GOVERNMENT PERCEPTION OF FISHERMEN AND APARATURES ON IMPLEMENTATION OF CANTRANG CAPACITY BANSING POLICY IN THE LAMPUNG BAY

By

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ABSTRACT

The policy to prohibit cantrang fishing gear is intended to prevent excessive exploitation of fish resources, environmental degradation and conflicts between fishermen, but fishermen and government officials' perceptions of the policy are not the same. The purpose of this study was to analyze the perceptions of fishermen and government officials on the implementation of the prohibition of cantrang fishing gear policy in Lampung Bay. Data collection was carried out by interviewing 30 fishermen and 30 government officials. The data obtained were analyzed using a Likert scale and polarized between the perceptions of fishermen and government officials. The results showed that fishermen's perceptions of the successful implementation of cantrang fishing gear prohibition policies were influenced by the attitude of the implementers and the inaccurate standards and policy targets / policy size and objectives. This is in accordance with the fishermen's refusal to prohibit cantrang fishing gear policy by continuing to operationalize cantrang fishing gear. The perception of the government apparatus the high influence of the economic, social and political environment has an influence on the successful implementation of cantrang fishing gear prohibition policies. Perceptions between fishermen and government officials who are not in harmony cause the failure of the cantrang fishing gear prohibition policy in Lampung Bay. Thus it is necessary to review the policy of prohibiting fishing gear cantrang and strategic steps for its implementation.

Keywords: policy, policy implementation, cantrang, perception, Lampung Bay

PRELIMINARY

The potential of marine and fisheries in Indonesia can improve the economy of fishermen even though in reality it has not been able to reduce the poverty level of coastal communities (Dahuri, 2003; Sukmawati, 2008; Satria, 2015; Andryana, 2016). One of the utilization of fisheries resources is done by fishing using various kinds of fishing gear that have different productivity and fishing areas. The level of productivity of fishing gear can affect the level of welfare of fishermen (Sukmawati, 2008; Yapanani*et al.*, 2013; Aji*et al.*, 2013; Zamron, 2015; Ermawati*et al.*, 2015; Satria, 2015; Andryana, 2016).

One of fishing gear favored by fishermen is cantrang fishing gear which is considered to have high productivity and maintenance of fishing gear is relatively easy. Cantrang is a net-shaped fishing gear, has wings, body and pockets, does not use a net opening, capture area in a flat water area with muddy or sandy substrate, not rocky (Subani et al, 1989; Bambang, 2006).

But in the course of fishing gear cantrang considered to cause degradation and destructive to the environment and fish resources. At present, the use of marine wealth is feared to accelerate the decline in the carrying capacity of fish and ecosystem resources. According to FAO in Satria (2015), 90% of the world's fisheries stocks are in an alarming condition, 61% have experienced fully exploited and the remaining 29% are over exploited.

Utilization of resources must be accompanied by policies to avoid damage to the environment, the decline in fish resources and ecosystems. Policy deliberately done to solve a particular problem (Wahab, 2012). Policy implementation is one that is identified within the scope of the policy process (Kartodihardjo, 2017). Analysis and implementation are crucial stages in the policy making process (Dunn, 1991; Tarigan, 2000; Wibawa et al, 1994; Grindle, 1980).

To overcome the decline in fish and environmental resources by cantrang fishing gear, the government has established a policy prohibiting cantrang through the Minister of Maritime Affairs and Fisheries Republic of Indonesia Regulation Number: 71 / Permen-KP / 2016. This policy was rejected by fishermen so that it was deemed unsuccessful in its implementation. The response of fishermen to the prohibition of cantrang fishing gear is based on the perception of each fisherman. Perception is the process by which the brain interprets sensory impressions, selective attention, filters out irrelevant stimuli, directives for someone to behave, views responding to the information around them (Vander, 1984; Nevid, 2013; Myers, 2013;). The purpose of this study was to analyze the perceptions of fishermen and government officials on the implementation of the prohibition of cantrang fishing gear policy in Lampung Bay.

