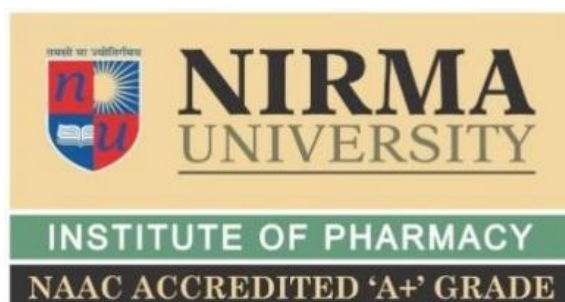


**EMPOWERING COMMUNITIES THROUGH  
JAN AUSADHI KENDRA: IN-DEPTH ANALYSIS  
OF OUTREACH AND IMPACT**



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**BACHELOR OF PHARMACY**

**UNDER THE GUIDANCE OF  
DR. ANSHU SRIVASTAVA**

**INSTITUTE OF PHARMACY  
NIRMA UNIVERSITY**

**May 2024**

**EMPOWERING COMMUNITIES THROUGH  
JAN AUSADHI KENDRA: IN-DEPTH ANALYSIS  
OF OUTREACH AND IMPACT**

**Thesis submitted to the Institute of Pharmacy, Nirma University,  
in partial fulfilment of the requirements for the Degree of**

**BACHELOR OF PHARMACY**

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## DECLARATION

We, VASOYA KRISHNA R. (20BPH120), PATEL PRINCE R. (20BPH075), PARMAR UTSAV D. (20BPH123) and PATEL YATRIK G. (20BPH115), hereby declare that B.Pharm project work (BP812PW) entitled “EMPOWERING COMMUNITIES THROUGH JAN AUSADHI KENDRA: IN-DEPTH ANALYSIS OF OUTREACH AND IMPACT” being submitted to Institute of Pharmacy, Nirma University for the award of degree of B.Pharm was carried by us under the supervision of DR. ANSHU SRIVASTAVA, Institute of Pharmacy, Nirma University. The content of this project work, in full or in parts, have not been submitted to any other University for the award of any degree. We also declare that all the information was collected from various primary sources (journals, patents, etc.) has been duly acknowledged in this project report.

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## **CERTIFICATE FOR SIMILARITY OF WORK**

This is to undertake that the B.Pharm. Project work (BP812PW) entitled **“EMPOWERING COMMUNITIES THROUGH JAN AUSADHI KENDRA: IN-DEPTH ANALYSIS OF OUTREACH AND IMPACT”** submitted by **VASOYA KRISHNA R. (20BPH120), PATEL PRINCE R. (20BPH075), PARMAR UTSAV D. (20BPH123) and PATEL YATRIK G. (20BPH115)**, B.Pharm. Semester VIII is a bonafide research work carried out by us at the Institute of Pharmacy, Nirma University under the guidance of **“DR. ANSHU SRIVASTAVA”**. We are aware about the rules and regulations of Plagiarism policy of Nirma University, Ahmedabad.

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**Date:** 18/05/2024

**Place:** Ahmedabad



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## **LIST OF ABBREVIATIONS**

CMIE-CPHS	: Centre for Monitoring Indian Economy - Consumer Pyramids Household Survey
FDA	: Food and Drug Administration
JAK	: Jan Aushadhi Kendras
JAS	: Jan Aushadhi Scheme
NACL	: National Accreditation Board of Testing and Calibration Laboratories
NLEM	: National List of Essential Medicines
NSO	: National Social Organisation
OOP	: Out-of-pocket
OTC	: Over-the-Counter
PMBJP	: Pradhan Mantri Bhartiya Janaushadhi Pariyojana
PMJAY	: Pradhan Mantri Jan Aushadhi Yojana
PSUs	: Public Sector Undertakings
WHO	: World Health Organization
WHO-GMP	: World Health Organization's Good Manufacturing Practices
WHO-HAI	: World Health Organization- Health Action International

## **ABSTRACT**

The use of pharmaceuticals to cure ailments has grown worldwide since the recognition of modern medicines as a scientific and dependable technique of treatment. Increased healthcare expenses are a serious problem in a country like India, where economic conditions are not favourable. Hence, the Government of India launched the Jan Aushadhi Kendras under Jan Aushadhi Scheme to provide generic medicines at a reasonable price to the general public, while being comparable in quality and efficiency to pricey branded treatments. For implementation of better policy for generic medicines, it is essential to have scientific data on the consumers' attitude and experience of generic medicines through Jan Aushadhi Kendras. However, there is limited insight on this issue due to very few studies conducted. A cross-sectional descriptive study was conducted in Ahmedabad city to understand the impact and outreach of Jan Aushadhi Kendras while simultaneously gauging perception and awareness of people towards Jan Aushadhi Kendras. The data was collected and collated using a pre-validated self-made questionnaire containing 25 multiple-choice questions. To meet the study's purpose, the responses collected from with 152 respondents were analysed and represented as graphs and tables. The results indicated that though respondents has fairly good idea about the existence and services of Jan Aushadhi Kendra, they were sceptical about the limited range of medicines and supply chain at JAK. People also believed that to address the issue ignorance and incorrect information about Jan Aushadhi Scheme and generic medicines, healthcare workers and authorities should take a proactive approach to dispel myths about generics and promote widespread acceptance of the program.



# CHAPTER 1

## INTRODUCTION

This chapter highlights the details about the problems and solutions in the Indian healthcare system. It provides an overview about the government's initiatives to overcome the challenges with respect to availability of low-cost medicines and surgical supplies. The chapter will help in recognising the lacunae in the initiatives and suggest how this study will help in identifying the problem, so as to address it efficiently and successfully.

### 1.1 Access for All – Persisting Issue in Indian Healthcare System

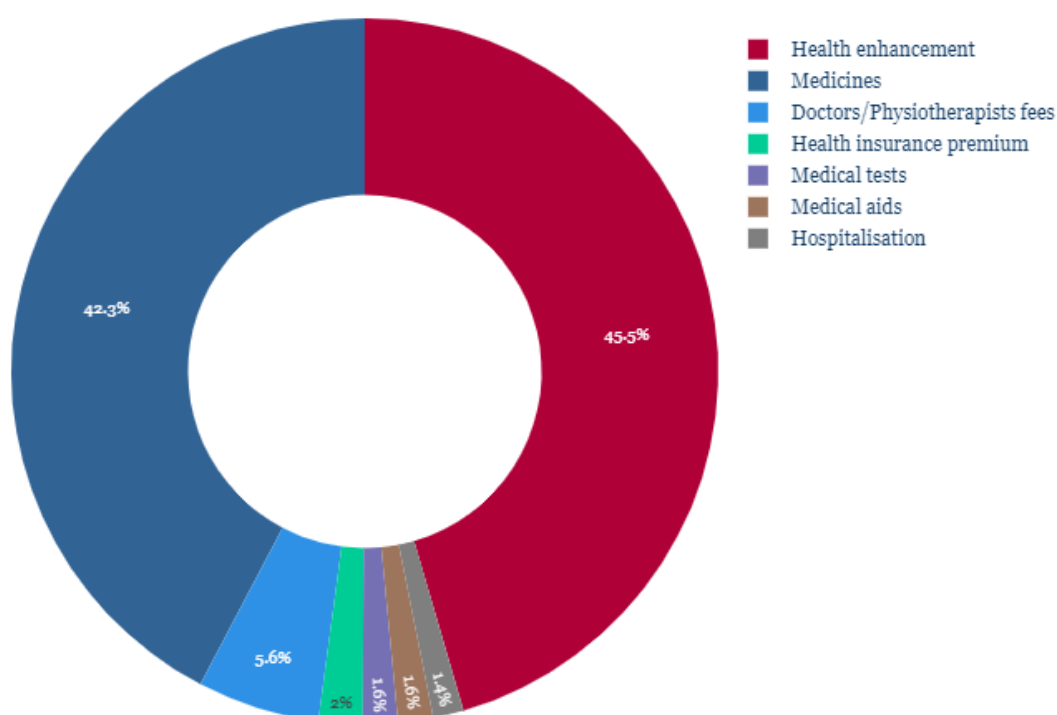
*“Healthcare is vital to all of us some of the time,  
But public health is vital to us all of the time.”*

*- C. Everett Koop*

India has grown into a major producer of high-quality branded and generic medicines in most therapeutic categories, with the industry valued at around Rs 1,500 crores in 1980 and more than Rs 1,19,000 crores in 2012 (Mallam et al. 54). Although the rate of these drugs is affordable in comparison to comparable pharmaceuticals in the majority of other nations, a substantial portion of the country's underprivileged people cannot afford the costlier branded drug category. Medication for practically all therapeutic categories is mostly given as branded commodities at excessively high pricing. (Tripathi and Bhattacharya 91).

Even today, a sizable portion of the public struggles to pay for these costly medications. Families in India are exposed to the private-sector market for buying medicines because commercial hospitals provide 60% of in-hospital treatment and 80% of out-patient care (Ghia and Rambhad 2194507). According to National Social Organisation (NSO) estimates, the cost of medications makes up to 79% of healthcare expenditures in rural areas. This issue becomes even worse by the fact that patients bear roughly 80 percent of the cost of their medical treatments.

Indian households spent well over Rs. 120 billion on healthcare-related expenditures, according to the Centre for Monitoring Indian Economy's Consumer Pyramids Household Survey (CMIE-CPHS). According to "How Much Do Indian Households Spend on Healthcare Every Month?," urban India accounted for 42.3% of overall healthcare-related spending during this time period, with rural India accounting for the remaining 57.7%. Figure 1.1 shows a breakdown of total estimated household healthcare spending. Thus, access to lower-cost generic medications is critical to ensuring affordable healthcare (Patidar and Parmar 498).



**Figure 1.1. Breakdown of total estimated household expenditure on healthcare**  
(Source: Consumers Pyramids Household Survey, Centre for Monitoring Indian Economy)

Globally, the use of generic medications is rising quickly due to financial strain on prescription drug budgets in the form of out-of-pocket (OOP) expenses. Since generic medications are typically far less expensive than branded ones, there is potential to save a big amount of money on healthcare expenses (Tripathi and Bhattacharya 94).

The drug inventories of unbranded generic producers perform rather well when compared to the World Health Organization-Health Action International (WHO-HAI)

approach for measuring medicine availability (Mathew 319). Moreover, unbranded generic medications are far less costly than the most well-known brands, which lowers treatment costs in family practice and primary care.

## **1.2 Strategic Solution: Pradhan Mantri Bhartiya Janaushadhi Pariyojana (PMBJP)**

*Jan Aushadhi - Seva bhi, Rozgar bhi*

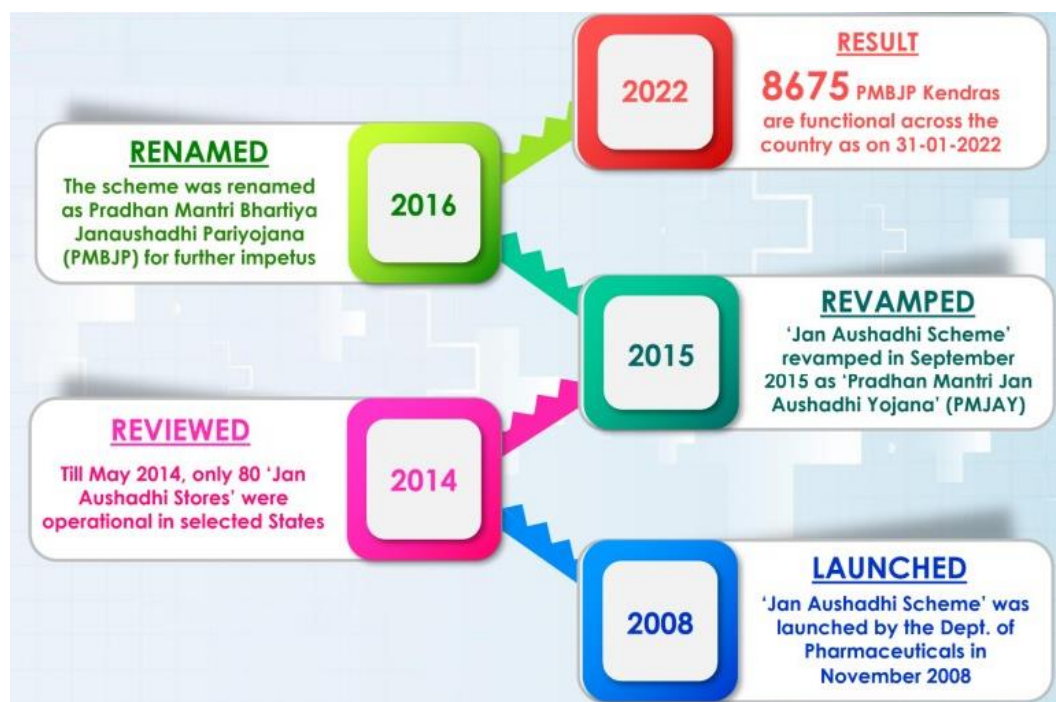
In both developed and developing nations, the price of pharmaceuticals and the cost of healthcare are big issues. Pharmaceutical costs, which make up a sizable portion of healthcare spending, have an impact on healthcare costs (Motkuri and Mishra 32). Governments and policy makers have been searching for alternative ways to cut costs without sacrificing the quality of care provided, and generic drugs have emerged as one such option.

The Department of Pharmaceuticals, Ministry of Chemicals & Fertilizers, Government of India established the "Jan Aushadhi Scheme" (JAS) in November 2008 across the country with the goal of providing premium generic drugs at cheap prices to all (Pradhan Mantri Bhartiya Janaushadhi Pariyojana). In September 2015, the JAS was renamed as the "Pradhan Mantri Jan Aushadhi Yojana" (PMJAY). To strengthen the program, it was called "Pradhan Mantri Bhartiya Janaushadhi Pariyojana" (PMBJP) from November of 2016.

The salient features of scheme are (Khurana et al.):

- Ensuring consistent access to high-quality drugs.
- Increased coverage of high-quality generics to reduce out-of-pocket expenditures and redefine treatment costs per patient.
- Increasing public knowledge of generics through education and publicity.
- Proving that good quality does not always come with a high price.
- A public project involving government, PSUs, private sector, NGOs, societies, cooperatives, and other entities.

Quality generic pharmaceuticals and medical supplies are dispensed at low prices, especially for the poor and underprivileged, through exclusive stores “Jan Aushadhi Kendras (JAK)”. As of 2022, 8675 JAK were functional across the country. The journey towards the constitution of PMBJP is represented in Figure 1.2. Consequently, one of the government's primary targets has been to "ensuring availability of quality medicines at affordable prices to all."



**Figure 1.2. The journey of PMBJP**  
(Source: www.nextias.com)

The JAK were formed to assist a significant percentage of the population living in the most distant areas of the country by offering them generic pharmaceuticals and surgical supplies at a discounted cost. There are 10607 JAK operating nationwide as of 2024. The JAK's product basket includes 293 surgical products and 1965 medications ('Year End Review of Department of Pharmaceuticals'). These generic drugs include all main therapeutic areas such as anti-infectives, anti-allergies, anti-diabetics, cardiovascular, anti-cancer, and gastrointestinal treatments ('Pradhan Mantri Bhartiya Janaushadhi Pariyojana - PMBJP').

