Level of Public Satisfaction with Sports Facilities at Medan State University Stadium

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Article Info	Abstract

This study aims to determine the level of public satisfaction with the sports facilities at the Medan State University Stadium. The study used a quantitative descriptive approach involving 30 respondents, consisting of students and the general public who use the stadium facilities. The research instrument was a closed-ended questionnaire using a Likert scale covering indicators of facility and infrastructure conditions, cleanliness, security, comfort, accessibility, and facility management. Data were analyzed using Statistical Package for the Social Sciences (SPSS)to obtain percentage values, average (mean), and satisfaction level categories. The results of the analysis show that the level of public satisfaction is in the category **Good** with an overall average score of 3.87 (scale 1–5) or 77.4%. The aspects of cleanliness (mean = 4.02) and security (mean = 3.95) obtained the highest scores, while the aspect of completeness and maintenance of facilities (mean = 3.65) obtained the lowest score. These findings indicate that in general, the stadium sports facilities have met user expectations, although improvements are still needed in the aspects of maintenance and completeness of facilities to optimally improve service quality.

INTRODUCTION

The availability of adequate, safe, and accessible public sports facilities is a key prerequisite for encouraging participation in physical activity, improving population health, and strengthening the social function of public spaces. In urban settings, the quality of public sport infrastructure is determined not only by the existence of physical amenities (e.g., courts, tracks, stands, toilets, and parking areas), but also by the quality of services that accompany their use (e.g., cleanliness, safety, crowd management, information provision, staff responsiveness, and overall comfort). Prior studies on public sports facilities indicate that perceived service quality and physical environment factors are associated with user satisfaction as well as intentions to reuse the facility or recommend it to others.

Institution-managed sports facilities including university stadiums are increasingly viewed as an essential component of public sport infrastructure because they support physical activity, recreation, and social interaction. However, the mere presence of facilities is insufficient. Users evaluate their experiences based on both the physical condition of the facility (cleanliness, security, comfort, and accessibility) and the service quality delivered (staff responsiveness, information availability, and operational orderliness). In this context, public satisfaction becomes a strategic indicator for assessing the management performance of the Medan State University (UNIMED) Stadium as a facility that also serves the wider community.

University stadiums, including the UNIMED Stadium, often perform dual functions: they serve as venues for education and sport performance development, while also acting as public spaces for community sport participation. This dual role requires consistent governance to ensure a positive user experience for diverse segments (students, athletes, sport communities, and the general public). In practice, public facilities frequently face challenges such as limited maintenance, fluctuating cleanliness, parking congestion, varying accessibility quality, insufficient information provision, and inconsistent staff readiness. These challenges can reduce perceived service quality and ultimately lower user satisfaction, potentially decreasing repeat use and damaging the institution's image. The importance of maintenance, cleanliness, and operational management as part of facility management is also emphasized in stadium management guidelines, particularly in relation to safety and asset preservation.

From a theoretical perspective, Customer Satisfaction Theory explains that satisfaction emerges from a comparison between expectations and perceived performance (expectancy disconfirmation). When performance exceeds expectations, users are likely to be satisfied; when it falls below expectations, dissatisfaction is likely. Satisfaction is critical because it is linked to behavioral outcomes such as reuse intention and positive word-of-mouth (WOM).

One of the primary determinants of satisfaction is service quality. The SERVQUAL model conceptualizes service quality through dimensions such as tangibles, reliability, responsiveness, assurance, and empathy. In addition, hierarchical approaches propose that service quality is formed through interaction quality, physical environment quality, and outcome quality. In sport services, the physical environment of facilities (sportscape) has also been shown to influence satisfaction and intentions to return.

Within the context of public sport, empirical evidence suggests that the service quality of public sports facilities affects citizens' satisfaction and encourages WOM intentions. In parallel, the Sport Facility Management perspective highlights the importance of operational factors such as maintenance and cleaning to protect stadium assets and meet safety requirements factors that ultimately shape perceived quality and user satisfaction. However, research that specifically examines public users' satisfaction with university stadiums as public sport infrastructure remains limited and often fails to integrate service quality and facility management dimensions into a comprehensive evaluation framework.

