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Comparative Study of Border Area Development Models Through Security, Prosperity, and Environmental Approach at Sebatik and Miangas Islands

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Abstract: Various problems with illegal activities at the border and border economic activities are the impact of interactions between border communities and nearby cities in neighboring countries. Therefore, development of the Sebatik and Miangas border areas must continue to be carried out to overcome these problems. A comparative study of security, prosperity and environmental approaches to support the development of the Sebatik and Miangas borders was carried out. The method used is a mixed method. Quantitative approach to obtain the influence of the three approaches in Sebatik and Miangas. Qualitative approach to obtain policy concepts and implementation in Sebatik and Miangas. Respondents and research subjects were security forces and local governments in Sebatik and Miangas. The research results show that in Sebatik and Miangas, the most dominant approach is prosperity, the second is the security approach, and the third is the environmental approach. Meanwhile, the proposed policy is Border development is carried out in a holistic, comprehensive, integrated border development system based on security, prosperity and environmental factors thematically and spatially with benchmarks for success, namely productivity, efficiency, and community participation through a combined top-down and bottom-up system. Policy implementation in the two regions is different according to the characteristics of Sebatik, which borders sea and land, and Miangas, which borders sea.

Keywords: Border Development, Security, Prosperity, Environmental.

1. Introduction

Indonesia is an archipelagic country that shares land and sea borders with various countries. Borders are frontier areas that are vulnerable to various violations of law and sovereignty (Djunarsjah & Putra, 2021). Besides that, borders are areas that have unique problems. Land borders have unique problems, while sea borders also have unique border problems (Sariguna Johnson Kennedy et al., 2018).

The land border area has quite large natural resource potential, and is a very strategic area for national defense and security. However, development in some areas lags behind development in neighboring countries. The above causes socio-economic disparities in society compared to neighboring countries. Maritime border areas have their own character compared to land border areas. This is because the maritime border area has territorial waters and is even located on small and outermost islands. So, the problem may be different specifications. Related problems in maritime border areas are more dominant in the limited number of personnel and infrastructure supporting law enforcement, territorial sovereignty and maritime security. Problems related to the economy of maritime border areas are high poverty rates, suboptimal use of natural resources and sea transportation. The regional economy and the function of strategic activity centers are related to low accessibility in terms of transportation, telecommunications and electricity (Kurnia et al., 2023; Sariguna Johnson Kennedy et al., 2018; Setyanto et al., 2018).

Development of border areas is a necessity. Several previous studies have shown that development of border areas should be carried out using three approaches. These three approaches are the security approach, the prosperity approach, and the environmental approach (Fitri et al., 2017; Solheim & Azevedo, 2018; Sudiar & Irawan, 2018).

One of Indonesia's most worrying borders is the Indonesia-Malaysia border in North Kalimantan. These problems range from high political problems such as border disputes, damage or loss of demarcation pillars to social and economic problems such as undeveloped areas, low or non-existent basic infrastructure, low accessibility, underdevelopment and so on. The Indonesian government is fully aware of this problem, and has issued several policies designed to improve the prosperity of people living in border areas. However, the lives of "border communities" cannot be separated from the old problems they have described previously (Sudiar & Irawan, 2018). Another problem is on the border of Indonesia and the Philippines. This area is an area that allows illegal activities to be used that disrupt the economy and the law. On the other hand, border communities also allow for economic activities that are less profitable for border communities in Miangas and the national economy in general, including the use of Philippine Pesos for their economic activities (Hanim et al., 2023; Kurnia et al., 2023; Nugroho et al., 2019).

Besides that, development of border areas should be carried out conceptually and continuously (Fitri et al., 2017; Wattimena, 2017). The Sebatik and Miangas areas are areas with very unique borders. Sebatik shares land and sea borders with Malaysia, while Miangas shares sea borders with the Philippines. The problems in Sebatik are related to the land and sea borders which allow smuggling and use of Malaysian ringgit as well as the level of prosperity which is disparate with the Tawau - Malaysia area, which can have an impact on sovereignty and law violations in the region. Meanwhile, Miangas, which borders Davao - Philippines, has problems related to the entry of necessities from the Philippines, the use of Philippine Pesos in trade interactions, as well as illegal activities that can disrupt the country's economy and defense.

Based on the background above, the problems are:

a. How does border area development compare based on security, prosperity and environmental approaches in Sebatik and Miangas?

b. What is the comparison of border area development concepts and strategies based on security, prosperity and environmental approaches in Sebatik and Miangas.

2. Literature Review

2.1 Border Area Development

A border area is defined as an area that geographically and demographically borders the border of a country (Djunarsjah & Putra, 2021; Sudiar & Irawan, 2018; Wattimena, 2017). The border between Indonesia and Malaysia is long and involves various types of territory, from land to water. On land, there are several provinces in Indonesia that directly border Malaysia, such as North Sumatra, West Kalimantan and East Kalimantan. Most of these land borders are marked by rivers, forests, and mountains. The border around Sebatik Island is the subject of attention because of its strategic location. This border is marked by the administrative and maritime boundaries between the two countries. As part of efforts to understand and manage this border, Indonesia and Malaysia continue to dialogue and work together to address issues that may arise (Brata, 2020; Fitri et al., 2017)

Miangas is a small island located on the border of Indonesia and the Philippines. This island is part of the Talaud Islands Regency, North Sulawesi Province, Indonesia. Miangas is located north of the island of Sulawesi and is in the Mindanao Strait, which separates the island from the Philippines. The border around Miangas is of concern because of its strategic location and close proximity to Philippine territory. This has led to several issues regarding sovereignty and administration on the island. Even though Miangas is located in Indonesian territory, there are several issues related to the Philippines' claim to this island (Kurnia et al., 2023).

