

# STUDY OF FISHERIES INDUSTRY POTENTIAL IN INDRAMAYU DISTRICT

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## ABSTRACT

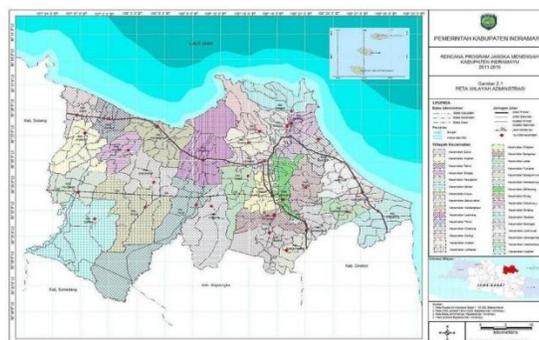
This study aims to describe the activity of the fisheries industry sector in Indramayu. Analyzing the role of the fisheries industry sector in regional development Indramayu district based on comparison of the amount of production of regional and provincial fishery. This study began in February 2019 to March 2019. Research Methods literature survey was performed using data collected through surveys decisions then quantitatively analyzed and presented descriptively. Data of this study consisted of two types: primary data and secondary data. The data analysis was conducted on the Shift Share Analysis and Analysis of Location Quotient (LQ). Based on the research conducted on the Fisheries Industry Potential Studies in Indramayu, it can be concluded fisheries potential in Indramayu namely fisheries industry (LQ 1.75) and the aquaculture industry Pond (LQ 1.57) is an industry that excel in Indramayu. Shows the value of industrial production growth in net shift of Indramayu district fishery with the average of the years 2013-2017 amounted to 47.472,45 fisheries industry demonstrates the value  $PB > 0$ , which means that the fisheries industry in Indramayu had progressive growth rate.

**Keywords:** *Keywords: potential fisheries industry, Indramayu regency, Shift Share Analysis and Location Quotient (LQ) analysis.*

## 1. INTRODUCTION

Fishery potential in Indramayu, according to statistics from the Department of Marine and Fisheries Indramayu district, on the 2016 Indramayu district fisheries production reached 433,678.99 tons, the processed fishery products, which reached 42 344 tons, and the value of local revenues reached USD fisheries sub-sector. 10,481,461,259.00. Besides the investment value of fisheries sub-sector managed to achieve the target, even an increase of 85.34% of the target that has been set with an investment of Rp. 28,613,043,941.00 (BPS Indramayu 2017).

This indicates that the Indramayu district has potential for development and fisheries development intensive, if developed through the steps right, then the potential of the fisheries industry is expected to be utilized for the economic progress of society and the development of the district of Indramayu, therefore there needs to be monitoring for see the progress and development of the fisheries industry in Indramayu.



**Figure 1.** Map of the District administrative region Indramayu

According to Purnomo A. and ES Heruwati. (2011) Although it has been announced since the New Order era and continue to be programmed in the reform era, but in general it can be said that the development of fisheries industry, aquaculture and fish processing industry has not been optimal. This is partly caused by less than optimal infrastructure and facilities and other infrastructure such as roads, irrigation, container cultivation, electricity, water, ice, etc., as well as the persistence of tariff and non-tariff countries buyers of industrial products such fisheries dolphin issue, Ecolabeling, traceability, Sanitary and Phytosanitary (SPS), environmental issues, mangroves, antibiotics, antifungals, human rights, and others. (A. Purnomo and ES Heruwati, 2011).

Development and the development potential of the industry in Cirebon is expected to support the economy of coastal communities and fishermen to employ these communities to reduce the number of unemployed, prosperous society and improve fishery and optimizing infrastructure development in the region.

## 2. MATERIALS AND METHODS

This research was conducted in Indramayu Regency as a research study area and West Java as a research reference area. The research method using literature survey data collected through the survey then quantitatively analyzed and presented descriptively (Rizal 2013). The data used consist of primary data and secondary data. Primary data were obtained from observations, either in the form of questionnaires, interviews with relevant parties and documentation. The primary data is more focused on the performance of the industrial sector, social, economic, and environmental problems faced. Primary data is needed to determine the conditions and problems in the management of the fisheries sector. Secondary data were obtained through the gathering of information from previous research and the latest developments on the data obtained from the Department of Fisheries and Marine Indramayu district. Secondary data used include the form of time series data that include fisheries production and economic growth in areas related to the fisheries industry. Analysis of the data used in this research is quantitative descriptive analysis is used while the shift share analysis and Location Quotient (LQ)

## 3. RESULT AND DISCUSSION

Indramayu District is one district that is located at the eastern end of West Java Province. As for other areas bordering the Indramayu district, among others, are as follows: The south is bordered by Majalengka, Sumedang and Cirebon; West by Sumedang; and the north side Java Sea; East by the Java Sea and Cirebon.

