

Application of Website-Based Fieldwork Practice Information System

Linda Fatmawati^{1*}, Adhie Thyo Priandika², Ade Dwi Putra³

¹Information Technology, Universitas Teknokrat Indonesia, Indonesia

²Informatics, Universitas Teknokrat Indonesia, Indonesia

³Information System, Universitas Teknokrat Indonesia, Indonesia

^{1*}lindafatmawati1205@gmail.com, ²adhie_thyo@teknokrat.ac.id,

³adedwiputra@teknokrat.ac.id

Abstract: Field work practice is a program that must be followed by Yadika Pagelaran Vocational School students which is useful for training students to be able to adapt and provide experience in the world of work. However, in its management, SMK Yadika Pagelaran still uses manual methods in several processes such as recording student daily activity journals, collecting street vendors reports and processing student transcripts. In this study, a website-based field work practice system will be built using the waterfall design method which is useful for facilitating data management in the implementation of street vendors at SMK Yadika Pagelaran. This research was designed using UML system design and system testing using black box testing. The results achieved from this research are a website-based field work practice system for managing the implementation of street vendors used by street vendors admins, students, school supervisors and company supervisors. Tests in this research system produce a percentage of 100% so that the system is said to be very feasible to use. With this system, it is hoped that it can help all relevant parties in the process of implementing field work practices at SMK Yadika Pagelaran

Keywords: Black Box Testing; Field Work Practice; UML; Website; Waterfall.

1. INTRODUCING

Information system is a system that provides information for management in making decisions and also for carrying out company operations, where the system is a combination of people, information technology and organized procedures. The use of the information system itself is also designed to process various information managed by each company or organization so that the resources needed are not too large and the processing time can be shortened. In addition, managed data can be used anytime, anywhere, so as to reduce existing bureaucracy.

SMK Yadika Pagelaran is a private vocational high school located on Jl. Raya Gumuk Mas RT. 14 RWs. 05 district. District performance Pringsewu Lampung. At the SMK level, the learning process of practical activities is much more than theory. This requires students at SMK Yadika Pagelaran to take part in the Field Work Practice (PKL) program.

Field work practice is one of the programs that is required for students at the SMK level, which is a form of application between the education program at school and the skills mastered through direct work practice in the business/industrial world [1].

Linda Fatmawati : *corresponding author



Copyright © 2023, Linda Fatmawati, Adhie Thyo Priandika, Ade Dwi Putra.

Technological advances that continue to develop affect people's lifestyles in everyday life. Therefore, many fields take advantage of this technology because it can provide convenience from various aspects of life, one of which is in the field of education. However, in the management of street vendors, Yadika Pagelaran Vocational School has not fully utilized technological advances in several processes such as the process of recording student daily activity journals, collecting street vendor results reports and processing student grade transcripts. Based on these constraints, it is proposed to conduct research by developing a web-based field work practice information system at SMK Yadika Pagelaran. This research is expected to facilitate the management of street vendors' activities.

2. METHOD

Modelling System

Use Case diagram in the design of a fieldwork practice information system using the waterfall method has 4 actors, namely admins, students, school supervisors and company supervisors.

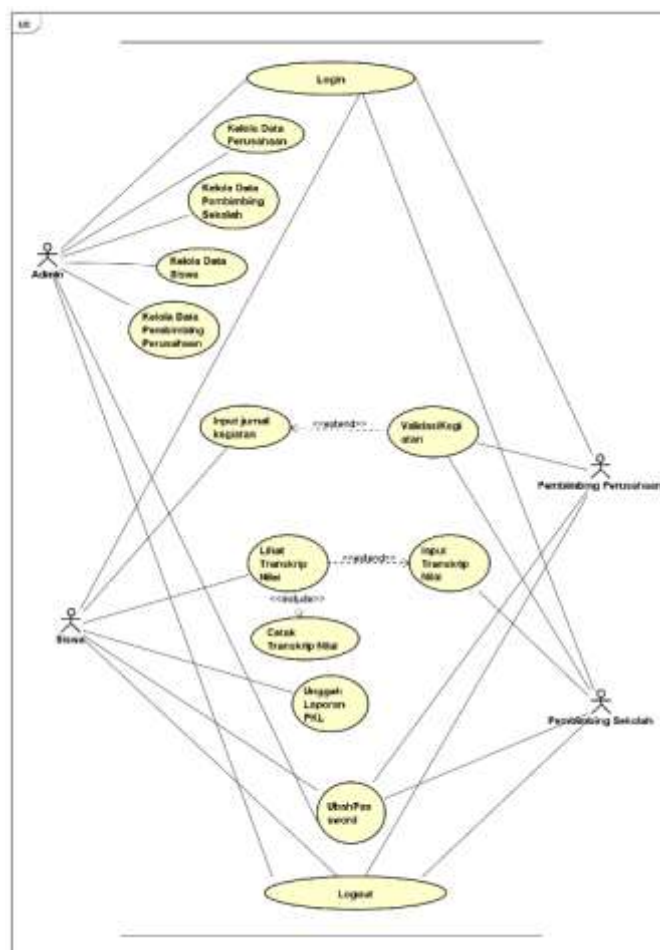


Figure 1. Usecase Diagram

Class diagram is a UML modeling that describes the structure of the system in terms of defining the classes to be created in the construction of the system.

