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Analysis of User Satisfaction of the High School Student Admissions Website Using the User Experience Questionnaire Method

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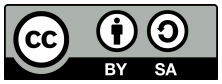
ABSTRACT

In the era of digitalization of public services, web-based student registration systems have become an important instrument in the education sector. The Website for New Student Admission (PPDB) of Senior High Schools (SMA) and Vocational High Schools (SMK) in Central Java Province has been implemented as a single platform for new student registration. Still, the main problem identified is the lack of a comprehensive evaluation of the level of user satisfaction with the quality of interaction experience with this platform, especially after the emergence of several complaints on the official PPDB social media regarding the system flow, services, and website appearance. This study aims to measure and analyze the level of user satisfaction with the PPDB website of SMA/SMK in Central Java Province using the User Experience Questionnaire (UEQ) approach, which covers six aspects of user experience. This research method is descriptive quantitative with a survey approach using a standardized UEQ instrument consisting of 26 question items, involving 30 respondents of class X students of SMA Negeri 1 Karanganyar Demak selected using a 10% sampling technique from the population. The results of this study indicate that the efficiency criteria obtained the highest score of 1.125. In contrast, the novelty criteria received the lowest score of 0.792, with the benchmark comparison diagram indicating a position below average (poor) in the criteria of attractiveness (1.061), clarity (1.092), accuracy (0.983), and stimulation (0.992), while in the criteria of efficiency and novelty, they are in a position above average (quite good). The implication of these findings underlines the need for further development in visual appeal, clarity of information, accuracy of functions, and interaction stimulation to improve the overall quality of the user experience of the PPDB website.



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1. INTRODUCTION

Digital transformation has become one of the government's policies to create services for the community that are faster, measurable, and more efficient. In the rapidly evolving digital era, websites have become essential instruments for delivering information and services, including education. The New Student Admission (PPDB) for senior high schools in Central Java Province exemplifies an educational service that has utilized websites to facilitate the new student registration process. However, with the increased use of the PPDB website, questions have arisen regarding the extent of user satisfaction with the website's quality. Information systems and web applications have become essential instruments for delivering information and services, including education, in the rapidly evolving digital era. User experience (UX) evaluation has become crucial to ensure the effectiveness and quality of digital services [1]. The User Experience Questionnaire (UEQ) has proven effective in measuring user perceptions across various aspects of user experience, including attractiveness, perspicuity, efficiency, dependability, stimulation, and novelty [2]. This method enables comprehensive evaluation of both pragmatic and hedonic aspects of user interaction [3]. As demonstrated in several recent studies, UEQ has been implemented to evaluate various systems, ranging from mobile applications like Peduli Lindungi [4], academic information systems [5], to MBKM information system interfaces [6]. This UX evaluation approach enables developers to identify areas requiring improvement, enhancing user satisfaction and the overall quality of digital services. This research aims to measure user satisfaction levels with the PPDB website for senior high schools in Central Java Province using the UEQ approach. The survey respondents were 30 tenth-grade students from SMA Negeri 1 Karanganyar Demak who had experience using the PPDB website. The UEQ analysis results show the highest score in the efficiency criterion at 1.125 and the lowest score in the novelty criterion at 0.792. The benchmark comparison diagram indicates a below-average position for attractiveness, perspicuity, dependability, and stimulation criteria and an above-average position for efficiency and novelty criteria.

User experience (UX) evaluation of web-based information systems has become essential to educational technology development. The User Experience Questionnaire (UEQ) [7], the method has proven effective for measuring pragmatic and hedonic qualities of academic information systems and learning platforms [8]. Previous research shows that UEQ can evaluate six important dimensions: attractiveness, perspicuity, efficiency, dependability, stimulation, and novelty [9]. Abubakari et al. implemented UEQ to evaluate an e-learning platform at the graduate level, demonstrating that pragmatic aspects such as efficiency received higher ratings compared to hedonic aspects [10]. García and Villanueva extended this perspective by combining emotional design and rhetoric to enhance user experience in Moodle [11]. Meanwhile, Wulandari evaluation of the PPDB zoning system emphasized the importance of user experience in the context of educational public services. Several previous studies have employed various approaches in UX evaluation [12]. Mansa applied UEQ to optimize the MBKM information system interface, while Othman used a combination of UEQ and Importance-Performance Analysis for cultural heritage applications. Paula et al. implemented UEQ to evaluate the EdLink application, whereas Wicaksana et al. applied it to the CLASS-IPB LMS [13].

