

The Role of Environmental Communication in Overcoming the Impact of Foreign Investment in Jepara

Yuni Retnowati

STIKOM , Jl. Laksda Adisucipto Km 6,5 No 279 Yogyakarta, Indonesia, Phone 08175411067, e-mail :yuniwati67@gmail.com

Abstract

The investment increasing of foreign manufacturing industry in Jepara has caused environmental problems such as pollution and abrasion. The rhetorical tradition is used to review this problem. The focus of rhetoric has been extended to include all human ways in using symbols to influence the surrounding in building the world in where they live. The concept used in applying the rhetoric theory in the case that occurred in Jepara was environmental communication which would analyze cases of environmental pollution caused by industrial waste and abrasion caused by iron sand mining. The pragmatic function of environmental communication leads to educational, persuasion, mobilizing, and warning to overcome environmental problems. This research was a study of literature by searching for references to theories related to cases or problems which are found. References to theories obtained through the research of study of literature become the basic foundation and main means in analyzing problems in the research. Te result of study of literature in this research showed that the activity carried out is to intensify social campaigns related to environmental issues, conduct counseling and most importantly, improving government relations in conducting advocacy to encourage a policy that is pro on environmental issues

Keywords : pollution, investment, rhetoric tradition, environmental communication

Introduction

The development of foreign manufacturing industry investment in Jepara continues to increase. The investment value from 2013-2015 was IDR 1.5 trillion with 373 companies spread throughout the Jepara Regency. In 2016 foreign investment (FDI) rose to Rp. 3.15 trillion (kabupatenjepara.go.id). The presence of these foreign companies absorb thousands of local workers thus threatening the sustainability of the furniture industry which has been the icon of the Jepara Regency. Many furniture workers eventually chose to work in a factory with a much larger income. Furniture companies have difficulty getting labor. Moreover, the garment industry absorbs a lot of female workers who have been the backbone of the furniture industry in woodworking work.

In addition to the problem of labor availability, the expansion of factory construction is threatens the agricultural sector. Some industrial estates are built on productive agricultural land and damage irrigation systems. So far, it has been found by companies whose waste management is still not environmentally friendly. Liquid waste pollutes the river until the color is blackened. Liquid waste disposed of into the environment can reduce environmental quality or damage the water ecosystem.

Iron sand mining in Mulyorejo Hamlet, Bandungharjo Village, Donorojo Subdistrict also caused problems that triggered conflict. Citizens' anger was carried out by destroying and demanding the cancellation of mining permits by CV Guci Mas Nusantara which had an area of 14 hectares of mining permits and PT. Alam Mineral Lestari with a permit area of 200 hectares located in three villages namely Bandungharjo, Banyumanis, and Ujungwatu. The reason for the rejection by the residents is because they are concerned about the abrasion caused by the mining area which directly borders the coast. Abrasion not only threatens settlements but also agricultural land and farm land which are the foundation of their livelihoods. Environmental damage from mining means threatening their lives. The refusal was also carried out by farmers because mining would damage the rice fields and disrupt access to irrigation.

The large number of investors who open businesses in the Jepara region is supported by the ease of the licensing process and investment climate. The number of investments that enter Jepara is expected to improve the welfare and standard of living of the people. The only negative consequence that happens is the reduced availability of labor for the furniture industry and other small and medium enterprises. It is unfortunate if the furniture industry suffers from a lack of workforce. Historically Jepara is known as a city of carving and earned the nickname of the World Carving Center after successfully making a record in the field of carving wood

together the most in the world. The impact of environmental pollution is also a serious threat in the future.

The incessant FDI investment in Jepara without analysis of economic, social and environmental impacts has caused various problems. The government does not conduct in-depth studies to regulate selection and control of incoming investors. They just pursue the increase in the value of investment without considering the socio-economic and environmental impacts for the local community. Investment in the field of natural resource management should also not exploit nature which results in damage to the ecosystem and threatens the survival of the community

Method

This research is a study of literature by searching for references to theories related to cases or problems of environmental pollution. References to theories were searched through reputable international journal and books considered to be relevant. The identified aspects from this literature include environmental communication, development communication and communication strategy.