2.2 Security Approach

The security approach assumes that border areas are areas that directly border neighboring countries. In addition, border waters play an important role in the economies of many countries because they provide global communication routes and also contain enormous natural resources. Efforts to ensure security and protection are intended to create conditions in waters that are under controlled national jurisdiction and can be utilized as much as possible for various activities that support national interests. Therefore, the security approach views border areas not only as areas that have strategic value from the perspective of regional unity, but also to safeguard the

country's maritime development and the interests of state development in general. One form of border security control is by establishing guard posts in the control zone whose task is to monitor state resources and frontline defense. Meanwhile, in maritime border areas, security efforts are being carried out in selectively vulnerable areas around the most remote islands, starting from the three sea lanes of the Indonesian archipelago, to the outer limits of the waters that are its legal territory. (National Border Management Agency Regulation Number 1 of 2015, 2015).

Human security as an approach in the study of state borders. The concept of human security refers to a shift in focus from traditional development and security to a focus on key actors and statistical data. From a development perspective, this concept supports the development objectives implemented which are to improve the lives of the people. There are two visions in this development context, namely: production-oriented development and secondly the concept of human security (Gasper, 2022).

First and foremost is production-oriented development (production-focused development) which places humans more as tools or objects of development. In this case, it would be more productive if prosperity was abundant and the poor received it passively. At that time humans were only considered as a factor of production without paying attention to other people. Second, community-centered development (people-centered development) which emphasizes the importance of community empowerment, especially human capacity to develop all its potential beyond humans (Sudiar & Irawan, 2018). This approach places the community as actors in the development process as part of efforts to resolve development problems through empowerment. The logic behind this model is a balanced human ecosystem, the main source of development is information about creative initiatives that never runs out, and the goal is human development towards optimal reality. This thinking gives individuals a role, not only as objects but as subjects/actors (actors) who determine goals but also control resources and direct the implementation of processes that determine their lives. This concept views humans as subjects who are equal to other subjects in international relations and are no longer in the shadow of state security as in the traditional security model. Furthermore, the concept of human security offers an expansion of the origins and forms of threats, taking into account tangible and intangible threats, objective and subjective threats, as well as direct and indirect threats. More broadly, the concept of human security identifies three types of threats: socioeconomic threats, threats to personal security, and environmental threats.

Second, in the context of border studies, the concept of human security offers an alternative to the human-centred concept of state development, and in the context of discussions related to border issues, this concept can help develop border policies and border development whose orientation can be more directed towards society. Development based on a human security model can complement the discourse on border development, especially for developing countries. Apart from that, this model can also complement the agenda and be a reformer of various national border studies which have been dominated by traditional styles that focus on concepts such as sovereignty, militarization, exploitation of natural resources, and civil rights issues (Gasper, 2022).

Current state security management, especially in border areas, can be based on at least 2 (two) main models, namely the state security approach and human security approach. State security is related to the territorial security of a country, in particular maintaining the sovereignty and integrity of the country through the deployment of military force. State security only covers the political and military fields, where state security can only be achieved if it is strictly protected by the military. At that time the concept of security experienced an expansion in meaning, from state security to personal security or what was called human security (Harmaen Anggayudha & Rafsanjani, 2023).

Human security is starting to become a top priority along with the emergence of social, societal and environmental issues. The need for human security that must be fulfilled is the main source of funding for efforts to maintain national security. This approach emphasizes aspects of human security in a broad sense, especially economic, health and other security. There are 3 (three) approaches in the human security school of thought, namely: (1) an approach based on respect for human rights (2) an approach that emphasizes human security (3) an approach that emphasizes efforts to implement sustainable development (Harmaen Anggayudha & Rafsanjani, 2023)..

The security approach in this paper can be interpreted as an effort to guarantee security and protection, namely creating conditions in waters under national jurisdiction that are controlled and can be controlled in the dimension of state security and the dimension of protecting human security. National security is measured by

indicators of maintaining national sovereignty and integrity, aspects of human security, in particular: (1) an approach that emphasizes rights (2) an approach that emphasizes human security (3) an approach that emphasizes sustainable development efforts.

2.3 Prosperity Approach

The prosperity approach is an effort based on the development of economic and commercial activities to improve the prosperity of people in border areas. The development of economic and commercial activities aims to produce better products and goods for each border region and its surroundings. The prosperity approach is mainly reflected in the development of cities and villages in border areas, which then grow into engines of growth for border areas. The prosperity approach is a logical consequence of the new paradigm of border area development, which changes the direction of "inward" and "outward" development policies, so that border areas can be used as gateways to the economy, life and trade with neighboring countries. (Nugroho et al., 2019).

In order for border areas to become "gateways for trade" between countries, they must be supported by the provision of facilities and infrastructure, for example a road network system that connects them with the growth centers of neighboring countries, adequate electricity networks, sufficient water, telecommunications, transportation, ports, markets, etc. etc. The aim of border management is to make border areas into areas that are competitive, advanced, prosperous, independent and prosperous by supporting their capabilities and strengths to guarantee the territorial integrity and sovereignty of the Republic of Indonesia (Sariguna Johnson Kennedy et al., 2018).

The social approach refers to the satisfaction of individual needs, including basic, secondary and higher or additional needs. People are expected to obey and comply with the law and not take many actions that violate the rules as long as their survival needs are met to maintain the stability and security of society. Logically, the stability of social security cannot be guaranteed if people continue to suffer from hunger, lack of clothing, lack of beds and rest. The government must also strive for the secondary and tertiary needs of society, such as education, health and employment. The level of education and public health actually supports the implementation of public order and security, which in the end can create jobs through sustainability. Socio-economic development as an effective tool for fostering social peace in terms of prosperity (Sudiar & Irawan, 2018; Troshin et al., 2019).

Empirical indicators that can be used as a reference for the high and low levels of social prosperity in society can be adapted as follows: physiological needs, safety security, valued individual activities, ownership relationships, competence and self-esteem (Khumairah & Julia, 2023). The overall level of social prosperity of communities in Indonesia's border areas is an illustration or reflection of these four criteria.

