

ANALYSIS OF REGIONAL LEADING SECTORS AS A BASIS FOR DETAILED SPATIAL PLANNING (RDTR) WEST SUMBA REGENCY

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ABSTRACT

This study aims to analyze the structure and classification of economic sectors in West Sumba Regency, examine the utilization of leading sectors as a basis for the preparation of the Detailed Spatial Planning (RDTR), and formulate policy directions for the development of leading sectors in supporting regional spatial planning. The study employed a quantitative descriptive approach using the Klassen Typology analysis method based on sectoral growth rates and contributions to the Gross Regional Domestic Product (GRDP). The data used consisted of secondary data, including the GRDP of West Sumba Regency for the period 2020–2024, RPJMD, RKPD, RPJPD documents, and regional regulations related to regional development. The results indicate that the economic structure of West Sumba Regency is still dominated by the agriculture, forestry, and fisheries sector. However, several leading sectors possess significant potential to drive regional economic growth, including wholesale and retail trade, manufacturing industry, financial and insurance services, real estate, and educational services. Based on the Klassen Typology analysis, the economic sectors in West Sumba Regency are classified into four categories, namely advanced and rapidly growing sectors, advanced but depressed sectors, developing sectors, and relatively underdeveloped sectors. The findings also reveal that the utilization of leading sector analysis can serve as a foundation for the preparation of the RDTR through the determination of regional development zones, strengthening economic growth centers, and spatial allocation aligned with regional characteristics and economic potential. Therefore, policy directions for the development of leading sectors should focus on strengthening regional infrastructure, increasing investment, developing human resources, and optimizing local potential sustainably in order to support more effective, well-directed, and locally based regional development in West Sumba Regency.

Keywords: *Leading Sectors, Klassen Typology, RDTR, Regional Economic Development, Spatial Planning.*

I. INTRODUCTION

Indonesia is an archipelagic nation comprised of thousands of islands surrounded by water. According to data from the Geospatial Information Agency (BIG), the number of islands in Indonesia as of December 2024 was 17,380. This number includes named islands with coordinates. As the world's largest archipelagic nation, Indonesia faces structural challenges in interregional mobility due to its geographical fragmentation by oceans and the relatively long distances between islands. This situation has become a major factor in Indonesia's uneven development.

Adaptive and comprehensive spatial planning instruments, such as the Detailed Spatial Plan (RDTR), are needed as a basis for controlling spatial use and

guiding regional development. The Detailed Spatial Plan (RDTR) is a crucial instrument in spatial planning (Sinaga, 2025). With the RDTR, regional development will be more organized, and development will be focused on the potential and characteristics of that region.

Spatial planning and regional economic development are two closely interrelated and reciprocal aspects. Space provides a platform for economic activity, while economic activity shapes the structure and patterns of spatial use within a region. Effective spatial planning requires a thorough understanding of the regional economic structure, including the sectors that play a key role in driving regional growth. Without such understanding, spatial planning risks being out of context, inefficient, and failing to support local economic development.

Spatial Planning (RDTR) and zoning regulations are essential as operational references for spatial utilization and control (Feryanto Kurniawan et al., 2021). A thorough understanding of a region's physical and geographical conditions is fundamental in determining the direction of regional development, as this directly impacts the optimal utilization of local resource potential. Integrating geographic aspects into spatial planning serves not only as an instrument for controlling spatial utilization but also as a strategy to encourage the development of leading regional sectors that are competitive and contribute significantly to local and regional economic growth.

Lede (2023) emphasized that most districts in East Nusa Tenggara still have a relatively low level of economic specialization compared to growth centers. This situation demonstrates the need for district-level studies to identify leading sectors with the potential for development and spatial direction through appropriate spatial planning policies. This analysis is expected to serve as a basis for determining regional development directions that align with local economic characteristics and potential.

West Sumba Regency holds a strategic position in supporting national economic development through its contributions to regional development. High economic growth is fundamentally a prerequisite for accelerating sustainable and equitable development, yet West Sumba Regency's economic performance remains relatively low compared to other regions with similar characteristics. This situation highlights the need to strengthen local economic capacity through optimizing resource utilization and improving the quality of regional development planning. A comprehensive analytical approach is needed to identify potential sectors capable of acting as key drivers of regional economic growth.

Gross Regional Domestic Product (GRDP) growth is an indicator of a region's economic growth and development. The agriculture, forestry, and fisheries sector continues to dominate the economy, contributing Rp 418.79 billion in 2024. Meanwhile, the manufacturing and retail trade sectors are showing an upward trend, although growth remains relatively slow. Average economic growth over the past five years has only reached 2.9% per year, reflecting the suboptimal utilization of the potential of the region's productive sectors.

The direction of regional economic development in West Sumba Regency is also reflected in various regional development policy documents. Based on the 2005–2025 West Sumba Regency RPJPD document, regional economic development is

directed at strengthening the agricultural sector as the main sector that still dominates the regional economic structure and makes a significant contribution to GRDP and employment. Furthermore, the development of micro, small, and medium enterprises (MSMEs) and cooperatives is also a priority in efforts to strengthen the people's economy through increasing human resource capacity, access to capital, institutions, and strengthening business partnerships. Furthermore, the tourism sector is also directed as one of the mainstay sectors that has the potential to drive regional economic growth, increase community income, and expand employment opportunities through the development of tourist destinations, promotions, and the construction of supporting infrastructure.

