

# Analysis of the Staffing Needs Division in a Persero Company Using the Workload Indicator Staffing Needs (WISN) Method

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## Abstract

**Purpose** – This research aims to find out the needs of employees or human resources at PT PLN UIP Tanjung Jati B Jepara based on the WISN method and find solutions to problems related to employees or human resources from WISN calculations.

**Methodology** – The workload calculation method at PT PLN UIP Tanjung Jati B uses the WISN (Workload Indicator Staffing Need) workload calculation. Calculations using WISN are easy to do with validity and reliability that have been measured valid and reliable.

**Originality** – This study analyzed human resource needs at one of the large state-owned companies, namely PT PLN Tanjung Jati B Jepara, which was carried out to improve excellent service to the company.

**Findings and Discussion** – The workload using the WISN method, PT PLN UIP Tanjung Jati B Jepara, has a workforce of 81 people. The total number of gaps from the WISN calculation results is 20 people or less than 20 staff.

**Conclusion** – Utilizing the WISN method at PT PLN UIP Tanjung Jati B Jepara highlighted a workforce gap of 20 employees in a total staff of 81. Addressing this gap is essential for optimizing operational efficiency and enhancing service quality. This study underscores the importance of strategic human resource planning to meet organizational demands, ensuring continued success and service excellence at PT PLN Tanjung Jati B Jepara.

**Keywords:** Management, human resource, excellent service, staffing needs, workload

## Introduction

One of the state-owned companies in Indonesia is the State Electricity Company (PT. PLN). PT. PLN as a provider of electrical energy services for the community is required to continually provide quality in its managerial processes and services to the community so that the community as consumers will feel satisfied. With a wide range of consumers, companies must provide the best service so that employees' workload becomes greater (Nasution & Perekonomian, 2022). Job descriptions in the company are made to facilitate the implementation of each employee's main tasks and functions, which are

translated into daily activities.

If not corrected, various problems related to community service will result in the organization not running well, especially for the benefit and satisfaction of customers (Persellin et al., 2019). Besides that, they must also be responsible to stakeholders, especially the government as the owner of PLN, for the successful management of PLN. It is necessary to analyze the workload, formation, number, and quality of non-structural and functional personnel so that there are no gaps between the workload that must be carried out and the number of workers needed (Ali et al., 2022). This analysis is by the organizational structure and governance of PT PLN UIP Tanjung Jati B Jepara. Calculating workload using the workload indicator of staffing needs (WISN) is used because calculating the number of human resources needs is based on the workload that must be carried out and is his responsibility so that the allocation of labor will be more straightforward and rational.

In the dynamics of organizational management, ensuring an optimal balance between workforce capacity and operational demands becomes a necessity for sustainable efficiency and customer satisfaction. This research builds a strong foundation by detailing previous research support, as well as exploring further at PT PLN UIP Tanjung Jati B Jepara. The main goal is to understand in more depth the personnel and human resource needs within the organization. The approach adopted in this research is rooted in the Workload Indicator of Staffing Needs (WISN), a methodological framework designed to assess and quantify human resource needs based on existing workload (Mann et al., 2020). Previous research supports showing that this approach has been proven effective in similar contexts, providing a solid foundation for this research (Maulana et al., 2022). Through detailed examination in the field, this research aims to gain better insight into workforce dynamics, organizational structure and functionality at PT PLN UIP Tanjung Jati B Jepara. In addition, this research is also committed to providing concrete solutions to specific challenges and problems identified through WISN calculations.

By realizing the important role of an efficient workforce in achieving organizational success, the findings from this research are expected to provide a valuable contribution to decision making, stakeholders and human resource management practitioners (Aurora, 2021). Thus, this research not only explores potential improvements in personnel allocation and management, but also enriches the scientific literature with a deeper understanding of the specific context of PT PLN UIP Tanjung Jati B Jepara. Therefore, this research aims to find out the needs of employees or human resources at PT PLN UIP Tanjung Jati B Jepara based on the WISN method and find solutions to problems related to employees or human resources from WISN calculations.

