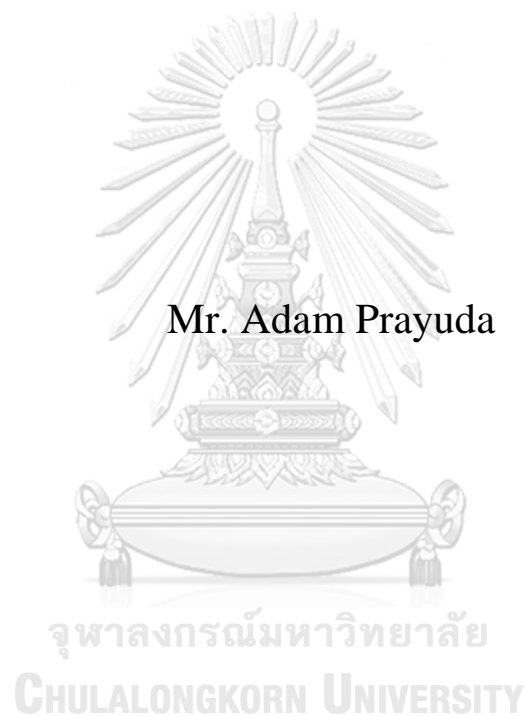


Sustainable Livelihood of Fishermen: A Case Study in the City
of Semarang, Indonesia



Mr. Adam Prayuda

A Thesis Submitted in Partial Fulfillment of the Requirements
for the Degree of Master of Arts in Environment, Development and
Sustainability

Inter-Department of Environment, Development and Sustainability

GRADUATE SCHOOL

Chulalongkorn University

Academic Year 2021

Copyright of Chulalongkorn University

ความเป็นอยู่อย่างยั่งยืนของชาวประมง :
กรณีศึกษาในเมืองเชอมารัง จังหวัดชวา ประเทศอินโดนีเซีย



วิทยานิพนธ์นี้เป็นส่วนหนึ่งของการศึกษาตามหลักสูตรปริญญาศิลป
ศาสตรมหาบัณฑิต
สาขาวิชาสิ่งแวดล้อม การพัฒนา และความยั่งยืน
สหสาขาวิชาสิ่งแวดล้อม การพัฒนาและความยั่งยืน
บัณฑิตวิทยาลัย จุฬาลงกรณ์มหาวิทยาลัย
ปีการศึกษา 2564
ลิขสิทธิ์ของจุฬาลงกรณ์มหาวิทยาลัย

Thesis Title	Sustainable Livelihood of Fishermen: A Case Study in the City of Semarang, Indonesia
By	Mr. Adam Prayuda
Field of Study	Environment, Development and Sustainability
Thesis Advisor	Associate Professor NARUEMON THABCHUMPON, Ph.D.

Accepted by the GRADUATE SCHOOL, Chulalongkorn University in Partial Fulfillment of the Requirement for the Master of Arts

..... Dean of the GRADUATE SCHOOL
(Associate Professor THUMNOON NHUJAK, Ph.D.)

THESIS COMMITTEE

..... Chairman
(Professor SUPANG CHANTAVANICH, Ph.D.)
..... Thesis Advisor
(Associate Professor NARUEMON THABCHUMPON, Ph.D.)
..... Examiner
(Assistant Professor Carl Middleton, Ph.D.)
..... Examiner
(Assistant Professor Suthirat Kittipongvises, Ph.D.)
..... External Examiner
(Assistant Professor Yanuar Sumarlan, Ph.D.)

จุฬาลงกรณ์มหาวิทยาลัย
CHULALONGKORN UNIVERSITY

อดัม ปรายดา : ความเป็นอยู่อย่างยั่งยืนของชาวประมง :
กรณีศึกษาในเมืองเซมารัง จังหวัดชวา ประเทศอินโดนีเซีย. (Sustainable
Livelihood of Fishermen: A Case Study in the City of Semarang,
Indonesia) อ.ที่ปรึกษาหลัก : นฤมล ทับจุมพล

การศึกษานี้มีจุดมุ่งหมายเพื่อพิจารณาสถานการณ์ทางสังคมและเศรษฐกิจของชาวประมงในเมืองเซมารัง วิถีชีวิตในท้องถิ่นของพวกเขาและบทบาทที่สำคัญของรัฐผ่านบริการประมงเซมารัง เพื่อปรับปรุงการดำรงชีวิตทางเศรษฐกิจและสวัสดิการสังคมของกลุ่มชายขอบกลุ่มนี้ ใช้กรอบการดำรงชีวิตอย่างยั่งยืนเพื่อดูกระบวนการความเข้ากันได้และการเสริมอำนาจที่อาจส่งผลต่อชุมชนชาวประมง

การวิจัยครั้งนี้ใช้วิธีการผสมเพื่อทำความเข้าใจปัญหาและนำเทคนิคการเล่าเรื่องมาใช้เป็นกรณีศึกษาเพื่อให้ได้ข้อมูล แหล่งข้อมูลต่าง ๆ ใช้เพื่อแยกข้อมูล มุมมอง และผลลัพธ์ที่คาดหวังเพื่อเพิ่มความรู้ในการให้ข้อมูล

ผลการวิจัยพบว่ามีปัญหาบางอย่างในกระบวนการสร้างเสริมอำนาจชุมชนชายฝั่งในพื้นที่ชายฝั่งเซมารัง ปัญหาดังกล่าวรวมถึงการขาดความตระหนักรู้ระหว่างรัฐบาลและชุมชนสำหรับกิจกรรมที่กำลังดำเนินอยู่ นอกจากนี้ยังพบข้อจำกัดของเรือ เครื่องมือประมง ทริพ ยา กรร ม นุ ษ ยั คุ ณ ภ า พ ต้า การใช้วิธีการแบบเดิมและขาดการต้นสุดในการตลาดของอุตสาหกรรมทางทะเลเชิงสร้างสรรค์ ประเด็นทางการเมืองจากอำนาจอธิปไตยที่จำกัดกิจกรรมของชาวประมง และยังคงมีกฎเกณฑ์บางประการที่ขัดขวางการดำเนินการของชุมชนชายฝั่งทะเลให้เจริญรุดหน้าเพื่อการดำรงชีวิตที่ยั่งยืน จากผลลัพธ์และการอภิปรายแนวคิดของการเพิ่มขีดความสามารถของชาวประมงชายฝั่งผ่านแนวทางสิทธิประโยชน์เพื่อการดำรงชีวิตที่ยั่งยืนในเมืองเซมารังสามารถดำเนินการได้โดยมีขั้นตอนดังต่อไปนี้ และการเพิ่มขีดความสามารถของเงินทุน

จุฬาลงกรณ์มหาวิทยาลัย
CHULALONGKORN UNIVERSITY

สาขาวิชา	สิ่งแวดล้อม การพัฒนา และความยั่งยืน	ลายมือชื่อนิสิต
ปีการศึกษา	2564	ลายมือชื่อ อ.ที่ปรึกษาหลัก
สาขา		

6388562120 : MAJOR ENVIRONMENT, DEVELOPMENT AND SUSTAINABILITY

KEYWORD Empowerment, Coastal Region, Fishermen, Local and State
D: Government Effort, Local Government Policy

Adam Prayuda : Sustainable Livelihood of Fishermen: A Case Study in the City of Semarang, Indonesia. Advisor: Assoc. Prof. NARUEMON THABCHUMPON, Ph.D.

The study aims to look at the social and economic circumstances of fishermen in Semarang City, their local livelihoods, and the significant role of the state through Semarang Fisheries Service to improve the economic livelihoods and social welfare of this marginal group. It applies a sustainable livelihood framework to look at the compatibility and empowerment process that can affect the Fishermen's Community.

This research used mixed methods to understand the problem and apply narrative techniques for case studies to obtain the data. Different sources of information are used to triangulate information, perspectives, and expected results to increase knowledge in providing information.

The research found that there are some problems in the process of coastal community empowerment in the Semarang coastal area. The problems include the lack of awareness between the Government and Community about the ongoing activities. It also found out the limitations of the ships; means of fishing tools; low quality of human resources; the use of traditional methods and lack of improvising in the marketing of creative marine industry; the political issue from the sovereignty that constraint fishermen activity, and still have certain rules and regulations that hinder the implementation of coastal communities to thrive for sustainable livelihoods. Based on the results and discussion, the concept of empowering coastal fishermen through the sustainable livelihood Assets approach in Semarang City can be carried out with the following steps: Empowerment of social capital, Empowerment of natural capital, Empowerment of physical capital, Empowerment of human capital and Empowerment of financial capital

Field of Study: Environment,
Development and
Sustainability

Academic 2021
Year:

Student's Signature

.....

Advisor's Signature

.....

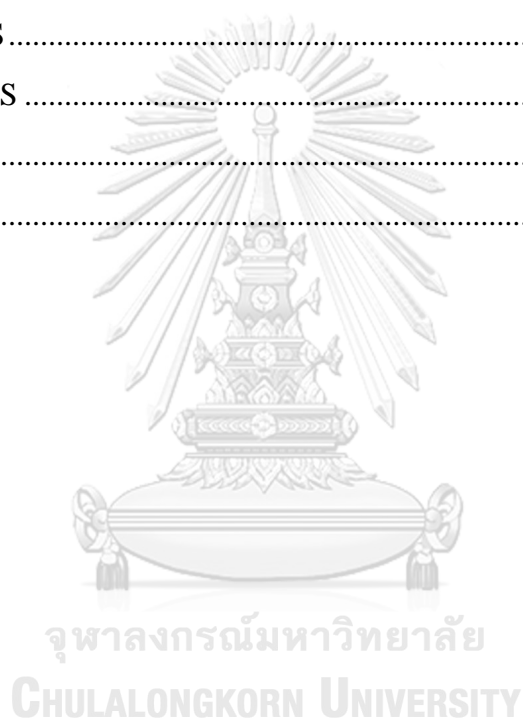
ACKNOWLEDGEMENTS

I would like to thank my advisor Ajarn Assoc. Prof. Naruemon Thabchumpon, Ph.D., for her patience, guidance, and support in overseeing my thesis from proposal to the last defense, without my advisor I might not create my thesis flawlessly. Her willingness and generous able to make me confident until the end. I also wish to express my gratitude to committee Ajarn Assist. Prof. Carl Middleton, Ph.D., to my excellence EDS director Ajarn Assist. Prof. Suthirat Kittipongvises, Ph.D., and honorable external examiner Ajarn Yanuar Sumarlan, Ph. D

Lastly, to my wife Moody Novia Hapsari Putri and to my son Aryasatya Aksara Prayuda, to my parents: Budi Agung Prayoga, Suci Wulandari, Istiyoharyadi, and Endang Listiyoningsih, to my sister: Annisa Prayudya and Azza Shofiya Prayudha, to my brother Rony Pasonang, M. Eng, my friend who helps me take a survey in Tugu and Semarang Utara, to the amicable institution Semarang City Fisheries Services, and to the social community of Semarang Coastal Area, especially Tugu and Semarang Utara District who support and flexibility. Thank you for taking the time and effort to cooperate and having your phones at the ready to keep in touch when we were apart. Having your support behind me gave me the strength to pursue my goals.

TABLE OF CONTENTS

	Page
ABSTRACT (THAI)	iii
ABSTRACT (ENGLISH).....	iv
ACKNOWLEDGEMENTS.....	v
TABLE OF CONTENTS.....	vi
LIST OF TABLES.....	vii
LIST OF FIGURES	viii
REFERENCES	179
VITA.....	199



LIST OF TABLES

	Page
Table 1. Methodology Matric and Interview Strategy.....	16
Table 2. Categories of Decentralization by Objectives and Instruments.....	40
Table 3. Number of Population in 2019.....	56
Table 4. Number of Population in 2020.....	57
Table 5. Number of Population by Poverty Level	58
Table 6. Population by Education.....	59
Table 7. Population by Main Employment Status	58
Table 8. Population by Fisheries Sector in the City of Semarang	59
Table 9. Data on Characteristics of Coastal Households by Age	66
Table 10. Characteristics of Coastal Household Respondents Based on Number of Family Dependents	67
Table 11. Human Capital Aspects	68
Table 12. Natural Capital Aspects	72
Table 13. Financial Capital Aspects	76
Table 14. Social Capital Aspects.....	82
Table 15. Physical Capital Aspects.....	85
Table 16. Significant Roles to Improve Livelihood Outcome for Fishermen and Fishing Community	90
Table 17. Flowchart Create Fisherman Insurance Card (KN)	138
Table 18. Short-term vulnerability context and Strategy	162
Table 19. Long-term vulnerability context and Strategy.....	164
Table 20. Dimension and Vulnerability Context	169

LIST OF FIGURES

	Page
Figure 1. Research Mapping	10
Figure 2. Empowerment Model	18
Figure 3. Process of Empowering	20
Figure 4. Sustainable Livelihood Framework: a checklist (Scoones, 1998).....	21
Figure 5. Example of a FishermanCard	127
Figure 6. Process of making Fisherman's Card (E-Card of Fisherman).....	129
Figure 7. Flow of the Assistance Process	131
Figure 8. Fish market building.....	135

Contents

1. Introduction.....	3
1.1. Research Question	4
1.2. Research Objectives.....	6
1.3. Types and Trait Research.....	7
1.4. Criteria for Case Study Selection.....	7
1.5. Population and Sample	10
1.6. Data Collection Method.....	12
1.7. Methodology Matric and Interview Strategy.....	15
1.8. Conceptual Framework	17
2. Literature Review.....	26
2.1. Theories Related on Topics	26
2.1.1. Definition of Empowerment	26
2.1.2. Empowerment Process.....	31
2.1.3. Community Empowerment.....	34
2.1.4. Social Capability.....	36
2.1.5. Scope of Personal and Social Capability	37
2.1.6. Organizing Elements.....	37
2.1.7. Community Resources Management	39
2.1.8. Decentralization	40
2.2. Empirical Case	43
2.2.1. Indonesian Fishing Communities and Problems (Economic Politics, Social and Environment).....	46
2.2.2. Fisherman Poverty and Access to Social Welfare	47
2.2.3. Government Strategies and Activities For Fishing Communities	47
2.2.3.1. Indonesian Policies, Law and Regulations on Welfare for Fishermen and Fishing Communities	47
2.2.3.2. Strategy in General, Special Strategy on Welfare Services	49
2.2.3.3. Activities in General	50
2.2.3.4. Special Activities on Improving Welfare of Fishermen in Semarang.....	51
3. Socio- Economic Condition and Livelihood Assetof Fishermen	53
3.1. Introduction	53
3.2. Socio-EconomicConditions, Economic Livelihood, and Assets of Fishermen.....	53
3.2.1. Population of Semarang City.....	54
3.2.2. The Production of Fishery Product in the City of Semarang	60
3.2.3. Export of Fishery Products in Semarang City, Central Java Province	62

3.2.4.	Socio-Economic of Fishermen and Fishing Communities in Tugu and Semarang Utara	68
3.2.5.	Main Assets of Fishermen, Fishing Community and Household in Semarang City	69
3.2.6.	Significant Role to Improve Livelihood Outcome for Fishermen And Fishing Community	92
4.	The Regulation, and Strategies of Government to Support Economic Condition of Fishermen	100
4.1.	Introduction.....	100
4.2.	Welfare Condition of Fishermen in Semarang City	100
4.3.	PoliticalCondition in Semarang Utara and Tugu	104
4.4.	Government Strategy in Improving Fishermen's Welfare	117
4.5.	Development of Facilities and Infrastructure	128
4.6.	Conclusion	134
5.	Analysis and Conclusion.....	135
5.1.	Introduction	135
5.2.	Summary of the Answer to the Main Research Question Based on SLA (Sustainable Livelihood Assets) Framework.....	135
5.2.1.	Vulnerability Context	137
5.2.2.	Livelihood Assets	137
5.2.3.	Institution and Process	139
5.2.4.	Livelihood Outcome	141
5.3.	Summary of the Existing Regulations and Strategies of Fisheries	150
5.4.	Empowerment of the Margin	155
5.4.1.	Limitation and Challenges	155
5.4.2.	Opportunity	158
5.5.	Conclusion	162

Chapter One

I. INTRODUCTION

Empowerment has become a prominent issue worldwide since development relied on economic growth has been blamed to create inequality among people. It emphasizes people's freedom (UNDP, 2010), is based on mutual participation, and focuses on local context. People's participation is important because they know local characteristics and this can further lead to better and more effective decisions and initiatives (Argiolas *et al.*, 2009).

Many South and Southeast Asian countries translate the shift on coastal governance into national policies aiming to increase local livelihoods and to restore and protect the ocean. India adopts joint coastal management where the government sets coastal management objectives while responsibilities and benefits are shared between the government and local people (Balooni & Inoue, 2007). Community-based coastal management is employed in the Philippines in form of responsibilities transfer from government to local communities (Pomeroy & Carlos, 1997; Balooni & Inoue, 2007). Laos introduces a maritime village that gives villagers control over all aspects of coastal management. However, this has evolved to become participatory sustainable coastal management where villagers are not allowed to sell fish products freely to maximize the benefits sharing of revenues from fisheries sales (Hodgdon, 2010).

In developing countries, community empowerment in coastal management is considered as a shift from a centralistic approach to collaborative governance (Balooni & Inoue, 2007). Previous state-centric mechanism focused on fishing capture utilization (Castañeda, 2000) and practiced unsustainable levels of exploitation of coastal resources (FAO, 2016) has been criticized because it failed to account for a

wide range of economic, social, and cultural benefits (Wang, 2004) and impoverished local community (Lebel *et al.*, 2004).

Indonesia has a similar experience and it is applied through coastal society. It is intended to develop societal capacity and to give communities access to coastal management. Further, it aims to improve local community welfare and to maintain coastal society. The obstacle facing fishermen in Semarang City is that there are already much fish caught by sophisticated motorboats in the middle of the sea, so that small fishing communities are not getting much fish anymore.

The largest fishery production in Semarang City is produced from aquaculture activities, reaching 3,200 tons/year, while capture fisheries production only reaches 2,392 tons/year, a total of 5,592 tons/year or only about 25% of the need. Semarang currently has 1,104 (people) fishermen, most of whom are currently located in Tambak Lorok, 856 freshwater fish farmers, 40% of which are located in Gunung Pati, 701 brackish water farmers located along the Tugu Mangkang area (Central Bureau of Statistics, 2006)

This awareness training is carried out in order to make fishermen aware so that they can be independent in thinking and acting and the training on making gillnet fishing gear is carried out in order to support and anticipate the impact of the application of the regulation of the Minister of Marine Affairs and Fisheries No. 56/2014 concerning the Temporary Suspension (Moratorium) of capture fisheries business permits in fisheries management areas (Rusli, 2017). Therefore, there is a need for empowerment that must be carried out by the government for the welfare of fishermen.

Fishing communities or those who make a living as fishermen are people who live near sea (water). That water is used as a source of income or daily livelihood. In reality, there are times when people make fishing as their main livelihood and some only use it as an additional activity that allows them to increase their income to support their lives and fulfill their family's needs. Fishermen are

people who actively carry out fishing activities, either directly (such as: spreaders and towing nets) or indirectly (such as: sailboat helmsman, fishing boat captain).

The subject referred to in this thesis is the fishing community. The fishing community is a coastal community group whose main livelihood is fishing at sea. The fishing community is divided into three groups, namely labor fishermen, skipper fishermen and individual fishermen. Labor fishermen are fishermen who work with other people's fishing gear. On the other hand, skipper fishermen are fishermen who have fishing gear operated by someone else. Meanwhile, individual fishermen are fishermen who have their own fishing equipment and do not involve other people in their operation.

From the description above, what is meant by the title of this thesis is an effort to provide capabilities to capture fishermen, the process is in the form of awareness carried out by the Government carried out by The Semarang City Fisheries Services. In the utilization and management of community resources of fishing communities, so that they are able to manage their resources effectively and efficiently.

Therefore, this thesis aims to examine on the livelihood situations of fisherman in Semarang City and the involving of government's strategy to entangle with fisherman community, especially to improve social welfare of fishermen through Empowerment Strategy.

1.1. RESEARCH QUESTION

The problem faced by the Indonesian government today is poverty, it is undeniable that poverty is one of the diseases suffered by this nation, until the end of the government of President Susilo Bambang Yudhoyono, the government has not been able to eradicate poverty in the community, even though there have been many programs carried out by the government to alleviate poverty in Indonesia.

Government programs that are intended to improve the welfare of fishing communities are also not optimal, both during the New Order government and until

now, such as program development, Economic Empowerment of Coastal Communities (PEMP) and the flow of Direct Cash Assistance (BLT) programs which are subsidies or increases in Fuel Oil (BBM) which are also still a lot of question mark.

The two central research questions guiding this research are as follows:

1. What are the socio-economic, livelihood assets, and significant roles of fishermen and fishing community in Semarang City?
2. What are regulations and strategies of Government (Semarang City Fisheries Services) to support Economic Condition of Fishermen?
 - 2.1. What are the existing regulations and supports that affect local livelihood fishermen and fishing community in Semarang City?
 - 2.2. What are the significant strategies for Fishermen and Household that can improve Livelihood outcome?

In an effort to achieve quality human resources, the Semarang City Fisheries Services managing fishermen community in Semarang City need guidance so that their self-development leads to a good self-identity stability in utilizing natural resources.

1.2 RESEARCH OBJECTIVES

The following two objectives shall guide this research:

1. To know about the Fisheries social and economic circumstances in Semarang City, local livelihoods of fishermen and the significant role to improve livelihood in the city of Semarang
2. To find out compatibility for Empowerment Strategy that can affect the Fishermen Community and Household with significant strategy by Semarang City Fisheries Services

- 2.1. To know and explain the intention of Government focuss on existing regulation to Fishermen and Fishing Community
- 2.2. To know significant strategies the Semarang City Fisheries Services to enhance the welfare of Fishermen and Household to improving the livelihood outcomes

The practical benefits of the results of this research are expected to be able to add and complete the literature in the field of Environmental Science, Sustainability and Development, especially those relating to government strategies in improving the welfare of fishermen in Semarang City, providing understanding to fishermen in responding to policies made by the government and can be used as a reference for assignments, courses related to fisherman welfare issues.

1.3. TYPES AND TRAIT RESEARCH

a. Types of research

The type of field research is a carried out in a real life scene (Kartono, 1998). That the field in question aims to empower the fishing community through training capture fishing at Semarang City. Where all data collected from data mining and then analyzed comes from the responden.

b. Trait of research

This research is descriptive analytical, which is a method of researching the status of a human group, an object, a set of conditions, a system of thought, or a class of events at the present time (Nazir, 2005). So, this research in addition to revealing the data also observes cases that occur in society as it is, also provides analysis in order to obtain clarity on the problems faced, I would to examined the empowerment of fishing communities in the form of training in the manufacture of environmentally friendly fishing capture, fishing technology is one of the tools that can be utilized for the management of fishery resources.

14. CRITERIA FOR CASE STUDY SELECTION

A. SEMARANG CITY AS THE STUDY SITE

Semarang City is the capital city of Central Java Province and the fifth largest metropolitan city in Indonesia after Jakarta, Surabaya, Medan and Bandung. The city, which is located on the north coast of Java, has a geostrategic position because it is in the economic traffic lane of Java Island and is a Central Java development corridor consisting of four gate nodes. Administratively, the area of 373.67 km², consists of 16 sub-districts and 177 urban villages. The city of Semarang received the nickname Venetie Van Java (When was the Dutch of Colonialism) or the Venice of the Island of Java and The Port of Java. In addition, this city which has various ethnicities also has a Variety of Culture jargon. With this jargon, Semarang City offers attractiveness in the form of cultural diversity, tourism, culinary, and historical heritage sites located in various corners of the city (Yulianti, 2019).

B. GEOGRAPHICAL, ECONOMIC, AND SOCIAL SITUATION IN THE AREA

- **GEOGRAPHY**

The city of Semarang geographically has two very opposite areas. The area in the south has an altitude of 270 meters above sea level, is a settlement with cool and fresh air. The northern area is a coastal alluvial plain with a height of 0.5-1.5 meters above sea level which is hot. The area of the city of Semarang is 373.70 km².,. From this area, Mijen District is recorded as the largest sub-district, namely 57.55km², followed by Gunung Pati District at 54.11 km²., while the District with the smallest area is South Semarang at 5.93 km². Local flooding and the overflow of seawater into the mainland called “Sea Level Raise” are still a complicated problem for the City of Semarang. Even though it is not the rainy season, most areas in the northern area of Semarang City are almost always inundated by water (Purwanto, 2005).

- **POPULATION**

Referring to the results of the 2020 population census, the city of Semarang is inhabited by 1,653,524 people with a population density of 4,425 people/km².,. This population density tends to increase along with the increase in population each year. Then, for the population growth rate during 2010-2020 Semarang City reached 0.59. For the composition of the population based on religion, the majority of the population of Semarang City is Muslim, which is 87.22%. Followed by 6.92% Protestant, 5.11% Catholic, 0.07% Hindu, 0.65% Buddhist, and 0.03% other religions. As a trade and service city, the population of Semarang City mostly work as laborers

and employees in the industrial sector. The figure will reach 60.59% in 2020(Central Bureau of Statistics, 2021)

- **WELL-BEING**

In the last decade, human development in the city of Semarang continues to show progress. The Human Development Index (HDI) increased from 79.96% in 2010 to 83.19 in 2019. This figure then decreased by 0.14% in 2020 to 83.05%. Throughout 2017-2019, the open unemployment rate (TPT) of Semarang City continued to decline. However, in 2020, Semarang City TPT will increase again due to the outbreak of Covid-19 cases. TPT in 2020 was recorded at 9.57%, a drastic increase compared to 2019 of 5.03%. The increase in TPT also has an impact on increasing the poor in the city of Semarang. The Central Statistics Agency (BPS) recorded that 79.58 thousand people or 4.34% of the total population of Semarang City are poor (Central Bureau of Statistics, 2021)

- **ECONOMY**

The Gross Regional Domestic Product (GRDP) of Semarang City in 2020 was recorded at 189.26 trillion rupiah. This figure experienced a decrease of 2.11 trillion when compared to the previous year. Of all sectors, the processing industry contributed the largest GRDP figure of 28.64%. Then followed by the construction sector by 26.07% and wholesale and retail trade, car and motorcycle repair by 13.40%. For Regional Original Income (PAD), this trading city still relies on local taxes and retribution. The contribution of regional taxes reached 1.56 trillion rupiah or 75.7% of the total PAD 2.06 trillion rupiah in 2019. Meanwhile, regional redistribution was 113.8 billion or 5.5% (Central Bureau of Statistics, 2021)

C. FOCUSS OF THE RESEARCH SITE

Semarang City has an area of 5,039.17 Ha or about 0.02 percent of the total area of Semarang City (37,366,838 Ha). The length is approximately 25Kilometer, including in Tugu District along 3.5 Km, North Semarang 5.56 Km, West Semarang 8.94 Km and Genuk 7 Km. The area includes 17 sub-districts; namely: KelurahanKemijen, Tambakrejo, Tanjungmas, Bandarhardjo, Panggung Lor, Tawang Sari, Tambakhardjo, TerboyoKulon, TerboyoWetan, Trimulyo, MangkangKulon, Mangunhardjo, MangkangWetan, Randugarut, Karanganyar, Tuguredjo and Jrasah (Ridlo, 2016).

The scope of this study is a coastal area which includes six urban villages in the city of Semarang, namely MangkangKulon, Mangunharjo, MangkangWetan, Karanganyar, Tugurejo and Trimulyo.

Figure 1. Research Mapping



Semarang City is the largest city in Central Java, Indonesia. Semarang City renowned as an Industrial City and focuses for evolution in urban area to control in Agency and Institution. Meanwhile, fisheries sector less attention because there are intrigue by Government that emerge of disproportion at Coastal Area. Therefore, Semarang City is pivotal to highlight by this case and thereby empowerment strategy to reinforced fisheries communities.

1.5. POPULATION AND SAMPLE FOR DATA COLLECTION

a. Population

The population is the entire research subject (Sugiyono, 2008). The Data Population of Fishermen in Semarang City shows that there are

745 from Semarang Utara and 251 from Tugu. While, the population data in Semarang Utara is 119.647 people and Semarang Utara is 33.333 people (Central Bureau of Statistic, 2019). The entire population in this study amounted to people consisting of The Semarang City Fisheries Services 11 people, 996 fishermen, and 152.980 household

b. Sample

The sample is part or representative of the population being studied (Raco, 2010). In this study, the author uses purposive sampling, which is based on a certain purpose. What needs to be determined in this purposive research sampling must be based on certain characteristics, traits, or characteristics, therefore in the process of this research, the samples that can be used are with the following characteristics or criteria.

Based on the opinion above, then the criteria to be a sample in this study are:

1. The Semarang City Fisheries Services with the following:

- Head of Fish Farming Management
- Head of Small Business Empowerment for Fish Cultivation
- Head of Capture Fisheries

2. Household selected 100 respondents, comprised by 50 from Tuguan and 50 from Semarang Utara

Based on the criteria above, the samples in this study were from The Semarang City Fisheries Services 3 people, and 100 households comprised by Tugu and Semarang Utara. The reason for selecting these populations are fishermen and local community subsumes by

fishermen poor, medium, and rich. In total, the sample amounted to 103 people. Tugu and Semarang Utara Regency located directly nearby java sea (laut jawa), potentially of these located possible to reach the area destination and easy to the conversation using by local language (jawa language)

1.6. DATA COLLECTION METHOD

To facilitate data collection in the field, the authors use the following data collection methods:

a. Interview Method

Interview is the process of obtaining information for research purposes by means of question and answer, while face to face between the questioner and the answerer or respondent using a tool called an interview guide.

In this interview method the author uses a structured interview technique, namely the interviewer before conducting the interview first prepares a list of questions, to be read out when conducting interviews with respondents (Arikunto, 2010)

This method is the main method in collecting data on the Empowerment of Fishermen Community in Semarang City, because this method can be used for all layers, so that the author considers the most appropriate and practical way to collect the necessary data so that complete information related to the problem can be obtained.

b. Observation Method

Observation is a method of collecting data through direct observation or careful and direct review. In this case, the researcher, guided by his research design, needs to visit the research location to directly observe various things or conditions that exist in the field. In this case the author uses the type of non-participant observation, namely conducting observations that do not

involve researchers directly in observation activities to obtain data and information in the field without involving themselves, or not being part of the social environment or organization being observed.

c. Documentation Method

Documentation is looking for data about things or variables in the form of notes, transcripts and books, newspapers, magazines and so on. The documentation method is a method of collecting qualitative data by viewing or analyzing documents made by the subject himself or by other people.

Documentation is one way that qualitative researchers can do to get an overview from the subject's point of view through a written medium and other documents written or made directly by the subject in question.

d. Data analyse method

The next process as the final activity, after everything is collected completely, then the data is processed and analyzed and then concluded. In this analysis the author uses mix-method, namely: use statistical numeric and description words or sentences, then separated according to theory to draw a conclusion (Teguh, 2005). While the analytical technique used in this study is a comparative technique in the field, namely comparing theory with reality. From that analysis to be carried out, then a conclusion is drawn using the deductive method. Deductive thinking method is a method of thinking which is general things first to be connected in specific parts (Ruslan, 2010). From this conclusion, it is the answer to the problems in this discussion.

This study uses a mixed-method (qualitative and quantitative). Mixed methods research is a type of research that collects, analyzes, and combines quantitative and qualitative research methods in a series of studies to understand research problems (Cresswell, 2015). If researchers want to use this

research design, it is very necessary to understand quantitative and qualitative research. In general, the following are some general characteristics of mixed-method research:

- a. This mixed methods research has several types of designs that can be chosen to be implemented, of course, taking into account the objectives
- b. Mixed methods research involves merging, connecting data (connecting), building new data (building), and placing new data (embedding). This means that quantitative and qualitative data are "mixed" in a study;
- c. This mixed methods research will use two sources of data derived from qualitative and quantitative methods and then combine the two;
- d. This research is used if the researcher wants to follow up research to get more specific and detailed complementary information when compared to relying on only one research method.

This research is used if the researcher wants to provide an alternative perspective in a study. One example is when a policymaker wants data "numbers" and at the same time "narrative" about a problem, researchers can use test and non-test data collection techniques to obtain the data. Thus, these different sources of information provide more detailed and expected results. Because of the complexity of a mixed-method, for that researcher must have a good understanding of quantitative and qualitative research, it is necessary to conduct a study to provide a reference and technical guidance to increase students' knowledge in providing mixed methods research.

Some researchers have grouped and differentiated mixed-method research into several major types (types) with different numbers and names. The classification that is deemed most appropriate and relevant for the target

audience with an educational background is the classification made by Creswell et al (2003), Creswell (2012), and Creswell and Plano Clark (2011). Therefore, in the next sub-section only the 6 most used major types will be discussed, namely:

1. convergent parallel design,
2. explanatory sequential design,
3. exploratory sequential design
4. embedded designs,
5. transformative design, and
6. multiphase design.

The type of research used quantitative research using a survey method, which is a research method that aims to collect a large amount of data in the form of variables, units or individuals at the same time. The survey method used in this study was then analyzed descriptively. The advantage of using the survey method is that you can obtain various information and results can be obtained used for other purposes.

Data collection techniques in this study using observation, documentation and questionnaires. The data analysis technique used in this research is descriptive statistical analysis by calculating the percentage. Descriptive analysis is used to generate an overview of the data that has been collected based on respondents' answers through the distribution of items from each variable.