There are gaps that have not been resolved by previous research, namely the lack of integration between quantitative UX evaluation and in-depth qualitative analysis, particularly in the context of the PPDB zoning system, which has specific characteristics as an educational public service. The difference between this research and the previous one is the combination of the UEQ method with qualitative content analysis to evaluate the PPDB zoning system, taking into account both technical and non-technical aspects of user experience. As explained in various studies, digital transformation has affected various sectors, from education to finance and technology. Kadri and Sembiring developed a web-based PBM questionnaire application designed to facilitate data collection from various parties, showing a high level of user satisfaction [9]. In the context of education, Wenerda and Fauziah highlighted the importance of innovation in digital platforms for student services, which were positively assessed in terms of clarity and efficiency, although the aspect of novelty still requires improvement [14]. Meanwhile, the implementation of the zoning policy in Malang City, as explained by Pramono et al., aims to equalize access to education, although it still faces challenges in the form of public perceptions about superior and non-superior schools [15]. In the technology sector, Wijaya et al. evaluated the PaTik Bali application designed to write Balinese script, showing high scores on the aspects of stimulation and attractiveness, but low on novelty, emphasizing the importance of innovation [16]. In the field of Islamic finance, Sudarmanto et al. highlighted the great opportunities in financial inclusion through technologies such as blockchain, although the challenge of Sharia compliance remains significant [17]. Finally, Kresnanto et al. compared the user experience of the RedDoorz and Airy applications, with the result that Airy outperformed in almost all aspects, highlighting the importance of innovation in improving the attractiveness of applications [18].

This research aims to develop a comprehensive evaluation model for the PPDB zoning system that integrates pragmatic and hedonic aspects of user experience. Its contribution is the development of a UX evaluation framework specifically applicable to educational public service information systems, which can assist policymakers in improving service quality and user satisfaction.

2. RESEARCH METHOD

This study uses the User Experience Questionnaire (UEQ) to measure user satisfaction with various aspects of the user experience, such as attractiveness, clarity, efficiency, accuracy, stimulation, and novelty. This research uses a survey approach with quantitative methods to evaluate user satisfaction with the PPDB SMA/SMK website of Central Java Province. The research flow will be conducted as shown in Figure 1.

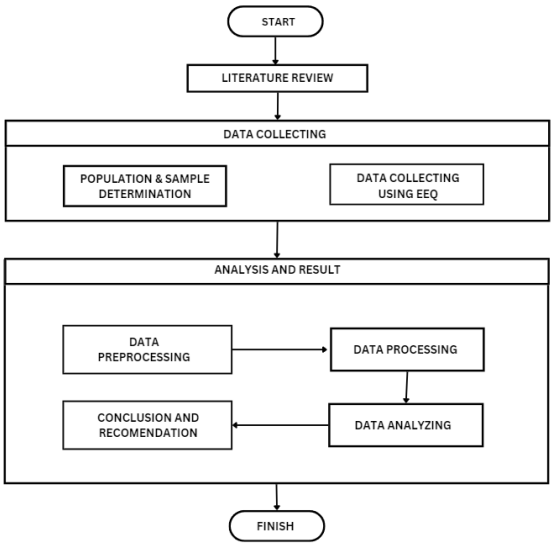

Figure 1. Research Workflow Diagram

The main instrument used in this research is the User Experience Questionnaire (UEQ). The UEQ questionnaire is a standardized questionnaire downloaded from the UEQ website https://www.ueq-online.org/. UEQ is part of the classic UX user testing to obtain a comprehensive user impression from several aspects [16] . Figure 2 consists of 26 question items divided into six main scales: attractiveness, clarity, efficiency, accuracy, stimulation, and novelty [19]. Each scale is designed to capture users' perceptions of specific aspects of the PPDB SMA/SMK Central Java Province website.

Saat ini silakan evaluasi produk dengan memilih satu lingkaran tiap baris item.

	1	2	3	4	5	6	7		
menyusahkan	O	O	O	O	O	O	O	menyenangkan	1
tak dapat dipahami	O	O	O	O	O	O	O	dapat dipahami	2
kreatif	O	O	O	O	O	O	O	monoton	3
mudah dipelajari	O	O	O	O	O	O	O	sulit dipelajari	4
bermanfaat	O	O	O	O	O	O	O	kurang bermanfaat	5
membosankan	O	O	O	O	O	O	O	mengasyikkan	6
tidak menarik	O	O	O	O	O	O	O	menarik	7
tak dapat diprediksi	O	O	O	O	O	O	O	dapat diprediksi	8
cepat	O	O	O	O	O	O	O	lambat	9
berdaya cipta	O	O	O	O	O	O	O	konvensional	10
menghalangi	O	O	O	O	O	O	O	mendukung	11
baik	O	O	O	O	O	O	O	buruk	12
rumit	O	O	O	O	O	O	O	sederhana	13
tidak disukai	O	O	O	O	O	O	O	menggembirakan	14
lazim	O	O	O	O	O	O	O	terdepan	15
tidak nyaman	O	O	O	O	O	O	O	nyaman	16
aman	O	O	O	O	O	O	O	tidak aman	17
memotivasi	O	O	O	O	O	O	O	tidak memotivasi	18
memenuhi ekspektasi	O	O	O	O	O	O	O	tidak memenuhi ekspektasi	19
tidak efisien	O	O	O	O	O	O	O	efisien	20
jelas	O	O	O	O	O	O	O	membingungkan	21
tidak praktis	O	O	O	O	O	O	O	praktis	22
terorganisasi	O	O	O	O	O	O	O	berantakan	23
atraktif	O	O	O	O	O	O	O	tidak atraktif	24
ramah pengguna	O	O	O	O	O	O	O	tidak ramah pengguna	25
konservatif	O	O	O	O	O	O	O	inovatif	26