JAK not only created direct jobs but also jobs in the transportation, maintenance, and supply chain sectors. Hence, the PMBJP acts as Aushadhi for both the prosperity and

health of the country (Palav et al. 2536). With regard to the provision of reasonably priced medications and the nationwide expansion of JAK, the PMBJP has accomplished a great deal over the past few years. However, for this program to continue and flourish, support and promotion are very crucial especially given the aging and growing population as well as the potential for a pandemic.

### **1.3 Notable Attributes of Jan Aushadhi Kendra (JAK)**

The ultimate goal of JAK is to make healthcare accessible to every Indian by providing generic medicines or surgical items within the budget of every household. Additionally, it has to ensure that all the products fulfil the quality control criteria and are at par with the branded drugs in terms of purity, potency, stability and drug release (Joshi et al. 69).

Since 2019, the 7th of March has been honored annually as Jan Aushadhi Diwas.

The characteristic features of the JAK includes (‘Pradhan Mantri Bhartiya Janaushadhi Pariyojana (PMBJP) - UPSC’):

- JAK is governed by the Pharmaceutical and Medical Devices Bureau of India.
- The JAK offers generic medications at reasonable costs and is available throughout India. Typically, this cost is between 50% and 90% less than that of branded medications.
- JAK offers medical and related products in addition to medications, which are available at pharmacies.
- Over-the-Counter (OTC) generic medications are available from JAK without a doctor's prescription. However, scheduled medications require a doctor's prescription.
- The National Accreditation Board of Testing and Calibration Laboratories (NABL) tests a batch of pharmaceuticals to ensure that the quality of the medications is maintained.

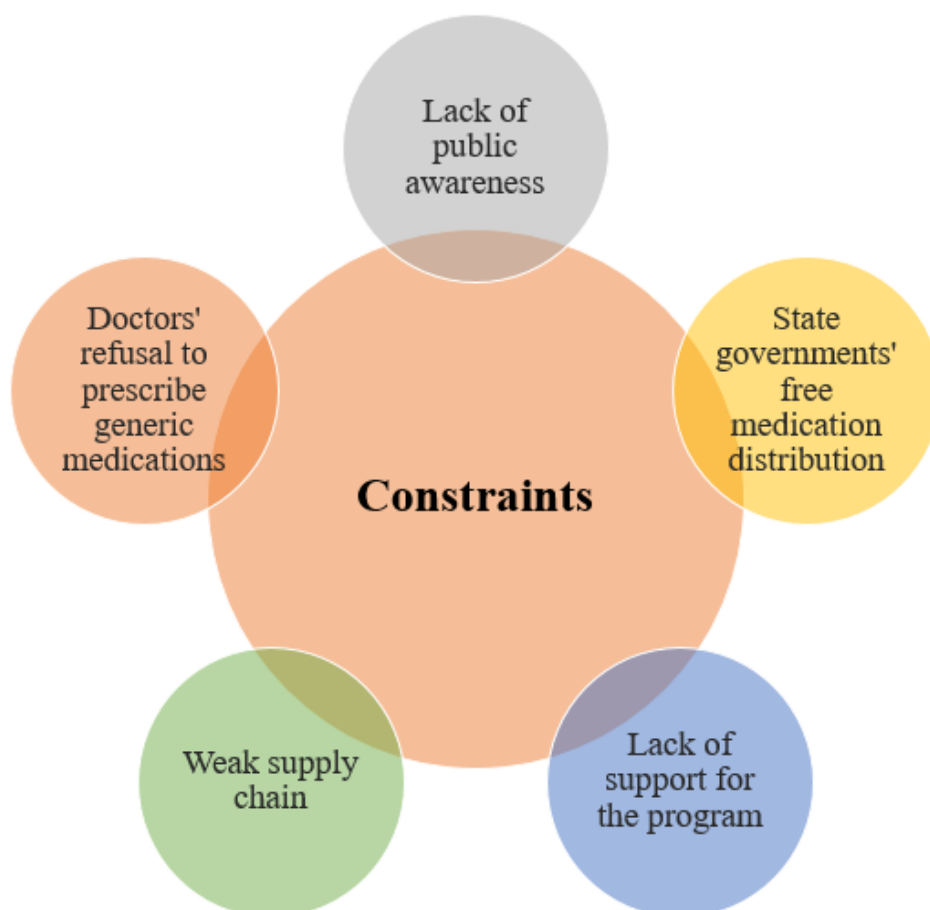
- In order to preserve the quality of the medications and related items delivered as PMBJP products, these are only purchased from suppliers certified by the World Health Organization's Good Manufacturing Practices (WHO-GMP).
- A 20% portion of the drug's price is awarded as an incentive to the operating agency. The Government offers Kendras associated with the Pharmaceuticals and Medical Bureau of India an incentive worth up to Rs. 5 lakhs.
- Special incentives are also given to underprivileged groups, such as women entrepreneurs and the divyang. SCs, STs) in order for them to launch Kendras as well.

## **1.4 Public Acceptance of JAK: The Lacunae**

Although there is a noticeable improvement in the acceptability of generic drugs, there is still a great deal of scepticism and lack of faith, especially among patients and, to a lesser extent, physician groups. Information and education on regulation, equivalency, and addressing myths about generic pharmaceuticals are critical in building the trust of these stakeholders. (Dunne and Dunne 173). To promote the acceptability of generic pharmaceuticals, mass media and healthcare professionals must conduct awareness campaigns. (Sareen et al. 238).

Additionally, the poor availability of drugs at JAK indicates the implementation challenges encountered by the initiative. The JAK list contains just 214 essential medications, suggesting that it eliminates more over 50% of drugs listed on the National List of Essential Medicines (NLEM), 2015 (Lavtepatil and Ghosh 643). According to a study by the Public Health Foundation of India, the main obstacles to the JAK's poor success are shown in Figure 1.3.





**Figure 1.3. Major constraints faced by JAK**

## **1.5 Problem Statement**

Rising healthcare costs are still a hot topic globally, particularly in developing and impoverished nations like India where things are not going so well economically. In an attempt to combat this, the Government of India (GoI) introduced the Jan Aushadhi initiative in April 2008, which aimed to supply inexpensive generic medications; yet, the program's success has been mostly limited. Furthermore, because they are unaware, the patients depend on prescription medications that are branded and end up spending 10-20% of their income on healthcare. The present cross-sectional survey was conducted to understand and gain insight in the thought-process and perception of the people towards JAK. The study will be helpful in identifying the degree of acceptance and outreach of JAK and implementing further strategies for success of the Jan Aushadhi initiative.

## **1.6 Scope of the Study**

Every individual has the right to acceptable, affordable, and accessible pharmaceuticals. Not only is health a personal choice, but it is also a national need. A commendable step toward a "healthy India" is the PMBJP. It creates jobs in addition to making pharmaceuticals available to regular people. Ensuring the sustainability of this effort is crucial for India's future. The primary goal of this study is to evaluate the public knowledge of JAK. This study is restricted to urban areas, but as many residents in rural areas must rely on generic drugs, it might be extended there as well. The research might be extended to rural Gujarat to provide a more complete picture of perceptions and acceptance of JAK in rural and urban populations.

## **1.7 Significance of the Study**

The vast majority of Indians may be unaware regarding the implementation of Jan Aushadhi Scheme and existence of JAK, thus spending their earnings on expensive prescription drugs. Moreover, those who are aware may still favor expensive medications found in private medical facilities over those found at JAK. This is due to their belief that expensive medications are of superior quality. Therefore, this study is crucial to understand not only the public's awareness of government initiatives but also their acceptance for JAK. This will also help in understanding the outreach and impact level of JAK on the Indian healthcare system.

## **1.8 Research Questions**

- 1) Do socio-demographic factors like age, sex, education and income influence the perception of people towards JAK?
- 2) Is the impact of JAK on the healthcare system affected by the people's perception towards availability and reliability of medicines?
- 3) Will the information on quality, efficacy and safety of Jan Aushadhi medicines influence the public's acceptance of JAK?
- 4) Whether conducting awareness programs prompt the consumers to trust and explore JAK for healthcare needs?

## **1.9 Aim and Objectives**

### **1.9.1 Aim**

The main aim of the study is to assess the outreach and impact of JAK in Ahmedabad City.

### **1.9.2 Objectives**

To fulfil the aim, following primary objective was defined as:

To analyze the socio-demographic factors and its influence on people's perception towards JAK.

Subsequently, to conduct the study and achieve the primary objectives, some secondary objectives were established as follows:

- a) To assess general perception of people towards JAK.
- b) To examine people's view on the impact of JAK on the healthcare system.
- c) To study people's reliability on Jan Aushadhi medicines.
- d) To understand the satisfaction level of people for services offered at JAK.
- e) To evaluate people's opinion about advantages of JAK.
- f) To gauge outlook of people about challenges faced by JAK

## 1.10 Hypothesis Development

The research hypothesis is significant because it guides the research, develops links between variables, and aids in the discussion and conclusion of the study.

**Hypothesis: To analyze the socio-demographic factors and its influence on people's perception towards JAK.**

H<sub>0</sub>: There is no significant relationship between socio-demographic factors and people's perception of JAK. (Null hypothesis)

H<sub>1</sub>: There is a significant relationship between socio-demographic factors and people's perception of JAK.

## **CHAPTER 2**

### **REVIEW OF LITERATURE**

This chapter discusses the prior research published on generic medicines and JAK in books, scholarly articles and other sources. It provides a comprehensive description, summary, and critical evaluation of these works in relation to the research problem being investigated. The chapter also provides an overview of sources that have been explored while researching this study.

#### **2.1 Healthcare Utilization Pattern in India**

Lack of access to vital medicines is a serious health policy challenge worldwide, particularly in low- and middle-income nations. According to the World Health Organization (WHO), a whopping 2 billion people worldwide do not have access to essential medicines (Ozawa et al. iii1). This means that drugs that can save lives by preventing deadly diseases like cancer or AIDS, or provide relief from excruciating pain caused by preventable and curable diseases, are not available or accessible.

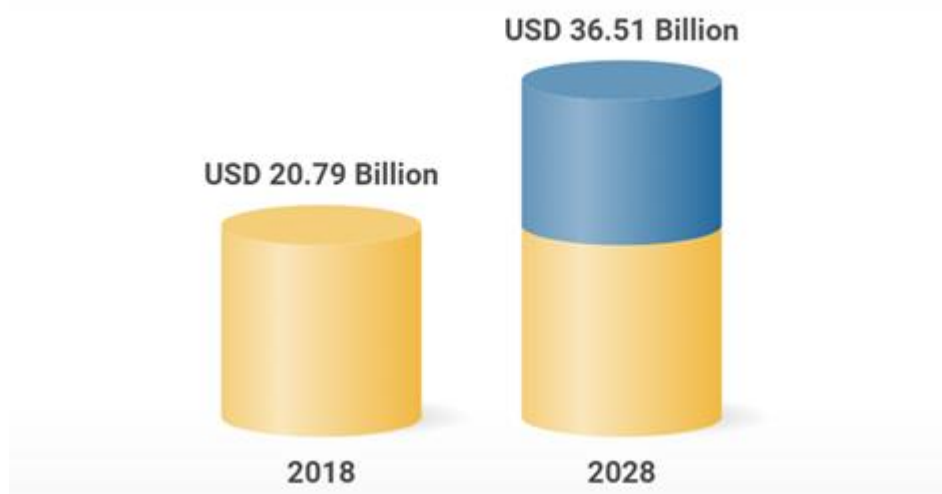
Despite the fact that India has a robust generic pharmaceutical industry, the cost of medications remains a major barrier to access. According to WHO, 65% of Indians, or almost 650 million, do not have access to basic medications, and medicine accounts for 63% of households' total out-of-pocket (OOP) health payments, impoverishing millions of individuals each year (Lavtepatil and Ghosh 643; Selvaraj e018020).

Access to medicine is a major contributing factor to India's imbalanced healthcare utilisation pattern. According to the National Sample Survey Organisation, public facilities provided only 30% of all healthcare services in 2017-18 (Lavtepatil and Ghosh 643). This meant that the majority of people had to seek healthcare, including drugs, from private providers. Furthermore, even those who receive healthcare from public institutions must purchase drugs from the market because prescribed medications are frequently unavailable in public hospital pharmacies.

## 2.2 Generic Medicines

Generic drugs are non-branded pharmaceuticals that are equivalent to branded or reference-listed drugs in terms of dosage, mode of administration, and efficacy. According to Food and Drug Administration (FDA) regulations, generic pharmaceuticals must have the same active ingredient, dosage, potency, safety, usage guidelines, and delivery method as branded drugs (Tiwari et al. 46).

The need for generic medications is growing as people and governments explore ways to lower the expense of healthcare. By 2028, the Indian generic drug market, which was valued at USD 20.79 billion in 2018, is projected to expand at a consistent CAGR of 6.97% (Figure 2.1). Government and other regulatory authorities' efforts to increase public knowledge of the availability of generics, like the PMBJP, have taken center stage and are now offering people high-quality medications at reasonable prices ('India Generic Drugs Market Analysis, Competition, Forecasts & Opportunities, 2018-2021 & 2022-2028').



**Figure 2.1. Forecast for Indian generic drugs market**  
(Source: [www.researchandmarkets.com](http://www.researchandmarkets.com))

A thorough examination of consumer perceptions of branded and generic medications was conducted through literature analysis. Research papers utilizing qualitative and quantitative methods were reviewed. In developed countries, mixed attitudes toward branded and generic medications was observed while in less developed nations,



inadequate access to essential medications was noted. Generic medications significantly enhance access to crucial medical supplies (Uctu 174113432091575).

Using generic medicine does not suggest that it is less safe or effective, as shown by Araszkiewicz et al. (554). Generic drugs are just as effective as branded ones, according to a different meta-analysis study (Kesselheim et al. 2514). Many participants in a study conducted by Colgan et al. (e008915) had misconceptions about the efficacy and security of generic medications. The majority of practitioners said that generic drugs are a useful tool for reducing overall healthcare expenditures, according to Patel and Paras (101).

Generic medicines offer clinically equivalent quality, efficacy, and safety to brand-name counterparts at considerably lower costs, resulting in substantial savings for healthcare systems while maintaining therapeutic efficacy. Consequently, numerous nations advocate for the effective utilization of generic medications (Shweta 40). In a poll on the prevalence of generic drugs, most participants said that price had no bearing on their decision to use them and that they wouldn't switch to a generic option even if it were less expensive, raising concerns about their poorer performance (Alam et al. 184).

Cost and efficacy are the two main factors to be taken into account when choosing generic medications, according to a study done to better understand public knowledge, opinions, and usage of these prescriptions (Lira et al. 267). A notable portion of patients remains unaware of generic pharmaceuticals, often confusing them with genetic counterparts (Lee et al. 26). Price differentials between expired branded medications and newer versions underscore the economic appeal of pharmacological replacement (Babar et al. 447).

Numerous studies have acknowledged the cost-saving potential of generic substitution (Duerden and Hughes 335). To reduce pharmaceutical costs and improve healthcare accessibility, governments all over the world have implemented generic medicine replacement programs (El-Jardali et al.). However, public perceptions and patient preferences complicate the implementation of generic substitution policies (Faasse et al. 187; Salmane Kulikovska et al. 1). Physician and pharmacist recommendations

significantly influence patients' acceptance of generic alternatives (Lira et al. 273). Coordinated public education campaigns are required to guarantee that generic medications are widely known, and healthcare providers are essential in disseminating the necessary information (Kobayashi et al. 60).

