

EXPERIENTIAL LEARNING THROUGH FIELD TRIPS: A PERSPECTIVE FROM STUDENTS AT HANOI UNIVERSITY OF INDUSTRY

Pham Duc Long^{1*} and Nguyen Thi Ha Thuy²

¹*Center for Enterprise Partnership, Hanoi University of Industry*

²*School of Languages and Tourism, Hanoi University of Industry*

Abstract. The field trip is one of the significant experiential learning activities to enhance students' cognition of employment opportunities after graduation. The study assesses the value of nine field trips of Hanoi University of Industry students in 2022. Data were collected from 451 second-year students at the faculty of Information Technology through an online survey. The survey consists of two parts, the first related to demographic information and the second for the participants' ratings on the aspects of field trips. Data analyses were performed by spss software (version 26). The result revealed that participants highly valued the university support, enterprise activities and their achievements for the field trips. The findings from the Hanoi University of Industry can act as a successful case for other Vietnamese higher education to organize similar field trips to promote their undergraduates' preparedness of work readiness after graduation.

Keywords: field trips, work readiness, employment opportunities, experiential learning.

1. Introduction

Experiential learning plays a critical role in assisting students in obtaining hands-on knowledge and skills. The field trip, which is a short-term experiential learning activity, can offer students “a window onto the world outside the classroom” [1, p.3]. On a school or class trip, students have unique opportunities for individual, academic, and professional development.

The field trip is often implemented in primary and secondary education [2]. Few studies have investigated the field trips for students from different disciplines in tertiary and postgraduate education such as logistics students in Austria [3], Linguistics students in Malaysia [4], and postgraduate marketing students in the United Kingdom [1]. However, very little is known about the field trips for computing and information technology students. Therefore, this study provides one of the first investigations to fill the gap.

Nine field trips were organized for computing and information technology students in the academic year 2021-2022 at Hanoi University of Industry. The paper reports the students' assessment findings of field trips in terms of the university plan, enterprise selection, lecturer support and achievements for the field trips.

The paper is composed of three parts. The first section introduces the research problem and finds out the gap needed to fill. The second part covers four sub-parts: a literature review of experiential learning and field trips, research methodology of data collection and analysis, the

study findings, and discussions. The last part is the conclusion which includes the summary of research findings and limitations of the study.

2. Content

2.1. Literature Review

Vietnamese higher education institutions are put under pressure because employment statistics of university graduates have received particular attention from parents, students and the government [5]. Experiential learning activities at workplace with employers are required to implement by universities to bring opportunities to access employment [6]. Among experiential learning activities is the field trip which can promote future employability for undergraduates [7, p.16].

2.1.1 Experiential learning

Various studies have attempted to explain the experiential learning [8-10]. Experiential learning appeared for the first time in the 1940s when learning could be measured through solving problems. Experiential learning theory regards knowledge attained in the learners' experiences as a process in which the learners can watch, listen to and touch things. Kolb [11] introduced experiential learning process with four stages, including a concrete experience, accurate reflection, lessons and principles-forming, and the operation of gained knowledge to new settings. Matsuo [8] proposed a model for learning from experience which central motivations include individual goals and social networks. Individual goals refer to learning goal orientation which aims at achieving skills or new knowledge. Social networks specify groups of people who proactively participate in career development activities.

Experiential learning activities are organized as a compulsory course with organizing guidance for Vietnamese primary, secondary and high school level. According to general education programs announced in 2018, experiential learning activities aims at learner-oriented, society-oriented, nature-oriented and career-oriented tasks [12]. At higher education level, experiential learning activities are engaged with career counselling and employment tasks for learners [6]. Experiential learning activities can be implemented through various types, such as the field trip for workplace experience [13], or community service to create win-win-win partnerships for university, community and students [14, p.2], or extra-curricular programs to enhance employability skills [15].

2.1.2. Field trip

The field trip is considered short-term experiential learning, which lasts a part of the day, a day, or some days for the learner to generate a concrete experience. The field trip may be described as any journey organized under the support of “the school for educational purposes” [16, p.233]. The field trip may be mentioned through its synonyms, such as the instructional trip, company tour, study excursion and school excursion. In another way, the field trip is interpreted as an opportunity for students to bridge the gap between theory and practice [2].

