

Analysis of Students' Difficulties in Learning Mathematics in Multiplication Materials in the Covid-19 Period

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Abstract

The purpose of this study was to analyze students' difficulties in learning mathematics and to find out what factors caused difficulties in the multiplication material during the Covid 19 period. This research uses a qualitative descriptive approach. The sample of this study was 22 students obtained purposively and snowball at SD Negeri Jatimekar II Bekasi City. The data was collected through observations, questionnaires, interviews, and documentation. The research result was that online learning has been less effective and less fun, students feel bored, students do not understand the material delivered by the teacher, lack of focus on learning because of the noisy environment, internet packages run out, bad internet network, students do not have an android, low enthusiasm and motivation to learn, and lack of family attention, lack of online learning infrastructure at home, and the teacher's teaching method is dominated by lectures, the use of learning media is still lacking, and the teacher is less creative and innovative and lacks parental attention. This study concluded that online learning has many levels of difficulty than face-to-face learning which is able to provide good explanations of subject matter and active student involvement in learning, so learning objectives are achieved optimally.

Keywords: Covid-19, learning mathematics, students' difficulties.

1 INTRODUCTION

Learning difficulty is a condition that is often experienced by students. This is indicated by the obstacles experienced by students either directly or indirectly in the learning process as a whole. The existence of learning difficulties as a problem is caused by obstacles that arise from within oneself and the environment (Sirait, Alghadari, & Huda, 2021). Therefore, the existence of learning difficulties requires efforts to solve it. Students who experience learning difficulties experience a sense of inferiority in developments at school and in society. When a student fails at school, he or she faces the danger of preparing for life's failures. So the failure of learning life in school is a source of failure in the next life.

Learning mathematics requires perseverance and tenacity, so that mathematics is considered the most difficult and boring subject by some students, some even think that mathematics is the most frightening subject. A situation like this will cause mathematics lessons to be disinterested by students, and many students will ignore and ignore it, so that students will experience learning difficulties (Hasibuan, 2018).

Factors that influence the learning difficulties of fifth grade students in Thematic Material Through Online Learning Activities, namely internal factors and external factors that exist in students. Such as student learning interest factors, student learning motivation factors, parental support factors, family economic factors, playmate factors, and intelligence factors. As well as the learning difficulty factor that most dominates in class V students in thematic material through online learning activities, namely the student learning interest factor with an average score of 13 to 24 (Asriyanti & Purwati, 2020).

Based on the description above, the problems experienced by students in learning mathematics multiplication material during the Covid 19 period showed that there were factors underlying the difficulties in learning mathematics multiplication material from internal factors and external factors, so that students were less than optimal in learning mathematics in understanding concepts and skills counting. Internal factors include: the lack of students having basic abilities, learning motivation, and body condition. While external factors include: the use of media or teaching aids and family and teacher factors.

To overcome the problems mentioned above, it is necessary to understand and deal with it immediately for students who have difficulty learning mathematics so that students have motivation to learn, are able to take part in learning mathematics, and enjoy mathematics. As a prospective elementary school teacher who is also a researcher interested in conducting research by raising the research title, namely "Analysis of Difficulties in Learning Mathematics in Multiplication Materials During the Covid 19 Pandemic". Descriptive Qualitative Research on Class II/A Students, Even Semester, Academic Year 2021/2022 SDN Jatimekar II Bekasi City.

2 RESEARCH METHODS

The researcher made observations to observe carefully the class II/A students of SDN Jatimekar II Bekasi City to obtain data about this study. The presence of the researcher in this study acts as a key instrument that directly involves himself in the life of the subject during the research time that has been set by the researcher to obtain data according to the characteristics of qualitative research. The researcher chose SDN Jatimekar II Kota Bekasi as the research location because it was based on the data the researcher got from class II/A teachers said that class II/A students had difficulty learning multiplication mathematics.

The purpose of this study was to determine the difficulty of learning multiplication material mathematics during the Covid 19 period in class II/A students at SDN Jatimekar II Bekasi City. The place of this research was conducted in Class II/A SDN Jatimekar II which is located at Jl. KP object. Pemahaman Jatimekar Village, Jatiasih District, Bekasi City, West Java Province. The time of the research was carried out for three months from the end of January 2022 to April 2022.

3 RESULTS AND DISCUSSION

In this section, a discussion of the results of the analysis of learning difficulties in mathematics learning multiplication material during the Covid 19 period in class II / A students is presented. Jatimekar II Elementary School, Bekasi City.