Accordingly, the study entitled **"Level of Public Satisfaction with Sports Facilities at Medan State University Stadium"** is important for: (1) systematically measuring public satisfaction; (2) testing the influence of service quality on satisfaction; and (3) examining the implications of satisfaction for reuse intention and WOM, while incorporating facility management as a contextual determinant of user experience and perceived quality.

Although the literature on service quality and satisfaction in sport facilities has expanded, several gaps remain relevant to university stadiums as public sport infrastructure. First, many satisfaction studies focus on specific user groups (e.g., fitness center members, event spectators, or students), while research specifically capturing the general public's satisfaction with facilities managed by higher education institutions is still limited. Second, some studies measure "satisfaction" in general terms without sufficiently integrating service quality and sport facility management (operations, maintenance, and safety) into a single comprehensive evaluation framework for stadiums serving public users. Third, the local context of Medan may involve distinctive patterns of facility use (e.g., visitation patterns, peak-time congestion, and user preferences), meaning that findings from other settings may not be directly generalizable.

Based on these gaps, this study offers novelty in three aspects. First, in terms of context and participants, it focuses on public satisfaction among community users of a university stadium as public sport infrastructure, rather than only internal campus users. Second, it applies an integrated theoretical framework that combines Customer Satisfaction Theory (expectancy–disconfirmation), Service Quality (SERVQUAL/multidimensional approaches), and Sport Facility Management to evaluate satisfaction more holistically (service experience, facility condition, and management practices). Third, the study provides managerial

implications by identifying priority areas for service and facility improvement (e.g., cleanliness, safety, accessibility, information provision, staff responsiveness, and maintenance), offering practical input for stadium managers to enhance public service quality and asset sustainability.

Therefore, this research is essential for providing empirical evidence on the factors shaping community satisfaction with sports facilities at the UNIMED Stadium. The findings are expected not only to enrich the literature on sport facility satisfaction and sport service quality, but also to inform decision-making for more responsive, safe, and user-oriented public sport infrastructure management.

METHODS

This research uses an approach **quantitative descriptive** using a survey design (Sugiyono, 2023). This approach was chosen to systematically and factually describe the level of public satisfaction with the sports facilities at the Medan State University Stadium based on numerical data obtained from respondents. The research was conducted at the Medan State University Stadium. Data collection took place when the stadium facilities were actively used by students and the general public.

Participants

The population in this study was all users of the stadium sports facilities, both students and the general public.

Sampling technique using accidental **sampling**, namely respondents who happened to use the facilities and were willing to fill out the questionnaire. The number of samples in this study was **30 respondents**.

Table 1. Respondent Characteristics

Characteristic	Category	Frequency (n)	Percentage (%)
Age	17-20 years	10	33.3
	21-25 years	12	40.0
	26-30 years	5	16.7
	>30 years	3	10.0
Gender	Male	18	60.0
	Female	12	40.0
Status	Student	20	66.7
	General Public	10	33.3
Frequency of Stadium Use	1-2 Times Per Week	12	40.0
	3-4 Times Per Week	10	33.3
	>4 Times Per Week	8	26.7

Materials and Apparatus

The instruments used in this study are **closed questionnaire, which** is compiled using **5-level Likert scale** This questionnaire aims to measure the level of public satisfaction with the sports facilities at the Medan State University Stadium.

Respondents were asked to provide answers according to the level of

satisfaction they felt with each statement given.

This instrument contains several key indicators: the condition of facilities and infrastructure, cleanliness, safety, comfort, accessibility, and completeness and maintenance. Each indicator is broken down into several statements that describe the actual condition of the stadium facilities.