Field trips can result in realistic values for the students through providing authentic experience, increasing learning interest, fostering cognitive skills, bringing better motivation, and developing social network [17]. Students can gain personal development by connecting their learning from experiences with the ideas, concepts, and subject matter [18]. There is a positive relationship between the field trips and the students' knowledge [3], attitude about the subject [18], social skills [2].

Field trips cover three stages pre-trip, while-trip, and post-trip. Pre-trip activities consist of different preparatory plans, such as selecting the field trip venue, arranging a reasonable time for school and enterprise, considering transportation, exchanging detailed schedules, and

designing evaluation tools for student engagement [18]. During the trip, the roles of lecturers are emphasized. There are various ways to keep the students engaged. The first way is to make participants care about their personal tasks; another method is to create group work requiring students to observe, discuss and report their results. After the trip, students are asked to write their reflections to inform the school organizers of the student's interests and the trip's values. The well-organized field trips can avoid the “zoo phenomenon” [2, p.170] of not achieving educational intent or not supporting participants to make personally relevant meaning from the learning experience. The post-trip feedback from participants can suggest improvements for the following excursions.

2.2. Research methodology

This study followed a quantitative research design because collected data can supply specific numbers for statistical analysis to draw frequency or describe trends about a large number [19, p.535]. The quantitative method design includes different types, including the survey, correlational and experiential ones [19, p.12].

The study employed an online survey design which is cost-effective and can supply quick results [20]. Specifically, Google form was used as data collection instrument. The survey consists of two parts with 16 items, the first related to demographic information and the second for the participants' assessment on the aspects of field trips. For the second part of the survey, which is composed of 12 items with three groups in terms of university activities, enterprise activities and student learning outcomes, the students rated their responses for each statement by selecting 5 (Completely agreed) or 4 (Agreed) or 3 (Neutral) or 2 (Disagreed) or 1 (Completely disagreed). The items for learning outcomes were adapted from the study by Laren et al. [17], while questions for assessing university and enterprise activities were composed by the researcher as the requirement for implementing and managing field trip activities.

Table 1. Summary of respondent information

Characteristics	Category	Overall (N=451)	
		N	%
Gender	Male	380	84.25
	Female	71	15.75
Disciplines	Information Technology	192	42.57
	Software Engineering	116	25.72
	Information Systems	90	19.96
	Computer Science	53	11.75
Enterprises to visit	FPT Software Co., Ltd.	176	39.02
	VTI JSC.	63	13.97
	MISA JSC.	51	11.31
	Rikkeisoft JSC.	46	10.20
	HCL Vietnam Co. Ltd.	33	7.32
	Sun Asterisk Vietnam Co. Ltd.	27	5.99
	ETC Technology Systems JSC.	23	5.10
	Harvey Nash Vietnam Co. Ltd.	16	3.55
VMO Holdings Technology JSC.	16	3.55	

The field trips were organized for computing and information technology students under the management of Faculty of Information Technology at Hanoi University of Industry. The faculty is in charge of five training programs: information technology, software engineering, information systems, computer science and multimedia technology. The training programs are built for enterprises to introduce first-year students to technology trends and updates about the labour market in information and communication technology sector. The faculty collaborated with the Centre for Enterprise Partnership under Hanoi University of Industry to organize field trips for second-year students. Multimedia technology is a new program that begins in the academic year 2022-2023. Therefore, there is no second-year multimedia technology-majored student to join the field trip in the academic year 2021-2022.

There are nine enterprises selected for field trips in May 2022. All companies are in Hanoi, of which 5 out of 9 are joint-stock ones, while the remaining belong to the limited enterprise (as indicated in Table 1). The questionnaires were distributed to 650 the second-year students who completed the field trips through their emails and Zalo-based class groups. After six days, 451 answers were recorded, with a response rate of 69.38 per cent.

SPSS software (version 26) was operated to interpret data. Descriptive statistics were used to discover the general information about participants' trips and disciplines. For the questions relating to the university support, enterprise activities, and learning outcomes, mean and standard deviation value are measured and displayed.

2.3. Results

2.3.1. Demographic profile

Simple statistical analysis was used to explore the participants' generic information. As shown in Table 1, the male participants outweigh the females. 84.25% of the male participants took part in school trips, while nearly one-sixth of female ones attended. Moreover, the participants were grouped based on their disciplines. What stands out in the table is most respondents were studying Information Technology (42.57%). Two other majors involved the participation of students are Software Engineering (25.72%) and Information Systems (19.96%) while a minority of respondents were pursuing a Bachelor of Computer Science (11.75%).

