

Strengthening Student's Soft Skills in the Era of Industrial Revolution 4.0

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Abstract—The increasingly massive variety of digital polarization from various loci in the field of life both education, economy, politics, social and others is allegedly an indication of the birth of a 4th generation era (Era of Industrial Revolution 4.0). The implications of this era have an impact on students' attitudes and behaviors which are feared for loss of self-confidence as citizens because of the lack of various knowledge, attitudes, and skills that they have. Thus an effort is needed in strengthening citizens' soft skills (skills in communication, critical thinking, problem-solving skills, teamwork, information management, entrepreneurship, leadership, and professionalism) in this Era of Industrial Revolution 4.0. The methodology used in writing this article is a study of various literature both journals and books and other literature, with steps to study, compare and make conclusions. The conclusion of this article is that to be able to live surfing in the Era of Industrial Revolution 4.0 this requires systematic and organized/programmed efforts, one of which is through the field of learning-oriented education by utilizing current technological sophistication.

Keywords: *civic education, digital citizenship, soft skills, industrial revolution 4.0, learning*

I. INTRODUCTION

The phenomenon of disruptive innovation has been much discussed in the economic sector, banking, tourism, and so forth. However, it is still limited addressed in the education sector. Meanwhile, outside have a lot of educational institutions that continue to move swiftly. Not just private universities, but universities online. And most must be observed is the phenomenon of disruption and innovation are also reaching the potential impact on our children, learners conventional schools.

The development of information and communication technology has brought great changes in many areas of life, not least in education. Simple observation illustrates the dynamics of the behavior and trends of specialization in this millennial generation while interacting with the internet concerning education. They prefer the visual-based information (via YouTube, online games) rather than through the narratives and

texts (reading a printed book or hear a lecturing teacher). They're good at surfing and exploring in the virtual world, receiving and curate information rather than passively trapped in conventional libraries. They are more convenient to learn collaboratively in real practice or peer to peer via social networks (using social learning platform).

Technological developments and the real information could not be avoided as such we must respond and adjust how education provides a good space to be able to take advantage of advances in technology and information to the attitude, personality, and behavior of students on morality, character, and diversity of students, this is one of them bear responsible for Civics Education in particular.

Thus, the importance of an effort to strengthen against the soft skills of citizens as this skill is an ability that can affect how we interact with others without eliminating value character as a citizen. For effective communication load Soft skills, creative and critical thinking, team building, as well as other capabilities related to the capacity of the individual's personality. The purpose of soft skills training is to provide the opportunity for individuals to learn new behaviors and improve interpersonal relationships with others.

Therefore it is in the era of the industrial revolution 4.0 This entails a serious and programmed them is how to strengthen the soft skills through learning is seen to respond to the problems above

II. THEORETICAL REVIEW

A. Civic Education

Citizenship Education (civic education) is the subject of learning with the mission to establish a national identity, which is a conscious effort in "nation and character building." In this context, the role of Citizenship Education for the continuation of the life of the nation is very strategic. Thus, the purpose of civic education is the realization of the full participation of reason and responsibility in the political life of the

citizens who obey the values and principles of constitutional democracy in Indonesia[1]. To be able to participate effectively and fully with responsibility in public affairs need a set of knowledge and intellectual skills and the skills to participate. These skills, in turn further enhanced through the character development that can improve the ability of individual citizens to participate in the political process, which could further support the healthy functioning of the political system. Thus Citizenship Education focuses on the development of three basic components: (1) knowledge, (2) the skill, and (3) the character or character citizenship.

The vision of the "Asian Education Leaders" says: "In the era of globalization, Civic Education should be directed to the development of quality citizens that include" spiritual development, a sense of individual responsibility, and reflective and autonomous personality" [2]. Therefore, curriculum and learning should develop a vision of "globalization, localization, and individualization for multiple intelligence" [3]. This vision is focused on the development of "Learning Intelligence" in the dimensions of the "social, cultural, political, economic, and technological intelligence", as it is known in full in the "Pentagon Theory of contextualized Multiple Intelligence"[3].

With the above, Civics Indonesia especially in the face of global trends should be placed as one part of a national study mission to the intellectual life of the Indonesian people through the corridor "value-based education" [2]. Configuration or systemic framework Citizenship Education is built on the paradigm as follows: First, Civics in curricular designed as a subject of study that aims to develop the potential of individuals to become Indonesian citizens were noble, smart, participatory, and accountable responsibility. Second, Civics theoretically designed as a subject of study which includes the dimensions of cognitive, affective, and psychomotor are confluent or interpenetrating and integrated with the context of the substance of ideas, values, concepts, and moral Pancasila, democratic citizenship, and civil defense. Third, Above requires both curricular Citizenship Education, theoretical and programmatic needs to be designed in a learning process that is born a good citizen and smart (and smart good citizenship). In the process of learning, civic education should be "the subject of strong learning" (powerful learning area)[4].

On the other hand, the majority of civic education in Indonesia is still showing the characteristics of the conventional learning system, every aspect of the learning process was considered to have many weaknesses in the aggregate even be counterproductive towards self- development and intellectual abilities of students[2].

