

## **Testing and Analysis User Satisfaction of Salute Bidan Application Using End-User Computing Satisfaction**

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**Abstract.** This paper describes the measurement of testing and analysis of user satisfaction on a health service application for pregnant women. The 'Salute Bidan' application is a prototype of an Android-based health service application that pregnant women use in Depok, Indonesia. During the Covid-19 pandemic, with limited activities outside the home, pregnant women had problems consulting with midwives. The Salute Bidan application bridges communication between pregnant women and midwives as health workers. The quality of software or application based on information technology should be tested and analyzed before being used for release to the market. One good indicator of software is measuring user satisfaction in using the application. This research measured and analyzed user satisfaction with the Salute Bidan application using the End-User Computing Satisfaction (EUCS) method. The purpose of this research, in general, is to measure user satisfaction with the Salute Bidan application based on the quality of the information presented in terms of the ease of obtaining information so that it is useful for pregnant women. This research was conducted to determine the reliability of application software, one of which can be done by measuring end-user satisfaction. This EUCS method focuses on the quality of information and the quality of the application system presented by Salute Bidan. The EUCS variables used were Content, Accuracy, Format, Ease of Use and Timeliness (CAFET) with 100 respondents. The results obtained good responses to each CAFET variable, namely 59.4 % or 60 respondents, 64.4 % or 65 respondents, 55.4 % or 56 respondents, 64.4 % or 65 respondents, and 59.4 % or 60 respondents. This research contributes to the development of applications based on user satisfaction of pregnant women who use the application and in midwifery regarding information technology in maternity services.

**Keywords:** End-User Computing Satisfaction, Salute Bidan, User Satisfaction, User Experience

## 1. Introduction

The Covid-19 pandemic has triggered the need to improve information technology. This situation impacts the health sector, like healthcare (Uzir et al., 2021), which has shifted from offline to online. Currently, in Indonesia, information technology-based healthcare in the form of smartphone applications is dominated by general healthcare using technology, also known as Mobile Health (mHealth). The mHealth has become an important tool to support public health, especially during the COVID-19 pandemic, to increase health awareness (Birkmeyer et al., 2021). For example, the popular mHealth app with doctor consultations, such as the Halodoc app, has experienced an increase in users during the pandemic (Mochammad Aldi Kushendriawan et al., 2021). Meanwhile, unique healthcare, such as for pregnant women, is still significantly lacking in using information technology, such as using smartphone applications. Healthcare One of the digital service applications for pregnant women during the Covid-19 pandemic is the Salute Bidan Mobile Application (Nawangari et al., 2022). It has advantages with several features compared to other similar applications, such as monitoring pregnant women's health on Android smartphone devices (de Sousa Gomes et al., 2019; Tus Sadiyah, 2020). The unique feature app is different from other Salute Bidan applications: pregnancy risk self-screening. This feature gives a score developed from 25 to 30 criteria (Herlina et al., 2021) based on the Poedji Rochayti pregnancy risk scorecard (Rochjati, 2011). In addition to these superior features, it has some other advantages, namely the information on five health centres in Depok that have collaborated with it, so that the midwives in the Salute Bidan Application are permanent in the five public health centres in Depok.