## Literature Review

### Management

Management is a process to realize the desired goals. Some definitions of management according to experts:

1. Management is a specific process of planning, organizing, directing, and controlling actions to determine and achieve predetermined targets using the company's human resources and other resources (Nurhayati & Supomo, 2018).
2. Management is the science and art of managing the process of utilizing human resources and other sources effectively and efficiently to achieve a specific goal (Hasibuan, 2005).
3. Management is a set of processes that can keep a complicated system of people and technology running smoothly. The most critical aspects of management include planning, budgeting, staffing, controlling, and problem-solving (Kotter, 2014).

Based on several definitions of management from experts, management is the science and art used to regulate utilizing human and other resources effectively and efficiently to achieve the goals set. Management functions are related activities so that one activity becomes a condition for others. The functions of management, planning, organizing, leading, and controlling functions (Bateman & Snell, 2014).

### **Human Resource Management**

Human resource management is a strategy for implementing management functions ranging from planning, organizing, leading, and controlling every operational activity of the Company's Human Resources starting from the process of selection, training, and development to termination of employment, which is aimed at increasing the productive contribution of organizational human resources to achieve organizational goals more effectively and efficiently (Nurhayati & Supomo, 2018).

### **Organizational development**

Organizational development is a planned change of an organization, including its system, that is directed further to improve its effectiveness (Azwar, 1996). In contrast, according to Scanlan (Azwar, 1996). Organizational development is an effort that is supported by leadership to increase the effectiveness of the system (organization) as a whole through a series of actions that have been planned. Human resource development aims to provide optimal service needs to the community to achieve high satisfaction. Human resource development is often oriented toward physical facilities and equipment, but one needs to understand the importance of developing human resources (Wahid, 2003).

Organizational management is a system that includes input, process output, and outcome. Inputs are in the form of infrastructure/equipment, sources of funds/financing and human resources, processes in the form of various series of procedures/activities carried out in an organization, and output in the form of results from services/activities, outcomes in the form of satisfaction or dissatisfaction from service users (Soejitno et al., 2002). Excellent service is required to achieve optimal outcomes in customer satisfaction. The terms of excellent service are trustworthy, responsive,

customers feel valued, empathetic, and competent/employees according to their fields (Aditama, 2004). The factors that influence organizational development are internal factors (for example, the addition or reduction of employees, addition or reduction of activities, and addition or reduction of goals, including employee or leadership dissatisfaction) and external factors (for example changes in government policy, changes in technology or changes in society/environment) (Azwar, 1996).

### **Workload**

The workload arises from the interaction between the demands of tasks, the work environment used by coworkers, skills, behavior, and workers' perceptions (Hannani, 2016). Meanwhile, The states that workload is several activities that must be completed by an organizational unit or position holder systematically by using job analysis techniques, workload analysis techniques, or other management techniques within a certain period to obtain information about the efficiency and effectiveness of the work of an organizational unit (Ellyzar et al., 2017).

The workload is given to the workforce or employees to be completed at a particular time using the workforce's skills and potential (Munandar, 2014). The workload is the difference between the capacity or ability of workers with the demands of work that must be faced. Given that human work is mental and physical, each has a different level of loading (Anggit & Heru, 2014). The workload is the volume of work results or records of work results that can show the volume produced by several employees in a particular division (Moekijat, 2010). Based on several definitions of workload, workload arises due to several activities or tasks that employees must complete systematically using skills that must be completed on time. In large companies, it is necessary to carry out workload analysis for each workload with the aim (Koesomowidjojo, 2017) of determining the number of workforce requirements, improving job duties, improving organizational structure, improving Standard Operating Procedures (SOP), and determine Standard Time Duties and Activities of employees or employees.

The workload consists of physical load, mental load, and time load (Munandar, 2014). According to Ilyas three ways can be used to measure workload: work sampling, study time and motion, and the daily log (Krisna, 2012).

