

Children's Education in Families Facing the Challenges of the 21st Century and the Era of Industrial Revolution 4.0 During Pandemic

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ABSTRACT

Children are a very valuable asset of the nation, in their hands whether or not this country will be developed in the future. As the nation's next generation, they need optimal guidance and development that must start at an early age. Parents have important roles in children's education. The family in this case the parents are the first and foremost educators. Even if the child has been admitted to an educational institution, the longest frequency of the child is in the family environment. Therefore, parents have roles in child's education. This article is a literature study to describe the concept of children's education in the family and the challenges of the 21st century and the Industry revolution era. In this study, the researcher analyzes the relevant articles, and document. This paper focuses on the education of children in the family, especially for early childhood.

Keywords: *Children's Education in the Family, 21st Century Challenges; Revolution era 4.0*

1. INTRODUCTION

Children are the next generation of the nation who are growing and developing continuously. Early ages is a sensitive period when a child receive s various stimuli for all aspects of their development in order to grow optimally. During the Covid pandemic child stimulation should be cared and that is parents' roles to develop child as the offspring. Parents care children and

Early childhood is a period in human life to construct an individual who can be part of social communities, the child construction is a fundamentally contribute to child development for future life.

Stated that in early childhood is a determine period to grow up and develop. For growing up and developing, a child needs environmental supports. Young children in ages 0 to 10 are in a very valuable ages range compared to later ages due to the rapid development of their notable intelligence during early childhood period.

Young children develop rapidly in early ages, at the critical ages or the ages below 10 their intelligent develop prominently.

Furthermore, the process of a child takes place as it grows, develops, matures and purifies, in its

physical and spiritual aspects that it endures all life, gradually and continuously. A child in the ages of 0 to 6 years who are in the process of development, as in the early ages all aspects of children must develop optimally. However, this cannot be separated from the provision of stimulation according to the stage of development [1]

Educating children begins at an early age, because at this time the stimulation of all aspects of development has an important role for further developmental tasks. Facing the challenges of today's world, almost all of which cannot be separated from the role of technology, there are different things in educating children, the challenges of raising and educating children today are more difficult. But with different challenges, it cannot be done in the same way as in the past. Seeing such challenges, parents have a big role in raising children. Parents must continue to adapt to the times.

Parents are the primary educators in the family. Family education is very important as a foundation for children's growth and development. Indonesia Ministry of education stated that there are three roles of parents; parents as trainers, coaches and as therapist.

As we currently face the industrial revolution which is known as the 4.0 where in this is the era of

innovation, impacting the industrial sectors and all aspects of human life in the world without exception in the world of education [2]. Experiencing the great setbacks of this era of the 4.0 Industrial Revolution, education must also change because we only have two options, to know, to change or to die.

During covid outbreak, there is a massive used of digital technology. The process of digital learning, known as the cybernetic system and is capable of making the process of learning take place in a continuous manner without limits of space and time.

Technological develop has a great impacts on education. The research about the impacts of technological developments, it shows that more than 25% of children worldwide have a gadget before they turn 8 years old. One in three children start using a smartphone when they are 3 years old and one in ten children enjoy gadgets at a younger age of 2 years . However, gadgets are sophisticated devices that have various features and applications that can provide information, education, socio-culture, sports, economics and politics to help make human life more practical.

From the above statement that the industrial revolution era will have an impact on children's lives, the impact can be positive or negative. So to deal with this, parents have vital roles. Parents are responsible to educate, nurture, their children. Parents as the adults who close o children help children to gain their zone of proximal development [3] Therefore, parents should give aids to strengthen child's education in the family.

2. THEORITICAL REVIEW

2.1 Early Childhood Education Programs

Education always needs attention and improvement in maintaining the continuity of life processes in various aspects in society. Therefore, the quality of education needs to be the concern of various parties to jointly advance it. ECE (Early Childhood Education) has a strategic role in educational process because it is the foundation and vehicle for preparing children to enter basic education.

The regulation of Republic Indonesia Ministry of Education no 20 2003 (MoNE, 2003) describe that the Education in Early Childhood aims to guide and assist children from the early year to the age of six

through the provision of educational facilities to their development physically and spiritually , therefore children are ready to study in higher education.

Early childhood education is the stage of education that provide assistance to the growth and development of physical and spiritual so that children are ready to enter higher education; Regarding the uniqueness of children's growth and development, the maintenance of early childhood education adapts to the level of development that early childhood experience it. The implementation of education in early years is adjusted to the process of development in the stages of [4].

