

CHAPTER 5 – CONCLUSIONS AND RECCOMENDATIONS

5.1 Conclusions

1. OTIF achievements since the support point was built, the backlog, re-design delivery, and additional manpower have OTIF above 90 %. The more problems that are resolved from problems that occur in the problem geography or remote area and the completion time is below the specified time standard, the OTIF performance will be good. Conversely, the more problems are resolved but the time to solve it is above the specified time standard, the OTIF Solution performance will be bad. A good performance of the OTIF Solution is a reflection of good product support performance.
2. The results of the research that has been done show that the development of lead time, development of delivery (re design Logistics), backlog, Provide New Support points can increase the ability and speed of mechanics to solve problems that occur in machines and the ability and speed of part delivery will affect the performance On Time in Full (OTIF).
3. Providing New Support Points can increase the effectiveness of support on the obi site. From the results of this research, market product support is detailed based on population and demand commodity trends, then the investment analysis is calculated based on NPV and IRR and it is found that this support point has been Approve to built with a warehouse inventory of 1.5 billion and a dedicated workforce of 16 people, from this data improvement OTIF has reached above 90%.

5.2 Further Improvement

From the research that has been done, there are several things that need to be further improved and developed to obtain more accurate data, improve delivery part, backlog Inventory Management, Warehouse Improvement, and testing of a mechanic competency in order to increase the performance of the OTIF. The following are some recommendations that can be made to optimize this research:

1. To maintain OTIF above 90%, there needs to be improvement in terms of inventory management, backlog management and mechanical competency training to speed up response from customers, and it is necessary to carry out monthly reviews regarding warehouse performance and carry out monthly audits for past moving stock and dead stock.
2. Training with the blended learning method can be carried out in other training modules to accelerate the improvement of warehouse crew, part analys, after sales consultant and mechanic competence across branches by adding time to tutorial and practice sessions, in collaboration with experts in each machine such as Instructors, Technical Consultants, Senior Sales and Senior Mechanics.
3. It is necessary to expand and improve the warehouse, where according to demand calculations in the next 5-10 years there will be an increase in the unit population and that means there will be an increase in the need for parts and mechanics, so that the inventory proces, order process and delivery process can increase customer satisfaction.

GLOSSARY

Product Support: Comprehensive assistance provided for a product, encompassing maintenance, troubleshooting, and other related services to ensure its optimal functionality.

On-Time In-Full (OTIF): A performance metric measuring the timely delivery and completeness of orders, often expressed as a percentage.

DMAIC: An acronym for Define, Measure, Analyze, Improve, Control, representing a structured problem-solving approach used in process improvement initiatives.

Infrastructural Enhancement: The process of improving and upgrading physical structures, facilities, and systems to enhance overall efficiency and functionality.

Nickel Business: Refers to activities related to the extraction, processing, and trading of nickel, a significant metal used in various industries.

South Halmahera: A geographical region located in Indonesia, known for its diverse ecosystems and significant mineral resources.

Site Obi: Specifically refers to the operational site situated on Obi Island, a remote location with unique geographical challenges.

Geographical Challenges: Difficulties and obstacles arising from the physical characteristics and location of a particular area, impacting operational activities.

Quality Improvement: Initiatives aimed at enhancing the overall quality of products, services, or processes within an organization.

Feasibility Study: An assessment of the practicality and viability of a proposed project or initiative, considering economic, technical, and operational factors.

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CURRICULUM VITAE

GEDE BAYU BANDIS PRATAMA was born in Penarukan 11 December 1995. The author is the 1st of 3 children in the family. Grew up in Singaraja and completed formal education at elementary school level at SDN 3 Penarukan, junior high school level at SMPN 3 Singaraja and high school level at SMAN 1 Singaraja until continuing his education at the Sepuluh Nopember Institute of Technology Surabaya. The author was accepted into the Department of Marine Engineering, ITS Faculty of Marine Technology in 2013 through the SNMPTN route. In the Department of Naval Engineering, the author took the study field of Naval Engineering - Ship Design. During his study period at ITS, the author was active in the Marine Engineering Student Association (HIMATEKPAL) as Department of Home Affairs Staff 2014-2015, and was Deputy Daily Chair of TPKH-ITS in 2015-2016. His committee involvement in events at the Institute includes being the Coordinator of the LOKARINA SAMPAN 8 ITS Event in 2014, Steering Committee in the TPKH GAMES event in 2015. The author also took part in several trainings, both soft skill formation training such as LKMM and training that supports academic needs during lectures, such as AutoCAD and Maxsurf software training. The author started working at PT ABC from 2018 until now, working as an After Sales Consultant.

Email : bayubandispratama@gmail.com

Phone : +62 852 1155 9846