THE ENTREPRENEURSHIP LEARNING MODEL IMPROVES THE COMPETENCE OF ENTREPRENEURS

Suranto[1] – Agus Marimin[2] –Munajat Tri Nugrohi[3] –M Fahmi Johan Syah[4]
[1]Industrial Enggineering - Faculty of Engineering- Universitas Muhammadiyah Surakarta
[2] Islamic Economic – Faculty of Economics and Business – Institut Teknologi Bisnis AAS Indonesia
[3]Industrial Enggineering - Faculty of Engineering- Universitas Muhammadiyah Surakarta
[4] Accounting Education - Faculty of Education- Universitas Muhammadiyah Surakarta

author coresponden: sur185@ums.ac.id
co author: agus.marimin@gmail.com
munajat3n@2ums.ac.id
mfj120@ums.ac.id

ABSTRACT

To generate college graduates who are competitive, independent, ready to work and have entrepreneurial competencies will require hard work, both the learning process, learning strategies, regulations, curriculum, supporting infrastructure, methods and appropriate regulations to make it occur. This research aims to enhance entrepreneurial mental competence for students. The benefits of the research are that a goodness of fit entrepreneurship learning model is generated for enhancing entrepreneurial competence and a role model for increasing student entrepreneurial competence. The object of the research is students who take entrepreneurship lectures in the Industrial Engineering study program at Universitas Muhammadiyah Surakarta. Data collection methods are conducted with questionnaires, observation, documentation and direct action of students doing entrepreneurial learning activities. Stages of implementation through workshops, business internships, product manufacturing and design, and product marketing. Data analysis with structural equational modeling (SEM) concept approach build variable linkages and model formulation. Based on the results of the analysis, the model developed is declared goodness and fit so that it is feasible to use to develop an entrepreneurial learning model in order to enhance student entrepreneurial competence.

Keywords: learning, entrepreneurship, generate, startup business

1. INTRODUCTION

Based on data from the Department of Labor in 2021, the unemployment rate of educated people at the tertiary level in Indonesia is 13.17%, recording 1,286,464 people. The high level of educated unemployment is caused by many challenges encountered by students after they graduate. The challenges encountered by university graduates include not having the skills, knowledge, and competence to work (low employability rate), the unavailability of jobs compared to the number of university graduates each year, moreover the lack of competence to run their own business, where jobs are concentrated in certain cities and regions in Indonesia. To be able to overcome this, it is necessary to have support from the government to increase the employability rate for students and encourage them to run their own businesses (Nugroho, 2021).

Therefore, universities have a great responsibility in organizing education, learning and training because it is expected to prepare, equip and provide excellent service for students, especially affective, cognitive and psychomotor provision in entering the world of work, profession, position, career according to their field.

Entrepreneurial training with the model to be developed is more focused on students who have passion, talent and potential in improving entrepreneurial skills. It is to face competition, complexity and changing conditions of the era 5.0. The developed model is

expected to: (a). Hone the mentality, character and mentality of entrepreneurship, soft skills, and hard skills, managerial in innovation, collaboration to enhance independence; (b) Entrepreneurship development methods for students; (c). Help to improve the capacity and quality of graduates; (d). Creating employment opportunities and reducing unemployment; (e) Providing services and facilities for students to obtain internship and training places, as well as entrepreneurial experience. (f) Improve the role and contribution of entrepreneurship for students as a provision for the future (Nugroho, 2022).

To unravel the unemployment problem, the government has planned the Merdeka Learning Campus Merdeka (MBKM) program, so that graduates are able to run their own businesses, have recognition and experience outside the campus. The government policy program is oriented towards independence, knowledge and skills to business behavior for prospective graduates. Problems that occur: (a) there is undergraduate unemployment, (b) there is entrepreneurial learning in the affective and cognitive stages, (c) entrepreneurial learning collaboration between universities and the business world, especially Micro, Small and Medium Enterprises (MSMEs), has not been maximized. This problem is a concern for the importance of this research and becomes a novelty in research, in formulating, designing an appropriate and effective learning model in giving birth to the mental independence of new entrepreneurs.