### **2.3 Jan Aushadhi Kendras (JAK)**

India's pharmaceutical sector has grown to be able to provide high-quality branded and generic medications across the majority of therapeutic areas. (\$65 billion by 2024 and \$130 billion by 2030) are the estimated earnings ('Pharmaceutical Industry in India: Invest in Pharma Sector'). Regretfully, the poor in India cannot buy the branded medications, despite the fact that the majority of those drugs are cheaply priced when compared to those in other nations. Through policies like Excise Duty Reduction, Uniform VAT, and Scheduled and Non-Scheduled Drug Control, the Indian government has intervened to help the poor. Through the Jan Aushadhi Campaign, the government aims to improve the lives of the impoverished by giving them access to high-quality pharmaceuticals.

According to Rajasekaran et al.'s descriptive research study (132), demographic factors including age, gender, and occupation have less of an impact on JAK's customer happiness. The majority of customers expressed satisfaction with JAK in regard to the chosen metrics, according to the research's conclusions. The investigations came to the conclusion that consumers of Jan Aushadhi medical stores are very loyal to these establishments and are happy with the quality of the generic medications.

Overall, respondents to a different descriptive survey conducted by H. Manjula et al. (9) expressed satisfaction with JAK. However, the supply of high-quality medications will be the scheme's biggest obstacle. Only with the guaranteed availability of cost-effective quality medicines can the objective of universal healthcare be accomplished. When considering buying generic medications from Jan Aushadhi medical stores, consumers give priority to considerations such as product quality, value for money, doctor education, and convenience (Nagarajappa and Srivatsa, 75).

Accessibility, tangibility, reliability, and responsiveness are the four main criteria that Solomon and Sundar (550) found to be highly relevant in influencing consumer satisfaction with the services rendered by Jan Aushadhi medical shop workers. They observed that unfavorable employee conduct has a detrimental impact on client satisfaction.

According to Pawar et al. (136), there is no discernible difference in the efficacy and quality of generic medications sold at Jan Aushadhi medical stores compared to other branded medications on the market.

A study on the productivity and operational effectiveness of Jan Aushadhi outlets in India was carried out by Deshpande et al. (36) and colleagues. They identified the difficulties these outlets throughout the nation confront. They discovered that even though Jan Aushadhi medications were the most affordable and of the highest caliber, the profits were constantly less than Rs. 5000.

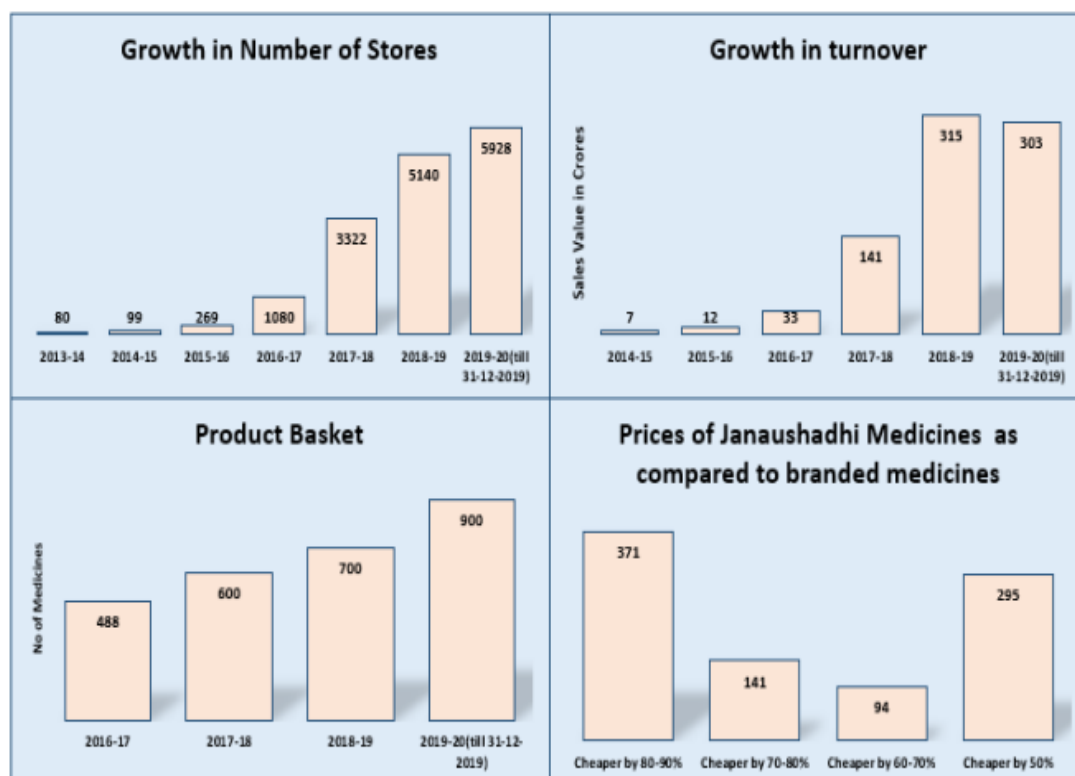
Jan Aushadhi medicines address a wide range of communicable diseases, cardiovascular diseases, diabetes, mental disorders like anxiety, analgesics, vitamin, iron, folic acid supplements, and tetanus toxoid injections, according to a separate analysis by Mukherjee (255) on the cost dynamics of the Jan Aushadhi initiative in India. Furthermore, there is a notable difference in cost between Jan Aushadhi pharmaceuticals and other pharmaceuticals that are sold in the market.

Sadiq et al. (977) and group conducted a study to have an insight into uncertainty among doctors and patients regarding generic medicines provided under Jan Aushadhi scheme. This was carried out by studying knowledge, attitude, and practices (KAP) towards the scheme. They concluded that a number of physicians remain unconvinced regarding the effectiveness and promptness of generic Jan Aushadhi medications. Most doctors don't recommend generic medications. Therefore, people should be informed about this program and doctors should be urged to prescribe more generic Jan Aushadhi medications.

A study was carried out to understand the existing interventions at JAK (Joshi et al. 47). The findings demonstrate the huge disparities in cost between JAK medications

and the range of branded medicines that are offered in India. It implies that switching to JAK medications would help patients and their caretakers have less financial hardship. The nation's healthcare system might gain from moving to generic medications as well. In order to attain the objective of decreasing financial strain, patients must be informed about the notable variations in cost between PMBJP medications and generic medications. All parties involved, including patients, prescribers, and pharmacists, should be made aware of this.

As illustrated in Figure 2.2, Asher and Upadhayay (6) examined the PMBJP's development using a variety of indices. They came to the conclusion that it would be challenging to establish a reliable supply chain and logistics system for so many stores spread out across the nation and for so many medications and surgical supplies in such a short period of time. Thus, they highly advised the development of a strong management information system (MIS) to aid in better management and decision-making and to track important results and outcomes.



**Figure 2.2. Progress indicators of PMBJP**  
(Source: Asher and Upadhayay 7)

The study also concluded that the number of JAK should be distributed more evenly throughout urban, para-urban, and rural areas to improve accessibility. JAK should be motivated to modernize their supply chain and delivery mechanisms. (Asher and Upadhayay 6)

In a separate study, four popular drugs—Alprazolam, Cetrizine, Ciprofloxacin, and Fluoxetine—offered as generics by "Jan Aushadhi Stores" were compared to comparable leading brands—Restyl, Alerid, Ciprobid, and Fludac—on the market. When testing these medications, the Indian Pharmacopoeial regulations were followed. All four pairings of generics and well-known branded medications passed the appropriate pharmacopoeial tests, proving that generic meds are just as high-quality as branded treatments. (Singhal et al. 204).

Despite hurdles, increasing access to information, as well as supportive policies and financial incentives, have helped to promote the usage of generic medications (Hassali and Wong 171).

## **CHAPTER 3**

### **METHODOLOGY**

This chapter describes exactly how the survey was conducted. It outlines the information about how the questionnaire was designed, the sampling technique, sample size selection, where the survey took place, response rate, data collection and data analysis.

#### **3.1 Study Design**

A cross sectional descriptive study was carried out in the Ahmedabad city to understand the perception and awareness of JAK in the population.

#### **3.2 Sampling Technique**

The respondents were chosen based on the convenience sampling technique since the actual population is unknown.

#### **3.3 Criteria for Sample Selection**

##### **Inclusion Criteria:**

- Participant's age should be 18 years and above.
- Participants having ability to comprehend the questions by themselves or when explained by surveyors.
- Participants willing to participate in the study

##### **Exclusion Criteria:**

- Participants age below 18 years.
- Participants unable to understand the questions by themselves or when explained by surveyors.
- Participants unwilling to participate in the study

### 3.4 Sample Size

Based on Krejcie and Morgan's (608) reported literature, the survey's sample size was determined. The population size and the amount of inaccuracy the surveyor is willing to accept dictate the size of the sample. The table was designed for situations where the surveyor wishes to be 95% certain, or within 5 percentage points, of the results that would have been obtained if the entire population had been surveyed. Based on the body of research indicated that a randomly selected sample size of 152 should be used for a population of 250.

Alternatively, sample size was also calculated using the following formula:

$$\text{Sample Size} = \frac{(Z\text{-score})^2 \times \text{StdDev} \times (1\text{-StdDev})}{(\text{confidence interval})^2}$$

Confidence level - 95%, represents the level of confidence that the data is representative of the entire population.

Confidence interval - 5%, implies that the error could occur in the entire population of the research.

Study population - 250

$$\text{Sample size} = (1.96)^2 \times 0.5 (0.5) / (0.05)^2 = 152$$

### 3.5 Survey Questionnaire

A questionnaire was drafted based on the literature search conducted. The questions were logically framed which basically aimed at achieving the objectives of the study. The questionnaire had 25 single-answer multiple choice questions, each with four options. The questionnaire had three sections.

**Section I:** consisted of socio-demographic data like gender, age, educational qualification and income of the respondents.

**Section II:** covered questions pertaining to perception of respondents towards quality of medicine and services offered by JAK; impact and advantages of JAK; and challenges faced by JAK.

**Section III:** included questions for feedback from respondents regarding improvement of the services at JAK.

### **3.6 Validation of Research Tool**

Prior to administration of the questionnaire, its contents were assessed by a subject expert for its clarity and appropriateness in fulfilling the objectives of the study. Initially, a total of 30 questions were designed but following the validation by an External subject expert, only 25 questions were further included in the final questionnaire. The 5 questions were removed from the questionnaire because of the ambiguity.

### **3.7 Data Analysis**

#### **3.7.1 Tools used for the analysis of data**

Data analysis is performed by tabulating the acquired data in a manner that allows for interpretation. The categorical variables were expressed as number, n (%). Statistical tools were employed to analyse and interpret data.

#### **3.7.2 Simple percentage method**

Percentages are a type of ratio that expresses how one variable compares to another. The acquired data is analyzed using the simple percentage approach, which allows for



quick comparison of two or more features and the determination of their relative differences.

$$\text{Percentage} = \frac{\text{Number of respondents}}{\text{Total respondents}} \times 100$$

### 3.7.3 Statistical techniques

An easy-to-use, wizard-based statistical program for laboratory test analysis, GraphPad InStat 3.05, was used to analyze the survey data that was gathered. Chi-square test was done to establish the whether two variables related or independent. Based on the total number of variables and samples in the experiment, the p-value was utilized to assess whether or not a null hypothesis may be rejected. The null hypothesis is rejected when the p-value is less than the significance level ( $p < 0.05$ ).

## **CHAPTER 4**

### **RESULTS AND DISCUSSION**

The results of the study are compiled here and presented in relation to the research questions. The study's findings are presented objectively, without bias or interpretation, and in a logical order. Written language, tables, graphs, and other visual aids are used to report the findings. The findings are compared to those of other research and surveys.

#### **4.1 Socio-demographic Data of the Respondents**

Socio-demographics are quantifiable factors and help in generating statistical information for decision-making. The socio-demographic questions facilitate categorizing the respondents into different sub-groups and collect meaningful data for research questions.

For this study, a simple random sampling procedure was utilized to disseminate the questionnaire to respondents. The survey questionnaire comprised four socio-demographic variables like age, gender, educational qualification and income.

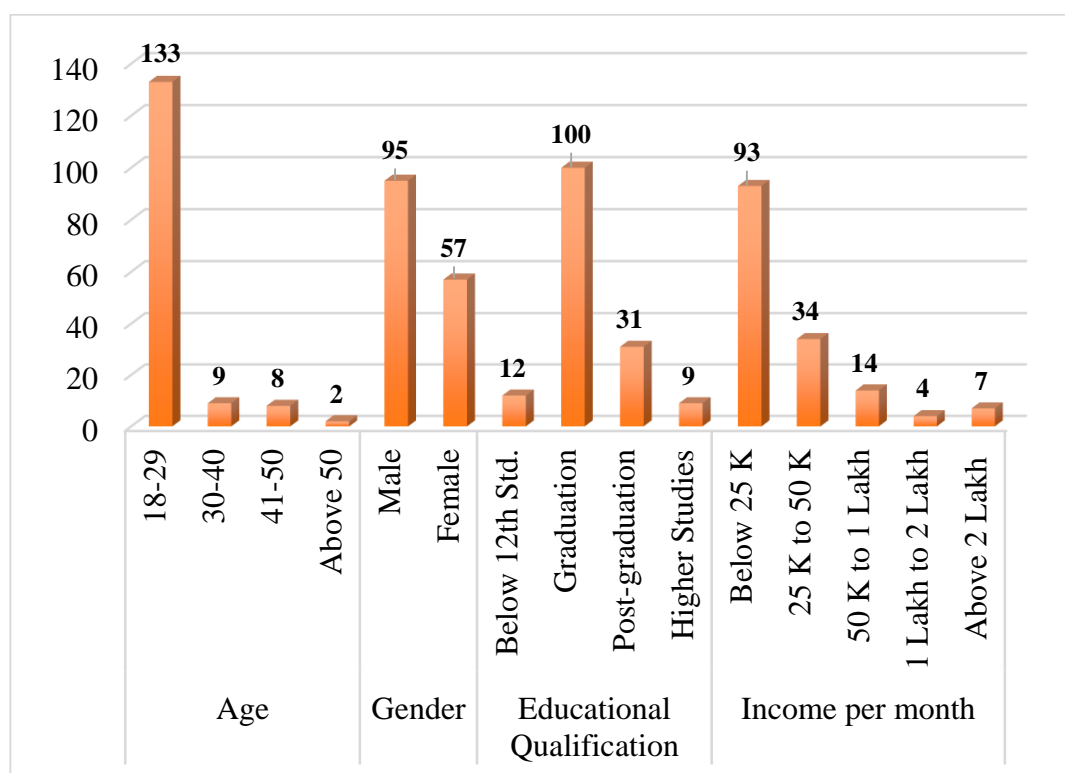
Previous research has shown a link between patients' awareness of generic drugs and their age and education level (Beauvais et al. 850). Charan et al. (176) discovered a positive relationship between respondents' age, education level and awareness of generic drugs available at JAK. Product quality, price and convenience of access influence the decisions when purchasing generic medications (El-Jardali et al.).

The outcome of the socio-demographic data indicates that the majority of the respondents prevail in the 18-29 years age category (87.50%). The gender-wise classification showed a significantly higher percentage of male respondents (62.50%) over females (37.50%). With reference to educational qualification, 65.80% of respondents were graduates followed by 20.4%, which were post-graduates. As for the monthly income, most of the respondents were having monthly income below 25,000 per month (Figure 4.1, Table 4.1).

