



Human Enhancement and the Ethical Limits of Creation from an Islamic Perspective

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ABSTRACT

The development of human enhancement technologies such as genetic engineering, artificial intelligence, and biological modification has brought about major changes in modern human life. This technology is not only used for medical purposes but also to enhance human physical and cognitive abilities. This phenomenon raises ethical issues regarding the limits of human intervention in God's creation and changes in human nature. This study aims to analyse human enhancement and the ethical limits of human creation from an Islamic perspective through a study of Qur'anic interpretation. This study uses a qualitative approach with a library research type based on thematic interpretation studies (tafsīr maudhū'ī). Primary data comes from the Qur'an and classical and contemporary commentaries, while secondary data is obtained from scientific journals and Islamic bioethics literature. Data collection techniques were carried out through documentation and literature studies, then analyzed using content analysis with a maqāṣid al-syarī'ah approach. The results of the study show that Islam does not reject technological developments as long as they are aimed at human welfare, such as treating diseases and improving the quality of life. However, Islam imposes limitations on human enhancement practices that can change the nature of human creation, damage human dignity, or cause social injustice. The principles of hiḥfẓ al-naḥf, hiḥfẓ al-'aql, and hiḥfẓ al-naḥf serve as the primary basis for determining the ethical boundaries of technology use. This study concludes that Islam positions technology as a means of public welfare that must be governed by moral values and humanitarian principles.

Keywords: Human enhancement, Islamic ethics, thematic interpretation, maqāṣid al-syarī'ah, Islamic bioethics.

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INTRODUCTION

The development of science and technology in the modern era has brought humanity into a new phase in the history of civilization ([Tegegn, 2024](#)). Advances in biotechnology, artificial intelligence (*artificial intelligence*), genetic engineering, *brain enhancement*, until the biological modification of humans gave birth to the concept human *enhancement*, namely efforts to enhance human physical, mental, and biological abilities through technological intervention ([Dara et al., 2024](#)). This phenomenon is rapidly developing in the fields of health, military, education, and even the digital industry. Technologies such as *genetic editing* Using CRISPR, neural implants, and human-machine integration are part of a modern transformation that is no longer just about improving the condition of the human body, but is starting to be directed at “enhancing” human capabilities beyond their normal limits ([Andreoni et al., 2021](#)).

On the one hand, these developments offer significant benefits to human life, particularly in the medical field, such as treating genetic diseases, neurorehabilitation, and restoring bodily functions. However, on the other hand, human enhancement raises complex ethical issues, particularly regarding the limits of human intervention in God's creation ([Dobrzański et al., 2021](#)). Debates arise when technology is no longer used for medical purposes, but rather to alter human biological structures to achieve superior abilities compared to normal humans. This situation raises fundamental questions about the limits of human ability to change oneself and how Islam views changes to the natural order of human creation ([Gostimskaya, 2022](#)).

Islam, as a comprehensive religion, places great emphasis on preserving human dignity and nature. The Quran explains that humans were created by God in the best and most perfect form. This is clarified in the words of Allah SWT:

لَقَدْ خَلَقْنَا الْإِنْسَانَ فِي أَحْسَنِ تَقْوِيمٍ

“Indeed, We have created man in the best of forms.” (QS. At-Tin: 4)

This verse demonstrates that human creation possesses a perfection and balance predetermined by Allah SWT. Therefore, any changes to human creation must take into account moral, spiritual, and humanitarian aspects. Furthermore, the Quran also prohibits following Satan's temptation to deviantly alter God's creation:

وَلَا مَرَهُمْ فَلْيَغْيِرَنَّ خَلْقَ اللَّهِ

“And I will surely command them to change the creation of Allah.” (QS. An-Nisa’: 119)

This verse is often used as a basis for discussions on the ethics of human biological change in Islam. Commentators explain that changes in God's creation that lead to corruption, arrogance, and deviation from human nature are prohibited ([Hansen,](#)

[2020](#)). However, Islam does not reject science and technology as long as they are aimed at the public good and do not violate sharia principles.

From an Islamic perspective, the development of knowledge is part of a religious mandate. Allah SWT says:

وَقُلْ رَبِّ زِدْنِي عِلْمًا

"And say: My Lord, increase me in knowledge."(QS. Thaha: 114)

This verse shows that Islam encourages humanity to continuously develop knowledge. Therefore, human enhancement technology cannot be rejected outright, but rather needs to be examined based on its purpose, benefits, and impact on humanity ([Kudlek, 2022](#)). In this context, the maqāṣid al-syarī'ah (observance of the principles of sharia) serves as an important foundation for determining the ethical boundaries of the use of modern technology. The principle of preserving the soul (*hifẓ al-nafs*), keeping your mind (*hifẓ al-'aql*), and taking care of the offspring (*hifẓ al-nasl*) is the main parameter in assessing human enhancement practices ([Humaira et al., 2025](#)).

