

## Research Article

Gladdays Naurah<sup>1\*</sup>, Diana Pratiwi<sup>2</sup>, Tia Ariani Salsabila<sup>3</sup>, Rino Orleans Adam<sup>4</sup>, Muhammad Nurrochman<sup>5</sup>, Vip Paramarta<sup>6</sup>

# Knowledge Management and its Implementation in the Human Resources Unit of the Palembang Muhammadiyah Hospital

\*Corresponding Author: **Gladdays Naurah**: Universitas Sangga Buana YPKP Bandung; [gladdaysnaurah27@gmail.com](mailto:gladdaysnaurah27@gmail.com)

**Diana Pratiwi**: Universitas Sangga Buana YPKP Bandung; [dianapratiwi14068993@gmail.com](mailto:dianapratiwi14068993@gmail.com)

**Tia Ariani Salsabila**: Universitas Sangga Buana YPKP Bandung; [tia.arianisalsabila@gmail.com](mailto:tia.arianisalsabila@gmail.com)

**Rino Orleans Adam**: Universitas Sangga Buana YPKP Bandung; [rinoorleans@gmail.com](mailto:rinoorleans@gmail.com)

**Muhammad Nurrochman**: Universitas Sangga Buana YPKP Bandung; [rachman00123@gmail.com](mailto:rachman00123@gmail.com)

**Vip Paramarta**: Universitas Sangga Buana YPKP Bandung; [vip@usbypkp.ac.id](mailto:vip@usbypkp.ac.id)

Received: June 18, 2024; Accepted: June 28, 2024; Online: July 07, 2024 | DOI: <https://doi.org/10.47353/ijema.v2i2.168>

**Abstract:** *This research aims to describe Knowledge Management and its implementation in the Human Resources Unit of the Palembang Muhammadiyah Hospital. Based on this research, qualitative descriptive techniques are used which are connected to literature studies. The qualitative approach is usually referred to as a postpositivistic method because it is based on postpositivistic theory. The research strategy implemented has the initial aim of producing this article by providing research starting point for academics interested in this topic. Research result The application of KM is needed for an organization or company that empowers quite a lot or large human resources. And KM can help a company process the knowledge it has well so that this knowledge can be shared equally by every individual involved in an organization and company. By implementing this, an organization or company can advance in the field of information and knowledge processing. People, leadership, technology, organization, learning are important factors that must be considered so that an organization's knowledge management can be implemented optimally. New information and communication technologies, Integration of knowledge processes to organization's processes, Management support, Learning culture, Qualification of employees, Corporate culture is according to several case studies with a focus on small and medium companies which are known to be critical success factors for implementing KM processes.*

**Keywords:** *knowledge management, human resources, Palembang Muhammadiyah Hospital.*

## Introduction

In this modern era, the development of information technology is increasingly advanced so that every agency must have competent human resources. The development of individual and organizational needs is always evolving, resulting in a shift between individual and organizational needs. The shift between individual and agency needs is changing from material to information. This shows that information that is internalized into knowledge is the most useful resource at this time. Knowledge is a part of modern human social life. Apart from that, in an organization, the role of knowledge as a whole can increase the competitiveness and work efficiency of the organization concerned. In the information age, it is important to realize that the flow of knowledge into and out of organizations occurs very quickly.

Knowledge used in organizations is an interaction between two components, namely human capital and information. Human capital is thought and character which consists of human competence. This competency is determined by knowledge, imagination, intuition, education, skills and experience which are influenced by emotions and other attributes. Meanwhile, information includes documentation of human experience and intellectual achievements, including formulas to help with solutions, and is the content of books, papers, research, reports, software, databases, CDs and DVDs and patents. With the use of information technology and telecommunications, a revolution in the distribution and use of knowledge is

not something strange. Many organizations today adopt and implement knowledge management systems as a means of supporting processes related to empowering the knowledge they have. Implementing effective knowledge management will involve many elements, namely people, culture, processes, leadership and technology.