Figure 2. UEQ Questionnaire

Respondents were asked to rate each item on a five-point Likert scale, ranging from strongly disagree to agree strongly. The UEQ questionnaire was chosen because of its proven validity and reliability in various previous studies. The data collected through this questionnaire will be analyzed to identify areas needing improvement and evaluate overall user satisfaction. Respondents are asked to fill out the questionnaire honestly to obtain relevant assessments. The UEQ questionnaire is presented in the Indonesian version.

The data collection procedure in this study involves several stages. First, the researcher prepared the UEQ questionnaire in digital format and ensured that all respondents understood the purpose and how to complete the questionnaire. After that, the questionnaire was distributed to 30 first-year students at SMA Negeri 1 Karanganyar Demak who had used the PPDB SMA/SMK Provinsi Jawa Tengah website. Data collection was conducted online to facilitate access and expedite the filling process. Respondents are asked to answer each question based on their experience using the PPDB SMA/SMK Central Java Province website (https://ppdb.jatengprov.go.id/#/), displayed in Figure 3.

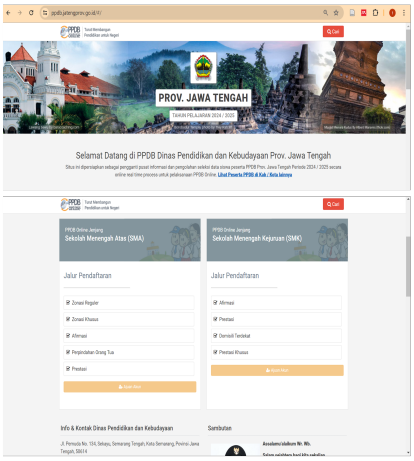

Figure 3. PPDB Website of Central Java Province

The UEQ questionnaire is used as a data collection tool, consisting of 26 question items that measure six main aspects: attractiveness, clarity, efficiency, precision, stimulation, and novelty. The data collection process was conducted online, where respondents were asked to fill out the questionnaire based on their experiences. The data that has been obtained is then analyzed using descriptive statistics to calculate the mean and standard deviation on a certain scale. The results of this analysis will be compared with the UEQ benchmark to assess the position of the Central Java Provincial PPDB website in various categories, such as good, very good, or above average. The explanation of the UEQ criteria calculation is shown in Figure 4.

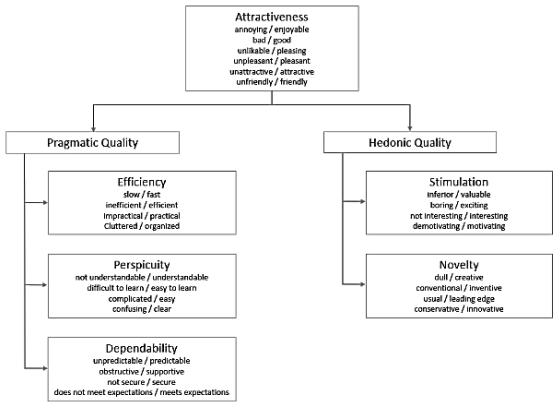

Figure 4. Scale Structure UEQ

Scale structure UEQ encompasses six dimensions that evaluate user experience comprehensively. The first dimension, attractiveness, reflects the general impression of users towards the product, indicating whether they find it appealing or unappealing. Perspicuity measures the clarity of the product, assessing whether it is easy or difficult to understand. Meanwhile, efficiency evaluates how effectively users can complete their tasks using the product, determining whether the interaction is fast, practical, or requires significant effort. Dependability focuses on the user's perception of control during interaction with the product, examining whether it feels predictable and supportive or unpredictable and obstructive. Stimulation, conversely, pertains to the user's motivation to use the product, highlighting whether it is perceived as useful, interesting, or less engaging. Lastly, novelty assesses the degree of innovation within the product, determining whether it is seen as creative and innovative or conservative and lacking originality. Together, these dimensions comprehensively evaluate both pragmatic and hedonic aspects of user experience.

The population of this study is first-year students at SMA Negeri 1 Karanganyar Demak who have used the PPDB SMA/SMK Provinsi Jawa Tengah website. The sample was taken at 10%, which amounts to 30 students. The sample selected as respondents were then asked to fill out a questionnaire to provide a representative picture of their user experiences. After the data is collected, the next step is to conduct an analysis using UEQ to assess the position of the PPDB SMA/SMK Central Java Province website in various categories. Data analysis was conducted using the downloaded questionnaire, and then all the data was inputted into the UEQ data analysis machine tool.

