



## Economic Valuation Relationship in Ecological Discourses

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### **Abstract**

Economic valuation that is constellation into AMDAL (as a EIAs) must contain three principles including: considering dialectical economic, environmental and social interests. This study was carried out utilizing a normative juridical research technique, the author use document study approaches to collect the data required for the study. The result is that human behavior that does not respect life and life presents the view that nature exists to be exploited for the greatest possible prosperity of humans. Sen's criticism of (i) respect for money as an episteme, (ii) justifies the means to achieve goals, (iii) loss of respect for the natural environment, (iv) has the opportunity to open a permissive attitude towards corruption. Sen's criticism provides a clear picture of economic valuation must be based on ethics.

**Keywords:** *Economic Valuation; AMDAL; Environment*

### **Introduction**

Environmental challenges should neither be limited to their deterioration, destruction, and pollution, nor to anthropocentrically measured conservation, but to their substance, understanding, and perspectives. So there is a pro-ecosystem viewpoint and an anti-ecosystem viewpoint. Both points of view are incorporated in the topic of ecology, which is people. Humans are the key to comprehending their surroundings and their interactions with the world around them (*Das Umgreifenden*) or *Aussenwelt*<sup>1</sup>.

In terms of its origins, ecology (from the Greek Oikos/house and Logos/science, words) was first coined by Ernst Haeckel, a German biologist, in 1869 as *Haushaltslehre der Natur* (teachings on the household of nature), the study of nature's economics, or the science of "the

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<sup>1</sup> Bdk. Emilio F. Moran. 2006. *People and Nature. An Introduction to Huan Ecological Relations*, Blackwell Publishing, Malden, MA, USA, page. 9

household of living beings.<sup>2</sup> "The study of the relationships between living systems and their environment"<sup>3</sup> is another definition of ecology. The core of ecology is found in the dynamic (systematic and moving) interactions and interactions between organisms and the living environment, rather than in the silent balance of "as if" two independent objects.

Relationships, both physical and non-physical, are being questioned. When someone talks about "mining ecology," for example, there is a link between environmental difficulties and justice (distributive, commutative, and social). This is due to the fact that the environment encompasses not only physical items but also social, cultural, and civilizational factors and behaviors<sup>4</sup>.

Natural forests in Indonesia are never unaffected by threats. Natural forests in three provinces of North Sumatra, East Kalimantan, and North Maluku lost 718 thousand hectares between 2013 and 2016. This equates to 240 thousand hectares each year, 20 thousand hectares every month, or half a hectare per minute. In 2016, just 9 million hectares of natural forest were found in three provinces (Forest Watch Indonesia 2018).

Joko Widodo the President of the Republic of Indonesia, admitted that Indonesia is the world's sixth highest contributor to carbon emissions, with 1.98 billion tons of CO<sub>2</sub> emissions per year (Kompas, 2015). (WRI, 2012). The forestry industry is the leading source of carbon emissions caused by deforestation and forest degradation (UNDP, 2017).

Indonesia ratified the Paris Agreement with Law No. 16 of 2016 on Ratification of the Paris Agreement on the United Nations Framework Convention on Climate Change. Indonesia is committed to reducing emissions by 29 percent through domestic efforts and 41 percent through international cooperation from business as usual in 2030, one of which is through forestry and agriculture. Without tackling deforestation and forest degradation, Indonesia will not be able to meet its self-imposed emission reduction objectives. The data reveal that Indonesia's forestry history is nothing more than a history of deforestation.

Current environmental challenges are continuing to evolve, particularly when it comes to the subject of corruption. In regard to corruption, there are a number of research on environmental concerns. Relationships and interests in the environment Current environmental challenges are continuing to evolve, especially when it comes to corruption<sup>5</sup>. In regard to corruption, there are a number of research on environmental concerns. Environmental crimes in the form of corruption, as well as ecological relations and commercial interests, are examined qualitatively by taking into account the intrinsic and extrinsic values of the environment. Economic evaluation (economicvaluation) provides a rationale for the causal link between economic and environmental objectives.

The EIAs are a solid step in economic appraisal (Environmental Impact Assessments). Environmental impact assessments (EIAs) are one of the analytical techniques used to identify

<sup>2</sup> Hermann Rimmert. 1980. *Ecology. A Textbook*. Springer-Verlag. Berlin, page 1.

<sup>3</sup> Turk and Whites. 1972. *Ecology. Pollution. Environment*. WB. Saunder Company. Philadelphia. USA, page. 1

<sup>4</sup> Hyronimus Rheti. 2018. *Cita Hukum dan Postmodern. Kajian Gagasan Ekologis Pancasila*. Genta Publishing. Yogyakarta, page. 266

<sup>5</sup> Reza Akhbari, Mehdi Nejati. 2019. *The Effect of Carbon Emissions in Developed and Developing Countries: Empirical Investigation of a Claim*. Journal Heliyon. Volume 5. Issue 9.

and mitigate specific project hazards to the environment and communities, such as habitat for certain species, ecosystems, and carbon sequestration, all the way down to biodiversity levels (Alex William, Kendra Dupuy., 2017). It is accommodated in AMDAL in the context of Indonesia (Analysis of Environmental Impacts). That all environmental exploitation, public and private, is carried out in accordance with PP. No. 27/1999 and the Minister of the Environment's Decree No. 17/2001 on the Types of Business Plans and/or Activities Required to be Completed, using AMDAL as the legal foundation.

