



Promoting the employability and entrepreneurship
of Higher Education graduates
through innovative ways in the Philippines

PATHWAY

POLICY WHITE PAPER

Partners



ATENEDE DE MANILA UNIVERSITY
Ateneo de Manila University



Benguet State University



Lyceum of the Philippines University - Batangas



Polytechnic University of the Philippines



St. Paul University Philippines



University of Alicante (Spain)



University of Montpellier (France)



Commission on Higher Education



European Chamber of Commerce of the Philippines



Enactus Philippines

Co-funded by the Erasmus+ Programme of the European Union



PATHWAY is co-financed by the European Commission through the Erasmus+ Programme, under contract number 618907-EPP-1-2020-1-ES-EPPKA2-CBHE-SP. The contents of this publication reflect only the views of the authors and the European Commission cannot be held responsible for any use which may be made of the information contained therein.

TABLE OF CONTENTS

INTRODUCTION.....	5
EXPERIENCES GAINED DURING THE PROJECT.....	6
1. ENHANCED CROSS-CULTURAL COLLABORATION.....	6
2. INNOVATIVE CURRICULUM DEVELOPMENT.....	6
3. SKILL DEVELOPMENT WORKSHOPS.....	6
4. ENHANCEMENT OF ESTABLISHED INCUBATION CENTERS.....	6
5. INTERNSHIP AND APPRENTICESHIP PROGRAMS.....	7
6. ENTREPRENEURIAL COMPETITIONS AND HACKATHONS.....	7
7. NETWORKING OPPORTUNITIES.....	7
8. ENHANCED EMPLOYABILITY THROUGH CERTIFICATION PROGRAMS.....	7
9. IMPROVED INSTITUTIONAL CAPACITIES.....	8
10. POLICY ADVOCACY AND DEVELOPMENT.....	8
NATIONAL EVENT AND THE WORLD OF WORK CAFÉ.....	9
PILOT ACTIVITIES FOR STUDENTS.....	10
1. ESTABLISHING A NEW ENTREPRENEURSHIP SERVICE.....	10
2. HACKATHON.....	11
3. SOFT SKILLS TRAINING.....	12
4. 100 STUDENTS X 20 INDUSTRIES ENCOUNTER.....	13
NATIONAL CONFERENCE.....	14
OBSERVATORY ANALYSIS FINDINGS.....	15
1. VARIABILITY IN ENTREPRENEURIAL INTENTIONS.....	15
2. INFLUENCE OF ENTREPRENEURIAL ATTITUDE AND SELF-EFFICACY.....	15
3. ROLE OF SUBJECTIVE NORMS.....	15
4. DIVERSE POST-GRADUATION EMPLOYMENT EXPERIENCES.....	15
5. SKILLS GAP BETWEEN EDUCATION AND EMPLOYMENT.....	15
6. HIGH LEVELS OF STUDY SATISFACTION.....	16
7. EMPLOYMENT THROUGH NETWORKS AND INTERNSHIPS.....	16
8. ENTREPRENEURIAL SPIRIT AMONG GRADUATES.....	16
9. INTEGRATION OF WORK AND STUDY.....	16
10. NEED FOR FURTHER RESEARCH.....	16
ENTREPRENEURSHIP COMPETENCIES.....	17
THE PATHWAY TASKFORCE.....	17
THE ENTREPRENEURSHIP COMPETENCIES FRAMEWORK.....	17
RECOMMENDATIONS FOR IMPLEMENTATION.....	19

**GENERAL RECOMMENDATIONS FOR IMPROVING EMPLOYABILITY AND
ENTREPRENEURSHIP OF HIGHER EDUCATION GRADUATES IN THE PHILIPPINES..... 21**

1.	CURRICULUM ENHANCEMENT	21
2.	INDUSTRY COLLABORATION	21
3.	EXPERIENTIAL LEARNING OPPORTUNITIES	21
4.	STRENGTHENING CAREER SERVICES	22
5.	ENTREPRENEURSHIP SUPPORT SYSTEMS.....	22
6.	SKILLS DEVELOPMENT AND TRAINING	22
7.	ALUMNI ENGAGEMENT	22
8.	GOVERNMENT AND POLICY SUPPORT	23
9.	INTERNATIONAL EXPOSURE AND COLLABORATION.....	23
10.	RESEARCH AND INNOVATION PROMOTION.....	23
11.	NETWORKING OPPORTUNITIES	23
12.	USE OF TECHNOLOGY AND DIGITAL TOOLS	23
13.	MENTORSHIP AND GUIDANCE	24
14.	INFRASTRUCTURE AND RESOURCES	24
15.	PROMOTE A CULTURE OF INNOVATION AND LIFELONG LEARNING	24
16.	COMMUNITY AND SOCIAL ENGAGEMENT	24

