EXECUTIVE SUMMARY

OF

PH.D. THESIS ENTITLED

"A STUDY ON MEASURING THE PERCEPTION FOR SELECTED HEALTH CARE SERVICES PROVIDED BY PRIMARY HEALTH CARE CENTERS (PHCs) IN SELECTED VILLAGES OF THE VADODARA DISTRICT"

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BY

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RESEARCH GUIDE

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EXECUTIVE SUMMARY

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A STUDY ON MEASURING THE PERCEPTION FOR SELECTED HEALTH CARE SERVICES PROVIDED BY PRIMARY HEALTH CARE CENTERS (PHCS) IN SELECTED VILLAGES OF THE VADODARA DISTRICT

1.0: INTRODUCTION:

The healthcare sector in India has been facing challenges for a long time, including in Gujarat; the Government has been making efforts to improve the healthcare infrastructure by increasing the number of Primary Health Centres (PHCs) and sub-health centres. The Government also focuses on providing better training and resources for healthcare workers. However, there are still challenges, including a shortage of doctors and nurses, particularly in rural areas. The Government of India has launched several initiatives to improve the healthcare sector, such as the Ayushman Bharat Scheme, to provide health insurance coverage to millions of people. In addition, the National Health Mission aims to improve healthcare infrastructure and provide universal access to healthcare services. Primary Healthcare Centres (PHCs) remain an essential component of the healthcare system in India. PHCs are the first point of contact for users seeking medical attention and provide primary healthcare services to the local community. However, there are still significant challenges in the primary healthcare sector, including a shortage of doctors and other healthcare workers in rural areas, inadequate Infrastructure and equipment, and limited financial resources. These challenges have been further aggravated by COVID-19, which has significantly strained the healthcare system. To address these challenges, the Government of India has been increasing healthcare sector funding, promoting technology to improve healthcare delivery, and incentivizing healthcare professionals to work in rural areas. It has also been working to strengthen the healthcare supply chain, including improving the availability of essential medicines and vaccines.

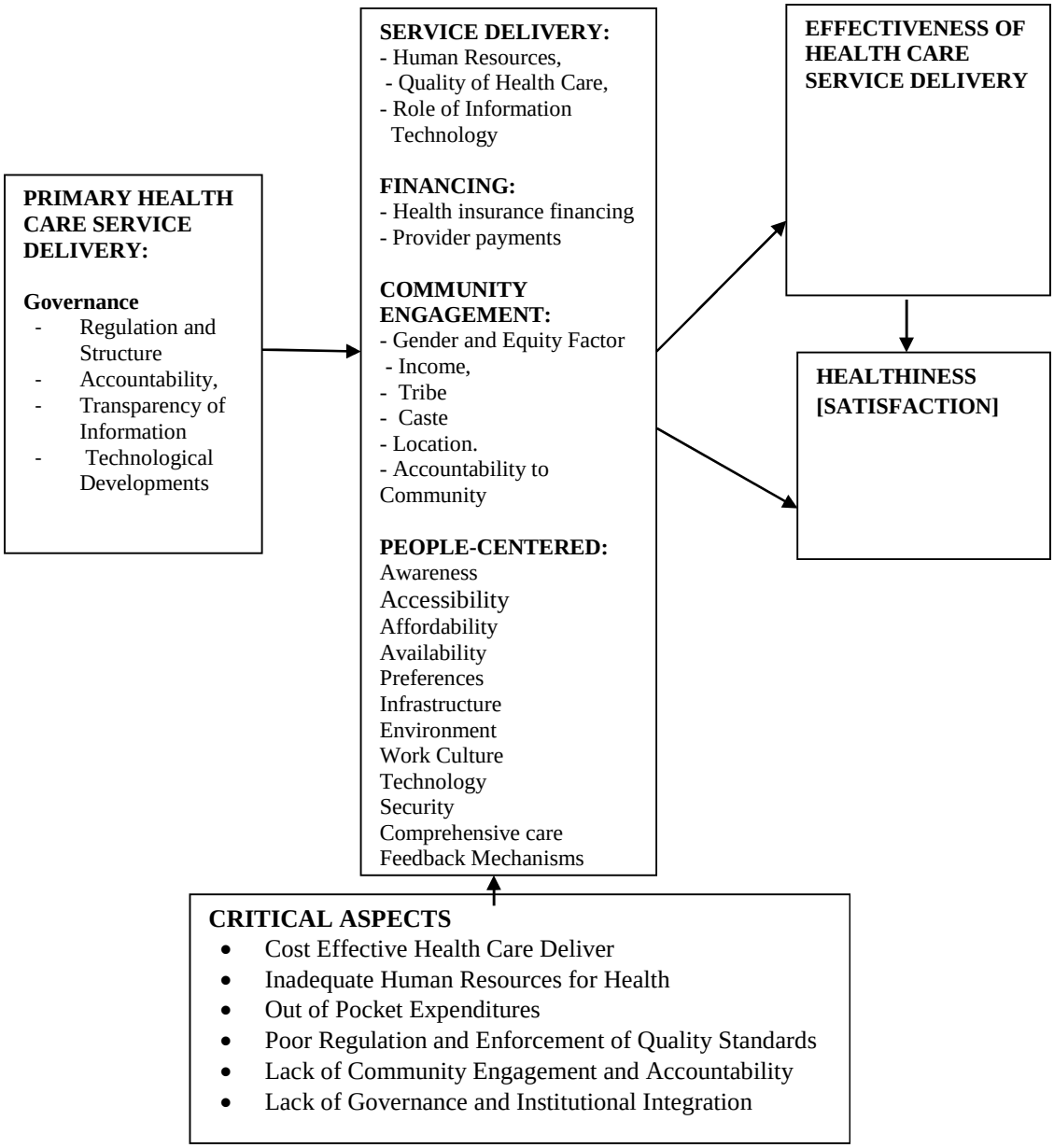
2.0: A BRIEF ABOUT THE RESEARCH STUDY:

