

ENHANCING ENTREPRENEURSHIP SKILL AMONG UNIVERSITY'S STUDENTS BY ONLINE BUSINESS SIMULATION

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Abstract

Malaysia Government is currently focused to produce more entrepreneurs among university students with high quality and entrepreneurial values. This goal is concomitant with the country's economic transformation towards a high-income country by the year 2020. This study helps to identify the effectiveness of entrepreneurship courses that is offered to UKM students which include first year student. This courses is only offered by UKM-CESMED (Centre of Entrepreneurship Development and SMEs) for the first year student. This study used a descriptive analysis of 3,129 students who have followed the entrepreneurship course. The objective of this study is to determine the effectiveness of entrepreneurship courses that is offered to the first year students. The funding show that eighty percent of students agreed that this course can provide the basic knowledge of entrepreneurship and stimulate interest in students to become entrepreneurs in the future. In addition, this research also have found that the Health and Medical (H&M) department have the best Entrepreneur skill among the three main department. Therefore this course also can help the student to learn the necessary skills to be an entrepreneur.

Keywords: Business simulation, Entrepreneurship course, Student UKM, UKM-CESMED, Skills.

1. Introduction

Unemployment is seen as a serious problem to Malaysian Government. This is due to unemployment among the graduate student in Malaysia. Every year many students graduated from institutions of higher learning either in public or private institutions. A lot of competition among the graduate student causing a high unemployment rate. This competition exists in getting employment from the government and private sector. Many graduates are more interested in public

sector rather than the private due their secure the future. Jaison et al. [1] show that many graduates is working part-time job and working in a lower wage due to their lack of experience and their inability to find the right job. This is due to they employability from become a higher graduate into the labour market and begin to manage their employability [2]. The recent policy emphasis on employability rests on the assumption that the economic welfare of individuals and the competitive advantage of nations have come to depend on the knowledge, skills and enterprise of the workforce. Those with degree-level qualifications (graduate student) are seen to play a particularly important role in managing the 'knowledge-driven' economy of the future [3] but without proper comprising skills, competencies, independent and attributes they are unable to manage their employability [4].

Malaysian Department of statistical shows unemployment rate have increased drastically in 2015 as shown in Fig. 1. This is due to the Malaysian economics that unstable causing unemployment, inflation, and others. Due to this problem, Malaysian government have taken a step to create an entrepreneur among the graduate student. This is because they should employ their self rather than searching for job. Awogbenle and Iwuamadi agreed that this strategies help to boost employment and job creation for young people [5]. Entrepreneurship is accepted as an important valuable or an additional strategy to create jobs and improve livelihoods and economic independence of young people. Regrettably, problems of unemployment as experienced by the educated youths and even the uneducated but skilled youths have become more pathetic in many developing economies, despite the neo-liberal strategies in addressing the issue of enhancing human capital.

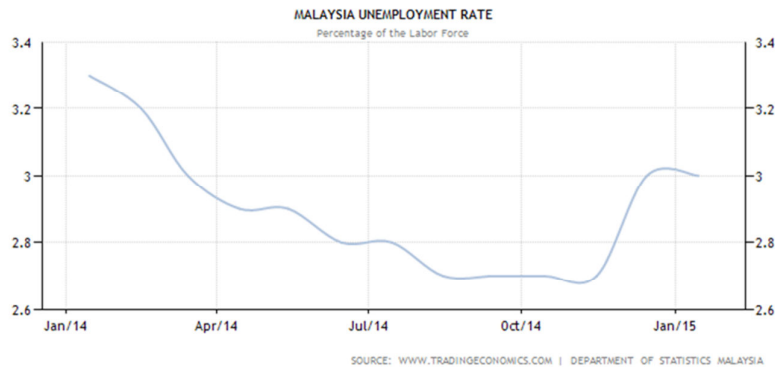


Fig. 1. Malaysian unemployment rate.

Entrepreneurship has emerged over the last two decades as arguably the most potent economic force the world has ever experienced and the recent growth and development in the curricula and programs devoted to entrepreneurship and new-venture creation have been remarkable. Gorman, Hanlon and King study about the theory of entrepreneurial learning which examined to determine key learning which explores how the processes might be simulated in a student-learning environment and highlights the role of emotional exposure, situated learning, action-orientation and discontinuity [6, 7].

