

## The Implementability of the Quality Service Delivery in the Tanzania's Telecommunication Industry. The Case of ICT Mobile Services in the Tanzania Telecommunication Corporation

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### Abstract

*This study examined the implementability of quality service delivery in Tanzania's telecommunication industry, using Tanzania Telecommunication Corporation (TTCL) as a case study. The specific objectives were to determine the extent to which reliability of service, responsiveness, and customer assurance influence quality service delivery. A quantitative approach was employed with 111 conveniently sampled TTCL customers in Dar es Salaam. Data were analyzed using multiple regression analysis with SPSS. The findings revealed that responsiveness and assurance had positive and statistically significant relationships with quality service delivery, while reliability showed a positive but non-significant relationship. The three constructs collectively explained 11% of the variance in quality service delivery. The study concludes that responsiveness and assurance are the strongest predictors of quality service implementation in Tanzania's telecommunication sector. Key recommendations include prioritizing investment in staff training to enhance responsiveness, strengthening customer assurance mechanisms through reliable service delivery, and implementing systematic service quality monitoring using the SERVQUAL framework.*

**Keywords:** Service quality, SERVQUAL, responsiveness, assurance, telecommunications, Tanzania, TTCL, customer satisfaction

### Introduction

The concept of quality service delivery has received considerable attention among academicians and practitioners worldwide (Shuvalov et al., 2025). This attention is attributed to its significance not only as a key element of business strategy but also as a fundamental goal for business activities, particularly in contemporary competitive market environments (Alsaqer et al., 2024; Ahmad et al., 2025). Quality service delivery represents a cross-cutting imperative that affects multiple sectors of the economy, influencing customer retention, market share, and long-term organizational sustainability (Oanh, 2020; Kozłowski & Korzeniewski, 2024). In the telecommunication industry specifically, service quality has emerged as a critical differentiator in increasingly saturated markets (Prasad et al., 2025). Telecommunication firms face intense competition driven by rapid technological innovation and shifting consumer expectations (Bucko et al., 2025). Scholars such as Saut and Bie (2024) and Parasuraman et al. (2024) posit that perceived quality falls short of satisfaction when customer expectations exceed actual performance, leading to dissatisfaction and customer churn. Quality service delivery refers to an organization's ability to satisfy or surpass customer expectations (Aziz et al., 2025). According to Asawawibul et al. (2025), perceived service quality emanates from customers' comparisons of

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their initial expectations against their perceptions of the delivered service. When expectations are met or exceeded, customers develop positive perceptions that translate into loyalty and positive word-of-mouth (Seo & Roh, [2025](#)).

Tanzania's telecommunication sector has undergone significant transformation since the liberalization of the industry in the 1990s (TCRA, 2018). Established under the Tanzania Telecommunications Company Incorporation Act of 1993, TTCL became responsible for telecommunication services and officially commenced operations on January 1, 1994 (TCRA, 2018). The partial privatization of TTCL in 2001 marked a step toward full liberalization, ushering in an era of intense competition with multiple private operators entering the market (TCRA, 2019). According to the Tanzania Communications Regulatory Authority (TCRA, 2025), the telecommunication market in Tanzania is characterized by five major operators: Vodacom (32.18% market share), Airtel (22.4%), Yas Tanzania (formerly Tigo, 28.14%), Halotel (15.6%), and TTCL (1.8%). This distribution reveals a stark reality: despite being the incumbent operator with substantial infrastructure investments, nationwide coverage, and a legacy of public service, TTCL commands the smallest market share among all major providers. In voice subscriptions, TCRA (2025) data shows TTCL had 1,686,713 subscribers compared to Vodacom's 29,769,205, Yas's 26,048,898, Halotel's 14,442,541, and Airtel's 20,788,441. Similarly, in mobile money services, only 2.1% of subscribers use TTCL's T-Pesa service (TCRA, 2025). This persistent underperformance despite substantial organizational assets raises fundamental questions about the implementability of quality service delivery within the corporation.

