Vol. 47. No. 8. August 2020

Formative Assessment in the Teacher Education in Vietnam

Nguyen Hoang Tien¹, Duong Thi Anh², Mai Van Luong³, Nguyen Minh Ngoc⁴, Nguyen Thanh Vuong⁵

- (1, 2. Saigon International University, Ho Chi Minh City, Vietnam;
 - 3. Thu Dau Mot University, Thu Dau Mot City, Vietnam;
- 4. Ho Chi Minh University of Finance and Marketing, Vietnam;
 - 5. Tien Giang University, Mỹ Tho, Vietnam)

Abstract: The central aim of this study is to investigate the effectiveness of the implementation of formative assessment practices in the leading teacher education institutions in Vietnam. This helps understand its impact in engaging and motivating students in their process of acquiring knowledge. Students need to rely on the assessment information in order to evaluate and improve their learning performance. Social interaction and group communication are essential channels for students to self-assess and peer-assess in a bid to define own strengths and weaknesses. The study employed questionnaire, in-depth interviews and observations as the research methods. The results of this study showed that students are engaged and involved in learning by formative assessment practices which help them shift the process of acquiring knowledge forward. Other factors impacting the implementation of formative assessment including class-size, portfolios, and curriculum etc. are also discussed in this study.

Keywords: formative assessment, self-assessment, peer-assessment, involvement, engagement

越南教师教育中的形成性评估

摘要:这项研究的主要目的是调查在越南领先的师范教育机构中实施形成性评估做法的有效性。这有助于了解其在吸引和激励学生学习知识过程中的影响。学生需要依靠评估信息来评估和提高他们的学习成绩。社交互动和小组沟通是学生进行自我评估和同伴评估的基本渠道,以定义自己的优势和劣势。该研究采用问卷,深入访谈和观察作为研究方法。这项研究的结果表明,学生通过形成性评估实践来参与和参与学习,这有助于他们向前发展获取知识的过程。本研究还讨论了影响形成性评估实施的其他因素,包括班级规模,档案袋和课程等。

关键词:形成性评估,自我评估,同伴评估,参与,参与

Introduction

Tertiary education in Vietnam is tradition-oriented with predominantly knowledge-based teaching [24] which is due to the policy and administrative systems, or even due to the differences in customs, beliefs and culture of the country [48]. Meanwhile, the national education system currently faces the problems of

Received (date): June 15, 2020

unqualified workforce in which 65% of graduates have to take additional education to meet employers' demand [33] and only 50% of graduates can find jobs in their majors [42, 43, 47]. The ongoing problems in Vietnam's higher education include declining academic standards, increasing teaching by free-lance lecturers, large-size classes, diminishing values of academic degrees due to oversupply of graduates in the labor market [2, 3, 5, 13, 27, 36].

Studying at the universities means that students are increasingly expected to distinguish themselves in the dynamic and competitive higher education environment [8, 17, 38, 46]. Formative assessment as described in the international literature assists students to be self-driving and self-regulating on their knowledge acquiring process [4, 5, 10, 11, 28].

In general, teacher education system in Vietnam consists of three years training for expertise subjects and approximately one year studying pedagogical courses and teaching practices. One of the emerging issues in teacher education here how to respond to changes in hi-tech generation and international integration [40, 41]. At the same time, another issue is how to engage students to develop certain competences for the advantage of their future career and life [16]. For Vietnam's education system, it is important how teachers are trained to deal with those requirements in their daily learning practices and how they approach the changes in modern society and engage continually in active learning. Thus, involving and engaging students in the process of formative assessment seem to be a real challenge, especially for a Confucian heritage culture like Vietnam and China [1]. This is a research issue that few researchers, both national and international, have addressed previously [45]. This is a research gap that this study with its original research is intended to fill in.

1 Theoretical Framework

1.1 Overview of Assessment and Formative Assessment

Higher education in the 21st century requires students to master up-to-date skills for both their social and professional life. It is necessary for them to focus on learning new competencies through updated learning and instruction methods. Learning involves not only acquiring new knowledge but also connecting the previous knowledge with the one they may (want to) know [44, 53].

A document issued by OECD/ CERI [29] illustrates the relationship between assessment and evaluation in which evaluation is made based on judgements from assessment with the aim of improvement. Information from students' learning process may help educators in making decisions on the way to change teaching and

learning methods in order to improve curriculum and education institutions as well [34]. Moreover, OECD has also reported research on how to use evaluation in improving teaching capacity of teachers with skills required in the 21st century [30].

In that sense, it focusses on the way to measure the obtained knowledge during the learning process. The rapid change in the context of assessment drags on the adjustment of the way to give feedback in higher education [6, 50]. Globally, higher education is concerned with students' competencies in terms of what they can do, how they do and what they are able to do when they receive support and feedback from lecturers and peers. The key factor lies in the way lecturers engage and motivate students in the classroom to enhance their performance and uplift their achievements [39]. Formative assessment is considered by many as the combination of feedback from evaluation, self-assessment and peerassessment which may be collected and used for adjusting students' current learning methods and contents [14, 15, 19, 20, 23, 31, 37].