In this research, I was a researcher who use the embedded design model. There are two models in concurrent embedded research, namely the quantitative method which is the primary method, and/or the qualitative method which is the primary method.

1.7. METHODOLOGY MATRIC AND INTERVIEW STRATEGY

Table 1. Methodology Matric and Interview Strategy

No	Main Research Question	Data Needed	Information Sources & Interviewee/ origin of sources	Lists of Interviewee
1	1.1 What are the socio-economic circumstances of fishermen and fishing community?	Secondary	1. Number of Population 2. Number of Population by Poverty Level 3. Number of Population by Education 4. Number of Population by Employment Status 5. Number of Population by Fisheries Sector	Data sources from the institutional related with the thesis topic (Quantitative)
	1.2. What are the main assets of fishermen and households in Semarang City?	Primary Data		Interview with Fishermen and Household (Quantitative)
	1.3. What are the significant roles for Fishermen and Households that can improve Livelihood outcome?	Primary Data		Interview with Fishermen and Household (Quantitative)

2	What are the existing regulations and supports that affect local livelihood fishermen and fishing community in Semarang City?	Primary Data		Interview with Government Officer (Qualitative) : a. Head of Fish Farming Management b. Head of Small Business Empowerment for Fish Cultivation c. Head of Capture Fisheries
---	---	--------------	--	--

1.8. CONCEPTUAL FRAMEWORK

Adibowo (2014) specifically examines the Implementation of Coastal Community Economic Empowerment Policies (Study in Karangsong Village, Indramayu Regency, West Java Province) Coastal. According to him, that in the implementation of the economic empowerment policy of coastal communities it is not only the duty of the government to be able to run optimally, but entails commitment with various parties between institutions and their communities. Although, there are some hurdles that cannot be disprove, such as:

1. Commitment from the government in implementing policies,
2. Education escalation of coastal communities, and
3. Community orientation regarding economic empowerment which is seen still from a financial perspective not yet understanding that prioritizes aspects of coastal community empowerment as a target so that the main goal of the program vestiges consistent and surveillance.

According to Azizet., *al* (2019) The model for empowering coastal communities, especially in the Coastal Society needs to be done triparted. See picture 1 below:

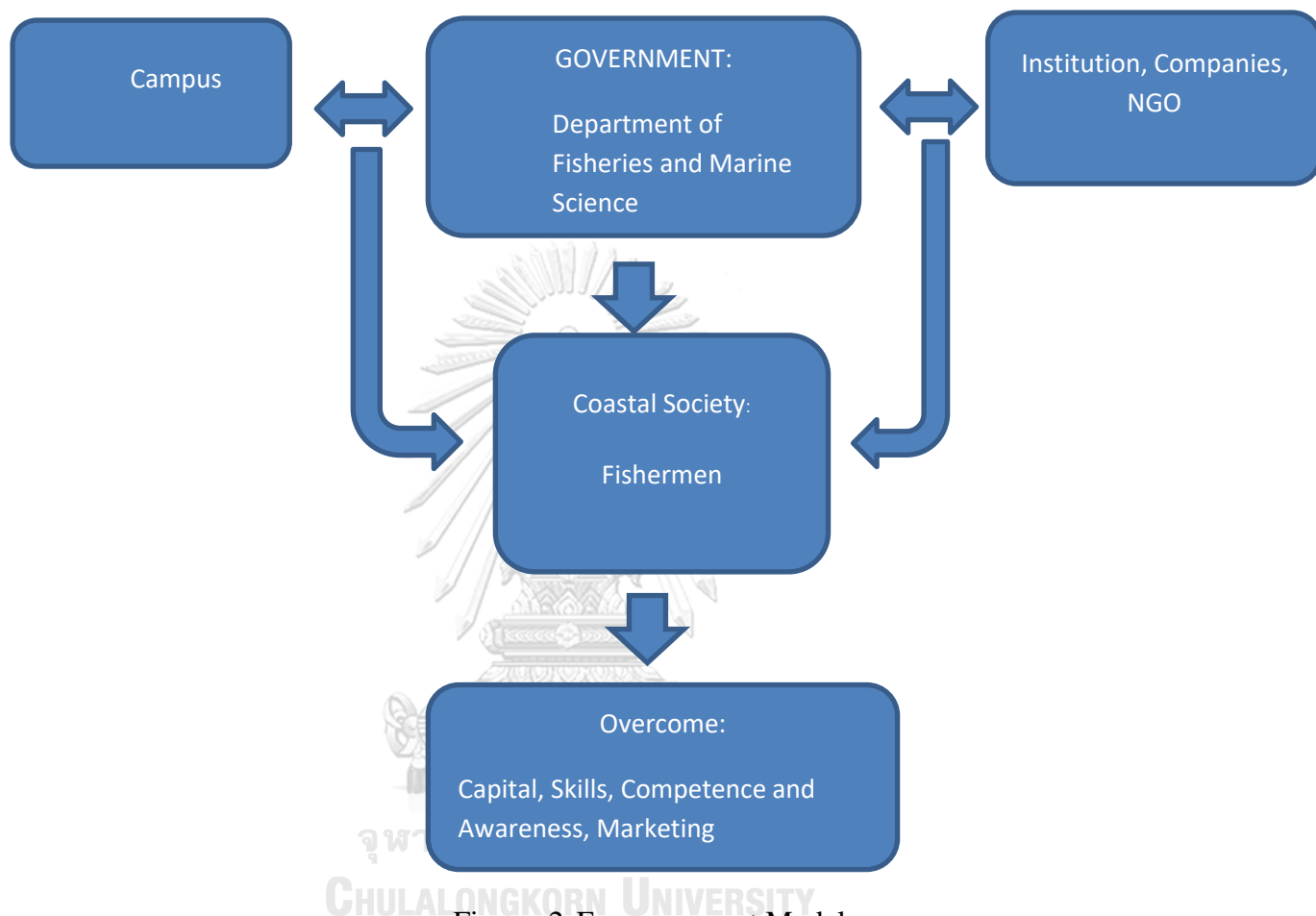


Figure 2. Empowerment Model

The picture above explains that the coastal empowerment model includes four factors, namely:

1. College factors,
2. Government factors,
3. Private factors, and
4. The community itself.

The role of the government, both local government and related agencies - is pivotal in taking part in empowering coastal communities. Hence, the existence of higher education institutions also exerts to possess an active role in reserving education and relief to the community. And, not to mention the existence of private institutions can be urgent in their participation in the empowerment of coastal Muslim communities.

According to Suhendi (2014) that the model of empowerment of coastal communities has at least three choices, namely:

1. Acquaintance pro-people regulations,
2. Enhance self-organization capacity, and
3. Developing production-consumption systems.

Of the three choices of empowerment models, enhance self-organization capacity is more in line with the meaning of the empowerment philosophy itself, where the process emphasizes increasing group capacity in organizing resources to meet needs and reserve solutions to the problems they face. According to Aziz *et al* (2019) The process of empowering coastal communities needs to pay attention to the following stages:

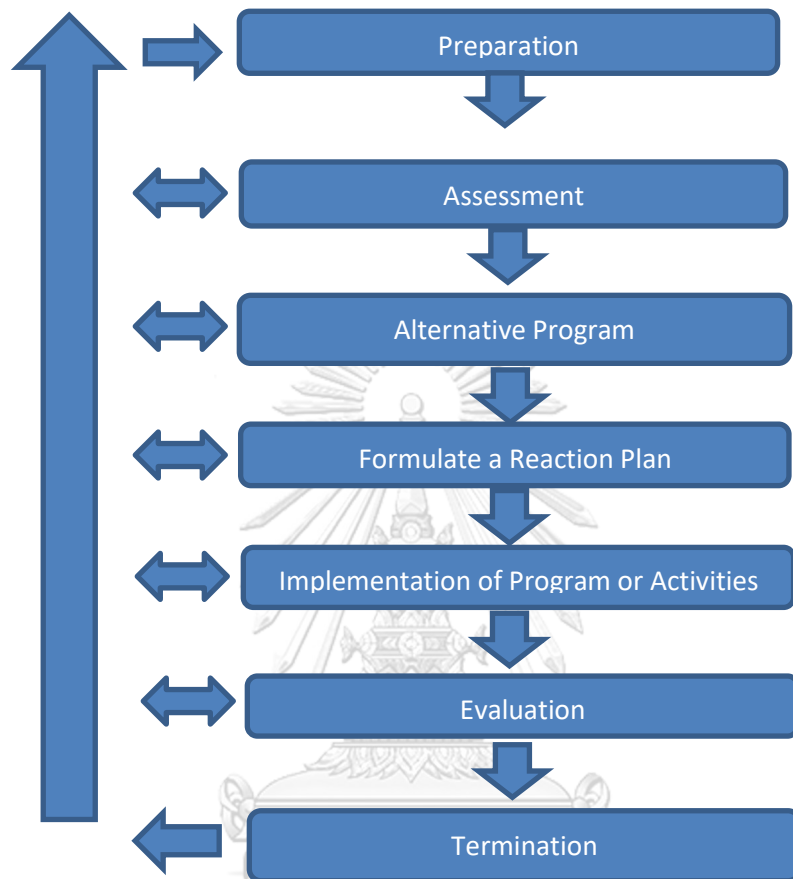


Figure 3. Process of Empowering

From these stages, empowerment modeling needs to be done. According to Andeas and Savitri (2006), in general, the effective approach model is twofold, namely:

1. The empowerment model is top-down (macro level), and
2. The empowerment model is bottom-up (micro level).

The same thing above, Mikkelsen (2003) illustrates that the micro level and macro level models referred to besides as part of a fieldwork approach that can provide input in the context of policy,

while the macro level is more inclined to the historical dimension as part of the context of community empowerment.

Regarding to Empowering Model above, I use the concept of Sustainable Livelihood Framework as Empowerment Model of the research

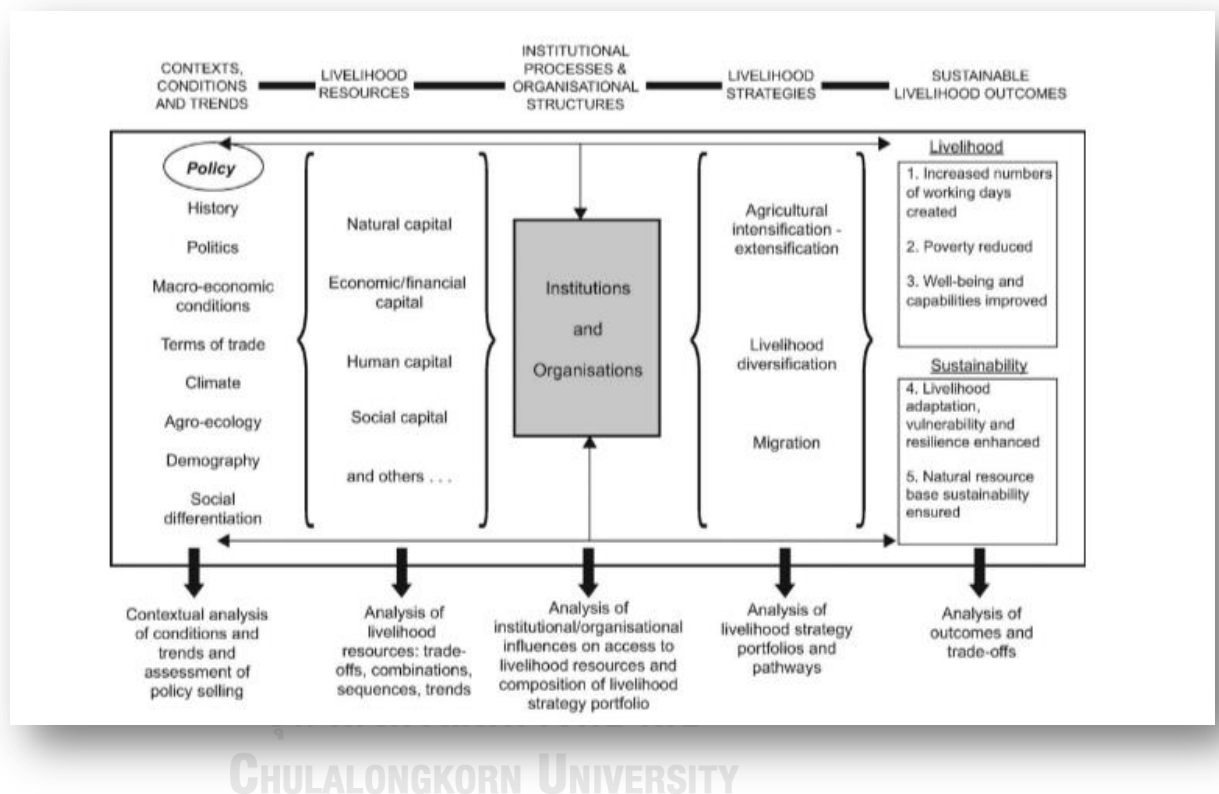


Figure 4. Sustainable Livelihood Framework: a checklist (Scoones, 1998)

Regarding Elements of the Framework, I try to linkage with my thesis as follows:

1. Vulnerability context

There are two aspects we have must understand, Risk and Vulnerability are very different cases. For this case, fishermen know the activity about Risk namely High Tide, Erratically Fish Outcome, Fishing Gear Regulation, Fish Price. And, these cases about

Vulnerability namely Social Gap and Different Income.

2. Livelihood Assets

Related with Assets or Capital. Usually, fishermen spend money to go in the ocean whether to one-day fishing or a few days fishing. One day Fishing do not need more money rather than a few days fishing, because they need spare daily needs more like rice, cigarette, freshwater, food material and fuel.

3. Policies, Institutions and Process

The role of the Government to determine Policies might counteract any affairs in the amid of Social Community. Decision-making is not only arbitrated from the above (Government) but we must understand the patterns of society whereas in Social Community multifaceted namely culture, ethnic, tribe, etc. So, Indonesia Nation is a comply with Pancasila (Sacred Constitution) which is cherish, respect, and Uphold Democracy.

4. Livelihood Strategies

That I can say, livelihood strategies cater society to aim livelihood goals. With their dynamic life, society can attain appropriate without leaving the main activity. For example of this case in coastal social life, fishermen do the activity of catching fish in the ocean while in the traditional market fishmonger do the fish buying and selling activity. This activity is different but the risk between Fishermen and Fishmonger shows that Fishermen undergo high risk than Fishmonger, Fishermen strive in the ocean, and Fishmonger role plays in the market. Fishermen patronage in Indonesia frankly low attention from Government, beyond of the rule whichever always altering when the presidential election. For the Livelihood Strategies

hopefully vote of fishermen might have a positive impact on Sustainable Livelihood.

5. Livelihood Outcomes

Livelihood Outcomes from this research destine for increasing fishermen welfare namely compatibility fishing gear regulation, fishermen subsidy (education, staple food, fuel, money), fishermen insurance (health, work accident), and enhance skill (workshop, seminar). So, the livelihood outcomes might to embodies namely equal equity, eradicate the gap between fishermen (poor-medium-rich), and assuage another dispute between fishermen and government.

Livelihood Assets vary depending on the value of capital owned by the community, namely human capital, natural capital, social capital, financial capital, and physical capital. The various relationships and interrelationships between these components of livelihood resources are described in the form of an asset pentagon. The shape of the pentagon and the connecting line with the central point in the center of the pentagon illustrates the variation in the level of community ownership and access to resources (DFID, 2001: 53).

The following are indicators of livelihood assets:

A. Human Capital

The livelihood approach has the first and foremost concern for humans as an important subject. Human capital indicates a person's ability to gain better access to their living conditions. In this study, the assessment of human capital includes the level of education, health, labor and skills.

B. Natural capital

Comes from nature and is used to meet its needs (DFID, 1999:37). Natural capital is also considered very important because humans cannot live from environmental services and food that comes from nature (Carney, 1998:64). Natural Capital can be used to gain access to a better life.

C. Financial Capital

Financial Capital is a source of financial resources that can be used and utilized by the community in achieving their livelihood goals, which include reserves or inventories either owned by themselves or financial institutions as well as in the form of a regular flow of funds (DFID, 2001:53). The access of fishermen and household in the four research hamlets to financial capital is quite diverse depending on the type of need and openness to opportunities to take advantage of it. The constituent elements of financial capital include income, savings, assistance and expenses.

C. Social Capital

Social Capital is a social resource that is useful and used by the community to achieve the community's livelihood goals. Social resources are generally intangible and are not easy to measure but have benefits for the community (DFID, 2001:55). Social capital shows how households interact with other communities in the social environment. Social capital is considered able to increase trust and reduce the cost of working together, helping and reliable respondents in various problems.

D. Physical Capital

Physical capital is the basic infrastructure and facilities to support livelihood processes public. Control of physical resource assets is an illustration of the ease of access that support the household in

survival life. DFID (1999:39) states that physical capital consists of basic infrastructure and ownership of equipment that can produce goods or services so as to encourage the growth of infrastructure livelihoods between other transportation, buildings, clean water and others etc. Physical capital in this study includes housing, facilities, transportation, accessibility, and production equipment.



Chapter Two

LITERATURE REVIEW

2.1. THEORIES RELATED ON TOPIC

2.1.1. DEFINITION OF EMPOWERMENT

The word empowerment has two meanings, the first is to give power authority to. The second means to give ability or enable. The first definition is defined as giving power, transferring power, or delegating authority to other parties. While the second sense, is defined as an effort to give ability or empowerment (Suharto, 2005)

Therefore, empowerment is both a process and a goal. As a process, empowerment is a series of activities to strengthen the power or empowerment of weak groups in society, including individuals who experience poverty problems. Meanwhile, as a goal, empowerment refers to the empowerment of conditions or results to be achieved by a social change; namely people who are empowered, have power or have the knowledge and ability to fulfill their life needs, whether physical, economic, or social, such as having self-confidence, able to express aspirations, have a livelihood, participate in social activities, and be independent in carrying out the tasks of life (Retnowati, 2011)

In a broader sense, as stated by Pranarka and Moeljarto, empowerment is mentioned as an effort to respect diversity, local uniqueness, decentralization of power and increasing independence, it is further said that empowerment means a fair distribution of power so as to increase political awareness and power of weak groups and increase their influence on the development process and outcomes (Rindawati, 2012)

According to (Batliwata, 1993) Feminist interpretations of power lead to a still broader understanding of empowerment, since they go beyond formal and institutional definitions of power, and incorporate the idea of 'the personal as political' from a feminist perspective, interpreting 'power over' entails understanding the dynamics of oppression and internalised oppression. Since these affect the ability of less powerful groups to participate in formal and informal decisionmaking, and to exert influence, they also affect the way that individuals or groups perceive themselves and their ability to act and influence the world around them. Empowerment is thus more than simply opening up access to decision-making; it must also include the processes that lead people to perceive themselves as able and entitled to occupy that decision-making space, and so overlaps with the other categories of 'power to' and 'power from within'.

Bachrach *et., al* (1970) added Programmes that build on the demands and wishes of the people who participate in them are a step towards empowerment, but they do not in and of themselves tackle the assumptions that those people (and the people around them) are already making about what they can and cannot do: the point where the internalised oppression works in combination with the particular economic and social context to restrict the options that people perceive as available, and legitimate. An empowerment approach centred on economic activity must pay attention to more than the activity itself. The processes and structures through which an economic activity operates need to be deliberately designed to create opportunities for an empowerment process to happen.

2.1.2. EMPOWERMENT PROCESS

In developing the theory of empowerment, Sadan (2004) adopted structuration theory (Giddens, 1984). She argues that his theory is critical and comprehensive and directly connects to theory of power. In addition, Ritzer (2011) argues that its strength is it integrates micro and macro levels of inquiry very well. The basis of Giddens's theory is applicable for both empowerment levels. Empowerment may exist in the terms of either individuals' abilities or social structure (Sadan, 2004) and both levels can have a mutual reinforcement (Maton & Rappaport, 1984).

Therefore, empowerment is considered as a continuous process of social change by which people's abilities and common resources can be activated (Giddens, 1984). Theoretically, the process of empowerment is as follows (Sadan, 2004):

- a. **Powerlessness.** A sense of frustration is originated from an unbridgeable gap between hope and chances to realize it. People discover that effort to actualize their hopes relies on their capabilities and unreachable resources
- b. **Support.** This feeling must be espoused by initial capability and resources to facilitate arranged action, and social support to allow the action. Support can come from family, friends, community leader and community
- c. **Wish.** People have an intention to acquire means and resources to expand capability in achieving something in their livelihood. Better knowledge and life, and aspiration to work together also become their desires
- d. **Consciousness.** The acknowledgement of people's right in expressing their hopes and people's ability in defining them is

considered as a result of the development of a critical consciousness in the current state

e.**Confidence.** People feel confident about their ability to seize results. Individual potency can result in mutual potency if it is transformed into collective practical ability to arrange itself for a common action. People will expand their aspirations and visions, experience voice equality, see oneself in new ways, and increase self-understanding

f.**Empowered group.** The process continues through resources mobilization by individuals, including establishing and arranging communal institutions (Mann, 1986). They can securely apply their skills to attain results such as controlling their livelihoods, participating in making decision, and influencing circumstance. In this stage, there is a consonance of values and practices where they will transfer their abilities to daily activities

As a process, empowerment is a series of activities to strengthen and or optimize the empowerment (in terms of the ability and or competitive advantage) of weak groups in society, including individuals who experience poverty problems. both individually, in groups, and in society in a broad sense). With such an understanding, empowerment can be interpreted as a planned process to increase the utility scale of the empowered object.

There are another concept and perception from another author about Empowerment Process. According to Kusnadi (2003) Empowerment is a concept of “a process of becoming”, not an “instant procession”. As an empowerment process, it has three stages, namely:

A. Awareness Stage.

That is where people are given an enlightenment in the sense of providing awareness that they are capable of having something and that they have extraordinary abilities and capacities if only they want to explore and explore the abilities within themselves.

B. The Capacity Stage.

That is the stage where the empowered community is given an empowerment program to make them have skills in managing themselves and their resources.

C. Powering Stage.

At this stage they are given power, power authority or opportunity. This gift is in accordance with the quality of the skills that have been owned or according to the abilities of the recipient. So that people become willing, aware and able to make changes in their lives for the better.

Kusnadi, (2003) added that the empowerment process contains two tendencies:

The first tendency is the empowerment process which emphasizes the process of giving or transferring as strength, power or ability to the community so that individuals are more empowered. The first tendency can be referred to as the primary tendency of the meaning of empowerment.

The second tendency or secondary tendency emphasizes the process of stimulating, encouraging or motivating individuals to have the ability or power to determine what their life choices are through a dialogue process.

What is meant by an empowered community is a community that knows, understands, understands, is

motivated, has the opportunity, takes advantage of opportunities, is energetic, is able to work together, knows decisions, dares to take risks, knows various alternatives, is able to seek and capture information and is able to act in accordance with the situation.

2.1.3. COMMUNITY EMPOWERMENT

Community empowerment is a development process where the community takes the initiative to start the process of social activities to improve their own situation and condition (Christenson *et.,al* 1989)

Community empowerment is a process where people become stronger to participate in various controls over events that affect their lives. Community empowerment emphasizes that people (individuals, groups) acquire sufficient skills, knowledge, and power to influence their lives and the lives of others they care about (Suharto, 2005).

Although community empowerment is not merely an economic concept, community empowerment implicitly means upholding economic democracy. Economic democracy literally means people's sovereignty in the economy, where economic activities that take place are from the people, by the people, and for the people (Totok, *et.,al*, 2015). However, the perception of the fishing community is always analogous to a situation that is left behind. Such as low knowledge, health and poverty. Therefore, empowerment is considered to be an alternative solution to equalize fishing communities with other established communities.

In a similar, Prijono & Pranaka said that community empowerment is an effort to increase the dignity of the layers of

society who in their current condition are unable to escape the trap of poverty and underdevelopment. In other words, empowering the community means providing the ability and independence of the community. Empowerment process which emphasizes the process of giving the ability to the community to be empowered, encouraging or motivating individuals to have the ability or empowerment to determine their life choices. In this case, empowerment must be aimed at groups or layers of society that are left behind (Priyono & Pranaka, in Manat Rahim, 2014).

According to Shofwan,(2008), development policies in the coastal and ocean sectors as strategic policies are expected to bring prosperity to the people, develop the dignity of coastal communities and be able to align themselves with other communities. Policies are built based on participatory principles and are directed so that the people are the biggest beneficiaries. The link or relationship between the concept of decentralization and the empowerment of coastal communities is also explained by Eni (2013), who says that the spirit of marine resource management is the spirit of autonomy that puts the region as the main axis of its implementation locomotive. In this context, the region has the authority to regulate and manage its marine resources with the main goal of course on the welfare of the region and the people in it.

Regarding community empowerment in the marine sector, the main target is the coastal community, both those who work as fishermen, traders and fishermen's wives. In its development, the empowerment of coastal communities has become an activity or agenda that is very important for the government, considering the condition of coastal communities which is still considered low. Coastal communities show several characteristics. His attitude tends

to be straightforward, spontaneous, the words used tend to use open language. The art is relatively rough in the sense that it is not complicated, the religious style tends to be mixed Islam, and the mobility is quite high (Ambo, 2011).

Added by Eni (2013), another reason why the empowerment of coastal communities is so important is because the management of marine resources is still not considered optimal. The wealth in the sea, especially in Java, only a small part of the population of the Coastal community tries to scavenge it, and even then in small businesses such as traditional fishermen. This means that the concept of the sea and the sea in general for the people of Coastal Java has not been ingrained. In addition, the picture of carrying out activities in the sea is full of risks, while the picture of the living conditions of fishermen is still blurry, so in the process of socialization and while in education, there have been no efforts to be oriented to love of the sea, both regarding marine knowledge, utilization of wealth. marine and marine technology. The neglect of this condition resulted in the spirit to love and be proud as a fisherman, as well as his sincerity to be able to take advantage of the wealth of the sea, greatly reduced.

Based on some of the definitions above, what is meant by community empowerment in this thesis is an effort to provide awareness, ability or capacity, as well as empowerment to fishing communities. Empowerment of fishing communities is very important and is a mandatory thing to do considering the rapid economic and technological growth lately will greatly affect the ability of each individual to meet their daily needs.

The fishing community is a group of people whose lives depend directly on marine products, either by catching or cultivating. They generally live on the coast, a residential

environment close to the location of their activities.

2.1.4. SOCIAL CAPABILITY

Social capability can be defined as the ability to have or acquire certain capabilities destined to overcome economic and social changes. For examples, the individual who have a certain level of socialization capacity, will have a participatory attitude in the company, will promote union, and will influence both their own and co-worker attitudes (Alegreet. *al* 2008)

According to (Viitala*et. al*2016) Therefore, social capability can be an instrument to generate more ideas and, consequently. Thus, the ability to socialize is a personal competence that the individual has or can develop to a greater or lesser degree, and the development of this competence will make the investment that the entrepreneur makes in certain practices such as the enhancement of social relationships between employees and members of the organization, to a greater or lesser extent.

In addition, individual with a high level of social capability will be a complementary asset for the firm's development of Innovation performance(IP). *socialCcapability* is therefore an important capability for obtaining a competitive advantage, given its imperfect imitability (Pérez, 2000)

2.1.5. PERSONAL AND SOCIAL CAPABILITY

Personal and social capability encompasses personal/emotional and social/relational dispositions, intelligences, sensibilities and learning. It develops effective life skills for individuals, including understanding and handling themselves, their relationships, learning and work. Although it is named 'Personal and social capability', the

words 'personal/emotional' and 'social/relational' are used interchangeably throughout the literature and within educational organisations. The term 'Social and Emotional Learning' is also often used, as is the SEL acronym (Beveridge, 2010)

The domain of personal and social learning is not new, despite changes to nomenclature, definitions and understandings over the past century. In 1920, Thorndike identified 'social intelligence' as an important facet of intelligence. Importantly, recent contributors have emphasised the ability to develop and improve personal and social capability both as adults and as children. Development of personal and social learning can provide a way for students with disability to access age-equivalent content and promote student learning, selfconfidence and independence (Wehmeyer et al 2007).

2.1.6. ORGANISING ELEMENTS

According to (Goleman, 1998) The Personal and social capability learning continuum is organised into four interrelated elements of:

1. Self-awareness

This element involves individual in identifying and describing the factors that influence their emotional responses. They develop a realistic sense of their personal abilities, qualities and strengths through knowing what they are feeling in the moment, and having a realistic assessment of their own abilities and a well-grounded sense of self-knowledge and selfconfidence. In developing and acting with personal and social capability, individuals:

- a. Recognise emotions
- b. Recognise personal qualities and achievements

c. Understand themselves as learners

d. Develop reflective practice

2. Self-management

This element involves individual in effectively regulating, managing and monitoring their own emotional responses, and persisting in completing tasks and overcoming obstacles. Individuals are engaged in developing organisational skills, and identifying the resources needed to achieve goals. In developing and acting with personal and social capability, individuals:

a. Express emotions appropriately

b. Develop self-discipline and set goals

c. Work independently and show initiative

d. Become confident, resilient and adaptable.

3. Social awareness

This element involves individual recognising others' feelings and knowing how and when to assist others. Individuals learn to show respect for and understand others' perspectives, emotional states and needs. They learn to participate in positive, safe and respectful relationships, defining and accepting individual and group roles and responsibilities. In developing and acting with personal and social capability, individuals:

a. Appreciate diverse perspectives

b. Contribute to civil society

c. Understand relationships.

4. Social management

This element involves individual in interacting effectively and respectfully with a range of adults and peers. Individuals learn to

negotiate and communicate effectively with others; work in teams, positively contribute to groups and collaboratively make decisions; resolve conflict and reach positive outcomes. Individuals develop the ability to initiate and manage successful personal relationships, and participate in a range of social and communal activities. In developing and acting with personal and social capability, individuals:

- a. Communicate effectively
- b. Work collaboratively
- c. Make decisions
- d. Negotiate and resolve conflict
- e. Develop leadership skills

2.1.7. COMMUNITY RESOURCES MANAGEMENT

Community resource management has evolved as a way of maximizing benefits derived from natural resource whilst enhancing their status. It has been argued that the status of the resources and how they are used are inseparably linked and as such there is a dynamic equilibrium between renewal and utilisation (IUCN 1996), As such, the development of Community Resource Management Plans (CRMPs) evolved as an attempt to establish, monitor and manage this equilibrium. The CRMPs are implemented through adaptive management to cope with the risk and cater for unpredictable and sometimes-unknown responses of resources and variation of other conditions. CRMPs are records of all community's development, utilisation and conservation priorities for the implementation of resource management strategies and monitoring of impacts resulting thereof. The ultimate objective of developing

CRMPs is the attainment of sustainable utilisation of natural resources. Sustainable use of natural resources is socially defined and therefore not an absolute determinant or a standard measure. Its determination therefore is a process that involves participation and public discourse where development agents are facilitators ensuring that social groups have equal representation (SASUG, 1996).

Community Resource Management Area (CREMA) concept is being implemented to address key natural resources governance and management challenges that account for the declining trend in natural seeks to encourage CREMA constituent communities to integrate natural resources management into their traditional livelihood strategies in areas outside of forest reserves and Protected Areas. Overtime, the concept has evolved to become an innovative community based governance system for managing resources for climate change adaptation and mitigation opportunities as well.

According to James *ET. al* (2004) The Community Resource Management Area (CREMA) idea was conceptualised on the back of declining trends of wildlife. The decline in wildlife was in part due to:

1. The nature of the law on wildlife that culminated in “public exclusion” from wildlife conservation.
2. The diminishing habitat of wild animals

CREMAs were therefore initially developed to encourage sustainable production of other natural resources based livelihood options toward a balance between conservation and development. Nonetheless, the concept has evolved into a viable governance and management platform for natural resources in general

2.1.8. DECENTRALIZATION

The concept of decentralization applied in Indonesia has given very basic implications, especially regarding fiscal policy and state administration policy. Rondinelli and Cheema (1983), define decentralization as the transfer of planning, decision-making and/or administrative authority from the central government to central regional organizations, local administrative units, semi-autonomous and parastatal organizations (companies), local governments or non-governmental organizations. The different concepts of decentralization are determined mainly by the level of authority for planning, deciding and managing the authority transferred by the central government and the amount of autonomy received to carry out these tasks.

Furthermore Rondinelli (2000), provides 4 dimensions of decentralization which are described in the following table:

Table 2. Categories of Decentralization by Objectives and Instruments

No	Decentralization	Category	Purpose Instrument
1	Political decentralization	Increasing power to citizens and their political representation in public decision-making	Differences in constitutions and laws, development of political parties, strengthening of the legislature, establishment of local political institutions, support for effective public interest groups
2	Administration decentralization	Improving management efficiency for public service delivery	Deconcentration, delegation, and devolution each with different characteristics.
3	Fiscal decentralization	Improving financial performance through improving decisions in creating rational revenues and expenditures.	Rearrangement of expenditures, revenues and fiscal transfers between levels of government
4	Decentralization of the economy and markets	Creating a better environment for business and providing goods and services in response to local needs and market mechanisms	Transfer of government functions to business organizations, community groups or NGOs through privatization and

			strengthening of the market economy through deregulation
--	--	--	--

Robert A. Simanjuntak (2001) states that decentralization can basically be divided into 3 major parts, namely political decentralization, administrative decentralization and fiscal decentralization, all of which are closely related to each other and should be implemented together so that various regional autonomy objectives such as improvement of public services can be implemented.