Quality service delivery is widely recognized as crucial in the telecommunication industry as it largely influences customer satisfaction and organizational competitiveness (Okinda, [2024](#); Agarwal & Dhingra, [2023](#)). Organizations that consistently deliver high-quality services tend to attract and retain more subscribers because their service offerings and delivery mechanisms satisfy customer expectations (Parasuraman et al., [2013](#); Santos et al., [2020](#)). This view is reinforced by Jum'a ([2025](#)), who found that customer trust moderates the relationship between service quality and firm performance in Jordan's service sector. Despite TTCL's historical position, substantial infrastructure investments, highly skilled personnel, and nationwide network coverage, the corporation maintains the lowest market share among Tanzanian telecommunications providers (TCRA, [2025](#)). This paradoxical situation suggests a significant gap between the organization's service delivery capabilities and customer perceptions of service quality. The persistence of this gap, despite multiple reform initiatives, indicates a need for systematic investigation into the factors that influence the implementability of quality service delivery at TTCL.

Previous research has established significant relationships between service quality dimensions and customer satisfaction (Zameer et al., [2019](#); Sorkun et al., [2020](#)). However, limited empirical studies have specifically examined how reliability, responsiveness, and assurance, which are three core SERVQUAL dimensions, influence quality service delivery in the Tanzanian telecommunication context. Furthermore, while the SERVQUAL model has been extensively applied in developed country contexts, its applicability in Sub-Saharan African telecommunication markets remains underexplored (Ojo, [2017](#); Okinda, [2024](#)). After carefully analyzing existing research utilizing the SERVQUAL framework, several gaps emerge. First, many studies have been conducted outside the telecommunication sector with varied outcomes while employing different service quality constructs. Second, within the telecommunication

sector, most research has focused on customer satisfaction outcomes rather than the "implementability" of quality service delivery, which refers to the practical execution of service quality principles within organizational contexts. Third, limited empirical research has applied the SERVQUAL framework to assess quality service delivery in Tanzania's telecommunication industry specifically. Fourth, existing Tanzanian studies such as those by Ojo (2017) and Okinda (2024) have not systematically examined the relative predictive power of reliability, responsiveness, and assurance dimensions using inferential statistics. This study addresses these gaps by examining the implementability of quality service delivery at TTCL through quantitative analysis of these three critical dimensions. The main objective of this study was to examine the implementability of quality service delivery in Tanzania's telecommunication industry, with specific reference to TTCL's ICT mobile services. Specifically, the study sought to determine the extent to which reliability of service influences quality service delivery at TTCL, to assess the extent to which responsiveness influences quality service delivery at TTCL, and to establish the extent to which customer assurance influences quality service delivery at TTCL.

### **Theoretical Framework**

This study is anchored on two complementary theories: Service Gap Theory and Human Service Delivery Theory. These theories provide the conceptual lens through which the implementability of quality service delivery at TTCL is examined. The Service Gap Theory, articulated by Parasuraman et al. (1985) and extended in subsequent research (Parasuraman et al., 2024; Cronin, 2003), asserts that service quality is a function of the difference between customer expectations and actual performance across quality dimensions. This theory, which underpins the SERVQUAL framework, identifies five distinct gaps that explain why organizations fail to deliver services that meet customer expectations. The knowledge gap refers to the discrepancy between customer expectations and management's perceptions of those expectations. In the telecommunication context, this gap manifests when management lacks accurate understanding of mobile service users' expectations regarding network reliability, internet speed, customer support responsiveness, and service accessibility in underserved areas (Prasad et al., 2025). The policy gap is the discrepancy between management's perceptions of customer expectations and the service quality specifications actually established, arising when management understands expectations but fails to translate this knowledge into enforceable service standards due to cost constraints, technological limitations, or organizational priorities (Alsaqer et al., 2024). The delivery gap reflects the discrepancy between service quality specifications and actual service delivery, encompassing operational challenges that constrain an organization's ability to implement quality service delivery as intended, including inadequate employee training, insufficient resources, or ineffective systems (Obeng et al., 2025).