3. RESULT AND ANALYSIS

The findings of this research are that the PPDB SMA/SMK website in Central Java Province demonstrates varying levels of user satisfaction across six dimensions of the User Experience Questionnaire (UEQ). The efficiency criterion received the highest score of 1.125, indicating that users found the website relatively practical and easy to use for completing tasks. On the other hand, the novelty criterion had the lowest score of 0.792, highlighting a lack of innovation or creative features on the website. The benchmark comparison diagram further reveals that the website scored below average in the criteria of attractiveness (1.061), clarity (1.092), accuracy (0.983), and stimulation (0.992). However, it achieved an above-average position for efficiency and novelty. These results underscore the need for improvements in visual appeal, clarity of information, functional accuracy, and interaction stimulation to enhance the overall user experience. This research aligns with or is supported by Khuntari [20], who conducted a comparative study on user experience using the User Experience Questionnaire (UEQ) for the Gojek and Grab applications. The study revealed that while both applications achieved positive scores overall, certain dimensions, such as perspicuity and novelty in Gojek and efficiency and dependability in Grab, required further enhancement. This is consistent with the current research findings, which emphasize the need for improvements in clarity, accuracy, and stimulation to enhance the user experience of the PPDB website. Similarly, Juniantari and Putra [4], in their analysis of the DPMPTSP information system using the UEQ method, found that while the system performed well in stimulation and novelty, it required significant improvements in clarity (perspicuity) to make the platform more user-friendly. These findings support the results of this research, as clarity was also identified as a critical area for improvement to optimize the user experience.

Moreover, Hinderks et al. [19] highlighted the importance of integrating importance-performance analysis (IPA) with UEQ results to pinpoint specific areas requiring development. Their study on platforms such as YouTube, WhatsApp, and Facebook demonstrated that focusing on dimensions with high importance but low performance, such as trust and reliability, provides actionable insights for enhancing user satisfaction. This approach resonates with the benchmark comparison in this research, which identified efficiency and novelty as strengths while highlighting weaknesses in attractiveness and stimulation.

Lastly, Handayani et al. [21] conducted an analysis of the Threads application using the UEQ and identified that several dimensions, including attractiveness, efficiency, accuracy, and stimulation, were rated as "bad," while clarity was "below average." These findings are consistent with this research, which also identified weaknesses in attractiveness, accuracy, and stimulation, emphasizing the need for targeted improvements in these areas. By synthesizing insights from these studies, this research confirms that addressing clarity, accuracy, and stimulation is crucial for enhancing the user experience of the PPDB website while leveraging strengths in efficiency and novelty to create a more effective and user-friendly platform. Respondents were asked to rate each item on a five-point Likert scale, ranging from strongly disagree to agree strongly. The UEQ questionnaire was chosen because of its proven validity and reliability in various previous studies. The data collected through this questionnaire will be analyzed to identify areas needing improvement and evaluate overall user satisfaction. In order to obtain relevant assessments, respondents are asked to fill out the questionnaire honestly. The Indonesian version of the UEQ questionnaire is presented.

The data collection procedure in this study involves several stages. First, the researcher prepared the UEQ questionnaire in digital format and ensured that all respondents understood the purpose and how to fill out the questionnaire. After that, the questionnaire was distributed to 30 first-year students at SMA Negeri 1 Karanganyar Demak who had used the PPDB SMA/SMK

Provinsi Jawa Tengah website. Data collection was conducted online to facilitate access and expedite the filling process. Respondents are asked to answer each question based on their experience using the PPDB SMA/SMK Central Java Province website (https://ppdb.jatengprov.go.id/#/). Table 1 contains responses from respondents represented by a 10% sample of the population using a scale of 1 to 7, which have been input into the UEQ tool. The data in Figure 5 is then transformed to obtain negative or positive assumptions for each item. The results of the transformation are presented in the Value Transformation Table. Table 2 shows the percent of items in the questionnaire are counted to determine whether they have a positive or negative value. Half of the items start with a negative term, while the other half starts with a positive term. The number -3 represents the lowest value (negative), while +3 represents the highest value (positive). The average score for each response item is shown in the following Figure 1.