According to Richard Sylvan and David Bennett, there are prudential and instrumental reasons in instrumentalistic ethics, with the prudential argument emphasizing that human existence and welfare are dependent on environmental sustainability and quality. The existence of humanity is contingent on the preservation of the cosmos and all of its components. Although anthropocentrism is founded on the belief that people are different from and above nature, the theory of anthropocentrism cannot reject the ecological truth that all organisms in nature, including humans, have a very intimate relationship, as understood by Aristotle and Thomas Aquinas. As a result, people have an interest in environmental preservation since environmental preservation is equivalent to humans defending their own existence.

Respect for life is the most fundamental foundation for environmental preservation. Human greed and avarice degrade nature and the environment, particularly for economic reasons, and this, in turn, harms human existence and life. Ecological responsibility encompasses not just the present but also the future. As a result, the purpose of this study is to focus on ecological issues that are connected to economic evaluation from an ethical standpoint, as pioneered by Amartya Sen's economics of well-being.

To ensure intergenerational fairness, economic activities must be regarded from an ethical perspective. Exploitation that undermines the ecosystem of natural resources as a country's wealth demands economic activities to be considered from an ethical perspective. AMDAL must be able to go beyond profound abstractions regarding economic and environmental concerns as a tool for assessing economic worth.

### ***Methods of Research***

A research guide or research technique is required to collect information and explanations about everything linked to the subject matter; this is because adopting the right research technique will ensure data validity and will ease problem-solving research.

This study was carried out utilizing a normative juridical research technique, also known as library law research, which is a way for doing legal research by reviewing existing library items<sup>6</sup>.

The author use document study approaches to collect the data required for the study. Document studies entail examining and examining a variety of documents, including:

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<sup>6</sup> Soekanto, Mamudji. 2009. *Penelitian Hukum Normatif; Suatu tinjauan singkat*. Raja Grafindo Persada. Jakarta, page. 13.

1. Examine the laws and regulations, as well as other rules and regulations.

After collecting several laws and regulations, the authors choose those that are relevant to the study's topic, namely Law Number 32 of 2009 and PP. No. 27/1999, as well as the Minister of the Environment's Decree No. 17/2001 concerning Types of Business Plans and/or Activities Required to be Completed with AMDAL as the legal basis.

2. Review of the Literature

The author's initial step was to gather literature relating to the topic of study. The writer then goes on to read and examine the literature that has been gathered, as well as make a selection of the materials required, based on the research topic.

### ***Dissertation***

The concept of economic value is inextricably linked to the concept of ethics. The (inter)relationships between people, the environment, and the abstraction of non-humans as a single natural ecosystem are explored in these two assertions. The role of law in the effort to maintain ecosystem balance in the principle of sustainable development is critical; intrinsically, the law seeks the idea of intergenerational justice, and extrinsically, through legal products, such as laws and regulations, it becomes an important instrument for defining boundaries and defining crimes against the environment in ensuring that the environment is protected.

Ecology, according to Ernst Haeckel, is the science of nature's home. The idea of ecology, which refers to the complexity of biotic (people, plants, animals, fungus, bacteria) and abiotic (non-living) components, need a deeper knowledge (air, soil, water). Because humans are the only animals capable of manipulating the elements of these two components, humans become the central point in the interaction between humans and the environment in order to comprehend the phenomenon of how the environment changes over time and whether these changes have positive or negative consequences<sup>7</sup>. This is hazardous for the environment. As a result, the term "environment" is used in this work to refer to the concept of ecology.

Environmental crime must be separated from environmental damage (environmental harm) (environmental crime). The difference between the two is the gravity of the situation, as well as the evidence from environmental harm, such as scientific data to back up the environmental damage claim.

Environmental crime is described as "criminal behavior that has the potential to harm the environment" (United Nations Office on Drugs and Crime). The term "criminal behavior" refers exclusively to the notion of social construction as expressed in the products of rules and rules governing the lawful and unlawful character of actions. Harm – an actual danger or adverse effect, stemming from direct and indirect social processes, that negatively impinges upon the health and well-being and ecological integrity of humans, specific biospheres and nonhuman

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<sup>7</sup> Merchant, C. 2005. *Radical Ecology: the Search for A Livable World*. New York: Routledge. Dalam Rob White. 2013. *Environmental Harm: An Eco-Justice Perspective*. Policy Press. USA, page .34

animals<sup>8</sup>. Environmental harm is caused not just by legislative regulations, but also by 'natural households.' This implies that there is a dialectical shift with regards to nature, natural resources, and ecological communities, with cultural wealth being considered in the definition of environmental crimes.

## Sustainable Development

Randall Munroe uses statistics to demonstrate how the concept of "sustainable development" is essentially "unsustainable." The information is derived from Google search terms. The sample has been researched since 1960, and by 2100, it is expected to grow exponentially in size to infinity. Munroe wants to point out that the concept of sustainable development is completely useless. The argument is a retribution for apocalyptic forecasts of natural resource scarcity that have consistently failed to materialize.