This empirical research study aimed to investigate how the users perceive different services provided by the PHCs and how they might contribute to developing healthcare services. This research study's purpose and critical objective were to interpret, analyze, and evaluate the influence of selected factors Accessibility, Affordability, Availability, Environment, Work Culture, Community Engagement, Infrastructure, Service Delivery, Perception of the Use of PHCs and Preferences for PHCs. It aimed to measure users' perception of the healthcare services provided by the PHCs and their views and plans for using PHCs services in selected villages of the Vadodara District of Gujarat State.

3.0: CONCEPTUAL MODEL DEVELOPED AND USED IN THIS RESEARCH STUDY:

The review of the relevant past research served as the basis for the development of the research model.

Figure No.: ES. 1.0: The Conceptual Model of the Research Study



Source: Model of Research Study Adapted from Priya Anant et. al.2016.

Based on the above model, an attempt was made in this research study to empirically study and examine the relationship between Primary Health Care Services, the Selected Service Quality Criteria and the Effectiveness of Health Care Service Delivery on health and healthiness.

4.0: A BRIEF ABOUT THE RESEARCH METHODOLOGY:

This empirical research study aimed to investigate how the users perceive different services provided by the PHCs and how they might contribute to developing healthcare services. This research study's purpose and critical objective were to interpret, analyze, and evaluate the influence of selected factors Accessibility, Affordability, Availability, Environment, Work Culture, Community Engagement, Infrastructure, Service Delivery, Perception of the Use of PHCs and Preferences for PHCs. It aimed to measure users' perception of the healthcare services provided by the PHCs and their views and plans for using PHCs services in selected villages of the Vadodara District of Gujarat State.

Table Number: ES-1.0:
A Brief Factual Profile of the Research Study

Bibliography	
Number of Books Referred	15
Number of Research Journals, Thesis & Dissertations Referred	140
Number of Research Reports, Conference Proceedings Referred	20
Number of Websites Accessed	60
Name of Search Engines Used	Google Scholar
Name of Statistical Tools Applied	Frequency Distribution, Percentages, Mean, Proportion, Correlation, Chi- square Test, T-test, Friedman Test, Factor Analysis & Partial Least Square Structural Equation Modeling (PLS-SEM)
Sources of Secondary Data Used	Reference Book, Journals, Newspaper articles, Ph.D. Thesis, Master Dissertation, Working paper, Conference proceeding, Websites
Group of Hypotheses Tested	13
Research Design Used	Exploratory and Descriptive research design
Research Instrument Used	Structured Non-Disguised questionnaire
Sampling Decisions	
A Representative Sample	Primary Health Care Centers (PHCs) Users
Sampling Design	Non-Probability Sampling Design
Sampling Method	Convenient Sampling Method
Sampling Frame	The sampling frame includes those users of the PHCs by referring PHCs records of patients and using data released by the Gujarat State Government and data obtained from the Gram-Panchayat office, Sarpanch, and different local organizations.
Sample Size	650 participants who have used the services of rural PHCs have been selected as the sample.
Sampling Media	Structured Non-Disguised Questionnaire filled up through personal interviews with the PHCs Users
Details of Model	Service Quality Model
Number of Tables in Ph.D. Thesis	106
Number of Graphs in Ph.D Thesis	23
Number of Figures in Ph.D Thesis	28

The key objective of this research study was to determine how users in this research study, perceived specific health services as provided to them by Primary Health Care Centres (PHCs) in selected villages located in the Vadodara District of the Gujarat State.