METHOD

The research location is in Lampung Bay with the loading / unloading port of the cantrang ship at the Lempasing Coastal Fishery Port (PPP), Bandar Lampung City. The study was conducted in January-June 2019. Data were collected through interviews using questionnaires, observations, and documentation studies. Interviews were conducted with 30 government officials and 30 fishermen (ship owners, ship management, skipper, Head of Engine Room / KKM and Ship Men / ABK).

Data on the perception of fishermen and government officials were analyzed using a Likert Scale of standards, policy targets / measures, and policy objectives; policy sources; characteristics or nature of the implementing agency / agency; communication between organizations related to implementation activities; the attitude of the implementers; and the economic, social and political environment of implementing the prohibiting fishing gear policy. Likert scale is used to measure the attitudes, opinions, and perceptions of a person or group of people about social phenomena (Sugiyono, 2014). The questionnaire contains a perception assessment with a Likert Scale where 5 (five) alternative answers are available in accordance with Table 1. Further analysis was carried out using the Polarization Graph from Myers et al. (1976); Sabir (2018) to study the polarization of perceptions among fishermen and government officials. Polarization graphs are used to look at the distribution and differences in perception values between 2 different groups on the same research variable (Kesuma, 2019)

Table 1. Likert scale used in research on the perception of fishermen and government officials on the implementation of the prohibition policy on cantrang fishing gear

1
2
3
4
5

Source:Sugiyono (2014).

The calculation formula used in Likert scale data analysis in Microsoft Excel is : 1. The Likert scale calculation formula uses 5 alternative answers

 $NL = \Sigma (n1 x 1) + (n2 x 2) + (n3 x 3) + (n4 x 4) + (n5 x 5)$

Information:

NL = Likert scale scoring value

- n =Number of answer scores (alternative Likert score to 5)
- 2. The average calculation formula for each aspect of the question

Q = NL/30

Information :

Q = Average of each aspect of the question NL = Likert scale scoring value

30 =Number of respondent samples

3. The final grade formula for each aspect

NA = Q1 + Q2 + Q3 + Q4 + Q5

Information :

NA = Final score

Q = Average of each aspect of the question (Likert uses a scale of 5)

Source : Sugiyono (2014)

RESULTS AND DISCUSSION

General Conditions of Location

The Lampung Bay coastal area is administratively located in Bandar Lampung City, Pesawaran Regency, and South Lampung Regency. The area of water in this region is 161,178 ha (Table 2). This area is a place to live and a source of livelihood for fishermen and fish farmers. In 2007 in the coastal area of Lampung Bay there were 2,336 fishery households (RTP). The highest number of FHs is in Bandar Lampung City (West Betung Bay and South Betung Districts), which is 1,760 FHs (55% of Lampung Bay). In 2018 there were 3,653 FHs with the most number of FHs in South Lampung Regency, namely 1,589 FHs or 43.49% (Department of Maritime Affairs and Fisheries of Lampung

Table 2.Extensive waters of the Lampung Bay coastal area					
No.	Depth (m)	Large (ha)	Percentage (%)		
1	0-20	37.797	23,45		
2	20-25	48.172	29,89		
3	25-30	32.432	20,12		
4	30-50	40.290	25,00		
5	50-80	2.369	1,47		
6	>80	119	0,07		
	Total	161.178	100,00		

Province, 2019). This is inseparable from the availability of infrastructure needed by fishermen such as fishing ports and supporting facilities.

Source : Damai (2012)

Lampung Bay waters are inhabited by various types of fish, both demersal and pelagic. The results of the Research Center for Oceanographic Research and Development (2000) in the Department of Fisheries and Maritime Affairs of the Province of Lampung (2007) showed that in five locations of observation in Lampung Bay there were 7,072 individuals from 31 tribes and 162 species of fish, 40 of which were target fish (food). The "major fish" category consists of 22 tribes with 160 species. The target fish consists of 9 tribes and 10 species, while the indicator fish consists of 1 tribe with the 16 highest abundance species of fish found on the western side of Pahawang Island with a value of 1,556 individuals. Based on fish category, the highest abundance of "major" fish abundance was found on the western side of Tegal Island, and the highest indicator fish abundance was 31 individuals found on the eastern side of Puhawang Island. The highest number of "major" fish species is found on the east side of Legundi Island, while the highest target fish and indicator species are found on Sebuku Island on the west side.