2.4 Environmental Approach

Currently, environmental issues have become an important variable in the world of industry, institutions and development in general. Environmental sustainability can be described as complete and reliable interaction with the environment to end the exploitation and degradation of natural resources and build a more positive relationship with the environment. Environmental sustainability measures have helped meet the needs of the world's current population without sacrificing the benefits that can be gained from meeting the needs of future generations (Ashraf et al., 2019).

Economic development, social development and environmental protection are important elements of sustainability. Companies or organizations need to include the environment as a foundation in short-term and long-term strategies for sustainable development. Besides that, organizations can provide an environmentally friendly environment to the community (Ahmed et al., 2021).

Furthermore, Ashraf (2019) explains that strategies, policies and institutions to conserve, protect and enhance natural resources must be strengthened to provide a supportive environment and must be based on the specific resource constraints faced in certain locations. Environmental sustainability is very necessary in sustainable development related to the complex interactions between the environment and development. This is relevant and an important note for development in border areas that have these characteristics.

2.5 Security Approach, Security Approach, and Environmental Approach to Regional Development

Border area development orientation does not only require a single approach. A security approach alone will not be able to overcome other problems regarding prosperity which may continue to lead to unresolved border issues. Likewise, developing the economic sector without paying attention to security issues will continue to maintain the possibility of illegal economic and social activities from neighboring countries. If these two things are implemented together, they will have a good impact on the border area. However, a blue economy and a green economy that pay attention to environmental issues will have a positive impact on sustainable development and a positive image in national development, especially in border areas. Therefore, it is necessary to combine these three approaches in development activities (Syafei et al., 2023).

Development of border areas is a necessity. Several previous studies have shown that development of border areas should be carried out using three approaches. These three approaches are the security approach, prosperity approach, and environmental approach. Balanced and sustainable development between socio-economic, security and environmental aspects must be a development principle and the main basis for consideration of all sectors and regions to ensure the sustainability of the development process in border areas. Thus, a deeper approach to security, prosperity and the environment in developing border areas is a necessity (Fitri et al., 2017; Solheim & Azevedo, 2018; Sudiar & Irawan, 2018).

3. Research Hypothesis

Based on the research problem and literature review analysis, the following research hypothesis can be formulated:

H1: There is a significant influence between security, prosperity, and environmental approaches simultaneously on the development of border areas on Sebatik Island

H2: There is a significant influence between security, prosperity, and environmental approaches simultaneously on the development of border areas in Miangas

4. Method

The research was carried out using a mixed approach, namely quantitative and qualitative methods. A mixed approach is used with the aim of combining the advantages of qualitative and quantitative methods in one research in the hope of achieving a more comprehensive and in-depth understanding of the phenomenon or research problem (Creswell & Creswell, 2018). Quantitative methods were used to research the analysis of the influence of security, prosperity, and environmental approaches on the development of border areas in Sebatik and Miangas. Next, qualitative analysis is used to analyze development strategies for border areas in Sebatik and Miangas and their differences.

Mixed method research in the two regions was carried out with research respondents being regional government employees in the two border regions as well as TNI officers in the two regions for quantitative research. The number of research respondents was 170 people. Meanwhile, the data for qualitative research with data sources are the sub-district head, sub-district head and base commander in the two regions, 3 people each, so there are a total of 6 research subjects.

Quantitative research in the form of multiple regression analysis to determine the influence of security, prosperity and environmental approaches on the development of the Sebatik and Miangas border areas. Next, qualitative research was carried out to obtain an analysis of the concept of regional development on the Sebatik border and Miangas border areas. Next, the results of the quantitative and qualitative analysis are compared. The comparison results are research findings on border area development in Sebatik and Miangas.

Furthermore, the research steps can be presented in the research flow diagram presented as follows.

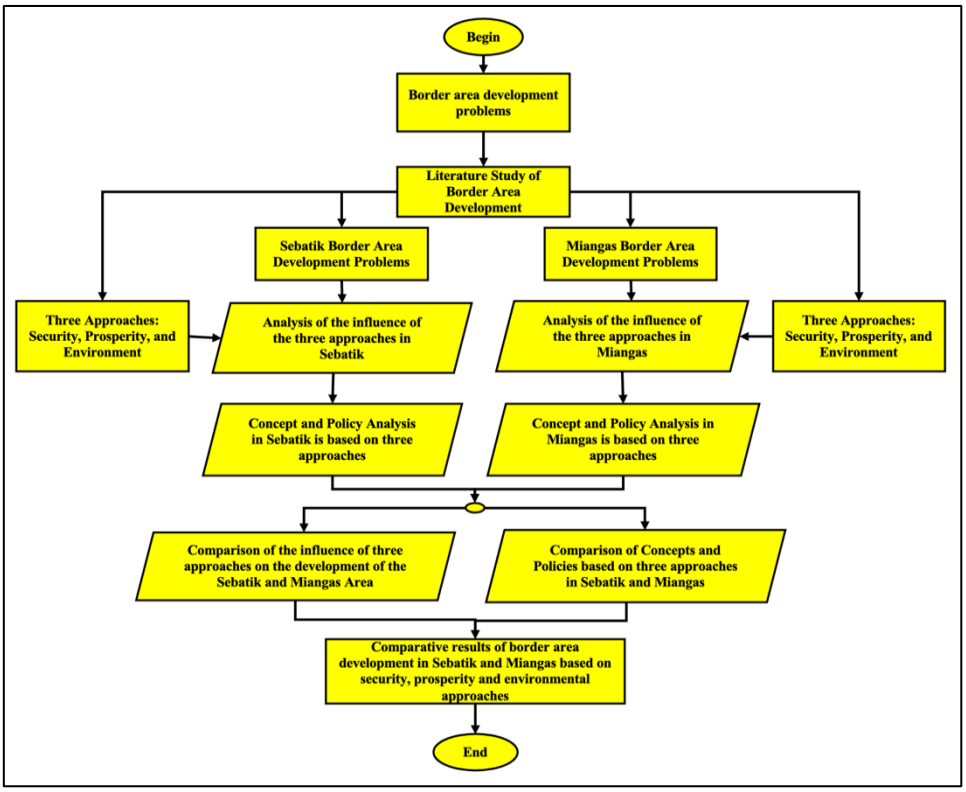


Fig 1: Research Flow Diagram

5. Results And Discussion

5.1 Description of Research Respondents

The respondents for this research consisted of security forces at the Sebatik – Tawau and Miangas – Davao borders. In detail, the identification of respondents in the two research areas can be presented in the following table.

