Original Research Article

Stakeholder Participation in Strategic Environmental Assessment of the Detailed Spatial Plan for Manokwari Urban Area, Papua Barat, Indonesia

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ABSTRACT

Regional development as an effort to improve human welfare always has an impact on the environment. Therefore, this research aims to determine stakeholder participation in Strategic Environmental Assessment (SEA) of Detailed Spatial Plan (DSP) for the Manokwari Regency Urban Area. The research was carried out from February to March 2021, whwre the research location in the Manokwari Urban Area which is the location for the delineation of DSP. Data collection was carried out by means of observation, interviews and secondary data studies. Observations were carried out directly during the discussion of SEA documents. The researcher describes in detail about the conditions in the field, human activities and the context in which the activities were held. Interviews were conducted by asking written questions to respondents and using prepared questionnaires. Data was analyzed using a stakeholder analysis approach to ensure aspects, including: a) determining precisely the parties that will be involved; b) guarantee the implementation of the principle of participation; c) guarantee that the results of the DSP document obtain public legitimacy; d) level of stakeholder participation. The research results show that the most dominant form of stakeholder participation is the contribution of input/suggestions and the provision of information/data from stakeholders. This means that there is a willingness and ability of the stakeholders involved to express their opinions scientifically. Stakeholders' willingness to participate can increase motivation to make changes, while the ability to participate is related to human resources and learning abilities.

Keywords: regional spatial planning, Papua, stakeholder participation, regional development, environment

1. INTRODUCTION

City development has a strong correlation with the use of natural resources and the environment [1–3]. Basically, development requires space and utilizes natural resources [4–6], where the utilization of natural resources and the environment generally aims to improve human welfare [7–9].. In development, there is a process ofoptimization, interdependence, and interaction between development components,namely between natural resources, human resources, community values andtechnology. In reality, development always gives rise to paradoxes, one ofwhich is the decreasing quality and carrying capacity of the environment [10,11]. In this case, there is a non-linearrelationship between human needs and natural resources or the environment. Thismeans that the more numerous, varied, and unlimited human needs are, the morelimited nature's ability to provide them is [8,9]. This

non-linear relationship tendency can occur continuously and can hinder economic growth, while environmental capabilities and quality cannot be improved.This means thatchanges in regional space will cause changes in environmental quality, both positive and negative [1,2,12–14].

The natural environment has alimited carrying capacity. Therefore, there needs to be an initiative tointegrate environmental components in development planning. To ensure that the use of regional space does not exceed the carrying capacity, the Manokwari Regency government has prepared a Detailed Spatial Plan (DSP) or *RencanaDetai Tata Ruang (RTDR)* document for Manokwari Urban Area, which is integrated with the Strategic Environmental Assessment (SEA) or *Kajian Lingkungan Hidup Strategis (KLHS)*. SEA is an important aspect that is integrated into thepreparation of development planning in Indonesia (Law No. 26/2007; Law 32/2009). SEAis seen as an instrument in creating a policy formula followed bypolicy implementation through the role of politics in decision-making [15]. SEA is a way to proactively evaluateenvironmental, social, and cultural aspects before a plan or program is implemented [16]. SEA iscarried out to protect the environment and reduce or prevent negative impactsresulting from a development process with active stakeholder involvement [17]. SEA is intended to be a review that isprepared systematically with the involvement of all parties to ensure that theprinciples of sustainable development can become a basis for making policies, plans, and programs [18,19]. Thus, governance andenvironmental assessment are two things that complement each other and cannot be separated [20].

SEA information will be very helpful inmaking sustainable spatial planning and evaluating spatial planning for both land and sea [21].SEAis needed to support regional development so that development in the region runs harmoniously and sustainably, including the Detailed Spatial Plan (DSP) [22,23]. To ensure that space utilization runswell following zoning regulations, stakeholder involvement is neededto monitor space utilization following the established DSP.Stakeholders are all parties whose interests are affected by a planning orpolicy process. The involvement of stakeholders is a mandate of Law No. 26/2007 concerning Spatial Planning Article 65 states that "theimplementation of spatial planning is carried out by the government, byinvolving the community". In addition, based on Law No. 32/2009,SEA is a series of systematic, comprehensive, and participatory analyses toensure that the principles of sustainable development become the basis and areintegrated into the development of a region and/or policies, plans and/orprograms. In general, many SEA communities have stated that publicparticipation is an important and absolute thing to implement in the development planning process [24–27]. Thus, the problem of this researchlies in how are stakeholders involved in the Manokwari Urban SEA-DSP process. This is the research question that will be answered in this article.

