





The Role of Islamic Religious Education in 21st Century Science and Technology

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ABSTRACT

Background. Today's science and technology play an important role in education. However, it resulted in many changes in the social and moral order. Students are required to catch up and master increasingly sophisticated science and technology. So the process of forgetting religious and moral values because they are considered ancient, stylish things are considered advanced and modern. The influence of advances in science and technology can be countered by means of education, especially Islamic Religious Education.

Purpose. The role of Islamic Religious Education helps to restore morals and ethics in the pursuit of science and technology. This role is explained in the Koran that humans are created with eyes to see, ears to hear and hearts to consider what is pursued in gaining knowledge. The aim of this research is to determine the role of Islamic Religious Education on science and technology.

Method. This research involves students to get the desired results. The method used in the research is a quantitative method by distributing questionnaires to students via Google Form

Results. The research results show that the role of Islamic religious education in science and technology has a big influence on the educational process.

Conclusion. The conclusion from the research is that the role of Islamic Religious Education must be increased further in following developments in science and technology. Therefore, the limitation of the research is that the researcher did not undertake to look at the role of Islamic Religious Education in the world of science and technology in the 21st century. The researcher hopes that future researchers will carry out the same research in order to obtain in-depth and comprehensive research results so that the results are maximum.

KEYWORDS

Islamic, Science, Technology

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INTRODUCTION

Technology is a network and a set of things related to social use, education and the work environment (Afolabi et al., 2018; Ji et al., 2018; Min, 2019). This is a form of progress in human resources in the competition for the use of 21st century technology. In the field of science, we also feel the positive impact of this technological progress. Where science-based education is currently very closely



related to the use of technology, this is proven by the fact that technology is used as a forum for improving the quality and abilities of a student's knowledge.(Sun & Yu, 2019; Tang et al., 2018; Zhao et al., 2021). Apart from that, technology also forms students' skills in utilizing technology in the world of education (Dolphin et al., 2019; Hedges et al., 2018; Scott et al., 2018). This makes it easier for students to display their acquired talents in playing technology in the world of education, so that students can achieve their desires.

The role of technology in developing science is very important, because steps in educational development require technology as a supporting medium for learning(Al-Hunaiyyan et al., 2018; Danilaev & Malivanov, 2020; Saleh et al., 2021). For this reason, it can be concluded that technology has an important role in the world of education today(Brooks et al., 2020; Fang et al., 2020; Huang & Zhao, 2020). This is because whatever type and form of learning will always be linked to technology. Starting from looking for learning resources, looking for important points in learning objectives, as a place to develop knowledge. The technology used is usually Android-based which can be accessed every day via internet network sites(Choo & Huh, 2019; Tacchino et al., 2020; Yang & Nakajima, 2018). This is nothing new in this day and age, it would not be strange to see that most individuals today have Android as a supporting medium which has various benefits in all circles. In the world of education, Android is clearly very helpful for students and educators in developing the quality of learning.

Science is insight about various knowledge(Baker et al., 2018; GERAD1 Consortium et al., 2018; Li et al., 2019). Because of this, science is mandatory for students to learn. To produce human resources, basic knowledge is needed in order to create people who are useful in life. Science is not only in learning education at universities, humans can learn it both from the environment, nature and education at universities. This is also the goal of knowledge itself to achieve results and paradigm insight about a problem that must be solved in research or analysis(Figueras-Maz et al., 2021). In the development of science, there are certain parts that must be paid attention to, namely empirical, radical, systematic and scientific objectives that relate to the problem that must be solved.(Lytkin et al., 2018; Varvarousis, 2020; M. Wang et al., 2018). In the development of science, there are many aspects that must be resolved in order to solve a problem in the form of knowledge.