1.2 Formative Assessment in Higher Education Context

The goals of higher education have changed from knowledge transfer and acquisition into producing knowledgeable individuals, focusing on problemsolving skills, professional skills, and authentic learning, i.e. learning in real-life contexts [12]. Hence, higher education should create a constructive learning culture and environment where students and lecturers have a shared expectation before starting to work together. The development of formative assessment in higher education means that assessment should be considered as assessment during the learning process as well as assessment of final performance of students at the end of the course [35, 49, 52]. Formative assessment needs to be considered in specific social and cultural contexts [18, 26]. In the South-East Asian societies that are characterized by Confucian values and Buddhist culture, standardized assessment concentrates genuinely on competitive examination culture [45]. We need to recognize assessment as a social product in which cultural values and traditions, interests of specific groups play an important role, because culture is a matter in assessment [7]. The cultural context of assessment consists of students' learning and social culture. Formative assessment is changing classroom practices to influence the learning culture [32]. Commonly, lecturers should work together to learn how to adapt formative assessment practice to the needs of their students [9].

Assessment in Vietnam is usually claimed as a means to support the quality of education. Students should positively possess traits such as ethical values, healthy lifestyle, creative thinking, practical

professional skills, foreign language competencies and IT capabilities in order to provide a qualified workforce for society [25]. Since 2015, Vietnam' education system has been on track to implement a competence based assessment approach. It was being conducted first by Vietnam National University Hanoi. The university entrance examination using a competence test has been organized by MOET, in which students to demonstrate their understanding and achievements in certain scope of knowledge and skills. This innovation requires students to gain their knowledge and skills in the process of study in high school. The test structure specifies that students might be checked for competencies and knowledge provided in high school curriculum, most of them are from grade 12 [24].

Formative assessment plays a key role in contributing to improve students' competencies and confidence in self-studying and self-researching process. Students are actively involved in all class activities and these activities can be modified to enable them to achieve their learning targets based on different kinds of feedback. Formative assessment is well known for its various definitions but the extent of its impacts on lecturers and students remains debatable. It is widely believed that students' competencies can be shown during their learning process so that both lecturers and students can adjust their activities to gain the targets based on provided feedback. Formative assessment encourages students to demonstrate their natural abilities and regulate their learning process to achieve better performance. Previous studies observed that when students' creativity and innovation is encouraged, connections of the acquired knowledge with the real world are established [51].

2 Research Methodology

While most previous studies have focused on theory around types of formative assessment and their application in compulsory education settings, formative assessment has application to the knowledge acquisition in higher education as well. This study explores a variety of faculty and students' perspectives on formative assessment practice. The participants of this study are intended to be lecturers and students at the teacher education institutions in the field of natural sciences (offering subjects such as chemistry, mathematics, physics) and social sciences and humanities (offering subjects such as law, psychology, literature and history). This study drawing upon these cohorts is an effort to evaluate the relations between current practices of formative assessment and its outcomes within the context of Vietnam's teacher education.

The study conducted and reported here addresses

the overarching questions: 'What is the practice of teaching, learning and assessment in teacher education in Vietnam?' by answering the following specific questions:

- (1) How do lecturers and students in Vietnam perceive formative assessment in general and in the classroom in particular?
- (2) How is formative assessment conducted in teacher education institutions in Vietnam?

Within the mentioned scope of study, to understand the cultural characteristics and context of formative assessment, we utilize a mixed method to answer the above research questions. The study examined group behaviors, customs, practices and the way of interaction between culture-sharing groups and people in their higher education environment. The study has used questionnaire delivered to collect 175 responses from students, observations of 10 lectures, in-depth interviews with 10 lecturers and focus group discussion with 10 students to define common activities and types of behavior of specific groups.

There were 31 items in the questionnaire, divided into five categories: grading/marking practice, sharing learning expectations, questioning, giving feedback, self-assessment and peer-assessment, and other factors. These items are reported by mean score based on the five category Likert scale (1-Strongly disagree to 5-Strongly agree). Observations were conducted in which the researchers play a participant role in the class. Any teaching and learning activities or emotional features were noted in an open form. There were semi-structured, in-depth interviews and focus group forms to record responses from participants.

3 Findings

3.1 Relationship between Teaching and Assessment in Teacher Education in Vietnam

The results showed that there is a holistic relationship between teaching and assessment or in another words, assessment in terms of lecturer's feedback is a part of the teaching process. Vietnamese lecturers used words such as 'parallel activity', 'an integral part' to talk about this relationship. It's important to implement the assessment works as well as it's important not to separate it from teaching process. Without assessment it is unable to check whether lecturer and students exactly meet learning goals in the teaching process. If we model the teaching process in hexagon shape, assessment is just one side of it. The others are: grading/marking practice, sharing learning expectation, questioning practice, peer-assessment, self-assessment.