Table 1: Identification of respondents based on official institutions

Respondent Identification			
SEBATIK		**Miangas**	
Military	Civilian	Military	civilian
64	11	60	35

Source: primary data processed by researchers in 2023

5.2 Classic Assumption Tests

A. Normality Test

Based on the results of SPSS Ver. 20.00 indicates that the normality test was carried out using the one sample Kolmogorov-Smirnov test, below.

Table 2: One-Sample Kolmogorov-Smirnov Test for the Sebatik and Miangas Border Area

	Sebatik				**Miangas**			
	X1	**X2**	**X3**	**Y**	**X1**	**X2**	**X3**	**Y**
N	75	75	75	75	95	95	95	95
Test Statistics	0.094	0.080	0.100	0.086	0.093	0.057	0.093	0.095
Asymp. Sig. (2-tailed)	0.166	0.200	0.062	0.200	0.066	0.200	0.064	0.051

Source: Data processed with SPSS version 20.00

The table shows the results of the Sebatik Area Data Normality test, for regional development with a significance probability of 0.200 > 0.05 meaning normal data, security approach variables with a significance probability of 0.166 > 0.05 meaning normal data, and prosperity approach variables with a significance probability of 0.200 > 0 .05 means normal data and environmental approach variables with a significance probability of 0.062> 0.05 means normal data.

The table shows the results of the Miangas Region data normality test, for regional development with a significance probability of 0.0521 > 0.05 meaning normal data, a security approach variable with a significance probability of 0.066 > 0.05 meaning normal data, and a prosperity approach variable with a significance probability of 0.200> 0.05 means normal data and an environmental approach variable with a significance probability of 0.064> 0.05 means normal data.

B. Autocorrelation Test

Based on the results of SPSS Ver. 20.00 shows that the autocorrelation test is as follows.

Table 3: Autocorrelation Test for Sebatik and Miangas Data

Model Summary - Sebatik					Model Summary - Miangas				
R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin - Watson	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin - Watson
0.842	0.710	0.697	14.226	2.098	0.812	0.660	0.648	12.190	2.029

Source: Data processed with SPSS version 20.00

From the SPSS 20.00 processing results, a DW value of 2.098 was obtained. This value will be compared with the table value with a significance value of 5%, a sample size of 75 (n) and a number of independent variables of 3 (k=3), a dL value of 1.54 and dU were obtained. of 1.71, with this we get 4-dU = 2.29. Because the DW value is 2.098, which is in the area between dU and 4-dU (1.71<2.098<2.29), it can be concluded that there is no autocorrelation.

From the SPSS 20.00 processing results, it can be seen in table 5.9 that the DW value is 2.029. This value will be compared with the table value with a significance value of 5%, the sample size is 85(n) and the number of independent variables is 3 (k=3), the dL value is 1. .57 and dU is 1.72, with this we get 4-dU = 2.28. Because the DW value is 2.029 which is in the area between dU and 4-dU (1.72<2.029<2.28), it can be concluded that no autocorrelation occurs.

C. Heteroskedasticity Test

Based on the results of SPSS Ver. 20.00 shows that the homoscedasticity test is as follows:

From the scatterplot graph below, it can be seen that the points are spread randomly and are spread both above and below the number 0 on the Y axis. It can be concluded that heteroscedasticity does not occur in the regression model, so the regression model is suitable for use to predict the development of border areas in Sebatik, and Miangas based on the independent variable input of security, prosperity and environmental approaches.

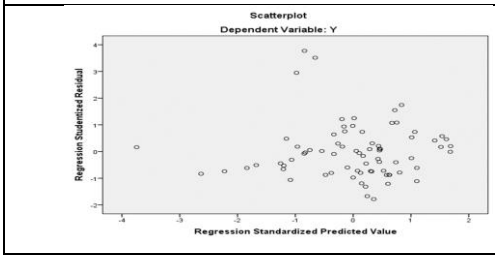
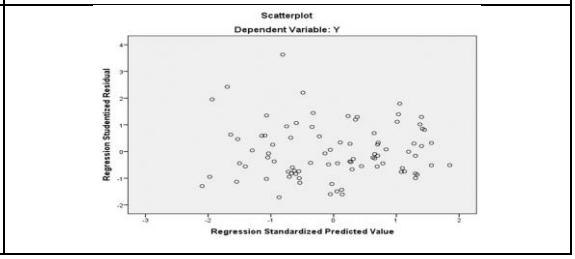
SEBATIK	MIANGAS
	

Fig 2: Heteroskedasticity Test

Source: Data processed with SPSS version 20.00

D. Multicollinearity Test

Table 4: Multicollinearity test of Sebatik and Miangas data

	Sebatik		**Miangas**	
	Collinearity Statistics		**Collinearity Statistics**	
	Tolerance	**VIF**	**Tolerance**	**VIF**
Constant				
X1	0.383	2,611	0,511	1,957
X2	0.622	1,608	0,482	2,076
X3	0.446	2,242	0,520	1,924

Source: Data processed with SPSS version 20.00

The results of the analysis in the table above show that the security approach variable has a VIF value = 2.611 and a Tolerance value = 0.383. The prosperity approach variable has a VIF value = 1.608 and a Tolerance value = 0.622, the environmental approach variable has a VIF value = 2.242 and a tolerance value of 0.446

Thus, based on the data from the analysis in the table and the conditions for the multicollinearity test, it is known that the three independent variables have a VIF value of less than 10, and a Tolerance value of more than 0.1. This means that the three independent variables do not have multicollinearity problems.