Implementation of Act No. 23 Year 2014 on Regional Government in line with the decentralization and the strengthening of democracy and community participation have consequences on the county and/or city as the basis of regional autonomy organizers claimed to be more capable of run independently. For that local governments should be able to explore the potential to increase local revenue (PAD). The area should also be able to encourage more people to participate in various aspects of life. Therefore, the development of coastal and marine areas should be arranged in the frame of integrative approaches are synergistic and harmonious with the observance of the values and institutions that grow and thrive in the community and in line with the local potential sources.

2.2. EMPIRICAL CASE

2.2.1. INDONESIAN FISHING COMMUNITITESAND PROBLEMS (ECONOMICS, POLITICS, SOCIAL AND ENVIRONMENT)

The results of various studies on fishing community groups in Indonesia show that their condition is a marginal community group from an economic, social and political perspective (Semedi, 2002). As an illustration, since 1997/1998 the average household income of small-scale fisheries in 10 provinces in Indonesia is still far below the regional minimum wage (UMR) set by the government in the same year. Furthermore, in 1985 when Indonesia's per capita income reached Rp. 588 thousand, the fishing group with capital owners had an income of Rp. 560 thousand, lower than the national income per capita. This situation is not much different from the current situation. Efforts to improve the social, economic and political conditions of fishermen are inseparable from the availability of basic data regarding the characteristics of their socio-economic conditions. As the poorest of the poor (Muflikhati, 2010), exact data on the number of fishermen in Indonesia has never been available.

The process of utilizing fishery resources in capture fisheries activities is a series of capture fisheries activities that involve aspects of fishing technology, fishing operations, mobilization of capital and labor to aspects of fish marketing. This process is the basis of the economic activities of fishermen in coastal areas. Ironically, in the process, fishermen are always in a marginal position with a low quality of life which is indicated by the absolute poverty they face. On the other hand, of the 51 million fishermen worldwide, more than 99 percent are small-scale fishermen,

generally depending on marine resources. The condition of marine resources itself has been degraded so that it becomes a crucial problem faced by world countries based on capture fisheries. The Food and Organization (FAO) in 1997 noted that around 35% of the 200 capture fisheries sources were in a state of declining catch, about 25% were at a high level of exploitation, 40% were still in the developing stage to continue to be exploited and 0% were at a high level of exploitation. conditions are not exploited at all. This situation shows that about 60% of all capture fisheries resources are in a condition that has been optimally processed and leads to high exploitation. This situation is no different from the conditions found in the northern coast of the island of Java, especially West Java. In addition to experiencing over exploitation, the fishing ground is getting narrower between the same and different fishing gear, plus other interested parties are increasingly complex who use these water areas. The end of the whole problem is the condition of fishermen who remain poor and even continue to be poor.(Siswanto, 2008)

Various efforts have been made by the government to improve the quality of life of fishermen, although in its implementation the policies issued by the government are always not in favor of fishermen or the weak application of the regulatory law. The policies that have been issued by the government have started from the issuance of the Blue Revolution policies since the 1970s to regulations at the legal level at this time. While in agriculture at the same time the government issued a Green Revolution policy in the context of modernizing the agricultural system to increase the level of farmers' welfare, the Blue Revolution was issued by the government as a fishery political policy that initially wanted to

follow a success story in agriculture. The target of the Blue Revolution is to increase the welfare of fishermen through efforts to increase fishery efficiency and productivity, especially marine resources with various policy variants ranging from modernizing the use of motorization and modern fishing gear technology; a policy of providing credit facilities in the form of business loans, machinery, boats and essential equipment to fishermen; construction of infrastructure facilities that support fishing activities in order to ensure effectiveness and increase production in the form of fishing ports, cooler rooms, fish drying places and Fish Auctions (TPI). In 1980-1996 this policy was renewed with the launch of fisheries deregulation which included the development of fishing gear, port construction and addition of fishing fleets through domestic production capabilities as well as the import of used vessels as well as the granting of permits for foreign vessels (Kusnadi, 2000)

According to (Adrianto, 2007) The impact of the Blue Revolution policy issued by the government is quite fantastic, namely from 1970 to 2003 there was an increase in fishery production, both capture and aquaculture. This is because the Blue Revolution, which is supported by large-scale and capital-intensive business activities, justifies the penetration of capitalism which is not based on the independence of small fishermen and fish farmers.

In particular, six implications emerge from this development:

1. Degradation of fish resources, decreased carrying capacity of the marine environment and damage to ecosystems
2. Creating a wide class gap between ship owners and fishing workers;
3. Degradation of mangrove forests and transfer of pond land to investors

4. Spatial conflicts in coastal areas caused by areas of fishery activities, ports, tourism, industry and conservation areas
5. The low capacity of fishermen's human resources so that their productivity is also low, and
6. Structural injustice that harms poor fishermen in terms of limited access to capital.

The other efforts that have been made by the government to improve the quality of life of fishermen include through a program for distributing business credit to fishermen, subsidizing fuel oil (BBM), Decree of the Minister of Agriculture No. 607.Kpts/Um/9/1976 concerning the division of fishing areas based on the qualification level of fishing equipment owned by fishermen, Presidential Decree No.39/1980 concerning the abolition of the operation of tiger trawlers, Law Number 27 of 2007 concerning the Management of Coastal Areas and Small Islands and the issuance of Presidential Decree Number 10 of 2011 concerning the Coordination Team for the Improvement and Expansion of the Pro-People Program which allocates funds of Rp. 927.82 billion for the welfare of fishermen. In reality, the enforcement of regulations and the implementation of these programs is currently very weak and indicates as if these regulations and policies never existed, as there is stagnation in improving the welfare of fishermen's lives. In the end, the allocation of resources and sources of funds in the capture fisheries system for small fishermen is still far from a condition that can improve their quality of life (Sutejo, 2007)

Efforts by various parties to improve the quality of life of fishermen from a social, economic and political perspective by arranging extension programs are closely related to the availability of basic data regarding the condition of fishermen's characteristics

in social, economic and political aspects. Referring to this, this study considers it important to describe the social and economic conditions of fishing communities in Semarang City

2.2.2. FISHERMAN POVERTY AND ACCESS TO SOCIAL WELFARE OF FISHERMEN

According to the Head of the Center for the Study of Coastal and Ocean Resources (PKSPL) IPB, Kusumastanto, *et.al* (2011), most of the coastal and marine areas are rural areas with 80 percent of the population still in the poor category. This condition is compounded by the damage to marine and coastal resources and natural resources in general, the low quality of human resources, and limited village infrastructure. Outside the village context, the development of coastal and marine areas also cannot stand alone because it is closely related to the social, economic, and political context of the nation and the world in general. Coastal areas are generally still in a traditional environment, which in terms of financing, procurement and fulfillment of other needs is still a bit difficult, compared to those in cities.

Furthermore, Kusumastanto, *et.,al* (2011) explains that the problems faced by coastal villages are also due to several critical issues that lie behind them. Some of these important issues are divided into five domains, namely: ecological, social, economic, agrarian, and geopolitical. Some of these issues require serious handling related to the goal of empowering coastal village communities.

Departing from several issues that occur in coastal communities that have been described previously, the government is increasingly serious in trying to issue programs and policies to

empower coastal communities. Likewise, the local government of Semarang City. Based on the geographical condition of Semarang City, which consists of coastal areas along the northern coast, it is necessary for the Semarang City Government to make programs related to the management of marine potentials and marine products of Semarang City.

The Semarang City Government is still considered not serious enough in coastal management. This is because one of them is that the Semarang City government does not yet have a mature concept of area management to Accommodate Street Vendors (PKL). These management concepts will help the community's economy and be able to be enjoyed by the government by Increasing Local Revenue (PAD) from the marine sector in Semarang Regency.

In addition, according to the results of research by Shofwan, (2008), from the results of a survey of several sub-regions in Semarang City which represent capture fisheries and aquaculture businesses, both marine and freshwater fisheries, it shows that most coastal communities are still below the poverty line. The main problems are lack of capital, quality of human resources, lack of facilities and infrastructure, damage to marine habitats (coral reefs, mangrove forests, marine pollution and so on), lack of understanding of the value of resources and institutional problems (use conflicts and legal uncertainty issues).

2.2.3. GOVERNMENT POLICIES AND STRATEGIES AND ACTIVITIES FOR FISHING COMMUNITITES

2.2.3.1.INDONESIAN POLICIES, LAWS AND REGULATIONS ON WELFARE FOR FISHERMEN AND FISHING COMMUNITITES

A. FISHING LAWS REGIONAL REGULATIONS

Fisheries activities in Indonesia arrange by Ministry of Fisheries and Marine Affairs to Surveillance of the resources whichever fisheries consider sustainable, equitable, compliance and conservation aspect. Regulation of the Minister of Fisheries and Marine Affairs bolster anything capacity and create of humankinds especially fishermen to understanding of the natural resources is limited if we ignored about sustainability. Moreover, conservation effort inseparable among harnessing and preserving, these factor always to promote in the decade to control fisheries consumption whereas fisheries consumption prominent as a source of nutrition (Regulation of the Minister of Marine Affairs and Fisheries No. 22 Article 8, 2021).

B. LABOR LAWS, REGIONAL AND CITY REGULATION FOR FISHERMEN

Fisheries Labor in Indonesia comprised by Fishermen, Fish Cultivation and Salt Farmers. Fishermen as the main topic is also protect by the Regulation in Indonesia. Protection for fishermen elicit comfort and far from oppress impression. Fishermen with ease to adaptation with the environment to start the activities like a mundane and sell the outcome in the market. However, the Regulation from Government support fishermen to catch the fish and the Government do not have a due to extort the outcome from fishermen. (Indonesian Act No.7, 2016)

C. WELFARE LAWS REGIONAL REGULATIONS FOR FISHING COMMUNITIES

Welfare Laws for Fishing Communities imparted of assurance instantly to reserve fishermen with the best life. Obviously, Fishermen deserve namely Education Level, Ownership of Fishing Facilities and Availability of Fishing Infrastructure. The Regulation understanding of the circumstance of fishing activities in the ocean. Erratically, Fishermen rove in the ocean to catch the fish with any feasibility whichever the condition propitious or adverse. Empowerment of this research slated to Socio-economy as refer to increase the Welfare of Fishermen. Hopefully, Fishermen and Government might to coordination as well to establish and create harmony with apprehend meaningful (Regulation of the Minister of Marine Affairs and Fisheries No. 22 Article 10, 2021).

The Central Java Provincial Government is currently discussing the formulation of a special Regional Regulation (PERDA) to protect fishermen. The local regulation, which is currently being discussed, is expected to improve the quality of life of fishermen, including providing full protection to fishermen.

2.2.3.2. STRATEGY IN GENERAL, SPECIAL STRATEGY ON WELFARE SERVICES

The Central Java Provincial Government is currently discussing the formulation of a special Regional Regulation (PERDA) to protect fishermen. The local regulation, which is currently being discussed, is expected to improve the quality of life of fishermen, including providing full protection to fishermen.

The Governor of Central Java, GanjarPranowo, explained that the making of a local regulation on the protection of fishermen was motivated by the fact that fishermen currently need a lot of

protection in various aspects. In addition, improving the quality of fishermen is also important because it is no longer the time for fishermen to go to sea to look for fish, but to catch fish. Previously, the Chairperson of the All-Indonesian Fishermen Association, Riyono, hoped that the Central Java provincial government would make a special regulation for the protection of fishermen. The regulation is important to follow up the Law on the Protection and Empowerment of Fishermen as a complement to Law number 32 of 2014 concerning marine affairs and Presidential Instruction (INPRES) number 15 of 2011 concerning the protection of fishermen (Yulianti, 2019)

2.2.3.3. ACTIVITIES IN GENERAL

The Semarang City Fisheries Service is under the Ministry of Maritime Affairs and Fisheries and has 4 areas, namely the field of Marine and Coastal Management, the field of Capture and Aquaculture, the Field of Management of Fishery Products, and the Field of Marketing of Fishery Products. The Secretariat has 3 parts, namely the Planning and Evaluation sub-section, the Finance Sub-section and the General and Personnel Sub-section. The Service Technical Implementation Unit (UPTD) is divided into three parts, namely the UPTD for the Mina Rejomulyo Hygienic Fish Market, the UPTD for the Cangkiran Fish Seed Center, and the UPTD for the Tambaklorok Fish Landing Base.

However, in 2017 the Semarang City Marine and Fisheries Service changed its name to the Semarang City Fisheries Service because the Marine part was handed over to the province. With this change, the order in the Fisheries Service has also changed, such as: tasks, functions and organizational structure. The Marine and Coastal Management Sector was abolished, the Fishery Product

Marketing sector joined the Fishery Product Management Service to become the Fish Cultivation Small Business Empowerment Sector. Changes also occurred in the Secretariat and the UPTD, where the secretariat of the Finance sub-section joined the Evaluation Planning sub-section, while the Tambalorok Fish Landing Base UPTD was abolished.

The previous official duties and functions were regulated in the Mayor's Regulation Number 37 of 2008, now the official duties and functions are regulated in the Mayor's Regulation Number 82 of 2016. The UPTD section also underwent changes in the regulations. Task description from the field section attached at the bellow

TASK DESCRIPTION

The Field of Fish Farming Management has the following functions:

- a. Implementation of policy-making activities in the Field of Fish Farming Management
- b. Implementation of the activities of the Cultivation Fisheries Hatchery Section, and SsectionAquaculture Technology Development Section, and the Fish Cultivation Infrastructure and Facilities Development Section
- c. Implementation of financial management and accountability activities in the Fish Farming Management Sector

The Small Business Empowerment Sector has the following functions:

- a. Implementation of policy formulation activities in the Empowerment of Small Business Fish Cultivation
- b. Implementation of the activities of the Aquaculture Business Control Section, the Fish Cultivation Development Section, and the Fish Cultivation Product Marketing Development Section

- c. Implementation of data and information compilation activities in the Empowerment of Small Fish Cultivation Business

The Capture Fisheries sector has the following functions:

- a. Implementation of the activities of the Infrastructure Development Section and Capture Fisheries Advice, the Management and Implementation Section of Fish Auction Places, and the Small Fisherman Empowerment Section
- b. Implementation of data and information compilation activities in the Capture Fisheries Sector
- c. Implementation of financial management and accountability activities in the Capture Fisheries Sector

2.2.3.4. SPECIAL ACTIVITIES IN SEMARANG

Based on some of these phenomena and problems, the Government of Semarang City has implemented an empowerment program for coastal communities. This program is a program from the Central Java Community Empowerment Agency (Bapemas) which is implemented in 8 regions in Central Java, one of which is in Semarang City, especially in Tambaklorok Village. This program aims to eradicate underdevelopment and poverty in coastal areas in several areas in Central Java. The program that has been implemented is the Coastal and Coastal Community Empowerment Program (P2MPP), which is one of the community empowerment programs by utilizing the marine wealth of Semarang City. The target of this program is the mothers or wives of fishermen because it is these mothers who have the ability and have the time to process the marine products caught by fishermen. (Ma'ruf 2018)

The Ministry of Maritime Affairs and Fisheries stated its readiness to develop Indonesia from the periphery through the Natuna Integrated Marine and Fisheries Center (SKPT). One of the efforts made by the KKP through the technical implementation unit of the Directorate General of Capture Fisheries, Central Fish Catching Center (BBPI) Semarang is to increase the capacity of fishermen to optimize fishing fleets. Head of BBPI Semarang Widodo said his work unit was ready to support the fishermen empowerment program through technical guidance. This guidance is in the form of training in optimizing folding trap fishing gear, repairing machines, maintaining and laminating fiber boats.

In addition to supplying folding trap fishing equipment, fishermen will also be given materials on how to repair machines, maintain and laminate fishing vessels. So that it is not only fishing activities but also tips to keep the fishing boat fleet from being damaged quickly and can be used for a long time. BBPI Semarang has also coordinated with the Natuna Regency Fisheries Service and involved fishery instructors. In addition, it also provides competent engineers who design teaching materials in the technical guidance. This is done to prepare various things for fishermen's needs and their readiness to practice fish folding trap technology engineered by BBPI Semarang.

Chapter Three

III. SOCIO-ECONOMIC CONDITIONS AND LIVELIHOOD OF FISHERMEN

3.1 INTRODUCTION

This chapter tries to answer research question one on the socio-economic and cultural conditions and circumstances of Fishermen and Fishing Community in Semarang City. In order to answer this question, the chapter used quantitative data sources from the institutional related for acquire secondary and primary data. The Secondary data consists by Number of Population, Number of Population by Poverty, Number of Population by Education, Number of Population by Employment Status, Number of Population by Fisheries Sector. It also looks at the main assets of fishermen and households in Semarang City and the roles of local community of fishermen and fishing community. The answer is based on quantitative data interview of 100 households of fishermen in the Semarang Coastal Area, namely Tugu and Semarang Utara.

On socio-economic economic conditions of fishermen, the chapter applies both quantitative data. The finding is as follow

1. From documentary on population data
2. From survey and interview look at livelihood assets and role of local community on the answer that related to socio-economic conditions of fishermen and fishing community: human, social, financial, physical, natural.

3.2. SOCIO ECONOMIC CONDITIONS, ECONOMIC LIVELIHOOD AND ASSETS OF FISHERMAN

Socio-culture in the Semarang Coast is still very strong, this is passed down from generation to generation and continues to be instilled in the younger generation. Socio-cultural This is very easy to find, as there is still a culture of sea offerings and tahlilan. Sea offerings are an effort from the community to be grateful for abundant marine products and tahlilan (praying where people die, and others). Even a sense of togetherness and mutual help is still inherent in the Semarang Coastal community, by showing togetherness in the cooperation system. The city of Semarang is located in the administrative area of Central Java Province, the socio-economic conditions of the coast of Semarang have little influence on urban culture, this is because the Semarang Coast is close to the Semarang City area.

3.2.1. POPULATION OF SEMARANG CITY

The coastal population of Semarang, in general, is indigenous people who have settled and descended into the city of Semarang administratively and some come from other areas, both from the Regency/City in Central Java Province and from other provinces. The total population of Semarang City in 2019 was 1,814,100 people, while in 2020 the population was 1,653,524 people of the total population divided into men and women by sub-district with details as shown in the following table 3 and table 4

Table 3. Number of Population in 2019

No	Sub-district	Total Population	
		Population (Thousand)	Annual Population (Percent)
1	Mijen	76037	1.567
2	GunungPati	118760	1.567
3	Banyumanik	164953	1.567
4	Gajahmungkur	60679	1.567
5	Semarang Selatan	70522	1.567
6	Candisari	76857	1.567
7	Tembalang	209504	1.567
8	Pedurungan	214689	1.567
9	Genuk	119010	1.567
10	Gayamsari	83036	1.567
11	Semarang Utara	75762	1.567
12	Semarang Timur	119647	1.567
13	Semarang Tengah	61102	1.567
14	Semarang Barat	165048	1.567
15	Tugu	33333	1.567
16	Ngaliyan	165171	1.567
Total		1814110	1.57

Source: Central Bureau of Statistic Semarang City

Table 4. Number of Population in 2020

No	Sub-district	Total Population	
		Population (Thousand)	Annual Population (Percent)
1	Mijen	80906	1.567
2	GunungPati	98023	1.567
3	Banyumanik	142076	1.567
4	Gajahmungkur	56232	1.567
5	Semarang Selatan	62030	1.567
6	Candisari	75456	1.567
7	Tembalang	189680	1.567
8	Pedurungan	193151	1.567
9	Genuk	123310	1.567
10	Gayamsari	70261	1.567
11	Semarang Utara	66302	1.567
12	Semarang Timur	117605	1.567
13	Semarang Tengah	55064	1.567
14	Semarang Barat	148879	1.567
15	Tugu	32822	1.567
16	Ngaliyan	141727	1.567
Total			1.57

Source: Central Bureau of Statistic Semarang City

The data in table 3 and table 4 explains that the population of Semarang City decreased by 160,586 people from 2019 to 2020, with the largest population in 2020 in Pedurungan District.

Semarang city is the capital of the central java province, the total population is very high and many immigrant communities reside as long as possible to work in the City of Semarang.

a) Population by Poverty

The population of Semarang City in 2020 is 160,586 people, of which there are people with poverty levels. The trend of the poverty line in the city of Semarang has increased, while the number of people living in poverty has decreased from 2013 to 2019 and increased again in 2020. The following details the data on the number of residents with poverty levels in the city of Semarang provide in the table 5

Table 5. Number of Population by Poverty Level

Year	Poverty Line (rupiah/capita/month)	Number of Poor People (thousand)	Percentage of Poor People
2013	328271	86,70	5,25
2014	348824	84,70	5,04
2015	368477	84,30	4,97
2016	382160	83,59	4,85
2017	402297	80,86	4,62
2018	427511	73,65	4,14
2019	474930	71,97	3,98
2020	522691	79,58	4,34

Source: Central Bureau of Statistic Semarang City

The data in the table explains that the highest poverty line in 2020 is in the range of 522,961, with some populations 79.58. The number of poverty in the City of Semarang denote increase every year from 2013 to 2020. The problem of poverty in the city of

Semarang is the burden of the Government want to be deducted and eradicated.

b) Population by Education

The level of public education is based on data from the Central Bureau of Statistics Semarang City as shown in the following table 6. The data in Table 6 explains that the average population of Semarang City has completed education to University Graduates, this shows that Semarang City's public awareness of education is very high, so this is a great potential that will become a driving force for Semarang City towards progress.

Table 6. Population by Education

No	Educational Level	2019	2020
1	Up to Primary School	112	66
2	General Vocational Junior High School	220	154
3	General Vocational Senior High School	2132	1678
4	Diploma I,II/Akta I,II	943	505
5	DiplomaIII/Akta III/Bachelor	889	862
6	University Graduates	6365	6501
Total		10661	9766

Source: Central Bureau of Statistic Semarang City

The problem of cost to attain University Graduate perceived by all layer society, even though some society feels enough to pursue within General Vocational Senior High School. The Government in the City of Semarang's assertion to the whole society accomplished “compulsory study” from level Primary School to Senior High School. The aim of “compulsory study” is to eradicate illiterate, and enhance individual productivity

C) Population by Employment Status

The Main Employment Status of the people of Semarang City is different, with details of the total work of all sub-districts in the city of Semarang can be seen in the following table 7. The table is the total population based on Main Employment Status consisting of men and women with a total of 925,963 people. The table above shows that the majority of the people of Semarang City according to Main Job Status as Employees are 543,318 people.

Table 7. Population by Main Employment Status

No.	Main Employment Status	Total
1	Own Account Worker	167.124
2	Employer Assisted by Temporary Worker/Temporary Worker	63.977
3	Employer Assisted by Permanent Worker/Paid Worker	32.832
4	Employee	543.318
5	Casual Worker	46.440
6	Family Worker/Family Worker	72.272
	Total	925.963

Source: Central Bureau of Statistic Semarang City

Reference to the data there are feasibility the City of Semarang for stimulating the society towards Entrepreneurship. The Government has must bolster and oversee the opportunity. The industrial sector since pandemic covid-19 knuckles down to revoke economical sector, even though sacrifice to deducted employees. Through the condition Government have must to poised between everlasting to Industrial sector and well-being to society, avoidance criminality is very important to create sustainable financial.

D) Population by Fisheries Sector

From the number of native people of Semarang City in 2019 whose work as fishermen were 1082 people, Embankment Farmer 794 people and Pond Farmer 992 people. Furthermore, the data is still not recorded and there are immigrant communities who work as fishermen in Semarang City. The trend of Semarang City people who make a living as fishermen has decreased, this is inversely proportional to Pond Farmers who experienced an increasing trend.

Table 8. Population by Fisheries Sector in the City of Semarang

No	Sub-district	Fisherman (person)	Embankment Farmers (people)	Pond Farmer (person)
1	Mijen	-	-	164
2	GunungPati	29	-	263
3	Banyumanik	-	-	24
4	Gajahmungkur	-	-	-
5	Semarang Selatan	-	-	24
6	Candisari	-	-	-
7	Tembalang	-	-	-
8	Pedurungan	-	-	152
9	Genuk	45	-	32
10	Gayamsari	-	-	20
11	Semarang Utara	745	95	-
12	Semarang Timur	-	12	-
13	Semarang Tengah	-	-	-
14	Semarang Barat	12	48	150
15	Tugu	251	-	-

16	Ngaliyan	-	-	41
	Total 2019	1082	794	992
	2018	1484	794	972
	2017	1575	631	856
	2016	1404	683	708
	2015	1404	678	678

Source: Central Bureau of Statistic Semarang City

The opportunity of Pond Farmer showed bullish in every year, the condition it must be considered by the Government, and it must be convinced to the whole stakeholder whose support national project strategies. The Government is obliged to promote if Fresh fish contains protein resources and potential for fish production in the market.

3.2.2. THE PRODUCTION OF FISHERY PRODUCT IN THE CITY OF SEMARANG

Semarang is the capital city of Central Java Province and has a 36.63 km long beach which has potential in the field of fisheries including marine fisheries and land fisheries, while administratively it is divided into 16 sub-districts and 177 sub-districts. The total population of Semarang City based on population registration is 1,419,478 people, which increases as fishermen 1,104 people. The residents make a living as fish traders, both fresh and processed fish, 1153 people, 502 people are aquaculture farmers, and 373 fish cultivators. The area of the pond is 1,002.10 hectares spread over the Tugu Region, West Semarang, North Semarang, East Semarang, Gayamsari, and Genuk. While the area of the pond in Semarang City is 16.84 hectares spread over the Mijen, Gungpati, Ngaliyan, South Semarang, Tugu, Banyumanik, West Semarang, North Semarang, Pedurungan, Gayamsari and Tembalang sub-districts, the overall area of the river as public waters is 173.20 Ha. (Central Bureau of Statistic, 2021)

One of the fishery activities in Semarang City which is currently developing is the processing of fishery products. The existence of fish processing groups and fishery product processing companies in Semarang City is felt to be able to support the development of fishery development potential, both from the utilization of fishery products and employment.

The production of fishery products processing is mostly to meet local needs around Central Java. The need for fish consumption for the population of Semarang is 22.37 kg per capita per year, meaning that the fish need is 1,356,017 tons. Even if Semarang succeeds in increasing fishery production by processing fishery products, it does not rule out the possibility to export. This is indicated by the export of fishery products from/through Semarang City of 3,376,747 Kg with a value of \$ 19,041,913.02. Meanwhile, the value of fish from land fisheries also increased from Rp. 9,219,094,500,- in 2012 to Rp. 14.213.700.000,- in 2013, or an increase of 54.18%. The area of land used for aquaculture in Semarang City is 1626.13 ha consisting of ponds and ponds. The area of ponds for aquaculture in 2012 was 52.18 ha and increased by 7.57% in 2013 to 56.13 ha. Meanwhile, the area of ponds in the city of Semarang is 1,570 ha. (www.dkpkotasemarang.go.id)

According to the Law of the Republic of Indonesia, Number 31 of 2004 concerning Fisheries, Article 6:

- (1) Management of fisheries in the fishery management area of the Republic of Indonesia is carried out to achieve optimal and sustainable benefits, and ensure the sustainability of fish resources.
- (2) Fishery management to catch fish and raise fish must take into account the customary law and/or local wisdom and take into account the participation of the community.

And Article 24:

- (1) The government encourages the increase in the added value of fishery products.

(2) The government may limit the export of raw materials for the fish processing industry to ensure the availability of these raw materials in the country.

(3) Further provisions regarding the increase in the added value of fishery products as referred to in paragraph (1), and guarantees for the availability of domestic fish processing industry raw materials as well as restrictions on the export of raw materials as referred to in paragraph (2), shall be governed by government regulation. So fishery management in the Semarang area must be optimal and sustainable and make it an added value to production for the region

3.2.3. EXPORT OF FISHERY PRODUCTS IN SEMARANG CITY, CENTRAL JAVA PROVINCE

The export of fishery products in Central Java Province continues to increase in terms of volume, income, product types, and destination countries. As of November 2019, the volume of Central Java's fishery exports reached 41,289 tons with a value of IDR 2.4 trillion (www.humasjatengprov.go.id). Exports of marine and fishery products from Semarang, Central Java have increased. The export value throughout April 2021 reached Rp 323 billion. The figure increased every month (month to month) from Rp 260 billion in March 2021. Exports during April were the highest during the 4 months of the first quarter of 2021. In January, exports only reached 3,914 tons, February had dropped to 2,850 tons, and increased again in March 2021 by 3,231 tons. (www.money.kompas.com)

"Meanwhile, the volume of Central Java's fishery exports in the first semester of 2019 reached 26,775 tons with a value of Rp. 1.59 trillion. Even now, export destination countries are also increasing, previously or in 2018 there were 32 destination countries, then in 2019 it became 36. Among them are the United States, Japan, China, Malaysia, Singapore, and Taiwan," said Head of the Central

Java Maritime Affairs and Fisheries Service Fendiawan
Tiskiantoro

The Head of the Central Java Marine and Fisheries Service again stated:

"Some of the largest commodities exported from Central Java's fishery products include surimi, squid, small crab, white shrimp, *vaname* shrimp, anchovies, *layur*, and tilapia meat. Even in 2019, the types of export fishery production were increasingly diverse compared to the previous year. In 2018, 92 species were recorded, now there are 95 types of fishery products shipped to several countries. While the leading commodities of fishery and marine products in Central Java include catfish products amounting to 143,853 tons or worth Rp1,245 trillion, tilapia as much as 102,727 tons, milkfish recorded at 93,204 tons, seaweed 75,008 tons, and *vaname* shrimp which is still one of the mainstay export products of Rp. 28,954 tons with a value of Rp1.064 trillion. Although fish production in Central Java is increasing, fish consumption is still around 30 percent with the highest consumption levels including Pati Regency and Semarang City. Therefore, we have to improve the program for eating fish more."

Meanwhile, the Head of Small Business Empowerment said:

"Several programs must be implemented and synergized with various parties. Regarding the program budget, it is more to realize the benefits. Program activities must be useful and communicated in the community, the Central Java region has dozens of small islands scattered in the waters of the North Coast and South Coast. Among them are in Jepara, Kebumen, Cilacap, and Rembang. All these small islands must be managed and maintained properly so that they are not lost

3.2.4. SOCIO-ECONOMIC OF FISHERMEN AND FISHING COMMUNITIES IN TUGU AND SEMARANG UTARA

a. Poverty

Poverty is a problem that often occurs when regional development activities are characterized by backwardness or underdevelopment and unemployment which will increase inequality (Ridlo, 2001).

Based on data from the poor community in Semarang City in 2020 of 114,939 families or 367,848 people, most of whom are in the Semarang Utara District, the Sub-District that has the poorest population is Tanjungmas Village, which is 4,324 families and as many as 14,384 people and most of them are in the Tanjungmas Village, Tambak Lorok Sub-District (Poor Citizens Information System, 2021).

b. Education

Educational vulnerability based on Mayor Regulation No. 18C Year 2009 is unable to finance their children's education until Senior High School. Budgets that are not on target are given in Semarang Utara District and Tugu District. This happens because the two sub-districts are sub-districts prone to higher education, but receive a small budget. The budget that is right on target is given in the Ngaliyan District because it is a sub-district with a moderate education vulnerability and gets a moderate budget (Poor Citizens Information System, 2021).

c. Employment Status

Semarang Utara is a coastal area that is synonymous with fishermen. Most of the people who live in coastal areas are fishermen. The

Tambak Lorok area is the Sub-District with the largest number of fishermen, amounting to 1,756 people out of a total of 1,919 fishermen in Semarang Utara (Central Bureau of Statistic Semarang City, 2021). Coastal areas are still considered synonymous with poverty. Coastal communities are people who live in coastal areas and their daily lives are very dependent on marine resources (Nikijuluw, 2001).

d. Fishery Sector

The number of Fishery households in Semarang Utara and Tugu District in 2019 showed a far disparity that is Semarang Utara 734 people and Tugu with 219 people. Meanwhile, the Number of Fishery households in the Tugu District in 2020 also showed a far disparity that is Semarang Utara 753 people, and Tugu 258 people. The majority of Semarang Utara and Tugu District Fishery sector consists of Fishermen and Embankment Farmer, in 2020 Fishermen in Semarang Utara was 754 people, while Fishermen in Tugu were 251 people. Meanwhile, Embankment Farmer in Semarang Utara 95 people, while in Tugu there is no exist. (Central Bureau of Statistic Semarang City, 2021)

3.2.5. MAIN ASSETS OF FISHERMAN, FISHING COMMUNITY AND HOUSEHOLDIN SEMARANG CITY

Data on the Characteristics of Coastal Household Respondents from the results of data collection through questionnaires answered or filled out by respondents, a description of the characteristics of respondents was obtained including data on age, and number of dependents in the family.

a) Characteristics of Coastal Household Respondents by Age

Based on the results of research on 100 respondents, data on the distribution of respondents' characteristics based on age will be presented in the following table 9. According to the data in the table 9, it can be seen that the age group of respondents aged 30-49 years is 52 people or 52% and aged 40-50 years is 24% people. This shows that the majority of coastal households in Semarang City are in the age range between 30-39 years, as many as 52 respondents.

