# Fishermen's Socio-Economic Performance in Marine Tourism Areas (Case Study of South Kuta District, Badung Regency, Bali Province)

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# ABSTRACT

Indonesian tourism cannot be separated from the development of Bali tourism with the general name The Island. of Paradise or The Island Of God which attracts the attention of local and foreign tourists. Bali began to be known for its tourism beginning in the 1900s. Tourism fishermen are fishermen who have a choice between catching fish and also carrying out tourism activities such as selling services to take tourists around by boat, renting surfboards, taking tourists fishing and others. Fishery production in Badung district in 2018 was 16,210 tons, in 2018. 2019 as much as 4.4.72 tons. This research was conducted in South Kuta District, Badung Regency from November 2021 to July 2022. This study aims to analyze the socio-economic performance of fishermen in marine tourism areas and analyze the influence of social interaction, social mobility, social stratification, work time, and fishing activities other than fishing, fish on the state of marine tourism in South Kuta District. Characteristics of fishermen include age, education level, number of dependents in the family. The data of this study consisted of primary and secondary data. Determination of the sample in this study using the accidental sampling method, the data analysis technique used multiple linear regression analysis and the coefficient of determination. The results showed that fishing activities other than fishing had a positive value of 0.179, social interaction was positive 0.229, social stratification was positive 0.179, social mobility was positive 0.197, work time was positive 0.238, variable fisherman activities other than fishing, social interaction, social stratification, social mobility, working time has an effect of 90.6% on the variables of the state of the marine tourism area in South Kuta sub-district, Badung district, Bali province. **Keyword** : maritime tourism conditions, social interaction, social mobility, social stratification, working hours

## **1. INTRODUCTION**

Bali is an island rich in tourism destinations consisting of marine tourism destinations, culture, spiritual tourism, and rural tourism. Bali's complex tourism appeal allows Bali to attract tourists from all segments of the local to foreign market (Aristiarini & Mahagangga 2015). Denpasar's total fishery production in 2018 was 34,086.95 tons and then decreased by 15,695 tons in 2019, Badung district fishery production in 2018 was 16,210 tons and then decreased by 11,737 tons in 2019. According to local fishermen, this is because since 2018 fish catches have decreased (Wiratmini 2019). Full-time fishermen are fishermen who use all of their working time to do fishing work, the main part-time fisherman is a fisherman whose most of their working time is used to carry out fishing operations, while the main part-time fisherman is a fisherman whose part of their working time is used to carry out fishing operations (Kartika et al. 2020). Characteristics of fishermen, among others; fisherman's age, number of family dependents, fisherman's education level, fisherman's contribution to fishermen's empowerment activities. Fishermen groups in marine tourism areas are generally an association of fishing communities, which are part of the local community (Sihombing & Nugroho 2018). Fishermen who are in tourism areas have more intensity to

socialize with fishermen. Tourist visits can also cause changes in the pattern or way of life of the local community (Sidarta 2002). The fishing community in general interacts with a deep pattern, this pattern can be seen from cooperation in carrying out activities, making good contact between fishermen and other communities, in carrying out business, the fishing community has clear goals and designs a permanent system, in accordance with culture (Syah 2016).

The progress of a region is influenced by many factors. There are several developments of marine tourism areas, including; development, community social aspects, community economic aspects, regional regulations, etc. This study will discuss the economic and social aspects. Social aspects include; social conflict, social mobility, social interaction, social stratification. Economic aspects, among others; income, work time, etc. Tourism has several advantages for the pro-community economy, especially the poor (Ashley 2006), because; consumers who come to tourist attractions provide opportunities to sell goods and services, tourism provides opportunities to diversify local communities, tourism offers more intensive employment opportunities.