Table 1. Respondent Questionnaire Data

Items																								
1	**2**	**3**	**4**	**5**	**6**	**7**	**8**	**9**	**10**	**11**	**12**	**13**	**14**	**15**	**16**	**17**	**18**	**19**	**20**	**21**	**22**	**23**	**24**	**25**	**26**
6	6	2	2	1	6	6	7	1	3	6	2	6	6	3	6	1	1	2	6	1	7	4	2	2	6
6	6	1	1	1	6	6	6	1	1	6	1	6	6	2	6	1	1	1	6	1	6	4	1	1	6
4	4	3	5	5	5	6	4	2	3	6	1	5	6	4	6	2	2	2	4	2	6	2	2	1	4
2	6	2	6	2	6	2	6	6	2	6	2	2	2	6	6	2	2	2	6	2	6	6	2	2	6
6	5	4	5	6	2	6	6	7	4	6	2	6	6	5	6	2	2	3	6	1	6	4	2	2	5
4	4	3	3	3	2	4	3	2	4	3	2	3	4	4	5	4	3	3	4	5	5	3	4	3	5
4	5	4	4	4	5	5	3	3	4	3	3	3	4	5	3	4	4	5	5	5	5	4	3	3	5
7	7	2	1	1	6	6	5	1	1	7	1	7	7	7	6	6	1	2	6	1	7	2	2	2	6
6	7	2	1	1	5	6	6	2	3	7	1	7	7	6	7	1	2	1	7	1	6	4	4	2	7
1	7	1	6	2	3	4	5	1	7	4	3	5	3	2	1	2	3	4	4	6	7	4	4	6	6
6	7	2	1	1	5	7	1	1	5	5	1	6	6	6	6	1	5	2	1	1	7	1	2	1	7
4	4	3	4	3	4	3	4	6	4	4	5	3	4	3	4	4	2	3	5	3	5	4	4	3	5
7	7	1	1	1	6	7	6	2	6	7	1	5	6	6	7	1	1	2	7	1	6	4	1	1	7
5	4	3	2	2	5	6	4	3	3	4	2	5	5	5	5	4	3	4	5	4	4	5	4	5	3
7	6	2	2	1	5	6	6	2	4	6	1	7	5	5	6	2	2	2	6	3	7	2	2	2	6
4	7	7	1	3	1	1	1	1	7	7	3	7	4	1	5	1	7	7	7	1	7	4	7	1	2
1	1	7	7	7	1	1	1	7	7	1	7	1	1	1	1	7	7	7	1	7	1	1	7	7	1
4	3	2	4	2	5	5	6	2	3	6	2	3	6	5	4	3	3	5	4	2	3	4	4	4	5
2	2	1	7	5	4	7	1	4	4	3	6	5	4	5	5	3	2	7	4	7	5	5	5	4	6
5	5	3	3	4	2	6	4	4	4	5	3	4	4	4	4	3	1	4	5	4	4	4	4	3	4
7	7	2	1	1	5	7	7	2	1	7	1	7	7	5	7	1	2	3	7	1	7	3	1	1	7
4	6	3	3	2	4	4	7	3	3	4	4	4	4	4	4	6	6	5	4	5	5	4	4	4	4
7	7	2	2	2	7	6	7	2	2	7	1	7	7	7	7	1	2	1	7	1	6	1	1	1	7
5	7	4	6	3	7	7	6	1	1	7	4	6	3	5	2	2	4	6	5	5	3	1	5	4	5
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4	4	5	4	2	3	4	4	5	3	6	2	3	4	2	6	3	3	5	4	5	6	3	3	2	5
6	6	2	2	2	6	6	6	2	2	6	2	5	6	6	6	3	2	2	6	2	6	4	2	2	6
6	7	4	2	1	6	6	5	1	4	6	1	6	5	6	7	1	2	1	7	1	7	4	4	1	6
3	4	2	3	6	2	2	4	4	3	5	3	6	3	3	2	3	4	3	5	5	5	3	5	2	7

Table 2. Value Transformation Table

Items																								
1	**2**	**3**	**4**	**5**	**6**	**7**	**8**	**9**	**10**	**11**	**12**	**13**	**14**	**15**	**16**	**17**	**18**	**19**	**20**	**21**	**22**	**23**	**24**	**25**	**26**
2	2	2	2	3	2	2	3	3	1	2	2	2	2	-1	2	3	3	2	2	3	3	0	2	2	2
2	2	3	3	3	2	2	2	3	3	2	3	2	2	-2	2	3	3	3	2	3	2	0	3	3	2
0	0	1	-1	-1	1	2	0	2	1	2	3	1	2	0	2	2	2	2	0	2	2	2	2	3	0
-2	2	2	-2	2	2	-2	2	-2	2	2	2	-2	-2	2	2	2	2	2	2	2	2	-2	2	2	2
2	1	0	-1	-2	-2	2	2	-3	0	2	2	2	2	1	2	2	2	1	2	3	2	0	2	2	1
0	0	1	1	1	-2	0	-1	2	0	-1	2	-1	0	0	1	0	1	1	0	-1	1	1	0	1	1
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3	3	2	3	3	2	2	1	3	3	3	3	3	3	3	2	-2	3	2	2	3	3	2	2	2	2
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2	3	2	3	3	1	3	-3	3	-1	1	3	2	2	2	2	3	-1	2	-3	3	3	3	2	3	3
0	0	1	0	1	0	-1	0	-2	0	0	-1	-1	0	-1	0	0	2	1	1	1	1	0	0	1	1