To be able to follow the growth of information, of course you don't just need to apply it directly, you have to go through a process of processing and utilizing existing information. In order for information to become something of value, and then grow into knowledge within an organization or company, a system or concept known as Knowledge Management (KM) is needed. Through knowledge management, the knowledge possessed by an organization will be identified to improve performance and produce various innovations. Innovation in an organization can be obtained through knowledge creation, which is one dimension of the knowledge management process. In this way, organizations continuously improve themselves (continuous improvement) and produce sustainable innovation to face an ever-changing environment. Ways to increase this knowledge include getting used to a culture of communication between employees, providing opportunities to learn, and encouraging mutual knowledge sharing, either through learning forums or coaching clinics. Where this business will create and maintain increased value from the organization's core competencies by utilizing existing information technology.

In the context of papers on knowledge management in contemporary human resources, the following are several problem formulations that can be explained:

1. What are the important factors in implementing knowledge management?
2. What are the benefits of implementing knowledge management?
3. What is the knowledge management cycle?
4. What is the knowledge management process?
5. What is the implementation and strategy for implementing knowledge management?
6. What are the problems in implementing knowledge management?

## Literature Review

### Contemporary Human Resource Management

Quoting from Sutrisnowati & Hadi (2020) who stated that human resources are currently facing serious challenges. The increasingly rapid development of science and technology requires human resources to have in-depth expertise and specialization. Humans are increasingly shackled by technical rules which have resulted in social relations becoming a rare phenomenon. Human Resource Management (HRM) in this modern era faces increasingly complex challenges within organizations. Appropriate employee recruitment and selection, orientation and induction, training and development processes. Apart from that, performance appraisals, a balanced compensation system, good relationships with colleagues or superiors, work health and safety, employee welfare programs are part of HRM's duties in managing the workforce. In general, employee placement is in accordance with skills and expertise with the aim of increasing good work productivity.

### Hospital management

Hospitals are health service institutions for the community with their own characteristics which are influenced by developments in health science, technological advances and the socio-economic life of the community which must continue to be able to improve services that are of higher quality and affordable for the community in order to achieve the highest level of health.

## Knowledge Management

Groff & Jones (2003:2) say knowledge management is a tool, technique, strategy for storing, analyzing, organizing, improving and sharing business experience. According to Wigg in Liebowitz (1999:6), knowledge management is the systematic, slow development, renewal and application of knowledge to maximize the effectiveness of company knowledge and the benefits of knowledge assets. Hibbard in Halawi et al (1997), knowledge management is the process of obtaining a company's collective experience which is stored in data bases, papers or human thoughts and disseminated so that it can help generate bigger payrolls. Macintosh in Halawi et al (1996) states, knowledge management involves identifying and analyzing available and needed knowledge which is used for planning and monitoring actions to increase intellectual property to achieve organizational goals. The main goal of knowledge management is to maintain and effectively transfer important knowledge to employees (Leung, Chan, & Lee, 2003).

## Method

Based on this research, the author uses qualitative descriptive techniques which are connected to literature studies. The qualitative approach is usually referred to as a postpositivistic method because it is based on postpositivistic theory (Purnamasari et al., 2013). Creswell defines a qualitative research approach as a process or investigation used to analyze and understand a major phenomenon. The knowledge base of this research was evaluated using scientific articles from regionally and globally renowned journals, books, magazines and conferences. The research strategy implemented had the initial aim of producing this article by providing a research starting point for academics interested in this topic (Jabani, 2015). The train of thought in this research begins with changes that give rise to competition, where each wants to improve its existence by improving the quality of human resources.

## Results and Discussion

### Important Factors in Implementing Knowledge Management

The implementation of knowledge management will not be able to run without a knowledge sharing process in it, because with this knowledge sharing, the knowledge possessed by individuals can accumulate into organizational knowledge. Knowledge management facilitates this process so that knowledge can be better organized and can later be utilized optimally for the benefit of the organization. In its implementation, knowledge or know-how accumulated in an organization can be utilized and used as a tool to find solutions to problems being faced by the organization concerned. Apart from that, this knowledge can also be used to create new ideas or to improve existing ideas in the organization.