The regional economic development policy is also strengthened through West Sumba Regent Regulation No. 3 of 2024 concerning Priority Use of Village Funds. In this regulation, priority village development sectors are not explicitly formulated based on the GRDP sectoral classification, but rather are directed at strengthening village economic enterprises based on local potential. Development priorities in underdeveloped and very underdeveloped villages are focused on the construction and development of basic infrastructure and economic infrastructure that support community business activities, particularly in the productive agricultural sector, food security, and the development of superior village and rural product lines.

Based on the data calculations, several sectors with LQ values of less than one (non-basic) yet exhibited relatively large growth component values in the SS analysis, such as agriculture, construction, transportation and warehousing, and health services and social activities. This indicates that although these sectors do not yet have a higher level of specialization than the reference region, they have experienced significant development or growth during the analysis period.

Based on these conditions, the use of Klassen Typology analysis is important as an analytical instrument to identify the position and performance of regional economic sectors based on the combination of their growth rates and contributions to GRDP. This approach allows for the grouping of economic sectors into four main categories: advanced and rapidly growing sectors, advanced but depressed sectors, developing sectors, and relatively lagging sectors. Through this grouping, a more comprehensive picture of the structure and dynamics of the regional economy can be obtained, so that local governments can formulate more targeted development policies, both in strengthening developed sectors and in encouraging the acceleration of potential sectors that still require development support.

Integrating the results of the analysis of leading sectors using the Klassen Typology approach into the preparation of the RDTR will produce a spatial plan that is more data-driven, realistic, and contextual to local needs and potential, thereby encouraging economic growth in West Sumba Regency. This approach is highly relevant for West Sumba Regency, given that the region possesses rich natural resources and diverse economic potential, yet has not been fully optimized through targeted, leading sector-based spatial planning.

Various previous studies have utilized the Location Quotient (LQ) and Shift Share (SS) methods to identify leading sectors in various regions in Indonesia. Negara

and Putri (2020) examined leading sectors in Toboali District and demonstrated that LQ and SS analysis can reveal local economic structures in greater detail.

Ariani et al.'s (2021) research in Semarang Regency combined the LQ, SS, and Klassen Typology approaches to obtain a comprehensive overview of the classification of the region's leading sectors. Sulistyowati et al.'s (2022) study of the two buffer regencies of Sukoharjo and Karanganyar found variations in contributions between regions in driving regional economic growth.

Most of these studies focus solely on identifying sectors or commodities without directly linking their analysis to spatial planning policies, particularly the Detailed Spatial Plan (RDTR). Furthermore, these studies are located in regions with relatively high economic development or buffer zones. Based on this description, the researchers chose to conduct a study entitled "Analysis of Regional Leading Sectors as a Basis for Planning the Detailed Spatial Plan (RDTR) for West Sumba Regency."

II. RESEARCH METHODS

This research is a quantitative descriptive study using a regional analysis approach. The primary focus is to classify the leading sectors in West Sumba Regency. The research is conducted as a case study, depicting the actual development of the regional economic sector. The analysis uses time series data on the Gross Regional Domestic Product (GRDP) of West Sumba Regency from 2020 to 2024 to identify the leading sectors in West Sumba Regency.

This research uses a quantitative descriptive approach. This approach is chosen because the analysis is based on numerical data systematically processed to describe the economic conditions and structure of the study area. Through this quantitative descriptive approach, the researcher can objectively explain the classification results of the leading economic sectors in West Sumba Regency. This analysis utilizes the Klassen Typology method to describe the contribution and sectoral economic growth in the study area.

The data in this study was taken from various reliable sources such as official websites and the Central Statistics Agency (BPS).

The data collection technique used in this research is a documentary study in the form of secondary data. Documentary study in the form of secondary data is a data collection technique through the review of existing documents, such as laws and regulations, official reports, statistical data, and relevant scientific publications. This technique is used to obtain supporting data, strengthen research findings, and provide a theoretical and empirical foundation for understanding the context and objective conditions of the research object.

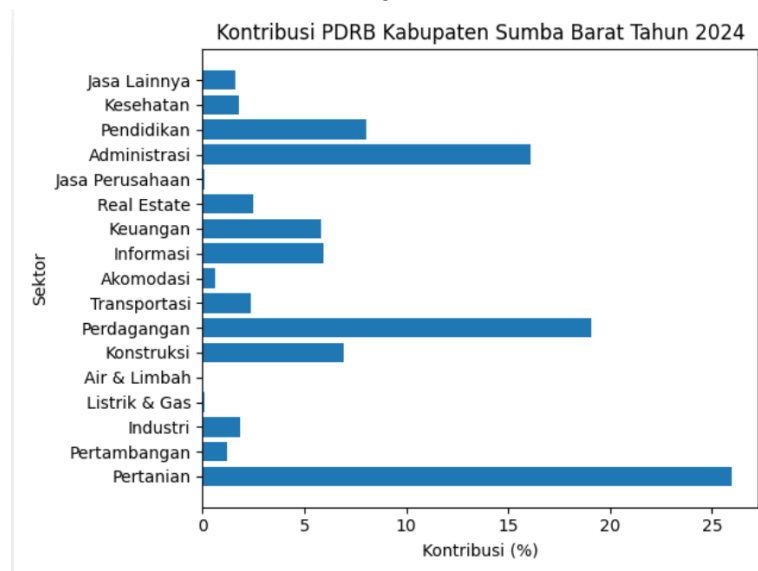
Data analysis techniques are methods or procedures used to process, organize, and interpret data collected in a study. These techniques aim to simplify raw data into meaningful information, allowing it to be used to answer research questions, test hypotheses, and draw systematic and scientifically sound conclusions. The data analysis in this study employed the Klassen Typology approach.

