

UTILIZATION OF AI AS ASSISTIVE MEDIA IN HINDU RELIGION EDUCATION LEARNING IN THE MODERN ERA

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Abstract

As technology develops rapidly and practically, as the times evolve. The emergence of artificial *intelligence* (AI) technology in the world of education has become a subject that attracts the attention of academics and educational practitioners. Its existence must be responded positively, because it can increase learning creativity and support digital transformation, including its application in Hindu religious education lessons. The development of *Artificial intelligence* technology has a positive impact by making it easier to get information and this causes a lack of interest in learning because it relies more on *Artificial intelligence* (AI). However, the application of AI also provides a number of ethical challenges and concerns, data security, technology dependency and lack of teacher training. Therefore, researchers want to provide a presentation of data on the utilization of AI technology for education, especially for learning ahindu religious education. The method used in discussing this material is to use the case study method in exploring the benefits of artificial intelligence (AI). Based on this, it can be seen the results and discussion of this material, among others; 1) the benefits of artificial *intelligence* (AI) for learning Hindu religious education, 2) The excessive impact of the use of AI in the world of education. Thus AI is actually like a double-edged knife, its usefulness must be used wisely, controlled by what you want to need, don't let the technology manage the individual back. Because Artificial intelligence not only provides positive benefits, but will also be able to have a negative impact, the development of *Artificial intelligence* technology has a positive impact by making it easier to get information and this causes a lack of interest in learning students because they rely more on *Artificial intelligence*.

Keywords: Benefits of AI; Assistive Media; Hinduism Learning

Introduction

In this sophisticated modern era, everything is fast and practical. The development of information and communication technology (ICT) has brought significant changes in various sectors of life, including education. One technology that is growing rapidly and is in the spotlight is Intelligence (AI). AI technology offers various conveniences in accessing information, optimizing the learning process, and providing a more interactive and personalized learning experience. As part of the digital transformation, the utilization of AI in education has opened up new opportunities, both in terms of teaching methods and in terms of implementing technology in the curriculum. AI is a technology that has great potential to transform the world of education. Such as: *Quizlet*, *Formative AI*, *Automatic assessment*, *Canva*, *ChatGPT*, *Grammarly*, *Classpoint*, *Virtual Mentor*, *Quillbot*, *Gemini* on Google etc. AttendanceAI certainly brings a breath of fresh air to individuals who are overshadowed by the relentless demands of tasks.

The emergence of AI in the world of education has a very significant function, helping educators in applying material more interestingly. Then behind the emergence of this technology there is a huge impact on humans on the progress and development of science and technology (IPTEK), which is increasingly felt by the user community, especially in academia, including aspects

of human life that do not escape the influence of this technology is education or closer to learning activities (Serdianus, 2023). Currently, *Artificial Intelligences* (AI) technology or what we know as artificial intelligence is a very interesting and implementable topic of discussion. *Artificial* intelligence includes the development of machines with a certain level of intelligence, capable of performing functions similar to humans, including perception, knowledge, judgment, and adaptation to the environment (Manongga et al., 2022).

The presence of AI for the world of education especially is clearly very helpful for educators in transferring knowledge to their students. Because the presence of AI as a help in teaching at school. Speaking of media, media can be defined as anything that can be used to channel *messages*, stimulate students' thoughts, feelings, attention and abilities so as to encourage the learning process (Zainal Agib, 2002). Hindu Religious Education, as an important part of character and spiritual education in Hindu society, is also not spared from this development. In the midst of the rapid development of the times, learning Hindu religious education in schools and higher education institutions requires innovation to remain relevant to the needs of the millennial generation and who are very familiar with digital technology. The utilization of AI as an auxiliary medium in Hinduism learning has great potential to improve the quality of teaching and enrich students' learning experience.

PHDI (1993) states that Hindu religious education and guidance is a tool to make Hindus as people who are expected to be able to exercise their rights and obligations in reciprocal relationships between each other, to their nation and country, and to their God. Religious education is a lifelong education, therefore the implementation of religious guidance should be since the child is still young. Education has long been recognized as a fundamental pillar in the development of a nation, by shaping its capacity for qualified individuals and preparing them to face global challenges. However, although AI offers various benefits, its utilization in Hindu religious education also presents various challenges, both in terms of ethics, data security, and the readiness of educators in integrating this technology into the learning process. Therefore, it is important to examine in depth how AI can be optimized as an assistive medium in Hindu religious education, as well as its positive and negative impacts on students' development in understanding Hindu religious and spiritual teachings.

With the development of technology, the global education landscape is undergoing significant changes. This phenomenon has attracted the attention of researchers to explore the potential and implications of AI integration in the context of education. Several previous studies have discussed the important role of AI in education. Then what is the relationship between the use of AI and Hindu religious education, clearly based on the understanding and benefits of AI, of course, its presence does not only help some circles. Especially in the world of education, it covers all subjects that are taught by all students.