2. Business Strategy Game for Young Entrepreneur

The Business Strategy Game is a PC-based simulation that gives the players experience in developing and implementing strategies [8]. Business simulation game usage in academia and in industry has continued to grow over the past 10 years with expectations for further growth [9]. It is obvious that the students need to run their company in a competitive market setting against other teams has bring the students to another level of strategizing their business. In the research of [8] Declan & William found that the forces need them to take risks and anticipate competitor strategies. Simulation education has increasing popularly [10] but many institutions find themselves more effective to interact with the student using education simulation rather than references by the book.

The business and management institutions in higher education have been increasingly using educational simulation games in recent years, factors influencing the continuing use of business simulation games by higher-education students are worth probing into. Hence this is cause by the technology development that is increasing dramatically. Student now days are more focusing on the electronic devices and futuristic program in the computer. They are exposing with updated information mainly in the internet as the simulation technology has improved and its costs cheaper. This made the demand for quality education have increased 71 behaviour and has embraces as a valuable tools for teaching. The features contain by the book have a limited interest rather than the interest in the simulation [10]

Although simulation is typically considered as relevant and highly applicable, the use of simulation is limited in reality. Many organizations have tried to use simulation to 71 behaviour their business processes at some stage. However, few are using simulation in a structured and effective manner. This may be caused by a lack of training and limitations of existing tools. First of all, the focus is mainly on design while managers would also like to use simulation for operational decision making (solving the concrete problem at hand rather than some abstract future problem). Second, there is limited support for using existing artifacts such as historical data and workflow schemas. Third, the 71 behaviour of resources is 71 behaviour in a rather naïve manner [11].

The main ideas of this Business Strategy Game are described as simulation based on business theory and application which reflect the latest technology. Experiments show that it is indeed possible to capture human 71 behaviour in business processes in a much better way. By incorporating better resource characterizations in contemporary tools, business process simulation can finally deliver on its outstanding promise [11].

3. Business simulation in academic entrepreneurship program in UKM

Universities play a functional role in promoting entrepreneurship education to develop regional and society economies, universities have a key role to play in promoting entrepreneurship since educational institutions are ideally considered the place in shaping entrepreneurial cultures and aspirations among students while they are studying to survive in today's robust business milieu [12, 13]. This could probably because universities are seedbeds of entrepreneurship to teach their students the way to think and behave entrepreneurially. Universities, in this

respect, should position themselves as a hub of entrepreneurship by making substantial contributions in nurturing an entrepreneurial environment that combines factors that contribute to the development of entrepreneurship

Entrepreneurship in higher education in Malaysia was introduced by the Ministry of Education since 2010 (<http://www.moe.gov.my/en/program-keusahawanan>). Entrepreneurship is critical for the economy as entrepreneurship is seen as an engine of economic progress, job creation as well as social adjustment and to enhanced economic development by generating new ideas and to translate into profitable ventures makes entrepreneurship an attention of the scholars as well as the policy makers [14]. Entrepreneurship Enculturation is a continuous long term process to attract interest of all members to society to be involved in business and begin by involving students from primary and secondary school and education institution [15].

Business simulation is one of the ways to train the new start up to understand the process in doing business. Business simulation also immerses students in the life of an evolving business for which they develop a continuing stream of business advice based on the application of accounting principles [16] and also emphasizing communication skills, alternative viewpoints, and the effect of assumptions on decisions, the simulation episodes demonstrate the usefulness and importance of accounting to business decision makers. In business one of the key of success besides the product is the ability to choose the best marketing strategy, thus in business simulation the start up or students can try and choose multiple times the types of marketing for their business. As mentioned by Green and Ryans, a key decision faced by marketing managers is the development of entry strategies for new markets. In addition to selecting which product market to enter, the manager must make decisions about the entry strategy itself [17].

Business Simulation in UKM is based on the collaboration with a business simulation in US. This is a new step for UKM to step up with new teaching technique using business simulation as a tool for education. In 2014 they have been 3,129 student that have participated for this business simulation game. This simulation game help to be understand the effective of a real business and the decision making that is involved in business life. The expose of this simulation game help student to think a way creatively to solution a problem that is facing. Besides, the simulation helps to enhance entrepreneurship skill among the students [18].