III. RESULTS AND DISCUSSION

Regional Economic Growth

Regional economic growth in West Sumba Regency can be analyzed through the presentation of Figure 1 below, which illustrates the sectoral contribution to GRDP in 2024.

Figure 1
Graph of West Sumba Regency's GRDP-ADHK Contribution 2024



Source: BPS West Sumba Regency, processed data, 2026

Based on Figure 1, which shows the contribution of Gross Regional Domestic Product (GRDP) by industry in West Sumba Regency in 2024, the regional economic structure shows a striking disparity between sectors. The agriculture, forestry, and fisheries sector dominates, contributing the largest amount, at approximately 26% of the total GRDP. This dominance reflects the regional economy's continued reliance on the primary sector, which is generally influenced by natural factors, land availability, and a relatively large workforce. This situation also indicates that the structural transformation of the economy to the secondary and tertiary sectors has not yet fully progressed.

The wholesale and retail trade sector ranks second, contributing approximately 19%. This high contribution indicates the development of goods and services distribution activities and the role of local markets in driving the local economy. Furthermore, the government administration, defense, and compulsory social security sectors contribute approximately 16%. The substantial role of these sectors indicates that government activity remains a key driver of the regional economy, particularly through government spending and the provision of public services.

The construction and education sectors also contribute significantly, each accounting for approximately 7-8%. This reflects infrastructure development activity and the increasing demand for educational services in the region. Sectors such as financial services, information and communication, and real estate are in the middle

category, with contributions ranging from 3–6%. The presence of these sectors indicates the beginning of the development of service-based economic activity, although their contribution is not yet dominant.

On the other hand, several sectors have relatively small contributions, such as manufacturing, transportation, healthcare, mining, and electricity and gas supply, which are generally below 3%. The low contribution of the industrial sector indicates that the industrialization process in the region is still limited, resulting in suboptimal economic value. Furthermore, the minimal contribution of the energy and utilities sector may also reflect limitations in basic infrastructure.

Overall, the structure of West Sumba Regency's GRDP in 2024 will still be dominated by the primary sector and some tertiary sectors, with a relatively low contribution from the secondary sector. This situation indicates that regional economic development should focus on economic diversification, increasing the added value of leading sectors, and strengthening the productive industrial and service sectors to encourage more sustainable and inclusive economic growth.

Based on these conditions, further analysis is needed to identify the region's leading sectors. Therefore, the following sub-chapter uses the *Klassen Typology* method.

Analysis of the Results of the Classification Typology Calculation

The results of the economic sector classification based on the *Klassen Typology* analysis indicate a differentiation in the level of sector development, reflecting the structure, characteristics, and dynamics of the regional economy in West Sumba Regency. This differentiation illustrates that each sector has a different ability to generate economic growth and contribute to Gross Regional Domestic Product (GRDP). This condition aligns with the *Klassen Typology* concept proposed by Sjafrizal, which states that grouping sectors based on growth and contribution indicators can be used to identify the relative position of sectors in regional economic development. Through this approach, sectors that have developed rapidly, those that are starting to slow down, those with potential for growth, and those that are still relatively lagging behind can be identified. Thus, the classification results not only indicate the regional economic condition statistically but also provide an overview of the direction of transformation in the economic structure of West Sumba Regency.

Quadrant I includes the mining and quarrying sector, manufacturing industry, wholesale and retail trade, car and motorcycle repair, education services, financial services and insurance, and real estate. The presence of these sectors in Quadrant I indicates that they are classified as advanced and rapidly growing sectors, exhibiting higher growth rates and contributions than the average for the reference region. This indicates that these sectors have developed into key drivers of regional economic activity and possess a relatively strong capacity to create economic added value.

The dominance of Quadrant I sectors demonstrates that the economic structure of West Sumba Regency is shifting from primary economic activities to secondary and tertiary economic activities, which offer higher added value. The trade, financial services, education, and real estate sectors demonstrate the development of increasingly complex service-based economic activities. This development reflects the

growing public demand for economic services, education, investment, and the distribution of goods and services. In the context of regional development, this condition indicates an economic transformation process characterized by increasing interconnectedness between sectors and the expansion of non-primary economic activities.