Authoring Information	
Project	Promoting the Employability and Entrepreneurship of Higher Education Graduates through Innovative Ways in the Philippines (PATHWAY)
Project Reference Number	598612-EPP-1-2018-1-ES-EPPKA2-CBHE-SP
Document Authors	Dr. Sergel I. Dacut, Dr. Maribeth G. Buenviaje, Dr. Annalie Patena, Dr. Alex Ylagan (Lyceum of the Philippines University-Batangas), Dr. John Luis Lagdameo (Ateneo de Manila University), Dr. Samuel Duyan and Mr. Jeftee Ben Pinos-an (Benguet State University), Mrs. Ann Clarisse De Leon (Polytechnic University of the Philippines), Ms. Sophia Ordon and Ms. Katt Baligod (European Chamber of Commerce of the Philippines)

PATHWAY consortium

European Union:

- University of Alicante (coordinator)
- University of Montpellier

Philippines:

- Ateneo de Manila University (AdMU)
- Benguet State University (BSU)
- Lyceum of the Philippines University - Batangas (LPU-B)
- Polytechnic University of the Philippines (PUP)
- St. Paul University Philippines (SPUP)
- Commission on Higher Education (CHED)
- European Chamber of Commerce of the Philippines (ECCP)

Contact information:

Institutional Project Management Office (OGPI) – University of Alicante

Website: www.ogpi.ua.es

PATHWAY: www.pathway2employability.eu/

LEGAL NOTICE

The present document was developed and edited by the partner institutions of the Erasmus + Project PATHWAY- *Promoting the Employability and Entrepreneurship of Higher Education Graduates through Innovative Ways in the Philippines* under the coordination of the University of Alicante, Spain. The views and opinions expressed in this publication are those of the authors, and the European Commission cannot be held responsible for any use which may be made of the information contained therein. All contents generated by the PATHWAY Project are protected by intellectual property law, in particular copyright.

INTRODUCTION

PATHWAY or **Promoting the Employability and Entrepreneurship of Higher Education Graduates through Innovative Ways in the Philippines** addresses the national priority for the Erasmus+ CBHE programme under the Asian Region 6, Category D “Developing the Higher Education sector within society at large.” Within Category D, PATHWAY aims to strengthen the “University-enterprise cooperation” by promoting entrepreneurship and employability among graduates. PATHWAY is a structural project aiming to have an impact at the national level by enhancing the entrepreneurship and employability culture of Higher Promoting the Employability and Entrepreneurship of Higher Education Graduates through Innovative Ways in the Philippines (PATHWAY)

This project was launched virtually on February 23, 2021, with 2 major objectives: To consolidate the entrepreneurship and employment structures at HEIs by fostering and boosting university-enterprise synergies and to accompany CHEDs reforms on building up an entrepreneurship culture at the national level through the implementation of pilot initiatives and policy recommendations.

With the incomparable guidance of the University of Alicante, University of Montpellier and the Commission on Higher Education, the 5 partner HEIs namely Ateneo de Manila University, Benguet State University, Lyceum of the Philippines University-Batangas, Polytechnic University of the Philippines, and St. Paul University Philippines together with the European Chamber of Commerce of the Philippines were able to execute the different work packages assigned to them.

EXPERIENCES GAINED DURING THE PROJECT

1. Enhanced Cross-Cultural Collaboration

Engaging with international partners fostered a rich exchange of ideas and best practices. The project provided a platform for all participants to engage with educators and entrepreneurs, fostering a global perspective on business, innovation, and employability. This exposed them to diverse entrepreneurial ecosystems, enhancing their understanding of global business trends and opportunities.

2. Innovative Curriculum Development

The project facilitated the redesign of curricula focused on entrepreneurship and employability. This included the integration of entrepreneurship subjects across all programs to inculcate an entrepreneurship mindset among students. This also sets the foundation for inculcating entrepreneurship spirit in students whose programs are not necessarily related to business. Moreover, these curricula were designed to be more practical and aligned with the current market needs, equipping students with relevant skills and competencies. In addition, this action led to initiatives like the creation of the Government-Industry-Academe Board (GIAB) in PUP aimed at achieving the following: a) enhancement of the curricula; b) strengthened industry-academia collaboration; c) promotion of entrepreneurship and innovation; and d) address workforce development needs.

3. Skill Development Workshops

Numerous workshops and training sessions were conducted by all local partners, focusing on soft skills such as leadership, communication, and critical thinking, as well as technical skills like business planning, resume writing, and digital competencies. These workshops significantly improved the employability of graduates by making them more versatile and job-ready. Moreover, the staff involved in the mobility gained valuable experiences and knowledge that contributed to their professional and personal development.

4. Enhancement of Established Incubation Centers

The project led to the enhancement of business incubation centers within partner universities. These centers provided aspiring entrepreneurs with resources, mentorship, and networking opportunities, thereby nurturing their

startup ideas from conception to execution. These centers also became avenues for activities that foster creativity and interest in innovation.