Application testing is essential to the software development stages, like mobile apps. When using the application, a positive user experience is a factor that can impact the effectiveness of the application in terms of the quality of the features (Duplaga & Turosz, 2022; Luna-Perejon et al., 2019). The application can be known by testing the application in terms of user satisfaction. One of the software tests at the user level is user experience (UX) (Aggelidis & Chatzoglou, 2012; Pal et al., 2023), where the application's user experience can increase the chances of success and application quality. Several methods that are used to measure application user satisfaction include the End-User Computing Satisfaction (EUCS) approach, User Information Satisfaction (UIS) (Aggelidis & Chatzoglou, 2012) and WEBQUAL. One of the three approaches, EUCS, is a popular method used to measure user satisfaction because it emphasizes technology aspects consisting of five dimensions: Content, Accuracy, Format, Ease of use and Timeliness (CAFET). Several testing studies for health service applications using EUCS include analyzing user satisfaction with the information system applications that are applied to the health services centres, such as health centres and hospitals (Aggelidis & Chatzoglou, 2012; Cucus & Halim, 2019; Nissinen, 2015). Testing EUCS on the health service applications based on Android smartphone mobile devices has been done and included the testing of the end user or patient satisfaction on the popular Halodoc application (Mochammad Aldi Kushendriawan et al., 2021) and the other user satisfaction tests carried out on the end users, namely Integrated Healthcare Center's cadres (Abdul Ghani Mohamad Shahfik Afendi & Wan Shamsuddin Syadiah Nor, 2020).

Several studies on information technology in health services include EUCS research on the application systems for health centres and hospitals. The measurement uses the extensive EUCS for the hospital information systems in Greece. The researcher carried out an empirical study of the preliminary determination of EUCS with 283 respondents with an average user satisfaction of more than 69% on the aspects of information quality (content, format, accuracy and timeliness) and system quality (Training, Ease to Use, Documentation, Interface and System Speed) (Aggelidis & Chatzoglou, 2012). In Cucus's research (Cucus & Halim, 2019), the measurement of user satisfaction with the EUCS hospital management information system focused only on accuracy and timeliness, with 30 respondents with good category results of an average of 71.33%. The research on user satisfaction with the desktop application of Public Health Center management information systems was carried out by Adiputra Research (Adiputra Golo et al., 2021), with eight respondents' satisfaction levels (26.6%).

Based on the problems described above, testing for the end-user area needs to consider. This research used EUCS with five dimensions to measure the end-user satisfaction with the Salute Bidan application at five health centres in Depok City. The measurement aims to determine whether the Salute Bidan mobile application makes it easier for users to find the information needed and whether the Salute Bidan Mobile application is running well and benefits pregnant women. The results of this test are expected to help see how far the needs of pregnant women for information are met. This research needs to be carried out so that the application used by pregnant women meets the system requirements and can impact the process of service for pregnant women carried out by midwives at five health centres in Depok City. With the mobile application, pregnant women's condition can be monitored and recorded periodically during pregnancy.

## 2. Literature Review

### 2.1. Salute Bidan Mobile Application

Salute Bidan Application is an Android-based digital guide application designed for end users, namely pregnant women, with telehealth (Nawang Sari et al., 2022). It has been designed to facilitate pregnant women still to get health services through the information technology media. Preexisting activities is monitoring the health, development and growth of the womb or the development of the fetus until the estimated time of birth was carried out, among others, by reading pregnancy care guidelines with maternal and child health books (KIA) and visiting independent practice midwives and midwives at the PUSKESMAS (Public Health Center). The Salute Bidan Application has maternal service features consisting of consultation with midwives, Public Health Center information, pregnancy calculator, independent screening of pregnancy risk and health articles during pregnancy. All the features available in it can be seen in Figure 1. Its main feature is self-screening. Pregnant women are vulnerable to various disease threats and are at risk in the womb (Pin, 2015). Self-screening is a feature designed to determine the condition of pregnant women based on the pregnancy risk categories. Pregnant women can find out their current situation by answering questions based on 30 pregnancy risk screenings, including the risk of Covid-19 transmission, developed from 25 Poedji scorecards Rochyati (Rochyati, 2011). The results of the pregnancy risk are in the form of scores and are divided into three categories, namely low risk if the score is less than 6, high with a score of more than six or less than or equal to 10 and very high with a score of more than 10.