Educators at school. Religion lessons are usually seen as boring lessons and a lot of material that must be memorized and seem rigid. With the presence of AI, of course, it answers all the concerns experienced by a religion teacher at school, we can take an example of the application of AI such as *Quissis* where teachers and students can interact directly, packaged interestingly like playing quiz *games*. Thus, we can align religion with English, math and science subjects, and others. Where the subjects have already been able to be packaged interestingly in the learning process in

the classroom by involving direct practice in it. Through this research, the author aims to reveal how the utilization of AI can be used effectively in learning Hindu Religious Education, as well as the challenges and opportunities that may arise along with its implementation. Thus the utilization of AI is expected to not only provide solutions in increasing the effectiveness of learning, but also maintaining the noble values contained in the teachings of Hinduism itself.

Methods

Discussing the benefits of artificial intelligence (AI) for education, especially Hindu religious education, this research uses case study research methods and descriptive qualitative. The author will explore the real experience of the application of AI in Hindu religious learning and present findings related to the benefits, challenges, and impacts of the use of AI in the world of education, especially Hindu religious education in the modern era. By collecting data from reliable sources both some literature sourced from journals, books and other sources.

Results and Discussion

In the process of education, there is an awareness both in the educator and in the students to create a normative maturation situation. Education can also be interpreted as a process to change the attitudes and behavior of a person or group of people through teaching, training, and research. As an activity that is aware of its purpose, its implementation is in a continuous process in every process and level of education. The utilization of artificial intelligence (AI) in education has become a major focus for researchers and educational practitioners. The following describes the results and discussion of this material, including the following:

1. The benefits of AI (*Artificial Intelligences*) or artificial intelligence for learning Hindu religious education.

In the ever-evolving digital era, artificial intelligence (AI) has penetrated into various sectors, including education. AI is not only used to improve administrative efficiency or automated evaluation, but also has great potential to enhance the learning experience, particularly in Hindu religious education. Access to deep spiritual teachings can now be gained more easily through various AI-based platforms, which present material in a more engaging and easy-to-understand format. The future of education with AI will continue to evolve and play an increasingly important role in education. In the future, artificial intelligence (AI) will be able to help us create a more personalized, effective, and efficient learning system, so that every student can reach their full potential during the learning process. Artificial intelligence (AI) is a technology that allows computers to mimic human abilities, such as learning, thinking, and solving problems.

Problem. In its application, AI in learning has many benefits for students, teachers, and educational institutions. The utilization of artificial intelligence (AI) in the context of education has a broad and deep positive impact. Talking about education, because education is closely related to knowledge whose existence is very important because it has a very crucial role in the lives of individuals and society. Among them are opening up vast opportunities, improving the quality of life, encouraging growth and development, shaping character and values and creating a better society. This is also contained in the sacred verses which state that;

*Na hi jñānena sadr śam pavitram
iha vidyate Tatsvayam yoga-
saṁsiddhā
kālenātmani vindati.*

(Bhagavad Gita, 4.38)

Meaning:

There is nothing purer in this world than knowledge. One who has attained perfection through Yoga, will find that knowledge within himself with the passage of time.

This sloka reveals that knowledge (jñāna) is something very pure and noble. Spiritual knowledge, especially that found through the path of yoga and self-control, is considered an invaluable source of enlightenment. In addition, knowledge is also said to be important in the Reg Veda sloka. The Reg Veda explains that knowledge is also highly valued. One of the slokas that emphasizes the importance of knowledge is:

*Dhīśaḥ prajāḥ prathamaḥ savitā,
yujyāḥ prajābhyo jñānam udārayat.*

(Reg Veda, 1.164.39)

Meaning:

Knowledge that brings light and awareness, comes from a pure source, which spreads throughout the world.

This shows that knowledge is an enlightening force and brings good to all humanity. Overall, Hinduism regards knowledge and education as essential means to achieve truth, enlightenment, and liberation. Education, both in the mundane and spiritual aspects, is the path to a deeper understanding of ourselves and the world around. The following will explain the benefits of AI (*Artificial Intelligences*) or artificial intelligence for learning Hindu religious education, including:

A. Improved accessibility of learning materials

Artificial intelligence (AI) allows students to access a wider and more diverse range of learning materials, including sources of Hinduism in the formats of

that are easier to understand, such as videos, articles and interactive applications. The use of AI-based platforms, such as educational apps or *chatbots* (as virtual teachers), can provide a deeper understanding of spiritual concepts in Hinduism. One example of an emerging AI application in Hinduism learning is *chatbots*. AI-based *chatbots* such as Virtual Guru can act as "virtual teachers" who provide explanations interactively. Students can ask questions related to the teachings of Hinduism, and the chatbot will provide answers based on data that has been programmed. Examples of questions that can be asked to a chatbot include:

- 1) What is *Atman* in Hinduism?
- 2) How to perform *puja* at home?
- 3) What does the concept of *karma* mean in everyday life?"