According to Tobing (2007: 28), important factors that must be considered so that an organization's knowledge management can be implemented optimally are;

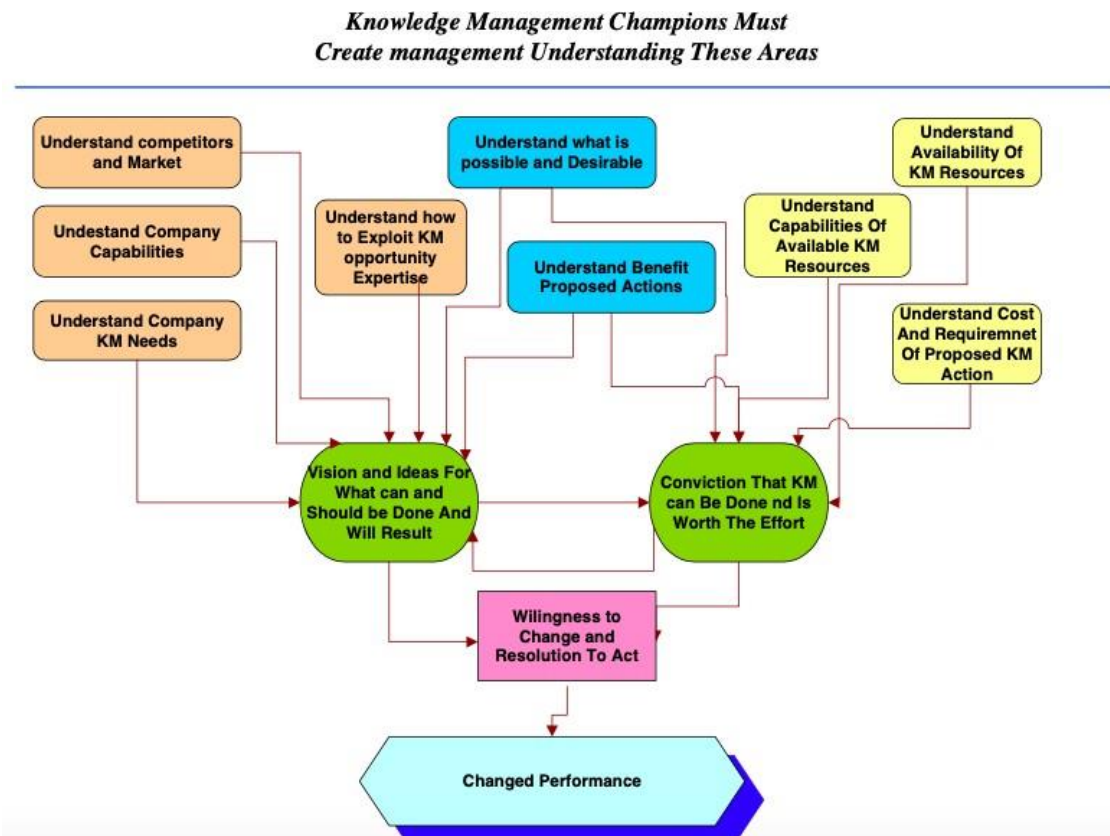
1. Humans, essentially knowledge resides in the human mind in the form of tacit knowledge. Carla O'Dell said that 80% of knowledge is in the form of tacit knowledge and only 20% is in the form of explicit knowledge (Tobing, 2007: 28). Apart from being a source of knowledge, humans are essentially also actors in the processes in KM.
2. Leadership, a very critical role that must be carried out by leaders is to build a strong vision, namely a vision that can move all members of the organization towards it.
3. Technology: The development of information technology (IT) which has penetrated all aspects of human activities has made the use of information technology one of the 21 enablers of KM. The development

of IT means that more and more processes are being automated and more and more workers are spending their time in front of computers either to carry out analytical work, execute business processes or to communicate.

4. Organization, Organization is concerned with handling operational aspects of knowledge assets, including functions, processes, formal and informal organizational structures, control measures and indicators, process improvement, and business process engineering.
5. Learning, the learning process is very important in KM, because through this process it is hoped that new ideas, innovations and knowledge will emerge, which are the main commodities processed in KM.