Vietnamese interviewees emphasized the importance of assessment in teacher education. If students do not get access to the lecture unit's

assessment, they will not know how to perform in their learning process. In Vietnam, students in teacher education can learn about the techniques of assessment through a separate unit or by combinations of some pedagogical units. More than that, they mentioned the role of modelling good teaching and learning practice as a way for students' assessment literacy. Assessment tasks can signal important things in the nature and quality of learning and the learning expectations. Therefore, good design of assessment tasks is vital to help student to effectively learn. The lecturers should be very careful in conducting assessment. If they make mistakes in their assessment tasks it will be problematic in consequence.

Most of the interviewed lecturers emphasized the fact that summative (final) assessment could be separable from teaching and learning process but formative assessment should be along with it. In summative assessment lecturer of one class can assess students' assignments of another class. Formative assessment is carried out during teaching and learning process and lecturer will have to do that job on his own. For mass lecture we should separate assessment from teaching by having special department to develop and conduct tests/examinations. For professional lecture units delivered in small-sized classes, it should be a total combination of assessment and teaching.

Furthermore, it is recorded from the survey that there are some techniques in teaching that are quite useful for lecturers in getting students involved in the learning process. First of all, over the scale of 5, students have rated the importance of two following supports: "teachers are available to discuss with students over their progress (m=3.73; SD=.859)" and "teachers support students whenever they need help (m=3.74; SD=.884)". Secondly, "opportunity to resubmit assignments (m=3.18; SD=.941)" and "lecture to be summarized in key points (m=3.70; SD=.783)" are highly valued and appreciated by students. "Adjustments of teaching activities toward students' levels and needs (m=3.61; SD=.742)" and "tolerance for different opinions expressed (m=4.07; SD=.817)" seem to be also highly appreciated in the class because students are treated as adults and they have different perspectives, views, opinions and the ways of thinking that need to be treated individually. In this way, their creativity and critical thinking could be highly developed.

Lecturers also have suggested to increasingly engage students in the formative assessment process by push forward interactions during the lecture time. It depends individually on lecturers who can put on the table all learning expectations and students have to decide how to meet them effectively. Other options are also to be considered. Lecturers often request students to write out their learning targets and assess what they have to do to meet them at the end of the semester. It is

really important for students to orient their actions to meet the goals. If they could not remember the goals of the lecture units, it means that they don't care much about their achievement.

In general, assessment has been affirmed by most of participants with its importance in the teaching and learning process. Lecturers in Vietnam traditionally pay more attention to conducting assessment to assure that the assessment process is of high quality, accurate and reliable. They also learn more about the assessment so that they could be fair in judging students' achievements.

3.2 Factors Impacting Formative Assessment in Teacher Education

Lecturers who participated in our interviews were asked if they had to put the formative assessment into the teaching model, what are the factors of this model they would think of. Some respondents stated that the teaching model is rectangular with peer-assessment, self-assessment, teacher assessment and the goal of teaching at the center of it. However, as a summary of all participants' responses, there would be a five factor model that consists of: sharing learning expectations, collecting learning evidence (questioning, observing, etc.), giving lecturers' feedback, self-assessment, and peer-assessment. This study has found that 'feedback' is the word mentioned most in the participants' responses. Participants have also mentioned some other factors such as: learning credits, marks and lecturers' learning proactivity, goals, learning Nonetheless, they want the model to focus on developing the content of lecture's unit and types of assessment.

In the first words, it is inevitable to mention grading/marking practice when we talk about assessment. The survey of students provides evidence that grading and marking could motivate them in learning (m=3.71; SD=.794). This task also gives students information on their weaknesses and strengths so that they can get better in their study to reach closer to their learning goals. In other words, there is 62% of students agree that grading/marking also provides feedback to help them understand and improve their weaknesses and explore their strengths. However, they complained that they had too many grades from all kinds of quizzes and tests during the course (m=3.74; SD=.889). This statement could be cross checked by looking at the ratio of assessment students have in the course through lecturers' interview findings. Students usually have more than 5 element marks during the whole course which means that they burden greater learning pressure, not including frequent quizzes and tests' marks. Interviewed lecturers also believed that there should be more assessments for students to be better motivated in learning.

Sharing learning expectations of the lecture unit is believed to be really important at the beginning of the semester. It is an important factor in the model of formative assessment given by Black and William [5]. The point is the way in which it is conducted, it could be learnt by students themselves or it could be shared by other students or the lecturers. Vietnamese lecturers have kept quite well the practice of sharing the way (how and what) to learn the unit effectively, which was also stated by 85% of the students. Lecturers think that their students could also learn about a unit's requirements from the curriculum. Therefore, students have understood the outcomes of each lecture unit of study (m=3.58; SD=.853). Also, lecturers have communicated the unit's requirements clearly (m=3.69; SD=.802). Observation from lectures indicated that, lecturers have clearly stated the expectations from the lecture since the beginning. It was confirmed by percentage when 96% of participated students agree that they were initially provided with learning goals and expectations. The findings from observations come in line with the survey results when students are encouraged to brainstorm critically during the lecture (m=3.77;SD=.786). However, some recommended that students should self-learn the expectations instead of just sitting in the classroom and listen. In that way they could learn about expected competences quickly.