The mining and quarrying sector demonstrates economic activity in the form of exploration and exploitation of natural resources linked to the distribution and marketing of products. These activities generate substantial added value because they create economic turnover through employment, income distribution, and subsequent trade activities. Meanwhile, the manufacturing industry sector demonstrates the processing of raw materials into value-added products, extending the regional economic production chain. The existence of the manufacturing industry is crucial because this sector can create backward linkages through the need for raw materials and forward linkages through the distribution of processed products.

In the wholesale and retail trade sector, including car and motorcycle repair, the high growth and contribution indicate that the distribution of goods and services is actively developing in the regional economy. This sector serves as a link between production and consumption activities, thus playing a strategic role in maintaining the smooth flow of the regional economy. Increased trade activity also indicates increased purchasing power and the development of economic service centers in West Sumba Regency.

The education services sector demonstrates a form of economic development oriented towards improving the quality of human resources. The presence of this sector in Quadrant I indicates that education is not only viewed as a social service but also as a strategic sector contributing to regional economic development. The growing educational activity reflects the increasing public demand for access to education and the strengthening of formal and non-formal educational institutions. In the long term, this condition has the potential to improve workforce quality and regional competitiveness.

Meanwhile, the financial and insurance services sector demonstrates growing financial intermediation activities that support the smooth operation of the regional economic system. The role of this sector is evident through its function of collecting and distributing funds to support investment, business activities, and public consumption activities. The development of the financial services sector also reflects the increasing economic activity of the community, which requires support from financing services, savings, and business risk protection.

The presence of the real estate sector in Quadrant I indicates increased land use and property development activities in the region. This condition can indicate a growing need for space for housing, trade, and other economic activities. Spatially, the development of the real estate sector shows a tendency for built-up area growth, which can influence regional spatial structure.

In general, sectors in Quadrant I exhibit characteristics such as relatively more organized production systems, longer value chains, and strong linkages with other economic sectors. These conditions enable these sectors to become drivers of regional economic growth. This finding aligns with research by Ariani et al. (2021), which

shows that sectors with high growth rates and contributions tend to be identified as leading sectors in the Klassen Typology analysis.

Quadrant II is occupied by the government administration, defense, and mandatory social security sectors. The presence of these sectors in Quadrant II indicates that they are classified as advanced sectors but are experiencing growth pressures. This condition indicates that the government administration sector contributes relatively significantly to the regional GRDP, but its growth rate is lower than the average for the reference region. This indicates that this sector has achieved a certain level of stability within the regional economic structure, but its capacity for expansion is relatively limited.

The characteristics of the sector in Quadrant II demonstrate the dominance of economic activity based on public services and institutions. Economic activity in this sector occurs through government spending mechanisms, such as personnel expenditures, goods and services expenditures, and social protection programs. Thus, the government administration sector's contribution to the regional economy comes more from income distribution and the provision of public services than from the direct creation of productive economic output.

The significant contribution of this sector demonstrates that government activity still plays a crucial role in maintaining economic stability in West Sumba Regency. This is understandable, as government spending can create a ripple effect through household consumption, employment, and public service activities. However, the low growth rate of this sector also indicates that reliance on government activity cannot be fully relied upon as the primary source of long-term economic growth. Therefore, diversification of the economic structure by strengthening other productive sectors is necessary to ensure more sustainable regional economic development.

Quadrant III includes agriculture, forestry and fisheries, construction, transportation and warehousing, accommodation and food and beverage services, and healthcare and social activities. The presence of these sectors in Quadrant III indicates that they have the potential to develop due to their relatively high growth rates, although their contribution to GRDP remains below the average for the reference region. This indicates that these sectors are experiencing economic growth, but their capacity to contribute to regional economic development is not yet optimal.

The agriculture, forestry, and fisheries sector plays a crucial role in the economic structure of West Sumba Regency, as it remains the primary source of livelihood for the community. The high growth of the agricultural sector indicates an increase in primary production activity, but its relatively low contribution indicates that the resulting added value remains limited. This situation may be due to the dominance of raw material production, low levels of product processing, the use of rudimentary technology, and limited market access. Therefore, although the agricultural sector has significant potential, it has not yet fully emerged as a leading sector that accelerates regional economic growth.

The construction sector shows increasing physical development activity in West Sumba Regency, including infrastructure, service facilities, and residential areas. This sector's growth reflects increased investment in regional development. However, its

relatively low contribution indicates that construction activity has not yet fully established broad economic linkages with other supporting sectors.

In the transportation and warehousing sector, high growth indicates an increase in the mobility of goods and services in line with the growth of regional economic activity. However, the low contribution of this sector indicates that the regional logistics and connectivity systems are still underdeveloped. This situation has resulted in incomplete economic distribution efficiency.

The accommodation and food and beverage sector demonstrates the development of economic activity based on consumer services and tourism. This sector's growth may indicate the growth of tourism and increasing public demand for accommodation and consumer services. However, the business structure, still dominated by small businesses with simple management, means its economic contribution remains relatively limited.

Meanwhile, the health services and social activities sector demonstrates increasing public demand for health and social welfare services. This sector's growth reflects growing public awareness of quality of life, although service capacity and supporting facilities still require further strengthening.