5. Internship and Apprenticeship Programs

Collaborations with local and international businesses facilitated internship and apprenticeship programs for students. These programs offered hands-on experience, allowing students to apply theoretical knowledge in real-world settings and gain practical insights into the business world. Internships also helped students build professional networks, increasing their chances of employment post-graduation.

6. Entrepreneurial Competitions and Hackathons

Organizing entrepreneurial competitions and hackathons stimulated creative thinking and innovation among students. These events provided a competitive yet collaborative environment where students could showcase their ideas, receive feedback, and gain recognition. Participating students were given a chance to interact with the sponsoring industry by pitching their business ideas. Winning participants had a once-in-a-lifetime opportunity to attend an innovation conference in Europe and receive other exciting prizes.

7. Networking Opportunities

Participants had the chance to network with successful entrepreneurs, industry experts, and alumni. These interactions provided valuable insights, mentorship, and potential investment opportunities, broadening the students' professional networks. Meanwhile, the participating HEIs also gained new linkages and partnerships which may lead to more projects and programs for the faculty, non-teaching staff, and students.

8. Enhanced Employability through Certification Programs

Certification programs in emerging fields as well as cultivating skills aligned to Industry 4.0 such as digital marketing, data analytics, and project management were also launched as inspired by the project. These certifications make graduates more attractive to employers, thereby enhancing their employability.

9. Improved Institutional Capacities

Partner institutions benefited from improved capacities in terms of additional facilities, new services (e.g. entrepreneurship services), resource management, local linkages, and international collaborations. This institutional strengthening contributed to the sustainability of the project's outcomes.

10. Policy Advocacy and Development

The project outcomes are being used to advocate for policy changes at the national level. Recommendations were made to integrate entrepreneurship education into the national curriculum and to provide more support for young entrepreneurs through government initiatives including access to funding and other resources.

Through these experiences, the Erasmus+ project significantly contributed to the enhancement of employability and entrepreneurship among Higher Education graduates in the Philippines. The innovative approaches and collaborative efforts have created a more dynamic and responsive educational environment, preparing graduates to thrive in a competitive global economy.

NATIONAL EVENT AND THE WORLD OF WORK CAFÉ

The PATHWAY National Event, held on 14 October 2022, at Dusit Thani Manila, addressed critical issues surrounding employability and entrepreneurship in the evolving economic landscape of the Philippines. The event underscored the need for collaborative efforts among higher education institutions (HEIs), industry, and government agencies to better align educational outcomes with labor market demands.

The morning session highlighted the urgency of addressing skill mismatches and enhancing cooperation among stakeholders. Emphasis was placed on the importance of investing in professional education and upskilling to align with global standards. The PATHWAY Project's key objective is to enhance the entrepreneurship and employability culture within HEIs to meet labor market needs. This initiative is crucial given the high rates of unemployment and underemployment among Filipino graduates, and the necessity of producing graduates who possess the right skills for available jobs.

Legislative support for these initiatives is critical. Policies that match educational outcomes with industry needs and support economic resilience are essential for fostering a robust labor market. Equipping graduates with critical thinking and problem-solving skills is vital for meeting global labor standards. Additionally, **nurturing an entrepreneurial culture and implementing supportive policies for entrepreneurship education can significantly contribute to economic growth.**

The afternoon session and panel discussions explored practical measures to bridge the gap between education and employment. **Identifying key employment sectors and emphasizing the importance of quality job creation, skills upgrading, and matching job seekers with industry demands** were crucial points for collaboration. The **significance of strong industry-academia linkages to foster innovation and economic growth** was also highlighted. **Enhanced data collection and collaborative efforts** to align HEI programs with labor market needs are necessary steps to ensure that educational outcomes meet the demands of the evolving job market.

In conclusion, the PATHWAY National Event underscored the multifaceted approach required to improve employability and entrepreneurship in the Philippines. Continued collaboration among HEIs, industry, and government

agencies is imperative to sustain momentum. The Philippines can enhance its global competitiveness and ensure sustainable economic growth by aligning educational outcomes with labor market needs and fostering an entrepreneurial culture.

