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# Evaluation of the Quality of Service in the Clinics of the Degree in Dental Surgeon of the Otay-Tijuana Campus of the Autonomous University of Baja California (UABC)

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Abstract: Objective: To evaluate the quality of the services provided by the dental clinics of the Autonomous University of Baja California (UABC) Otay-Tijuana Campus using the Donabedian and SERVPERF methodologies to know strategies that allow improving the quality of care. Methodological design: A prospective cross-sectional study was carried out in a random sample of 1,315 surveys of patients who attended the clinics of the Tijuana Faculty of Dentistry of the UABC in the period 2023-1. To collect the information, the PERCACEL tool was used, developed using the Donabedian and SERVPERF methodologies, which consists of 4 sections: 1) Specifications of the clinic that provided the service and time in which the care was received, 2) General data of the respondent, 3) Perceptions of the care received and 4) User perception of the service provided. This survey was validated in the city of Puebla to be used in dental care clinics, obtaining a Cronbach's Alpha of 0.923 for the Donabedian instrument and 0.963 for the SERVPERF instrument. Results: The average of the evaluation obtained from the perception of quality through the SERVPERF model was 9.13, slightly higher than that obtained through the Donabedian model, which was 8.98, demonstrating that the quality of care provided by the university community is high without great variations.

**Keywords:** Evaluation, Quality of care, Stomatology, Donabedian, SERVPERF, PERCACEL.

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### **INTRODUCTION**

Medical care is defined as the treatment provided by a health professional to a clearly established episode of illness in each patient. Two aspects originate from this care, the first is technical care, which is the application of science and technology to resolve a health problem and the second is the interpersonal relationship, which is the social, cultural, and economic interaction between the health professional and the patient (Coronado-Zarco *et al.*, 2013). In accordance with the provisions of the World Health Organization (WHO) within the framework of the provision of quality health services in the year 2020, there is a growing recognition that optimal health care cannot be provided simply by ensuring coexistence of infrastructure, medical supplies, and health care providers. Improving health care delivery requires a deliberate focus on the quality of health services, which involves providing effective, safe, people-centered care that is timely, equitable, integrated, and efficient. Quality of care is the degree to which health services for individuals and populations improve the likelihood of desired health outcomes and are consistent with current professional knowledge (WHO, 2020).

High-quality health services involve the right care, at the right time, responding to the needs and preferences of service users, while minimizing harm and waste of resources. Quality health care increases the probability of desired health outcomes and is consistent with the seven measurable characteristics: effectiveness, safety, people-centeredness, timeliness, equity, integration of care, and efficiency (WHO, 2020).

From the perspective of three global institutions interested in health, the Organization for Economic Cooperation and Development (OECD), the World Bank and the WHO, a path forward is proposed for health policymakers, seeking to achieve the goal of access. To high-quality, people-centered health services for all. High-level action is called for from each of the key groups who must work together with a sense of urgency to support the promise of the Sustainable Development Goals to achieve better and safer health care. Among the actions established in this regard are the following (WHO, 2020).

#### All citizens and patients must:

- Be empowered to actively participate in care to optimize their health status.
- Play a leading role in the design of new models of care to meet the needs of the local community.
- Be informed that they have the right to access care that meets modern quality standards.
- Receive support, information, and skills to manage your own long-term conditions (WHO, 2020).

#### All healthcare workers must:

- Participate in quality measurements and improvements with your patients.
- Adopt a teamwork practice philosophy.
- See patients as allies in the provision of care.
- Commit to providing and using data to demonstrate the effectiveness and safety of care (WHO, 2020).

# Quality of care in the health service provided in educational institutions

According to the Institute of Medicine, "quality of care is the degree to which health services for individuals and the population increase the likelihood of desired health outcomes and are consistent with current professional knowledge" (Institute of Medicine, 1990) the quality of care in the service provided to patients is a constant that educational institutions must ensure. Such a premise implies that all aspects involved in this process and that contribute to its operation (academic, clinical, administrative and ethical) must ensure that they support quality care that provides a solution to the individual Although multiple elements of quality have been described for decades, there is growing recognition that quality health services around the world must be effective, safe, and people centered. Furthermore, to achieve the benefits of quality health care, health services must be timely, equitable, integrated, and efficient (WHO, 2020).

