

The Efficiency of Local Tax Collection in Technical Implementation Unit of West Nusa Tenggara Provincial Revenue Management Board

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| History Article | Abstract |
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| Received: August 29, 2018 Accepted: October 14, 2018 | The study aimed to investigate the efficiency level of regional tax collection in nine technical implementation units in Regional Revenue Management Board of NTB. |
| Published: December 1, 2019 | The data was analyzed by means of Data Envelopment Analysis (DEA). This study applied a quantitative study which utilized descriptive analysis while the data was |
| Keywords: Technical Efficiency; Technical | collected using a direct interview to the principals and any related stakeholders and also observing and documentating observes. The findings suggested that |
| Revenue Management Board; DEA | eight UPTBs suffers from inefficiency determined by lack of capability of each UPTBs to target the predetermined regional tax revenue based on their potential and |
| JEL Codes: G28; H21 | incapability to achieve its predetermined target. In addition, it was also determined by excessive human |
| Correspondent email: | resources in each UPTBs and the placement of human |
| aki_baih@yahoo.co.id | resources who did not have relevant or adequate required capability. |
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INTRODUCTION

Regional development is an integrative part of national developments in a country. It is an effort to increase the local government's capacity, so that there is improvement in the local government's reliability and professionalism in terms of giving the first-rate service to the society. The regional development means promoting the local ability to manage its economic resources in terms of utility and productivity in order to support the prosperity of the society. According to Saragih (2003), local development is conducted by employing two approaches, namely the centralistic and the decentralization. The centralistic means the majority of development realization and implementation is authorized by central bureaucracy. Meanwhile, the decentralization approach means the local development is implemented mostly by the region itself and is automatically realized by the region.

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Board.

Provincial

The autonomous regional development aims at empowering the local authority in order to get more developed, peaceful, better and broader choices to be utilized in life. The implementation of regional autonomy is an effective way in carrying out the function of governance and public service while at the same time followed by fiscal decentralization to empower the local funding in order to increase the quality of service to the society. The Fiscal decentralization is realized in form of financial balancing policy between the central and local government. Since implemented in 2001, which was marked by the application of Law Number 23 of 2014, significant change occurred in the policy regarding the local finance, such as the shift of local income source. Before the implementation of regional autonomy, the source of local income comes to scheme Authentic Regional Income (ARP) and other small funding from the government.

Efficiency is a study explaining how to achieve maximum output with certain input as well as how to allocate the production factors available optimally to produce maximum output. Economists offer an important definition for the word efficiency. Samuelson & Nordhaus (1996) suggested that the meaning of efficient refers to a condition where economic resources are utilized effectively to meet people needs and their expectation. Further, Sukirno (2015) remarked that resources utilization is efficient when the entire resources available is fully utilized and resources design is used in such a way that no other designs can be employed to enhance the society's properity. Moreover, Nicholson (1989) divided efficiency into two models, first, a technical efficiency which is defined as the production option which later results in certain output by minimalizing the resources. The state of this technical efficiency is presented by dots along the isoguant curve. Second, cost efficiency deals with any technical matter used in the production which can minimalize the cost. In cost efficiency, the company activities must minimalize the cost. Moreover, the activity of the company will be limited by budget line of the company itself (isocost). The efficiency choosen is the one which includes both technical and cost efficiency.

West Nusa Tenggara Province (NTB) is part of the regional government in Indonesia which is formed based on Law 58, 1964 and is expected to manage the sources of regional income economically, effectively, and efficiently, so that the development design can be achieved. In managing the sources, West Nusa Tenggara has formed one Regional Force Organization to perform the main task and function of managing the regional income through the West Nusa Tenggara Provincial Revenue Management Board. It is formed based on the Law Number 11, 2016 regarding the Formation and Structure of Regional Force Organization which duty is to assist the Governor in running the administration of financial sector, the subsector of income based on the autonomy principle, assistant duty, and deconcentration.