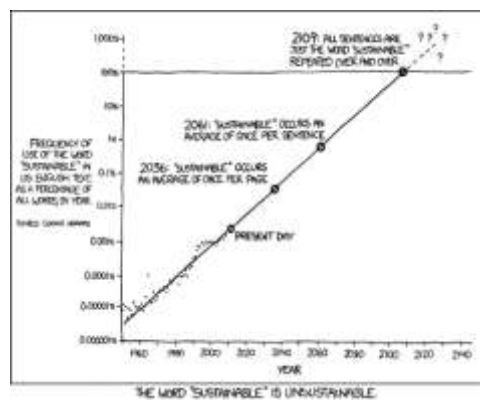


Figure 1. Sustainable Development

One of the tenets of sustainable development is that current resource consumption may be extended as far as possible into the future. The inference is that we must seek for alternate resources to fulfill our current resource requirements. However, communities without the concept of sustainable development have a history of turning to better resources long before those resources run out; timber and straw were replaced by coal, coal by oil, and while wood, straw, coal, and oil are still plentiful today, people have turned to consuming methane (natural gas)<sup>9</sup>.

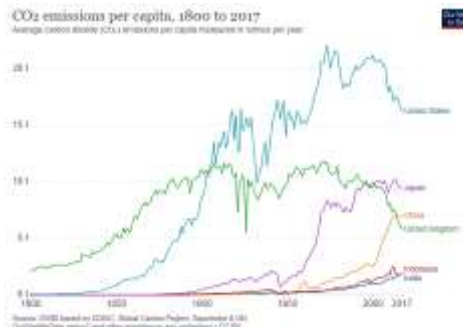


Figure 2. CO<sub>2</sub> Consumption Per Capita

<sup>8</sup> Rob White. 2013. *Environmental Harm: An Eco-Justice Perspective*. Policy Press. USA, page. 55

<sup>9</sup> Pinker, Steven. 2019. *Enlightenment Now: The Case for Reason, Science, Humanism, and Progress* (Indonesia's translate version). CV. Global Kreatif Indo: Manado, hlm. 174.

It is simple to argue that the concept of sustainable development is useless and only an apocalyptic accusation based on data. Today's international community, including the third world, is developing in terms of exponential population increase, and more and more people are living in greater prosperity, all while the world is moving toward decarbonization.

People's preferences lead to decarbonization as a natural result. Carbon blackens the lungs of miners, pollutes city air, and threatens climate change<sup>10</sup>. To demonstrate the hazards of CO<sub>2</sub>, which has a direct influence on air pollution, around 7 million people die each year as a result of inhaling this toxic air (WHO).

This is where the topic of sustainable development, namely the greenhouse impact on the earth's climate, comes into play. In other words, whenever we burn wood, coal, oil, or gas. The carbon in the fuel is oxidized to CO<sub>2</sub>, which is then released into the environment. Although some CO<sub>2</sub> dissolves in the seas or is taken up by plants via photosynthesis, these natural processes are insufficient to compensate for the 38 billion tons of CO<sub>2</sub> humans emit each year into the atmosphere. CO<sub>2</sub> levels in the atmosphere have risen from around 270 parts per million before the Industrial Revolution to over 400 parts per million now<sup>11</sup>. This suggests that, since the potential of sentient life on Earth arose around 1-2 billion years ago, humanity have only needed roughly 200 years to fulfill about half of the civilization's greenhouse impact.

In the twenty-first century, if greenhouse gas emissions continue, Earth's average temperature will rise by at least 1.5°C (1.4°F) beyond pre-industrial levels, and perhaps by as much as 4°C (7.2°F) or more. Global average temperatures rose by around 0.8 degrees Celsius, making 2016 the hottest year on record, ahead of 2015 and 2014<sup>12</sup>. Many islands will sink as a result, and numerous natural calamities will strike often. A 2°C increase is regarded the most adaptable in the globe, according to a 2012 World Bank assessment, while a 4°C rise should be avoided.

Basically, determinism is the activity of exploiting the human environment since the industrial revolution era until now, even though the trend of carbon use has decreased, statistically the world will reach a temperature of 4 degrees Celsius, so only technology can save the earth at this time with policies and technology, as an idea called deep decarbonization. The Paris Agreement contains one of these policies.

### **The Importance of Economic Valuation in AMDAL**

To get a more objective understanding of economic value and what it is founded on, the classical and neo-classical schools of economics are first discussed, followed by a comparison of Pigou's theory as an economic basis that is directly tied to environmental challenges.

In the classical school of economics, Adam Smith introduced the 'theory of the invisible hand,' which states that what is regarded as public interest is determined by the self-interest of individuals in a free market system. However, Smith recognized that under the free market mechanism, where people freely arrange their own goods to generate efficient production-

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<sup>10</sup> *Ibid*, page. 195.

<sup>11</sup> *Ibid*, page. 184.

<sup>12</sup> *Ibid*, page. 185.

consumption circulation, there are some things for which the market system cannot function successfully without government involvement.