The results of the analysis in the table above show that the security approach variable has a VIF value = 1.957 and a Tolerance value = 0.511. Prosperity approach variable with VIF value = 2.076 and Tolerance value = 0.482, environmental approach variable with VIF value = 1.924 and tolerance value 0.520

Thus, based on the data from the analysis in the table and the conditions for the multicollinearity test, it is known that the three independent variables have a VIF value of less than 10, and a Tolerance value of more than 0.1. This means that the three independent variables do not have multicollinearity problems.

5.3 Regression Analysis of X1, X2 and X3 against Y

Multiple linear regression is used to test the influence of more than one independent variable on the dependent variable. In the table below are the results of multiple linear regression analysis.

Table 5: Multiple Linear Regression Analysis for the Sebatik and Miangas regions

	Coefficients (Sebatik Island)					Coefficients (Miangas)				
	Unstandardized coefficients		Standardized Coefficients			Unstandardized coefficients		Standardized Coefficients		
	B	Std. Error	Beta	T	Sig.	B	Std. Error	Beta	T	Sig.
Constant	21,017	8,995		2,337	0,022	31,131	7,045		4,419	0,000
X1	0,305	0,119	0,262	2,556	0,013	0,284	0,086	0,295	3,315	0,001
X2	0,503	0,079	0,514	6,396	0,000	0,384	0,085	0,415	4,528	0,000
X3	0,233	0,113	0,196	2,068	0,042	0,219	0,086	0,223	2,532	0,013

Source: Data processed with SPSS version 20.00

Based on table 5, the regression line equation can be seen from column B in the Sebatik and Miangas data. Sebatik data shows the results of regression processing with values: Parameter Constant = 21.017; X1 = security approach parameter = 0.305; X2 = prosperity approach parameter = 0.503; and X3 = environmental approach parameters = 0.233.

Thus, the multiple linear regression equation for the influence of the security approach, prosperity approach and environmental approach on the development of the Sebatik border area is: $Y= 21{,}017 + 0{,}305X_1 + 0{,}503X_{2+} 0{,}233X_3$.

Based on this equation, it can be explained that:

1. A constant of 21.017 means that if security, prosperity and environmental approaches are not considered or do not exist, then the development value of the Sebatik area is 21.017.
2. Coefficient X1 = 0.305, meaning that if security approach increases by one unit, then the development of the Sebatik area increases by 0.305 units. This increase occurred on the assumption that other independent variables had fixed values.
3. Coefficient X2 = 0.503, meaning that if prosperity approach increases by one unit, then the development of the Sebatik area increases by 0.503 units. This increase occurred on the assumption that other independent variables had fixed values.
4. 4) Coefficient X3 = 0.233, meaning that if environment approach increases by one unit, then the development of the Sebatik area increases by 0.233 units. This increase occurred on the assumption that other independent variables had fixed values. Regresi linear berganda digunakan untuk menguji pengaruh lebih dari satu independent terhadap variabel dependent variable.

In the table below are the results of multiple linear regression analysis. To create a regression line equation, you can look at column B. Constant = 31.131, X1 = security approach = 0.284, X2 = prosperity approach = 0.384, X3 = prosperity approach = 0.219. This means that the multiple linear regression equation is: $Y= 31{,}131 + 0{,}284X_1 + 0{,}384X_{2+} 0{,}219X_3$

1. The constant is 31.131, meaning that if the security, prosperity and environmental approach has a value of 0 then the development value of the Miangas area is 31.131.
2. Coefficient This increase occurred on the assumption that other independent variables had fixed values.
3. Coefficient This increase occurred on the assumption that other independent variables had fixed values.
4. Coefficient X3 = 0.219, meaning that if the environmental approach increases by one unit, then the development of the Miangas area increases by 0.219 units. This increase occurred on the assumption that other independent variables had fixed values.

5.4 Simultaneous Hypothesis Test (F Test)

Hypothesis F test for the Sebatik region and Miangas region according to table 6 below:

Table 6: Simultaneous Test (F Test) for Sebatik and Miangas

Model	Sebatik					Miangas				
	Sum of squares	df	Mean Square	F	Sig.	Sum of squares	df	Mean Square	F	Sig.
Regression	35375.04	3	11791.68	59.29	0.000	24313.38	3	8104.46	55.11	0.000
Residual	14119.67	71	198.87			122059.88	82	147.07		
Total	49494.72	74				36373.26	85			

Source: Data processed with SPSS version 20.00

The results of the simultaneous test (F test) for the Sebatik data show a calculated F value of 59.294. This means that the F count of 59.294 is greater than the F table of 3.07. On the basis of this comparison, H0 is rejected and Ha is accepted or means that together there is an influence between the security approach (X1), prosperity approach (X2) and environmental approach (X3) on the development of the Sebatik area (Y).

The results of the simultaneous test (F test) for Miangas data show a calculated F value of 55.106. This means that the F count of 55.106 is greater than the F table of 3.07. On the basis of this comparison, Ho is rejected and Ha is accepted or means that together there is an influence between the security approach (X1), the prosperity approach (X2) and the environmental approach (X3) towards the development of the Miangas (Y) region.

5.5 The Influence of the Security Approach, Prosperity Approach, and Environmental Approach on the Development of the Sebatik and Miangas Border Areas

Based on the results of the calculations above, it appears that simultaneously the security approach, prosperity approach and environmental approach to the development of border areas in Sebatik and Miangas have a significant positive effect on the development of border areas. This study is in accordance with Presidential Regulation of the Republic of Indonesia Number 118 of 2022 concerning the Master Plan for Management of National Borders and Border Areas for the period 2o2o - 2024. The arrangement of the country's territory is carried out with the support of security, prosperity and environmental aspects. A security approach in the sense that state territory is managed to guarantee the territorial integrity and sovereignty of the state and protect the nation as a whole. A benevolent approach in controlling national territory must provide maximum benefits in improving the prosperity of the people in border areas, as well as being an environmentally friendly approach in accordance with the direction of development in border areas with attention to aspects of environmental sustainability. is a form of sustainable development.