Some types of regional income that become the duty of West Nusa Tenggara Provincial Revenue Management Board are the Authentic Regional Income, Balanced Fund obtained from the Central Government that later becomes the sole authority of Provincial Government as regulated in the prevailing Law, and other legal regional incomes. Technical Implementation Unit is a technical unit under the authority of West Nusa Tenggara Provincial Revenue Management Board which is formed based on Governor Regulation Number 53, 2016 regarding the Formation, Position, Organization Structure, Duty and Function as well as the Work System of official Technical Implementation Unit in Local Official and the Local Agencies in West Nusa Tenggara, possessing the duties and functions to technically collect the local tax, specifically the tax for automotive vehicles and the vehicle title transfer.

Local tax, according to The Indonesian Law Number 28 of 2009 regarding Regional Tax and Retribution is mandatory contribution to the region levied on individuals or corporations that is enforced based on the Law with no direct reward, and is used for local expenditures to achieve society's prosperity. There are some relevant studies about the efficiency of tax collection and retribution of the region which employed the Data Envelopment Analysis (DEA) application. According to Ramanathan (2003) DEA is linear programming-based development technique for measuring the relative performance of organizational units where the presence of multiple inputs and outputs to measure the efficiency of Decision Making Units (DMUs). DMU is organizational entities which efficiency is measured relatively towards other homogenous entities, homogenous means the inputs and outputs of DMUs that are evaluated must be similar. DMUs can be in form of commercial organization such as bank, hospital, local clinic, schools and many more.

One of them was a research conducted by Pamungkas et al. (2016) which stated that 18 out of 23 community health centers in Sumbawa District in 2015 were classified as technically efficient and the rest were classified as inefficient. This was due to differences in managerial capabilities of resources. Other previous research was conducted by Suseno Budi Prasetyo (2008), which mentioned that the results showed that marketing distribution in Semarang city is inefficient with its relative efficiency value 0.9036. Research conducted by Gonzalez & Rubio (2013) states that there were 4 special tax offices in Spain in 2008 that experienced efficient conditions. In contrast, Pradipta et al. (2015) in their research stated that eight health centers in Surabaya experienced an efficient condition, and two Puskesmas (public health centers) experienced inefficient condition. Further more, Amirillah (2014) stated that Syaria Banks in Indonesia reached 100% efficiency, then in 2007 to 2009, the level of efficiency decreased with an avarage efficiency of 99.94%. other research conducted by Siti Musyarofah (2007) shows that The efficiency level of collecting market retribution in Gresik Regency is experiencing a fluctuating state with a yearly average is 0.14 or 14% which indicates very efficient. Likewise with the research conducted by Gabril Jarjue et al. (2015) show that 9 (22%) health centers are efficient, 32 (78%) health centers are technically inefficient with an average technical efficiency score of 65% and standard deviation (STD) of 26%. Furthermore, 4 (10%) health centers are scale efficient, 37 (90%) health centers scale inefficient with an average scale efficiency score of 87% and standard deviation (STD) of 12%. The widespread inefficiency across the entire secondary health care service delivery system in the Gambia is alarming and the results suggest that health centers are using resources more than they actually need.

Additionally, another study conducted by Mohammadi et al. (2017) showed that Isfahan in 2011 and 2014, and Markazi in 2012 and 2013 had the best ranks among the developed provinces; while in underdeveloped provinces, i.e West Azerbaijan in 2011, 2012, and 2013, and Kurdistan in 2014 achieved the highest ranks. These results indicated that these provinces were more efficient by considering inputs and outputs compared to other provinces. In this current research, the author investigated efficiency of regional tax collection that was held by Technical Implementation Unit Agency (UPTB) of Regional Income Management Unit, West Nusa Tenggara by means of DEA (Data Envelopment Analysis) model. The study was carried out at West Nusa Tenggara Province as a recommendation for Regional Government in relation to the monitoring policy that was related to tax collection on each UPTB, ranging from its human resources placement, incentive, and infrastructurs.