2. MATERIAL AND METHODS

2.1 Research Location and Time

This research was carried out from February to March 2021 with the research location in the Manokwari Urban Area which is the location for the DSP delineation. Geographically, the planning area is located at coordinates 133°55'17.07" - 134°8'9.71" East Longitude and 0°48'37" - 1°6'18.08" South Latitude. The delineated area of urban area boundaries is 6,336 ha which is administratively included in the districts of West Manokwari, East Manokwari, and South Manokwari (ATR/BPN, 2019). In terms of population, the three districts have a population of 133,811 people with the largest population being in the West ManokwariDistrict with 95,837 people, which is the urban center of Manokwari (BPS, 2022). The research location can be seen in Figure 1.

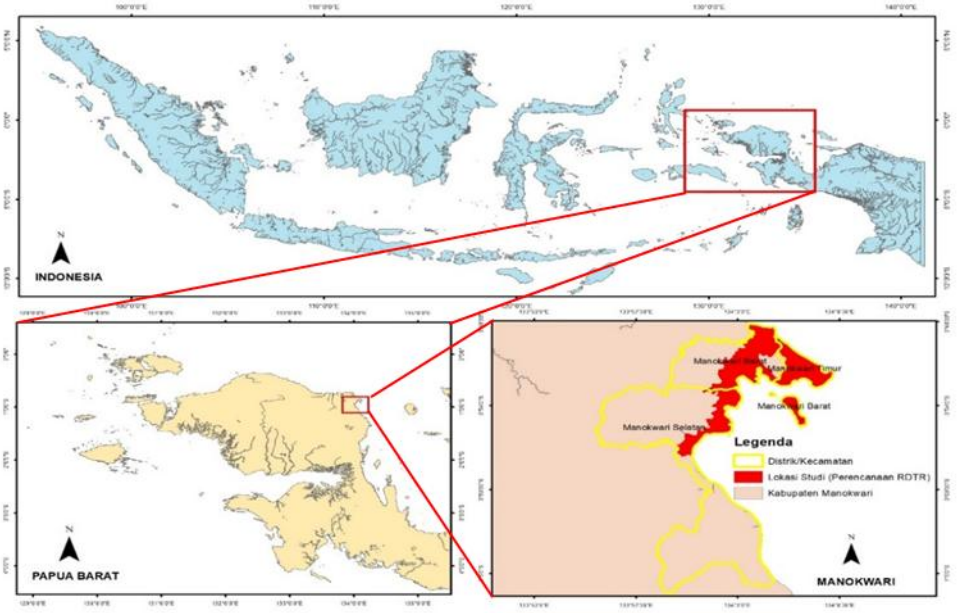

Figure 1. Map of research location

2.2 Data Collection

Data collection was carried out by observation, interviews, and secondary data studies. Data collection by observation was carried out when discussing SEA documents. Researchers describe factually, carefully, and in detail about field conditions, human activities, and the context in which activities are held. Data collection by interview was carried out by asking written questions to respondents and using a prepared questionnaire. Data collection through secondary data studies was carried out through books, pictures, photos, or the like to support the data obtained through observations and questionnaires. Secondary data were obtained through literature studies and related agency work plan documents.

The determination of stakeholders was based on Manokwari Regent's Decree No. 600/190/IX/2019 concerning the Establishment of a SEA-DSPManokwari Urban Area Working Group (POKJA), and a list of attendees during public consultations. Determining stakeholders with FGD is carried out by observing the role of stakeholders together with other stakeholders [28].