During Childhood education , which is a phase of education, fundamentally laying the foundations of growth and physical development, cognitive, creativity, emotional intelligence, spiritual intelligence), socio -emotional, language and communication, in the stages of development that children go through at an early ages.

According to [5] Early childhood education includes basically all the efforts and actions that educators and fathers undertake in the process of nourishing, caring and educating children in the environment where children can explore experiences,, the opportunities to meet and understand experiences and learn from the environment.

It can be concluded that during in the education in early years will help children to grow and develop optimally and achieving their proximal development. Early childhood education as an educational unit to prepare the nation's next generation of quality. Early childhood education is the initial foundation for further child development, where the role of parents in the family will be very decisive.

2.2 Family Roles

The family is the smallest community and becomes a pillar for the establishment of a macro society, namely the people. A family can be formed because of the bond between a man and a woman through a legal marriage both according to state law and Islamic law. According [6] the functions of the family include: 1). Reproductive Function or Continuing Offspring; 2). Affection or Affection Function; 3). Economic Function; 4). Educational or Educational Function; 5). Socialization Function; 6). f. Religious function or religion; 7). Religious or Religious Protective or Protective Functions; 8). h. Social Control Function.

[7] The family is an institution whose function is to maintain human survival, through the function of reproduction. In a civilized society, the family is the only vehicle for this purpose. The continuity of this function is closely related to sexual activity between men (husbands) and women (wives). It is only through the family that human sexual activity, which is the key to carrying out the function of continuing offspring, can be fulfilled appropriately, fairly and regularly from a moral, cultural, social, and health perspective and is of course legal based on customary law, religious law, and state law.

[8] Every human being needs love, because this need involves a person's feelings or emotions. The family is one of the institutions that can meet the needs of its members for love. The ideal family is a family filled with loving relationships among its members. Love and affection play an important role in the personal development of each family member, especially children.

Every family must be able to support economic needs of its members, therefore the members will be able to survive life. For that every family member must work together to produce something. For example: the father as the head of the family is obliged to work to earn a living to fulfill the living necessities of the family members. While the mother is in charge of managing family finances. The economic function of the family is very important for family life, because it is the main support for the needs and survival of the family. The economic function of the family includes earning a living, its planning and use.[9]

[10], As an educational center, the family has a very fundamental task in preparing children for their role in the future. In the family environment, the basics of behavior, attitudes and other habits have been instilled. The function of socialization has a very close relationship with the function of education, because the function of education contains socialization efforts, the first in the family environment. His parents prepared him to be a good member of society. In the family environment, children are trained to live in society, fostered and introduced to the values and norms that apply in their community, so that in their time children are really ready to jump in the midst of society.

The family has a religious function. This means that the family is obliged to introduce and invite children and other family members to religious life. To do this, parents as core figures in the family and

other members must first create a religious climate or atmosphere in the family. [10]

The family has a function as a shelter for family members. In this case it is intended that the family must provide a sense of security, calm and peace for its family members. The socialization that children receive in the family environment also provides a sense of security to be able to get along in the social environment of the community. So the protection function of the family against children includes physical and spiritual protection. [7]

The family can act as an agent of social control (social control) for its members, the family can make preventive efforts (prevention) against its members so as not to deviate from the values and norms prevailing in society. Families can also make curative efforts, for example by reminding, awakening or punishing family members who have committed deviant behavior or violated family and community values and norms. [8]

From the explanation that parents have the main function in the lives of children by providing guidance, direction, instructions as well as possible, this is because the good or bad life of children in the future will be largely determined from the success or failure of parents in carrying out their functions. The family has an important role to construct the child's personality, because the family is the first environment that directly interacts with the child and build their identity.

2.3 21 st Century Challenge

The development of science and technology are recognized as advancing rapidly in the 21st century, as well as the access information from various countries, can be easily accessed at low cost, at anytime and anywhere. However, in this century, The current young generation, has different challenges from the previous generation. The young generation today is the younger generation who are flooded with "convenience" from various sides. This convenience has two sides, it can have a negative impact as well as a positive impact. Currently, the era is competitive, and it require a particular preparation to produce a qualify human [11] Thus the 21st century demands global skills in terms of ways of thinking, working, mastering technology, and as citizens of the world. Education is needed that emphasizes the potential of students in a civilizing setting, parents/educators have full awareness in local and national contexts, and

have cultural awareness. So that educating children must be in accordance with the times.