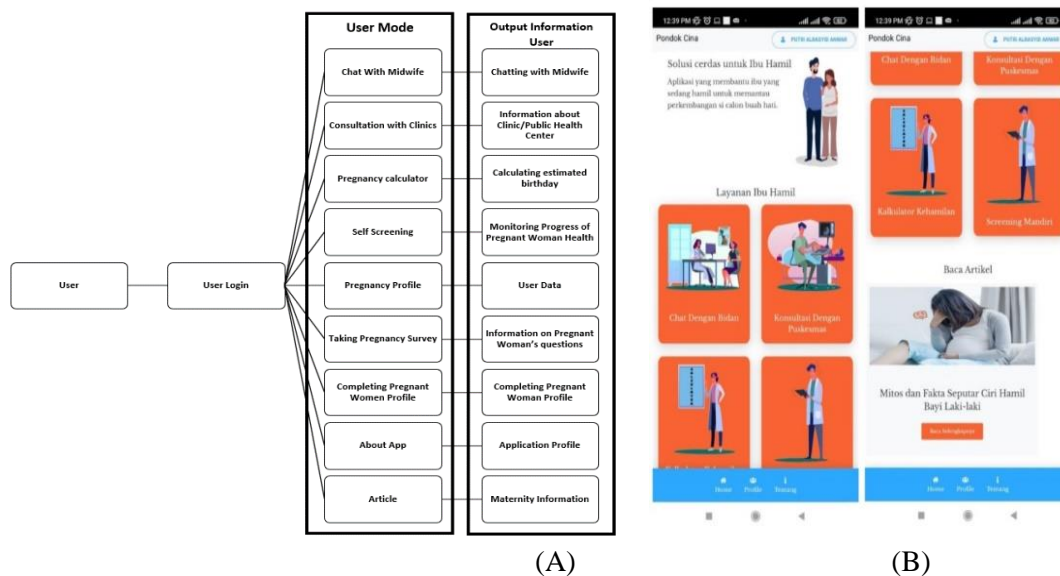


Fig. 1: (A) Structure of Salute Bidan app Features and (B) Interface app

The Salute Bidan application has been designed with the Rapid Prototyping Model method, where

the collaboration cycle between the application creation process and the client revision is in one application development cycle. The interface of the Salute Bidan application consists of a dashboard page that contains the health services offered by the login page, the profile page and each feature page, as shown in Figure 1 (A). Figure 1 (B) is the interface of the Salute Bidan application for the users. The Display layout is combined with simple colours to make users comfortable using it.

## 2.2. User Experience

User experience (UX) is the user's view of the application, expressed as experience in using the software. In Human-Computer Interaction (HCI), UX can also be defined as the result of the user experience in interacting with software (Nissinen, 2015) which is based on the individual perception, emotion, cognition, motivation and action (Abdul Ghani Mohamad Shahfik Afendi & Wan Shamsuddin Syadiah Nor, 2020). UX is also a subset of one of the non-functional aspects of software, namely Usability, where UX consists of three attributes: efficiency, effectiveness and satisfaction. Currently, UX is associated with User Interface (UI), where a good UI design will improve UX, including satisfaction and comfort. Five good UX criteria must be met according to the research (Pin, 2015) namely Learnability, Efficiency, Memorability, Errors and Satisfaction so that the deepest attribute of Usability can be defined, one of which is satisfaction. The relationship between Usability, UX and Satisfaction can be seen in Figure 2.



Fig. 2: User Satisfaction is part of User Experience

## 2.3. End-User Computing Satisfaction

End-User Computing Satisfaction (EUCS) is a quantitative method that is useful for thoroughly testing and measuring the level of satisfaction of end users of an application introduced by Doll and Torkzadeh (Doll & Torkzadeh, 1988). Satisfaction measurement indicators are carried out by comparing expectations and reality based on user experience with the application. EUCS consists of five dimensions of measurement variables, namely Content, Accuracy, Format, Ease of use and Timeliness (CAFET) (Aggelidis & Chatzoglou, 2012; Azwar et al., 2020; Hidayah et al., 2020).