#### 1.1 Socio-Economics Aspect

Interaction has requirements, namely the existence of social contact and communication. terms of social interaction are the existence of social contact and communication. Generally, what is interpreted as interaction is a dynamic reciprocal relationship between individuals, people and groups, or between groups that start from contact and communication (Hidayat & Pratiwi 2018). Social contact is a physical and spiritual approach. These social contacts are primary and secondary. Social stratification is a social layer or level (Syah 2016). Underdevelopment and poverty are phenomena that are familiar to fishermen's families and have become a stigma for the community, it is necessary to conduct research on the socio-economic performance of fishermen in tourism areas. This research focuses on revealing the social and economic aspects that bind fishermen so that they are powerless to face the challenges of global development. Class classification in social stratification is carried out in a certain social system according to the dimensions of power and *prestige* (Maunah 2015). Social mobility is a movement, shift, increase or decrease in status or class from a person's social status (Kamilatunnisa 2018). Social mobility is divided into two types, namely horizontal mobility and vertical social mobility.

## 2. RESEARCH METHOD

This study discusses the socio-economic performance of the fishing community in marine tourism areas that affect the state of marine tourism areas, South Kuta District, Badung Regency, Bali Province. This research method is descriptive quantitative using a survey with the method of accidental sampling, with the number of respondents as many as 42 people. The data received will be processed using multiple linear regression, and the coefficient of determination.

Multiple linear regression, this analysis is used to predict changes in the value of certain variables when other variables change. (Sugiyono 2019), it is said to have multiple regression because the number of independent variables is more than one. Given that in this study the variable x has six predictors, then the multiple linear regression equation is used with the following formula:

$$Y = a + b1X1 + b2X2 b3X3 + b4X4 + b5X5$$

Description:

Y = State of Marine Tourism in South Kuta District, Badung Regency.
a = Constants
b1b2 = Coefficient/direction of the line
X1 = Fishing activities other than fishing
X2 = Social interaction
X3 = Social Stratification
X4 = Social Mobility
X5 = Analysis of working time

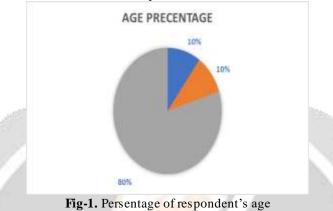
The coefficient of determination test (R2) is used to measure how far the model's ability to explain variations dependent variable (Ghozali 2018).

 $Kd = R2 \times 100\%$ 

### **3. DISCUSSION**

South Kuta is a sub-district located in Badung Regency, Bali Province. Administratively, South Kuta District is bordered by Kedonganan District in the north, the Indian Ocean in the east, west and south. There are 6 sub-districts in Badung district, one of which is South Kuta district. The area of South Kuta District is 105.4594 Km<sup>2</sup>.

The characteristics of the fishermen in this fisherman consist of; age, education level, number of family dependents, fishermen's contribution to fishermen's empowerment activities.



The age of fishermen based on respondents is dominated by age > 40 years, which is 80% or equivalent to 34 respondents. Fishermen aged 20-30 and aged 31-40 have the same percentage of 10% or equivalent to 4 respondents in each grouping, fishermen with an age range of 20-30 years are dominated by fishermen who are on Kedonganan Beach, which are 3 respondents.

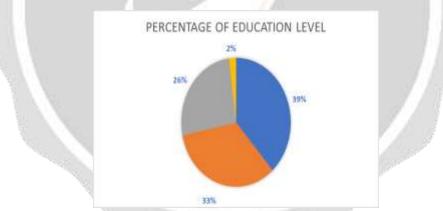


Fig-2. Percentage of Respondent's Education Level

The results of the primary data obtained, stating that the education level of fishermen in the tourism area of South Kuta District, shows that as many as 38% of fishermen carry out piercing up to elementary school level, this number is the highest number which is equivalent to 16 respondents. The dominance of respondents who underwent education to elementary school came from Jimbaran and Kedonganan beaches with 7 respondents from each beach. The number of respondents who carry out education with the smallest percentage is fishermen with an undergraduate education level of 2% or equivalent to 1 respondent.

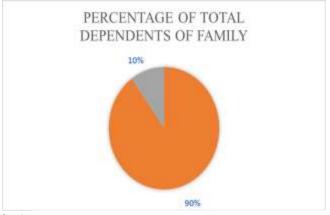


Fig-3. Percentage of Total Dependents of Respondents' Family

The number of dependents of fishermen's families with the largest percentage is dependents of 5 people, reaching 90% with 38 respondents, while the number of dependents >5 people has a percentage of 10% with 4 respondents. The majority of the dependents of fishermen's families in South Kuta sub-district are in the low dependent group because the data obtained are dominated by the number of dependents of 5 people. Respondents who have a large number of family dependents with the number of dependents >5 the majority are fishermen located on Jimbaran Beach with a total of 3 respondents.

