

ENTREPRENEURIAL COMPETENCIES AMONG ENGLISH MAJORS AND THEIR IMPLICATIONS FOR CURRICULUM DEVELOPMENT

KHẢO SÁT NĂNG LỰC KHỞI NGHIỆP CỦA SINH VIÊN CHUYÊN NGÀNH TIẾNG ANH VÀ NHỮNG HÀM Ý ĐỐI VỚI PHÁT TRIỂN CHƯƠNG TRÌNH ĐÀO TẠO

Nguyen Hoang Nhi, Nguyen Bich Dieu*

The University of Danang - University of Foreign Language Studies, Vietnam

*Corresponding author: nbdieu@ufl.udn.vn

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Abstract - This study adopts quantitative and qualitative approaches to investigate the students' self-perceived entrepreneurial competencies (EC) of English majors at the University of Danang – University of Foreign Language Studies (UD-UFLS). Using an adapted version of the Comprehensive Entrepreneurship Competence Model (CECM), students' self-evaluations were recorded through 200 questionnaires and 10 semi-structured interviews. Furthermore, the study includes a course analysis across 40 subjects. The evaluation covered ten distinct sub-competencies, including *metacognition, emotion regulation, problem-solving, creativity, ethical & sustainable thinking, personal initiatives, communication, discovering & exploiting opportunities, understanding the environment* and *financial literacy*. The results reveal that students report highly positive in cognitive and social competencies, but lack confidence in strategic business competencies. Students cite limited practical experience, rigid assessments, and heavy workloads as their primary developmental barriers. Consequently, the study proposes six solutions for improving EC at UD-UFLS.

Key words - Entrepreneurial competencies; curriculum analysis; student self-evaluation; the Comprehensive Entrepreneurship Competence Model (CECM)

1. Introduction

Entrepreneurship is a foundational element of the 21st-century labor market, distinct from traditional business management due to its diverse set of skills and its ability to enhance competitiveness. It has been argued that entrepreneurship is not merely the act of starting a business but a comprehensive skill set that fosters professional versatility and better prepares graduates for future challenges [1].

Entrepreneurial competencies (EC) are widely regarded as a key indicator of employability and professional success across diverse career paths. While business-related curricula can greatly improve the career options of a student, an exclusive association with business majors can sometimes hinder the development of students in non-business disciplines. This highlights the need to integrate entrepreneurial skills within specific major programs to bridge the financial knowledge gap for non-business students [2]. In the English Language program context, achieving such integration presents a particular challenge. Focusing on EC, this research examines English majors at UD-UFLS to assess their self-perceived skill levels and the difficulties they encounter. It seeks to identify ways to better support students in their holistic development, ensuring they gain

Tóm tắt - Nghiên cứu áp dụng phương pháp định lượng và định tính để khảo sát năng lực khởi nghiệp theo đánh giá của sinh viên chuyên ngành tiếng Anh tại trường Đại học Ngoại ngữ - Đại học Đà Nẵng. Dựa trên Mô hình Năng lực Khởi nghiệp toàn diện, dữ liệu gồm 200 phiếu khảo sát và 10 cuộc phỏng vấn bán cấu trúc, kết hợp phân tích nội dung 40 môn học. Nghiên cứu tập trung vào mười năng lực: *siêu nhận thức, điều chỉnh cảm xúc, giải quyết vấn đề, sáng tạo, tư duy đạo đức và bền vững, tự chủ động, giao tiếp, phát hiện và khai thác cơ hội, hiểu biết môi trường và hiểu biết tài chính*. Kết quả cho thấy, sinh viên đánh giá tích cực về các năng lực nhận thức và giao tiếp, nhưng lại thiếu tự tin vào các năng lực chiến lược kinh doanh. Họ đề cập việc thiếu kinh nghiệm thực tiễn, hình thức đánh giá cứng nhắc và khối lượng bài tập lớn là rào cản chính. Do đó, nghiên cứu đề xuất sáu giải pháp cải thiện năng lực khởi nghiệp tại cơ sở khảo sát.