Based on Yu Cheng et al. [19] the finding shows that Entrepreneurship education in Malaysia is not matching students' skill expectations with skill acquisition. The findings also indicate that the level of understanding on "what is entrepreneurship" is still low among the respondents selected in this paper. To overcome this problem UKM have collaborate with UKM-CESMED (Centre of Entrepreneurship Development and SMEs) to help improve the skill of Entrepreneurship among the UKM student starting from the first year. Siegel and Phan agreed that University have to play a part to transfer technology strategic to influence the student to stress the entrepreneurial dimension [18]. Institutions that choose to stress the entrepreneurial dimension of technology seen as an advantage of skill deficiencies in technology transfer offices, reward systems that are inconsistent with enhanced entrepreneurial activity, and education/training for faculty members, post-docs, and graduate students relating to interactions with entrepreneurs.

4. Research Methodology

We have divided into 3 main departments such as Health & Medicine, Sciences Technology and Sciences social. Each department have they own creativity and intellectually ways to win this Business Simulation. The analysis is done between the 3 main departments to identify the best entrepreneur skills in decision making. The skill is divided into 3 main parts which is Sales, Net Income and Return of Sales (ROS). The analysis is done for the year 2014 from each faculty. The sample of this analysis is 3,129 student from the first year. The faculty is divided by the department based on their field of expertise. To access the effectiveness of the simulation we have obtain each score of the variable and analysis the score based on the decision made by the student. This analysis can show which department have the highest score based on the entrepreneur decision making skill. The analysis is calculated by each score of the variable to identify the best department of entrepreneur skill in decision making.

5. Findings and Discussion

Figure 2 shows that student from Health and Medical (H&M) that have the best entrepreneur skill in term of category of sales, net income, return of sales (ROS) and index point. This shows that student from H&M has the potential become an entrepreneur even though they have a small knowledge in business. This statement can be supported by Jianjun and Hongwei where they have highlighted that entrepreneurs with high intellectual achievement able to increase sales, asset scale and equity growth when diversification is adopted, while entrepreneurs with middle-level of intellectual achievement tends to cause negative effect on firm performance when diversification is adopted [20]. This shows that student with higher education for example in H&M filed is able to become a young entrepreneur. In addition, the H&M filed also have their desire and dream to become an Entrepreneur by opening their own clinical one day. This show their passion towards entrepreneurship is always there to own their own business. Furthermore this ambition sprit and wisdom may help them to become a better entrepreneur in contributing the Economic development in Malaysia.

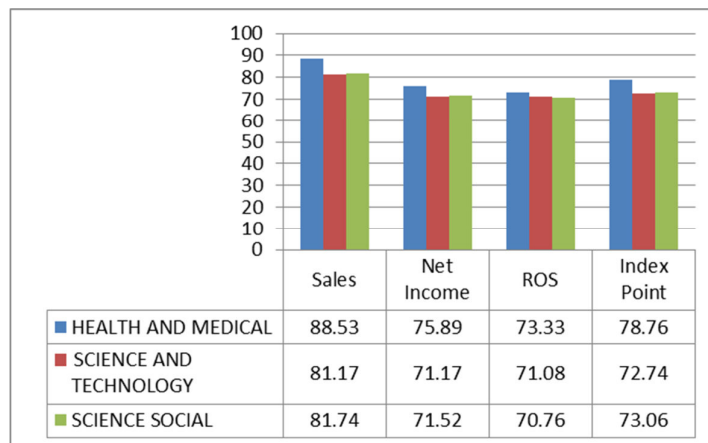


Fig. 2. Analysis based on three different field at UKM.

Figure 3 shows the sales is the highest focus rather than net income and ROS. In a business sales is seen as the main indicator for a successful business but it is not true. This is because sales only calculate the gross profit not the net profit. William Baumol has stated in the American Economic Review, that “the typical large corporation in the United States seek for the maximum not its profit but its total revenues which businessman calls it as sales this will result bankruptcy”. In addition, Baumol also stress that the import to maximize the net profit rather than sales. The ROS is the main part for business development, this is because it help increased the gross margin for the business [21].

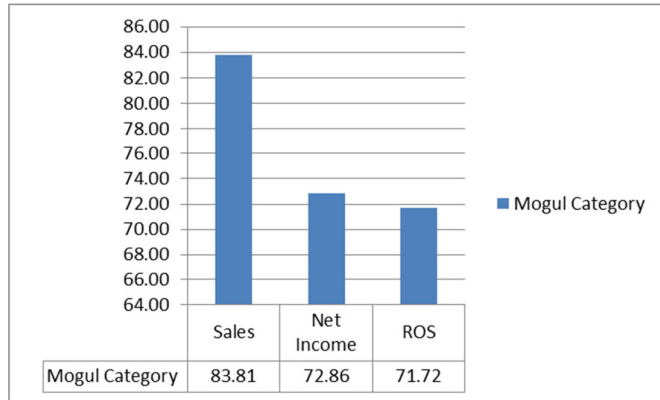


Fig. 3. Student focus on simulation category.