Result and Discussion

1.1. Rhetorical Tradition Perspective

Investment in Jepara raises various problems that must be addressed immediately. The rhetorical tradition is used to review this problem. The focus of the rhetoric has been extended to cover all human ways of using symbols to influence the surrounding environment to build the world in which they live.

The center of the rhetorical tradition is the five great works of rhetoric, namely discovery, arrangement, delivery style and memory. Changes to the rhetoric extended to these five great works. Discovery refers to conceptualization, namely the process when we determine the meaning of a symbol through interpretation, response to facts through interpretation of the categories we use. Compilation is the arrangement of symbols or compiling information in relationships between people, symbols and related contexts. Style relates to all related assumptions in the presentation of all the symbols, from choosing the symbol system to the meaning we mean to all the symbols starting from the words and actions to the clothes and furniture. Submission becomes the embodiment of symbols in physical form, including non verbal choices for speaking, writing and mediating messages. Memory includes remembering culture as a perception process that influences how we store and process information (Littlejohn and Foss, 2009: 73).

Rhetorical traditions pay attention to aspects of making messages or symbols. The main principle is how to use the right symbols in conveying intentions. If using media, it will be related to the process of making policy decisions, designing programs and determining graphics. Given the principle that the right message will be able to achieve communicator intentions, the ability to design adequate messages is an important concern.

Value factors, ideology, culture are the determining factors in making messages, both in media organizations and individuals. The message is generated through a process that involves certain values, interests and life views of humans that produce messages. The rhetorical tradition can explain the context of interpersonal communication and mass communication. Attention is paid to how the process of designing message content is adequate so that the communication process can take place effectively.

Logical and emotional attraction is a special feature of the theory of rhetoric. This tradition views the activities of the communicator as governed by art and methods. This is based on the assumption that we are very strong and powerful. For this reason, information becomes important in making decisions so that communication can be improved and evaluated. The concept used to apply the theory of rhetoric in the case that occured in Jepara was environmental communication. This was used to analyze cases of environmental pollution caused by industrial waste.

1.2. The Role of Environmental Communication

Environmental problems are problems with high complexity. Handling environmental issues requires effective communication. Environmental communication is a field of communication science studies that first appeared in the United States in the 1980s and comes from the tradition of rhetorical theory. Cox (2010: 20) defines environmental communication as a means that functions pragmatically and constitutively to understand the environment and relations with the environment.

The pragmatic function of environmental communication leads to things that are educational, persuasive, mobilizing, and warning to overcome environmental problems. It is also called as management tool. Ariestya (2017) calls it a strategic function with the main activities in the form of campaigns and awareness raising of the public to care about the environment. The goal is to teach, invite and encourage relevant parties (government, private sector, community) to participate in addressing environmental problems. This is done by intensifying social campaigns related to environmental issues, conducting counseling and most importantly, improving government relations in advocating for policies that are pro on environmental issues.

Meanwhile, the constitutive function of environmental communication can be seen in efforts to form, write, or represent nature as an environmental problem and make them the subject of understanding. Therefore environmental communication is used to form perceptions of someone towards their environment. Ariestya

(2017) calls it a technical function. The goal is to provide information to the public about environmental problems.

The purpose of environmental communication is to create planning strategies through communication processes and media products to support effective policy making, encourage public participation, and implement environmental sustainability projects (OECD, 1999: 9-11). In making these plans and strategies, interaction that takes two directions is needed. It is intended that understanding the key environmental factors and their relationships emerge so that they can respond to problems in the right way. Communication will play a crucial role throughout the policy and program life cycle of recognizing - gaining control over - solving - and maintaining control over an environmental problem

The aspects that build environmental communication are Non-Formal Environmental Education (NFEE) in the form of teaching processes that include knowledge, values, socio-economics, and technical abilities related to procedures that facilitate changes in values and practices that promote sustainable development as problem solving (OECD, 1999: 8). NFEE is expected to be able to walk together with environmental communication into a power that can impact the emergence of perceptions and criteria that can be chosen.