Từ khóa - Năng lực khởi nghiệp; phân tích chương trình đào tạo; tự đánh giá của sinh viên; năng lực khởi nghiệp về mặt ngôn ngữ; mô hình năng lực khởi nghiệp toàn diện (CECM)

the competencies required to succeed in the current labour market by answering the following questions:

(1) To what extent do English students at UD-UFLS perceive their own EC?

(2) What are the academic challenges that English students at UD-UFLS faced in the process of improving their EC?

(3) What improvements can be suggested for the current English Language undergraduate programs to more effectively promote students' EC?

2. Literature Review & Theoretical Background

2.1. Previous Studies & Definition of EC

Early work conceptualized EC primarily around business operations, focusing on the personal characteristics and management styles that drive successful ventures [3], [4]. More recent research has argued that entrepreneurship is not merely business knowledge or personal traits, but a comprehensive, actionable skill set [5]. These skills can be gained, refined and utilized effectively, and are essential assets in higher education institutions [6]. A major advancement in the field was the conceptual shift toward

EC, which facilitated the development of consolidated and categorized models to evaluate these skills [7]. Research utilizing these frameworks has indicated that educational institutions can design targeted, comprehensive curricula that address the diverse needs of aspiring entrepreneurs. The evolution of these models has shifted EC research from a strict focus on business majors to applications across varied academic disciplines. For example, integrating entrepreneurial education into STEM equips students to commercialize their research [8], while its application in the arts, humanities, and social sciences effectively prepares graduates for self-employment and professional versatility [2]. In this study, EC are not viewed solely as competencies for business creation. Instead, they are conceptualized as transferable competencies such as problem-solving, creativity, initiative, communication, adaptability, and opportunity recognition, which are increasingly valued across diverse professional contexts, including language-related careers.

While research on EC in Vietnam has emerged, existing studies often focus on regional areas [9] [10] or factors influencing entrepreneurial success [11]. Consequently, there is a lack of evidence concerning undergraduate non-business majors. Furthermore, few studies analyze university-level programs to evaluate how structural curricula align with student mindsets across cognitive, social, and strategic business dimensions. The present study addresses these gaps by employing a case study to evaluate the EC of English majors at UD-UFLS.

2.2. The Comprehensive Entrepreneurship Competence Model (CECM)

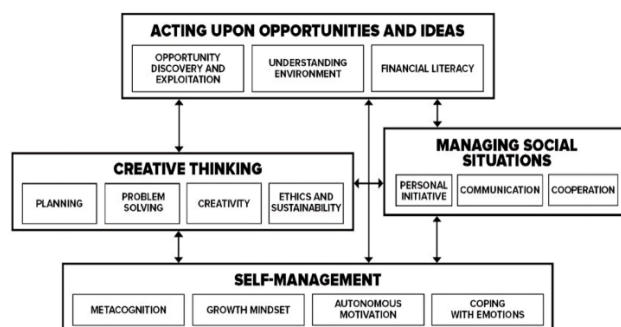


Figure 1. The Comprehensive Entrepreneurship Competence Model [12]

This study adopts the Comprehensive Entrepreneurship Competence Model (CECM) developed by Venesaar et al. [12] as its primary theoretical framework. The CECM offers a precise structural breakdown consisting of four core competence areas, including *Acting Upon Opportunities and Ideas*, *Creative Thinking*, *Managing Social Situations*, and *Self-Management* with 14 specific sub-competencies. For the scope of this research, the sub-competence of *Planning* is excluded because the current English Language curriculum lacks specialized business-practicum courses where formal, strategic business execution can be assessed. Instead, the CECM allows non-business students to self-evaluate how their language and communication proficiency can be leveraged to generate social or economic value across diverse professional environments. The study

does not claim to measure the full CECM framework. Instead, it reports findings based on the validated sub-competencies retained after reliability testing.

2.2.1. Self-management

Self-Management forms the foundation of entrepreneurship [12]. First, *metacognition* involves higher-order reflection on one's behaviors, attitudes, and ideas to facilitate future improvement and strategic adaptability. Within this study, *metacognition* is closely linked with *critical thinking*, as critical thinking is actively triggered when individuals apply these reflective skills [13]. Second, a *growth mindset* reflects the sustainable beliefs and behaviors required to ensure long-term development and anticipate business potential. Finally, *autonomous motivation* drives individuals to engage in activities that align with their personal values, interests, and sense of importance [14]. In an entrepreneurial context, this internal determination is vital for boosting productivity, enhancing management, and serving as a decisive factor for long-term sustainability.