These *chatbots* can provide answers that are in line with Hindu teachings, and in some cases, provide further resources for learning. This technology allows students to learn in a more personalized and barrier-free way. The utilization of *Artificial Intelligences* (AI) technology in learning activities can increase the effectiveness of learning, skills to produce innovative work, and increase the creativity of digital learning as part of a digital transformation, for a student who is able to quickly accept new and innovative things. However, each person has different characteristics and attitudes from one another in terms of acceptance of something new and innovative, so the innovation diffusion process needs to be carried out as an effort to spread the innovative product (Kisno, 2022).

This is in line with the Hindu sloka that states that knowledge can also be obtained through technology.

*Tad viddhi pranīpātena
paripraśnena sevayā,
Upadekṣyanti te jñānaṁ
jñāninas tattva-darśinaḥ.*

(Bhagavad Gita, 4.34)

Meaning:

Know that knowledge can be gained by humbly submitting oneself, by asking sincerely, and by serving the wise who know the truth.

In this context, although there is no direct mention of technology, the principle is that knowledge can be acquired through various means, including through wise and appropriate sources. In the modern era, this can be translated as learning from various media and technologies that provide knowledge that is true and in accordance with universal truths.

B. Personalize learning

One of AI's key contributions is its ability to align learning approaches with individual student needs, embodying the concept of personalized learning. By analyzing data, AI can understand each student's level of understanding and present learning materials specifically according to their needs. This not only allows students to learn at an appropriate and relevant pace, but also creates a learning environment that supports their development more optimally. Here are some of the benefits of AI in general, including the following:

- a) Improve Academic Achievement; AI can help students learn more effectively and efficiently, thereby improving their academic performance.
- b) Increase Student Motivation and Engagement; AI can make learning more interesting and interactive, thus increasing motivation and engagement in learning.
- c) Assisting Teachers in Teaching; AI can help teachers with teaching tasks, allowing them to focus more on students.
- d) Improving Educational Efficiency and Effectiveness; AI can help educational institutions in improving educational efficiency and effectiveness.

Based on the explanation of the benefits of AI, we can conclude the importance of the benefits of AI not only for educators but for students as well. We can see the rapid development of technology for world of education, namely in the past educators taught using a blackboard. What initially used chalk as the times progressed changed to using markers and finally LCDs appeared as auxiliary media in teaching. Furthermore, there is now a replacement for the blackboard and LCD incorporation without having to involve projection media onto the screen, which is a kind of touch screen tablet but with a larger size. One of the countries that have implemented this media is China. One of the depictions can be seen below;



Artificial Intelligence (AI) in the classroom teaching *system* (Source: *Coding Bee Academy*)

With AI technology, learning can be tailored to the needs of each student. AI can analyze a student's level of understanding of the material and then

provide recommendations or tasks that are appropriate to their abilities, so that the learning process becomes more effective. This is particularly important in Hindu religious learning, which involves understanding deep spiritual values. One example is

1) Private Tutor

AI can be programmed with in-depth knowledge of various Hindu scriptures, such as the *Vedas*, *Bhagavad Gita*, and *Puranas*. AI can provide simpler or more complex explanations depending on the student's level of understanding.

2) Ritual and Ceremony Simulation

AI can create 3D visual simulations of various Hindu rituals and ceremonies, so that students can see and understand the steps involved more clearly. Students can interact with the simulations virtually, for example by selecting the mantras they want to chant or performing certain movements in a ceremony, and the AI can provide detailed explanations of the meaning behind each action in the ritual or ceremony.

3) Personalized Comprehension Evaluation

AI can administer tests that automatically adjust their difficulty level based on student performance. In addition, AI can analyze students' answers to identify areas that need strengthening. And it can provide specific and constructive feedback to help students improve their understanding.

4) Translation of Sacred Texts

AI can provide real-time translations of Hindu sacred texts in multiple languages, allowing students to study the scriptures in language they understand. Of course, this is very convenient for students with language barriers, AI can also provide context explanations of difficult words or phrases, as well as connect the text to other concepts in Hinduism.

5) Online Learning Community

Artificial intelligence (AI) can provide an online discussion forum facility where students can interact with fellow students as well as teachers. And AI can recommend study buddies who have similar interests and levels of understanding.

Examples of real-world application cases:

1. Mobile Apps

A mobile app can provide access to a personal AI tutor that can be accessed anytime and anywhere. As an example of this application is AI in meditation and yoga apps, some yoga and meditation apps, such as *Headspace* or *Calm*, are starting to incorporate elements of Hindu spiritual teachings in their programs. AI in these apps can help users to customize their meditation or practice sessions.

yoga based on their needs and experience levels, and provide data-driven guidance from user interactions.

2. Online Learning Platform

Online learning platforms can offer a variety of Hinduism learning courses and modules tailored to individual needs. As an example of the application of AI in *Hinduism* learning platforms, learning platforms such as *Vedanta Academy Online* or apps such as *Hinduism Today* can integrate AI technology to provide a more personalized learning experience. By analyzing students' learning patterns, these platforms can recommend relevant articles, videos, or modules based on students' interests and understanding.