- **Content**

*Content* is a measurement variable related to the content in the form of information the application presents. The measurement focuses on the complete information that is informative to the user and that increases the user's satisfaction with the presentation of information. In other words, user satisfaction will increase if the information presented is complete and to the user's needs.

- **Accuracy**

*Accuracy* is a measurement variable related to the accuracy of the data when an application generates information based on the input data given. The measurement focuses on how often the application processes incorrect or error information output from the input data.

- **Format**

*Format* is a measurement variable related to the application interface, which consists of display design and aesthetics. The measurement focuses on the ease of users in operating the application having an attractive appearance. The easier and more attractive the application interface is, the more effective the use of the application will be.

- **Ease of Use**

*Ease of use* is a measurement variable related to the nature of user-friendly applications. The measurement focuses on the ease of entering data, processing data, finding information and finding the information required.

- **Timeliness**

*Timeliness* is a measurement variable related to the speed and timeliness of the application in presenting the information needed by the user. The measurement focuses on the period or speed of processing the input data to provide the required information.

Based on the literature review above, it can be interpreted that the EUCS method is part of UX, so that it can be used as a measurement method emphasizing end-user satisfaction with technological aspects. To test reliability, EUCS has also been done in several similar studies (Wijaya et al., 2021; Yudistira et al., 2022). The EUCS method is still the most widely used because EUCS is essential as it directly impacts productivity, user adoption, employee engagement, cost savings, customer satisfaction, and innovation. Satisfied end users are more productive, adopt new technologies readily, and feel engaged in their work. EUCS reduces support and training costs while enhancing customer experiences. A satisfying computing environment promotes innovation and creativity, driving organizational growth and success. Overall, prioritizing end-user computing satisfaction creates a positive digital workplace environment that benefits individuals and the organization.

### **3. Research Method**

The approach used in this study uses a quantitative research method. The quantitative approach is used in a particular population or sample. The sampling technique in this study was carried out randomly. The data were obtained in the form of interviews and filling out questionnaires by the application users (Nawangარი et al., 2018). The flow of research to measure user satisfaction can be seen in Figure 3. This research began with formulating the problem of estimating the satisfaction level of Salute Bidan end users. The problem formulation to measure the level of satisfaction is obtained through a literature review. So the measurement method used in this research was EUCS. Then in the next stage, data is collected, and measurement indicators are made based on the five EUCS dimensions in the questionnaire. Was followed by the implementation by distributing the questionnaires to pregnant women in five locations of Depok City Health Centers that have collaborated. The next stage is data processing, with the questionnaire questions tested based on validity and reliability. In addition, the questionnaire data were processed as respondents' responses. The final stage is the conclusion based on the research objectives and results.