The fishing fleet operating in Lampung Bay is approaching 2,500 units, with various types and sizes of ships, both motorized and non-motorized. The type of small motorized vessels (<5 tons and 5-10 tons) is the type of boat that is most operated by fishermen, because the Lampung Bay fishermen are dominated by small fishermen (artisanal), and generally go to sea in just one day (one day fishing). Larger vessels (10-20 tons and > 20 tons), are groups of fishermen operating outside the Gulf of Lampung (Semangka Bay, Sunda Strait, West and East waters of Lampung, or to the Java Sea), and the coastal areas of the Gulf Lampung is only a place to land and live (fishing base). In 2019 cantrang vessels operating around Lampung Bay will be under 30 GT with a total of 28 units. Usually manned by a skipper and Head of the Machine Room (KKM), with a number of crew (ABK) ranging from 10-15 people per ship. They carry out loading and unloading activities at the Lempasing Beach Fishing Port, Bandar Lampung City. Fish catch does not go into the Fish Auction Place (TPI), but is directly sold in unloading docks so that the capture fisheries production data is not recorded and there is no PAD (Regional Original Revenue). On the other hand, if fish caught by cantrang at auction at TPI will become legality for the existence of cantrang vessels, while regulations for prohibiting cantrang fishing gear have been established.

Fishermen and Government's Perception on the Implementation of Cantrang Fishing Gear Banning Policy

From the research conducted, the results obtained as in Table 3, where perceptions between fishermen and the government are not the same in understanding and implementing cantrang prohibition policies.

No.	Research Variable	Average Score	
		Fisherman	Government
1	Policy Standards and Targets / Policy		
	Measures & Objectives	2	3
2	Resource	2	3
3	Characteristics or nature of the Implementing Agency / Agency	2	3
4	Communication between Organizations		
	related to Implementation Activities	2	3
5	The attitude of the Implementers	4	3
6	Economic, social and political environment	3	4

Keterangan: (1: Very Disagree), (2: Disagree), (3: Average), (4: Agree), (5:

VeryAgree)

Some differences in perception between fishermen and government officials can be described based on the following variables:

1. Policy standards and objectives / measures and policy objectives

Fishermen disagree with policy standards and targets / measures and policy objectives, arguing that cantrang fishing gear is not degradative and destructive to the environment and fish resources because cantrang fishing gear is operated on mud or sand substrates, not on rocks / coral reefs, in accordance with opinion of Subani et al, (1989); Bambang, (2006). While the government's goal to prohibit the use of cantrang fishing gear is to protect fish resources and the environment. The size and objectives of the policy according to the fishermen are unrealistic and do not consider the socioculture at the policy implementation level (fishermen). According to Agustino (2006), policies that are too ideal (utopian) will be difficult to realize.

2. Resource

From the results of the study it turns out that fishermen also do not agree with the resources owned by the government for the implementation of policies in the field. Human resources, financial resources and time are not sufficient to implement cantrang fishing gear prohibition policies. While the government apparatus is neutral towards the resource variable.

3. Characteristics or nature of the implementing agency / agency

Related to the characteristics or nature of the implementing agency / agency, according to the fishermen, they also do not agree with the current conditions in which implementing agents (formal or informal) involved in implementing policies are required to be strict and disciplined, although in other contexts democratic and

persuasive attitudes are needed. According to fishermen, currently the implementing agency (government) is not strict in carrying out the Standard Operating Procedures (SOPs) that are made so that there is a difference in treatment in the field. The facts on the ground show that the government does not act firmly and take legal action against fishermen who still use cantrang fishing gear, even in some areas it is permissible to use cantrang fishing gear (Central and East Java).