Based on these issues, educational institutions should be more responsive in running programs and equipping students as early as possible. Similarly, the government has issued regulations or policies on entrepreneurship. The government is through eight independent campus policy programs, namely: (1) student exchanges, (2) internships or work practices, (3) teaching assistants in educational units, (4) research conducted with lecturers, (5) humanitarian projects, (6) entrepreneurial activities, (7) independent studies or projects, and (8) building villages or thematic KKN. The eight program policies are framed in the Merdeka Learning Campus Merdeka (MBKM) activity, which aims at scientific recognition and scientific provision from outside the campus, so that the outputs of higher education academic activities can work and be independent. This is in line with the goals of national education to make Indonesian humans as a whole, able to support their own needs (Makarim, 2019).

The MBKM program in the field of entrepreneurship includes the independent entrepreneurship program (WMK), which was implemented in 2022, and 2023 is in progress. Wirausaha Merdeka is a program initiated by the Ministry of Education, Culture, Research and Technology of the Republic of Indonesia, specifically for students who have and interest in the world of entrepreneurship. The objectives and outcomes of entrepreneurial activities are to provide opportunities and opportunities for students to, (a) encourage the mentality and character, interests, hobbies and enthusiasm of students in entrepreneurial activities; (b) instill the mindset and basic competencies of entrepreneurship; (c) encourage entrepreneurial improvement and experience for students; (d) enhance the ability of students' enthusiasm, work independence; (e) help to improve the capacity and quality of graduates (Nugroho, 2022).

The expected achievements through entrepreneurial learning programs with the concept of doing, empowering, facilitating and evaluating (DEFE) to train independence, develop student talent or passion, develop student business potential and so on, so that college graduates have an independent business mentality in carrying out work activities after graduation.

The implementation of the research is based on a portrait of the existing problems, so that the formulation of the problem is to formulate an entrepreneurial learning model in enhancing the mental competence of entrepreneurs and graduates who are ready to be independent, have the courage to create their own jobs. This research aims to formulate a feasible, appropriate model in entrepreneurial learning in enhancing the mental competence of business independence.

Enhancing entrepreneurial skills and competencies (Diwanti, 2020), enhancing understanding of knowledge: affective, cognitive in entrepreneurship (Handayani, 2016), and enhancing entrepreneurial independence through enhancing business mental independence have been carried out, but it cannot be maximized, so the concept of entrepreneurial learning, apprenticeship, competency-based training is needed which has the aim of enriching knowledge, skills and business behavior (Romanto, 2020).

Learning materials for entrepreneurial learning activities can be carried out through debriefing and stages: (1) the first stage, students gain knowledge, experience in workshops, explore theories, hard skills and soft skills, financial systems, production systems, marketing systems, business systems, supply chain systems, business model canvas, SWOT analysis, Business Plan, online and offline marketing by creating digital marketing accounts, company growth systems, project-based entrepreneurship, internships, based on hard skills and soft skills (Yulia, 2015). It is to strengthen the affective and cognitive abilities of prospective entrepreneurs, so that the entrepreneurial mentality can be built properly; (2) the second stage, internship activities in MSMEs, including direct experience and skills in finance, production, marketing, information systems and so on. Internship activities provide experience, skills and direct strengthening of entrepreneurship By doing activities (doing, empowering) from the potential they have. Learning methods are conducted through PAIKEM GEMBROT, namely active, innovative, creative, fun, joyful and weighty learning (Suranto, 2016) and active learning (Suranto, 2018). Enhancing entrepreneurial abilities can be achieved through enhancing knowledge, skills, behavior, internships in the work system for prospective graduates, very relevant in improving business independence and work ethic (Murjito, 2010); (3) The third stage, students design and prototype products to be sold. Students make designs, business plans and complete with calculations to be implemented in the form of real businesses.