The researcher developed the structured, non-disguised questionnaire with input from a review of the existing literature, and it was tested with information from users.

The researcher has used the Cronbach coefficient alpha to evaluate the Reliability of different instrument constructs. The Cronbach Alpha score (Cronbach, 1991) demonstrated the inner consistency of the measure and represented the level of coherence among the chosen questions. The value of the users' opinions of rural Primary Health Centers (PHC) ranged from 0.764 to 0.895.

The researcher established the validity of the scale mean scores by comparing them to another questionnaire construct.

There was less variance in the specified question categories and a similar average satisfaction level. In addition, most responses were determined to be between Agree and Strongly Agree, satisfying the validity requirement.

Normality tests were performed on data from 650 people who had used healthcare services in several localities in the Vadodara District of Gujarat State.

The Kolmogorov-Smirnov test was used to check for statistical significance since the sample size was more than 100.

It displays the test results, which showed statistical significance at the 5% level. This indicated that the raw data did not follow a normal distribution.

In contrast, primary data were collected from a cross-section of users comprising of diverse age groups, professions, occupations, and Gender etc. who had availed Health Care Services as delivered to them by the Selected PHCs functioning in the Villages of the Vadodara District of the Gujarat State.

A sample of 650 respondents who use the services offered by rural PHCs was drawn for this purpose.

The researcher has conducted research keeping in mind the rural population from selected rural areas/villages of the Vadodara district in Gujarat. The researcher has provided a demographic as well as quantitative data profile in terms of Qualifications, Age and Monthly Income as follows:

Table No: ES 2.0: Demographic Profile of the Respondents:

Parameters		Responses	Percentage
Age (In Years)	Below 30 Years	141	21.7
	31 to 50 Years	335	51.5
	50 Years and Above	174	26.8
	Total	**650**	**100**
Gender	Male	547	84.2
	Female	103	15.8
	Total	**650**	**100**
Educational Qualifications	No Formal Education	83	12.8
	Primary	184	28.3
	12^{th} Pass	224	34.5
	Graduation	131	20.2
	Post-Graduation	28	4.3
	Total	**650**	**100**
Occupation	Farmer	260	40
	Trader	97	14.9
	Home Maker/House Wife	93	14.3
	Student	49	7.5
	Service	151	23.2
	Total	**650**	**100**
Monthly Family Income	Below Rs. 10,000	199	30.6
	Rs. 10,001 to Rs. 20,000	199	30.6
	Rs. 20,001 to Rs. 30,000	105	16.2
	Rs. 30,001 and Above	147	22.6
	Total	**650**	**100**

Source: Field Work

Considering Occupation, Mix responses were received from people of different professions. Half of the total users were in the age group of 31 to 50 years of male users or users, 84.2 per cent used rural Primary Health Centers (PHCs), and more than Female users, 15.8 per cent. Considering Education, it has been observed that 28.3 per cent of users possess only Primary Education, 12.8 per cent of users have no Formal Education, and 34.5 per cent of users have qualified HSC. Meanwhile, 20.2 per cent possess a Graduation degree, and only a handful of users possess a post-graduation, Degree.

Traders and Students were minimum in numbers. Regarding occupation, 40 per cent were farmers, followed by Service-Going People at 23.2 per cent, and 14.3 per cent were Homemakers/Housewives. Most users, i.e. 61.2 per cent, had a Monthly Family Income of Less than Rs. 20,000.

The primary objective of this research study was to understand how users, including patients, perceive specific health services provided by Primary Health Care Centres (PHCs) in selected villages in the Vadodara District of Gujarat State. Several methodological and practical processes and conceptual facets of the exploratory and descriptive research methodology have been applied in this research study. It mainly includes viz., Basic Terms and Rationale of the research study, Research Design of the research study, Scope and Coverage of the research study, Objectives, Research Questions and Hypotheses of the research study, Conceptual Model developed in this research study, Sources of Secondary Data, Sampling Decisions, Collection of the Primary Data and its Analysis, and

Interpretations, Recommendations and Suggestions of the research study of primary data. The researcher has offered justification, method, and process utilized to estimate and calculate a suitable sample size for this research study. It also contains information on the scale used, the number of statements/items generated, and the process followed in reviewing literature for drafting the Structured Questionnaire. It has provided data and information on the 'Reliability and Validity 'of the Structured Questionnaire for collecting primary data from users. It details the Normality Test performed on the research study's preliminary data to characterize its distribution. The researcher provided information on the statistical methods used to analyze the primary data. It has also offered a chapterisation of the Ph.D. Thesis.