2.3 Data Analysis

Stakeholder participation in the SEA-DSP preparation activities for the Manokwari Urban Area was carried out using a Stakeholder Analysis approach through several stages, namely identification of key stakeholders and classification of stakeholders [29]. The involvement of stakeholders in the preparation of the SEA-DSP for the Manokwari Urban Area for 2018–2038 was analyzed to ensure aspects, including: a) determining precisely the parties who will be involved; b) guaranteeing the implementation of the principle of participation; c) guarantee that the results of the 2018–2038 Manokwari Urban Area DSP document obtain legitimacy or acceptance by the public; d) the level of stakeholder participation in conveying information, suggestions, opinions and considerations regarding the environment and sustainable development through the SEA implementation process.

3. RESULTS AND DISCUSSION

Stakeholder participation included three important meetings, namely: Public Consultation Phase I, Public Consultation II, and Quality Assurance and Documentation. Analysis of forms of stakeholder participation aims to determine the forms of stakeholder participation, in this way the value of participation will be known. The value of participation lies not only in whether they participate but also in the type of participation that is appropriate for the various issues being discussed. In this case, it is emphasized the importance of recognizing classifications or types and forms of community participation. By knowing the type of participation, efforts can be made to address environmental problems appropriately.

3.1 Stakeholder Participation in Public Consultation Phase I

Participation activities can be identified in various forms. Forms of participation at the Phase I Public Consultation stage can be in the form of listening, providing input/suggestions, providing information/data, helping to clarify rights to space, and other forms such as a combination of forms of stakeholder involvement. Based on the results of frequency distribution calculations, it can be seen that the forms of stakeholder participation in the preparation of the SEA-DSP for the Manokwari Urban Area, at this stage were mostly in the form of input/suggestion/suggestion contributions totaling 19 with a percentage of 37.2% (Table 1), stakeholders who contributed information data input/suggestions as many as 20 with a percentage of 39.2%, stakeholders as listeners as many as 10 people with a percentage of 19.6%, stakeholders in other forms as many as 2 people with a percentage of 3.9%.There is no form of participation with the help of clarifying Policies, Plans and Programs. Another form intended is that apart from providing input/suggestions, we also provide information and data assistance. The form of stakeholder participation in Phase I Public Consultation is presented in Figure 2.

Table 1. Frequency distribution of stakeholder participation forms in the Phase I Public Consultation

No	Forms of Participation	Frequency	Percentage (%)
1.	Just as a listener	10	19.6
2.	Provide input/suggestions	19	37.2
3.	Provide information/data contributions	20	39.2
4.	Help clarify Policies, Plans, and Programs	-	-
5.	Submitting Objections to Policies, Plans, and Programs	-	-
6.	Another form	2	3.9
		51	**100**

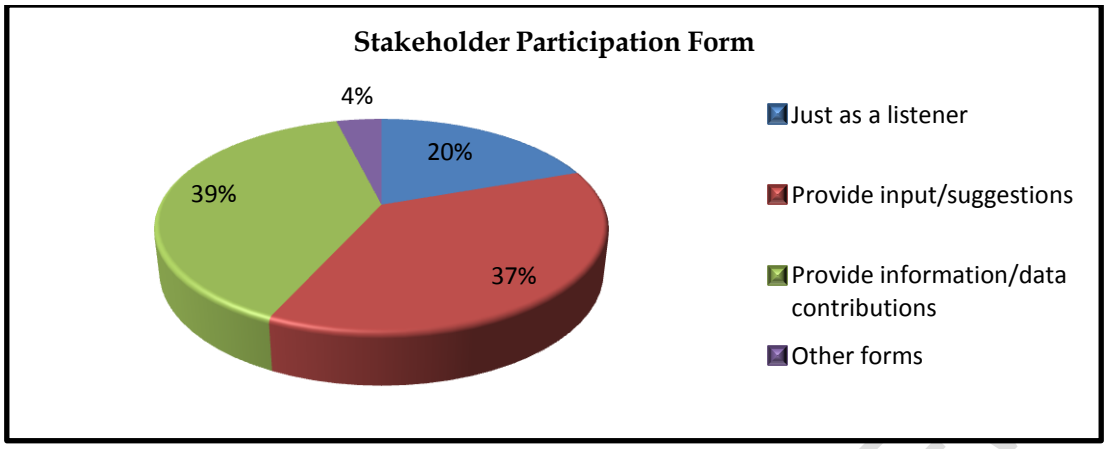

Figure 2 . Diagram of the Form of Stakeholder Participation in the Public Consultation Stage Phase I