Understanding that quality of care aims to increase the possibility of obtaining desired positive health results, the WHO mentions 7 important aspects that allow us to evaluate whether the care provided or received is of high quality:

- Effective, based on scientific knowledge and evidence-based guidelines.
- Safe, minimizes harm, including preventable injuries and medical errors.
- Focused on people, respects, and responds to their preferences, needs and values.
- Timely, it would keep delays in the provision and receipt of services to a minimum.
- Equitable, it does not vary according to personal characteristics such as gender, race, ethnicity, geographic location, and socioeconomic status.
- Integrated, the care received in all facilities and providers is coordinated.
- Efficient, avoids waste of resources, including equipment, medicines, energy, and ideas (Akdere *et al.*, 2023).

These elements are the basis of the strategies that allow improving the quality of care in medical services, since it is not enough to allocate countless amounts of funds in infrastructure and scientific advances if an effective patient care program is not designed and available to everyone.

In recent years, the term "quality improvement" (QI) has taken on special importance in state dental education systems, promoting it to obtain favorable health outcomes, reduce costs, and improve the experience of patients patients (Luo et al., 2018). Taking these last 3 points into consideration, we have that the health results will be more favorable the better the quality of the treatment and the ethical behavior of the clinician who provides it. It has been shown that a good incentive for the ethical behavior of health service providers is a good payment mechanism, which provides the clinician with financial incentives to provide highquality treatment and improve patient outcomes (Luo et al., 2018). The students of the Faculty of Dentistry do not receive any financial incentive since they provide a dental service in accordance with their professional training process to promote the oral health of the population.

#### Quality assessment

The conceptual and methodological bases for the evaluation of the quality of care, published at national and international levels during the last ten years, have been justified in the model developed by Donabedian. This model has been an important contribution, since it allows the variables linked to the quality of health services to be measured in an orderly manner. This scheme assumes that the results really are a consequence of the care provided, which implies that not all results can be easily and exclusively attributable to processes, and not all processes depend directly and solely on the structure (Akdere *et al.*, n.d., 2023, Coronado-Zarco *et al.*, 2013).

Donabedian also mentions that health care has three components: technical care, interpersonal relationships, and the environment (amenities), in which the care process takes place. The way to begin to translate the grand abstractions of concept formulation into the more detailed attributes of care that will represent its quality is through "empirical" exploration of everyday experience; to extract from the opinions expressed by patients, doctors and administrators, the judgments they share about quality, as well as those in which they differ (Akdere *et al.*, 2023, Coronado-Zarco *et al.*, 2013).

This instrument evaluates three dimensions; a) Technical, that is, the relationship strictly with medicine and the clinical field of treatments that includes the use of technological devices, establishment of diagnosis, treatment plan and prognosis. b) Interpersonal, the approach of health personnel based on the ethical principles established by the National Medical Arbitration Commission (CONAMED). c) Amenities, everything that allows the patient's experience to be more pleasant. When evaluating, 25% is established for the structure and 75% for the procedures carried out in the evaluated institution.

At the Faculty of Dentistry Campus Otay-Tijuana, of the Autonomous University of Baja California (UABC), the training of students during the disciplinary stage is based on the care of patients who come to the university in search of dental treatments at a low cost. compared to private consultation. These treatments are strictly supervised by clinic heads and are carried out under the protocols pre-established by the WHO and various organizations in charge of promoting oral health. This study sought to evaluate the quality of the treatments provided in the different dental care clinics, using the PERCACEL instrument, which measures the perceptions of the dental treatment received and the service in general. The aim was to analyze the data obtained through this instrument and develop strategies to improve the quality of care for patients who

come for the first time or for follow-up appointments to the Faculty of Dentistry.

# METHODOLOGY

A descriptive, prospective, and cross-sectional study was carried out in a simple random sample of 1315 surveyed patients, of which men and women between 18 and 94 years of age were included, who attended the clinics of the Tijuana Faculty of Dentistry of the UABC and received dental care from students of the Dental Surgeon degree during the 2023-1 school period, with the aim of evaluating the quality of services in the clinics. The selection of participants in the study was random according to the order in which dental care was completed until the service hours were completed. A total of 5 clinics participated, of which 4 are urban care centers (peripheral clinics) and 1 in the Otay-Tijuana Campus and the following areas were included: surgery, diagnosis, endodontics, comprehensive, restorative dentistry, dental surgery, periodontics, fixed prosthesis, removable partial prosthesis and total prosthesis.