### **Human Resource Planning**

Human resource planning estimates the number of human resources based on the location, skills, and behavior needed to provide services (Ilyas, 2011). This planning is a particular activity related to determining the needs of the organization's human resources, both short-term and long-term (Hariandja, 2017). Human resource planning determines strategies to obtain, utilize, develop, and maintain human resources according to current organizational needs and future development (Nawawi, 2016). Factors that must be considered in human resource planning are (Dessler, 1998):

1. Employee rotation as a result of resignation and termination of employment with the company
2. The quality and character of employees
3. Decisions to improve the quality of products or services or enter into new markets
4. Technological and administrative changes that result in increased productivity
5. Financial availability.

The purpose of human resource planning is to answer problems that arise from human resources within the organization within the organization (Alwi, 2001). Planning for human resources requirements accompanied by workload calculations is carried out through an analysis of the human resources situation, an analysis of labor supply, an analysis of human resources needs, and an analysis of gaps (Ilyas, 2011). The analysis of labor supply includes the availability of employees within the organization, potential losses due to wasting employees, the effects of employee absences, sources of supply from within the organization, and sources of supply from outside the organization (Armstrong, 2003).

Human resources requirement analysis and gap analysis are related to workload. Workload analysis is a technique developed to measure the weight of a task or job to be used to determine personal needs and the size of an organizational unit. One of the workload calculation methods is the daily log. A daily log is a simple work sampling in which the person under study writes down the activities and time spent on these activities (Ilyas, 2011).

One of the methods used in analyzing human resources requirements planning is the Workload Indicator Staffing Need (WISN) method. The states that to implement short-term workforce needs plans, and organizations need to respond to service needs at the same time to help develop the achievement of long-term goals (Shipp, 1998). Calculation of human resources requirements using the WISN method is based on the work carried out by the staff/employees. Each unit has its workload pattern, which is different from one another. For each type of workload, we can define a standard activity.

The steps for calculating human resource requirements based on WISN include Five steps, namely (Shipp, 1998):

1. Determine available work time  
Available time =  $\{ A - (B+C+D+E) \} \times F$   
Information :  
A = Workdays  
B = Annual leave  
C = Education and training  
D = National holiday  
E = Absence from work  
F = Working time

2. Define work units and HR categories

3. Develop workload standards

The workload standard is the volume/quantity of workload for one year

per category:

$Workload\ Standard = (Available\ Working\ Time)/(Average\ Principal\ Activity\ Time)$

4. Develop a standard of leeway

$Leisure\ Standard = (average\ time\ per\ allowance\ factor)/(Available\ Working\ Time)$

5. Calculation of labor requirements per work unit.

$Human\ Resource\ Needs = (Main\ Activity\ Quantity + Leisure\ standard)/(Workload\ standard)$

## Methods, Data, and Analysis

**The workload calculation method at PT PLN UIP Tanjung Jati B uses the WISN workload calculation.**

Calculations using WISN are easy, and the validity and reliability have been measured as valid and reliable. The steps using the WISN method are as follows:

1. Step 1: Define WISN goals  
Selection for the use of WISN:
  - a. The human resources category at PT PLN UIP Tanjung Jati B
  - b. Types of facilities, infrastructure, and work tools
  - c. Geography
2. Step 2: Estimating Working Time
  - a. Calculate the number of working days in a year
  - b. Estimate the number of public holidays, annual leaves, and absences in a year.
  - c. Subtract the number of days worked per year by the number of days not worked, obtained working time available for each category of human resources for 1 (one) year.
3. Step 3: Define work components  
Determine the main activities per category of human resources PT PLN IUP Tanjung Jati
4. Step 4: Setting Activity Standards  
Standard of activity: The time required for a member of a specific category of personnel who is well educated, well trained, and motivated to carry out activities by professional standards and conditions in the company. Work standards match the job description.
5. Step 5: Calculating Standard Workload  
Workload Standard: The amount of time a person spends working (in one activity) in a year or the volume/quantity of main activities that can be done over one year by each category of human resources in each work unit. Standard workload = available work time divided by the

average time per main activity.