A non-probability sample methodology was employed to conveniently choose 650 PHCs Users who lived in the different villages of the Vadodara district of Gujarat State to collect the primary data using a structured, non-disguised questionnaire.

The researcher used secondary and primary data to conduct the study. The data analysis was done with SPSS 21 software. In addition, the researcher applied Factor Analysis (FA) and the PLS-SEM to analyze and examine the relationships between Satisfaction, which influences their Behavioural Intention when considering Selected Factors of PHCs, viz., 'Accessibility, Affordability, Availability, Environment, Infrastructure, Work Culture, Service Delivery, Perception, Preferences, and Community Engagement'.

It was evident that Service Delivery, Financing, Community Engagement, and Patients Centered Health Care Services Delivery are significant characteristics that impact the delivery of Health Care Services. In addition, Human Resources, Care Quality, and Information Technology (IT) contributions are crucial in providing Health Care Services.

The delivery of Health Care Services needs consideration of equity factors for Gender and No discrimination based on Income, Caste, Location, and Accountability to the community. Patient-centric service delivery of Health Care Services needs attention to improving user awareness, Accessibility, Affordability, Preferences, Infrastructure, Environment, Work Culture, Use of Technology Security, Comprehensive Care, and Feedback Mechanism, respectively.

5.0: KEY FINDINGS AND IMPLICATIONS OF THE RESEARCH STUDY:

The researcher has attempted to offer findings of applications of various statistical tools and techniques that were used to infer findings to bring out meaningful applications of this research study.

Table Number ES-3.0 shows the formulated hypotheses, findings, and implications of this research study.

Table No: ES 3.0:
Summary of the Research Study's Hypotheses, findings, Conclusions, and Implications.

Testing of Hypotheses	**Summarised Findings of the Research Study**	**Implications of the Research Study**
H1: Accessibility, Affordability, Availability, Environment, Infrastructure Facilities, Work Culture, Service Delivery, Community Engagement, Perception for the use of PHC services, and preference for PHC has a significant relationship with the intention of the users of PHCs to continue to use medical services offered by PHCs.	Low degree of positive correlation between the Accessibility, Affordability, Availability, Environment, Infrastructure Facilities, Work Culture, Service Delivery, Community Engagement, and Perception of the use of PHC services. Preference for PHCs to continue and use medical services offered by PHCs.	All ten factors showed a statistically significant positive correlation with continuing to use PHC Services. It implies that these selected factors are essential for a repeat usage of PHC services.
2)H1: Accessibility, Affordability, Availability, Environment, Infrastructure Facilities, Work Culture, Service Delivery, Community Engagement, Perception for the use of PHC services, and preference for PHC has a significant relationship with the intention to recommend the use of PHCs healthcare services to others.	Low degree of positive correlation between Accessibility, Affordability, Availability, Environment, Infrastructure Facilities, Work Culture, Service Delivery, and Community Engagement. Perception of the use of PHC services and preference for PHC to recommend PHC healthcare services to others.	All ten factors showed a statistically significant positive correlation with the idea of recommending the use of PHC healthcare services to others. It implies that the factors under study are equally important to strengthen the Intention of PHC Service users to recommend PHC Services to others.
3)H1: Accessibility, Affordability, Availability, Environment, Infrastructure Facilities, Work Culture, Service Delivery, Community Engagement, Perception for the use of PHC services, and preference for PHC have a significant relationship with overall satisfaction with PHC services.	A moderate degree of positive correlation between Accessibility, Affordability, Availability, Environment, Infrastructure Facilities, Work Culture, Service Delivery, Community Engagement, and Perception of the use of PHC services. Preference for PHC to overall health and Satisfaction with PHCs services.	All ten factors showed a statistically significant positive correlation, suggesting that these factors offer the utmost Satisfaction for users of PHC Services. Therefore, it implies that these selected factors are essential for Satisfaction for users of PHC Services.

