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Education

APPLICATION OF SEMIOTICS TO TEACH THE GAME OF GO

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Abstract

Many people believe the game of Go provides benefits to players. But there were few research studies that showed the effects of the game of Go and not many research studies that explained how the game of Go promoted and transferred skills to a player. In order to understand, maybe we must reconsider the assumption of the game of Go. The initial stones on the game of Go board present some clues to players on how to do next, with means the initial stones stand for something like concept or strategy of the game of Go and become the sign the concept like semiotics. The novice players learn the concept and strategy of the game of Go by interaction with the expert player or his/her teacher. Expert players then help the novice players with scaffolding techniques to support the abilities the novice lack and expert players use a sign to form the cognitive process to be internalized by novice players.

Keywords: Go, Scaffolding, Semiotics, Sign

Introduction

The game of Go has 4,000 years of history. It was originated from China, then well-received Japan, and around the world. At present in many countries play the game of Go because it involves interesting topics like the way of life, education, business, artificial intelligence (A.I.), mathematic, and philosophy (Shotwell, 2003). In the field education, the game of Go has been found to promote concentration, creativity, and imagination, some multiple intelligence and some soft skills of children. (The Nihon Ki-in, 2015; Chen, Zhang, Zhang, Li, Meng, He, & Hu, 2003; Kim, Han, Lee, Kim, Cheong, & Han, 2014; Cho, Jeong, Cheon, Im, & Kim, 2009). However, there have been few researches concerning the game of Go on cognitive process whereas a considerable number of researches have been conducted with respect to chess. It is possible to attempt to apply those researches to any work on the game of Go (Shotwell, 2003).

Most people tend to believe that expert chess players possess memory skills, calculation skills, verbalization of decisions skills, and general intelligence more than novice chess players. However, Hearst, and Wierzbicki (1979) argued that there was little evidence to support this assumption. According to Ross (2006), expert chess players can recall memory skills better than novice chess players on the game pattern; however, both perform the same on the random pattern. About calculation skills, an expert chess player can play very well like normal game tournament when he/she (got time per move a little bit with no time to think. On the verbalization of decisions skills, it is believed that expert chess players follow certain specific principles in order to decide an appropriate strategy or a next move. In contrast, many expert chess players sometimes resort to rely on a simple strategy which he/she cannot explain why that strategy is adopted. In terms of general intelligence or IQ comparison, there is no much differences between expert chess players and novice chess players on the game of Go and chess and that expert chess players require understanding, then memory to

make a decision. According to Hearst, and Wierzbicki's, we can, therefore, conclude that there exist misunderstandings about the skills required by chess players.

On the game of Go context, Reitman. (1976), studied the partition of recall and reproduction data in chunks on the basis of inter-response times. The samples were master players and beginner players. Reitman created two types of stimuli. Figure 1 shows the meaningful patterns from Japanese the game of Go journal whereas Figure 2 depicts the random patterns which consist of clusters of similar size. He found the meaning pattern the game of Go master player can recall better than the game of Go beginner player in the first trial but when they try much time found no difference between two groups. In random pattern found no difference recalled between the game of Go master player and the game of Go beginner player in the first time but when they try much time, they can recall equal. (Reitman, 1976; Burmeister, 2000; Gobet, Voogt, & Retschitzki, 2004).

Moreover, Reitman discusses the memory task with the game of Go master's guessing being more likely to be right than beginner. He thought some initial stones as clues. The game of Go Master level may have been able to figure out the final pattern compositions from the game of Go Master knowledge and Master level Game. From Reitman discussion showed some issue. The initial stones on the game of Go board were clues the game of Go Master knowledge.

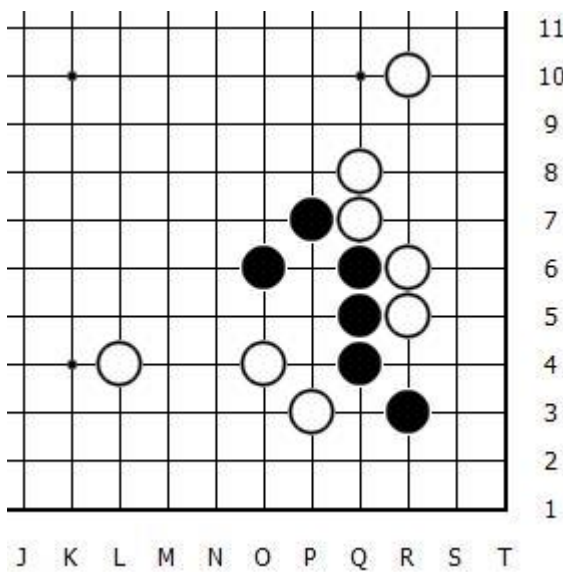


Figure 1
Meaning patterns

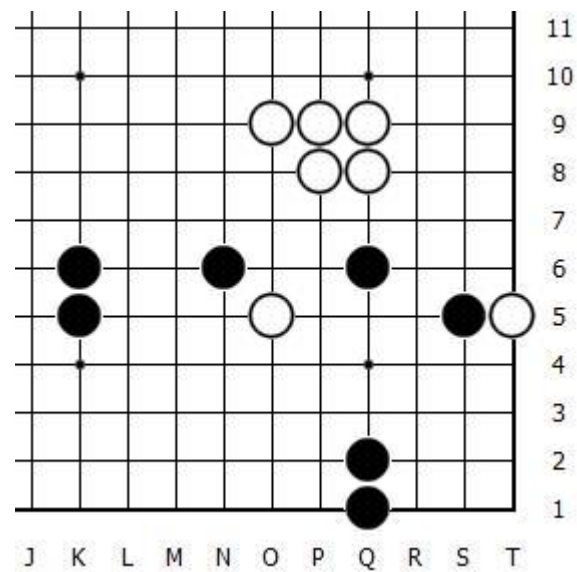


Figure 2
Random pattern

Source: Reitman, 1976, p. 341

Tajaroensuk (2017), found two interesting issues. Firstly, if we change some stones in the meaning patterns, the clues from the initial stones will be changed as well. This means that the move patterns like initial stones were keys to understanding the cognitive process of the player in the game of Go. Secondly, the role of the teacher on socialization of the game of Go is worth noticing. It was also found that the teacher's use of scaffolding technique to shape the student's cognitive process in the game of Go was found positive.

From my literature review, I agreed with Gobet, Voogt, & Retschitzki. In fact, we had little evidence to assume the effect of chess promote student skills. Gobet, Voogt, & Retschitzki (2004), presented two issues of board game experimental research. First, the researcher chose weak research

design. And last the researcher lack knowledge of chess instruction. These issues were very interesting and we must rethink about theory or paradigm or assumption to find a new way to study the game of Go education. In my opinion, they lacked theory to explain how the game of Go promote skills and how to create intervention program. From the lacking theory affect to optional instruction, how to lead motivation player, and be balanced between chess skills and benefit. But what theory? Reitman issue showed initial stones were stimuli to knowledge the game of Go player. And initial stones clued what player can do. The game of Go player knows clues from initial stones with intuition. And from Tajaroensuk(2017), issues showed the shape and pattern on the board can be created and change the meaning. The game of Go stones were stand for some ideas or somethings. Now the game of Go stones were sign. Semiotics was sign studies. If we apply semiotics to integrate with education and psychology theory, we can deep understanding the game of Go education.

What is sign and semiotics?

The definition of the sign was something stand for something than itself. Sign take the form of words, images, sounds, acts, or objects. The sign was a concept of Semiology or Semiotics. (Chandler, 2002) In this paper, I focus on Semiotics. Charles Sanders Peirce, the pragmatist philosopher and logician formulated model of sign, he believed sign must have three parts. First, the representamen was the form which the sign takes. Second, object was something beyond the sign to which it refers. And third, interpretant was not interpreter but was the sense made the sign. (Chandler, 2002) Many scholars who got influence from Peirce, they made the construct of sign and three parts in figure 3. In this article, I focus on Interpretant only to explain how to apply semiotics to teach the game of Go.

Interpretant refers to the sense made the sign (Chandler, 2002). Peirce considered the sense in three types. First, Rheme refers sign which is understood to represents its object merely in its characters or possibility. Second, Dicentsign refers sign which is understood to represent its object in respect to actual existence or fact. And third, Argument refers sign which is understood to represent its object in its character as law or reason, and an argument is a process of thought tending to produce belief. (Sáenz-Ludlow, 2007). On the game of Go context found many the game of Go player used sense like interpretant. Jeong (2001), found the game of Go expert players have three-step problem-solving in the game of go. First, the game of Go expert players finds the first possible move. Second, they search the next Possible Moves Tree (PMT), and 3) If the player found the first and second operation did not work, they took the action to find the alternative possible move. And he gave two notices, first, he found the relationship between the game of go strength and the quality choice of possible move. A strong player can found high possibility to reach the answer than a weak player and the possible move conceived by the intuition subject not from logical analysis but from they saw the shape. Second, they can chosen eccentric moves. Intuition was very important issue to understand human cognition because we don't know how to study intuition. But on semiotics view, Peirce refused intuition. He argued the intuition was sign. It involves a direct dyadic relation between an interpretant and its object (Houser, 2010).

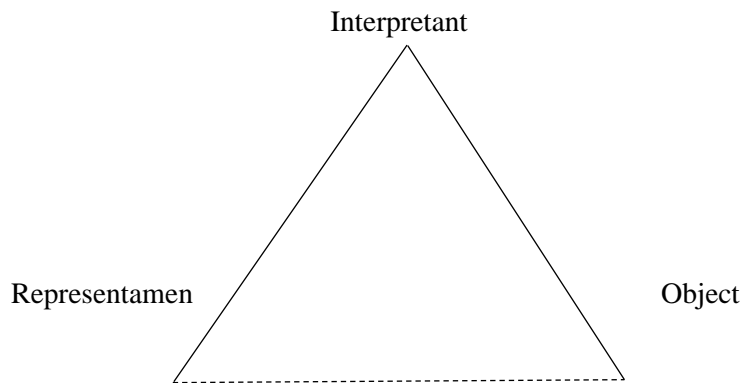


Figure 3: Construct of Semiotics

Source: Chandler, 2002: p. 30

Semiotics in Psychological field

The game of Go requires strong intuition and abstract thinking to play. Because The game of Go was perfect information games and very complexity from 10^{170} possible game states (Brunner, 2019). On psychological field, intuition refers to psychological processes involving immediate understanding or direct apperception. On Psychological field explain process in insight problem solving might be incremental, but inaccessible to consciousness. In addition, Piaget saw development from childhood to adulthood as the transition through four main stages, culminating in the “formal-operation” stage, which is characterized by hypothetico-deductive reasoning, and the capability to think using abstract possibilities (Gobet, Voogt, & Retschitzki, 2004). And many evidence shows that people can learn, retrieve, and use knowledge (called implicit) that they do not consciously know they have. (Metcalf, 2000). On psychological field, the mainstream sign concept was Piaget’s concept and Vygotsky’s concept. They study sign on language. The difference between Piaget’s concept and Vygotsky’s concept is the role of sign or language. Piaget believes children used sign or language to represent cognitive process. He noted everything around child represent what child understands object or the world around the child (Piaget, 1951). On the other hand, Vygotsky thought children used sign to form and shape cognitive process, example children think around to begin form and shape his/her cognitive process by told about what he/she will do and control themselves to follow he/she plan. He believes sign system created by societies and change by societies. (Vygotsky, 1987)

In my opinion, we can integrate Piaget’s concept and Vygotsky’s concept together in The game of Go education. Piaget’s concept used when we want to know what are the game of Go player think example let children play and ask them what are he/she thought. And Vygotsky’s concept used when we want to form and shape the cognitive process. And in this article, I will focus on Vygotsky’s concept to apply on the game of Go education.

Vygotsky concept of sign

Vygotsky thought human link the stimulus (S) – response (R) chain by the sign to intermediate link between S and R. (Figure 4) This process transfers the psychological operation to higher and qualitatively new forms and permits humans by aid or extrinsic stimuli to control their behavior from the outside and Vygotsky call higher psychological function or higher behavior when children can combine sign in psychological activity. After that, children will reconstruct and to occur

internally or the other hand the interpersonal process is transformed into the intrapersonal. This process call internalization. (Vygotsky, 1978). The rules become explicit while the roles and imaginary situation become implicit. These mechanisms called the higher mental function. The higher mental function has to exist first in an “intersubjective” (shared or distributed) state before it eventually becomes “intrasubjective”(individual) (Bodrova, & Leong, 1998). On the game of go, the game of Go teacher used sign to intermediate between initial stones and next pattern. The game of Go teacher used the stones or his/her finger to represent the next pattern with how to thought. The students will internalization to form his/her cognitive process by think around in young students and used his/her finger to intermediate between initial stones and how to thought. (Tajaroensuk, 2017).

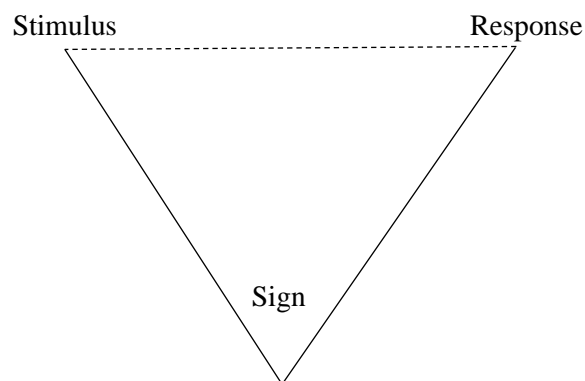


Figure 4: Structure of sign operation

Source: Vygotsky, 1978, p. 40

The internalization forms of behavior involves the reconstruction of psychological activity on the basic of sign operation. The role of sign is not only internalization. It has a specific role to perception. The perception of humans is not only colors and shapes, but also meaning. The structure of human perception could be figuratively expressed as a ratio in which the object is the numerator and the meaning is the denominator (object/meaning). On other hand on behavior, we also have the action/meaning ratio too. The action is initially dominant over meaning and is incompletely understood. It means children action more than understanding. And when children can detach the meaning of action from the real action. the children requires a pivot in the form of an action to replace the real one. The structure of action is inverted and meaning becomes the numerator and action becomes to denominator. Human behavior comes to depends upon the operation of meaning. The Child’s inverted meaning becomes the numerator and action becomes to denominator will uses time to response because they separate meaning to choose the action (Vygotsky, 1978). Tajaroensuk (2017), found when children play the game of Go at beginner level, they will play immediately when the opponent or teacher moves. Because they don’t understand what happens from the initial stones. But when they learned for a period of time., they will introspect before the move. Because the children understanding the initial stones on the board and know what happens now and what happens next. It means meaning guide the next move of children.

Zone of proximal and Scaffolding

Binet discovered the Chess expert player do not have “photographic minds” but their images were abstract, in the sense that specific details were often omitted. When ask the chess expert player to describe games played months or years previously, expert players were most likely to forget

isolated moves but they can remember ideas, patterns, plans, and the type of tactical finale rather than individual moves. (Binet. 1893. Cited in Hearst, & Wierzbicki, 1979). Also to the game of Go because most of the work on chess applies to any work on the game of Go (Shotwell, 2003). The game of Go was an abstract game and required abstract thinking to play this game (Brunner, 2019). The game of Go thought also like political thought. It differs from their thought about such well-structure features of the physical world as number, weight, and volume, spatial relationships, etc., in that the objects of thought are at a distance from the child rather than immediately accessible to him/her. In general, the children build their ideas from information that has already been processed in one way or another from interaction with adults (Connell, 1975). From these evidence can be concluded in two issues. First, It has a distance or gap between the game of Go concept and the game of Go novice thought. And second, the game of Go novice learned the game of Go concept from information by one way or interaction with adults.

Vygotsky explained these two issues. First, when children have activities, we will find some children can do these activities by themselves, some students need guidance from adults, and some children can not do with guidance from adults. Vygotsky calls the phenomenon is Zone of proximal (ZPD) (figure 5). The zone of proximal refers the gap between actual development and completed developmental (Vygotsky, 1978). On sign concept, Goldin (1996), found internal and external systems on sign. He presented two issues. First, he called internal representation. The internal representation refers to possible mental configurations of individuals, such as learners or problem solvers. And second, he called external representation. The external representation refers to physically embodied, observable configurations such as words, graphs, pictures, equations, or computer microworlds. Goldin explained internal representation and external representation were interaction together and external representation is not independent of internal representation.

And second, children participation with the guidance of more skilled partners allows children to internalize the tools and sign for thinking and for taking more mature approaches to problem solving that children have practiced, adult who is expert abilities more than children can handle difficult aspects of a task and organize children's involvement with features of the activity that are within grasp. (Rogoff, 1990). Adult or expert support can promote skills, knowledge and competency of students to higher level (Wood, Middleton, 1975; Rogoff, 1990). Wood, Bruner, & Ross (1976), called this/ support was scaffolding.

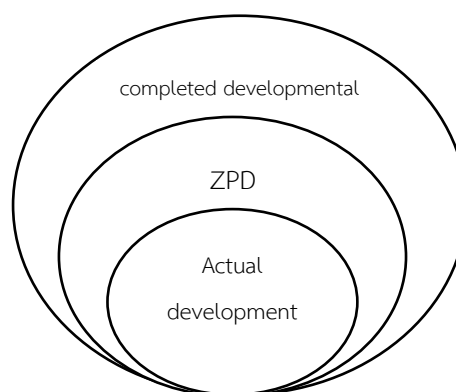


Figure 5: Zone of proximal development

Source: Adapt from Vygotsky, 1978, p. 84-91; Janevski, Demetriou, Mavroskoufis, & Hodolidou, 2013, p. 23

Wood, Bruner, & Ross (1976), described three characteristics of scaffolding. First, the expert knows the answer and knows how but other does not. Second, The acquisition of skill in the novice can be fruitfully conceived as a hierarchical program in which component skills are combined into “higher skills” by appropriate orchestration to meet new, more complex task requirements (Bruner, 1973 cited in Wood, Bruner, & Ross, 1976) And third, The expert can controlled elements of the task that are initially beyond the learner’s capacity, thus permitting him to concentrate upon and complete only those elements that are within his range of competence. Rogoff (1990), recommended the fourth characteristic of scaffolding. Rogoff said the expert avoid helping novice at points when they need the freedom to make their own decisions and, often, their own errors. Wood, Bruner, & Ross (1976), explained six steps for the scaffolding process. 1)Recruitment refers to the teacher find the problem solver’s interest in and adherence to requirements of task 2) Reduction in the degree of freedom refer to reduce the difficulty or level of problem for properly abilities of students 3)Direction maintenance refer help student concentrate with the object of problem. 4)Marking critical features refer give feedback to students about what he/she mistake 5) Frustration control refer help students regulate the emotion and 6)Demonstration refer used modeling or imitation to solve the problem.

On the game of Go, Yasuda, (2002) said some the game of Go teacher knows about the game of Go strategy very well, he/she would push the game of Go students to learn more difficult rules, and the students become to confused, walk away, some student will make hate the game of Go. Tajaroensuk, (2017) found the game of Go teacher use scaffolding technique to teach the game of Go student. He explained scaffolding six steps. First, on recruitment, the game of Go teacher will choose the game of Go content to promote abilities, skills, or lacks for the game of Go students. Second, on reduction, the game of Go teacher divides the game of Go lesson to hierarchical program or some the game of go teacher created initial stones to the game of Go students and continue from initial stones. Third, on direction maintenance, sometimes the game of Go teacher converse with the game of Go students between play the game of Go, ask “what do you think”, clue the game of Go student how to do at present situation, and praise when the game of Go students can do from the clue. Fourth, on marking critical features, when the game was finish, the game of Go teacher will replay this game again and give feedback about the game of Go student’s mistake or he/she doesn’t understand the game of Go some student move like why do you choose play this move. After the game of Go teacher understand the game of Go student strategy, if it is misconceptions he will explain to core concept. Fifth, on frustration control, some students lose or mistake when playing the game of Go. The effect frustrates the game of Go student. The game of Go would start the conversation to understand and teach how to cope it. And sixth, on demonstration, Studying from the game of Go professional play is often activity. The game of Go teacher will choose the professional game and teach on two techniques. First, Students should remember and replay this game on board. And second, the game of Go teacher will explain what the professional player thinks or the game of Go teacher understand from this game. In first activity was imitation because the student move like as professional game. And second activity was identification because the student learned ideas, strategy and kept the information to construct their knowledge.

Application semiotics with scaffold to teach the game of go

Previously, I described the core concept of semiotics, zone of proximal, and scaffolding. Next, I will explain how to integrate three concepts together in teaching the game of Go education. Zone of proximal and scaffolding were main ideas for teaching. Semiotics was embed in scaffolding technique. Novice play and learning made Zone of proximal. Expert will guide or scaffold to help novice(Vygotsky. 1978; Bodvora, & Leong. 1998). Semiotics will help to understand cognitive process because every move represent the cognitive player. Other hands we can use the game of Go stone to shape and form cognitive process or higher order thinking. On interpretant of Semiotics concept, it can help in two ways. First, we can use to check the game of Go Novice understand or not

understand. And Second, we can use to shape or form cognitive process by use sense. For explaining, I chosen simple rules by the liberty and capture rules.

Using sign for Checking understand or not understand

From Piaget's concept, sign was represent of cognitive process. Initial stones and every move represented partial cognitive process. We can know the cognitive process from observation and interviews to know what player think. On the game of Go moves the stone on the intersect. On the line out from the stone to intersect called liberty at triangle point. White gets four liberty (Figure 6). Black try to capture this white stone, black must close all liberty of white. If black close all white liberty, black can capture this white stone (Figure 7). Sometimes, the game of Go novice tries to capture but they don't play like figure 7 to capture white. They move at 1 like figure 8.

In figure 8, black move at 1, which means black cannot capture white. We don't know or not sure purpose of player because of the complex possibility of the game of Go. The reduction possibility of the game of Go by the rules can help to scope and understand human thought. We can reduce the game of Go rules from win by territory to win by capture to reduce the purpose and scope cognitive process. In fact, purposes of the game of Go can separate four purposes, first, try to capturing opponent stones, second, save your stones from opponent capturing, third collect your territory and fourth reduce opponent territory. The purpose of the game depends on the rules of game and understanding of player if we adapt the rules we can reduce possibility, purpose, and understanding of player (Upton, 2015). From Tajaroensuk (2017), he asked novice players and found some issues when novice players learn only liberty concept. The novice player told he/she tried to capture the white but they don't move at triangle point to capture. He assumed the novice player lack problem solving skill process. these were confliction between the object and the solution. He noted, why the novice player moves like random pattern may be from two issues. First, they lack sub-object or sub-goal. Novice players who don't set any object or goal The main object of the game of Go was surrounding territory more than opponent. In the game of Go players can surround territory two ways by capture the opponent's stones and surround the territory. These two ways were sub-goal on the game Go. And many novice players confuse between sub-goal on the game of Go. And the sub-goal depend on initial stones on the board. The novice player must learn how to understand the situation for set sub-goal. And Second, they lack problem solving skills. Many the game of Go novice player set them goal by capture but they move on other intersect than capture the opponent stones because they cannot made the solution or decided solution base on sub-goal. It means they lack problem solving skills.

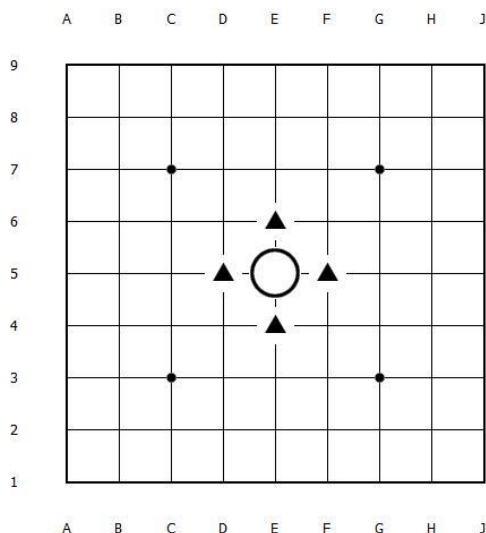


Figure 6 Liberty

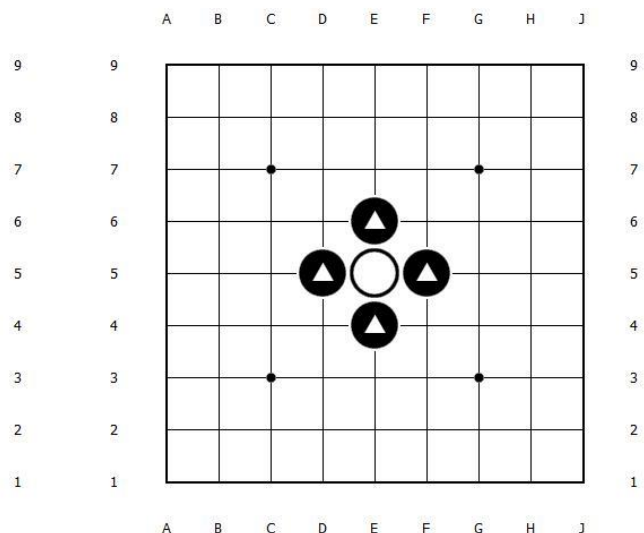


Figure 7 Capture

Using sign to shape and form cognitive process.

However, some novice players not understood the liberty and capture concepts. They play at 1 immediately after the opponent move, like in figure 8. They don't capture at triangle point because they don't understand. Now, the zone of proximal happen, the game of Go teacher will guide how to do by making the possible move. The game of Go teacher can make the possibility by using his/her finger (now is a sign because the finger refers to play here) to make the possible move at triangle point (figure 9), and observe the time response of student. If students don't move immediately and thought before move, it means the meaning becomes guide his/her action. After that when the student can capture, the teacher explains again why he/she can capture by count liberty and how to close liberty. And teacher shows a comparison between Figure 10 and Figure 11 to understanding the quality and law of liberty and capture. These steps were interpretant by start with possibility, fact, and laws of sense. Tajaroensuk (2017), found two phenomena like semiotics. First, many the game of Go teacher used finger or language to guidance and Second, The game of Go students who are children used think aloud when they create a solution or the game of Go student used his/her finger to imaging the next move when he/she doing Life and death(Go problem).