**Benefits of Implementing Knowledge Management**

The implementation of knowledge management has been carried out by many countries in the world. In business organization practice, knowledge management is used in ERP (Enterprise Resource Planning), CRM (Customer Relationship Management), and HR (Human Resources).



**Figure 1**

Source: Liebowitz (1999:3-11)

Based on the picture above, the application of knowledge management allows companies to understand the organizational environment, both internal and external. This understanding is then used in formulating the organization's vision and ideas and the basis for acting in making changes to organizational performance.

In implementing knowledge management in an organization or company, it can help create a better business process in the running of the system. The following are some of the benefits that can be received by implementing knowledge management, such as:

1. Saving time and costs, applied knowledge management can make an organization or company spend time or money searching for the same knowledge, every time a change in human resources occurs within it.
2. Increasing knowledge assets, knowledge management that has been implemented, can help each individual in an organization or company not need to relearn from the beginning, but with this KM they can learn it quickly, so as to increase the competency of each individual.
3. Improve decision making. With knowledge management, individuals within it can obtain previous information or reports on the organization or company, so that a wrong decision does not occur in the same condition.
4. Improve process efficiency and work methods. Knowledge management can help an organization or company evaluate its performance from previous periods, so that in the future it can be improved and developed.
5. Increase the ability to innovate products and services. Through knowledge management, organizations or companies can analyze the knowledge they have collected, so they can develop each product and service within it.

### **Knowledge Management Cycle**

A knowledge management generally known as the processing of knowledge. As stated by [1] knowledge is a mixture of experience, values, contextual information and expert views that provide a framework for evaluating and integrating new experiences with information. Apart from having value, this knowledge also has a level where according to [2] there is a hierarchy of knowledge, which starts from data then information and becomes knowledge and this hierarchy is complemented by the expertise and capabilities of the organization.

Knowledge management is formed from knowledge, where knowledge is divided into three types, namely:

1. Tacit Knowledge, It is knowledge that is not easily described and shared. This knowledge is in the form of experience and expertise possessed by each individual where this knowledge has not been documented. This knowledge is obtained or developed through interaction and communication with other people.
2. Explicit Knowledge, It is knowledge that has been successfully documented, which has structural, systematic characteristics and is easy to communicate and share with others. This knowledge can be in the form of: books, journals, scientific works, references or others. This knowledge is obtained and develops from the content and information contained in it.
3. Potential Knowledge, It is knowledge that is used to carry out data analysis and transform data into knowledge. This knowledge is obtained and developed from the results of analysis of existing data.

### **Knowledge Management Process**

The implementation of knowledge management occurs according to a certain phase from the knowledge acquisition process to the application of knowledge in the organization to achieve organizational goals. There are several opinions about the phases that go through in implementing knowledge management, namely:

According to Nonaka and Takeuchi (1995), in the application of knowledge management, the knowledge creation process arises from interaction through a knowledge conversion process called SECI (socialization, externalization, combination and internalization).

1. Socialization, is the process of transferring one person's experience to another person to produce tacit knowledge. This process is carried out by meeting directly or face to face. Apart from that, this knowledge is obtained from something that is done together, such as: meetings, discussions, etc.
2. Externalization, is a process for articulating tacit knowledge into an explicit form, such as: forums, books, minutes, reports, and so on.
3. Combination, is a process that combines several different explicit knowledge to create new explicit knowledge, through analysis, grouping and rearranging.
4. Internalization, is a process that extracts existing explicit knowledge into tacit knowledge.

### **Application of Knowledge Management**

Knowledge organized through the knowledge management process will produce very valuable knowledge. This is because the organization's new knowledge is obtained from analysis of the internal and external environment. The knowledge resulting from this knowledge management process is an organizational capability so that it will produce output of goods and services which are the result of knowledge that is difficult to imitate.

