

The Influence of Work Demands and Rewards on Hospital Service Quality through Employee Satisfaction

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Abstract

This study investigates how job demands and job rewards influence hospital service quality, and whether employee satisfaction mediates these relationships among staff at Prof. Dr. R. Soeharso Orthopaedic Hospital, Surakarta. Using an explanatory quantitative design, Likert-scale questionnaires were collected from 235 medical and non-medical employees (n=235) through voluntary response sampling and analyzed with PLS-SEM (SmartPLS) to test a model comprising job demands (X1), job rewards (X2), employee satisfaction (Z), and service quality (Y), operationalized with demand, reward, satisfaction, and SERVQUAL-based service quality indicators. The measurement model met adequacy criteria (AVE>0.50; composite reliability=0.875–0.935; Cronbach's alpha>0.80) and showed acceptable collinearity (VIF<5). In the structural model, job demands had a negative but non-significant direct effect on service quality ($\beta=-0.025$; $t=0.415$; $p>0.05$), while job rewards had a positive, significant direct effect ($\beta=0.281$; $t=3.405$; $p=0.001$). Job demands significantly reduced employee satisfaction ($\beta=-0.198$; $t=3.455$; $p=0.001$), whereas job rewards strongly increased satisfaction ($\beta=0.759$; $t=26.836$; $p<0.001$). Employee satisfaction positively predicted service quality ($\beta=0.389$; $t=4.210$; $p<0.001$) and mediated both exogenous variables' effects on service quality; effect-size results indicated a large contribution of rewards to satisfaction ($f^2=1.564$). The model explained 63.3% of the variance in employee satisfaction ($R^2=0.633$; $Q^2=0.439$) and 40.5% in service quality ($R^2=0.405$; $Q^2=0.280$). Theoretically, the findings extend job demands–resources logic in a hospital context by evidencing satisfaction as a key mechanism linking work conditions to perceived service quality. Practically, hospital managers should calibrate workloads and institutionalize fair financial and non-financial rewards to sustain satisfaction and improve service delivery. Overall, the study shows that reward strengthening and demand management are strategic levers for consistently high-quality hospital services.

Keywords — Employee Satisfaction; Job Demands; Job Rewards; SEM-PLS; Service Quality.

Abstrak

Penelitian ini bertujuan menganalisis pengaruh tuntutan kerja dan imbalan kerja terhadap kualitas pelayanan rumah sakit serta menguji peran mediasi kepuasan karyawan pada staf RS Ortopedi Prof. Dr. R. Soeharso Surakarta. Desain kuantitatif eksplanatori digunakan dengan pengumpulan data kuesioner

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skala Likert dari 235 pegawai medis dan nonmedis ($n=235$) melalui voluntary response sampling, kemudian dianalisis menggunakan PLS-SEM (SmartPLS) pada model yang mencakup tuntutan kerja (X1), imbalan kerja (X2), kepuasan karyawan (Z), dan kualitas pelayanan (Y) yang dioperasionalisasi melalui indikator tuntutan, dimensi imbalan, indikator kepuasan, dan kualitas layanan berbasis SERVQUAL. Model pengukuran menunjukkan kelayakan konstruk ($AVE>0,50$; composite reliability= $0,875-0,935$; Cronbach's alpha $>0,80$) serta tidak terdapat multikolinearitas ($VIF<5$). Hasil model struktural menunjukkan tuntutan kerja berpengaruh negatif namun tidak signifikan terhadap kualitas pelayanan ($\beta=-0,025$; $t=0,415$; $p>0,05$), sedangkan imbalan kerja berpengaruh positif dan signifikan ($\beta=0,281$; $t=3,405$; $p=0,001$). Tuntutan kerja menurunkan kepuasan karyawan secara signifikan ($\beta=-0,198$; $t=3,455$; $p=0,001$), sementara imbalan kerja meningkatkan kepuasan karyawan sangat signifikan ($\beta=0,759$; $t=26,836$; $p<0,001$). Kepuasan karyawan berpengaruh positif signifikan terhadap kualitas pelayanan ($\beta=0,389$; $t=4,210$; $p<0,001$) serta memediasi pengaruh kedua variabel eksogen terhadap kualitas pelayanan; analisis effect size menunjukkan kontribusi imbalan kerja terhadap kepuasan karyawan sangat besar ($f^2=1,564$). Model menjelaskan 63,3% variasi kepuasan karyawan ($R^2=0,633$; $Q^2=0,439$) dan 40,5% variasi kualitas pelayanan ($R^2=0,405$; $Q^2=0,280$). Secara teoretis, temuan ini memperkaya kerangka Job Demands–Resources dalam konteks rumah sakit melalui bukti bahwa kepuasan menjadi mekanisme kunci penghubung kondisi kerja dan kualitas layanan. Secara praktis, manajemen rumah sakit perlu menyeimbangkan beban kerja serta memperkuat sistem imbalan finansial maupun nonfinansial untuk menjaga kepuasan dan meningkatkan mutu layanan. Secara keseluruhan, studi ini menegaskan bahwa penguatan imbalan dan pengelolaan tuntutan merupakan tuas strategis untuk mempertahankan kualitas layanan rumah sakit secara berkelanjutan.

Kata Kunci — Imbalan Kerja; Kepuasan Karyawan; Kualitas Pelayanan; SEM-PLS; Tuntutan Pekerjaan.

1. INTRODUCTION

Development in the healthcare sector in Indonesia is based on the 1945 Constitution of the Republic of Indonesia, particularly Article 28, which affirms that every citizen has the right to obtain a reasonable degree of health as a fundamental human right. Similar principles are also included in the 1948 Constitution of the World Health Organization (WHO). Furthermore, Law Number 36 of 2009 concerning Health emphasizes that health is a part of Human Rights and an essential element in achieving prosperity, in accordance with the ideals of the Indonesian nation as stated in Pancasila and the 1945 Constitution.

The government has the responsibility to guarantee the fulfillment of citizens' fundamental rights through the provision of public services. This is regulated in the Minister of Administrative and Bureaucratic Reform Regulation (KEPMENPAN) Number 63/KEP/M.PAN/2003, which emphasizes two main aspects of public service, namely the service providers and the service users, which are the community (KEMENPAN, 2003).