Before being used in data collection, the questionnaire was first tested for validity and reliability to ensure that the instrument was suitable for use and capable of measuring the level of public satisfaction accurately and consistently.

The following is a table of research instruments that can be used in research. **Level of Public Satisfaction with Sports Facilities at the Medan State University Stadium at** Medan State University.

Table 1. Measurement Scale (5-Level Likert Scale)

No	Answer Categories
1	Very Dissatisfied
2	Not satisfied
3	Quite Satisfied
4	Is it?
5	Very satisfied

Table 2. Instrument Validity Test Results

No	r Count	rTable	Information
1	0,528	0,361	Valid
2	0,612	0,361	Valid
3	0,574	0,361	Valid
4	0,641	0,361	Valid
5	0,589	0,361	Valid
6	0,603	0,361	Valid
7	0,556	0,361	Valid
8	0,618	0,361	Valid
9	0,547	0,361	Valid
10	0,571	0,361	Valid
11	0,533	0,361	Valid
12	0,590	0,361	Valid

Table 3. Instrument Reliability Test Results

Variable	Total Item	Cronbach's Alpha	Information
Public Satisfaction with Sports Facilities at Medan State University Stadium	12	0,842	Reliable

Based on the analysis results using SPSS, all statement items had a calculated r value greater than the table r (0.361), so all items were declared valid. The Cronbach's Alpha value of 0.842 indicates that the instrument has a high level of reliability, making it suitable for use as a data collection tool in this study.

Design or Data Analysis

The data obtained were analyzed using **Statistical Package for the Social Sciences (SPSS)** with the following steps:

1. Test the validity and reliability of the instrument
2. Descriptive statistical analysis (mean, percentage, and standard deviation)
3. Categorization of satisfaction levels based on score intervals

The criteria for the satisfaction level category are determined as follows:

Table 4. Satisfaction Level

Interval Shoes	Category

4,21 – 5,00	Very good
3,41 – 4,20	Good
2,61 – 3,40	Enough
1,81 – 2,60	Not enough
1,00 – 1,80	Very less

RESULT

The results of this study were obtained from distributing questionnaires to 30 respondents who used sports facilities at the Medan State University Stadium. The collected data were then analyzed using **Statistical Package for the Social Sciences (SPSS)** to obtain the average value (mean), percentage, and satisfaction level category.

Based on the results of the descriptive analysis, the overall average value obtained was **3,87** on a scale of 1–5 or equivalent **77,4%**, which is in the category **Good** This shows that in general the public is satisfied with the sports facilities available at the stadium.

If reviewed based on each indicator, the aspects/cleanliness **of facilities obtained** the highest average score, namely **4,02 (80,4%)**, which is included in the good category. Respondents assessed that the condition of the stadium area was relatively clean and well-maintained, and that adequate facilities to support cleanliness were available. **Security** also shows high values with an average 3**,95 (79%)**, which indicates that users feel safe when carrying out activities in the stadium environment.

Next, the aspect **comfort** get an average score **3,88 (77,6%)**, followed by the condition **of facilities and infrastructure** as big as **3,85 (77%)**, and **accessibility** as big as **3,82 (76,4%)**. All five indicators are in the good category, meaning the stadium facilities have generally met user expectations.

However, the indicators completeness **and maintenance of facilities obtained** the lowest average value, namely **3,65 (73%)**, although still in the fairly good to good category. This indicates that some facilities or equipment still need to be improved or maintained to provide more optimal service.

