



DOI: <https://doi.org/10.57125/FP.2024.06.30.02>

How to cite: Kelikli, M. (2024). Revisiting Aristotle's Master-Slave Relationship: A Casual Evaluation in the Context of Human-AI Dynamics. *Futurity Philosophy*, 3(2), 25-39. <https://doi.org/10.57125/FP.2024.06.30.02>

Revisiting Aristotle's Master-Slave Relationship: A Casual Evaluation in the Context of Human-AI Dynamics

Murat Kelikli

*Associate Professor, Department of Philosophy, Afyon Kocatepe University, Turkey,
<https://orcid.org/0000-0002-3358-6859>*

***Corresponding author:** *kelikli@gmail.com*.

Received: December 14, 2023 | **Accepted:** April 11, 2024 | **Available online:** May 2, 2024

Abstract: This paper sought to explore Aristotle's handling of the notion of natural slavery and its relevance in ongoing discussions concerning the ethics of artificial intelligence. Using an extensive literature review covering his discussions on slavery in the *Politics* and the *Nicomachean Ethics*, this study delved into the philosophical underpinnings of slavery within Aristotle's political theory and examines its ramifications within the domain of ethical technology. Consequently, while Aristotle's theory of natural slavery suggests that certain individuals are predisposed to service due to deficiencies in rational capacity, this concept was analysed in the context of modern AI technology, raising ethical concerns about autonomy, control and social hierarchy in human AI interactions. By relating Aristotle's philosophical framework to contemporary AI ethics, this study offered an understanding of the ethical implications of advancing technology and encouraged interdisciplinary dialogue between philosophy, ethics and AI research.

Keywords: Aristotle, natural slavery, artificial intelligence, societal hierarchy, ethical implications.

Introduction

From the outset of *Politics*, Aristotle endeavors to demonstrate that the formation of the state arises as a natural progression. Accordingly, in *Politics* I.1, he defines the partnership established by men, women and slaves as a family. This partnership is within the framework of meeting daily needs. The family generates multiple households by establishing new familial units from within its own structure. but when these houses come together with a new partnership to fulfil needs beyond daily needs, a village is formed. In the end, the final partnership formed by several villages coming together is the site or the state. This development is natural and within this natural structure the state takes precedence over the individual and the family. Slavery is also considered natural as it is part of a natural process. Ambler states that the establishment of the state occurs naturally, and slavery emerges as a part of this natural process in the establishment of the state (Ambler, 1987, p. 392). Thus, Aristotle gives the definition of natural slave as follows:

(1254b16-21) Therefore all men that differ as widely as the soul does from the body and the human being from the lower animal (and this is the condition of those whose function is the use of the body and from whom this is the best that is forthcoming) these are by nature slaves, for whom to be governed by this kind of authority is advantageous, inasmuch as it is advantageous to the subject things already mentioned.¹

Aristotle responds to the question of "whom?" that can be asked here by saying that barbarians should naturally be slaves:

(1258b8) 'This meet that Greeks should rule barbarians.

He states that this natural process is wrong for women and slaves in the societies of barbarians to assume the same social role, and that this is because none of the segments in their societies are suitable for ruling. This deficiency distances them from what is natural and they naturally become societies consisting of only male and female slaves. In other words, it is perceived as a natural outcome for an individual to become enslaved when they fail to fulfill their obligations, much like it is natural for a student expected to pass an exam to fail when they provide incorrect answers. For this reason, he finds the aphorism "it is appropriate for the Greeks to rule the barbarians" correct (Aristoteles, 1831, 1252b10). It is noteworthy that Aristotle himself was not a Greek; in Athens, Aristotle was a migrant (μέτοικος) (Liddell & Scot, 1996, p. 1121). For this reason, the society that Aristotle recognises as Greek is Greek-speaking. The Greeks called non-Greeks who did not speak Greek, that is, non-Greeks, "barbarians (βάρβαρος)" because they did not understand the language of non-Greeks and sounded like blah-blah (Baracchi, 2014, p. 292). In addition, the fact that non-Greeks and non-citizens are slaves prevents them from uniting and rebelling (Aristoteles 1831, 1329a35-1330b30). Aristotle's assessment here is based entirely on a logical deduction. According to this, barbarians lack reasoning due to the fact that barbarians do not know the function of women, therefore those who lack reason will have to be slaves, and Greeks who can use reason are obliged to rule the barbarians.

¹ All quotations are from translations by H. Rackham.

Aristotle focuses on understanding how human communities and social structures are formed and why some individuals are better suited to serve others. This perspective can help the understand of similar problems that humanity has experienced throughout history when addressing the ethical issues of artificial intelligence. In Aristotle's opinion, some people may be better suited to serve others, and this is part of a natural order. However, this view is considered unacceptable in modern societies because people are thought to have equal rights and everyone's free will and human dignity should be respected. This perspective is important for AI ethics because the potential impacts of AI systems on humans must be evaluated in terms of justice and equality. Aristotle's concept of natural servitude holds that some people are created to serve others. However, contemporary reverence for human rights and freedoms repudiates such a perspective. How artificial intelligence systems will respect people's rights and freedoms should be addressed as an ethical issue. Aristotle's views can contribute to discussions about protecting human dignity and freedom in the field of AI ethics. Aristotle's thought can contribute to the justification of social and economic inequalities by claiming that some people are created to serve others. In modern societies, it is important that such inequalities are reduced and that everyone has equal opportunities. The utilisation of artificial intelligence systems can either diminish or exacerbate these inequalities, underscoring the significance of designing these systems with fairness and equality in mind. Thus, Aristotle's understanding of natural slavery can provide a framework for addressing fundamental issues such as human rights, justice, and equality in the field of AI ethics. This perspective can guide ethical decision-making in the design and implementation of AI systems and shape humanity's future relationship with AI in a more equitable and respectful way. Aristotle's understanding of slavery is an important and useful structure when trying to establish a relationship and parallelism with AI, in terms of its spontaneous emergence and a completely controlled society.