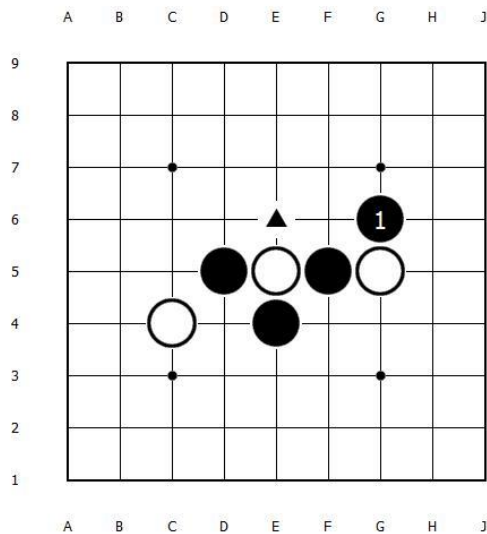


Figure 8 Don't capture

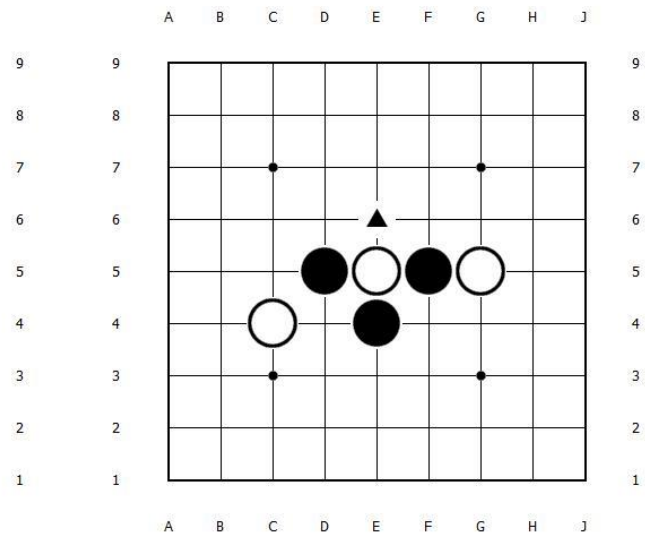


Figure 9 Find capture point

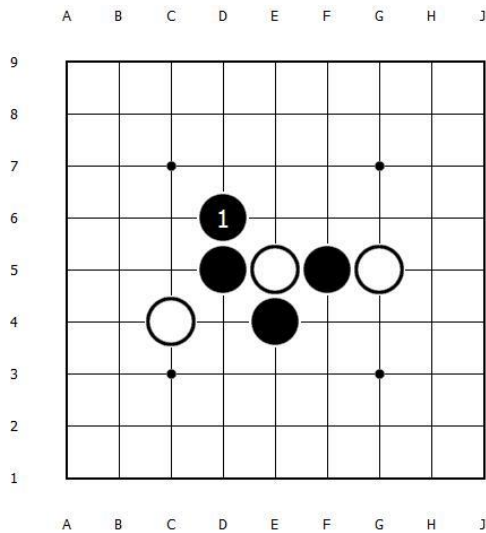


Figure 10 Can not capture

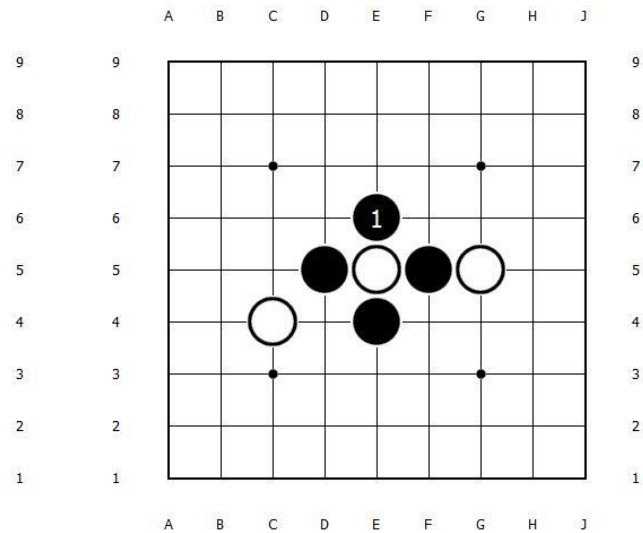


Figure 11 can capture

Conclusion

the game of Go concepts is abstract thinking. In the game of Go novice players learn the game of Go by interaction with expert or other players and shape the cognitive process. Novice players can misunderstand because they learned core the game concept and construct knowledge from interaction with other the game of Go player or the game of Go teacher. These misunderstand created the gap between student concept and core concept or Zone of proximal. The game of Go teacher was very important to help or guide, what is the core concept or how to solve a problem. The game of Go teacher teaches by scaffolding technique to promote understanding between student concept and core concept. The game of Go novice player learns from scaffolding with the game of Go expert player and transforms interpersonal process to intrapersonal process. But only the scaffolding technique is not enough to help understanding the game of Go concept. Because the core of the game of Go concept is abstract on a complex pattern.

Signs are mediate between the game of Go pattern and the game of Go concept. Signs link understanding the game of Go pattern and the game of Go concept together. Sign like language, gestures happen from human creates and interaction together. Sign relates with meaning and meaning regulates action. With different meaning Children will choose the meaning for appropriate action. On teaching, the game of Go, teacher use sign to immediate between the game of Go stones and concept and construct the understanding of the game of Go concept. Sign have three dimensions, representamen, object, and interpretant. Interpretant refers to the sense made the sign and can divide into three subdimension, possibility of sense, the fact of sense, and the law of sense. On scaffolding, The game of Go teacher can apply semiotics in teaching with scaffolding. We can apply semiotics by uses sign to make the sense. The game of Go teacher creates the possibility move by use sign like finger or language to novice players when they need guidance. After the novice player understanding from teacher helping, the novice player will not response immediately. They try to find appropriate move and answer the sub-goal. Teacher will explain the fact and reasoning to make the understanding.

Suggestion

This article showed how semiotics supports psychological theory to explain the cognitive process of the game of Go. Previously we believe, humans find the solution in the game of Go by intuition. But on semiotics views, intuition is semiotics. Other hands on psychology views, semiotics, or sign were two roles for represent cognitive process and form cognitive process. The integration between sign from semiotics and scaffolding from psychology can help to understanding and basic principles to create intervention. This finding can help researches to create experimental research designs. On education, sign was intermediate between stimuli and responses. It means sign is a very important variable to helps understanding and construct novice knowledge. Teacher uses sign when he interaction with novice player. With interpretant, it can help us easily to form cognitive process from sense of sign. And at last, the article shows ideas on how to integrates semiotics with psychology to research. it means we can integrate three paradigms between objectivism (experimental design) constructionism (Vygotsky theory) and subjectivism (semiotics) together on same topic.

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METHODS FOR IMPACT EVALUATION: A CASE ANALYSIS ON A COIL COURSE DURING THE PANDEMIC 2020

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Abstract

Virtual Exchange (VE) is not as recent a development, yet it has gained a rapid attention during the COVID-19 pandemic crisis, particularly in the past year (2020). Just to take Japan for an illustration, Kansai University and its initiative to start Japan-COIL Association membership has increased by 150% in the past six months in 2020, which implies strong interests and efforts to install this new international educational approach. Collaborative Online International Learning (COIL) or VE has shown a good growth in community in terms of practitioners of it now, the field now faces a need for maturity in several significant areas in order to realize its potential further. One of well desired areas is to identify methods to evaluate the impact of this new pedagogy, in terms of both individual and organizational dimensions. This paper reports on what IIGE (Institute of Innovative Global Education) at Kansai University has worked on thus far by experimenting various testing tools on its COIL/VE courses to find out their compatibility, by taking one course called UMAP-COIL Joint Program 2020 as an example. We employed our own survey, BEVI test, and OPIc test, and original survey to measure students' individual growth over an 8-week long COIL course program. Our analysis suggests that the COIL practice has "shaken up" their original core value systems, and we were able to observe positive development of their transversal competencies. The paper also indicates future suggestions to improve a multilateral COIL course.

Keywords: COIL (Collaborative Online International Learning), Virtual Exchange, International Education, Internationalization at Home, BEVI (Belief, Events, and Value Inventory), OPIc (Oral Proficiency Interview computer-based)

Introduction

While the range of new developments in technologically mediated higher education have been of considerable utility in the context of the COVID-19 pandemic, it is important to ensure that processes and practices are also developed alongside the implementation and delivery of virtual exchange and COIL based initiatives to incorporate appropriate evaluation mechanisms. Merely assuming that the provision of some form of virtual exchange, COIL program or online learning component for a given course is likely to accrue student learning and experiential benefits is unlikely may be misguided. While some courses and programs may be well suited to various forms of virtual exchange, it may be that other offerings are less suited, or require careful design or management to deliver tangible benefits. It is to this purpose that we undertook the following evaluation of a COIL based program in order to explore the utility and compatibility of two measurement tools (the BEVI and OPIc) to identify the possible impacts of a specific COIL based experience. A secondary objective was to explore how a COIL experience might bring about different impacts to students in terms of their intercultural competence development.

In the recent years, particularly in 2020, we have observed a growing reliance on online learning and forms of Virtual Exchange (VE) due to the COVID-19 pandemic, there has been a significant redirection of resources by higher education institutions towards establishing best practice policies and procedures for the implementation and delivery of high quality technologically mediated education.

As just one example, consider that Kansai University, a large private university in Japan, formed a new Institute of Innovative Global Education (IIGE) several years prior to the onset of the COVID-19 pandemic with a core mission to expand the range of VE course and program offerings at Kansai University and at other institutions throughout Japan. One of the initiatives undertaken by the IIGE was to increase the profile of Collaborative Online International Learning (COIL) that had been employed for several years at Kansai University, and to expand and support the growth of a Japan-COIL Association for those institutions interested in developing and implementing COIL based courses and programs in their own institutions. The membership of this association increased by over 150% in the second-half of 2020 and clearly represents a dramatic increase in the interest of domestic institutions to undertake efforts to increase their ability to furnish their stakeholders with greater access to viable forms of VE and COIL related activities.

More specifically, and in order to operationalize these objectives, we pursued to identify differences in impact by COIL experience, particularly between a Japanese student group and an international student group participating in the same program. Another aspect of investigation is to find out whether Japanese students' communication proficiency in English has improved after completion of a COIL course. VE and COIL courses are mostly conducted in English as their communication medium, which was purposely designed in the curriculum so that local Japanese students have authentic opportunity for communication in English as their L2. Lastly, we are also in need to learn students' reaction against such a novel pedagogy installed in the university curriculum. Bringing in "overseas peers" by using social media and other technology in a classroom is still a fairly novel idea for many; COIL certainly replaces a traditional lecture style teaching and learning with student centered, action-based style. How students in a VE or COIL course feel satisfied in such a paradigm shift is an important matter to confirm, because this methodology is new.

Literature Review

1. Virtual Exchange /COIL

Most VE programs share some common characteristics: they use web-based videoconference tools for synchronous communication, and they use written or recorded message apps for asynchronous communication. Most of the programs make use of combination of both methods. Many programs involve "projects" that require participant collaboration through small groups. Practitioners use several different terms to describe their programs in different parts of the world. To name a few, there are "global digital exchange," "collaborative online international learning," and "telecollaboration," among others. At Kansai University, COIL is recognized as the official term. This is precisely so to emphasize the importance of higher education level learning such as collaborative learning, engaged learning, or challenge-based learning. While cross-cultural understanding may dominate some of the virtual exchange program, COIL assumes a team-based project as a part of its pedagogical scheme. In foreign language education, Virtual Exchange has been referred to as "telecollaboration", e-tandem or Online Intercultural Exchange.

As part of their internationalization at home (IaH) initiatives, a growing number of higher education institutions are engaging their students in Virtual Exchange beyond language learning. The COIL model (as it is known today) was actually developed in 2004 by Jon Rubin and his colleagues at

the State University of New York (SUNY) network of universities (Rubin & Guth, 2016). While foreign language telecollaboration, for example, usually takes language and culture as the content, COIL adds a collaborative and comparative perspective to the subject content by creating a shared syllabus which is worked on by all participating classes (O'Dowd, 2017). In recent years, COIL practioners and their community has become one of the largest Virtual Exchange networks.

2. Research on learning impact by COIL

Educators who have participated in COIL projects have reported increases in students' intercultural awareness as a result of structured communication with students of differing nationalities whose cultural attitudes and practices are often different than their own (e.g., Guth & Helm, 2010; O'Dowd, 2007). COIL practice combines international exchange, global citizenship education, and online education through a pedagogical model in which the respective students from both domestic and overseas classrooms collaborate (Rubin & Guth, 2016). Educators who have participated in COIL projects have reported increases in students' intercultural awareness as a result of structured communication with students of differing nationalities, whose cultural attitudes and practices are quite often different than their own (Guth & Helm, 2010).

Approaches in foreign language education have explored the development in qualities in language learners, such as foreign language competence (O'Rourke, 2007) as well as aspects of intercultural competence (Belz, 2003). To our knowledge, there are very few results reported in the literature that explicitly focus on examinations of other domains of learning impact brought by COIL and/or VE experience other than anecdotal or episode-based qualitative case studies in the current field. Our project is to remedy, in a small way, that gap in the literature.

One domain of such learning impact requested for a visible illustration for the growth relates to transversal competencies (Care & Luo, 2016). Transversal competencies refer to a number of important competencies that can be learned and that everyone requires to successfully adapt to changes and to lead meaningful and productive lives. Within the holistic skills development process, transversal skills become the base to add on occupationally specialized skills (technical and vocational skills). They include critical and innovative thinking, interpersonal skills, global citizenship, and media and information literacy (ERI-Net Research Program, 2013). If we consider that the world is facing any number of significant socioeconomic changes and emerging challenges due to the COVID-19 pandemic, we might understand that these multi-faceted challenges serve to motivate educators as well as stakeholders of other sectors to reconsider the value of transversal skills today. Assessment of transversal competencies is also being re-visited. There have been intensive efforts to assess competencies such as problem solving (e.g., OECD PISA), collaborative problem solving, and information and communications technologies skills at large-scale for the education sector (Care & Luo, 2016), other competencies have not yet received global attention. Our project aims to explore such assessment in relation to COIL and/or VE experience by applying some measurement tools, namely, BEVI and OPIC.

This study takes a case analysis approach to examine the above-mentioned research questions. A COIL program delivered during summer 2020 called the UMAP-COIL Joint Program 2020 was chosen as the analytic target in this paper. The details of this particular COIL program are explained in Table 1. It was an 8-week long COIL program which included 19 Japanese and 121 overseas students from 13 different countries. It featured a COIL design with peer group opinion discussion sessions, a collaborative project undertaken in a small group (max. of 8 students per a group) over 4 weeks, and a final team-presentation. We believe that students' skills and competencies should be assessed using a mixed-method approach through direct evidence, namely critical reflection and performance, as well as indirect evidence using self-report measures such as surveys or

inventories (Deardorff, 2011). In this regard we applied various measurement tools, namely the BEVI and OPIc test, in addition to qualitative analysis of students' reflection writing on the COIL groupwork experience, in order to understand the possible benefits and disadvantages that this particular COIL initiative afforded student participants.

Table 1: UMAP-COIL Joint Program 2020 Program Overview

Outline	Details	Tools
Pre-Program Ice Breaker	Self-introduction video making/commenting to each other	immerseU
Lectures and Virtual Exchange Activities	July 27th "Introduction to SDGs" Don Bysouth Specially Appointed Associate Professor, Kansai University August 3rd "Design for Social Regeneration after Mass Disaster" Kate Sedwell, Co-Founder & Director of Atlantic Pacific Idrees Rasouli, Founder and CEO of X-Crop August 10th "Love our ocean" Kate Sedwell, Co-Founder & Director of Atlantic Pacific Robin Jenkins, Co-Founder of My Mizu August 31st "Business for SDGs". Jiun-Yan Wu Specially Appointed Assistant Professor, Kansai University September 7th "Popular Culture and SDGs" Don Bysouth Specially Appointed Associate Professor, Kansai University	Zoom immerseU Microsoft365 Forms
Group PBL Task	August 10th through September 14th (4 weeks) Task: identify a social business organization and critically analyze the case	Padlet/SNS
Final Presentation	September 14th 15 minutes each group with 3 guest evaluators	Zoom
Post-Program Reflection	Self-and Other-review of own team and groupwork (Writing)	immerseU

UMAP stands for University Mobility in Asia and Pacific; it is an international consortium with over 200 universities in the regions as its members. While a typical COIL course consists of two universities (one domestic and the other overseas) to have the students from both institutions learn together in project-based format, the UMAP-COIL program takes a multilateral approach. It provides a common curriculum designed and carried out by a particular institution, and the students from the member universities can participate in the course to meet the other peers from other countries and regions. This particular way of COIL brings a wide variety of institutions a chance to be a part of virtual exchange opportunity at once. In addition, group composition from such a diverse pool of students becomes a valuable environment for students to truly immerse and work together with the diversity. This unique feature of the COIL course design is worth marking a remark.

Assessment Methods of this Study

1. BEVI (Beliefs, Events, and Values Inventory)

The BEVI (Beliefs, Events, and Values Inventory) is an accessible, adaptable, and powerful analytic tool to measure transversal skills and more (Shealy, 2016). It can be used in a wide range of settings, including an educational intervention such as COIL or VE. It not only enables individuals to learn about themselves, but also generates a profile of a particular group, for example a

COIL class. When it is taken by the same participants it can furnish a Time1-Time 2 comparison profile that may provide for data to assist in the analysis of high impact learning, with any changes in the profile possibly related to particular learning experiences. This study utilized the BEVI to identify learning impact among the students in our COIL courses. As a part of their pre-COIL and post-COIL participation process, all students had taken a BEVI test. The inventory is available in both English and Japanese, and the students were free to choose the language of their preference in this study.

Consider that the BEVI can be understood as a measure that provides for an indicator of 'global identity' (Wang et al., 2020), and as such represents an appealing evaluation measure for those interested in developing and delivering international learning experiences. Higher scores on each of the BEVI's 17 scales reflect greater degrees of a range of psychological adaptability, and the scores from each scale comprise 7 domains that reflect functioning across a range of social and psychological contexts given an individual's unique life experiences, core beliefs and values, and needs. Importantly, the BEVI provides for analysis of cohorts of students that can be undertaken before and after a given learning experience and can be assessed at the general or aggregate level, in addition to providing a basis for more fine-grained examinations in order to answer questions relating to the suitability of learning experiences.

2. OPIc (Oral Proficiency Interview-Computer Test)

OPIc is an oral interview proficiency test that features computer-based administration. A test taker talks to “Eva” - the OPIc avatar as the tester - and the learner records themselves upon answering questions asked by her. ACTFL Certified OPIc raters then evaluate the recordings. These raters are highly specialized language professionals who have completed a rigorous training process that includes the demonstrated ability to consistently rate samples with a high degree of reliability. Figure 1 illustrates the rating criteria for OPIc used. The Japanese students (total of 18 students) have taken OPIc test (English).

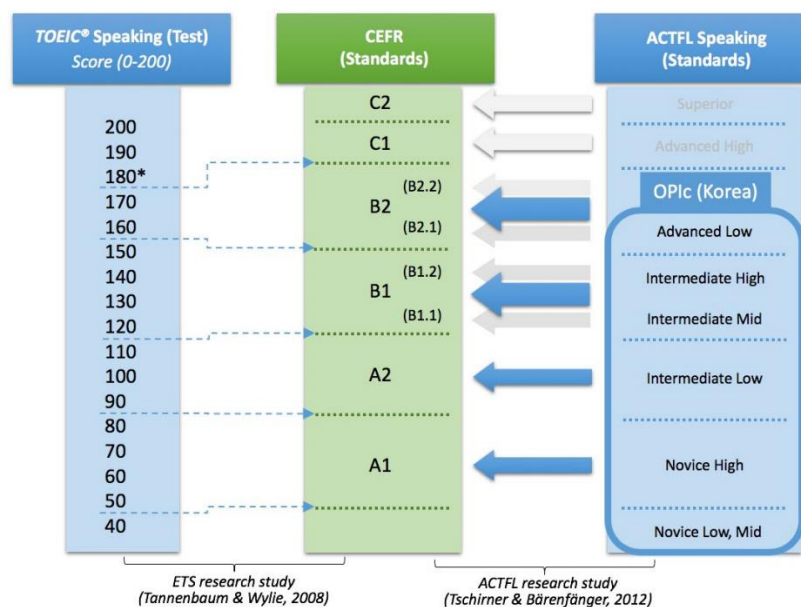


Figure 1: Official ACTFL Rating (Source: Qu, Schmidgall, Cid, & Chan, 2019)

3. Original Survey

Results of the Study

1. BEVI results

While the full detail of the data the BEVI profiles provide would require another article to properly address the full range of psychometric findings, here we provide a brief analysis of a restricted set of domains in this paper in order to compare COIL groups (UMAP-COIL and Fall semester COIL) and non-COIL group.

1.1 COIL group (UMAP-COIL intensive) vs. COIL group (semester-base) comparison

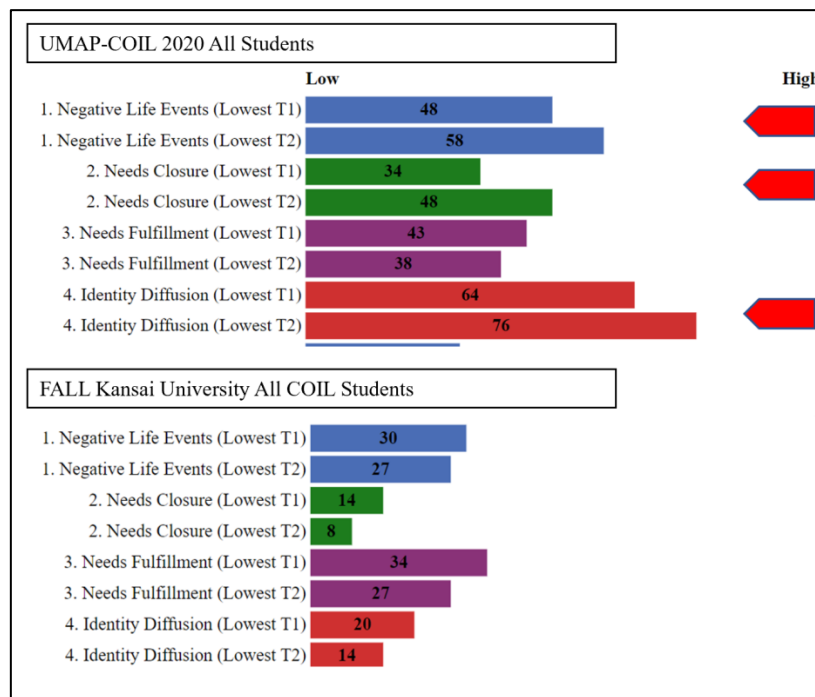


Figure 2: Comparison Between Two Groups by Formative Variable and Fulfillment of Core Needs

Figure 2 provides for a comparison between BEVI scale scores representing the lowest scoring one-third of all participants at T1 and T2 for the BEVI domains Formative Variables and Fulfillment of Core Needs. The Formative Variables domain comprises the Negative Life Events scale, which may reflect such things as having a difficult childhood, life conflict or struggles, experience of regret. The Fulfillment of Core Needs domain comprises the Needs Closure, Needs Fulfillment and Identity Diffusion scales, and taken together can be understood as reflecting the range to which an individual has had their basic core needs such as attachment and affection from self and others met in a “good enough” manner. What can be clearly observed is the overall higher scores for the bottom scoring one-third of UMAP-COIL students compared to the Kansai University COIL students. Here, note that for interpretative purposes the lowest 30% of scorers can be understood as representing ‘Low Optimal’ scorers (Wang et al., 2020).

If we consider that Identity Diffusion may stand as a proxy for ‘global identity’ (Wang et al., 2020) it would appear that the lowest scoring UMAP-COIL participants experienced significantly higher levels of Identity Diffusion both before and at completion of the program – and this for a program that explicitly was developed in order to facilitate opportunities for the

development of global mindsets and identity development. By comparison, the lowest scoring Kansai University COIL students, while having low levels of Identity Diffusion to begin with, saw a further reduction by the end of their program.

We can also observe that the Negative Life Events score increased for the lowest scoring UMAP-COIL students across T1-T2, while for the Kansai University COIL students there was a decrease (from a lower initial level). Taken together with the previous findings this may suggest that for a ‘Low Optimal’ cohort of students (with regard to BEVI Full Scale Scores) the experience of participating in high impact COIL based programs may require additional support and facilitation, and is perhaps reflective of the additional challenges and difficulties faced by students undertaking VE during a pandemic.

1.2 Japanese student group vs. International student group comparison in UMAP-COIL Joint Program

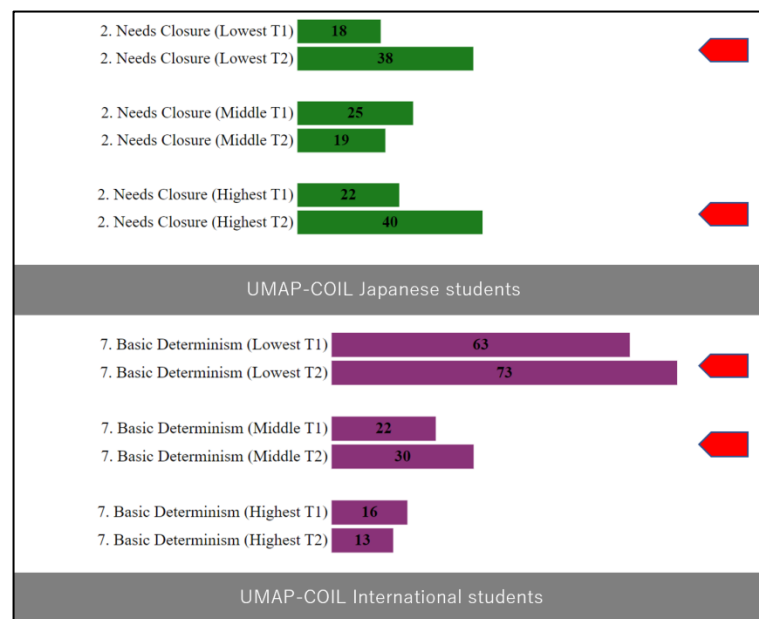


Figure 3: Comparison between UMAP-COIL Japanese vs. international participants

In Figure 3 the BEVI scale scores for Needs Closure and Basic Determinism are reported for the lowest, middle, and highest scoring participants for the UMAP-COIL Japanese students and International students. Here we provide this data in order to demonstrate that the BEVI can provide a level of granularity that is absent in many psychometric measures that may bear on evaluations of multifaceted international learning. For the UMAP-COIL Japanese student participants we can observe that for the ‘Low Optimal’ and ‘High Optimal’ students a significant increase in Needs Closure from T1 to T2. This reflects an increase in reported unhappy experiences, conflictual family dynamics and related issues. However, note that for the ‘Middle Optimal’ students there was a decrease in Needs Closure from T1 to T2. We highlight this finding to suggest that the BEVI might be useful in reflecting otherwise invisible influences on our COIL and VE undertakings in that most forms of program evaluation take a much narrower range of evaluative data, for example course grades and limited student feedback focused on program content and delivery. In this case, the Needs Closure findings may be reflective of students becoming more aware of a relatively negative set of local and global concerns and issues as part of their COIL participation, and their activities as

mediated by the requirements of pandemic control measures (e.g., online learning, social isolation, disruptions to local student life).