In addition to the Quran, the hadith of the Prophet Muhammad SAW also emphasizes the importance of maintaining balance and avoiding excessive actions on the human body. The Prophet SAW said:

إِنَّ الْجَسَدَ عَلَيْكَ حَقًّا

"Indeed, your body has a right over you."(HR. Bukhari)

This hadith demonstrates that the human body must be cared for and treated with proportion, not overly exploited for the sake of specific ambitions. Thus, Islam views humans as noble creatures endowed with dignity and not to be subjected to experiments without clear ethical boundaries.

Much research on human enhancement has been conducted from the perspectives of bioethics and the philosophy of technology, but studies linking it specifically to Quranic interpretation are still relatively limited. The first study, conducted by [Mendz & Cook \(2021\)](#), discussed the concept of transhumanism and the enhancement of human capabilities through technology. This study emphasized that enhancement technology can be a means of modern human evolution, but lacked discussion of the spiritual dimension and moral boundaries of religion. The second study, conducted by [Afshari et al., \(2025\)](#), examined the interpretation of human nature and the prohibition on changing God's creation. This study emphasized the importance of maintaining a balance between scientific development and human values, but did not specifically address modern enhancement technology. The third study, conducted by

[Kudlek, \(2022\)](#), examined Islamic bioethics in genetic engineering. The results showed that Islam permits medical intervention for treatment but prohibits modification that leads to the exploitation of human biology.

Based on previous research, there is a research gap in the form of the lack of thematic interpretation studies that specifically discuss human enhancement and the ethical limitations of human creation in an Islamic perspective with a *maqāṣid al-syarī'ah* approach. Therefore, it is important to conduct this research to provide a comprehensive understanding of how the Qur'an views the development of human enhancement technology and the ethical limits that must be maintained in its use. This research aims to analyze the concept of human enhancement and the ethical limitations of human creation based on the study of the interpretation of the Qur'an so that it can be an academic contribution to the development of contemporary Islamic bioethics.

METHODS

This study uses a qualitative approach with a library research type based on thematic interpretation studies (*tafsir maudhū'i*) to analyze the concept of human enhancement and the ethical boundaries of human creation from an Islamic perspective ([Rufaida, 2025](#); [Sari, 2025](#); [Rahman et al., 2025](#)). This approach was chosen because the study focuses on the interpretation of the verses of the Qur'an related to human creation, changes in God's creation, the preservation of the soul, mind, and offspring, and their relevance to the development of modern technology such as genetic engineering, artificial intelligence, and human biological modification. The primary data sources in this study are the Qur'an and classical and contemporary commentaries, such as *Tafsir al-Ṭabari*, *Tafsir Ibn Kathir*, *Tafsir al-Qurṭubi*, and M. Quraish Shihab through *Tafsir al-Misbah*, while secondary data sources are obtained from scientific journals, Islamic bioethics books, academic articles, and previous research results that discuss human enhancement, bioethics, transhumanism, and *maqāṣid al-syarī'ah*. Data collection techniques were carried out through documentation studies and systematic literature searches by identifying relevant references based on the research theme. The data were then analyzed using the content analysis method through several stages, namely collecting verses related to the theme, classification based on the ethical aspects of human creation, interpreting the meaning of verses using the *tafsir* approach, and normative analysis based on the principles of *maqāṣid al-syarī'ah*, specifically *hiḏ al-nafs*, *hiḏ al-'aql*, and *hiḏ al-nasl*. Data validity was strengthened through source triangulation by comparing the views of classical and contemporary commentators and linking them with modern bioethics studies to obtain a comprehensive, objective, and relevant understanding of the development of human enhancement technology in the modern era.

RESULT AND DISCUSSION

The Concept of Human Enhancement in the Development of Modern Technology

Human enhancement is the concept of increasing human capabilities through technological intervention aimed at improving or enhancing human biological,

physical, mental, and intellectual functions. Modern technological developments have given rise to various forms of enhancement, such as genetic engineering (*genetic engineering*), artificial intelligence (*artificial intelligence*), neural implants (*neural implant*), biological modification, gene therapy, to human-machine integration (*cyborg technology*). Initially, this technology was developed for medical purposes, such as treating genetic diseases, neurorehabilitation, and organ replacement ([Wang et al., 2023](#); [Mahato, 2025](#)). However, as it evolved, enhancement technology began to be used to enhance human abilities beyond normal limits, such as improving memory, physical strength, and artificial intelligence.

