noticeable that nine of the respondents revealed they found themselves more responsible and independent in their English learning. They learnt even when their teacher did not give them homework.

3.2. Discussion

The findings of this study demonstrate that the implementation of EPs has offered a wide range of benefits to secondary students. As shown in the interviews, the students who truly participated in the project have developed multiple SDL skills via the use of English EPs such as goal-setting skills, time-management skills, and problem-solving skills. Moreover, they have changed not only their attitudes towards autonomous learning, the characteristics of being SDLers but also their English learning habits. In other words, EPs help students promote their

SDEL. This finding is in parallel with several studies [9], [10], and [12] in that the application of EPs developed learners a sense of ownership and encouraged their independence in learning. In addition, they were able to manage their personal learning progress through the use of EPs.

Regarding the feedback of the 11th graders towards the use of EPs during 8-week intervention, it is noteworthy that the experiences that the participants earned from using EPs to foster SDEL was quite positive in terms of cognitive components, behavioural components and the application of Wordpress as an EP tool. Actually, the students self-evaluated that they were more aware of not only the knowledge learnt but also their selves and their engagement in learning English. In addition, the participants realised the importance of reflection on their learning progress and they started learning to be a SDLer. The behaviour of the students after implementing EPs was also positive since they could take control over their learning process and get feedback from others more easily. Moreover, they found this Wordpress-based EP an enjoyable experience; therefore, they wished to continue to use EPs for their English learning in the future.

However, most 11th graders involved in the study encountered a number of difficulties in exploring and mastering all the functions of Wordpress EPs, which can be inferred that the students lack adequate IT skills and IT facilities for their learning. Therefore, if the teachers desire to implement EP to enhance students' SDEL, it is vital that they support their learners with adequate IT skill training so that they can handle technical problems that they may experience in their learning process. It is also recommended that language educators should anticipate a broad range of technical hindrances so that they could facilitate the learners in their SDEL.

4. Conclusion

The study results illustrate the potential of EP implementation in English learning for cultivating students' SDL. It can be concluded that the students have held optimistic attitudes and changes in their SDEL via the use of EPs. Hence, it can be suggested that EPs be applied in language education as a tool to encourage learner autonomy in general and self-directed learning skills in particular including goal-setting skills, evaluation, and problem-solving skills. Nevertheless, for sustainable effectiveness of the use of EP on learners' SDEL, language teachers should consider longer implementation time so that students could experience a more comprehensive exploration of different aspects of EPs and have a more profound understanding of the values of EPs, which could facilitate their commitment to the pursuit of more autonomous English study.

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