6. Step 6: Calculating Allowance Standards

Allowance standards are the time required to carry out activities due to routine obligations or needs, obtaining the time requirements of each category of human resources to complete each leeway factor or activities that are not/less directly related or not influenced by high or low quantity or amount main activity, such as breaks for meals and worship, morning coffee or morning gatherings and afternoon gatherings and so on by company regulations. Standard allowance = average time per allowance factor divided by available working time.

7. Step 7: Calculating Labor Requirements

Obtained the number of each category of labor needed to work on the entire load of activities in each work unit in the company for a year, namely: energy requirements = quantity of main activities divided by standard workload plus allowance factor

8. Analysis of Labor Needs (HR)

Obtain information on the adequacy, shortage, and excess of labor and alternatives for utilization and fulfillment in each work unit.

**Use of WISN results**

There are two types of comparisons:

- a. The difference between the absolute number and the need for labor, the result will appear as less or more labor requirements.
- b. The ratio between the reality and the need for labor (WISN ratio) is the visible state of the labor category.

WISN ratio = 1: sufficient human resources

WISN ratio less than 1: not enough human resources

WISN ratio greater than 1: more than the requirement

**Table 1.** Example: The need for labor in each field

No	Field	Real Staff	Need	Mark	WISN Ratio	Power Problem State	Follow-Up
1.	A	5	6.25	-1.25	0.8	Lack of staff	Recruitment
2.	B	3	1.50	+1.50	2.0	Excess staff	Mutation
3.	C	12	10.00	+2.80	1.2	Excess staff	Mutation
4.	D	8	8.00	0	1.0	In accordance	

**Implement WISN**

Each professional category applies WISN within their group or field. Each group of professional categories or fields then reports the results to all categories. When working together, these groups can also work together to eliminate this overlap.

- 1. Identify staff categories in all fields who will fill out workload forms, namely all PT PLN Tanjung Jati B Jepara staff except GM and SM.
- 2. Gather all designated staff to fill out workload forms.

3. Implement WISN by following all the steps per the WISN Guidelines.
4. Each professional group or category reports the results of their calculations. On this occasion, the calculation errors can be corrected, and parts that are not understood can be explained again.
5. Results analysis. Calculates the difference between the state of employment and the WISN ratio.

## Results

The results of calculating the workload of PT PLN UIP Tanjung Jati B Jeparu using the WISN method per field can be written as follows:

### A. Engineering field

**Table 2.** Final Result of Engineering Field Workload Calculation

No.	Department	Name	workers	Current Number of Employees	WISN results	Gaps	WISN value
I	Engineering						
	Senior Manager Engineering	Marsudi San Tosa Edi	1	1	0	0	0
	Senior Engineer 2/ Engineer Engineering Change Project		1	0	0	0	0
	Administration Assistant Officer/Junior Officer		1	0	0	0	0
A	Engineering Manager	Yusvi Adi Mustofa	1	1	1	0	1.4228
	Engineer/Assistant Engineer/Junior Engineer Analysis and Evaluation of Mechanical Systems	Budiman Raharja	1	1	1	0	1.0032

	Engineer/ Assistant Engineer/ Junior Engineer Electrical System Analysis and Evaluation	I Gede Arya Prata ma	1	1	1	0	1.0957
	Engineer /Assistant Engineer/ Junior Engineer Analysis and Evaluation of Control Systems and Instru ments		1	0	0	0	0
	Efficiency Improve ment Engineer/ Assistant Engineer /Junior Engineer		1	0	0	0	0
B	Renko And Risk Manager	Muha mmad Iqbal	1	1	2	-1	1.6956
	Perfor mance Analyst/Assis tant Analyst/Ju nior Analyst and Management Reporting		1	0	0	0	0
	Analyst/Assis tant Analyst/Ju nior Analyst for Risk Management and Planning	Indar tri Vian dari	1	1	2	-1	1.8615
	Engineer/ Assistant Engineer/ Junior Engineer for Power Plant Operation and Mainte	Anu grah Pu tranto	1	1	2	-1	1.7948

nance  
Planning

C	Manager of Quality and Business	Adi Triharso	1	1	1	0	1.4933
	Engineer/ Assistant Engineer/ Junior Engineer		1	0	0	0	0
	Asset Management Analyst/ Assistant Analyst/ Junior Analyst	Reza Firdian Mardiansyah	1	1	3	-2	2.9073
	System Integration Management						
<b>Total</b>			<b>15</b>	<b>8</b>	<b>13</b>	<b>-5</b>	