The fourth stage, independent mental competence as an outcome is expected to improve, from the marketing of products made, sold and marketed online and offline. The ability of competence in skills, independent business, self-confidence, persistence, analytical skills, skills of thinking, skills of knowledge, management skills, vocational skills, and communication skills. The final output of the research is the formulation of a learning model to improve students' entrepreneurial mental competencies, with specifications: (a) flexible that can be applied to formal and non-formal education, (b) applicable to learners who pursue entrepreneurship, (c) visible according to the expectations of independent businesses and careers (Suranto, 2022). The hypothesis in this study, Ha: The entrepreneurial learning model is able to improve the mental competence of entrepreneurs, according to the concept of the theoretical model of entrepreneurial learning as shown in Figure-1.

Figure-1. The concept of the theoretical model of entrepreneurial learning

2. METHODOLOGY

The research method is designed as a step to solve the problem and the implementation of research activities can be well directed. The research stages include: a quantitative research approach using 40 college students who take entrepreneurship courses in industrial engineering, integrated with entrepreneurship courses held in even semesters.

The research design was carried out using an experimental design totaling 40 college students, collecting data through random techniques from college students who took part in learning totaling 162 college students, with different potentials, ranging from expertise in sports, culinary, animal husbandry, writing, catfish cultivation, and creative industries. Development stages with the concept of research and development, is in accordance with the steps proposed by Borg and Gall (Soegiyono, 2016).

Data collection is carried out through observation, questionnaires, interviews, documentation and literature study. Stages and steps are in the validity and reliability analysis test of the questionnaire, then conduct an experimental test of the entrepreneurship learning model for 40 UMS business entrepreneurship students. Questionnaires are given to college students, testing manifest variables that reflect the latent variables developed. Content validity is validity to test the validity of the instrument. Construct validity is an instrument based on concepts that use the opinions of experts / experts based on empirical experience in the field. Then formulate a model that is applied and tested through CFA (Confirmatory Factor Analyses), the core components of the model, the content of Gall's entrepreneurial competency learning model (Soegiyono, 2016), (Isa, 2011).

3. RESULT AND DISCUSSION
A. Stages and Variable Determination

The research was conducted in stages: (a) development of variables, (b) making the core components of the model, (d) the content of entrepreneurial learning materials, (d) testing the questionnaire instrument and testing the validation of the hypothetical model, (e) testing the working effectiveness of the model through goodness of fit model through CFA. Confirmatory Factor Analysis (CFA) measures the manifest confirmation in the model to confirm: (a) model effectiveness is applied, (b) analysis of manifest variables that are proven to reflect latent variables, (c) analysis of the correlation among variables.