Testing of Hypotheses	Summarised Findings of the Research Study	Implications of the Research Study
4)H1: There is a significant relationship between Gender, Age, Education, Occupation, And Monthly Income Vis-À-Vis Selected Criteria of the Accessibility factor.	The study failed to accept the hypothesis for the other 35 instances as no significant association was found between the demographic variables and the statements identifying the variable 'Accessibility' under the study.	The chi-square test of independence provides insights into the association between different demographic variables and factors related to the Accessibility of PHCs services. The results suggest that some elements may be significantly associated with Accessibility while others may not. These findings can inform policy decisions and interventions to improve Accessibility to PHCs services. The study shows that monthly Income is an essential factor affecting Accessibility. Gender and occupation were not significant factors concerning Accessibility, which may indicate that accessibility issues are not specific to particular gender or occupational groups. Age and education were found to have limited associations with Accessibility, which may warrant further investigation to identify any potential patterns or issues.
5)H1: There is a significant relationship between gender, age, education, occupation, and monthly income vis-à-vis selected criteria of the Affordability factor.	The study failed to accept the hypothesis for the other 20 instances as no significant association was found between the demographic variables and the statements identifying the variable 'Affordability' under the study.	The study suggests that monthly Income is an essential factor affecting Affordability. Education was not associated with Affordability, which may indicate that Affordability issues are not specific to certain educational levels. Age, occupation, and Gender were not significant factors in Affordability, suggesting that Affordability issues are more evenly distributed across different demographic groups.
6)H1: There is a significant relationship between Gender, Age, Education, Occupation, and Monthly Income Vis-À-Vis Selected Criteria of the Availability factor.	The study failed to accept the hypothesis for the other 37 cases as no significant association was found between the demographic variables and the statements identifying the variable 'Availability' under the study.	The study suggests that multiple demographic factors may influence Availability outcomes. The fact that Gender, Age, occupation, and monthly Income were each associated with Availability indicates that Availability issues are not specific to particular demographic groups. In addition, the study highlights the importance of education as a factor influencing Availability outcomes, suggesting that efforts to improve Availability should consider educational levels.

Testing of Hypotheses	Summarised Findings of the Research Study	Implications of the Research Study
7)H1: There is a significant relationship between Gender, Age, Education, Occupation, and Monthly Income Vis-À-Vis Selected criteria of the Environment factor.	The study failed to accept the hypothesis for the other 36 cases as no significant association was found between the demographic variables and the statements identifying the variable 'Environment' under the study.	These findings imply that education plays an essential role in shaping Attitudes and Perceptions related to the Environment. Therefore, educational programs should be implemented to increase awareness and promote Environmental responsibility among the general population.
8)H1: There is a significant relationship between gender, Gender, Age, Education, Occupation, and Monthly Income Vis-À-Vis Selected criteria of the Infrastructure (Physical Facilities) factor.	The study failed to accept the hypothesis for the other 44 cases as no significant association was found between the demographic variables and the statements identifying the variable 'Infrastructure' under the study.	Overall, there are relatively few significant associations between Infrastructure criteria and Demographic Factors. It suggests that infrastructure-related perceptions and preferences may be similar across different demographic groups, at least in the study context. Some Infrastructure criteria significantly associated with Demographic Factors include the Age factor, which provides for Water leakages in rooms of PHC, drinking water facilities at PHC, toilet facilities at PHC, and availability of beds for users at PHC. In Education variable includes the doors and windows of PHC are in good condition, drinking water facilities at PHC, toilet facilities at PHC, and availability of beds for users at PHC. The monthly income variable includes Drinking Water at PHC toilet facilities at PHC. These results suggest that certain infrastructure criteria may be more important to specific demographic groups and that addressing them may improve their Satisfaction and perception of the PHCs.
9)H1: There is a significant relationship between Gender, Age, Education, Occupation, and Monthly Income Vis-À-Vis Selected criteria of the Work Culture factor.	The study failed to accept the hypothesis for the other 32 cases as no significant association was found between the demographic variables and the statements identifying the variable' work culture' under the study.	Several implications can be drawn about Doctors' and Para-medical Staff's work culture. The Doctors are more likely to explain illness and positively approach users. It also suggests that they tend to take their users into confidence while testing, which shows the importance of gaining trust in their work. On the other hand, it also reveals that the para-medical Staff are more likely to be polite and answer the queries of users, indicating a higher level of service they provide. It also suggests they can listen to patient suggestions more easily.