From the results of calculating the workload using the WISN method in the engineering field in **Table 2**, judging from the number of available workers, there is a gap, namely a need for more than five staff. In contrast, if you want to be ideal according to the organizational structure, there is a gap: a need for six more staff. So it is necessary to carry out selection and recruitment to meet the workforce's needs so that gaps do not occur and staff are not overloaded in completing work according to the job description. While the data suggests a need for at least five additional staff, the discrepancy between WISN calculations and ideal structure highlights the importance of further analysis before initiating recruitment (Gopalan et al., 2021). From the data above, one person still needs to fill out the workload form, namely the Engineering Senior Manager. Hence, the total workforce available was reasonable with the WISN calculation results. Also, the gaps did not match.

**B. Production Sector**

**Table 3.** Final Result of Calculation of Workload in the Production Sector

No	Department	Name	Employees	Current number of employees	WISN results	Gaps	WISN value
II	Production						
	Senior Production Manager	Ahadi	1	1	0	0	0
	Assistant Officer/ Junior Officer Administration		1	0	0	0	0
A	Operations and Maintenance Manager Unit 1-2	Ronniko Agus FS	1	1	1	0	1.3277
	Operations Performance Engineer/Assistant Engineer		1	0	0	0	0
	Engineer/Assistant Engineer/Junior Engineer for Operations Control	Ahmad Pramutadi	1	1	1	0	1.1748
	Assistant Manager Operations and Maintenance Unit 1-2	Eko Ahadyat	1	1	1	0	1.4178
	Mechanical Maintenance Control Engineer/Assistant Engineer/Junior Engineer	M. Akbar Pradipto	1	1	1	0	1.4006

	Electrical Maintenance Control Engineer/Assistant Engineer/Junior Engineer		1	0	0	0	0
	Engineer/Assistant Engineer/Junior Engineer Control and Instrument Maintenance Control	Rendy Ardian syah	1	1	1	0	1.3287
B	Operations and Maintenance Manager Unit 3-4	Sutomo	1	1	1	0	0.6256
	Operations Performance Engineer/Assistant Engineer		1	0	0	0	0
	Engineer/Assistant Engineer/Junior Engineer for Operations Control	Muham mad Firdaus	1	178	1	0	0.9511
	Assistant Manager Operations and Maintenance Unit 3-4	Ardian Krisnu Murti	1	1	1	0	1,212
	Mechanical Maintenance Control Engineer/Assistant Engineer/Junior Engineer	Krisna Apriandi S.	1	1	2	-1	1.5794

	Electrical Maintenance Control Engineer/As sistant Engineer/Ju nior Engineer	Janu Sejati Wahyu P.	1	1	2	-1	1.5794
	Engineer/As sistant Engineer/Ju nior Engineer Control and Instrument Maintenance Control		1	0	0	0	0
C	Logistics Manager Unit 1-2	Said U. Wiran dono	1	1	1	0	1.3606
	Engineer/As sistant Engineer/Ju nior Engineer for Logistics Planning and Control	Reza Maulid Ghiffary	1	1	1	0	1.4051
		Catur Sujoko		1	2	-1	2,286
D	Unit 3-4 Logistics Manager	Budi Setyono	1	1	1	0	0.395
	Engineer/As sistant Engineer/Ju nior Engineer for Logistics Planning and Control	Totok Sukarnoto	1	1	1	0	1.1449
		Teuku Reza Maulana	0	1	1	0	1.4188
<b>Total</b>			<b>20</b>	<b>17</b>	<b>19</b>	<b>-3</b>	