Knowledge created through the SECI knowledge conversion process and distributed to all parts of the organization becomes knowledge, which will then be implemented within the organization. According to Liebowitz (1999:13-3) the application of knowledge can take the form of:

1. Patents, technology licenses
2. Knowledge based customer services
3. Knowledge of products and embedded technology
4. Separate KBS Application Product
5. Knowledge workers at all levels.

### **Knowledge Management Implementation Strategy**

Knowledge management is a process that involves social change and systematic development. The effectiveness of implementing knowledge management is determined by the strategy used and the support of the organization where this knowledge management will be implemented. The steps taken in implementing the knowledge management strategy are as follows:

1. Consider organizational aspects
2. Strive to build a culture of knowledge
3. Identify key SPs in the organization.

The first action that must be considered is building the influence of knowledge in the organizational context, knowledge strategy, organizational knowledge, leadership and culture. The second action is building the foundation of knowledge management through the support of human resource management and knowledge systems, which emphasizes the role of information technology. The third step is the application of knowledge by determining the organization's core competencies, knowledge storage, determining the knowledge services provided by the organization as well as organizational learning and development. The final step is an effort to improve and evaluate the steps that have been taken which include repairing, maintaining and analyzing and researching the problems that occur. The third step in the

knowledge management implementation strategy is to pay attention to the five key systems for integrating the organization with strategy. These five keys are known as the five Ps, namely planning, people, process, product and performance.

### Problems in implementing Knowledge Management

In one context the question arises about how the implementation of the KM process for an organization or company can be facilitated. In the field of KM, research activities are still limited, especially case studies. Based on several case studies with a focus on small and medium companies, it is known that there are six critical success factors for implementing the KM process. These factors can also be applied to various types of organizations or companies, namely:

1. *Corporate culture*, Successful implementation of KM has a close relationship with the culture that exists in the organization or company. But in the process of implementing it, cultural change takes time. In implementing KM, it is important to know how KM can interact with culture and can determine how a culture must be changed.
2. *Qualification of employees*, in implementing KM, the competency and motivation of each individual within an organization or company plays a very important role in whether a KM is successful or not. For this reason, the development of human resources is very important.
3. *Learning culture*, the implementation of a KM can be seen as a learning process from one part to another that must be maintained.
4. *Management support*, in its implementation, a KM has a chance to be successful with support from the executive board of an organization or company who participates in socializing it and also participates in implementing it.
5. *Integration of knowledge processes to organization's processes*, it is important to link Knowledge Management with existing processes within the organization, to gain acceptance and economic legitimacy.
6. *New information and communication technologies*, the implementation of KM does not always have to be linked to investment in new information and communication technology. The potential for this technology to develop has a condition where the organizational culture exists or not.

### Implementation of Knowledge Management System in Hospitals Web-Based Muhammadiyah Palembang (Case Study: Human Resources Unit)

*Knowledge* In this information era, it is very important for companies. The more knowledge a company's employees have, the more advanced the company will be and will pass on the knowledge to the right people in order to improve organizational performance. This knowledge is divided into 2, namely tacit knowledge and explicit knowledge.

### System Development Methods

The system development method that will be used to implement the knowledge management system at the Palembang Muhammadiyah Hospital is the 10 step knowledge management roadmap method.