Testing of Hypotheses	Summarised Findings of the Research Study	Implications of the Research Study
10)H1: There is a significant relationship between gender, Gender, Age, Education, Occupation, and Monthly Income Vis-À-Vis Selected criteria of the Service Delivery factor.	The study failed to accept the hypothesis for the other 40 cases as no significant association was found between the Demographic variables and the statements identifying the variable' Service Delivery' under the study.	Under Service Delivery, Age and Education seem to significantly impact patient Satisfaction with PHC services, as these variables have the highest number of significant 'P' values across the criteria. Any Age with any Education can have the basic Health facilities provided by the Primary Health Centres. Gender, Occupation, and Monthly Income have a relatively lower impact on patient satisfaction, as indicated by the lower number of significant 'P' values for these variables across the criteria.
11)H1: There is a significant relationship between Gender, Age, Education, Occupation, and Monthly Income Vis-À-Vis Selected criteria of the Community Engagement factor.	The study failed to accept the hypothesis for the other 55 cases as no significant association was found between the demographic variables and the statements identifying the variable 'Community Engagement' under the study.	The Demographic variable with the highest impact on Community Engagement was Age, with significant associations found. It suggests that period could be essential when designing Community Engagement initiatives.
12)H1: There is a significant relationship between Gender, Age, Education, Occupation, and Monthly Income Vis-À-Vis Selected criteria of the 'Perception for using PHC Services' factor.	The study failed to accept the hypothesis for the other 58 cases as no significant association was found between the demographic variables and the statements identifying the variable 'Perception for the use of PHC Services' under the study.	Healthcare providers can use the users data to develop targeted strategies to enhance the Perception of PHC services among specific Demographic groups. Moreover, these results can inform policy decisions related to healthcare financing and resource allocation. For instance, policymakers may consider targeting Healthcare resources to improve PHC services in areas with significant associations.
13)H1: There is a significant relationship between Gender, Age, Education, Occupation, and Monthly Income Vis-À-Vis Selected Preference criteria for the PHC factor.	The study failed to accept the hypothesis for the other 46 cases as no significant association was found between the demographic variables and the statements identifying the variable 'Preference for PHC' under the study.	For preference for PHC, Demographic variables may not be essential in determining an individual's choice. Other factors, such as Accessibility, Quality of Care, and Personal Experiences with Healthcare, may play a more significant role in shaping one's preference for PHC.

Table No: ES 4.0:
Summary of the Research Study's Objectives, findings, Conclusions, and Implications.

Objectives of Research Study	Test Applied for Objectives	Findings and Implications of the Research Study
To measure the awareness of those users who had availed health care services and had also used the facilities provided at Primary Health Care Centers (PHCs).	Frequency Distribution (Descriptive Statistics have been used.	Out of the total respondents 650, 185 agreed that they have the Primary Health Centers (PHCs) facility in their Village, and 465 respondents accepted that there were non-availability Primary Health Centers (PHCs) in their respective villages. It is implied that some rural regions do not receive primary health centres. Also, it is implicit that some of the population within this area are unaware of rural PHCs. This data will be specimen information for the policymakers to implement health-related policies and schemes in the rural areas of the Vadodara district of Gujarat State.
To Study and understand the influences of selected demographic variables on the acceptability of the Health Care Services as delivered by the selected PHCs functioning in the villages of the Vadodara District of Gujarat State.	Frequency Distribution (Descriptive Statistics), and Chi-Square, have been used.	Demographic variables, such as Age, Education, Monthly Income, Gender, and Occupation, have different levels of association with PHC services, including Accessibility, Affordability, Availability, Infrastructure, Users of PHC Services, Satisfaction, and Community Engagement. For example, Monthly Income is an essential factor affecting the Accessibility and Affordability of PHC Services, while Education is vital for availability outcomes. Age significantly impacts users of PHC Services satisfaction and could be critical when designing Community Engagement initiatives. Infrastructure-Related Perceptions and Preferences may be relatively similar across different demographic groups, although certain infrastructure criteria may be more important to specific demographic groups. The Demographic variable with the highest impact on Community Engagement was Age, with significant associations found. It suggests that period could be essential when designing Community Engagement initiatives.
To assess the Primary Health Care Services offered by the Government through Primary Health Care Centers(PHCs) in chosen villages from Vadodara District of Gujarat State.	Factor Analysis have been used by the researcher to understand and determine the underlying criteria that decide the significance of respective factor in assessing the users response based on factor loadings score for each criteria.	Based on the factor analysis, Accessbility, Community Engagement, Service Delivery, Perception for use of PHCs and Preference for PHCs are the factors where there is needs of improvement.

To study and analyse the (4 A's) Availability, Acceptability, Affordability, and Accessibility of the Health Care Services as well as Awareness, Environment, Infrastructure, Work Culture, Service Delivery, Community Engagement, Perception of the use of PHC Services, and Preference for PHC by patients or users vis-à-vis Health Care Services as delivered by the Selected PHCs functioning in the Villages of the Vadodara District of the Gujarat State.	Frequency Distribution, Chi Square, Correlation, Friedman Rank Test, Factor Analysis and SEM through PLS have been used to analyse the 4 A's (Availability, Acceptability, Affordability and Accessibility of the Health Care Services as delivered by the selected PHCs	Perception of the use of PHC services, stands out as the top most evaluated parameter. This position was followed by the criterion of Preference for PHC, which emphasizes more preferences were given to PHCs for healthcare facilities. The factors like Work Culture, Affordability, and Accessibility had a relatively lower impact on the respondents' perceptions. It indicates that healthcare service providers and policymakers should focus on enhancing the Quality of Services, Community Engagement, and Availability of Resources to improve the perception of PHCs.