From the results of calculating the workload using the WISN method in the production sector in **Table 3**, judging from the number of available workers and the ideal according to the organizational structure, there is a gap, namely a need for three staff. So, it is necessary to carry out selection and recruitment to meet the workforce's needs so that gaps do not occur and staff are not overloaded in completing work according to the job description. While the current personnel might appear sufficient if considering both WISN calculations and ideal structure, neglecting the unfilled workload form by the production senior manager raises concerns about the gap analysis accuracy (Weisshaar & Cabello-Hutt, 2020). Therefore, completing the missing data and

reevaluating the recruitment needs is crucial to ensure optimal staffing and prevent future workload imbalances (Cao et al., 2019). From the data above, one person still needs to fill out the workload form, namely the Production Senior Manager, so the total number of available workers is reasonable with the results of the WISN calculation. Also, the gap does not match.

**C. Primary Energy Field**

**Table 4.** Final Result of Calculation of Workload in the Primary Energy Sector

No	Department	Name	Employees	Current number of employees	WISN results	Gaps	WISN value
III	Primary Energy						
1	Primary Energy Senior Manager	Kuswara	1	1	0	0	0
2	Assistant Officer/ Junior Officer Administration			0	0	0	0
A	Manager of Primary Energy and Port Unit 1-2	Amrul Hakim	1	1	1	0	1.3273
1	Engineer/Assistant Engineer/Junior Engineer for Primary Energy Planning and Control	Heru Setiawan	1	1	2	-1	1.5073
2	Engineer/Assistant Engineer/Junior Engineer for Planning and Control of Primary Energy Transportation	Boby Himawan P.	1	1	2	-1	1.5349

3	Port Control Engineer/Assistant Engineer/Junior Engineer		1	0	0	0	0
B	Manager of Primary Energy and Port units 3-4	Presley R. Palodongan	1	1	1	0	1.3712
	Engineer/Assistant Engineer/Junior Engineer	Ruhsihan Anwar	1	1	1	0	1.0954
1	Engineer for Primary Energy Planning and Control	Rahmad Setya Darmawan	0	1	1	0	0.7796
2	Engineer/Assistant Engineer/Junior Engineer for Planning and Control of Primary Energy Transportation		1	0	0	0	0
3	Port Control Engineer/Assistant Engineer/Junior Engineer		1	0	0	0	0
Total			9	7	8	-2	

From the results of calculating the workload using the WISN method in the primary energy sector in **Table 4**, judging by the number of available workers and the ideal according to the organizational structure, there is a gap, namely two staff less. So, it is necessary to carry out selection and recruitment to meet the workforce's needs so that gaps do not occur and staff are not overloaded in completing work according to the job description. By strategically crafting the sentence, it can effectively communicate the critical need for selection and recruitment to avoid negative consequences for the organization (M & Gonzales, 2021). From the data above, one person did not fill out the workload form, namely the Senior Manager of Primary Energy, so the total available workforce is reasonable with the results of the WISN calculation. Also, the gap does not match.

**D. Human Resources, Finance, and Administration**

**Table 5.** Final Result of Calculation of Workload in Finance, Human Resources, and Administration

No	Department	Name	Employees	Current number of employees	WISN results	Gaps	WISN value
IV	Finance, Human Resources, and Administration						
	Senior Manager of Finance, Human Resources and Administration	Sofyan	1	1	0	0	0
1	Analyst/Assistant Analyst/Junior Analyst Analysis and Evaluation of Financial Performance and Human Resources		1	0	0	0	0
2	Assistant Officer/Junior Officer Administration		1	0	0	0	0
A	Communication Assistant Manager	Grahita Muhamad	1	1	3	-2	2.7852
1	Analyst/Assistant Analyst/Junior Analyst for Communication and Public Relations		1	0	0	0	0
2	Assistant Officer/Junior Officer of Documentation and Libraries		1	0	0	0	0
B	CSR Assistant	Mahaputra	1	1	3	-2	3.1167