However, the findings in this research are a more detailed explanation of the different influences of each approach in the two regions, although in general they are the same, namely the prosperity approach is more dominant. In the Sebatik area, which borders land and sea with Malaysia, it is 51.6%, and in the Miangas area, which only borders the Philippines, it is 39%. The results of this calculation show that in areas bordering more developed countries, a prosperity approach is more important. Apart from that, maritime borders also have an influence on the need for a higher prosperity approach.

Apart from that, the security approaches in the two regions also show differences. At the Sebatik border it was 24%, and at the Miangas border it was 31.8%. These results indicate that security approaches in areas bordering the sea need to receive more attention. This is possible because there is a possibility of breaking through stronger borders compared to areas with land borders.

Meanwhile, the environmental approach in the Sebatik area was 21.1% and in the Miangas area it was 22.4%. The sustainability of the terrestrial environment needs to receive important attention in the development of border areas compared to maritime border areas which are still free from pollution.

5.6 Qualitative analysis to develop policies and implementation strategies.

The data collected in this research is primary data in the form of data obtained from interviews. This interview was conducted to obtain more in-depth information regarding the development of border areas using a security approach, prosperity approach and environmental approach in the Sebatik and Miangas border areas. The results of these interviews strengthen the data obtained from quantitative research results which state that these three approaches have a significant influence on the development of border areas. If these three approaches are implemented, they will produce optimal regional development. Indeed, with the distinction between land-sea border areas, maritime borders and land borders, the magnitude of the influence is different, so it is hoped that with this research the government will be able to see which priorities are the main points of border area development. At land sea borders, based on the results, it is known that the main priority that must be paid attention to is the prosperity approach, at sea border areas the priority is the security approach and at land borders the government's priority attention is the environmental approach.

In-depth interviews were conducted with expert informants who served in each region so that it was hoped that the results of the interviews could provide an overview of the strategic concepts and efforts that needed to be carried out by the government. Data from interviews acts as primary data, while data from documentation acts as secondary data. Furthermore, in this research, the primary data that has been collected will be triangulated and analyzed, while the documentation data is used to support and complement the observation and interview data.

In this research, researchers conducted interviews with relevant officials, namely Commander Lanal Nunukan/Sebatik, Commander Lanal Melonguane, Subdistrict Head and Head of Sebatik Subdistrict, Head of Miangas Subdistrict, and Subdistrict Head. Qualitative analysis shows that based on the results of interviews, the three border regions require security, prosperity, and environmental approaches for regional development. The results of the analysis are presented in the form of a border area development concept and implementation strategy, which are described below.

5.7 Border Area Development Policy Concept

Referring to quantitative research results, the development of border areas is influenced simultaneously by the security approach, prosperity approach and environmental approach. Apart from that, the results of qualitative data processing show a strengthening of the quantitative research results mentioned above, which are equipped with indicators for each independent and dependent variable as well as indicators of success. Furthermore, based on the results of the interview, the concept of border area development in Sebatik and Miangas is: "Border development is carried out in a holistic, comprehensive, integrated border development system based on security, prosperity and environmental factors thematically and spatially with benchmarks for success, namely productivity, efficiency, and community participation through a combined top down and bottom up system". Holistic in the sense of relating to the whole system in the development of border areas as a whole rather than just a collection of parts. Comprehensive, in the sense that border area development involves not only all parts but also its aspects. Integrative in the sense that it is a combination of security, prosperity and border environmental factors. Thematic in the sense that it suits the potential, needs and challenges of each border area. Spatial in the sense of considering the geographical location of the border area being developed.

Thus, based on the discussion above, border development is carried out in a comprehensive development system including security, prosperity and environmental factors with all aspects in more detail by considering local resources, markets, labor, investment, transportation and communication, government capabilities, and technology in accordance with the characteristics of the potential, needs and challenges of each region as well as the geographic border areas of Sebatik and Miangas with the benchmarks for success being productivity and efficiency as well as higher community participation in a combination of top down and bottom-up.

Diagrammatically, this concept is a strengthening of the research conceptual framework, and to the system the development of border areas is added with its implementation in a holistic, comprehensive and integrated manner. Diagrammatically, the concept of border area development is presented as follows:

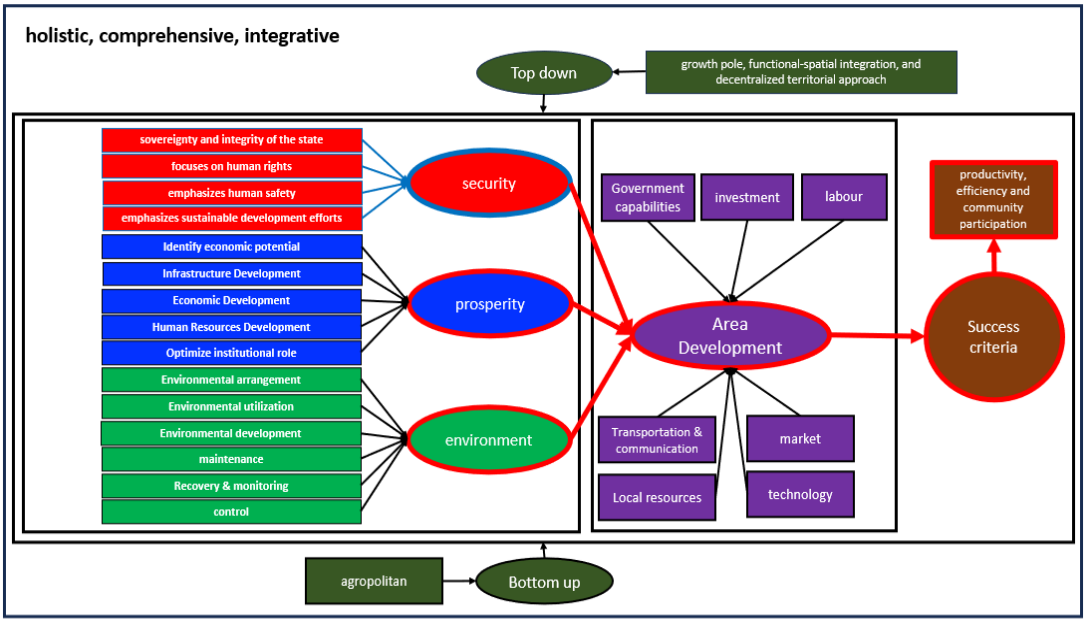


Fig 2: Regional development model on the Sebatik and Miangas Border

5.8 Strategy and efforts to implement Regional Development in Sebatik and Miangas through a Security, Prosperity and Environmental Approach.