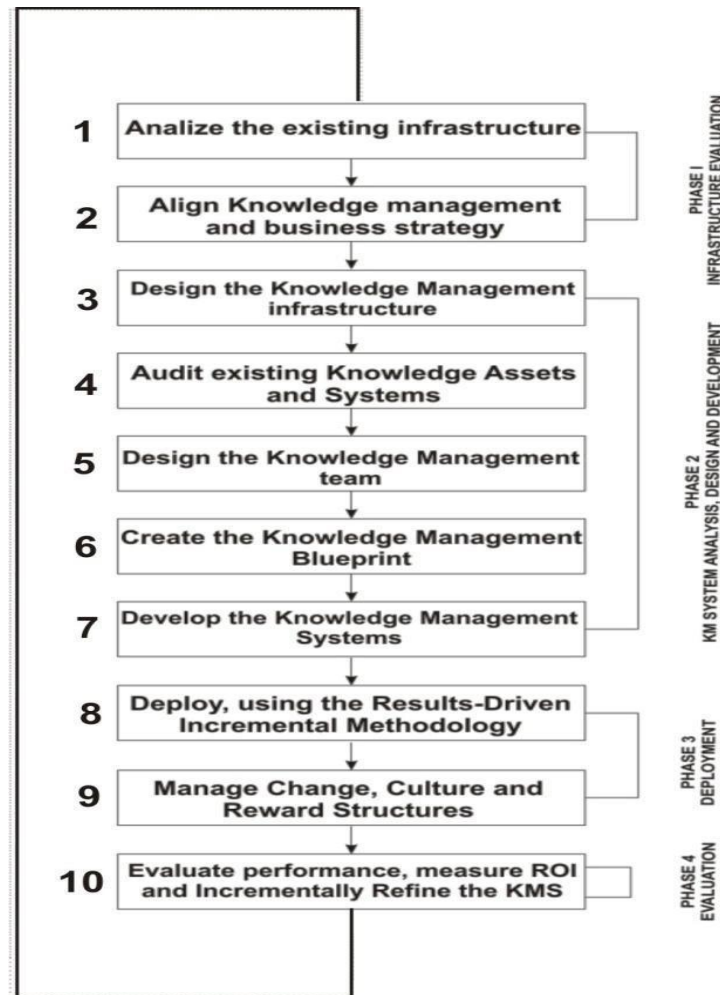


Figure 2. Step Knowledge Management Roadmap (Tiwana, 2002)

However, in the research that the author will carry out on this system, he will only use the first to second phases, namely the infrastructure evaluation phase, and design analysis and knowledge management development.

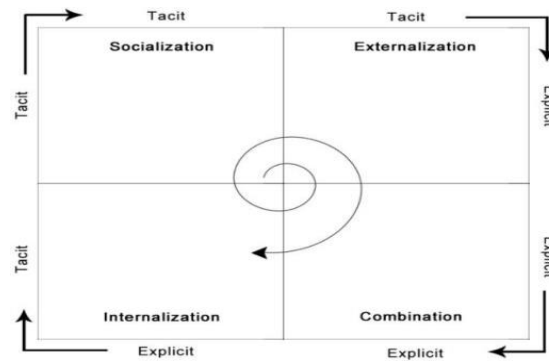
### Knowledge Management System

*Knowledge Management System* is a systematic process for finding, selecting, organizing, extracting and presenting knowledge in a certain way, so that workers are able to utilize and improve their mastery of knowledge in a specific field of study, then there is an institutional process so that the knowledge created becomes company knowledge.

### SECI models.

*Knowledge* What is shared can become new knowledge after undergoing a process of socialization, externalization, combination and internalization (SECI). New knowledge as a result of the socialization, externalization, combination and internalization processes will experience value multiplication if it experiences the SECI process continuously.





**Figure 3.** SECI models

Source: Nonaka, et. Al. (1995)

### Designing a Knowledge Management Team

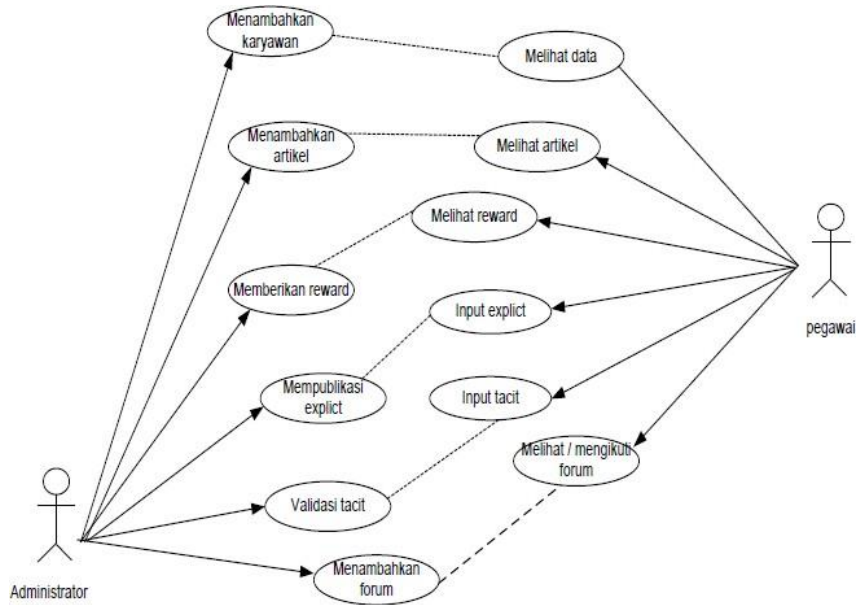
Designing the KM team is carried out to determine who uses the system and who is involved in it. As well as determining the role of each user. In this phase, 3 system groups were obtained, namely: The Km Team was formed to carry out the process of selecting incoming knowledge and was also tasked with capturing new existing knowledge. Staff/employees act as a source of knowledge consisting of Muhammadiyah Hospital administrative employees. Admin acts as administrator and also developer of the system.