Knowledge itself does not just appear suddenly in the development of lessons. This is aimed at various aspects that are present in each individual both in everyday environments and in groups. With this, a desire arises to know and solve various problems that will produce knowledge. Knowledge can be obtained both in theory, analysis and application of skills(Green et al., 2018; Hamidi & Chavoshi, 2018; Wiewiora & Kowalkiewicz, 2019)This is because science has various types for humans to explore in improving the quality of learning(Chatterjee & Mukherjee, 2020; Herrmann et al., 2018; Reznikov et al., 2020). With the existence of science, humans will definitely be able to differentiate between what is good or bad, right or wrong(Honegger & Reiner, 2018). With context, humans can be wiser in life and can face every problem related to the insight and knowledge they have. This makes the human form have efforts in the insight of consciousness as a human being who is intellectually qualified and wise.

Islamic Religious Education is the process of instilling education between educators and students to instill Islamic values and balance students with the Islamic Religion in various regulations. This is a form of planned effort in preparing students who have good morals and can practice Islamic learning.(Alabdulhadi, 2019; Lafrarchi, 2020; Shah, 2019). Islamic religious education must be instilled more deeply in students or students who are Muslim. In learning at universities or schools, Islamic religious education must be instilled more in students and students

as a form of moral and social improvement for students so that it can be practiced well in the family environment and in society. Therefore, Islamic religious education has an important role for students to have a good attitude in reflecting Islamic religious values.

Based on relevant research related to this study carried out by Kemas Mas'ud Ali, basically Islamic religious education is a form of Muslim personality related to both good and bad provisions. (Fahrurrazi, 2019; Klapp, 2018; Yazgan, 2022). Islamic religious education is mostly aimed at introducing or approaching Allah(ter Avest, 2020). This education is also mostly aimed at behavior or attitudes that will realize human deeds, both individually and socially(Jalloh et al., 2019). Islamic religious education is something that has the maximum possible coaching process that is given to a person through Islamic teachings so that the person can develop in accordance with the expected goals, as these goals are focused on the worldly and the hereafter so that a person does not go astray in living his life, even though the person is know that there will be a reward in the afterlife. So it can be concluded that in Islamic religious education, Allah not only commands reading, but can also master learning material and increase knowledge.

According to Nasaruddin Hasibuan, Islamic religious education is the most important foundation for every other science, because in Islamic religious education there is already a good foundation between the Koran and Hadith. Meanwhile, looking at science, there is astronomy, geology, and so on, this is only related to the worldly world, there is no form of approach or deeper study of the afterlife, so science and technology is a form of knowledge that does not want to discuss the problems of the afterlife. If Islamic religious education can be used as a basis for learning science and technology related to astronomy which is based on certain verses or certain hadith, perhaps this will not be understood by students. There are several verses from Allah that show how vast Allah's knowledge is so that it covers the entire universe.

Regarding learning, Islamic religious education is required to continue to experience development and change, especially technological developments which require the world of education to adapt to the problems and problems that occur in the educational environment, for example the lack of improvement in the quality of human resources.in terms of educators/teachers, as well as the use of learning methods that have not adapted to technological developments. Therefore, this research aims to find out the extent of the role of Islamic religious education in 21st century science and technology. It is hoped that after conducting this research a solution can be obtained to resolve this problem, so that the important goals of Islamic religious education can be realized. And the instillation of moral and social values in students runs optimally.

The use of technology can be concluded if for iScience in Islamic education is very helpful in learning media. It is believed that this media can reveal the role of Islamic religious education in science, namely that in this era of modern globalization, technology is clearly helping the development of learning media. In learning Islamic religious education with internet-based technology, educators can use it to broaden students' horizons in the learning in question(Christ et al., 2018; Halloush, 2019; Saqr et al., 2018). For example, the technology used in schools in learning media such as infocus and laptops helps educators to develop students' knowledge in learning. By using this laptop, there are many supporting application features that can be explored and shown to students along with the discussion of the learning material.

Based on the description above, researchers are very interested in studying the role of learningIslamic religious education in the 21st era. Can this media be a means of supporting Islamic religious education learning for now and in the future? and being able to observe data from student data workers at a university being researched can be oriented towards technology as a means of

supporting education. With this, it is hoped that in the future the feature used will become a learning model that can be cognitively evaluated, is effective and supports psychomotor innovation in the learning process. And it is hoped that it can still be used as a form of ongoing learning. On the role of Islamic Religious Education in 21st century science and technology.