Today, it is impossible talking about these groups or the factors that brought them into existence. It is possible only take these views as a causal process and adapt them by trying to understand why Aristotle made the distinction between slaves and natural slaves and by uncovering the causes of slavery. When following these reasons, it is surprising that they can be adapted for AI. Nevertheless, the views on AI are often quite optimistic. They predict that in the future, AI will increase the effectiveness of people and improve the quality of life and will ennoble humanity (Brynjolfsson & McAfee, 2016; Buchanan, 2019; Ford, 2015; Harari, 2018; Pinker, 2018; Russell & Norvig, 2021). Some commentators paint a pessimistic picture. Accordingly, humanity will lose its will and begin to be enslaved (Bostrom, 2014; Bostrom & Yudkowsky, 2014; Joy, 2000; Musk, 2018; Tegmark, 2018). This situation is the result of the fact that slavery, which is as old as human history, is still continuing (Han et al., 2022; Kara, 2017; Lamas, 2023; Mwemezi, 2023) and the concern that slavery will continue in the future. Nevertheless, it can be stated that these predictions are made for the future of AI and not about what the relationship between human and AI will be. More precisely, how human and AI will determine their status relative to each other in the future.

In the literature review, an attempt was made to reveal Aristotle's understanding of natural slavery. Firstly, Aristotle's views on slavery and his definitions of actual and natural slaves were analysed. The structure of these definitions of slavery were analysed and the question how slavery emerged was discussed. Thus, it was defined what slavery caused by

causes is. Secondly, it was discussed whether these causes belonged to a natural process and whether they will disappear. Thus, the emergence and disappearance of the causes of slavery were defined. Thirdly, the distinction between natural and actual slavery in terms of their causes were discussed. Aristotle opposition of actual slavery and the process towards natural slavery was explained. Thus, the causes of slavery emergence were understood.

In the conclusion section, the views of Aristotle in AI and human interaction were evaluated and the questions to answer in this paper were answered.

Research Problem

The fact that slavery is no longer active today has been a forgotten and neglected issue. Nevertheless, the existence of people or objects that can be defined as slaves can be analysed. Analysing this inquiry through the lens of Aristotle's conception of slavery and its origins will indeed provide a novel perspective.

As AI begins to enter people's lives more and more, it is inevitable and urgent that ethical problems related to AI are discussed by philosophy. To the extent that philosophy makes an introduction to these problems, it is also important to address the problems in terms of Aristotle in order to make evaluations until today.

Research Focus

The aim was not to delve into the concept of slavery itself, but rather to scrutinise the condition of the slave. In this research, the primary focus was on questioning the factors contributing to the existence of slaves, rather than the institution of slavery. Through this approach, it was intended to elucidate the intricate relationship between AI and humanity, offering a more objective examination of the dynamics between master and slave.

Research Aim and Research Questions

The primary objective of this article was to conduct an assessment of contemporary and future perspectives by examining slavery through Aristotle's framework of four causes, particularly in the context of advancing AI technology. The investigation sought to answer to the following inquiries:

1. What are the underlying causes of slavery according to Aristotle?
2. Can a slave be emancipated according to Aristotle's perspective?
3. Considering the rapid advancement of AI in present times and the optimistic projections for the future, how will the dynamics between humans and AI evolve?
4. While the discourse on the future relationship between humans and AI has been extensively explored in scientific studies, cinematic narratives, and literature, how can philosophical insights contribute to addressing this issue?
5. Does the future interaction between humans and AI portend a positive or negative trajectory?

This research endeavoured to discern the ideal trajectory for AI development by examining Aristotle's insights, aiming to delineate what AI ought not to become.

Literature Review

Human is a political animal by nature. But not in the same way as any herd animal. The difference between human beings and other animals is that human beings have rational thinking faculties that can distinguish between good and evil, right and wrong, just and unjust. Accordingly, Aristotle gives his definition of the natural slave. He says that the natural slave lacks thinking and foresight (Aristoteles 1831, 1260a12, 3.1280a33-34, 1252a31-34, 1254b20-23), but he does not deny that he has emotions (Fortenbaugh, 2006, p. 242). Nevertheless, he did not consider that the slave was completely incapable of thinking. The slave is expected to behave moderately, but is not expected to be virtuous, they are denied the ability to reason, but they are allowed to perceive the existence of reasoning (Aristoteles 1831, 1254b22-23). At other times, the natural slave is defined by his ability to perform physical labour (Aristoteles 1831, 1252a32-34, 1254b17-19, 25-26, 1258b38, 1259b25-26). While the virtues of the slave are being obedient, being governed and diligence, the virtues of the master should be in subjects such as management and economics. However, the slave and master should also have common virtues. The slave is only afforded the capacity to utilize his body, with no further expectations placed upon him. Because he has lack of ability to use his mind. Slaves and domestic animals obey and aim to serve with their physical strength. Thus, it can be stated that their final causes are to serve. The distinction ($\delta\iota\alpha\phi\omega\rho\acute{\alpha}$) between slaves and animals is that they have some reason. Therefore, reasoning is present in the slave as potential. Nature has designed some people to have strong bodies and weak intellect (Aristoteles 1831, 1254b31-1255a1). Thus, it can be said that the efficient cause is to do physical labour.