Questioning practice is a factor that is considered as the key activity to warm up students in the classroom, to brainstorm their knowledge, and to provoke the answers based on their prior knowledge, from the basic to high-order thinking. Most of students in the survey agreed that the class is often started by questions or problems (m=3.46;SD=.793). Lecturers performed this job efficiently and it has become a standard in pedagogy skills. Students also confirmed that they paid attention to other student's questions in the class (m=2.74; SD=.864). In contrast, students confirmed that focus group discussion is an effective way to learn from each other. It could be seen clearly from observation that they have discussed, argued passionately or even questioned back the lecturers during the lecture. However, most of students specified that they could learn much from lecturers' practice of questioning and that might result in better teaching performance. They all think that working on questions from lecturers is very challenging but it is also significant to understand their job (m=3.30 & 3.80 respectively). Alongside with that, lecturers are always available and helpful to address students' problems (m=3.96; SD=.833).

Vietnamese students like students in Confucian heritage culture are quite shy in raising their questions during the lecture [45]. They often need to be encouraged by the lecturers or even they wait until they are invited to share their ideas. Or even, in a tutorial,

the lecturers/instructors used a lot of nonverbal language to engage students into the learning activities. For example, instructors could give hands towards students who are sitting in a U shape, and then they wave hands toward their body as if they are expecting answers. Or they may use eye contact so effectively across all the students to seek first answers to a given question. After a while of being encouraged, students expressed about what they still do not understand and felt free to speak out what they thought.

Giving feedback is considered as the core factor of formative assessment. It has been proved to be a vital element in keeping students motivated in learning. Focus groups showed that they know what they have to do with lecturers' feedback and responses to improve their study, and they need this kind of information to adjust their learning methods. The feedback could also be given by their peers (70.7% students want to receive more feedback from their peers) individually or in groups. Students use both kinds of feedback in adjusting their future performance (m=3.77; SD=.690). Specifically, they very highly appreciate lecturers' feedback on their learning process (m=3.95; SD=.775) regardless of the oral, written or electronic form (m=3.19; SD=.925)

In general, students could get feedback by their own reflections (self-assessment), from their peers (both individual and in a group), then from their lecturers. It was observed from the lecture and tutorial that students could have feedback from those three kinds of resources. Some students perceive peer feedback as a way to motivate their learning while some others think that their friends are too serious in finding out their mistakes and argue aggressively.

Self-assessment/ self-reflections: this technique is often used by lecturers after each lecture unit as an opportunity for students to independently look back on their own performance. Most interviewees recognized the vital role of assessment in relation to teaching because it provides students with information of where they are at the moment. Students could even develop necessary self-assessing skills in their critical life situations such as choosing proper path of career or partner, etc. Students themselves confirm they find that it is very useful to self-assess their own study (81%). However, sometimes it depends much on students' characteristics and motivation. Some responses included: students will soon be successful when they are able to assess themselves; setting learning targets is very difficult because it's not students' habit, they usually learn passively with difficulties to involve in learning; students have to understand the purpose, scope and criteria first before making self-assessment.

Peer assessment: students think they could have some lessons learnt through assessing other's works. They could assess with criteria developed by the division/lecturers with or without their participation.

Lecturers should show students the advantages of peerassessment so that they could learn the way to listen and accept feedback from their peers. This is one of the important skills in modern society, especially tertiary level of education.

In general, lecturers are prone to provide time and opportunities for self-assessment and peer-assessment and they are also willing to offer their own comments. Self-assessment and peer-assessment are very useful for students and there should not be only one kind of feedback. The survey results showed that criteria should be clearly stated before conducting assessment (m=3.61; SD=.829). This is confirmed by lecturers who stress on the need to develop rubrics for selfassessment and peer-assessment beforehand. 64% of students find it is quite embarrassing to assess others' works, but with clear criteria they would know how to give constructive feedback for their peers. It is very group important when members recognize contributions of individuals and divide the total mark of the group appropriately. Some responses in this study considered that: the reliability of feedback is not so important compared to the students' responsibility and recognition of the purpose of feedback; students will learn how to develop a check list for group work and peer-assessment; assessment criteria could be discussed and developed by lecturer, students and also other participants.