The success of public service administration, especially in the service sector, heavily depends on the quality of service, especially in today's globalization era, where competition is increasingly fierce (Mokobombang & Natsir, 2024). Consumers, in this case service users, not only focus on product quality but also assess how service providers deliver the service experience (Gema Z. & Suwitho, 2017). Service providers with good service quality tend to be more favored by consumers. Consumers will be more loyal and enhance service providers' reputations compared to other providers (Azhari & Ali, 2024). Therefore, efforts to improve service quality are no longer optional but have become a primary strategy to maintain existence and competitiveness in the dynamic modern market era.

Employees are the leading resource that plays an important role in determining the quality of service of an organization (Pratiwi S et al., 2022). Two factors that significantly influence employee behavior and performance are job demands and reward systems (Loudoe et al., 2023). Fair and proportional reward distribution has proven to increase employee motivation, loyalty, and work ethic (Nugraha & Tjahjawati, 2023). Conversely, increased job demands on individuals are associated with increased fatigue, stress, and burnout, which can lead to decreased productivity and customer service quality (Haribowo et al., 2025). Thus, effective management of job demands and reward systems becomes a strategic factor in creating a conducive work environment and encouraging positive employee behavior.

Employee satisfaction is directly linked to the quality of service provided to customers. If employees are satisfied with their work, whether in terms of compensation, workload, or social relationships at the workplace, they tend to exhibit better behavior, show greater care, and demonstrate stronger commitment to the organization's service standards. From a service-profit chain perspective, employee satisfaction also serves as a crucial link connecting internal organizational policies with customer satisfaction. Therefore, effective management of employee satisfaction is a strategic step toward maintaining and enhancing service quality and ensuring sustainable, optimal performance.

According to Kotler and Keller, service is an act or activity offered by one person to another. This act is intangible and non-ownership (Kotler & Keller, 2016). Meanwhile, service quality reflects service providers' efforts to meet consumers' needs and expectations (Chen et al., 2019). In the context of healthcare services, services are understood as a series of activities carried out individually or collectively within an organization to maintain and optimize health, prevent and treat diseases, and improve health conditions at the individual, family, group, or community level. The form and type of healthcare services provided by providers depend on the organizational system, scope of activities, and target outcomes (WHO, 2023).

In healthcare, quality is understood as the degree of alignment between the characteristics of the services provided and recipients' perceptions and expectations. Generally, users will assess service quality by comparing it to their experiences with similar services elsewhere. Service quality reflects the extent to which a product or service can provide satisfaction and added value to its recipients. A service can be categorized as quality if it offers tangible benefits and meets users' needs optimally (Tri HA, 2017). Several factors can influence service quality improvement, including the workload and demands placed on employees, the organization's reward or compensation systems, and staff job satisfaction.

Previous studies have extensively examined the relationship between reward systems and service quality enhancement. Research indicates that providing appropriate compensation can increase employee satisfaction, which, in turn, fosters intrinsic motivation to deliver better-quality service (Cahya et al., 2021). This condition has a positive impact on customer satisfaction, as they experience more responsive service that better meets their needs. Indirectly, the improvement in service quality also contributes to the organization's success in achieving its primary goals, namely increasing revenue and maintaining customer loyalty through superior service. Meanwhile, the study also confirms that reward systems have a significant impact on the quality of service employees provide (Sitepu et al., 2018).

Besides reward factors, workload demands also play an important role in affecting the level of service quality delivered by employees. When individuals repeatedly face excessive workload, it can lead to emotional exhaustion and psychological stress. This condition often leads to higher turnover rates, negatively affecting service stability and overall quality. Employees facing high job demands tend to focus solely on completing tasks, rather than understanding and fulfilling customer needs. As a result, the services provided become less responsive and impersonal, which can decrease consumer satisfaction

(Wahyuni & Erwantiningsih, 2020). The research findings by Sarnia et al. (2022) also reinforce this view, showing that job demands significantly influence the quality of healthcare services at Puskesmas Siontapina, Buton Regency (Sarnia et al., 2022).

Employee satisfaction can be a primary driver for improving individual performance in the workplace. Employees who are satisfied with their work tend to perform better, which can ultimately lead to higher economic rewards. When perceived as fair and commensurate with their contributions, job satisfaction levels tend to increase further. Conversely, when compensation is deemed not proportional to performance, it can lead to dissatisfaction and uncertainty among employees (Liu & Liu, 2022). Job satisfaction is dynamic because it can change in response to work environment conditions and external factors outside the organization (Jufrizen & Kanditha, 2024).

A high level of job satisfaction is also closely related to work engagement, as satisfied employees tend to be more engaged and take greater responsibility for their tasks (Aliyari, 2024). Many managers believe that increasing job satisfaction will lead to higher participation and employee performance, ultimately contributing to the achievement of organizational goals (Imawan & Lesmana, 2024). According to Landry & Whillans (2018), employee satisfaction tends to arise when the received work reward is considered adequate and commensurate with the contributions made. The level of satisfaction or dissatisfaction with those rewards will directly affect the quality of employees' work. Therefore, work compensation is an important aspect of organizational policies that requires serious attention, ensuring that every employee receives fair and adequate remuneration to achieve optimal job satisfaction (Boadi et al., 2023; Thibault Landry & Whillans, 2018).

Besides compensation, employee empowerment is also a key factor in building job satisfaction (Sulistio & Ismi, 2024). This empowerment includes efforts to give employees adequate responsibility and authority to make decisions and complete tasks independently. This approach reflects the implementation of a decentralization system that encourages subordinates' active participation in decision-making, thereby increasing their sense of ownership of the organization.

However, generally, the quality of healthcare services in Indonesia still faces various challenges. According to the 2023 Global Monitoring of Universal Health Coverage (UHC) report, Indonesia's Service Coverage Index (SCI) shows an unpromising trend. After increasing from 42 in 2010 to 56 in 2019, the index actually decreased to 55 in 2021 (WHO, 2023). This condition indicates that efforts to improve the quality of healthcare services must be continually strengthened to achieve UHC targets in Indonesia sustainably.

So far, little research has examined in depth the role of employee satisfaction in mediating the relationship between job demands and work rewards in service quality. Studies specifically exploring the relationship among these three variables remain limited, leaving a vast open research space in this field. Additionally, the relationship between job demands, work rewards, and service quality through employee satisfaction has yielded inconsistent results in previous studies; some find a positive relationship, while others report a negative one. These differing findings make the topic an attractive area for further research to gain a more comprehensive understanding and ensure consistency with previous research outcomes.