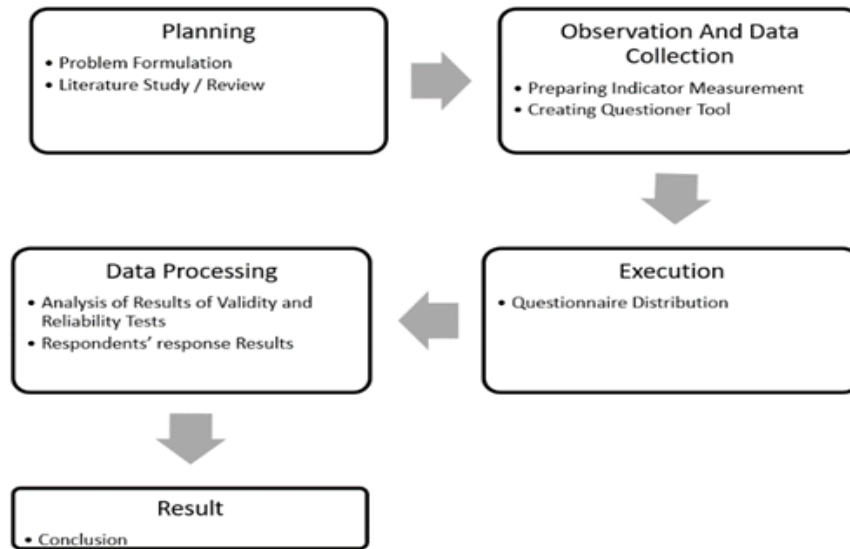


Fig. 3: Research Method

The questionnaires used a Likert scale to measure the respondents' perceptions and expectations about the application of the Salute Bidan. The respondent's perceptions in this research are expressed on a Likert scale ranging from 1 to 5. Where one was Very Poor, and five was Excellent. The Likert scale can be seen in Table 1.

Table 1: Respondents' Perception Likert Scale (Haque et al., 2021).

Perception	Score
Excellent	5
Good	4
Fair	3
Poor	2
Very Poor	1

There are 38 Health Centers in the city of Depok, Indonesia. 7 out of the 38 Health Centers have the Basic Emergency Neonatal Obstetrics Services status, or the term in Bahasa is PONEB. They are Pancoran Mas Health Center, Beji Health Center, Sukmajaya Health Center, Cimanggis Health Center, Tapos Health Center, Kedaung Health Center and Bojongsari Health Center. This research was conducted during the Covid-19 pandemic with limited and strict rules so that only five health centres were taken, namely Pancoran Mas, Beji, Sukmajaya, Cimanggis, and Cinere. The reason for using the 5 Health Centers was because they already have complete facilities to improve the health status of the community. All the health service facilities are equipped with general examinations of Maternal and Child Health services (KIA) and Family Planning services (KB).

The number of respondents used in this study refers to research by Malhotra (Malhotra, 2019). In the analysis, could be determined the sample size by multiplying the number of indicators by 5 or 5 times the number of variables. Thus, this study used 20 question indicators from 5 variables to determine the number of samples size using equation (1) to obtain 100 respondents with characteristics of respondents: age, occupation, and monthly income.

$$n = i \times N \tag{1}$$

The descriptive method is used to describe or analyze a research result. A random sampling technique was applied. The data were in the form of interviews and filling out questionnaires by the

application users. The questionnaires used a Likert scale to measure respondents' perceptions of the Salute Bidan mobile application. The EUCS method in this study referred to research (Aggelidis & Chatzoglou, 2012), where this study only focused on the quality of information on the Salute Bidan application. The EUCS variables used, therefore, consisted of content, accuracy, format, ease of use, and timeliness (CAFET). *Content* is a variable used to measure user satisfaction from the content of the Salute Bidan application used by pregnant women. *Accuracy* is a variable used to measure user satisfaction seen from the accuracy of the data presented when the application system receives an input which is then processed into the output of information on the Salute Bidan application. The format is a variable used to measure appearance and aesthetics based on the interface of the Salute Bidan application. Ease of Use is a variable used to measure user satisfaction regarding the ease with which pregnant women use the Salute Bidan application, such as entering data, processing data, and finding the required information. *Timeline* is a user satisfaction variable based on timeliness in presenting the information pregnant women need. The EUCS model in this study can be seen in Figure 4.



Fig.4: Test Model of EUCS

## 4. Result

### 4.1. Validity Test

A measuring instrument is valid if the tool can measure the construct as expected by the researcher. The rules for the decision are as follows:

1. If  $r\text{-count} > r\text{-table}$ , the question item is valid.
2. If  $r\text{-count} < r\text{-table}$ , the question item is not valid.

The results of the validity test of the Mobile Salute Bidan Application variable can be seen in table 2.