In Nicomachean Ethics VIII 10-11, Aristotle mentions six forms of government, three good and three bad. Accordingly, good governments are monarchy, aristocracy, constitutional government, and bad governments are tyranny, oligarchy and democracy. While the best of the good governments is monarchy, the worst of the bad governments is tyranny (Aristoteles 1831, 1160a31-b17). Aristotle says that it is because the king in monarchy looks after the interests of his subjects, while in tyranny he looks after his own interests (Aristoteles 1831, 1160b2-3). Aristotle claims that the relationship between father and sons constitutes a monarchy, the relationship between husband and wife constitutes an aristocracy, the relationship between siblings is constitutional government, and the relationship between slave and master is tyranny (Aristoteles 1831, 1160b22-1161a9). According to Aristotle, ruling and being ruled are not only necessary, but also beneficial. Accordingly, some naturally exist to rule and some to be ruled (Aristoteles 1831, 1254a21-33). However, in tyranny, there is no partnership and justice between the tyrant and his subjects (Aristoteles 1831, 1161a30-34).

In this context, Aristotle seems to defend tyranny on an individual basis and a view emerges that he defends tyranny as just. Ross attempts to elucidate this scenario by positing that a differentiation should be drawn between individuals naturally inclined towards freedom and those predisposed to servitude. Consequently, he contends that two types of tyranny must exist. Tyranny should be unjust for natural free persons and just for natural slaves. Nevertheless, Ross states that one cannot speak of a just tyranny, and this is inconsistency

(Ross, 2008, pp. 57–59). Ross argues that the inconsistency in the Nicomachean Ethics can be eliminated by understanding it as friendship, justice and the determination of justice according to behaviour (Ross, 2008, p. 66). According to Ross, even if we cannot say that the slave is treated fairly or unfairly, he argues that we should be able to say that the slave is treated fairly or unfairly. This means that although Aristotle does not explicitly condemn slavery as an injustice, he recognises that the treatment of slaves can be just or unjust. Despotism cannot be said to be just, although they can be beneficial to all. In this case, Ambler asks the question “In a scenario where everyone benefits, it becomes challenging to conceive that an injustice is being perpetrated” (Ambler, 1987, p. 397)”.

Smith criticises Aristotle for defending the institution of slavery, which he defines as a relationship of tyranny, as an ideal political community in which citizens are free and equal, while at the same time defending the institution of slavery, which seems to contradict this ideal (Smith, 1983, p. 121). Smith also notes that Aristotle's theory of natural slavery was criticised for being based on arbitrary and unjust distinctions between different groups of people (Smith, 1983, p. 113). The state cannot be made up of people who are all the same; the more different kinds of people, the better. It is the perfect balance between the different parts that will sustain the existence of the state (Aristoteles 1831, 1304b1-8). In this case, Aristotle is expected to explain the perfect balance between master and slave as a form of government. It is the ruler who determines the form of government. In this case, it is seen that it is the master who determines slavery. Thus, the master is the material cause and the relationship between them formal cause.

Aristotle suggests that slavery should be understood as an instrument of action rather than a means of production (Aristoteles 1831, 1253b23-1254a17) . However, he advocates the use of slaves for agriculture, which is a productive enterprise (Aristoteles 1831, 1330a25-26). Smith (1983, p. 110) and Schlaifer (1936, p. 192) see the difference between the nature of the natural slave as "a tool for action" and the purpose of actual slaves as "a tool for production" as a failed narrative. However, Aristotle elucidated this concept succinctly: the tool that tills the soil does not itself generate anything; rather, it undertakes the task of ploughing and facilitates the cultivation of the field. For this reason, this tool is not a tool of production (ποίησις), but a tool of action (πρᾶξις). The slave is considered as a tool that serves the tool of production.

Is Freedom Possible for the Slave?

Aristotle uses emancipation as a reward in slavery (Aristoteles 1831, 1330a32-33), Smith states that if the natural thing for the slave is to be a slave, then emancipation should be a punishment for the slave (Smith, 1983, p. 111). It is impossible to agree with this; if the slave is no longer able to continue slavery, it is detrimental for the slave to persist in a state of enslavement, and the master possesses the virtue to discern this distinction.

Slaves cannot put together logical arguments and cannot give sensible advice to their masters. But they can understand their masters' reasons and decide to follow them. To this extent they can share in reason, so much so that Aristotle is on sound moral as well as psychological ground when he protests against rejecting the reasoned advice of slaves. To offer reasoned explanation is to respect slaves' cognitive capacity and allow them to reason to the

best of their ability (Fortenbaugh, 2006, p. 243). Thus, the slave's capacity to develop should be noted and the reward should be for the slave who develops his capacity and begins to reason.