The communication gap emerges as the discrepancy between actual service delivery and external communications about the service, occurring when promotional messages raise customer expectations beyond what the organization can consistently provide, creating a credibility deficit (Jum'a, 2025). The perceptions gap, which represents the cumulative outcome of all preceding gaps, is the discrepancy between customer expectations and perceived service delivery, reflected in customers' overall judgment of service quality (Aziz et al., 2025). Service Gap Theory provides the overarching framework for understanding implementability challenges at TTCL by guiding identification of where and why service quality breaks down between customer expectations and actual delivery. By examining reliability, responsiveness, and assurance through this theoretical lens, the study can pinpoint which gaps are most problematic and suggest targeted interventions.

The theory is particularly relevant because it emphasizes that perceived service quality, which is the ultimate measure of implementability, is determined by customers' comparisons of expectations against actual service experiences.

The Human Service Delivery Theory, as developed in service management literature (Yadav, [2024](#); Trangbæk et al., [2026](#)), provides insight into how people work toward delivering services within organizational systems. The theory asserts that human beings are the most important resource in the delivery of quality service (Obeng et al., [2025](#)). Accordingly, high-quality service delivery requires organizations to formulate people-centered policies that acknowledge employee ingenuity and provide fair and equitable rewards. The theory identifies four key characteristics of human service delivery that influence quality outcomes. Intangibility means that services exist as experiences rather than physical objects, making quality assessment subjective and dependent on customer perceptions, which necessitates that employees understand how their behaviors shape customer perceptions (Kozłowski & Korzeniewski, [2024](#)). Variability refers to the fact that services are more variable than physical products because they involve human interactions that differ across providers, customers, and situations, requiring continuous training and standardization efforts to ensure consistent quality (Asawawibul et al., [2025](#)). Limit acknowledges that the level of service an organization can deliver is partly determined by workforce size and capacity, making adequate staffing essential for maintaining quality standards, particularly during peak demand periods (Bryland & Curry, [2005](#)). Ideology encompasses the shared values, beliefs, and norms that shape how employees approach service delivery, with customer-focused ideology enabling employees to better process challenges and justify their actions in service delivery (Trangbæk et al., [2026](#)). Human Service Delivery Theory directly supports the examination of reliability and responsiveness dimensions.

Since services are delivered by front-line employees who interface directly with customers and embody the company's image, employee capabilities become vital in ensuring reliable and responsive service. The theory emphasizes that employees' trustworthiness, competence, and commitment determine customers' perceptions of service quality. For TTCL, this theory suggests that investments in employee training, adequate staffing, and fostering a customer-service ideology are prerequisites for implementing quality service delivery. The theory also underscores the importance of continuous feedback mechanisms to identify areas for service improvement, a process central to enhancing responsiveness. Service Gap Theory and Human Service Delivery Theory are complementary, with Service Gap Theory explaining the outcome side of service quality, which is the gap between expectations and perceptions, while Human Service Delivery Theory explains the input side, which encompasses the human behaviors and organizational conditions that determine whether services are delivered reliably and responsively. Together, they provide a comprehensive framework for examining how reliability, responsiveness, and assurance influence quality service delivery implementation at TTCL.

### **Empirical Literature and Hypothesis Formulation**

#### **Reliability and Quality Service Delivery**

Reliability refers to the ability to perform the promised service dependably and accurately (Parasuraman & Berry, [1985](#)). This dimension encompasses keeping promises, providing error-free service, and delivering services at the promised time. Asawawibul et al. ([2025](#)) consider reliability the most important determinant of perceptions of service quality, as it directly reflects the organization's ability to fulfill its core promises to customers.

International empirical studies have consistently demonstrated the importance of reliability in telecommunication contexts. Research by Zameer et al. (2019) in Pakistan's service industry found that reliability significantly predicted customer satisfaction and loyalty outcomes. Similarly, Agarwal and Dhingra (2023) investigated factors influencing cloud service quality and identified reliability as a strong predictor of customer satisfaction. In the African context, Ojo (2017) examined the relationship between service quality and customer satisfaction at TTCL and found that reliability had a positive relationship with customer satisfaction. Okinda (2024) studied Vodacom Tanzania and found that reliability emerged as a strong predictor among SERVQUAL dimensions, suggesting that customers place high value on consistent, dependable service. However, Taylor and Berry (2014) found contrasting results in their study of Star Times decoder customers in Tanzania, where reliability perceptions were low and significantly contributed to customer dissatisfaction, suggesting that reliability effects may vary across service contexts and providers. Based on the theoretical proposition that reliable service delivery enhances customer perceptions of quality, and consistent with empirical evidence, this study hypothesizes:

**H1:** *Reliability of service has a positive influence on quality service delivery in Tanzania's telecommunication industry.*

### **Responsiveness and Quality Service Delivery**

Responsiveness depicts willingness to help customers and provide prompt service (Lovelock & Wirtz, 2011). This dimension places emphasis on attention and swiftness in handling customer requests, questions, complaints, and problems. Ozuem et al. (2024) posit that responsiveness can be measured by the amount of time customers wait for assistance, the flexibility demonstrated in addressing unique needs, and the organization's ability to customize service to resonate with customer requirements. International research supports the significance of responsiveness. Alsaqer et al. (2024) examined Total Quality Management strategies in GCC telecommunications and found that responsiveness significantly predicted sustainable customer satisfaction, highlighting that prompt problem resolution and staff willingness to help were particularly important in technology-mediated service environments. Jum'a (2025) investigated digital voice of customer adoption in Jordan's banking and telecommunications sectors and found that responsiveness mediated the relationship between digital engagement and customer satisfaction, with customer trust moderating this relationship, underscoring that responsiveness becomes even more critical in digital service contexts where customers have limited direct contact with service providers. In Tanzania, Ojo (2017) found that responsiveness significantly predicted customer satisfaction at TTCL, with customers expressing particular concern about the time taken to resolve technical problems. Okinda (2024) reported similar findings for Vodacom Tanzania, where responsiveness explained substantial variance in customer satisfaction. These findings align with Human Service Delivery Theory, which emphasizes that variability in service encounters requires continuous attention to responsiveness as a quality differentiator. Based on theoretical reasoning and empirical evidence, this study hypothesizes:

**H2:** *Responsiveness has a positive influence on quality service delivery in Tanzania's telecommunication industry.*

### **Assurance and Quality Service Delivery**

Assurance refers to employees' knowledge and courtesy, and their ability to inspire trust and confidence (Christopher & Jochen, 2011). This dimension is particularly crucial when customers

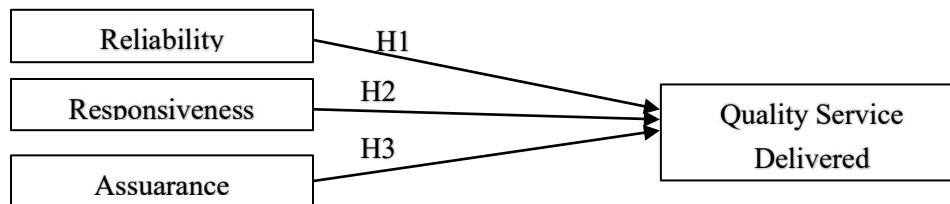
perceive services as high-risk or when they doubt their ability to evaluate outcomes independently. Assurance encompasses credibility, security, competence, and courtesy, all factors that reduce customer uncertainty and build confidence in the service provider. International studies confirm the importance of assurance. Ahmad et al. (2025) examined e-service quality in Pakistan and found that assurance significantly predicted e-customer satisfaction, noting that assurance became more important as transaction complexity increased, suggesting its particular relevance in telecommunications where technical complexity may exceed customer understanding. Seo and Roh (2025) investigated online and offline delivery qualities in South Korea and found that assurance mediated the relationship between service quality and loyalty, with customers who perceived high assurance demonstrating stronger loyalty behaviors including positive word-of-mouth and repurchase intentions.