With this form of information contribution, stakeholders are given space and a place to express their rights to express existing local potentials. The rights of stakeholders to express their aspirations regarding government policy, the aim is to influence government policy and determine a joint agenda in program planning policies in preparing the SEA DSP document for the Manokwari Urban Area. A responsive planning study is decision-making that is responsive to the preferences and needs of stakeholders, especially communities who are potentially affected if the KRP is implemented. This means that the form of community participation at the first stage of capturing community aspirations is dominated by input/suggestion/suggestions and information/data contributions.

3.2 Stakeholder Participation in Public Consultation Phase II

Forms of participation in Public Consultation Stage II can be seen from the capacity of FGD participants as listeners, the contribution of input/suggestions, the contribution of information/data, assistance in clarifying Policies, Plans, and Programs (KRP), and other forms, namely a combination of the forms mentioned above. Based on the results of frequency distribution calculations, it can be seen the forms of community participation in the preparation of the SEA-DSP for the Manokwari Urban Area, at this stage most of them were in the form of input/suggestions from 20 people (39.2 %). Then followed by other forms of 4 people (7.8%), information/data contributions of 18 people (35.2%), 9 people as listeners (17.6%), and none in the form of assistance in clarifying the KRP. The form of stakeholder participation at the stage of capturing community aspirations is dominated by input/suggestion/suggestions and information/data contributions (Table 2 and Figure 3).

Table 2. Frequency Distribution of stakeholder participation forms in the Phase II Public Consultation

No	Forms of Participation	Frequency	Percentage (%)
1.	Just as a Listener	9	17.6
2.	Provide input/suggestions	20	39.2

3.	Provide information/data contributions	18	35.2
4.	Help clarify KRP	-	-
5	Submission of objections to the KRP	-	-
6.	Another form	4	7.8
		51	100

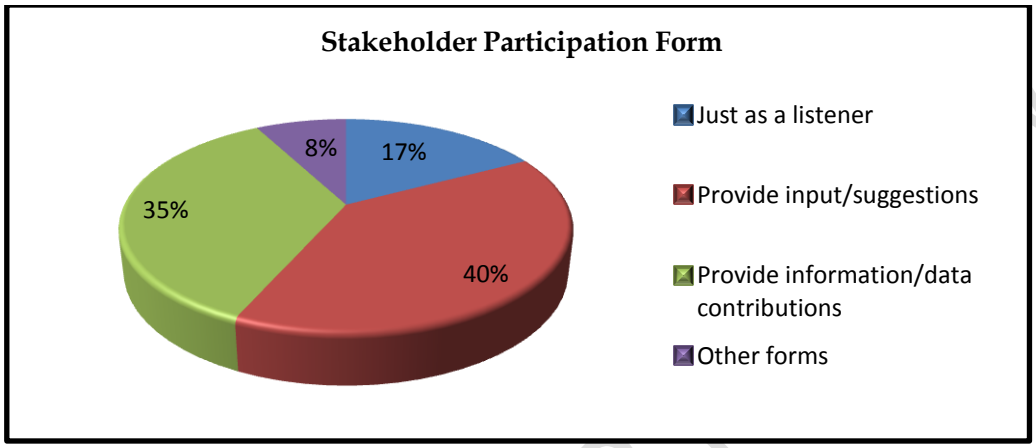

Figure 3 . Forms of Stakeholder Participation in the Public Consultation Stage Phase II

3.3 Community Participation in the Quality Assurance and Documentation Phase

The forms of stakeholder participation at the quality assurance and documentation stage consist of being a listener, contributing input/suggestions, donating information/data, helping to clarify the quality of the KRP, submitting objections to the quality of the KRP, and other forms (a combination of the forms that have been mentioned above). Based on the results of frequency distribution calculations, it can be seen that the forms of stakeholder participation in the preparation of the SEADSP Document for the Manokwari Urban Area, at this stage most of them are still in the form of input/suggestions as many as 16 people (31.7%). Then followed by donations of information/data by 17 people (33.4%), other forms by 6 people (17.1%), as listeners by 4 people (7.8%), and assistance in clarifying KRP by 5 people (9 people). 8 %), and 1 person (2.8 %) submitted an objection to quality. In this case, what is meant by other forms is in the form of providing input/suggestions as well as providing information/data. Calculation of frequency distribution is shown in Table 3 and Figure 4. Stakeholder participation in the Quality Assurance and Documentation Stage is dominated by input/suggestion forms and information/data contributions. This means that stakeholders place greater emphasis on the quality of data used in strategic environmental analysis.