The first stage, variable determination and development, builds the developed variables, followed by validation testing and content components of entrepreneurial learning, as shown in Figure-1. There are two latent variables in this research: learning activity programs, new entrepreneurial competencies. The latent variable of learning program includes 5 indicators: (1) workshops, (2) MSME internships, (3) product prototyping and design, (4) product expos, (5) online and offline marketing (Suranto, 2022), while the latent variables: in the form of new entrepreneurial mental competencies: (1) recognizing self-potential, (2) tenacity and perseverance, (3) perseverance, (4) knowledge, (5) skills, (6) cost of production and sales, (7) business planning, (8) canvas model and (9) strategic management, (10) marketing management, (11) human resource management, (12) production management and (13) financial management. The core components of the learning model according to Figure-2, and can be formulated with codes: workshops (W), MSME internships (M), product prototypes and designs (PD), product expos (EP), online and offline marketing (POO) (Suranto, 2022), while latent variables: in the form of mental competencies of new entrepreneurs: recognizing self-potential (MP), tenacious and persevering (UT), perseverance (PM), knowledge (P), skills (K), cost of goods produced and sold (HPP), business planning (MU), model canvas (MC), and strategic management (MS), marketing management (PM), human resource management (PSDM), production management (MPP) and financial management (MK).
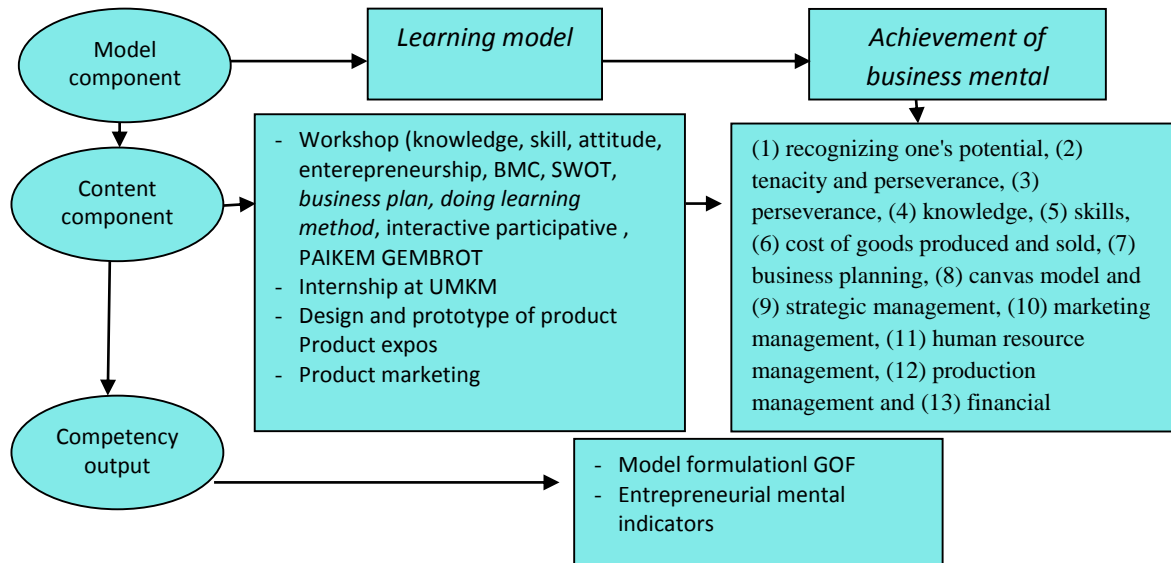
Figure-2. The core component of the entrepreneurial learning model

In this research, an integrated entrepreneurial learning model is formulated that has an influence on the achievement of results, namely improving students' entrepreneurial mental competence. The concept of the entrepreneurial mental competency model is in accordance with Figure-3. The competency improvement learning model includes activities: Workshop (W), UMKM internship (M), prototype and product design (PD), product expo (EP), online and offline marketing (POO) (Suranto, 2022), while entrepreneurial mental competencies include: recognizing self-potential (MP), tenacious and persevering (UT), perseverance (PM), knowledge (P), skills (K), cost of goods produced and sold (HPP), business planning (MU), model canvas (MC), and strategic management (MS), marketing management (PM), human resource management (PSDM), production management (MPP) and financial management (MK), (Yulia, 2020).
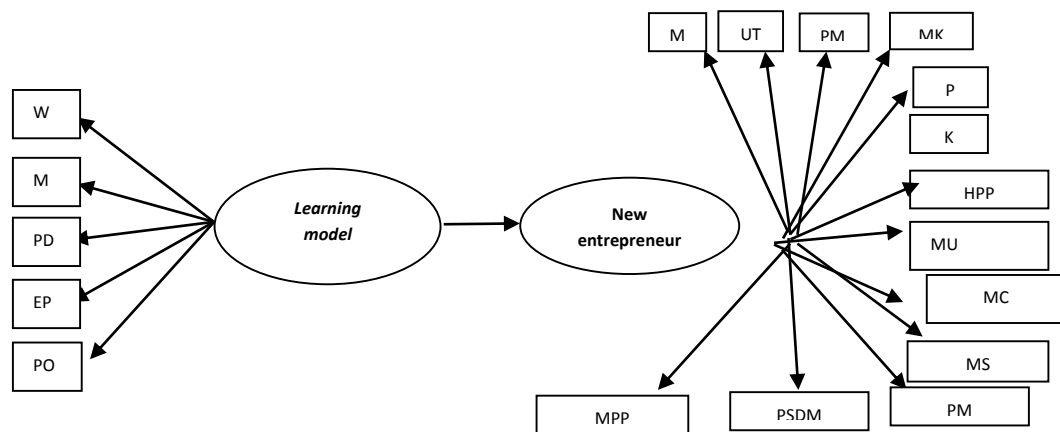