Another aspect that builds environmental communication is symbolic action. Departing from the Shannon-Weaver model, symbolic action assumes that language and symbols actively shape one's understanding, shape our meanings, and orient us towards this vast world (Cox, 2010: 20). Symbolic actions will also be brought to the public space to bring up certain discussions regarding the environment.

Environmental Communication (EC) is usually connected with environmental education, public participation and environmental politics. More generally, EC is the communication of environmental data and information between various audiences using different media. Such communication is the foundation for establishing relationships between people and the environment and a means for enhancing environmental literacy and sustainable environmental practices (Environmental Communication Resource Center 2000).

Communication as a symbolic action means that it is used by a variety of codes by humans to interact with others, namely codes that are verbal and non verbal. Fawles and Alexander in Sunarwinandi (2000: 57) interpret communication as a symbolic action that can be formulated as symbolic behavior which results in various degrees of division together meaning and value among the perpetrators.

Two cases of river pollution that disturbed residents were pollution of the Gede River in Karangrandu Village, Pecangaan District by liquid waste from PT Jiale's textile industry and pollution in the Karangrandu river in Gemulung Village, Pecangaan District due to the burning of PT Samwon Busana Indonesia's waste. Both cases can be approached with an environmental communication approach. Pragmatic and constructive functions can be used to explain this case from the perspective of environmental communication.

1. Pragmatic or strategic functions

This function is carried out by inviting relevant parties to participate in overcoming environmental problems. The establishment of the Jepara Peduli Lingkungan (Jamaspara) Community Network is a form of concern for environmental sustainability. Jamaspara has asked the District Government (Pemkab) of Jepara to tighten supervision of waste management in a number of companies in Jepara. This was triggered by weak government oversight of the mushrooming of the company along with the increase in investment. In addition, Jamaspara also asked the Jepara Regency Government to conduct independent and reliable laboratory tests for pollution of the Karangandu river caused by the burning of PT Samwon Busana Indonesia's waste. So far, supervision has only relied on reports from companies that conducted tests with designated private laboratories.

2. Constructive or technical functions

Publicizing this river pollution case through various media to raise this issue becomes a common understanding and shapes the community's perception of the issue. The pollution of the river Gede Karangrandu Village Pecangaan District since 2015 has finally become a big issue in Central Java. This effort turned out to be successful in attracting the attention of the central government. This was evidenced by the follow-up in the form of a visit made by five members of the House of Representatives Commission VII followed by the handling by the Ministry of Environment and Forestry (KLHK). The problem should be resolved at the district level through the Environmental Agency. The pollution of river water is due to PT Jiale dumping waste carelessly. The results of the study found phenol pollution and detergent. Water quality is classified as class 3 but can be used for watering and buffalo bathing. Jepara District Government is considered weak in monitoring environmental aspects of the factory.

Public awareness of the need to preserve the environment is good enough. Understanding of the importance of the environment for human life encourages people to care for the environment. At the same time, the emergence of foreign companies that invest a lot of capital in Jepara causes side effects in the form of waste. While the Jepara Regency government does not yet have a policy on industrial waste. The competence of the Environmental Agency in handling pollution cases due to industrial waste is also still weak.

At first the local community also did not understand the impact of river pollution. Environmental pollution has occurred in the village of Troso Pecangaan originating from traditional tie weaving industry activities that produce liquid waste from the process of coloring threads and fabrics using textile dyes containing chemicals. River pollution can be seen from the changing color of the river in accordance with the color of the flow of industrial effluents which are flowed and the unpleasant odor that disturbs the surrounding community.