Among nine enterprises to visit, FPT Software Co., Ltd welcome the largest number of participants (39.02%), followed by VTI Joint Stock Company (13.97%) and MISA Joint Stock Company (11.31%). It was apparent from this table that very few respondents observed the office of Harvey Nash Vietnam Co. Ltd. and VMO Holdings Technology Joint Stock Company (3.55%).

2.3.2. Students' assessment on the field trip

Twelve items on the questionnaire measured the students' view on university support, enterprise activities and students' achievements.

University support

As shown in Table 2, the participants were satisfied with the university support (items' mean values are greater than 4). The most noticeable finding is selecting enterprises (mean=4.43, SD=0.707) for the trip met the partakers' expectations. The participants rated the highest rank for the university's efforts in contacting and selecting enterprises based on their training disciplines. Secondly, the university's time arrangement (mean=4.40, SD=0.761) was suitable for student engagement. Thirdly, lecturers (mean=4.38, SD=0.746) were capable of knowledge, skills, and expertise to communicate with the participants effectively. Last but not least, the University plan (mean=4.35, SD= 0.808) was sent on time to the students to register and select. It is implied that the students had enough time to prepare for their trips.

Table 2. Students' assessment on university support

No.	Statements	Mean	Std. Deviation	Rank
1	The plan for the field trip was announced to me.	4.35	0.808	4
2	The field trip date was suitable for my timetable.	4.40	0.761	2
3	Lecturers answered my questions convincingly during the trip	4.38	0.746	3
4	Enterprise for my field trip matched my training major	4.43	0.707	1

Enterprise activities

Beside the university support, enterprise activities are the main content of the trip. After the participants observed the machines and manufacturing sections, the companies introduced about their development and recruitment plan. The third section involved the sharing of alumni working at the companies followed by ask and answer section.

As shown in Table 3, the participants agreed that enterprise activities were meaningful (items' mean values are greater than 4). Firstly, the second-year students were the most satisfied with listening to the skills needed to work at enterprises (mean=4.42, SD=0.699). Two other activities drew the students' attention, including job introduction (mean=4.39, SD=0.692) and constructive feedback on the trip's question (mean=4.38, SD=0.746). Lastly, briefing the general procedure of production, business and service appeared to receive the slightest notice from the participants (mean=4.33, SD=0.769).

Table 3. Students' assessment on enterprise activities

No.	Statements	Mean	Std. Deviation	Rank
1	Enterprise shared the procedure of business, and service.	4.33	0.769	4
2	Enterprise introduced job positions and recruitment needs.	4.39	0.692	2
3	Enterprise instructed me about the skills needed for work.	4.42	0.699	1
4	Enterprise guided and answered me during the trip.	4.38	0.746	3

Students' learning outcomes

The findings from Table 4 indicate that the partakers' learning outcomes were outstanding. Knowledge, motivation, and cognition of necessary competencies are more highly valued among students on field trips (mean = 4.37). It appeared that the participant had little time in the developing social network during trips compared with other learning outcomes (mean=4.18, SD=0.752). The companies for the trip were in Hanoi, and travelling from Hanoi University of Industry to the trip venues might take thirty minutes. Thus, the participants could have limited time in the car to have long conversations.

Table 4. Students' assessment on learning outcomes

No.	Statements	Mean	Std. Deviation	Rank
1	I get new knowledge and experience	4.37	0.740	1
2	I have more motivation for school subjects	4.37	0.774	1
3	I can exchange and develop a social network	4.18	0.951	2
4	I understand the competencies that need to be prepared for work	4.37	0.752	1

2.4. Discussions

There exist some prominent findings to emerge from the results. Firstly, most participants were males who were studying at Faculty of Information Technology. Secondly, FPT Software Co., Ltd was the big company which created the most opportunity for students to observe among nine enterprises. Thirdly, Hanoi University of Industry implemented suitable preparatory work for trips. Additionally, activities organized at enterprises satisfied most participants. Lastly, advancement in knowledge, motivation and cognition were the main achievements for students.

The field trips were taken by the more male than female students. This finding is consistent with that of Larsen et al. [17] who investigated the field trips for the first-year student in the United Kingdom. The ratio of male and female respondents in their study is 70:30. A possible explanation for this might be discipline-based characteristics which technology majors are selected by the vast number of male students.