Given the variation in research findings on service quality and its enabling and inhibiting factors, further studies are needed to balance and enrich the existing literature. Based on this background, the researcher is motivated to conduct a study entitled "The Influence of Job Demands and Work Rewards on Quality of Healthcare Services at Hospitals with Employee Satisfaction as a Mediation Variable."

This research was conducted at Prof. Dr. R. Soeharso Orthopedic Hospital Surakarta, located on Jalan Jenderal Ahmad Yani, Sukoharjo, Central Java. This hospital, established by Prof. Dr. R. Soeharso in 1945, is known as a pioneer in orthopedic services in Indonesia. At its founding, it was called the Orthopedic and Prosthesis Institute (LOP), which was part of the Rehabilitation Center (RC), an

initiative established to assist freedom fighters with physical disabilities resulting from war. Over time, LOP transformed into Prof. Dr. R. Soeharso Orthopedic Hospital Surakarta. The hospital's long history began with prosthesis fabrication experiments in 1946, which later received attention and support from the Indonesian Ministry of Health in 1948.

In 1951, the Center for the Development of Disabled Patients (Rehabilitation Center) was established with support from the late General Gatot Subroto and the Ministry of Social Affairs, reinforced through collaboration among various ministries in developing social and medical rehabilitation services. Subsequently, in 1982, the institution changed its name to the Center for the Rehabilitation of Body Disabled Patients (PRPCT), and later, in 1994, it became the Social Rehabilitation Center for Bina Daksa (PRSBD). In 2008, following a decision by the Minister of Social Affairs of the Republic of Indonesia, the institution was officially named the Big Center for Social Rehabilitation of Bina Daksa (BBRSBD) Prof. Dr. R. Soeharso Surakarta.

In 1957, the Orthopedic and Prosthesis Institute earned the United Nations (UN)'s trust to host the Rehabilitation Seminar, attended by representatives from Asia and the Far East. Over time, PRSBD evolved into an international training center that trains rehabilitation personnel at both national and international levels through various programs, including Technical Cooperation among Developing Countries (TCDC), conducted in collaboration with UNDP and ILO. This hospital continues to develop in line with advancements in medical science, particularly in orthopedics and medical rehabilitation, and adopts concepts from the World Health Organization (WHO).

The vision of Prof. Dr. R. Soeharso Orthopedic Hospital Surakarta is to become a leading orthopedic hospital, providing excellent service. The hospital's commitment is reflected in the application of advanced medical technology, such as minimally invasive techniques used in about 25% of procedures. Additionally, the hospital ensures that all clinical staff hold professional certifications relevant to their fields.

The hospital's primary mission includes providing trauma orthopedic services integrated with education and training activities, managing the hospital effectively and efficiently, and developing professional, innovative, and creative human resources. The hospital also places great emphasis on developing sustainable service networks to support optimal healthcare quality.

Soeharso Dr. Orthopedic Hospital (RSO) Surakarta is a healthcare institution that plays an important role in providing orthopedic services to the broader community. As a national referral hospital, RSO Dr. Soeharso consistently strives to improve service quality for the community, service recipients, and the staff who deliver these services. To ensure the quality of services provided by all staff and employees, a comprehensive, systematic study of employees' perceptions of hospital management is necessary. The findings from this study will serve not only as an evaluation tool but also as a basis for strategic decision-making that supports the sustainable development of human resources.

The importance of a comprehensive study of service quality lies in its ability to explore staff and employees' aspirations, perceptions, and satisfaction levels with their institution. The results of this study form a strong foundation for designing evidence-based service improvement strategies. Employee satisfaction reflects the welfare and work motivation of human resources at RSO Dr. Soeharso. By understanding the needs and expectations of both parties, the hospital can identify areas for improvement, whether in internal management or in the provision of external services to the community. This aligns with RSO Dr. Soeharso Surakarta's commitment to ongoing development as a superior and competitive healthcare center at both national and international levels.

Implementing this study allows RSO Dr. Soeharso to be more proactive in managing stakeholders' expectations and needs. Employee satisfaction surveys are crucial tools for gauging employees' satisfaction with hospital management. These surveys are concrete steps in implementing hospital governance focused on customer satisfaction and the development of human resource quality.

With credible and comprehensive survey results, RSO can maintain its reputation as an innovative, inclusive, and high-quality healthcare institution, contributing significantly to community welfare and staff professionalism (Ningsih, 2020).

2. LITERATURE REVIEW

The concept of job demands is grounded in the Job Demands Resources framework, which describes physical, cognitive, and emotional requirements such as workload, time pressure, and role complexity that consume employees' energy and can trigger stress, burnout, and reduced performance when they exceed individual capacity. Prior studies in health-care settings show that excessive job demands are associated with fatigue, emotional exhaustion, and lower service quality, whereas poorly calibrated demands (either too high or too low) can also undermine engagement and attentiveness toward patients.

Job rewards are conceptualized as the total package of financial and non-financial returns, including salary, allowances, incentives, promotion opportunities, recognition, and developmental prospects that employees receive in exchange for their work contributions. Empirical research consistently reports that fair and competitive reward systems strengthen motivation, organizational commitment, and job satisfaction, which in turn support higher quality and more responsive service delivery. Within this framework, employee satisfaction represents a positive evaluative state toward one's job arising from perceptions of work conditions, work demands, compensation, supervisory support, and career opportunities, and has been linked to better performance, stronger customer orientation, and improved service experiences for patients.

Service quality in hospitals is typically conceptualized using multidimensional models such as SERVQUAL, encompassing tangibles, reliability, responsiveness, assurance, and empathy, and is recognized as a central determinant of patient satisfaction, loyalty, and trust in health-care providers. Previous studies indicate that frontline employees' attitudes and behaviors are crucial in shaping patients' perceptions of service quality and that internal organizational factors, particularly workload and reward systems, indirectly influence service outcomes through their effects on staff satisfaction. However, existing evidence on how job demands and job rewards jointly affect service quality through employee satisfaction remains mixed, and research in Indonesian hospital contexts, especially at national referral centers such as Soeharso Orthopedic Hospital, is still limited.

Building on these gaps, the present study, "The Influence of Work Demands and Rewards on Hospital Service Quality through Employee Satisfaction," tests a model in which job demands and job rewards are exogenous variables, employee satisfaction is a mediating variable, and hospital service quality is the main outcome. Consistent with the abstract, the literature supports the expectation that job demands will exert a negative influence on employee satisfaction and service quality, whereas job rewards will have a positive influence on both, and that employee satisfaction will positively predict service quality while partially mediating the effects of job demands and job rewards on hospital service quality.