To collect the information, the PERCACEL instrument was used, which was developed following the Donabedian and SERVPERF methodologies. This survey was previously validated by other researchers in 2021 in the city of Puebla, to be used in dental care clinics, obtaining a Cronbach's Alpha of 0.923 for the Donabedian instrument and 0.963 for the SERVPERF instrument; granting reliability and relevance to the instrument used, the confidentiality of the information obtained by the patient is also guaranteed. The evaluation instrument was previously endorsed by the Ethics Committee of the Faculty of Dentistry of the Autonomous University of Baja California (Coronado-Zarco *et al.*, 2013, López Ramírez *et al.*, 2021).

This instrument measures the quality of the service based on the patient's perception, including 8 dimensions or approaches: structure, process, result, reliability, responsiveness, security, empathy, and tangible aspects. The questionnaire consists of 4 sections: 1) Specifications of the clinic that provided the service and time in which the care was received, 2) General data of the respondent, 3) Perceptions of the care received and 4) User perception of the service provided (Coronado-Zarco *et al.*, 2013, López Ramírez *et al.*, 2021).

Regarding the items that were measured, in sections three and four, the response options were reported using the Likert scale where the value "1" is very bad and the value "5" is very good. Section three is made up of 24 items and section four is made up of 15 items, 11 complying with the Likert scale and 4 questions with a dichotomous response option (Coronado-Zarco *et al.*, 2013) (López Ramírez *et al.*, 2021).

# **Results**

The study considered 1,315 participants over 18 years of age, users of the dental care clinics of the Autonomous University of Baja California; 36.1% (475) were men and 63.9% (840) women, the average age was 41.03 years, with a minimum age of 18 and maximum of 94 (Table 1).

Table 1: Freq	uency and	percentage	of sex

Sex	Frequency	%		
Male	475	36,1		
Female	840	63,9		
Total	1315	100		
Source: self-made				

As a general description of the total number of clinics where the surveys were carried out, the one with the highest frequency was the Otay-Tijuana Campus with 68.7%, followed by the University Center for Health Education (CUES) with 9.5%, and for the Obrera clinic with 9.4%, finally data was taken in 70-76 and Florido with 7.5% and 4.9% respectively. Regarding the dental service and/or treatment for which users attended, it turned out to be to a greater extent the comprehensive clinic with 23.9%, followed by the diagnostic clinic with 14.5% and the surgery clinic with 14.5%. 13.6% of care; Finally, the endodontic, restorative, dental surgery, pediatrics, fixed prosthesis, and removable partial prosthesis clinics accounted for less than 10% of the total dental care evaluated acquaintance.

Table 2: Dentist-	patient relationship
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Clínica	Friends	Acquaintance	Student	Relative	None	Couple	Total
Surgery	3,0%	1,9%	0,0%	2,4%	6,3%	0,0%	13,6%
Diagnosis	2,8%	2,1%	0,0%	2,1%	7,3%	0,2%	14,5%
Endodontics	0,7%	1,1%	0,0%	1,2%	2,8%	0,0%	5,8%
Integral	5,2%	3,6%	0,0%	6,5%	8,4%	0,1%	23,9%
<b>Restorative Dentistry</b>	0,7%	0,5%	0,0%	1,2%	1,9%	0,1%	4,3%
Dental Surgery	3,3%	0,8%	0,0%	2,7%	2,7%	0,0%	9,4%
Pediatric dentistry	0,3%	0,3%	0,0%	0,1%	1,4%	0,0%	2,1%
Periodontics	2,7%	1,1%	0,1%	3,4%	3,3%	0,1%	10,7%
Fixed Prosthesis	0,6%	1,1%	0,0%	2,5%	4,0%	0,0%	8,2%
Partial prothesis	0,3%	0,2%	0,0%	0,7%	1,8%	0,0%	3,0%
Total prosthesis	0,1%	0,8%	0,0%	1,1%	2,4%	0,0%	4,4%
Total	19,8%	13,5%	0,1%	24,0%	42,2%	0,4%	100,0%

Regarding the relationship or kinship between the dentist and the users or people treated (Table 2) in the clinics of the Dental Surgeon degree of the UABC, it was found that 42.2% had no relationship with the students, 24% were family members, while 19.8% were friends and in 13.5% of the respondents there was a relationship of acquaintances, finally less than 1% of the respondents mentioned having a relationship with the student.