RESEARCH METHODS

The research method used is quantitative methods, the quantitative type used is surveys (Al-Azawei, 2018; Jalloh et al., 2019; D. Wang et al., 2018). The aim of this research is to find out and analyze observation data that can play the role of Islamic religious education in 21st century science and technology (Abdullah, 2020; Dugassa, 2021; Sahin, 2018). This research was conducted at an Islamic University in West Sumatra, during online learning in the 2021/2022 academic year. At the time of this research, it occurred during online learning, because students were learning using technology, so they were not only focused on one material presented by the teacher, but students could search and explore other information in various existing sources. current technology. With this, Islamic religious education can be the main source in the educational process and pay attention to the elements of other religions in it.

The sources for this research come from students and lecturers at Islamic universities who participated in filling out online-based questionnaires, therefore we can find out students' answers about the role of Islamic Religious Education in science and technology. To what extent is the knowledge of students and educators in this matter so that it can be developed properly to help students and educators in the continuity of learning. In line with filling out the questionnaire, 50 people answered and had 5 options, namely agree, strongly agree, disagree, disagree, and neither. So that respondents can answer according to their own understanding and can apply the knowledge they have learned previously. The role of Islamic religious education can be applied in various other sciences and technologies, don't just focus on one knowledge. So for this reason educators must be able to use technology so that it can be developed and used in the learning process.

Results of this research collected in the form of questionnaires and surveys, before the researcher distributed the questionnaire, the researcher asked several questions and then the students filled out the questionnaire. Criticism and suggestions from several researcher validators served as a basis and reference for improving the description of the questionnaire that the researcher distributed, in order to get respondents from the research site. The questions that researchers share are how to play Islamic Religious Education towards science and technology, whether students need to master more about the role of Islamic Religious Education towards science and technology. The research data that has been collected is then analyzed using quantitative methods, namely looking at the results of the percentage of questions from the questionnaire that has been distributed, then the percentage that has been obtained will be explained through discussion with expert opinion and corrected by the researcher first to make it relevant.

Data was collected through survey techniques, So this survey technique means that the researcher first prepares a grid relating to the Role of Islamic Religious Education in Science and Technology in the 21st Century. Next, there are several validators who provide criticism and suggestions for the validation sheet, so that before it is distributed widely, it can be improved again after improvement. Only then can it be disseminated widely and the general public can know these opinions. Then it can be used as a form of result of the research that has been carried out. Regarding the grid created by the researcher, it was created in accordance with material related to the role of Islamic religious education in science and technology so that the different opinions can provide

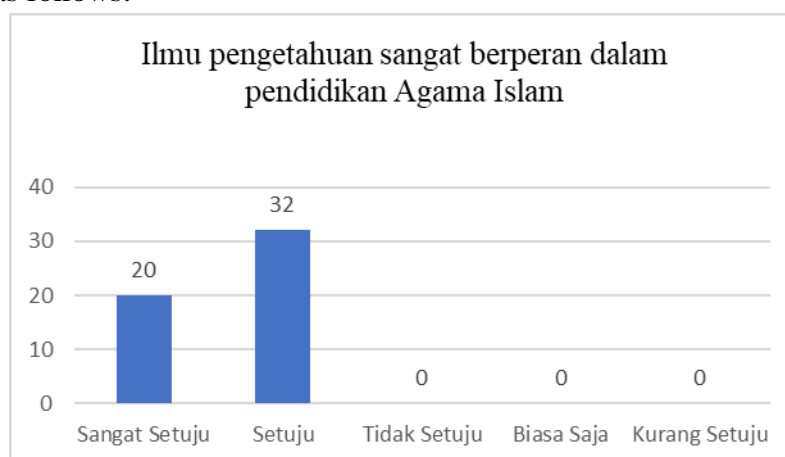
information related to this and serve to review the extent of the respondent's understanding of the role of Islamic religious education in science and technology.