Table 9. Data on Characteristics of Coastal Households by Age

NO	AGE	NUMBER OF RESPONDENTS (Person)	PERCENTAGE %
1.	20-29	26	26%
2.	30-39	52	52%
3.	40-50	24	24%
	Total	100	100 %

Source: Data processed

b) Characteristics of Coastal Household Respondents Based on Number of Family Dependents

Based on the results of research on 100 respondents, data on the distribution of respondents' characteristics based on Number of Family Dependents will be presented in the following table 10

Table 10. Characteristics of Coastal Household Respondents Based on Number of Family Dependents

NO	The number of dependents	Number of Respondents (person)	Percentage %
1.	1 person	6	6 %
2.	2 person	40	40%
3.	3 person	40	40%
4.	4 person	10	10%
5.	5 person	2	2%
6.	6 person	2	2 %
	Total	100	100 %

Source: Data processed

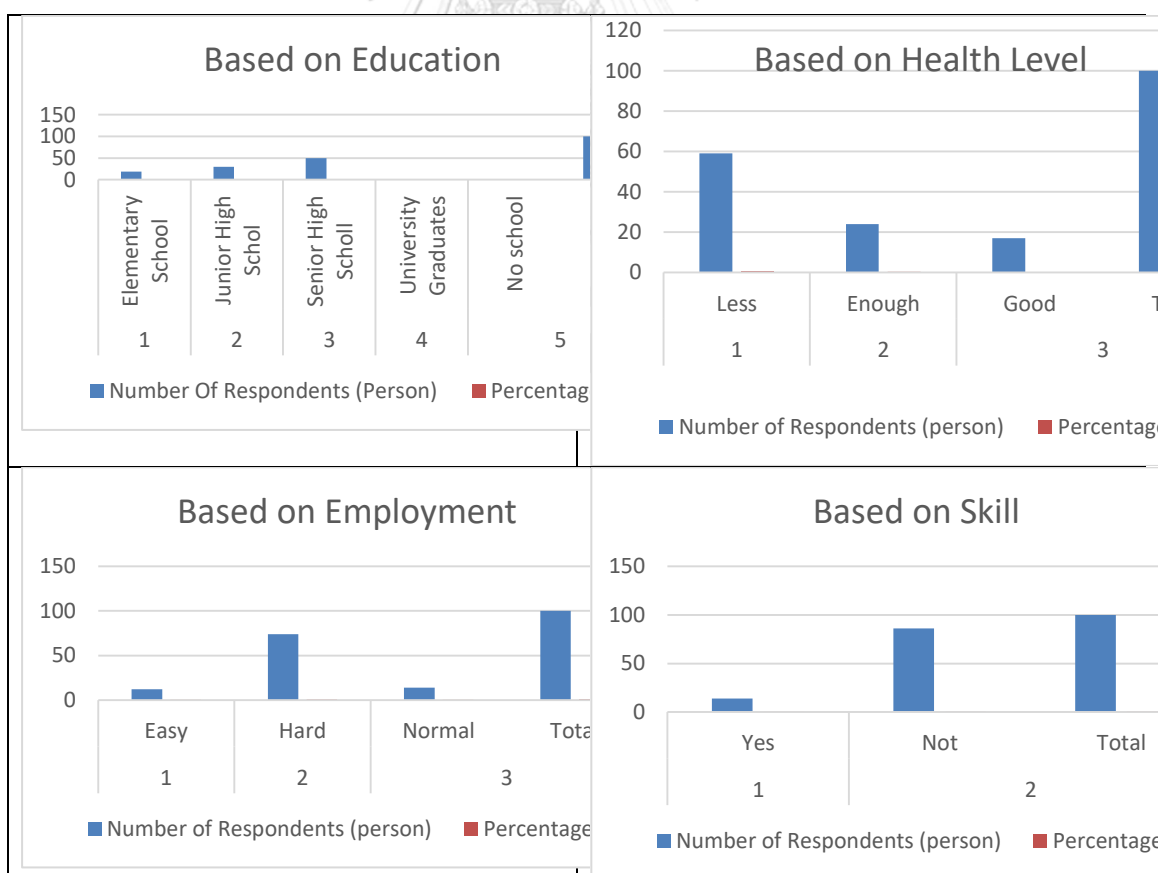
By looking at the table above, it can be seen that the Respondents of Coastal Households in the City of Semarang with the number of dependents 1 person as many as 6 people or 6%, respondents with the number of dependents 2 people as many as 40 people or 40%, respondents with the number of dependents 3 people as many as 40 people or 40%, respondents with 4 dependents as many as 10 people or 10%, respondents with 5 dependents as many as 2 people or 2%, respondents with 6 dependents as many as 2 people. So it can be concluded that most of the respondents have quite large dependents.

The livelihood assets that compose of human, natural, financial, social and physical capital. The finding is seen below.

A. Human Capital

The results of the percentage of human capital in the two research locations are not too much different. This is due to the education level of fishermen and coastal households, most of which are high school graduates. High school graduates and junior high school graduates are only 20% different. Most of the fishing communities do not have special skills so they only focus on fishing activities. There are some people who have other skills such as trading because the income from the fishery sector is not enough to meet their daily needs.

Table 11. Human Capital Aspects



Source : Data processed

1. Responden Based on Education

Based on the data in table 11, it can be seen that most of the respondents have a senior high school education/equivalent as many as 50 people or 50% and followed by a junior high school education/equivalent as many as 30 people or 30%.

While there are 19 people with elementary education or 19% and no University Graduates education. From the data above, it can be concluded that the people in Semarang Coastal Area are still at a low level of education. This can be seen from the level of education of the community which only graduated from elementary school to high school and for University Graduates there is absolute no.

1. Responden Based on Health Level

From the data in table 11, it is noted that in general, respondents have a level of health with a sufficient category as many as 59 respondents or 59% of the total number of respondents and the rest with a less category 24 respondents or 24% and have a healthy level with a good category as many as 17 respondents or 17%.

The quality of life of a Coastal Household is generally considered to be a community with poor health conditions. Various factors that cause it, among others, due to the lack of knowledge and awareness of the community to live clean and healthy as well as dirty environmental sanitation conditions and slum and so that the surrounding community is very vulnerable to suffering from various kinds of diseases.

From the research data, the level of health of fishing communities in Semarang City is generally categorized as "enough". This is indicated by an improvement in family health conditions where the level of illness among fishing communities can be reduced or reduced compared to last year. This is based on programs

made by the government such as health extension workers and improving health services by health workers in the city of Semarang.

2. Responden based on Employment

From the data in table 11, it is noted that in general, respondents have a level of Employment Indicator with a “Hard” category as many as 74 respondents or 74% of the total number of respondents and the rest with a “Normal” category 14 respondents or 14% and have an Employment Indicator with a “Normal” category as many as 17 respondents or 17%.

The data refer to seeking a job in the Semarang city, especially in the coastal area who the majority of social work as fishermen and rough workers like in the building and maintenance support. This case is destined by the level of education is low, even they are only Senior High School graduates. Currently, working in the city of Semarang minimum have must standard University Graduate.

3. Responden Based on Skill

From the table 11, it is noted that in general, respondents have a level of Skill Indicator with a “No” category as many as 86 respondents or 86% of the total number of respondents and the rest with a “Yes” category 14 respondents or 14%.

The Data show that the Fishermen majority do not have skill another catch the fish. Usually, Fishermen and Coastal Household spend the time in full day to checking the boat and fishing gear if any troubles to operated again in another day. In my opinion the condition emerge of dilemma, fisheries outcome in Semarang City is low because the impact of bad water quality produce by water pollution from factory activity and unconciousness the society to

throw the garbage dump. Even, in Semarang City plastic waste inhibit water drainage in the gutter and emerge of flash flood.

Based on the tables above, it can be seen that the education level of the respondents in the two research sites is mostly Senior High School graduates. The health condition of the respondents in the research area is classified as lacking. As many as 59% of respondents stated that their health level was lacking. The number of respondent workers shows that there is little potential for labor other than fishermen because their daily activities are dealing with fishing activities other than fishing, namely checking boats and fishing gear if something is damaged, this activity takes time because it requires concentration and affects performance the next fishing day

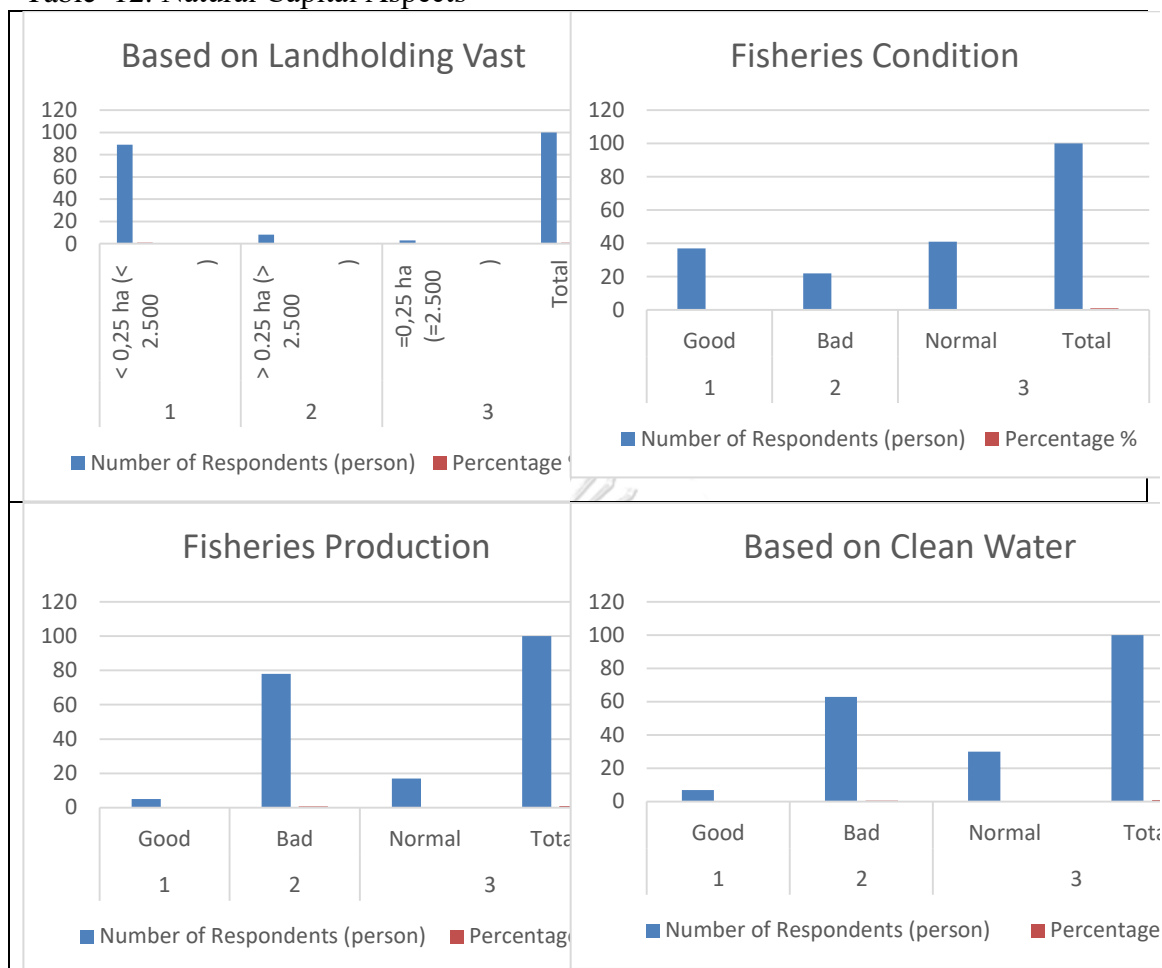
The more the number of productive family members who help fishery businesses such as processing marine fishery products, it can help the family economy. The workers who come from fishermen's families are the family's contribution to overall fishery production and are never valued in money, so they will be more efficient and effective. The role of this fisherman's family member is as the main asset in managing the fishery business together.

Skills in the two research sites showed low scores. This number shows a lot of potential that respondents have other than fishing activities. The low value of this skill indicates that most of the respondents only depend on fishing activities to support their life.

B. Natural Capital

The value of natural capital in the two research locations can be determined as follows Landholding Vast, Fisheries Condition, Fisheries Production, and Clean Water Condition.

Table 12. Natural Capital Aspects



Source: Data processed

1. Responden Based on Landholding Vast

From the table 12, it is noted that in general, respondents have a Landholding Vast Indicator with a “< 0,25 ha” category as many as 89 respondents or 89% of the total number of respondents and the rest with a “> 0,25 ha” category 8 respondents or 8% and have a Landholding Vast Indicator with a “=0,25 ha” category as many as 3 respondents or 3%.

The data show that majority Coastal Household have Landholding Vast “<0,25” ha because the condition in coastal area is not appropriate to building vast rather than we are sovereign in the

location such as fishermen skipper (fishermen rich) who they have Landholding Vast “> 0,25 ha” to assets and fish storage. The fishermen skipper genuinely rich people in these area, and obviously they have enchantment and authority to control economical sector.

2. Responden Based on Fisheries Condition

From the table 12, it is noted that in general, respondents have a Fisheries Condition Indicator with a “Normal” category as many as 41 respondents or 41% of the total number of respondents and the rest with a “Good” category 37 respondents or 37% and have a Fisheries Condition Indicator with a “Bad” category as many as 22 respondents or 22%.

The data show that majority Coastal Household Reveal Fisheries Condition in the Normal Category, the condition obviously difference with the fact in the ground. Fisheries condition in the Semarang Coastal Area minimum attention from the Government. Fisheries in Semarang city mostly used traditional technology, and the habit of traditional fishermen felt enough if the outcome sufficient. So, it is related with their opinion in the “Normal” condition.

3. Fisheries Based on Fisheries Production

From the table 12, it is noted that in general, respondents have a Fisheries Production Indicator with a “Bad” category as many as 78 respondents or 78% of the total number of respondents and the rest with a “Normal” category 17 respondents or 17% and have a Fisheries Condition Indicator with a “Good” category as many as 5

respondents or 5%.

The data show that majority Coastal Household Reveal Fisheries Production in the Bad Category, the condition obviously different with the Fisheries Condition. Fisheries Condition focus on habit, while Fisheries Production focus on outcome. Regarding the data from Semarang City Fisheries Services in annual report 2020 there are decrease outcome production from 800.000 tons compare by 2019 as many as 1,04 million tons. According to several fishermen, fish production in Central Java is fish caught and cultivated. The most catches are types of fish for “*Surimi*” such as “*Kuniran*” and “*Kapasan*” fish. There are several factors that caused the decline in fish production in 2020. One of them is the impact of the COVID-19 pandemic. Due to the COVID-19 pandemic, it has affected a number of fisheries sectors. One of them, fishermen who reduce their intensity to go to sea, or even don't go to sea at all because of the declining fish auction prices

4. Responden Based on Clean Water

From the table 12, it is noted that in general, respondents have a Clean Water Indicator with a “Bad” category as many as 63 respondents or 63% of the total number of respondents and the rest with a “Normal” category 30 respondents or 30% and have a Clean Water Indicator with a “Good” category as many as 7 respondents or 7%.

The data show that majority Coastal Household Reveal Clean Water in the Bad Category, the condition obviously astonished and anxiety with the condition which is Semarang is the capital city of Central Java, Indonesia. The clean water crisis is one

of the pressures facing the city of Semarang. The majority of clean water needs in this city are obtained by utilizing ground water. This action causes the groundwater to shrink more and more so that the water there is increasingly brackish and the salt content increases. This condition cannot be allowed to drag on because it can cause land subsidence, landslides, floods, tidal waves, and sea water intrusion. If that happens, the subsidence speed here (coastal) will be the highest compared to other areas in the city of Semarang.

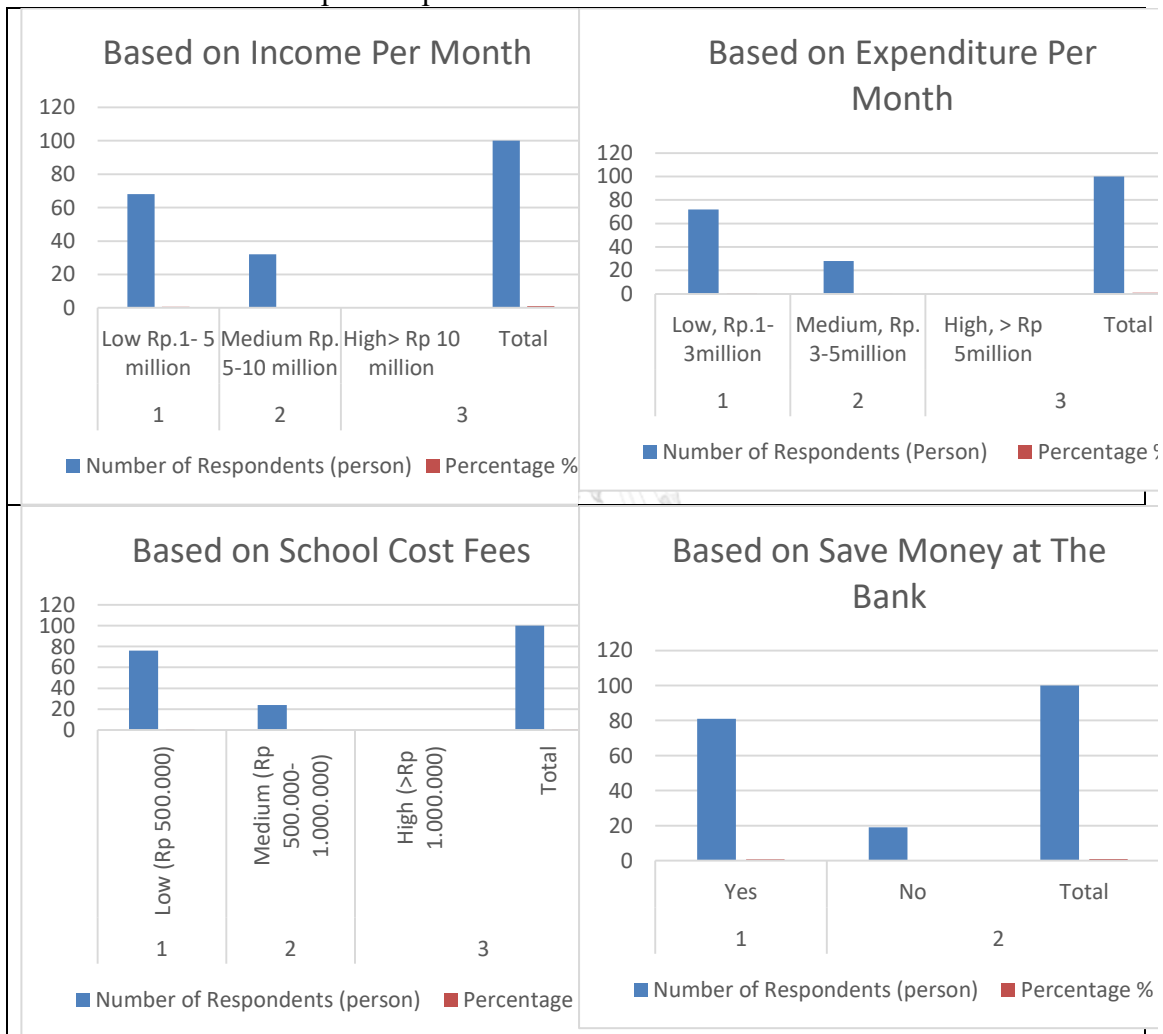
From several explanations, the table above shows that the average value of natural capital is quite diverse, but not too much of a difference. The element of land tenure is 89% of respondents have land with an area of <0.25 Ha and as many as 8% of respondents have land with an area of 0.25 Ha. In both research locations, land area <0.25 Ha is almost owned by all respondents. Land tenure is a form of community welfare which is realized through immovable assets. Land is the main factor for coastal communities as a place to live, especially for respondents who have family.

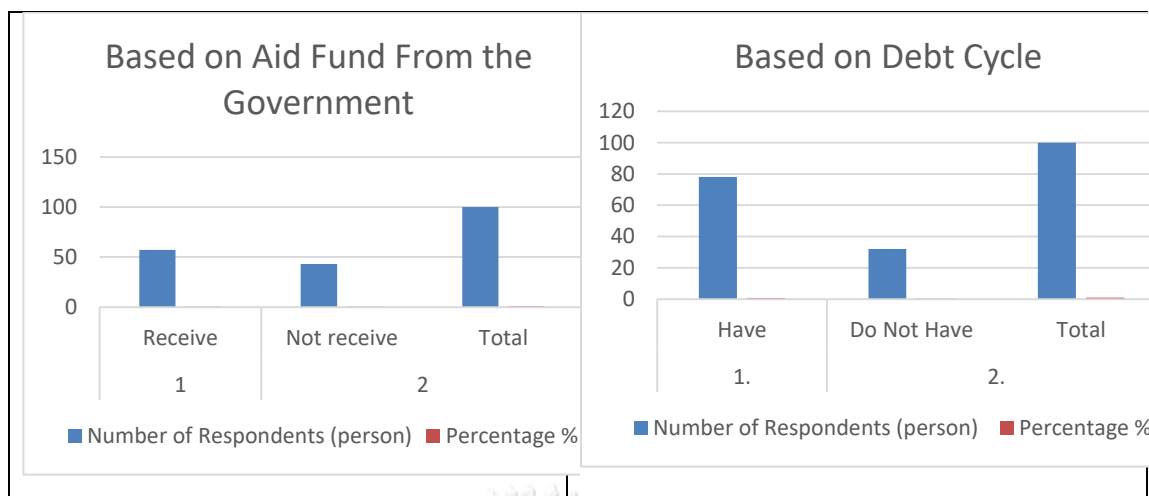
The availability of water in the two research sites was in "Bad" conditions and as many as 63 respondents or 63%. Respondents said that access to clean water for daily needs was dirty and smelly because they used groundwater a lot, as many as 30% said that water access in housing was in normal condition with non-permanent wells. The element of fishery productivity in the two research sites was in "Bad" condition and as many as 78 respondents or 78% stated this.

C. Financial Capital

The value of financial capital in the two research locations can be determined as follows Income Level, Expenditure, School Cost Fees, Save Money at The Bank, and Aid Funds from the Government.

Table 13. Financial Capital Aspects





Source: Data processed

1. Responden Based on Income Level

Based on the table 13, it can be concluded that in general, respondents have a monthly income of between Rp. 1.000.000 to 5.000.000 with the "low" category, namely 76 respondents or 68%, followed by those with income below Rp. 5.000.000 in the "medium" category, as many as 32 persons, while the income per month above Rp 10.000.000 does not exist. Where the economic condition of the fishing community will have an influence on the level of welfare of the community itself. Welfare is a very important object variable. Income is a very important factor to consider when determining the welfare level of a Coastal Household.

The majority of coastal households rely on the fishery sector; they work as fishermen. Fishermen are a group of people whose lives depend directly on marine products, either by catching or cultivating them. They generally live on the beach, a residential neighborhood with the location of their activities. Fishermen in Semarang City consist of capture fishermen, cultivation fishermen, processing fishermen, and merchant fishermen. Generally,

fishermen's lives in Semarang City live in limitations. Economic limitations can be seen in the level of fishermen's income which is still low, which is supported by the results of research where the welfare level of the fishing community in Semarang City is still low, which is around Rp. 5.000.000/month. If there are obstacles experienced by fishermen to catch fish such as unfavorable weather conditions and the waves are so big, then the fishermen will not get any income at all. The income of the fishing community is low; it will create low purchasing power which results in the fishing community remaining in an environment of poverty.

2. Responden Based on Expenditure

Based on the table 13, it can be concluded that in general, respondents have a monthly expenditure of between Rp. 1.000.000 to 3.000.000 with the "low" category, namely 72 respondents or 72%, followed by those with expenditure between 3.000.000 to 5.000.000 in the "medium" category." as many as 28 persons, while the expenditure per month above Rp5.000.000 does not exist. Where the economic condition of the Coastal Household will have an influence on the level of welfare of the community itself.

From the data, we can apprehend about the fishermen Expenditure based per month. This case obviously depends on the fishermen income per month. Apparently, fishermen consider to skimp and manage the money. High case of covid-19 in Semarang appropriately affected with the expenditure, fishermen have must to mulled buy daily needs like staple food than be extravagant with the money.

3. Responden Based on School Cost Fees

Based on the table 13, it can be concluded that in general, respondents have a children monthly school fees of Rp.500.000 with

the "low" category, namely 76 respondents or 76%, followed by those with children monthly school fees between Rp. 5.00.000 to 1.000.000 in the "medium" category, as many as 24 persons, while the children monthly school fees per month above Rp 1.000.000 does not exist.

Where the economic condition of the fishing community will have an influence on the education condition in Indonesian compulsory whole of the citizen to comply study from Elementary School until Senior High School. So, it is the strategy from Government to impassion of literacy and eradicate dullness. The subsidy from Government encompassed school equipment and school fees, but for subsidy like daily needs Government do not facilitate. Therefore, the parents spend money for children's snack needs, especially if the school until afternoon then we have to provide money for lunch.

4. Responden Based on Save Money at the Bank

Based on the table 13, it can be concluded that in general, respondents have a Save Money at the Bank with the "Yes" category, namely 81 respondents or 81%, followed by those with "No" category, as many as 19 persons. Where the Save money at the Bank that emerge condition of the fishing community will have an influence on the level of welfare of the community itself.

From the table, we can notice the fishermen recognize to save money at the bank, it is the modal toward advance comprehensive amidst majority fishermen in Semarang City renowned as traditional fishing. Save money at the bank emerge of secure and overseen by Ministry of Financial. In another hand, fishermen can propose a loan to bolster their jobs like treatment fishing gear and boats with enclosed Fishermen's Cards. Fishermen cards have availed to reserve and join co-operation with a bank to

reduce bank interest

5. Responden Based on Aid Funds from the Government

Based on the table 13, it can be concluded that in general, respondents have an Aid Funds from the Government with the "Receive" category, namely 57 respondents or 57%, followed by those with "Not receive" category, as many as 43 persons. Where the Aid Funds from the Government determine Government seriousness to take care with society, especially with Semarang Coastal society that majority fishing community and influence with fishing stock in Semarang City

From the data, we can conclude that 57% of the fishermen receive the Aids Fund from the Government and the rest is not receive the Aids fund. Regarding several opinions from fishermen reveal that Aids fund from the Government is not distributed with splendid schema. The Government is not denoted and saves the data with good treatment. There are several fishermen rich who receive the Aids Fund and the condition evokes bearish from poor fishermen. The Government should have up-to-date data collection and be able to choose which ones are precisely to receive the aid funds.

6. Responden Based on Debt Cycle

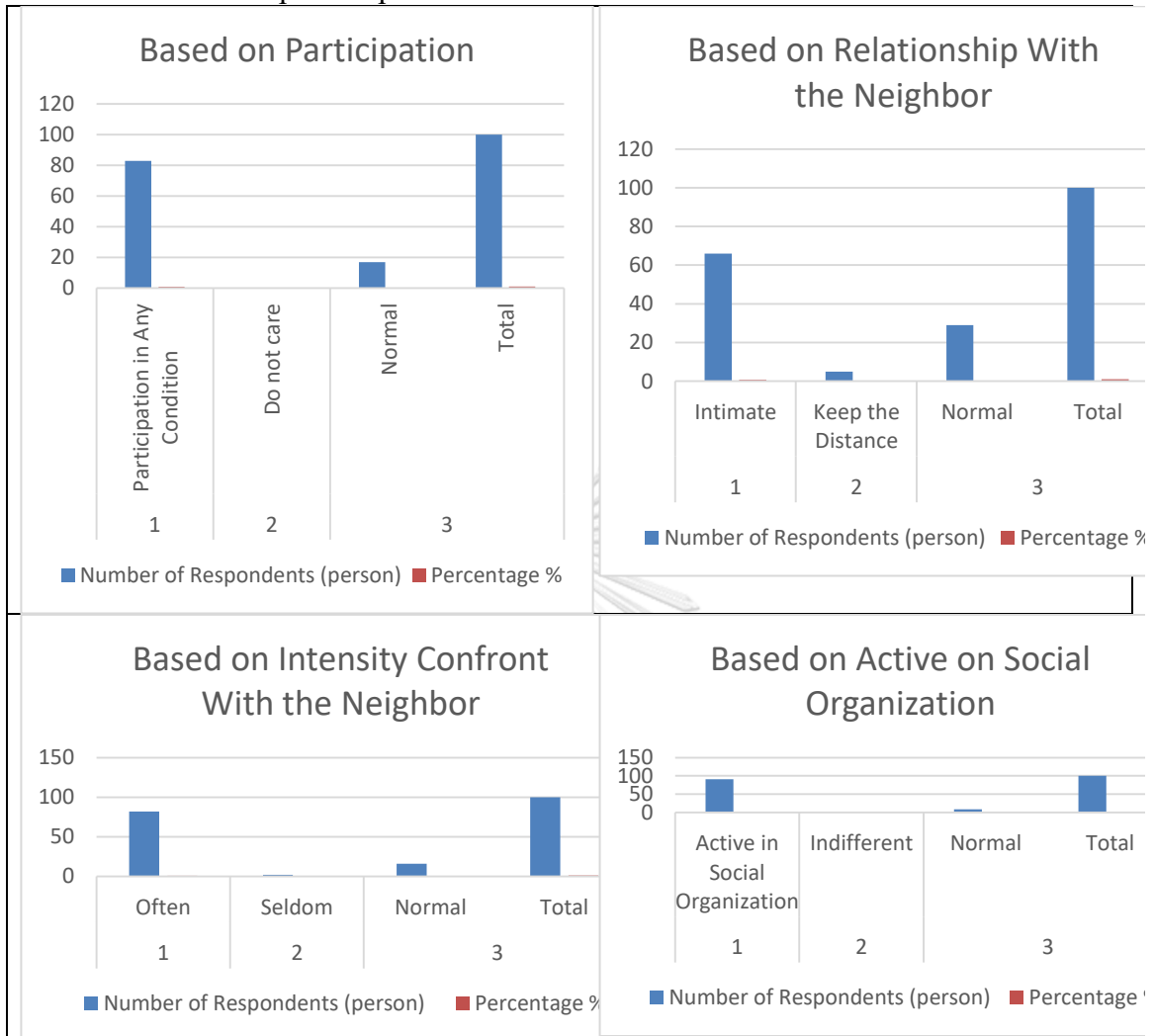
Based on table 13, it can be concluded that in general, respondents have a Debt Cycle in the "Have" category, namely 78 respondents or 78%, followed by those with "Do not have" category, as many as 32 persons. Where the Debt Cycle in Fishermen Community is affected with lifestyle and conducted by the unprecedented condition who possibility to be a burden in the coastal household, and even though it is the opportunity from the bank to engage with the fishermen.

From the data, we can conclude that majority of the fishermen take a loan or have a debt with the bank or they are borrowing the money from rich fishermen. Fishermen poor feel comfort to borrow the money from the rich fishermen because they can pay piecemeal by the outcome in every single day catch the fish with the deal price. Usually, fishermen poor take a loan to pay the school fees, repair the fishing gear, and maternity cost. Otherwise, rich fishermen take a loan to the bank to evolve the enterprise for example buy new fishing boats, buy advanced technology (GPS, radio, and fishing light), cold box, and repair the fishing boat if the condition is not steady to voyage.

D. Social Capital

The value of Social Capital in the two research locations can be determined as follows Participation, Relationship with the Neighbor, intensity Confront with the Neighbor, and Active on Social Organization.

Table 14. Social Capital Aspects



Source: Data processed

1. Responden Based on Participation

From the table 14, it is noted that in general, respondents have an answer with a “Participation in Any Condition” category as many as 83 respondents or 83% of the total number of respondents and the rest with a “Normal” category 17 respondents or 17%, while the Participation “Do not care” does not exist.

Social life in the Coastal Life imposed the individual to more participate than do not be aware of the society around. The community is always established with participation and life

togetherness. So, the condition exemplifies majority of the respondent prefer to participate in any condition rather than be seclude from the community

2. Responden Based on Relationship with the Neighbor

From the table 14, it is noted that in general, respondents have a Relationship with the Neighbor with an“Intimate” category as many as 66 respondents or 66% of the total number of respondents and the rest with a “Normal” category 29 respondents or 29%, while the category “Keep the distance” show 5 persons or 5 %.

Relationship with a neighbor in the Coastal Society so tautly like a family. Usually, the community has a purpose to elevate public affairs than individual affairs. They are working together in the sea as a fisherman and the majority as a poor fisherman who has the adage “one fate one blood”. So, in the majority of the indicators, the respondent prefers to intimate with the community.

3. Responden Based on Intensity Confront with the Neighbor

From the table 14, it is noted that in general, respondents have Intensity Confront with the Neighbor with an“Often” category as many as 82respondents or 82% of the total number of respondents and the rest with a “Normal” category 16 respondents or 16%, while the category “seldom” show 2 persons or 2 %.

Intensity to confront the neighbor creates a family and fellowship. Semarang coastal community is renowned for solidity and unity; they always help with the community because the intensity is so high. The majority of the respondent prefers to often with the community, and encounter to discourse about anything topics.

4. Responden Based on Active on Social Organization

From the table 14, it is noted that in general, respondents have the Answer with the “Active in Social Organization” category as many as 91 respondents or 91% of the total number of respondents and the rest with a “Normal” category 9 respondents or 9%, while the category “indifferent” does not exist.