The strategy developed is an approach to the security sector in the form of increasing human security, sovereignty and integrity of the state, quality and quantity of guard posts and borders, as well as integrated border management through priority efforts to accelerate the determination of unfinished boundaries, border monitoring with technology, community participation, increase in border crossing posts. This strategy is implemented through the following efforts:

Table 7: Efforts to Implement Security Sector Strategies in Sebatik and Miangas

No	Sebatik	Miangas
1	Settlement of the Indonesia-Malaysia Land Boundary through a joint survey in accordance with the agreement.	Settlement of Indonesia-Philippine Maritime Boundaries through joint surveys in accordance with the agreement.
2	Identification, maintenance and repair of state boundary markers in the land area of Indonesia-Malaysia	Identification and maintenance of terrestrial AIS conditions for monitoring the Infonesia – Philippines boundary.
3	Use of geospatial technology to monitor and secure land border markers so they do not shift	Use of geospatial technology for monitoring and securing maritime borders.
4	Construction of beacon towers and terrestrial Automatic Identification Systems to monitor borders, territorial violations and illegal activities at sea and Long Range Cameras for violations on land	Construction of beacon towers and terrestrial Automatic Identification Systems to monitor maritime traffic, territorial violations and illegal activities at sea
5	Increasing community participation at the border in monitoring land and sea borders.	Increasing community participation at maritime borders in maritime border monitoring.
6	Encourage synergy between community leaders, village government, regional government, TNI, Police, and central government in Defense and Security matters.	Encourage synergy between community leaders, village government, regional government, TNI, Police, and central government in Defense and Security matters.
7	Recruitment of Village border soldiers and Maritime border soldiers as agents of change and agents of development.	Recruitment of maritime border soldiers as agents of change and agents of development.
8	Empowering land border monitoring posts through the use of technology to reduce violations.	Empowerment of maritime border monitoring posts through the use of technology to reduce violations.
9	Increased synergy between the TNI, Police, Ministry of Defense, Ministry of Foreign Affairs, and Regional Government to increase land and sea border security	Increased synergy between TNI, Police, Ministry of Defense, Ministry of Foreign Affairs, and Regional Government to increase maritime border security

Implementation of security approach policy strategies in development in Sebatik and Miangas, characterized by:

1. Settlement of the State Boundaries of the Indonesia-Malaysia land area and the Indonesia-Philippine Sea area through joint surveys in accordance with the agreement.
2. Identification and maintenance of boundary benchmark conditions in Sebatik for monitoring the Indonesia-Malaysia boundary, as well as terrestrial AIS in Miangas for monitoring the Indonesia-Philippine boundary.
3. Use of geospatial technology to monitor and secure land and sea borders in Sebatik and sea borders in Miangas.
4. Construction of a beacon tower and terrestrial Automatic Identification System to monitor sea traffic, territorial violations and illegal activities at sea in the Sebatik and Miangas areas, as well as long range cameras for violations in the land area of Sebatik.
5. Increase community participation at land and sea borders in Sebatik and sea borders in Miangas.
6. Encourage synergy between community leaders, village government, regional government, TNI, Police and central government in Defense and Security matters.
7. Recruitment of Babinsa and Babinpotmar soldiers in Sebatik and Babinpotmar in Miangas as agents of change and agents of development.

8. Empowerment of land and sea border monitoring posts in Sebatik and sea in Miangas through the use of technology to reduce violations.
9. Increased synergy between the TNI, Polri, Ministry of Defense, Ministry of Foreign Affairs and Regional Government to increase land and sea border security in Sebatik, sea borders in Miangas.

5.9 Prosperity approach

The strategy developed in the prosperity sector approach is through increasing synergy and collaboration between institutions, developing human resources, strengthening the social conditions of the community, as well as increasing the quality and quantity of infrastructure with priority efforts being through improving the function of border posts, transportation, education, health and basic needs facilities. other. In detail, this strategy is implemented through efforts:

Table 8: Efforts to Implement Prosperity Strategies in Sebatik and Miangas

No	Sebatik	Miangas
1	Improved cross-border postal facilities to become an export gateway to Tawau - Malaysia to improve the prosperity of the surrounding community.	Improved facilities at the border as an export gateway to Davao - Philippines to improve the prosperity of the surrounding community.
2	Development of markets around border crossing posts and border areas that are larger than markets in Tawau, Malaysia with competitive prices.	Development of a market in Miangas that is larger than a similar market in Davao, Philippines with competitive prices.
3	Development of hospitals and hospital supporting facilities equivalent to hospitals in Tawau, Malaysia.	Development of hospitals and hospital supporting facilities equivalent to hospitals in Davao, Philippines.
4	Development of land transportation facilities to surrounding areas to facilitate the flow of mobility of people and goods to nearby areas.	Development of sea transportation facilities by increasing the frequency of fast boats visiting Miangas.
5	Increase the frequency of flights to and from the nearest airport for transportation of people and goods to improve the economy and social interaction.	Increasing the frequency of pilot aircraft with +30 passengers for transportation of people and goods to improve the economy and social interaction.
6	Development of vocational education according to regional needs with full scholarships from the government with majors in fisheries and trade.	Development of vocational education according to regional needs at full government expense with majors in fisheries and trade.
7	Development of a fish processing industry to add value to fishing results and ship employees from vocational school graduates in Sebatik.	Development of a fish processing industry directly on ships to add value to fishing results and employees from vocational school graduates in Miangas.
8	Development of solar electricity supply to increase electrification and help the economy.	Development of solar electricity supply to increase electrification and help the economy.
9	Increased synergy between Regional Government, Border Area Management Agency, and Central Government for community development and empowerment in Sebatik	Increased synergy between the Regional Government, Border Area Management Agency, and Central Government for community development and empowerment in Miangas

Implementation of the prosperity approach policy strategy in development in Sebatik and Miangas, characterized by:

1. Improved facilities at the border as export gateways to Tawau - Malaysia and Davao - Philippines to improve the prosperity of local communities.
2. Development of a market in Miangas that is larger than similar markets in Tawau and Davao, Philippines with competitive prices.