From an Islamic perspective, the development of science and technology is essentially part of the divine law and can be utilized for the benefit of humanity. Islam does not reject technological progress as long as it does not conflict with sharia principles and human values. This is in accordance with the words of Allah SWT:

هُوَ الَّذِي خَلَقَ لَكُمْ مَا فِي الْأَرْضِ جَمِيعًا

"He is Allah who created for you all that is on earth." (QS. Al-Baqarah: 29)

This verse indicates that humans are entrusted with utilizing knowledge and natural resources for the benefit of life. Therefore, the use of modern technology in health and medicine is fundamentally permissible in Islam as long as it provides benefits and does not cause greater harm ([Yanni, 2025](#)). This principle aligns with the principles of Islamic jurisprudence:

الْأَصْلُ فِي الْأَشْيَاءِ الْإِبَاحَةُ

"The original law is that everything is permissible."

This principle explains that technology is essentially permissible as long as there is no evidence to prohibit it. Therefore, human enhancement technology aimed at treating illness, rehabilitating the body, and saving lives can be categorized as permissible.

Islamic Perspective on Human Creation

Islam views humans as noble creatures created by Allah SWT in the best form and endowed with dignity that must be upheld. The Quran affirms:

لَقَدْ خَلَقْنَا الْإِنْسَانَ فِي أَحْسَنِ تَقْوِيمٍ

"Indeed, We have created man in the best of forms." (QS. At-Tin: 4)

The verse explains that humans were created with a perfect balance of physical, intellectual, and spiritual qualities. This concept forms an important basis for discussions of human enhancement, as any changes to the human body must consider their purpose and impact on the natural order of human creation. In his commentary, M. Quraish Shihab explains that human perfection lies not only in physical form but also in the moral and spiritual balance that distinguishes humans from other creatures.

Islam also strictly forbids any change to God's creation that could lead to deviation and destruction. This is explained in the words of Allah SWT:

وَلَا تُرْمِمْ فَلْيُغَيِّرَنَّ خَلْقَ اللَّهِ

"And I will surely command them to change the creation of Allah." (QS. An-Nisa': 119)

In classical interpretations such as *Tafsir Ibn Kathir* and *Tafsir al-Qurtubi* This verse is explained as prohibiting changes that destroy human nature and are aimed at pursuing lust or arrogance ([Sakka, 2025](#)). Therefore, enhancement practices that merely aim to fulfill human ambitions for superiority without urgent need are considered contrary to Islamic principles.

However, scholars distinguish between changes that are therapeutic in nature (*al-'ilāji*) and changes that aim to excessively alter nature. Changes aimed at eliminating disease or improving bodily functions are permitted, while changes that are manipulative and exceed human limits are considered forbidden ([Anwar et al., 2023](#)). This is in accordance with the hadith of the Prophet Muhammad (peace be upon him):

تَدَاوُوا فَإِنَّ اللَّهَ لَمْ يَضَعْ دَاءً إِلَّا وَضَعَ لَهُ دَوَاءً

"Seek medical treatment, for Allah does not send down a disease except that He also sends down its cure." (H.R Abu Dawud)

This hadith demonstrates that Islam encourages the development of medical science to maintain human health. Therefore, therapeutic enhancement technologies are acceptable in Islam as long as they do not violate sharia principles.

Analysis of Human Enhancement Based on Maqāṣid al-Syarī'ah

In the study of Islamic law, maqāṣid al-sharī'ah is an important foundation in determining the feasibility of a technology. The main purpose of the sharia is to safeguard religion (*hifẓ al-dīn*), soul (*hifẓ al-nafs*), reason (*hifẓ al-'aql*), descendants (*hifẓ al-nasl*), and property (*hifẓ al-māl*). The concept of human enhancement must be analyzed based on these five principles so that it does not conflict with the objectives of sharia ([Setiawan & Fikri, 2024](#)).

1. Hifz al-Nafs (Guarding the Soul)

Enhancement technology used to save human lives and health can be categorized as a form of soul care. Examples are the use of neural technology to help paralyzed patients, gene therapy for hereditary diseases, and artificial organs to maintain human life ([Timmermans & Kaufman, 2020](#)). This is in accordance with the words of Allah SWT

وَمَنْ أَحْيَاهَا فَكَأَنَّمَا أَحْيَا النَّاسَ جَمِيعًا

"Whoever saves the life of one human being, it is as if he has saved the lives of all mankind." (QS. Al-Ma'idah: 32)

This verse demonstrates that preserving human life is the primary goal of Islamic law. Therefore, the use of technology for treatment and saving lives is permitted and even encouraged.