C. More interesting and innovative interactions

The use of artificial intelligence (AI) in the classroom learning process can create a new atmosphere and a more interesting and interactive learning experience. For example, in Hinduism, students can interact with AI to explore Hindu epics such as *Ramayana* or *Mahabharata* in the form of educational *games*, virtual tours to holy places or worship simulations. In addition, analysis of educational data obtained through AI enables an educational institution to identify trends and patterns in student performance. With this in-depth understanding, institutions can take better informed decisions related to curriculum development, as well as improvement of overall fulfillment methods. Teaching, student and overall needs. Not only that, AI also facilitates access to global education through online learning platforms.

Students from different geographical backgrounds can access high-quality educational resources without being constrained by physical limitations such as distance. Finally, AI stimulates the development of critical and creative thinking skills through the design of challenging tasks and deep learning experiences. This provides students with skills that are relevant to the demands of an increasingly technologically advanced world. Thus, the use of artificial intelligence in education not only optimizes the learning process, but also shapes students to become challenge-ready and innovative individuals in the face of technological developments.

One example is the use of AI media, namely *Quizizz* and *Word Wall*, where students not only learn but learn while playing. Of course, this does not conflict with the types of teaching methods. According to Zainal Agib (2002), this game method provides an interesting experience for students in understanding a concept, strengthening concepts that are understood or solving problems. This method is useful because it can develop intrinsic motivation, provide opportunities to practice making decisions and develop emotional control emotional control when winning or losing, and is more interesting and fun so that it can make it easier for a student to understand the subject matter presented by his teacher. If the game in the past could only be presented on paper such as the TTS (crossword) game with Hinduism questions, the image media on the card then discuss or discuss.

group games by guessing klu such as Mahabharata character material. Now all of these media can be applied with just one media, namely AI, it is not uncommon for the application of the greeting game method of learning in class that some groups do not want the *fair to* seem to suppress one group or individual. So that sometimes this method run . Unlike AI, the user name can be disguised so that the indication of emphasis on individuals or groups is very small. The explanation will be described below, from the example of presenting questions and ranking the results of answering these questions about games that are *fair* without pressure from certain groups / individuals.

QUIZZZ

Berikut yang
merupakan bagian
Eka Pramana adalah....



Rank	Avatar	Name	Score
1		Rara Pratiwi	17982 pts
2		Gita Adi	17981 pts
3		ayundha sukma	16384 pts

Utilization of AI (*Quizizz*) for learning Hinduism (Source: *Quizizz* personal account)

Brown and Jones (2021) explain that artificial intelligence (AI) leads to the conclusion that the application of artificial intelligence (AI) in education not only provides

current benefits, but also has long-term implications for the future. Increased efficiency, learning, and

The personalization of skill development relevant to the digital era is a factor that strengthens the role of AI in the future of education. In addition to having benefits, the presence of AI in Hinduism learning also has other characteristics such as;

- a. The role of AI in teaching Hinduism in schools Artificial intelligence (AI) as an auxiliary medium, its presence is highly anticipated by educators who experience anxiety about types of methods that need to be applied in teaching Hinduism. Through the process carried out by AI, it can quickly recognize the needs of individual learners accurately, be able to understand their learning preferences, and the ability to identify other areas that require special attention and quickly. Therefore, users who have responded positively to the development of AI technology must be able to use this AI insight optimally in the learning process activities carried out. Hindu religious education learning has the opportunity to choose effective ways or methods of learning with the following approaches approaches that are relevant and according to educational characteristics. Wang and Zhang (2020) highlighted that artificial intelligence can improve the efficiency of teaching methods by providing curriculum- compliant content recommendations, supporting responsive curriculum development, and creating a more interactive learning environment.
- b. Challenges and obstacles of Artificial Intelligence (AI) for education AI's success in providing information- information quickly, of course, raises polemical doubts about the accuracy of the data. Indeed, the success of AI in providing information is seen from the accuracy of the results obtained without having to open material in a book. Inaccuracies/incompleteness of data can lead to unreliable or invalid results. , efforts are needed to provide accurate analysis and recommendations. While the positive potential of AI is, this literature review also includes an understanding of the challenges that may arise. According to Li et al (2019), some of the challenges involve ethical concerns, data privacy, and preparation of educators and students to adopt this technology.
- c. AI's contribution to curriculum development and education administration AI has a crucial role to play in crafting an education curriculum that is relevant to future needs. First, through data analysis and occupational trends, AI can provide deep insights into the most sought-after skills in the job market. By understanding industry needs and economic developments, educational institutions can customize curriculum to ensure students are equipped with the skills needed to succeed in the ever-changing world of work. Furthermore, AI can be used to identify individual student learning styles and preferences. By understanding how students learn best, curriculum can be customized

to meet their needs more effectively. This personalized approach not only improves student engagement but also helps them develop skills, abilities and interests more effectively. Finally, AI can support the integration of 21st century skills in the curriculum. These include skills such as problem solving creativity, and interpersonal skills that are increasingly valued in the workforce. By identifying the best ways to teach and measure the development of these skills, educational institutions can prepare students for success in the modern era complexity and change.