Data from the research results were then analyzed and explained using quantitative methods, namely looking at the percentage of each survey question that had been distributed. The percentage was then described in words and discussed by the researcher and using references from relevant previous research. In the discussion of research results, narratives and expert opinions will be combined in the form of existing research conclusions. So that it can be concluded well and described and explained how the results of the respondent's answers are in accordance with the options that have been given. After that, the researcher made a diagram according to the results obtained. The aim is to find out the relationship between Islamic religious education and science and technology in order to create learning motivation from students, so that students have enthusiasm and innovation in the learning process.

RESULTS AND DISCUSSION

The role of Islamic Religious Education in 21st Century Science and Technology has an impact on education today, Islamic law must be used as a standard basis for the use of Science and Technology which is the benchmark for the use of Science and Technology, namely halal and haram provisions. In the Islamic religion, the foundation is the Al-Qur'an, the Al-Qur'an contains all the information that humans need. Information about science and technology is mentioned repeatedly, this aims to enable humans to act with good deeds and get closer to Allah. So this technology must contain good ethics or actions so that it can be applied, so that it can help humans complete their work. Technology must have high value so that it is not misused.

Judging from the development of Islamic Religious Education towards the current science and technology that is currently accessible, researchers can assess that Islamic Religious Education is one of the supports for the development of Science and Technology and can also be useful for students in today's world of education. It can be seen that education today on average utilizes science and technology as a source of all information and broaden students' insight into the learning in question. Students can also instill Islamic values. To find out the extent of the benefits of Islamic religious education on science and technology, this can be reviewed from a survey giving a research questionnaire regarding the title of the research. And the questionnaire research data that has been attached below is as follows:



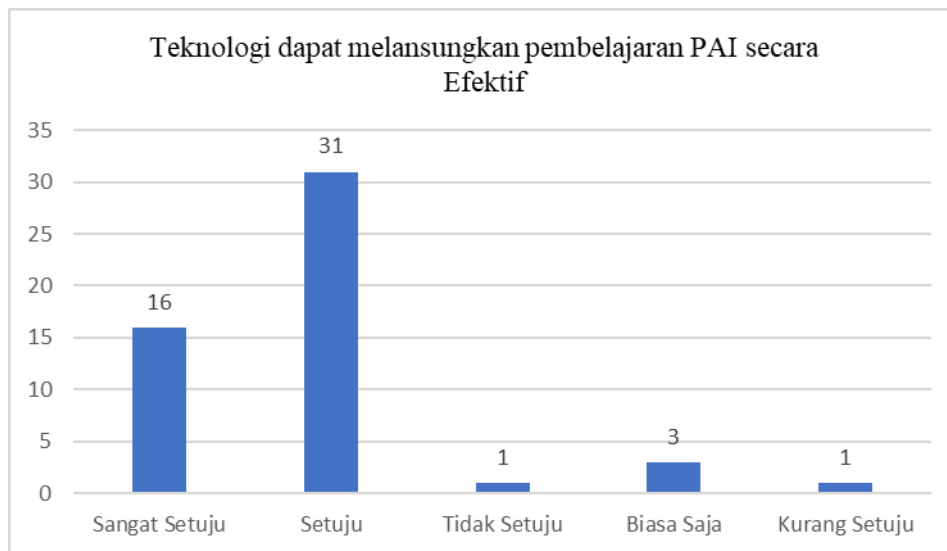
Based on the results from the respondents above, what is their opinion regarding science which plays a role in Islamic religious education. Respondents chose different answers, including some who answered strongly agree and some who answered disagree. It can be seen that respondents tend to choose strongly agree and agree that science has a big influence on Islamic

religious education. Because all the provisions are related and complementary, from the perspective of each religion, it can support scientific activities and science can support religious understanding for human welfare. In education, it can be seen that religion is not only about academics or other general subjects, so science and Islamic religious education are interconnected to broaden horizons.