Table 2. Scale Validity Test Results (Corrected Item-Total Correlation)

Item	Corrected Item-Total Correlation	R-Table	Note
C1	0.779	0.196	Valid
C2	0.734	0.196	Valid
C3	0.811	0.196	Valid
C4	0.807	0.196	Valid
A1	0.728	0.196	Valid
A2	0.772	0.196	Valid
A3	0.767	0.196	Valid
A4	0.786	0.196	Valid
F1	0.693	0.196	Valid
F2	0.834	0.196	Valid
F3	0.775	0.196	Valid

Item	Corrected Item-Total Correlation	R-Table	Note
F4	0.730	0.196	Valid
EU1	0.692	0.196	Valid
EU2	0.757	0.196	Valid
EU3	0.795	0.196	Valid
EU4	0.811	0.196	Valid
T1	0.789	0.196	Valid
T2	0.782	0.196	Valid
T3	0.776	0.196	Valid
T4	0.724	0.196	Valid

Table 2 shows that all the statement items used to measure the variables of the Mobile Salute Bidan Application Dimension are valid. It can be seen from the Corrected Item-Total Correlation value, which is greater than the r-table value at a significant level of 5%.

### 4.2. Reliability Test

A reliability test shows how much a measuring instrument can be trustworthy or dependable. The reliability test instrument used in this study was Cronbach's Alpha, with a common value of 0.60. The results of the reliability test of the Mobile Salute Bidan Application variable can be seen in Table 3.

Table 3: Reliability Test Results (Cronbach's Alpha)

Reliability Statistics	
Cronbach's Alpha	N of Items
.969	20

Table 3 shows that Cronbach's Alpha value of 0.969 is more significant than 0.60. Therefore, all variables' statements in this research are concluded to be reliable.

### 4.3. Characteristics of Respondents

Characteristics of Respondents The characteristics of the respondents in this study consisted of several criteria, including age, occupation, and monthly income.

#### 1. Characteristics of respondents by age

In Figure 5, 95 users of the Salute Bidan application, or 95.05%, are more than or equal to 20 years old, while those less than 20 years old are five people or 4.95%.

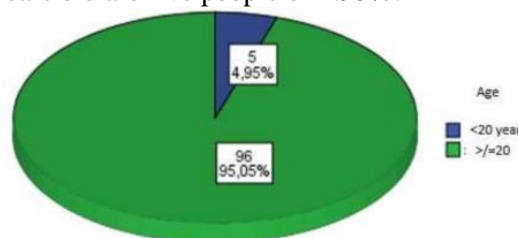


Fig. 5: Characteristics of respondents by age

#### 2. Characteristics of Respondents by occupation

In Figure 6, the Salute Bidan application users, as many as 75 people, or 75.25%, have jobs as housewives, and 11 people, or 10.89%, as private employees. The remaining 14 people, or 13.86%, have jobs as entrepreneurs, teachers/lecturers, students, nurses, and others.



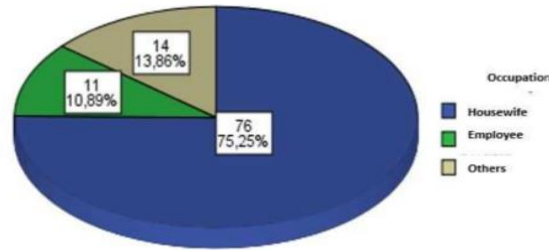


Fig.6: Characteristics of respondents by occupation

3. Characteristics of respondents by monthly income

Figure 7 shows that most users of the Salute Bidan application, as many as 88 people or 89%, have a monthly income of less than Rp. 5,000,000.; those have a monthly payment of more than or equal to Rp. 5,000,000 are 12 people or 11.88%.