METHOD

This study applied a quantitative method by using the descriptive analysis method. The research was conducted in the West Nusa Tenggara Provincial Revenue Management Board to investigate the efficiency level of tax collection, specifically for automotive vehicles and title transfer expense by the Technical Implementation Unit. The data collection procedure involved in-depth interview process by employing question and answer session with the managers and stakeholders who were in charge at the time in the Provincial Revenue Management Board. The documentation of the data was carried out by using the available data from the

related institutions. In addition, observation process was conducted directly by monitoring the object of the study regarding the condition of local tax collection.

The input variable is the resources used by West Nusa Tenggara Provincial Revenue Management Boarding in conducting its function and duty in tax collection and local retribution including, 1) the number of resource in form of staffs; 2) the number of media and infrastructures used in conducting the local tax collection; 3) the realization of Salary Expense, Subsidy and Incentive of tax collection; 4) the local tax potential in each Decision Making Unit; 5) the realization of the revenue of each Decision Making Unit in the scope of Technical Implementation Unit of West Nusa Tenggara Provincial Revenue Management Board.

This research employed Data Envelopment Analysis (DEA) to analyze the data. According Ramanathan (2003), DEA linear programming-based development technique is used to measure the relative performance of organizational units where the presence of multiple inputs and outputs are used to measure the efficiency of Decision Making Units (DMUs). There are some approaches in measuring the efficiency in DEA; by maximizing the output and minimalizing the input. Not only is DEA used to measure the grade of efficiency, but also to determine benchmarking towards the observable unit. In this research, the DEA is used to analyze the annual data of West Nusa Tenggara Provincial Revenue Management Board as the research location where the data availability is very limited to fulfill other uses with another approach and also the difficulties in accomodating the use of multi input and multi output with other approaches.

This research made use of DEA VRS model to measure the relative efficiency and the input and output target of certain DMU. The notation of input and output in this research was defined in the form of Xij and Yrj, in which Xij indicates the number of the 'I-th' input on the 'j-th'DMU. Meanwhile, the Yrj indicates the number of the 'r-th' output on the 'j-th' DMU. The formula used in this research was:

$$\sum_{\substack{\mu_{k}v_{i}k=1}}^{max} \mu_{k}y_{k0} - u_{0}$$

s.t
$$\sum_{i=1}^{m} v_{i}x_{i0} = 1$$

$$\sum_{k=1}^{p} \mu_{k}y_{kj} - \sum_{i=1}^{m} v_{1}x_{ij} \leq 0$$

$$j = 1, ..., n$$

$$k = 1, ..., p$$

$$j = 1, ..., m$$

In which :

 x_{ij} = the number of the I-th input type on the j-th DMU y_{kj} = the number of the k-th output type on the j-th DMU

RESULTS AND DISCUSSION

 $\mu_k \geq \epsilon, v_i \geq \epsilon$

The increment number of resources that neglects the required quality might cause inefficiency in the local tax collection in each Technical Implementation Unit of Agency. The measurement of technical efficiency with DEA model was done with input orientation method by using VRS (variabel return to scale) scale. This model views that corporation is not operating in optimum scale with the assumption that the ratio between the addition of input and output is not the same variable return to scale. Referring to the result of the study, the efficiency level of each Technical Implementation Unit of West Nusa Tenggara Provincial Revenue Management Board can be illustrated as presented in table 1.

From nine UPTBs at Provincial Income Management Agency of NTB, only one UPTB was categorized as efficient. Conversely, 8 UPTBs were categorized as inefficient in tax management. In 2016, UPPD Mataram was categorized as efficient, and 4 UPPBs had efficient rate almost 1, i.e. UPPB Praya was 72.45%, UPPB Selong 86.92%, UPPB Bima 54.99% and UPPB Gerung 86.91%. There were four UPPBs which had lower efficient rate, i.e. Sumbawa 42.06%, Dompu 26.96%, Taliwang 48.95% and Tanjung 35.04%. Inefficiency of tax collection on eight UPTBs were reflected in the use of input variables and 100% achievement of output variables that had not been achieved. The achievement of each variable, especially the input variables in each UPTBs which was indicated by the actual value had not achieved an efficient score, the DEA indicated the excess in allocating input variables. Likewise, the achievement of the output variable indicated by the actual value did not achieve the efficiency score, the DEA indicated the achievement of output variable had not been maximized.