#### Type of user and health services

Regarding the type of user and health insurance (Table 3), it was observed that 47% of the people were beneficiaries of the Mexican Social Security Institute (IMSS), of which 24.3% were treated for the first time in the UABC clinics and 22.7% were subsequent care. Followed by many people (31.9%) who do not have any type of health insurance, the rest of the people are users of different types of health insurance such as ISSSTE, ISSSTECALI or private insurance.

Servicio de Salud	Primera vez	Subsecuente	Total
IMSS	24,3%	22,7%	47,0%
IMSS, ISSSTE*	0,1%	0,0%	0,1%
IMSS, ISSSTECALI*	0,2%	0,1%	0,2%
IMSS, Priviate insurance*	0,3%	0,2%	0,5%
insabi	3,6%	3,9%	7,5%
ISSSTE	2,0%	1,6%	3,6%
ISSSTECALI	1,7%	1,4%	3,0%
Private insurance	4,2%	1,6%	5,8%
United State insurance	0,2%	0,2%	0,5%
No Health insurance	18,7%	13,2%	31,9%
Total	55,2%	44,8%	100%

Table 3: Type of user and health services
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#### Occupation and educational level

Regarding educational level and occupation (table No. 4), approximately 60% of the total users surveyed mentioned having a high school level, 37.2% had a bachelor's degree. Regarding occupation, according to the data obtained, it was found that most users (46.6%) were employees of the public or private sector, followed by university students with 21.3% and 13.7%. of the surveyed users who mentioned not having a specific occupation. Among other occupations with the lowest percentages were retired patients, merchants, users dedicated to household chores or informal work.

	Illiterate	Elementary	Middle	High	Bachelor's	Master's	Total
		School	School	School	Degree	Degree	
Businessman	0,0%	0,2%	1,2%	1,5%	0,5%	0,0%	3,5%
Employee	0,2%	2,7%	8,7%	16,3%	16,8%	1,9%	46,6%
Student	0,0%	0,0%	0,1%	5,2%	15,9%	0,1%	21,3%
Retired	0,8%	1,7%	1,7%	2,0%	1,5%	0,0%	7,8%
Household chores	0,0%	1,1%	2,0%	1,8%	0,9%	0,0%	5,9%
Unemployed	1,4%	2,1%	4,3%	4,3%	1,4%	0,0%	13,7%
Informal worker	0,0%	0,3%	0,5%	0,5%	0,1%	0,0%	1,4%
Total	2,4%	8,3%	18,5%	31,7%	37,2%	2,0%	100%

#### Table 4: Occupation and educational level

#### Quality perception (Donabedian model)

In the evaluation of the model proposed by Avedis Donabedian (Table 5) where the perception of the structure, process and result of the health service is observed, in the evaluation, it was observed that the average quality was 8.45/10. When analyzing the data according to the location of the clinics (peripheral or Otay-Tijuana Campus), on average there is a difference of 0.23 between the perception obtained from the Otay-Tijuana Campus clinics compared to the peripheral ones, where there is the greatest difference is in the perception of the structure (0.5), with respect to the other process parameters and the results, no significant variations were observed.

Table 5: Perception of a	mality by Donabedian	model an location of clinics
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Evaluation approach	Perceived quiality CO*	Perceived quialityP CP*	Average		
Strucuture	8.6	8.1	8.35		
Process	9.5	9.6	9.55		
Result	8.8	8.5	8.65		
Average 8.96 8.73 8.45					
*Otay-Tijuana Campus (CO), Periphereal Clinics (PC)					
Source: This chart was made by the author.					

#### **Quality perception (SERVPERF model)**

Regarding the perception of the quality of care received according to the SERVPERF model, it was observed that there is a difference of 0.07 between the clinics, with those located in the periphery being higher with a 9.23/10 compared to 9.16/10 on the Campus. Otay-Tijuana. A greater difference was obtained in the perception of the safety of care, being greater in the peripheral clinics with a 9.76 and lower in the Otay-Tijuana Campus with a 9.32. Another value to highlight is the tangible aspects in which there was a difference of 0.17, with the Otay-Tijuana Campus where a better perception was obtained with 8.91.