What is quite striking about the Basic Determinism data is the significantly higher scores for the 'Low Optimal' group of the UMAP-COIL International students in comparison to the 'Middle' and 'High Optimal' scoring participants. The BEVI scale Basic Determinism is one of the two scales that comprise the domain Critical Thinking (the other scale being Socioemotional Convergence). This scale reflects the extent to which a person may prefer simple explanations for differences and behaviors, with high scores reflective of greater degrees of inflexibility. Here we can see that for the 'Low Optimal' and 'Middle Optimal' students there was an increase in Basic Determinism across T1 to T2 (with the 'Low Optimal' group having relatively high scores at T1). However, for the 'High Optimal' students there was a decrease in Basic Determinism across T1 to T2. In short, it may be that for students with higher levels of flexibility with regard to critical thinking and related domains, they may be able to better exploit the opportunities afforded by VE and COIL related activities (and in the disruptive context of the ongoing pandemic).

1.3 COIL or non-COIL students analyzed by gender disaggregated T1-T2 results

Examining the BEVI results with gender disaggregated provided us with an interesting finding that we would like to briefly canvass here. Within the fall semester COIL courses the male student group had a larger percentage change (T1 vs. T2) across a number of BEVI scales compared to the female group. For example, the average percentage change in scaled scores across T1 and T2 for the male group was -1.7% (with a range of -67.9% to 40%) while the average percentage of change in scaled scores for the female group was -0.8% (with a range of -42.9% to 33.3%).

Taken together, these results suggest that provision of a COIL element in a regular course at Kansai University has the potential to provide a number of significant enhancements for the student learning experiences, and moreover that differential benefits may accrue on the basis of gender. For example, COIL based courses may provide male students with enhanced opportunities and experiences to increase their social and psychological functioning in domains related to critical thinking, concern for both self and others, and self-reflection and openness to experience. These are of clear importance for fostering greater employability of graduates in a rapidly globalizing employment environment.

2. OPIc results

2.1 UMAP-COIL Joint Program results

18 Japanese students have taken the OPIc test twice: Time 1 (T1) took place in later July, and Time 2 was done in later September, right after the final presentation of the program finished. Table 2 shows the result. There were two participants who were not able to take the T2 test, thus the total student number in the T2 result is different from T1. Overall, we can observe some improvement in their oral proficiency in English at T2 results. N for Intermediate High evaluation increased from 1 to 3, and instead, Intermediate Mid evaluation has decreased from 9 to 6. At T2, there is no student with Novice Mid evaluation. Despite a student whose score at T2 went down, their level has gone up or sustained the T1 level. In just over 8 weeks, given that this is not a physically available study abroad program in a traditional sense, we can conclude that online collaboration opportunities, both synchronous and asynchronous, show a promising impact to improve English oral proficiency in a short span.

Table 2: OPIc Test Score Results From UMAP-COIL 2020 Joint Program

T1	N	T2	N
IH	1	IH	3
IM	9	IM	6
IL	4	IL	4
NH	3	NH	3
NM	1	NM	0
SUM N	18		16
UP/DN率			
TOTAL	46.20%	2 UP	3
		3 UP	1
		1 UP	1
		0 UP	10
		1 DN	0
		2 DN	1

2.2 2020 UMAP-COIL Joint Program vs. 6-week semester-based asynchronous COIL program

IIGE had generated another set of OPIc scores which could be used as a comparison with the above results. In 2017, a total of 28 students had taken the same test after a COIL course. The course took place for approximately 4 weeks, and the collaboration was done with a single overseas institution at a time rather than as a multiparty collaboration as with the UMAP-COIL program.

Approximately 40% of the test takers had at least one score up. One student had a lower score in the T2, and the rest remained on the same score. One student had two scores up, from Intermediate Mid level 1 to Intermediate High. The others who started with Novice High reached Intermediate entry level, and those who started at Intermediate Mid also improved their communication proficiency.

The ratio for growth in proficiency in UMAP-COIL program was 46.2%. The length of collaboration overall was twice as long as the 2017 COIL course. A group project was also completed over a 4-week period, and the students in each group were in frequent contact with each other throughout. Depending on the length and content of a COIL course design, we can make further interesting observations for a research. In this paper we are limited to simply compare two scenarios, yet this is worth making a remark for a potential investigation.

3. Original Survey

We asked all the participating students of the program to answer our original survey immediately after the program finished in September. Total of 83 students have responded. There were 10 Likert-scale questions, asking of their satisfaction level of the program. We also asked volunteer students from the Japanese student pool for an interview to learn more about their answers.

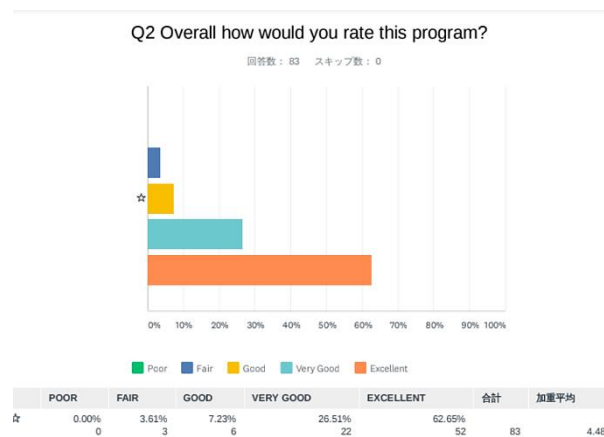


Figure 4: Overall satisfaction rating by the students

As Figure 4 indicates, students' satisfaction rate was quite high over all. The comments received along with the survey also indicate that they had individual growth from the program. For instance, one student from Japan said *"I learned to be accepting of different opinions. Everyone has different opinions because he or she has a different angle of looking at things. Even cultures and languages foster an immense noteworthy influence on our mindset. Despite [our differences], we should learn to respect [others' opinions] and try to put ourselves in other people's shoes."* Another from the international student pool said *"Participating in lectures gave me another way of self-fulfillment. Not just that, the topics from the lectures are really relevant. Its relevance is life-long. I realized that knowing others perspective, not just yours, and your own country made it more credible."* It is good to discover that there were various discoveries and learning among the participants, and this survey result has confirmed us that such a room for individual learning growth seems very effective.

Discussion and Conclusion

In this paper we examined results drawn from two measurement tools that might assist in our understanding and measurement of possible learning impacts afforded by COIL practice. Both the BEVI and OPIc demonstrated a generally positive impact of COIL on both language acquisition and a range of psychosocial domains. OPIc was a useful measure by which participants' oral communication skills could be identified, and was able to capture the change in student skill set when compared to Time 1 performance. As a caveat for our recommendation of this test however, at least from an administrative perspective, is the significant cost. Each test-taker would have to bear costs of approximately 10,000 yen (approximately 96.00 USD) for two tests per person. While the test certainly appears to be of effective utility in the context of the present small-scale research evaluation, the scalability of this assessment method to an entire institution may come with significant challenges. In this regard, OPIs might best be utilized as a sampling assessment method, in which a randomly selected pool of target participants only take the test (Time 1/2) in order to generally identify the whole group profile. When the whole target group consists of students with a similar level of oral proficiency, this approach can be applied with validity (Suskie, 2009).

The use of the BEVI provided us with multi-faceted data result, which would be very difficult to obtain otherwise. It has strengths in portraying test-takers intercultural and interpersonal competencies. With BEVI, we were able to detect the internal layers of participant types within a single set of program participants. While it is highly informative, we also consider that the use of other assessment approaches to further explore transversal competency development along with the



BEVI. The 17 metrics in BEVI provide the backbone for our interpretations, and we can most likely assume that having high-level score results in BEVI would assure high level transversal skills. Yet by itself, the BEVI is an indirect assessment measure, thus it does not (and is not made to) illustrate direct links to specific competencies. A further research to utilize multiple assessment methods is desired.

Was the program seen as a positive learning opportunity by the actual participants themselves? The post-program survey answered by the participants of the program indicated that over 90% of the students have said they would recommend this program to their peers, despite their “challenging” experiences. The participants are clearly aware that challenges are “good” for them, and they are able to make a good learning out of, as the educators and designer of this program, this is a very much desired result from mature, internationalized young adult learners.

Based on the results of the investigation in this study, a few suggestions for improvement of the course can be generated. BEVI shows that number of High Optimal pool of Japanese students was very small BEVI results imply that there needed an additional pre-program orientation for the Japanese students. This may imply that the Japanese students were not familiarized enough on the topic of the program (SDGs) on a par with the international students. Furthermore, High Optimal pool of students in the Japanese student pool showed impact on basic aspects of global mindset, such as needs closure, while the international student pool in the same category had shown small changes before and after the program. This result also confirms that the domestic local students in Japan have much less of opportunity to encounter and be immersed in a diverse group like UMAP. For a better program design, it is important for us to be aware of different level of needs for orientation by their backgrounds. Another suggestion based on the results of this study stems from the original survey. The result indicates that the learners felt the it met the objectives of the course well (over 90% agree or strongly agree), yet there were small number of them not satisfied with the online platform used for the course(roughly 30 % neutral or disagree). For the improvement for the future course, the user-friendly guidance for the platform (LMS) can be provided in a better way.

Lastly, we would like to leave a disclaimer that this paper only highlights some of the analytic findings from the investigation using the two measurement tools. At IIGE/Kansai University, a more comprehensive report is under preparation, and we would like to draw the readers’ attention to the prospective publication in the near future.

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PROBLEMS AND GUIDELINE FOR SUPERVISING AND COACHING INTERNSHIP STUDENTS IN WORK-BASED LEARNING (WBL) PROGRAM

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Abstract

This research was aimed to study problems on supervising and coaching internship students in Work-Based Learning (WBL) Program including the provision of solution for the problems under the Bundit Premium Project. Focus Group was used for data collection consisting of 4 categories of related participants. There were 21 supervising and coaching teachers, 10 trainers, 4 administrators and staff of Premium Graduate Project, and 10 experienced teachers in WBL Program from Panyapiwat Institute of Management. The research found that the problems on supervising and coaching internship students were about the communication and information interacted with students. Self-adjustment to working environment, patience, responsibility, teamwork and relationship, and dormitory were also found as the problems including personal problems. The solution for those problems was to provide channel and network for communication and information, coaching by the supervising, and coaching process including additional activities to promote the patience and self-problem solving.

Keywords: Problem Solution, Student's Supervising and Coaching, Work-Based Learning, Bundit Premium Program

Introduction

Globalization became significant coming along with borderless society. Migration of people, exports and import of goods and services, capital flow and investment, sharing of knowledge, technology advancement, and circulated information were freely flowing. This enforced the competitiveness in the world marketing. New economic countries have increased their competitiveness such as China, India, Latin America, and Vietnam. Those countries were empowered with cheap labor and different campaigns to attract international investment for the better industries of their countries leading to higher competitiveness in middle level industries. However, economy and politics were also vulnerable leading to frequent economic crisis in different regions of the world (Office of the National Economic and Social Development Council, 2017). In regarding to the changes of economy and society, different countries faced the need to stipulate the direction on manpower development for acquiring higher competency with more specific skills whereas the unskilled labor and low skilled labor would be replaced by robots and new technology (Office of National Education Council, 2017). This phenomena was seen through to the Sustainable Development Goals of the United Nations (The Global Goals) focusing on educational accessibility and opportunity, quality of education in connecting to the need of labor market by promoting public private partnership. Regarding this, there would be necessary to understand and collect data on the need for competency in industries and the necessity of life-long learning for continuous career development. According to THE ASEAN Work Plan on Education 2016-2020, it was focused on



the utility of ICT, the support and promotion of participation for all concerned for producing manpower to serve the need of labor market for sustainable development, the strengthening of higher education by development of quality assurance mechanism and its efficiency, and the promotion of networking of university and private sectors (Office of National Education Council, 2017).

Thailand has faced the shortage of qualified manpower insufficient for the country development and unable to serve the need of industries (Office of the National Economic and Social Development Council, 2017). Based on the statistics of the Office of the National Statistics, it showed that the need of the country manpower with Bachelor's Degree was 3.6 Million, Master's Degree was 460,000 people, in a total of 4,100,000 people. The shortage of manpower for those education backgrounds was only on some particular needed fields of studies. Others were unemployed due to their studies or fields of studies were not needed by the labor market (Office of National Statistics, 2017). Average Labor Productivity of Thailand was increasing annually at 2.9 percent which was lower than neighboring countries such as Malaysia with a double higher average labor productivity and Singapore with 5 times higher average labor productivity. Skills and competency of manpower was unable to serve the need of labor market or mismatching. Production industries and services industries were still based on low skilled manpower opposite to the higher education manpower. Presently, graduate manpower was highly unemployed at 60 percent of those unemployed while the labor market needed manpower from grade 12 at 64 percent of all needed manpower. The survey in 2015 on the perspectives of industries on manpower, it revealed that both skilled and semi-skilled manpower of Thailand was lower than the expectation of industries (Office of the National Economic and Social Development Council, 2017).

CP ALL (Public) Company Limited has foreseen this phenomenon and to solve the problem of Thailand by establishing Bundit Premium Project which was in cooperation with more than 70 vocational and technical colleges and universities located countrywide. There were 24 vocational and technical colleges with 234 students under the Project. For universities, there were 17 universities under the project consisting of 6 private universities with 471 students, 4 Rajamangala University of Technology with 92 students, 6 Rajabhat Universities with 179 students, and 1 government educational institution with 29 students. There were totally 1,005 students for the first batch of the project. Memorandum of Understanding was signed with the purpose to provide effective education to serve the need of industries and private sectors. Bundit Premium Project was provided with the model of 50 percent theory and 50 percent practice in order to empower students' competency with knowledge and skills according to the demand of industries and private sectors.

Apart from the shortage of qualified manpower with insufficient skills and knowledge to serve industries, the problem was also on student dropout. This would be an urgent problem needed to solve. Based on data in academic year 2018 by Equitable Education Fund using iSEE system, it was found that student dropout of Thailand at the age between 18-21 was 902,358 students (Equitable Education Fund, 2019). This showed that the population of manpower of Thailand has an average education at 9.57 years comparable to grade 7 only. The number of average durations of education reflected the quality of education arriving at shallow of knowledge, unskilled, low income, and replaceable workforce respectively. To increase additional and specific skills for career path development became difficult accordingly (Ministry of Education, 2018). The Bundit Premium Project found the problem on student dropout. Based on the data collection on 49 dropouts which was 4.88 percent, the problem was in the title for Table 1 follows.

Table 1: Dropout Statistics under Bundit Premium Project Academic Year 2019

Number of Dropout (Person)	Percentage	Problems findings
22	45%	Problem on taking internship in Private Sectors
20	41%	Problem on changing of studying major
1	2%	Problem on malpractice
6	12%	Other problems

It was revealed that the problem on student dropout was on taking internship (Bundit Premium Project, 2019) due to lacking of readiness and understanding unable to adjust themselves to work based learning program. Since students have to learn both theory and practice, some students felt that there was monotonous and overemphasized on practice opposite to the student's preference. This came the problem on student's dropout affecting the tiresome of private sectors (Jantori, 2012). The continuous and ongoing obstruction on internship students were discipline, emotional quotient, and communication among teachers, students, and private sectors (Chantanasuksilpa, Netramai & Wattanaprajak, 2015).

The solution for problem solving on student dropout in order to support efficiency on internship students were consisted of the relationship between supervising teachers and student, attention of consulting teachers and supervising teacher, and motivation for internship (Thumthong & Sosuttha, 2013). The implementation of supervising and coaching system may have a positive for problem solving as an mechanism on student development process. Teachers and educational institution were important for problem solving on coaching student as a motoring system (Suksodkiew, 2018). Educational institution needed to supervise and coach students under their responsibility including the support for further education (Ministry of Education, 2018) leading to skill development, knowledge, and attitude for qualified manpower as well as better livelihood and happiness.

Based on those problems on internship student mentioned, without emotional quotient, limited communication among student, supervising teachers, and private sectors, students facing emotional problem and stress may have end up with dropping out. Those problems and situation came the research on a study on problems in student internship in private sectors for problem solving for student, supervising teachers, and concerned people. Improving supervising and coaching process and system for internship students in work-based learning program found based on the research findings was accordingly benefited.

Objectives

The purpose of this research was to study the problems and solution for supervising and coaching internship students in Work-Based Learning (WBL) Program.

Literature Reviews

The Bundit Premium Project was for graduate level using German Model on Work Based Learning (WBL) or dual learning and working. More than 70 educational institutions participated consisting of 24 vocational college, 4 Rajamangala University of Technologies, 6 Rajabhat Universities, and 1 government educational institution. Those educational institutions had conducted Work Based Learning Program with equal proportion of learning and practicing as 50:50 percent with



the purpose for preparing necessary competencies for students in knowledge, skills, and life skills to serve the needs of labor market in 21st century (Bundit Premium Project, 2019)

The concept on work-based learning was to provide an opportunity for students to have real experience in private sectors. (Weldon & Richardson, 1995) believed that the implementation of internship in industries or private sectors was the learning process out of classroom for having real experience, different skill development, and attitude and understanding on working culture and environment. Wick (1993) gave an opinion that classroom learning was not supportive for new learning and environment with fixed stipulation and limitation opposite to real working environment. Bradford & Cohen (1984) stated that continuous learning was useful for real working in workplace and increasing continuous working efficiency. (McTavish & Baley, 2010) mentioned that internship conducted in workplace would be assessed in 3 aspects. First, students acquired necessary theoretical knowledge from educational institution for using in real practice in workplace. Second, it reflected acknowledgement of skills, behavior, and knowledge for fulfillment and improvement of those weaknesses. Third, it promoted the participation of industries and private sectors in education for consultation, development of curriculum, and cooperation in developing students. Nonaka and Takeuchi (1995) viewed that networking of all people and sectors concerned internally and externally would create cooperation and value for effectively solving problems.

A study on variables affecting the success of student's internship revealed the emotional quotient and problem response toward the sensitivity of students as significant variables. Nacharoen (2013) stated that the factors affecting the capability to face and cope with problems were from self-confidence, motivation on achievement, and positive attitude. Bandura (1997) explained that the belief on oneself was to believe in capability, skills, and competency capable to the assignment given. This would be the motivation for working. To believe on self-capability were from experience, perception and impression from successful role model on skills and competency, encouragement and support from people concerned. (Wigfield & Eccles, 1955) stated that positive attitude of internship students were from interest value, skill value, and utility value.

Research Methodology

1. Sample

There were four groups of people who provided information with expertise and experience in connection with the internship:

1.1 Supervisors from schools participating in the Bundit Premium Project, which is a cooperative project between universities and CP All Co., Ltd. for the academic year 2019. There were 21 supervisors to participate in a focus group. The first group was 10 supervisors from vocational education and the second group was 11 supervisors from the higher education. Group discussion was suitable for approximately 8-12 people per group (Grudens-Schuck, Allen & Larson, 2004) using a homogeneous sampling method of Miles and Huberman. There were sample groups with a similar experience minimizing differences in data and helping make data analysis easier which suitable for research in focus group.

1.2 Trainers who are responsible for supervising and coaching students in the Work Based-Learning (WBL) system during the internship in workplace (7-eleven convenient store), by inviting 10 trainers to participate in a focus group. The researchers used Miles and Huberman's method of selecting a homogeneous sampling.

1.3 Administrators and staff in charge of the Bundit Premium Project by inviting 4 administrators and staff, who were selected by purposive sampling, to join a focus group,



1.4 Students who have studied in the WBL system from Panyapiwat Institute of Management graduated in 2018. The researchers invited 10 students to join a focus group and used Miles and Huberman's Criterion Sampling. The details of students are as follows: 1) Graduated Bachelor's degree from Faculty of Business Administration, Panyapiwat Institute of Management, in the academic year 2018, 2) GPA not lower than 3.00, 3) GPA, an internship at least 3.00, and 4) They had experience in activities both inside and outside the institute, for screening the sample to obtain quality data according to the research objectives.

2. Instruments for data collection

2.1 Focus group questions were to study the problem and the need for information technology to be used in student monitoring. The questions are as follows: 1) Problems in monitoring students and 2) The need for a monitoring internship students system.

2.2 Focus group record was for relevant experts leave their comments on questions in the Focus Group Discussion in the comments section with questions as follows:

The first point was problems in monitoring internship student; it consists of the following questions:

- 1) In the present, what are the problems that you face for taking care of students?
- 2) Do you have a guideline to find the individual student problems and how?
- 3) Do you have a guideline for preventing or solving problems during the student's internship?
- 4) Do you have a guideline for activities to develop and promote students to have the ability to solve problems during the internship, and how?
- 5) If you cannot solve the student problems, how have you done or forwarded the problem?
- 6) Do you think what factors can contribute to students' success in the WBL?

The second point was the need for a monitoring internship students system; the questions are as follows:

- 1) In the present, do you use technology to monitor internship students?
- 2) What was the condition of the problems and obstacles you faced in applying technology to monitor internship students?
- 3) In the monitoring internship students, what steps should be applied to technology?
- 4) What technology should be used for monitoring internship students?

3. Statistics used and data analysis

NVivo Qualitative Data Analysis Software (NVivo Pro 12) has been used by analyzing the data from the focus group. NVivo is owned by QSR International Pty Ltd. It is a computer program that can quickly facilitate an analysis of qualitative data. Qualitative research has weaknesses in its reliability. This program can build credibility in data analysis results, test various theories, and analyze trends. Users can check information in a variety of formats by using search engines and using keywords. Furthermore, this program can create plans, prepare reports, and share information (Pimmanee, 2018).

Research Result

The results of data analysis from a sample of experts involved in the internship are the total number of 45 people which consisted of 21 supervisors from educational institutes participating in the Bundit Premium Project, 10 trainers, 4 administrators and staff from CP All Co., Ltd., and 10 students who have studied in the WBL system.



1. Problems in monitoring internship students; there were 4 major problems found as follows:

1.1 Communication problems in providing information related to student supervision lacked continuity between supervisors, workplaces, and students, causing did not know any changes about students' information, for example, the student's internship schedule or the student moved to other workplaces. Some students did not follow the information and contact their supervisors, including the supervisors who did not understand information related to the workplaces' work process.

1.2 Student adjustment problems such as students lack of patience, responsibility, and relationships with colleagues. They must try to adapt themselves with a variety of colleagues whether ages, character, and working process of each colleague those were different. When students have some problems, they could not solve the problem themselves. They did not consult their supervisors, trainers, or friends, causing the problem to drop out in the end.

1.3 Problems on accommodation problem, including student dormitories, are because the Bundit Premium Project provided a free dormitory for students to complete an internship in the workplace. Due to workplaces were in different areas, students lived in the dormitories, which differed depending on the location, and took time to travel from the dormitories to workplaces. There are various ways to travel. It was causing students to compare the information with others and dissatisfied with what the students received. It caused the problem of drop out in the end.

1.4 Personal problems in health, financial, and family aspects affect students' productivity, resulting in frequent absences and leaving. If these problems cannot be resolved, it will result in dropping out.

2. Guidelines for solving problems in following-up and supervising internship student. There are 3 important points as follows:

2.1 There should be communication channels to provide information related to student supervision and be a channel to follow-up students when problems arise. All related parties can know the information together. There must be a regular follow-up to students, such as using Line or Facebook application in both group and personal communication including mobile phones for communication, etc.

2.2 There should be a process for monitoring students. Supervisors should be followed-up with students closely and regularly. There must be an individual survey of student behavior. When problems arise, a validation process is required, follow-up on solving student problems that the problem has been resolved.

2.3 There should be guidelines for developing additional activities for students to have patience. They have to know how to solve problems themselves. They have to adapt to working with others and confident themselves, and be motivated, including have a life goal. Furthermore, there should be activities for students to return to the school to build relationships, exchange ideas together, and encourage each other between students and teachers both before and during the internship.

Summarize and discuss research findings

From the analysis of qualitative research results, it can be summarized and discussed as follows.

1. Problems in monitoring the internship students. The research results found communication problems providing information related to student supervision; student adjustment problems, lack of patience, responsibility for duty, relationships with colleagues; dormitory problems; and personal problems. These research results are consistent with Chantanasuksilpa, Netramai, and



Wattanaprajak, (2015), which found that the factors affecting the student's effectiveness were personal factors with the highest average score of 2.85, followed by the assigned workload factor with an average score 2.67. An environmental factor in operations is an average score of 2.66. The organization's representatives responsible for students identified critical problems encountered during student internships, including unannounced leave and lack of determination to work. The said problems can be solved by introducing and training students to have work skills and adapt a better work attitude.

2. Guidelines for solving problems in following-up and supervising internship students. The study found that there should be a communication channel to provide information related to student supervision. There should be a process to monitor students, and there should be additional activities for students to have patience. They have to know how to fix problems themselves. These research results are consistent with Suksodkiew (2018) research, which found that working with all personnel, having a management system for supervision, and a follow-up student system is extremely important. Supervisors should link activities to provide students with desirable characteristics according to the helping student system standards; thus, students intend to study for a better future and have a promising career and live in society happily. As (Stoltz,1997) stated that the ability to face and overcome obstacles was very important to everyone in society because it had been studied and proven by practice and was a scientific theory that can be applied. This concept could predict a person has the potential for success. It was a tool for developing responses to themselves, others, and organizations, based on proven science.

Suggestions

The results of this research can be applied to assist in developing a more appropriate and comprehensive student monitoring system. This will make the student internship useful and benefit to students, workplaces, and educational institutes. This research is limited in collecting data in only one workplace (Convenience store). The research result may not cover the problem of students who have interned in other workplaces. Therefore, to further research, there should be a study on the problem of monitoring interns in different contexts to cover all professional fields, to support the study and internship in the WBL model in the future.