**Table 4.1. Socio-demographic data of the respondents**

Variables	Category	Frequency	Percentage (%)
Age	18-29	133	87.5%
	30-40	9	5.90%
	41-50	8	5.30%
	Above 50	2	1.30%
Gender	Male	95	62.50%
	Female	57	37.50%
Educational Qualification	Below 12th Std.	12	7.90%
	Graduation	100	65.80%
	Post-graduation	31	20.40%
	Higher Studies	9	5.90%
Income	Below 25 K	93	61.20%
	25 K to 50 K	34	22.40%
	50 K to 1 Lakh	14	9.20%
	1 Lakh to 2 Lakh	4	2.60%
	Above 2 Lakh	7	4.60%

n = 152



**Figure 4.1. Frequency distribution of respondents in socio-demographic variables**

## 4.2 Understanding the Respondent's Perception towards JAK

Table 4.2 highlights the opinions of respondents to the questionnaire. The questionnaire consisted of questions pertaining to the perception of people towards various parameters of JAK like its function, services, medicines, impact, advantages and challenges. The results are discussed in detail in subsequent sub-sections.

**Table 4.2. Perception of respondents towards JAK**

Questions	Options	Frequency	Percentage (%)
What is your perception regarding Jan Aushadhi Kendra?	It provides poor quality medicines	12	7.90%
	It offers a limited range of medicines	36	23.70%
	It is a reliable source of affordable generic medicines	102	67.00%
	It is only accessible to the wealthy	2	1.30%
What do you believe is the main reason behind the popularity of Jan Aushadhi Kendra?	High-quality medicines	22	14.50%
	Cost-effectiveness	105	69.10%
	Convenient location	16	10.50%
	Extensive range of medicines	9	5.90%
How do you feel about the accessibility of information about services at Jan Aushadhi Kendra?	Easily accessible	82	53.90%
	Difficult to find	30	19.70%
	Insufficient information	24	15.80%
	Not sure	16	10.50%
How do you perceive the accessibility of Jan Aushadhi Kendra?	Easily accessible	80	58.60%
	Moderately accessible	56	36.80%
	Difficult to access	7	4.60%
	Only accessible to certain demographics	9	5.90%
What do you consider to be the biggest drawback of Jan Aushadhi Kendra?	Limited range of medicines	95	62.50%
	Poor customer service	24	15.80%
	Long waiting times	11	7.20%
	Lack of trust in generic medicines	22	14.50%
How likely are you to recommend Jan Aushadhi Kendra to friends and family?	Very likely	59	38.80%
	Somewhat likely	81	53.30%
	Not likely	4	2.60%
	Not sure	8	5.30%

How do you view the pricing of medicines at Jan Aushadhi Kendra?	Expensive	8	5.30%
	Comparable to branded medicines	39	25.70%
	Affordable	100	65.80%
	Unpredictable	5	3.30%
How do you perceive the quality of medicines available at Jan Aushadhi Kendra?	Superior to branded medicines	27	17.80%
	Inferior to branded medicines	19	12.50%
	Comparable to branded medicines	96	63.20%
	Unreliable	10	6.60%
How do you perceive the availability of specialty medicines at Jan Aushadhi Kendra?	Limited	70	46.10%
	Extensive	26	17.10%
	Comparable to private pharmacies	43	28.30%
	Not sure	13	8.60%
How do you perceive the quality of consultation provided at Jan Aushadhi Kendra?	Excellent	61	40.10%
	Adequate	75	49.30%
	Poor	8	5.30%
	Not sure	8	5.30%
How do you feel about the staff expertise and assistance at Jan Aushadhi Kendra?	Knowledgeable and helpful	92	60.50%
	Uninformed and unhelpful	19	12.50%
	Indifferent	22	14.50%
	Varies depending on the location	19	12.50%
How do you perceive the speed of service at Jan Aushadhi Kendra?	Fast and efficient	31	20.40%
	Slow and inefficient	24	15.80%
	Varies depending on the location	76	50.00%
	Not sure	21	13.80%
What impact do you believe Jan Aushadhi Kendra has on the overall healthcare system?	Positive impact	112	73.70%
	Negative impact	12	7.90%
	No impact	15	10.00%
	Not sure	13	8.60%
How do you perceive the overall impact of Jan Aushadhi Kendra on their healthcare expenses?	Significant reduction	72	47.40%
	Moderate reduction	62	40.80%
	No impact	15	9.90%
	Increase in expenses	3	2.00%
What impact do you believe Jan Aushadhi	It drives them out of business	13	8.60%
	It has no impact	69	45.40%

Kendra has on other pharmacies in the area?	It creates healthy competition	65	42.80%
	It reduces the availability of medicines in the area	5	3.30%
How do you view the level of trustworthiness of Jan Aushadhi Kendra compared to private pharmacies?	More trustworthy	43	28.30%
	Equally trustworthy	98	64.50%
	Less trustworthy	7	4.60%
	Not sure	4	2.60%
What do you appreciate the most about Jan Aushadhi Kendra?	Its convenience in terms of location	33	21.70%
	Its customer service	28	18.40%
	Its contribution to reducing healthcare expenses	88	57.90%
	Its range of branded medicines	3	2.00%
How do you perceive the reliability of Jan Aushadhi Kendra in terms of medicine availability?	Very reliable	56	36.80%
	Somewhat reliable	79	52.00%
	Not reliable	8	5.30%
	Varies depending on the location	9	5.90%
What do you believe is the most significant advantage of Jan Aushadhi Kendra compared to other pharmacies?	Lower prices	78	51.30%
	Better quality medicines	48	31.60%
	Wider range of medicines	11	7.20%
	Better customer service	15	9.90%
What do you believe is the biggest challenge faced by Jan Aushadhi Kendra in maintaining quality standards?	Lack of trained staff	39	25.70%
	Inadequate infrastructure	29	19.10%
	Supply chain issues	52	34.20%
	Government regulations	32	21.10%
What do you believe is the biggest challenge faced by Jan Aushadhi Kendra in fulfilling its objectives?	Lack of awareness among the public	73	48.00%
	Limited availability of medicines	45	29.60%
	Quality control issues	20	13.00%
	Government regulations	14	9.20%

\* Values are expressed as n (%)

#### 4.2.1 General perception towards JAK

- Analysis for general perception towards JAK indicates that a large percentage (102, 67.00%) of respondents believed that JAK is a reliable source of affordable generic medicines. However, some respondents (36, 23.70%)

thought it offered a limited range of medicines. Very few respondents (12, 7.90%) felt that medicines available at JAK are of poor quality.

- Main reason behind the popularity of JAK was found to be cost-effectiveness of medicines (105, 69.10% respondents) followed by faith of respondents (22, 14.50%) in availability of high-quality medicines at JAK.
- Majority of respondents (82, 53.90%) felt that the information about JAK services is easily accessible. In contrast to this opinion, a good percentage of respondents (30, 19.70%) found it difficult to access information about JAK services.
- Study of public's accessibility of JAK suggested that a large number of respondents agreed to easy (80, 58.60% respondents) and moderate (56, 36.80% respondents) accessibility of JAK.
- The biggest drawback of JAK was recognised to be availability of limited range of medicines (95, 62.50% respondents) followed remotely by poor customer service (24, 15.80% respondents) at JAK.
- Most of the respondents (81, 53.30% to some extent and 59, 38.80% very likely) agreed to recommend JAK to their friends and family.

#### **4.2.2 Medicines available at JAK**

- A significantly higher percentage of respondents (100, 65.80%) believed that the JAK medicines are affordable to common man while some respondents (39, 25.70%) were of the opinion that pricing of JAK medicines is comparable to branded medicines.
- With reference to the quality of medicines available at JAK, majority of respondents (96, 63.20%) perceived that JAK medicines are comparable to

branded medicines. Significantly less percentage of respondents (27, 17.80%) thought that JAK medicines are unreliable.

- The availability of specialty medicines at JAK was assumed to be limited by the majority of respondents (70, 46.10%) while some respondents (43, 28.30%) believed that the scenario was comparable to that at private pharmacies.

Chandhok and Gautam (158) suggested that regular pricing policy reviews and minimizing over-prescribing of expensive branded treatments will help to sustain generic medicines' cost-effectiveness and impact. Ensuring effective communication and information dissemination about generic and branded drugs can help to raise awareness and acceptance. In contrast to our findings, Chaturvedi et al (e57630) reported that the majority of participants in their survey were unaware about Jan Aushadhi Scheme and believed that generic drugs lacked the quality of branded products. According to Perappadan, the top selling medicines at JAK are for diabetes, heart disease, gastrointestinal problems, and pain treatment. With sales of these medicines increasing 170 times, people have saved roughly ₹20,000 crore over the last nine years. A separate study evaluated the quality of JAK medicines and found it to be comparable in quality to branded medicines available in the market (Singhal et al. 2006).

#### **4.2.3 Services offered at JAK**

- The consultation service provided at JAK was recognised to be adequate by many respondents (75, 49.30%) but many respondents (61, 40.10%) also believed it to be excellent.
- A significantly higher percentage of respondents (92, 60.50%) agreed that the staff at JAK are knowledgeable and helpful. However, few respondents believed the staff at JAK are indifferent (22, 14.50% respondents), uninformed and unhelpful (19, 12.50% respondents).
- Majority of respondents (76, 50.00%) felt that the location of JAK is directly related to the speed of service provided at the JAK while some respondents 31, 20.40%) believed that the speed of service at JAK is fast and efficient.



In an earlier study, Solomon and Sundar (549) also noted in their study that the behaviour of the staff at JAK is negatively impacting the customer's feedback of JAK. They further suggested that JAK needs to focus on employee behaviour to improve customer satisfaction.

#### **4.2.4 Impact of JAK**

- A significant majority of respondents (112, 73.70%) felt that JAK had positively impacted the overall healthcare system. This might be due to the fact that JAK has increased the affordability of medicines and medical supplies for everyone.
- The healthcare expenses of people have reduced significantly as observed by many respondents (72, 47.40%) agreeing to it followed by few respondents (62, 40.80%), who perceived that there is only moderate reduction in their healthcare expenses.
- Large percentage of respondents (69, 45.40%) agreed that the existence of JAK has no impact on the other pharmacies in the area while some respondents (65, 42.80%) believed that it creates a healthy competition, so as to indirectly benefit the customers in terms of healthcare expenses.
- Many respondents (98, 64.50%) established that they had equal trust on medicines available at JAK as compared to private pharmacies. However, few respondents (43, 28.30%) trusted JAK medicines more than that of private pharmacies.
- Most of the respondents (88, 57.90%) appreciated the contribution of JAK towards reducing healthcare expenses and few respondents (33, 21.70%) also mentioned that the numerous location of JAK makes it convenient to avail cost-effective medicines on time.

According to a report submitted by Niti Aayog, the benefit of the JAK is visible in lower health-care costs, cost reductions, and improved medication accessibility and affordability (Best Practice).

#### **4.2.5 Advantages of JAK**

- With reference to the reliability of JAK in terms of medicine availability, a large number of the respondents accepted that they think JAK is reliable to some extent (79, 52% respondents) or very reliable (56, 36.80%) and most of the medicines will be available at JAK.
- Lower prices (78, 51.30% respondents) and better quality (48, 31.60% respondents) of the medicines were believed to be the most significant advantage of Jan Aushadhi Kendra when compared to other pharmacies.

A survey carried out by Srinivasan (8) also showed that drug cost is a significant factor influencing consumers' attitudes toward JAK medicines. The availability of low-cost good-quality medicines will reduce medical expenses of people and increase their willingness to purchase medicines from JAK.

#### **4.2.6 Challenges faced by JAK**

- The biggest challenge faced by JAK in maintaining the quality standards was believed to be supply chain issues (52, 34.20% respondents). However, many respondents also recognised lack of trained staff (39, 25.70%), inadequate infrastructure (32, 21.20%) and government regulations (29, 19.10%) as some of the other challenges faced by JAK.
- Majority of respondents (73, 48.00%) agreed that lack of awareness among the public is the biggest challenge faced by JAK in fulfilling its objectives. However, few respondents (45, 29.60%) believed that limited availability of medicines is the biggest challenge faced by JAK in fulfilling its objectives.

Thawani et al. (135) also agreed that poor supply chain is one of the major constraints faced by JAK leading to its poor success. The results were in sync with the study conducted by Chaturvedi et al. (e57630) which concluded that a large population of people are still unaware about generic medicines and JAK. They did not have any idea that Jan Aushadhi medicines are cheaper and safer.

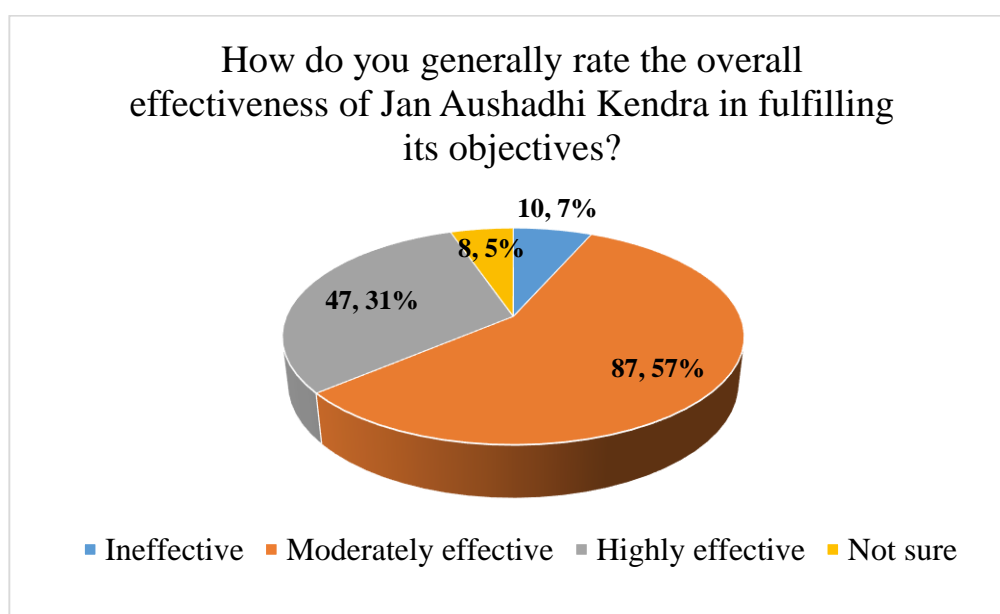
### 4.3 Feedback from Respondents

The feedback was collected from the respondents to acquire the opinion of respondents for improvement of services at JAK. The responses for the feedback pertaining to various parameters are mentioned in subsequent sub-sections.

#### 4.3.1 Effectiveness of JAK in fulfilling its objectives

About 57.00% respondents rated the overall effectiveness of JAK in fulfilling its objective as moderately effective followed closely with 31.00% respondents rating it as highly effective (Figure 4.2).

The results indicate that the majority of respondents believed that JAK is successful in fulfilling its objective by supplying low-cost quality medicines to public.