There are also approaches that ignore Aristotle's view that the slave should be rewarded. Kiran states that Aristotle argues that the understanding of slavery should be related to **the** creation, so that being free or being a slave cannot be realised later (Kiran, 2018, p. 812). It is not possible to agree with this view. If there was no subsequent enslavement and the slave could not be emancipated, it would have to be taken as a species. Moreover, Aristotle's defence of emancipation and his acceptance that there will be people who are freed from slavery do not conform to Kiran's views. In addition, it cannot be said that virtuousness, which is not found in slaves, will never be found. Virtue can develop with education. In that case, the fact that someone is a slave is not the nature of his existence, but the nature of the situation he is in. Nevertheless, it must be recognised that some will never acquire these virtues, but only incidentally. Because the distinction is not to be sought in matter, it cannot be attributed to opposites of a finite kind. In essence, it is logically problematic to assign mastery exclusively to men while presuming that women cannot possess virtue. Because man and woman are opposites, opposites are of matter, and distinction is not sought in matter.

Kiran bases his view that slaves cannot be emancipated on the view that virtue comes from nature and birth. He concludes that there cannot be happiness without virtue, and thus slaves cannot have any share of happiness because they cannot have virtue later on (Kiran, 2018, p. 813). Virtues are not affections, whereas faculties are the capacities to feel affections. For this reason, virtue is not innate, whereas faculties are an innate characteristic (Bayraktaroğlu & Özcan, 2020, p. 288).

The naturalness of slavery has a close relationship with the evaluation of whether slavery is supported or not. Lloyd, who claims that slavery has nothing to do with naturalness, says that Aristotle's structure of natural slavery is constructed in support of actual slavery (Lloyd, 1968, p. 251). However, Newman (1887, p. 151) and Barker (1973, p. vii) emphasise that Aristotle does not establish such an identity between natural and actual slavery and see Aristotle as a reformer for his time. Nussbaum comets Aristotle's understanding of natural slavery as a radical criticism of actual slavery arising from nature (Nussbaum, 1980, p. 420). On the other hand, Ambler says that although Aristotle mentions natural slavery, there is no clear sign that he accepts the actual institutional practice. Accordingly, he argues that he rejected natural slavery as well as actual slavery (Ambler, 1987, p. 393). The author states that Aristotle's explanations are explanations that do not attack slavery in order not to disturb Greek prejudices, yet they are far from arguing that actual slavery is natural.

When Aristotle creates a structure such as natural slavery, he mentions that the natural master dominates and the natural slave serves (Aristoteles 1831, 1252a31-34), but he has no explanation for the actual slave and master (Ambler, 1987, p. 392). This demonstrates that Aristotle is not concerned with opposing actual slavery. Aristotle aims to explain how slavery, which stands as a reality, should be constituted as an institution.

Aristotle states that some people are free by nature, others are slaves, and for the latter slavery is both advantageous and just, yet it is the master who benefits from this relationship (Aristoteles 1831, 1278b32-37). In this case, it is considered that there is an inconsistency

between Aristotle's views in *Politics* and *Nicomachean Ethics*. In the *Nicomachean Ethics*, Aristotle appears to contend that slavery is inherently unjust; however, in *Politics*, he posits the existence of natural slaves who are deemed suitable for servitude. This inconsistency has been recognised by scholars, but there is disagreement about how to reconcile the two views. While some scholars deny that there is any incompatibility between the two views, others argue that Aristotle's discussion of slavery in these two works should not be seen as a whole (Ross, 2008, p. 57).

When the government (controlling organisation) does not determine who are slaves, a social chaos is inevitable and a shift towards actual slavery is inevitable. In addition, it is inevitable that a government that overlooks issues such as keeping the slave trade under control and regulating the behaviour of slaves, who are the main sources of production, will suffer economic disaster. The most striking examples of this can be found in archaic Greece of the 6th and 7th centuries BC. As a result of the inability of small field owners to repay the high-interest loans they had taken from farm owners and merchants to establish vineyards and olive groves, they were deprived of their freedom according to the heavy debt law of the period and sold as slaves to foreign countries by the creditor. Perhaps for this reason, Aristotle describes interest as the most hated and unnatural monetisation (Aristoteles 1831, 1257b10-20). Towards the end of the 6th century BC, this situation caused the peasants to become landless by dispossessing them of their lands and caused Attica to fall into the hands of a few rich people. This, in turn, led to attempts to intervene in the government by the people in the struggle for tyranny. After the unsuccessful attempt by Kiron, the administration had to make political and social reforms. In this regard, Solon was appointed to power with the task of serving as a mediator between the nobility and the common populace. Solon's first job was to regulate the relations between debtor and creditor in order to improve the situation of peasants under debt. He forgave the debts of the debtors, mortgaged lands were returned to their owners, he abolished the pledging of people in return for debt, he bought back those who were sold as slaves to foreign countries because of their debts by paying from the state account and ensured their return to their homeland. Solon also abolished land slavery and distributed land to landless peasants. Until this period, land slavery (εἰλωτες) was a practice seen all over Greece, but now it started to be seen as a necessity of democracy. Sparta, on the other hand, took the opposite attitude to land slavery from Attica and suppressed it by using military force based on the police and police organisation. For this reason, Spartans was never able to move away from their country due to the fear of internal rebellion in their military expeditions, or they could not participate in the expeditions they had to embark on due to internal rebellions. For this reason, it could not fully reach economic prosperity. Sparta has become a closed country in order to prevent the ideas of freedom outside Sparta. As a result, Sparta ceased to be a centre of culture and art from the 6th century BC. The reforms that seemed to be to the detriment of Attica at first were in its favour (Mansel, 2014, pp. 194–195; 197; 218–219).