4. Communication between organizations is related to implementation activities

Regarding communication between organizations related to the current implementation activities, fishermen do not agree because of the lack of socialization and other forms of communication conveyed by the government regarding the prohibition of fishing gear cantrang to fishermen. While the perception of government officials is neutral in assessing the implementation of communication. Communication is needed in the framework of delivering information to policy recipients starting from the standards, objectives, policy objectives and others. The better coordination and communication between the implementing agent and the recipient of the policy, the smaller the error, and vice versa.

5. The attitude of the implementers

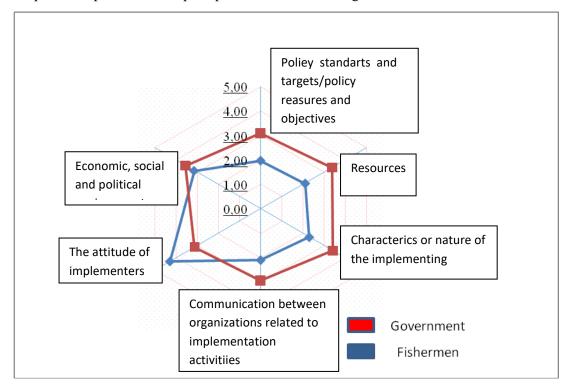
According to fishermen, the attitude of the implementers that most influences the successful implementation of a policy. While the government parature assesses neutral towards the variable attitude of the implementers. This is consistent with the facts on the ground where the attitude of fishermen who reject the prohibition of fishing gear cantrang policy causes the implementation of the policy to fail. The refusal of fishermen is shown by the still operating of cantrang vessels in the Gulf of Lampung and its surroundings, rejecting replacement fishing gear and conducting mass demonstration activities asking that the prohibition of cantrang fishing gear be lifted. The attitude of the implementers is decisive in the successful implementation of a policy. An attitude that refuses to make a major contribution to the failure of implementing cantrang fishing gear prohibition policies in fishing communities. This can happen because the contents of the policy are considered "top-down" which is very possible decision makers (the government) do not understand and do not touch the needs, desires or problems that must be resolved. According to Van Meter and Van Horn (1975), the attitude of the implementers is influenced by his views on a policy and how to see the influence of the policy on personal or group interests. Policy implementation begins with filtering through the perception of the implementer within the limits where the policy is implemented. There are 3 things that influence the implementation of policies in implementing a policy, namely: 1) knowledge, understanding and deepening; 2) the direction of the response whether to accept, neutral or reject; 3) the intensity of the policy.

6. Economic, social and political environment

Fishermen's perception of the influence of the economic, social and political environment on the implementation of the policy of prohibiting moderate / neutral fishing gear. This means that the economic, social and political environment does not influence the implementation of cantrang fishing gear prohibition policies today because economically fishermen still earn income from cantrang fishing gear that they operate even though it has been banned by the government. The government apparatus

believes that the economic, social and political environment influences the successful implementation of the prohibition of fishing gear. This means that a conducive economic, social and political environment can make policy implementation successful in society, and vice versa. Current conditions, many fishermen demonstrations are politically charged so that the political environment is not conducive and can interfere with the successful implementation of cantrang fishing gear prohibition policies.

The polarization graph shows the perceptions between fishermen and government officials are not aligned or not the same as Graph 1. The most opposing opinion between the two is the attitude of the implementers and the economic, social and political environment. Of the 6 (six) variables studied, none of the fishermen and government perceptions were the same.



Graph 1. The polarization of perception of fishermen and government officials

CONCLUSION

The perception of fishermen and government officials are not aligned in viewing and accepting policies so that it becomes the cause of the unsuccessful implementation of the prohibition of cantrang fishing gear in Lampung Bay. For fishermen, cantrang fishing gear is economically beneficial, considered to be non-degradative and destructive to the environment and fish resources. The government believes cantrang fishing gear threatens the preservation of fish resources and damages the aquatic environment. The implementation of the prohibition of cantrang fishing gear in Lampung Bay was unsuccessful due to the operation of cantrang vessels as a form of fishermen's rejection of the policy. Thus it is necessary to review the policy of prohibiting fishing gear cantrang and strategic steps for its implementation.

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