	Manager	Revelation					
1	Analyst/Assistant Analyst/CSR		1	0	0	0	0
C	Human Resources and General Manager	Joko Purwanto	1	1	1	0	0.9672
	Assistant Manager of Human Resources	Dani Puji Astuti	1	1	1	0	1.1810
1	Analyst/Assistant Analyst/Junior Analyst of Human Resources Development		1	0	0	0	0
2	Assistant Officer/Junior Officer of Human Resources Administration	Esti Fatmawati	1	1	1	0	1.3598
	General Assistant Manager	Dyah Esa Irsyada	1	1	1	0	1.4476
1	Assistant Officer/Junior Officer Secretariat	Aditawan Budi N. Happy John K.	1 0	1 1	1 1	0 1	0.9039 0.5871
D	Financial manager	Sumarni	1	1	1	0	1.0510
	Tax Control Analyst/Assistant Analyst/Junior Analyst	Ibn Wicaksana	1	1	2	-1	1.6529
	Assistant Manager of Financial Control	Ahmad April S.	1	1	1	0	1.4833
1	Financial Control Analyst/Assistant Analyst/Junior Analyst	Tristan Hasyim J Awang Budiharja	1 0	1 1	0 1	0 0	 1.1921
2	Analyst/Assistant	Yulidar Wahyu	1	1	0	0	

	Analyst/Junior Analyst Administration and Cash Management	Mahta Ika Yunita	0	1	2	-1	1.5661
E	Budget and Commerce Manager	Andiana Widiarta P.	1	1	1	0	1.0512
1	Budget Analyst/Assistant Analyst/Junior Analyst	Arfian Galih Handoko	1	1	1	0	1.3169
2	Analyst/Assistant Analyst/Junior Analyst for Insurance and Commerce		1	0	0	0	0
F	Accounting Manager	Tri Prabowo	1	1	1	0	0.9311
	Accounting Assistant Manager	Nurhayati	1	1	1	0	1.4705
1	Accounting Analyst/Assistant Analyst/Junior Analyst	Harris Fujiari	1	1	2	-1	1.5258
<b>Total</b>			<b>25</b>	<b>21</b>	<b>25</b>	<b>-7</b>	

From the results of calculating the workload using the WISN method in engineering in **Table 5**, it can be seen from the number of available workers that there is a gap of 7 staff, whereas if you want to be ideal according to the organizational structure there is a gap of 4 staff. While recruitment is crucial, addressing the missing workload data from the three individual is equally important before making hiring decisions (Gul et al., 2020). So, it is necessary to carry out selection and recruitment to meet the needs of the workforce so that gaps do not occur and staff are not overloaded in completing work according to the job description. Their omitted data could significantly alter the gap analysis and recruitment needs, ensuring a more comprehensive and accurate understanding of the actual workforce situation (Sasrisom & Weerapaiboon, 2022). From the data above, there are three who did not fill out the workload form, namely the Senior Manager of Human Resources, Assistant Analyst for Financial Control, and Assistant Analyst for Administration and

Cash Management so that the total available workforce is reasonable with the WISN calculation results and also the gap is not appropriate.

**E. Procurement Bure**

**Table 6.** The Final Result of the Calculation of the Workload of the Procurement Bureau

No	Department	Name	Employees	Current number of employees	WISN results	Gaps	WISN value
V	Procurement						
A	Procurement Planning Officer	Jatie Kun cara	1	1	1	0	0.7456
1	Procurement Analyst/Assistant Analyst/Junior Analyst	Cantika Ros dianita	1	1	2	-1	1.7333
B	Procurement Executive Officer	Agus Sulistyono	1	1	1	0	1.3689
1	Procurement Implementation Analyst/Assistant Analyst/Junior Analyst	Brilliansyah Tri Nugraha	1	1	2	-1	2.47
2	Assistant Officer/ Junior Officer of Procurement Administration	Ima Kharis mawati	1	1	1	0	1.2678
<b>Total</b>			<b>5</b>	<b>5</b>	<b>7</b>	<b>-2</b>	

From the results of calculating the workload using the WISN method of the Procurement Bureau in **Table 6**, it can be seen from the number of available workers that there is a gap, namely two staff less. So, it is necessary to carry out selection and recruitment to meet the workforce's needs so that gaps do not occur and staff are not overloaded in completing work according to the job description. While recruitment will address immediate workload concerns, aligning staffing with the ideal organizational structure requires further analysis of workflow inefficiencies or possible structural adjustments (Kamau, 2022). However, ideally, there is no gap according to the organizational

structure.