However, observations from lectures showed that when conducting self-assessment and peer-assessment and reporting to the lecturer in front of the class, students seem to be a little shy and humble. This is the features of students living in the Confucian Heritage culture and society. They speak in a low pitch and give eyes towards lecturer and other students to probe or wait for reactions. Probably, they are afraid of saying something wrong or even something right. It is due to Confucian culture that let students to show obedience, respect others and react with proper behaviors [45]. They listen and follow lecturer' instructions just like it is the best way to learn. That's the reason why students always unconditionally follow lecturer' requirements. Something should be done to lift this barrier so that students are more confident and comfortable to share their own ideas because in discussions there is basically nothing right or wrong. Even when there are no ultimate answers, students should be encouraged to share and discuss more regarding each possible circumstance.

In a nutshell, students felt motivated about their learning process by assessing activities in the class (71.3% agree). They also felt excited when they were encouraged to interact with others by discussing, presenting, group working, etc. (81% agree). Approximately 71% of surveyed students indicated that participation and interactions with peers were encouraged not inside but also outside class as well in

case of group activities through conducting group assignments, group presentations or even some extra activities. All of this could help to boost the effect of formative assessment.

3.3 Implementation of Formative Assessment for Teacher Education

Vietnamese lecturers possess a wide range of knowledge and thorough understanding on formative assessment and how to implement it efficiently in the practice of teacher education. They have performed exactly what they believed to be effective in the formative assessment to support their teaching activities. However. when talking about implementation of formative assessment, they often start their responses referring to MOET (Vietnam Ministry of Education and Training) requirements, rules and regulations. This is an evidence that Vietnam is influenced by Confucian Heritage Culture because lecturers have read and learned by heart the regulations under the central government. Does this hinder the implementation process of formative assessment? Could lecturers be flexible and creative in performing their tasks?

There are some other factors in addition to the mentioned above to be considered during the implementation of formative assessment. First of all, many lecturers mentioned portfolios where they collect different works from students. However, this job takes time and effort to keep track of over 30 students. Lecturers say they have been overloaded and could not handle all the extra documentation. The only thing they could do is to take a note of the main points next to students' name in the students' list in the classroom. Then they give judgements on each student at the end of the course based on such note taking.

Curriculum is another measure in applying formative assessment. Most lecture units are governed and reviewed by a panel group at the university level. They will appoint which kind of assessment is suitable and what methods are needed and applied to test students' understanding and skills. Thus, depending on each lecture unit, there will be different kinds and ratios of assessment. More than that, the summative assessment (or known as final examination) should be of high stake with at least 60-80% of the total mark. The rest of percentage could be from assignments, tests, presentations, complimentary marks, etc. Such kind of traditional-approach assessment driven by examinations unfortunately prevent students from highorder, independent and critical thought development [45]. The study suggests that there should be a change in this ratio of assessment when conducting formative assessment at tertiary level. Students should be challenged by learning tasks to develop their thinking capacity and creativity. Students should have similar chance to show up their possessed skills and

competences, especially while it can keep the intended meaning of formative assessment, specifically designed for learning improvement.

Class-size plays an important role in conducting formative assessment. The study also finds that lecturers claim to be unable to keep track of each student and give valuable feedback on each students' performance with a class of more than 30 students. In fact, they usually have to deal with classroom overloaded with over 100 students. In such a mass lecture, the lecturers could not have time for giving feedback, implementing self-assessing and peerassessing. Instead, they create learnings tasks in groups for group discussion and collaboration purposes, because it is so difficult for them to control the whole class. Lecturers could share learning expectations, they could give questions, but they do not have adequate time for students to brainstorm for the answer. As a result, lecturers could not provide constructive feedback for their students.

Culturally, Vietnam is strongly influenced by Confucianism stressing the education of the moral values [47]. It maintains two fundamental principles: the necessity of correct behavior and the importance of loyalty and obedience. In a class observation, lecturers were taught to obey some pedagogical standards in teacher education. Professional standards of conduct in Vietnam includes neatly dressing, politely talking, appropriately walking and sitting style, etc., which were expressed clearly through verbal and non-verbal (body) language in the class. The evidence on these noble standards was presented and communicated to students so that in the future some of them might be motivated to pursue the teaching career. Observational results also have showed that by dynamic and meaningful activities organized by the lecturer during the class, students get involved in each of learning activities. Students can really transform from a timid person at the beginning of the lecture to become more engaged and involved in active learning. Assessment practices are also to serve students' participation, engagement and identification with the class. Students motivated by lecturers' attitudes and behaviors and assessments could perform their best in all class activities. They actively participate in all kinds of learning tasks, and be confident and assertive in taking their role.

Lecturers could motivate students by their impressive teaching/acting performance. They give clear instructions in order that students are involved in all learning tasks. In an observed tutorial, lecturers have been recorded as applying right teaching techniques. They continually gave questions to encourage students in developing critical thinking. They took notes on students' strengths and weaknesses during their presentations. Even, lecturers used nonverbal language effectively and efficiently, with

multi accents and intonations from a sweet, warm, quick to serious one for different stages of presentation. Lecturers had used eye contacts by scanning the whole class activities. They smiled most of the time and use hand movements by folding toward the body to encourage students' volunteering and sharing. Especially, lecturers never stood at same place in the classroom, but in the middle of the classroom and turned around to encourage the answers. One special thing observed from lecturers is that they have changed the task every 15 minutes, which is believed to make some refreshment and create new engagement for students. This idea has been confirmed by interviewees when they shared the same opinion.