PILOT ACTIVITIES FOR STUDENTS

In the framework of WP3 Pilot Activities, each partner university designed and implemented four new activities aimed at enhancing students' employability and entrepreneurship efforts, as well as strengthening the institution's ties to the business sector. These were the following:

1. Establishing a new Entrepreneurship Service

Each university designed its own Entrepreneurship Service. They had workshops, mentorship sessions, and hands-on learning activities wherein the participating students enhanced their entrepreneurial skill sets, developed a wider business network, and showcased sustainable and ethical portions of their proposed businesses. The following are the newly established entrepreneurship services:

- **Pitching Workshop**- aimed to develop a new support service focused on fostering entrepreneurial spirit, providing practical business knowledge, facilitating networking, offering resources, and promoting sustainable practices among young entrepreneurs. (Ateneo de Manila University)
- **Leveraging an Ambience of Knowledge and Opportunities (LAKO2)**-Leveraging an Ambience of Knowledge & Opportunities" student entrepreneurship program stands as a beacon of innovation, collaboration, and empowerment for aspiring student entrepreneurs. Through its multifaceted approach, the program has successfully created an environment where students are encouraged to unleash their creativity, hone their entrepreneurial skills, and forge meaningful connections within the entrepreneurial ecosystem. (Benguet State University)
- **LPU-B Launchpad**- Launchpad is a new Entrepreneurship service of LPU-Batangas designed to help startups and entrepreneurs launch and grow their businesses. This will typically provides resources such as mentorship, networking opportunities, and access to workspace

facilities. It also aims to accelerate the development and success of startups by offering tailored support and connections within the entrepreneurial ecosystem. (Lyceum of the Philippines University-Batangas)

- **PUP SIBOL** is the overarching program of the University that aims to seamlessly integrate the outputs and outcomes of the academic and research sectors with the career development and entrepreneurship services and support of the University. It will serve as the blueprint that will define the pathways that will lead students to opportunities for entrepreneurship apart from the ongoing annual activities that assist in their employment. (Polytechnic University of the Philippines)
- **Entrepreneurship and Employment Center-** supports the development of entrepreneurial skills and fosters employment opportunities for students in the University. Accordingly, the center serves as a hub for resources, training, and networking opportunities for students to start their own businesses or find employment. (St. Paul University Philippines)

The service also enabled faculty and associated staff to enhance their entrepreneurship learning programs and personal skill sets to empower more student entrepreneurs within their respective universities.

The universities also strengthened and widened their professional and government networks. A pathway to establishing, managing, and growing student-borne enterprises was made clearer through these services. As a result, the evolving synergies between the universities, the students and the government may create more independent businesses and organizations that will contribute to the nation's economic development in the future.

2. Hackathon

The Hackathon was an opportune time for students to present their innovative ideas for a solution to a challenge presented by the sponsor businesses. Additionally, the winners from each university were able to attend a major innovation/startup event in Europe to gain further knowledge in innovative entrepreneurship.

The key to making these hackathons successful was the partnership developed by the universities with the participating businesses who also served as their major sponsor of each Hackathon.

Hackathon	ADMU	BSU	LPU-B	PUP	SPUP
Title	Ateneo Innov Jam	Innovate: Road to Endless Innovation	2023 HACKathink: LPU-B Innovation Challenge	2023 PUP HACKATHON: Uthak and Puhunan	Summer Startup Bootcamp for Aspiring Founders
Dates	July 3-4, 2023	July 12-14, 2023	July 6-7, 2023	July 3-4, 2023	July 10-11, 2023
Real-life Business Challenge	Create pitch decks and design prototypes for their proposed innovations to promote and improve Asialink’s microfinancing programs and offerings.	Health 100 Restoreant	Prioritizing Solutions to the following problems: Sales, Profitability, Guests, and Core Values of Employees		“Enterprise Management and Logistics” in consideration of the need of Cagayan Valley Regio
Number of Participants	36	50	36	60	48
Industry Partner/ Partner Organization	Asialink Finance Corporation	Health 100	Silver Peak Group of Companies	Samsung	Randomware.co

The universities organized and implemented this type of hackathon for the first time and realized that having more hackathons of this level would be a tremendous benefit for all those involved in the program. This also resulted in a very wide understanding of what the current startup trends are in different parts of the world.

3. Soft Skills training

Learning from what future skill sets would be needed by various industries gave the chance for the university’s skills training programs to be upgraded.

The student participants appreciated this training as it allowed them to understand what potential employers are looking for and how they can individually improve their soft skills for higher employability.

There were 61 BSU students who attended the training-workshop from the 91 students that pre-registered online. The event was facilitated by five BSU

PATHWAY Project members with the assistance of OSS-VPU and BSU-IRO staff. Two subject-experts from BSU and two other expert professionals attended as resource speakers and discussed four different aspects of emotional intelligence as a soft-skill. It was established in the training-workshop that it is essential for students to work on developing their emotional intelligence skills to increase their employability, stand out in the job market, and achieve success in their careers.

For LPU-Batangas, the workshop on soft skills training was very educational and engaging. The presentations of each speaker were simplified for everyone to easily comprehend and find them relatable. This may then increase the students' tendency to put into practice their new learnings and further improve their existing soft skills. With this, the objective of this workshop can already be said to be partially successful. Hopefully, in years to come all the students who were able to participate here would be able to attain a solid foundation regarding soft skills and would be able to put into practice such skills in the real world. A total of 51 students across programs attended the said training.