2.4 The Industrial Revolution 4.0

The development of science and technology that is increasingly advanced makes the demands of the revolution continue to increase. The global community certainly needs to prepare provisions to face these changes. Of course, there are only two choices that can be taken, including the desire to change and meet the demands of the times or stay silent and wait to be changed.

The Industrial Revolution 4.0 has made digital technology is the central of human activities, including education. The Industrial Revolution 4.0 era is also a transition between Generation Z and Generation Alpha. Generation Z is a term for children born around the 1990s to 2015s [12]

In general, the definition of The Industrial Revolution is the technological development transform the socio economic and and culture of the society. The term Industrial Revolution 4.0 was first recognized in Germany in 2011. Industry 4.0 was marked by a strong integration between the digital world and industrial production. The industrial revolution 4.0 is a digital era when all machines are connected via the internet system or cyber system. The situation brings the impact of major changes in society [13]

From the explanation above, the industrial revolution provides technological advances that change all human activities to be faster and more practical. With the use of this technology, it is possible for the learning process to take place without being limited by space and time, with the meaning that the learning process is not only in the classroom and during study hours.

3. RESEARCH METHODS

This research uses literature review, literature review in a scientific research is one important part of the overall steps of the research method. Library research, namely research activities carried out by collecting data or based on scientific writings that aim at the object of research or data collection is library, or a study is then carried out to solve a problem and in depth to relevant library materials. Before reviewing library materials, researchers must first know for sure about the source of scientific information from which it will be obtained. The

sources used include; text books, scientific journals, research results in the form of theses, theses, dissertations, and the internet, as well as other relevant sources.

4. DISCUSSION

The first education in children grows from the family environment, so that the first time children get guidance and education is not from the school environment but from the family environment. The family has the main task for children's education, namely as a basic reference regarding religious education, cultural values, and moral values as capital in socializing in the community

Early Childhood Education) greatly determines a person's success in the future, how a person responds to various problems faced in every step of life is largely determined by the experience and education obtained at an early age. Children who receive appropriate and effective guidance from an early age will be able to improve their health and physical and mental well-being, which will have an impact on increasing learning achievement, work ethic, and productivity so that they are able to be independent and optimize their potential.

In its implementation, of Education in early childhood requires support from various parties, both from the government, the community, and parents. The basic potential of children has been formed from home, before children start school so that their abilities, values of life are very dependent on the education conditioned by their parents.

Regulation of the Ministry of Education and Culture of the Republic of Indonesia Number 30 of 2017 states that the family is the smallest unit in society consisting of husband and wife, or husband and wife and their children, or father and child, or mother and child, or blood family in a straight line up or down. down to the third degree.

The family is the first and main educator with a direct interest in maintaining and fostering the development of children from phase to phase, especially when children are in the early years of development and growth. Based on the literacy obtained, several ways parents educate children in the millennial generation revolution era include: 1) Giving Freedom to Learn; 2) Technology Introduction; 3) Understanding Children's Potential; 4) Instilling Personality Values; 5) Grow Children's Entrepreneurial Spirit.

4.1 Giving Freedom To Learn

Parents in the era of the millennial generation choose to free their children in determining their goals. The role of parents in educating the child is only to direct or guide the child if the child has difficulty achieving his goals. The choice of this way of educating is based on the development of advanced technology, parents feel that children are more proficient in finding various information on their own so that parents play a role in directing children so as not to fall into negative things. The way of educating parents that frees children to make their own choices tends to be expected by millennial generation children because they think that children should be given freedom in making choices. Parents support and motivate as long as the choices and goals are positive [14]

In line with the opinion of [15], there are several reasons why parents permit their children to play gadgets in kindergartens including smartphones, and to introduce information and communication technology and to enhance children knowledge, and for educational media, and for their pleasure and entertainment. The reasons put forward by parents are for the benefits of their children.

4.2 Technology Introduction

Today's children are born in the digital technology decade, computers or gadgets for instance Ipad and tablets have become everyday friends. As parents, in the technological era for children's education, should teach children literacy digital and they should know how to use the technology. Before introducing technology, parents must recognize the different needs of each child according to their ages. Parents can install special applications designed to sharpen their child's skills or talents. For example, a child who loves to draw. He said that in the future he wants to be a designer, parents can facilitate by installing applications that allow children to be creative with shapes and colors.

According to [16], parents/educators can use information technology-based media which is now very easy to obtain. Among them are calculators, Microsoft PowerPoint, and the internet. Parents/educators can also use mobile technology, such as mobile phones or tablets. Each has strengths and weaknesses, parents / educators can choose according to the needs of the child.