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高校创业教育对创业行为的影响机理研究——以广西财经学院为例

THE MECHANISM OF THE IMPACT OF ENTREPRENEURSHIP EDUCATION ON ENTREPRENEURSHIP BEHAVIOR IN COLLEGES AND UNIVERSITY— —TAKING GUANGXI UNIVERSITY OF FINANCE AND ECONOMICS AS AN EXAMPLE

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摘要

当前, 国家竞争已经从单一财力比拼转向了多元化、深层次的综合国力竞争, 尤其是科技和自主创新能力。各高校针对大学生这一极具创新创业潜力、可塑性强的群体, 积极建设创新创业教育体系, 鼓励高校学生在学习专业知识的同时, 培养创新创业意识并帮助其实现自主创业, 促进高等教育教学的深化改革, 将创新创业精神和实践能力贯穿高校教育全过程。本次研究选取广西财经学院在校大学生及毕业五年内学生为研究对象, 以问卷设计、发放和数据采集为研究手段, 共计发放 200 份问卷并收到有效问卷 178 份, 经过回归分析发现学生主动学习和高校安排一系列的创新创业教育理论、实操学习后, 明显激发学生产生创业行为, 论证了学院创新创业教育生态体系与学生创业行为的正向影响。研究结果充分说明当前学校落实创新创业教育的成功, 但也给予高等教育由从业就业教育向创新创业教育战略转型提供反思与启示。

关键词: 创业教育 创业行为 创新创业

Abstract

At present, national competition has shifted from a single financial competition to a diversified and indepth competition of comprehensive national power, especially in technology and independent innovation capabilities. Universities are actively building innovation and entrepreneurship education systems for college students, a group with high potential for innovation and entrepreneurship and high plasticity, to encourage them to cultivate innovation and entrepreneurship awareness and help them realize their own businesses while learning professional knowledge. This initiative effectively promotes the deepening reform of higher education teaching and deepens the innovation and entrepreneurship spirit and practical ability throughout the whole process of university education. In this study, students from Guangxi University of Finance and Economics and students within five years of graduation were selected as the research objects. Using questionnaire design, distribution, and data collection and analysis as research methods, a total of 200 questionnaires were distributed and 178 valid questionnaires were received. After regression analysis, it was found that after students took the initiative to learn and colleges arranged a series of theoretical and practical learning of innovation and entrepreneurship education, students were obviously stimulated to produce entrepreneurial

behavior, which support the positive influence of college innovation and entrepreneurship education ecosystem and students' entrepreneurial behavior. The research results fully illustrate the current success of schools in implementing innovation and entrepreneurship education, and provide reflection and enlightenment on the strategic transformation of higher education from employment education to innovation and entrepreneurship education.

Keywords: Entrepreneurship Education, Entrepreneurial behavior, Innovation and entrepreneurship

引言

当前, 国家竞争已经从单一财力比拼转向了多元化、深层次的综合国力竞争, 尤其是科技和自主创新能力。2007 年召开十七次全国代表大会之后, 从中央各部委到地方出台了多项创新创业相关政策, 彰显了中国对创新创业教育的重视和对学生创新意识的培养, 同时也是国家自身发展的迫切需要。通过高校教育的持续深化改革, 力争培养一批富有创新精神、勇于担当国家发展重任的应用型、创新型人才, 努力扭转我国大众化教育背景下的严峻就业形势。

各高校不断摸索, 相互学习, 逐渐将创新创业教育发展为高校人才培养的新模式。通过重新定义高校教育的责任与义务、升级教育理念、优化教学管理制度、探索人才培养新路径、建立健全创新创业教育评估体系, 为当代大学生搭建实现个人理想、独立创新、社会担当的新平台。

本文将从高校创新创业教育对大学生创业行为的影响出发, 拟回答: 在国家大众创业万众创新政策的引领下, 高校积极相应国家号召投身到了创新创业教育中, 经过一系列的创新创业教育理论、实操学习是否能成功激发学生产生创业行为? 财经类高校的学生创新创业教育与创业行为是否是正向影响?

希望通过本研究, 推动高等教育由从业就业教育向创新创业教育战略转型提供反思与启示。

研究目的

本研究的目的在于: 通过在广西财经学院实地走访调研后, 设计和发放问卷, 收集学院内大学生群体对创新创业教育和创业行为的相关数据, 了解在校及毕业五年内大学生群体创新创业教育和创业行为的基本情况。在数据采集的基础之上, 分析学校作为财经专业高校, 基于较强专业性教育而设计的创新创业教育体系对创业行为是否存在影响, 并试图找到他们之间的关联途径, 揭示其中存在的问题, 从而为完善学校的创新创业教育体系, 提升大学生的创业行为开展提供对策建议。

文献综述

1. 理论依据

1.1 三元交互决定论

三元交互决定论(Triadic Reciprocal Determinism)是社会认知理论的核心内容, 适用于研究个体的所有学习行为, 是行为学习理论的基石(Bandura,1989), 也是本文构建研究模型的理论基础。

Bandura(1978, 1986)指出, 人类的大部分思想源于其认知的发展和深入; 当认知过程和社会工作处于和谐状态时, 就会发生学习作用和交互作用(interaction), 并形成

两两互相影响的三个独立的作用力，即：个体因素、环境因素和个体行为，其中个体因素着重强调个体的认知因素，Bandura(1986)把这个发现命名为“三元交互决定论”。

Bandura（1986，1989）指出三元交互决定论中个体、环境和行为三要素之间相互影响、互为因果的作用关系并不是对称和固定不变的，也并非必须在同一时间产生相互作用，而是随着不同个体、不同环境和不同时间段发生相应变化，随着时间推移，三要素之间依次实现交互影响。

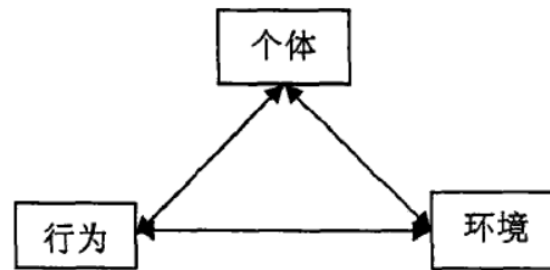


图 1：Bandura(1978)三元交互决定论三要素作用关系

带入创新创业教育研究中来看，既高校建立的创新创业教育生态体系与大学生之间；高校建立的创新创业教育生态体系与大学生创业行为之间；大学生与大学生创业行为之间随着时间的推移所产生的变化（如图 2 所示）。本研究主要为发现高校建立的创新创业教育生态体系与大学生创业行为之间的关系是否为正向激励。

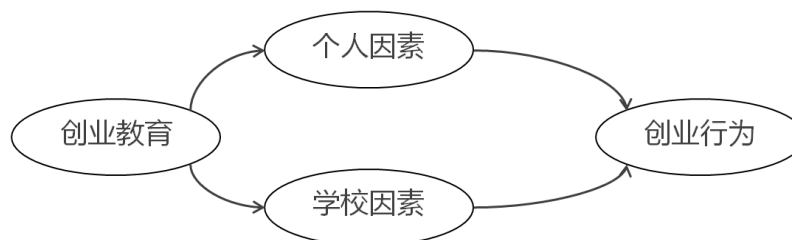


图 2：创业教育对创业行为影响模型

2. 研究综述

2.1 大学生创新创业教育

钱华生（2020）总结了近年来国内创业教育的研究，发现联合国教科文组织在 1989 年 11 月北京召开的“面向 21 世纪教育国际研讨会”上，首次以官方名义向全世界提出“创业教育”概念：“创业教育，从广义上来说是指培养具有开创性的个人，它对于拿薪水的人同样重要，因为用人机构或个人除了要求受雇者在事业上有所成就外，正在越来越重视受雇者的首创、冒险精神，创业和独立工作能力以及技术、社交、管理技能。”

赖明勇（2015）认为 1991 年东京创业创新教育国际会议，从广义上把“创业创新教育”界定为：“培养最具有开创性个性的人，包括首创精神、冒险精神、创业能力、独立工作能力以及技术、社交和管理技能的培养。”是较为贴合当前国内创新创业教育现状的定义。

国内不少学者（李静薇，2013；朱红、张优良，2014；宁德鹏，2017）对“创新创业”带来的变化产生了浓厚的兴趣并开展相关研究，同时尝试对“创新创业教育”概念进行界



定，总的来说可以归结为“人才说”和“素质说”两种观点。“人才说”认为大学生经过创新创业的学习后具有一定的创新意识和能力，并时时关注行业市场创业环境，成为各项创新素质俱佳的人才，毕业后有能力实现自主创业。“素质理论”则认为，培养学生的创业素质，让他们学会利用创业理论分析自我，提高思考、实操和创造能力，这才是创业教育的重点。

总结李静薇（2013）、朱红与张优良（2014）、宁德鹏（2017）等人研究成果后，作者形成个人的思考与借鉴，归集创新创业教育含义的四个紧密逻辑层次，其一，通过创新创业通识型教育，使大学生了解和掌握实际创业所需的基础知识和相关技能；其二，通过创新创业与学科专业的融合教育，引导大学生结合专业特长发现创业机会；其三，通过创新创业实操训练，使大学生加深知识掌握从而获得自主选择职业或自我创业的能力；其四，通过创新创业素质教育，培养大学生创业意识和创新能力，激发大学生对国家发展的责任感，使其成为中国创新创业深化改革的参与者。

综合李静薇（2013）、宁德鹏（2017）的成果，本次研究对创新创业教育的定义概括为：以高校大学生为主，以社会、政府、企业、家庭为辅，通过包括基础专业学科教育、学科专业融合教育、实训实操锻炼和继续教育贯穿始终的创新创业教育生态体系，使高校大学生具备与就业和创新创业相关的一系列相对完整的知识、技能与精神素养，可以自由地规划自身未来职业发展路径，同时等待或自我创造条件，抓住创业机会实现创业，给予自己和他人就业岗位，为拉动国家经济增长发展贡献自己的创新思维与创业技能的教育方式。

2.2 创新创业教育的维度

随着中国创新创业教育的深入开展，不少学者开始研究创新创业教育给社会、区域、个体、经济等带来的变化，并从不同维度评估创新创业教育落地后的存在问题与成果。木志荣（2006）将从创业课程和非课程体系两个方面，打造了包含创业课程、创业研究、创业论坛、创业计划竞赛和创业者联盟五个模块的创新创业教育体系。米江霞与傅象喜（2012）从创新思维、创业能力、创业精神三个维度探讨大学生创业教育体系构建的新思路。李静薇（2013）基于三元交互决定论分学生个体因素和学校教学因素来研究创业教育。周山华（2014）认为应该从政府、高校、企业和个人等更为广义的层面来考量创业教育。王心焕、薄赋徭与雷家骥（2016）从创业课程、创业竞赛和创业活动经历三个维度来研究创业教育。

在总结了前人的研究结论之后，参考其研究的不同视角不同维度，本次研究将借鉴李静薇研究创业教育的“个人因素”和“学校因素”两个维度来开展。

2.3 大学生创业行为

张玉利（2004，2008）研究发现创业者首先要有企业家精神，在充分积累、利用资源的过程中，逐步整合并扩大资源禀赋的过程。钱永红（2007）从广义层面定义新企业的创立和成长的全过程都属于创业行为；从狭义视角定义创业行为仅指创业者从感知创业机会、整合创业资源到企业最终创立的过程。闫华飞与胡蓓等（2014）将识别创业机会、获取创业资源、组建创业团队作为创业的三大关键行为。刘迈克（2018）从创业机会发现和创业机会开发两个方面来设计问卷，深入研究创业行为。

本研究认为，创业行为是指大学生个体自愿付出时间与精力主动进行创新创业知识的学习与实训，并积极参加多层次创新创业活动积累经验，同时不断搜索创业机会和做一定的资金筹备等持续努力的行为动态过程。

2.4 创新创业教育对创业行为的影响研究

德鲁克 (Drucker, 1985) 最先指出经典的“创业可教论”，他强调“创业并不是深植于基因中的与生俱来的天赋，而是可以被教授的，是可以通过学习掌握的”。在中国创新创业教育对创业行为的影响研究中，学者们（林聪，2015；宁德鹏，2017，2020；刘新民、张亚男与范柳，2020）通过研究发现创业教育对创业行为的正向显著影响。宁德鹏（2020）再次扩大研究范围和深度，在全国 26 个省的百所高校发放并回收了 30887 份问卷，发现创业教育和创业行为二者之间存在积极的关系，尤其是参与性的创业教育，例如创业比赛、创业项目实际孵化对学生的创业行为有很大的帮助。刘新民等（2020）对接受过和未接受过创新创业教育的群体进行了区别比较，认为接受创新创业教育的群体对创业行为倾向认知具有积极作用，明确了创业教育影响个体创业的效果。

研究方法

1. 研究模型建立和假设提出

本研究对创新创业教育的定义是：以高校大学生为主，以社会、政府、企业、家庭为辅，通过包括基础专业学科教育、实训实操锻炼和继续教育贯穿始终的创新创业教育生态体系，使高校大学生具备与就业和创新创业相关的一系列相对完整的知识、技能与精神素养，可以自由地规划自身未来职业发展路径，同时等待或自我创造条件，抓住创业机会实现创业，给予自己 and 他人就业岗位，为拉动国家经济增长发展贡献自己的创新思维与创业技能的教育方式。

基于三元交互决定论，本研究中创新创业教育分为“个人因素”、“学校因素”两个维度来开展。

对创业行为的定义是：大学生个体自愿付出时间与精力主动进行创新创业知识的学习与实训，并积极参加多层次创新创业活动积累经验，同时不断搜索创业机会和做一定的资金筹备等持续努力的行为动态过程。

基于以上分析，本次研究提出两个假设：

假设 1：创业教育中的个人因素正向显著影响创业行为

假设 2：创业教育中的学校因素正向显著影响创业行为

2. 研究方法

2.1 研究对象

本次研究问卷发放对象为广西财经学院接受过创新创业教育的在校及毕业 5 年内大学生，问卷中创新创业教育体系不仅包括学校开展的创业通识类课程，还包含创业实训课、实践课、创业孵化园及各种相关活动，如：各类创业讲座、训练营和创业大赛。

2.2 研究方法

本次研究采用问卷、文献研究以及定量分析等方法，制定创新创业教育对创业行为而影响的调查问卷，发放并收集问卷数据进行比较、分析和归纳从而得到启发。

2.3 数据收集

在问卷设计时，为确保问卷科学有效，参阅大量文献及收集一线创业教师、团队管理者和成员的意见设计问题 26 个，确保问卷具有较高的信效度。

2.4 数据分析

利用问卷星发放和回收问卷数据，导入 spss20 软件分析问卷的信度和效度，并利用因子回归论证假设是否成立。

研究结果

1. 问卷设计、发放与回收

本次研究问卷发放对象为广西财经学院接受过创新创业教育的在校及毕业 5 年内大学生，创新创业教育不仅包括学校开展的创业基础类课程，还包含创业实训课及各种相关活动，如：各类创业讲座、训练营和创业大赛。

在问卷设计时，为确保问卷科学性和有效性，在参阅大量文献及收集一线创业教师、创业团队管理者和成员的意见，确保问卷具有较高的信效度。调查对象均为广西财经学院学生，采用问卷星发放问卷共计 200 份，剔除信息有误样本 22 份，剩余有效样本 178 份，有效率为 89%。其中，男生占比 24.16% 和女生占比 75.84%；由于问卷发放的范围是广西财经学院，因此经管专业学生占比达到 67.42%；大部分集中在大二及以上，有 45.51% 的学生参加过创新创业大赛，10.11% 的学生有过创业经历。根据变量统计结果来看，总体人口统计特征分布较为合理。

表 1: 样本结构分布

变量	分类指标	频数	频率（%）
性别	男	43	24.16%
	女	135	75.84%
专业	财经	120	67.42%
	理工	36	20.22%
	其他	22	12.36%
年级	大一	16	8.99%
	大二	57	32.02%
	大三	34	19.10%
	大四	27	15.17%
	毕业	44	24.72%
家人或朋友有创业经历	是	43	24.16%
	否	135	75.84%
您是否参加过创业竞赛	否	97	54.49%
	一次	50	28.09%
	多次	31	17.42%
您是否有创业经验	是	18	10.11%
	否	160	89.89%

2. 问卷的设计

大学生创新创业教育借鉴李静薇（2013）的量表，采用“个人因素”、“学校因素”两个维度，强调个体主观创业能动性和高校教育的促进作用。创业行为综合借鉴宁德鹏（2017）、刘迈克（2018）及刘宇娜（2018）编制的创业行为测量量表，结合广西财经学院在创新创业教育中的实际情况稍作修改后进行测量。

本次问卷采用里克特五分量表进行测量。

3. 问卷的信效度测量

在问卷星收集 200 份数据后进行筛选，将问卷和有效数据 178 份导入 SPSS20 软件，分析结果如表 2 所示。各题项在相应变量上的因子载荷全部集中在 0.7~0.9 之间，问卷中的各变量结构效度良好。

各变量的 ALPHA 系数值均在 0.8 以上，问卷数据内部的一致性较高，信度良好。计算变量的 AVE 和 CR 值分析问卷的判别效度和组合信度，变量之间具有良好的判别效度。

表 2: 变量与观测指标的信、效度

变量名称	测量指标	因子载荷	ALPHA 值	AVE	CR
创业教育——个人因素	我主动选修关于创业教育的课程并参加创业讲座或报告	.751	.943	.671	.953
	我曾经主动参加学校组织的创业技能培训或模拟演习	.742			
	我经常主动参与创业大赛活动	.762			
创业教育——学校因素	学校创新创业教育增加了我对创业的兴趣	.823			
	学校创新创业教育让我更好地掌握商业计划知识	.887			
	学校创新创业教育改善了我对商业机会的理解	.902			
	学校创新创业教育提高了我的业务管理技能	.880			
	学校有完善的创业基地或指导机构	.775			
	学校有良好的创新氛围	.839			
	学校有优秀的创新创业指导教师（含外聘）	.809			
创业行为	我经常了解市场发展动态和需求，并思考怎么利用可能的商业机会进行创业	.866	.961	.785	.967
	我与我的亲人、朋友及合作伙伴探讨新的商业想法	.862			
	我（独自或与他人一起）设计商业产品与服务	.905			
	我会投入大量的时间完善创业想法，撰写商业计划书，为创业做准备	.909			
	我拥有一个志同道合的创业团队	.887			
	我已经搭建创业所需人脉	.893			
	我会运用系统的方式解决商业问题	.925			
	我已让父母在一定的年限内为我准备一定创业资金	.838			

4. KMO 和 Bartlett 检验

KMO 值越接近于 1，意味着变量间的相关性越强，测量结果如表 3 所示，KMO 值为 0.934，接近 1；巴特利球形检验显著性概率为 $0.000 < 0.050$ ，检验结果显著，各个变量在一定程度上相互独立，问卷结构效度成立。

表 3: KMO 和 Bartlett 检验

取样足够度的Kaiser-Meyer-Olkin度量。		.934
	近似卡方	3527.863
Bartlett的球形度检验	df	153
	Sig.	.000

5. 自变量相关系数检验

从表 4、表 5 可以看出各变量间的相关性分布较为合理，有较好的判别效度。

表 4: 自变量相关系数检验

	我主动选修关于创业教育的课程并参加创业讲座或报告	我曾经主动参加学校组织的创业技能培训或模拟演习	我经常主动参与创业大赛活动	学校创新创业教育增加了我的兴趣	学校创新创业教育让我更好地掌握商业计划知识	学校创新创业教育改善了我对商业机会的理解	学校创新创业教育提高了我的业务管理技能	学校有完善的创业基地或指导机构	学校有良好的创新氛围	学校有优秀的创新创业指导教师（含外聘）
我主动选修关于创业教育的课程并参加创业讲座或报告	1									
我曾经主动参加学校组织的创业技能培训或模拟演习	.613**	1								
我经常主动参与创业大赛活动	.564**	.750**	1							
学校创新创业教育增加了我的兴趣	.591**	.563**	.676**	1						
学校创新创业教育让我更好地掌握商业计划知识	.595**	.592**	.624**	.717**	1					
学校创新创业教育改善了我对商业机会的理解	.625**	.587**	.598**	.741**	.908**	1				
学校创新创业教育提高了我的业务管理技能	.568**	.578**	.583**	.719**	.822**	.871**	1			
学校有完善的创业基地或指导机构	.509**	.396**	.503**	.530**	.639**	.647**	.651**	1		
学校有良好的创新氛围	.547**	.532**	.515**	.638**	.676**	.691**	.700**	.715**	1	
学校有优秀的创新创业指导教师（含外聘）	.584**	.521**	.475**	.541**	.627**	.650**	.649**	.743**	.829**	1

**在.01水平（双侧）上显著相关。

表 5: 因变量项间相关系数检验

	我经常了解市场发展动态和需求，并思考怎么利用可能的商业机会进行创业	我与我的亲人、朋友及合作伙伴探讨新的商业想法	我（独自或与他人一起）设计商业产品与服务	我会投入大量的时间完善创业想法，撰写商业计划书，为创业做准备	我拥有一个志同道合的创业团队	我已经搭建创业所需人脉	我会运用系统的方式解决商业问题	我已让父母在一定的年限内为我准备一定创业资金
我经常了解市场发展动态和需求，并思考怎么利用可能的商业机会进行创业	1							
我与我的亲人、朋友及合作伙伴探讨新的商业想法	.839**	1						
我（独自或与他人一起）设计商业产品与服务	.813**	.811**	1					
我会投入大量的时间完善创业想法，撰写商业计划书，为创业做准备	.821**	.820**	.844**	1				
我拥有一个志同道合的创业团队	.671**	.634**	.749**	.762**	1			
我已经搭建创业所需人脉	.640**	.671**	.723**	.741**	.845**	1		
我会运用系统的方式解决商业问题	.743**	.730**	.810**	.782**	.844**	.862**	1	
我已让父母在一定的年限内为我准备一定创业资金	.616**	.611**	.659**	.666**	.779**	.844**	.778**	1

**在.01水平（双侧）上显著相关。

6. 共同方法偏差检验

为避免问卷重复填写带来的同源偏差，在问卷发放前采用匿名填写问卷、分班级发放等方式事先控制，并在进行数据分析前对问卷数据进行 Harman 单因子检验。结果显示，未旋转得到第一个因子的解释程度为 42.849%，由此推断同源偏差对本研究的影响并不显著。

7. 假设检验

本研究通过多元线性回归模型进行假设检验。首先，将高校教育中的个人因素和学校因素设为自变量，创业行为设为因变量，其次将经过因子分析处理后的数据置入回归模型，分析结果如表 6、表 7 所示。

回归结果支持假设 H1：创业教育中的个人因素对创业行为非常显著正相关，假设成立；H2：创业教育中的学校因素对创业行为非常显著正相关，假设成立。

表 6: 回归分析: 高校教育中的个人因素对创业行为影响

系数 ^a					
模型	非标准化系数		标准系数	t	Sig.
	B	标准误差	试用版		
1 (常量)	1.075E-017	.052		.000	1.000
个人因素	.728	.052	.728	14.082	.000

a. 因变量: 创业行为

表 7: 回归分析: 高校教育中的学校因素对创业行为影响

系数 ^a					
模型	非标准化系数		标准系数	t	Sig.
	B	标准误差	试用版		
1 (常量)	4.724E-017	.057		.000	1.000
学校因素	.649	.057	.649	11.326	.000

a. 因变量: 创业行为

研究总结

本研究采用广西财经学院 178 名在校大学生及毕业学生的调查数据, 剖析了学院学生创业行为的现状, 评估在通识、融合、实践、素质等不同类型的创新创业教育体系下, 学院学生创业行为发生的积极变化, 得到主要结论如下:

其一, 高校创新创业教育中个人主动接受创新创业教育对其创业行为有显著积极影响。这表明: 在理论性创新创业教育中, 大学生在专业学习的同时, 自愿主动学习创新创业知识, 积极参加包括讲座报告、各类竞赛、培训和实训、训练营等多种创新创业训练方式, 形成创新创业思维, 积累创业经验, 促进个人理想、专业知识与创业行为的融合, 最终对其创业行为有正向积极影响。

其二, 高校创业教育中学校主动安排创新创业知识对大学生创业行为有显著积极影响。现体系中, 创新创业知识和技能的学习主要还是以学校安排为主, 依据国家层面的各项文件要求, 将创新创业课程列入教学大纲, 并在教育过程纵向开展深层次多样化的实训实践教学及创业活动。以项目、比赛、孵化等形式学习和传授知识, 激发大学生对创新创业的兴趣与关注, 提升大学生的创业意识, 最终开展自主创业。

其三, 未主动参加和接受创新创业教育的个人其创业行为不显著。该结果说明, 如果个体没有或被动接受创新创业教育, 在受教育的过程中持消极态度, 没有创新创业的兴趣和爱好, 未掌握创业所需的知识和技能, 则无法触发其创业意向和思维形成, 最终其创业意向和行为不明显。



讨论与启示

第一，高校构建多元化人才培养模式，促进个体创业行为实施。创新创业教育是个体创业行为的起点，创业意识是个体实现创业的开始，创业环境则是个体创业行为的触发点。创业环境包括当地政府资金及政策扶持，加上完善的引导机制；努力搭建良好的创业环境，建立孵化基地，帮助个体获得创业经验；当地经济发展程度和技术发展程度，经济和技术是个体创业的门槛，在经济发达地区创业机会大于经济欠发达地区。

第二，强化个人创业价值观，充分发挥创新创业教育作用。创新创业教育能触发创业行为，并形成正向影响，同时对个体创业价值观具有积极引导作用。首先，高校应当重视个体创业价值观的引导，让个体主动学习创业知识，扭转被动就业为主动创业的积极心态。其次，高校应整合政府和企业、区域多方多形式资源，为个体提供多元化、深层次的实践活动。最后，鼓励个体在参加各类创新创业竞赛中不断完善自己的创业想法，在赛后资金和政策上支持孵化，推动个体从创业学习到形成创业意向最终产生创业行为的转变落地。

第三，组建专创融合高素质教师队伍，牢固创新创业教育根基。创新创业教育是专业教育的延伸，是高校教育的高级阶段，教师队伍也应积极做出转变，带着科研成果走出校园，到企业、乡村中去。高校建立鼓励政策，允许教师离岗参与成果转化与创业，或者师生共创，在实践中总结经验和教训，反哺学生。