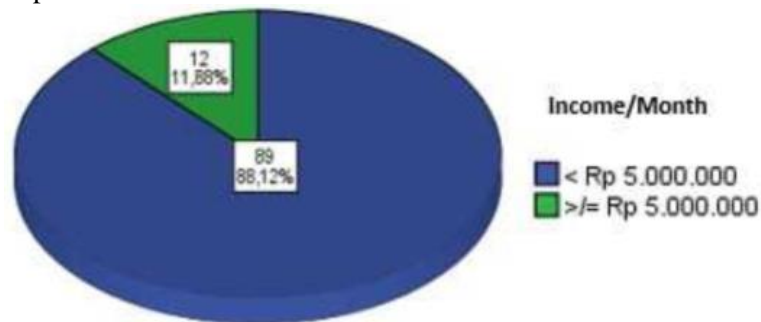


Fig.7: Characteristics of respondents based on monthly income

**4.4. Respondents' Responses to the Benefits of the Salute Bidan Mobile Application Characteristics of Respondents**

To find out the Benefits of the Mobile Salute Bidan Application, the author applied descriptive analysis by distributing 100 questionnaires. Used five variables in this study: Content, Accuracy, Format, Ease of Use, and Timeliness. The results of the descriptive analysis can be seen in Table 4 as Respondents' Statements About Content Variables.

Table 4: Respondents' Responses About Content Variables

Measurement Scale	Value	Frequency	Total Score	Percentage (%)
Very Poor	1	1	1	1
Poor	2	0	0	0
Fair	3	19	57	18.8
Good	4	60	240	59.4
Excellent	5	21	105	20.8
Total		100	403	100

Table 4 above shows that one of the five measurement scales that provides the most significant responses to the Content variable is "Good," with 60 respondents or 59.4%. Those giving "Excellent" answers are as many as 21 respondents or 20.8%, while those giving "Fair" responses are 19 respondents or 18.8%. The rest, one respondent or 1%, has issued a "Very Poor" response.

**4.5. Statements About Accuracy Variables**

Table 5: Respondents' Responses About Accuracy Variables

Measurement Scale	Value	Frequency	Total Score	Percentage (%)
Very Poor	1	1	1	1
Poor	2	0	0	0

Fair	3	10	30	9.9
Good	4	65	260	64.4
Excellent	5	25	125	24.8
Total		101	416	100

Table 5 above shows that one of the five measurement scales that provides the most significant responses to the Accuracy Variables is "Good," with 65 respondents or 64.4%. Those giving "Excellent" answers are as many as 25 respondents or 24.8%, while those giving "Fair" responses are ten respondents or 9.9%. The rest, one respondent or 1%, has issued a "Very Poor" response.

#### 4.6. Respondents' Statements About Format Variables

Table 6: Respondents' Responses About Format Variables

Measurement Scale	Value	Frequency	Total Score	Percentage (%)
Very Poor	1	1	1	1
Poor	2	0	0	0
Fair	3	24	72	23.8
Good	4	56	224	55.4
Excellent	5	20	100	19.8
Total		101	397	100

Table 6 above shows that one of the five measurement scales that provides the most significant responses to the Format variable is "Good," with 56 respondents or 55.4%. Those giving "Fair" answers are as many as 24 respondents or 23.8%, while those giving "Excellent" responses are 20 respondents or 19.8%. The rest, one respondent or 1%, has issued a "Very Poor" response

#### 4.7. Respondents' Statements About End of Use Variables

Table 7: Respondents' Responses About End of Use Variables

Measurement Scale	Value	Frequency	Total Score	Percentage (%)
Very Poor	1	1	1	1
Poor	2	0	0	0
Fair	3	17	51	16.8
Good	4	65	260	64.4
Excellent	5	18	90	17.8
Total		101	402	100

Table 7 shows that one of the five measurement scales that provides the most significant responses to the End of Use variable is "Good," with 65 respondents or 64.4%. Those giving "Excellent" answers were as many as 18 respondents or 17.8%, while those giving "Fair" responses were 17 respondents or 16.8%. The rest, one respondent or 1%, issued a "Very Poor" response.