Items																								
1	**2**	**3**	**4**	**5**	**6**	**7**	**8**	**9**	**10**	**11**	**12**	**13**	**14**	**15**	**16**	**17**	**18**	**19**	**20**	**21**	**22**	**23**	**24**	**25**	**26**
3	3	3	3	3	2	3	2	2	-2	3	3	1	2	2	3	3	3	2	3	3	2	0	3	3	3
1	0	1	2	2	1	2	0	1	1	0	2	1	1	1	1	0	1	0	1	0	0	-1	0	-1	-1
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-3	-3	-3	-3	-3	-3	-3	-3	-3	-3	-3	-3	-3	-3	-3	-3	-3	-3	-3	-3	-3	-3	3	-3	-3	-3
0	-1	2	0	2	1	1	2	2	1	2	2	-1	2	1	0	1	1	-1	0	2	-1	0	0	0	1
-2	-2	3	-3	-1	0	3	-3	0	0	-1	-2	1	0	1	1	1	2	-3	0	-3	1	-1	-1	0	2
1	1	1	1	0	-2	2	0	0	0	1	1	0	0	0	0	1	3	0	1	0	0	0	0	1	0
3	3	2	3	3	1	3	3	2	3	3	3	3	3	1	3	3	2	1	3	3	3	1	3	3	3
0	2	1	1	2	0	0	3	1	1	0	0	0	0	0	0	-2	-2	-1	0	-1	1	0	0	0	0
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0	0	-1	0	2	-1	0	0	-1	1	2	2	-1	0	-2	2	1	1	-1	0	-1	2	1	1	2	1
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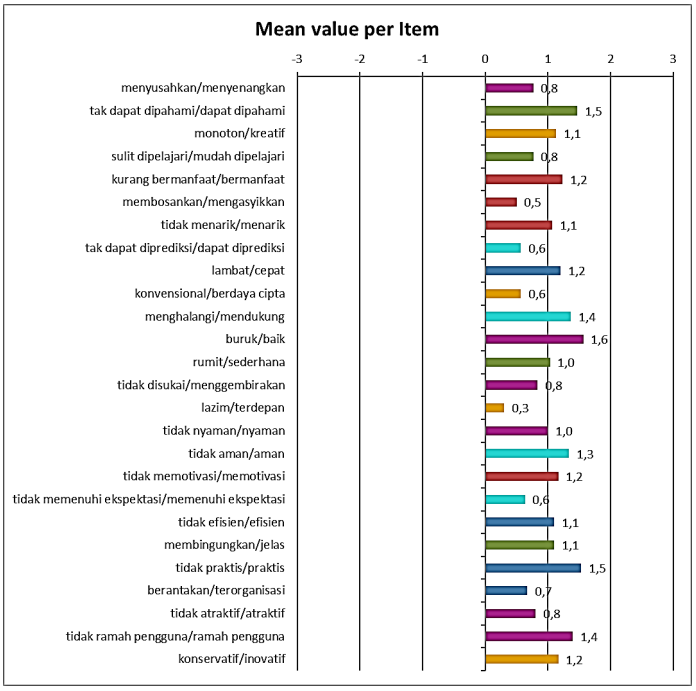

Figure 5. The Average Score for Each Response Item

Next, the mean, variance, and standard deviation calculations were performed on each response, as shown in Figure 6. The average result of the standard deviation variance. In each answer, a color code corresponding to its answer group has been provided, with each question having the ability to differ according to 9 criteria: attractiveness, clarity, effectiveness, resilience, incentive, and innovation. The conclusions of each criterion can be seen in the following Figure 7. UEQ Scales (average and variance). In Figure 7. UEQ scales (average and variance) show that the Efficiency criterion received the highest average score with a value of 1.125 and a variance of 1.91. Next, the Attractiveness criterion received a score of 1.061 and a variance of 1.97, the Clarity variable received a score of 1.092 and a variance of 2.31, and Stimulation received a score of 0.992 and a variance of 1.90. Meanwhile, the lowest average score in the Novelty criterion was 0.792, with a variance of 1.63. The graph comparing the average variables is presented in Figure 8.

Item	Mean	Variance	Std. Dev.	No.	Left	Right	Scale
1	0.8	3.0	1.7	30	menyusahkan	menyenangkan	Daya tarik
2	1.5	2.7	1.7	30	tak dapat dipahami	dapat dipahami	Kejelasan
3	1.1	2.5	1.6	30	kreatif	monoton	Kebaruan
4	0.8	3.9	2.0	30	mudah dipelajari	sulit dipelajari	Kejelasan
5	1.2	3.6	1.9	30	bermanfaat	kurang bermanfaat	Stimulasi
6	0.5	3.0	1.7	30	membosankan	mengasyikkan	Stimulasi
7	1.1	3.2	1.8	30	tidak menarik	menarik	Stimulasi
8	0.6	3.7	1.9	30	tak dapat diprediksi	dapat diprediksi	Ketepatan
9	1.2	3.4	1.8	30	cepat	lambat	Efisiensi
10	0.6	2.9	1.7	30	berdaya cipta	konvensional	Kebaruan
11	1.4	2.3	1.5	30	menghalangi	mendukung	Ketepatan
12	1.6	2.5	1.6	30	baik	buruk	Daya tarik
13	1.0	2.7	1.7	30	rumit	sederhana	Kejelasan
14	0.8	2.4	1.6	30	tidak disukai	menggembirakan	Daya tarik
15	0.3	2.9	1.7	30	lazim	terdepan	Kebaruan
16	1.0	3.0	1.7	30	tidak nyaman	nyaman	Daya tarik
17	1.3	2.7	1.6	30	aman	tidak aman	Ketepatan
18	1.2	2.8	1.7	30	memotivasi	tidak memotivasi	Stimulasi
19	0.6	3.3	1.8	30	memenuhi ekspektasi	tidak memenuhi ekspektasi	Ketepatan
20	1.1	2.4	1.6	30	tidak efisien	efisien	Efisiensi
21	1.1	4.0	2.0	30	jelas	membingungkan	Kejelasan
22	1.5	2.1	1.4	30	tidak praktis	praktis	Efisiensi
23	0.7	1.7	1.3	30	terorganisasi	berantakan	Efisiensi
24	0.8	2.6	1.6	30	atraktif	tidak atraktif	Daya tarik
25	1.4	2.4	1.5	30	ramah pengguna	tidak ramah pengguna	Daya tarik
26	1.2	2.6	1.6	30	konservatif	inovatif	Kebaruan