3. RESEARCH METHODS

This research uses a quantitative, explanatory research design to examine the relationships among job demands, work rewards, employee satisfaction, and the quality of healthcare services. This method is based on a positivist philosophy and uses structured questionnaires for data collection (Ramadhian & Pringgabayu, 2025). The research population comprises medical and non-medical personnel at Prof. Dr. R. Soeharso Orthopedic Hospital Surakarta, totaling approximately 235 individuals. The sampling technique employed was non-probability voluntary response sampling, with a sample size of approximately 235 respondents (Ahmed, 2024). Primary data were obtained through

closed-ended questionnaires using a Likert scale, 1–5, Strongly Disagree to Agree Strongly, to measure the level of agreement with statements related to the research variables (Taherdoost, 2021). Research variables include: independent variables job demands (X_1) and work rewards (X_2), mediating employee satisfaction (Z), and dependent service quality (Y).

The indicators used are Job Demand Indicators (Arrandhikasari et al., 2023), Reward Dimensions (Wardati & Er, 2019), and Service Quality Dimensions (Zeithaml et al., 2016). Data analysis was conducted using Partial Least Squares-Structural Equation Modeling (PLS-SEM) with SmartPLS software. The model was evaluated using the outer model (convergent validity, discriminant validity, and reliability) and the inner model (R^2 , Q^2 , and hypothesis testing via bootstrapping). Significance criteria were set at $p < 0.05$ and t -statistic > 1.96 (Fransisca & Carolina, 2021).

4. RESULTS AND DISCUSSION

4.1. General Overview of the Research

This chapter aims to systematically explain the research results, based on the detailed stages outlined by a good research methodology. The research was conducted at the Orthopedic Hospital in Surakarta, with a total of 285 responses collected. After coding and editing to eliminate unwanted entries, the final sample used for this research consisted of 235 responses, which is in accordance with or close to the target sample size within the population. Data collection was conducted online via Google Forms. The sampling technique used was voluntary response sampling. The data analysis was performed using SmartPLS 3.0.

4.2. Respondent Description

This research aims to examine the factors related to Work Demands and Work Rewards and their impact on the Quality of Healthcare Services at the hospital, with Employee Satisfaction acting as a mediating variable at the Orthopedic Hospital in Surakarta. The respondent description provides information based on the characteristics of those who participated. The respondent data in this study were analyzed using JASP, a statistical software application valued for its ease and flexibility (Culajara & Lao, 2023). The results are as follows:

4.2.1. Gender Description

The respondent description based on gender is explained in the table below:

Table 1. Gender Description

Gender	Frequency	Percentage
Man	125	53 %
Women	110	47 %
Total	235	100 %

Source: Primary Analysis Data, 2025

Based on the table 1, the characteristics of the respondents by gender show that 125 male respondents (53%) were included. Meanwhile, 110 female respondents account for 47%. Therefore, it can be concluded that the respondents are predominantly male, totaling 235 respondents.

4.2.2. Age Description

The respondents' age distribution is shown in the table below:

Table 2. Age Description

Age	Frequency	Percentage
21-30 years old	22	9 %

31-10 years old	64	27 %
>40 years old	149	64
Total	235	100 %

Source: Primary Analysis Data, 2025

From the table 2, the respondents are between 21 and 30 years old, with 22 people representing a 9% prevalence. A total of 31-40 people were affected, with 64 cases, accounting for 27%. Of the 149 people who have been vaccinated, more than 40 have tested positive. The table indicates that respondents over 40 years old are more common and tend to dominate.

4.2.3. Description of Final Education

The respondent's description based on the final indication is shown in the table. below:

Table 3. Description of Final Education

Education	Frequency	Percentage
D3	59	25 %
D4	28	12 %
S1	97	41 %
S2	48	21 %
S3	3	1 %
Total	235	100 %

Source: Primary Analysis Data, 2025

Based on the table 3, the characteristics of respondents according to their level of identification are as follows: D3 with 59 individuals at 25%, D4 with 28 individuals at 12%, S1 education level with 97 individuals at 41%, S2 with 48 individuals at 21%, and 3 individuals at 1%. Therefore, it can be concluded that a large portion of respondents are at the S1 level, with 97 respondents.

4.2.4. Description of Work Period

The response description is based on the work period outlined in the table below:

Table 4. Description of the Terms of Service

Work Period	Frequency	Percentage
1-5 years old	32	14 %
6-10 years old	29	12 %
11-15 years old	29	12 %
16-20 years old	52	22 %
21-25 years old	30	13 %
> 26 years old	63	27 %
Total	235	100 %

Source: Primary Analysis Data, 2025

Based on the table 4, the respondents' characteristics are categorized by work period. The respondent with 1-5 years of experience knows up to 32 people, accounting for 14%. A total of 6-10 people were involved in 12% of the cases. For the 11-15-year age group, the respondent knows up to 29 people, which is 12%. For the 16-20-year age group, the respondent knows as many as 52 people, representing 22%. For the 21-25 years group, I know up to 30 people, representing 13%. The table shows that respondents with over 26 years of experience are the most prevalent.

4.2.5. Profession Description

The respondent's description based on the research is presented in the table below:

Table 5. Profession Description

Work	Frequency	Percentage
Doctor	25	11 %
Nurse	64	27 %
Other healthcare workers	90	38 %
Other	56	24 %
Total	235	100 %

Source: Primary Analysis Data, 2025

Based on the table 5, the characteristics of respondents by profession are as follows: doctors, 25 people (11%). Then, as Nurses, as many as 64 people with a percentage of 27%. Then, as other Health Workers, as many as 90 people, representing 38%. As for other professions not included among the provided options, 56 people (24%) were included. It can be concluded that most respondents are from other health worker (supporting) professions, namely 90 people.

4.2.6. Room Placement Description

The description of the respondent based on the room layout is shown in the table below:

Table 6. Room Placement Description

Room Placement	Frequency	Percentage
Emergency Installation	9	4 %
OC/IBS	28	12 %
ICU	3	1 %
Hospitalization	29	12 %
Outpatient	41	18 %
Other	125	53 %
Total	235	100 %

Source: Primary Analysis Data, 2025

Based on the table 6, the respondents' characteristics based on their room placement are 9 people in the IGD room, making up 4%; 28 people in the OC/IBS room, accounting for 12%; 3 people in the ICU room, representing 1%; 29 people in hospitalization, which is 12%; 41 people in outpatient treatment, totaling 18%; and 125 people in other departments, comprising 53%. Therefore, it can be concluded that the majority of respondents are in other departments, with 125 people.