Geographically Indramayu District located at position 107 ° 52-108 ° 36' east longitude and 6 ° Scope Indramayu district government administrative area currently consists of 31 districts, 309 villages and 8 villages, with an area of 204.011 ha or 2.04011 million Km in length 147 km coastline that stretches along the north coast between Cirebon-Subang, with many coastal villages 36 vilages of 11 kecamatanDi agricultural sector, Cirebon regency is one of the rice-producing areas are located on the north coast.

Indramayu district area is low-lying areas with topographic elevation region generally ranges between 0-18 m above sea level and the low lying areas ranges between 0-6 m above sea level in the form of swamps, ponds, fields, yards. Indramayu district most of the land surface in the form of terrain with a slope of between 0% - 2% covering an area of 201 285 ha (96.03%) of the total area. This condition makes the Indramayu district has good potential for the development of the fisheries industry.

The development of economic development in an area, it can be seen from the level of economic growth. Gross Regional Domestic Product (GDP) is one of the economic indicators that are often used in addition to other micro indicators such as the level of employment and price stability. Sustainable development is a development strategy that is widely applied by developing countries, including Indonesia. Therefore, government policies to prioritize the past few years of economic growth, thus the exploitation of natural resources is striking without taking into account the environmental damage.

The rate of economic growth in 2016 in Indramayu decreased compared to the previous year. Based on the calculation of GDP at constant prices in 2010, the rate of economic growth in Indramayu regency in 2016 is about 0.08 percent, whereas in 2015 about 2.16 percent. Gross Regional Domestic Product Indramayu regency in 2016 at current prices reached 66,467,586.21 million. While on the constant that is not influenced by inflation reached 56,706,182.92 million. '

**TABLE 1. RESULTS OF THE CALCULATIONS LQ FISHERIES INDUSTRY FROM 2013 TO 2017.**

No.	type of Industry	Location Quotient (LQ)					Average	Information
		2013	2014	2015	2016	2017		
1	Fisheries	1.96	1.71	1.81	1.63	1.63	1.75	Base
2	Aquaculture Pond	1.57	1.62	1.53	1.70	1.41	1.57	Base
3	Freshwater Aquaculture	0.46	0.42	0.49	0.48	0.40	0.45	Non Base
4	Fish processing	0.50	0.57	0.51	0.49	1.14	0.64	Non Base

Table 1 shows the results of analysis calculation LQ. Industries with LQ> 1 represents the type of industry that is superior to other industries to meet demand from within the region and outside the region Indramayu district, and is the type of industry the most widely hailed by the public. LQ <1, meaning that a particular commodity in the region can not meet its own needs must obtain supplies from outside the region.

Industry sectors which have an average value of LQ> 1 including fisheries (LQ 1.75) and aquaculture ponds (LQ 1.57) is an industrial sector that excels in Indramayu, which can meet the demand of the sector both within and outside the region.

This is due to the geographical conditions of Indramayu district directly adjacent to the sea north of Java so that it becomes the preferred place for fishermen to land fish, KPL Mina Sumitra is a cooperative that focuses on the fisheries industry with the largest production in the district of fisheries Indramayu.. Besides fisheries, fisheries industry types with LQ> 1 where the fisheries pond, according to the explanation Dinskanla staff Indramayu field cultivation, the enthusiasm of people to cultivate the pond fisheries industry due to the high profits generated and the high interest of investors from outside the region to invest in pond fisheries industry.

**TABLE 2. CHANGES IN INDUSTRIAL PRODUCTION AND FISHERIES IN INDRAMAYU, WEST JAVA REGENCY CONSTANT PRICES 2013-2017.**

Year	(ΔYi)	Percentage Change (%)	(ΔYj)	Percentage Change (%)
2013/2014	6825	1.65%	9755	0.84%
2014/2015	4,124	0.97%	182 248	0.35%
2015/2016	26 920	6.32%	71 335	1.90%
2016/2017	48 223	10.66%	106 011	-8.04%

INFORMATION :

$\Delta Y_i$  = INDRAMAYU DISTRICT

$\Delta Y_j$  = WEST JAVA PROVINCE

**TABLE 3.** RATIO OF INDUSTRIAL PRODUCTION AND FISHERIES IN INDRAMAYU WEST JAVA PROVINCE IN 2013-2017.

year Analysis	ri	Ri	Ra
2013/2014	0.07	0.08	0.07
2014/2015	0.04	0.16	0.06
2015/2016	0:10	0.09	0.05
2016/2017	-0.12	-0.09	0.05

INFORMATION :

$\Delta Y_i$  = INDRAMAYU DISTRICT

$\Delta Y_j$  = WEST JAVA PROVINCE

Table 3 shows that the growth rate of the industrial sector and fisheries in Indramayu of West Java province in the period 2013/2014 to 2015/2016 can be said to have a growth rate that is progressive, with a positive value ratio, while in 2016/2017 the District Indramayu and West Java Province has a negative value shows that in that year the growth rate is not progressive. Ra value is the value of production growth is obtained based on the difference count province base year total production analysis (2011) divided by the total production of the province of the base year analysis (2011). Ra value is a reference value that indicates growth.