Overall, the results of this study confirm that public satisfaction with the sports facilities at the Medan State University Stadium is in the good category, with several aspects requiring special attention to improve service quality in the future. The following is a bar graph of the results.
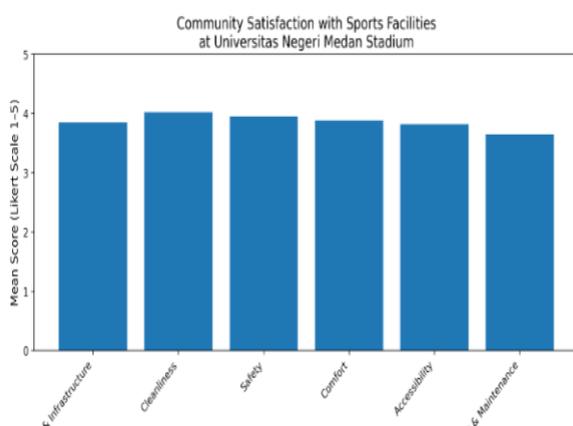

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Figure 1. Research Results Bar Graph

DISCUSSION

This study aimed to analyze the level of community satisfaction with sports facilities at the stadium of Universitas Negeri Medan using a descriptive quantitative approach. The findings indicate that the overall mean score of community satisfaction was 3.87 (77.4%), which falls into the "good" category. This result suggests that, in general, the existing sports facilities have met users' expectations and function adequately as a public sports space within a university environment.

Among the evaluated indicators, cleanliness obtained the highest mean score (4.02). This finding implies that users perceive the stadium environment as relatively well-maintained and hygienic. Cleanliness is a fundamental component of service quality in public facilities, as it directly influences comfort, health, and users' willingness to revisit. The high rating in this aspect reflects effective routine maintenance and operational management.

The safety indicator also showed a high mean score (3.95), indicating that respondents felt secure while engaging in sports activities. A safe environment is essential in sports facility management, particularly in open-access university stadiums where users may come from diverse backgrounds. Adequate security

arrangements contribute positively to perceived service quality and overall satisfaction.

Furthermore, comfort (3.88), facilities and infrastructure condition (3.85), and accessibility (3.82) were all categorized as good. These findings demonstrate that the physical condition of the sports infrastructure and its ease of access are generally acceptable. Accessibility, including parking space and ease of entry, plays a strategic role in enhancing user experience. The relatively positive evaluation in these aspects suggests that the stadium functions effectively as a semi-public sports facility serving both students and the surrounding community.

However, the lowest mean score was found in the equipment completeness and maintenance indicator (3.65). Although still within the good category, this result indicates that users perceive certain limitations in the availability or upkeep of sports equipment. This finding highlights the importance of continuous investment in facility upgrades and systematic maintenance programs. In the context of sports facility management, inadequate equipment or irregular maintenance may gradually reduce user satisfaction and utilization rates.

When compared to previous studies on sports facility service quality, which often focus primarily on student populations or use service quality models such as SERVQUAL, this research provides a broader perspective by incorporating community users as respondents. The findings reinforce the notion that satisfaction in sports facilities is multidimensional, encompassing

physical conditions, environmental aspects, safety, and managerial effectiveness.

Overall, the results confirm that the stadium management has performed adequately in delivering sports services. Nevertheless, improvement strategies should prioritize equipment enhancement and preventive maintenance systems. By strengthening these aspects, the university can further improve service quality, sustain community trust, and support long-term sports participation.

These findings contribute to the field of sports facility management by providing empirical evidence from a university-based stadium that functions as a public-access sports space. The results may serve as a reference for policy formulation and continuous quality improvement initiatives in higher education sports infrastructure management.

CONCLUSION

Based on the results of this study, it can be concluded that the level of community satisfaction with sports facilities at the stadium of Universitas Negeri Medan is categorized as **good**, with an overall mean score of 3.87 (77.4%). This indicates that, in general, the available facilities have met users' expectations and are considered adequate to support sports and physical activities. Among the assessed indicators, cleanliness and safety received the highest ratings, reflecting effective management and maintenance practices. Meanwhile, equipment completeness and maintenance obtained the lowest mean score, suggesting the need

for improvement in facility upgrading and routine maintenance systems.

Overall, the findings demonstrate that the stadium functions effectively as a university-based public sports facility. However, continuous evaluation and strategic improvements-particularly in equipment provision and maintenance-are recommended to enhance service quality and sustain long-term user satisfaction.

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