*“... erecting and maintaining certain publick works and certain public institutions which it can never be for the interest of any individual, or small number of individuals to erect and maintain; because the profit would never repay the expence to any individual or small number of individuals, though it may frequently do much more than repay it to a great society.”<sup>13</sup>*

What is called as public goods is the aforementioned constellation and the term payback it to great society (public goods). Meanwhile, it is not explained in the classical school of economics how anything might become a public good or the importance of environmental concerns in the supply of these public goods. In the neoclassical school of economics, the relevance of the new environment is discussed.

In his book *The Coal Question*<sup>14</sup>, William Stanley Jevons, a pioneer in neoclassical economic theory, forecasts the demise of British industry due to the depletion of natural resources, notably coal. The book generated popular speculation on the potential end of British development. *The Coal Question* examines how coal is used substantially as an energy source in the UK's growth and wealth, which is rising rapidly thanks to its industries. According to Jevons, diminishing coal can no longer be converted into energy at the same rate as exponential economic expansion; this is the cause, according to Jevons, that will be the brake and a factor that slows down economic expansion. As a result, he believes that the United Kingdom has to reconsider its national plan.

While Jevons proposed a theory of resource allocation in his previous work *Theory of Political Econom*<sup>15</sup>, this theory is founded on the idea that resources are limited but human demands are boundless. As a result, Jevons makes a clear connection between present and future coal prices and extraction costs. It is important to understand that the marginal utility (the amount of customer pleasure with goods/services – coal –) is the determining element in price formulation, not the cost of coal production.

We recognize that the sole market logic is left to the market mechanism alone, without thinking about the excess consequences, based on the classical school of economics. While the topic of the environment has begun to gain traction in the neo-classical school of economics, the main premise is that there is energy that cannot be refreshed, and that energy will run out one day, therefore the responsibility of price formation falls on utilities rather than the production process. merely marginal Of course, the technique hasn't been thoroughly examined from the standpoint of environmental harm and loss.

Arthur C. Pigou is well known for his theories on the Pigouvian tax and for developing the theory of consumption externalities, which laid the groundwork for current environmental economics. His empirical study of how policy choices, particularly in the realm of taxes, might improve resource allocation efficiency and its significance to environmental harm.

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<sup>13</sup> Agnar Sandmo. 2015. *The Early History of Environmental Economics*. Review of Environmental Economics and Policy, Volume 9, issue 1, page. 46.

<sup>14</sup> *Ibid*, page. 50.

<sup>15</sup> *Ibid*, page. 50.

Externalities are economic costs or advantages that arise as a result of economic activity but are distributed outside of the market system. The notion of externalities is significant because it serves as a foundation for Pigou's thinking on taxes and the market system's failure.

Pigou's concept of market failure is based on a distinction between the private and social marginal net product, which he refers to as the private and social marginal net product, respectively. Excessive negative externalities will result if the social marginal cost is larger than the private marginal cost. Pigou used the example of a factory that generates hazardous smoke to the environment.

*“ . . . for this smoke in large towns inflicts a heavy uncharged loss on the community, in injury to buildings and vegetables, expenses for washing clothes and cleaning rooms, expenses for the provision of extra artificial lights, and in many otherways.<sup>16</sup> ”*

The consumer or firm that creates the externality must pay taxes that are proportional to the marginal impact of the externality. It allows a customer or a business to assess how many advantages and impacts there will be on the quantity of items produced or consumed by the business or customer. This means that imposing charges will give industrial owners with incentives to limit pollution as much as feasible. The higher the tax levied, the greater the reduction in pollution.

The environmental permit system is primarily a regulation of environmental management operations as a tool for preventing environmental harm and/or pollution. As a result, environmental permits must be regulated and implemented in accordance with the principles outlined in Law 32/2009. Licensing has numerous roles in theory, including:

1. Permits as tools for development engineering

The government can enact legislation and make policies that encourage socioeconomic development. These policies and choices, on the other hand, can be a barrier to progress (as well as a source of corruption);

2. Permits as a source of revenue (budgeting)

Permits, in other words, are a source of revenue for the state. Permits are granted in exchange for licensing payments, which serve as a counter-achievement. The state obtains its independence;

3. The regulating role of permission (regular)

That is, it is to become a tool for policing communal acts and conduct. Licensing, like the notion of revenue collection, has the ability to govern people's actions and conduct. When it comes to natural resource management, the environment, spatial planning, and other strategic issues, the processes and requirements that must be specified by laws and

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<sup>16</sup> *Ibid*, page. 53.



regulations must also take strategic factors into account. The objective of issuing the permission and the criteria mentioned in the permission must be linked;

#### 4. Permits as a form of control

Licensing tools are used by the government to regulate communal activities. Permissions are granted with the intention of achieving certain objectives.

Environmental Impact Assessments (EIAs) as the tools in considering economic, environmental, and social interest dialectically, in the context of Indonesia, is realized in the form of AMDAL (Analisis Mengenai Dampak Lingkungan Hidup). The concept of EIAs understood in the horizon which has been previously explained, covers environmental impacts such as deforestation, greenhouse effect, and social impacts caused by environmental exploitation.