Figure 6. The Average Result of the Standard Deviation Variance

UEQ Scales (Mean and Variance)		
Daya tarik	1.061	1.97
Kejelasan	1.092	2.31
Efisiensi	1.125	0.91
Ketepatan	0.975	1.82
Stimulasi	0.992	1.90
Kebaruan	0.792	1.63

Figure 7. UEQ Scales (Average and Variance)

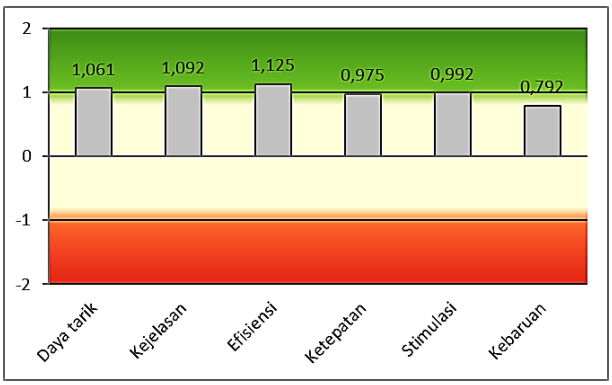

Figure 8. Average UEQ Scale Graph

The subsequent analysis is conducted to determine the Pragmatic and Hedonic quality of the evaluated website. Pragmatic quality is evaluated from 3 categories: Perspicuity, Efficiency, and Dependability, while hedonic quality is measured based on two criteria: Stimulation and Originality. Pragmatic quality shows aspects related to tasks, while hedonic quality shows aspects not related to tasks. The pragmatic and hedonic qualities are then compared with the category of attractiveness. From Table 3, the Pragmatic and hedonic quality table., it can be seen that attractiveness has the same value as the pragmatic quality, which is 1.06. This means that

the website is rated as good in terms of attractiveness and pragmatic quality. Next, the hedonic quality is in the lowest position, with a score of 0.89. The following graph provides a clearer picture. Displayed in Figure 9.

Table 3. Pragmatic and Hedonic Quality Table

Pragmatic and Hedonic Quality	
Daya tarik	1,06
Kualitas Pragmatis	1,06
Kualitas Hedonis	0,89

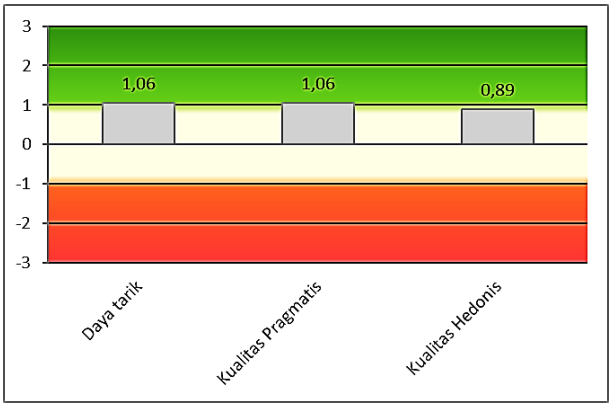

Figure 9. Comparison Graph of Pragmatic and Hedonic Quality

The results of this analysis were then subjected to a comparison benchmark to compare the evaluation of this research with similar studies reported on UEQ online. The UEQ calculation results for the UX of the PPDB SMA/SMK website of Central Java Province were compared with other studies. There are several scales to classify the assessment of the website as follows. Excellent (Luar Biasa) if the website measurement results are in the top 10% range; Good (Bagus) if the website measurement results are in the range of the top 10% and 75% worse; Above Average (Fair) if it is in the range of 25% better compared to the evaluated website results which are 50% worse; Below Average (Below Average) if the measurement result of 50% of the measurement value is better than the evaluated website result which is 75% worse; and Bad (Bad) if the website measurement result is around 25% or lower. The benchmark comparison results for the SMA/SMK PPDB Web of Central Java Province are displayed in Table 4.