4.3. Data Analysis Results

In this study, hypothesis testing uses Partial Least Squares (PLS) data analysis techniques with SmartPLS 3.0. The following is a schematic of the PLS program model being tested:

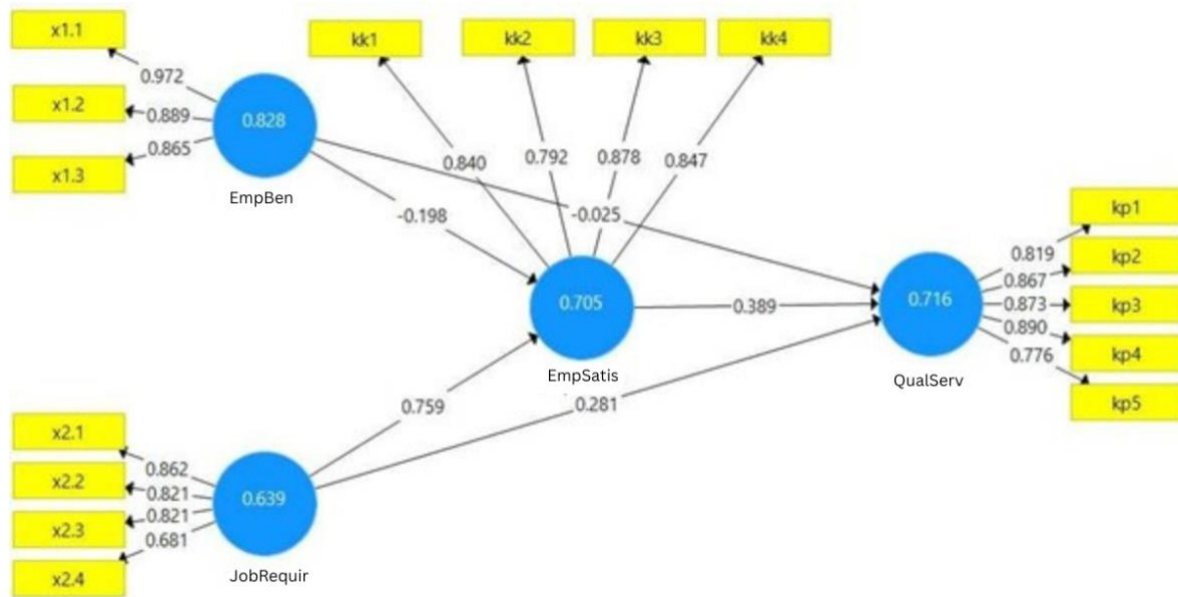


Figure 1. Outer Model

4.3.1. Outer Test

- Validity Test

Convergent Validity

The intuitive measure of convergent validity is the loading factor. An indicator is considered to have good convergent validity if the loading factor exceeds 0.7. The following shows the loading factor value of each indicator in the research variable.

Table 7. Outer Loading Value

	Employee Satisfaction	Job Requirements	Quality of Service	Employee Benefits	Information
ES1	0.840				Valid
ES2	0.792				Valid
ES3	0.878				Valid
ES4	0.847				Valid
QS1		0.819			Valid
QS2		0.867			Valid
QS3		0.873			Valid
QS4		0.890			Valid
QS5		0.776			Valid
JD1	0.972				Valid
JD2	0.889				Valid
JD3	0.865				Valid
WR1			0.862	0.862	Valid
WR2			0.821	0.821	Valid
WR3			0.821	0.821	Valid
WR4			0.681	0.681	Valid

Source: Primary Analysis Data, 2025

Based on the table 7, each indicator variable in the research has many values with outer loadings > 0.7. However, a scale of outer loading values from 0.5 to 0.6 is already considered sufficient to meet

the convergent validity requirement. The data above show that no indicator variables have outer loadings below 0.6, so all indicators are deemed suitable for use in the research and can be used for further analysis.

Discriminant Validity

Discriminant validity is used to ensure that each concept of each construct or variable is distinct from other variables. Discriminant validity can be assessed by looking at the AVE (Average Variance Extracted) value > 0.5 , which indicates that it is valid in terms of convergent validity (Rönkkö & Cho, 2022). The following are the AVE values for each research variable:

- Reliability Test

Average Variance Extracted Value

Table 8. Average Variance Extracted Value

Variable	Average Variance Extracted (AVE)	Average Variance Extracted (AVE)
Work rewards	0.639	Valid
Job demands	0.828	Valid
Employee Satisfaction	0.705	Valid
Quality of Service	0.716	Valid

Source: Primary Analysis Data, 2025

Reliability Statistics for Employee Satisfaction and Service Quality Constructs

Table 4. 9 Reliability Statistics for Employee Satisfaction and Service Quality Constructs

Variable	Composite Reliability	Cronbach's Alpha	Employee Satisfaction	Quality of Service	Information
Job demands	0.935	0.915	1.004	2.574	Non multicollinearity
Work rewards	0.875	0.808	1.004	2.728	Non multicollinearity
Employee Satisfaction	0.905	0.860	-	1.111	Non multicollinearity
Quality of Service	0.926	0.900	-	-	-

Source: Primary Analysis Data, 2025

Composite reliability values for job demands, work rewards, employee satisfaction, and service quality are 0.935, 0.875, 0.905, and 0.926, respectively, all above the recommended cut-off of 0.70, demonstrating excellent internal consistency at the construct level. Consistently, Cronbach's alpha coefficients for the same variables (0.915 for job demands, 0.808 for work rewards, 0.860 for employee satisfaction, and 0.900 for service quality) exceed the minimum criterion of 0.60, confirming that the items within each scale reliably measure their intended latent construct.

Collinearity diagnostics show VIF values of 1.004 and 2.574 for the effects of job demands, 1.004 and 2.728 for work rewards, and 1.111 for employee satisfaction, all well below the threshold of 5. These results indicate the absence of multicollinearity among the predictor variables, implying that each independent construct contributes unique variance to the model and that the regression estimates are stable and interpretable.