#### 4.8. Respondents' Statements About Timeliness Variables

Table 8: Respondents' Responses About Timeliness Variables

Measurement Scale	Value	Frequency	Total Score	Percentage (%)
Very Poor	1	1	1	1
Poor	2	0	0	0
Fair	3	9	27	8.9
Good	4	60	240	59.4
Excellent	5	31	155	30.7
Total		101	423	100

Table 8 shows that one of the five measurement scales that provide the most significant responses to the Timeliness variable is "Good," with 60 respondents or 59.4%. Those giving "Excellent" answers were as many as 31 respondents or 30.7%, while those giving "Fair" responses were nine or 8.9%. The rest, one respondent or 1%, issued a "Very Poor" response.

## 5. Discussions

The conclusion from the content dimension variable is that the information contained in the Salute Bidan application is "good" in terms of the completeness of the information provided, a clear profile page, the complete required data, and easy to use of the system to produce information that is following the user's needs. The better and more complete the information the system provides, the higher the level of user satisfaction will be. The Accuracy dimension shows that this application is "good" to be recommended to other pregnant women. The error rate is minimal in terms of data accuracy when receiving input and then processing it into information, so they will feel comfortable when opening the application. The Format dimension showing that the application is "good" means that the menu contained in the application is straightforward to fill in by the users and admins, which consists of a username, password, and information about the Public Health Center. This Format dimension measures the user's satisfaction in terms of appearance to show whether the arrival of the system makes it easier for them when using the system so that it can increase their effectiveness.

The Ease of Use dimension shows "good" where the application is easy to use, easy to access, and user friendly in using the application. So the users can quickly use it. The timeliness dimension is seen from the viewpoint of "good" timeliness in presenting or providing the required data/information. It means that every user request will be processed immediately with no waiting time limit to make users happy and satisfied. The results have shown that all UECS dimensions (Content, Accuracy, Format, Ease of Use, and Timeliness) have been declared "good." Firstly, the Content dimension provides precise information, meets users' needs, and provides thorough and transparent communication. Secondly, the Accuracy dimension means that the application is detailed, accurate, and has the appearance. Thirdly, the Format dimension is the application that is presented attractively, looks good and easy, and makes it easier for the users to display the menu/link. Fourthly, the Ease of Use dimension is the application being easy to use, easy to access, and user friendly in using the application. Fifthly, the Timeliness dimension deals with the speed of responding. If an error occurs, it will display up-to-date information. From the five dimensions of the UECS method, the Salute Bidan mobile application illustrates that the application is valid and acceptable to users, especially pregnant women. Based on the three characteristics, show good results so that the impact on end users. These results are only for three user characteristics so that it can be developed in the future by adding a place of residence and educational attainment.

## 6. Conclusion

Testing and analyzing user satisfaction with the Salute Bidan application has been carried out using the EUCS method. Based on the results of the validity test, all the questions on the questionnaire were declared valid with the Corrected Item-Total Correlation value greater than the r-table value at a significant level of 5%. In contrast, the reliability test obtained Cronbach's Alpha value of  $0.969 > 0.60$ , meaning it was reliable. The responses of pregnant women respondents based on each of the five dimensions of CAFET with the UECS method, namely user satisfaction, were of suitable value, as evidenced by the results of the questionnaires. Each of the five dimensions of CAFET yielded 59.4% or 60 respondents, 64.4% or 65 respondents, and 55.4%. Or 56 respondents, 64.4% or 65 respondents, and 59.4% or 60 respondents. The Salute Bidan application has some benefits for users, especially pregnant women. This result can also be useful for application developers and stakeholders, where application developers can develop applications based on the level of end-user satisfaction. Currently, midwife communication is only done via chat, and no application section connects midwives directly to applications in the form of a separate account. For stakeholders, the results of this study indicate that the application can impact a service system for pregnant women into an innovation, namely a digital service system for pregnant women. In the future, this application can be carried out with development tests that can collaborate with the Performance, Information, Economic, Control, and Efficiency (PIECES) test method of framework software and developed into commercial applications or startups.

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