University support

The study found that university support significantly contributes to the trip's successful organization. The results match Mukuria's study [21] in Canada and Australia, where the field trips were supported by administrative staff for student communication, financial aid and transport, and academic divisions to implement the learning from experience and assessment tasks. The findings imply that Hanoi University of Industry administrative staff arranged a suitable time for enterprises, lecturers, and students to be involved in the trips. May 2022 seemed to be an ideal time for reconnecting with enterprises that preferred spending their efforts on production recovery and building recruitment plans after the Covid-19 pandemic.

Enterprise activities

The research results reveal that enterprises organized different activities to make the trip effective for the students. The results can enrich the literature about enterprise involvement during the field trip which has little information to be found in previous research. Selecting IT enterprises familiar to students, namely FPT Software Co., Ltd or MISA JSC., may have been an important factor in drawing on the first-hand experience for participants. For example, when the participants visited Hoa Lac Hi-tech Park, where FPT Software Co., Ltd has been operating since 2017, they could observe the modern working offices and had pleasant time with sightseeing the flower garden and fish pond where the FPT employees can relax and enjoy fresh air.

The students' learning outcomes

The study findings show that the field trip can stimulate knowledge and motivation for learning. This confirms Samuel et al.'s study [1] for marketing and business strategy students in the United Kingdom where 96 business school students asserted that the more novel the trip environment was, the more motivation they gained. Moreover, this study result was consistent with Arcodia et al.'s research [22], which the most popular motivation for 83 students from 26 countries to engage in the field trips came from educational aspect. Nearly 40% participants in the study by Arcodia et al. [22] supported that the field trip could assist them in obtaining hands-on knowledge and experience.

The study findings help us to understand the crucial roles of maintaining and developing university-industry cooperation in aiding university undergraduates to adjust their study plans. The field trips confirm the practical values of experiential learning, which brings concrete experiences that make sense to each participant. Moreover, the trips help foster the student's understanding of career pathways from the outdoor activities, which need to be connected with later internships, job fairs and recruitment activities.

3. Conclusion

The current study sought to assess the field trips organized by Hanoi University of Industry for IT-majored second-year students. Research has also shown that the field trip is a beneficial short-term experiential learning. It dramatically improves the students' authentic knowledge, increases their learning motivation, sharpens cognition of necessary competencies for work after graduation and builds a social network for career development.

The scope of study was limited to second-year students at a Hanoi-based public university. Further research should be undertaken to investigate the first- or third-year students or other higher education institutions in different provinces in Vietnam. Moreover, the field trips were taken by more males than females. Future field trips are suggested to be organized for an equivalent number of males and females. Therefore, an Independent Sample T-test may be performed to compare the difference in achieving learning outcomes regarding gender.

Acknowledgement: I would like to express my deep gratitude to Hanoi University of Industry for assisting me in collecting data for our study. I would also like to thank Dr Nguyen Huu Cuong, Van Lang University, for his patient guidance and helpful critiques during the course "Advanced Academic Writing" for PhD students at Vietnam National University, Hanoi, in October 2022.

REFERENCES

- [1] Samuel, A., Thomas, R. J., McGouran, C., & White, G. R. T., 2021. Experiencing the Macromarketing Dimensions of Sustainability: Lessons Learned From Field Trips to the Ultra Novel. *Journal of Marketing Education*. <https://doi.org/10.1177/027347532111049825>.
- [2] Higgins, N., Dewhurst, E., & Watkins, L., 2012. Field trips as short-term experiential learning activities in legal education. *Law Teacher*, 46(2), 165–178. <https://doi.org/10.1080/03069400.2012.681231>.
- [3] Putz, L. M., Treiblmaier, H., & Pfoser, S., 2018. Field trips for sustainable transport education: Impact on knowledge, attitude and behavioral intention. *International Journal of Logistics Management*, 29(4), 1424–1450. <https://doi.org/10.1108/IJLM-05-2017-0138>.
- [4] Campbell, Y. M., & Gedat, R., 2021. Experiential Learning through Field Trips: Effects on Educational, Social and Personal Development among Linguistics Majors. *Journal of Cognitive Sciences and Human Development*, 7(2), 131–144. <https://doi.org/10.33736/jcshd.3430.2021>.
- [5] Tong, L., 2019. Graduate Employment in Vietnam. *International Higher Education*, 97, 22–23. <https://doi.org/10.6017/ihe.2019.97.10948>
- [6] MOET., 2022. Circular 07/2022/TT-BGDDT on career counseling and business startup support in education institutions. <https://thuvienphapluat.vn/van-ban/EN/Giao-duc/Circular-07-2022-TT-BGDDT-career-counseling-in-education-institutions/518214/tieng-anh.aspx>
- [7] Peasland, E. L., Henri, D. C., Morrell, L. J., & Scott, G. W., 2019. The influence of fieldwork design on student perceptions of skills development during field courses. *International Journal of Science Education*, 41(17), 2369–2388. <https://doi.org/10.1080/09500693.2019.1679906>
- [8] Matsuo, M., 2015. A Framework for Facilitating Experiential Learning. *Human Resource Development Review*, 14(4), 442–461. <https://doi.org/10.1177/1534484315598087>.