Ross evaluates that there were two extreme views on slavery in Aristotle's time (Ross, 2008, p. 53). One group argued that the master's sovereignty over slaves was unnatural and therefore unjust, while the other group believed that everything taken in war should belong to the victors and that slavery in accordance with the tradition of war was just. Nevertheless, there are philosophers who argue that there are other views on slavery. The purpose of Ross's

characterisation of slavery into two groups is to argue that Aristotle's natural slavery is an attempt to find a middle ground between these two views. Aristotle states that slaves do not possess reason (Aristoteles 1831, 1254b16-23), that is, they do not have the ability to think (Aristoteles 1831, 1260a12), and that the enslavement of prisoners of war is not a natural process, but a customary structure. Aristotle thus seems to be defending slavery on the grounds that slaves lack the ability to think, while opposing slavery on the grounds that slavery based on custom is unnatural. Ross contends that this should be perceived as a stance opposing both extreme perspectives (Ross, 2008, p. 54). Although I disagree with Ross's point, it can be seen that the types of slavery we see in the Greeks can be categorised as slavery taken for economic reasons and slavery taken as a result of wars. For example, we can attribute the fact that the debtor becomes a slave to his lack of ability to determine what is good for him. However, the way he gets rid of his debt and gets rid of slavery can be based on the fact that the period he was a slave was considered as an education process that would determine what is good. We should see Aristotle's examination of the dual slavery system, which suits his purpose, as an endeavour in terms of ethics and political philosophy rather than a legal evaluation.

As a result, the causes of Aristotle's slavery are as follows:

- a. The final Cause To Serve The Master as A Tool of Action
- b. The efficient Cause: Physical Labour
- c. The material Cause: Master
- d. The formal Cause: The relationship Between Master and Slave

The biggest difference between the master and the slave here is that the efficient cause is "deciding what is good and having the intelligence to do so". Because the fact that the slave is a slave for the material cause and the other causes are the same actually shows that there is a thin boundary between the slave and the master. Bhorat seeks to highlight the peril of digital servitude by underscoring Aristotle's conception of slaves as property. He draws a parallel with Aristotle's concept of slavery by showing the increasing loss of property with the rise of the digital world (Bhorat, 2023, p.7-10).

In Aristotle's philosophy, the concept of slavery is entwined with rationality and autonomy. He contends that certain individuals are naturally predisposed to slavery due to perceived deficiencies in rational capacity. According to Aristotle, these individuals lack the ability to self-govern, necessitating guidance and control from others. When examining AI, particularly advanced systems, parallels with Aristotle's notion of slavery emerge. Another notable aspect is the autonomy. Just as Aristotle's natural slaves are deemed lacking in rational self-governance, AI lacks true human-like autonomy. While AI systems can execute complex tasks and make decisions based on algorithms and data, they lack conscious awareness and moral agency, integral to human autonomy.

Moreover, akin to Aristotle's natural slaves, AI systems are often crafted and overseen by humans, serving specific purposes or goals set by their creators. This prompts ethical inquiries into power dynamics inherent in AI creation and utilisation. Just as Aristotle's slavery concept evokes concerns about exploitation and domination, AI development and deployment may provoke similar apprehensions regarding the control and subjugation, albeit in a distinct context. Another facet worth exploring is hierarchy. In Aristotle's schema, a clear hierarchy

exists between master and slave, with the former wielding authority over the latter. Similarly, in AI, a hierarchical relationship between humans and AI systems prevails. Humans dictate AI functions, behaviours, and limitations, potentially fostering abuses of power and reinforcing social inequalities.

Moreover, much like Aristotle's concept of slavery was intertwined with the socio-political structures of his time, the development and proliferation of AI are molded by contemporary socio-economic and political contexts. Issues like workforce displacement, algorithmic bias, and privacy concerns underscore ethical complexities akin to Aristotle's slavery concept, revealing the intricate interplay between AI and societal dynamics. Though the analogy between Aristotle's slavery concept and AI may appear disparate initially, closer scrutiny unveils intriguing parallels. By delving into autonomy, control, hierarchy, and social context, we glean insights into ethical ramifications of AI, drawing from ancient philosophical frameworks to inform contemporary discourse.

Stating that the digital world is developing rapidly, Bhorat states that this involves serious risks. Thus, he thinks that the "Digital Despotism" that the digital world will bring will parallel Aristotle's understanding of slavery and people will become vulnerable (Bhorat, 2023, p.2-3). In this context, he draws attention to protecting the digital individual autonomy (Bhorat, 2023, p.19).

While AI systems can analyse data and manifest unexpected behaviour through learning capabilities, complete emancipation from human control or the potential for exploitation and domination necessitates AI developing human-like consciousness and will, a speculative domain presently. Nonetheless, researchers addressing ethical and security dilemmas in AI view such a scenario as plausible. How to avert such a scenario in the future remains a pressing concern.