2.2.2. Creative Thinking

Creative Thinking encompasses *problem-solving*, defined as analyzing and resolving complex, ambiguous issues [15]. *Creativity* involves cognitive flexibility to synthesize scattered information into functional concepts [16]. Moreover, *ethical and sustainable thinking* requires integrating cross-disciplinary knowledge to make morally and environmentally responsible decisions [17]. Although *planning* belongs to this domain in the CECM framework, it was excluded here as the adapted questionnaire items for planning require concrete operational business metrics (e.g., budgeting) that do not fit the academic reality of undergraduate language majors.

2.2.3. Managing Social Situations

Managing Social Situations involves an individual's behaviors and interactions within social contexts [12]. First, *personal initiative* represents the proactive actions an individual takes to seize opportunities without waiting for external forces [18]. While autonomous motivation focuses on the internal reasons for behavior, personal initiative emphasizes the actions themselves and remains highly connected to goal commitment [19]; for clarity, this study links this sub-competence to *leadership*. Second, *communication* is the process of reading social situations, maintaining ethical and emotionally tolerant behavior, and responding appropriately to others' reactions to achieve social objectives [20], which is pitching, presenting, and negotiating in entrepreneurship. Finally, *cooperation* is the ability to work effectively within a team to reach common goals [21]. This requires team members to clearly understand their shared responsibilities, monitor collective performance, and maintain a genuine desire to collaborate.

2.2.4. Acting Upon Opportunities

Acting Upon Opportunities and Ideas represents the higher-order thinking competencies and critical steps required to transform abstract concepts into real-world entrepreneurial products. First, *discovering and exploiting opportunities* centers on having the market knowledge

necessary to evaluate situations within the social environment and take immediate action to seize emerging chances [22]. Second, *understanding the environment* involves the ability to analyze how local, national, and global external forces such as political, economic, social, technological, and ecological impact value-creating activities [23]. Finally, *financial literacy* is defined as the foundational knowledge and confidence needed to manage financial matters, plan expenses, understand risks, and make informed investment decisions [24], [25].

3. Research Methodology

This study adopts an integrated quantitative and qualitative case study design, combining a structured survey questionnaire with semi-structured follow-up interviews to investigate students' self-perceived EC of English majors at UD-UFLS. Moreover, a multi-instrument approach is highly relevant as it allows the researcher to capture both general statistical trends and in-depth qualitative insights [26].

The target population consists of third- and fourth-year undergraduate students at UD-UFLS specializing in English Language and English Language for Communication. These senior-level students were strategically sampled because they have experienced the majority of the academic program's 40-course curriculum. Quantitative data was collected from a sample of 200 students using paper-based questionnaires and Google Forms. The participant sample comprises 158 third-year students (127 majoring in English Language and 31 in English Language for Communication) and 42 fourth-year students majoring in English Language. The instrument was adapted from validated EC survey frameworks mapped to the CECM. It utilized a 5-point Likert scale (*from 1 = strongly disagree to 5 = strongly agree*) [27] to measure student self-evaluations across targeted sub-competencies, alongside open-ended queries capturing qualitative challenges. Following the interpretation proposed in [27], the composite mean scores were interpreted as follows: 1.00–1.80 = Strongly Disagree, 1.81–2.60 = Disagree, 2.61–3.40 = Neutral, 3.41–4.20 = Agree, and 4.21–5.00 = Strongly Agree.

To clarify questionnaire trends and address ambiguities, face-to-face interviews lasting 5 to 7 minutes were conducted in English with 10 randomly selected survey participants. Finally, qualitative content analysis was performed on the "Course Specification 2019 - Undergraduate Program in the English Language" across 40 core courses divided into four groups: *General Education*, *Linguistics/Culture*, *Language Skills*, and *Professional Skills*. Although the whole course syllabi of every subject were analyzed, the content analysis focused only on the course learning outcomes (CLOs). Each CLO was coded based on predefined descriptors adapted from the CECM framework. When a CLO reflected more than one competency, the dominant competency emphasized in the learning outcome was recorded for analysis. To enhance consistency, all coding decisions followed a common coding guide. Two researchers independently coded the CLOs based on the CECM framework. Discrepancies were discussed until consensus was reached.