- [9] Seaman, J., Brown, M., & Quay, J., 2017. The Evolution of Experiential Learning Theory: Tracing Lines of Research in the JEE. *Journal of Experiential Education*, 40(4), NP1–NP21. <https://doi.org/10.1177/1053825916689268>.
- [10] Stern, M. J., & Powell, R. B., 2020. Field Trips and the Experiential Learning Cycle. *Journal of Interpretation Research*, 25(1), 46–50. <https://doi.org/10.1177/1092587220963530>.
- [11] Kolb, D. A., 1984. *Experiential Learning: Experience as The Source of Learning and Development*. Prentice Hall, Inc., 1984, 20–38. <https://doi.org/10.1016/B978-0-7506-7223-8.50017-4>.
- [12] MOET., 2018. Circular 32/2018/TT-BGDDT on promulgating general education program. <https://thuvienphapluat.vn/van-ban/EN/Giao-duc/Circular-32-2018-TT-BGDDT-promulgating-general-education-program/519827/tieng-anh.aspx>
- [13] Nguyen, T. N. H., & Nguyen, V. D., 2021. Enhancing student employability: A mixed-methods study into work-integrated learning curricula in Vietnamese universities. *International Journal of Work-Integrated Learning*, 23(3), 405–425.
- [14] Fede, J. H., Gorman, K. S., & Cimini, M. E., 2017. Student Employment as a Model for Experiential Learning. *Journal of Experiential Education*, 1–18. <https://doi.org/10.1177/1053825917747902>
- [15] Tran, L. H. N., 2017. Developing employability skills via extra-curricular activities in Vietnamese universities: student engagement and inhibitors of their engagement. *Journal of Education and Work*, 30(8), 854–867. <https://doi.org/10.1080/13639080.2017.1349880>
- [16] Sorrentino, A. V., & Bell, P. E., 1970. A comparison of attributed values with empirically determined values of secondary school science field trips. *Science Education*, 54(3), 233–236. <https://doi.org/10.1002/sce.3730540308>.
- [17] Larsen, C., Walsh, C., Almond, N., & Myers, C., 2017. The “real value” of field trips in the early weeks of higher education: the student perspective. *Educational Studies*, 43(1), 110–121. <https://doi.org/10.1080/03055698.2016.1245604>.
- [18] Behrendt, M., & Franklin, T., 2014. A Review of Research on School Field Trips and Their Value in Education. *International Journal of Environmental and Science Education*, 9(3), 235–245. <https://doi.org/10.12973/ijese.2014.213a>.
- [19] Creswell, J. W., 2012. *Educational research: planning, conducting and evaluating quantitative and qualitative research*. Pearson Education, Inc.
- [20] Singh, S., & Sagar, R., 2021. A critical look at online survey or questionnaire-based research studies during COVID-19. *Asian Journal of Psychiatry*, 65(August), 102850. <https://doi.org/10.1016/j.ajp.2021.102850>.
- [21] Mukuria, V., 2022. Preparation for work: Reflections on developing an international Indigenous field trip. *Journal of Work-Integrated Learning*, 23(2), 169–186.
- [22] Arcodia, C., Abreu Novais, M., Cavlek, N., & Humpe, A., 2021. Educational tourism and experiential learning: students’ perceptions of field trips. *Tourism Review*, 76(1), 241–254. <https://doi.org/10.1108/TR-05-2019-0155>.