4.3.2. Inner Model Analysis

- Model Goodness Test

Table 10. Model Goodness Test

Exogenous Variables	R Square	R Square Adjusted	f² Employee Satisfaction	f² Quality of Service
Job demands	-	-	0.106	0.001

Employee benefits	-	-	1.564	0.052
Employee satisfaction	0.633	0.630	-	0.093
Quality of Service	0.405	0.397	-	-

Source: Primary Analysis Data, 2025

The structural model in this study was evaluated using goodness-of-fit tests based on two main indicators: R² and Q². The R² values for employee satisfaction (0.633, 63.3%) and service quality (0.405, 40.5%) are moderate, indicating that the variance explained by the predictor variables is sufficiently adequate. The Q-Square test yields values of 0.439 for employee satisfaction and 0.280 for service quality, indicating that the model has strong predictive power by Geisser and Stone's standards. Furthermore, the effect size (f²) test results show that compensation significantly contributes to employee satisfaction (f²=1.564), while job demands have a moderate effect (f²=0.106) on employee satisfaction but a very small effect on service quality (f²=0.001). Compensation also has a moderate effect on service quality (f²=0.052), and employee satisfaction has a moderate effect on service quality (f²=0.093). These three indicators confirm that this research model provides a good, relevant statistical fit to describe the relationships among the research variables.

• Hypothesis Testing

Path Coefficient Test (Direct & Specific Indirect Effect)

Table 11. Path Coefficient (Direct Effect)

Indicator	Original Sample (O)	T Statistics (O/STDEV)	P Values	Sample Mean (M)	2,5%	97,5%	Information
Job Demands (X1) ↓ Quality of Service (Y)	-0.025	0.415	0.378	-0.024	-0.117	0.129	Negative Not Significant
Work Rewards (X2) ↓ Quality of Service (Y)	0.281	3.405	0.001	0.286	0.132	0.445	Significant Positive
Job Demands (X1) ↓ Employee Satisfaction (Z)	-0.198	3.455	0.001	-0.191	-0.286	-0.051	Significant Negative
Work Rewards (X2) ↓ Employee Satisfaction (Z)	0.759	26.836	0.000	0.384	0.194	0.552	Significant Positive
Job Demands (X1) ↓ Quality of Service (Y)	0.389	4.210	0.000	0.758	0.700	0.809	Significant Positive
Job Demands (X1) ↓ Quality of Service (Y)							

Source: Primary Analysis Data, 2025

Hypothesis testing in this study used path coefficients to evaluate the direct and indirect effects among variables, with bootstrapping in SmartPLS 3.0. Based on the obtained output, the direct effect of job demands on service quality was not significant (t-statistic = 0.415; p-value = 0.678; original sample = -0.025), so the first hypothesis was rejected—meaning that workload does not have a significant direct contribution to service quality. Conversely, work rewards were found to have a positive and significant effect on service quality (t-statistic = 3.405; p-value = 0.001; original sample = 0.281), thereby supporting the second hypothesis. Job demands were also shown to have a negative and significant effect on employee satisfaction (t-statistic 3.455; p-value 0.001; original sample -0.198), while work rewards demonstrated a positive and highly significant influence on employee satisfaction (t-statistic 26.836; p-value 0.000; original sample 0.759).

Next, employee satisfaction plays an important role, with a positive and significant effect on service quality (t-statistic = 4.210; p-value = 0.000; original sample = 0.389). Indirect effects were also tested, with employee satisfaction mediating the relationship between job demands and service quality, which was found to be significant (t-statistic = 4.160; p-value < 0.05). Similarly, in the mediation path from compensation to service quality via employee satisfaction, the results are significant (t-statistic = 2.544; p-value = 0.011). Overall, the path coefficient analysis shows that the strongest path in the model is compensation → employee satisfaction → service quality, while workload has a greater negative impact on satisfaction, and the indirect effects of job demands and compensation on service quality are significantly mediated by employee satisfaction. These findings confirm that improving service quality is driven not only by external factors (rewards/compensation) but also by internal employee conditions, particularly job satisfaction.

Epsilon V Test

Table 12. Epsilon V Measurement

Indicator	Original Sample (O)	Description
Job Claim (X1) Employee Satisfaction (Z) → Service Quality (Y)	$(-0.198)^2 \times (0.389)^2$ 0.0392x 0.151321= 0.00593	Low Mediation Effect
Imbalan Kerja (X2) Employee Satisfaction (Z) → Service Quality (Y)	$(-0.198)^2 \times (0.389)^2$ 0.0392x 0.151321= 0.00593	Low Mediation Effect

Source: Primary Analysis Data, 2025

The statistical sigma in the analysis of the effect size variable indicates how much the effect size varies at the structural level. The interpretation of the effect size value of Sigma (V) follows the recommendations of Ogbeui et al. (2021): 0.175 (high effect size), 0.075 (medium effect size), and 0.01 (small effect size).

4.4. Discussion

Based on the above description, the employee satisfaction variable, as a mediator of the direct effect of job demands on service quality at the structural level, is classified as moderate. However, the employee satisfaction variable, which mediates the direct influence of work rewards on service quality at the structural level, is classified as medium.

Work demands do not significantly affect the quality of hospital services based on statistical analysis, although a high workload can theoretically increase the risk of employee fatigue and stress, which negatively impacts service quality if not supported by workload planning, training, and a

conducive work environment. An organization needs to distribute tasks fairly and provide adequate facilities and support so that employees can manage their job demands and maintain consistent service.

Work rewards have a positive and significant effect on the quality of service. Compensation received by employees, whether in the form of basic salary, allowances, or non-financial facilities, encourages employee motivation and dedication to improving service quality. However, periodic increases in rewards are not the only factor driving service behavior; many employees maintain their dedication to their work and professional commitment, in addition to the financial rewards they receive.

Excessive workload has been proven to significantly decrease job satisfaction. Employees facing overly demanding work often experience a decline in motivation due to fatigue and psychological pressure, leading them to prioritize patient care over their own needs. Hospitals need to design workloads and working hours that are balanced with staff capabilities and numbers.

Work compensation is the main determinant of employee satisfaction. Adequate compensation increases motivation and provides employees and their families with a sense of security and social status. Previous research also confirms that salary levels and facilities contribute to achieving a standard of living and work enthusiasm. Fair compensation also ensures the quality of work results and encourages sustained high performance.

Employee satisfaction has a significant impact on the quality of service they provide to patients. Management efforts to implement the salary system, promote career advancement, foster positive social relationships in the workplace, and create a healthy work environment have proven to boost job satisfaction and maintain consistent service quality.