In the Tanzanian context, Ojo (2017) found that assurance was a strong predictor of customer satisfaction at TTCL, with customers emphasizing the importance of staff knowledge and trustworthiness. Mac Stravic (2013), in a health service context in Dar es Salaam, found that lack of assurance, manifested in poor staff attitude and perceived incompetence, was a primary driver of patient dissatisfaction. While in a different sector, this finding suggests the cross-cutting importance of assurance in Tanzanian service contexts. The theoretical foundation for assurance derives from both Service Gap Theory and Human Service Delivery Theory. Service Gap Theory posits that assurance reduces the knowledge gap by ensuring that employees understand and can respond to customer expectations. Human Service Delivery Theory emphasizes that employee competence and trustworthiness are essential inputs to quality service delivery. Based on this theoretical grounding and empirical support, this study hypothesizes:

**H3:** *Customer assurance has a influence on quality service delivery in Tanzania's telecommunication industry.*

### **Conceptual Framework**

Based on the theoretical framework and empirical literature reviewed, [Figure 1](#) presents the conceptual framework guiding this study. The framework posits that three independent variables, namely reliability, responsiveness, and assurance, influence the dependent variable which is quality service delivery. Each independent variable is operationalized based on SERVQUAL dimensions as articulated in the theoretical framework. The framework posits that higher levels of reliability, responsiveness, and assurance are associated with more effective quality service delivery. Specifically, H1 predicts a positive relationship between reliability and quality service delivery, H2 predicts a positive relationship between responsiveness and quality service delivery, and H3 predicts a positive relationship between assurance and quality service delivery. These hypotheses will be tested using multiple regression analysis to determine the relative contribution of each independent variable to explaining variance in quality service delivery.



**Figure 1: Conceptual Framework**

**Source:** Adapted from Parasuraman and Berry (1985); Lovelock and Wirtz (2011)

### Methodology and Approaches

This study employed a cross-sectional survey design with convenient sampling technique to select respondents. The target population comprised all customers of the Tanzania Telecommunication Company Limited (TTCL) in Dar es Salaam, which according to TCRA (2018) numbered 711,411 subscribers. Convenient sampling was adopted because it is cost-effective, less time-consuming, and allows access to respondents who are readily available and willing to participate (Golzar et al., 2022). While this technique limits generalizability, it was appropriate for this exploratory study given resource constraints. The sample size of 111 respondents was determined using the Slovin formula with a 90.5% confidence level (margin of error 9.5%), calculated as  $n = 711,411 / (1 + 711,411 \times 0.095^2) = 111$ . This sample size meets the minimum requirement of 10 to 20 observations per predictor variable for multiple regression analysis (Hair et al., 2010). In addition to the customer survey, five key informants from TTCL management were purposively selected for in-depth interviews, including the Chief Executive Officer, Chief Marketing and Sales Officer, Chief Financial Officer, Head of Human Resource, and Chief Internal Auditor.

The dependent variable, quality service delivery, was operationalized as customers' overall assessment of whether their service expectations have been met. The independent variables were operationalized using items adapted from the SERVQUAL scale developed by Parasuraman et al. (1988). Reliability was measured using seven items assessing promise fulfillment, error-free service, problem-solving concern, timely provision, billing accuracy, service availability, and comparative reliability. Responsiveness was measured using eight items assessing technical problem resolution, staff willingness and friendliness, service availability certainty, assistance in informed choices, prompt responses, and comparative responsiveness. Assurance was measured using nine items assessing company reputation, product safety, staff courtesy, staff knowledge and accuracy, trustworthy behavior, convenient hours, and overall trust. All items were measured on a five-point Likert scale where 1 represented "Strongly Disagree" and 5 represented "Strongly Agree."

## Results

### Descriptive Analysis

A total of 120 questionnaires were distributed to TTCL customers, and 111 were returned fully completed, representing a response rate of 92.5% which is considered excellent for survey research (Mugenda, 1999). Regarding demographic characteristics, the majority of respondents were aged between 36 and 45 years (48.6%) and 46 years and above (46.8%), indicating that the customer base consists primarily of mature individuals with substantial experience using telecommunication services. Male respondents constituted 63.1% of the sample, while females represented 36.9%. The majority of respondents were either married (39.6%) or living with a

partner (31.5%), suggesting that most customers have family responsibilities that may influence their telecommunication needs. In terms of education, 63.9% of respondents held at least a bachelor's degree, indicating that the customer base is relatively well-educated and capable of providing informed assessments of service quality. As shown in [Table 1](#), responsiveness had the highest mean score ( $M = 3.53$ ,  $SD = 0.977$ ), indicating that respondents generally agreed with statements about TTCL's responsiveness. Assurance had a moderate mean score ( $M = 3.14$ ,  $SD = 0.932$ ), suggesting neutral to slightly positive perceptions. Reliability had the lowest mean score ( $M = 2.41$ ,  $SD = 1.004$ ), indicating that respondents tended to disagree with statements about TTCL's reliability. These descriptive findings suggest that customers perceive TTCL's responsiveness most favorably, followed by assurance, while reliability is perceived as an area requiring significant improvement.