6.0: CONCLUDING REMARKS OF THE RESEARCH STUDY:

The world has committed to an ambitious development agenda to enhance the health and well-being of all people via the UN's Sustainable Development Goals (SDGs). It is time for the international community to move boldly in that direction forty years after the Declaration of Alma-Ata, armed with evidence and motivated by the new global commitment. The SDGs and Universal Health Care (UHC) must be accomplished with a new primary health care strategy. The moment is opportune, but progress will take guts and tenacity. Never before has the world been more ready for success. Primary care is a critical component of healthcare delivery in rural areas. As a result, the research examined several variables that affect primary healthcare facilities' effectiveness. The provision of infrastructural facilities, community engagement, and coordination with PHCs are all factors that affect how well direct healthcare services are delivered. The research made an effort to pinpoint the variables affecting the provision of healthcare in rural regions. It concluded that the Vadodara district of Gujarat State's rural areas lacks efficient primary healthcare delivery services. Chi-square, factor analysis, correlation analysis tests, and regression utilising SEM have all been used to evaluate various hypotheses. The conclusion that primary health centres are believed to provide higher-quality healthcare services than community health centres was astounding. The main issues cited at PHCs were a lack of physicians and medical equipment, poor clinical examinations, and subpar medication quality.

How rapidly a government scheme may adapt may depend on the scale of the healthcare sector, whether it is government payer, private, or multi-tiered, as well as the market's level of maturity. Transformation happens more slowly in the UK, where the country is now centralising and simplifying its healthcare systems. Imagine turning a huge ocean ship. Yet in developing nations like India, where many start-up businesses are using technology to close the access to care gap for millions of clients living outside of cities, change may happen quickly.

Healthcare organisations worldwide will continue to encounter difficulties in providing better care for the people they serve, emphasising preventative measures, greater access, a personalised approach, higher quality, and results while being more effective and efficient. The use of data and technology will be essential to overcoming these obstacles. The challenge will be to combine intelligent data that can reveal how to suit each population's cultural and geographic demands with technology such as artificial intelligence and medical equipment. Technology will also make clinical research more accessible and inclusive. However, healthcare organisations must acknowledge that users' confidence in their doctors and hospitals to protect their personal health information has diminished. Therefore, they should take further precautions to safeguard the data and the way it is transmitted. Last but not least, healthcare organisations need to widen the concept of health to take into account social factors that influence the well-being of their communities.

To leverage the cost perspective of the PHC in the country, the Government to take bold decisions considering the trends that are impacting the delivery and financing of healthcare are viz., Demographic shifts and social change; Shifts in global economic power, Technological advances; and The empowered consumers. Such consideration by the Government result in emergence of new business models for healthcare services; a greater focus on reward for outcomes instead of volume of activity in healthcare; new entrants expanding and reshaping the health system; a shifts towards better healthcare services to rural population. and rebalancing of the participation of the public and private sectors in the financing and delivery.

One topic that has generated the most heated discussion worldwide is the expense of medical care, or, more specifically, the amount of money a country has to spend to provide its population access to medical treatment. It is crucial to consider how one might characterise this paradigm: Is access to medical care a right people can demand from the state, or does each person bear the responsibility for their well-being? On the other hand, there is a widespread agreement that the expansion of even the healthiest economies is at risk of being derailed if not at least one type of universal health coverage is made accessible. Access to preventative, promotive, and curative care of a quality high enough to be effective should be included in the range. It should be guaranteed that individuals will not go bankrupt due to their medical expenses. shows the overall opinion of behavioural intention towards PHCs of the Vadodara district of Gujarat State. Likewise, 46.5% of those polled strongly agreed, while 45.4% agreed, that they would keep using PHCs in the future. In addition, 54.6% of respondents strongly agreed, and 45.4% agreed, that they would suggest the PHCs of chosen villages in the Vadodara district of the Gujarat State to those in need of healthcare. The "New Indian Healthcare Ecosystem" will redefine the healthcare delivery and products space by introducing low-cost hospitals and speciality clinics, medical devices that cost a fraction of the price of imported machines, mobile technologies that address primary healthcare needs, and quality healthcare that is both affordable and accessible. These inventions not only meet the demands of India, but they also have the potential to be duplicated across the underdeveloped globe, where the majority of problems are similar to those that our nation faces.