Figure-3. The concept of entrepreneurial learning model

Based on Figure-3, the latent variable consists of two variables, namely: learning program with five stages of indicators and achievement variables in the form of mental business competencies. The next stage is model validation analysis, and it is declared feasible if the formulated model has achieved Goodness Of Fit (GOF), according to the model equation

developed. The Goodness Of Fit (GOF) suitability aims to evaluate the fit between the sample covariance and the population. The formulated model obtained good and fit results, according to the results of table -1.

Tabel-1. Hasil *goodness of fit index*

No	Index	*Cut of Value*	Result	Note
1	Kai Kuadrat (p)	Kecil (p > 0.05)	146.360 (0.0862)	Fulfilled
2	CFI	≥ 0.90 (max 1)	0.9262	Fulfilled
3	GFI	≥ 0.90 (max 1)	0.9188	Fulfilled
4	AGFI	≥ 0.90 (max 1)	0.9489	Fulfilled
5	RMSEA	≤ 0.08 (Min 0)	0.0722	Fulfilled

Source : Data result (2023)

Furthermore, the validity and reliability tests were declared valid as a measuring tool and item consistency, according to Table-2.

Table-2. *Construct Reliability*

Variables	Cronbach's Alpha
Learning program	0,882
Business mental competence	0,864

Source: Data result (2023)

In Table-2, it is found that the question items used to measure the learning program variables and business mental competence are reliable. It has a Cronbach's Alpha coefficient> 0.7 (Soegiyono, 2016). Furthermore, testing CFA (Confirmatory Factor Analysis), based on the analysis obtained the results that CFA the correlation between indicators (manifest variables) with latent variables (construct variables) can be presented as Table-3.

Table-3. *Loading CFA*

VARIABLES		LOADING	P-VALUE
W	<- Learning Program	0,792	0,000
M	<- Learning Program	0,939	0,000
PD	<- Learning Program	0,861	0,000
EP	<- Learning Program	0,922	0,000
POO	<- Learning Program	0,892	0,000
MP	<- Competency	0,742	0,000
UT	<- Competency	0,760	0,000
PM	<- Competency	0,694	0,000
P	<- Competency	0,813	0,000
K	<- Competency	0,871	0,000
HPP	<- Competency	0,680	0,000
MU	<- Competency	0,802	0,000
MC	<- Competency	0,723	0,000
MS	<- Competency	0,712	0,000
PM	<- Competency	0,606	0,000
PSDM	<- Competency	0,722	0,000

MPP	<- Competency	0,692	0,000
MK	<- Competency	0,792	0,000

Source: Data result (2023).

In table-3, it is found that the loading of each indicator on its variable is> 0.5 and is declared significant because the p value is <0.05 (5%). It means that all indicators (manifest) are significant in contributing to latent variables. Furthermore, data analysis through path analysis, as for the results of the coefficient of direct influence of exogenous variables on endogenous can be seen in table-4.