**TABLE 4.** COMPONENTS SHARE FISHERIES INDUSTRY INDRAMAYU DISTRICT, WEST JAVA PROVINCE IN 2013-2017.

Year	CPG
2013/2014	92785.55
2014/2015	187,132.00
2015/2016	121,688.45
2016/2017	-129,418.84

Information :

CPG = Growth Proportional Component

Share Growth Proportional component or components are components of the fisheries industry sector CPG value Indramayu district of West Java province shows a positive value in the year 2013/2014 with a value of 92785.55, the year 2014/2015 worth 187,132.00 which shows the greatest value, 2015 / 2016 with a value of 121,688.45, and the year 2016/2017 CPG value is negative - 129,418.84. Sectors that have a positive CPG value means the sector of regional economic growth rate has resulted in growth in Indramayu experience positive growth. While the sector has negatively KPP value means the sector of regional economic growth rate has resulted in a decrease in Indramayu experiencing negative growth.

**Table 5.** Components of the Fisheries Industry Mix in Cirebon regency of West Java province in 2013-2017.

Year	PG
2013/2014	-16,225.43
2014/2015	-5393.68
2015/2016	-14,118.26
2016/2017	62260.57

Information :

PG = Proportional Growth

Table 5 shows the proportional growth (PG) contribution of the fisheries sector to the provinces. Based on proportional growth (PG) of the fisheries sector in 2013/2014 (PG value -16,225.43), 2014/2015 (-5393.68 PG value), 2015-2016 (PG value -14,118.26) show that in that year the rate pertumbuhan slow compared to the province of West Java. While in the year 2016/2017 shows the PG value 62260.57, Indramayu regency This shows that year had a positive growth with  $PG > 0$ , so that it can be concluded that

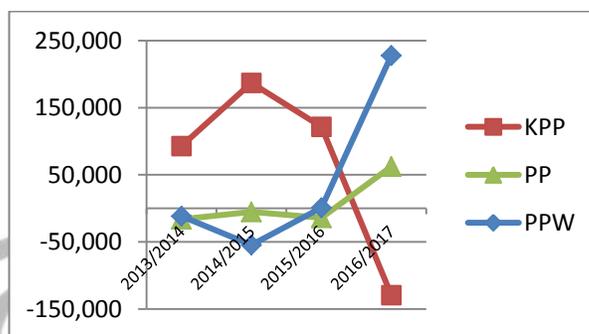
bring in the fisheries industry sector growth rate faster than the Indramayu district of West Java province

**TABLE 6. COMPONENTS FISHERY INDUSTRY COMPETITIVE 2013-2017.**

Year	GST
2013/2014	-11,671.52
2014/2015	-54,518.32
2015/2016	773.19
2016/2017	227,797.17

Description: GST = Growth Share Territory

Table 6 shows the competitive component has an average of 40595.13 is a value that indicates that in general in the development of the past five years, namely 2013 to 2017 sectors of the fisheries industry in Indramayu have tersus increased so as to have the competitiveness of the fisheries sector are better than other regions in the fisheries sector West Java province. Figure 4 shows the trend of the development of the fisheries sector competitiveness with other regions Indramayu regency in West Java province.



**Figure 2.** Trend Value Share Component, Component Mix, Kompeten Competitive

**TABLE 7. NET FISHERIES INDUSTRY SHIFTS INDRAMAYU DISTRICT**

Year	Shifting Net
2013/2014	-25,475.18
2014/2015	-68,321.98
2015/2016	-12,726.56
2016/2017	296,413.54

Table 7 shows the value of the fisheries industry sector net shift of Indramayu district with the average of the years 2013 to 2017 amounting to 47472.45. Fisheries industry sector shows the value  $PB > 0$ , meaning that the fisheries industry sector in Indramayu had progressive growth rate. Based on the interview fisheries industry sector developments tend to increase the production of comparable results. In order to improve the performance of economic development Indramayu district, the sector of the fisheries industry be a priority of government as a leading sector in Indramayu, then the Indramayu district may be indicated as the area with the industrial sector of fisheries affecting the economy of the region, where production can meet the needs of the district of Indramayu also can meet the needs of regions outside the region Indramayu district.

**Conclusion**

Based on research conducted at the Fisheries Industry Potential Studies in Cirebon, can be summed up as follows:

1. Research carried out on the Fisheries Industry Potential Studies in Indramayu, it can be concluded fisheries potential in Indramayu namely fisheries industry (LQ 1.75), the aquaculture industry Pond (LQ 1.57), and general water industry (LQ 1 , 87) is an industry that excel in Indramayu.
2. Shows the value of industrial production growth in net shift of Indramayu district fishery with the average of the years 2013-2017 amounted to 47472.45, fisheries industry demonstrates the value  $PB > 0$ , which means that the fisheries industry in Indramayu had progressive growth rate.

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