Work satisfaction mediation has proven to be an important pathway in the influence of job demands on service quality. If high job demands are balanced with work satisfaction, performance decline can be minimized. However, if satisfaction decreases due to work pressure, both performance and patient service will also be negatively affected. The role of satisfaction as a mediator is crucial in maintaining healthcare service outcomes.

Similarly, job satisfaction also mediates the influence of work rewards on service quality. Performance allowances, awards, and a supportive work environment can increase satisfaction, which ultimately impacts performance and service quality. This mediating role explains that good HR policies will have implications not only for employee satisfaction but also for the overall quality of service in the organization.

The research results show that performance allowances influence employee performance through job satisfaction. This finding is supported by empirical studies, which indicate that job satisfaction can mediate the effect of performance allowances on employee performance (Febiola et al., 2024). This is also in line with the research by Apriyanto et al. (2024), which states that performance allowances can affect job satisfaction and employee performance (Apriyanto et al., 2024). In this case, even without the satisfaction variable as a mediator, performance allowances still significantly influence employee performance. This indicates that job satisfaction acts as a partial mediator. According to Febiola et al. (2024), in line with the demands of bureaucratic reform, improving civil servant performance is no longer merely a matter of performance allowances affecting employee performance through job satisfaction, but a necessity for continuous performance improvement and the quality of public services. Civil servants who perform well and make significant contributions to their agencies naturally expect rewards commensurate with their performance and contributions. Therefore, government agencies should open up opportunities to motivate each employee to achieve their best performance. Providing performance-based allowances will strengthen alignment among work behaviour, work results, organizational goals, and targets (Febiola et al., 2024). Thus, the granting of performance allowances to civil servants essentially aims to improve employee and organizational performance, enhance employee welfare, and improve the quality of public services.

5. CONCLUSION

The study demonstrates that job demands and job rewards jointly shape hospital service quality through their impact on employee satisfaction. Job rewards show a strong positive and significant effect on both employee satisfaction and service quality, whereas job demands reduce employee satisfaction and have only a small, non-significant direct effect on service quality. Employee satisfaction has a positive and significant effect on service quality and mediates the effects of both job demands and job rewards, with a low mediation effect for job demands and a medium mediation effect for job rewards. These findings underline clear managerial implications: hospital leaders should prioritize fair and attractive reward systems and active workload management to sustain employee satisfaction and consistently high service quality.

This study has several limitations. First, the data come from a single orthopedic hospital, which may limit the generalizability of the results to other institutions or settings. Second, the use of non-probability voluntary response sampling and a cross-sectional, self-report questionnaire design raises risks of selection bias, common method bias, and constraints on causal inference.

Future research could extend this work by employing probability-based sampling and multi-hospital or multi-region designs to improve external validity. Longitudinal or experimental designs are recommended to better capture causal dynamics between job demands, rewards, satisfaction, and service quality over time. In addition, future studies could incorporate other relevant antecedents and mechanisms, such as leadership style, organizational support, or burnout, to more comprehensively explain variations in hospital service quality.

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REFERENCE

- Ahmed, S. K. (2024). How to choose a sampling technique and determine sample size for research: A simplified guide for researchers. *Oral Oncology Reports*, 12(September), 100662. <https://doi.org/10.1016/j.oor.2024.100662>
- Aliyari, M. (2024). The Role of Managers in Employee Job Satisfaction Considering Multiple Mediating Effects. *International Journal of Modern Achievement in Science, Engineering and Technology*, 1(4), 27–34. <https://doi.org/10.63053/ijset.43>

- Apriyanto, E., Harsono, S., & Yulianti, E. (2024). The Effect of Motivation and Performance Allowances on Employee Performance with Job Satisfaction as an Intervening Variable in Simomulyo and Tanjungsari Community Health Center. *Management Studies and Entrepreneurship Journal*, 5(2), 5693–5706. <https://doi.org/https://doi.org/10.38035/dijemss.v7i1>
- Arrandhikasari, D., Pamungkas, R. A., & Saptaningsih, A. B. (2023). The Influence of Workload, Knowledge, Motivation on Medical Record Quality Through Doctor Compliance. *International Journal of Nursing and Health Services (IJNHS)*, 6(3), 171–177. <https://doi.org/10.35654/ijnhs.v6i3.705>
- Azhari, F., & Ali, H. (2024). Peran Inovasi Produk, Strategi Pemasaran, dan Kualitas Layanan terhadap Peningkatan Kinerja Perusahaan. *Jurnal Manajemen Dan Pemasaran Digital*, 2(2), 72–81. <https://doi.org/10.38035/jmpd.v2i2.146>
- Boadi, S., Lartey, A. E., & Amoako, R. (2023). Influence of Psychological Well-Being and School Factors on Delinquency, During the Covid-19 Period Among Secondary School Students in Selected Schools in Nakuru County: Kenya. *International Journal of Research and Innovation in Social Science (IJRISS)*, VII(2454), 1175–1189. <https://doi.org/10.47772/IJRISS>
- Cahya, A. D., S, R. A., N, S. A., & Jati, P. S. (2021). Pengaruh Pemberian Kompensasi Karyawan terhadap Kepuasan dalam kinerja untuk Meningkatkan Kualitas Pelayanan. *Jesya (Jurnal Ekonomi & Ekonomi Syariah)*, 4(2), 1288–1294. <https://doi.org/10.36778/jesya.v4i2.495>
- Chen, L., Li, Y. Q., & Liu, C. H. (2019). How airline service quality determines the quantity of repurchase intention - Mediate and moderate effects of brand quality and perceived value. *Journal of Air Transport Management*, 75(October 2018), 185–197. <https://doi.org/10.1016/j.jairtraman.2018.11.002>
- Culajara, C. J., & Lao, A. (2023). The Use of Simplified Learning Materials (SLM) in Physical Education as a Tool in Enhancing Students' Learning Experiences. *JUMORA: Jurnal Moderasi Olahraga*, 3(1), 72–81. <https://doi.org/10.53863/mor.v3i1.605>
- Febiola, B., Donal Mon, M., & Setyawan, A. (2024). The Influence of Discipline and Allowances on Employee Performance Through Job Satisfaction as a Mediating Variable Evidence. *Jurnal Manajemen Dan Pemasaran Jasa*, 17(1), 117–134. <https://doi.org/10.25105/jmpj.v17i1.19084>
- Fransisca, E., & Carolina, Y. (2021). Banking Sector in Bandung-Indonesia). *Conference Series*, 3(1), 791–804.
- Gema Z., D., & Suwitho, S. (2017). Pengaruh Kualitas Layanan Dan Kualitas Produk Terhadap Kepuasan Pelanggan. *Jurnal Ilmu Dan Riset Manajemen*, 4. <https://doi.org/10.52103/tatakelola.v7i2.174>
- Haribowo, S. F., Soetjipto, B. E., & Wardana, L. W. (2025). Examining the Relationship Between Incentives, Workload, and Employee Performance: A Systematic Literature Review. *Jurnal Ilmu Manajemen*, 13, 106–117. <https://doi.org/10.26740/jim.v13n1.p106-117>
- Imawan, I., & Lesmana, M. T. (2024). Work-Life Balance, Work Engagement and Employee Performance: An Examining the Mediating Role of Job Satisfaction. *International Journal of Business Economics (IJBE)*, 5(2), 166–186. <https://doi.org/10.30596/ijbe.v5i2.18210>
- Jufrizen, J., & Kanditha, E. S. (2024). the Effect of Organizational Justice on Employee Performance Job Satisfaction as an Intervening Variable At Pt Durenmandiri Fortuna Jambi. *Nomico*, 1(1). <https://doi.org/10.62872/x1atfb56>
- KEMENPAN. (2003). *Kementrian Pendayagunaan Aparatur Negara*.
- Kotler, P., & Keller, K. L. (2016). *Marketing Management* (15th ed.). Pearson.