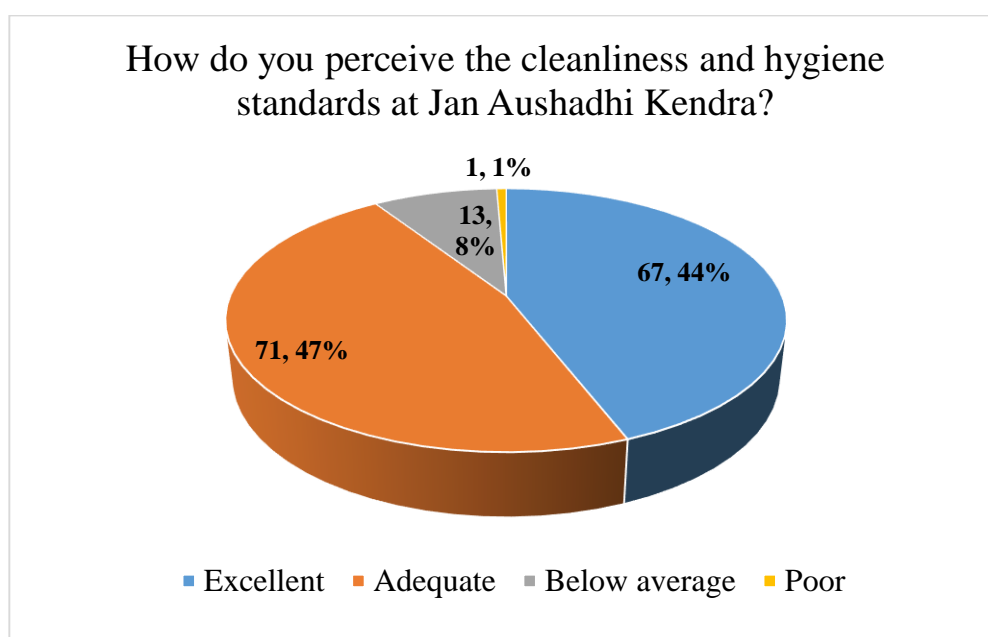


**Figure 4.2. Effectiveness of JAK in fulfilling its objectives**

### 4.3.2 Cleanliness and hygiene standards at JAK

The guidelines provided by the government for JAK states the necessity to strictly focus on the hygiene in the premises. Figure 4.3 indicates that 47.00% of respondents perceived the cleanliness and hygiene standards at JAK as adequate and 44.00% of respondents thought it to be excellent.

The results suggest that a significantly large percentage of respondents trusted JAK for maintaining cleanliness and hygiene standards.

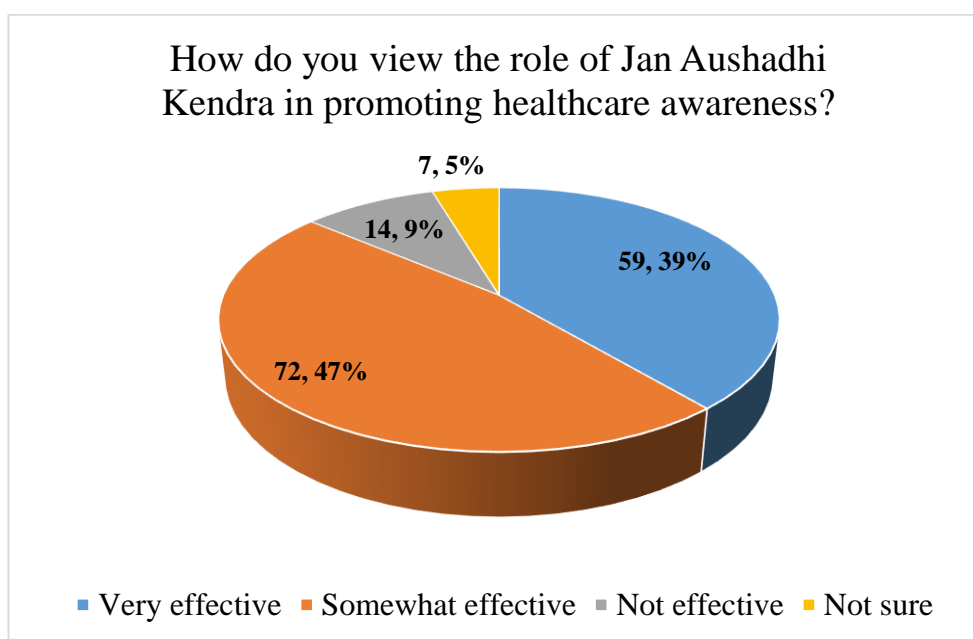


**Figure 4.3. Cleanliness and hygiene standards at JAK**

### 4.3.3 Role of JAK in promotion of healthcare awareness

JAK conducts mass drives for various government initiatives to promote awareness for sanitation among the public. Moreover, cleanliness drive initiatives are also carried out by JAK to promote good hygiene practices and maintain a clean and healthy environment. Medical camps and conferences are organized by JAK to create healthcare awareness. 39.00% of respondents view the role of JAK in promoting healthcare awareness as very effective and 47.00% feel it is effective to a certain extent (Figure 4.4).

The result points out that the majority of respondents were in agreement about the important role that JAK plays in promoting healthcare awareness among the public.



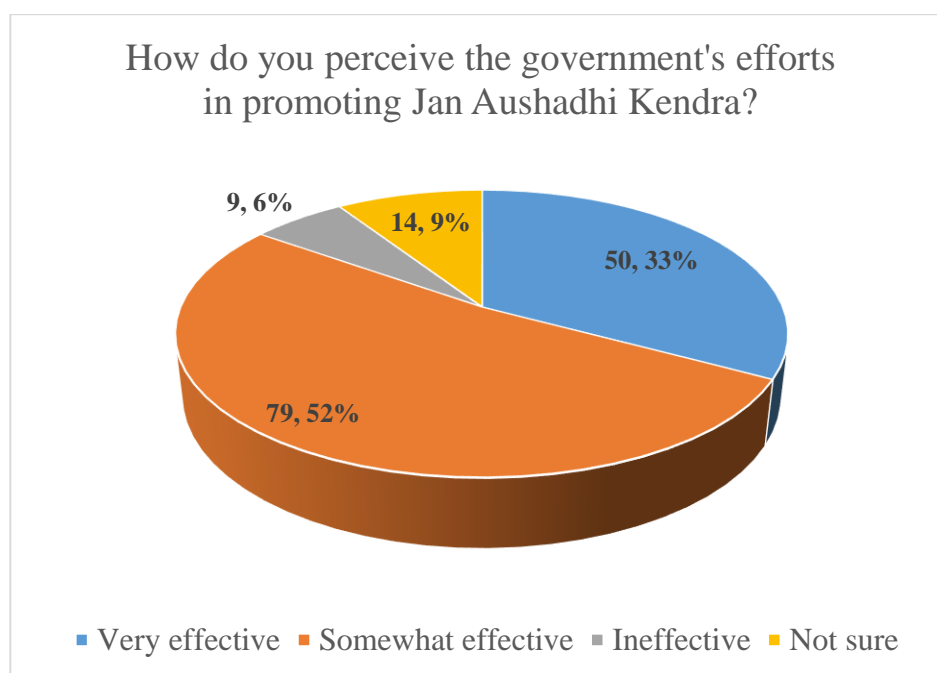
**Figure 4.4. Role of JAK in promotion of healthcare awareness**

#### 4.3.4 Government's efforts in promoting JAK

The government has taken several steps to promote the sale of generic medicines through JAK. It has launched a smartphone application called 'Janaushadhi Sugam' that informs the public about the locations of kendras, allows people to search for Janaushadhi medicines, and compares the maximum retail price of generic vs. branded drugs, among other features. Further, various guidelines issued by the government recommend all Central Government hospitals to prescribe generic medicines only ('Steps Taken for Promotion of Generic Medicines').

The survey points out that 52.00% of respondents perceived that the government's efforts in promoting JAK fairly effective while 33.00% respondents recognised that it is very effective (Figure 4.5).

The results suggest that respondents feel that the government's efforts are effective only to an extent in promoting JAK. More initiatives and promotional activities will be helpful in increasing the acceptance for JAK.



**Figure 4.5. Government's efforts in promoting JAK**

#### 4.4 Influence of Respondent's Age on Survey Responses

Age is one of the most important socioeconomic elements influencing respondents' opinions. Various scientific investigations have demonstrated that attitudes on a wide range of topics fluctuate among age groups (Dobronte). People belonging to the same age group usually have similar experiences, which influences their preferences (Longe).

Table 4.3 depicts the influence of respondent's age on the survey responses. The results indicate that there is no significant difference in the perception of respondents in different age groups. However, few outliers were observed in 18-29 years age group as follows:

- 83 (62.40%) believed that the biggest drawback of JAK is the availability of limited range of medicines.
- 68 (51.12%) perceived that the consultation service provided at JAK is adequate.

**Table 4.3. Result analysis of the influence of respondent's age**

Questions	Options	Age groups (in years)				p value
		18-29	30-40	41-50	Above 50	
What is your perception regarding Jan Aushadhi Kendra?	It provides poor quality medicines	10 (7.51%)	0 (0.00%)	2 (25.00%)	0 (0.00%)	0.7951
	It offers a limited range of medicines	32 (24.06%)	2 (22.22%)	1 (12.50%)	1 (50.00%)	
	It is a reliable source of affordable generic medicines	89 (66.91%)	7 (77.77%)	5 (62.50%)	1 (50.00%)	
	It is only accessible to the wealthy	2 (1.50%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	
What do you believe is the main reason behind the popularity of Jan Aushadhi Kendra?	High-quality medicines	19 (14.28%)	2 (22.22%)	1 (12.50%)	0 (0.00%)	0.9231
	Cost-effectiveness	90 (67.66%)	6 (66.66%)	7 (87.50%)	2 (100.00%)	
	Convenient location	15 (11.27%)	1 (11.11%)	0 (0.00%)	0 (0.00%)	
	Extensive range of medicines	9 (6.76%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	
How do you feel about the accessibility of information about services at Jan Aushadhi Kendra?	Easily accessible	71 (53.38%)	5 (55.55%)	4 (50.00%)	2 (100.00%)	0.6245
	Difficult to find	27 (20.30%)	0 (0.00%)	3 (37.50%)	0 (0.00%)	
	Insufficient information	21 (15.78%)	2 (22.22%)	1 (12.50%)	0 (0.00%)	
	Not sure	14 (10.52%)	2 (22.22%)	0 (0.00%)	0 (0.00%)	
How do you perceive the accessibility of Jan Aushadhi Kendra?	Easily accessible	72 (54.13%)	5 (55.55%)	2 (25.00%)	1 (50.00%)	0.4142
	Moderately accessible	48 (36.09%)	3 (33.33%)	4 (50.00%)	1 (50.00%)	
	Difficult to access	7 (5.26%)	0 (0.00%)	2 (25.00%)	0 (0.00%)	
	Only accessible to certain demographics	6 (4.51%)	1 (11.11%)	0 (0.00%)	0 (0.00%)	
What do you consider to be the biggest drawback of Jan Aushadhi Kendra?	Limited range of medicines	83 (62.40%)	9 (100.00%)	2 (25.00%)	1 (50.00%)	0.0047 <sup>#</sup>
	Poor customer service	23 (17.29%)	0 (0.00%)	1 (12.50%)	0 (0.00%)	
	Long waiting times	11 (8.27%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	
	Lack of trust in generic medicines	16 (12.03%)	0 (0.00%)	5 (62.50%)	1 (50.00%)	

How likely are you to recommend Jan Aushadhi Kendra to friends and family?	Very likely	55 (4.35%)	3 (33.33%)	1 (12.50%)	0 (0.00%)	0.6910
	Somewhat likely	67 (50.37%)	6 (66.66%)	6 (75.00%)	2 (100.00%)	
	Not likely	4 (3.00%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	
	Not sure	7 (5.26%)	0 (0.00%)	1 (12.50%)	0 (0.00%)	
How do you view the pricing of medicines at Jan Aushadhi Kendra?	Expensive	8 (6.01%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	0.4416
	Comparable to branded medicines	34 (25.56%)	2 (22.22%)	3 (37.50%)	2 (100%)	
	Affordable	87 (65.41%)	6 (66.66%)	5 (62.50%)	0 (0.00%)	
	Unpredictable	4 (3.00%)	1 (11.11%)	0 (0.00%)	0 (0.00%)	
How do you perceive the quality of medicines available at Jan Aushadhi Kendra?	Superior to branded medicines	26 (19.54%)	1 (11.11%)	0 (0.00%)	0 (0.00%)	0.6799
	Inferior to branded medicines	17 (12.78%)	0 (0.00%)	2 (25.00%)	0 (0.00%)	
	Comparable to branded medicines	81 (60.90%)	7 (77.77%)	6 (75.00%)	2 (100.00%)	
	Unreliable	9 (6.76%)	1 (11.11%)	0 (0.00%)	0 (0.00%)	
How do you perceive the availability of specialty medicines at Jan Aushadhi Kendra?	Limited	57 (42.85%)	8 (88.88%)	4 (50.00%)	1 (50.00%)	0.1743
	Extensive	25 (18.79%)	0 (0.00%)	1 (12.50%)	0 (0.00%)	
	Comparable to private pharmacies	40 (30.00%)	1 (11.11%)	2 (25.00%)	0 (0.00%)	
	Not sure	11 (8.27%)	0 (0.00%)	1 (12.50%)	1 (50.00%)	
How do you perceive the quality of consultation provided at Jan Aushadhi Kendra?	Excellent	52 (39.09%)	8 (88.88%)	1 (12.50%)	0 (0.00%)	0.0212 <sup>#</sup>
	Adequate	68 (51.12%)	1 (11.11%)	4 (50.00%)	2 (100.00%)	
	Poor	7 (5.26%)	0 (0.00%)	1 (12.50%)	0 (0.00%)	
	Not sure	6 (4.51%)	0 (0.00%)	2 (25.00%)	0 (0.00%)	
How do you feel about the staff expertise and assistance at Jan Aushadhi Kendra?	Knowledgeable and helpful	81 (60.90%)	7 (77.77%)	2 (25.00%)	2 (100.00%)	0.0820
	Uninformed and unhelpful	18 (13.53%)	0 (0.00%)	1 (12.50%)	0 (0.00%)	
	Indifferent	19 (14.28%)	2 (22.22%)	1 (12.50%)	0 (0.00%)	
	Varies depending on the location	15 (11.27%)	0 (0.00%)	4 (50.00%)	0 (0.00%)	
How do you perceive the	Fast and efficient	27 (20.30%)	1 (11.11%)	2 (25.00%)	1 (50.00%)	0.8517



speed of service at Jan Aushadhi Kendra?	Slow and inefficient	22 (16.54%)	1 (11.11%)	1 (12.50%)	0 (0.00%)	
	Varies depending on the location	67 (50.37%)	4 (44.44%)	4 (50.00%)	1 (50.00%)	
	Not sure	17 (12.78%)	3 (33.33%)	1 (12.50%)	0 (0.00%)	
What impact do you believe Jan Aushadhi Kendra has on the overall healthcare system?	Positive impact	97 (72.93%)	9 (100%)	4 (50.00%)	2 (100.00%)	0.5910
	Negative impact	11 (8.27%)	0 (0.00%)	1 (12.50%)	0 (0.00%)	
	No impact	14 (10.52%)	0 (0.00%)	1 (12.50%)	0 (0.00%)	
	Not sure	11 (8.27%)	0 (0.00%)	2 (25.00%)	0 (0.00%)	
How do you perceive the overall impact of Jan Aushadhi Kendra on their healthcare expenses?	Significant reduction	66 (49.62%)	3 (33.33%)	3 (37.50%)	0 (0.00%)	0.6054
	Moderate reduction	51 (38.34%)	4 (44.44%)	5 (62.50%)	2 (50.00%)	
	No impact	13 (9.77%)	2 (22.22%)	0 (0.00%)	0 (0.00%)	
	Increase in expenses	3 (2.25%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	
What impact do you believe Jan Aushadhi Kendra has on other pharmacies in the area?	It drives them out of business	13 (9.77%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	0.5903
	It has no impact	58 (43.60%)	5 (55.55%)	6 (75.00%)	0 (0.00%)	
	It creates healthy competition	57 (42.85%)	4 (44.44%)	2 (25.00%)	2 (100.00%)	
	It reduces the availability of medicines in the area	5 (3.75%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	
How do you view the level of trustworthiness of Jan Aushadhi Kendra compared to private pharmacies?	More trustworthy	41 (30.82%)	2 (22.22%)	0 (0.00%)	0 (0.00%)	0.1804
	Equally trustworthy	83 (62.40%)	7 (77.77%)	6 (75.00%)	2 (100.00%)	
	Less trustworthy	5 (3.75%)	0 (0.00%)	2 (25.00%)	0 (0.00%)	
	Not sure	4 (3.00%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	
What do you appreciate the most about Jan Aushadhi Kendra?	Its convenience in terms of location	31 (23.30%)	1 (11.11%)	1 (12.50%)	0 (0.00%)	0.3673
	Its customer service	27 (20.30%)	0 (0.00%)	1 (12.50%)	0 (0.00%)	
	Its contribution to reducing healthcare expenses	73 (54.88%)	7 (77.77%)	6 (75.00%)	2 (100.00%)	