SPUP has invited four (4) speakers to further expand the topic on employability. Dr. Allan Peejay Lappay (Director, Alumni, External Relations, and Advocacies) spoke on “Forming Ethical Mindset” – that he linked into SPUP’s core values as Paulinian emblems to inhabit ethical behaviors and practices. On the other hand, Dr. Teresita Lasam (Director, Student Affairs and Academic Support Services) talked on “Developing Motivational Skills”. She focused on differentiating intrinsic and extrinsic motivations; concluding that a balance of both guarantees absolute motivation. Meanwhile, Dr. Juana Rivera (Director, Human Resource) tackled the topic “Igniting Negotiating Skills”. In her sharing, good oral and written communication were emphasized. She also highlighted confidence, body language, and emotional intelligence as supplementing tools to assist one’s means of communication, especially in negotiating. Moreover, Mr. Rucelj Pugeda (Adviser, Paulinian Student Government), shared key points on “Fostering Networking Skills”. He established the vital role of collaboration in networking, while referencing to his leadership experiences in college. He then encouraged students to associate themselves in clubs and organizations, which can be their respective training grounds to master networking.

4. 100 Students x 20 Industries Encounter

The 100x20 activity was a relaxed encounter that enabled university students and potential employers to discuss the needs of employers and what university

students have to offer after graduation. This activity narrowed the gap between employers and potential employees.

Encounters like this also allow university placement officers and their respective offices to capture what employers are looking for in terms of fresh graduates; thus, enabling them to create skills development programs for better employability.

NATIONAL CONFERENCE

Theme:

“PATHWAYS to Success: Expanding Opportunities for Higher Education Graduates through Entrepreneurship and Employability”

The National Conference marked the culmination of the 3-year collaborative efforts of the partner institutions. It brings together various higher learning institutions, private organizations, and government agencies to share their best practices, exchange ideas, and address common issues concerning entrepreneurship education and employability in the country. It is a convergence of academic experts, policy-makers, and practitioners in the field of education and entrepreneurship providing learning and networking opportunities for all the participants.

The activity presents some of the major outputs of the Pathway project such as the Entrepreneurship Competencies Framework developed specifically for the Philippines setting. It also highlights some of the key activities undertaken during the project implementation like the business hackathon, business-students encounters, and the establishment of entrepreneurship and employability centers. The partner HEIs share some of their best practices and experiences in implementing the various activities.

Further, the event yields actionable strategies aimed at fostering entrepreneurship and enhancing employability. The output of the 2-day conference is crucial in crafting policy reforms, identifying investment in education and training programs, and developing initiatives to support the promotion of the entrepreneurship ecosystem in the country and strengthen the employability skills of graduates thereby contributing to economic growth and job creation.

OBSERVATORY ANALYSIS FINDINGS

As part of PATHWAY, staff from the partner universities received training in the design and purpose of labor-market observatories in universities. Two surveys were designed to estimate recent graduates' employability and the entrepreneurial intentions of current students. Based on the analysis of survey results, there are ten key findings which should encourage policymakers to implement actions that boost employability and entrepreneurial culture among students:

1. Variability in Entrepreneurial Intentions

There are significant differences in entrepreneurial intentions among students from different educational and regional backgrounds, suggesting targeted support and resources could be beneficial.

2. Influence of Entrepreneurial Attitude and Self-Efficacy

The presence of a strong entrepreneurial attitude and self-efficacy significantly predicts the likelihood of engaging in entrepreneurial activities, pointing to the need for programs that enhance these traits in students.

3. Role of Subjective Norms

Perceived social pressures and norms play a crucial role in shaping entrepreneurial intentions, indicating that cultural and societal support systems are essential for fostering entrepreneurship.

4. Diverse Post-Graduation Employment Experiences

Graduates face a dynamic employment landscape, with many securing employment immediately while others engage in multiple jobs, highlighting the need for adaptable career support services.

5. Skills Gap Between Education and Employment

There appears to be a mismatch between the skills developed during university and those required in the workplace, suggesting the necessity for curriculum updates and enhanced career services.

6. High Levels of Study Satisfaction

Most graduates are satisfied with their university studies, but this satisfaction does not necessarily correlate with job satisfaction, which varies significantly among respondents.

7. Employment Through Networks and Internships

A substantial number of jobs are secured through personal contacts and internships, which underscores the importance of networking opportunities and practical work experiences during studies.

8. Entrepreneurial Spirit Among Graduates

There is a notable entrepreneurial spirit among graduates, which can be further supported through dedicated entrepreneurial programs and resources offered by universities.

9. Integration of Work and Study

A significant portion of students who worked during their studies may have developed valuable professional networks and work experience, which could aid in better employment outcomes post-graduation.