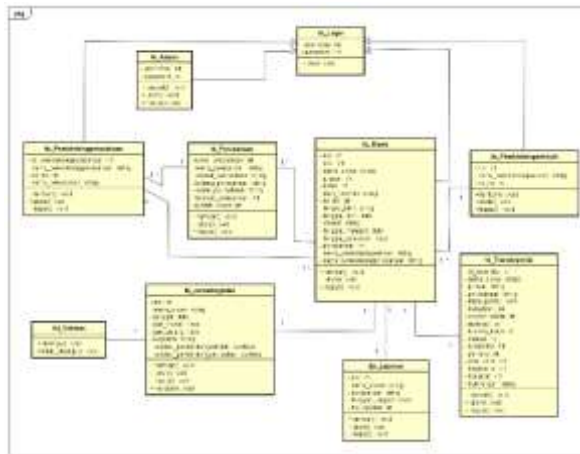


Figure 2. Class Diagram

3. RESULT AND DISCUSSIONS

The information system has the ability to facilitate the management, planning, supervision, direction, and delegation of work to all coordination departments. Information systems have the ability to increase the efficiency and effectiveness of accurately and timely presented data. Information systems have the ability to improve the quality of human resources because their work units are coordinated and systematic. Information systems can also help companies increase productivity and save costs.

Login is the page that first appears when the user / admin opens the system. To enter the user / admin system it is necessary to enter a username and password.

Figure 3. Interface Login

The page in the activity journal menu, in this menu students can input daily activities that have been carried out every day.



Figure 4. Interface Student Activities

To obtain a feasibility study from the fieldwork practice information system, testing was carried out using calculations from black box testing as many as 45 questions to 6 respondents, the following results were obtained:

$$\text{Result} = \frac{270}{270} \times 100\% = 100\% \quad (1)$$

From the test calculations above, it can be concluded that the website-based fieldwork practice information system at SMK Yadika Pagelaran obtained very decent results through the calculation results by obtaining a percentage of 100%.

4. CONCLUSION

Based on the results of the discussions that have been carried out, it can be concluded that the system of managing fieldwork practices at SMK Yadika performance still uses manual methods in several processes, such as recording journals of students' daily activities, collecting reports on PKL results, and processing student transcripts. So that a web-based fieldwork practice system was built to facilitate the management of the implementation of PKL activities.

In terms of design, the web-based fieldwork practice system at SMK Yadika Pagelaran uses UML, namely with a model of designing usecase diagrams, activity diagrams, class diagrams and sequence diagrams. The implementation in this system uses PHP and MySQL which help in processing data on the implementation of PKL at SMK Yadika Pagelaran. This research applies the waterfall method as a system building methodology for a web-based fieldwork practice system at SMK Yadika Pagelaran. Testing the system using black box testing obtained a percentage result of 100%, so this system is said to be very feasible to use.

5. REFERENCES

- 1] I. G. N. W. Pratama, I. G. . A. C. Putra, and A. I. Datya, "SISTEM INFORMASI MANAJEMEN PRAKTEK KERJA LAPANGAN BERBASIS WEBSITE (STUDI KASUS PROGRAM STUDI SISTEM INFORMASI UNIVERSITAS DHYANA PURA BALI)," *J. Teknol. Inf. dan Komput.*, vol. 3, no. 1, 2017, doi: 10.36002/jutik.v3i1.236.
- [2] S. S. Mluyati, "Rancang Bangun Sistem Informasi Penyewaan Wedding Organizer Berbasis Web Dengan Php Dan Mysql Pada Kiki Rias," *J. Tek.*, vol. 7, no. 2, 2019.
- [3] G. M. Marakas and J. A. O'Brien, *Pengantar Sistem Informasi*. Jakarta: Salemba Empat, 2017.
- [4] M. B. Romney and P. J. Steinbart, *Sistem Informasi Akuntansi*, 5th ed. Jakarta: Salemba Empat, 2016.
- [5] D. Sumantri, S. Subijanto, S. Siswanti, and S. Sudiyono, *Pengelolaan Pendidikan Kejuruan: Pengembangan Sekolah Menengah Kejuruan (SMK) 4 Tahun*. Jakarta: Puslitjakdikbud, 2017.
- [6] N. Nurhadi, *Pondasi Dasar Pemrograman Website*. Surabaya: CV. Garuda Mas Sejahtera, 2017.

Linda Fatmawati : *coresponding author



Copyright © 2023, Linda Fatmawati, Adhie Thyo Priandika, Ade Dwi Putra.

- [7] F. Abdillah, *Manajemen Organisasi Pendidikan Kejuruan*. Jember: Cerdas Ulet Kreatif, 2020.
- [8] A. S. Rosa and M. Shalahuddin, *Rekayasa Perangkat Lunak*, 1st ed. Bandung: Informatika Bandung, 2018.
- [9] A. N. Asyikin, *Pemrograman Web*, 1st ed. Yogyakarta: POLIBAN PRESS, 2019.
- [10] C. A. Pamungkas, *Dasar Pemrograman Web Dengan PHP*, 1st ed. Yogyakarta: Deepublish, 2017.
- [11] S. Supono and V. Putratama, *Pemrograman Web dengan Menggunakan PHP dan Framework Codeigniter*, 1st ed. Yogyakarta: Deepublish, 2018.