In real practice, lecturers are trusted to be the good examples for students to follow as they are motivated by the style of the lecturers they admire. They also conducted properly and efficiently formative assessment. Factors hindering its efficiency include strict regulations from the university and MOET, curriculum, class-size and Confucian Heritage culture. It is suggested that lecturers should be more empowered to provide lectures on their own way. Other administrative jobs could be arranged to support them such as: class-size should be reduced to around 30 students and facilities should be provided fully including flexible desks and chairs, multimedia devices, projector and white board, etc.

4 Conclusions

4.1 Scope of Results of This Study

The data collected and the results obtained in this study indicated how assessment can help improve the quality of teacher education in the context of Vietnam. Especially for the formative assessment with five factors (sharing learning expectations, collecting learning evidence, giving feedback, self-assessment and peer-assessment), it is also indicated that assessment always goes with teaching pedagogy. Challenges of formative assessment implementation are also addressed in this paper according to the perceptions of Vietnamese lecturers. Formative assessment requires lecturers' adequate skills in handling class issues and sensitivity in recognizing each student's features and needs in their learning process. This study has confirmed that factors verified and agreed by students and lecturers such as curriculum, class-size, assignment resubmission or learning portfolios have had important impact on implementation of formative assessment.

It could be seen clearly that both lecturers and students present certain understanding on the issues of formative assessment. However, they seem to be quite dependent on regulations put forward by the institutions (where they work and study) and MOET in

making decision regarding their teaching and learning methods and styles. Most of the lecturers have based on students' prior knowledge to reach and retain their and their students' achievements [5, 21]. They know how to deliver an effective lecture, and how to keep students interested and concentrated during the class. They also master well students-centered teaching techniques. Especially, they emphasize the importance of formative assessment in teaching and learning process which is considered as the key philosophy of modern education [5, 22, 53].

In this research, it appears that the formative assessment is quite well applied in observed classes and the process of its implementation indicates many suggestions to facilitate the students' learning autonomy, creativity and independence of thinking. Challenges of formative assessment implementation, such as study workload, lecture time allowance, classsize, lecturers' rights and empowerment, sharing learning expectations, specific criteria of peer-assessing and self-assessing could be addressed by altering overall assessment policy to unlock lecturers' potential by releasing their flexibility and autonomy in conducting students' assessment. This is a good start point to fully implement formative assessment in higher education which could be helpful to improve students' learning capacity and move whole education system forward.

4.2 Application of This Study

Referring to the multi-factor model of formative assessment, interviewees have mentioned feedback, collecting learning evidence and time to clarify and share learning expectation with students. In order to gain higher competences and skills, students should be provided with specific feedback on how they are doing, what they can do to improve their performance. It is great that lecturers are very clear on what they can do to make feedback as specific as possible. Accordingly, lecturers know how students use their feedback in adjusting learning process by looking at students' progress in the next assessment. This means that students pay much attention on the feedback they received but would not want to have as many examinations as they have at the moment. This model is intended to be flexible as its components (impacting factors) may be subjects of change, removal and extension. The proposed multi-factor or multicomponent model of formative assessment could be used not only in assessing performance of students in the field of teacher education but also in other fields of science and professional education in the context of fast changing Vietnamese higher education landscape (increased market competition, autonomy independence of all institutions in Vietnam's higher education system).

4.3 Novelty and Limitation of This Study

The study carried out in this article has identified cultural understanding of the term of formative assessment and how it is being implemented on the ground and in context of Vietnam's higher education system. Involving and engaging students in the process of formative assessment seem to be a real challenge, especially difficult at the beginning, in a Confucian culture dominated society of Vietnam [1]. This is a research issue that few researchers have addressed indepth and profoundly [45]. This study has examined this issue within the context of Vietnam's changing and opening society and transforming higher education system toward global standards. The scope of this study is limited to one country. The future research studies should deal with comparative analysis of the implementation and application of formative assessment in higher education of a series of other Asian countries with predominant Confucian culture and social values. We suggest to compare developed nations (where formative assessment has been already and successfully implemented) with developing and less developed nations (where formative assessment is being in different stage of development). Additionally, this study has also left a room for further research on student-centered approach in teaching and formative assessment to customized education process towards students' needs in the context of dynamically changing society and fluctuated labor market condition.