 Table 1. The Efficiency Score of Local Tax Service Unit within The Scope of West

 Nusa Tenggara Provincial Revenue Management Board 2016.

| No. | Local Tax Service Unit (LTSU) | 2016 |
|-----|-------------------------------|---------|
| 1 | LTSU of Mataram | 100 % |
| 2 | LTSU of Praya | 72.45 % |
| 3 | LTSU of Selong | 86.92 % |
| 4 | LTSU of Sumbawa | 42.06 % |
| 5 | LTSU of Bima | 54.99 % |
| 6 | LTSU of Dompu | 26.96 % |
| 7 | LTSU of Gerung | 86.91 % |
| 8 | LTSU of Taliwang | 48.95 % |
| 9 | LTSU of Tanjung | 35.04 % |

Source: Data processed (DEAP 2.1)

The Inefficiency of the Technical Implementation Unit of Agency (TIUA) in 2016.

Tabel 2. The Score of each Local Tax Service Unit within the Scope of West Nusa Tenggara Provincial Revenue Management Board 2016

| TIUA. | Variable | Original Value | Projected Value | Efficiency level |
|----------------|-----------------|-------------------|--------------------|---------------------|
| LTSU of Gerung | Tax Target | 72,139 | 72,139 | 0.846 |
| Ū | Tax Realization | 73,540 | 75,276 | - |
| | Salary | 671,464 | 567,773 | - |
| | Subsidy | 193,933 | 162,307 | - |
| | Incentive | 791,128 | 639,103 | - |
| | Number of Media | 5,049,087 | 3,140,509 | |
| | Number of Staff | 0.02 | 0.01 | - |
| LTSU of Praya | Tax Target | 66,396 | 67,083 | 0,820 |
| | Tax Realization | 70,000 | 70,000 | - |
| | Salary | 644,196 | 527,982 | - |
| | Subsidy | 187,800 | 150,932 | - |
| | Incentive | 745,548 | 594,313 | - |
| | Number of Media | 3,767,106 | 2,920,413 | - |

| TIUA. | Variable | Original Value | Projected Value | Efficiency level |
|------------------|-----------------|-------------------|--------------------|---------------------|
| | Number of Staff | 0.02 | 0.01 | |
| LTSU of Sumbawa | Tax Target | 105,697 | 109,369 | 0,920 |
| | Tax Realization | 114,124 | 114,124 | _ |
| | Salary | 935,378 | 860,791 | |
| | Subsidy | 282,042 | 246,071 | |
| | Incentive | 1,134,029 | 968,934 | _ |
| | Number of Media | 6,465,005 | 4,761,274 | - |
| | Number of Staff | 0.02 | 0.01 | - |
| LTSU of Bima | Tax Target | 79,307 | 82,143 | 0,849 |
| | Tax Realization | 85,714 | 85,714 | - |
| | Salary | 761,698 | 646,506 | - |
| | Subsidy | 241,094 | 184,814 | - |
| | Incentive | 995,433 | 727,728 | |
| | Number of Media | 4,643,501 | 3,576,004 | _ |
| | Number of Staff | 0.02 | 0.01 | _ |
| LTSU of Dompu | Tax Target | 42,503 | 42,503 | 0,197 |
| | Tax Realization | 40,334 | 44,351 | _ |
| | Salary | 1,697,361 | 334,522 | _ |
| | Subsidy | 542,316 | 95,628 | _ |
| | Incentive | 2,279,738 | 376,548 | _ |
| | Number of Media | 1,844,699 | 1,850,331 | _ |
| | Number of Staff | 0.04 | 0.01 | _ |
| LTSU of Gerung | Tax Target | 34,779 | 40,274 | 0,495 |
| | Tax Realization | 42,025 | 42,025 | - |
| | Salary | 680,682 | 316,978 | _ |
| | Subsidy | 201,201 | 90,613 | _ |
| | Incentive | 806,853 | 356,800 | _ |
| | Number of Media | 3,540,963 | 1,753,291 | - |
| | Number of Staff | 0.02 | 0.01 | _ |
| LTSU of Taliwang | Tax Target | 13,320 | 14,415 | 0,088 |
| | Tax Realization | 15,042 | 15,042 | _ |
| | Salary | 1,286,563 | 113,456 | _ |
| | Subsidy | 441,092 | 32,433 | - |
| | Incentive | 1,944,495 | 127,709 | - |