Table-4.Direct Effects

VARIABLES	PATH	P Values
Learning program-> Mental competency	0.968	0,000

Source: Data result (2023)

In table-4, it is found that the learning program, which includes five stages, has a significant direct effect on the activity program and has an influence on the formation of entrepreneurial mental competencies. It is with a coefficient of 0.968 and p < 0.05. Thus, the path analysis can be formulated that the stages in learning activities including 5 stages are very influential on the formation of college students' business mental competencies, according to Figure-4.
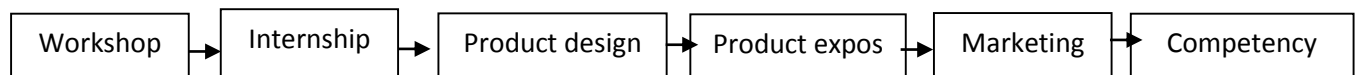
Workshop	→	Internship	→	Product design	→	Product expos	→	Marketing	→	Competency

Figure-4. Path analysis of entrepreneurial learning model

B. Discussion

Through the workshop program, college students obtain a lot of knowledge, skills and experience from the presenters, and college students open their minds about entrepreneurship. Likewise, with MSME internship activities, college students obtain knowledge and experience in a number of business activities at the internship site. College students are then able to make a business plan, able to make business opportunities and threats, college students are able to make a business canvas.

The mentality in entrepreneurship, which is developed is very realistic for college students who will graduate, as a provision for doing business. Internship activities are continued with product design and prototypes that will be developed and marketed, through online or offline-based marketing activities.

The learning model developed is very good and it is proven that college students have a business and have developed business competencies.

Student entrepreneurial competencies can also be recognized in order to provide new experiences for college students in pursuing entrepreneurship. College students have direct knowledge, experience, and skills in doing business. Indeed, students' entrepreneurial mentality and competence will be further improved and developed.

Through five stages, college students have high motivation because they obtain knowledge, experience in workshops, explore theory, hard skills and soft skills, financial

systems, production systems, marketing systems, business systems, supply chain systems, business model canvas, SWOT analysis, Business Plan, online and ofrline marketing by creating digital marketing accounts, company growth systems, project-based entrepreneurship, internships, based on hard skills and soft skills (Yulia, 2015), this is to strengthen affective and cognitive and psychomotor abilities, for students, so that entrepreneurial mentality can be built properly. Increasing entrepreneurial ability can be achieved through increasing knowledge, skills, behavior, internships in the work system for prospective graduates, very relevant in increasing business independence and work ethic (Murjito, 2010), (Adcharina, 2021).

The entrepreneurship program developed, through an entrepreneurial learning model that is implemented in an integrated manner, is able to assist students in entrepreneurship development, especially to improve managerial competence, finance, technology adaptation, creativity actualization, finance, human resources, and adaptability in developing the ability to create products that can be useful for society. Through entrepreneurship programs on each campus, it is optimistic that future generations will be born who are competent, creative, innovative, resilient, empowered as agents of change in realizing the vision of the Golden Indonesia 2045. The learning model formulated and applied is very sharpening the entrepreneurial spirit, soft skills, hard skills, managerial, and has proven to be able to encourage increased experience, knowledge, and entrepreneurial skills of college students.

The outputs and success indicators of the entrepreneurial model program developed are designed: (1). Generating university graduates obtain appropriate jobs, according to their potential and a good business career path, (2) mental provision of college student business competencies. It is in line with the main performance indicators for universities; (3). Providing student experience learning off campus, as measured by indicators of the number of college student participants and the value of program learning outcomes (CPP); (4). The learning model is proven to be able to improve student competence and knowledge about entrepreneurship including the formation of an entrepreneurial mindset, organizing, managing and marketing a business, (5) The learning program, which includes five stages, has a significant influence directly on the activity program and has an influence on the formation of entrepreneurial mental competencies.

4. CONCLUSION

Based on the results of the research and discussion that has been generated, it is concluded: (1) the formulation of an entrepreneurial learning model to improve entrepreneurial mental competence is considered a goodness of fit model, (2) the formulated model can be applied in improving new entrepreneurs in the formal and non-formal fields, (3) entrepreneurial learning activities will be maximally beneficial if they are able to develop psychomotor aspects, cognitive aspects and affective aspects. (4) The entrepreneurial learning model will be more optimal if it prioritizes improving skills, knowledge and by doing direct action to do business.