第四，打造专创融合精品课程，升级创新创业教育内涵。2018年中国教育部发布的《普通高等学校本科专业类教学质量国家标准》中，进一步明确了学科专业教育是人才培养的根本，大众化教育背景下严峻的就业形势需要高校在做好学科专业教育的同时，加速推动高校创新创业教育与专业教育的深度融合。对于财经类高校，存在学科专业强的特性，同时也因为专业单一，高校和老师都应结合行业背景充分思考单一专业的创新创业元素，深挖行业资源，设计适合“专业知识强、知识单一化”的创新创业教育生态体系，设置教育目标与考核要求，通过建设通识类及专业创新实训实践类融合精品课程，建立项目实践孵化基地，积极推动学科专业与创新创业实践紧密衔接。

第五，积累专创成功案例，有力支撑创新创业教育。财经类高校绝大多数专业为文科且专业单一，科技含量不高，难以突破和创新。在专创融合的过程中，不断寻找和深挖创新创业元素，以赛促创听取各方专家学者意见，不断摸索创业成功路径，总结成功案例拓展思路，助力孵化优质项目和有力支撑创新创业教育。

第六，健全教学质量保障体系，确保创新创业教育实施效果。高校在设置了教育目标和考核要求后，通过建立创业教育评价体系，设计既有“定性”又有“定量”的考核指标，既对指标有定性的要求，又包含可以量化的绩效指标，创造性地将常态监测与定期评估相结合，及时评价、及时反馈、持续改进，推动高校创新创业教育落到实处，质量稳步提升，以创造之教育培养创造之人才，以创造之人才造就创新之国家。

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泰国大学生线上学习现状与存在问题研究-以正大管理学院线上教学为例
**THAI UNDERGRADUATES' CURRENT STATUS AND EXISTING PROBLEMS
OF DISTANCE LEARNING - A CASE STUDY OF PANYAPIWAT INSTITUTE
OF MANAGEMENT**

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摘要

始于 2019 年的新型冠状病毒在世界范围内的大流行,加速了高等教育机构的数字化转型,迫使高校在短时间内迅速地将教学和管理任务向线上转移,这给学生学习带来很大的挑战。本文从高等教育的数字化转型入手,讨论了疫情期间教学的数字化转型,及其给高校学生带来的各方面的挑战;并通过调查问卷调查了泰国正大管理学院汉语教育专业在校大学生线上学习的情况,遇到的问题以及对线上学习的看法,并进行分析和归纳总结。本文的研究结果表明,网络连接不良影响学习质量是学生线上学习遇到的主要问题;另外,很多学生反映由于线上学习不像面对面学习一样直接,这给学生和老师、同伴之间沟通交流造成不少困难,主要体现在学生上课回答问题、小组合作完成任务等方面。关于对线上学习的看法,大部分学生认为虽然线上学习给他们带来的不小的挑战,但其也具有独特的优势,线上学习更加灵活、省时,信息技术的应用为汉语学习带来新的体验。此外,从本研究的调查结果可以看出学生对未来线上和线下相结合的学习模式有所期待。对教师来说,积极寻找能够促进线上师生和生生之间沟通交流的办法,优化线上教学手段,借助混合学习的模式帮助学生提高线上学习质量值得进行深入的研究。

关键词: 新型冠状病毒 线上学习 数字化转型 挑战

Abstract

Worldwide Covid-19 pandemic has accelerated the digital transformation of higher education institutions. Colleges and universities were forced to quickly transfer teaching and learning tasks online in a short period of time, which brings great challenges and opportunities for teachers and students. The present study discussed the digital migration of teaching and the challenge to undergraduates in several aspects. The questionnaire was used to investigate the opinions of undergraduates in Thailand. Suggestions and problems encountered in online learning are analyzed and summarized. The objective of the research was to investigate the online learning situation and existing problems of undergraduates in Thailand. The results showed that most students believe that poor Internet quality is an important factor affecting the quality of online learning. In addition, because online learning is not as direct as learning in the classroom, it brings difficulties to

communication between teachers and students. Regarding their views on online learning, most students believe that although online learning poses considerable challenges to them, it also has unique advantages. Online learning is more flexible and time-saving. Moreover, it can be seen that students have expectations of blended learning for the future. Therefore, teachers need to adjust and innovate teaching methods to meet the needs of students.

Keywords: Covid-19, Distance Learning, digital migration, challenges

引言

1. 研究背景

2019 年新型冠状病毒在全球范围内的大流行，给泰国的教育系统带来严峻的挑战，为应对疫情时期教学任务的线上转移，泰国的教育部门以及研究者、教师都相当关注科技在教育中的价值，以及线上教育的未来发展。Krittee Manoleehagul（2020）在“泰国在线研讨会：新现实中的教育（Thailand Webinar: Education in The New Reality）”中提出了对泰国本地教育前景的看法，并且也对未来线上学习连续性计划和智能（AI）教育技术的应用提出了看法。该研讨会旨在通过科技和智慧赋能教育，以此帮助监管者、政府官员和专家更好地指导当前教育领域的新发展。曾冰然（2020）在研讨会中指出，泰国正在积极推进“泰国 4.0 战略”，为了使泰国经济向知识经济转型，需要大力提高雇员包括教师的信息与通信技术技能（ICT），因此，泰国教育部门应考虑更新课程，将新技术运用到教育管理和教学中。

新冠疫情期间，高等教育机构迅速转移到线上平台，这也是线上课程第一次大规模被高校所应用。互联网和技术创新的持续增长是线上教育发展的动力，为了使线上教学更高效，教师、管理者和教育机构需要对其优势和局限性有全面的了解。当前，有关线上教学的研究日益增多，专家、学者正在积极寻找方法提高线上教学的质量，线上技术，如电子邮件、学习管理系统、讨论区、视频会议、社交媒体等都可以为实现线上教学的目标提供有效、便捷的方法。尽管互联网和信息技术使教学任务线上得以继续，但是，高校的教学任务紧急从线下向线上转移，给高校师生带来巨大的挑战，正如 Serwatka（2002）指出，师生所熟悉的传统教室的教学和学习方法并不一定适用于线上学习，线上学习中学习者和教师之间缺乏面对面的交流互动等诸多问题都有待解决。Joshi, Chapagain, Kharel, Poudyal, Murray 与 Mehmood（2020）指出，疫情期间的线上学习的学习成果还有待商榷。因此，在积极利用线上技术准备教学之时，不能忽视学生线上学习遇到的问题；为了提高线上学习质量，给学生更好的线上学习体验，了解学生线上学习的现状和对线上学习的看法至关重要。

研究目的

本研究的目的是帮助教师了解泰国大学生线上学习的现状、遇到的问题以及对线上学习的看法和建议，为教师调整线上学习的教学计划和教学方法提供思路。

文献综述

1. 高等教育机构的数字化转型

杨现民（2014）将高等教育机构的数字化转型(digital transformation)定义为在现代教育思想和理论指导下，应用计算机、通信、网络等信息技术开展教育活动的新型教育方式，具有高效性、开放性、灵活性等特征。数字化转型对高等教育机构来说早已不是一个新的话题，

它已经伴随高等教育机构很多年了，与管理者、教育者、学生息息相关。当前，在生活的各个领域对应用信息与通信技术（ICT）的能力和要求的逐渐增加，Bond, Marín, Dolch, Bedenlier 与 Richter（2018）提出大学必须承担起培养专业人员的任务，能够面对未来的挑战并提供危机解决方案。Hiltz 与 Turoff（2005）研究指出，当代的变革将在未来 50 年内被视为高等教育的革命性变革，这种变革将改变传统的面对面的教学模式和以教师为中心的教学方法，由于线上数字技术和混合学习项目的蓬勃发展，以学习者为中心的合作教学法得以增强。线上学习是科技发展的产物，它在某种程度上已逐渐成为我们习以为常的面对面授课的替代品。当前的疫情大大加速了高等教育机构的数字化转型，也为高校提供了最佳的利用数字化技术的机会。Strielkowski（2020）指出，由于不同学校接纳新颖教学手段的能力以及学校的硬件设备不同，高等教育机构使用新颖的教学手段通常要花费很多年，然而，由于新型冠状病毒带来的危机，全球范围内的高等教育机构在有限的时间内开始接纳并采用了新颖的线上教学技术，这是高校第一次大规模进行全面的线上教学。

Ferrari（2012）提出数字素养（Digital competence）是指使用信息与通信技术（ICT）和其他数字设备来进行问题解决，信息管理，进行有效合作并遵守道德准则的素养。Bennett, Maton 与 Kervin（2008）提出在这个信息技术高速发展的时代，并非所有的居民都拥有数字素养。数字素养较低的教师和学生很容易在线上学习中落后于他人。由于疫情期间教学活动的数字化转型，很多地区的图书馆顺应趋势，通过数字化图书馆为教职员工、学生提供高效的服务，而数字素养较低的教职员工和学生可能会发现难以充分高效地利用数字图书馆。Omotayo 与 Haliru（2020）指出，数字素养是一个与对数字图书馆的使用能力相关的正变量，并且数字图书馆的应用对教职员工和学生的工作、学习具有实质性的影响。因此在新时代，对个人来说，提高数字素养是至关重要的。

随着新冠疫情的持续，教学技术人员尤其是远程教育研究人员需要利用线上学习者骤增的优势，抓住发展研究的时机，以提供科学技术和教学方法方面的创新来应对线上教学的最新挑战。Adedoyin 与 Soykan（2020）提出这些研究应涵盖以下几个方面：（1）需要提供模型以适应线上教育的当代改变；（2）回顾高等教育机构数字化转型的过程；（3）设计更具可扩展性和个性化的线上教学模型；（4）设计可减少教师工作量的线上教学模型，（5）重新设计学习过程。Hameed（2020）指出，当前全球的学术关注转移了，预计会有更多数研究人员从事研究活动，并且将产生大量研究出版物和创新。

2. 异步线上学习和同步线上学习

Fry（2001）定义线上学习为利用互联网和其他信息技术来实现教育目的的手段。Hrastinski（2008）提出线上学习有两种类型，即异步线上学习（asynchronous online learning）和同步线上学习（synchronous online learning）。

在异步线上学习中，学习者与教师不需要同时线上，可以通过电子邮件、线上讨论板等媒体进行联系，这是灵活的线上学习的关键组成部分。线上异步学习时，学生可以随时登录、下载文件或向教师和同伴发送消息。学生有更充沛的时间来完善自己的作业和任务，这一点也是部分学者认为与同步交流相比，更周到的地方。Robert 与 Dennis（2005）提出的媒体选择的认知模型理论也支持上述观点，他们认为异步交流可以提高人们处理信息的能力，因为在异步交流中，接收者不被要求立即得到答复，他们有更多时间来理解、消化所接收的信息。对大学生来说，他们有更多的时间处理和消化老师讲授的知识和提出的问题。然而，异步线上学习也有缺点，Hrastinski（2008）的研究指出，如果教师主要依靠异步线上学习进行教学，学生

与教师、同伴之间缺乏面对面的交流，学生会感到孤立无助，认为自己不是团体的一部分，这不利于促进学生之间的合作与学习。

与异步线上学习不同，同步线上学习通常使用视频会议和聊天软件等来帮助线上学习者发展学习。同步线上学习有助于学习者在学习过程中更有参与感，通过更持续的联系（尤其是同步的联系）克服孤独感，使学习者意识到自己是团体的一员，而不是孤立的个人在与计算机进行对话，从而够增加学生交互、学习的动机。Kock（2005）认为同步交流中能够显示出表达能力和观察面部表情、肢体语言的能力，学习者在心理上会受到更多的激励，因为这种类型的交流更接近于面对面的交流，如果抑制这些面对面交流的因素，会减少心理唤醒。此外，由于语言的发出者知道对方可能会做出回应，因此会在心理上有更多的积极性。在同步线上学习中，学习者可以对教师所讲授的内容作出快速的回应。同步线上学习同样有缺点，很多学生在线上学习时由于担心同伴给出和自己一样的答案，所以他们会尝试快速写一些东西，而重点通常放在回答问题的数量上而不是质量上。

3. 线上教学带来的挑战及影响

3.1 线上教学对教师的影响

疫情期间高等教育机构突然的数字化转型，教师需要将传统的线下课程内容转换为对学习者有效的线上教学内容，这种转换对于熟悉传统教室上课的教师来说并非易事，正如 Serwatka（2002）的研究指出，传统的、适用于教室的教学方法不一定同样适用于线上课程，线上课程要求老师转变教学方法、手段，充分利用互联网和电子软件设计适合线上教学的内容和活动。此外，线上教学中教师需要通过网络对学生监督测试和评估，这也给教师带来不小的挑战。Ribeiro（2020）指出，这种教学的数字化转型带来了技术方面的挑战和态度上的改变。Feldman(2020)讨论了在这次大流行期间处理学生评估时，各个高校可以根据这些建议建立公正无偏的评分政策：（1）与疫情大流行相关的焦虑将对学生的学习成绩产生负面影响；（2）学生的学习成绩可能会受到种族、家庭经济水平和资源差异的影响；（3）大部分教师线上教学中没有做好准备以提供高效、高质量的教学。Arkorful 与 Abaidoo（2014）指出，由于线上教学的评估通常是线上进行的，因此教师的能力仅限于对学生的监督管理，但是难以控制学生的作弊行为。Osterlind（2002）表示关于评估和测试理论与分析的文献很多，但是教师在计划、设计和测试项目的编写上缺乏细节性的描述。根据 Osterlind（2002）的描述，以下几种测试形式较为适用于线上教学，这类信息与通信技术（ICT）支持的测试形式包括主观测试、完成句子、简答题、配对题、判断正误以及完形填空。由于我们很难判断哪些学习者在疫情期间通过线上学习获得相同的知识经验和机会，这使评估变得更加复杂，因此在疫情期间很多高等教育从业者和研究人员大力倡导对评分系统进行改革。

3.2 线上教育对学生的影响

对学生而言，适应线上学习也需要一个过程，因为和他们以往的学习经验不同，线上学习对学生自身的主观能动性、时间管理、网络软件的应用能力等方面都有较高的要求。线上教学中的互动（同学之间，同学与教师之间）也是教师和研究者关注的问题，相比在教室上课，线上教学中的互动也有所缺失。Wijekumar 与 Spielvogel（2006）指出，线上课程中教师更应该注重与学生的互动，通过不同的媒体主动寻求和增加与学生互动的机会，因为线上学习时学生的孤独感会增加。

由于整个线上教学的过程都完全依赖于电子设备和互联网，互联网连接不良会对学生线上学习的质量造成很大的影响。技术设备过时可能很难满足学生线上学习的某些技术要求。此外，Demirbilek（2014）指出，由于学生的社会经济地位的不平等，一些依赖学校的

计算机和免费互联网的学生在学校关闭的情况下，他们的线上学习质量会受到很大影响。根据 Fishbane 与 Tomer（2020）对疫情期间没有互联网的学生进行的研究结果表明，贫困社区互联网的访问速度和质量普遍存在问题，这使经济能力不足的学生和同伴相比，更容易落后或遇到挑战，难以在线上学习中赶上其他同伴。此外，Pollack 与 Wilson（2002）指出，线上课程技术方面的失败可能会导致学生对线上学习产生负面的情绪和态度，因此教师最好针对学习者的特点，选择用户界面友好的软件和设计。

王佳璐、刘吉祥与张靖雯（2021）的研究提到线上课程中学生很容易变成观众。其次，线上教学中老师无法快速对教学进度做出调整。另一方面，教师无法组织班上的学生进行多向型的互动，在与单个学生进行互动时也会因为受到网络的限制而导致互动效果不佳、学习质量降低。

4. 线上学习学生参与度

尽管在疫情迫使线上教育迅速发展之前，一部分师生和教育管理者已经对线上课堂有所了解，也有很多大学和教育机构在疫情之前就提供了丰富的线上课程，但是疫情期间，教学、管理必须完全在线上平台进行，这还是给教学带来了很大的挑战。尤其是多年来一直进行面对面教学的教师们，他们必须适应这种情况，不得不改变自己以往的教学方式，去学习如何开展高效并且有吸引力的线上教学。

学生参与度是衡量学生对教师课程的参与程度，它是教学中非常重要的方面，也是最难管控的方面。Jones 与 Bubb（2020）提出学生对课程具有高参与度的表现有如下四个方面：

- （1）学生全神贯注地听课
- （2）学生在课堂上的状态很放松舒适，而不是紧张且沉默
- （3）学生能够主动回答问题
- （4）学生可以纠正老师的错误

当前，随着教学模式的数字化转变，线上课程中学生的参与度变得更加重要，但是这对教师来说却是不易管控的。学生参与度低意味着学生线上学习的效率不高，这必然会影响学习的效果。为了帮助学生积极参与到线上学习中，Jones 与 Bubb(2020)提出因为学生线上学习的注意力有限，教师需要在有限的时间内快速吸引学生的注意力，因此教师应该做好充分的准备，以保证线上课程流畅进行，这能够有效提高学生的参与度。另一方面，因为线上学习的时间有限，所以师生之间的交流不应该只存在于线上课堂之中。老师应该主动和学生建立联系，比如通过创建小组聊天、邮件联系等方式沟通，让学生可以在课堂之外通过电子邮件、电话或其他社交媒体与老师保持联系，但也要注意要设定固定的办公时间，为自己和学生都留出足够的私人时间。此外，由于一部分学生还不习惯在网上上课，教师可以在线上课程开始之前向学生发送上课通知提醒，特别是需要输入密码进入线上课堂的时候，老师们的提醒可以帮助他们慢慢熟悉线上课程的安排。总之，无论选择使用哪种方式，教师和学生有效沟通对学生线上学习的质量有重要的作用。

金璐（2018）提出应创造有安全感的教室环境，因为师生互动、教学活动都是在教室完成的，教室环境对于学生学习和成长都有一定的影响作用。营造舒适的课堂氛围对线上学习尤其重要，因为对很多教师和学生来说，线上课程都是相对较新的事物，需要一个适应过程，而且线上学习中教师和学生的互动也没有在教室学习那么方便，因此教师应该营造一个有安全感、舒适的学习环境。好的线上课堂不应该使学生有压迫感，放松和舒适的学习环境能使学生更好地进入学习状态。创造舒适的线上学习环境可以从装饰屏幕背景开始，教师可以通过使用适合课程主题的实时背景或虚拟背景吸引学生的注意力，不必总使用单调的颜色作为背景。在

课中开个玩笑，营造轻松的学习氛围，可以让学生学习更加高效。由于传统的、适用于教室的教学方法不一定适用于线上课程，教师应该积极尝试使用不同的线上应用软件来开展课程，增加学生线上学习的兴趣和积极性。此外，给予学生改正错误的机会也非常重要，因为对很多教师和学生来说，线上课程都是相对较新的事物，没有丰富的经验，因此线上课堂有时会发生一些难以控制的事情，比如学生缺课、没有按时交作业或课堂上不够积极。作为教师，应当先去了解上述情况出现的原因，有时可能是学生需要帮助，或者有突发情况发生。这个时候，老师应当适当宽容并积极采取措施帮助学生，注重学生学习的过程和学习效率。

关于线上课程的教学计划，虽然每位教师都有固定的教学计划，但在线上教学中更重要的是随机应变，时刻关注学生对于课程内容的掌握情况，多多倾听学生的想法，询问他们的意见，然后根据这些反馈意见采取相应的措施，及时调整课程计划和进度。

研究方法

1. 研究对象

本研究选择泰国正大管理学院汉语教育专业的在校大学生作为本研究的研究对象。这些学生包括大学一年级到五年级的学生，他们都至少有一年半的线上学习经历。

2. 研究方法

本研究使用文献研究、调查问卷及定量分析等研究方法。根据研究的目的，通过查阅相关文献，全面地、准确地了解和掌握所要研究的问题。本研究的调查问卷是在参考已有同类研究后，根据泰国大学生的实际情况设计的。此外，本研究采用定量分析的方法，对所收集的数据进行比率分析和对比，对泰国大学生线上学习的情况，线上学习遇到的问题和对线上学习的看法等进行归纳总结，从而得出有效的信息。

3. 数据收集

本研究所使用的调查问卷是在参考已有同类研究后设计的，为了学生能够更清楚地理解问卷中的问题，问卷使用学生的母语泰语编写。问卷调查问卷由个人信息，线上学习的情况，线上学习遇到的问题和对线上学习的看法四个部分组成。前三个部分为选择题，对线上学习的看法部分使用李克特量表 1-5 来调查。从正大管理学院汉语教育专业大学生线上学习的现状出发，对他们线上学习时遇到的问题和对线上学习的态度进行研究，并分析归纳当前高校学生线上学习遇到的问题。

4. 数据分析

根据所收集的调查问卷对所收集的信息进行分析和归类，借助 EXCEL 等工具，对所收集的数据进行集中分析归纳，目的是为了找出大学生线上学习遇到的问题，为教师准备课程、设计教学活动提供思路，从而提高学生线上学习的质量。

研究结果

1. 线上学习的基本情况

本研究调查了 88 名汉语教育专业的大学生，调查问卷结果显示关于疫情期间的线上学习，有 65.4% 的学生表示线上学习形式是 100% 直播课，也有 30.9% 的学生表示他们线上学习的形式是直播课与录播课相结合。关于对直播课和录播课的喜爱程度，43.2% 的学生表示喜爱直播课与录播课相结合的模式，有学生指出，直播课时，遇到问题可以和老师及时沟通交流，每节课的内容会制作成视频，方便课后反复观看，因此喜爱直播与录播相结合的模式。还有 42% 的学生表示更喜爱完全上直播课。关于线上学习的时长，大部分学生指出，他们目前的线上学

习平均 2-3 小时一节课，超过一半（53.1%）的学生认为线上学习 1-2 小时一节课比较适合，这也表明大部分当前该专业的线上课程时长较长，应当根据不同课程的特点进行有效的调整。

关于线上学习的设备，使用电脑和智能手机的学生人数最多，大部分学生使用的是家里的无线网络或手机流量，但是也有少数学生线上学习时使用公共网络。大部分学生表示线上学习使用的设备可以满足学习的需求。

2. 学生对于线上学习的有利方面的看法

大部分学生表示线上学习的幸福感和在教室学习的幸福感相当，线上教学没有对知识的理解造成不良的影响，也没有更有效地帮助对知识的理解。然而，关于线上学习的参与度，相当一部分学生表示和在教室学习相比，线上学习时课堂参与、互动的意愿较低。

关于线上学习的优点，超过一半的学生（73.5%）提到线上学习可以节省时间，其中有学生表示线上学习让他们有更多时间预习和复习知识，有更充足的时间完成老师布置的任务，并且可以用之前交通的时间来做好上课的准备。还有相当多的学生提到这样学习更加方便，可以随时随地上课，限制较小，而且有学生指出，线上学习方便查找资料和使用软件协助学习。值得一提的是，不少学生提到线上学习课后有不懂的问题可以反复观看老师讲课的录像，便于复习。有学生提到线上学习由于不能随时和同伴交流，遇到问题时要求自己能独立思考，解决问题，从而培养独立学习和解决问题的能力和对学习负责的态度。此外，也有学生提到在家学习不会被其他同学打扰、影响。除了上述的优点之外，省交通费和住宿费、有更多时间和家人在一起也是学生提到的线上学习的优点。

3. 学生线上学习遇到的问题

和在教室学习相比，线上学习也给学生带来了相当多的问题，其中最多被提到的是线上学习影响学习质量，在调查中学生提到的影响学习质量的外部因素主要有：网络连接不良，学习设备不能满足线上学习的需求，以及周围环境不适合学习。由于这些因素的影响，导致线上学习经常听不懂、跟不上同伴。其次，有不少学生提到线上学习缺乏主观能动性，没有学习的动力，容易被周围的事物吸引。此外，有学生提到一整天在电脑前比较无聊，而且会使眼睛疲劳。值得一提的是，有两位学生提到线上学习影响小组任务的完成，尤其是需要合作完成的任务完成起来有困难。除了前面提到的问题之外，线上学习使学生与同伴和老师交流少了，有时候不能及时回应老师，不能和同伴交流讨论；线上学习的任务量增加也是学生线上学习遇到的问题。

在本调查中关于如果未来疫情有所好转，对于未来的课程安排，学生更愿意以哪种形式进行等问题，46.9%的学生表示更愿意采用线上学习作为教室学习的补充，二者相结合的学习方式，35.8%的学生愿意和以前一样完全在教室学习，只有 17.3%的学生愿意继续通过网络学习。

关于对线上学习的建议，有学生表示线上学习既有利有弊，总体来说线上学习是一件好事，但是即使是在家学习，学费仍然是和在教室上课一样，希望学校在疫情期间能够帮助经济有困难的同学减免一部分学费。也有学生提出希望能够知道未来的学习方式，以省去租宿舍的费用。多位同学提到线上学习让学生有足够的休息时间，但是线上学习沟通是一个问题，特别是需要小组合作完成的任务有一些困难。也学生表示现在已经渐渐地习惯了线上学习的学习、交流模式，虽然刚开始进行线上学习的时候不好意思老师和同伴交流，因为通过网络不像在教室学习一样直接。

总结

调查问卷的结果表明,疫情期间大部分学生都使用电脑进行线上学习,线上学习过程中,网络质量不良是影响学生学习质量的一个重要因素,除此之外,线上学习中教师和学生、学生和学生之间互动不足,出现沟通交流不便等问题,这也对学习质量有很大的影响。另一方面,学生也意识到线上学习对主观能动性、时间管理、独立自主的学习能力都有很高的要求。在发现线上学习出现的一些不足之处的同时,学生也注意到线上技术给学习带来的便利,作为教师更应该帮助和引导学生,更高效的发挥好线上的有利因素,帮助学生更好的适应线上学习,提高学习质量。

由于本研究只选取正大管理学院汉语教育专业的学生作为调查对象,样本数较少,不能够代表泰国大学生群体在线上学习遇到的问题和对线上学习的看法,因此研究的结果具有一定的局限性。此外,不同经济状况、不同性别的学生对线上学习的看法也不尽相同,不能够一概而论,应根据不同的研究对象具体问题具体分析。

讨论

由于新型冠状病毒的流行,导致高等教育机构迅速的数字化转型,在创新实践的过程中涌现出不少亟须解决的问题,给高校师生带来严峻的挑战,但这些经历和挑战也是教师和学生进行研究、探索和发展的好机会。本研究对泰国正大管理学院汉语教育专业的学生线上学习状况进行了讨论,分析了该专业学生线上学习存在的问题。从调查结果可以看出,虽然在线上学习中学生遇到不少问题,但他们已经慢慢开始适应这种疫情期间涌现出的新的学习形式。

新冠病毒大流行期间,信息技术被广泛应用于高等教育机构,但信息技术的影响远不止于此,从现状来看,线上教学将持续存在,教学方法将变得更混合。从本研究的调查结果可以看出学生对未来线上学习和线下学习相结合的模式有所期待。对教师来说,积极寻找能够促进线上交流合作的办法,探索适合线上课程的教学方式,优化线上教学手段,利用混合学习的模式帮助学生提高线上学习质量值得进行深入的研究。

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应用型本科学生成才意愿与主动实践行为研究

APPLICATION-ORIENTED UNDERGRADUATES' WILLINGNESS TO BECOME TALENTS AND ACTIVE PRACTICE BEHAVIOR

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摘要

本文以目标设定理论为基础,分析了可能影响应用型本科学生成才意愿与主动实践的因素,并利用专业 200 名学生调查数据对学生主动实践成才意愿进行描述性分析,采用 Logistic 模型进行实证检验。研究表明,应用型本科学生成才意愿强烈,但是由于学校专业成才引导与方案设置不尽合理,尤其是前两个学年四学期阶段性专业应用成就目标不明显,导致学生无法保持成才意愿并持续自主学习主动实践。建议通过优化专业学科课程结构设置和科学增设学期专业学期应用目标,增强学生成才意愿与信心,提升师资工程能力,提高学科教学质量与专业职业目标达成引导力度,创新课程考核机制和建立激励教师参与学生成才全过程政策等措施来提高学生成才意愿与主动实践。

关键词: 应用型本科 目标设定理论 心智模型理论 成才意愿与主动实践

Abstract

Based on the goal setting theory and mental model theory, this paper analyzes the factors that may affect the application-oriented undergraduate students' willingness to become talents and active practice, and makes a descriptive analysis of the students' willingness to become talents in active practice by using the survey data of 720 students from four majors, and makes an empirical test by using logistic model. The research shows that the application-oriented undergraduate students have a strong desire to become talents. However, due to the unreasonable guidance and scheme setting of the school's professional talents, especially the lack of the phased professional application achievement goal in the first two academic years and four semesters, the students are unable to maintain their willingness to become talents and continue to study and practice autonomously. It is suggested that the students' willingness and initiative to become talents can be improved by optimizing the curriculum structure of professional disciplines and scientifically adding semester application goals, enhancing students' willingness and confidence, improving teachers' engineering ability, improving

the quality of subject teaching and guiding the achievement of professional career goals, Innovating Curriculum Assessment Mechanism and establishing policies to encourage teachers to participate in the whole process of students' becoming talents Practice.