In the Article 13 paragraph (1) of the Law no. 32 of 2009 on Environmental Protection and Management (UUPPLH), it is stated that “Environmental pollution and/or damage shall be controlled in the framework of preserving the environmental functions.” Afterwards, in paragraph (2), it is stated that “The control over the environmental pollution and/or damage as referred to in paragraph (1) shall cover: a. prevention; b. mitigation; and c. restoration. The control over environmental pollution and/or damage as referred to in paragraph (1) shall be done by the government, regional governments and personnel in charge of businesses and/or activities on the basis of their respective scopes of authority, role, and responsibility.

Business and/or activity plans are required to have AMDAL due to its substantial impact on environment. It is stated in Article 22 Paragraph (2) of UUPPLH that the substantial impact shall be stipulated on the basis of the following criteria:

1. The quantity of population to be affected by the business and/or activity plan;
2. The size of distribution area of impact;
3. Intensity and duration of impact;
4. Environmental components to be affected;
5. Cumulative characteristics of impact;
6. Whether impact reverts or not; and/or;
7. Other criteria in accordance with the developments of science and technology.

Pigou also discussed the possibility of empirical model to evaluate the benefits of environmental restoration policy. In his description about “*a valuable investigation*” conducted by Manchester Board of Air Health in 1918<sup>17</sup>, Pigou illustrated his arguments about the environmental cost of factory smoke. That argument compares the weekly washing cost from two different cities, namely Manchester with its chimneys and Harrogate with its clean air. Based on the investigation, the cost for 100 households in Manchester was 7.5 pence per week. The population of Manchester was seven hundred and fifty thousand people and the cost of factory smoke to the city in general was estimated to be more than £ 290,000 per year.

<sup>17</sup> *Op. Cit.*, Agnar Sandmo. Hlm. 55.

In the classic economic theory proposed by Smith, supply and demand entirely depend on the market mechanism in the terminology of the invisible hand. It simultaneously reduces the meaning of life, extinction, or destruction of an ecosystem which is reduced to be merely a phenomenon of public interest. Based on the neo-classical economic theory of Jevons, the intervention of a country is required to reconsider the potential of the natural resources which will be depleted in the future through a mathematic method. It means that according to Jevons, there have been efforts to consider the environmental damage even though the historical materialism still emphasizes on the paradigm of anthropocentrism.

It was then in the externality theory of Pigouvian that the necessity of the environment obtained a more proportional rate. Therefore, industries or companies must be responsible for creating public goods as the compensation for their exploitation activities without reducing the potential of environmental restoration and adoption of the interests of the directly affected people, which in Pigouvian is manifested in the form of tax. Considering the elaboration of the aforementioned theories, the case of license in this case is AMDAL, normatively is not enough observed from the perspective of the amount of the income of a country on the investment from a business activity, but it contains economic, environmental, and social interests dialectically.

However, the AMDAL, particularly that in Indonesia, is subject to criticisms that there is a great gap between the ideal reality and the real reality of AMDAL to realize AMDAL as EIA seems irrelevant and acts as mere formality. In the Indonesian Institute Centre for Public Policy Research<sup>18</sup>, it is stated that AMDAL in Indonesia is implemented with the following conditions:

1. The initiators arrange AMDAL after the license of activity has been issued, meaning that AMDAL does not serve as decision making tool;
2. The initiators still consider AMDAL as additional cost instead of environmental management tool. The environmental management contained in RKL-RPL has not been oriented on the steps to lower costs.
3. AMDAL planning as a feasibility study material is still weak due to the high frequency of lateness in its implementation after the economic and technical aspects are considered as feasible. Therefore, the probability of the result of AMDAL study to provide constructive and alternative inputs for the activity is extremely low.
4. AMDAL is still arranged with low quality and focus.
5. The assessors of AMDAL have not been able to direct the plans toward improvements because there are still many low-quality documents allowed to pass with various reasons.

Since the cases of AMDAL cannot be solved in legal-formal and mechanic means, consistency and efforts to high commitment in implementing AMDAL itself are required. Along with the ethics, the understanding of AMDAL should be able to exceed the dimension of mere document.

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<sup>18</sup> The Indonesian Institute Centre for Public Policy Research. 2016. Licensing System Reform: Strengthening Environmental Impact Analysis (Amdal). Volume X, No. 05.

## Criminal Law Enforcement

Based on the basis of the empirical problems elaborated in the previous points, the AMDAL in Indonesia and in other developing countries is generally considered as complementing requirement so that in its arrangement, AMDAL does not serve as a valid scientific basis in the decision of granting a business license.

The effectiveness of criminal sanctions, especially evaluated from their quantity, is greater than the enforcement instrument of civil and administrative law. Faure and Visser stated that compared to the criminal sanctions, administrative sanctions are often problematic in terms of<sup>19</sup>: (i) that administrative law does not acknowledge penalization or non-monetary sanction, non-monetary enforcement requires an effectively applicable criminal law; (ii) that administrative law often tends to prioritize persuasive obedience than to prevent forbidden actions. This condition leads to faulty ex-ante incentive for the perpetrator of environmental destruction to neglect the regulations in particular limitations; (iii) administrative law will be more effective if there is a support from criminal sanction so that it will be able to strengthen the negotiation in the enforcement of its administrative law.