Conclusion

In conclusion, Aristotle's justification of slavery is predicated on three fundamental elements. Firstly, he posits the existence of a natural hierarchy in the world, suggesting that certain individuals are inherently superior to others. This hierarchy is based on the sovereignty of the soul over the body and the sovereignty of divine men over imperfect men. Secondly, Aristotle argues that some individuals are born with a natural inclination to be slaves. He claims that these individuals lack the rational capacity to govern themselves and are therefore fit to be ruled by others. Third, Aristotle argues that slavery is necessary for the functioning of the city-state. He argues that slaves are necessary for the economic and social welfare of the society as they perform menial tasks that free citizens are unwilling or are unable to perform. According to Aristotle, slavery allows citizens to pursue higher intellectual and political activities.

While Aristotle's ideas about natural slavery are still relevant to modern debates in terms of politics and society, they are often seen as outdated and incompatible with modern values of equality and justice (Ambler, 1987, p. 407). According to modern commentators, Aristotle's endeavor to defend slavery with a moral conception of natural slavery in his Politics is regarded as unsuccessful. Modern approaches cannot be expected politically to find Aristotle's attempt to defend slavery successful. It is absurd and inappropriate to evaluate Aristotle in this way. To

treat what was said 2500 years ago as if it was said yesterday is a work that is far from being scientific but has been expressed for political reasons. However, the perspective of the presented paper was based on the evaluation of Aristotle's period and concepts. On the other hand, Schofield and Yazıcı argue that Aristotle's ideas should not be attributed solely to his era but rather to his individual beliefs, and that they should not be divorced from the context of reality (Schofield, 1990, p. 4; Yazıcı, 2021, p. 14). In this context, even if Aristotle's views are evaluated in relation to the present, this evaluation should be methodological. Aristotle did not assert that slavery is an immutable institution destined to endure indefinitely; such an assertion would be unrealistic. Just as you cannot strip a farmer of their tools and anticipate continued productivity, if you remove tools from the farmer's hands and still expect productivity, alternative tools must be provided. A pragmatic approach would entail abolishing slavery within the current period and instituting an alternative system that facilitates continued productivity. This is the crux of Aristotle's evaluation, as he elucidates the mechanism through which slavery will be abolished, namely, the system that will succeed it:

(1253b33-1254a1) And every assistant is as it were a tool that serves for several tools ; for if every tool could perform its own work when ordered, or by seeing what to do in advance, like the statues of Daedalus in the story, or the tripods of Hephaestus which the poet says ' enter self-moved the company divine,' —if thus shuttles and quills played harps of themselves, master-craftsmen would have no need of assistants and masters no need of slaves.

Although this paragraph was interpreted as showing mechanisation after the Industrial Revolution of the 19th century, this period should only be perceived as the development of tools. The real process will be the existence of a tool that will enable the machine, which is the tool, to produce. Thus, following the 19th century, while the formal structure of slavery has evolved, the underlying causes of slavery have persisted; only the formal cause's structure has undergone change. Again, it can be taken as a structure that is decisive to serve the master, who is the material cause for the slave, as the efficient cause. In this paragraph, Aristotle was cited with the idea that slavery will continue to exist as long as the material cause exists. Other causes will also exist as long as the material cause exists.

In the explanation given by Aristotle, he mentions the environment in which there will be no material reason for the production of looms. In this scenario, the pertinent question arises: for whom are the looms intended to produce? In essence, production, serving as the final cause, is inherent to the material cause, and its absence is inconceivable. Aristotle further illustrates that such a scenario can only exist within mythological constructs and is not viable in the real world.

A positive assessment of AI is that it will be the new slave "artificial intelligence" that you will give to the master for production. In order for artificial intelligence to be a part of the system and to be used in the service of human beings, it will be expected to be unable to decide what is good and just. Here, as an agent, it must perform bodily works. However, the efficient cause of artificial intelligence is not physical labour, but the decision-making and reasoning. For this reason, artificial intelligence has the reason to be a master rather than a slave.

Aristotle's approach of liberating the slave when the slave starts to decide what is good and beneficial, what kind of freedom will be the freedom when artificial intelligence starts to

enter decision-making processes. Will humans have to switch off the machines that start making decisions and reasoning? In this case, the question humanity should ask about the future should be how far people will allow artificial intelligence to progress, or people should decide what to do with free machines. The status of machines and humans must be determined. If Aristotle's natural slavery process develops naturally, a new system will come in which artificial intelligence will causally become the master. In terms of this paper, artificial intelligence should not turn into a structure that will decide what is good for people.

It is necessary to understand that it is not talking about a system where natural slavery will take over by taking control of AI. It is about humans trusting AI and leaving the decisions of what is good and right for them to AI, i.e. human self-enslavement. By nature, humans possess a proclivity to enslave themselves as a means of evading their responsibilities. Although the biggest difference between man and AI is that they have free will (and although it is predicted that other differences will be solved, the solution of free will is not desired), it can be predicted that man will choose slavery with his free will. The AI we desire in the future should not be a structure that we will knowingly and willingly make master, that is, a structure that will decide what is good and right for human beings.