5. ACKNOWLEDGEMENT

REFERENCES

Adcharina, P.,. Asri. L. R.I.,Mohamad. H.,Sarah. R.H.P., 2021. The Development of Market Oriented Batik Products Based on Customer Buying Intention (Industrial Center of Batik Sragen Indonesia). *International Journal of Management (IJM),* 11 (3), pp. 373–389, 2020.

Diwanti, D. P.,Suyanto, Sri I, Tri, S.A.,Hari, B,N., 2020. Peningkatan Kompetensi Wirausaha Muda Melalui Program Kegiatan Kewirausahaan Pada Badan Usaha Amal Nasyiatul Aisyiyah Kabupaten Kendal. *Jurnal Pengabdian Kepada Masyarakat*. Vol 03. No 02. Pp: 173-185.

Handayani.,T. 2016. Evaluasi tentang pengetahuan kewirausahaan dalam meningkatkan intensi berwirausaha (studi pada mahasiswa politeknik negeri bengkalis). *Jurnal Inovasi dan Bisnis,* Vol. 4, No. 2, pp: 91-98.

Isa, Muzakar. 2011. Analisis kompetensi kewirausahaan, orientasi kewirausahaan, dan kinerja industri mebel. *Jurnal Benefit Ekonomi Dan Bisnis*. Vol 15, No 1, Juni 2011, Vol. 15 No 1 Juni 2011, pp:172-186

Makarim, Nabiel. 2019. *Merdeka Belajar Kampus Merdeka*, Kementrian Pendidikan dan Kebudayaan Republik Indonesia. Jakarta

Murjito.W,.Mohktar. Ali. W. 2010. Magang Kewirausahaan Pada Industri Jasa Perawatan dan Penjualan Suku Cadang Kendaraan Bermotor di Yamaha Dau Motor. *Jurnal Dedikasi*. Vol 07. No 1. 2010, pp 97-110.

Nugroho.M.T.,Suranto.,Muhtadi.,Fahmi.J.S.,Kussudyarsana.,Soepatini.,Aan.S.,Nur.H., 2022. Proposal Wirausaha Merdeka Peningkatan Kompetensi Wiruasaha Mahasiswa.,Juni. Universitas Muhammadiyah Surakarta.

Nugroho.M.T.,Suranto.,Muhtadi.,Fahmi.J.S.,Kussudyarsana.,Soepatini.,Aan.S.,Nur.H., 2022. Laporan Kegiatan Wirausaha Merdeka Peningkatan Kompetensi Wiruasaha Mahasiswa., Desember. Universitas Muhammadiyah Surakarta.

Romanto, E.,Nur, H.2020. Pengaruh Pengetahuan Dasar Dan Kompetensi Kewirausahaan Terhadap Motivasi Kewirausahaan Mahasiswa Universitas Tarumanagara. *Jurnal Manajerial dan Kewirausahaan*, Volume II, No. 2/2020, Pp: 479-489

Soegiyono. 2016. *Research and Development*. Alfabeta. Bandung.

Suranto.2018. Menumbuhkan Semangat Wirausaha Mahasiswa Berbasis Potensi. Seminar Nasional *IENACO*- 2018. ISSN 2337-4349. Pp: 607-615.

Suranto, Muhtadi. Kuswaji. D,P.,Totok.B.S. 2016. Pengembangan Inkubator Kewirausahaan Di Universitas Muhammadiyah Surakarta. *Jurnal Warta*, 2016. March. Vol 19. No 1. UMS Surakarta.

Suranto. 2021. Pengembangan Model Pembelajaran Kewirausahaan Melahirkan *New Entrepreneur.. Seminar Nasional Hubisintek*- 2021

Yulia. Effrisanti. 2015. Pembelajaran Berbasis Proyek Melalui Program Magang Sebagai Upaya Peningkatan Soft Skill Mahasiswa. *Jurnal Eksis*. Vol X, No 1, April, pp-28-41