B. Soft Skills Digital Citizenship in the Age of the Industrial Revolution 4.0

Soft skills are personality attributes fabric of both intra-and inter-personality personalities. Intra-personality

is a skill that one has set itself, such as time management, stress management, change management, character transformations, creative thinking, have a positive reference purpose, and techniques to learn fast. While inter- personalities are skills related to or interact with the environment community groups and the work environment as well as the interaction with the individual human being to develop the performance of its full potential, the ability to motivate, leadership skills, negotiation skills, presentation skills, communication skills, ability to establish relationships, and ability speak in public.

Soft skills are skills and life skills, either for themselves, in groups, or society, as well as the creator. The rest with soft skills have made the existence of a person will be increasingly felt in the community. Will communicate the skills, emotional skills, language skills, group skills, ethics and morals, manners, and spiritual skills [5].

Soft skills are the kinds of skills are more related to the sensitivity of one's feelings on the surrounding environment. Because soft skills associated with psychological skills, the impact of a more abstract but still can be felt like eg courteous behavior, discipline, perseverance, the ability to be able to work together, to help other people, and so on. The concept of soft skills is a sociological term that represents the development of emotional intelligence (emotional intelligence) a person who is a collection of personality traits, social sensitivity, communication, language, personal habits, friendliness, and optimism that characterize relationships with others. Soft skills complement hard skills.

Soft skills have many benefits, such as career development and professional ethics. From the organizational side, soft skills have an impact on total quality management, institutional effectiveness, and synergy of innovation. The essence of soft skills is an opportunity. Graduates need soft skills to open up and take advantage of the opportunity.

Briefly soft skills can be concluded that the ability of a person, who is not cognitive, but rather affective that allows a person to understand the psychological condition yourself, set speech, thoughts and attitudes and actions following the norms of society, to communicate and interact with the environment so that these individuals can adapt. Although the soft skills needed someone different from one profession to another, basically soft skills are not bound by culture, because it is universal soft skills.

Soft skills have several interrelated components between one and the other. The components such as the series of organs that make up the organ system in the body which have a function/ particular task, interrelated and mutually supportive of one another. This is similar to that presented [6], states that soft skills are all aspects of generic skills that also include elements of cognitive-related non-academic skills. It adds that, based on research results, the seven soft skills were identified and

important development in the learners in higher education institutions, covering; Communication skills (communicative skills), thinking and problem-solving skills (thinking skills and problem-solving skills), the power of teamwork (team workforce), learn throughout life and management of information (life-long learning and Information Management), business skills (entrepreneurial skills), ethics, morale, and professionalism (ethics, morale, and professionalism), and leadership skills (leadership skills). Sharma tabulates soft skills elements that must be owned and possessed good as shown in Table 1 Each soft-skills in it contains sub-skills that can be categorized as individual skills that are needed (must have) and the category as a good skill for owned (good to have).

Besides, [7], describes several types of soft skills related to success in the world of work based on the results of the study are as follows:

1. Emotional Intelligence, through intensive research[8] found that a person's success is not only supported by how smart a person to apply knowledge and demonstrate skills, but how much a person can manage themselves and interactions with others. The skill called emotional intelligence. Emotional intelligence terminology first introduced by Salovey and Mayer to express the qualities of a person, such as the ability to understand other people's feelings, empathy, and emotion regulation to improve the quality of life[9]. Emotional intelligence also includes several skills related to the accuracy of the assessment of the emotional self and others; and the ability to manage feelings to motivate, plan and achieve life goals.
2. Healthy Lifestyle, millions of dollars wasted by the institution and the public because of lack of productivity, health care, work accidents, and employees who missed work. The main supporter of the indicators is the individual's lifestyle is not healthy. The University of Central Florida incorporates these healthy lifestyle themes as a target for the development of soft skills for their students. Topics raised in its development contain nutrition, stress management, time management, cultural diversity, and drug abuse. The results showed that a healthy lifestyle affects the high resilience, flexibility and a healthy self-concept that affects the high participation in the community.
3. Effective Communication, many student failures in schools, communities, and workplaces due to lack of skills in communication. In addition to communication skills contribute directly, the indirect role was also found. Communication skills indirectly affect the level of self- confidence and social support and continued influence on success.

II. RESEARCH METHODS

Writing this article using the methodology by reviewing the literature both journal articles and research literature relevant books in studying the problems related

to the discussion in this article is by doing an in-depth assessment to obtain writing conclusions that are supported on a variety of relevant sources.

IV. RESULTS AND DISCUSSION

A. Strengthening Soft Skills Through Citizenship Education Learning

Soft skills are a set of capabilities that affect how we interact with others. Effective communication load of soft skills, creative and critical thinking, team building, as well as other capabilities related to the capacity of the individual's personality. The purpose of soft skills training is to provide the opportunity for individuals to learn new behaviors and improve interpersonal relationships with others. To strengthen soft skills of citizens of one of them came through the efforts of learning Citizenship Education, in this study contain cargo load that leads to the process of strengthening the soft skills of citizens in the face of the onslaught of the industrial revolution 4.0, so that learning Citizenship Education unlike a lot of research that says that the Citizenship Education learning to saturate feels formalist.