| TIUA. | Variable | Original Value | Projected Value | Efficiency level |
|-----------------|-----------------|-------------------|--------------------|---------------------|
| - | Number of Media | 9,791,714 | 627,555 | |
| | Number of Staff | 0.030 | 0.002 | _ |
| LTSU of Tanjung | Tax Target | 9,116 | 9,116 | 0,050 |
| | Tax Realization | 3,895 | 9,512 | _ |
| | Salary | 1,681,006 | 71,748 | _ |
| | Subsidy | 514,707 | 20,510 | _ |
| | Incentive | 2,136,977 | 80,762 | _ |
| | Number of Media | 7,944,790 | 396,857 | _ |
| | Number of Staff | 0.040 | 0.001 | _ |

Source: Data Analysis

The table shows that some factors which determined the inefficiency of tax collection on eight Technical Implementation Unit Agencies were input and output variables that did not achieve expected projected value. For UPPB Praya, it was caused by the excess of allocation of input variable such as staff quantity at 33. DEA estimation indicated the excess of staff quantity up to 41.50%. Achievement of Salary aspect was at 1,356,386,600.00, DEA indicated that the excess of salary reached 43.70%. Achievement of performance allowances variable was 490,542,012.50, DEA indicated that the excess in its allocation hit the rate 43.20%. Achievement of infrastructure variable was at rate 7,931,830,571.00. DEA rate for its variable was 27.60%. Besides excess of input variables allocation, inefficiency of tax collection in UPPB Praya were also determined by the efficiency score of output variables which was not achieved including the target of regional tax revenue as much as 79,390,052,000.00. DEA of its variable had deficiency in realisation by 3.40%.

Selong's UPPD in 2016 had efficiency score 86.92%. Factor that determined inefficiency of tax collection was excess of input variable such as staff quantity which hit the rate 33. DEA rate indicated that there was excess of staff allocation for 32.90%. Salary aspect achievement was at rate 1,369,416,700.00. DEA estimation indicated that there was excess of salary allocation for 36.10%. performance allowances variable reached 477,780,825.00, the DEA calculation indicated there was an excess of its allocation as much as 33.10%. Infrastructure variable with an achievement of 7,574,618,003.20, the DEA calculation indicated an excess on its allocation up to 13.10%. Besides input variables allocation was excess, inefficiencies of tax collection was also determined by the required value of output variable which was not achieved, namely target of regional tax revenue value as much as 91,896,570,000.00. The DEA indicated a shortage in its realization at rate 2.40%.

Sumbawa's UPPD in 2016 had an efficiency score 42.06%. Factors that determined the inefficiency for its UPPB in 2016 (score 42.06%) were the excess of input variables allocation, that is, number of employees at 26. The DEA indicated the excess of employee allocation up to 58%. Salary aspect reached 1,118,431,700.00, the DEA indicated there was an excess of its allocation by 62.30%. Performance Allowance variable with an achievement at 399,359,900.00, the DEA calculation

indicated there was an excess in its allocation by 60.50%. Infrastructure variable with an achievement of 7,730,206,270.60, the DEA indicated an excess in its allocation by 57.90%. Besides excess in input variables allocation, inefficiency of tax collection in UPPB Sumbawa determined by efficiency score of output variable which was not achieved, that is, tax revenue target for 43,861,205,000.00. The DEA indicated a shortage in its realisation for 5.90%.