In general, sectors in Quadrant III exhibit a production structure that is not yet fully integrated, relatively short value chains, and limited downstreaming and inter-sectoral linkages. Therefore, these sectors require policy support in the form of increased investment, infrastructure strengthening, technological modernization, and the development of processing industries to increase their contribution to GRDP. This finding aligns with research by Negara and Putri (2020), which indicates that sectors with high growth but low contribution have the potential to develop into leading sectors if supported by appropriate development policies.

Quadrant IV includes the electricity and gas procurement, water procurement and waste management, information and communications, and business services sectors. The presence of these sectors in Quadrant IV indicates that they are relatively underdeveloped, experiencing lower growth rates and contributions than the average for the reference region. This situation indicates that the development of these sectors still faces various limitations, including infrastructure, technology, investment, and institutional capacity.

The electricity and gas procurement sector demonstrates that energy services in West Sumba Regency are still underdeveloped. Limited distribution networks and energy access mean that economic activity is not fully supported by an adequate energy system. This situation can impact the productivity of other economic sectors, as energy availability is a key prerequisite for supporting production and service activities.

The water supply and waste management sectors demonstrate that basic environmental infrastructure services still face limitations. The suboptimal clean water supply and waste management systems indicate that the quality of basic urban and residential services still needs improvement. This situation can impact environmental quality and public health.

In the information and communications sector, low contribution and growth indicate that the use of digital technology in economic activities and public services

remains limited. Yet, information technology development plays a crucial role in increasing economic efficiency, expanding market access, and supporting modern economic transformation.

The business services sector also demonstrates limited development in professional business support services, such as business consulting, corporate administration, and other managerial services. The low growth of this sector indicates that regional economic activity is still dominated by small-scale businesses and is not supported by a complex business service system.

In general, sectors in Quadrant IV demonstrate an economic structure that is not yet optimally developed and has relatively weak linkages with other economic sectors. Therefore, more intensive policy interventions are needed through basic infrastructure development, increased investment, strengthened institutional capacity, and technological development to enhance the competitiveness of these sectors. This condition aligns with research by Hatta (2020), which indicates that low-performing sectors require more comprehensive policy interventions to increase their contribution to regional economic development.

Theoretically, the results of the GRDP sector classification in West Sumba Regency align with Sjafrizal's (2008) theory of regional economic growth, stating that the success of regional economic development is determined by the region's ability to manage resources, increase production efficiency, and optimize leading sectors that contribute significantly to economic growth. This also demonstrates that a regional potential-based development approach is a relevant strategy for driving regional economic growth. This in-depth analysis confirms that the results of the Klassen Typology not only provide a sectoral classification but also illustrate the level of maturity of the regional economic structure, the complexity of economic activity, and the strength of intersectoral linkages within the economic system. This understanding is important in formulating more targeted development policies, because each quadrant shows the need for different interventions according to the characteristics of its sectoral form.

Based on the results of the Klassen Typology analysis, sectors in Quadrant I can be identified as the main leading sectors in West Sumba Regency because they have relatively high growth rates and contributions. These sectors include mining and quarrying, education services, and financial and insurance services. Furthermore, sectors in Quadrant II, namely government administration, defense, and mandatory social security, can be categorized as potential leading sectors that have made significant contributions but require encouragement to increase their growth rate. Thus, regional leading sectors are not only determined based on contribution levels alone, but also consider the dynamics of sector growth. This approach provides a more comprehensive picture to support regional development planning, particularly in the preparation of Detailed Spatial Planning (RDTR) based on the potential and characteristics of the regional economy.

The Conformity of Utilization of Leading Sectors in the RDTR with the RKPD and RPJMD of West Sumba Regency

Based on the results of the Klassen Typology analysis, the utilization of leading sectors in the preparation of the Detailed Spatial Plan (RDTR) for West Sumba Regency can be explained through the relationship between sectoral performance and regional spatial allocation. Classifying sectors into four quadrants provides a comprehensive overview of the regional economic structure, thus serving as a basis for formulating spatial planning policies based on regional potential. This approach aligns with the concept of regional economic development, which emphasizes the importance of utilizing local potential as a basis for development planning. Theoretically, this is in line with the thinking of Ridwan and Sodik (2014) on the concept of spatial planning, which states that spatial planning is understood as a system encompassing the processes of spatial planning, spatial utilization, and integrated spatial utilization control.

In this context, leading sectors play a key role in driving economic growth, thus requiring support through appropriate spatial planning. To strengthen the validity of the analysis, the results of the Klassen Typology were compared with the policy directions in the West Sumba Regency Regional Development Plan (RKPD) and Regional Medium-Term Development Plan (RPJMD) documents to assess alignment and identify planning gaps.

1. Agriculture, Forestry, and Fisheries Sector

Based on the Klassen Typology, the agriculture, forestry, and fisheries sector falls into Quadrant III, a sector with relatively high growth but a relatively low contribution to the regional GRDP. This sector demonstrates a high degree of alignment between regional development policies in the RPJMD and RKPD and spatial planning directives in the West Sumba Regency RDTR.