Quantitative data processing was executed using Statistical Package for the Social Sciences (SPSS) version 26.0. Qualitatively, open-ended responses, interview transcripts, and course analysis data were subjected to thematic content analysis to extract recurring patterns. To ensure the validity and reliability, a Cronbach's alpha (α) reliability test was performed on the questionnaire constructs. Applying a threshold of $\alpha \geq 0.64$ [28], ten sub-competencies were confirmed as statistically valid and retained for final analysis. The other sub-competencies that do not satisfy the requirement are *growth mindset*, *autonomous motivation* and *collaboration*. Therefore, they will not be mentioned in the findings and discussion. The exclusion of these three dimensions is acknowledged as a limitation, and the remaining ten sub-competencies are analyzed as independent composite variables rather than a monolithic framework.

4. Quantitative Results

4.1. Students' Self-evaluation of EC

Have you ever heard of the term "entrepreneurial competencies"?

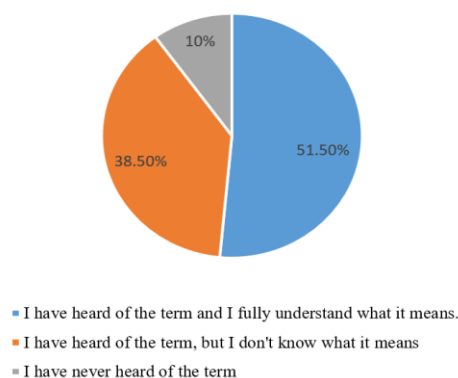


Figure 2. Students' acquaintance with EC

According to Figure 2, only 10% of the participants responded to having never heard of the term EC. In contrast, 38.5% of students reported that they had heard of the term but never sought out its definition, while more than half of the students (51.5%) believe that they have a clear understanding of the concept.

Table 1 reveals that students generally maintain a positive self-assessment of their EC, with nine out of ten validated sub-competencies falling within the agreement range (Mean ≥ 3.41). Students reported the highest level of confidence in higher-order cognitive domains, led by *metacognition* (Mean = 3.65) and *problem solving* (Mean = 3.60), closely followed by proactive behavioral indicators such as *personal initiatives* (Mean = 3.58) and *understanding the environment* (Mean = 3.57). Intermediate scores were observed for *ethical & sustainable thinking* (Mean = 3.49), *creativity* (Mean = 3.45), *emotion regulation* (Mean = 3.43), and *discovering & exploiting opportunities* (Mean = 3.41). Conversely, students reported lower levels of confidence when navigating social and highly specialized vocational settings. Specifically, *communication* (Mean = 3.29) fell into the neutral territory, while *financial literacy* received the lowest baseline evaluation (Mean = 3.01).

Table 1. Summary of Student Self-Evaluation Across Validated CECM Sub-Competencies

Sub-competence	Number of items	Composite Mean	Composite SD
Metacognition	2	3.65	0.97
Emotion regulation	6	3.43	1.02
Problem Solving	3	3.60	0.93
Creativity	3	3.45	0.95
Ethical & Sustainable Thinking	2	3.49	0.93
Personal Initiatives	7	3.58	0.96
Communication	2	3.29	0.98
Discovering & Exploiting Opportunities	5	3.41	0.97
Understanding the Environment	3	3.57	1.00
Financial Literacy	2	3.01	0.98

4.2. Curriculum Analysis

Table 2. Distribution of EC throughout four course groups

	Frequency	Percent
General Education and Generic Skills	11	9.5%
Linguistic and Cultural Knowledge	35	30.2%
English Language Skills	40	34.5%
Professional Knowledge and Skills	30	25.9%
TOTAL	116	100%