	Its range of branded medicines	2 (1.50%)	1 (11.11%)	0 (0.00%)	0 (0.00%)	
How do you perceive the reliability of Jan Aushadhi Kendra in terms of medicine availability?	Very reliable	50 (37.59%)	5 (55.55%)	1 (12.50%)	0 (0.00%)	0.4888
	Somewhat reliable	69 (51.87%)	2 (22.22%)	6 (75.00%)	2 (100.00%)	
	Not reliable	7 (5.26%)	1 (11.11%)	0 (0.00%)	0 (0.00%)	
	Varies depending on the location	7 (5.26%)	1 (11.11%)	1 (12.50%)	0 (0.00%)	
What do you believe is the most significant advantage of Jan Aushadhi Kendra compared to other pharmacies?	Lower prices	64 (48.12%)	7 (77.77%)	5 (62.50%)	2 (100.00%)	0.6786
	Better quality medicines	45 (33.83%)	1 (11.11%)	2 (25.00%)	0 (0.00%)	
	Wider range of medicines	11 (8.27%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	
	Better customer service	13 (9.77%)	1 (11.11%)	1 (12.50%)	0 (0.00%)	
What do you believe is the biggest challenge faced by Jan Aushadhi Kendra in maintaining quality standards?	Lack of trained staff	36 (27.06%)	1 (11.11%)	1 (12.50%)	1 (50.00%)	0.2249
	Inadequate infrastructure	26 (19.54%)	1 (11.11%)	2 (25.00%)	0 (0.00%)	
	Supply chain issues	45 (33.83%)	6 (66.66%)	1 (12.50%)	0 (0.00%)	
	Government regulations	26 (19.54%)	1 (11.11%)	4 (50.00%)	1 (50.00%)	
What do you believe is the biggest challenge faced by Jan Aushadhi Kendra in fulfilling its objectives?	Lack of awareness among the public	62 (46.61%)	4 (44.44%)	5 (62.50%)	2 (50.00%)	0.7929
	Limited availability of medicines	39 (29.32%)	4 (44.44%)	2 (25.00%)	0 (0.00%)	
	Quality control issues	19 (14.28%)	0 (0.00%)	1 (12.50%)	0 (0.00%)	
	Government regulations	13 (9.77%)	1 (11.11%)	0 (0.00%)	0 (0.00%)	

Values are expressed as n (%); # p < 0.05 indicates that variables are significantly associated.

## 4.5 Effect on Respondent's Gender on Survey Responses

The gender-based analysis helps in investigating behavioural patterns and provides thorough understanding of outcomes. The gender questions guarantee that the respondents are representative of the larger population and allow investigation of the gender effects on the survey (Bhat).

Table 4.4 depicts effect of respondent's gender on the survey responses. The results indicate no significant difference in the perception of respondents based on gender. However, few outliers were observed in responses of male gender as follows:

- 62 (65.26%) felt that the main reason behind the popularity of JAK was cost-effectiveness of medicines.
- 57 (60.00%) considered limited range of medicines to be the biggest drawback of JAK.
- 42 (44.21%) thought that the location of JAK is directly related to the speed of service provided at the JAK.
- 45 (47.36%) agreed that the existence of JAK has no impact on the other pharmacies in the area.

**Table 4.4. Result analysis of the effect of respondent's gender**

Questions	Options	Gender		p value
		Male	Female	
What is your perception regarding Jan Aushadhi Kendra?	It provides poor quality medicines	7 (7.36%)	5 (8.77%)	0.7192
	It offers a limited range of medicines	23 (24.21%)	13 (22.80%)	
	It is a reliable source of affordable generic medicines	63 (66.31%)	39 (68.42%)	
	It is only accessible to the wealthy	2 (2.10%)	0 (0.00%)	
What do you believe is the main reason behind the popularity of Jan Aushadhi Kendra?	High-quality medicines	16 (16.84%)	6 (10.52%)	0.0464 <sup>#</sup>
	Cost-effectiveness	62 (65.26%)	43 (75.43%)	
	Convenient location	8 (8.42%)	8 (14.03%)	
	Extensive range of medicines	9 (9.47%)	0 (0.00%)	
How do you feel about the accessibility of information about	Easily accessible	50 (52.63%)	32 (56.14%)	0.8951
	Difficult to find	18 (18.94%)	12 (21.05%)	

services at Jan Aushadhi Kendra?	Insufficient information	16 (16.84%)	8 (14.03%)	
	Not sure	11 (11.57%)	5 (8.77%)	
How do you perceive the accessibility of Jan Aushadhi Kendra?	Easily accessible	51 (53.68%)	29 (50.87%)	0.9071
	Moderately accessible	34 (35.78%)	22 (38.59%)	
	Difficult to access	5 (5.26%)	2 (3.50%)	
	Only accessible to certain demographics	5 (5.26%)	4 (7.01%)	
What do you consider to be the biggest drawback of Jan Aushadhi Kendra?	Limited range of medicines	57 (60.00%)	38 (66.66%)	0.0380 <sup>#</sup>
	Poor customer service	18 (18.94%)	6 (10.52%)	
	Long waiting times	7 (7.36%)	4 (7.01%)	
	Lack of trust in generic medicines	13 (13.68%)	9 (15.78%)	
How likely are you to recommend Jan Aushadhi Kendra to friends and family?	Very likely	38 (40.00%)	21 (36.84%)	0.7938
	Somewhat likely	49 (51.57%)	32 (56.14%)	
	Not likely	2 (2.10%)	2 (3.50%)	
	Not sure	6 (6.31%)	2 (3.50%)	
How do you view the pricing of medicines at Jan Aushadhi Kendra?	Expensive	7 (7.36%)	1 (1.75%)	0.2681
	Comparable to branded medicines	26 (27.36%)	13 (22.80%)	
	Affordable	58 (61.05%)	42 (73.68%)	
	Unpredictable	4 (4.21%)	1 (1.75%)	
How do you perceive the quality of medicines available at Jan Aushadhi Kendra?	Superior to branded medicines	19 (20.00%)	8 (14.03%)	0.0988
	Inferior to branded medicines	14 (14.73%)	5 (8.77%)	
	Comparable to branded medicines	59 (62.10%)	37 (64.91%)	
	Unreliable	3 (3.15%)	7 (12.28%)	
How do you perceive the availability of specialty medicines at Jan	Limited	42 (44.21%)	28 (49.12%)	0.7167
	Extensive	16 (16.84%)	10 (17.54%)	
	Comparable to private pharmacies	27 (28.42%)	16 (28.07%)	

Aushadhi Kendra?	Not sure	10 (10.52%)	3 (5.26%)	
How do you perceive the quality of consultation provided at Jan Aushadhi Kendra?	Excellent	37 (38.94%)	24 (42.10%)	0.8192
	Adequate	47 (49.47%)	28 (49.12%)	
	Poor	5 (5.26%)	3 (5.26%)	
	Not sure	6 (6.31%)	2 (3.50%)	
How do you feel about the staff expertise and assistance at Jan Aushadhi Kendra?	Knowledgeable and helpful	58 (61.05%)	34 (59.64%)	0.1074
	Uninformed and unhelpful	16 (16.84%)	3 (5.26%)	
	Indifferent	11 (11.57%)	11 (19.29%)	
	Varies depending on the location	10 (10.52%)	9 (15.78%)	
How do you perceive the speed of service at Jan Aushadhi Kendra?	Fast and efficient	19 (20.00%)	12 (21.05%)	0.0331 <sup>#</sup>
	Slow and inefficient	15 (15.78%)	9 (15.78%)	
	Varies depending on the location	42 (44.21%)	34 (59.64%)	
	Not sure	19 (20.00%)	2 (3.50%)	
What impact do you believe Jan Aushadhi Kendra has on the overall healthcare system?	Positive impact	68 (71.57%)	44 (77.19%)	0.4900
	Negative impact	10 (10.52%)	2 (3.50%)	
	No impact	9 (9.47%)	6 (10.52%)	
	Not sure	8 (8.42%)	5 (8.77%)	
How do you perceive the overall impact of Jan Aushadhi Kendra on their healthcare expenses?	Significant reduction	46 (48.42%)	26 (45.61%)	0.9837
	Moderate reduction	38 (40.00%)	24 (42.10%)	
	No impact	9 (9.47%)	6 (10.52%)	
	Increase in expenses	2 (2.10%)	1 (1.75%)	
What impact do you believe Jan Aushadhi Kendra has on other pharmacies in the area?	It drives them out of business	11 (11.57%)	2 (3.50%)	0.0319 <sup>#</sup>
	It has no impact	45 (47.36%)	24 (42.10%)	
	It creates healthy competition	34 (35.78%)	31 (54.38%)	
	It reduces the availability of medicines in the area	5 (5.26%)	0 (0.00%)	

How do you view the level of trustworthiness of Jan Aushadhi Kendra compared to private pharmacies?	More trustworthy	27 (28.42%)	16 (28.07%)	0.6950
	Equally trustworthy	62 (65.26%)	36 (63.15%)	
	Less trustworthy	3 (3.15%)	4 (7.01%)	
	Not sure	3 (3.15%)	1 (1.75%)	
What do you appreciate the most about Jan Aushadhi Kendra?	Its convenience in terms of location	22 (23.15%)	11 (19.29%)	0.4790
	Its customer service	15 (15.78%)	13 (22.80%)	
	Its contribution to reducing healthcare expenses	57 (60.00%)	31 (54.38%)	
	Its range of branded medicines	1 (1.05%)	2 (3.50%)	
How do you perceive the reliability of Jan Aushadhi Kendra in terms of medicine availability?	Very reliable	37 (38.94%)	19 (33.33%)	0.1797
	Somewhat reliable	44 (46.31%)	35 (61.40%)	
	Not reliable	7 (7.36%)	1 (1.75%)	
	Varies depending on the location	7 (7.36%)	2 (3.50%)	
What do you believe is the most significant advantage of Jan Aushadhi Kendra compared to other pharmacies?	Lower prices	49 (51.57%)	29 (50.87%)	0.7935
	Better quality medicines	30 (31.57%)	18 (31.57%)	
	Wider range of medicines	8 (8.42%)	3 (5.26%)	
	Better customer service	8 (8.42%)	7 (12.28%)	
What do you believe is the biggest challenge faced by Jan Aushadhi Kendra in maintaining quality standards?	Lack of trained staff	23 (24.21%)	16 (28.07%)	0.0966
	Inadequate infrastructure	24 (25.26%)	5 (8.77%)	
	Supply chain issues	30 (31.57%)	22 (38.59%)	
	Government regulations	18 (18.94%)	14 (24.56%)	
What do you believe is the biggest challenge faced by Jan Aushadhi Kendra in fulfilling its objectives?	Lack of awareness among the public	41 (43.15%)	32 (56.14%)	0.3613
	Limited availability of medicines	32 (33.68%)	13 (22.80%)	
	Quality control issues	12 (12.63%)	8 (14.03%)	
	Government regulations	10 (10.52%)	4 (7.01%)	

Values are expressed as n (%); # p < 0.05 indicates that variables are significantly associated.

## 4.6 Consequences of Respondent's Educational Qualification on Survey Responses

The majority of the time, individuals with varying degrees of education exhibit glaring differences in viewpoint (Longe). Respondents who completed their education after high school may not have answered the same questions as those who have a four-year degree from a college or university (DeFranzo).

The effect of the respondent's educational background on the survey is represented in Table 4.5. The results indicate that there is no significant difference in the perception of respondents based on educational qualification. However, few outliers were observed in responses of respondents having graduation degree as follows:

- 51 (51%) felt that the information about JAK services is easily accessible.
- 68 (68%) believed that the JAK medicines are affordable.
- 46 (46%) perceived that the availability of specialty medicines at JAK was limited.
- 66 (66%) established that they had equal trust on medicines available at JAK as compared to private pharmacies.
- 56 (56%) appreciated the contribution of JAK towards reducing healthcare expenses.