### Creating a Knowledge Management System Blueprint

To design a knowledge management system blueprint, researchers used the 7 layer knowledge management architecture as a reference from Tiwana (2002) which consists of interface layer, application layer, transport layer, middleware and lag cynical integration and Repository. Interface layer This layer is the layer that connects the user with the layers below it. Access and Authentication Layer This screen limits the movement of system users to avoid abuse of authority from certain parties regarding the knowledge in the system. Collaboration, Filtering and intelligence Layer User patterns can obtain new knowledge and contribute knowledge to the system. In this layer the system provides a knowledge search feature. Socialization The socialization process between employees at Muhammadiyah Hospital is carried out through face-to-face meetings. KMS externalization will really help this externalization process, namely the process of articulating tacit knowledge into a clear concept at the Palembang Muhammadiyah Hospital. This process occurs when employees write down the knowledge and experience gained while working on the process. Combination is combining various different explicit knowledge to be compiled into KMS at Muhammadiyah Hospital. Internalization All data, information and knowledge documents that have been documented can be read by other people. In this process, HR knowledge increases.

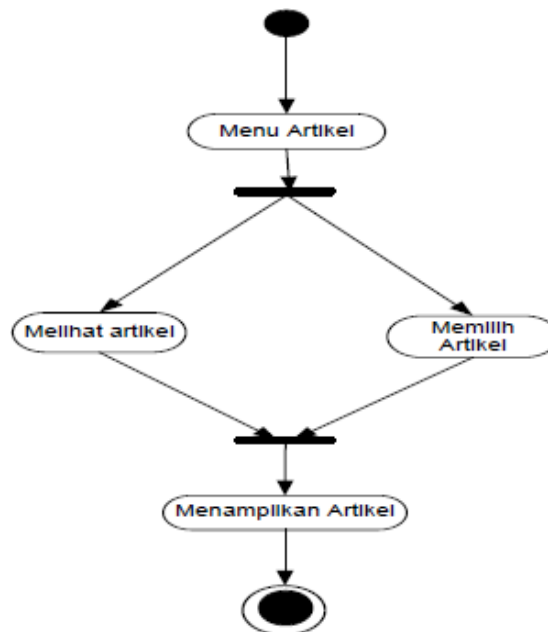
### Development Needs

*Use cases* is a description of the function of a system from the user's perspective. And also an explanation of what the actors involved in the software being built do.



**Figure 4.** Use Case Application Diagram

Activity Diagrams or activity diagrams describe the workflow (workflow) or activities of a system or menu business process in the software. What needs to be noted here is that the activity diagram describes system activities, not what actors do, so activities that can be carried out by the system.



**Figure 5.** Activity Diagram Design to Display Articles

**Development Results**

The result of the development is an application that supports the implementation of a knowledge management system at Muhammadiyah hospitals. It is hoped that this application can help the Muhammadiyah Hospital administration put this knowledge into a forum and improve the culture of knowledge sharing. The implementation of the knowledge management system in the service administration

section of the Muhammadiyah Hospital is the final result of all activities and system development using the 10 step knowledge management system method from Amrit Tiwana which was described in the previous chapter.