**Table 1: Descriptive Statistics for Study Variables**

Variable	N	Minimum	Maximum	Mean	Std. Deviation
Reliability	111	1.00	5.00	2.41	1.004
Responsiveness	111	1.00	5.00	3.53	0.977
Assurance	111	1.00	5.00	3.14	0.932

**Source:** Field Data (2020)

### Measurement Model Results

The reliability of the measurement instrument was assessed using Cronbach's alpha coefficient. As shown in [Table 2](#), all dimensions met the acceptable threshold for internal consistency. Reliability exhibited excellent internal consistency with a Cronbach's alpha of 0.980, indicating that the seven items measuring this dimension were highly correlated. Assurance demonstrated acceptable reliability with a Cronbach's alpha of 0.729, exceeding the 0.70 threshold recommended for established scales (Hair et al., [2010](#)). Responsiveness showed a Cronbach's alpha of 0.656, which is acceptable for exploratory research given that values above 0.60 are considered adequate when dealing with scales adapted for new contexts (Hair et al., [2010](#)). The overall instrument had good reliability with a Cronbach's alpha of 0.872, indicating that the 24 items consistently measured the intended constructs. These results confirm that the measurement model was reliable and suitable for subsequent inferential analysis.

**Table 2: Reliability Results**

Dimension	Number of Items	Cronbach's Alpha	Interpretation
Reliability	7	0.980	Excellent
Responsiveness	8	0.656	Acceptable for exploratory research

Dimension	Number of Items	Cronbach's Alpha	Interpretation
Assurance	9	0.729	Acceptable
Overall Instrument	24	0.872	Good

**Source:** Field Data (2020)

### Results and Hypothesis Testing

Multiple regression analysis was conducted to test the hypotheses and determine the influence of reliability, responsiveness, and assurance on quality service delivery. Prior to analysis, diagnostic tests confirmed that multicollinearity was not a concern, with Variance Inflation Factor (VIF) values ranging from 1.001 to 1.003, well below the conservative threshold of 5 (Hair et al., 2010). The three independent variables collectively explained 11% of the variance in quality service delivery ( $R^2 = 0.11$ ). Table 3 presents the regression coefficients.

**Table 3: Multiple Regression Results**

Variable	B	t	P-value	VIF	Hypothesis	Decision
Reliability	0.044	-0.291	0.050	1.001	H1	Not Supported
Responsiveness	0.048	-0.510	0.041	1.002	H2	Supported
Assurance	0.049	0.911	0.024	1.003	H3	Supported

**Source:** Field Data (2020)

The results reveal that responsiveness had a positive and statistically significant influence on quality service delivery ( $\beta = 0.048$ ,  $p = 0.041$ ). Therefore, Hypothesis 2 which stated that responsiveness has a positive and significant influence on quality service delivery is supported. This finding aligns with previous research by Alsaqer et al. (2024) who found that responsiveness significantly predicted sustainable customer satisfaction in GCC telecommunications, and with Ojo (2017) who reported that responsiveness significantly predicted customer satisfaction at TTCL. The finding also supports Jum'a (2025) who identified responsiveness as a mediator between digital engagement and customer satisfaction in Jordan's service sector. The theoretical implication is that prompt problem resolution and staff willingness to help are critical for enhancing perceived service quality, consistent with Human Service Delivery Theory which emphasizes that variability in service encounters requires continuous attention to responsiveness as a quality differentiator. Assurance also had a positive and statistically significant influence on quality service delivery ( $\beta = 0.049$ ,  $p = 0.024$ ). Therefore, Hypothesis 3 which stated that customer assurance has a positive and significant influence on quality service delivery is supported. This

finding is consistent with Ahmad et al. (2025) who found that assurance significantly predicted e-customer satisfaction in Pakistan, and with Seo and Roh (2025) who reported that assurance mediated the relationship between service quality and loyalty in South Korea. In the Tanzanian context, this finding supports Ojo (2017) who identified assurance as a strong predictor of customer satisfaction at TTCL. The theoretical implication is that employee knowledge, courtesy, and ability to inspire trust and confidence are essential for building positive customer perceptions, aligning with Service Gap Theory which posits that assurance reduces the knowledge gap by ensuring employees understand and respond to customer expectations.