Moving on from the problems by the said[10] that is less meaningless Citizenship Education for students due to the dominance of conventional learning method possible application of such a ground covering technique, indoctrination, and narrative technique in civic education daily. It can lead teachers can not improvise creatively for other activities apart from learning the routine face to face scheduled with tight that classroom management has not been able to create an atmosphere conducive and productive to provide experience to students through their inclusion in a proactive and interactive both in the classroom and in outside the classroom.

To solve the problem of lack of meaningfulness, civic education should not only contain a mere rote but do a blend of face-to-face learning with the students combined with a learning use technology that is a mixture of so-called learning or blended learning. *Blended learning* according to [11] "Blended learning combines the best aspects of online learning, structured face-to-face activities, and real-world practice". Meaning that blended learning is a combination of the best aspects of online learning, face-to-face learning, and real-world experience. Blended learning is integrated or blends learning programs in different formats to archive a common goal that can be interpreted blended learning programs integrate or combine learning in different formats in achieving the learning objectives[12].

Blended learning as "it represents an opportunity to integrate the innovative and technological advances offered by online learning with the interaction and participation offered in the best of traditional learning"[13]. A chance to integrate the innovative and technological advances offered by online learning with interaction and participation offered to the best of traditional learning. So we can conclude that blended learning is learning that integrate or merge between

online learning (e-learning) with traditional learning (face to face) in harmony to achieve the learning objectives. Concerning the development of blended learning, reveals that there are three possible models in the development of an internet-based learning system, the model of the web course, web-centric course, and web-enhanced course[14].

Course web is a model that uses the Internet for educational purposes, where learners and educators entirely separate and no need for face to face. The entire teaching material, discussion, consultation, assignments, exercises, tests, and other learning activities entirely delivered over the internet. In other words, this model uses the system remotely. In essence, all the learning activities performed online without any face at all.

Course web-centric model of Internet use that combines distance learning and face-to-face (conventional). Most of the material is delivered via the Internet, and partly through face to face, while the complementary functions. In this model, educators can provide clues to the students to learn the subject matter through the web that has been made. Learners are also given referrals to find another source of the relevant websites. In face-to-face, learners and educators more discussion of the findings of material that have been learned through the internet. This model is more relevant for use in the development of education educators, judging from the condition, culture, and infrastructure owned by the current. Teacher materials are substantially identical to the value that can not only be transferred through learning without face-to-face but required direct learning so that the elements of educator modeling can be adapted very well. For mastery of the conceptual, theoretical and blended learning skills can be used with the system remotely.

B. Used of ICT in Learning

The model web-enhanced course is the use of the Internet to support the quality of learning done in class. Internet function is to provide enrichment and communication among learners with educators, fellow learners, group members, or students with other resource persons. Therefore the role of educators in this regard are expected to master the technique of searching for information on the internet, guiding learners seek and find sites that are relevant to learning materials, presenting the material through the web attractive and desirable, airport guidance and communication via the internet, and prowess other necessary.

In addition to the above development model, the use of ICT in education, educators can refer to the models of [15], which gives an explanation about five levels of use of ICT in learning, namely: *Level-1 Information*: At this level learning materials are not too many presented by ICT, but is limited to materials that nature of the information to support the learning process even tend to be administrative and learning rules. For example, the syllabus of lectures, lecture schedules and provided also a place to store information for educators.

Level-2 Supplemental: At this level has begun to incorporate the learning material, but its nature is still limited, not decipher the complete learning content, the material presented just the basics. For example, learning materials for educators at present through a PowerPoint presentation, acrobat reader, and Html files that have been placed on the web to be provided and revised by educators.

Level-3 Essential, In this level almost all the learning material available on the web. Activities learned educators and learners will not run properly if it does not use the web facility. Thus, it is no reliance use of ICT in learning where among educators as learners with learning using ICT infrastructure manager better.

Level-4 Communal: At this level combines pattern- face classroom or online web usage. So is the case with the presentation of learning material is presented via a direct way in the classroom and presented online. In this pattern the expected independence of educators to seek and develop learning materials in independent learning materials and material under their control of education.

Level-5 Immersive: At this level take place in virtual learning. The entire contents of the learning material are presented online. This level view of learning from recruitment, learning, evaluation systems, and graduation was held virtually.

Blended learning has two main categories, namely; (1) Increased activity form face-to-face, namely the use of information and communication technologies in the activity of face-to-face, either in the form utilizing the internet (web- dependent) or as a supplement (web-supplemented) that does not alter the activities, (2) learning that reduces the activity of face-to-face but not eliminate it, allowing students to learn online. So blended learning developed in this study utilization information and communication technology Web-based learning to support the quality-face done in class.

III. CONCLUSION

Based on the theoretical description above it can be concluded that to strengthen against the citizens of one of the soft skills is through learning among them Citizenship Education by doing the appropriate model in the process of strengthening the elements of soft skills. The right model for efforts such as technology-based learning model information in this article is meant is developed Learning Blended learning, because learning this model is closely related to the sophistication of information technology every day followed by nationals.

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