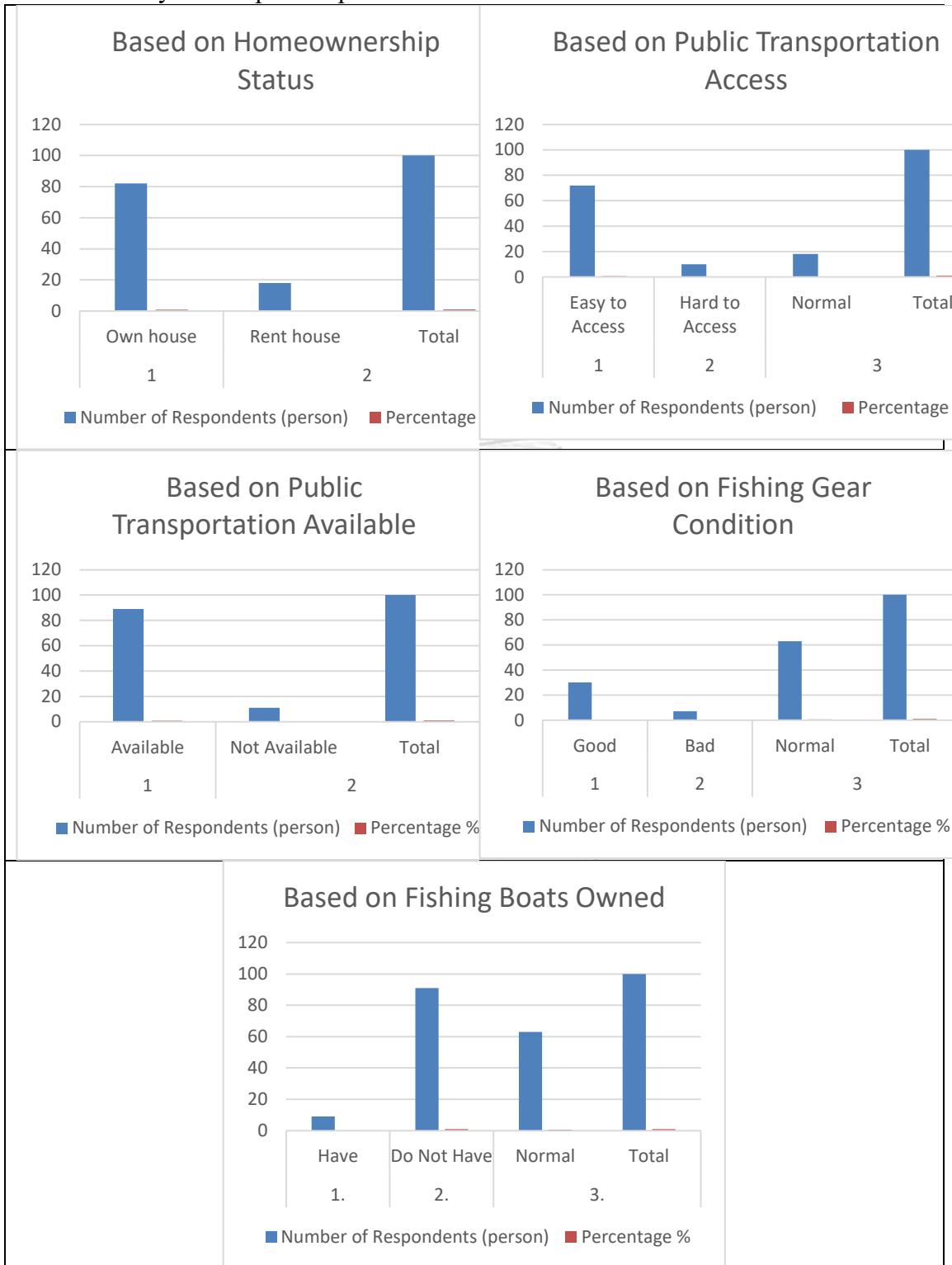
Social organization in the coastal society creates some groups, and the majority is fulfilled by the fishermen group. Fishermen groups usually have an agenda every month, the agenda entangle several parts like Government and NGO. Usually, fishermen groups need support and promotion to intensify the agenda. Culture agenda like “*sedekah laut*” focus to acquaint sea culture ethnic from Indonesian ancestors. “*Sedekah laut*” is the symbol of worship to the god regarding the fishing outcome and preserve from the calamity. So, the majority of the respondent apprehend to be active in the social organization because of approach with many aspects, especially with an inter-fishermen group.



E. Physical Capital

The value of Physical Capital in the two research locations can be determined as follows Homeownership Status, Public Transportation Access, Public Transportation Available, Fishing Gear Condition, and Fishing Boats Owned.

Table 15. Physical Capital Aspects



Source: Data processed

1. Responden Based on Homeownership Status

From the table 15, it is noted that in general, respondents have the Homeownership status with the “Own House” category as many as 82 respondents or 82% of the total number of respondents and the rest with a “Rent house” category 18 respondents or 18%.

The data show a majority of Semarang Coastal Society has “Own house” status, another respondent remarkable that they do not indigenous or inherit from the parent's life in the area. Life in the City of Semarang possibly enhances their life rather than occupying the rural area.

2. Responden Based on Public Transportation Access

From the table 15, it is noted that in general, respondents have the Public transportation access with the “Easy to Access” category as many as 72 respondents or 72% of the total number of respondents and the rest with a “Normal” category 18 respondents or 18%, while the category “Hard to Access” show 10 respondents or 10%.

Currently, the Semarang Coastal area is easy to access and several public transportations such as mini-bus and online transportation (car, motorcycle) are reachable to ushered indigenous society and foreigners. The problems in the Semarang Coastal Area like “Sea Level Rise” arise cleavage in the asphalt surface, even evoke high crashes in the night and deter high traffic in the morning within the afternoon.

3. Responden Based on Public Transportation Available

From the table 15, it is noted that in general, respondents have the Public transportation available with the “available” category as many as 89 respondents or 89% of the total number of respondents

and the rest with a “Not Available” category 11 respondents or 11%.

The City of Semarang is right now connected by mini-bus and have myriad shelter from the rural area within the central city. The rise of online transportation in The City of Semarang is a role from Government and Owner of Online Transportation to embody Semarang clean ecosystem and support the reduction of jobless, which can labor absorb. The Covid-19 condition in the City of Semarang shackle several enterprises to reduce the labor to deducted expenditure, and fortunately Online Transportation open recruitment for a new driver.

4. Responden Based on Fishing Gear Condition

From the table 15, it is noted that in general, respondents have the Fishing gear condition with the “Normal” category as many as 63respondents or63% of the total number of respondents and the rest with a “Good” category 30 respondents or 30%, while the category “Bad” show 7 respondents or 7%.

Fishing gear condition in the Semarang Coastal area represented by the data above that show majority in the Normal condition, even though Government is not yet seriously to approach with significant affected but the Fishermen obviously formidable to knowing the condition in the sea. Instinct and insight inherit from ancestor to everlasting feasibility face by the unforeseen condition in the sea. The ancestor obviously give advice to their ancestry which one relies on natural movement (namely movement of clouds, wind direction, constellations, and the movement of ocean waves) and used traditional fishing gear to preserve nature. Currently, traditional fishermen tempt advanced devices that as Geographical Positioning System (GPS) to support their performance.

5. Responden Based on Fishing Boats Owned

From table 15, it is noted that in general, respondents have the Fishing Boats owned with the “do not have” category as many as 91 respondents or 91% of the total number of respondents and the rest with a “have” category 9 respondents or 9%

Fishing boats owned in the Semarang Coastal area are represented by the data above that show majority in the do not have the category, the fishermen poor usually rent to the fishermen rich which has enormous fishing boats to accomplishing the demand from fishermen poor. Fishermen poor can pay rent for a trip a day with two systems, at first they can pay with profit sharing, and at the second they can pay with price deal. Usually, fishermen rich decoy fishermen poor to join for a long trip, for example, one within three weeks to catch the fish, the fleet comprise by 10-25 people in every Fishing Boat, in every long trip voyage as a there are 2-3 fleet for coordination and oversee if any unprecedented accidental.

The conclusion of socio-economic and livelihood of fishermen in Semarang Coastal Society seen are below :

1. The socio-economic conditions of Semarang coastal society related with the surrounding area near by sea, their life is very dependent with fisheries outcome, and they are robust for maintenance cultural legacy from the ancestor. The condition of poverty in Semarang city increase every year, so it is related with the covid-19 condition bashing all layer working place, beyond Semarang city renowned as industrial city. The condition of education level mostly looking good by data, enormous society achieve university graduation, and show the competence of worker in Semarang City have must balancing with another skill for propped the capability in

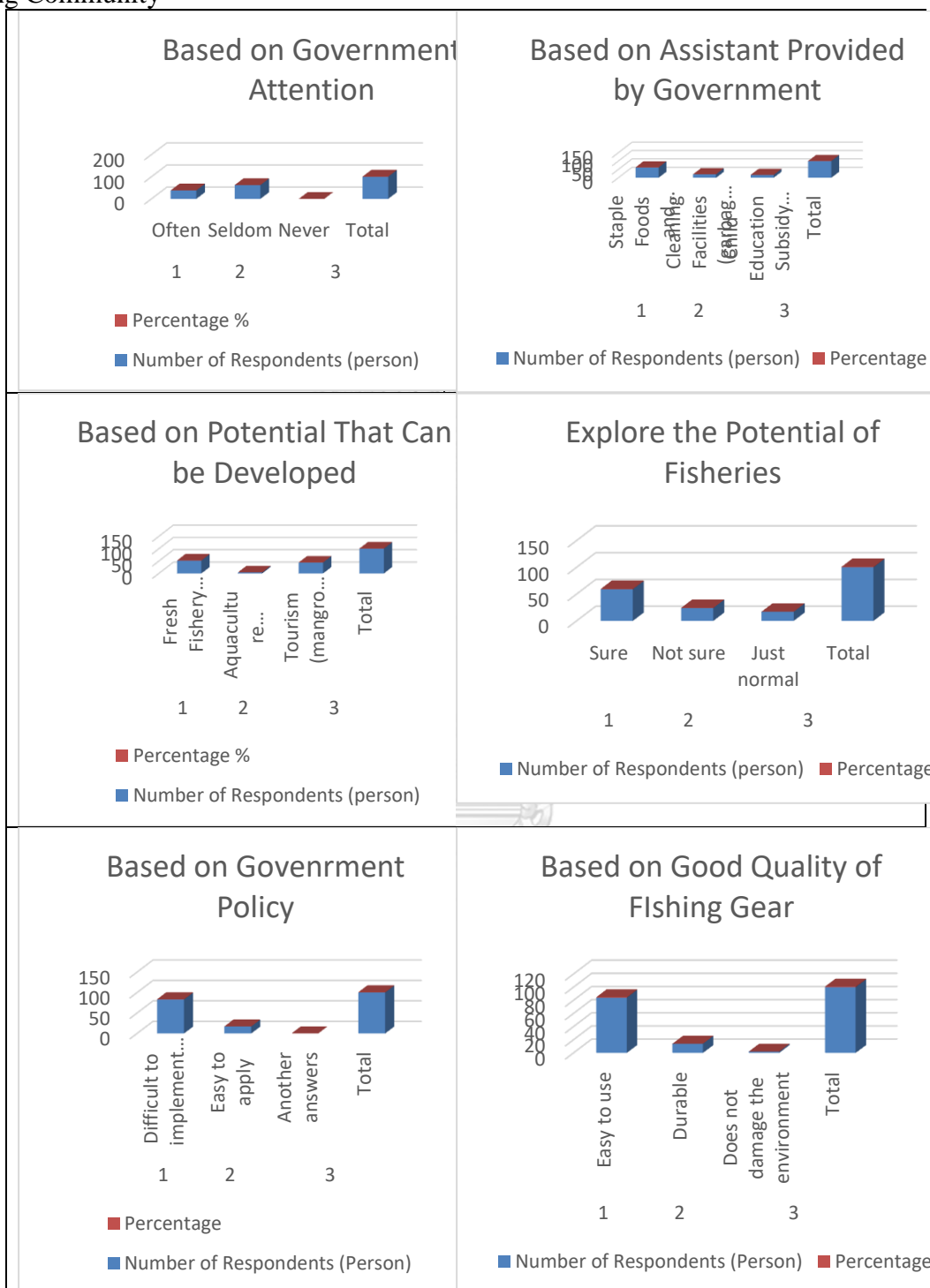
working place.

2. The livelihood of fishermen in the Semarang Coastal Society have different results that show need more attention and need to improve. The aspect of Physical, Natural, and Social capital need to improve because in several points look so good, and as a focus to improve social welfare we need to reinforce towards in the best treatment. The aspect of Human and Financial capital need more attention because regarding by the data show the tendency of Government is not serious to maintain, human resources management and financial freedom is the pivotal component to achieve well-being and determine quality of life.

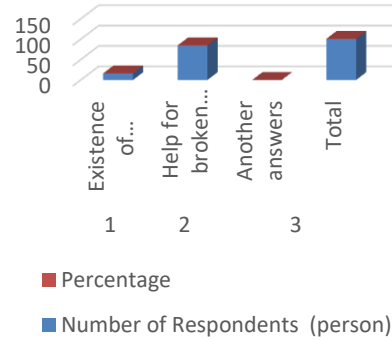
3.2.3. SIGNIFICANT ROLES TO IMPROVE LIVELIHOOD OUTCOME FOR FISHERMAN AND FISHING COMMUNITY

The value of Significant Roles to Improve Livelihood Outcome for Fishermen and Fishing Community in the two research locations can be determined as follows in the table below

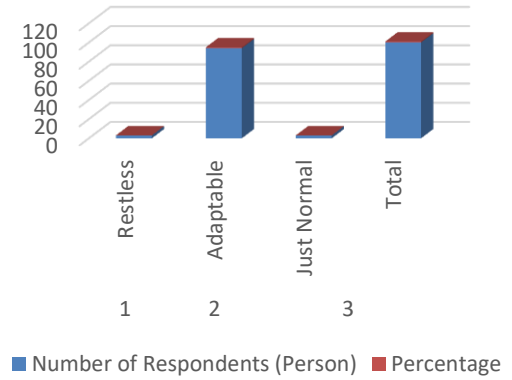
Table 16. Significant Roles to Improve Livelihood Outcome for Fishermen and Fishing Community



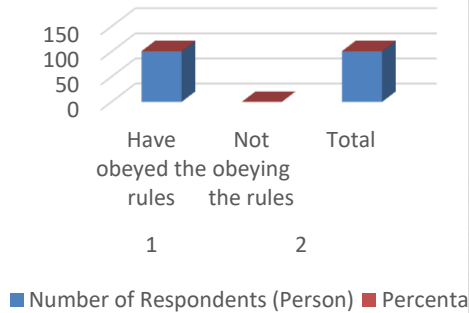
Based on Government's to the Use and Assistance of Fishing Gear



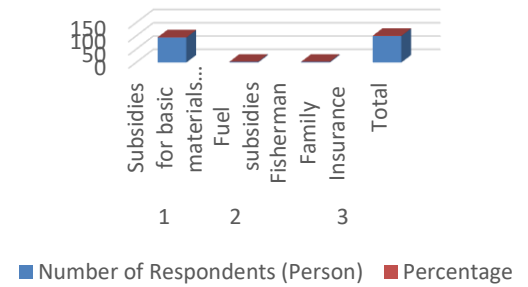
Based on Fishing Gear Policy Change



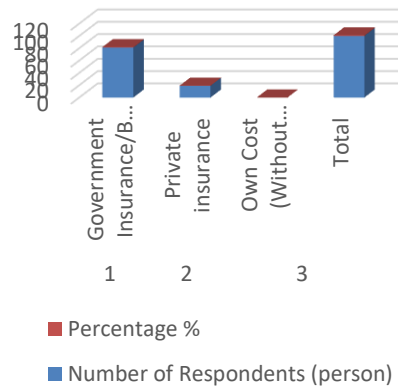
Based on Compliance with Government Policy



Based on Subsidies That Have Been Given by the Government

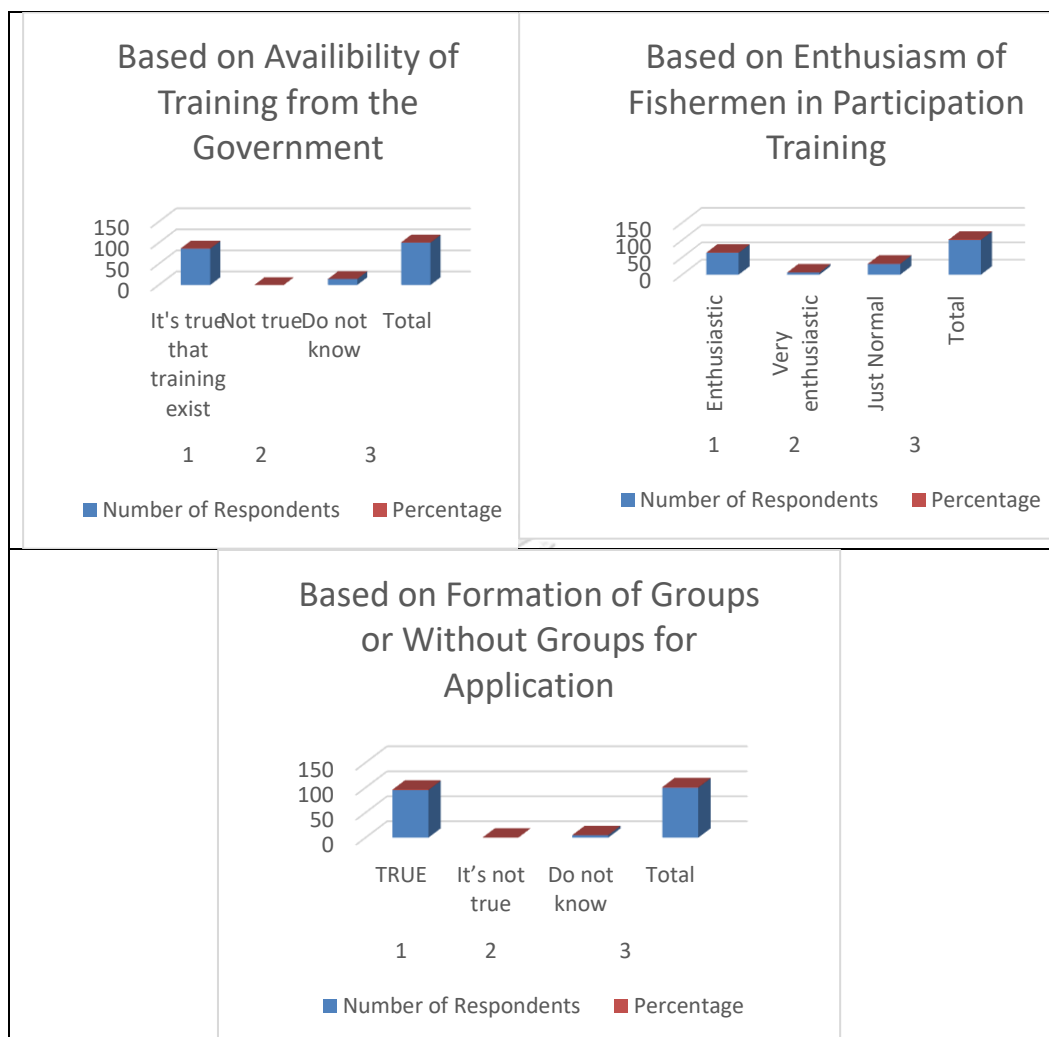


Based on Insurance Type



Based on Routines of Subsidized Assistance from the Government





Source: Data processed

1. The Role of Coastal Household Based on the Intensity Level of Government Attention

Based on the results of research on 100 respondents, data on the role and participation of fishermen based on the Intensity Level of Government Attention can be seen in the table 16

Based on the table, it can be concluded that in general, respondents have an indicated Level of Government Attention with the "Seldom" category, namely 62 respondents or 62%, followed by those "Often" category, as many as 38 people, while the option "Never" does not exist. Where the attention of the Government of paramount importance to fostering Coastal

Household in the future, in another hand will have an influence on the level of welfare of the community itself.

2. The Role of Coastal Household Based on Assistance provided by the Government

Based on the results of research on 100 respondents, data on the role and participation of fishermen based on Assistance provided by the Government can be seen in the table 16

Based on the table, it can be concluded that in general, respondents have treatment by government Assistance with the "Staple Foods and Clean Water" category, namely 76 respondents or 76%, followed by those within the "Cleaning Facilities (Garbage Bins, Toilets)" category, as many as 21 people, while the less option "Child Education Subsidy (School equipment)" as many as 17 people. Where the Government Assistance absolutely depict seriously treatment by the Government and it will have an influence on the level of welfare of the community itself.

3. The Role of Coastal Households to Develop Potential in the Surrounding Environment

Based on the results of research on 100 respondents, data on the role and participation of fishermen based on Develop Potential in the Surrounding Environment can be seen in the table 16

Based on the table, it can be concluded that in general, respondents have a desire to develop "Fresh Fishery Product (Sea Fish)" category, namely 52 respondents or 52%, followed by those with "Tourism (mangrove ecotourism, fishing)" category, as many as 44 persons, while the less option is Aquaculture Products as many as 4 persons. Where the Potential of Coastal households regarding by society show that Fresh Fishery

products and Tourism might develop, the potency will be successful to incarnate if Government and Society develop together, and it will have an influence on the level of welfare of the community itself.

4. The Role of Coastal Households to Explore the Potential of Fisheries in their Residential Environment

Based on the results of research on 100 respondents, data on the role and participation of fishermen based on Potential of Fisheries in their Residential Environment can be seen in the table .16

Based on the table, it can be concluded that in general, respondents have a notion with the "Sure" category, namely 59 respondents or 59%, followed by those with "Not Sure" category, as many as 24 persons, while the less option "Just Normal" as many as 17 persons. Where the potential of the Fisheries Sector is obviously espoused by the Nature Condition and High demanding Fisheries Product in the Traditional and Modern Market, and it will have an influence on the level of welfare of the community itself.

5. Role and Participation of Fishermen based on Current Government Policy

Based on the results of research on 100 respondents, data on the role and participation of fishermen based on Current Government Policies can be seen in the table 16

Based on the table , it can be concluded that in general, respondents have an option with the "Difficult to implement" category, namely 83 respondents, followed by those with the "Easy to apply" category. " as many as 17 people, while the Another Answer does not exist. Where the Government Policy,

for now, fluctuates every president elected, fishermen still depend on this job. Fishermen chose this job because inherit it from their ancestors and were supported by the surrounding area.

6. The Role and Participation regarding Good Fishing Gear Quality

Based on the results of research on 100 respondents, data on the role and participation of fishermen based on Good Fishing Gear Quality can be seen in the table 16

Based on the table , it can be concluded that in general, respondents have an option with the "Easy to Use" category, namely 84 respondents, followed by those within the "Durable" category, as many as 14 people, while the "Does not damage the Environment" category only 2 people. Fishermen in Semarang Coastal Area always mostly thinking easy to operate the fishing gear without considering anything case in the environment, overfishing and low water quality in the Java Sea (Laut Jawa) always be brunt and challenge amid by many of the factories (Industrial Enterprise) spill their pollution without thoughtfulness in the environmental impact, especially for the fisheries sector.

7. The Role and Participation of Fishermen based on the Government's Attention to the use and assistance of Fishing Gear

Based on the results of research on 100 respondents, data on the role and participation of fishermen based on the Government's Attention to the Use and Assistance of Fishing Gear can be seen in the table 16

Based on the table, it can be concluded that in general,

respondents have an option with the "Help for broken Fishing Gear" category, namely 84 respondents, followed by those in the "Existence of Training " category, as many as 16 people, while the "Another answer" does not exist. Fishermen in Semarang Coastal Area prefer to choose Help for broken fishing gear than Existence of training, this condition shows that the Fishermen perceive enjoy to fishing rather than add the knowledge like attending in the Workshop and Seminar. Meanwhile, upgrade knowledge for traditional fishermen in Semarang Coastal Area very interesting to operate Fishing Advance Technology and compete with the modern fishermen.

8. The Role and Participation of Fishermen based on the Fishing Gear Policy That Changes Every President Election

Based on the results of research on 100 respondents' data on the role and participation of fishermen based on fishing gear policies that change every presidential change can be seen in the table 16

Based on the table above, it can be concluded that in general, respondents have an option with the "Just Normal" category, namely 94 respondents, followed by the "Adaptable" and "Restless" category, with equal results as many as 3 people. Fishing Equipment Policy change in every presidential election make fishermen confuse for operating the Fishing Gear, this case emerges different apprehend to the fishermen and Government dilemma to promote this policy. Fishermen do not catch the fish unless the policy is so strict, even though fishermen entail support from the Government to enhance their fish catch.

9. The Role and Participation of Fishermen based on Compliance with Government Policies

Based on the results of research on 100 respondents' data regarding the role and participation of fishermen based on compliance with government policies can be seen in the table 16

Based on the table above, it can be concluded that in general, respondents have an option with the "Have obeyed the rules" category, while the "Not obeying the rules" category does not exist. Fishermen in the Semarang Coastal Area always appreciate the Policy, although the policy does not lucrative for the Fishermen. However, sober-minded is the first tendency to create dispute which is a wreak of bad nuance between Government and Fishermen. So, fishermen are accustomed and peacefully with the condition to steadfast the best way for the fisheries sustainability.

10. The Role and Participation of Fishermen based on Subsidies that have been given by the Government

Based on the results of research on 100 respondents' data on the role and participation of fishermen based on subsidies provided by the government can be seen in the table 16

Based on the table, it can be concluded that in general, respondents have an option with the "Subsidies for basic materials and children education" category, namely 94respondents, followed by "Fuel subsidies" and "Fisherman Family Insurance" category with the equal results 3 people. The data above show the category "Subsidies for basic materials and children's education" very prominent than another option. Daily needs such as rice, water (drink water and clean water), oil cooking, etcetera are very important for supporting fishermen's

family life. Recently, education in Semarang City is free from the level primary school within the senior high school. Hopefully, Government pays more attention to Fishermen families beyond school equipment, and it will influence the level of welfare of the community itself.

11. The Role and Participation of Fishermen Based on Insurance Sources for Treatment

Based on the results of research on 100 respondents, data on the role and participation of fishermen based on Insurance Sources for treatment can be seen in the table 16

Based on the table, it can be concluded that in general, respondents have an Insurance Type mostly with the Government Insurance (BPJS), namely 81 respondents or 81%, followed by those with have Private Insurance as many as 19 people, while the Own Cost (without insurance) does not exist. Where the insurance sources can know that the Coastal Household condition will influence the attention from Government. So, many of the communities exert Government Insurance (BPJS) when they felt ailed.

12. The Role and Participation of Fishermen based on Routines of Subsidy Assistance from the Government

Based on the results of research on 100 respondents for Coastal Households, we obtained data on the role and participation of fishermen based on routine subsidies from the government can be seen in the table 16

Based on the table above, it can be concluded that in general, respondents have an equal option for answering the question. Subsidy from Government received by fishermen every 3 months, and Fishermen usually attend in the Sub-district Office. Previously, the Government pointed the envoy from

every head fishermen group to promote their members if there is a subsidy from Government. Fishermen can receive the subsidy with showed the evidence through Fishermen Card (Kartu Nelayan). The Subsidy give access between Government and Fishermen unified diversity and collaboration to develop fisheries sustainability

13. The Role and Participation of Fishermen based on the Existence of Training (Seminar, Workshop) from the Government

Based on the results of research on 100 respondents for Coastal Households, we obtained data on the role and participation of fishermen based on the existence of training (seminars, workshops) from the government can be seen in the table 16

Based on the table above, it can be concluded that in general, respondents have an option with the "It's true that training exists" category, namely 86 respondents, followed by those with the "Do not know" category, as many as 14 people, while the "Not true" does not exist. From the data above I can conclude that Availability training it truly exists and there is a problem such as fishermen's consciousness to attend the training and fishermen do not know Government enforces the training. Where the Availability of Training in the fishing community will have influence the attention of the community itself.

14. The Role and Participation of Fishermen with Enthusiasm in Participating in Training from the Government

Based on the results of research on 100 respondents for Coastal Households, we obtained data on the role and participation of fishermen based on their enthusiasm for participating in training from the government can be seen in the table 16

Based on the table, it can be concluded that in general, respondents have an option with the "Just Normal" category, namely 31 respondents, followed by those with the "Enthusiastic" category, as many as 63 people, while the "Very Enthusiastic" is only 6 persons. The data above conclude that the training is low variation and merely theory, even though fishermen need more practice in the field. Therefore, Government ought to apprehend the condition and be able to immerse and approach whether fishermen perceived comfortable or uncomfortable since the ongoing training.

15. The Role and Participation of Fishermen Regarding the Formation of a Group or Group for Application of Activity Funds

Based on the results of research on 100 respondents for Coastal Households, we obtained data regarding the role and participation of fishermen based on the formation of groups or groups for the application of activity funds can be seen in the table 16

Based on the table, it can be concluded that in general, respondents have an option with the "True" category, namely 95 respondents, followed by those with the "Do not know" category, as many as 5 people, while the "It's not true" category does not exist. From the data above I can conclude that Government

allows the Fishermen Group to create a proposal report before receiving the help funds. The proposal needs more correction if the activity from fishermen does not suitable with the funds proposed. Therefore, Semarang City Fisheries Services perused and need more time to revise before submit the report to Financial Audit Board (BPK).



Chapter Four

IV. REGULATIONS AND STRATEGIES OF GOVERNMENT TO SUPPORT ECONOMIC CONDITION OF FISHERMEN

4.1. INTRODUCTION

This chapter looks that the regulations and supports of government that helps improve local livelihoods and social welfare of fishermen and fishing community in Semarang City. In order to answer this question, the chapter used qualitative data sources from the institutional related for acquire primary data. The Primary Data interview with Government Officer, namely Head of Fish Farming Management, Head of Small Business Empowerment and Head of Capture Fisheries.

4.2. WELFARE CONDITION OF FISHERMAN IN SEMARANG CITY

The daily activities of Semarang Coastal fishermen are dependent on marine products. Fishers are divided into 3 namely skipper fishermen (rich fishermen), small fishermen (poor labor/fishermen), and individual fishermen (middle fishermen), while some of the fishermen in Semarang Coastal occupy positions as small fishermen (labor fishermen/poor fishermen) consisting of 10-25 people per group in one boat, even more than 25 people depending on the size of the boat capacity. The average population of the Semarang Coastal area based on the results of research through observation and interviews, the majority work as small fishermen (labor fishermen/poor fishermen) whose income depends on the catch and the distribution of results between other fishing groups and skipper fishermen (rich fishermen) as boat owners.

Therefore, to improve the welfare of fishermen by the notion

of welfare from a social perspective, it is carried out through the provision of assistance, which in this case is carried out by the Semarang City Fisheries Service by providing moral or material assistance, starting from the construction of fishermen's facilities and infrastructure, holding training to increase knowledge and assisting fishermen in marketing their catch.

Based on observations and interviews that are guided by the theory (Kusnadi, 2003) the causes of a decrease in fishermen's income which have an impact on the level of welfare so that fishermen experience poverty, there are several causes of fishermen poverty in the Semarang Coast:

a) A lifestyle that is seen as extravagant so that it is less oriented towards the future, this is an internal cause of poverty, if the limited capital is not a problem for fishermen, the following are interviews with fishermen:

"Nowadays, everything has to be there, especially our children, even small ones are already smart to play cellphones, so we as parents obey them, even sometimes our children's daily snacks are quite different from my past, if for limited capital to go to sea It's not a problem for me, because I'm joining the skipper fisherman (wealthy fisherman), so if there's any shortage, the skipper fisherman will handle everything." Yuda (Poor Fisherman/36 years old)

b) Natural conditions that make it impossible for fishermen to go to sea, this is an external cause of poverty, good natural conditions make fishermen able to go to sea to increase the income of fishermen, whereas if bad weather makes fishermen not possible to go to sea, it means that

fishermen's income is reduced, following the results of interviews with fishermen:

"If the weather is bad, we automatically (individual fishermen/medium fishermen) will not go to sea, because if we go to sea it is a big risk, indeed our income is based on fish catches, if we don't go to sea, it means there is no income. Dani (middle fisherman/41 years old)

In this case, if the weather at sea is not favorable, the fishermen's income will decrease and the fishermen's debt will also increase, due to having to meet the daily needs of the fishermen's households interview with Rich Fisherman:

"Fishermen often take loans, especially when the weather is bad at sea, most often fishermen take loans and for payment, I usually deduct a little salary (for poor fishermen) until it is paid off from the catch when they can go to sea and for individual fishermen, they usually sell their catch at a price which I have deducted according to their debt" Danang (Rich Fisherman/48 years old)

From the results of the interview, it is explained that the payment system is from cutting the catch obtained when the weather at sea has improved gradually.

If fishermen are prosperous, the poverty level will decrease, in this case measuring the level of welfare is not only measured in terms of economy, community welfare is a subjective matter. This means that everyone has a different view of life, life goals, and ways of life. So to measure the welfare level of Semarang Coastal Fishermen

by using the empowerment process approach by theory of (Sadan, 2004). The following is an interview that answers the welfare indicators:

“My family and I only depend on income from fishing, there is no other job besides fishing. If my children were still in education, they would not have worked before, while my wife was only a housewife” Wahono (Poor Fisherman/52 years old)

The following interview was also confirmed by other fishermen:

“Our family does not have a job other than fishing, my wife helps me the most in processing salted fish” Siswadi (Poor Fisherman/51 years old)

Small fisherman families (poor fishermen) on the Semarang coast do not have a job other than fishing, as well as fishermen's wives who only depend on their husbands' income and help their husbands in processing fish to be marketed to increase their income. If small coastal fishermen in Semarang have a source of income from work other than fishing, it means that the fishermen's family is included in the category at the support level, but the reality based on observations and interviews of small fishermen in the Coastal Semarang is included in the family category at the powerless level. Other facts can be seen from the results of the following interviews.