Through the dissemination of information about environmental issues, the public is aware of the effects of pollution that could endanger their survival. Liquid waste that flows into the river can damage the quality of river water, disturbing and even damaging aquatic ecosystems that can affect the death of existing living creatures and can spread disease around the waters. While liquid waste that seeps into the surface of the soil can damage the soil, especially its fertility and water sources in it. Over time the waste will seep into the community well drains so that well water will be contaminated by organic and inorganic compounds that can disrupt human health and even cause death. In addition, if we live on contaminated soil and consume everything from it, it will endanger the health of the body and can cause various diseases such as diarrhea and dysentery.

Non-Formal Environmental Education (NFEE) in the form of counseling and reporting in the mass media teaches knowledge about the effects of environmental pollution. This knowledge underlies attitudes and behaviors in dealing with environmental issues after forming people's perceptions.

Considering program in handling pollution, it should involve stakeholder. There is growing empirical evidence that incorporating stakeholders' appeals into the decision-making process is a crucial step in the mitigation of environmental conflicts (Burger, 2002; Song, 2008; Takshe et al., 2010). The involvement of environmental stakeholders can contribute to improved public health and reduced environmental conflicts (Cook, 2007).

Understanding the differences of stakeholders' environmental appeals in the process-based pollution diffusions is vital for environmental policy-making. Many demographic factors (such as age, education level, gender, occupation, residential location and income) can significantly shape the environmental attitudes of stakeholders (Dong et al., 2011; Qu et al., 2009; Song, 2008; Wakefield et al., 2006), and the perception and communication of information about environmental risks plays an important role in environmental knowledge translation (Lahr and Kooistra, 2010; Pablos-Mendez et al., 2005). Some studies have found that the details of perceived pollution and the social context may affect the environmental actions which are taken (Rooij, 2010; Slovic, 1997).

1.3. Symbolic Actions in Environmental Communication

Symbolic actions here are nothing but verbal and non-verbal communication used in discussions in the public space regarding the issue of environmental pollution in the Jepara region. The community as the perpetrators of symbolic actions express through communication with the central and regional governments. Verbal communication takes place face to face and media. Face-to-face communication was carried out when the community members asked for a solution to the river pollution problem by a textile company which is a PMA company in Jepara. While non-verbal communication is carried out through the reporting mechanism to the Jepara Environmental Agency. In addition, reporting in the mass media regarding the issue of river pollution by the textile industry waste can also be categorized as verbal symbolic action that is media.

Symbolic action involves the sharing of meaning and value among actors. This can be understood because each action represents certain values. Here the value believed is the relationship between humans and nature must be harmonious for the survival of all living things and the preservation of nature. While the meaning of actions taken by the community is an effort to invite all parties involved to care about environmental sustainability by preventing the occurrence of environmental pollution by industrial waste.

The government shows symbolic action in responding to people's aspirations. Receiving complaints, reporting and proposals from the public requires handling even though in this case the Jepara Regency seems passive in responding to community complaints. Instead the central government is faster in responding to reports related to environmental pollution in Jepara.

The meaning and value of society is different from the meaning and value of local government in addressing environmental pollution. For the community, nature is a comfortable place to live together. The value of sustainability, usefulness and comfort are priorities in dealing with nature. The government sees nature as a resource that can be used to increase regional income. The value of benefits becomes important in looking at nature. With this difference in meaning and value, the potential to cause conflict.

Conclusion

Investment in Jepara provides two different sides. Increased regional income, economic growth and employment are the good side. While the bad side is the impact on industrial waste that causes environmental pollution, environmental damage due to the use of natural resources for iron sand mining, and lack of labor for SMEs Jepara carved furniture because labor is absorbed by large companies that emerge and offer higher salaries.

The community cannot stay silent in facing social, economic and environmental changes that follow investment in Jepara. The rhetorical tradition explains how people fight for their rights over natural resources

Proceeding of The 5^{th} Conference on Communication, Culture and Media Studies **(CCCMS) 2019**

through refusing iron sand mining even though it ends in failure. At least they have tried to open the eyes of the ruler for violations committed against the rights of the people. This case also shows that the granting of iron sand mining permits is not in accordance with the latest development process that involves people's participation in decision making. Participatory communication did not occur so that conflicts arose that triggered acts of violence by the community to stop iron sand mining activities.