### Analysis

This research succeeded in building a knowledge management system at the Muhammadiyah Hospital in Palembang as a form of implementing KMS in the administration department. The application that is built can help employees or service administration employees in collecting this knowledge into a container so that employees or employees do not lose the knowledge that employees have.

### Conclusion

Based on the results of the research and discussion in the previous chapter, it can be concluded as follows:

1. The application of KM is needed for an organization or company that empowers quite a lot or large human resources. And KM can help a company process the knowledge it has well so that this knowledge can be shared equally by every individual involved in an organization and company. By implementing this, an organization or company can advance in the field of information and knowledge processing. In its implementation, knowledge or know-how accumulated in an organization can be utilized and used as a tool to find solutions to problems being faced by the organization concerned. Apart from that, this knowledge can also be used to create new ideas or to improve existing ideas in the organization.
2. People, leadership, technology, organization, learning are important factors that must be considered so that an organization's knowledge management can be implemented optimally. *New information and communication technologies, Integration of knowledge processes to organization's processes, Management support, Learning culture, Qualification of employees, Corporate culture* is according to several case studies with a focus on small and medium companies which are known to be critical success factors for implementing KM processes.

### References

- Aditama, Tjandra Y., Manajemen Administrasi Rumah Sakit . Jakarta : Universitas Indonesia.2003.
- Bhatt, D. (n.d.). EFQM - Excellence Model and Knowledge Management Implications. Retrieved April 8, 2012, from [www.eknowledgecenter.com](http://www.eknowledgecenter.com/articles/1010/1010.htm): <http://www.eknowledgecenter.com/articles/1010/1010.htm>
- Davenport, T. H., De Long, D. W., & Beers, M. C. (1998). Successful KMProjects. Sloan Management Review.
- Djalip, I. P., Kosasih, K., & Paramarta, V. (2024). Pengaruh Kompetensi dan Evaluasi Kinerja terhadap Motivasi dan Implikasinya pada Performa Pegawai . Jurnal Pendidikan Tambusai, 8(2), 25954–25972. Retrieved from <https://jptam.org/index.php/jptam/article/view/16332>
- Efrain, Turban, E. Aronson, J., E. Ting – Peng, L. Shardan R. (2007). Decision Support and Business Intelligence Systems. Prentice Hall.
- Godbout, A. J. (2000). Managing core competencies: the impact of knowledge management on human resources practices in leading-edge Organization. proquest, 76.
- Hartini, Hartini & Nainggolan, Hermin & Setiowati, Rini & Tyas, Yayuk. (2023). Pengantar Manajemen SDM di Era Modern.
- Ismail Solihin, Pengantar Manajemen, Erlangga, Jakarta, 2012, hal. 12

- Kisbiyanto, 2012. Manajemen Sekolah. Yogyakarta : Mahameru
- Liebowtiz, J; Beckman, T., J. (1998). Knowledge Organization: What Every Manager Should Know. Boca Raton: CRC Press LLC.
- Nonaka, I. and Takeuchi, H. (1995), The Knowkdge Creating Company, Oxford University Press, New York, NY.
- O'Brien, James A. (2005). Pengantar Sistem Informasi - Prespektif Bisnis dan Manajerial. Jakarta: Salemba Empat.
- Probst, Gilbert, Raub, Steffen, Romhardt, Kai. (2000). Managing knowledge : buildings for success. New York: John Wiley & Sons, Inc.
- Sidhatama, B., Fatmasari, & Solikin, I. (2020). Implementasi Knowledge Management System Pada Rumah Sakit Muhammadiyah Palembang Berbasis Web (Study Kasus: Unit Sumber Daya Manusia). Jurnal Pengembangan Sistem Informasi dan Informatika Vol. 1, No. 3, 164-174.
- Sutrisnowati, S. A., & Hadi, B. S. (2020). Tantangan Pengembangan Sumber Daya Manusia Indonesia di Era Global. Jurusan Pendidikan Geografi FIS UNY, 54-64.