Thus, through data analysis, monitoring of technological developments, personalized approaches, and a focus on 21st century skills, AI can serve as an invaluable tool in crafting an educational curriculum that is relevant and responsive to future demands. The application of artificial intelligence (AI) in the administrative context of educational institutions can bring significant positive changes. First of all, AI systems can be used to automate routine administrative tasks, such as student data management, attendance recording, and timetabling. By automating these tasks, administrative staff can focus on tasks that require more complex decisions and human interaction. The immediate impact of this automation is increased efficiency. Time and resource management that used to be spent on routine administrative work can be allocated to improving services to students and support to teaching staff. Overall, this can improve the productivity and service quality of educational institutions.

d. AI in distance education and emerging ethics

The use of artificial intelligence (AI) in distance education not only increases interactivity, but also brings significant changes in classroom management and student support. Through personalized learning, AI can identify individual learning needs and recommend additional relevant materials, giving teachers a more in-depth view of student success and enabling the adoption of more effective teaching strategies. AI-optimized virtual tutoring systems not only provide assistance in material mastery, but can also track student progress in real-time, allowing teachers to provide additional support more precisely and proactively. The use of artificial intelligence (AI) in education, while promising innovation and efficiency, brings a number of ethical challenges and concerns that must be carefully addressed. One such challenge is the issue of data privacy and security. The collection and analysis of student data by AI can threaten individual privacy if not managed carefully. Personal data protection and information security are imperative to prevent potential misuse or unintended privacy violations.

- e. AI's impact on student learning outcomes.

A method is said to be successful if students are able to understand what has been given by their educators. Smith and Brown (2018) state that artificial intelligence (AI) can show that the implementation of AI can improve student learning outcomes. The adoption of this technology enables more accurate evaluation of student understanding, facilitates faster feedback, and provides solutions to individualized learning needs.

2. Implementation of AI in the Hindu religious education curriculum

In the context of Hindu religious education, the implementation of AI opens up new opportunities to improve the way in which spiritual teachings are taught and understood. Hindu religious education, which encompasses vast and complex philosophies, rituals and spiritual values, requires innovative approaches to reach out to the younger generation who are already exposed to technology. The implementation of AI in the Hindu religious education curriculum is an innovative step that promises to improve the quality of learning and students' understanding of deep spiritual values. By utilizing AI technology, learning Hinduism can become more personalized, interactive, and effective. The implementation of AI in the Hindu religious education curriculum is as follows:

A. Use of AI in teaching

Speaking of AI, its use can be integrated into the Hindu education curriculum, whether in public schools, Hindu religious schools, or higher education institutions. For example, AI can be used in the creation of more dynamic teaching materials or as a tool to support multimedia-based teaching, so that students more easily understand the teachings of Hinduism.

B. AI-based learning platform

The use of AI-based learning platforms in the Hindu religious education curriculum, of course, has benefits such as the use of AI-based learning *software* to teach Hindu prayers, religious rituals, or knowledge of Hindu philosophy with a more visual and interactive approach.

C. Application of AI in Test and Evaluation

The application of AI provides convenience as an educator, such as AI can assist in giving automated exams or provide instant feedback to students regarding their understanding of the material that has been learned. The implementation of artificial intelligence (AI) in the Hindu religious education curriculum offers much potential to improve accessibility, effectiveness, and students' understanding of the deep teachings of Hinduism.

By using AI to tailor learning to individual needs, increase interactivity, and provide quick and accurate feedback, Hindu education can become more dynamic and accessible to the younger generation living in the digital age. However, there needs to be attention to ethics and the quality of the material being delivered to ensure that this technology is used in a wise manner and in accordance with Hindu principles.

3. The impact of AI on students and the learning process

The application of AI is also seen in the analysis of educational data in the learning process, removing teachers' flexibility to respond to students' individual needs. In , inequality in access to education may occur if the implementation of AI is not By leveraging artificial intelligence, educational institutions can analyze data to identify major trends for learning, providing valuable insights for curriculum development and teaching process improvement. AI-powered online learning platforms open the door to global access to learning materials, embracing students from diverse backgrounds and minimizing geographical boundaries. The intended impacts are as follows:

a. Influence on learning motivation

For example students may feel bored with traditional learning methods may be more interested in approaches that use modern technology. AI provides a more interactive learning experience that adapts to students' learning pace, thus increasing their interest and engagement.

b. Challenges in the use of AI

While AI has many benefits, the use of this technology can also bring challenges. These include issues related to the lack of digital skills among teachers and students (tech-savvy), as well as the lack of supporting infrastructure to optimally implement AI in Hinduism learning.

c. Ethical and data security concerns

Besides the benefits of AI, it also raises some concerns, especially in terms of ethics and data security. How is the personal data of students used by AI applications protected, as well as whether the use of AI can change the way students view or understand Hindu religious values that should be passed on traditionally.