Fishermen empowerment activities are held by the government through fishermen groups. Based on the results of interviews, the types of fisherman empowerment carried out through fisherman groups include; surfing training, ship grants to fishermen, ship engine grants, safety grants such as buoys. The Badung Regency Government guarantees an education program for children of small fishermen, as well as an entrepreneurship training program for small fish cultivation. Fishermen empowerment activities have been regulated by the local government in the Regional Regulation of Badung Regency No. 8 of 2016. The response from the fishing community to fishermen's empowerment activities is that 100% of respondents feel that the fishermen's empowerment activities held by the government are useful. Based on interviews conducted in this study, fishing communities who are members of fishing groups feel enthusiastic every time there are fishermen empowerment activities.

Model		Unstandardized	d Coefficients	Standardized Coefficients	t	Sig.
		В	Std. Error	Beta		
1	(Constant)	,612	1,285		,476	,63
	X1	,179	,080	,212	2,239	,03
	X2	,229	,070	,261	3,263	,00
	X3	,172	,070	,203	2,445	,02
	X4	,197	,079	,197	2,493	,01
	X5	,238	,096	,235	2,486	,01

#### 3.1 Multiple Linear Regression Analysis

Based on the results of the multiple linear regression analysis in the table above, the following regression model was obtained:

Based on the multiple linear regression model above, the following information was obtained:

- 1) The purchasing decision regression coefficient (Y) is positive 1.627, which means that if the value of the other variables remains (constant), then the variable state of marine tourism in Kuta sub-district, Badung district is 1.627.
- 2) The regression coefficient on the activity variable other than fishing is 0.79 and is positive, meaning that if the activity variable other than fishing has increased by 1 point significantly, and other variables have a fixed value. Then the income variable will increase the value of the variable state of marine tourism in Kuta District, Badung Regency 0.179.
- 3) The regression coefficient on the social interaction variable is 0.229 and is positive, meaning that if the social interaction variable has increased by 1 point significantly, and other variables have a fixed value, then the state of marine tourism in South Kuta District, Badung Regency is 0.229.
- 4) The regression coefficient on the social stratification variable is 0.179 and is positive, meaning that if the social stratification variable has increased by 1 point significantly, and the other variable has a fixed value, then the state of marine tourism in South Kuta District, Badung Regency is 0.179.
- 5) The regression coefficient on the social mobility variable is 0.197 and is positive, meaning that if the social mobility variable has significantly increased by 1 point and the other variables have a fixed value, then the state of marine tourism in South Kuta District, Badung Regency is 0.197.
- 6) The coefficient of marine tourism on the working time outpouring variable is 0.238 and is positive, meaning that if the working time outpouring variable has increased significantly by 1 point and other variables remain, then the state of marine tourism in South Kuta District, Badung Regency is 0.238.
- 7) It can be seen that all coefficients are positive, this means that there is a positive correlation between variables where when the independent variable increases, the dependent variable will also increase, and vice versa.

	£.		Table 2.	Determination	Analysis and	F Test			
Model	R	R	Adjusted R Square	Std. Error of	Change Statistics				
		Square			R Square Change	F Chang	df1 df	df2	Sig. F Chang
	1	1. 10				e	7.12		e
1	,952 <sup>a</sup>	,906	,893	,299	,906	69,523	5	36	,000
o Dradiat	onat (Const.	ant) V5 VA	V2 V2 V1				1		

## 3.2 Analysis Of The Coefficient Of Determination

a. Predictors: (Constant), X5, X4, X2, X3, X1

The t test is used to test the significance or significance of the partial regression coefficient. Testing through the t test is to compare t <sub>count</sub> with t<sub>table</sub> at the real level = 0.05. The t-test has a positive and significant effect if the result of the t <sub>count calculation</sub> is greater than t <sub>table</sub> (t- <sub>count</sub> > t<sub>table</sub>) or the probability of error is less than 5% (P <0.05). Furthermore, the value of the coefficient of partial determination ( $r^2$ ) will be sought to determine the effect of the independent variable (X) partially on the dependent variable (Y).