In 2016, Bima's UPPD had an efficiency score 54.99%. Factors that led to the inefficiency (54.99%) were the excess of input variables allocation, that is, number of employees by 21. The DEA indicated that there was an excess in term of numbers of employees by 53%. Salary aspect reached 875,549,000.00. DEA calculation indicated that there was an excess of salary allocation by 55.40%. Performance Allowance variable with an achievement at 327,722,550.00.00, the DEA calculation indicated there was an excess in its allocation by 56.50%. Infrastructure variable with an achievement of 5,337,565,332.70, the DEA indicated an excess in its allocation by 45.00%. Besides excess in input variables allocation, inefficiency of tax collection in UPPB Bima determined by efficiency score of output variable which was not achieved, that is, tax revenue target for 39,556,768,000.00. The DEA indicated a shortage in its realisation for 6.00%.

In 2016, Dompu's UPPD had an efficiency score 26.96%. Factors that led to the inefficiency for its UPPD was an excess in input variable allocation such as employes number that reached 16. The DEA calculation indicated an excess in its allocation by 73.00%. The Salary aspect reached 704,354,000.00, DEA calculation indicated that there was an excess of salary allocation by 75.80%. Performance Allowance variable with an achievement at 257,406,625.00, the DEA indicated there was an excess in its allocation by 75.80%. Infrastructure variable with an achievement of 4,915,194,572.70, the DEA indicated that there was an excess in its allocation by 73.90%. Besides excess in input variables allocation, inefficiency of tax collection in Dompu's UPPB was also determined by the value of efficiency score of output variable that had not been achieved such as realization of tax revenue for 17,400,285,530.00. The DEA of its variable indicated a shortage in its realization as much as 7.40%.

Gerung's UPPD in 2016 had an efficiency score of 86.91%. Factors that led to inefficiency for its UPPD was there was an excess in input variable allocation such as employes number at 33. The DEA calculation indicated an excess in its allocation by 38.10%. The Salary aspect reached 1,343,673,600.00, DEA calculation indicated that there was an excess of salary allocation by 39.90%. Performance Allowance variable with an achievement at 489,720,100.00, the DEA indicated there was an excess in its allocation by 39.80%. Infrastructure variable with an achievement of 6,989,896,238.00, the DEA indicated that there was an excess in its allocation by 13.10%. Besides excess in input variables allocation, inefficiency of tax collection in Gerung's UPPB was also determined by the value of efficiency score of output variable that had not been achieved such as target of tax revenue for 73,229,300,000.00. The DEA of its variable indicated a shortage in its realization as much as 18.50%.

Taliwang's UPPD in 2016 had an efficiency score 48.95%. Factors that led to inefficiency for its UPPD was because there was an excess in input variable allocation such as employes number that reached 14. The DEA calculation indicated an excess in its allocation by 51.00%. Salary aspect had an achievement that reached 555,036,300.00, DEA calculation indicated that there was an excess of salary allocation by 51.20%. Performance Allowance variable with an achievement at 223,429,300.00, the DEA indicated there was an excess in its allocation by 55.70%. Infrastructure variable with an achievement of 4,224,243,417.70, the DEA indicated

that there was an excess in its allocation by 51.70%. Besides excess in input variables allocation, inefficiency of tax collection in Taliwang's UPPB also determined by efficiency score of output variable was not achieved such as tax revenue target that hit 26,293,098,000.00. The DEA of its variable indicated a shortage in its realization as much as 10.80%.

Tanjung's UPPD in 2016 had an efficiency score 35.40%. Some factors that led to inefficiency for its UPPD was because there was an excess in input variable allocation such as employees number that hit the rate 19. The DEA calculation indicated an excess in its allocation by 75.40%. Salary aspect had an achievement that reached 838,452,300.00, DEA calculation indicated that there was an excess of salary allocation by 78.00%. Performance Allowance variable with an achievement at 300,722,250.00, the DEA indicated there was an excess in its allocation by 77.60%. Infrastructure variable with an achievement of 3,962,702,308.00, the DEA indicated that there was an excess in its allocation by 65.00%. Besides excess in input variables allocation, inefficiency of tax collection in Tanjung's UPPB also determined by efficiency score of output variable that had not been achieved such as realization of tax revenue for 8,477,225,620.00. The DEA of its variable indicated a shortage in its realization as much as 138.60%.