The environmental law enforcement in Indonesia covers compliance and enforcement. The regulation of criminal sanctions is included in the law enforcement as regulated in UUPH 32/2009 in Chapter XV, consisting of 23 articles, starting from Article 97 until Article 120. In Article 97, it is stated that criminal act as referred to in Chapter XV constitutes crime. Therefore, the crime on environment is regulated in that chapter. The crime or criminal act of environment can be referred to in various Laws besides UUPH and Penal Code of Indonesia (KUHP)<sup>20</sup>.

Referring to the data from 70 cases of environmental crime solved between 2002 and 2015, 43% of the defendants were sentenced to discharge; 40% of them were sentenced with probation; 13% of them were sentenced to imprisonment and fine; 2% of them were released from any future claims whatsoever (*onstlag van gewijsde*); and 2% of them had their charges rejected<sup>21</sup>.

The data show that even though criminal law has been rigidly regulated in the Laws, without a clear political will, the conviction will only stop in the formal legal level.

## The Implication of the Correlation between Economic Assessment and Environmental Interests in the Perspective of Ethics

Environment is the most substantial factor for the sustainability of human and the integral dimension of the life itself so that an accountable management is required to show the respect to the integrity of environment. This accountable principle provides accents to the carefulness aiming to give attitudes and views which are oriented on the natural welfare and life sustainability.

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<sup>19</sup> Nagara, Grahat. 2017. "*Perkembangan Sanksi Administratif Dalam Penguatan Perlindungan Lingkungan Terkait Eksploitasi Sumber Daya Alam*". *Jurnal Hukum Lingkungan* Vol.3. Issue 2, page. 21

<sup>20</sup> Soo Wong Kim.2013. "*Kebijakan Hukum Pidana Dalam Upaya Penegakan Hukum Lingkungan Hidup*". *Jurnal Dinamika Hukum* Vol. 13. No. 3, page. 418.

<sup>21</sup> Azam, Deni dan Marsya.2019. "*Reorientasi Penegakan Hukum Pidana Lingkungan Hidup melalui Perjanjian Penanggulangan Penuntutan*." *Jurnal Hukum Lingkungan Indonesia*, Vol. 6, No. 1, page. 73.

Humans in sustaining their life are in the development of needs. This needs development may take place in the next culture, giving response to the biological needs and then new needs in the level of culture which then produces technical instrumental needs, namely the needs on equipment in supporting and fulfilling those new needs.

This development signifies that humans in developing their environment is principally oriented on their own needs instead of paying attention to environmental needs. The natural environment is cultivated and exploited for the sake of human needs. In cultivating the environment, humans need equipment which can support them to tame the nature, ease their work, and save their energy at work. The creation of those equipment is called as technique, while the creation of those equipment is methodologically conducted by applying the laws of sciences called as technology<sup>22</sup>.

However, the reality attempts to provide the facts and descriptions on how the technology created by humans turns out to reduce the respect of humans on the environment by showing the occurrences of exploitations and excessive exploitations of natural resources. The impacts of these exploitations of natural resources vary such as flood, landslide, earthquake, greenhouse effect, and et cetera.

Exploitations and excessive exploitations give probability for the development of environmental crisis which has been the general attention so that it creates the perspective of environmental ethics in order to give directions for humans to change their moral behavior in order to make the environment sustainable. Sonny Keraf stated that environmental ethics do not only discuss about human behavior on the environment, but also the relationship among all life in the universe, namely between humans and humans having impacts on the environment, and humans with other creatures or the overall nature<sup>23</sup>.

Exploitations on natural resources occur by the use of equipment produced by technology advancement motivated by the achievement of effectiveness in gaining maximum advantage in the economic side. The pursuit in economic side is clearly correlated with the theory of anthropocentrism consisting of the credo that humans deserve to obtain moral consideration while other creatures are only used as means in achieving the various goals of humans.

The centralized pursuit of economic side even by the means of disrupting the natural environment at least implies several matters on the morality of humans, namely: (i) respecting money as *episteme*, (ii) justifying all means to achieve the objectives, (iii) losing respect on the environment, and (iv) making possibilities for permissive attitude on corruption.

Firstly, the respect on money as *episteme* has been a trend until the patterns of social relationship are determined by it<sup>24</sup>. Efficiency becomes a priority thus changing the patterns of relationship between human and time. The change is followed with the demand that everything must be instant, immediate, and urgent. Consequently, humans come to acknowledge a new psychology of not respecting wait, not prioritizing patience, and disliking slowness.

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<sup>22</sup> Ignas Kleden. 1987. "*Sikap Ilmiah dan Kritik Kebudayaan*". LP3ES, Jakarta, page. 144.

<sup>23</sup> A. Sonny Keraf. 2010. "*Etika Lingkungan Hidup*". Kompas, Jakarta, page. 41-42.

<sup>24</sup> Haryatmoko. 2010. "*Dominasi Penuh Muslihat, Akar Kekerasan dan Diskriminasi*." Gramedia Pustaka Utama, Jakarta, page. 253.