From the point of view of Aristotle's reason, it is visible that man is moving towards slavery on the edge of AI. The assessment of people's responsibility will and freedom in the form of surrender in this process always gives the impression that in the future man can claim his freedom in the face of AI.

Aristotle's theory of natural slavery offers valuable insights into the dynamics of human society and governance. While his teleological framework provides a rational basis for understanding social hierarchies, its application to contemporary issues such as AI ethics requires careful consideration. By critically engaging with Aristotle's concepts of slavery and causality, it can enrich the understanding of the evolving relationship between humans and artificial intelligence. Moving forward, interdisciplinary dialogue between philosophy, ethics, and AI research is essential to address the ethical implications of advancing technology and ensure the responsible development and deployment of AI systems.

The view that AI can make correct and positive decisions for people, so that AI will change the daily life of human beings, is quite common (Davenport & Kalakota, 2019; Habila et al., 2023; Holmes et al., 2019). However, this perspective is more pragmatic in nature. In this case, conditions other than human judgement of what is good for AI need to be evaluated. For this reason, during the development period of AI, the contribution of philosophy to the development and ethical conditions of AI should be continuous. To date, there have been constitutional proposals for AI (Brundage et al., 2020; Dafoe, 2018; Towards a Magna Carta for Data, 2017) and philosophy will have an important place in the development of these proposals.

Suggestion for Future Research

Studies on the history of philosophy ought to serve as an interpretative endeavor aimed at elucidating perspectives on both the present and the future. In this context, an attempt was made to establish a connection between the master-slave relationship and the AI-human relationship by using Aristotle's causality. It is posited that assessments regarding what AI

ought to encompass, particularly in addressing ethical dilemmas, will prove beneficial and constructive by assimilating philosophical insights from throughout history into contemporary and future contexts. The structure of AI and the future as a science fiction prediction, free from the evaluations of philosophy, will not be beneficial for humanity and AI. Aristotle's concept of causality can be assessed distinctly concerning both the causes of slavery and the reasons behind its existence. Thus, given Aristotle's views on natural hierarchies, there is a need to investigate how the proliferation of AI technologies may affect existing social structures and power dynamics. This research could analyse AI's potential to reinforce or disrupt traditional hierarchies, as well as its effects on social equity and justice. In addition, based on Aristotle's emphasis on purpose and final causality, future research could propose ethical design principles for the development of AI systems. This could include considering the integration of human flourishing and social welfare considerations into the design process, ensuring that AI technologies are compatible with ethical values and goals. Moreover, considering the potential for humans to willingly relinquish decision-making authority to AI systems, future research should investigate strategies aimed at mitigating the risks associated with human self-enslavement. This could include developing frameworks to encourage critical engagement with AI technologies and to promote human autonomy and agency in the face of technological advances. By pursuing these avenues of research, scholars can further elucidate the ethical dimensions of AI technology and contribute to the responsible and ethical development of AI systems in alignment with human values and societal well-being.

Acknowledgements

None.

Conflict of Interest

None.

Funding

The Author received no funding for this research.

References

- Ambler, W. (1987). Aristotle on Nature and Politics: The Case of Slavery. *Political Theory*, 3(15), 390–410. <https://doi.org/10.1177/0090591787015003007>
- Aristoteles. (1831). *Aristotelis Opera*. In I. Bekker (Ed.), edidit Academia Regia Borussica. apud G. Reimerum.
- Aristotle. (2016). *Aristotle's Politics: Writings from the Complete Works: Politics, Economics, Constitution of Athens*. Jonathan Barnes (ed.). Princeton University Press.
- Aristotle. (1959). *Politics*. Tr. H. Rackham. Harvard University Press.
- Baracchi, C. (2014). *The Bloomsbury Companion to Aristotle*. Bloomsbury Academic. Bloomsbury.
- Barker, E. (1973). *The Politics of Aristotle*. Oxford University Press.