References

- [1] ASGHAR M. The lived experience of formative assessment practice in a British university [J]. Journal of Further and Higher Education, 2012, 36(2):205-223.
- [2] LINQUANTI R. Supporting formative assessment for deeper learning: A primer for policymakers [M]. Washington DC: Council of Chief State School Officers, 2014.
- [3] BEATTIE G, SHOVELTON H. An experimental investigation of some properties of individual iconic gestures that mediate their communicative power [J]. British Journal of Psychology, 2002, 93:179-192.
- [4] BENNETT R E. Formative assessment: A critical review [J]. Assessment in Education: Principles, Policy & Practice, 2011, 18(1):5-25.
- [5] BLACK P, WILIAM D. Changing Teaching through Formative Assessment: Research and Practice the King's Medway-Oxfordshire Formative Assessment Project [EB/OL]. http://www.oecd.org/education/ceri/34260938.pdf, 2005-06-15/2020-08-04.
- [6] BOUD D, ELIZABETH M. Rethinking models of feedback for learning: The challenge of design [J]. Assessment & Evaluation in Higher Education, 2012, 38(6):1-15.
- [7] BROADFOOT P. Education assessment and society [M]. Buckingham: Open University Press, 1999.

- [8] CAEIRO S, FILHO W L, JABBOUR C, *et al.* Sustainability assessment tools in higher education institutions [M]. Springer, 2013.
- [9] CARPENTER S R, BROCK W A. Adaptive capacity and traps [J]. Ecology and Society, 2008, 13(2):40.
- [10] CHEN Q X, MAY L, KLENOWSKI V, *et al.* The enactment of formative assessment in English language classrooms in two Chinese universities: Teacher and student responses [J]. Assessment in Education, 2014, 21(3):271-285.
- [11] CLARK I. Formative assessment: Assessment is for self-regulated learning [J]. Educational Psychology Review, 2012, 24(2):205-249.
- [12] DOCHY F, SEGERS M, SLUIJSMANS D. The use of self-, peer and co-assessment in higher education: A review [J]. Studies in Higher Education, 1999, 24:331-350.
- [13] HATTIE J, TIMPERLEY H. The power of feedback [J]. Review of Educational Research, 2007, 77(1):81-112.
- [14] HERITAGE M. Learning progressions: Supporting instruction and formative assessment [M]. Council of Chief State School Officers, 2008.
- [15] HERMAN J, OSMUNDSON E, DAI Y Y, *et al.* Investigating the dynamics of formative assessment: Relationships between teacher knowledge, assessment practice and learning [J]. Assessment in Education: Principles, Policy and Practice, 2015, 22(3):344-367.
- [16] HOANG T. Three Issues in Current Vietnamese Education [EB/OL]. http://ired.edu.vn/vn/doc-tin/74/ba-van-de-cua-dai-hoc-viet-nam-hien-nay, 2016-05-23/2020-04-04.
- [17] JENKINS J O. A multi-faceted formative assessment approach: Better recognising the learning needs of students the learning needs of students [J]. Assessment and Evaluation in Higher Education, 2010, 35(5):565-76.
- [18] KENNEDY K, CHAN J, FOK P, *et al.* Forms of assessment and their potential for enhancing learning: Conceptual and cultural issues [J]. Educational Research for Policy and Practice, 2008, 7:197-207.
- [19] LEFROY J, HAWARDEN A, GAY S P, *et al.* Grades in formative workplace-based assessment: A study of what works for whom and why [J]. Medical Education, 2015, 49(3):307-320.
- [20] LEUNG C, MOHAN B. Teacher formative assessment and talk in classroom contexts: Assessment as discourse and assessment of discourse [J]. Language Testing, 2004, 21(3):335-359.
- [21] LIUTKUS D. How informative is formative assessment? Investigating the learning process of educators who adopt formative assessment as practice [D]. University of Southern Queensland, 2015.
- [22] MASTERS G N. Reforming educational assessment: Imperatives, principles and challenges [M]. Camberwell: Australian Council for Educational Research, 2013.
- [23] MCMANUS S. Attributes of effective formative assessment [M]. Washington DC: Council of Chief State School Officers, 2008:1-6.
- [24] MINISTRY OF EDUCATION AND TRAINING, VIETNAM. Law on Higher Education [EB/OL].