10. Need for Further Research

The study suggests further research to explore the causes of job satisfaction or dissatisfaction among graduates, which can inform university support services and curriculum development, particularly in fostering entrepreneurial skills and mindsets

ENTREPRENEURSHIP COMPETENCIES

The PATHWAY Taskforce

The task force have the mission to review the existence research in the topic and interview main stakeholders to propose final recommendations by the end of the project.

The Task Force is composed of 3 members per partner university such as Ateneo De Manila University, Benguet State University, Polytechnic University of the Philippines, St. Paul University Philippines, and Lyceum of the Philippines University-Batangas, and 2 members from ECCP and the Commission on Higher Education. They had 3 major face-to-face meetings and discuss how are they going to translate entrepreneurship into competencies that was held at LPU-Batangas, Benguet State University, and St. Paul University Philippines. Additional inputs were also came from University of Alicante, Spain and University of Montpellier.

The Entrepreneurship Competencies Framework

Being entrepreneurial is to live sustainably amidst economic challenges in today's technologically advanced global landscape. Becoming entrepreneurial involves the development of related competencies to be fully capacitated in identifying business opportunities and taking calculated risks to be engaged with sustainable ventures. The development of entrepreneurial competencies enables individuals to make viable financial decisions in their field of specialization.

Developing entrepreneurial competencies among students will prepare them for their entrepreneurship journey. This will equip students with the competencies required to manage and sustain their entrepreneurial ventures. This will help them address the demands and complexities of their entrepreneurial engagement to realize their entrepreneurial goals.

Entrepreneurship introduces students to the fundamentals of finance, economics, and business management. Acquiring entrepreneurial skills equips students with financial literacy, enabling them to make informed financial decisions, manage resources effectively, and understand the implications of their actions. This knowledge builds a strong foundation for future ventures and enhances their overall business acumen.

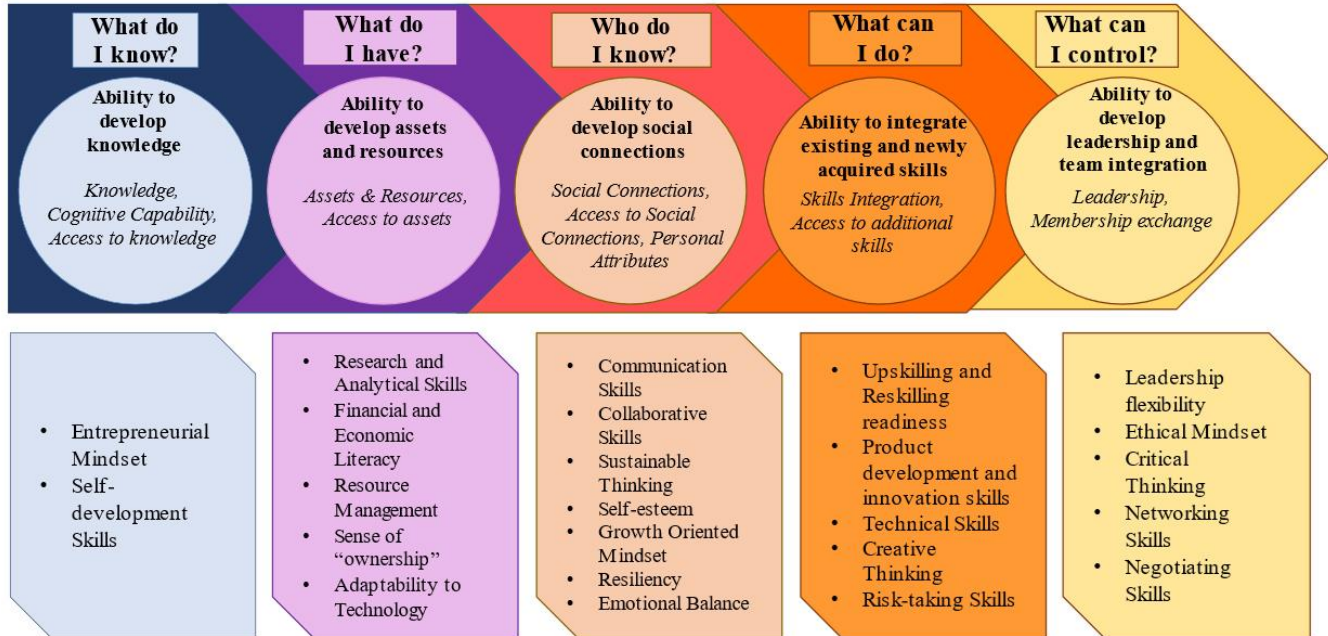
Due to the heterogeneity in definitions and competence frameworks in the field of entrepreneurship education, literature, and practice still illustrate much confusion about what should be taught in academic entrepreneurship courses and which competencies need to be developed (Tittel and Terzidis, 2020). These authors made an in-depth review of entrepreneurial competencies dating back to the year 2008 by Mitchelmore and Rowley by condensing the entrepreneurial competencies mentioned in the literature and developing a list of them. As a result, the study illustrates that the authors Bird (1995), Man et al. (2002), and Mitchelmore and Rowley (2010) are identified to be of vital importance not only about the definitions but also for categorization and the listing of entrepreneurial competencies.