Labors are demanded to work approximately 8 hours a day in order to raise the production rate by exchanging the time and energy spent by those labors with small amount of money. The raised production is conducted to quickly fulfill the market demand as if time is extremely low, short, and limited. The authority of money and short time logic is what brings forth consumerism. Consumerism which is not balanced with a good work ethic will create opportunities on corruption.

Secondly, justifying all means to achieve objectives. The threat in life these days is that people tend to sacrifice norms for technical interests. Information technology and sophisticated devices have supported human in making more responsible decisions because they minimize the upcoming risks by relying on numbers, precision, and accuracy. Therefore, technique is able to relieve humans from the emergence of risks which are too great<sup>25</sup>.

The development of quasi-autonomous and modern techniques implies that not only the development is difficult to be controlled for human interests, but also the development itself is highly impossible to be stopped or decelerated. Therefore, a new belief that achievements and success are determined by what can be produced again arises. In that belief, every time there is a new technique, any means will be conducted to enable it to be feasible and usable even by sacrificing norms.

Thirdly, the loss of respect norms on the environment. When the economic side becomes the orientation by showing the behaviors of disliking patience, not respecting wait, and the development of techniques which ignore norms, an individualistic, egocentric, and ignorant way of thinking arise up to the point of losing respect to the environment.

The individualistic character ignoring the order of life will keep exploiting the natural resources in various means as if there is a belief that the nature contains infinite resources and the nature will regenerate like humans. In fact, this naïve and commonly misunderstood understanding will lead to the destruction of the future of human generation.

Lastly, the opportunity of the development of permissive attitude on corruption. The stakeholders play a great role in officially implementing something. However, it will be problematic once the authority is abused against the law for instance, AMDAL is often abused for corruption projects through a bureaucratic system. The issue of AMDAL from the authorities for instance has proven to create corruption. One of the corruption cases in the sector of natural resources concerning the issue of mining license (IUP) is the Prosecution of Corruption Crime conducted by the ex-governor of Southeastern Sulawesi, Nur Alam. He was sentenced to 12 years of imprisonment and criminal fine of 1 billion Rupiahs with additional 2.7 billion Rupiahs of criminal fine and the revoke of his political rights for 5 (five) years.<sup>26</sup>

The system which tends to be bureaucratic creates the opportunity of corruption, even more if people have the main orientation on money, ignoring what will happen to others nor environment and justifying all means to achieve their objectives will clearly increase the frequency of corruption in various sectors. Moreover, the law enforcement agency in Indonesia still tends to use the understanding (scientific evidence) in the cases of environmental crime

<sup>25</sup> Juergen Habermas. 1981. "*Technik und Wissenschaft als 'ideologie'*". (Frankfurt a.M.: Suhrkamp), page. 339.

<sup>26</sup> <https://www.bbc.com/indonesia/indonesia-43554605>.

unevenly. Up to this point, the law enforcement agency in Indonesia still uses conventional methods in revealing environmental laws such as forest fire and forest encroachment which affect the environment. There even have been several perpetrators obtaining discharge from legal charge due to the difficulty in the stage of verification.

Based on the 4 previously mentioned attitudes, it can be concluded that all of them are correlated to each other in influencing the relationship between economic evaluation and environmental interest in which ethics become a means to investigate the moralistic behavior to direct the behavior to the *das sollen* (what is supposed to be). As the analytical tools, the researcher used the ethics from Amartya Sen focusing on the idea of freedom. Freedom is important because: (i) the value of freedom is significant in itself, and (ii) freedom serves as a means to achieve goals<sup>27</sup>. Freedom has significant value to itself because if there is a responsibility to be accountable for the freedom, and freedom is a means to achieve goals found in the basic norm of human namely human dignity.

In his book, Sen stated freedom in two aspects, namely (i) process aspect and (ii) real opportunity aspect. The first aspect is the freedom to choose what is good without any coercion from other parties, and the second aspect is that freedom is considered as the ability to achieve something valuable<sup>28</sup>. The term “*ability to achieve*” is referred to as capability. Sen categorized capability into 2 (two) aspects, namely well-being freedom and agency freedom<sup>29</sup>.

Sen defined well-being freedom as the capability to achieve something which determines one’s well-being<sup>30</sup>. Meanwhile, agency freedom is defined as one’s capability to achieve or pursue something valuable<sup>31</sup>. Being valuable means that it is highly respected and valued. The distinction between the two capabilities lies in the meaning that will be achieved. The fundamental idea of agency is closely related to the conception of the good, the supposition used is that the doer holds accountable for the choices which are considered as good<sup>32</sup>.

Sometimes Sen defined agency freedom as an act based on commitment. In a commitment, the doer provides clear limitations and cuts the relationship between the action done and the motif to achieve self-interest<sup>33</sup>. This agency action considers humans as the doers and judges. The aim that will be achieved by well-being freedom is narrower than that of agency freedom because the orientation of well-being freedom leads to advantage<sup>34</sup>.

The four attitudes previously mentioned (respect on money as episteme, justification of all means to achieve objectives, loss of respect on the environment, and permissive attitude on corruption) are the parts of what is referred to by Sen as well-being freedom which focuses on benefits. Consequently, the relationship between economy and environmental interest to be considered as a means to gain benefits.