- Liu, W., & Liu, Y. (2022). The Impact of Incentives on Job Performance, Business Cycle, and Population Health in Emerging Economies. *Frontiers in Public Health*, 9(February), 1–14. <https://doi.org/10.3389/fpubh.2021.778101>
- Loudoe, M. M., John E.H.J. FoEh, & Simon Sia Niha. (2023). Pengaruh Stress Kerja, Beban Kerja, dan Kebutuhan Aktualisasi Diri Terhadap Prestasi Kerja Melalui Motivasi Kerja sebagai Variabel Intervening. *Jurnal Siber Multi Disiplin*, 1(2), 52–65. <https://doi.org/10.38035/jsmd.v1i2.47>
- Mokobombang, W., & Natsir, N. (2024). Strategi Pengembangan Sumber Daya Manusia Dalam Meningkatkan Kinerja Organisasi: Tinjauan Pada Industri Jasa. *Jurnal Minfo Polgan*, 13(1), 606–618. <https://doi.org/10.33395/jmp.v13i1.13756>
- Ningsih, Y. (2020). Hubungan Perilaku Caring Perawat Dengan Tingkat Kepuasan Pasien Pengguna Jasa BPJS Di RS An-Nisa Tangerang Tahun 2020. *Jurnal Health Sains*, 1(4), 252–261. <https://doi.org/10.46799/jhs.v1i4.44>
- Nugraha, A., & Tjahjawati, S. S. (2023). Pengaruh Kompensasi Terhadap Kinerja Karyawan Melalui Motivasi. *Akses: Journal of Publik & Business Administration Science*, 5(2), 8–17. <https://doi.org/10.58535/jasm.v5i2.40>
- Pratiwi S, Faradila N, & Iashania Y. (2022). Pelatihan dan Pengembangan Sumber Daya Manusia dalam Meningkatkan Kualitas Pelayanan Publik. *Nusantara Innovation Journal*, 1(1), 28–37.
- Ramadhian, M. A. R., & Pringgabayu, D. (2025). Understanding Employee Performance Through Job Satisfaction and Motivation in Public Hospitals. *The International Journal of Business Review (The Jobs Review)*, 7(2), 107–118. <https://doi.org/10.17509/tjr.v7i2.81305>
- Rönkkö, M., & Cho, E. (2022). An Updated Guideline for Assessing Discriminant Validity. In *Organizational Research Methods* (Vol. 25, Issue 1). <https://doi.org/10.1177/1094428120968614>
- Sarnia, Manaf, S., & Mahmud, A. (2022). Impact of health workers' work and facilities on improving the quality of health services at Siontapina Health Center, Buton Regency. *Jurnal Ilmiah Ilmu Administrasi Negara*, 11(1), 50–64.
- Sitepu, C. M., Lengkong, F. D. J., & Londa, V. Y. (2018). Pengaruh Kompensasi Terhadap Kualitas Pelayanan Publik Dinas Kesehatan Kota Manado. *Journal of Chemical Information and Modeling*, 4, 41.
- Sulistio, A., & Ismi, Darmastuti. (2024). *Employee Empowerment and Job Satisfaction: A Systematic Literature Review*. 04(06), 273–280.
- Taherdoost, H. (2021). Data collection methods and tools for research: A technique for academic and business research projects. *International Journal of Academic Research in Management (IJARM)*, 2021(1), 10–38.
- Thibault Landry, A., & Whillans, A. (2018). The Power of Workplace Rewards: Using Self-Determination Theory to Understand Why Reward Satisfaction Matters for Workers Around the World. *Compensation and Benefits Review*, 50(3), 123–148. <https://doi.org/10.1177/0886368719840515>
- Tri HA, M. (2017). The Impact of Customer Value on Customer Satisfaction and Customer Loyalty in Hotel Firms. *Tourism Research*, 42(3), 141–158. <https://doi.org/10.32780/ktidoi.2017.42.3.141>
- Wahyuni, H., & Erwantiningsih, E. (2020). Pengaruh Intelegensi Quotient (IQ), Emotional Quotient (EQ) dan Beban Kerja terhadap Kualitas Pelayanan Tenaga Perawat. *Jurnal Manajemen Dan Kewirausahaan*, 8(1), 50–58. <https://doi.org/10.26905/jmdk.v8i1.3846>
- Wardati, N. K., & Er, M. (2019). The impact of social media usage on the sales process in small and medium enterprises (SMEs): A systematic literature review. *Procedia Computer Science*, 161, 976–983. <https://doi.org/10.1016/j.procs.2019.11.207>

WHO. (2023). *Global Monitoring Report on Universal Health Coverage*.

Zeithaml, V. A., Bitner, M. J., & Gremler, D. D. (2016). *Services Marketing: Integrating Customer Focus Across the Firm*. McGraw-Hill Education.