 Table 6: Perception of quality by SERVPERF model and location of clinics

	Otay-Tijuana Campus	<b>Periphereal Clinics</b>	Average
Reliability	9.01	9.22	9.12
Answer's capacity	9.05	9.10	9.08
Security	9.32	9.76	9.54
Empathy	9.52	9.33	9.43
Tangibles aspects	8.91	8.74	8.83
Average	9.16	9.23	9.20

# Perception of quality according to methodologies and clinics

When comparing the evaluations of the perception of dental care, according to the method and the clinic of care (Table 7), in the SERVPERF model higher scores were obtained in all the clinics compared

to what was obtained in the Donabedian model, these variations were equal to or less than 1. For example, when comparing the value obtained in the Otay Campus with the SERVPERF model where the perception of quality was 9.16 while in the Donadedian model the value was 8.96, indicating a difference of 0.20. Where

the greatest variability was observed was in clinic 70-76, with a difference in quality perception of 0.29. While the perception of the quality of care in the clinic located in

Florido was almost the same, showing a difference of 0.01 between the two models used in this study.

#### Table 7: Quality perception by SERVPERF model and breakdown of peripheral clinics

	Methodology			
Clínica	SERVPERF	Donabedian		
70-76	9.04	8.75		
CUES	9.17	9.15		
Florido	9.00	8.99		
Obrera	9.31	9.07		
Otay-Tijuana Campus	9.16	8.96		
Source: This chart was made by the author.				

In summary, when globally analyzing the results of both instruments (Table 8) to measure the quality of care in the UABC dental clinics on the Tijuana

Campus, the differences in perception were minimal, demonstrating that the care provided by the university community is of high quality.

	SERVPERF	Donabedian				
Otay-Tijuana Campus	9.16	8.96				
Periphereal Clinics	9.1	8.99				
Total	9.13	8.98				
Source: This chart was made by the author						

#### **Quality classification**

When classifying the quality according to the Donabedian model (Table 9), 53% of the users surveyed perceived the quality of the "Structure" as satisfactory and 45% as excellent. In the "Process" dimension, 88% perceived that it is excellent and only 11.70% mentioned that it is satisfactory, finally in the "Result" dimension, only 10.40% perceived that it was deficient, followed by

27% as satisfactory and 62.60% as excellent. It is worth mentioning the latter as the only one where there were users who considered the result to be deficient, so it is possible that since they are teaching clinics that operate according to the academic periods (semesters), there are treatments that are not concluded in the same period. Academic period established by the university, thus affecting the perception of the care provided to users.

Table 9: Quality p	erception by	v Donabedian	model ac	cording to	quality categories

	Strucuture	Process	Result			
Deficient	1.40%	0%	10.40%			
Satisfying	52.90%	11.70%	27%			
Excellent	45.70%	88.30%	62.60%			
Total	100%	100%	100%			
Source: This chart was made by the author.						

In the SERVPERF model (Table 10) that considers 5 evaluation dimensions, high percentages were obtained with an excellent level for reliability with 57.10%, empathy with 62.70% responsiveness with 60.60% and security with 69.80% being the highest level of all the dimensions evaluated. However, from the users'

perspective, the greatest weakness was found in the tangible aspects with a percentage of 50% at the deficient level, which is related to the infrastructure of the different dental care clinics that have recently been established in renovation and restoration process.

Table 10: (	Juality	perception	ı by SER'	VPERF mode	el according to	quality categories
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	Reliability	Answer's capacity	Security	Empathy	Tangibles aspects
Deficient	0.50%	1%	0.20%	0.20%	50.00%
Satisfying	42.40%	38.90%	30%	37%	38.80%
Excellent	57.10%	60.60%	69.80%	62.70%	11.20%
Total	100%	100%	100%	100%	100%

Source: This chart was made by the author.

# DISCUSSION

Health care includes the actions carried out by the health professional such as dissemination, prevention, recovery, and rehabilitation of health. According to Donabedian, the quality of care is that which provides the user with the greatest and complete well-being after assessing the balance between gain and loss (Rodríguez Vargas, 2018). Therefore, based on what was observed in this study of perception of quality in clinics, this balance can be associated with the large number of patients who come during each academic period for dental care by the students of the Bachelor of Dental Surgeon, always under the supervision of trained professionals committed to the community.