Reliability had a positive but non-significant influence on quality service delivery ( $\beta = 0.044$ ,  $p = 0.050$ ). Therefore, Hypothesis 1 which stated that reliability of service has a positive and significant influence on quality service delivery is not supported. This finding contrasts with several previous studies. Asawawibul et al. (2025) considered reliability the most important determinant of perceptions of service quality. Agarwal and Dhingra (2023) found that reliability was the strongest predictor of customer satisfaction in cloud services. Okinda (2024) reported that reliability emerged as the strongest predictor among SERVQUAL dimensions for Vodacom Tanzania. However, the finding is consistent with Taylor and Berry (2014) who found that reliability perceptions were low and contributed to customer dissatisfaction among Star Times decoder customers in Tanzania. The non-significant result may be explained by the specific context of TTCL, where customers may have adjusted their expectations downward due to historical service challenges, or by measurement issues where the reliability items may not have fully captured the dimension as perceived by customers. This finding suggests that for TTCL specifically, reliability may not be the primary driver of quality perceptions, possibly because customers have come to expect certain limitations and instead focus on how staff respond to problems (responsiveness) and whether they can trust the service (assurance).

## **Discussion**

This study examined the implementability of quality service delivery in Tanzania's telecommunication industry, focusing on how reliability, responsiveness, and assurance influence quality service delivery at TTCL. The findings revealed that responsiveness and assurance had positive and statistically significant relationships with quality service delivery, while reliability showed a positive but non-significant relationship. The significant influence of responsiveness on quality service delivery aligns with previous research by Alsaqer et al. (2024) who found that responsiveness significantly predicted sustainable customer satisfaction in GCC telecommunications, and with Ojo (2017) who reported that responsiveness significantly predicted customer satisfaction at TTCL. This finding also supports Jum'a (2025) who identified responsiveness as a mediator between digital engagement and customer satisfaction in Jordan's service sector. The theoretical implication is that prompt problem resolution and staff willingness to help are critical for enhancing perceived service quality, consistent with Human Service Delivery Theory which emphasizes that variability in service encounters requires continuous attention to responsiveness as a quality differentiator (Yadav, 2024; Obeng et al., 2025). For TTCL, this means that investments in training staff to respond quickly and effectively to customer inquiries and technical problems are likely to yield improvements in perceived service quality. The qualitative findings from key informants reinforce this interpretation, with the Chief Marketing and Sales Officer noting that "responding on time to customers makes them satisfied, hence raising assurance and trust in them and the company's reputation."

The significant influence of assurance on quality service delivery is consistent with Ahmad et al. (2025) who found that assurance significantly predicted e-customer satisfaction in Pakistan, and with Seo and Roh (2025) who reported that assurance mediated the relationship between service quality and loyalty in South Korea. In the Tanzanian context, this finding supports Ojo (2017) who identified assurance as a strong predictor of customer satisfaction at TTCL. The theoretical implication is that employee knowledge, courtesy, and ability to inspire trust and confidence are essential for building positive customer perceptions, aligning with Service Gap Theory which posits that assurance reduces the knowledge gap by ensuring employees understand and respond to customer expectations (Parasuraman et al., 1985; Parasuraman et al., 2024). For TTCL, this suggests that building customer trust through competent and trustworthy staff should be a priority in service quality improvement efforts. The Chief Internal Auditor emphasized this point, stating that "building assurance to customers is very important because it sends out trust and confidence to them and increases the goodwill of the firm."