Table 4 shows that the attraction criterion, with an average score of 1.06, is below average, with the interpretation that 50% of the results are better. In comparison, 25% of the results are worse. The Clarity criterion, with an average score of 1.09, is positioned below average (poor), with the interpretation that 50% of the results are better while 25% are worse. Meanwhile, with an average score of 1.13, the Efficiency criterion is positioned as above average (fairly good), interpreting that 50% of the results are better and 50% are worse. Next, the Accuracy criterion, with an average of 0.98, is positioned below average (less good), interpreting that 50% of the results are better and 50% are worse. The Stimulation criterion, with an average score of 0.99, is positioned below average (poor), with the interpretation that 50% of the results are better and 50% are worse. Meanwhile, the Novelty criterion with an average score of 0.79 is positioned above average (fairly good), meaning 50% of the results are better and 50% are worse. The comparison benchmark, as shown in Figure 10, indicates the website's position compared to the UEQ database. The Attractiveness, Clarity, Accuracy, and Stimulation criteria results show that the website is positioned below average (poor). In contrast, for the criteria of Efficiency and Novelty, the website is positioned above average (fairly good).

Table 4. Comparison Benchmark Table

Scale	**Mean**	**Comparison to Benchmark**	**Interpretation**
Daya tarik	1,06	Below Average	50% of results better, 25% of results worse
Kejelasan	1,09	Below Average	50% of results better, 25% of results worse
Efisiensi	1,13	Above Average	25% of results better, 50% of results worse
Ketepatan	0,98	Below Average	50% of results better, 25% of results worse
Stimulasi	0,99	Below Average	50% of results better, 25% of results worse
Kebaruan	0,79	Above Average	25% of results better, 50% of results worse

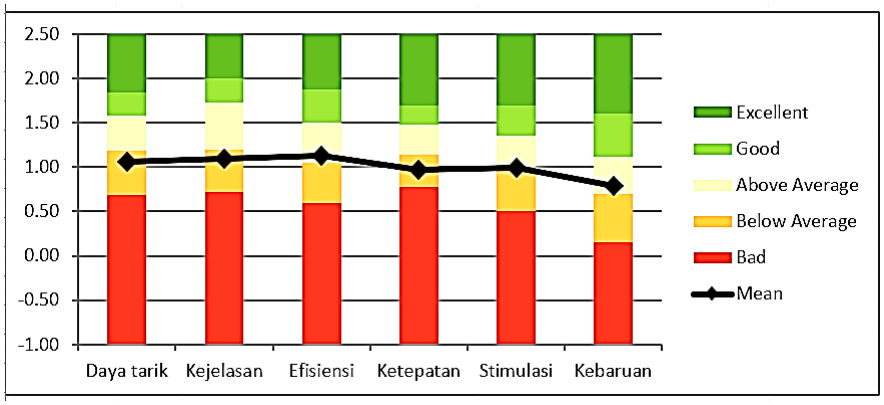

Figure 10. Comparison of Benchmark Diagrams

4. CONCLUSION

This research has successfully demonstrated the effectiveness of combining the UEQ method with qualitative content analysis for evaluating educational public service information systems, particularly the PPDB zoning system. This novel integrated approach provides a more comprehensive understanding of user experience by capturing quantitative metrics and contextual insights that traditional single-method evaluations might miss. The findings reveal that while the PPDB website achieves positive user experience levels overall, there are clear opportunities for improvement in specific dimensions, with the New Student Admission (PPDB) website for senior high schools in Central Java Province using the User Experience Questionnaire (UEQ) method. The results revealed that the efficiency criterion achieved the highest score of 1.125, indicating that the website is perceived as practical and user-friendly for completing tasks. Conversely, the novelty criterion received the lowest score of 0.792, highlighting the website's lack of innovation or creative features. The benchmark comparison diagram shows that the website scored below average for attractiveness (1.061), clarity (1.092), accuracy (0.983), and stimulation (0.992). However, the website achieved an above-average position for efficiency and novelty, interpreted as "fairly good." Based on the pragmatic and hedonic qualities analysis, pragmatic quality (covering efficiency, clarity, and accuracy) scored 1.06. In contrast, hedonic quality (covering stimulation and novelty) scored only 0.89, indicating that non-task-related aspects like motivation and innovation still require improvement.

The novelty of this research lies in applying the UEQ method, which not only quantitatively evaluates user experience but also provides strategic insights for developing public education service websites. By leveraging UEQ-based evaluation, this study successfully identified areas requiring improvement, such as enhancing visual appeal, information clarity, functional accuracy, and interaction stimulation. Furthermore, these findings emphasize the importance of integrating innovation into website design to improve overall user experience. As a practical implication, the developers of the PPDB website are encouraged to prioritize improvements in low-scoring dimensions, such as attractiveness and stimulation, to enhance user satisfaction. Additionally, innovation in new features needs to be promoted to attract more users and create a more engaging experience. This study also contributes to developing a UX evaluation framework applicable to other public education service systems, assisting policymakers in improving the quality of digital services.

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