**Table 4.5. Result analysis of the impact of educational qualification**

Questions	Options	Educational Qualification				p value
		Below 12th Std.	Graduation	Post-Graduation	Higher Studies	
What is your perception regarding Jan Aushadhi Kendra?	It provides poor quality medicines	2 (16.67%)	7 (7.00%)	2 (6.45%)	1 (11.11%)	0.0554
	It offers a limited range of medicines	4 (33.33%)	22 (22.00%)	5 (16.13%)	5 (55.56%)	

	It is a reliable source of affordable generic medicines	5 (41.67%)	71 (71.00%)	23 (74.19%)	3 (33.33%)	
	It is only accessible to the wealthy	1 (8.33%)	0 (0.00%)	1 (3.23%)	0 (0.00%)	
What do you believe is the main reason behind the popularity of Jan Aushadhi Kendra?	High-quality medicines	2 (16.67%)	16 (16.00%)	4 (12.90%)	0 (0.00%)	0.3572
	Cost-effectiveness	7 (58.33%)	65 (65.00%)	25 (80.65%)	8 (88.89%)	
	Convenient location	3 (25.00%)	12 (12.00%)	1 (3.23%)	0 (0.00%)	
	Extensive range of medicines	0 (0.00%)	7 (7.00%)	1 (3.23%)	1 (11.11%)	
How do you feel about the accessibility of information about services at Jan Aushadhi Kendra?	Easily accessible	8 (66.67%)	51 (51.00%)	19 (61.29%)	4 (44.44%)	0.0244 <sup>#</sup>
	Difficult to find	3 (25.00%)	21 (21.00%)	5 (16.13%)	1 (11.11%)	
	Insufficient information	1 (8.33%)	16 (16.00%)	7 (22.57%)	0 (0.00%)	
	Not sure	0 (0.00%)	12 (12.00%)	0 (0.00%)	4 (44.44%)	
How do you perceive the accessibility of Jan Aushadhi Kendra?	Easily accessible	7 (58.33%)	53 (53.00%)	16 (51.61%)	4 (44.44%)	0.3465
	Moderately accessible	4 (33.33%)	37 (37.00%)	13 (41.93%)	2 (22.22%)	
	Difficult to access	1 (8.33%)	4 (4.00%)	0 (0.00%)	2 (22.22%)	
	Only accessible to certain demographics	0 (0.00%)	6 (6.00%)	2 (6.45%)	1 (11.11%)	
What do you consider to be the biggest drawback of Jan Aushadhi Kendra?	Limited range of medicines	4 (33.33%)	65 (65.00%)	20 (64.52)	6 (66.67%)	0.6860
	Poor customer service	4 (33.33%)	15 (15.00%)	4 (12.90%)	1 (11.11%)	
	Long waiting times	2 (16.67%)	6 (6.00%)	2 (6.45%)	1 (11.11%)	
	Lack of trust in generic medicines	2 (16.67%)	14 (14.00%)	5 (16.13%)	1 (11.11%)	
How likely are you to recommend Jan Aushadhi Kendra to friends and family?	Very likely	2 (16.67%)	40 (40.00%)	12 (38.71%)	5 (55.56%)	0.3386
	Somewhat likely	7 (58.33%)	54 (54.00%)	17 (54.83%)	3 (33.33%)	
	Not likely	1 (8.33%)	3 (3.00%)	0 (0.00%)	0 (0.00%)	
	Not sure	2 (16.67%)	3 (3.00%)	2 (6.45%)	1 (11.11%)	



How do you view the pricing of medicines at Jan Aushadhi Kendra?	Expensive	3 (25.00%)	4 (4.00%)	1 (3.23%)	0 (0.00%)	0.0053 <sup>#</sup>
	Comparable to branded medicines	5 (41.67%)	27 (27.00%)	4 (12.90%)	3 (33.33%)	
	Affordable	3 (25.00%)	68 (68.00%)	23 (74.19)	6 (66.67%)	
	Unpredictable	1 (8.33%)	1 (1.00%)	3 (9.68%)	0 (0.00%)	
How do you perceive the quality of medicines available at Jan Aushadhi Kendra?	Superior to branded medicines	3 (25.00%)	21 (21.00%)	3 (9.68%)	0 (0.00%)	0.0775
	Inferior to branded medicines	1 (8.33%)	15 (15.00%)	2 (6.45%)	1 (11.11%)	
	Comparable to branded medicines	5 (41.67%)	59 (59.00%)	24 (77.42%)	8 (88.89%)	
	Unreliable	3 (25.00%)	5 (5.00%)	2 (6.45%)	0 (0.00%)	
How do you perceive the availability of specialty medicines at Jan Aushadhi Kendra?	Limited	0 (0.00%)	46 (46.00%)	18 (58.06%)	6 (66.67%)	0.0082 <sup>#</sup>
	Extensive	5 (41.67%)	20 (20.00%)	1 (3.23%)	0 (0.00%)	
	Comparable to private pharmacies	4 (33.33%)	27 (27.00%)	9 (29.03%)	3 (33.33%)	
	Not sure	3 (25.00%)	7 (7.00%)	3 (9.68%)	0 (0.00%)	
How do you perceive the quality of consultation provided at Jan Aushadhi Kendra?	Excellent	4 (33.33%)	40 (40.00%)	12 (38.71%)	5 (55.56%)	0.6251
	Adequate	6 (50.00%)	51 (51.00%)	15 (48.39%)	3 (33.33%)	
	Poor	2 (16.67%)	3 (3.00%)	2 (6.45%)	1 (11.11%)	
	Not sure	0 (0.00%)	6 (6.00%)	2 (6.45%)	0 (0.00%)	
How do you feel about the staff expertise and assistance at Jan Aushadhi Kendra?	Knowledgeable and helpful	5 (41.67%)	65 (65.00%)	16 (51.61%)	6 (66.67%)	0.0749
	Uninformed and unhelpful	1 (8.33%)	15 (15.00%)	2 (6.45%)	1 (11.11%)	
	Indifferent	2 (16.67%)	11 (11.00%)	9 (29.03%)	0 (0.00%)	
	Varies depending on the location	4 (33.33%)	9 (9.00%)	4 (12.90%)	2 (22.22%)	
How do you perceive the speed of service at Jan	Fast and efficient	4 (33.33%)	22 (22.00%)	4 (12.90%)	1 (11.11%)	0.5018
	Slow and inefficient	1 (8.33%)	19 (19.00%)	3 (9.68%)	1 (11.11%)	

Aushadhi Kendra?	Varies depending on the location	4 (33.33%)	48 (48.00%)	18 (58.06%)	6 (66.67%)	
	Not sure	3 (25.00%)	11 (11.00%)	6 (19.35%)	1 (11.11%)	
What impact do you believe Jan Aushadhi Kendra has on the overall healthcare system?	Positive impact	7 (58.33%)	71 (71.00%)	27 (87.10%)	7 (77.78%)	0.1559
	Negative impact	1 (8.33%)	11 (11.00%)	0 (0.00%)	0 (0.00%)	
	No impact	3 (25.00%)	7 (7.00%)	3 (9.68%)	2 (22.22%)	
	Not sure	1 (8.33%)	11 (11.00%)	1 (3.23%)	0 (0.00%)	
How do you perceive the overall impact of Jan Aushadhi Kendra on their healthcare expenses?	Significant reduction	4 (33.33%)	47 (47.00%)	18 (58.06%)	3 (33.33%)	0.7260
	Moderate reduction	7 (58.33%)	40 (40.00%)	11 (35.48%)	4 (44.44%)	
	No impact	1 (8.33%)	10 (10.00%)	2 (6.45%)	2 (22.22%)	
	Increase in expenses	0 (0.00%)	3 (3.00%)	0 (0.00%)	0 (0.00%)	
What impact do you believe Jan Aushadhi Kendra has on other pharmacies in the area?	It drives them out of business	3 (25.00%)	7 (7.00%)	3 (9.68%)	0 (0.00%)	0.2130
	It has no impact	7 (58.33%)	43 (43.00%)	16 (51.61%)	3 (33.33%)	
	It creates healthy competition	2 (16.67%)	47 (47.00%)	10 (32.26%)	6 (66.67%)	
	It reduces the availability of medicines in the area	0 (0.00%)	3 (3.00%)	2 (6.45%)	0 (0.00%)	
How do you view the level of trustworthiness of Jan Aushadhi Kendra compared to private pharmacies?	More trustworthy	2 (16.67%)	29 (29.00%)	8 (25.81%)	4 (44.44%)	0.0149 <sup>#</sup>
	Equally trustworthy	8 (66.67%)	66 (66%)	21 (67.74%)	3 (33.33%)	
	Less trustworthy	0 (0.00%)	3 (3.00%)	2 (6.45%)	2 (22.22%)	
	Not sure	2 (16.67%)	2 (2.00%)	0 (0.00%)	0 (0.00%)	
What do you appreciate the most about Jan Aushadhi Kendra?	Its convenience in terms of location	3 (25.00%)	23 (23.00%)	7 (22.57%)	0 (0.00%)	0.0350 <sup>#</sup>
	Its customer service	5 (41.67%)	19 (19.00%)	1 (3.23%)	3 (33.33%)	
	Its contribution to reducing healthcare expenses	4 (33.33%)	56 (56.00%)	23 (74.19%)	5 (55.56%)	

	Its range of branded medicines	0 (0.00%)	2 (2.00%)	0 (0.00%)	1 (11.11%)	
How do you perceive the reliability of Jan Aushadhi Kendra in terms of medicine availability?	Very reliable	3 (25.00%)	38 (38.00%)	12 (38.71%)	3 (33.33%)	0.2373
	Somewhat reliable	8 (66.67%)	54 (54.00%)	13 (41.93%)	4 (44.44%)	
	Not reliable	0 (0.00%)	4 (4.00%)	2 (6.45%)	2 (22.22%)	
	Varies depending on the location	1 (8.33%)	4 (4.00%)	4 (12.90%)	0 (0.00%)	
What do you believe is the most significant advantage of Jan Aushadhi Kendra compared to other pharmacies?	Lower prices	7 (58.33%)	47 (47.00%)	17 (54.83%)	7 (77.78%)	0.5947
	Better quality medicines	4 (33.33%)	35 (35.00%)	7 (22.57%)	2 (22.22%)	
	Wider range of medicines	0 (0.00%)	9 (9.00%)	2 (6.45%)	0 (0.00%)	
	Better customer service	1 (8.33%)	9 (9.00%)	5 (16.13%)	0 (0.00%)	
What do you believe is the biggest challenge faced by Jan Aushadhi Kendra in maintaining quality standards?	Lack of trained staff	3 (25.00%)	28 (28.00%)	5 (16.13%)	3 (33.33%)	0.1833
	Inadequate infrastructure	3 (25.00%)	15 (15.00%)	9 (29.03%)	2 (22.22%)	
	Supply chain issues	2 (16.67%)	39 (39.00%)	7 (22.57%)	4 (44.44%)	
	Government regulations	4 (33.33%)	18 (18.00%)	10 (32.26%)	0 (0.00%)	
What do you believe is the biggest challenge faced by Jan Aushadhi Kendra in fulfilling its objectives?	Lack of awareness among the public	7 (58.33%)	47 (47.00%)	15 (48.39%)	4 (44.44%)	0.6729
	Limited availability of medicines	2 (16.67%)	28 (28.00%)	11 (35.48%)	4 (44.44%)	
	Quality control issues	3 (25.00%)	14 (14.00%)	3 (9.68%)	0 (0.00%)	
	Government regulations	0 (0.00%)	11 (11.00%)	2 (6.45%)	1 (11.11%)	

Values are expressed as n (%); # p < 0.05 indicates that variables are significantly associated.

## 4.7 Impact of Respondent's Income on Survey Responses

Income is a significant and difficult concept to quantify in health-related studies. Income is strongly connected with a variety of critical health, economic, and sociological outcomes. (Davern et al. 1534).

Table 4.6 depicts the influence of respondent's income on survey responses. The results indicate that there is no significant difference in the perception of respondents based on income per month. However, few outliers were observed in responses of respondents with income below 25K as follows:

- 60 (64.52%) felt that the main reason behind the popularity of JAK was cost-effectiveness of medicines.
- 45 (48.39%) thought that the location of JAK is directly related to the speed of service provided at the JAK.
- 36 (38.71%) perceived that the availability of specialty medicines at JAK was limited.

**Table 4.6. Result analysis of the influence of respondent's income**

Questions	Options	Income					p value
		Below 25 K	25 K -50 K	50 K - 1 Lakh	1 Lakh - 2 Lakh	Above 2 Lakh	
What is your perception regarding Jan Aushadhi Kendra?	It provides poor quality medicines	7 (7.53%)	1 (2.94%)	2 (14.29%)	0 (0.00%)	2 (28.57%)	0.1396
	It offers a limited range of medicines	23 (24.73%)	9 (26.47%)	2 (14.29%)	1 (25.00%)	1 (14.29%)	
	It is a reliable source of affordable generic medicines	62 (66.67%)	24 (70.59%)	10 (71.43%)	3 (75.00%)	3 (42.86%)	
	It is only accessible to the wealthy	1 (1.08%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	1 (14.29%)	

What do you believe is the main reason behind the popularity of Jan Aushadhi Kendra?	High-quality medicines	15 (16.13%)	3 (8.82%)	2 (14.29%)	4 (100%)	3 (42.86%)	0.0046 <sup>#</sup>
	Cost-effectiveness	60 (64.52%)	28 (82.35%)	9 (64.29%)	0 (0.00%)	4 (42.86%)	
	Convenient location	11 (11.83%)	3 (8.82%)	2 (14.29%)	0 (0.00%)	0 (0.00%)	
	Extensive range of medicines	7 (7.53%)	0 (0.00%)	1 (7.14%)	0 (0.00%)	0 (0.00%)	
How do you feel about the accessibility of information about services at Jan Aushadhi Kendra?	Easily accessible	50 (53.76%)	18 (52.94%)	7 (50.00%)	2 (50.00%)	5 (71.43%)	0.4098
	Difficult to find	22 (23.66%)	3 (8.82%)	2 (14.29%)	1 (25.00%)	2 (28.57%)	
	Insufficient information	10 (10.75%)	10 (29.41%)	3 (21.43%)	1 (25.00%)	0 (0.00%)	
	Not sure	11 (11.83%)	3 (8.82%)	2 (14.29%)	0 (0.00%)	0 (0.00%)	
How do you perceive the accessibility of Jan Aushadhi Kendra?	Easily accessible	50 (53.76%)	18 (52.94%)	5 (35.71%)	3 (75.00%)	5 (71.43%)	0.3826
	Moderately accessible	34 (36.56%)	13 (38.24%)	5 (35.71%)	1 (25.00%)	2 (28.57%)	
	Difficult to access	6 (6.45%)	0 (0.00%)	1 (7.14%)	0 (0.00%)	0 (0.00%)	
	Only accessible to certain demographics	3 (3.23%)	3 (8.82%)	3 (21.43%)	0 (0.00%)	0 (0.00%)	
What do you consider to be the biggest drawback of Jan Aushadhi Kendra?	Limited range of medicines	54 (58.06%)	29 (85.29%)	6 (42.86%)	2 (50.00%)	4 (57.14%)	0.0791
	Poor customer service	19 (20.43%)	1 (2.94%)	3 (21.43%)	1 (25.00%)	0 (0.00%)	
	Long waiting times	5 (5.38%)	2 (5.88%)	2 (14.29%)	0 (0.00%)	2 (28.57%)	
	Lack of trust in generic medicines	15 (16.13%)	2 (5.88%)	3 (21.43%)	1 (25.00%)	1 (14.29%)	
How likely are you to recommend Jan	Very likely	39 (41.94%)	16 (47.06%)	1 (7.14%)	2 (50.00%)	2 (28.57%)	0.3851
	Somewhat likely	46 (49.46%)	16 (47.06%)	11 (78.57%)	2 (50.00%)	5 (71.43%)	

Aushadhi Kendra to friends and family?	Not likely	4 (4.30%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	
	Not sure	4 (4.30%)	2 (5.88%)	2 (14.29%)	0 (0.00%)	0 (0.00%)	
How do you view the pricing of medicines at Jan Aushadhi Kendra?	Expensive	4 (4.30%)	2 (5.88%)	0 (0.00%)	0 (0.00%)	2 (28.57%)	0.2642
	Comparable to branded medicines	27 (29.03%)	7 (20.59%)	5 (35.71%)	0 (0.00%)	0 (0.00%)	
	Affordable	59 (63.44%)	24 (70.59%)	8 (57.14%)	4 (100.0%)	5 (71.43%)	
	Unpredictable	3 (3.23%)	1 (2.94%)	1 (7.14%)	0 (0.00%)	0 (0.00%)	
How do you perceive the quality of medicines available at Jan Aushadhi Kendra?	Superior to branded medicines	18 (19.35%)	4 (11.76%)	3 (21.43%)	1 (25.00%)	2 (28.57%)	0.4347
	Inferior to branded medicines	12 (12.90%)	1 (2.94%)	3 (21.43%)	0 (0.00%)	2 (28.57%)	
	Comparable to branded medicines	55 (59.14%)	28 (82.35%)	7 (50.00%)	3 (75.00%)	3 (42.86%)	
	Unreliable	8 (8.60%)	1 (2.94%)	1 (7.14%)	0 (0.00%)	0 (0.00%)	
How do you perceive the availability of specialty medicines at Jan Aushadhi Kendra?	Limited	36 (38.71%)	24 (70.59%)	8 (57.14%)	1 (25.00%)	1 (14.29%)	0.0121 <sup>#</sup>
	Extensive	18 (19.35%)	0 (0.00%)	3 (21.43%)	1 (25.00%)	4 (57.14%)	
	Comparable to private pharmacies	29 (31.18%)	9 (26.47%)	2 (14.29%)	2 (50.00%)	1 (14.29%)	
	Not sure	10 (10.75%)	1 (2.94%)	1 (7.14%)	0 (0.00%)	1 (14.29%)	
How do you perceive the quality of consultation provided at Jan Aushadhi Kendra?	Excellent	34 (36.56%)	15 (44.12%)	8 (57.14%)	0 (0.00%)	4 (57.14%)	0.2930
	Adequate	49 (52.69%)	17 (50.00%)	4 (28.57%)	2 (50.00%)	3 (42.86%)	
	Poor	6 (6.45%)	0 (0.00%)	1 (7.14%)	1 (25.00%)	0 (0.00%)	
	Not sure	4 (4.30%)	2 (5.88%)	1 (7.14%)	1 (25.00%)	0 (0.00%)	
How do you feel about the staff expertise and assistance at Jan	Knowledgeable and helpful	58 (62.37%)	22 (64.71%)	6 (42.86%)	2 (50.00%)	5 (71.43%)	0.2468
	Uninformed and unhelpful	13 (13.98%)	2 (5.88%)	1 (7.14%)	0 (0.00%)	2 (28.57%)	
	Indifferent	10 (10.75%)	8 (23.53%)	3 (21.43%)	1 (25.00%)	0 (0.00%)	