| TIUA | Variable | Original | Radial | Slack | Projected | Efficiency |
|---------|-------------|-----------|----------|------------|-----------|------------|
| | | Value | Movement | Movement | Value | level |
| LTSU of | Tax Target | 72,139 | 0.000 | 0.000 | 72,139 | 0.846 |
| Gerung | Tax | 73,540 | 0.000 | 1,736 | 75,276 | - |
| | Realization | | | | | |
| | Salary | 671,464 | -103,691 | 0.000 | 567,773 | - |
| | Subsidy | 193,933 | -29,948 | -1,678 | 162,307 | - |
| | Incentive | 791,128 | -122,170 | -29,854 | 639,103 | - |
| | Number of | 5,049,087 | -779,708 | -1,128,871 | 3,140,509 | - |
| | Media | | | | | |
| | Number of | 0.02 | 0.00 | -0.01 | 0.01 | _ |
| | Staff | | | | | |
| LTSU of | Tax Target | 66,396 | 0.000 | 687 | 67,083 | 0,820 |
| Praya | Тах | 70,000 | 0.000 | 0.000 | 70,000 | - |
| | Realization | | | | | |
| | Salary | 644,196 | -116,214 | 0.000 | 527,982 | |
| | Subsidy | 187,800 | -33,880 | -2,989 | 150,932 | |
| | Incentive | 745,548 | -134,498 | -16,736 | 594,313 | |
| | Number of | 3,767,106 | -679,594 | -167,099 | 2,920,413 | - |
| | Media | | | | | _ |
| | Number of | 0.02 | 0.00 | -0.01 | 0.01 | |
| | Staff | | | | | |
| LTSU of | Tax Target | 105,697 | 0.000 | 3,672 | 109,369 | 0,920 |
| Sumbaw | Тах | 114,124 | 0.000 | 0.000 | 114,124 | |
| а | Realization | | | | | _ |
| | Salary | 935,378 | -74,587 | 0.000 | 860,791 | |
| | Subsidy | 282,042 | -22,490 | -13,482 | 246,071 | - |
| | Incentive | 1,134,029 | -90,427 | -74,668 | 968,934 | |
| | Number of | 6,465,005 | -515,518 | - | 4,761,274 | - |
| | Media | | | 1,188,213 | | _ |
| | Number of | 0.02 | 0.00 | -0.01 | 0.01 | |

Table 3 Contribution on each Output Variable and Input Variable to Reach the Efficiency Score in each Technical Implementation Unit of Agency