The non-significant influence of reliability on quality service delivery contrasts with several previous studies. Asawawibul et al. (2025) considered reliability the most important determinant of perceptions of service quality. Agarwal and Dhingra (2023) found that reliability was the strongest predictor of customer satisfaction in cloud services. Okinda (2024) reported that reliability emerged as the strongest predictor among SERVQUAL dimensions for Vodacom Tanzania. However, this finding is consistent with Taylor and Berry (2014) who found that reliability perceptions were low and contributed to customer dissatisfaction among Star Times decoder customers in Tanzania. The non-significant result may be explained by the specific context of TTCL, where customers may have adjusted their expectations downward due to historical service challenges. The descriptive statistics showing reliability as the lowest-scored dimension ( $M = 2.41$ ) support this interpretation. This suggests that for TTCL specifically, reliability may not be the primary driver of quality perceptions because customers have come to expect certain limitations and instead focus on how staff respond to problems and whether they can trust the service. This interpretation is consistent with Service Gap Theory, which suggests that when customers consistently experience service failures, their expectations adjust downward, and they begin to value recovery efforts (responsiveness) and trust-building (assurance) more highly than consistent performance (Parasuraman et al., 2024).

## **Conclusion**

This study examined the implementability of quality service delivery in Tanzania's telecommunication industry, focusing on how reliability, responsiveness, and assurance influence quality service delivery at TTCL. The findings demonstrate that responsiveness and assurance are the strongest predictors of quality service delivery, while reliability did not show a significant influence in this specific context. These results suggest that for TTCL, customers place greater value on how staff respond to their problems and whether they can trust the service provider than on consistent error-free performance, possibly due to adjusted expectations arising from historical service challenges. The study contributes to theory by applying the SERVQUAL framework in a Sub-Saharan African telecommunication context and by focusing on implementability rather than just customer satisfaction outcomes. The findings support the relevance of Service Gap Theory and Human Service Delivery Theory in understanding service quality challenges in developing country contexts, while also suggesting that the relative importance of service quality dimensions may vary across contexts based on customer expectations and prior experiences.

### **Implications and Recommendations**

From a practical standpoint, the findings have several implications for TTCL and other telecommunication providers in Tanzania. First, management should prioritize investments in staff training to enhance responsiveness, including technical training for quick problem resolution and customer service training for effective communication. Second, building customer assurance should be a strategic focus, achieved through demonstrating staff competence, maintaining courteous interactions, and delivering on promises consistently to build trust over time. Third, while reliability was not significant in this study, the low mean score indicates it remains an area requiring attention; TTCL should investigate the specific reliability gaps causing customer dissatisfaction and address them systematically. Fourth, TTCL should implement regular service quality monitoring using the SERVQUAL framework to track changes in customer perceptions and identify emerging issues before they affect customer retention. Fifth, the company should align external communications with actual service delivery capabilities to avoid raising expectations beyond what can be consistently delivered, thereby reducing the communication gap identified in Service Gap Theory.

### **Limitations and Future Research**

This study has several limitations that should be considered when interpreting the findings. First, the use of convenient sampling limits the generalizability of findings to all TTCL customers, as the sample may not be representative of the entire customer population. Second, the study focused on only three SERVQUAL dimensions (reliability, responsiveness, and assurance), excluding tangibility and empathy which may also influence quality service delivery. Third, the cross-sectional design captures perceptions at a single point in time and cannot track changes in service quality perceptions over time or establish causal relationships definitively. Fourth, the study was conducted only in Dar es Salaam, which may not reflect the experiences of customers in other regions of Tanzania where service delivery contexts may differ. Fifth, the relatively low R-squared value (11%) indicates that other factors not included in the model also influence quality service delivery, suggesting the need for more comprehensive models. Future research should address these limitations by employing probability sampling techniques to enhance generalizability, including all five SERVQUAL dimensions to provide a more comprehensive assessment, and adopting longitudinal designs to track changes in service quality perceptions over time. Comparative studies across multiple telecommunication providers in Tanzania would provide a more complete understanding of service quality dynamics in the industry. Additionally, qualitative research exploring why reliability was not significant in this context could provide deeper insights into customer expectations and adaptation mechanisms. Finally, future studies could investigate the role of organizational factors such as employee training, motivation, and organizational culture in enabling the implementability of quality service delivery.

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