Reports from similar studies indicate that the patient's perception in relation to the quality of the dental service and care provided is good, as well as being satisfied with the treatment received as they feel improvement after it (Coronado-Zarco et al., 2013, Mendoza Morales, 2020), this agrees with the results obtained in this research where the averages obtained to assess the perception of quality, encompassing the structure, processes and results of health, were 8.96 to 8.99 with respect to the Donabedian model and 9.1 to 9.16/10 with the SERVPERF model. These values indicate a good perception by the patient, in contrast to what was reported by Rodríguez Vargas where, according to 71.4% of users, the overall perception of the quality of the dental clinic is perceived as regular and 27.1% perceives it as good (Rodriguez Vargas, 2018).

Regarding the evaluation of quality perception with the Donabedian model in the structure, average values of 8.35 and 9.55 were obtained for the process, resulting higher than the averages reported by López Ramírez et al., in 2021, which obtained 7.95 for structure and 8.17 for process. When analyzing the perception of quality with the SERVPERF model, the average values obtained in this research were higher than those reported in similar studies (Coronado-Zarco et al., 2013), where lower averages were obtained in all the dimensions evaluated. five dimensions (reliability. The responsiveness, security, empathy, and tangible aspects) of the SERVPERF methodology were evaluated as excellent by the majority of patients or users surveyed with percentages greater than 50% except for the tangible aspects, which can be partner with the infrastructure of the different dental care clinics that are recently in the process of renovation and restoration.

The evaluation of the general quality with Donabedian methodology regarding the structure and process shows, in the first instance, a satisfactory perception followed by an excellent perception, coinciding with the findings of López Ramírez *et al.*, who refer to this point as being of great relevance since that according to the Donabedian methodology, the consideration in care of the humanistic aspect allows identifying the degree of patient satisfaction, and as a consequence, the feasibility of patient loyalty with the organization and their adherence to treatment (López Ramírez *et al.*, 2021). There is contrast with other reports, such as the research carried out by Manrique Guzmán *et al.*, where the quality of care was perceived as regular, however, said evaluation was carried out on users who received dental surgery treatment exclusively (Manrique-Guzmán *et al.*, 2018).

Pardave-Pacheco in 2019, when evaluating the quality of dental care with the SERVPERF model in patients from a private University in Lima, reported a greater perception of quality as extremely good in four of the five dimensions, specifically tangible aspects, reliability, responsiveness, security and empathy; The security dimension was perceived as extremely good with 60%, followed by the empathy dimension with 56.80%, these results are similar to those obtained in the present study (Pardave Pacheco & Vasquez Duran, 2020).

This study was carried out only during the 2023-1 academic period, so it is important to consider extending the evaluation time for two or three more periods to determine whether the quality of dental care continues to be well evaluated by the different users. Likewise, the data reported here reveal areas of opportunity on which work can be done, allowing specific goals to be established with short, medium, and long-term application in the clinics of the Degree in Dental Surgeon of the Otay-Tijuana Campus.

## **CONCLUSIONS**

Assessing the quality of care in dental health services is not common, since the efforts are focused on medical areas, therefore knowing the quality of dental care is the first step to knowing the quality of the service and being able to generate plans. improvement to provide better care to all patients.

The quality observed in the two models taken (Donabedian/SERVPERF) do not present significant differences, there is variability, where the Donabedian quality assessment model presents lower values since one of the points valued is the result of the care received. and due to the dynamics of care in the clinics where many of the procedures take several weeks, the result, since it is not tangible for the patients, received a lower rating. Despite this variability, there are no results that can lead to there being a poor quality of care in clinics.

Clinics 70-76 and Florido are the ones that present a lower appreciation of quality, in both models. This could be linked to the perception of the infrastructure itself since clinic 70-76 is among the oldest., in creation, infrastructure and equipment. In this way, it is concluded that these parameters are important and directly affect the assessment of the quality of care; on the other hand, clinics with better equipment or better accessibility have better ratings. Other aspects such as waiting times to receive care, to obtain an appointment and the empathy with which care is provided, are strengths of the dental clinics of the Autonomous University of Baja California Campus Otay-Tijuana. Among the areas of opportunity identified from this research are streamlining payment systems, modernizing appointment systems, improving accessibility to each clinic, and mainly reducing the time in which treatments are completed, considering all of this could generate a positive impact on care processes and a greater influx of patients.

The Autonomous University of Baja California, in the state, is a pillar in scientific development, creating professionals with the highest quality standards, but it is also worth emphasizing that in addition to its role in training, it provides general and specialty dental care services at affordable prices. accessible and of high quality to the entire population, in this way our university manages to partially remedy the saturation of dental health services provided by the Ministry of Health and the Mexican Institute of Social Security.