| TIUA | Variable | Original | Radial Mexement | Slack | Projected | Efficiency |
|----------|---------------------|--|--------------------|----------|-----------|------------|
| | Ctoff | value | wovement | wovement | value | level |
| ITSU of | Julii Tay Targot | 70 207 | 0.000 | 2 0 2 6 | 02112 | 0.940 |
| Bima | | 9,307 | 0.000 | 2,030 | 95 71/ | 0,049 |
| Dima | Realization | 05,714 | 0.000 | 0.000 | 05,714 | |
| | Salary | 761 698 | -115 192 | 0.000 | 646 506 | - |
| | Subsidy | 241 094 | -36 461 | -19.819 | 184 814 | - |
| | Incentive | 995.433 | -150,540 | -117,165 | 727,728 | - |
| | Number of | 4.643.501 | -702.239 | -365,258 | 3.576.004 | - |
| | Media | .,, | | | | |
| | Number of Staff | 0.02 | 0.00 | -0.01 | 0.01 | - |
| LTSU of | Tax Target | 42.503 | 0.000 | 0.000 | 42.503 | 0.197 |
| Dompu | Tax | 40,334 | 0.000 | 4,017 | 44,351 | |
| • | Realization | | | · | · | |
| | Salary | 1,697,361 | -1,362,839 | 0.000 | 334,522 | - |
| | Subsidy | 542,316 | -435,435 | -11,253 | 95,628 | - |
| | Incentive | 2,279,738 | -1,830,440 | -72,750 | 376,548 | _ |
| | Number of Media | 1,844,699 | -9,510,306 | -484,061 | 1,850,331 | _ |
| | Number of | 0.04 | -0.03 | 0.00 | 0.01 | - |
| LTSU of | Tax Target | 34 779 | 0.000 | 5 4 9 5 | 40 274 | 0.495 |
| Geruna | Tax | 42.025 | 0.000 | 0.000 | 42.025 | |
| g | Realization | ,0_0 | 0.000 | 01000 | , | |
| | Salary | 680,682 | -343,646 | -20,059 | 316,978 | - |
| | Subsidy | 201,201 | -101,577 | -9,011 | 90,613 | - |
| | Incentive | 806,853 | -407,344 | -42,709 | 356,800 | - |
| | Number of | 3,540,963 | -1,787,672 | 0.000 | 1,753,291 | _ |
| | Number of | 0.02 | 0.01 | 0.01 | 0.01 | - |
| | Staff | 0.02 | -0.01 | -0.01 | 0.01 | |
| LTSU of | Tax Target | 13,320 | 0.000 | 1,095 | 14,415 | 0,088 |
| Taliwang | Tax Realization | 15,042 | 0.000 | 0.000 | 15,042 | |
| | Salary | 1,286,563 | -1,173,107 | 0.000 | 113,456 | - |
| | Subsidy | 441,092 | -402,194 | -6,465 | 32,433 | - |
| | Incentive | 1,944,495 | -1,773,019 | -43,766 | 127,709 | - |
| | Number of Media | 9,791,714 | -8,928,230 | -235,929 | 627,555 | |
| | Number of | 0.030 | -0.027 | -0.001 | 0.002 | - |
| | Staff | | | | | |
| LTSU of | Tax Target | 9,116 | 0.000 | 0.000 | 9,116 | 0,050 |
| Tanjung | Tax Poalization | 3,895 | 0.000 | 5,617 | 9,512 | |
| | Salary | 1 681 006 | -1 507 027 | -12 222 | 71 7/0 | - |
| | Subsidy | 51/ 707 | -1,377,037 | -12,222 | 20 510 | - |
| | Incentive | 2 1 3 6 0 7 7 | -400,770 | -3,200 | 80 762 | - |
| | Number of | 7 944 790 | -7 547 933 | 0,000 | 396 857 | - |
| | Media | ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,, | 1,07,1700 | 0.000 | 570,037 | |
| | Number of Staff | 0.040 | -0.038 | -0.001 | 0.001 | - |

Source : Secondary data, managed in 2017.

Measurement of efficiency of regional tax collection is determined by the capitalization of implementation units in maximizing output variables and minimizing input variables. In order to improve the relative efficiency rate of UPTB, it could be conducted in terms of both input and output. Theoretically, this condition was introduced in previous study, and is relevant to the opinion of Suswinarno (2013). He suggested that efficiency occurs if a company or implementation unit produces maximal output by utilizing certain input.

This current study is relevant to statements of James Akazili et al. (2002) which suggested that in Ghana, besides output variables was not high at rate, inefficiency was also determined by excess resources utilization. Additionally, Alvarado (2006) suggested that efficiency will be achieved if output variables are increased. In order to improve efficiency score, comprehensive regulation and policy are required, both regarding the determination of the amount of the target of local tax revenue based on each potential UPTB and placement of quality resources in accordance with needs analysis of each UPTBs. This is in line with the opinion of Sutawijaya (2009) stating that to increase efficiency, you must be able to optimize the use of inputs up to 100%.

CONCLUSION

Based on result of the study, it can be concluded that eight UPTBs in Regional Income Management Agency of NTB suffered from inefficiency that were determined by lack of capability to make a plan for regional income target and incapability to realize predetermined target. In addition, inefficiency caused by human resources of each UPTBs was not relevant with adequate functional formation analysis that led to an excess in operational cost such as salary and allowance. To overcome these problems, each UPTB should rationalize human resources both based on real requirements on basis of UPTBs' capabilities and functional formation analysis in order to achieve efficiency of regional tax collection.

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