In addition, it can be said that the integration of AI in the learning process helps students develop digital skills that are essential in the modern era. Not only do they learn about using AI technologies, but they can also hone their critical and creative thinking skills through carefully designed tasks. Thus, the application of AI in education is not just a mere adoption of technology, but an effort towards a more adaptive, inclusive and relevant learning experience to prepare students for the challenges of an ever-evolving world. Research by Wang and Zhang (2020) highlights that artificial intelligence can improve the efficiency of teaching methods by providing curriculum-compliant content recommendations, supporting responsive curriculum development, and creating a more interactive learning environment. Research results by Smith and Brown (2018) say that artificial intelligence (AI) can show that the implementation of AI provides improved student learning outcomes. The adoption of this technology allows for a more accurate evaluation of student understanding of lessons,

It can also facilitate faster feedback and provide solutions to individualized learning needs.



AI in education (Source:

Komposiana.com)

The use of artificial intelligence (AI) in education has great potential benefits, but it is important to be aware of some of the dangers that can arise if its use is excessive or unwise. Over-reliance on AI technology can reduce human involvement in the best teaching methods, provide additional learning materials, and assist in curriculum planning. The application of artificial intelligence (AI) can also be seen in the analysis of educational data in the learning process, removing the flexibility of teachers to respond to the individual needs of a student. In addition, inequalities in accessing education can occur if the implementation of AI cannot be properly regulated, creating access gaps between students from lower economic groups or remote areas. Data security and privacy are also a concern with the potential risk of privacy and security breaches of student data in the absence of proper management. In addition, the danger of bias in algorithms could result in unfair or discriminatory assessments or recommendations against certain groups. It is also important to consider the loss of social and emotional skills if human interaction is overly replaced by AI technology. , a wise balance between technology and human presence, as well as careful regulation, is needed to ensure that artificial intelligence (AI) is properly integrated and provides benefits without introducing unintended risks.

Further studies can be conducted to expand the scope of the desired research, as well as apply other research methods, and test the effects of using artificial intelligence (AI) in real situations. With a deeper understanding of the relationship between the use of artificial intelligence (AI) and the student learning process, an educational institution can optimize the use of artificial intelligence (AI) technology in the context of learning. (Muarif, 2023). AI is also said to have several significant impacts on students, both positive and negative. The impacts in question are as follows;

a. Positive Impact

- 1) It has accuracy and precision in doing its job. This technology can be arranged to help facilitate human work, including students and even a student. The work will be more flexible and does not require a long time. Everything that students and college students question will be answered in it.
- 2) Replace repetitive and routine human tasks. Not only flexible, artificial intelligence (AI) can be said to be an assistant for students and students to work repeatedly and continuously. Students and college students do not need to bother looking in doing their assignments.
- 3) Can be used at any time and over a long period of time. AI has no time limit. Students can use it at any time and even for a long time. This is an interesting data for AI.
- 4) Cheaper, meaning that by using artificial intelligence (AI), students and college students do not need to pay additional costs to complete their assignments. The artificial intelligence (AI) really knows the ins and outs of the problem at hand. Because AI is designed just like humans. It can do the job faster and better.
- 5) Using AI can shorten the time spent in doing a job. Students and college students will have more free time due to the ease of AI in doing their work.

b. Negative Impact

- 1) Making students and college students become much lazier than before because the features offered make it very easy for students to complete their college work. Students and students will easily underestimate the work given to them.
- 2) *Artificial Intelligence* (AI) does not have *Common Sense*, AI is able to learn and work alone like humans, but AI cannot understand the purpose of the information created. Because a comprehensive understanding can only be obtained and owned by a human being himself, where AI was created because of the intelligence possessed by a human being to make his life easier. Although designed like the ability of a human, artificial intelligence (AI) also has shortcomings.
- 3) AI is still lagging behind for information processing that is vertical and requires complex teachers. Despite the conveniences it offers and has, artificial intelligence (AI) is still a technology that on

Basically, it still takes time to get such information.

- 4) Students' literacy will decrease because they don't have to bother reading journals or books. Artificial intelligence (AI) has an appeal that makes the attention of students and college students prefer the easy way rather than having to read references and journals that take a long time.
- 5) Using AI for a long time can be potentially addictive. If we take an example like online games, the AI has the same impact from the negative side, because it causes addiction. If you use it for too long, then someone can experience addiction (Sulistia, 2023).

Keep in mind that, in addition to the positive impact of the usefulness of AI on students and the learning process. And although AI can be a very useful tool, the role of the teacher is very important in the continuation of the utilization of AI media as an auxiliary application in learning Hindu religious education. Namely, the role of the teacher remains very important in providing personal guidance and support to students. In order for the use of AI technology to be utilized properly, because the use of AI in Hinduism learning must be done carefully to avoid misconceptions and ensure that the core values of Hinduism are maintained.