# REFERENCES

- Akdere, M., Top, M., & Tekingündüz, S. (n.d.). Examining patient perceptions of service quality in Turkish hospitals: The SERVPERF model. Total quality management & business excellence, 31, 3-4.
- Byrne, M.H.V., Tickle, M., Glenny, A., Campbell, S., Goodwin, T., & O'Malley, L. (2019). A systematic review of quality measures used in primary care dentistry. *International Dental Journal*, 69(4), 252-264.
- Coronado-Zarco, R., Cruz-Medina, E., Macías Hernández, S., Arellano Hernández, A., & Nava Bringas, T. (2013). The current context of health quality and its indicators. *Mexican Journal of Physical Medicine and Rehabilitation*, 25(1), 26-33.
- Da Rosa, S., Moysés, S., Theis, L., Soares, R., Moysés, S., Werneck, R., & Rocha, J. (2020). Barriers in Access to Dental Services Hindering the Treatment of People with Disabilities: A Systematic Review. International Journal of Dentistry.
- Donabedian, A. (1966). Evaluating the quality of medical care. *The Milbank memorial fund quarterly*, 44(3), 166-206.
- Fortich-Mesa, N., & Díaz-Narváez, V. (2018). Empathic attitude in dental students of the Rafael Núñez University Corporation in the city of Cartagena. *Rev Cienc Salud*, *16*(1), 129-143.
- Hui, Z., Wei-Min, M., Jing-Jing, Z., Li, W., Zhen-Jie, G., & Xiang-Tang, C. (2023). How to adjust the expected waiting time to improve patient's

satisfaction? BMC Health Services Research, 23. https://doi.org/10.1186/s12913-023-09385-9

- Institute of Medicine (US). (1990). Medicare A Strategy for Quality Assurance (Vol. 1). Kathleen N. Lohr. 10.17226/1547
- López Ramírez, E., Sifuentes Valenzuela, M., Lucero Rodríguez, R., Aguilar, S., & Perea González, G. (2021, December). Evaluation of the quality of service in the clinics of the BUAP Degree in Stomatology: SERVPERF and Donabedian methodologies. Entreciencias, 9(23), 1-23. https://doi.org/10.2307/3348969
- Luo, J.Y.N., Liu, P.P., & Wong, M. (2018). Patients' satisfaction with dental care: a qualitative study to develop a satisfaction instrument. BMC Oral Health, 18, 1.
- Luxford, K. (2012). What does the patient know about quality? International Journal for Quality in Health Care, 24(5), 439-440.
- Manrique-Guzmán, J., Manrique-Chávez, C., Chávez-Reátegui Beatriz del, C., & Manrique-Chávez, J. (2018). Technical and perceived quality of the dental operative service in a teaching dental clinic. *Rev Estomatol Herediana*, 28(3), 185-194.
- Mendoza Morales, F. (2020). Patient perception of the quality of dental care. *Vive health magazine*, *3*(7), 35-43.
- Obadan-Udoh, E., Calvo, J., Panwar, S., Simmons, K., White, J., Walji, M., & Kalenderian, E. (2019). Unintended consequences and challenges of quality measurements in dentistry. *BMC Oral Health*, (19), 1. https://doi.org/10.1186/s12903-019-0726-4
- WHO. (2020). Provision of quality health services. World Health Organization (WHO). Retrieved August 24, 2023, from https://apps.who.int/iris/rest/bitstreams/1335351/ret rieve
- WHO. (2022, October 2). -Youtube. Retrieved August 24, 2023, from https://www.who.int/publications/i/item/whoglobal-disability-action-plan-2014-20.
- Pardave Pacheco, S., & Vasquez Duran, T. (2020). Quality of care in the dentistry service in patients at the University Health Center of a private university in Lima during 2019. Peru: Peruvian University of Applied Sciences UPC, 28.
- Righolt, A., Sidorenkov, G., Faggion, C. M., Listl, S., & Duijster, D. (2018). Quality measures for dental care: A systematic review. Community Dentistry and Oral Epidemiology, 47(1), 12-23.
- Rodríguez Vargas, M. (2018). Factors that influence the perception of quality of external users of a university dental clinic. *Alas Peruanas Scientific Magazine*, 4(1), 15.

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