2. Hifz al-'Aql (Guarding the Mind)

The development of technology to enhance brain function and thinking ability is acceptable as long as it does not damage human reason. However, if technology is used to control thoughts, manipulate consciousness, or create biological dependency, it contradicts the principle of preserving reason ([Korte, 2020](#)). Islam places great importance on the purity of human reason because it is the basis of human moral responsibility.

3. Hifz al-Nasl (Preserving Lineage)

Genetic engineering, which alters the human heredity, is one of the most controversial issues in human enhancement. Islam permits gene therapy to treat hereditary diseases, but prohibits genetic manipulation aimed at creating "superior humans" based on specific interests ([Pollen et al., 2023](#)). Such practices have the potential to disrupt social balance and open up opportunities for biological discrimination. In Islam, offspring must be protected from harm and exploitation that could diminish their human value.

The Ethical Limits of Human Enhancement in Islam

The research results show that Islam provides several ethical limitations in the use of human enhancement technology, namely:

First, do not change human nature excessively.

Islam permits treatment and the improvement of bodily functions, but prohibits changes that diminish human identity. Enhancement aimed at making humans

absolutely "superior" is seen as contradicting the Islamic concept of humility and balance in life.

Second, it does not cause harm.

The rules of Islamic jurisprudence explain:

لَا ضَرَرَ وَلَا ضِرَارَ

"You must not cause danger to yourself or others."

Enhancement technology must not cause physical, psychological, or social harm. If the risks of harm outweigh the benefits, the practice is prohibited in Islam.

Third, maintaining human dignity

Islam places humans as noble creatures. Allah SWT says:

وَلَقَدْ كَرَّمْنَا بَنِي آدَمَ

"And indeed We have honored the children of Adam." (QS. Al-Isra': 70)

This verse is the basis that humans should not be made objects of biological exploitation for economic, political or scientific experimental interests without clear ethics.

Fourth, oriented towards the public interest

The primary principle of Islam is to bring benefit and prevent harm. Therefore, enhancement technology is only acceptable if its benefits outweigh its harms and it does not conflict with sharia principles.

The Relevance of Human Enhancement to Modern Life

The development of human enhancement demonstrates that modern humans face a significant challenge in maintaining a balance between technological progress and moral values. Technology uncontrolled by ethics can lead to dehumanization, social inequality, and the loss of human identity. In this context, Islam exists as a value system that provides moral guidance to ensure technological development remains within the bounds of humanity and divinity.

Exegetical studies of Quranic verses demonstrate that Islam maintains a moderate stance toward technological development. Islam does not reject innovation, but places morality as the primary foundation for its use. Therefore, human enhancement is acceptable in Islam if it is used for the benefit, treatment, and improvement of human quality of life without exceeding the natural limits of human creation as established by Allah SWT.

CONCLUSION

Based on the research results, it can be concluded that Islam views technological developments *human enhancement* as part of scientific advancement, which is essentially permissible as long as it is aimed at human welfare and does not conflict with sharia principles. Exegesis of the verses of the Qur'an shows that humans were created by Allah SWT in the best form, so that any form of intervention on the human body must consider moral, spiritual, and humanitarian aspects. Technologies such as genetic engineering, gene therapy, artificial intelligence, and biological modification are acceptable if used for treatment, health rehabilitation, and maintaining the quality of human life as a form of implementing the principle of *hifz al-nafs*, *hifz al-'aql*, And *hifz al-nasl* within the *maqāṣid al-syarī'ah*. However, Islam places strict ethical boundaries on enhancement practices that aim to excessively alter human nature, create biological superiority, undermine human dignity, or lead to social injustice and biological exploitation. Thus, this study confirms that Islam does not reject technological innovation, but places moral values, balance, spiritual responsibility, and protection of human dignity as the primary foundations for addressing the development of human enhancement in the modern era.

AUTHOR CONTRIBUTION

H: Supervision, providing feedback, editing. **J,E:** Data curation, Conceptualization, validation, observations, **A, A, B:** writing-reviewing, and investigation

CONFLICT OF INTEREST

The authors declare that this research was conducted without any conflict of interest in the research.

DECLARATION OF USE OF AI IN SCIENTIFIC WRITING

The author(s) used [**Chatgpt**] during the preparation of this work to [**Grammatical Corrections**]. After utilizing the tool/service, the author(s) thoroughly reviewed and edited the content as necessary and assumed full responsibility for the publication's content.

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