**F. Occupational Health Safety and Environment (OHSE)**

**Table 7. Final Results for Calculating the Workload of the OHSE Bureau**

No	Department	Name	Employees	Current number of employees	WISN results	Gaps	WISN value
VI Occupational Health Safety and Environment (OHSE)							
A	K3L Operational Officer	Nandi Hidayat	1	1	1	0	1.4996
1	Engineer/Assistant Engineer/Junior Engineer K3		1	0	0	0	0
B	Environmental Operations Officer	Nugroho Adi W.	1	1	1	0	1.4966
1	Engineer/Assistant Engineer/Junior Environmental Engineer	Zanusetiya Abdi Yugo Pranthata	1	1	2	-1	1.6132
0			0	1	1	0	1.1177
C	Security Operations Officer	M. Arifin	1	1	1	0	1.3339
1	Assistant Officer/Junior Security		1	0	0	0	0

Officer				
Total	6	5	6	-1

From the results of calculating the workload using the WISN method in **Table 7**, the Occupational Health and Environmental Safety Bureau, judging from the available workforce and the ideal one according to the organizational structure, there is a gap, namely one less staff. To ensure worker safety and compliance amidst and identified staffing gap, recruiting one additional occupational health and environmental safety professional is paramount (Moyce & Schenker, 2018). So it is necessary to carry out selection and recruitment to meet the workforce's needs so that gaps do not occur and staff are not overloaded in completing work according to the job description.

**G. Functional Expert**

**Table 8.** Final Result of Calculation of Expert Functional Load

No	Department	Name	Employees	Current number of employees	WISN results	Gaps	WISN value
VII Functional Expert							
1	Senior Specialist I Performance /Senior Specialist II Performance	Al Susilo Handoko	1	1	1	0	0.6732
	Administrative Officer/Assistant Officer/Junior Officer		1	0	0	0	0
2	Senior Specialist I/Senior Specialist II Stakeholder Communication and Management	Bambang Daryoso	1	1	1	0	1.3535
3	Compliance Analyst/Assistant Analyst	Kukuh Sudaryatmo	1	1	1	0	1.4825
Total			4	3	3	0	

From the results of calculating the workload using the expert functional WISN method in **Table 8**, there is no gap judging from the number of available workers. In contrast, if you want to be ideal by the organizational structure, there is a gap, namely one less staff. So it is necessary to carry out selection and recruitment to meet the workforce's needs so that gaps do not occur and staff are not overloaded in completing work according to the job description.

Based on the results in **Table 2** to **Table 8**, It can be concluded that the total workforce according to the organizational structure is 85 people, and the total workforce currently available is 68 people. From calculating the workload using the WISN method, a workforce of 81 people is needed with a record of 7 people who did not fill out the workload form: 1 General Manager (GM), 4 Senior Managers (SM), and two finance staff. The total number of gaps from the WISN calculation results is 20 people or less than 20 staff. Despite no immediate gap based on available staff, proactive recruitment is crucial to address the larger WISN-identified gap and prevent future workload overload (Geysen et al., 2018). So it is necessary to carry out selection and recruitment to meet the workforce's needs so that gaps do not occur and staff are not overloaded in completing work according to the job description.

## Conclusion

Based on this research, it can be concluded that:

1. From calculating the workload using the WISN method, PT PLN UIP Tanjung Jati B Jepara has a workforce of 81 people.
2. The total number of gaps from the WISN calculation results is 20 people or less than 20 staff.
3. It is necessary to carry out selection and recruitment at PT PLN UIP Tanjung Jati B Jepara to meet workforce needs so that gaps do not occur and staff are not overloaded in completing work according to the job description.

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