The test steps are as follows:

- 1) Determine HO and HA formulations
- HO : bi 0 means HO there is no positive and significant effect between the independent variable and the dependent variable.
- $\cdot$  HA : bi > 0 means that HA has a positive and significant effect between the independent variable and the dependent variable.

From *table* of coefficients obtained from *statistical* using SPSS, it is found that:

- 1) T table value obtained is 2.02809
- 2) From the table above, it is found that the calculated t value is greater than the t table, which means that the variables X1, X2, X3, X4 and X5 each partially have a positive effect on variable Y.

Jimbaran Beach is located in the Jimbaran Village, has a coastline of 400m. Tourists who enjoy Jimbaran Beach generally aim to be able to eat at restaurants located around the lips of Jimbaran Beach, some tourists usually rent a boat for fishing, then the results can be submitted to the restaurant and tourists only pay cooking wages. All fishermen who are members of the fishing group are local sons and are Hindus, before fishermen start fishing activities, fishermen usually pray and prepare the boat to be ready and ask for the blessing of safety. In the Jimbaran Beach area there are several hotels and there is 1 luxury hotel facing directly to the Jimbaran beach. People who visit Jimbaran beach have different goals, among others. Enjoying the beach, afternoon running, walking leisurely with pets, enjoying culinary delights around Jimbaran beach has cliffs as high as approximately 20 m so that this cliff is often used as a rock climbing exercise or just camping, this beach also has a little forest suitable for camping (Nainggolan et al. 2020).

Kedonganan Beach is located in the Kedonganan Village with a coastline length of 1258 m (Badung Fisheries Service, 2011). Tourists who enjoy and visit Kedonganan Beach usually visit a special market for fresh fish caught by fishermen, then tourists can take them to restaurants around Kedonganan Beach. Kedonganan Beach has a less attractive impression for tourists because Kedonganan Beach are filled with fishing boats so it is less interesting to visit if you just want to enjoy the beach atmosphere, Kedonganan beach also has a more fishy aroma when compared to other beaches in South Kuta District, so generally Tourists who visit Kedonganan beach only aim to buy fresh fish, then it is processed in restaurants or generally also processed in the villas they rent. At Kedongan Beach, there are many immigrant fishermen from other islands, so these fishermen cannot join the fishing group, nor can they create a new fishing group.

The coastline length of the German Coast is 400m. The German coast is bordered by Kedonganan Beach and Kuta Beach. Along the German coast, the beach is divided in two by the Ngurah Rai Airport runway. German beaches have significant historical value in South Kuta District, because during the construction of Ngurah Rai airport, the government collaborated with architects from Germany, then workers from Germany made special housing for airport project workers around the coast, that's why this beach is called German beach. This beach is more focused on surfing tourism activities, there are several surfboard renters around the beach, tourists who want to surf must be escorted by boat about 25 meters in the direction of the sea in order to be able to surf because the waves on the shore are held back because the German coast is adjacent to the beach. Ngurah Rai Bandra. German beaches there are also several hotels that face directly towards the beach. German beaches have a beach entrance fee of IDR 5,000.00/person. German beach sand has been stockpiled once, this is done due to abrasion based on the results of interviews with respondents, the first sand hoarding was carried out in the early 2000s, and is planned to be carried out again in 2023 by the Bali Provincial government in collaboration with Ministry of Public Works and Public Housing. The stockpile is planned to be 10m high.

#### 4. CONCLUSIONS

Based on the results of the analysis carried out, the following conclusions can be obtained:

The socio-economic aspects of fishermen in marine tourism areas consist of fishing activities that are dominated by fishing rentals, social interaction with the dominance of interaction for 2 hours/day, social stratification with the dominance of fishermen group members, social mobility with the dominance of upward mobility, the outpouring of fishermen's working time with the dominance of time. for 10 hours/day.

The state of marine tourism in South Kuta District, Badung Regency, Bali Province, is influenced by 90.6% by the socio-economic aspects of the fishing community. The state of the marine tourism area in South Kuta District that has changed is the German coast, the abrasion that has occurred on this beach until now has been piling up beach sand, and it is planned to do it again in 2023.

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