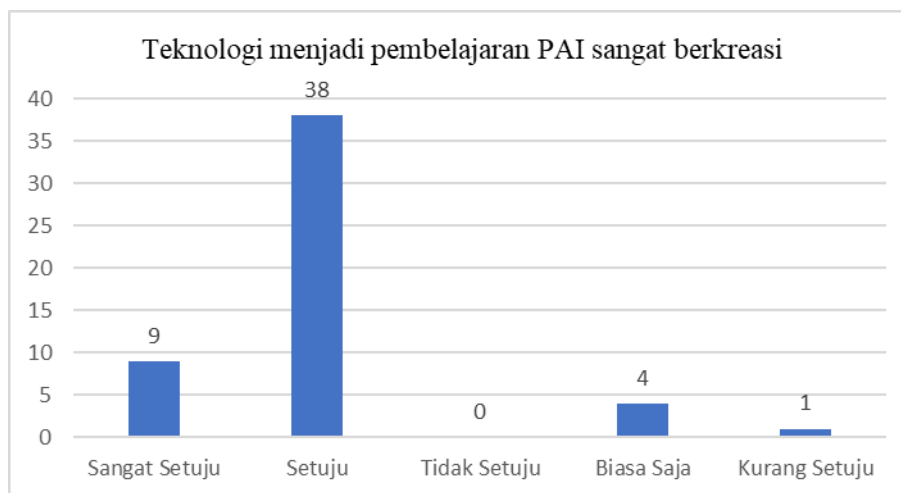


It can be seen from the diagram above that the respondents gave a good response Islamic religious education teachers must be able to use current technology. A total of 13 answered strongly agree and 38 answered strongly agree, 1 person answered disagree. Based on the data obtained, it can be seen that many respondents agree and strongly agree that PAI teachers must be able to use current technology because teachers can use learning media as a source of student learning, teachers can also apply technology well to make learning creative and not boring for students. Regarding respondents who answered that they did not agree regarding this, they considered that this technology was very difficult to use and that teachers could not understand the use of this technology. So it can be concluded that every teacher is required to be able to use technology in order to increase students' understanding.

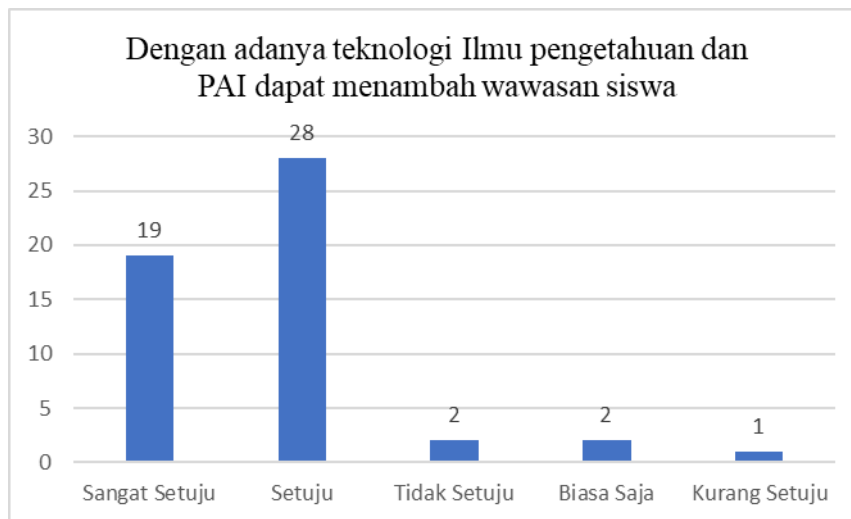
It can be seen from the diagram above that many people chose to agree and strongly agree to the questions given. From this it can be seen that technology can help students understand Islamic Religious Education lessons, although there were those who answered with 3 options, 21 people answered strongly agree and 26 people answered agree, 5 people answered indifferent. If we analyze the results of data obtained from respondents, we can see that many people answered agree and strongly agree, this is because this technology is at the highest level to find out all sources of knowledge, and can also increase insight into Islamic Religious Education. Judging from the respondents who answered normally, this is because they think that technology is not something to help students in learning and they think it is very difficult to understand compared to teachers who provide learning material.