The threat to the continuity of the Jepara carved furniture industry, which is mostly run by small enterprises, are caused by losing competitiveness in obtaining labor. The young generation began to abandon their ancestral traditions to preserve carving because of a small salary. The attractiveness of large salaries from foreign companies makes them reluctant to pursue carving, which is an icon of the city of Jepara which has even gained recognition as the world carving center. The Indonesian Furniture and Craft Industry Association urges protection from the government for the survival of small enterprises carved furniture in Jepara. The solution is there but its implementation requires the support of all parties, both the community and the government. A series of policies that have ever existed before must be followed up with real action. If there is no safeguarding and preservation of carving art, it will eventually become extinct.

Environmental communication answers environmental problems related to river pollution in Pecangaan Jepara Subdistrict caused by liquid waste from the textile industry owned by foreign investment companies from Korea. Public awareness of the dangers of pollution gives birth to the courage to ask the government to take serious measures through policy making that is in favor of environmental sustainability. Through a network of people who care about environmental issues, community aspirations are conveyed to the government.

Reference

- Ariestya, Angga. 2017. Asking the Existence of Environmental Communication In Indonesia. www.kompas. com . 18 September. 2017. Retrieved 27 December 2017. (in Bahasa)
- Burger, J., 2002. Restoration, Stewardship, Environmental Health, and Policy: Understanding Stakeholders' Perceptions. *Environmental Management*. 30 (5), 631-640.
- Cook, S., 2007. Putting Health Back in China's Development. China Perspective. 3, 100-108.
- Cox, R. 2010. Environmental Communication and The Public Sphere. London : Sage Publication.
- Dong, Y.L., Ishikawa, M., Liu, X.B., Hamori, S., 2011. The Determinants of Citizen Complaints on Environmental Pollution: An Empirical Study From China. J. *Cleaner Production* 19 (12), 1306-1314
- Lahr, J., Kooistra, L., 2010. Environmental Risk Mapping of Pollutants: State of the Art and Communication Aspects. *Sci. Total Environment*. 408 (18), 3899-3907.

Littlejohn, S. W., & Foss, K.A. 2009. Encyclopedia of Communication Theory. London : Sage Publication.

- -----. Communication Theory. Translated by Muhammad Yusuf Hamdan. Jakarta : Salemba Humanika (in Bahasa)
- OECD. 1999. Environmental Communication: Applying Communication Tools Towards Sustainable Development. : OECD Publication.
- Pablos-Mendez, A., Chunharas, S., Lansang, M.A., Shademani, R., Tugwell, P., 2005. Knowledge Translation in Global Health. Bull. World Health Organization. 83 (10), 723
- Qu, T., Zhang, Y., Liu, R., Dong, M.L., 2009. Social Effect of Environmental Pollution On Valley-Cities in Western China. Chin. Geographical Science .19 (1), 8-16.
- Rooij, B.V., 2010. The People vs. Pollution: Understanding Citizen Action Against Pollution in China. J. *Contemporer China* 19 (63), 55-77.

Slovic, P., 1997. Public Perception of Risk. J. Environmental Health 59 (9), 22-29.

- Song, L., 2008. *The Development of Risk Communication in Emergency River Pollution Accidents in China*. The Royal Institute of Technology. Stockholm
- Sunarwinadi, I. 2000. Intercultural Communication. Jakarta: Inter-University Center. Social Sciences Indonesia University. (in Bahasa)
- Takshe, A.A., Huby, M., Frantzi, S., Lovett, J.C., 2010. Dealing with Pollution from Conflict: Analysis of Discourses Around the 2006 Lebanon Oil Spill. *J. Environ. Manage*. 91, 887-896
- Wakefield, S.E., Elliott, S.J., Eyles, J.D., Cole, D.C., 2006. Taking Environmental Action: The Role of Local Composition, Context, and Collective. *Environmental Management* 37 (1), 40-53.