“My family and I live in a government-assisted house with 4 children and Alhamdulillah (compliment in moslem religion), I am in school except for my youngest child because he is still 5

years old" Suprihanto (middle fisherman/50 years old)

From the results of the interview, it was explained that the fishermen got a help house which was occupied by 6 people, namely the fisherman, the fisherman's wife, and 4 children. When viewed in terms of the building, the government-aided house is a suitable house to live in with a permanent roof, floor, and walls, and fishermen's children from the age of 7-15 years are in school. Other interview facts can be seen from the health indicators, namely:

"Be grateful, if one of the sick family is taken to the hospital because now the cost of the hospital is no longer a problem, because it is free, and for the time being there is no one from the family who is seriously ill, usually the illness is colds and dizziness" Suryohadi (Middle Fisherman) /48 years old)

Another interview was also stated by the Rich fisherman (wealthy fisherman):

"Usually the pain is like a cold, this is due to the weather, usually I buy medicine directly at the pharmacy. In the past, my child had allergies, then I took them to the hospital or puskesmas (district health services)" Wiwin (Rich Fisherman/42 years old)

Health complaints suffered by small fishermen on the coast of Semarang are dizziness and colds, they are fishermen who choose to self-medicate at home by buying drugs at pharmacies or stalls if they feel the pain is not too severe, but some fishermen choose to go to a hospital or

health center closest if you feel sick because it is more practical and economical.

So from the facts mentioned above both in terms of income, employment, housing, education, and health, it is clear that fishermen in the Semarang Coast based on the Empowerment Process approach referred to in (Sadan, 2004) are included in the category of family powerlessness level.

4.2. POLITICAL CONDITION IN SEMARANG UTARA AND TUGU

A. Forms of Political Participation of the Fisherman Communities in Semarang Utara and Tugu in Support of the Joko Widodo and Ma'aruf Amin 2019 Presiden Election Wins

In the democratic process, the community has room to be involved in various political processes or policy making. The process of community involvement in various political processes is called political participation. Samuel P. Huntington and Joan M. Nelson Political participation are defined political participation as the activities of citizens who act as individuals, which are intended to influence government decision-making. Participation is usually individual or collective, organized or spontaneous, steady or sporadic, peaceful or violent, legal or illegal, effective or ineffective.

According to Almond, there are two kinds of political participation, namely conventional political participation, and unconventional political participation. Conventional political participation, is a normal form of

political participation in a modern democracy, while conventional forms of political participation include; voting, political discussions, campaign activities, forming and joining interest groups, and individual communication with political and administrative officials.

Non-conventional political participation is a form of political participation that is not uncommon under normal conditions, it can even take the form of illegal, violent, and revolutionary activities. As for the non-conventional forms of participation, namely the submission of petitions, democracy, confrontation, strikes, acts of political violence against objects (destruction, bombing, burning), acts of political violence against humans (kidnapping, murder), guerrilla warfare, and revolution. (Damsar, 2013)

The fishing community in Semarang City in the 2019 Presidential Election also participated in political activities. The form of political participation of the fishing community is by being involved in general election activities. The political participation of fishing communities in general election activities in the form of voting and participating in supporting/campaigning for one of the presidential candidates who competed in the 2019 Presidential Election.

One of the presidential candidates who received great support from the fishing community was the pair Joko Widodo and Ma'ruf Amin, who in the end managed to become winners in the 2019 Presidential Election contestation. The fishing community became one of the political power bases for Joko Widodo and Ma'ruf.

Amen. The forms of political participation of the fishing community in general in supporting the victory of the Joko Widodo and Ma'ruf Amin pair are as follows:

1. Elite Fishermen as a Team of Success and Campaign Agents/Political socialization for the Joko Widodo and Ma'ruf Amin

The implementation of the presidential election involves the coastal community in this case the fishing community as a mass/voter base. Fishermen who are gathered in fishing communities have a big role in supporting the victory of the presidential couple. The ministry of Joko Widodo and Ma'ruf Amin in the Semarang Coastal Area cannot be separated from the contribution of the fishing community. The village fishing community has become an agent of political socialization for the Joko Widodo and Ma'ruf Amin pair in the 2019 presidential election. The fishing elite in particular plays a very significant role in mobilizing and socializing the fishing period so that a mass of fishermen are involved in supporting the Joko Widodo and Ma'ruf pair Amen. As we all know that elites are always less in number, carry out all political functions, monopolize power, and enjoy some of the benefits that power brings. Some elite fishermen influence being listened to by the fishing community, including, Akbar (Fisherman and Head of Tambak Lorok Village), Disna, Haidar, and Ujo. The fishing elite is also a successful team of Joko Widodo and Ma'ruf Amin.

The fishing elite mentioned above has a good role and integrity in the eyes of the fishing community. The interaction between the elite and the fishing community

that is well established has a positive impact on both of them. As Syahrul said:

"Indeed there are influential people who mobilize fishermen to become the mass base of Joko Widodo and Ma'ruf Amin candidates, and those influential people then together with village officials to support the pair, so you could say they embrace each other for the benefit of fishermen"

This influential person is an elite fisherman who has a strong emotional relationship and connection with the fishing community. The elite interaction with the fishing community is due to the functioning of political socialization agents, namely the place of work in this case the fishing community always provides political discussion spaces that lead to the formation of political orientations, for example, the construction of fishing communities in the fishing community about presidential candidates is formed so that it is conical to the figure of Joko Widodo and Ma'ruf Amin.

The elite and fishermen in the Semarang Coastal area are purely supportive of the presidential pair, Joko Widodo, and Ma'ruf Amin, who are the elected presidents of Indonesia. The support given is in the form of being an agent of political socialization. As agents of political socialization, the elite and the fishing community also introduced Joko Widodo and Ma'ruf Amin to their closest people, relatives, and families.

2. The Fisherman Community as a Political Power Base for Joko Widodo and Ma'ruf Amin

The fishing community is one part of Indonesian society that lives by managing the potential of fishery resources as a community living in coastal areas, fishing communities have social characteristics that are different from people living in mainland areas. In some coastal areas which are relatively rapidly developing, the community structure is heterogeneous, has a high work ethic, strong social solidarity, is open to change, and has characteristics of deep social interaction. (Fargomeli, 2014).

Fishermen are the political power base in the Semarang Coastal area because the majority of the villagers are fishermen. Most fishermen already have the right to vote, besides that, socialization among fishermen is also solid due to the existence of a collective awareness to improve their quality of life. In addition to interacting with elites and success teams that shape their political orientation by establishing communication with elites and successful teams of fishermen groups fighting for their interests, especially programs related to the fishing sector.

One strategy to generate active participation of individual community members is through a group approach. Development aimed at community development will be easily understood if it involves local agents through a forum called a group because in carrying out various livelihood activities, everyone tends to group. (Tampubolon, 2014)

The existence of the fishing community is taken into account by the candidates who compete in the presidential election because the existence of fishermen has proven to have a significant influence as a group that is fairly large in obtaining votes. It is proven by the following quote from the informant:

"Fishermen in the Semarang Coastal area greatly influence the vote base for Joko Widodo and Ma'ruf Amin because in this area the votes are superior to other pairs."

Observing the excerpt of the interview, we can see that the influence of fishermen in the presidential election contest in the Semarang Coastal area is very large. Even the Village Head also acknowledged that the influence of the fishing communities in the Semarang Coastal area is very large.

"Indeed, in the Semarang Coastal area, the involvement of fishermen in the presidential election has a significant influence, and indeed those who support Joko Widodo and Ma'ruf Amin are greater so that the vote in this area is really high. Party supporters who are very fanatical support very aggressively approach the community"

The culture of the fishing community is a system of ideas or cognitive systems of the fishing community that are used as a reference for socio-cultural behavior by individuals in social interactions. This culture is formed through a long socio-historical process and the crystallization of intensive and intense interactions

between people and their environment. In carrying out the process of deep social interaction, fishing communities have different characteristics from other communities. 65 The Fisherman Community had a big role in the victory of Joko Widodo and Ma'ruf Amin, especially in Semarang Utara and Tugu, in the 2019 presidential election as a very influential base in the political contestation process.

B. Motives for Political Participation of the Fisherman Community in Supporting Joko Widodo and Ma'ruf Amin in the 2019 Presidential Election

Traditional fishermen with small business scale are more subsistence in maintaining their family life. Various limitations of access to social networks for traditional fishermen cause the need for help from people outside their community. Social networks are formed because of mutual knowledge, informing each other, reminding each other, and helping each other in implementing or overcoming something. In essence, the concept of the network in social capital refers to all relationships with other people or groups that allow activities to run efficiently and effectively (Lawang, 2005).

To strengthen the survival of traditional fishing communities, the presence of a social network of capital owners is very necessary for the sustainability of traditional fishing businesses. As traditional fishermen, they have limitations in creating social capital networks. Social networks are the relationships created between many individuals in a group or between one group and another. The relationships that occur can be in formal or

informal forms. In addition to the social network of capital, the most important and the last aspect is the marketing of the catch (Amirudin, 2005).

The fishing community is synonymous with poverty, many things cause it, including the lack of capital owned by the fishermen, low technology owned, low market access, and low community participation in the processing of natural resources. In addition, other causes are non-economic, or commonly called social factors, such as high population growth, low levels of education, and low levels of health and other reasons such as public facilities and infrastructure in coastal areas. Lack of spatial planning results in overlapping of several sectors of an area, pollution, and environmental damage. (Hendro Wibowo, 2016)

For this reason, fishermen must be smart to improve their quality of life in terms of fulfilling all aspects that can support fishermen. Expanding social and political networks is a realistic step to support fishermen's lives. One of the things that have been done is the use of the situation of the democratic party in the regional head elections. Fishermen in the Semarang Coastal area take advantage of this democratic opportunity, in determining their political stance. Coastal communities take into account the natural social aspects. The concrete step that is firmly taken is to put a motive in politics to vote, in other words, the fishing community makes their choice of candidates who are considered capable of accommodating the wishes of fishermen. This is in line with interviews with the following informants:

“When it comes to motives, there must be a motive because the fishermen here are united by making their choices based on their hopes so that they can be fulfilled. I hope that a healthy political climate will be created and political parties will not intervene excessively such as illegal levies on fishermen and can protect them after being declared victorious in the presidential election.”

The political behavior of the fishing community, in general, has cultural and rational characteristics. The behavior of the fishing community is rational in choosing because of considerations of profit and loss. The profit and loss in question are that the political behavior of the fishing community is influenced by rational considerations. These include material benefits and a common vision & mission. The rational political behavior of the fishing community based on material benefits means that the fishing community is given and promised material assistance from the candidate pairs Joko Widodo and Ma'ruf Amin

Besides being rational, the pattern of the political behavior of fishing communities is also cultural. The support of the fishing community for Joko Widodo and Ma'ruf Amin is undeniably also strongly influenced by the familial and ethnic approach. Joko Widodo comes from the Javanese tribe, not much different from the fishing community in the Semarang Coastal area, which is also the majority Javanese.

The fishing communities in Semarang Utara and Tugu have supported the victory of Joko Widodo and

Ma'ruf Amin. This was due to the political participation of the fishermen's community in supporting the couple. The political participation of the fishing community is influenced by several motives. These include:

1. Economic Motive (Material Incentives)

Material motives are a person's rational motives in political activities that provide great benefits for personal interests. Rational consideration not only rewards the choice of the most profitable alternative (maximum gained) or the one that brings the least harm but also in the sense of choosing the alternative that poses the least risk. That way, it is assumed that people in choose political involvement can assess socio-political issues and political changes that occurred during their time. (Reskiyanti Nurdin, 2009)

Fishermen are a very important social element in the structure of coastal communities. The culture they have colored the characteristics of the socio-cultural behavior of coastal communities in general. The characteristics that characterize the socio-cultural characteristics of fishing communities are as follows: having a very strong patron-client relationship structure, high work ethic, utilizing self-ability and optimal adaptation, competitive and achievement-oriented, appreciative of the expertise, wealth and success in life, open and expressive, high social solidarity, a sex-based division of labor system (the sea is the domain of men and the land is the domain of women), and behaves "consumptively" (Kusnadi, 2004)

A large number of fishermen gathered in the fishing community involves a struggle for interests in fighting for the rights of the fishing community, it must be acknowledged that the fishing community, elite, and Joko Widodo and Ma'ruf Amin's success teams interact intensely. The interests of the fishing community are related to the various programs that have been promised by the Joko Widodo and Ma'ruf Amin success teams. The motives of fishermen can be identified, as quoted from the following informants:

"Fishermen in the Semarang Coastal area mostly choose Joko Widodo and Ma'ruf Amin because they promised to prioritize fishermen. Such as assisting fishermen in the form of boats, machines, puka, nets, and fishing rods to providing fishermen's markets to increase their fish sales. This of course can improve the standard of living of fishermen." Hardi

Also the results of interviews with local communities are as follows:

"The motive for choosing Joko Widodo and Ma'ruf Amin yesterday was because Joko Widodo focused on agriculture and fisheries which certainly had a good impact on fishermen, so that's why we support him." Guntur

By looking at the data in the field, it can be seen that the fishermen's material motives have been the reason that made them unite and choose Joko Widodo and Ma'ruf Amin. This material motive has led people to a political orientation that was previously built by the

elite and the successful team. This step taken by the fishing community has made the fishing community very large in quantity, which causes them to be increasingly taken into account. This political motive is of course an aspiration to improve the quality of fishermen both from a socio-political perspective, especially from an economic perspective. As in the following interview results which say that:

“This couple is indeed very good and synergizes with each other in paying attention to fishermen, it is proven during their candidacy that they promised pro-fisherman programs. The hope of the village government is, of course, that with this pair, they can support fishermen” Ikbal

The conditions that exist in Semarang Utara and Tugu are directly proportional to political motives and the movement of the fishing community in the Semarang Coastal area, economic motives are one of the motives that move these fishing communities to be involved in the presidential election. With this attitude and behavior, it means that there is a spirit of fishermen to make changes or progress towards better conditions through new policies or programs that can answer fishermen's problems.

2. Solidarity Motive (Solidarity Incentive)

Solidarity motive is looking for a new social life from what they have so far or for the sake of social solidarity. The reason is that personal benefits are not easy to identify and certainly not easy to measure compared to material benefits. One can feel, however, the socio-

political appreciation in the friendship of political organizations. Motives that arise to meet individual needs to the social.

The interaction between the fishing community and the Joko Widodo and Ma'ruf Amin Success Team was an important factor in the couple's victory. This interaction has an impact that causes the fishing community to be actively involved in the presidential election. The team in question was initiated by: Haidar, Akbar, and Disna. As quoted from the informant:

"There is a successful team that has gone down to try to embrace all fishermen, fishermen here have united to support Joko Widodo and Ma'ruf Amin as presidential candidates." Disna

The quote shows that the approach taken by the Joko Widodo and Ma'ruf Amin Success team is effective in attracting the sympathy of the fishing community. The approach taken by the Success Team is a family approach, where the Success team provides family issues in determining their choice. As stated by the following informant:

"The involvement of the fishing community in yesterday's presidential election in my opinion is very related or there is family involvement, meaning that I see ethnic similarities because in the Semarang Coastal area most of the people are Javanese, and Pak Joko Widodo is also Javanese, so the people of Semarang Utara and Tugu see this to elect Joko Widodo and Ma'ruf Amin". Darwis

In line with the interview, another informant also said:

"I think the candidate relied heavily on the family system during the campaign, I remember JokoWidodo's success team always said that the people of Semarang Utara and Tugu and Mr. JokoWidodo are families because here the Javanese are the same as Mr. Joko Widodo". Asda

The family issues raised by the Success Team certainly have a big impact because family issues involve ethnic relations, which are not only material issues. This kind of family issue is considered to be closely related to the election of Joko Widodo and Ma'ruf Amin because this issue has become a political commodity that is being discussed by the pair's success team.

From the interview excerpt above, it can be seen that the JokowiWidodo and Ma'ruf Amin team were able to find out relevant family issues to attract the sympathy and political orientation of fishermen, thus causing Joko Widodo and Ma'ruf Amin's vote to be maximized.

3. Idealism Motives (Purposive/Issue-Based Incentives)

The idealism motive is the individual's desire to fight for something ideal or ideological. There is a difference between the struggle of parties labeled as liberal or conservative, there is a deeper motivation from political activists, namely commitment to attitudes/behaviors in government and political policies, especially the government's suitability with social conditions that occurred at that time (contextual).

Democracy leads people to be smart in choosing good leaders because the era of freedom of opinion, election, and choice requires us to find good references in analyzing various kinds of political phenomena and various personal leaders. (Ananda Rezky Wibowo, 2014)

The reality of fishing activity in the sea is the main thing for the fulfillment of fishermen's lives, to increase the effectiveness of fishermen in carrying out their work so that their standard of living increases, the government must provide special injections to develop fishing equipment, fishing nets, ship motorization or provide a place in fish marketing.

Following the reality of coastal communities related to the fulfillment of the need for work tools is the most expected thing to support work that supports income. The pair Joko Widodo and Ma'ruf Amin in their nomination succeeded in attracting the hearts of fishermen regarding work programs that touch the fisheries sector. According to the following interview results which said that:

"When the presidential nomination was elected, there were indeed programs in the fields of agriculture and fisheries, that was what made fishermen choose Joko Widodo and Ma'ruf Amin." Harianto

The election of JokowiWidodo and Ma'ruf Amin as president of Indonesia is a breath of fresh air for fishermen, in this case, the people of Semarang Utara and Tugu as well as the local government hope for the

implementation of performance-related to what has been promised. As in the following interview:

"With regard to the president who was elected he must focus on yesterday's program on equitable distribution of people's welfare in the agriculture and fisheries sector because on that basis we support him" Akbar

The interpretation of the interview answers above, of course, really expects the performance of the elected president to accommodate the wishes of fishermen. Because fishermen have the potential to improve the quality of local income if the fulfillment of fishing gear and so on can be realized and provide convenience for fishermen to carry out their work routines. Therefore, one of the motives of the fishing community to support Joko Widodo and Ma'ruf Amin is because of the similarity of vision and mission to those expected by the fishing community.

4. Mixed Motives (Mix Incentives)

The mixed motive in this study is a motive consisting of several motives, this mixed motive collects material incentive motives, solidarity incentives, and idealism. Although not all motifs can be intertwined, some motifs have intersections. In this study, the researcher sees that the material motives of the fishermen's groups are seen as something that benefits them when they are involved in politics, but on the other hand, there is also the involvement of fishermen's groups who participate because of the urge to meet individual needs concerning their social environment. This

combination of material and ideological motives is found in the field as quoted by the following informant:

"We see that Mr. Joko Widodo and Ma'ruf Amin are figures who can pay attention to us. We also really hope for assistance from this elected president, but apart from that, we also see that Mr. Joko Widodo is a figure who wants to provide opportunities for us as fishermen to be able to develop, although it seems unfair that we are the only ones who want to be assisted but we are also part of the community that has been assisted so far". Bakri

Another thing was said by fishermen who are very pro with JokoWidodo and Ma'ruf Amin:

"The presence of JokoWidodo and Ma'ruf Amin as president and vice president is the hard work of the PDI (the red party) which is very understandable to be won in this area because the home base of the PDI is in Central Java and coincidentally the city of Semarang is the capital of Central Java province. I hope that the assistance given is right on the advice and hopefully it is trustworthy" Yusuf

Assistance is very important for fishing communities, so to attract their sympathy is to promise them assistance, expecting assistance from the elected president can be interpreted as a material motive in their participation in providing support to Joko Widodo and Ma'ruf Amin but this can only be interpreted as a step to improve their standard of living, by getting assistance in

the form of capital, fishing tools and access to distribution of fisherman's catch, it can be interpreted as an effort to fight for the welfare of the fishermen, this effort is a manifestation of ideological motives. For this reason, the interpretation of these motifs is a mixed motif.

4.3. GOVERNMENT STRATEGY IN IMPROVING FISHERMAN'S WELFARE

Based on the research results, the government has developed a strategy to improve the welfare of fishermen. The strategies that have been prepared have been listed in the strategic plan (Renstra). Semarang City Fisheries Service 2017-2022 is an elaboration of the targets and programs set out in the Revised 2017 Regional Medium-Term Development Plan (RPJMD). The 2017-2022 Strategic Plan contains the 2017-2022 Strategic Targets for all strategic indicators at the activity level.

The preparation of the strategic plan is intended as a direction and guideline for all apparatus at the Semarang City Fisheries Service as a reference in carrying out development tasks in the marine and fisheries sector for the next five years so that program objectives and targets for service activities to the community can be fulfilled optimally. The goal to be achieved from the preparation of this strategic plan is that the apparatus at the Semarang City Fisheries Service have the same view on the direction of Maritime and Fishery development in the context of the welfare of the community that is in harmony and in line with the vision,

mission and development policies of the City of Semarang. The strategies implemented by the service in increasing the income of fishermen for the creation of a prosperous fisherman's life are as follows:

a. Conduct training to increase knowledge of fishermen

The Semarang City Fisheries Service is based on fishermen's empowerment programs in improving fishermen's welfare, namely implementing strategies in terms of providing training to create new knowledge, new skills and providing innovations and breakthroughs regarding fishing technology. The following is an interview related to the Head of Small Business Empowerment in the Semarang City Fisheries Service:

"To improve the welfare of fishermen, the service will provide training to increase knowledge, skills so that fishermen understand in the management of fishing businesses, increase production to help access marketing, therefore fishermen need to be fostered and fishermen will be equipped with fishing technology innovations so that fishermen can find fish further, because the farther the fisherman explores the more catch they get, indirectly their income will increase."

In the last few months, the weather at sea has been very bad so that the sea exploration is not too far, so the catch is not too much. So in this case the service tries to invite fishermen to take part in training which can actually be filled with various useful activities that can provide additional income for fishermen, such as a fisherman being

able to repair a damaged motorboat engine himself without taking it to a repair shop (so fishermen can open a repair shop). and indirectly the income of fishermen can increase), fishermen can cultivate freshwater fish and sell them to the market, and fishermen can fill their free time by making various forms of processed fish and selling them to the market, or fill their free time by making crafts from shells made of raw materials. The raw material is very easy to find around the coastal environment so it can become an item that has high artistic value and an expensive selling price.

This training was held around the Semarang Coastal area to provide insight to increase fishermen's income, especially when the weather is bad at sea or other natural obstacles. The training participants are expected to be all fishermen in the Semarang Coastal Port. However, this did not work out as expected, such as the following interview with fishermen:

“To improve the welfare and income of fishermen, it is my business and the fishermen's groups themselves, I don't know how the training programs held by the service may be held, but I have never known about training” Yayan (rich fisherman/45 years old)

Another interview was also confirmed by another fisherman:

“There is indeed training from the service, but because I follow skipper fishermen (wealthy fishermen), I don't have time

to take part in the existing training, because if you don't go to sea, you don't get money, even though the weather doesn't allow us to go to sea, even though the results are not that great. a lot" Satoto (Poor Fisherman/50 years old)

The interview above explains that there are fishermen who know there is training and there are also fishermen who do not know that there is training, here it is clear that it is less effective and efficient in providing training programs due to lack of communication between the service and fishermen, so if this perception continues in the future, then the training that is held will never go according to plan (increasing knowledge and creating prosperous fishermen), and the impact of the training program does not guarantee the welfare of fishermen because not all fishermen follow the training program held by the service so that it costs money, time and energy.

b. Assistance

Assistance is a gift in the form of material or moral from the service to individuals or groups of fishermen that are not continuous and selective with the aim of protecting and improving the welfare of fishermen. The nature of the assistance provided by the service is that it continues but according to need. One of the strategies chosen by the government to improve the welfare of fishermen is through the provision of Fisherman's Cards.

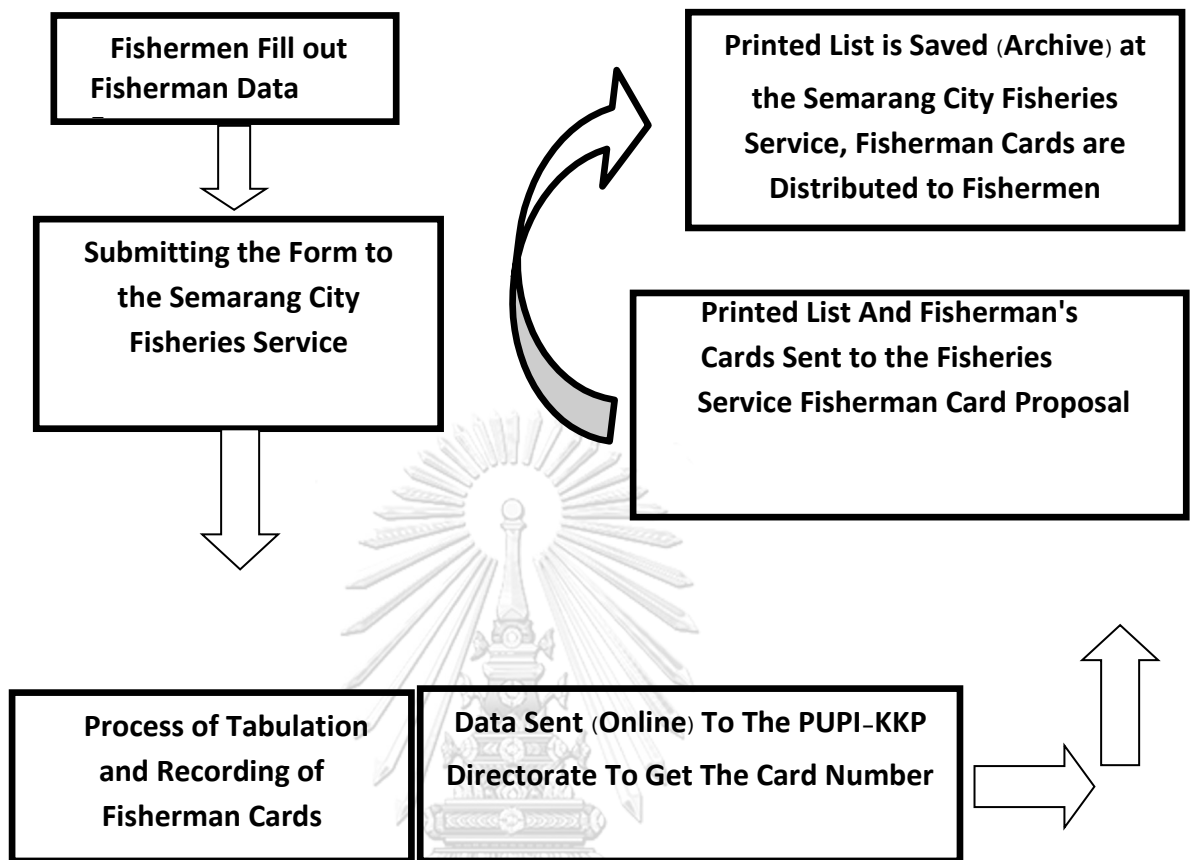
Figure 5. Example of a FishermanCard



Source : ayosemarang.com

The Fisherman Card is a professional identity card for Indonesian citizens who carry out fishing business activities which include: ship captains, ship officers, crew members, ship owners who participate directly in fishing activities and who do not use ships to catch fish. The benefit of the fisherman card is that it can be used as a data reference for the service to determine the category of fisherman groups, so that the provision of assistance is more targeted. Fisherman Card, here are the procedures for making Fisherman Card:

Figure 6. Process of making Fisherman's Card(E-Card of Fisherman)



Source : Semarang City Fisheries Services

The fisherman card is one of the requirements in the formation of the Joint Business Group (KUB) and the government's instrument in carrying out policies and initiatives to empower fishermen to be independent, professional, and abiding by the principles. Fishermen who do not understand the management of making fisherman cards, here are the results of interviews with fishermen:

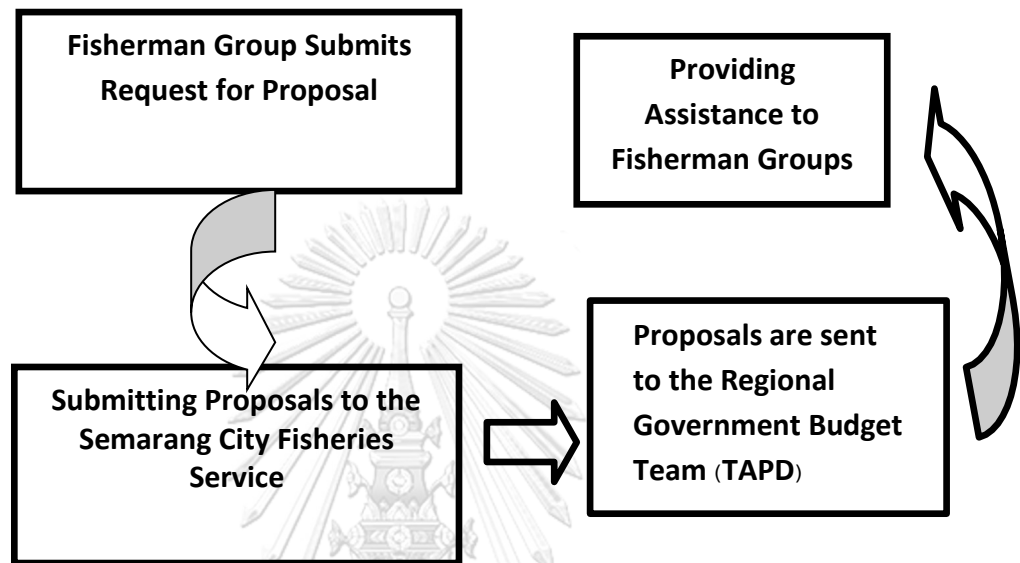
"For the procedure for making fisherman cards, I don't understand, indeed I already have a fisherman card, but the one who takes care of my card is from the head of the fishing group" Feri (Poor Fisherman/33 years old)

From the results of the interview above, it shows that fishermen do not seem to understand the management of making Fisherman's Cards, meaning that it is clear that if there is training from the service, fishermen certainly understand the management of making Fisherman's Cards. However, the reality is that there is a lack of understanding of fishermen in terms of increasing knowledge.

Minister of Maritime Affairs and Fisheries Regulation number 39 of 2017 concerning Marine and Fishery Business Actors. Fisherman cards whose validity period has expired will be replaced with "Kusuka" cards. The "Kusuka" card is an identity card intended to capture fishermen, cultivators, processors, and marketers as well as a database to facilitate the protection and empowerment of marine and fishery business actors. In addition, as a means of monitoring and evaluating the implementation of ministry programs. Meanwhile, the benefits are a prerequisite for the KKP program, such as government assistance and others.

If the fishing group already has a Fisherman's Card or "Kusuka" card, the fisherman group can already apply for assistance to the Semarang City Fisheries Service. With the provision that fishermen who wish to apply for assistance are based on groups, not individuals, because the fisheries service is not for the welfare of individuals but all groups of fishermen. The following is the submission of requests for assistance and the provision of assistance by the service to fishermen groups, namely:

Figure 7. Flow of the Assistance Process



Source : Semarang City Fisheries Services

From the picture above, it is explained that the provision of assistance by the service to groups of fishermen has its procedure, namely, the fishing group submits a proposal along with a Budget Plan (RAB) according to the required application, with the requirements and a certificate from the village and a certificate from the District and attaching a photocopy of the card. Identity Card (KTP). Furthermore, the proposal is submitted to the Semarang City Fisheries Service for verification of the authenticity of the proposal request to be submitted to the Regional Government Budget Team (TAPD) at the Semarang City level, if the proposal is approved, assistance will be provided to fishermen groups. The following

are the results of an interview with the Head of Small Business Empowerment, regarding the procedure for assisting fishing groups:

When a fishing group applies for assistance, the agency first checks the validity of the file, the application is as needed or not, if it is approved, the agency will buy goods through a third party, namely a contractor to be handed over to the fishing group by signing the handover and the Regional Grant agreement text and the fact of the integrity of the fishing group stating that they will use and not trade the goods, and monitoring and evaluation by the Inspectorate and the Financial Audit Board (BPK).

From the results of the interviews above, it can be concluded that the agency does not outright approve the request for assistance, not even all applications are approved because the assistance is not by the needs or the previous assistance is still suitable for use. In this case, the service does not get out of hand, but monitoring and evaluation are also carried out from the service and there is also supervision from the Inspectorate and the Financial Audit Board (BPK).

The task of the Semarang City Fisheries Service is to improve the welfare of fishermen, namely by assisting, while the assistance that is usually given is usually in the form of goods. The following is an interview regarding the provision of assistance to fishermen by the Head of Fish Farming Management:

The fish farming condition in the coastal area is very anxious, the society prefers to choose to be fishermen rather than cultivate in the pond, and the water condition in the coastal area is not favorable to do fish cultivation. Remember,

the weather in the coastal area is unforeseen, and it's so pathetic if the fish can not adaptable. Indeed, we must pay attention to the lives of fishermen, the government always assists fishermen intending to increase income and create fishermen's welfare. Usually, the government assists in the form of fishing rods, gill nets, trammel nets (3 layers net), beach trawlers, nets, GPS, radio communication, fish finder, boats/motorboats, life jackets, fish hatches, and cold boxes”.