2. Manufacturing Industry Sector

Based on the Klassen Typology, the manufacturing sector falls into Quadrant I, a developed and fast-growing sector with a relatively high growth rate and contribution to the regional GRDP. This indicates that the manufacturing sector plays a strategic role in supporting the economic growth of West Sumba Regency.

3. Water Supply, Waste Management, Waste and Recycling Sector

Based on the Klassen Typology, the water supply, waste management, and recycling sectors fall into Quadrant IV, with relatively low growth rates and contributions to regional GRDP. Nevertheless, these sectors still play a vital role in supporting environmental quality and basic public services.

4. Construction Sector

Based on the Klassen Typology, the construction sector falls into Quadrant III, a sector with relatively high growth but a relatively low contribution to regional GRDP. This indicates that the construction sector is experiencing rapid growth in line with increasing regional development activity in West Sumba Regency.

5. Real Estate Sector

Based on the Klassen Typology, the real estate sector falls into Quadrant I, a developed and rapidly growing sector with a relatively high growth rate and contribution to regional GRDP. This indicates that the real estate sector plays a strategic role in supporting the development of built-up areas and regional economic activity in West Sumba Regency.

6. Wholesale and Retail Trade Sector

Based on the Klassen Typology, the wholesale and retail trade sector, including car and motorcycle repair, falls into Quadrant I, a developed and fast-growing sector with a relatively high growth rate and contribution to the regional GRDP. This indicates that the trade sector plays a strategic role in supporting economic activity and the distribution of goods in West Sumba Regency.

7. Transportation and Warehousing Sector

Based on the Klassen Typology, the transportation and warehousing sector falls into Quadrant III, a sector with a relatively high growth rate but a relatively low contribution to the regional GRDP. This indicates that the sector has a fairly active development dynamic, but has not yet fully contributed optimally to the regional economic structure. This sector also demonstrates a congruence between regional development policies in the RPJMD and RKPD with spatial planning directives in the RDTR of West Sumba Regency.

8. Accommodation and Food and Beverage Provision Sector

Based on the Klassen Typology, the accommodation and food and beverage sector falls into Quadrant III, a sector with a relatively high growth rate but a relatively low contribution to the regional GRDP. This indicates that the sector has quite active development dynamics in line with increasing tourism and creative economy activities, but has not yet fully contributed optimally to the regional economic structure. This sector also demonstrates a congruence between regional development policies in the RPJMD and RKPD with spatial planning directives in the West Sumba Regency RDTR.

9. Information and Communication Sector

Based on the Klassen Typology, the information and communications sector falls into Quadrant IV, a sector with a relatively low growth rate and a relatively low contribution to regional GRDP. This indicates that the sector has not yet become a major driver of the regional economy, despite its strategic potential in supporting digital-based economic transformation. Therefore, stronger policy intervention is needed to optimize the sector's development and contribute to increased regional competitiveness.

10. Financial Services and Insurance Sector

Based on the Klassen Typology, the financial services and insurance sector falls into Quadrant I, a developed and rapidly growing sector with a relatively high

growth rate and contribution to regional GRDP. This indicates that the sector plays an increasingly important role in the regional economic structure, particularly in supporting community economic activity through the provision of financing, investment, and business risk protection services. Therefore, this sector has the potential to be a major driver of regional economic growth.

11. Education Services Sector

Based on the Klassen Typology, the education services sector falls into Quadrant I, a developed and rapidly growing sector with a relatively high growth rate and contribution to the regional economy. This indicates that the education sector has developed dynamically and plays a crucial role in regional development, particularly as a primary foundation for improving human resource quality and sustainably enhancing regional competitiveness.

12. Health Services and Social Activities Sector

Based on the Klassen Typology, the health services and social activities sector falls into Quadrant III, a sector with a relatively high growth rate but a relatively low contribution to regional GRDP. This indicates that the sector has significant development dynamics in line with the increasing public demand for health services and social protection, but has not yet fully contributed optimally to the regional economic structure. Therefore, this sector demonstrates potential for strengthening that still needs to be optimized through the integration of sectoral policies and spatial planning.

13. Government Administration, Defense, and Mandatory Social Security Sector

Based on the Klassen Typology, the government administration, defense, and mandatory social security sectors are included in Quadrant II, namely sectors with a relatively high contribution to regional GRDP but a relatively low growth rate. This condition indicates that these sectors play a very important role in the regional economic structure, particularly as providers of public services and supporting government stability, even though economic dynamics have not experienced significant expansion.

14. Other service sectors

Based on the results of the Klassen Typology, other service sectors fall into Quadrant III, a sector with a relatively high growth rate but a relatively low contribution to regional GRDP. This indicates that the sector has quite active development dynamics due to the increasing public demand for various social, cultural, and other supporting services, but has not yet fully contributed optimally to the regional economic structure. Therefore, this sector has significant development potential if supported by appropriate policies and targeted spatial planning.

Analysis of the Relationship between Theory and Research Findings

Based on the results of the Klassen Typology analysis, the utilization of leading

sectors in the preparation of the Detailed Spatial Plan (RDTR) for West Sumba Regency can be explained through the relationship between sectoral performance and regional spatial allocation. Classifying sectors into four quadrants provides a comprehensive overview of the regional economic structure and can therefore be used as a basis for formulating spatial planning policies based on regional potential.