Table 3 . Frequency Distribution of Forms of Stakeholder Participation at the Quality Assurance and Documentation Stage

No	Forms of Participation	Frequency	Percentage (%)
1.	Just as a listener	4	7.8
2.	Provide input/suggestions	16	31.7
3.	Provide information/data contributions	17	33.4

4.	Help clarify (Policies, Plans and Programs (KRP)	5	9.8
5.	Filing of Quality Objections	1	2.8
6	Another form	6	17.1
		51	100

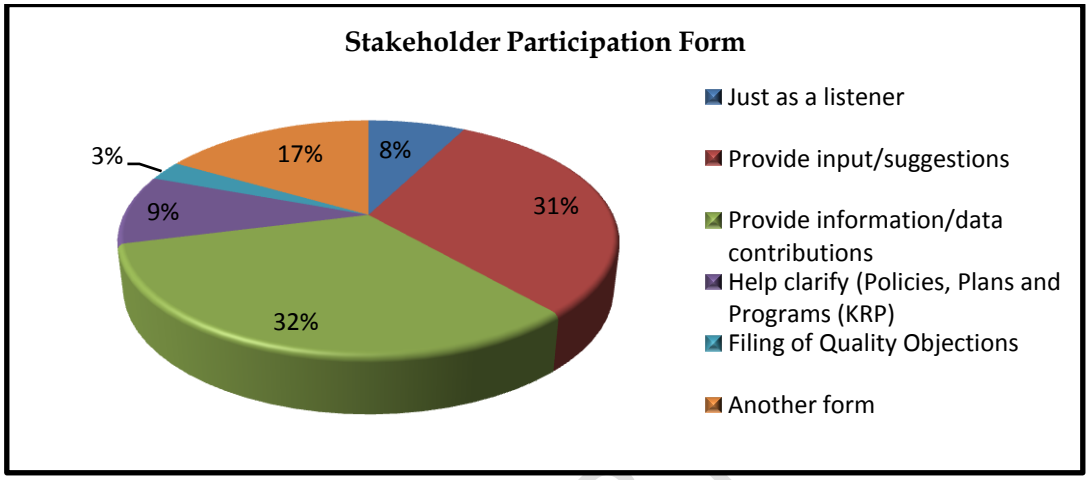

Figure 4 . Diagram of Stakeholder Participation Forms at the Quality Assurance Stage

3.4 Forms of Stakeholder Participation at All Stages

The results of the analysis of the forms of stakeholder participation in the Public Consultation Phase I, Public Consultation Phase II, and the Quality Assurance and Documentation Stage, show that overall stakeholder participation is in the form of providing input and ideas as well as providing data (Table 4 and Figure 5).

Table 4 .SEADSP Stakeholder Participation in the Manokwari Urban Area

No	Form	Public Consultation I		Public Consultation II		Quality Assurance and Documentation		Average	
		N	%	N	%	N	%	N	%
1.	Listener	10	19.6	9	11.4	4	7.8	7	13.7
2.	Contributions/Suggestions	19	37.2	20	51.4	16	31.7	18	35.2
3.	Information Contribution/ Data	20	39.2	18	14.2	17	33.4	18	35.2
4.	Help clarify KRP	-	-	-		2	3.9	2	3.9
5.	Submission of objections to the KRP	-	-	-		2	3.9	2	3.9
6.	Another form	2	3.9	4	7.8	6	17.1	4	7.8