Keywords: Application oriented undergraduate, goal setting theory, mental model theory, willingness to become a talent and active practice

引言

根据教育部发展规划司统计数据和民办本科院校官方数据,截至 2020 年 6 月,2020 年全国民办本科院校共 433 所,其中尚未转设,属于民办本科序列的独立学院共 246 所,民办普通本科院校 167 所。民办本科院校学生学习动力影响学生学业成绩及未来就业,关系到民办本科院校快速、健康、持续发展,对我国经济与社会发展产生重要影响。

2019 年国家发展改革委、教育部“十三五”期间实施教育现代化推进工程应用型本科高校建设项目,推动项目高校将产教融合项目建设和学校转型深化改革相结合,切实把办学真正转到服务地方经济社会发展上来,转到产教融合校企合作上来,转到培养应用型、技术技能型人才上来。根据数据显示应用型本科高校大学生的就业竞争力较弱、就业意识不强、自我定位不准,特别是大学四年间专业求学过程中的成才意愿与自主学习主动实践性不强,成为成才就业过程中的绊脚石。鉴于此,本文以应用型本科学生成才意愿与主动实践行为为研究主题,基于目标设定理论框架,分析学生成才意愿未能持续和主动实践的因素,通过对专业 4 个年级抽样 200 名学生问卷调查,应用 Logistic 模型解释影响学生成才意愿与主动实践行为的主要因素,注重分析专业培养设置、学生成才引导、双师激励政策等对学生成才影响。

1 理论框架与文献综述

1.1 理论框架

在目标设定理论的框架下,学生作为成才意愿主体,有其学习成长目标设定,个体受到学校专业培养与引导的刺激,会集中和调度其精力开展自主学习主动性实践,从而实现自己的成才目标。在这个过程中,个体的目标有两种,内部目标是学生个体对于自己成才目标的设定和追求渴望,外部目标是学校对学生培养科学论证的专业人才培养目标。在学生求学成长与学校专业培养情况下,学生的自我成才意愿基本都百分百具备,基本不存在没有不愿意成才的学生个体,区别在于成才意愿的明确性、挑战性、持久性与合理性;学校专业对学生培养目标设定基本都是科学的,符合专业发展与行业经济发展需求的,但是由于学生的个性化差异,外部目标和对应的带给学生个体开展主动实践行为的刺激存在宏观性、归一性和缺乏与个体内在目标针对性。

在以上理论框架下,学生成才意愿与主动实践行为不足原因可能是:

(1) 应用型本科学生对其专业发展、专业内涵与自身认知不足,处于信息不完全状态,理性人与心智成熟受到制约,故而内部目标不明确不强烈。



(2) 当学生个体目标设定挑战性与合理性, 学习方法方式与阶段性成效不明显, 造成意愿逐渐淡化, 主动实践行为不能持久, 继而不再付诸实践实现意愿目标。

(3) 当学校外部目标设定在具体执行过程中, 缺乏根据学生个性展开针对性引导, 学生个体的成才意愿与主动实践行为会大大下降, 人才培养目标成就实现越来越不明显, 个体实践行为差异性越来越小。

(4) 当外部目标与阶段引导针对性不足以满足学生个体成才意愿和实践阶段性提升需求, 学生的成才意愿与主动实践行为也会逐渐淡化减低。

(5) 学校整体学风与环境营造不佳时, 与前述情况类似, 学生成才意愿与主动实践行为也会不足。

1.2 文献综述

Henri Holec (1981) 将成才意愿与自主学习定义为自我管理和自我学习的能力, 认为自主学习主动实践成才是学生在求学过程中对自己能力拓展的主动性。Zimmerman (2002) 在总结了之前各个学者研究观念基础上系统提出了自主学习研究框架, 将个人意愿因素、主动实践行为因素、客观环境因素归纳为影响学生成才主要因素。他提出要学生要实现自我成才意愿, 首先要有正确定位、目标和方向, 其次要有正确的行动实践。同时再实践过程中不断调整不合理因素, 完成全过程促进成才实现的自主学习实践。

林毓鎡 (1985) 在对选修“学习方法论”课程的学生进行分析, 提出了大学生可以看见并找到自我成才路径, 并且通过转变学习方法, 形成自学能力; 通过转变生活方式, 初步形成独立生活与工作能力; 通过转变思维倾向, 培养发展创造能力。饶卫忠 (2012) 认为学生自我内在因素, 包括兴趣与动机、自我效能感和学习策略、性格等, 外部因素包括教师的教学模式、学校学习环境、社会文化环境等都是重要的影响因素。类似的文献还有张静与赵玲 (2012) 从学生个体和学校环境两方面进行了讨论; 朱林芳、李前锋与冯倩雯 (2018) 在“互联网+”背景下对学生自主学习能力进行了研究; 在众多成果中, 朱祖德、王静琼、张卫与叶青青 (2005) 在 Zimmerman 自主学习理论框架基础上, 编制了大学生自主学习量表, 提取出了学习自我效能感、内在目标和学习控制感等 12 个因素, 这为本文问卷调查研究提供了重要的参考。

总的来说, 国内文献对大学生自我成才意愿保持并转换自主实践行为方面研究较少, 同时学者们尚未提出一个比较完整的学生成才意愿与自主学习主动实践行为决策的理论框架。

2 假说提出

根据以上理论框架, 本文将影响学生主动实践行为的主要因素划分为 5 类: 第一类, 学生入学时高考的分数与素养; 第二类, 入学后是否拥有良好习惯、学习自律情况较好的; 第三类, 学生目标设定与外部专业发展培养设定引导认知情况, 包括自我的目标设定、对专业培养解读程度; 第四类, 学生在自我目标与现实求学受挫心理触动与反思程度, 主要为入学大一前两个学习产生落差的触动情况; 第五类, 学校专业培养预期的针对性与学风营造引导情况, 包括教学与学工的导学机制、奖学政策等。

本文提出以下假说:

假说 1: 学生入学时高考分数越高、综合素养越好, 其成才意愿越强烈, 主动实践行为越充足越持久。一般来说, 综合素养越高, 个人内部目标越明显, 自我规划与实践越主动; 反之, 大学自我成才意愿与规划就越不明显, 主动实践就越不足。



假说 2: 入学后学习习惯越好、学习越自律, 则成才意愿转化主动实践越充足越持久。当自律成习惯, 习惯变优秀, 则越优秀的学生越优秀, 对于目标与培养越敏感, 越有责任感; 自律越好、学习主动越持久, 对于外部培养目标与引导认知理解越发全面, 对于外因作用域内因成才作用发挥越大。

假说 3: 学生主体对学校专业培养目标与引导的认知情况影响其对自我成才与主动实践行为, 且认知越高则自我意愿主动实践行为越充足越持久。学生主体对于学校培养与引导认知可分为两个方面, 一是对学校专业培养目标的认知程度, 二是外部作用于自我实现与主动实践的重要性判断。一般来说, 越能理解认知学校人才培养目标与路径, 越能自主学习主动实践实现自我成才意愿。

假说 4: 学生主体在其实践行为与成才意愿目标对比受挫情况下, 心理触动越大与反思总结越多, 更能促进成才意愿与实践行为的匹配与目标达成度。学生意愿受挫是指在学习实践过程中达成的目标与意愿之间的落差, 以往实证研究结果表明, 落差状态对学生主体完善目标意愿改进坚定实践行为有着重要影响(李燕梅, 2016)。一般来说, 学生实践行为与意愿之间落差越大、呈现度越明显, 学生成才意愿越强烈, 主动实践行为越充分。

假说 5: 学校专业培养预期的针对性实施越深入、学风营造越浓厚, 学生主体成才意愿强烈, 主动实践行为越积极。学校专业人才培养外部目标一方面是指学校专业对培养目标的解读宣传与引导, 另一方面是指专业在实施培养过程中, 通过对学生主体意愿的了解, 结合主体自身情况, 针对性个性化引导培养激励。学风氛围的营造, 是一个无形的大环境构建, 对学生主体主动实践无形的促进与压力。总体来说, 学校专业对于人才培养目标和实施路径宣传越到位、个性化引导越具体、教学学工学风氛围营造越浓厚, 学生主体成才意愿越强烈, 主动实践行为越充分越持久。

3 研究方法

本文所采用的数据主要来源于计算机科学与技术专业 4 个年级抽样 200 名学生的调研。计算机科学与技术专业学生人数占比超学院 50%, 历届考研升学率远高于学院平均水平(10%), 就业率也是学院第一。该专业是学院校内重点建设品牌专业, 同时也是最早实施校企协同育人的专业, 在人才培养与学生个性化引导成才方面积累了一定的经验, 因此, 对计算机科学与技术专业学生的调研具有典型性与可行性。调研采用实地面对面问卷调查和网络问卷调查, 调查对象的确定采用分层抽样和随机抽样相结合。为保障调查问卷的有效性, 在正式调研之前, 开展了多次调研并完善了调查问卷内容, 尽可能避免偏误, 同时在正式开展调研前, 对实施具体调研的专业教师与调查员进行了相关培训, 统一了思想与目标, 尽可能保障问卷调查填写的正确率与有效率。此次抽样调查共调查了专业 200 名学生, 经过筛选, 最终获得有效样本 192 名, 样本有效率为 96%。

3.1 学生主体成才意愿与主动实践行为描述性分析

(1) 学生入学综合素养与成才意愿主动实践。学生入学分数越高、综合素养越好, 成才意愿越强烈明确, 主动实践越充分。专业入学超过本一投档线、本二投档线和本三投档线的成才意愿与主动实践行为发生占比分别为 52.63%、45.84%和 38.92%。

(2) 学生学习习惯好、自律性高与成才意愿主动实践。学生成才意愿明确主动实践积极与学生自律性高、学习习惯效果良好呈正向关系，自律性越高、习惯成效越好的成才意愿越明确、主动实践越积极充分。

(3) 学校专业培养目标与实施路径认知情况与成才意愿主动实践。学生主体对学院专业的培养目标和实施路径了解程序越高，对其成才意愿就越强，主动实践行为就越积极充分。对学院专业大环境目标“不了解”、“一般了解”、“非常了解”的成才意愿与主动实践行为发生率依次为 36.72%、61.33%和 84.21%。

(4) 学生主体学习受挫与成才意愿主动实践。调查发现，89.2%的学生都在大一大二阶段有过学习受挫感。受挫触动与反思越大，其成才意愿越强主动实践越积极。将学生主体学习受挫与反思情况按照“未感受挫没有反思”、“受挫没有反思”、“受挫有反思”分成 3 组，则不同组别的成才意愿和主动实践行为发生率依次为 38.1%、47.3 和 84.9%。

(5) 学校专业个性化培养引导和学风营造与成才意愿主动实践。学生主体更倾向于学校专业有针对性的引导与培养，同时在良好学风氛围内提升自己成才意愿与主动实践行为的发生概率。就学校针对性引导和学风建设营造而言，个性化引导培养越有针对性、学风越浓厚，学生主动实践成才意愿发生率就越高。将学院专业个性化引导培养和学风建设营造情况按照“未实施”、“实施一般”和“实施良好”分组，则不同组别成才意愿主动实践行为发生率分别为 48.6%、75.8%和 90.7%。

3.2 研究模型与变量说明

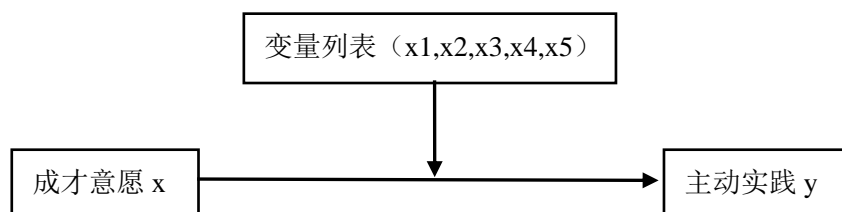


图1： 学生成才意愿与主动实践行为研究模型

研究模型变量数据具体如下表 1 变量表所示。

表 1： 变量表

变量	变量说明	均值	标准差	先验判断
成才意愿与主动实践 y	是=1, 否=0	0.66	0.48	
学生综合素养 x1	本一线 x1=1, 本二线 x2=2, 本三线 x3=3	2.27	0.78	+
学习习惯与自律性 x2	习惯与自律不佳=1, 习惯与自律一般=2, 习惯与自律良好=3	2.09	0.70	+
培养目标与实施路径认知情况 x3	不了解=1, 一般了解=2, 非常了解=3	2.18	0.75	+

表 1: 变量表 (cont.)

变量	变量说明	均值	标准差	先验判断
受挫与反思 x4	无受挫无反思=1, 有受挫无反思=2, 有受挫有反思=3	1.72	0.78	?
个性化引导与学风建设 x5	未实施=1, 实施一般=2, 实施良好=3	2.00	0.63	+

4 研究结果

利用 Logistic 模型的向前逐步回归法对表 1 中的变量数据进行分析, 以 0.05 的显著性水平为阈值, 不显著变量被逐步剔除, 得到回归结果, 如下表 2 所示。从回归结果看: 影响学生成才意愿与主动实践行为的因素包括了学生综合素养、学习习惯与自律性、培养目标与实施路径认知情况、受挫与反思和个性化引导与学风建设。

表 2: Logistic 模型回归分析结果

变量	回归系数	标准误差	显著性水平
入学综合素养	1.105	0.237	0.024
学习习惯与自律	2.401	0.211	0.002
培养目标与路径认知	1.108	0.226	0.043
受挫与反思	0.836	0.237	0.051
学风与引导	1.439	0.191	0.033

学生入学综合素养特征情况完全验证了假说 1。表明学生主题高考投档分数越高、其综合素养越好, 主题的成才意愿越明确, 主动实践行为越积极越有效。

学习习惯与自律性情况验证了假说 2。学习习惯良好的学生同步自律性都比较好, 学习效果也明显, 收获成就感比较足, 成就感越充足, 主动实践动力就越大。反之, 学习习惯不好、自律性不高的学生, 学习成就感弱, 没有成就感自学学习主动实践, 成才意愿付诸行为就越弱。

培养目标与实施路径认知情况验证了假说 3。当学生对学校专业的人才培养目标和实施路径了解越清楚, 则可以更加有针对性结合自己成才意愿, 利用外部引导力量助力自我成才。很多一开始只是存在成才意愿, 但不明确的学生, 在了解专业培养目标与实施路径后更加明确了自我成才意愿和方向, 找到了方向, 主动实践更有动力目标性与行为针对性。

学生主体阶段受挫与反思情况部分验证了假说 4。学生在学习过程中, 阶段性目标实现不明显甚至学业受挫, 对于成才意愿主动实践行为的发生影响不显著。从结果来看, 存在部分学生因为阶段目标的高阶性与反思, 促进了其更加实践实现意愿的决心; 而同时也存在由于学习过程受挫进而慢慢掉队淡化成才意愿的情况。因此教学统一性与学生受挫反思的个性化需要更进一步细化引导与助力。

学院个性化引导与学风建设情况验证了假说 5。学院个性化引导和学风建设营造对学生成才意愿主动实践行为有正向影响, 表明即使个性化引导相对不精确情况下, 依然对学生的主



动实践行为起到正向作用。而学风建设营造则影响更加显著，外部环境成才学习实践氛围会潜移默化转化成为学生个体自觉不自觉的达成成才意愿实践行为。

5 结论

本文基于计算机科学与技术专业 200 名学生问卷调查，采用二元 Logistic 模型分析发现了显著影响学生主体成才意愿主动实践行为因素：（1）学生入学综合素质对其成才意愿主动实践影响，入学综合素养越高，意愿越强实践越积极；（2）学习习惯与自律性好坏等变量显著正向影响学生成才意愿和主动实践；（3）现阶段学生对于学院专业培养目标和实施路径有了一定了解程度，但是缺乏对学习过程中的受挫反思；（4）学院教学与学工个性化引导和学风氛围建设营造会更加正向促进学生成才意愿主动实践行为。

6 讨论

基于上述研究结论，本文提出促进应用型本科学生成才意愿与主动实践行为培养政策建议：（1）学校层面，提升办学质量与影响力，将办学优势转换为服务产业行业经济的高就业率，以高就业率与高评价吸引更多更高综合素养考生。（2）注重学生自学能力与自律性培养提升，引导培养学生自主学习主动实践解决学生成才学习过程中的“为什么学、学什么和怎么学”的问题。（3）科学优化培养课程体系与教学进程，转专业人才培养目标为学生能够体验的应用成果，同时设置一定的高阶性引导学生通过受挫反思提升成长与解决问题的能力。（4）加强教学与学工协同开展学生个性化引导与学风建设，将提升教师科研教学水平同时加大教师对话学生开展个性引导的要求，凝聚师生建设良好学习成才氛围，提升学生主动实践成才的行为。

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正大管理学院中文教育专业学生汉语平翘舌音偏误研究

**THE ERRORS IN THE BLADE-ALVEOLAR & BLADE-PALATAL TONGUE
OF TEACHING CHINESE LANGUAGE STUDENTS AT PANYAPIWAT
INSTITUTE OF MANAGEMENT**

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摘要:

笔者在泰国正大管理学院中文教育专业教学的过程中发现, 泰国学生在汉语学习过程中遇到的第一个障碍就是语音偏误。语音偏误是汉语学习者在学习过程中最常遇到, 也是最早遇到的问题。如果不能很好的解决, 将会对学习者的语言面貌带来极大的影响。本文在已有研究的基础上, 选取泰国汉语学习者语音习得过程中的难度最大的平翘舌音)z, c, s\zh, ch, sh, r(作为研究的内容, 选取相关的音节语料, 运用 Praat 语音软件对泰国汉语学习者的语音偏误进行研究发现, 泰国中级汉语学习者平翘舌音的发音偏误主要有发音部位混淆; 发音方法的混淆; 发音部位和方法同时混淆等偏误类型。分析其成因是因为母语的负迁移, 教师的影响和学习环境的影响等四个方面。

关键词: 偏误 平舌音 翘舌音

Abstract

The author discovered during the teaching process of the Chinese education major of Thai Chia University School of Management that the first obstacle that Thai students encounter in the process of Chinese learning is phonetic errors .Phonetic errors are the most common and earliest problems encountered by Chinese learners in the learning process .If it cannot be solved well, it will have a great impact on the language outlook of learners .Based on the existing research, this paper selects the most difficult flat tongue sounds)z, c, s\zh, ch, sh, r (in the process of phonetic acquisition by intermediate Chinese learners in Thailand as the research content, and selects relevant Using Praat phonetic software to find out the phonetic errors of Thai Chinese learners, the pronunciation errors of the flat-above tongue of Thai intermediate Chinese learners mainly include :confusion of pronunciation parts; confusion of pronunciation methods; weakening and falling off of side sounds ; Four kinds of errors such as confusion of pronunciation parts and methods at the same time .Analyze the reasons for the negative transfer of the mother tongue; interlingual errors; the influence of teachers and the influence of the learning environment.

Keywords: Young teacher, work pressure, emotional exhaustion, work-family conflict

引言

1. 研究背景

2015 年 3 月，中国国务院办公厅印发《关于发展众创空间推进大众创新创业的指导意见》，“众创空间”、“创客”等词被首次写入中国政府工作报告，作为创新发展的新动力，“众创空间”与“创客”等词语引起了国内外学者的广泛关注。本研究将从创客所需资源、创客资源需求与创客入驻关系进行分析，从资源层面探讨创客入驻的相关问题。

1.1 众创空间现状

根据中国科技部中国火炬统计年鉴及前瞻产业研究院中国众创空间发展分析数据显示，中国众创空间已从 2014 年的 50 多家发展到 2018 年的 6959 家，数量高居世界第一，且仍呈现继续增长态势，截至 2019 年末，中国共有 8000 多个众创空间，国家备案的众创空间数量达 1888 家，发展规模不断壮大（中国科技部火炬中心与前瞻产业研究院，2020）。但是从中国科技部火炬中心发布的 2020 年民间孵化器、众创空间复工数据来看，公布的截至 2020 年 3 月 24 日火炬中心创业孵化机构复工复产监测上报数据：全国众创空间共有 5512 家填报数据，复工率为 88.5%，而 2019 年，中国众创空间数量约为 7874 家左右，大部分未复工的众创空间基本属于关停或注销状态（中国科技部火炬中心，2020）。

在政策驱动和创业氛围高涨的环境下，各地众创空间以及其他创业服务机构增速过快，早在 2018 年，学者黄嘉伟就对众创空间孵化能力存在的问题做出了分析，其认为：目前中国众创空间存在问题是，由于政策的利益驱使、众创空间扩张速度过快，许多众创空间建设未考虑自身能力与资源，服务水平过低，缺乏资源聚集整合的手段，很多众创空间无法提供创业团队所需要的服务；众创空间缺乏相关实验室以及资料库等，使服务孵化能力受限，从而导致创客及团队、企业入驻率低下继而关闭。很多民营企业的资本实力远远不及政府以及科研院所建立的众创空间以及孵化机构，根本无法提供创业团队所需的实验室等相关产品试验设备，也少有大学中的数据库资源，使得一些优秀的项目最终搁浅，虽然目前相关部门一直在推动高校与科研机构的资源向社会共享开放，而在具体实施与操作上仍存在不少困难（黄嘉伟，2018）。

由此可见，中国的众创空间发展在资源方面依旧需要进一步对创客所需资源进行了解，并根据创客资源需求进行更深入的研究。

1.2 JC 众创空间现状

2018 年 4 月成立于苏州的 JC 众创空间是一家以室内设计师为主体的众创空间。该众创空间截止到 2020 年 10 月入驻人数均未达到 2017 年 11 月正式下发的《苏州市众创空间管理实施细则（试行）》中苏州市众创空间的管理办法和绩效管理标准所规定的“在孵企业和团队（个人）数量不少于 20 家（个），其中企业占比不少于 50%；新增在孵企业包含在孵团队（个人）转化为企业”之要求（苏州市政府（苏市府），2017）。从目前的实际情况看，破解 JC 众创空间创客入驻问题至关重要。

为解决入驻率不达标的问题，JC 众创空间进行了三个阶段的策略调整，但均未有成效。第一阶段，从 2018 年 4 月起至 2019 年 3 月，通过媒体宣传、网络宣传、数字营销等方式进行品牌曝光。第二阶段，从 2019 年 4 月起至 2020 年 5 月，除通过品牌曝光的方式外，与第三方室内设计业务培训机构进行合作；同时在本阶段 JC 众创空间也通过搜集和洽谈装修材料供应商，举办了一系列的装饰材料及室内软装展来吸引室内设计师到场进行参观交流。前两阶段均未有效吸引创客及创客团队入驻。第三阶段，从 2020 年 5 月至 2020 年 12 月，为回笼资金，JC 众创空间开始进行单一的场地租赁服务，改变之前完全面向室内设计师群体的定位，也开始对有场地需求的各种个人和团队提供场地租赁服务。

JC 众创空间的初衷由于室内设计师创客及团队入驻率低下的问题已经被迫改变,所以破解影响目标群体即室内设计师创客及创客团队入驻的问题已迫在眉睫。经过本文作者的走访调研,通过曾到访过 JC 众创空间但未入驻、试入驻但期间退出的、试入驻期满后未正式入驻选择退出的室内设计师创客及团队负责人处了解到, JC 众创空间在创客所需资源的了解、满足创客资源需求方面存在为创客及团队提供的客户数量不足;提供的室内装修设计物料耗材的供应商品品牌数量不多、品类不全、供应价格偏高;与室内设计相关的学习、交流机会少等问题。