In line with [17] Technological developments have changed the learning paradigm which has changed the way children learn and interact with their environment. Currently, interaction with technology begins when humans are born into the world. So this causes the opportunity for early childhood to recognize literacy and numeracy through technology is getting bigger.

4.3 Understanding Child Potential

Confidence in children's abilities really needs to be nurtured by parents. So far, many parents think that smart children are those who are good at math or foreign languages. But this assumption can change, every child has their own type of intelligence. The importance of supporting their interests and optimizing their potential. So that the better the child masters a field, the higher the child's confidence because he feels he can and is valuable. Foreign language skills are not something that makes it difficult for children to be introduced through applications or games that use foreign languages. Utilizing technology can build children's skills, talents or hobbies that we can already see in a positive direction.

According to Sujiono as cited in [18] children are naturally creative, generally they explore this world with bright ideas and even use what they see in natural and original ways. So as parents need to give more attention and opportunities for children to explore and express themselves by letting children play with clay or sand, allowing children to scribble on walls and supporting and appreciating the activities carried out by children. Children will learn from the experiences they go through so parents need to help children in gaining their own experiences and freeing children to do activities that will help their development without many restrictions.

In line with the opinion of Aamodt and Wang as cited in [19] explained that parents who are worried about academic achievement are better off focusing on building self-control abilities and children's social skills. Both of these abilities can be modified by experience and contribute not only to a successful and happy life, but also to intellectual achievement. This means that academic achievement and children's social abilities must be balanced and interrelated.

4.4 Instilling Personality Values

As individuals who are still young and lack experience, children need to get guidance from their

parents. Give an understanding to children that the virtual world that seems without limits contains positive potential as well as dangerous threats. With the internet, global connections will make the world closer and smaller. Cultural interactions and exchanges are increasing, so children must be equipped with knowledge of their own cultural values as well as an attitude of respect for cultural differences from other countries. One of the efforts to instill values into children is through fairy tales. For example, a study by Pebryawan and Luwiyanto found that Javanese fairy tales contain many character education values which are divided into three main points, namely religious values, social values, and cultural values [12] These three values are closely related to improving a person's skills or ability to manage their emotions.

In line with the opinion of [20] in behaving, parents are the best example for children. Some good behavior needs to be exemplified, for example; respect parents who are older, reprimand if they pass or ask for permission when passing other people. The family needed to help children develop character is a strong and quality family that lives by the following principles: (1) mutual appreciation; (2) take advantage of time together; (3) build commitment; (4) have a good communication pattern; (5) oriented to religious values and; (6) able to overcome problems that arise in a positive way.

4.5 *Grow Children's Entrepreneurial Spirit*

In the face of industrial developments that increasingly demand quality and creative human beings. Entrepreneurship does require its own mental and skill. The process from finding ideas, developing them to producing and marketing them has its own challenges. The entrepreneurial spirit can be developed from an early age, by teaching independence, fostering curiosity, encouraging children to be critical and creative is the first step so that ordinary children have an entrepreneurial spirit. A simple example that parents can do is to read to them books that contain entrepreneurial values or invite children to play together with many people so that they learn how to negotiate their desires outside the family environment.

According to [21] when teachers introduce entrepreneurship education in kindergartens, it can

be design by making a plan, and teach in daily activities at home where children can learn how to sell product to their family members. Parents are directly involved in entrepreneurial activities (entrepreneurs). In making the "Family Day" program where father and mother are involved in school activities, including displaying performances, the work made by children and various foods that children have tried in the cooking program.

In line with the opinion of [22] Introducing entrepreneurship and inculcating an entrepreneurial spirit in early childhood can be done through the application of project methods and playing markets. Through these activities, it is hoped that children will be able to have an entrepreneurial spirit and become entrepreneurs in the future who can open new jobs and be able to compete with the economy of the Asean community.

Education in this family is the first and foremost education, because it is in this family that children get their first education. In addition, education in the family has a great influence on children's lives, especially for growth and psychological development as well as social and religious values in children.

5. CONCLUSION

Early childhood education programs are inseparable from the role, attention and responsibility of the family. Because most of the time early childhood is with the family, therefore early childhood education really needs the role of the family, where through the participation of parents it is believed to be able to provide understanding to children, because quality education is more effective starting from the family environment. In facing the challenges of the 21st century and the era of 4.0, everything uses modern technology, it is hoped that parents will prepare quality millennial generations by paying attention to several things, including: giving freedom to learn, introducing technology, understanding children's potential, instilling personality values, and growing child entrepreneurial spirit. So that this family education can have a positive impact on the development of children in the future.

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