Some of the disruptive trends that the Indian health economy is currently experiencing include an increase in patient consumerism, an expansion of the continuum of care, a shift towards quality-based care, an increase in patient participation, the use of technology in the delivery of care, and an increase in insurance penetration. For relevant stakeholders to be successful in the "New Indian Health Economy," they will need to redefine themselves and reorganise themselves following these trends and turbulent events, as well as adopt new components of people, processes, and technology into their business models. This will allow them to capitalise on the opportunity presented by the implementation of NHM. Hence, changes are needed for Primary Health Care Centers in infrastructure, work culture, and community participation to achieve India's long-term goal of sustainable development and a healthy population.

7.0: OVERALL RECOMMENDATIONS AND SUGGESTIONS OF THE RESEARCH STUDY:

- It can be suggested to policymakers that the number of PHCs can be increased as it was found in the study that many of the rural locations lack the medical services provided by the PHCs. The PHCs should provide continued assistance to the rural population as they may take some years to fully develop economically and have the Affordability to take high-charge services from the private players. Suppose the medical standards are to be brought to a pedestal in a country like India. In that case, PHCs can only get a positive difference on the statistics analysed by World Health Organization. One recommendation can be made that PHCs should be subsidized to a level and Infrastructure to be developed at a story from which even the advanced stage treatments can be given to the needy. It is recommended that PHCs should strongly support the idea of having a 'health Mitra volunteer scheme' for smooth functioning and hassle-free environment. NGOs that perform street plays and can make other demonstrations can be associated with awareness programs and other educational purposes. Specific training can be given to the para-medical Staff for appropriate communication without sounding authoritative to the visitors and users.
- It can be suggested that the policymakers may employ specific publicity campaigns where the population may not have to recommend the being of PHCs. However, PHCs should be a part of everyday rural life. Instead of people recommending PHCs should make sure that people know about them. Also, specific strategic locations such as Bus Stands, Village Entry, Bridge Walls, Public gathering places, School Walls etc., may be used for publicity and awareness about the PHCs. It can also be suggested that PHCs should not just waste their time and energy on advertising at the cost of their services.
- One firm suggestion is that all the PHCs should have a 'PHC Mitra volunteer scheme' that takes over the PHCs and the visitors in terms of recommending and campaigning about the services offered by the PHCs. The volunteers under such a scheme can be incentivized with other benefits. Also, the PHCs should adopt the online platform for better transparency in terms of working and cash flow dynamics.

Furthermore, the PHCs should emphasize educating the rural communities about their rights vis-à-vis the PHC services. Also, it can be suggested that the PHC staff members should be given handsome salaries, festival bonuses and comfortable accommodations which do not let them adopt corrupt or other malpractices. However, all of this is subject to discussion and implementation.

8.0: LIMITATIONS OF THE RESEARCH STUDIES

- The received data resulted in inaccurate and erroneous data information, analysis, and research study outcomes.
- With the first-hand data and information from rural communities, it was incorrect to generalize that it was accurate and applied to Gujarat State's entire population.
- The research was primarily conducted in selected villages in the Vadodara District. Therefore, this study did not intend to provide a comprehensive picture of all Gujarat State's village healthcare service customers.
- The research study's conclusions suffered from constraints such as a small sample size and the use of a convenience sampling method.
- The findings of the research study may not have been generalized
- It was not easy to obtain basic information on healthcare service users because they were dynamic and constantly fluctuated over time.
- Results were influenced since the research study's time limit and funding was constrained.
- The skewed viewpoint of healthcare service users may not have conveyed honest and accurate facts.
- The various model viewpoints of experts may have varied in this regard.

9.0: DIRECTION FOR FUTURE RESEARCH STUDY:

In order to gain a more comprehensive understanding of the perception, behavioural intention, and future usage of healthcare services throughout India, it may be beneficial for future researchers to conduct studies on healthcare service stakeholders in other districts of Gujarat as well as in other states of India. By expanding the scope of the research beyond the Vadodara District, researchers may be able to obtain a more diverse sample of healthcare service users with a variety of perspectives and experiences. This would help to ensure that any conclusions drawn from the research are more representative of the broader population of healthcare service users in India. In addition to expanding the scope of the research geographically, future studies may also consider using different research methods to overcome some of the limitations of the previous study. For example, a larger sample size and a more representative sampling method could help to increase the generalizability of the findings. Additionally, researchers may consider conducting longitudinal studies to track changes in perception and usage of healthcare services over time.

Overall, by conducting future studies on healthcare service stakeholders in other districts of Gujarat and other states of India, researchers may be able to provide valuable insights that could inform the development of healthcare policies and services throughout the country.

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