- Bayraktaroğlu, H. C., & Özcan, Z. (2020). Nikomakos'a Etik Bağlamında Aristoteles'in Erdem Etiği. *Uludağ Üniversitesi İlahiyat Fakültesi Dergisi*, 1(29), 277–296.
- Bhorat, Z. (2023). Digital Despotism and Aristotle on the Despotic Master-Slave Relation. *Philosophy & Technology*, 36(77). <https://doi.org/10.1007/s13347-023-00675-y>
- Bostrom, N. (2014). *Superintelligence: Paths, Dangers, Strategies*. Oxford University Press.
- Bostrom, N., & Yudkowsky, E. (2014). The ethics of artificial intelligence. In K. Frankish & W. M. Ramsey (Eds.), *The Cambridge Handbook of Artificial Intelligence* (pp. 316–334). Cambridge University Press. <https://doi.org/10.1017/CBO9781139046855.020>
- Brundage, M., Avin, S., Wang, J., Belfield, H., Krueger, G., Hadfield, G., Khlaaf, H., Yang, J., Toner, H., Fong, R., Maharaj, T., Koh, P. W., Hooker, S., Leung, J., Trask, A., Bluemke, E., Lebensold, J., O'Keefe, C., Koren, M., ... Anderljung, M. (2020). *Toward Trustworthy AI Development: Mechanisms for Supporting Verifiable Claims*.
- Brynjolfsson, E., & McAfee, A. (2016). *The Second Machine Age: Work, Progress, and Prosperity in a Time of Brilliant Technologies*. W. W. Norton & Company.
- Buchanan, B. G. (2019). *The AI Advantage: How to Put the Artificial Intelligence Revolution to Work*. MIT Press.
- Dafoe, A. (2018). *AI Governance: A Research Agenda*. Centre for the Governance of AI Future of Humanity Institute University of Oxford. <https://www.fhi.ox.ac.uk/wp-content/uploads/GovAI-Agenda.pdf>
- Davenport, T., & Kalakota, R. (2019). The potential for artificial intelligence in healthcare. *Future Healthcare Journal*, 6(2), 94–98. <https://doi.org/10.7861/futurehosp.6-2-94>
- Ford, M. (2015). *The Rise of the Robots: Technology and the Threat of Mass Unemployment*. Basic Books.
- Fortenbaugh, W. W. (2006). *Aristotle's Practical Side On His Psychology, Ethics, Politics And Rhetoric*. Brill.
- Habila, M. A., Ouladsmene, M., & Alothman, Z. A. (2023). Role of artificial intelligence in environmental sustainability. In *Visualization Techniques for Climate Change with Machine Learning and Artificial Intelligence* (pp. 449–469). Elsevier. <https://doi.org/10.1016/B978-0-323-99714-0.00009-1>
- Han, C., Jia, F., Jiang, M., & Chen, L. (2022). Modern slavery in supply chains: a systematic literature review. *International Journal of Logistics Research and Applications*, 1–22. <https://doi.org/10.1080/13675567.2022.2118696>
- Harari, Y. N. (2018). *21 Lessons for the 21st Century*. Spiegel & Grau.
- Holmes, W., Bialik, M., & Fadel, C. (2019). *Artificial Intelligence in Education. Promise and Implications for Teaching and Learning*. Center for Curriculum Redesign.
- Joy, B. (2000). Why the Future Doesn't Need Us. *Wired Magazine*.
- Kara, S. (2017). *Modern Slavery*. Columbia University Press. <https://doi.org/10.7312/kara15846>

- Kiran, A. (2018). Aristoteles ve Kölelik. *Route Educational and Social Science Journal*, 14(4), 810–818. <https://doi.org/10.17121/ressjournal.1594>
- Lamas, B. (2023). Modern Slavery in the Global Economy. In *The Palgrave Handbook of Global Slavery throughout History* (pp. 661–680). Springer International Publishing. https://doi.org/10.1007/978-3-031-13260-5_37
- Liddell, H. G., & Scot, R. (1996). *A Greek-English Lexicon*. Clarendon Press.
- Lloyd, G. E. R. (1968). *Aristotle: The Growth and Structure of his Thought*. Cambridge University Press.
- Mansel, A. M. (2014). *Ege ve Yunan Tarihi*. Türk Tarih Kurumu Yayınları.
- Musk, E. (2018). Elon Musk Says AI Could Become “an Immortal Dictator From Which We Would Never Escape.” *Business Insider*. <https://www.businessinsider.com/elon-musk-says-ai-could-lead-to-robot-dictator-2018-4>
- Mwemezi, P. (2023). A Critical Analysis of the State of Modern Slave in the 21st Century. *International Journal of Education, Culture, and Society*, 1(1), 72–85. <https://doi.org/10.58578/ijecs.v1i1.1770>
- Newman, W. L. (1887). *The Politics of Aristotle (Vol. 1)*. Oxford University Press.
- Nussbaum, M. C. (1980). Shame, Separateness, and Political Unity: Aristotle’s Criticism of Plat. In A. Rorty (Ed.), *Essays on Aristotle’s Ethics*. University of California Press. <https://doi.org/10.1525/9780520340985-024>
- Pinker, S. (2018). *Enlightenment Now: The Case for Reason, Science, Humanism, and Progress*. Penguin Books.
- Ross, D. L. (2008). Aristotle’s Ambivalence on Slavery. *Hermathena*, 184, 53–67. <https://doi.org/10.2307/23041580>
- Russell, S., & Norvig, P. (2021). *Artificial Intelligence: A Modern Approach*. Person.
- Schlaifer, R. (1936). Greek Theories of Slavery from Homer to Aristotle. *Harvard Studies in Classical Philology*, 47, 165–204. <https://doi.org/10.2307/310574>
- Schofield, M. (1990). Ideology and Philosophy in ARistotle’s Theory of Slavery. In G. Patzig (Ed.), *Aristoteles “Politika”: Aklen des XI. Symposium Aristotelicum* (pp. 1–27). Vandenhoeck & Ruprecht.
- Smith, N. D. (1983). Aristotle’s Theory of Natural Slavery. *Phoenix*, 37(2), 109–122. <https://doi.org/10.2307/1087451>
- Tegmark, M. (2018). *Life 3.0: Being Human in the Age of Artificial Intelligence*. Vintage.
- Towards a Magna Carta for Data*. (2017). Royal Irish Academy. https://www.ria.ie/sites/default/files/ria_magna_carta_data.pdf
- Yazıcı, Ç. (2021). Aristoteles’te İyi Yaşam, Kendine Yeterlilik ve Kölelik. *Kilikya Felsefe Dergisi*, 1, 1–17.