3. Construction of hospitals and hospital supporting facilities that are equivalent to hospitals in Tawau, Malaysia and Davao, Philippines.
4. Development of land and sea transportation facilities in Sebatik and sea transportation in Miangas by increasing the frequency of fast boats visiting Miangas.
5. Increase the frequency of flights to Sebatik and pilot aircraft with +30 passengers to Miangas for transportation of people and goods to improve the economy and social interaction.
6. Development of vocational education according to regional needs at full government expense with majors in fisheries and trade. In Sebatik, vocational education is up to higher education, while in Miangas, vocational education is at vocational school level.
7. Development of a processing industry in Sebatik and processing of fish directly on ships for Miangas, in order to obtain added value from fishing and employees from vocational school graduates in Sebaitk and Miangas.
8. Development of solar power supply to increase electrification and help the economy in Sebatik and Miangas.
9. Increased synergy between the Regional Government, the Border Area Management Agency and the Central Government for development by empowering communities in the Sebatik and Miangas border areas in accordance with the characteristics of their respective regions.

5.10 Environmental Approach

The strategy developed in the environmental sector approach is empowering local culture and maintaining the condition of the environmental ecosystem with priority implementation on increasing environmental attention through empowering local culture and environmental sustainability in development. This strategy can be implemented through different efforts in both regions, as follows:

Table 9: Efforts to Implement the Environmental Approach Strategy in Sebatik and Miangas

No	Sebatik	Miangas
1	Development of a market for trade in native Sebatik agricultural products with attention to natural sustainability.	Market development, especially for trade in native Miangas agricultural products with attention to natural sustainability.
2	Increasing Batu Lamampu beach tourism is environmentally based, targeting tourists from within the country and from Tawau, Malaysia.	Increasing marine tourism in accordance with local Mana'mi culture to increase income and community pride by paying attention to marine sustainability.
3	Development of a fish processing industry that pays attention to the marine ecosystem so that it remains sustainable and the community prosperous.	Development of a fish processing industry (fish processing vessels) that pays attention to the marine ecosystem so that it remains sustainable and the community prosperous.
4	The construction of boundary markers, terrestrial AIS and beacon towers still pay attention to environmental sustainability so that they remain sustainable.	The construction of terrestrial AIS and beacon towers still pay attention to environmental sustainability so that they remain sustainable.
5	The construction of border posts also needs to pay attention to the preservation of the surrounding environment.	Construction of a terrestrial AIS guard post while maintaining the preservation of the coastal environment.

Implementation of the environmental approach policy strategy in development in Sebatik and Miangas, characterized by:

1. Similarities in environmentally sound market development.
2. Differences in marine tourism models. In Sebatik there is beach tourism, while in Miangas there is fishing tourism, both of which are environmentally friendly.

3. Development of the fish processing industry remains based on environmental sustainability. The difference between the two is that in Sebatik the fish processing industry is on land and in Miangas it operates using fish processing vessels.
4. Development of land and sea border security monitors paying attention to environmental sustainability.
5. Construction of a land border post in Sebatik and a coast guard post in Miangas, paying attention to environmental sustainability.

6. Conclusion

The findings in this research are a more detailed explanation of the differences in the influence of each approach in the two regions, although in general they are the same, namely the prosperity approach is more dominant, followed by the security approach and finally the environmental approach. In the Sebatik region, which borders land and sea with Malaysia, it is 51.6%, and in the Miangas region, which only borders sea with the Philippines, it is 39%. Apart from that, the security approach in the two regions also shows differences. At the Sebatik border it was 24%, and at the Miangas border it was 31.8%. These results indicate that security approaches in areas bordering the sea need to receive more attention. Meanwhile, the environmental approach in the Sebatik area was 21.1% and in the Miangas area it was 22.4%. The sustainability of the terrestrial environment needs to receive important attention in the development of border areas compared to maritime border areas which are still free of pollution.

Border area development in the two Sebatik and Miangas border areas is able to apply the same multiagency single task concept, although the implementation policies are slightly different. Border development is carried out in a holistic, comprehensive, integrated border development system on security, prosperity and environmental factors thematically and spatially with benchmarks for success, namely productivity, efficiency and community participation through a combined top down and bottom-up system. Border development is carried out in a comprehensive system including security, prosperity and environmental factors with all aspects in more detail by considering local resources, markets, labor, investment, transportation and communication, government capabilities and technology according to potential characteristics, needs, and the challenges of each region and geography of the border areas of Sebatik, and Miangas Islands.

Border area development policies intended for land-sea borders and maritime borders are carried out by developing and realizing a security sector approach in the form of increasing border security through accelerating the determination of unfinished boundaries, monitoring borders with technology, community participation, and improving border crossing posts. The strategy developed in the prosperity approach is through improving the function of border posts, transportation, education, health, and other basic needs facilities. As well as the importance of developing and realizing an environmental approach strategy, namely increasing environmental attention through empowering local culture and environmental sustainability in development. Policy implementation typically differs, especially in terms of land and sea security monitoring posts, development of the fishing industry on land and at sea with fish processing vessels, as well as the environment that must continue to be preserved differently in the land environment and the sea environment.

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