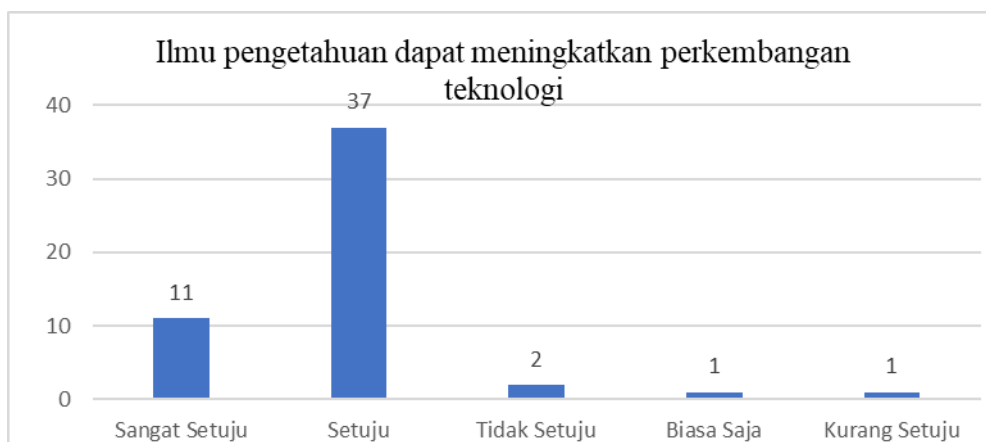
Judging from the results of the respondents above, 31 people answered agree, 16 strongly agreed, 3 people answered normal, 1 person answered disagree and 1 person answered disagree. It can be concluded that most respondents chose to agree and strongly agree because technology can make Islamic religious educators' learning effective and correct so that learning becomes efficient. Respondents who chose neither agree, nor agree nor even disagree thought that technology was less capable of developing students' knowledge, causing learning to be less effective and students not understanding the lesson.



Judging from the results of the respondents in the diagram above, 38 people agreed, 1 person disagreed, 9 people answered strongly agree, 4 people answered normal, 0 people answered disagree. If you look at the number of people who answered agree and strongly agree, technology makes learning Islamic religious education a more interesting creation, because this media is very interesting and does not make students bored and not lazy in the learning process, because in general learning uses teachers only explaining by lecture method, it would be better for educators to use technology that is more interesting and creative. And for respondents who answered indifferent and disagreed, perhaps this was because there were other obstacles that prevented them from using creative technology.



Judging from the results of the respondents in the diagram above, 28 people answered agree, 19 people strongly agreed, 1 person disagreed, 2 people answered normal and 2 people disagreed. If we analyze the students who answered agree and strongly agree, it is because for them the use of this technology opens up all aspects and insights of students in the learning process, this can develop ideas from their knowledge. And students who answered did not agree, disagree and were normal because of this. There were certain obstacles such as they did not understand the material and they did not understand how to apply this technology. So it can be concluded that it is very useful for students to open up all aspects and insights of students and is very beneficial for students from a positive perspective.