- http://www.chinhphu.vn/portal/page/portal/chinhphu/he thongvanban?mode=detail&document_id=163054, 2012-08-12/2020-04-06.(In Vientnamese).
- [25] MINISTRY OF EDUCATION AND TRAINING, VIETNAM. Vietnam's strategy for education development 2011-2020 [M]. 2011.
- [26] MUSAMALI K. Examining effective leadership practices across cultures: A comparative study of higher education leaders in Kenya and the United States [D]. Columbia MO: University of Missouri-Columbia, 2015.
- [27] NGUYEN T M H, HALL C. Changing views of teachers and teaching in Vietnam [J]. Teaching Education, 2017, 28(3):244-256.
- [28] NICOL D J, MACFARLANE-DICK D. Formative assessment and self-regulated learning: A model and seven principles of good feedback practice [J]. Studies in Higher Education, 2006, 31(2):199-218.
- [29] ORGANISATION FOR ECONOMIC CO-OPERATION AND DEVELOPMENT. OECD / CERI International Conference, Learning in the 21st Century: Research, Innovation and Policy, 15-16 May 2008 [EB/OL]. https://www.oecd.org/education/ceri/oecdceriinternationalconferencelearninginthe21stcenturyresearchinnovationandpolicy15-16may2008.htm, 2008-03-14/2020-04-07
- [30] ORGANISATION FOR ECONOMIC CO-OPERATION AND DEVELOPMENT. Teachers for the 21st century: Redefining professionalism [M]. Paris: OECD Publishing, 2013.
- [31] POPHAM J. Transformative assessment [M]. Alexandria VA: Association for Supervision and Curriculum Development, 2008.
- [32] SADLER D R. Formative assessment: Revisiting the territory [J]. Assessment in Education: Principles, Policy & Practice, 1998, 5(1):77-84.
- [33] SAI H C, ANH T D. Solutions for improving students 'competences under alumni's perspectives at Vietnam National University Hanoi, Vietnam [J]. The International Journal of Humanities & Social Studies, 2016, 4(5):300-306.
- [34] SHAVELSON R J, YOUNG D B, AYALA C C, et al. On the impact of curriculum-embedded formative assessment on learning: A collaboration between curriculum and assessment developers [J]. Applied Measurement in Education, 2008, 21(4):295-314.
- [35] SHEPARD L A. Linking formative assessment to scaffolding [J]. Educational Leadership, 2005, 63(3):66-70.
- [36] SHEPARD L A. The role of assessment in a learning culture [J]. Educational Researcher, 2016, 29(7):4-14.
- [37] STANLEY G, MACCANN R, GARDNER J, *et al.* Review of teacher assessment: Evidence of what works best and issues for development [J]. Oxford: Oxford University Centre for Educational Development, 2009.
- [38] STEWART T A. Effects of implementing a formative assessment initiative [D]. Bowling Green KY: Western Kentucky University, 2011.
- [39] TAUT S, VALENCIA E, PALACIOS D, *et al.* Teacher performance and student learning: Linking evidence from two national assessment programmes [J].

- Assessment in Education: Principles, Policy & Practice, 2016, 23(1): 53-74.
- [40] TIEN N H. Challenges in the international cooperation of pedagogical universities in Vietnam [C]// Proceedings of the University Scientific Conference on Perspectives of International Cooperation of the Universities. Ho Chi Minh City: University of Education, 2017:63-64.
- [41] TIEN N H. International executive MBA study program as part of the international cooperation strategies of the universities [C]// Proceedings of the University Scientific Conference on Perspectives of International Cooperation of the Universities. Ho Chi Minh City: University of Education, 2017:81-84.
- [42] TIEN N H. Young university staff development in context of Industrial Revolution 4.0 [C]// Proceedings of the University Scientific Conference "Young University Staff toward Education Innovation and Industrial Revolution", Vol. 4, 2018.
- [43] TIEN N H, ANH D B H. Development of highly qualified human resource to receive opportunities from CP-TPP approach of Vietnamese universities [J]. International Journal of Advanced Educational Research, 2019, 4(4):85-90.
- [44] TIEN N H, JOSE R J S, MAI N P, *et al.* Current state of human resource in international universities of Vietnam [J]. International Journal of Multidisciplinary Research and Development, 2020, 7(7):22-27.
- [45] THANH P T H, RENSHAW P. Formative assessment in Confucian heritage culture classrooms: Activity theory analysis of tensions, contradictions and hybrid

- practices [J]. Assessment and Evaluation in Higher Education, 2015, 40(1):45-59.
- [46] TOLLEFSON N. Classroom applications of cognitive theories of motivation [J]. Educational Psychology Review, 2000, 12(1):63-84.
- [47] TRAN K. Developing tertiary education in Vietnam [J]. Journal of Vietnamese Social Science, 2014, 10(83):54-62.
- [48] TRINH A N. Local insights from the Vietnamese education system: The impacts of imperialism, colonialism, and the neo-liberalism of globalization [J]. International Education Journal: Comparative Perspectives, 2018, 17(3):67-79.
- [49] WILIAM D. Embedded formative assessment [M]. Bloomington IN: Solution Tree Press, 2011.
- [50] WILIAM D, THOMPSON M. Integrating assessment with instruction: What will it take to make it work? In DWYER C A. The future of assessment: Shaping teaching and learning [M]. Mahwah NJ: Lawrence Erlbaum Associates, 2007:53-82.
- [51] YIN Y. The influence of formative assessments on student motivation, achievement, and conceptual change [M]. Standford CA: Standford University, 2005.
- [52] YORKE M. Formative assessment in higher education: Moves towards theory and the enhancement of pedagogic practice [J]. Higher Education, 2003, 45(4):477-501.
- [53] YUE Y, SHAVELSON R J, AYALA C C, *et al.* On the impact of formative assessment on student motivation, achievement, and conceptual change [J]. Applied Measurement in Education, 2008, 21(4):335-359.