3.1 Difficulties in Learning Mathematics

The research listed above has proven that Waskitoningtyas (2016), from the results of the study it was concluded that the learning difficulties experienced in the multiplication and division arithmetic operation material in students belong to a high classification. This is due to misunderstanding of concepts, numeracy skills, and problem solving. In addition, the factors underlying the difficulty of learning multiplication and division arithmetic operations are internal factors and external factors (Bahtiar, 2017).

This is supported by research conducted by Faizal and Febrianto (2016). Where in this study stated that the learning difficulties experienced by students in thematic material through online learning activities came from internal factors, namely the lack of student learning motivation, student learning interest, and student intelligence. As well as external factors that also influence thematic learning activities such as parental support, family economic factors and playmate factors.

Difficulty is a process that is difficult for individuals to carry out marked by obstacles in achieving the expected goals, so that more active efforts are needed to overcome these obstacles.

Factors that influence student learning difficulties consist of internal factors and external factors. Where the internal factors are divided into 2 namely physiological and psychological aspects. The factors contained in the physiological aspect are motivation and interest. Meanwhile, factors in the psychological aspect are physiological, study habits, parents and parental support, material/economics, school environment (use of methods by teachers and use of tools/media), community environment. For external factors, namely mass media/television and association/playmates (Wahyudi, Muldayanti, & Qurbaniah, 2015).

Learning Mathematics is an effort to facilitate, encourage, and support students in learning Mathematics. Learning mathematics in elementary school has goals that must be achieved. The general objective of learning mathematics in elementary schools is to form students capable and skilled in using mathematics.

Multiplication is the addition of the same number "n" times, the notion of multiplication is understood as repeated addition. In the multiplication operation on whole numbers, the commutative and associative properties apply, that is, the numbers multiplied are exchanged for each other, the result is the same, multiplication is the product of two numbers a and b is a number c so that $a \times b = c$. The multiplication operation is indicated by a cross or a period or minus.

3.2 The Reality of Covid 19

Online learning is a new way of learning by utilizing electronic devices in the form of gadgets or laptops, especially internet access in delivering the learning process, so that online learning is completely dependent on internet network access (Rigianti, 2020). Online learning during a pandemic is carried out to reduce the risk of disease transmission during the learning process, essentially this learning model optimizes interaction between students and teaching staff without eliminating educational principles. Online learning is a learning model that is carried out without direct face-to-face contact between students and teaching staff, but learning and communication activities are carried out through a digital platform that is connected via the internet network. Online learning is considered to be the only medium for conveying material between teachers and students, during a pandemic emergency.

Each study certainly has advantages and disadvantages. Online learning also has advantages, the following are the advantages of online learning, including: a) Students have flexibility in study time, b) Students can study anytime and anywhere, c) Students can study under the supervision of parents at home, d) Students can study with educators anytime and anywhere with the help of social media and Google classroom, e) For educators online learning does not require time like learning at school, f) Educators do not expend more energy explaining material as face to face, g) Meanwhile for parents online learning is able make parents monitor their children more during the learning process (Dewi, 2020).

Online Learning is learning that is held through web networks. Each lesson provides material in the form of video recordings or slideshows, with weekly assignments, which must be done with a predetermined time limit and various scoring systems (Bilfaqih & Qomarudin, 2015).

According to Yuliani et al. (2020) said that the disadvantages of online learning include: a) Health of students and educators, due to the frequent use of cellphones/laptops during the learning process. The danger from electromagnetic wave radiation, which is caused can make human health. b) The educator's concern about students' understanding of the learning material being taught. c) Concerns for parents, who are busy working cannot monitor their children during the online learning process.

4 CONCLUSION

Online learning has many levels of difficulty for students at the elementary school level compared to face-to-face learning which is able to provide good explanations of subject matter and active student involvement in learning, so that learning objectives can be achieved optimally.

The first is a physiological factor where 80% of students answered that they are in good health (do not have bodily ailments, hearing health and vision health are very good). Second, psychological factors where 65% of students answered that they had good health conditions, had a passion for learning mathematics, had no difficulties when using laptops/cell phones and were able to access the internet in online learning, got parental support for online learning, were able to use technology and were able to complete mathematics assignments well, the role of parents and good economic conditions and a very good school environment. The three external factors where 74% of students answered that the school has facilitated online learning infrastructure, teachers use voice notes via whatsapp groups in learning mathematics, the conditions of the home environment are very conducive to learning mathematics through online learning, and learning is carried out only in one direction and students only listening and mathematics learning outcomes are sent in the form of photos.

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