The definitions given by these recognized authors are: Entrepreneurial competencies have been identified as a specific group of competencies relevant to the exercise of successful entrepreneurship (Mitchelmore and Rowley, 2010); entrepreneurial competencies are defined as underlying characteristics such as generic and specific knowledge, motive, traits, self-images, social roles and skills which result in venture birth, survival and/or growth (Bird, 1995); entrepreneurial competencies are considered a higher-level characteristic encompassing personality trait, skills and knowledge and therefore can be seen as the total ability of the entrepreneur to perform a job role successfully (Man et al., 2002).

From the policy studies, the EntreComp Framework report (Bacigalupo et al., 2016) defines entrepreneurship as a competence, that applies to all spheres of life: from nurturing personal development, to actively participating in society, to (re)entering the job market as an employee or as a self-employed person and also to starting up ventures (cultural, social or commercial).

Acquiring entrepreneurial skills is not limited to starting businesses; it is about empowering students to navigate an ever-changing world with confidence, creativity, and resilience. These skills foster innovation, leadership, and critical thinking—qualities that are highly sought-after in today's job market. By developing an entrepreneurial mindset, students are better equipped to shape their own future, pursue their passions, and make a positive impact on the world around them. So, with entrepreneurial skills, it will undoubtedly unlock a world of opportunities and set you on a path to success.

ENTREPRENEURIAL COMPETENCIES FRAMEWORK



The Entrepreneurial Competencies Framework refers to the knowledge, assets, social connections, integration of skills, and leadership that are essential for individuals to successfully start, manage, and grow businesses. These competencies encompass a wide range of traits and capabilities that enable entrepreneurs to identify opportunities, navigate challenges, and achieve their goals in the competitive world of business.

Recommendations for Implementation

Taskforce recommendations on entrepreneurship often aim to foster an environment conducive to entrepreneurial activity, stimulate economic growth, and promote innovation. Taskforce recommends creating supportive policy environments at the national, regional, and local levels. Entrepreneurship education and training programs can equip individuals with the skills and knowledge needed to start and grow businesses. Taskforce recommendations focused on integrating entrepreneurship education into school curricula not only concentrating on Entrepreneurship majors but all across programs, offering vocational training programs, and providing mentorship opportunities for aspiring

entrepreneurs. The task force recommends measures to support research and development, foster technology transfer, and promote collaboration between start-ups and established firms.

In addition, building a vibrant entrepreneurship ecosystem requires collaboration among various stakeholders, including government, academia, industry, and the community where initiatives to foster collaboration, such as creating co-working spaces, organizing networking events, and establishing start-up incubators or accelerators. Finally, entrepreneurship is a dynamic field, and recommendations should emphasize the importance of continuous learning and adaptation. The task force recommends mechanisms for ongoing dialogue and collaboration among stakeholders to stay abreast of emerging trends and evolving needs in the entrepreneurial ecosystem.

Some practical recommendations on how this framework could be implemented.

1. In the academe, this framework can be implemented by incorporating it in the BS in Entrepreneurship curriculum as well as other degree programs. It starts with the alignment of program outcomes to this framework so that it will be embedded in all of the courses in the degree that the students will take.
2. The framework can be included as one topic in the basic entrepreneurship course, particularly under the characteristics or competencies of an entrepreneur.
3. This framework can also be integrated specifically in designing various class activities.
4. Integrate the framework into entrepreneurship students' capstone projects or thesis requirements, requiring them to apply principles and competencies to develop business plans, demonstrate their understanding, and assess their mastery.
5. Create guest speaker sessions anchored on entrepreneurship competencies or industry panels featuring successful entrepreneurs, sharing their experiences and insights. Encourage students to analyze these presentations, complementing theoretical coursework and providing real-world perspectives.

General recommendations for improving Employability and Entrepreneurship of Higher Education graduates in the Philippines

Improving the employability and entrepreneurship of Higher Education Institution (HEI) graduates in the Philippines requires a multifaceted approach that addresses both the skills gap and the ecosystem needed to support budding entrepreneurs. Below are comprehensive strategies that can be implemented by universities, government bodies, industry partners, and other stakeholders to achieve this goal:

1. Curriculum Enhancement

Integrate Practical Skills: Update academic programs to include practical, hands-on training that aligns with industry needs. Courses should emphasize critical thinking, problem-solving, and project-based learning.

Entrepreneurship Education: Introduce dedicated courses on entrepreneurship, business planning, and innovation to equip students with the knowledge to start their own ventures.