This approach can be theoretically explained through the concept of regional economic development, which emphasizes optimizing local resource potential as the basis for regional growth. Arsyad (1999) asserts that regional economic development is a collaborative process between the government and the community in managing resources to improve welfare. In the context of the RDTR, this process is realized through the integration of spatial structure and spatial patterns aimed at supporting productive economic activities.

The relationship between leading sectors and regional spatial development can also be explained through the economic basis theory proposed by Richardson (1973). This theory emphasizes that regional growth is strongly influenced by export-oriented sectors (basic sectors), namely sectors capable of generating surplus production for markets outside the region. The Klassen Typology identifies Quadrant I sectors as advanced and fast-growing, representing the role of the basic sector as a driving force for the regional economy.

The relationship between sectoral economic growth and regional structure can also be explained through regional economic growth theory, which emphasizes differences in growth rates between regions due to differences in resource capacity and economic structure. Sjafrizal (2008) asserts that the success of regional development is largely determined by a region's ability to manage its leading sectors and increase production efficiency based on regional potential.

The integration of the Klassen Typology and the RDTR results from a spatial perspective can be explained through the location theory proposed by Alfred Weber (1929), Johann Heinrich von Thünen (1854), and August Lösch (1954). These three approaches emphasize that the location of economic activity is determined by cost efficiency, market accessibility, and optimal spatial distribution. The allocation of leading sectors in the RDTR is not merely administrative but also a strategic decision based on spatial efficiency.

The concept of spatial planning, as stipulated in Law Number 26 of 2007 concerning Spatial Planning (2007), provides a normative basis that spatial planning is a system encompassing integrated planning, utilization, and control of space. In this context, the results of the Klassen Typology can be positioned as an analytical instrument that helps direct the distribution of economic activity into a more efficient and sustainable spatial structure.

The Integrated Spatial Planning Theory (Ridwan and Sodik, 2014; Law Number 26 of 2007) emphasizes that spatial planning is a system encompassing integrated spatial planning, utilization, and control, while considering the balance between economic, social, and environmental aspects. In the context of this research, this theory reinforces the results of the Klassen Typology analysis, which shows that each economic sector has different spatial implications and therefore requires proportional allocation within the West Sumba Regency Regional Development Plan (RDTR). This

interconnectedness is evident in the need for integration between leading sectors (Quadrant I) as growth centers, potential sectors (Quadrant III) as economic structural reinforcements, and lagging sectors (Quadrant IV) as priorities for equitable regional infrastructure distribution.

The Leading Sector Theory (Suyatno, 2000; Tumenggung, 1996) explains that leading sectors are those with comparative advantages and act as primary drivers of economic growth through multiplier effects on other sectors. In relation to the results of the Klassen Typology, the identification of Quadrant I sectors as advanced and fast-growing sectors indicates the existence of leading sectors that must be prioritized in the allocation of RDTR space. These sectors not only contribute to GRDP but also have spatial implications in the form of the need for industrial areas, trade, services, and supporting infrastructure. Therefore, this theory strengthens the argument that RDTR needs to be directed to optimize space for sectors with high economic driving force in order to be able to create an efficient and competitive regional structure.

Direction of Leading Sector Development Policy in Supporting the Preparation of the West Sumba Regency RDTR

Based on the results of the Klassen Typology analysis, the policy direction for developing leading sectors to support the preparation of the Detailed Spatial Plan (RDTR) for West Sumba Regency is systematically formulated, taking into account the characteristics of each quadrant, sectoral issues, and their relationship to the region's spatial structure and patterns. This policy formulation serves not only as normative guidance but also as an operational instrument for controlling spatial use based on regional economic potential.

In Quadrant I, leading sectors with high growth rates and contributions are directed as the main drivers of the regional economy. Necessary policies include the establishment of priority economic areas within the RDTR, such as mining, industrial, trade, and business centers. Furthermore, cluster-based regional development needs to be strengthened to increase efficiency and inter-sectoral linkages. Control of spatial use must also be emphasized in sectors with the potential to cause environmental impacts to prevent overexploitation. Improved transportation and logistics infrastructure, as well as ease of investment, are key supporting factors for accelerating the growth of this sector.

In Quadrant II, the government administration sector, which has a high contribution but relatively stable growth, requires policies to improve service quality and efficiency. Strengthening the function of regional activity centers is necessary through the arrangement of government areas integrated with economic activities. Furthermore, digitalization of public services and equitable access to services, even in rural areas, are strategic steps to maintain regional development stability and reduce the concentration of activity in urban centers.

In Quadrant III, potential sectors with high growth but still low contributions require capacity building and increased added value. Protection and development of production areas such as agriculture, fisheries, and forestry are top priorities. Development of transportation and distribution infrastructure is necessary to facilitate the flow of goods and services. Furthermore, developing a processing industry based

on local potential and improving the quality of human resources are key to driving these sectors to become leading sectors in the future.