4. **Challenges and opportunities of integrating AI in Hindu education** Integrating artificial intelligence (AI) in Hindu education presents various challenges and opportunities that need to be considered. On the one hand, this technology can bring great benefits in enhancing the learning experience and expanding access, but on the other hand, there are several barriers to overcome, especially those related to spiritual values and the authenticity of Hindu teachings. Let us discuss further the challenges and opportunities that can be faced in integrating AI in Hindu education. Behind the important role of the rapid advancement of technology, especially AI, of course, there are challenges and opportunities including:

- 1) Infrastructure and human resources readiness

One of the major challenges in implementing AI is infrastructure readiness and training for teachers and educators. The importance of training Hindu religion teachers so that they can utilize AI properly in the learning process. This is also explained on the website of the Ministry of Religion of Bangli Regency KKG (Teacher Working Group) at the elementary level in Bangli District also held a "Workshop on Utilizing AI and Managing Teacher Performance on the Merdeka Mengajar Platform" which took place at SDN 3 Kawan on July 3, 2024 explaining that the workshop was held to prepare teachers' steps in the digital era to advance education Development of technological skills where a teacher must be able to master the technological skills needed to integrate digital tools and applications in the learning process. The Head of Hindu Religious Education Section, I Komang Mahardika, conveyed some of the benefits of applying digital technology in the world of education, among others:

- a. accessibility of education,

- b. More interactive and engaging learning,
- c. Flexibility of time and place,
- d. Easy collaboration and communication,
- e. Administrative and learning efficiency in networking,

They should learn about advances in technology such as online learning platforms, collaboration tools, digital resources and how to use technology effectively. Designing a technology-based learning a teacher should be able to design an engaging and interactive learning experience by integrating technology in the learning process activities. Such as the use of videos, educational games, multimedia resources, and technology-based projects. Accommodating diverse or different learning styles, technology enables differentiated teaching, which allows teachers to accommodate students' various learning styles and individual needs. Teachers should use a variety of tools and strategies to ensure that each student can learn more effectively.

2) Deep understanding of religion

AI needs to be programmed with a very deep understanding of the nuances, contexts, and diverse interpretations within Hinduism. Errors in programming can result in misleading or even offensive information.

3) Preservation of Core values

In Hinduism, there are many traditional and spiritual values that are not easily conveyed through technology. The presence of AI should complement, not replace, more transformative and experiential teaching processes, such as religious ceremonies or spiritual training outside the classroom. AI should be able to preserve the core values of Hinduism without distorting or simplifying them. The challenge is to ensure that AI not only provides information, but also instills deep spiritual values.

4) Ethics and Morals

The use of AI in a religious context involves complex ethical questions. For example, how to ensure AI does not replace the role of teachers in providing spiritual guidance.

5) Technology Dependency and Accessibility

Over-reliance on artificial intelligence (AI) technology can reduce social interaction and a student's ability to think critically. And all students will not have equal access to technological advances. This can create gaps in learning, especially in the implementation of Hindu religious education teachings in students.

While AI has challenges in its application, it also has opportunities, which are useful in improving access to education. On the other hand, AI can be a very powerful tool.

effective to address the inequality of access to education in remote areas. With AI, Hindu education can be reached by more people without being limited by physical location. This opens up opportunities for the widespread dissemination of Hindu knowledge, even beyond the limited Hindu community. One example is as follows:

- a. **Personalized Learning:** AI can customize learning materials to each student's needs and interests, making learning more effective and engaging.
- b. **Access to Extensive Resources:** AI can provide access to a wide range of learning resources, such as sacred texts, videos, and simulations, which can help students understand Hindu religious concepts more comprehensively.
- c. **Strengthening 21st Century Skills:** AI can help students develop 21st century skills such as critical thinking, problem solving, and creativity through challenging and interactive tasks.
- d. **Improved Learning Motivation:** By providing positive and personalized feedback, AI can increase students' learning motivation and make the learning process more enjoyable.
- e. **Focus on Spiritual Values:** AI can help students understand deep spiritual values, such as *dharma*, *karma*, and *moksha*, in a more relevant and engaging way.

A technology is certainly expected to help the existence of what he wants to do, but what happens if the benefits of technology such as AI are used excessively, of course everything that is excessive is not good for its users, of course this has an impact on the emergence of obstacles / challenges in its application so that it requires a strategy to overcome challenges and take advantage of opportunities. What is meant is:

- a. **Collaboration with religious experts:** Involve religious experts in the development and oversight of AI systems to ensure accuracy and relevance of content.
- b. **Focus on human-centered learning:** AI should be used as a tool, not a substitute for teachers. Human interaction is still important to build deep relationships and foster spiritual values.
- c. **Prioritize ethics:** AI development should be based on strong ethical principles to ensure that these technologies are used responsibly.
- d. **Improve accessibility:** efforts need to be made to ensure that all students have equal access to technology and learning resources.