Table 3. Distribution of EC Categories in the CLOs

Sub-competence	Frequency	Percent
Metacognition	25	21.6%
Emotion regulation	1	0.9%
Problem-solving	4	3.4%
Creativity	7	6.0%
Ethical & sustainable thinking	2	1.7%
Personal initiative (Leadership)	28	24.1%
Communication	42	36.2%
Discovering and exploiting business opportunities	N/A	N/A
Understanding the environment	7	6.0%
Financial literacy	N/A	N/A
Total	116	100%

As shown in Table 2, explicit EC indicators are most heavily concentrated within core *English Language Skills* courses (34.5%) and *Linguistic and Cultural Knowledge* group (30.2%), followed closely by *Professional Knowledge and Skills* (25.9%), while *General Education* courses account for the smallest share (9.5%). Looking at the individual CLOs summarized in Table 3, *communication* stands out as the most heavily emphasized sub-competence, driving 36.2% of the tracked outcomes, followed by *personal initiatives* (24.1%) and *metacognition* (21.6%). Conversely, specific vocational and business-centric components are significantly minimized or entirely missing from the core program. *Creativity and understanding the environment* each make up only 6.0% of the CLOs, *problem-solving*, *ethical and sustainable thinking*, and *emotion regulation* combine for less than 6%, and strategic business dimensions like *financial literacy* and *discovering and exploiting business opportunities* are completely absent.

4.3. Students' Challenges

Table 4. Students' Challenges

Challenges	Responses		Percent of Cases
	N	Percent	
Understanding course material	58	12.8%	30.1%
Course content	33	4.9%	11.4%
Tests and Scores	99	21.9%	51.3%
Inflexible course options	63	13.9%	32.6%
Heavy workload	61	13.5%	31.6%
Lack of practical projects	114	25.2%	59.1%
Limited access to textbooks and materials	35	7.7%	18.1%
Total	452	100.0%	234.2%

Note. Respondents were allowed to select more than one challenge. Therefore, the percentages reported under *Percent of Cases* are based on the number of respondents and do not sum to 100%.

Table 4 outlines the primary academic and structural challenges students face during their studies. The most prominent obstacle is a lack of practical projects, which was selected by 59.1% of cases (114 cases), highlighting a strong demand for more hands-on, experiential learning opportunities. Assessment pressure also features heavily, with tests and scores identified as a major burden for 51.3% of cases (N = 99). Curriculum flexibility and academic demands represent a moderate concern, as inflexible course options (32.6%, N = 63), a heavy workload (31.6%, N = 61), and difficulties understanding course material (30.1%, N = 58) each affected nearly a third of the student sample. Conversely, limited access to textbooks and materials (18.1%, N = 35) and specific course content (11.4%, N = 33) were noted as the least influenced challenges.

5. Discussion

The data suggests a varied level of familiarity with EC among the participants. However, even though the majority of students feel confident in their understanding, when questioned about the participants' own understanding through the interview phase, nine out of ten students referred to EC with the traditional definition. In other words, they heavily associate EC with business major students. This perception aligns closely with the traditional view of entrepreneurship [4], which characterizes it primarily as the ability to successfully run a business. However, this narrow understanding stands in stark contrast to the broader definition [29], which views entrepreneurship as a versatile skill set enables individuals to transform ideas into reality across any discipline. This discrepancy suggests students may not fully grasp the nature of entrepreneurship as a crucial 21st-century competence, which could potentially restrict their ability to recognize and evaluate these skills within their own linguistic and professional contexts.

The self-assessment data from Table 1 demonstrates that students generally believe to possess a robust sense of self-efficacy regarding their entrepreneurial capabilities, with nine out of ten sub-competencies leaning positive

(Mean ≥ 3.41). Intriguingly, students rate themselves highest in higher-order cognitive and behavioral domains, specifically *metacognition* (Mean = 3.65), *problem-solving* (Mean = 3.60), and *personal initiatives* (Mean = 3.58). This high self-assessment suggests that students perceive themselves as autonomous, adaptive, and proactive learners who are confident in their ability to analyze situations and take action. These psychological traits are foundational to entrepreneurial intentions, indicating that the students perceive themselves as possessing relatively strong personal drive and cognitive agility. However, a critical paradox emerges when these perceptions are compared against the actual curriculum structure.