From the analysis of researchers, the assistance provided by the government helps fishermen in finding fish by providing fishing vessels, fishing gear, and fish storage facilities to increase the income and welfare of fishermen. The following are the results of interviews with fishermen regarding the provision of assistance:

‘I'm an ordinary fisherman (poor fisherman) who goes to sea with other people's boats (fisherman skipper/rich fisherman) with other fishing groups, as long as I'm a fisherman, I never get any help, because I didn't even think about it, if there is, thank God, if not as for it's also okay because I eat even with the money I share with the skipper fishermen (rich fishermen)’ Nur Salim (poor fisherman/ 36 years old)

The next interview was also confirmed by other fishermen, namely:

‘I heard that the assistance was given by the service, but I myself don't know who received the assistance, but my group never received any assistance. If we need something for fishing we ask or report it to the skipper fisherman

(wealthy fisherman)" Sugeng (Poor Fisherman/42 years old)

From the results of the interview above, it is explained that there are fishermen who have never received assistance from the service, but there are also fishermen who know there is assistance from the service but do not know which fishing group has received the assistance. This shows that the agency's performance has not been effective, marked by the unequal distribution of assistance and the lack of information disclosure regarding the provision of assistance to fishermen groups.

4.3.3. DEVELOPMENT OF FACILITIES AND INFRASTRUCTURE

To facilitate the daily activities of fishermen both at sea and on land, in this case, the agency implements a strategy of maintaining and developing facilities and infrastructure for the smooth running of fishermen's businesses in finding fish, and marketing small fish, following an interview with the Head of Fish Farming Management:

"Several strategic programs that have been realized to date include the development program and improvement of facilities and infrastructure, both the construction of piers, construction of cold storage, construction of fishing halls and other infrastructure for the smooth operation of fishermen's activities, in which this assistance program is to support fishermen's livelihoods"

The following are the results of interviews with fishermen regarding the implementation of programs that have been realized by the government:

"Regarding the construction of docks, fishing halls, and other physical developments, it is true that the service has built it, as has been seen at this time. It really helps us, fishermen, in their activities on land and at sea" Cecep (Medium Fisherman /43 years old)

Based on the results of the interview above, the Semarang City Fisheries Service has made efforts to maintain and build the needs for facilities and infrastructure for smooth fishing activities, even very well received by fishermen, because fishermen consider the development very helpful for fishermen, this was confirmed in an interview with a fisherman:

"For physical development, appreciation should be given to the government, but what I care about here is the construction of a fish market that has not been used" Wahyu (Poor Fisherman/38 years old)

Figure 8. Fish market building



Source: ayosemarang.com

The interview was also supported by the news published by the newspaper "Suara Merdeka" that there are three business facilities built by the central government in the

Fishery Industry area of Ocean Fishery Port (PPS) in Semarang Coastal Area which until now have not been functioned. The three business facilities are cold storage, fish market, and fish processing market. Cold storage is not functioning yet because there is no electricity network. While the fish market is still in need and additional facilities are still lacking, such as a sales table at the fish market, the number of selling kiosks is still limited. From these facts, it is explained that the government has built physical development but has not been able to function due to limited funds, then the strategy for developing facilities and infrastructure does not run effectively and efficiently due to developments that cannot be completed on time, but if this is not handled immediately then development is the hope. fishermen will be in vain, then the building will be damaged little by little so that it will require even more funds Fisherman Insurance Premium Assistance (BPAN)

Another strategy from the government in improving the welfare of fishermen is the Fisherman Insurance Premium Assistance (BPAN) program. The government through the Ministry of Maritime Affairs and Fisheries (KKP) seeks to implement the Law of the Republic of Indonesia Number 7 of 2016 concerning the Protection and Empowerment of Fishermen, Fish Cultivators and Salt Farmers. This is realized through the Fisherman Insurance Premium Assistance (BPAN) program, as one of the KKP's priority programs which is also in line with Nawacita number five, namely improving the quality of life of Indonesian people. The expenditure of Fisherman Insurance Premium Assistance (BPAN) is caused

because the fishing profession has a high enough risk, which can threaten life and safety. When carrying out fishing activities, fishermen are often faced with unfriendly weather causing accidents, and collisions often occur at sea. The procedures for making Fisherman Insurance Cards are:



Table 17. Flowchart Create Fisherman Insurance Card (KN)

No.	Description of Procedure	Executor				Book Quality									
		Fisherman	Ministry of Fisheries and Marine Affairs (DKPP)	Service Verification Team	Semarang City Fisheries Services	Requirements/Complete	Time	Output							
1	Submission						1. KTP (identity card) 2. KK (family card) 3. Fisherman card 4. FormF1	15 Minute							
2	File Receipt													15 Minute	
3	Verification														
4	Online Input													15 Minute	Insurance Card Number Fisherman

5	Tabulation Process			→ <input type="checkbox"/>	Computer and online network	15 Minute	KN Data Recapitulation Available
6	Card Printing Fisherman Insurance			<input type="checkbox"/>	Computer online, network, and printers specialty for KN (fishermen cards) process	1 Week	Insurance Card Fisherman Available

Source: Semarang city Fisheries Services

Requirements for recipients of fisherman insurance assistance:

- 1) Poor fishermen (small fishermen) and medium fishermen (traditional and semi-traditional fishermen)
- 2) Have a fisherman card
- 3) Maximum age is 65 years old
- 4) Maximum ship size 10GT
- 5) Never received insurance program assistance from the government
- 6) Comply with the provisions stated in the insurance policy.

The conditions that must be completed:

- 1) Fill out the forms (AN-1 and AN-2)
- 2) Attach a photocopy of the fisherman's card and family card
- 3) Attach a photocopy of the passbook (if any)
- 4) The appointed heirs must attach in accordance with points 2 and 3 (if the heirs are <17 years old, there is no need to attach an ID card).

The benefits of this fisherman insurance assistance are:

- 1) Compensation for accidents due to fishing activities that cause death to receive compensation in the amount of Rp. 200,000,000 (Two Hundred Million Rupiah)
- 2) Compensation for accidents due to activities on land that cause death to receive compensation in the amount of Rp. 160,000,000 (One Hundred and Sixty Million Rupiah)
- 3) Compensation for accidents due to fishing activities that cause permanent disability will receive compensation in the amount of Rp. 100,000,000 (One Hundred Million Rupiah)
- 4) Compensation for medical expenses amounting to Rp. 20,000,000

Fisherman Insurance Premium Assistance (BPAN) is intended to ensure better fishermen's activities in the fishing

business so that the rights and obligations of fishermen are clear and will be protected in their fishing business activities. The benefits obtained include peace and comfort for fishermen, and increased awareness of fishermen to continue insurance independently. Fisherman Insurance Premium Assistance in collaboration with PT. Jasindo (Public Company), the fishermen's insurance premium payments are assisted for a year, after which fishermen can continue their policies independently with the total insurance policy premiums of around Rp. 175,000 per year, even the Fisherman Insurance Card has been issued by the Marine and Fisheries Service of Semarang City as many as 148 people.

This insurance program is a form of firm policy for small fishermen (poor fishermen) and medium fishermen (traditional/semi-traditional) so that they are able to empower and carry out their fishing activities. The amount of compensation for fishermen's insurance benefits is up to Rp. 200 million is a firm policy to help small fishermen in the national fisheries sector. This policy has been running since 2016 and now it has spread to 34 provinces throughout Indonesia. The following are the results of an interview with the Head of the Capture Fisheries Division:

"This fisherman's insurance premium has been realized well, even some of our fishermen have felt the assistance for treatment, although none of them have ended in death, we hope that our fishermen do not feel this way. Recently, we receive fishing gear relief from the Ministry of Fisheries and Marine Affairs to distribute fishermen who received Fishermen Card. Ministry of Fisheries and Marine Affairs also gives mandatory to exert how to use and operate

fishing gear beyond advanced tools for surveillance maximum sustainable yield and connect with the system. Not all of the fishermen can adapt to easy-to-use and operate advanced tools technology, and we apprehend with the conditions. The hurdle of the training is usually difference comprehensive, and we will edify our communication to shunt boredom. "

The following interview was also confirmed by one of the fishermen:

"The fisherman's insurance premium is true, even I already have the card, but I also don't know whether the compensation is true or not, because none of my colleagues and I have had an accident, hopefully it will be kept away from disaster even though there is so much compensation"
Firman (Fisherman Poor/ 37 years old)

The interview above explains that the government has realized the fisherman's insurance assistance program as evidenced by the form of issuing insurance cards that have been received by fishermen.

In improving the welfare of fishermen, the government has supporting factors that influence work to develop more than before, and has inhibiting factors that affect work and even stop implementing its strategy as follows:

A. Supporting Factors:

Supporting factors are internal:

Sufficient employees, in supporting official work to serve and meet the needs of fishermen, must have sufficient employees. The Semarang City Fisheries Service has a sufficient number of

employees based on their respective fields according to the needs so that work can be done quickly.

Supporting factors are external:

1. Strategic location,

The Semarang City Fisheries Service is located on St. Pemuda No. 175 Semarang which is easy to reach by fishermen and close to transportation access, with its location not too far so it supports official work, is faster and does not spend too much time when the official visits the Semarang Coastal, as well as fishermen when they visit the office.

2. Good working relationship

A good working relationship is a supporting factor for the service, because the service cannot work alone, so with a good working relationship between the Semarang City Fisheries Service, and the Sub-district Agency, the job is easier.

B. Inhibiting Factors:

Inhibiting factors are internal:

1. Limited funds, with limited funds, it is very difficult to improve physical and non-physical development programs. So for now, despite the limited funds, the program is still running, both in terms of maintaining facilities and infrastructure and increasing the knowledge of fishermen.

2. Inadequate facilities, in which the work space is not organized, there are not enough computers.

The level of education of fishermen is low, with low education of fishermen, the lack of knowledge of fishermen is an inhibiting factor for the agency in conducting programs and socialization

with fishermen. Because fishermen can only complain and criticize what the service is doing without knowing what is an obstacle for the service.

The following are the results of an interview with the Head of Small Business Empowerment regarding the inhibiting factors:

"The inhibiting factor is always present in every program that wants to be implemented, especially with limited funds, it is very difficult for the service to work, so it is important for fishermen to take part in training to increase fishermen's knowledge, not only to complain and criticize the service, because the government's job is not only to help fishermen. "But also the government prioritizes education and other public health, if the service always obeys the wishes of fishermen, they will never be satisfied, because the expectations of these fishermen are high"

Inhibiting factors are external:

1. Lack of participation of fishermen, fishermen who are difficult to work with, of course, will hamper the performance of the Semarang City Fisheries Service, if all fishermen participate in programs held by the service for example holding training, if all fishermen take training, of course fishermen who have low education are not a factor Another obstacle, because fishermen already understand management related to marine and fisheries.

As for the obstacles for fishermen in participating,

The following is an interview with a fisherman:

"It's not that I don't support the program from the government, but my position depends on the Fisherman Skipper (Wealthy Fishermen), if I attend the training I can only gain knowledge, I can't get the money, now it's not a matter of being smart, but how do I support my family from fishing , if one day I don't go to sea and I take training, I don't get money for one day"

Didik (Poor Fisherman/47 years old)

The interview above explains that, the reason why fishermen do not participate is because they depend on their daily lives from the catch led by Fisherman Skipper (rich fishermen), where fishermen think that by participating in training, fishermen only get knowledge but do not get money. However, another thing shows that fishermen cannot take part in the training because fishermen work under pressure from Fishermen Skipper (Fishermen Rich).

4.5. CONCLUSION

From the data above we can conclude that society wishes the government more attractive and collaborate seriously amidst the issue of global warming and unexpected regulation every presidential election in Indonesia. Fishermen hopefully desire to live and survive in the ocean, while the government gave the brunt regarding the regulation to protect nature. This case ought to reconciliation among stakeholders such as the government, NGOs, and institutions who experts in this field like from Campus or Academic also illicit Fishermen as a role model fishing movement for sustainability in the future. Fishermen's relief is like insurance already a good decision from Government, but not all of the Fishermen not yet denote with Governments data who receive the relief.

Chapter Five

V. ANALYSIS AND CONCLUSION

5.1. INTRODUCTION

This chapter tries to elucidate the analysis and conclusion of the thesis topic. The SLA (Sustainable Livelihood Assets) framework construes building fishermen's empowerment and composes the government's role and regulation refers to the ministry of fisheries and marine affairs. The fishermen and Semarang city fisheries services gave the information, and hopefully represent the foresight empowerment treatment who suitable with the condition in Semarang coastal area

5.2 SUMMARY OF ANSWER TO THE MAIN RESEARCH QUESTION BASED ON SLA (SUSTAINABLE LIVELIHOOD ASSETES) FRAMEWORK

5.2.1 VULNERABILITY CONTEXT

The vulnerability context of the research regarding attaining Sustainable Livelihood Outcomes must be considered with three aspects, as follows three aspects namely Shock, Trend, and Seasonality. This chapter aims to answer question one regarding the sustainable livelihood framework and is related to chapter 4, social and economic conditions in the Semarang Coastal area. Shock means the condition where we can not anticipate fluctuation (price in the market, capricious fishing outcomes), and the community uphill to accustomed to the condition, which is the

community merely depends on the natural resources. The trend means the condition that the community must be diversified in the pattern of life because the natural resources especially in the java sea depend on the weather (per semester), and the community needs to encourage more apprehend of the condition to vigil demand, and supply in the market is not suitable with the condition in the sea.

Beyond, the condition has unpredictably imposed on the community concerned with global climate change, and an impact on the social life. Seasonality in my opinion mainstream mix comprehensiveness among shock and trend who we can not compel the community to accomplish the demand and supply in the market, the condition overtly make a dilemma on other hand fishermen catch the fish for selling in the market, meanwhile, in the ocean, the weather is not friendly to pursue the market condition. This condition will be poised if the market can control the desire of the buyer, and make it happen if the fish price in the market is not farther when the broker (have a role and influence to control the price in the market) buy from the fishermen.

For urban coastal areas in Semarang City, the impacts and vulnerabilities of climate change are very complex. In contrast to the adaptation of rural communities which is generally carried out socially and culturally, in urban areas the adaptation carried out by the community is assisted by the support of the government and the private sector. Economic and infrastructure development in urban areas is an important part of helping communities and the ecological environment to reduce the impact of climate change. According to the IPCC (2014), the impacts of climate

change that occur on the coast are sea-level rise and extreme storms, hot air pressure, extreme rain, coastal flooding, and seawater intrusion. The biggest threat is residential areas located on the urban coast. Urban communities living in informal settlements, hazardous areas, and lacking essential infrastructure and services pose a threat to their adaptive capacity (Moser et al. 2010).

The social and economic in Semarang Coastal area in the vulnerable condition, this case intensified with the several points such as the community hard to attune concurrent by issue Global Warming which is deluge the landholding vast, and the community disables to refrain their desire to enhance the affluent amid fish market demands still high. The limitations of the condition aggravated by the Regulation from Government circumscribe their capability to control prohibit fishing gear, and another hand the challenging of water quality in java sea inflict the bad condition to cause a decrease in fishing productivity

5.2.2 LIVELIHOOD ASSETS

This section depicts the fishermen's Livelihood Assets as the answer to question one and explains the ability of a community to survive in the conditioned realm to attain exquisite life in the future. The asset is capital something that is owned or accessible to run a living. Assets are capital to carry out activities so that livelihood goals can be achieved. There are five capitals (Pentagonal Assets) which are known in the concept of Sustainable Livelihood Assets (SLA), namely:

1. Human Capital included in this asset category are

Education, Health, Employment, and Skills

2. Natural Capital includes Landholding Vast, Fisheries Condition, Fisheries Production, and Clean Water, as well as activities related to the environment.

3. Financial Capital, namely Income, Expenditure, School Cost Fees, Save Money at the Bank, Aid Funds from the Government, and Debt Cycle

4. Social Capital (Social Resources), namely: Participation, Relationship with the Neighbor, Intensity Confront with the Neighbor, and Active in Social Organization.

5. Physical Capital (Infrastructure Resources): Including Homeownership Status, Public Transportation Access, Public Transportation Available, Fishing Gear Condition, and Fishing Boat Owned.

Coastal communities are people who are still underdeveloped and are in a marginal position. In addition, many dimensions of life are not known by outsiders about the characteristics of coastal communities. They have different ways in terms of knowledge, beliefs, social roles, and social structures. Meanwhile, behind the marginalization, coastal communities do not have many ways to overcome the problems that arise. One of the problems that arise is that coastal communities are a group of people who are relatively left behind economically, socially, in access to education and health as well as culturally. This condition can be characterized by the presence of several characteristics, such as poverty, socio-cultural backwardness and low human resources. This

condition causes not a few fishing or coastal communities to be vulnerable to disasters and/or climate change.

The concept of empowerment is often used by many parties to express community service activities with an empowerment approach as a way of solving problems, including for communities in coastal areas with various challenges and problems faced. As an alternative concept of development, in essence empowerment activities are multidimensional activities that emphasize the autonomy of decision-making from a community group, which is based on personal, direct, participatory, democratic, and social learning resources through direct experience (Friedman, 1992).

One approach to community empowerment that is quite innovative is the Sustainable Livelihood Assets (SLA), which is an effort to involve the community in learning and sustainably doing activities with their unique way of living to improve their quality of life. The Sustainable Livelihood Assets is a perspective on achieving success through empowerment by using 5 sustainable livelihood capital, namely: natural capital, social capital, financial capital, physical capital/infrastructure and human capital.

5.2.3 INSTITUTION AND PROCESS

The range of Institution and Processes in the context to attain Sustainable Livelihood Outcome is very important and need more comprehensive. The condition in the Semarang Coastal Society is probably to maintenance among human resources and natural resources, despite we can not exaggerate catch the fish, and imposed the fishermen to

accomplishing demand and supply in the market. The Semarang City Fisheries Services as a surrogate from the Government have the rule to tutelage due and compulsory for fishermen. Currently, fishermen have access to create Fishermen Cards who can obtain aids (stable food, insurance, gasoline, etcetera) meanwhile not yet the entire fishermen receive the aids. The government must be thorough where the condition to denote fishermen who are not yet to receive the aids and extenuate to create Fishermen Cards, and through this card, we have an access to surveillance and guidance fishermen in future Indonesia have a mission to more aware with fishermen affluent.

The process has a hurdle even though opposed between culture and institution. The fishermen culture usually has a habit in every semester to celebrate the fishing outcome, which is inflicted dispute because emerge water pollution in the sea, especially plastic waste scatter elsewhere in the water surface, and the condition trigger unrespected stare from the Government. The culture "*sedekah laut*" really affected the credence of Semarang Coastal Society, especially for a fishing outcome that is legacy from an ancestor. The force major case who as a burden to fishermen namely policy easy to change in every president who enacted in the election. Fishermen feel restive because the government changes the rule of fishing gear rather than focusing on the workshop (training, promotion, seminar) how to operate the best fishing gear, and how to evolve the advanced technology foresight.

The government's concern is the Fisherman

Insurance Premium Assistance Program (BPAN), which is an effort to implement Law Number 7 of 2016 concerning the Protection and Empowerment of Fishermen, Fish Cultivators, and Salt Farmers. This is also a form of state presence to provide protection rights for them. Fishermen, as one of the key factors in the marine and fisheries sector, are still not prosperous. The fishing business is strongly influenced by natural factors, this results in the continuity of production being not guaranteed. Small-scale fishing businesses are not efficient and have low business productivity. With insurance, the fishing profession, which has a high enough risk, can be more guaranteed. BPAN is intended to ensure better fishing activities in the fishing business so that the rights and obligations of fishermen are clear and will be protected. The benefits obtained include peace and comfort for fishermen and increased awareness of fishermen to continue insurance independently.

5.2.4 LIVELIHOOD OUTCOME

Regarding the results and theory of Sustainable Livelihood Assets, as a writer I can conclude that:

1. Reducing Vulnerability

Regarding the first Livelihood outcome, the Semarang Coastal Society start to comprehend the condition in the environment. The condition in the ocean is unforeseen and the Global Climate Change alters the habit of being more of aware the sustainable environment. Global Climate change urges the Coastal Society remember in the surrounding areas many cases of plastic waste, water pollution, and bad water quality that causes by industrial activity. Life togetherness

and high intensity to confront with the neighbor is the identity of Semarang Coastal Society, social life appropriately dispute avoidance and uphold togetherness who answer challenges reduce vulnerability.

Consideration of planning for reconstruction and rebuilding that is not holistic and comprehensive, and approaches to development strategies that do not take into account local community livelihood systems in the management of diverse livelihood assets, and do not take into account the side of long-term sustainability will create new vulnerabilities and even persistent poverty.

Cliffnotes (2000) observed the lives and livelihoods of coastal communities' families who were referred to as increasingly resembling or rather miniatures of wealthy conglomerates. Like conglomerates who insist on diversifying large-scale businesses that mutually support one investment activity with another, making them struggle to create sustainable profits. However, this framework seeks to provide a way of thinking about the livelihoods of people who are considered marginal and poor. This framework sees society in certain contexts such as vulnerability where disasters and violent conflicts often occur and even crisis tendencies.

2. More Income:

Regarding the second Livelihood outcomes, the Semarang Coastal Society genuinely is not ready to answer the challenges because they do not have the skill another capture fish in the ocean. Therefore, Government as a receptacle who overshadowed and nurture the Coastal Society might

give another chance to strive and survive used social approaching refer to attractive comprehensiveness skill another capture fish. Beyond, the Semarang City Fisheries Services as a Government Institutions with highly influence able to elicit training that can affect with the skill can generate more incomes.

Given the conditions, potentials, and obstacles faced by coastal communities in the city of Semarang, it is necessary to provide guidance and training for the development of the fish processing business which needs to be carried out, including material selection, fish sausage making, fish sausage packaging, sanitation, and hygiene, and economic calculations, that is determining product profit and break-even point. An assessment of the potential for the application of food technology and industrial development to tourism needs to be carried out, considering changes in habits of food in Indonesia are largely determined by the potential of the region. The application of appropriate food technology must be developed based on regional potential, local food products need to be raised to the national and international arenas with various improvements so that in time the food products produced by the people of Semarang coastal society can be unique souvenirs or gifts that arrive into the hands of consumers in a healthy and safe condition

The sustainable potential of Indonesian marine fisheries is estimated at 6.4 million tons per year spread over the territorial waters of Indonesia and the Exclusive Economic Zone (ZEE) with an allowable catch of 5.12 million tons per year or about 80 percent of the sustainable potential. In addition, there are other fisheries potentials that have the

opportunity to be developed, namely (a) capture fisheries in public waters covering an area of 54 million ha with a production potential of 0.9 million tons per year; (b) marine cultivation which includes fish farming, mollusk cultivation and seaweed cultivation; (c) brackish water cultivation with a potential development area of around 913,000 ha; (d) freshwater cultivation includes cultivation in public waters, cultivation in freshwater ponds and cultivation of "mina padi" in rice fields; and (e) marine biotechnology for the development of the pharmaceutical, cosmetic, food, feed, and non-food industries consumption (Ministry of Fisheries and Marine Affairs , 2005).

3. Increase Well-Being:

Regarding the third Livelihood outcome, the Semarang Coastal Society there is three-layer who subsume comprised of labor fishermen, middle fishermen, and rich fishermen. The gap is affected by the decision-making about price in the market and rich fishermen grasp the control because they have anything. Semarang City Fisheries Services as a Government Institutions have must control about undergo Fishermen Cards who facilitate insurance and aids. If Government seriously with the conditions, the aids it must be consigned every-one months. Presumably, the aids to the Semarang Coastal Society render every three months, and aids such as staple foods are very helpful and relieve the burden for poor society.

Realizing a maritime state requires hard work from the government and the community because from the New

Order era the concept of Indonesia's development was based on land development and Indonesia claimed to be an agrarian country. However, this claim seems to have changed with the vision announced by the government. As a step towards realizing a maritime state, the government must focus on and prioritize the welfare of fishermen, because fishermen are the spearhead of the concept of a maritime state. See conditions and problems In the welfare of fishermen, a strategy and policy are needed to realize the welfare of fishermen.

According to (Indonesian Maritime Council, 2012) the strategies and policies for the welfare of the fishermen include:

First, providing fishing capital assistance accompanied by the provision of education, knowledge, and skills. To be able to optimize the catch of fishermen, fishermen need fishing vessels that are more technological and have shipping safety standards. The provision of ship assistance is a solution to help the welfare of fishermen, but if the gift of the ship is not supported by education and knowledge in operating the ship, then the gift will be in vain. Therefore, it is necessary to increase the education of fishermen, both formal and informal education related to fishing voyages. Knowledge related to water systems and regional zones is also necessary for fishermen so that our fishermen do not catch fish outside the state zone because it will harm other countries and will face the law which will have an impact on the fishermen's income.

Second, increasing the number of gas stations (Public

Fuel Filling Stations) at fish landings. BBM (fuel oil) is the breath in shipping because the majority of fishing vessels currently use motors, as propulsion, motors are very dependent on fuel, the cost for this fuel can reach between 50-70 percent of the operational costs of fishing. In addition, gas stations that are far from fish landings will increase the cost of fishing operations because to meet the fuel needs of fishermen need to incur more costs, but if the gas stations are already on the fish landing, fishing costs are more efficient. In this regard, it is necessary to coordinate the ESDM (mineral resource energy) sector or related institutions to help accelerate the construction of gas stations at fish landings.

Third, enforce the law on the preservation of the marine environment. Government policies must be pro-environment, especially the marine environment, because currently Indonesia's seas have been heavily polluted by industrial and household waste, especially the western sea. This pollution will have an impact on the death of fish. Another possibility, if the fish is consumed by humans, it will endanger human health itself. The government's regulation on standardization of industrial waste already exists, but law enforcement is still weak. The Ministry of Environment and Forestry (LHK) is expected to play an active role in controlling waste, especially industrial waste.

4. Improved Food Security:

Regarding the fourth Livelihood outcome, the Semarang Coastal Society deeply wishes to receive a rebate from the Government. Beyond, the aids from the Government such as

rice, water, oil etcetera covered by Fishermen Cards. Currently, the condition in the Semarang City is unexpected about providing staple foods. Several agencies undertake illegal activities and regulated goods to hoard the staple food until wreak the scarcity condition in the market.

In the context of coastal areas, the community has a value system for the food they usually consume and controls food consumption behavior, which is a standard value to determine ethically what types of food are good and not good for consumption. Ritenbaugh (1982) suggests that the act of 'eating' by a person or group of individuals is a perfect example of the 'boundary' between the factors of fulfilling human biological needs and culture (bio-cultural interface). The cultural environment requires the choice of certain foods that are ethically permissible or not to be eaten. However, there are biological needs in each individual who are suitable for certain food choices, for example for growth, health, and reproduction. Jerome (1986) proposed the concept of holism which takes into account environmental parameters that can affect food and the level of technology that shapes interactions.

In order to realize solid food security, starting from the household, local and regional levels, the agribusiness systems and businesses in the marine sector that are built must have characteristics that are competitive, populist, sustainable, and decentralized:

Competitive, characterized by the level of efficiency, quality, price, and production costs as well as the ability to penetrate the market, increase market share and provide professional services.

Populist, characterized by the development of productive businesses that involve the wider community with business opportunities, job opportunities, and enjoy added value (income)

Sustainable, characterized by the ability to increase the capacity of food resources which is getting bigger over time which will improve the welfare of the community both economically, socially and environmentally

Decentralized, means that economic activity is determined by the community doing something with regional conditions on the basis of comparative advantage and the aspirations of the local community (Anonymous, 2001).

5. More Sustainable use of Natural Resources Base:

Regarding the fifth Livelihood outcome, the Semarang Coastal Society co-operation with the Semarang City Fisheries Services to used secure fishing gear and do not over-fishing practices that affect fish scarcity in the ocean, and always protect nature by avoiding oil spill who affected water pollution that emerges fish mass murderer.

The occurrence of weather anomalies causes fishermen to find it difficult to predict the start of the west season (wave season) and east season (shady season).

In fact, this certainty is very important because they use small boats, so they are very sensitive to changes in the weather. Not infrequently due to sudden changes in weather, they are forced to return to land because they see a cloud hanging in the middle of the sea which is considered a sign of strong winds. Due to climate

change, the western season has also become longer than usual. Climate change in addition to causing the emergence of greater uncertainty in the lives of fishermen also results in a long difficult life. Climate change does not only affect the livelihoods of community members but has a wider impact on the economic, social, and humanitarian sectors in society, especially changes in livelihood assets.

This is a particular concern considering the condition of fishing/coastal communities in various areas in general characterized by poverty, socio-cultural backwardness, and the low quality of human resources (HR) and capacity for community organizations. Overall, this condition causes social vulnerability and food insecurity (Nainggolan, 2009). Anticipation locally to reduce climate change is of very little benefit, so local governments as managers of coastal and ocean areas through relevant agencies must immediately adapt to climate change. An adaptation strategy is needed that can be applied to traditional fishing communities to deal with various ecological changes caused by global climate change. This adaptation strategy is certainly not only useful for saving the fishermen's economy but also for maintaining marine and coastal ecosystems through a sustainable use pattern

5.3 SUMMARY OF THE ROLES OF FISHERY SERVICES DEPARTMENT AND THEIR LIMITATION

The Department of Marine Affairs and Fisheries of Semarang City has prepared a strategy that was prepared

in the 2017-2022 Strategic Plan. The strategy implemented by the Department of Maritime Affairs and Fisheries of Semarang City in improving the welfare of small fishermen (labor fishermen) to provide training and increase fishermen's knowledge, assist in the form of goods to support fishermen in catching fish, build facilities and infrastructure for the smooth operation of daily fishing activities, as well as providing Fisherman Insurance Premium Assistance (BPAN) for small fishermen.

Pressures and shock exemplify a limitation of the role from the services department, this case determines how the coastal society feels comfortable with the regulation or conversely. Many of cases the coastal society feels distressed with the condition because regulation and a proper strategy to enhance the society's welfare are even uphill to implement and caprice every president elected. Pressures and shocks to the availability of and access to livelihood resources must also be able to be overcome and restored so that current and future lives can continue in their livelihood places. The response given by fishing households in responding to changes in the biophysical and social environment can be in the form of a short-term response by taking rescue actions or a long-term response by making behavioral adjustments. -an indication of the ability to make adjustments and repairs, enclose on tables 18 and 19.

Table 18. Short-term vulnerability context and Strategy

Short-term Vulnerability Context	Strategy
<ol style="list-style-type: none"> 1. Lack of highly educated fishermen 2. It's hard to find a job other than being a fisherman 3. Have no skills other than catching fish 	<ol style="list-style-type: none"> 1. Providing access for fishermen's families to continue their education in higher education 2. Open new job opportunities in residential areas and give priority to indigenous coastal communities 3. Provide training for fisherman households as support for earning a living other than as fishermen
<ol style="list-style-type: none"> 4. Ownership of the narrow land area 5. Decrease in catch 6. Availability of clean water 	<ol style="list-style-type: none"> 4. Maintain and plant mangroves as a barrier to coastal abrasion 5. It is prohibited for fishermen to use fishing gear classified as illegal fishing which interferes with the sustainability of fisheries 6. Providing clean water assistance managed by the government,

	especially for the benefit of clean drinking water and bathing water
7. Lack of poor fishermen who have private boats	7. Assist in the form of private boats for poor fishermen as an effort to care for and not depend on renting from rich fishermen
8. Lack of income 9. Awareness of saving money in the bank is low 10. The majority of fishermen take loans from banks and rich fishermen	8. Assist in the form of health insurance, staple foods, and so on 9. Provide education such as seminars to the fishing community on the importance of saving money in the bank 10. Providing people's business credit assistance to fishermen with low loan interest
11. Policies, programs, and development projects that are not based on the sustainability of fishermen's livelihoods	11. Strengthening identity, the role of government, and forming community organizations for fishermen's households from

	village to provincial level to fight for livelihood sustainability
--	--

Table 19. Long-term vulnerability context and Strategy

Long-Term Vulnerability Context	Strategy
<ol style="list-style-type: none"> 1. Fishermen use an ancient concept 2. Dependence on the fishing profession 3. Dependence on Capture Fisheries Resources 	<ol style="list-style-type: none"> 1. Provide education on the use of the modern fishing gear 2. Provide training to add skills other than the profession as a fisherman 3. Provide education for pond fisheries diversification and processing methods
<ol style="list-style-type: none"> 1. Sea level rise, the land is controlled by the sea 2. Opportunities for fishermen to commit fraud (illegal fishing) 3. The scarcity of clean water creates a decrease in environmental quality 	<ol style="list-style-type: none"> 4. Provide education on mangrove ecosystem conservation 5. Provide education that the use of the illegal fishing gear is very detrimental to the environment and the future of capture fisheries 6. Provide guarantees of clean water coordinated by the government to

	create a public health and the environment
4. Dependence on rich fishermen	7. Provide education on the importance of independence, especially financial factors that are very sensitive
5. High crime rate 6. Money is easily damaged, and the risk of loss is high 7. If you are unable to pay, you will be in debt	8. There needs to be clear legal protection for the marginalized 9. Provide education on the importance of saving money in financial institutions that are legal and supervised by the State 10. Instilling the importance of living modestly and not being greedy about the sources of livelihood that exist in nature, and avoiding a consumptive

	lifestyle
11. Leadership crisis	8. Appointing the head or leader of the fishing community who can be responsible, can provide solutions, and have broad insight

The livelihood system of fishermen's households, the majority of which are traditional fishermen, is proven to be able to survive in the face of changes in the ecosystem or biophysical environment. Short-term and long-term vulnerabilities caused by changes in estuary ecosystems and the ecosystems associated with them can be overcome through several strategies

Furthermore, challenges from the services department overcome the trouble in the mangroves area. The condition of mangroves in the Java Sea estuary, which is quite severe, has contributed to the increasingly widespread puddling process and the silting of the estuary waters. Illegal logging of mangroves can disrupt the stability of the estuary ecosystem, including the occurrence of coastal abrasion and the loss of places for shrimp and fish to breed. To avoid damage to the shoreline, where fishing households live, the strategy implemented is to maintain and prohibit the cutting of mangroves that are included in their village area. Mangrove conservation also aims to reduce the impact of

global warming, in the form of rising sea levels. Mangroves are one of the world's most important lungs, capable of absorbing large amounts of carbon.