Soft Skills Development: Incorporate training in communication, teamwork, leadership, and emotional intelligence to enhance overall employability.

2. Industry Collaboration

Internships and Apprenticeships: Establish strong partnerships with local and international businesses to provide students with internship and apprenticeship opportunities that offer real-world experience.

Curriculum Co-creation: Collaborate with industry experts to design and update curricula, ensuring that academic programs remain relevant and aligned with current market demands.

Guest Lectures and Workshops: Invite industry professionals to conduct seminars, workshops, and guest lectures, exposing students to practical insights and trends.

3. Experiential Learning Opportunities

Hackathons and Competitions: Organize events like hackathons, business plan competitions, and innovation challenges to foster creativity and practical problem-solving skills.

Project-Based Learning: Encourage students to engage in projects that address real-world problems, allowing them to apply theoretical knowledge in practical settings.

4. Strengthening Career Services

Career Counselling: Enhance career counselling services to provide personalized guidance on career paths, job searching strategies, and skill development.

Job Fairs and Networking Events: Host regular job fairs and networking events that connect students with potential employers and industry leaders.

Resume and Interview Workshops: Offer workshops focused on resume building, interview techniques, and professional etiquette to prepare students for the job market.

5. Entrepreneurship Support Systems

Incubators and Accelerators: Establish incubators and accelerators within universities to support student start-ups with resources, mentorship, and funding opportunities.

Seed Funding and Grants: Provide seed funding, grants, and scholarships for innovative business ideas, reducing financial barriers for aspiring entrepreneurs.

Mentorship Programs: Connect students with experienced entrepreneurs and industry mentors who can offer guidance, support, and networking opportunities.

6. Skills Development and Training

Technical Skills Training: Offer specialized training in high-demand areas such as digital marketing, data analysis, coding, and cybersecurity to enhance technical proficiency.

Continuous Learning Opportunities: Encourage lifelong learning through workshops, online courses, and certifications that allow graduates to continuously upgrade their skills.

7. Alumni Engagement

Alumni Networks: Leverage alumni networks to create mentorship opportunities, internships, and job placements for current students.

Alumni as Guest Speakers: Involve successful alumni in speaking engagements and panel discussions to inspire and guide students.

8. Government and Policy Support

Supportive Policies: Advocate for government policies that support higher education institutions in enhancing employability and entrepreneurship programs.

Funding and Grants: Secure government funding and grants for programs that promote workforce development and entrepreneurial initiatives.

9. International Exposure and Collaboration

Exchange Programs: Facilitate student exchange programs with international universities to broaden their perspectives and enhance global employability.

Global Competitions and Conferences: Encourage participation in international competitions and conferences to expose students to global best practices and networking opportunities.

10. Research and Innovation Promotion

Encourage Research Projects: Support faculty and student-led research projects that can lead to innovative solutions and potential commercial applications.

Intellectual Property Support: Provide resources and guidance on intellectual property rights to help students protect and monetize their innovations.

11. Networking Opportunities

Industry Partnerships: Foster strong relationships with industry partners to create networking opportunities, internships, and collaborative projects.

Professional Associations: Encourage students to join professional associations and attend industry events to build their professional networks.

12. Use of Technology and Digital Tools

Online Learning Platforms: Utilize online platforms for delivering courses, workshops, and training sessions that can reach a wider audience.

Career Development Tools: Implement digital tools and resources for career planning, job matching, and skill assessment to streamline the employability process.

13. Mentorship and Guidance

Faculty Mentorship: Encourage faculty members to mentor students on academic, career, and entrepreneurial pursuits.

Peer Mentorship Programs: Establish peer mentorship programs where senior students guide juniors, fostering a collaborative learning environment.

14. Infrastructure and Resources

Modern Facilities: Invest in state-of-the-art laboratories, libraries, and technology centers that support advanced learning and research.

Access to Tools and Technologies: Ensure students have access to the latest tools and technologies relevant to their fields of study.

15. Promote a Culture of Innovation and Lifelong Learning

Innovation Hubs: Create spaces dedicated to innovation and creativity where students can experiment with ideas and collaborate on projects.

Encourage Curiosity: Foster an academic culture that values curiosity, experimentation, and continuous improvement.

16. Community and Social Engagement

Service Learning: Incorporate community service and social engagement projects into the curriculum to develop socially responsible graduates.

Entrepreneurial Ecosystem: Build an entrepreneurial ecosystem that includes support from local communities, businesses, and government entities.

Enhancing the employability and entrepreneurship of HEI graduates in the Philippines requires a collaborative effort that bridges the gap between education and industry needs. By implementing comprehensive strategies that focus on practical skills, industry partnerships, experiential learning, and robust support systems, universities can produce graduates who are not only job-ready but also capable of driving innovation and economic growth through entrepreneurship.