While students express high confidence in *problem-solving* and *creativity*, the curriculum data analyzed previously shows that these exact skills are severely minimized or virtually absent in the curriculum. This disconnect suggests that the course still has not intentionally focused on these sub-competencies. Without structured curricular reinforcement, this latent potential may not effectively translate into professional or entrepreneurial competence.

The most striking anomaly in the data occurs within the communication domain. Despite the curriculum explicitly dedicating over a third of its learning outcomes to *communication* (36.2%), students evaluated their own communication proficiency with distinct hesitation, landing it in neutral territory (Mean = 3.29). This gap between heavy curricular exposure and low student confidence implies that from the students' perspective, the current training is not yet perceived as fully sufficient in equipping them with applied communication skills like pitching, negotiation or professional networking. This may be due to students' previously stated frustration regarding a severe lack of practical projects.

Finally, the lowest baseline evaluation was observed in *financial literacy* (Mean = 3.01), a finding that aligns with its total absence from the curriculum. While a neutral score indicates that students recognize this vulnerability, the findings suggest a possible alignment between curriculum emphasis and students' self-perceptions, although no causal inference can be drawn from the current data.

6. Conclusion and Implications

The research conducted a case study to investigate EC of third-year and fourth-year students at UD-UFLS. The study examined how students evaluate their EC through a survey based on the CECM and performed a content analysis of the current curriculum to identify how these competencies are integrated into the CLOs. It also identified the challenges students faced in the school's program and provided recommended solutions. The research was carried out using both quantitative and qualitative methods, with the collection of data through questionnaires and interviews of 200 students in 10 sub-competencies.

In general, the majority of students are familiar with the term "entrepreneurship", though many did not have a full understanding or have the traditional definition in mind. The results display a varying degree of certainty for

certain EC sub-competencies among students, yet show a general positive response. While students showed a general positive response toward their own EC levels, the content analysis revealed a heavy concentration on certain sub-competencies, such as *communication* and *metacognition*, while others like *financial literacy* and *opportunity exploitation* remained underrepresented in foundational course descriptions. Furthermore, respondents generally expressed positive perceptions regarding teaching approaches and overall satisfaction with their learning experiences. The primary challenge identified was a lack of practical experience, a finding mirrored in the curriculum analysis, which showed that most CLOs focus on theoretical understanding rather than applied entrepreneurial tasks.

The findings from this research have several important implications for the development of EC among students at UD-UFLS. (1) To bridge the gap between theory and practice, the curriculum should integrate hands-on projects and real-world applications, thereby potentially enhancing students' perceived EC. This might include case studies, business plan development, and interactions with successful entrepreneurs. Rather than introducing new standalone entrepreneurship courses, these competencies may be embedded within existing English language subjects. For example, project-based language assessments, authentic problem-solving tasks, case-based discussions, and collaborative presentations can provide opportunities for students to develop creativity, initiative, and problem-solving while simultaneously achieving language learning outcomes. (2) The positive yet uncertain responses regarding the effectiveness of teaching methods suggest that while current approaches are somewhat effective, there is room for refinement. (3) Extracurricular activities such as business clubs, specialized entrepreneurial workshops, and talk shows can directly target students' fear in the sub-competence *financial literacy* to addressing the lack of practical experience. By doing so, UD-UFLS can significantly enhance the EC of its students, better preparing them for future challenges and opportunities in the entrepreneurial world.

Due to time and resource constraints, this study only conducted a general assessment of 10 sub-competencies of the Comprehensive Entrepreneurship Competency Model (CECM). Three sub-competencies (growth mindset, autonomous motivation, and collaboration) were excluded due to insufficient reliability. Therefore, the findings should be interpreted as representing only the validated dimensions of the CECM rather than the complete model. Future studies are recommended to refine the instrument and further validate its factor structure with larger samples. The research acknowledges that the results may vary with further investigation if conditions such as the number of samples, the number of items for each sub-competence, and the duration of the research are adjusted. To address these limitations, future research should first investigate students' self-evaluations within specific, targeted competence sub-domains to provide a more granular case study of localized skill deficits.

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