Figure 4 shows focus on Medical and Health (M&H) student in UKM. M&H student have 4 different departments such as Pharmacy (FFAR), Dental (FGG), Medical (FPER) and Health Sciences (FSK) department. This analysis shows department with potential to become an entrepreneur. The analysis shows Dental Department (FGG) is the best in terms of sales, net income, ROS and index point.

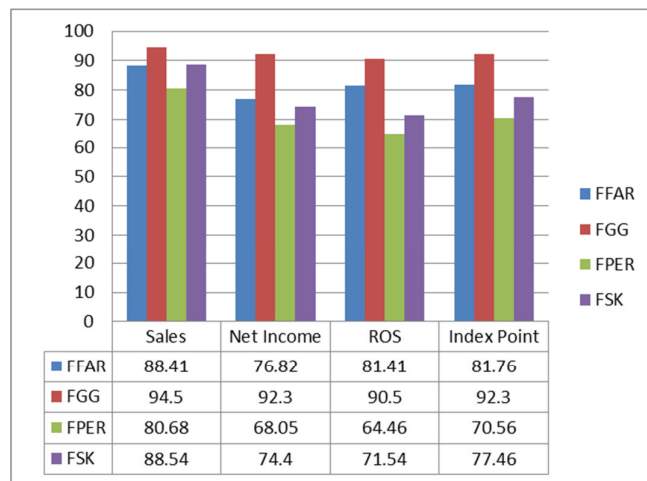


Fig. 4. Analysis focus on student in Medical and Health (M&H).

Furthermore, this shows that Dental Department (FGG) has a potential to become an entrepreneur in the future. The finding Louis et al. study is based on survey responses of a national sample of 4,000 clinical and non-clinical life sciences faculty in 49 U.S. research universities [22]. The results show non-clinical faculty as more involved at the back end. The more entrepreneurial end of commercialization while clinical faculty are involved at the back end. The more entrepreneurial faculty (non-clinical) are more likely to be secretive about their research. Clinical faculty are less likely to have been denied access to research results or products. Entrepreneurial faculty are not less productive in their faculty roles. This investigation is preliminary in that it addresses one large area of academic research but excludes fields with longer historical relationships with industry. This shows that the faculty members' involvement with industry in "entrepreneurial" involved in translating their research into potentially marketable knowledge or products. This action helps to create an entrepreneur with medical background that help to boost the economic development.

Figure 5 shows focus on Science and Technology (S&T) student in UKM. S&T student have 3 different departments such as Engineering (FKAB), Science and Technology (FST) and Information Science and Technology (FTSM) department. The analysis shows that in terms of sales, net income and index point Information Science and Technology (FTSM) is the best but in terms of Return of Sales (ROS) shows that Engineering (FKAB) also have a potential to become an entrepreneur in the future. The research Cooper there are also challenges because many entrepreneurs pursue personal goals, some of which are non-economic in nature [23]. Thus, decisions about whether to found ventures, about how vigorously to grow them, or about whether or not to close down marginal businesses are all influenced by the personal values of entrepreneurs. Even if the score of the S&T department is hot high but they still can contribute in terms of innovation of technology. The impact of technological innovation that done by the entrepreneur on growth has been largely effected [24]. In addition this will help the entrepreneur to take a step ahead in order to develop and innovate the product or services.

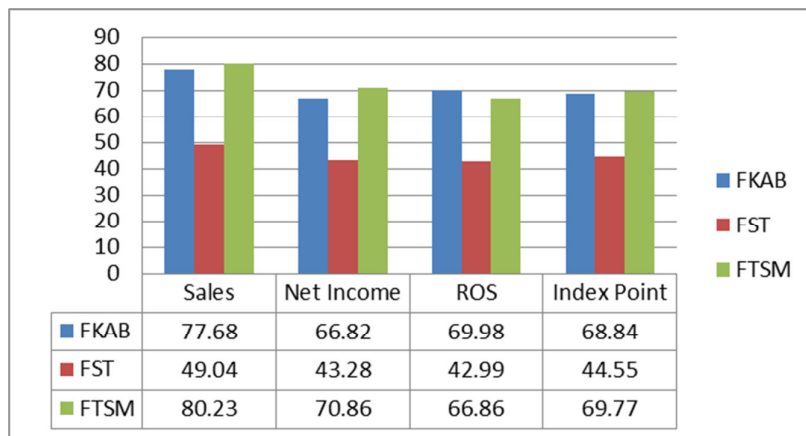


Fig. 5. Analysis focus on student in Science and Technology (S&T).