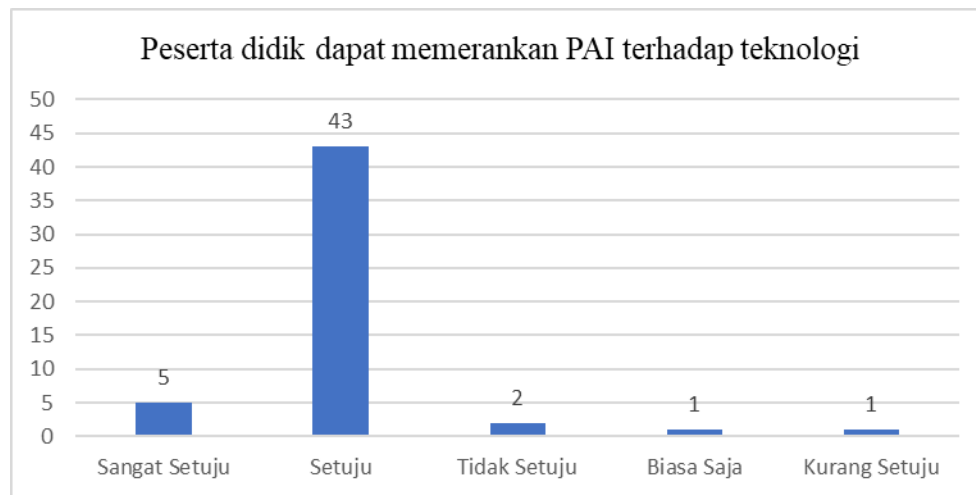
From the distribution of the questionnaire above, you can see the results obtained, 37 people answered agree and 11 people answered strongly agree, 1 person answered normal, 1 person answered disagree and 2 people answered disagree. Judging from these results, many people chose to agree and strongly agree that this could be used as a means of supporting technological development. For respondents who choose normal, disagree and disagree, there may be certain obstacles. So it can be concluded that science and Islamic religious education are technological developments.



From the distribution of the questionnaire above, you can see the results obtained, 38 people answered agree and 7 people answered strongly agree, 2 people answered normal, 4 people answered disagree and 1 person answered disagree. Judging from these results, many people chose to agree and strongly agree that this could be used as a tool for searching for information, so students do not only focus on one source but from many other sources. Regarding respondents who answered disagree, indifferent and disagree, there may be obstacles related to this, and cause there to be no progress in learning Islamic religious education.



From the distribution of the questionnaire above, you can see the results obtained, 34 people answered agree and 16 people answered strongly agree, 1 person answered normal, 1 person answered disagree and 0 people answered disagree. Judging from these results, many people chose to agree and strongly agree. This can be used as a reference that there is a connection between Islamic Religious Education and science, and also together to enhance the values of broad knowledge and many insights. For people who answer normally and don't agree, there may be other obstacles that can't play this out.



From the distribution of the questionnaire above, you can see the results obtained, 43 people answered agree and 5 people answered strongly agree, 1 person answered normal, 1 person answered disagree and 2 people answered disagree. If we look at the respondents who answered agree and strongly agree, this is because it can make it easier for teachers to follow technological developments based on competencies that emphasize students' skills and understanding. For respondents who answered disagree, normal and disagree, there may be obstacles in this matter and it cannot be implemented properly.

CONCLUSION

Islamic religious education is one way for students to understand good behavior, piety, noble character, and practice the teachings of the Islamic religion from its main sources, the holy books of the Koran and al-Hadith. Islamic religious learning is the process of students acquiring, believing in, and practicing the teachings of the Islamic religion. The aim of learning Islamic religious education is that students can know and understand good things and provisions in accordance with Islamic law, and use the Al-Qur'an as a guide for doing something good. Research on the role of Islamic Religious Education and Science in the 21st century can provide maximum learning, therefore the researcher hopes that Islamic religious education will not only be used in learning but can be used in various aspects of learning and other knowledge and can be developed in more interesting technology. As has been explained, Islamic religious education and science and technology ensure that students do not quickly become bored and bored in learning, because there are interesting features that can be created as well as possible by educators. Science is something that is organized into a system that comes from experience, studies and experiments that have been carried out to determine the nature of the principles regarding rights being studied. The benefits of knowledge itself can increase broad insight and many ideas.

Regarding researchers who use quantitative methods, this method makes it very easy for researchers to describe the questionnaires that have been distributed. Therefore, researchers hope that respondents will respond well. This will be very helpful in researching the role of Islamic religious education in science and technology. By having Islamic religious education on science, it can broaden students' insight not only about religion but also about science and technology, so that the relationship between Islamic religious education and science can run well and make it easier for students to understand, as well as students can develop the ideas they have got. So it can be concluded that Islamic religious education and science can be used as a perspective for knowing many things and it is important to know about life in this world and the afterlife.

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