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<sup>27</sup> Amartya Sen. 1999. “*Development as Freedom*”. Bantam Doubleday Dell Publishing Group Inc Imprint Anchor Books Publication City/Country New York, United States, page. 18.

<sup>28</sup> Sunaryo. 2017. “*Etika Berbasis Kebebasan Amartya sen*”. Gramedia Pustaka Utama, Jakarta, page. 4.

<sup>29</sup> Amartya Sen. 2009. “*The Idea of Justice*”. The Belknap Press of Harvard University Press, page. 289.

<sup>30</sup> Amartya Sen. 1985. “*Commodities and Capability*”. The economic journal, volume 96, Issue 383, page. 201.

<sup>31</sup> *Ibid*, page. 203.

<sup>32</sup> *Ibid*, page. 204.

<sup>33</sup> Amartya Sen. 2009. *Op.cit*, page. 189.

<sup>34</sup> Amartya Sen. 1985. *Op.cit*, page. 208.

The verification in Indonesian context in this case is the mining case in Tanah Laut Kalsel becoming the case of natural resources exploitation. The bribery case of business license of the palm plantation in Buol, in which the regent of Buol received 3 billion rupiahs from PT. Hardaya Inti. The bribery case of natural gas purchase for the power plants in Gresik and Gilir Timur is also one of the examples. The gas was obtained from the point in Bangkalan Regency and Indonesia Corruption Watch (KPK) declared the ex-regent of Bangkalan, Fuad Amin, as the suspect. Fuad was arrested when he served as the chairperson of Bangkalan Regional People's Representative Council (DPRD). Fuad received bribe from the director of PT MKS, Antonio Bambang Djatmiko who was also declared as the suspect of bribe giver. The bribery case of the modification of forest area in Bogor also serves as an example of this case.

This opportunity to gain benefits clearly influences the quality of human which is understandable because humans also rely on their environment and the quality of humans highly dependent on the quality of their environment<sup>35</sup>. Therefore, the explanation of human quality cannot be conducted optimally without any explanation on the environment where they live in<sup>36</sup>. In general, environment can be divided into three types, namely physical environment (nature), environment of idea (and information), and social environment. In this context, development is defined as the effort to adjust the environment to be more harmonious with human needs.

The ever-changing physical environment is undeniably must be responded with renewed view, understanding, and orientation in one side and on the other hand, social organizations failing to adapt with the change of physical environment (due to the fast changes) will gradually stop functioning and cease to exist.

It might be easier to imagine that if the efforts to develop the physical environment is stuck in self-interests with economic motives, it will lead to the degrading quality of humans such as seeing people as object instead of subject, laziness due to warm weather, and rebellious mentality of students due to the stagnant school development which is caused by corruption mean that there is not any guidance and character building in the education and other sectors.

The degrading human quality is asymmetrical with the real opportunity aspect stated by Sen because one does not possess the freedom to the ability to achieve something considered as valuable. In the environment considered as important for the platform of life and the whole social order where rites and liturgies to the ancestors and spirits through the nature in the commoners has vanished due to the exploitation for self-interest. In the perspective of process aspect, the commoners are forced to accept the exploitation for the jargon "national development" where twist of truth, injustice, and petty self-interests besmirching human dignity are hidden behind it.

Development should be a process of freedom expansion through the entitlement of human basic rights in one side and human development on the other side by prioritizing freedom as the objectives and instruments of development. The category of development success particularly in which humans serve as its subject, has improving freedom as stated by Sen.

The relationship between economy and factual environmental interest causes negative effects for the development of human quality. Thus, in the ethical perspective of Sen, in

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<sup>35</sup> Ignas Kleden. Op.cit. page. 127

<sup>36</sup> Nico L, Kana. 1984. "*Insan Budaya Mencerminkan Mutu Manusia*". HIPIS, Palembang, page. 4-5.

development (the existence of relationship between economy and environment does not matter) must prioritize the basic freedom of human and eliminate the sources of unfreedom such as poverty, minimum economic opportunities, systematic ignorance, or other factors causing one to have less opportunities or choices to carry out his/her passion of development.

The process of development must revolve around the components of freedom, namely: political freedom, freedom of speech, equality before the law, and finally distribution of human rights (HAM). In this case, development serves as the effort to create an environment which enables the people living in its to enjoy a creative, healthy, and long-lasting life. The development of production and income is just a tool, while the final objective of development must be the human itself.

### **Summary**

In ecological discourse, instruments regulating the economic valuation which explicitly regulates economic cost and social cost is required. In the context of Indonesia, economic valuation is considered as mere formality, without any scientific data testing.

Therefore, the basis of the relationship between economic valuation and factual environmental interest gives negative excess for the development of human quality. According to the ethics of Sen, development (the existence of relationship between economy and environment does not matter) must improve human basic freedom and eliminate sources of unfreedom such as poverty, minimum economic opportunities, systematic ignorance, or other factors causing one to have less opportunities or choices to carry out his/her passion of development. The process of development must revolve around the components of freedom, namely: political freedom, freedom of speech, equality before the law, and finally distribution of human rights (HAM).

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