Thus, integrating AI in Hindu religious education has enormous potential to improve the quality of learning and student understanding. However, it also requires careful planning and a cautious approach. By overcoming challenges and capitalizing on opportunities, AI can be a valuable tool in preserving and developing Hindu values. As an example of depicting the use of AI in terms of benefits, impacts to challenges and opportunities obtained in the world of children's cartoons, we can see in the Japanese cartoon, Doraemon, where one of the episodes illustrates how humans are controlled by robots, which are actually the result of technological creations made by humans themselves that are used to alleviate their problems.

daily human activities. But what happens if what we make, will turn against us. That might happen, given the rapid development of the times.

Technology will also develop more sophisticated, if we cannot use the benefits wisely it will be like a double-edged knife, where it will be able to turn around to deceive humans themselves. This can be seen in one episode of the Doraemon cartoon how the depiction of the rapid development of technology, the world is all fast-paced, sophisticated and modern. Humans become lazy to use their abilities starting from walking always using vehicles rather than , this has begun to be felt from now on. And the existence of robots will later replace the role of humans themselves from the education sector, daily life and the defense of a country. Of course, we have begun to feel anxiety about this in the current era, many robots have sprung up for restaurant waiters in Japan, drink / game vending machines, queuing machines in hospitals / other service media. Then comes the latest replacement robot for the world of education, its role is the same as a teacher teaching in school. Then what happens if it will be controlled by technology, human existence will be displaced little by little without realizing it. Because in the Doraemon cartoon, it is depicted how the robot controls the world, humans are made slave laborers for it, even though it was actually humans who created it. The fear and unrest that we imagine could happen if we are not wise in using these technological advances.

We can also see robots that are made that strike back at humans, because the system that has been designed before the implementation of errors in the field. One example is an administrative robot in Korea forced to work for 24 hours, in fact it was made to replace the role of human existence that is unable to work fully. Because humans have a limit in working 8 hours a day, more than that will certainly experience a decrease in energy and the brain as an information system in the body. If this is violated, it will reduce the quality of one's health. Technological advances are expected to help ease daily work, so what happens if the technology is not used wisely. Like the example earlier, the robot in Korea experienced an error system because it was too compressed to use it, when it wanted to fix it, it attacked humans back then what would be done. Forced the human to eliminate the existence of the robot, so that the human is safe not to be hurt by the robot. This will not happen, if the human can use it wisely. Make a *shift* first, when humans are productive hours to work, take advantage of human labor and when humans are tired of working, then use technological media such as robots as a substitute.

Because in fact the technology system is similar to the human body system, all have their own limits. It is the same with AI such as *Canva*, *ChatGPT*, *Gemini* on Google, *Google Map*, *Quizizz*, *Word Wall* in the world of education. Technological sophistication cannot replace the role of teachers or lecturers as the main role in guiding their students, so *Artificial Intelligences* (AI) technology can be a second role as a recommended media and tool in improving quality learning. A good and ethical understanding of the potential, implications and limitations of the use of AI-based technology must be improved, so that the ability to utilize and prepare for the challenges in the era of technology

digital can be done optimally. Based on the research results in the literature study, the research that has gone through analysis and discussion found and adopted the activities of the digital process with three stages, where in this process, there are three important activities, namely the digital process of digitalization, through digitalization to transformation on the use of digital *tools* as a positive response to learning activities.

Conclusion

The use of artificial intelligence (AI) in education has a very broad positive impact, ranging from personalization of learning, adaptive teaching, to data analysis for informed decision making. Virtual assistants (AI) also make a significant contribution in supporting teachers/educators, especially learning about *religion*. Speaking of usefulness in education, of course AI also has benefits for learning Hindu religious education. Such as the use of *Quizizz*, *WordWall*, *ChatGPT*, *Gemini* on Google etc. All of them we can utilize in the process of learning Hinduism, so that it seems interesting and fun when used. For example, *Quizizz* and *Wordwall* use like a quiz game whose questions we can change to Hinduism material questions, while the application of *Gemini* on Google can be used to find examples of questions, materials and compile curriculum and modules / administration of Hinduism learning. Keep in mind that technology does not only have a positive impact, of course the opposite is a negative impact. It will be like a double-edged knife, whose usefulness is not used wisely.

Similarly, its application in learning Hindu religious education, when an educator is too fixated on artificial intelligence (AI) from technology, it often causes laziness to explore other interesting ideas implementing Hindu religious education learning. This causes the potential it has to be less honed to the fullest. Because it always relies on the usefulness of the AI. Indeed, as an educator in implementing Hindu religious education learning must be carried out with a combination of classical and modern systems. So that the combination makes an individual capable and technologically literate, without reducing his ability or potential. But utilizing technological advances as an auxiliary medium alone does not make it the main everything. This research is likely to end with a conclusion that asserts that while AI offers much potential for enriching the learning experience of Hindu religious education, its use must be done judiciously and with proper control. AI should be a tool that enriches learning, not replace the more spiritual and interactive learning process.

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