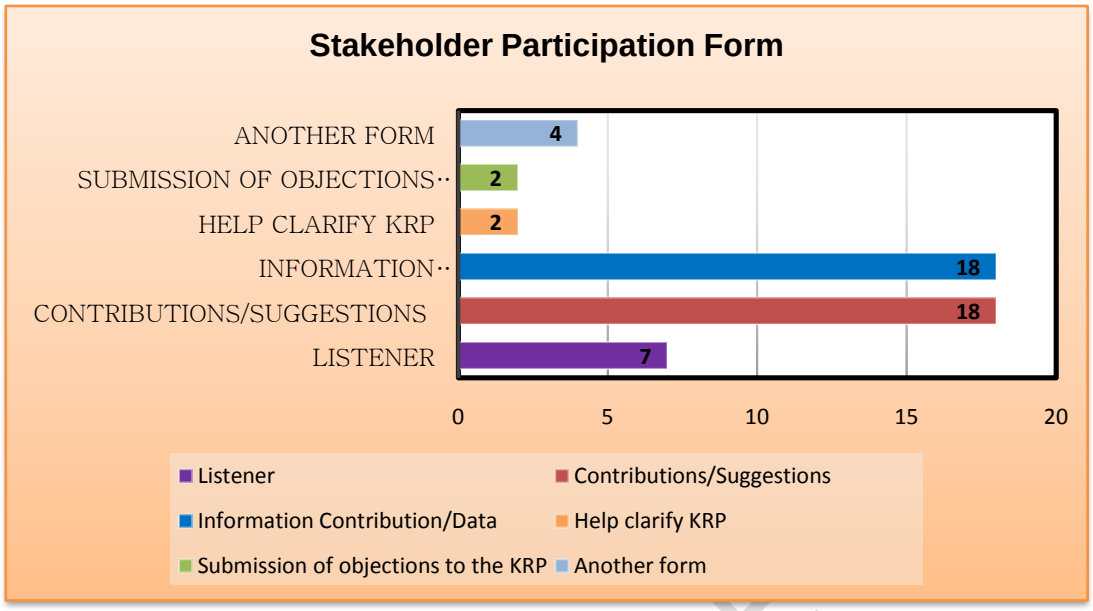

Figure 5. Diagram of Average Forms of Stakeholder Participation at All Stages

Theform of stakeholder participation at all stages is in principle the same as ateach stage. The most dominant forms of participation are contributions ofinput/suggestionsand contributions of information/data. This isbecause every participant who provides suggestions is alsoconfirmed by providing data, followed by being a listener and other forms. Thiscondition shows that the majority of stakeholders involved in preparing the SEA-DSP for the Manokwari Urban Area contributed input, suggestions, and provisionof information. This means that there is a willingness and ability of thestakeholders involved to express their opinions scientifically. Stakeholderswillingness to participate can increase motivation to make changes, while theability to participate is related to human resources and learning abilities. Thismeans that cooperation between stakeholders the provision of data and theirinvolvement in all preparation processes will strengthen the legitimacy of thedocuments being prepared. This process is also a smart practice from severalcountries and sectors in applying environmental issues to development planningdocuments [24–28,30–36]

By contributing input, it means that participation has provided community space and capacity to fulfill stakeholder needs and rights, as well as develop local potential and initiatives. The rights and actions of stakeholders to express aspirations for government policy can influence government policy and determine a joint agenda for preparing SEA DSP for the creation of sustainable development. In this case, stakeholder participation is used as a communication tool, namely a tool to obtain input in the form of information in the decision-making process, so that responsive decisions can be realized.

Meanwhile, from respondents' answers to open questions about proposed forms of participation, it can be seen that apart from the above forms of participation, respondents also proposed other forms such as identifying stakeholder needs, contributing considerations, collaborating in preparation, and assistance from experts from the local community. This situation shows that apart from contributing input, respondents also hope

for a form of cooperation between the community and the government in preparing spatial planning plans and also for assistance from experts from the community.

4. CONCLUSION

1) Community participation in the process of preparing the SEA-DSP for the Manokwari Urban Area is a form of input/suggestion contribution and information/data contribution.
2) The contribution resulting from the community participation process in preparing the SEA-DSP is accommodated by integrating it into the resulting spatial planning product.
3) Stakeholder participation policy in preparing the SEA-DSP for the Manokwari Urban Area, in practice there are still several differences with the normative. The differences lie in the nature of community involvement, the media used to provide information, and the short period of time for providing input from the community.

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