Figure 6 shows focus on student in Social Science (SS) UKM. SS student have 5 different departments such as Economics and Management (FEP), Education (FPEND), Islamic Studies (FPI), Social Science (FSSK) and Law (FUU) department. The analysis shows that in terms of sales dominion by Law department and net income is dominion by Social Science (FSSK). In addition, ROS is dominion by Islamic Studies (FPI). The social sciences are a source of new and fresh ideas about the theory and practice of entrepreneurship. Although social scientists participated very little in the revival of entrepreneurship studies that emerged in the 1980s, many noted thinkers have contributed to the social science literature on entrepreneurship. A review of economists' contributions is offered, and particular attention is paid to the work of Joseph Schumpeter, who argued that entrepreneurship is more about entrepreneurial behaviour than about the individual entrepreneur. The contributions of mainstream economists such as Frank Knight and Ludwig von Mises are then summarized. What follows is a brief discussion of the corpus produced by social scientists other than economists. This discussion focuses on the work of Max Weber, whose theory of entrepreneurship is often identified with his study of the positive influence of ascetic Protestantism on attitudes towards the entrepreneur. Following a review of literature produced by sociologists, anthropologists, psychologists, and economic historians, the power of the social sciences to integrate theoretical and practical knowledge of entrepreneurship is reiterated. A union of practical entrepreneurship and university-based social science research would be most productive.

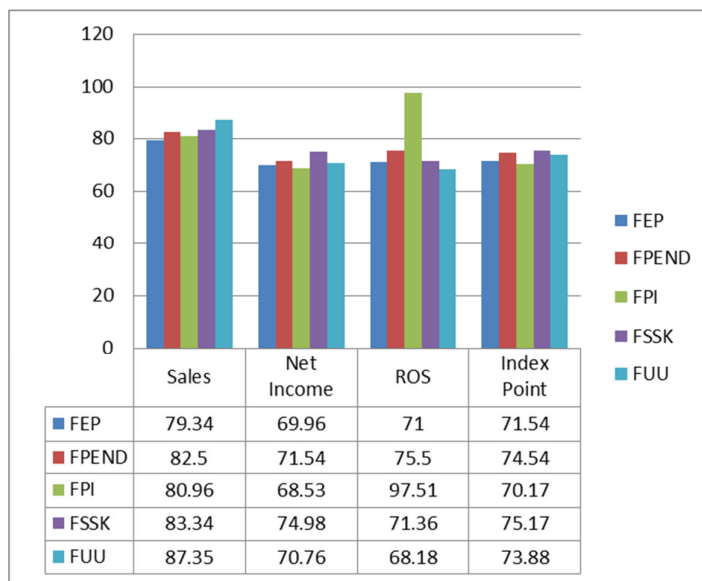


Fig. 6. Analysis based on four different variable.

6. Conclusion

Student in UKM see the entrepreneurship course as often student occupational aspirations. The interest among non-business such as the health and medical (H&M) student is highly significant beyond the business school. This can be

proven by the score by medical student compare to the business school. In addition, the finding also shows that entrepreneurship education can play an important role in encouraging management learning. The design of an entrepreneurship course simulation that the instruction should be appealed to, and reflect, the unique personality characteristics of the entrepreneur student, in order to produce a more effective course. The learning throughout online business simulation can help to enhance the entrepreneurship skill with in the student. In addition, Sexton and Upton find the students tend to be more autonomous, self-reliant, self-determined, rebellious, flexible, unpredictable, and unmanageable; they welcome change and new experiences [25]. To appeal to and encourage these traits, the senior-level entrepreneurship course was designed to be unstructured, pose problems, require novel solutions under conditions of ambiguity and risk, stress independent study, and include a “frustration factor.” Student in UKM are interest with latest technology that can help them to understand the entrepreneurship simulation more easy than normal teaching technique in class room. In addition, eighty percent of students agreed that this course can provide the basic knowledge of entrepreneurship and stimulate interest in students to become entrepreneurs in the future. In addition, this course also can help the student to learn the necessary skills to be an entrepreneur.

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