In Quadrant IV, relatively underdeveloped sectors require policy intervention in the form of strengthening basic infrastructure. The development and equitable distribution of electricity, clean water, sanitation, and communication network services are top priorities. Infrastructure zones should be designated in the Regional Development Plan (RDTR) to ensure the availability of space for the development of these sectors. Private sector involvement through collaborative schemes also needs to be encouraged to address funding constraints and improve the quality of basic public services.

Overall, economic sector development policies within the West Sumba Regency Regional Spatial Plan (RDTR) need to be directed at strengthening inter-sectoral and inter-regional linkages, structured spatial utilization control, and equitable development. The RDTR serves not only as a spatial planning instrument but also as a strategic tool for balanced, efficient, and sustainable regional economic development.

To strengthen this, an integrative approach is needed that positions the RDTR as a system of economic and spatial integration. In this regard, the development of regional economic corridors needs to be directed at functionally connecting production areas, distribution centers, and service centers to increase the efficiency of the flow of goods and services and reduce inter-regional inequality.

Furthermore, basic infrastructure such as transportation, logistics, digital networks, clean water, and sanitation need to be positioned as an integrated regional network system. This is crucial to support the transformation of low-competitive sectors so they can develop gradually.

Control over the development of urban areas and growth centers also needs to be strengthened through spatial planning instruments such as zoning, spatial utilization intensity, and building density regulations, so that a balance between economic growth and environmental carrying capacity can be maintained.

In the context of strengthening broader regional development policies, policymakers also need to pay more strategic attention to the mining and quarrying, electricity and gas procurement, and business services sectors in the development of the West Sumba Regency Medium-Term Development Plan (RPJMD) and Regional Work Plan (RKPD). The mining and quarrying sector needs to be developed in a controlled manner through zoning regulations and integration with the processing industry to increase added value. The electricity and gas procurement sector needs to be prioritized as basic infrastructure supporting all regional economic activities through equitable energy access. Meanwhile, the business services sector needs to be strengthened as a supporting sector that increases the efficiency and competitiveness of business activities through professional, technical, and investment support services.

Strengthening these three sectors is expected to encourage more inclusive and sustainable economic growth, while strengthening the role of the Regional Development Plan (RDTR) as an instrument for spatial control and directing the economic development of the West Sumba Regency region.

Overall, the results of the Klassen Typology analysis in this study demonstrate a strong link between the regional economic structure and the theoretical framework used. Regional economic development theory emphasizes the importance of managing local potential, while the economic base theory explains the role of leading sectors as drivers of growth.

The theories of economic growth and regional economic growth provide an understanding of the dynamics and disparities between sectors, while location theory explains the importance of spatial aspects in economic sector development. Furthermore, the concept of spatial planning serves as an instrument for integrating all of these potentials into targeted regional planning.

Thus, the results of this study are not only descriptive but also have a strong theoretical foundation in explaining the relationship between economic structure, leading sectors, and regional spatial planning.

IV. CONCLUSION

Based on the analysis and discussion outlined in the previous chapter, several conclusions can be drawn that reflect the main findings of this study.

1. Based on the Klassen Typology analysis, the economic sectors in West Sumba Regency are distributed into four quadrants with distinct characteristics. Quadrant I (developed and rapidly growing sectors) includes mining and quarrying, manufacturing, wholesale and retail trade, car and motorcycle repair, education, financial and insurance services, and real estate, which serve as the primary drivers of the regional economy; Quadrant II (developed but stagnant/depressed sectors) is occupied by the government administration, defense, and mandatory social security sectors, which have high contributions but relatively low growth; Quadrant III (potentially developing sectors) includes agriculture, forestry, and fisheries, construction, transportation and warehousing, accommodation and food and beverage services, health services and social activities, and other services that show high growth but still have limited contributions; Meanwhile, Quadrant IV (relatively underdeveloped sectors) consists of electricity and gas procurement, water procurement, waste management, waste and recycling, information and communication, and business services, which have relatively low growth rates and contributions, thus requiring more intensive policy intervention for their development.
2. The utilization of the results of the analysis of leading sectors in the preparation of the Detailed Spatial Plan (RDTR) for West Sumba Regency demonstrates a strong link between sectoral performance and regional spatial allocation. Sectors in Quadrant I serve as the basis for determining growth centers and strategic area development, while sectors in other quadrants play a role in supporting spatial structure balance by strengthening service functions, developing regional potential, and providing supporting infrastructure. The results of this analysis also indicate that the policy direction in planning documents such as the Regional Work Plan (RKPD) and the Regional Medium-Term Development Plan (RPJMD) is essentially

aligned with the regional economic structure, although gaps remain in aspects of implementation, integration between sectors, and equitable development.

3. The policy direction for developing leading sectors to support the preparation of the RDTR is formulated systematically based on the characteristics of each quadrant. These policies include establishing priority growth areas, strengthening spatial structures and patterns, developing regional connectivity, and providing basic infrastructure to support economic activity. Furthermore, more operational spatial utilization control instruments are needed through zoning, regulating spatial intensity, and implementing incentive and disincentive mechanisms. Integrating sectoral and spatial planning is key to ensuring that the development of leading sectors is effective, sustainable, and capable of driving a more balanced structural transformation of the regional economy.

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