The decline in water quality caused by industrial and household waste is addressed with a strategy to change the habit of throwing garbage into the sea/river and maintain a water-based livelihood. The strategy to reduce the contamination of rivers by garbage drifting from upstream is to instill the values of the importance of living friendly to nature and prohibiting throwing garbage into fishing ground locations. The more dependent fishing households are on the aquatic environment, the greater the desire to protect the aquatic environment.

Delving the operation of illegal fishing in the coastal area also precarious challenges from the services department, and several institutions such as the police and Indonesian army entangle to relief the responsibility. The use of illegal fishing techniques (bombs, chemical poison) can damage the aquatic biophysical environment and kill aquatic animals/biota that is not the target of catching. The strategy used to deal with this is by prohibiting the use of fishing gear classified as illegal fishing for community members. Meanwhile, parties outside the community who use illegal fishing techniques in the marine environment are reported to the authorities. The strategy from the services department for dealing with these ecosystem changes is part of the arrangements within the social organization of

fishermen's households.

5.4. EMPOWERMENT OF THE MARGIN

5.4.1 LIMITATION AND CHALLENGES

The assets of fishermen and coastal households in Semarang City can be deduced looking by at the data of Livelihood Assets comprised of Social Capital, Financial Capital, Physical Capital, Natural Capital, and Human Capital. These parameters determine the Fishermen and Coastal Household to maintain the Assets, be Sustainable to use, and be farther from vulnerable even though the condition of the data needs more attention in Financial Capital and Human Capital. The limitation of Empowerment focuses on the time to time the society receives comprehensive insight from the Government, social capability affected the individual and group aware at the first time and then applied the new insight, and the empowerment hard to apply if the society overlooks with the concept and stuck in traditional treatment. Meanwhile, the challenging in the future imposed the coastal society more creative and diversify to implement modernization and immediately conscious develop a mindset.

The challenge of the vulnerability of fishermen's household livelihoods

The context of vulnerability can be categorized into pressures from external community factors that are long-term and broad-scale (trends); shocks that come in a short time that disrupt the sources of livelihood (shock), and seasonal disturbances or pressures (seasonality). Sources of

vulnerability to the livelihoods of fishermen's households are socio-cultural and ecological changes that have started since they lived permanently in the coastal area of Semarang city. Changes in the regime of natural resource control and the entry of markets are also closely related to the intended environmental changes. The social, economic, cultural, ecological, and political changes that take place at the same time become the context for fishing households in Semarang City, enclosed in the table 20

Table 20. Dimension and Vulnerability Context

Dimension	Vulnerability Context	
	Short-term	Long-term
Human Capital	<ol style="list-style-type: none"> 1. Lack of highly educated fishermen 2. It's hard to find a job other than being a fisherman 3. Have no skills other than catching fish 	<ol style="list-style-type: none"> 1. Fishermen use an ancient concept 2. Dependence on the fishing profession 3. Dependence on Capture Fisheries Resources
Natural Capital	<ol style="list-style-type: none"> 1. Ownership of the narrow land area 2. Decrease in fish catch 3. Availability of clean water 	<ol style="list-style-type: none"> 9. Sea level rise, the land is controlled by the sea 10. Gaps for fishermen to commit fraud (illegal fishing) 11. Scarcity of clean water creates a decrease in environmental quality
Physical Capital	<ol style="list-style-type: none"> 1. Lack of poor fishermen who have 	<ol style="list-style-type: none"> 1. Dependence on rich fishermen

	private boats	
Financial Capital	<ol style="list-style-type: none"> 1. Lack of income 2. Awareness of saving money in the bank is low 3. The majority of fishermen take loans from banks and rich fishermen 	<ol style="list-style-type: none"> 1. High crime rate 2. Money is easily damaged and the risk of loss is high 3. If you are unable to pay, you will be in debt
Policy (Existing Regulations)	<p>Policies, programs and development projects that are not based on the sustainability of fishermen's livelihoods</p>	Leadership crisis

Sources of the vulnerability of fishermen's household livelihoods can also be caused by the method or technique of utilizing fishery resources in river and estuary ecosystems, such as the use of prohibited techniques (bombing, chemical poison, electricity) and fishing with modern technology. Illegal fishing techniques will have a direct effect in the short term, namely the death of small fish, damage to aquatic plants, and contamination of deposit feeder animals (shellfish, snails). The use of illegal fishing can also trigger conflicts between fishermen.

The development of modern fishing technology can be a context for the vulnerability of fishermen's household livelihoods in the long term. If the modern fishing technology used is only intended to achieve economic

benefits, without considering the sustainability aspect of fishery resources, the damage that occurs is even more severe than the use of illegal fishing. As happened during the blue revolution, namely overfishing. In addition, traditional fishermen are forced to compete with large fishing companies and even those on an international scale. This dimension of vulnerability can also be followed by government policies that are more favorable to fishermen or large entrepreneurs or are not based on the sustainability of rural livelihoods.

Other forms of sources of vulnerability of fishermen's households are fluctuations in the price of fuel oil, fluctuations in the rupiah exchange rate, and fluctuations in fishery commodity prices. The nature of the economic uncertainty of fishery resources and fishery businesses in the short term can be a shock to the livelihoods of fishermen's households. Sources of vulnerability in the long term from the economic dimension are the pervasive consumptive lifestyle, the growth of job opportunities in the industrial sector, and the occurrence of the economic crisis. If these short-term and long-term disturbances cannot be handled properly by fishing households, they can collapse or switch to other livelihood activities, even worse, they are forced to leave their livelihood place.

5.4.2 OPPORTUNITY

Although the livelihood system of fishing communities, which are predominantly traditional fishermen, has been able to make livelihood arrangements (community, household, and individual), as well as become a

livelihood strategy that can control and maintain fisherman household access to resources in the Java marine waters ecosystem so that it can continue to date. However, the polluted waters of the Java Sea, the sensitive characteristics of the Java Sea estuary ecosystem, and the limited human capital of fishermen's households make the livelihood system very vulnerable socially and ecologically.

Ecological vulnerability related to vulnerability to environmental degradation aspects of estuary bio-physical is strongly influenced by the conditions of other ecosystems (river ecosystems, forest-garden ecosystems, marine ecosystems). The condition and quality of these other ecosystems cannot be controlled. Regulations concerning the protection and maintenance of the quality of the biophysical environment carried out by fishing households as part of their livelihood system are only limited to the livelihood place (estuarine ecosystem), while the ecosystems located along the watersheds and the Java sea ecosystem are far away out of reach.

Social vulnerability is related to ownership and access to natural and physical capital in household livelihood places, as well as the quality of human capital of household members. As stated by Forsyth (2003), ecological vulnerability and social vulnerability are hybrid or interrelated. Social vulnerability will only be reduced if the degradation of the bio-physical environment can be reduced, as well as the ecological vulnerability can be reduced if the social system can build structures, superstructures, and social infrastructures that are protective of the biophysical

environment. The fishing community has built and institutionalized a livelihood system that is protective of the biophysical environment of the estuary through technological adaptation, economic regulation (production, distribution, consumption), demographic regulation, social stratification, division of labor, and livelihood culture, arts, literature, and knowledge. The social system that is protective of the environment can be suppressed or shaken by market forces and influences, as well as government policies that are not pro-environmental and not pro-low-level society.

Fisherman households as a pre-capitalist social system that has entered the market, are very vulnerable if they have to be released in a competitive market economy. As a novice player, you are very vulnerable if you have to compete with economic actors (businessmen) who have fully entered into modern capitalism. Even though they (Fishermen's Households) have been able to develop strategies and adaptations in their interactions with the state and the market, it would not be wise to allow them to continue to make deep adjustments to their livelihood systems, whenever market economic pressures and shocks occur. The state must be able to make rules of the game that are fair, pro grassroots, and pro-environment. The analogy that can be given is "it is very unfair if short distance runners (sprinters) have to compete with long-distance runners, or beginner sprinters have to compete with professional sprinters". One of the implications of this is that the state

must be able to make rules or policies on aspects of ownership and access to resources in the estuary so that the "economic race" that takes place is fair.

Changes in livelihood arrangements in the community have led to changes in the adaptive capacity of households. Changes in community settings that only regulate the aspects of securing natural capital and physical shared capital, while distribution and consumption aspects follow market mechanisms, have caused fishing households to be stratified based on asset ownership (physical capital), ability to own and access financial capital, and quality of human capital.

Households with large asset ownership, good financial capital availability, and better quality of human capital have a better adaptive capacity in responding to environmental changes. Households with lower asset ownership, limited financial capital, and lower quality of human capital are more exposed and more sensitive to environmental changes. The results showed that most of the fishermen's households were in the lower layers so most of the people were more exposed and more sensitive to environmental changes.

The adaptive capacity of fishing households in individuals also varies, in direct proportion to differences in the adaptive capacity of households. Individuals who come from or are household members at the lower layers have a lower adaptive capacity than household members from the upper layers in dealing with environmental changes. This relates to differences in the ability to rationalize economic actions. Individuals who can rationalize economic actions

better occupy higher social strata than individuals with lower abilities to rationalize economic actions. Individuals who are better able to orient their actions to commercial activities are better able to seize economic opportunities and consolidate and accumulate capital. Meanwhile, individuals who are less able to orient their actions to commercial activities are only able to fulfill basic needs. This difference is related to the quality of human resources which are also starting to be layered based on education (formal and non-formal), skills, and experience.

Individuals with limited knowledge, skills, and experience in activities are more exposed and sensitive to environmental changes when compared to individuals with broader and diverse knowledge, skills, and knowledge. Most of the individuals are members of the lower strata of households, so most are more vulnerable to environmental changes. The implication of this is that the state must play a role and improve the quality of the human capital, in short-term and long-term strategy.

5.5.CONCLUSION

Based on the results and discussion, the concept of empowering coastal fishermen through the sustainable livelihood Assets approach in Semarang City can be carried out with the following steps:

- a. Empowerment of social capital
 1. Counseling on civil society and empowerment at regular forums held, for example, recitations, and fishermen group meetings
 2. Identify and optimize the capacity of potential fishing

- groups to be developed
3. Formation of joint business groups using the form of Organization
- b. Empowerment of natural capital
1. Utilize the regular activity forums for fishing communities to expand information on environmental health and drinking water quality
 2. Utilize fishing groups or organizations to increase knowledge about the latest fishing patterns by current climate change
 3. Mastery of more effective fishing gear and methods
 4. Mastery of technology and methods in the processing of marine products and other marine crafts
 5. The relocation or expansion of the fishing area's business location at sea
 6. Change of business location from marine fishery to land fishery
 7. Expansion of the type of livelihood undertaken, as an alternative income during the lean season
 8. Improving coastal ecosystems through the cooperation of fishing groups or organizations with communities living in coastal areas
- c. Empowerment of physical capital
1. Repair of damaged or degraded infrastructure
 2. Periodic maintenance of infrastructure as a form of anticipatory damage that may occur
 3. Development of a trading area designated for the sale and purchase of fisherman's marine products and processed products

4. Formation of political access between fishing communities and local governments, so that policies for fishermen are more appropriate
- d. Empowerment of human capital
1. Formation of non-formal learning classes among fishermen to gain and pass on experiences regarding production strategies and techniques
 2. Establishment of non-formal learning classes for coastal women and fishermen's wives to process marine products and procedures for developing marketing
 3. Providing counseling about the importance of education to help improve the standard of living of fishing communities
 4. Providing incentives in the form of information and knowledge to fishing communities who are actively involved in fishing institutions or organizations
- e. Empowerment of financial capital
1. Implementation of fisherman institutional programs or organizations to increase community willingness to improve living standards and the environment
 2. Providing convenience in the revolving loan program
 3. Improved communication network and access to investors to increase capital
 4. Increasing the marketing of processed seafood as an alternative financial source

In further research, it can be complemented by consideration of policy factors carried out by local governments and related stakeholders in improving the welfare of coastal fishing communities. This will

increase the accuracy of the steps taken in improving the empowerment of coastal fishing communities in this study.



REFERENCES



จุฬาลงกรณ์มหาวิทยาลัย
CHULALONGKORN UNIVERSITY

- Adrianto, L. (2007). A Snapshot on Small Scale Fisheries. A Focus Group Discussion
Author. PKSPL IPB.
- Alegre, J.; Chiva, R. Assessing the Impact of Organizational Learning Capability on
Product Innovation Performance: An Empirical Test. *Technovation* 2008, 28,
315–326. [CrossRef]
- Ambo, Tuwo. (2011). Coastal and Marine Ecotourism Management. Surabaya: Brilliant
International
- Amiruddin, S. 2005. Social Network Marketing in Banten Traditional Fisherman
Community. *Community Journal* vol 6 (1), 2014
- Anonymous. (2001). Food Awareness Development Work Program. Center for Food
Awareness 2001-2004. Food Security Guidance Agency. Agriculture
department. Jakarta
- Argiolas, G. et. al. (2009). Building Innovative Models of Territorial Governance.
Journal of Place Management and Development, Vol. 2 No. 3, pp.178–210.
<https://doi.org/10.1108/17538330911013898>
- Arikunto, Suharsim. (2010). *Research Procedure A Practical Approach*. Jakarta: Rineka
Cipta
- Bachrach, P. and M.S. Baratz (1970) *Power and Poverty: Theory and Practice*, New
York: Oxford University Press
- Balooni, K., & M. Inoue. (2007). Decentralized Forest Management in South and
Southeast Asia. *Journal of Forestry*, Vol. 105, Issue 8, pp.414-420.
<https://doi.org/10.1093/jof/105.8.414>
- Batliwala, S. (1993) *Empowerment of Women in South Asia: Concepts and Practices*,
New Delhi: Asian-South Pacific Bureau of Adult Education and Freedom
from Hunger Campaign.
- Beveridge, A. (2010). Report: General capabilities – social competence, Hay Group
(commissioned by ACARA, unpublished).

- Central Bureau of Statistics. (2006). People's Welfare Indicator. Jakarta: BPS.
- Central Bureau of Statistics. (2021). Semarang City in Numbers. Semarang: BPS
- Cholisin and Nasiwan. 2012. Fundamentals of Political Science. Yogyakarta: Ombak
Publisher
- Cliffnotes, (2000). Models of Social Change. Study guide. Retrieved 3 Dec 2012
- Creswell, John W. 2008. Educational Research : Planning, Conducting, And
Evaluating Quantitative And Qualitative Research. London. Sage
Publications.
- Creswell, J. W., Clark, V.L.P., Gutman, M.L., & Hanson, W.E. 2010. Framework
Research Modern Mix-Method. Yogyakarta: Pustaka Pelajar.
- Creswell, J.W. 2010. Research Design: Approaching Qualitatif, Quantitatif, and
Mixed. Yogyakarta: Pustaka Pelajar.
- Creswell, J.W. 2011. Planning, Conducting, and Evaluating Quantitative and
Qualitative Research 4ed. Boston: Phoenix Color Corp.
- Creswell, J. W. 2012. Educational Research Planning, Conducting and Evaluative
Quantitative. In Research 4th Ed. USA: Pearson Education, Inc.
- Dahlan Tampubolon. 2014. Coastal Community Empowerment Strategy in Meranti
Islands Regency. Journal of SOROT Vol 8 No 2
- Damsar. 2013. Introduction to Political Sociology. Jakarta: KENCANA Penanda
Media Group
- Dr. Prabhat Pandey and Dr. Meenu Mishra Pandey. 2015. Research Methodology :
Tools and Techniques. Romania: Bridge Center.
- DFID (2000): Sustainable Livelihoods Guidance Sheets. Department for
International Development.
http://www.livelihoods.org/info/info_guidancesheets.html(accessed:
23.07.2008)
- Eni, Kamal. (2013). Regional Autonomy and Fishermen Empowerment. Pusitkom:

Bung Hatta University.

- Fanesa Fargomeli. 2014. Interaction of Fisherman Groups in Improving Living Standards in Tewil Village, Kec. SangajiKab. East Halmahera freshmen, Journal "ActaDiura" Vol III No 3
- Forsyth T. 2003. Critical Political Ecology: The Politics of Environmental Science. Routledge, London and New York.
- Goleman, D. (1998). Working with Emotional Intelligence, Bantam, New York.
- Hodgdon, B. D. (2010). Community Forestry in Laos. Journal of Sustainable Forestry, Vol. 29, Issue 1, pp.50-78. <https://doi.org/10.1080/10549810903463452>
- Indonesian Maritime Council. 2012. Marine Economic Policy With Blue Economy Model. Ministry of Maritime Affairs and Fisheries, Jakarta Intergovernmental Panel on Climate Change (IPCC). (2014). Climate Change 2014: Impacts, Adaptation, and Vulnerability. Part A: Global and Sectoral Aspects. Contribution of Working Group II to the Fifth Assessment Report of the Intergovernmental Panel on Climate Change. Cambridge: Cambridge University Press.
- James A. Christenson & Jerry W. Robinson JR. (1989) Community Development In Perspective. Iowa State University Pres
- Jerome et,all. (1986). Nutritional Anthropology: Contemporary Approach to Diet and Culture. Norge W. Jerome, Randy F. Kandel, and Gretel H. Pelto (eds.). Redgrafe Publishing Company.
- Jones, B. T., & Murphree, M. W. (2004). Community-Based Natural Resource Management as a Conservation Mechanism: Lessons and Directions. In Biodiversity, Rural Development and the Bottom line (Vol. 1, pp. 63-103). London UK: Earthscan.
- Kartono. (1998). Introduction to Social Research Methodology. Masdar Maju: Bandung
- Kusnadi, (2000). Fishermen: Adaptation Strategies and Social Networks. Bandung:

HumanioraUtama Press

- Kusnadi. (2003). *Fishermen's Poverty Roots*. Yogyakarta: LkiS
- Kusnadi. 2004. *Overcoming the poverty of fishermen in East Java, integrated approach*, Yogyakarta Renewal, (in Fanesa Fargomeli, *Interaction of Fisherman Groups in Improving Living Standards in Tewil Village, Sangaji District, Maba District, East Halmahera*, Journal "ActaDiura" Vol III No. 3 Th. 2014
- Kusumastanto, T & Satria A. (2011). *Independent Coastal Village Development Strategy. Towards Village 2030*. Bogor: Crestpent Press.
- Lawang, R.M.Z. 2005. *Social Capital in Sociological Perspective*. Second printing. FISIP UI Press, Depok
- Manat Rahim; Madjiani Tahir; Wally Aya Rumbia. (2014). *Model of Community Empowerment in Coastal Areas in Reducing Poverty in Buton Regency, Southeast Sulawesi*. The WINNERS Journal, Vol. 15 No. 1, March 2014
- Maruf., M. F. (2018). *Coastal Community Empowerment Through Empowerment Program Coastal and Coastal Communities in Tuban Regency*. Public Administration: UNESA
- Ministry of Marine Affairs and Fisheries. 2005. *Revitalization of fisheries*. Ministry of Marine Affairs and Fisheries of the Republic of Indonesia. Jakarta
- Moser C, Norton A, Stein A, Georgieva S. 2010. *Pro-Poor Adaptation to Climate Change in Urban Centers*. Washington (US): The World Bank/Sustainable Development Network Social Development Department.
- Muflikhati, I. (2010). *Socio-Economic Conditions and Levels of Family Welfare: A Case in the Coastal Region of West Java*, in the Journal of Family Science. Bogor Agricultural University. January 2010.
- Nainggolan, K. (2009). *Poverty and Empowerment Issues Food Security in Overcoming Global Crisis*, Paper Presented at P2E-LIPI FGD,

15 October 2009.

- Nazir, Muhammad. (2005). *Research Methods*. Ghalia: South Bogor
- Pérez, P. *Habilidades Sociales: Educar hacia la Autorregulación. Conceptualización, Evaluación e Intervención*; ICE-Horsori: Barcelona, Spain, 2000.
- Pomeroy, R. S., & M. B. Carlos. (1997). *CommunityBased Coastal Resource Management in the Philippines: A Review and Evaluation of Programs and Projects, 1984-1994*. *Marine Policy*, Vol. 21 No. 5, pp.445-464.
[https://doi.org/10.1016/S0308-597X\(97\)00016-X](https://doi.org/10.1016/S0308-597X(97)00016-X)
- Purwanto, L.M.F., (2005) *The Old Colonial City of Semarang (Overview of the History of the Development of City Architecture)*. *Journal of Geology and Mining RESEARCH* 33(1)
- Raco, J.R. (2010). *Qualitative Research Method Types, Characteristics and Advantages*, Jakarta: PT. Grasindo.
- Retnowati, Endang.(2011) *Indonesian Fishermen in Structural Poverty Whirlpool*. *Journal of Social, Economic and Legal Perspectives*, Vol. XVI No. 3 2011.
- Reskiyanti Nurdin. 2009. *Youth and Politics, a Study on Political Participation of Youth to Become Legislative Members in the Makassar City DPRD*
- Ridlo, Mohammad Agung, 2016, *Discussing the Problems of Metropolitan Semarang City*, DEEPUBLISH, Kaliurang-Yogyakarta.
- Rindawati, Septi. (2012). *Fisher Community Improvement Strategy*. *Journal of Economics and Accounting Information*, Vol. 2 No.3 2012.
- Ritenbaugh, Cheryl. (1982). "Nutritional Anthropology". *Medical Anthropology Newsletter*, 13: 15
- Ruslan, Rosady. 2010. *Research Methods Public Relations and communication*. Jakarta: Raja Grapindo Persada
- Rusli. (2017). *Fisherman, Observation*, March 30, 2017

- Sadan, E. (2004). *Empowerment and Community Planning*. Translated by Richard Flantz. Retrieved from [www.mpow.org/elisheva_sadan_empowerment.p df](http://www.mpow.org/elisheva_sadan_empowerment.pdf). (Accessed on March 21st, 2018)
- Semedi, P. (2002). *Close to the stone, far from the throne: The story of a Javanese community 1820s - 1990s*. Yogyakarta: Benang Merah.
- Shofwan. (2008). *Management of Marine Resources Potential as an Effort to Increase Fishermen's Income (Case Study of Community-Based Management of Coastal Areas in Tuban Regency)*. Faculty of Economics. Brawijaya University. *Journal of Indonesian Applied Economics*, Vol. 2 No. May 1, 2008, 102-112..
- Siswanto, B. (2008). *Poverty and Resistance of the Fishermen*. Malang: Laskbang Mediatama
- Suharto, Eddie. (2005). *Building Community Empowering People*. Bandung: Refika Aditama
- Sugiyono. (2008). *Educational Research Methods Quantitative, Qualitative, and R&D Approaches*, Bandung: Alfabeta.
- Sutejo, Kuart Widodo, (2007). *Policy Dynamics towards Fishermen: A Historical Review on Fishermen of the Coast of Java*. Faculty of Letters, Diponegoro University. Photocopied.
- Teguh, Mohammad. (2005) *Research Methods*. Jakarta :King of Grapindo Persada
- Totok, Mardikanto and Poerwoko, Soebiato. (2015). *Community Empowerment in the Perspective of Public Policy*. Bandung: Alfabeta.
- UNDP. (2010). *Human Development Report 2010 - 20th Anniversary Edition. The Real Wealth of Nations: Pathways to Human Development*. Retrieved from http://hdr.undp.org/sites/default/files/reports/270/hdr_2010_en_complete_reprint.

pdf (Accessed on March 22nd, 2018)

Viitala, R.; Kantola, J. Temporary Agency Workers Shake a Word Community: A Social Capital Perspective. *Empl. Relat.* 2016, 38, 147–162. [CrossRef]

Wehmeyer, M., Agran, M., Hughes, C., Palmer, S., Mithaug, D., & Martin, J. (2007). Promoting self-determination and student-directed learning for students with intellectual and developmental disabilities. New York: Guilford.

Yulianti, D., (2019). Revealing the History of the Old City of Semarang and the Development of Creative Industries. *Science* 4 (11)

REGULATIONS:

Indonesian Act No.7, 2016

Indonesian Act No.32, 2014

Presidential Instruction (INPRES) No. 15, 2011

Regulation of the Minister of Marine Affairs and Fisheries No. 22 Article 8, 2021

Regulation of the Minister of Marine Affairs and Fisheries No. 56, 2014

The Law of the Republic of Indonesia, Number 31 of 2004 concerning Fisheries, Article 6

WEBSITE:

<http://www.dpkotasemarang.go.id>

<http://humas.jatengprov.go.id>

<http://money.kompas.com>

Interview Form

A. Interview with concerned officials

1. Head of Fish Farming Management

- a. How are the condition about fish farming in the coastal areas?
- b. What are the achievement of your section to increasing income and creating fishermen welfare?
- c. What is the Government's strategy regarding infrastructure and facilitate?

2. Head of Small Bussines Empowerment

- a. How the insurance can support fishermen activity?
- b. What are the fishermen provision submission to obtain grant from Government?
- c. What ideas are used in empowering fishermen?
- d. How is the strategy to emerge consciousness of the participants?

3. Head of Capture Fisheries

- a. What are the attention from Government to Fishermen?
- b. How about the fishing gear subsidy for Fishermen?
- c. If there are training about fishing gear operation, How does the enthusiasm of fishermen?
- d. What are the hurdle since the training to Fishermen?

RESPONDENT IDENTITY

Put a mark (x) or (✓) on your identification.

1. Name

.....

2. Sex

Male

Female

3. Age

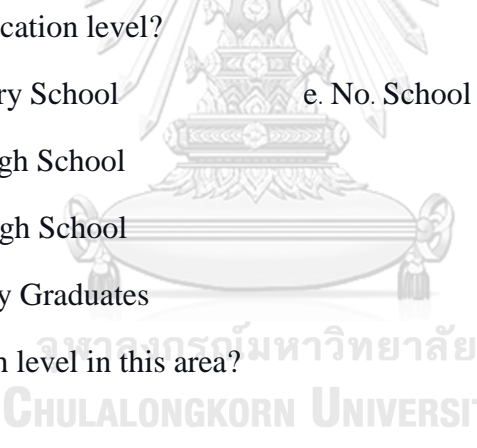
:

4. Number of Dependent

:

จุฬาลงกรณ์มหาวิทยาลัย
CHULALONGKORN UNIVERSITY

B. Main assets of fishermen and household**Human Capital :**

- 
1. What is your education level?
 - a. Elementary School
 - b. Junior High School
 - c. Senior High School
 - d. University Graduates
 - e. No. School
 2. How about health level in this area?
 - a. Less
 - b. Good
 - c. Enough
 3. Does it easy to seek a job here?
 - a. Easy
 - b. Hard
 - c. Normal
 4. Do you have the skill another catches the fish?
 - a. Yes

b. No.

Natural Capital:

1. How vast are your landholdings here?

a. $< 0,25$ ha ($< 2.500 m^2$)

b. > 0.25 ha ($> 2.500 m^2$)

c. $=0,25$ ha ($=2.500 m^2$)

2. How the fisheries condition in here?

a. Good

b. Bad

c. Normal

3. How is the fisheries production here?

a. Good

b. Bad

c. Normal

4. How the clean water provides here?

a. Good

b. Bad

c. Normal

Financial Capital

1. How much is your income per month?

a. Low: $< Rp.5.000.000$

b. Medium: $Rp. 5.000.000 - Rp. 10.000.000$



- c. High :> Rp. 10.000.000
2. How much is your Expenditure per month?
- a. Low:> Rp.1.000.000- Rp. 3.000.000
- b. Medium:Rp. 3.000.000- Rp. 5.000.000
- c. High :< Rp.5.000.000
3. How much your children's school fees per month?
- a. Low (Rp 500.000)
- b. Medium (Rp 500.000-1.000.000)
- c. High (>Rp 1.000.000)
4. Have you saved your money at the bank?
- a. Yes
- b. No
5. Have you received aid funds from the government?
- a. Yes
- b. No.



Social Capital

1. How about your participation in here?
- a. Participation in any condition
- b. Do not care
- c. Normal
2. How relationship with your neighbor?
- a. Intimate
- b. Keep the distance
- c. Normal

3. Have you often been confronted by your neighbor?

- a. Often
- b. Seldom
- c. Normal

4. Are you active in social organizations?

- a. Active in organization
- b. Indifferent
- c. Normal

Physical Capital

1. What is your homeownership status here?

- a. own house
- b. rent house

2. What is public transportation easy to access?

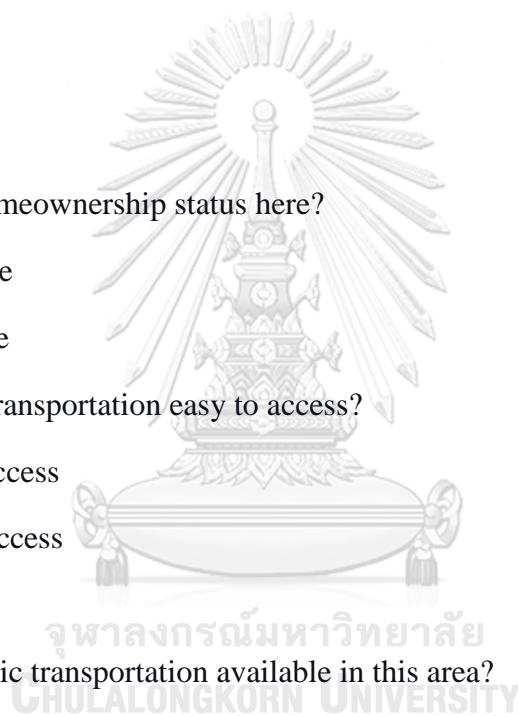
- a. Easy to access
- b. Hard to access
- c. Normal

3. What is the public transportation available in this area?

- a. Available
- b. Not Available

4. How is the fishing gear condition in here?

- a. Good
- b. Bad
- c. Normal



Please answer the questions below by putting a tick (✓) in the appropriate answer according to your real situation, opinion, and feeling.

B. Significant rule for Fishermen and Household

1. Does the government often go directly to your area?
- Often
 - Seldom
 - Never
2. Has the government ever provided assistance?
- Basic ingredients and clean water
 - Cleaning facilities (trash cans, toilets)
 - Child education subsidies (school equipment)
3. What is the potential that can be developed in your area?
- Fresh fishery products (sea fish)
 - Aquaculture products
 - Tourism (mangrove ecotourism, fishing)
4. Your area is very close to the sea; do you think the fishery potential can develop?
- Sure
 - Not sure
 - Just normal
5. What is the current government policy for fishermen?

- a. Difficult to implement (changeable, complicated)
- b. Easy to apply
- c. Another Answer
6. Can you explain a good fishing gear?
- a. Easy to use
- b. Durable
- c. Does not harm the environment
7. What are the concerns of the Government regarding the use and the assistance of Fishing Gear?
- a. The existence of training (workshops, seminars)
- b. Help for broken fishing gear
- c. Another Answer
8. Associated with changes in fishing gear policy every change of president. Are you feeling restless?
- a. Restless
- b. Adaptable
- c. Just Normal
9. Related to the Sustainability of Fisheries Resources in Your Area. Have you obeyed the rules from the Government?
- a. Already

b. Not yet

10. What subsidies have been given by the government to fishermen?

a. Subsidies for basic goods and children's education

b. Fuel subsidies

c. Fisherman Family Insurance

11. What is your insurance for your treatment?

• Government Insurance/BPJS

• Private insurance

• Own Cost (Without Insurance)

12. If you receive a subsidy from the government. Do you receive it every month?

a. every 1 month

b. 2-4 months

c. 6-8 months

13. Is it true that there is training from the government such as seminars and workshops for fishermen?

a. It's true that training

b. Not true

c. Do not know

14. Do you feel enthusiastic about the training from Government?

a. Enthusiastic

b. Very Enthusiastic

c. Just normal

15. Is it correct to submit an activity funding proposal to the government?

should create a group first?

a. True

b. Not true

c. Do not know



จุฬาลงกรณ์มหาวิทยาลัย
CHULALONGKORN UNIVERSITY

Documentation



Convention Hall



Interview with Coastal Society



Public Toilet



Awning



Road Access

Fishing Activities



จุฬาลงกรณ์มหาวิทยาลัย
CHULALONGKORN UNIVERSITY

VITA

NAME Adam Prayuda

DATE OF BIRTH 24 May 1994

PLACE OF BIRTH Semarang, Indonesia

**INSTITUTIONS
ATTENDED** Environment. Development and Sustainability

HOME ADDRESS Sadewa 1 No. 47

PUBLICATION Sustainable Livelihood of Fishermen : A Case Study in the
City of Semarang, Indonesia



จุฬาลงกรณ์มหาวิทยาลัย
CHULALONGKORN UNIVERSITY