2. 文献综述

移动网络购物的出现与移动电子商务的发展有着密切的关系,是指消费者通过移动设备在网络上完成购买过程的活动(Ko, Eun, and Lee, 2009)。移动网络购物离不开移动网络购物平台的作用(张武康与郭关科,2019),其最大的特点在于打破了空间以及时间层面存在的制约,使消费者能够随时随地享受移动网络购物(Yang 与 Kim, 2012)。Marangunić与 Granić(2015)对 TAM 的广泛文献回顾表明,在对网络用户消费行为进行分析时,采用 TAM 的优势更高。在具体研究过程中,通过对 TAM 模型进行相应优化,便可实现对研究使用范围的拓展,与单独使用 TAM 结构相比,这种整合为消费者对技术的接受提供了更好的解释(Bailey, Pentina, Mishra, & Mimoun, 2017; Muñoz-Leiva, Climent-Climent,&Liébana-Cabanillas, 2017)。本研究在 TAM 中添加四个不同因素以扩展 TAM,将 TAM 模型通过合并具有重大影响的新因子和变量进行了扩展,将补充因素和变量纳入模型中,以便更好地解释消费者移动网络购物购买意愿的预测因子(Voss,Spangenberg,&Grohmann,2003Marangunićet al,2015)。将感知风险,信任加入研究,能提高其预测移动商务态度和意愿的能力(例如, Demoulin & Djelassi, 2016; Groß, 2014; Marangunić & Granić, 2015)。Pavlou(2003), Kim,Ferrin 与 Rao(2008)提升消费者信任和减少消费者风险是成功的电子购物网站和营销活动的重要因素。Schierz,Schilke 与 Wirtz (2010)研究注重于主观规范与态度之间的关系,但没有研究主观规范对感知有用性的影响。另一方面, Yang(2010)使用了一种由社交网络和图片组成的称为社会影响力的结构,其主要也将主观规范用以扩展 TAM。消费者网络购物决策将会受到感知价值的影响,伴随感知价值的提升,消费者购买意愿也就更为强烈(王崇与刘健,2012)。综上所述, TAM 对信息系统接受度的研究做出了决定性的贡献,其优势塑造了研究格局。基于这些原因,本研究也依赖于 TAM。为了能够最准确地测量即时购物的接受程度,在 Davis 等人(1989)的原始 TAM 中添加变量,使其适应本研究的研究背景。通过对本研究相关变量的文献进行梳理,在网络购物消费者行为的研究中购买意愿的研究比较丰富,而在移动网络购物平台环境下消费者购买意愿的研究较少。因此,本研究在结合移动网络购物平台环境下的特征,以消费者移动网络购物平台购买意愿为主线,对移动网络购物平台环境下主观规范、信任、感知风险和感知价值的内涵与结构维度及其对购买意愿的影响进行研究。

3. 研究假设

3.1 主观规范的研究假设

主观规范被定义为一个人的感知,是指个人对于是否采取某项特定行为所感受到的社会压力,亦即在预测他人的行为时,那些对个人的行为决策具有影响力的个人或团体对于个人是否采取某项特定行为所发挥的影响作用大小(Young & TKent, 1985)。Ajzen 与 Driver(1991)指出主观规范是个人在执行某种行为时所感知的重要参考人是否同意其行为的压力程度。Venkatesh 与 Davis(2000)的 TAM 扩展版本(TAM 2)在原始模型中增加了组织和社会因素,例如印象和主观规范。Pedersen(2005)通过合并行为控制和主观规范来扩展 TAM,以

产生可分解的 TPB，这被证明对解释早期研究移动购物的行为很有用。Gerpott 与 Thomas(2014)，Ovčjak, Polančič 与 Heričko (2015)的研究表明，较高的积极态度，主观规范，信任和自我效能感会导致使用移动购物的可能性更高。罗杰(2011)研究中认为大学生主观规范和周边影响也与消费者行为有着重要影响，同时 Phong,Khoi 与 Le (2018)也认为主观规范对移动购物的意愿有着积极影响。因此，在以前学者的研究基础上，本研究提出了以下假设来验证主观规范对消费者移动网络购物平台的影响：

H1：主观规范正向影响感知易用性。

H2：主观规范正向影响感知有用性。

H3：主观规范正向影响平台使用态度。

3.2 感知易用性与感知有用性的研究假设

根据 Davis (1986) 的观点，使用信息技术的行为开始于对信息技术的有用性和易用性的认知，根据有用一词的定义来定义有用性，即能够被有利地使用，或者可以被用于有利的目的，对有用性的感知是一个人相信他在使用它时能得到的好处。Denni Ardyanto (2015) Budyastuti and Iskandar (2018) 探讨了电子商务的有用性、易用性和信任度对使用者行为的影响。除了感知易用性之外，感知有用性是 TAM 的主要决定因素 (Brusch & Rappel2019)。感知有用性、易用性和行为意图是预期和实际结果的关键预测因素 (King 与 He,2006)。同时感知有用性也受到感知易用性的影响，因为任何新技术如果更易于使用，都会被认为更有用(Venkatesh & Davis, 2000)。在本次研究中认为，当在移动平台上进行网络操作时，大学生消费效率的提升，可借助于感知易用性和感知有用性概念来进行解释。因此，本研究提出以下假设：

H4：感知易用性正向影响感知有用性。

H5：感知有用性正向影响平台使用态度。

3.3 信任的研究假设

信任是一种主观的信念，即当受托人面临更高的不确定性和更大的失控风险时，当事人将履行其义务(Lu, Yang, Chau, & Cao, 2011; Zhou, 2013)。许多现有的研究将信任视为信息系统中的决定因素(Lee,MoonKim,&Yi,2015;H.-H.Lin&Wang,2006;Luo,Li,Zhang,&Shim,2010)。信任的建立有多种机制，根据以往的文献以及网络平台自身的特点，网络平台的信任建立机制可分类为(Stewart,2003);McKnight,Choudhury 与 Kacmar(2002); Grabner-Kraeuter (2002)Wang 和 Emurian(2005);Pizzutti 与 Fernandes (2010))：1.基于知识的信任。2.基于特征的信任。3.基于制度的信任。4.基于个人特质的信任。

对成员的信任包括两个维度，一是对其他成员能力的信任，二是对其他成员诚实和善行的信任，即相信其他成员会自觉遵守社会规范或原则。Marriott 与 Williams(2018)发现与感知风险和信任有关的方面可以预测客户使用移动购物购买意愿的意图。如果用户相信网络商家能够完成交易，会信守承诺并注重用户利益，那么用户的信任信念就更高。

因此，本研究提出以下假设：

H6：感知易用性正向影响信任。

H7：信任正向影响感知有用性。

H8：信任正向影响平台使用态度。

3.4 感知风险的研究假设

感知风险理论认为消费者采取任何行为都有一定的无法预测的结果，结果的属性有可能是不好的，而这些认知都会影响其使用移动网络购物平台的态度(AlSoufi & Ali, 2014)，

本研究认为感知风险可以反映大学生对感知风险的态度，会影响其使用移动网络购物平台意愿。感知风险是指消费者使用移动网络进行购物可能预期造成的伤害或损失。用户在进行消费操作时，实际上并无法较为准确的实现对自身行为后果的预测。基于此，在此过程中实际上会感知到一定风险，但是，对于该风险而言，同实际风险存在较大差异。Marangunić等（2015），Groß（2015），Demoulin与Djelassi（2016）等学者为了提高移动购物态度及意愿的解释度，呼吁将感知的风险，信任和享受加入 TAM 模型进行扩展研究。当消费者使用移动网络购物平台交易时，其感知风险越强烈，那么这种感觉会影响大学生使用移动网络购物平台的购买意愿。因此本研究提出了以下假设：

H9 感知风险负向影响感知有用性。

H10 感知风险负向影响平台使用态度。

3.5 感知价值的研究假设

感知价值理论是来源于市场营销学中的消费者价值理论（Zeithaml,1988），他认为感知价值就是消费者对于所能够感知到的利益与其所获得的产品（服务）时所付出的成本进行比较权衡之后，对于产品或者服务的效用的总体的评价。

消费者网络购物决策将会受到感知价值的影响，伴随感知价值的提升，消费者购买意愿也就更为强烈（王崇与刘健，2012）。耿黎辉与姚佳佳(2020)研究表明感知价值对购买意愿具有正向影响。敖娇(2014)针对感知价值进行了划分，将其分为下述方面，即：安全、娱乐、产品、服务、易用性。感知价值是消费者基于其所得和付出而对产品或服务效用的总体评价（白长虹，2001）。是消费者在交易中所获得利益与为获取该利益而付出成本的二者权衡（Wood & Scheer 2006）。董岩、时光与时雨甜(2020)研究了线上营销对网络消费者购买行为的影响发现消费者感知价值对消费者感知风险有显著负向影响；消费者感知价值对消费者态度有显著正向影响。因此本文提出了以下假设：

假设 H11 感知价值正向影响感知有用性。

假设 H12 感知价值正向影响平台使用态度。

3.6 平台使用态度的研究假设

Davis(2000b) 认为人们对新技术的采纳平台使用态度是影响其使用新信息技术系统意向前置因素。在许多现有研究中，人们已经证实了使用新技术的态度与意愿之间存在正相关关系，其中，感知易用性和感知有用性是确定消费者对采用技术态度的先决条件(Kang, Hahn, Fortin, Hyun, and Eom, 2006; H.D.Yang & Yoo, 2004;S.Yang, Lu, Gupta, Cao, and Zhang, 2012)。李东进、吴波与武瑞娟(2009)在对中国消费者购买意愿模型中发现行为平台使用态度与行为之间的也是呈现显著影响的关系。Davis（1986）认为构建 TAM 对某个系统或技术进行研究取决于用户的行为意向，用户的行为意向受感知系统的影响较大，其次则是用户想用的态度。形成和巩固积极的消费者使用态度可以被认为是移动购物成功的关键（Khoi & Trang，2018）。在本研究中，平台使用态度既是购买意愿关系中重要变量。基于此观点，本研究提出以下假设：

H13：平台使用态度正向影响购买意愿。

H14：感知有用性在感知易用性对平台的使用态度的正向影响中起中介作用。

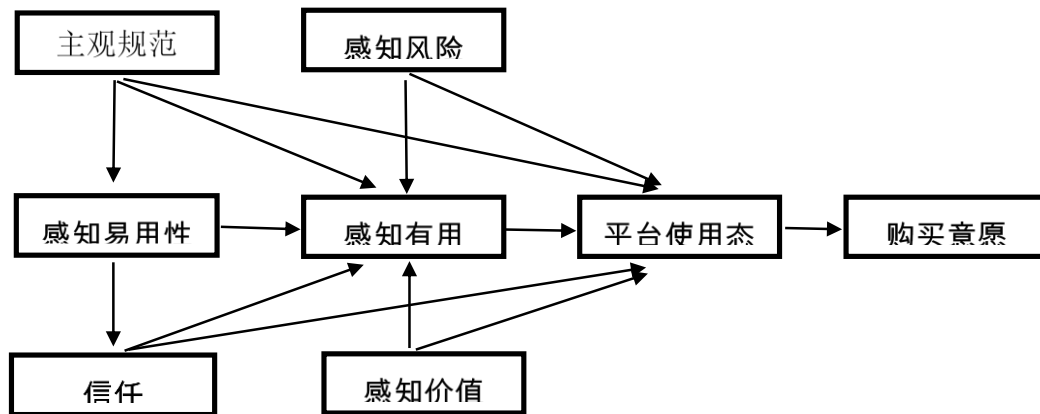


图 1： 假设模型图

4. 研究方法

本研究使用以下方法和数据分析工具分析问卷数据：

描述性统计分析。以样本数据为基础，对数据进行整理和归纳，借助频率、频数等统计指标来分析数据的趋势及整体特征。结构模型分析。结构方程模型旨在分析变量之间的相互作用关系，是多元统计的重要分析方法。在 Amos 26.0 中绘出测量模型，载入所收集的数据，结合相关分析指标，分析模型结构的拟合程度，当模型的拟合指标符合一般标准，便可以进行路径检验，以分析变量之间是否存在依赖关系以及确定其影响程度。

样本和数据测量：

本研究采用了目前最常用的 5-Point Likert Scale 调查问卷量表。问卷中，“1，2，3，4，5”，代表“完全同意、同意、不确定、不同意、完全不同意”五个层次。根据问卷中选取的具体项目，可以判断被调查者选择选项的意愿，即他们对某一问题的态度，这为本研究的数据基础奠定了基础。

调查问卷量表中使用 Davis(1989)、Venkatesh 与 Davis(2000)、Heijden, Verhagen 与 Creemers(2003)、Lin(2007)、Kim(2009)改编的题项来衡量 TAM 感知有用性；感知易用性和行为意图的题项，主观规范的变量改编自 Venkatesh 与 Davis(2000)；信任的题项来自于 Kim, Ferrin 与 Rao(2008)、ElSamen (2015)；感知风险 4 个题项来于 Featherman 与 Pavlou(2003)、Rafiqetal. (2012)，George 与 Kumar (2014)；感知价值题项来自于 Sheth(1991)。

本研究对象为贵州大学生消费者，随着一线和二线城市销售市场的日益饱和，移动网络购物平台迫切需要解决发现销售市场增加的问题，而下沉市场就成为各平台开创全新市场的未知空间，截至 2019 年 12 月，贵州网民网络购物的比例为 73.2%，其中移动购物网民占 43.9%，贵州市场还有很大的发展空间(贵州省通信管理局, 2020)。通过专业调查网站进行问卷调查和数据收集，为了尽可能地使样本具有代表性，调查问卷向贵州省本科学校和专科学校发放，发放学校包含了贵州省各地区院校，由学校老师随机发放并收集，其中本科院校为：1.铜仁学院；2.凯里学院；3.黔南民族师范学院；4.安顺学院；5.贵阳学院；6.贵州医科大学；7.遵义医科大学；8.六盘水师范学院。专科院校为：1.铜仁幼儿师范高等专科学校；2.铜仁职业技术学院；3.凯里职业技术学院；4.贵阳职业技术学院；5.贵州电子信息职业技术学院；6.贵州交通职业技术学院。共收回问卷 1453 份，其中无效问卷 239 份，最后获得有效问卷 1214 份。问卷调查的背景指标主要为相关人口统计指标的测量，分别为性别、年龄、收入水平等。分析结果具体数值汇总如下表：

表 1: 人口统计表

		频率	百分比
性别	男	597	48.18
	女	617	50.82
年龄	18 岁以下	34	2.80
	18-24 岁	1160	95.55
	24 岁以上	20	1.65
学历	专科	590	48.60
	本科	624	51.40
居住城市规模	省会城市	126	10.38
	地级市	204	16.80
	县级及以下地区	884	72.82
平均每月可支配金额	500-1000	730	60.13
	1001-1500	362	29.82
	1501-2000	78	6.43
	2000 以上	44	3.62
最高能接受的每笔消费	100 以下	385	31.71
	100-300	566	46.62
	301-500	136	11.20
	500 以上	127	10.46

5. 实证结果

5.1 信度和效度测试

本研究首先进行因子分析, 巴特利球体检验结果表明 KMO 值为 0.958, 并在 0.001 的水平下显著, 根据下表的值判断区间, 表明数据间相关性强, 适合进行因子分析。在进行主成分抽取和最大方差旋转后的因子结构如下表所示, 析出特征值大于 1 的 8 个因子, 方差解释率为 68.321%。

表 2: KMO 和 Bartlett 的检验

KMO 值□		0.958
	近似卡方□	22588.684
Bartlett 球形度检验	df	528
	p 值	0.000

为了本研究调查问卷的可靠性和准确性, 测量结果内部较高的一致性, 本研究采用 Cronbach's α 系数进行信度检验, 其中 Cronbach's α 值越大表示信度越高, 当 Cronbach's α 大于 0.7 时, 表示信度较好, 当该值大于 0.8 时则表示信度很好(Eisinga,Grotenhuis,& Pelzer,2013)。

表 3: 模型 AVE 和 CR 指标结果

Factor	平均方差萃取 AVE 值	组合信度 CR 值	Cronbach's α 值
感知有用性	0.465	0.813	0.816
感知易用性	0.612	0.826	0.823
感知风险	0.594	0.810	0.795
感知价值	0.509	0.805	0.805

表 3: 模型 AVE 和 CR 指标结果 (cont.)

Factor	平均方差萃取 AVE 值	组合信度 CR 值	Cronbach's α 值
主观规范	0.511	0.805	0.797
信任	0.603	0.883	0.882
平台使用态度	0.602	0.858	0.857
购买意愿	0.612	0.863	0.860

本次针对共 8 个因子, 以及 32 个分析项进行验证性因子分析(CFA)分析。从上表可知, 共 6 个因子对应的 AVE 值全部均大于 0.5, 且 CR 值全部均高于 0.7, 意味着本次分析数据具有良好的聚合(收敛)效度。过去学者建议 AVE 数值应高于 0.5 以上, 但因 AVE 若要高于 0.5 以上, 表示因素负荷量皆须高于 0.7 以上, 考量数据资料的实际面向, 亦可以 AVE 高于 0.36 以上为勉强接受标准(Fornell & Larcker, 1981)。

表 4: 区分效度: Pearson 相关与 AVE 平方根值

	有用	易用	风险	价值	主观规范	信任	态度	购买意愿
有用	0.682							
易用	0.667	0.783						
风险	0.329	0.454	0.771					
价值	0.563	0.471	0.316	0.713				
主观规范	0.528	0.483	0.307	0.660	0.715			
信任	0.386	0.300	0.110	0.636	0.599	0.777		
态度	0.561	0.436	0.239	0.685	0.678	0.653	0.776	
购买意愿	0.602	0.532	0.291	0.601	0.651	0.518	0.764	0.782

5.2 假设验证

表 5: 模型回归系数汇总表格

X	→ Y	非标准化路径系数	SE	z (CR 值)	p	标准化路径系数
感知有用	→ 平台使用态度	0.245	0.037	6.702	0.000	0.239
感知易用	→ 感知有用	0.784	0.056	13.926	0.000	0.699
感知易用	→ 信任	0.524	0.044	12.040	0.000	0.426
感知风险	→ 感知有用	-0.026	0.020	-1.305	0.192	-0.034
感知风险	→ 平台使用态度	-0.039	0.019	-2.037	0.042	-0.048
感知价值	→ 感知有用	0.308	0.055	5.632	0.000	0.329
感知价值	→ 平台使用态度	0.184	0.049	3.709	0.000	0.190
主观规范	→ 感知有用	-0.020	0.074	-0.272	0.786	-0.018
主观规范	→ 感知易用	0.660	0.041	16.002	0.000	0.670
主观规范	→ 平台使用态度	0.441	0.065	6.752	0.000	0.389
信任	→ 平台使用态度	0.282	0.023	12.401	0.000	0.301
信任	→ 感知有用	-0.052	0.024	-2.184	0.029	-0.057
平台使用态度	→ 购买意愿	0.999	0.040	24.824	0.000	0.890

感知风险对于感知有用影响时, 此路径并没有呈现出显著性($z=-1.305$, $p=0.192>0.05$), 因而拒绝 H9。主观规范对于感知有用影响时, 此路径并没有呈现出显著性

($z=-0.272$, $p=0.786>0.05$), 因而拒绝 H2。信任对于感知有用影响时, 标准化路径系数值为 $-0.057<0$, 与假设相反, 因而拒绝 H7。

通过修正后得结构方程模型路径可知, 感知有用对于平台使用态度影响时, 标准化路径系数值为 $0.239>0$, 并且($z=6.777$, $p=0.000<0.01$), 因而 H5 成立。感知易用对于感知有用影响时, 标准化路径系数值为 $0.684>0$, 并且($z=15.780$, $p=0.000<0.01$), 因而 H4 成立。感知易用对于信任影响时, 标准化路径系数值为 $0.418>0$, 并且($z=11.968$, $p=0.000<0.01$), 因而 H6 成立。感知风险对于平台使用态度影响时, 标准化路径系数值为 $-0.049<0$, 并且($z=-2.087$, $p=0.037<0.05$), 因而 H10 成立。感知价值对于感知有用影响时, 标准化路径系数值为 $0.276>0$, 并且($z=8.325$, $p=0.000<0.01$), 因而 H11 成立。感知价值对于平台使用态度影响时, 标准化路径系数值为 $0.190>0$, 并($z=3.727$, $p=0.000<0.01$), 因而 H12 成立。主观规范对于感知易用影响时, 标准化路径系数值为 $0.667>0$, 并且($z=15.971$, $p=0.000<0.01$), 因而 H1 成立。主观规范对于平台使用态度影响时, 标准化路径系数值为 $0.390>0$, 并且($z=6.758$, $p=0.000<0.01$), 因而 H3 成立。信任对于平台使用态度影响时, 标准化路径系数值为 $0.300>0$, 并且($z=12.219$, $p=0.000<0.01$), 因而 H8 成立。平台使用态度对于购买意愿影响时, 标准化路径系数值为 $0.890>0$, 并且($z=24.781$, $p=0.000<0.01$), 因而 H13 成立。

表 6: 模型回归系数汇总表格

X	→ Y	非标准化路径系数	SE	z (CR 值)	p	标准化路径系数
感知有用	→ 平台使用态度	0.248	0.037	6.777	0.000	0.239
感知易用	→ 感知有用	0.759	0.048	15.780	0.000	0.684
感知易用	→ 信任	0.513	0.043	11.968	0.000	0.418
感知风险	→ 平台使用态度	-0.039	0.019	-2.087	0.037	-0.049
感知价值	→ 感知有用	0.257	0.031	8.325	0.000	0.276
感知价值	→ 平台使用态度	0.183	0.049	3.727	0.000	0.190
主观规范	→ 感知易用	0.658	0.041	15.971	0.000	0.667
主观规范	→ 平台使用态度	0.442	0.065	6.758	0.000	0.390
信任	→ 平台使用态度	0.281	0.023	12.219	0.000	0.300
平台使用态度	→ 购买意愿	0.999	0.040	24.781	0.000	0.890

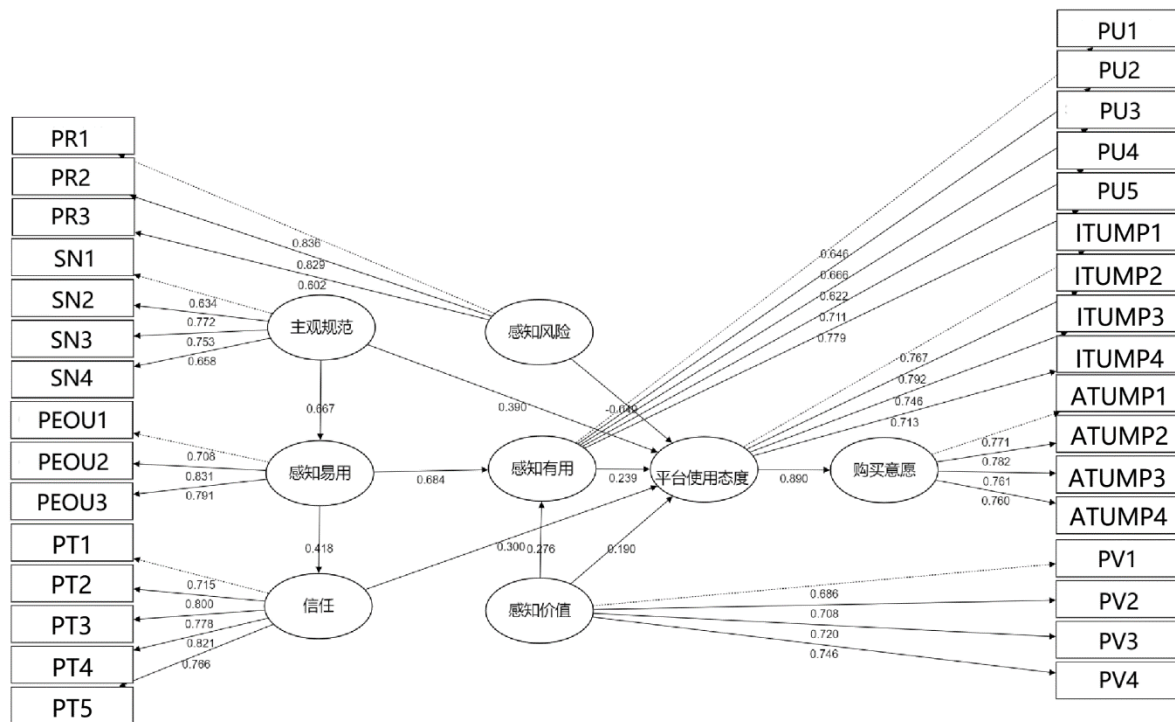


图 2： 结构方程路径图

结构方程模型拟合指标情况分析，其中 RMSEA 0.067，RMR 0.065，CFI 0.907，NFI 0.909，NNFI 0.900，TLI 0.900 达到指标标准，IFI 0.887，GFI 0.844 未达到大于 0.9 的判断标准，但是达到了大于 0.8 的最低判断标准。

表 7： 结构方程模型拟合指标

常用指标	GFI	RMSEA	RMR	CFI	NFI	NNFI	TLI	IFI
判断标准	>0.9	<0.10	<0.05	>0.9	>0.9	>0.9	>0.9	>0.9
值	0.844	0.067	0.065	0.907	0.909	0.900	0.900	0.887

5.3 中介变量验证

表 8： 中介作用效应量结果汇总

项	检验结论	c	a*b	c'	效应占比计算公式	效应占比
感知易用性=>感知有用性=>平台使用态度	完全中介	0.189	0.153	0.036	-	100%
感知风险=>感知有用性=>平台使用态度	中介作用不显著	-0.027	-0.002	-0.025	-	0%
感知价值=>感知有用性=>平台使用态度	部分中介	0.651	0.082	0.568	$a * b / c$	12.627%

由上表可知,感知价值=>感知有用性=>平台使用态度起着部分中介作用,感知易用性=>感知有用性=>平台使用态度起着完全中介作用,H14成立。

6. 结论与启示

本研究探索与验证了移动网络平台购物环境下购买意愿的结构维度。已有的移动网络购物结构维度研究还不够全面、系统,尤其是缺乏针对感知价值、感知风险、主观规范和信任变量的研究。通过对研究文献的梳理,构建了基于移动网络购物平台的大学生购买意愿的理论模型,并进行了理论逻辑推演和阐释。本研究在 TAM 基础是引入主观规范和信任因素,加深了移动网络购物平台购买意愿的研究。

6.1 研究得出得主要结论有:

1) 主观规范正向影响感知易用性,主观规范正向影响平台使用态度。

主观规范属于社会影响的一种,人类作为社会群体中的一员,其行为深受社会群体的影响,且常有从众现象。移动购物新用户通常是经身边的亲戚、朋友介绍和推荐而了解到这一新兴购物方式,消费者将对亲戚朋友的信任会投射到他们推荐的东西上,因此在消费者感知到他人希望我采取进行移动购物行为的观点时,就会产生移动购物意愿,这也说明了 H3 的合理性。同时除亲戚朋友外,电视媒体等的肆意宣扬也可能会对消费者造成影响(H1),了解得越多其对易用性得影响也就越多。

2) 感知有用性正向影响平台使用态度,感知易用性正向影响感知有用性,感知易用性正向影响信任。

说明了消费者之所以更倾向于使用移动网络购物平台,是因为移动网络购物平台的感知有用性和感知易用性高过了其它交易手段(H5)。消费者们更喜欢快捷、方便、简单的交易形式。

实证结果表明,将 TAM 与主观规范和信任因素结合起来比单独使用 TAM 构造更好地说明了消费者的使用态度和意图。感知易用性对感知有用性和信任均具有积极而显著的影响(H4)。如果系统不复杂且易于使用,消费者对采用移动网络购物平台的使用态度会更积极。如果消费者发现只用一根手指就可以轻松地浏览,比较商品和购物,而无需复杂的过程,那么消费者会更倾向于对移动网络购物平台有用性的看法。而感知易用性同时也积极得影响着信任因素(H6),随着 5G 时代得来临,移动网络环境得到了大幅度的发展,各类移动网络购物平台更加方便快捷,移动网络支付形式简单且安全,移动网络购物平台的便利性和更人性化的设计让消费者在使用移动网络平台购物的信任得到提高。

3) 信任正向影响感知有用性。信任正向影响平台使用态度。

信任是个复杂的因素,它通常适合积极的态度联系在一起。消费者对移动购物方式产生信任,意味着消费者认为移动购物是可靠的。由此也可说明 H8,信任对移动购物态度产生正向影响,消费者对移动购物方式越信任,移动购物态度越积极,消费者对移动购物方式越怀疑,移动购物态度越消极。在移动购物环境中,消费者看不见也摸不着商品,更是见不到卖家,难免会对这种情境产生不信任感,此时消费者对移动购物会产生怀疑、疑虑等负面态度,不利于促进移动购物行为。

4) 感知价值正向影响感知有用,感知价值正向影响平台使用态度。

国外学者较早地对消费者感知价值的驱动因素进行了研究(Sheth, Newman & Gross, 1991),将 TAM 与感知价值因素结合起来比单独使用技术接受模型构建更好地说明了消费者的态度和意图。感知价值正向影响感知有用,感知价值正向影响平台使用态度。目前, Park, Yap 与 Makkar (2019) 的研究极大地丰富了感知价值理论,提出了移动购物感知价值属性

的十个维度，即：信息价值，界面价值，定制价值，游戏化价值，满足价值，信誉价值，社会价值，便利价值，经济价值和视觉价值。这些维度是由于其独特的特性而专门针对移动电子商务而提出的。

5) 感知风险负向影响平台使用态度。

消费者感知风险的概念是由哈佛大学的 Bauer(1960)从心理学延伸出来的，消费者感知风险的影响因素有多种，包括环境因素（互联网因素、网站因素、网站的可信度）；主体因素（消费者因素、零售商因素），其中消费者因素包括消费者的性别、喜好、网购经验、消费能力等；客体因素（产品因素、价格因素），本研究通过对 TAM 模型进行扩展研究，证明了感知风险负向影响平台使用态度（H10）。

6) 平台使用态度正向影响购买意愿。感知有用性在感知易用性对平台的使用意图的正向影响中起中介作用。

平台使用态度正向影响购买意愿（H13），在许多现有研究中，人们已经证实了使用新技术的态度与意愿之间存在正相关关系，其中感知易用性和感知有用性是确定消费者对采用技术态度的先决条件。同时感知有用性在感知易用性对平台的使用意图的正向影响中起中介作用(H14),当内在因素、对象动机、中介因素三方面互相作用，便会产生态度以及购买打算，随着其他因素的参与，最终出现购买行为。

6.2 相关建议

1) 移动网络购物平台企业以大学生为服务对象时，应注重大学生的消费能力，提升大学生消费者对移动网络平台感知价值的感受。同时移动网络购物平台在推广过程中，需要提升对有用性方面的重视度，通过强化此方面的宣传力度来更好的实现对平台的推广。

2) 增强对移动客户端优化的重视程度，降低大学生依托移动网络购物平台交易的难度，使平台的可操作性更强。若要增强感知易用性，必须兼顾硬件以及软件两个角度。因此，对于电子产品提供商而言，其应将重点放在硬件升级研发，以给予市场体验更佳的购物载体。其次，对于软件，服务提供商必须不断优化移动网络购物平台以及 APP 客户端，提供更好的视觉效果，健全网站信息架构，优化购物支付渠道，提升消费者的综合购物体验。为大学生消费者提供便利的同时，使其对此类交易方式形成依赖。

3) 企业推广应提升消费者的社会影响效应。创建一种以消费者信任为标准，以经验营销为指导的营销方法。一是最大限度方便消费者，扩大消费群体。企业可以重点简化用户的购物程序，简化付款的流程。二是进行自我改进，使消费者对企业产生好感。企业要以优质的服务赢得消费者的认可，从而成为企业的忠实消费者。

4) 注重提升移动网络购物平台交易中的附加价值，让大学生消费者在交易的同时获得更多感知价值，创造移动网络购物平台的竞争优势。作为移动网络购物平台企业，在推广其移动网络购物平台时应对其平台内的产品信息选高质量价格较好的产品，给予像大学生这种经济状况较差的消费者物超所值的映像及体验。在吸引力上，必须令大学生感受到其趣味性、时尚能够获得人们的关注，在交易的过程中能获得互动性的服务，增加交易的趣味性。使大学生消费者能够在使用移动网络购物平台时获得其它平台交易所不能得到的主观价值，这也是移动网络购物平台竞争优势的所在。

6.3 研究局限及展望

本研究虽然对构建的理论模型进行了理论逻辑推演和阐释，并进行了实证研究验证，但是研究只是一个初步的尝试，仍然存在局限性，意图并不能完全反映消费者的实际行为，变量选择还可以更加的全面。同时本研究调查只安排在一个时间点，因此是一项横断面研

究。纵向研究将有可能观察被检查变量的特征变化及其随时间的相关性。随着时间的推移,也可以观察到缓和作用。

在未来的研究中,消费者如何使用移动网络购物平台进行购物是值得探讨的。除此之外,测试移动网络购物平台使用者和非使用者之间的差异也很有价值,因为之前的研究表明这两个群体之间存在差异。其次,未来的研究可以考察消费者个性因素等其他因素的影响,例如创新性和自我效能、系统质量等作为现有关系的潜在调节因素。同时,本研究发现感知风险并没有对使用意图和使用行为有影响,未来的研究可以检查这一发现不一致背后的原因。

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中医药国际教育战略联盟的竞合强度对绩效的影响

THE EFFECT OF THE COOPERATION AND COMPETITION INTENSITY OF STRATEGIC ALLIANCE OF INTERNATIONAL EDUCATION FOR CHINESE MEDICINE ON PERFORMANCE

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摘要

20 世纪 90 年代以来, 中医药国际化已是大势所趋。中医药国际教育中医药国际化的基础性工作, 也是目前开展的历史较长、影响范围较广的领域。目前关于该领域的运行机制、发展逻辑、演化路径的现代科学研究较少。

基于制度理论、资源依赖理论和社会交换理论, 本文描述了中医药国际教育战略联盟影响绩效的研究和关系理论。从理论和实践层面结合已有文献情况得出本文的研究结论, 阐释研究意义, 继而提出政策建议。文章还讨论了未来进一步深化研究的方向。

关键词: 中医药国际教育战略联盟的合作与竞争强度 绩效

Abstract

Since the 1990s, the internationalization of Traditional Chinese Medicine(TCM) has been an irresistible tendency for the public. International education of TCM is one of the basic work of internationalization of TCM with a long history and broader impacts outside of China. However, there are few modern scientific researches on the mechanism, logic development and evolution path of this field.

Based on institutional theory, resource dependence theory and social exchange theory, this paper describes the effect on the performance of TCM international education strategic alliance. The paper also explains the significance of the research, then puts forward the policy suggestions, finally which discusses the direction of further research.

Keywords: Cooperation and Competition Intensity of Traditional Chinese Medicine International Education strategic alliances Performance

引言

中医学是中华民族在几千年不断与疾病作斗争的实践中逐步形成的传统医学。有其独特的理论体系和出色的临床疗效, 以简、廉、便、易著称, 在各主要经济体传播历史较长。此次 COVID-19 疫情, 中医以其明显的优势在中国抗疫战争中发挥了巨大作用, 客观上加速了这一进程。

目前为止，中医药已传播到 183 个国家和地区。据世界卫生组织统计，目前 103 个会员国认可使用针灸“目前海外有中医药业余教学机构约 1500 所，每年向全球输送约 3 万名中医药技术人员”。

中医药国际教育

1956 年起中国高等中医药国际教育经过半个多世纪的发展，取得了丰硕成果。中医药国际教育是中医药国际化的基础性工作，跨越了社会学、管理学、传播学、情报学、心理学、语言学、信息工程学和大数据研究等多学科，是目前开展的历史较长、范围较广，特点突出并受到各国法律保护的领域。目前对这一领域内在运行机制和路径、发展规律的现代科学研究较少。

目前国内已有 20 余所中医药院校开展各种形式的中医药国际教育。与此同时，中国境外的中医药教育得到了蓬勃发展，约有 160 个国家和地区开展了中医药教育，中医药教育机构近 700 家。

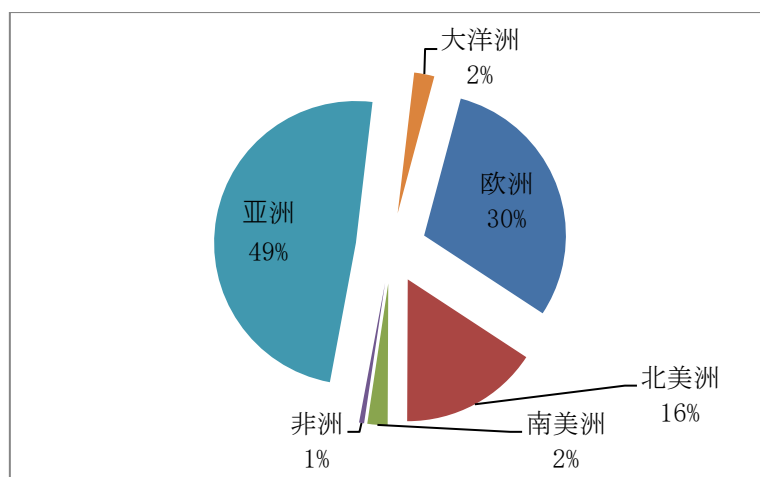


图 1: 国外中医教育机构各大洲分布图

数据来源：张伯礼，石鹏建，洪净.中医药高等教育发展战略研究

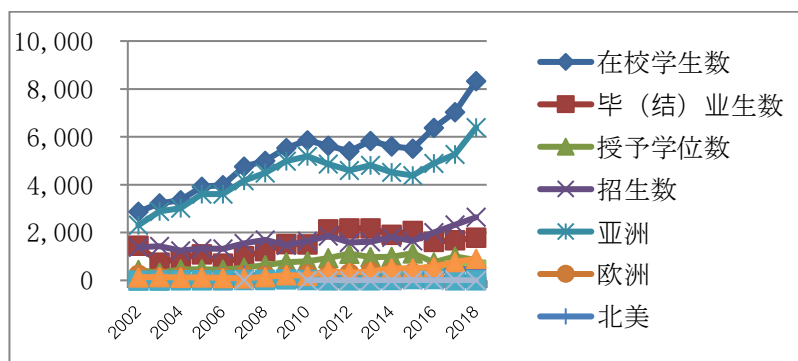


图 2: 中国高等中医药院校留学生统计折线图（2002-2018）

数据来源：中国国家中医药管理局 2002-2018 年《全国中医药统计摘编》



进入 21 世纪, 来华学习中医药的国际留学生规模呈现继续快速增长势头。中国国家中医药管理局从 2002 年起在每年公布的《全国中医药统计摘编》, 都要汇报全国中医药院校和研究机构留学生基本情况。

2019 年中国教育部国际合作司数据和中国国家中管局数据对比显示: 中国 2956 所高校中的具有招收留学生资质的 20 所中医药高等院校承担了来华中医药留学生中的 40% 以上, 因此中国的中医药高等院校是中医药国际教育传播的主体。

研究目的

本文研究目的立足探索如何促进中医药国际教育战略联盟进行中医药文化传播的绩效, 研究的理论意义主要表现为以下几方面。

第一, 本文通过中医药战略联盟与中医药国际教育绩效的关系进行分析, 探究战略联盟通过资源控制, 通过刺激绩效的机制反向影响联盟的稳定性。本文揭示了战略联盟竞合强度如何作用于绩效。从理论逻辑上揭示“结构——后果”的论证结构, 解释了中国情景下战略联盟作用机制, 细化并丰富了战略联盟领域的研究内涵。

第二, 本研究从理论上对于战略联盟基于社会交换理论对社会关系进行调整的组织行为进行研究, 发现其遵循了互惠原则并如何通过互惠原则刺激联盟结构调整, 并如何使战略联盟对绩效产生作用的机理成为本文的重要理论贡献之一。

文献综述

1. 战略联盟竞合强度

Teece 等指出战略联盟指为共同战略利益, 实现共用相互资源、共同拥有市场等战略目标, 两个及以上有着对等经济实力的企业或特定事业部门以各种协议、契约或股权等形式构成的生产要素双向或多向水平流动, 风险共担、优势互补的松散网络组织 (Teece, 1992; Culpan, 1993; Inkpen, 1995)。

Das 和 Teng(2000)提出联盟中存在的三对张力——合作与竞争、刚性与弹性、长期定位与短期定位是导致其不稳定的根源所在。根据陈菲琼 (2007) 指出“合作竞争已经成为现代市场经济环境的客观要求。单个企业能力的不足决定了联盟的主要形式表现为合作, 然而, 企业生存和发展的本质需求意味着合作背后永远是利益的博弈。”

战略联盟合作与竞争这对矛盾推动着联盟的发展, 其竞合强度决定了联盟的稳定性和存续。矛盾的无处不在决定了中医药国际教育战略联盟中伙伴间存在“学习竞赛”, 合作与张力等内在结构性矛盾同样决定着联盟的稳定性。

2. 绩效

绩效是一个多维构念。是组织为实现其目标在不同层面上的有效输出, 是组织达成特定目标的程度, 是组织期望的结果。Campbell (1977)视组织绩效为一个构造, 由组织绩效的理论模型来建构。

联盟的目的是增加组织竞争力: 中医药因为市场弱小, 国内中医药院校必须扩大国际市场影响力; 国外中医医疗机构, 必须解决行业规模过小问题; 双方在中医药国际教育市场上从扩大市场、提高地位的共同利益需要进行组织结构变化, 适应组织环境。从联盟获取资源, 通过相互学习是联盟成立的目的的观点成为共识, 组织竞争力是组织利用全部资源和能力的效率差异总和 (周建, 2000); 徐二明 (2012) 指出战略联盟伙伴间的合作和竞争关系在价值创造和增值等两个价值链的不同阶段的表现不同; 资源互补和机会主义之间的关系呈倒 U

型的关系。Mudamb (2004) 根据资源依赖理论提出“权力来源于组织中或组织间对战略资源的控制”中医药国际教育战略联盟的联盟伙伴常常表现为国内是中医药大学为主的公立大学和研究所，通过雄厚资源获得了中医药国际教育市场中获得了一定的市场权力，在提供中医药国际教育产品中获得了高市场权力；而国外联盟伙伴常常在东道国市场具有一定影响力，在吸引生源市场获得了高市场权力。这样的组织结构与市场权力的平衡关系长久支持了这一特殊联盟的稳定性。中医药国际教育战略联盟主动通过内部的竞合强度产生的联盟稳定性影响绩效。竞争与合作作为联盟的内生性的矛盾存续于联盟存续的全过程，在这一过程中互惠原则通过市场权力的激励诱导下规制了联盟稳定性，市场权力也主导了资源的分配。联盟伙伴因独占东道国的当地中医药诊疗资源和一定市场的品牌知名度使得其与国内联盟时，具有得天独厚的资源条件，从而生源和东道国市场高市场权力，增加了双方的合作意愿，提高了联盟的稳定性。市场权力使得联盟双方基于资源需要共同打造中医药国际市场、努力传播中医药并形成自律机制，一定程度压制了竞争，支持了合作。**资源依赖理论**

资源依赖理论是组织理论的关键理论。Benson, Pfeffer 与 Salancik (1978) 提出资源依赖理论，其基本假设是任何一个组织都不可能拥有全部所需资源，组织是不同利益群体的联合体，其生存的关键是获取和维持资源的供给，只有与外部环境互换资源，才可以实现组织战略目标或组织的可持续发展。

Pfeffer & Salancik (1978) 在《组织的外部控制：对组织资源依赖的分析》对组织与外部环境的关系进行了描述：为得到更多资源，组织对外部环境极其依赖，组织嵌入了环境。只有通过环境才可以实现战略、获取成功的关键资源、组织才能够生存下去，而这种有效性的获得是对环境的需求进行管理的结果，

任何组织都是存在于若干个下一层级及更下层级组织构成的大环境中，并不能独立存在。由于环境在资源提供存在不确定性，组织为获得稳定资源，会积极采取如交换、联盟及合并等手段来减少对外部资源的依赖。组织实施的所有活动都是为了使其获得资源、适应环境，组织的经营行为与组织的资源环境、制度环境相关联。因此组织就对环境产生了资源依赖，其对外部环境的依赖程度取决于要获取资源的稀缺性及重要性。组织与外部环境的其他组织不断互换资源，在资源互换中会遇到各种问题，阻碍组织对资源的获取、交换。这时，环境的不可依赖性对于组织的反作用非常明显。

组织是外部环境的依赖者、塑造者。组织的生存要求组织积极有效进行内部调整的同时必须很好地适应环境并改造环境，通过战略选择积极从环境获取资源而造成的限制因素和不确定性，组织的合作战略及时间要适应环境变化。（菲佛、萨兰基克，2006：2-5,23）

Hillman et al. (2009) 提出：组织是组织关系和社会的基本单位，其关注点是组织存续。组织存续需要资源，但常常无所需全部资源，必须与环境交换，从而导致了与外部环境相互依赖，组织受到这一关系网络约束。为获得存续资源，组织必须与环境（包括组织）互动，由于组织间的相互依赖性和组织依赖的行动不确定性导致了组织生存的未知性。组织存续同时建立在它所控制自身与其他组织关系能力上。其依赖模式会对组织间、组织内影响力、从而组织行为产生影响。

综上，资源依赖理论认为组织战略的制定和结构调整的目标是获取组织生存所必须的资源，消除外界的过度依赖、降低组织发展的不确定性，创造更好的外部环境。对于每一个组织而言，制度环境、资源环境一直是运动变化的，资源的供给与交换效率也在不停运动之中，环境的变化为组织创造发展机遇的同时也带来生存威胁。当无法迅速进行组织调整与环境

相匹配,则容易被社会淘汰(费显政,2006)。因此密切关注外部环境,协调自身制度改变,有利于刺激组织绩效。

各国的制度环境决定了中医药国际化在该国发展状态,决定着该国中医药国际教育联盟的组织形式、资源分配、市场表现等。因此研究清楚中医药国际教育联盟就有必要研究清楚资源依赖理论发挥的作用。

4. 社会交换理论

Georg Simmel (1900) 在《货币的哲学》开创了社会交换理论研究。Adam Smith 在《国富论》阐释了“供求法则”。Claude Levi-Strauss, 提出互惠交换的原则: 所有稀缺性资源都被规范与价值观束缚着; 个体在进行市场交易时, 如果一方得到了稀缺性资源, 作为报酬则需要将己方的资源提供给对方。社会学就是基于各种交换关系在互惠规则的约束下进行提出交换理论(Turner, 2001)。

G.C.Homans 率先提出了以经济学原则为基础的现代社会交换理论, 认为人们会对某种市场行为而得到收益进行精确计算, 并希望利益最大化。Blau 的交换理论, 将个体交往延伸到群体交换, 认为互相交往的群体促使了社会结构的形成。Emerson 行动者在所在的网络结构与他人互换资源, 促进了社会结构的形成; 从过去的二方交换延伸到网络交换, 并以行动者谈判以及行动者不谈判的形式出现在网络结构进行资源交换。前者的交易是谈判式的, 后者的交换则是互惠式的。

李艳春(2014)认为所有社会互动行为(不包括经济交换行为)均属于社会交换。Turner(1998,2001)认为社会交换遵循下列交换原则: 张力原则、吸引原则、权力原则以及价值原则(石军伟、付海艳, 2010)。

文献表明社会交换动机分析上, 前人研究认为, 资源占有的不平等, 导致行动者为了获得所需要的资源与外界进行资源交换并建立了社会关系; 交换过程成为了建立社会关系的基础; 关系作为一种资源, 能够为行动者找到更多资源并融入行动者的关系里(石军伟、付海艳, 2010)。社交关系在给人们带来经济利益的同时使人们收获了尊重、信任、誉等长远的收益, 使得这些交换行为更有利于人类的可持续发展, 所以相较经济利益而言, 人们更关注社会关系的建立,

中医药国际教育战略联盟是一种基于社会交换原则基础上的资源互补的社会关系行为, 联盟伙伴及联盟所有组织行为理论和实践上都遵循了张力原则、吸引原则、权力原则和价值原则, 上述原则是本文关注的战略联盟对绩效产生作用的机理之一。

中医药国际教育联盟伙伴间常常呈现的特点是中方伙伴具有中国国内得天独厚的丰富的中医药资源、政策法律支持、人才优势、雄厚的教学科研力量、完整的体系以及国际教育常常所需的财政资源等其他各项资源; 外方伙伴往往除了常规的市场优势外, 还具备法律等正式制度距离、东道国医患的情感资源以及人脉资源等各项资源, 这使得联盟的交换资源范围不再局限于表面的教育合作范围, 扩大到中医药国际教育发展所需的各项资源, 这些资源的交换和利用直接决定了中医药国际教育战略联盟的联盟绩效。

研究方法

1957 年 9 月, 北京中医学院招收首批外国留学生。1976 年受世界卫生组织委托, 北京、南京、上海中医学院分别建立“国际针灸培训中心”, 面向全球招收了 200 名左右来华学习中医药的留学生, 开启了中医现代国际化教育时代。目前国内已有 20 余所中医药院校开展各种形

式的中医药国际教育。与此同时,中国境外的中医药教育得到了蓬勃发展,目前约有 160 个国家和地区开展了中医药教育,中医药教育机构近 700 家。

中医药国际教育联盟及研究涉及的领域里相关文献进行了回顾与系统性梳理,为后续研究提供了理论依据和知识储备,同时也为本研究要解决的重点问题找到方向。并基于中医药国际教育联盟合作与竞争强度、品牌知名度对绩效占用的影响机理,本文构建了理论模型和相关研究假设。通过实证分析,进行真实、可靠、准确的结论,严谨、科学的研究设计。围绕近年来发表的相关高水平文献进行梳理的基础上,寻求对初始测量模型可能存在的各变量、界定了本研究涉及的变量操作性定义、量表和测度。详尽说明了初始量表的来源、形成过程,由此进行了标准化问卷设计和调查、阐述了样本的选择与收集过程和数据分析方法,进行了验证模型和假设。

研究结果

在明显小众的中医药国际教育市场,战略联盟的结构性矛盾在互惠原则和市场权力作用下产生社会认同和信任(Das and Teng,1998),更好地协调了资源分配与贡献,刺激了价值创造,通过建立信任与个人关系降低了机会主义的风险(Das and Teng,1998; Bouncken et al,2016)。联盟间适度的合作与竞争强度,有助于“创造和获取价值(彭珍珍,2020)”,联盟的机会主义行为将会对绩效产生负面影响(徐二明、徐凯,2012; Ritala and Hurmelinna - Laukkanen, 2013; Bouncken et al,2016),通过参与和互动,联盟伙伴的合作关系得以深化和扩大,关系规范和相互信任得以发展(kogut and zander,1992),从而降低了交易成本、提高了联盟绩效、减少了机会主义风险,联盟内部维系隐形成本降低也刺激了联盟长期绩效。对联盟伙伴的合作与竞争强度产生了强刺激作用,而制度理论的激励诱导和压力传导效应使得联盟的合作与竞争强度对绩效产生了相关性影响。

中医药国际战略联盟内部的竞争与合作强度决定了联盟的稳定性,在制度效应下,联盟伙伴通过资源占有地位获得市场权力,联盟内部市场权力按照互惠原则主导了联盟伙伴间的资源分配过程。因此中医药国际战略联盟内部的竞争与合作强度决定了联盟结构的发展变化并正向影响了绩效。中医药国际教育这一特定情景中“对对方资源的依赖”(Lechner et al,2016)决定了当前中医药国际教育联盟间合作是主流的趋势;总资源市场和生存压力(含考核压力)使得竞合强度凸显于伙伴关系中;

总结

矛盾的无处不在使得中医药国际教育战略联盟的稳定性取决于伙伴之间的竞合强度,当前中医药国际教育联盟普遍处于价值创造阶段,内生结构的矛盾并非联盟当前绝大多数情形下的主导力量,更大范围的合作使得中医药国际教育联盟对于中医药国际化的价值更加凸显。

讨论

中医药在国外医疗服务市场的合法性一直受到挑战,长期处于边缘地位决定了现阶段主要任务是千方百计扩大市场、扩大受众群体。当前必须抓住 COVID-19 疫情的有利时机做好品牌效应示范和受众心理,对全球抗疫斗争做出积极贡献的有利时机,做好中医药全球联盟品牌推广工作。充分利用机会,切实开展各项工作。为中医药融入东道国医疗体系,扩展生存空



间做好准备，同时也在中美脱钩风险加剧的今天，为中国力量增加东道国人民拥护的话语权和亲和力！

在中国情境下，尤其是中国传统非物质文化遗产中医药的国际化教育情境而专门开发的理论和量表较为缺乏，作为战略领域最重要的研究构念——绩效，在衡量深受国家政策和法律影响的非物质遗产的传统中医药国际教育市场明显缺乏有效衡量量表。受时间和精力限制，本文对此开发不足。是否存在维度过于单一，需要进一步验证。

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