Aushadhi Kendra?	Varies depending on the location	12 (12.90%)	2 (5.88%)	4 (28.57%)	1 (25.00%)	0 (0.00%)	
How do you perceive the speed of service at Jan Aushadhi Kendra?	Fast and efficient	18 (19.35%)	5 (14.71%)	1 (7.14%)	1 (25.00%)	6 (85.71%)	0.0004 <sup>#</sup>
	Slow and inefficient	18 (19.35%)	0 (0.00%)	4 (28.57%)	2 (50.00%)	0 (0.00%)	
	Varies depending on the location	45 (48.39%)	23 (67.65%)	7 (50.00%)	1 (25.00%)	0 (0.00%)	
	Not sure	12 (12.90%)	6 (17.65%)	2 (14.29%)	0 (0.00%)	1 (14.29%)	
What impact do you believe Jan Aushadhi Kendra has on the overall healthcare system?	Positive impact	67 (72.04%)	27 (79.41%)	10 (71.43%)	3 (75.00%)	5 (71.43%)	0.5235
	Negative impact	10 (10.75%)	0 (0.00%)	2 (14.29%)	0 (0.00%)	0 (0.00%)	
	No impact	9 (9.68%)	4 (11.76%)	1 (7.14%)	1 (25.00%)	0 (0.00%)	
	Not sure	7 (7.53%)	3 (8.82%)	1 (7.14%)	0 (0.00%)	2 (28.57%)	
How do you perceive the overall impact of Jan Aushadhi Kendra on their healthcare expenses?	Significant reduction	42 (45.16%)	19 (55.88%)	6 (42.86%)	2 (50.00%)	3 (42.86%)	0.9581
	Moderate reduction	39 (41.94%)	11 (32.35%)	6 (42.86%)	2 (50.00%)	4 (57.14%)	
	No impact	9 (9.68%)	4 (11.76%)	2 (14.29%)	0 (0.00%)	0 (0.00%)	
	Increase in expenses	3 (3.23%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	
What impact do you believe Jan Aushadhi Kendra has on other pharmacies in the area?	It drives them out of business	7 (7.53%)	2 (5.88%)	0 (0.00%)	1 (25.00%)	3 (42.86%)	0.2232
	It has no impact	42 (45.16%)	16 (47.06%)	8 (57.14%)	1 (25.00%)	2 (28.57%)	
	It creates healthy competition	41 (44.09%)	15 (44.12%)	5 (35.71%)	2 (50.00%)	2 (28.57%)	
	It reduces the availability of medicines in the area	3 (3.23%)	1 (2.94%)	1 (7.14%)	0 (0.00%)	0 (0.00%)	
How do you view the level of	More trustworthy	25 (26.88%)	12 (35.29%)	3 (21.43%)	0 (0.00%)	3 (42.86%)	0.1598

trustworthin ess of Jan Aushadhi Kendra compared to private pharmacies?	Equally trustworth y	60 (64.52%)	22 (64.71%)	8 (57.14%)	4 (100.00%)	4 (57.14%)	
	Less trustworth y	4 (4.30%)	0 (0.00%)	3 (21.43%)	0 (0.00%)	0 (0.00%)	
	Not sure	4 (4.30%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	0 (0.00%)	
What do you appreciate the most about Jan Aushadhi Kendra?	Its convenienc e in terms of location	20 (21.51%)	7 (20.59%)	2 (14.29%)	1 (25.00%)	3 (42.86%)	0.5121
	Its customer service	20 (21.51%)	3 (8.82%)	4 (28.57%)	0 (0.00%)	0 (0.00%)	
	Its contributio n to reducing healthcare expenses	51 (54.84%)	24 (70.59%)	7 (50.00%)	3 (75.00%)	4 (57.14%)	
	Its range of branded medicines	2 (2.15%)	0 (0.00%)	1 (7.14%)	0 (0.00%)	0 (0.00%)	
How do you perceive the reliability of Jan Aushadhi Kendra in terms of medicine availability?	Very reliable	28 (30.11%)	17 (50.00%)	5 (35.71%)	2 (50.00%)	4 (57.14%)	0.0658
	Somewhat reliable	55 (59.14%)	16 (47.06%)	4 (35.71%)	2 (50.00%)	2 (28.57%)	
	Not reliable	4 (4.30%)	0 (0.00%)	3 (21.43%)	0 (0.00%)	1 (14.29%)	
	Varies depending on the location	6 (6.45%)	1 (2.94%)	2 (14.29%)	0 (0.00%)	0 (0.00%)	
What do you believe is the most significant advantage of Jan Aushadhi Kendra compared to other pharmacies?	Lower prices	30 (32.26%)	9 (26.47%)	6 (42.86%)	0 (0.00%)	4 (57.14%)	0.4663
	Better quality medicines	7 (7.53%)	1 (2.94%)	1 (7.14%)	1 (25.00%)	1 (14.29%)	
	Wider range of medicines	8 (8.60%)	5 (14.71%)	1 (7.14%)	1 (25.00%)	0 (0.00%)	
	Better customer service	30 (32.26%)	9 (26.47%)	6 (42.86%)	0 (0.00%)	4 (57.14%)	
What do you believe is the biggest challenge faced by Jan Aushadhi	Lack of trained staff	27 (29.03%)	5 (14.71%)	3 (21.43%)	1 (25.00%)	3 (42.86%)	0.1460
	Inadequate infrastruct ure	16 (17.20%)	7 (20.59%)	6 (42.86%)	0 (0.00%)	0 (0.00%)	



Kendra in maintaining quality standards?	Supply chain issues	34 (36.56%)	10 (29.41%)	3 (21.43%)	2 (50.00%)	3 (42.86%)	
	Government regulations	16 (17.20%)	12 (35.29%)	2 (14.29%)	1 (25.00%)	0 (0.00%)	
What do you believe is the biggest challenge faced by Jan Aushadhi Kendra in fulfilling its objectives?	Lack of awareness among the public	44 (47.31%)	15 (44.12%)	6 (42.86%)	2 (50.00%)	7 (100.00%)	0.1183
	Limited availability of medicines	25 (26.88%)	15 (44.12%)	4 (28.57%)	1 (25.00%)	0 (0.00%)	
	Quality control issues	16 (17.20%)	0 (0.00%)	3 (21.43%)	1 (25.00%)	0 (0.00%)	
	Government regulations	8 (8.60%)	4 (11.76%)	1 (7.14%)	0 (0.00%)	0 (0.00%)	

Values are expressed as n (%); #  $p < 0.05$  indicates that variables are significantly associated.

## **CHAPTER 5**

### **SUMMARY**

Globally, pharmaceutical expenditures have been increasing relative to overall healthcare spending. As a result, the nation's finances are overextended, and many people do not have access to necessary therapies. Even while India has emerged as a global hub for the production of generic drugs, the expected cost savings are not being realized by the average person. Part of the reason for this is the increase in branded generics, which are available for around the same price as innovator names. Despite being much less expensive and just as effective as branded prescriptions, unbranded generic meds are not being prescribed because of a lack of trust and perception. Because of this, the vast majority of Indians still pay "out of pocket" for more costly branded medications.

Study of JAK is important to gain insightful information into its role in enhancing healthcare quality, cost, and accessibility of medicines, which are essential elements of a functional healthcare system.

The main aim of this survey is to understand the impact and outreach of JAK, which was assessed based on the overall perception of the people towards JAK. Influence of the socio-demographic factors like age, gender, educational qualification and income on people's perception of JAK was also analysed. The results of the study indicate that people agreed on cost-effectiveness and trusted the quality of the Jan Aushadhi medicines. People are also satisfied with the services provided at JAK. However, most of the respondents believed that the major factor responsible for limited success of JAK till date is lack of awareness among public and limited range of medicines offered at JAK.

Through this research work it was established that people look forward to the better service, easy accessibility, good quality and affordability of the medicines available at the JAK.

**Table 5.1. Summary of hypotheses testing**

<b>Hypotheses</b>	<b>p value</b>	<b>Observation</b>
To analyze the socio-demographic factors and its influence on people's perception towards JAK		
Age	NS	There was no difference between age-groups.
Gender	NS	There was no difference between male and female.
Educational qualification	NS	There was no difference between education groups
Income	NS	There was no difference between income groups

NS – Not significant

There is no significant relationship between demographic factors and people's perception of JAK.

Hence, Null hypothesis is accepted.

## CHAPTER 6

### CONCLUSION AND RECOMMENDATIONS FOR FUTURE

While recommending generic drugs rather than branded ones is becoming more and more commonplace globally, it hasn't caught on in India. This trend is influenced by a number of factors, such as the scarcity of generic medications, medical professionals' doubts about their efficacy, and the general public's ignorance of these formulations. The Pradhan Mantri Bharatiya Janaushadhi Pariyojna, often known as the Jan Aushadhi Yojna, was initiated by the Indian government to lessen the financial burden that costly branded pharmaceuticals place on the average person. Through Jan Aushadhi Kendras, this program provides affordable, high-quality generic medications in place of pricey branded ones found in pharmacies. However, there is a lack of empirical evidence on customers' attitudes and experiences with generic pharmaceuticals through Jan Aushadhi stores, hindering policy implementation. While retail pharmacies in other countries offer generic medications, the government-initiated opening of stores in India is unique. Since the policy's launch, there has been insufficient research to provide reliable feedback on public knowledge and attitudes towards it.

The current study found that consumers are aware of Jan Aushadhi Kendras and have faith in them to provide high-quality, reasonably priced medications. The primary obstacle to the prosperity of Jan Aushadhi Kendras, however, was the restricted selection of medications, particularly specialty medications, and the supply chain system. Furthermore, further campaigns need to be launched to persuade more people to use JAK. Therefore, in order to assist the average person in fully adopting this special, well-intentioned initiative, healthcare professionals and authorities need to take a more proactive approach in disseminating information about the plan and clearing up any misconceptions around generics.

## **LIMITATIONS OF THE STUDY AND RECOMMENDATIONS FOR FUTURE STUDIES**

The purpose of the study was to evaluate the outreach and influence of Jan Aushadhi Kendras and to learn how the public views these organizations in Ahmedabad, Gujarat. Due to variations in socioeconomic status and level of education, the statistics produced might not be entirely representative of the total population in the area. It is possible to broaden the study to include residents of rural areas.

A convenient sample size of 152 people was used for the investigation. A higher sample size would have provided a more thorough understanding of the results.

Majority of the respondents in the study were male belonging to 18-29 years age group and having graduation degree with income below 25K. This reflects a ceiling effect, which affected the ability to effectively measure and distinguish between participants' true responses. Further study with more nuanced and open-ended survey questions with larger population will be helpful in gaining better insight for the survey.

## **SUGGESTIONS FOR EXPANDING THE JAK'S OUTREACH**

- JAK requires further marketing initiatives.
- Drugs should be accessible online and at nearby pharmacies.
- Awareness activities are carried out in rural regions.
- Increase in healthcare budget for infrastructure
- Public-private partnership models for generic medications to reach a larger audience.
- Motivating physicians working in government hospitals to recommend Jan Aushadhi medicines.
- Collaborating with local hospitals, clinics and doctors are essential for raising awareness of PMBJP and Jan Aushadhi Kendra.
- Efficiency in the supply chain, manufacturing, and storage to lower input costs and maintain affordable prices.

## CHAPTER 7

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## **CHAPTER 8**

### **APPENDIX**

The online survey was conducted through Google Form. A questionnaire was drafted based on the literature search conducted. The questions were logically framed which basically aimed at achieving the objectives of the study. The questionnaire had 25 single-answer multiple choice questions, each with four options. The questionnaire was divided into three sections.

**Section I:** Socio-demographic Details

**Section II:** Overall Perception towards Jan Aushadhi

**Section III:** Feedback about Jan Aushadhi Kendra

# Empowering Communities through Jan Aushadhi Kendra: In-Depth Analysis of Outreach and Impact

This Research Survey is undertaken as a part of Final Year Project Work in Semester VIII for the degree of Bachelor of Pharmacy. The main aim of the study is to access the outreach and impact of **Jan Aushadhi Kendra** in Ahmedabad city.

The survey is conducted by group of four students from Institute of Pharmacy, Nirma University.

1. Vasoya KrishnA R. (20BPH120)
2. Patel Prince R. (20BPH075)
3. Parmar Utsav D. (20BPH123)
4. Patel Yatrik G. (20BPH115)

By filling the form, you are agreeing to participate in the study. We ensure you that your data would be treated confidentially and your opinions or details wouldn't be disclosed unless compelled by law.

\* Indicates required question

## Section I: Socio-demographic Details

1. Name \*

---

2. Age \*

*Mark only one oval.*

- ☐ 18 to 29
- ☐ 30 to 40
- ☐ 41 to 50
- ☐ Above 50

3. Gender \*

*Mark only one oval.*

- ☐ Male
- ☐ Female

## 4. Educational Qualification \*

Mark only one oval.

- ☐ Below 12th Std.
- ☐ Graduation
- ☐ Post-graduation
- ☐ Higher Studies

## 5. Income \*

Mark only one oval.

- ☐ Below 25 K
- ☐ 25 K to 50 K
- ☐ 50 K to 1 Lakh
- ☐ 1 Lakh to 2 Lakh
- ☐ Above 2 Lakh

**Section II: Overall Perception towards Jan Aushadhi Kendra**

## 6. What is your perception regarding Jan Aushadhi Kendra? \*

Mark only one oval.

- ☐ It provides poor quality medicines
- ☐ It offers a limited range of medicines
- ☐ It is a reliable source of affordable generic medicines
- ☐ It is only accessible to the wealthy

## 7. What do you believe is the main reason behind the popularity of Jan Aushadhi Kendra? \*

Mark only one oval.

- ☐ High-quality medicines
- ☐ Cost-effectiveness
- ☐ Convenient location
- ☐ Extensive range of medicines

8. How do you feel about the accessibility of information about services at Jan Aushadhi Kendra? \*

*Mark only one oval.*

- ☐ Easily accessible
- ☐ Difficult to find
- ☐ Insufficient information
- ☐ Not sure

9. How do you perceive the accessibility of Jan Aushadhi Kendra? \*

*Mark only one oval.*

- ☐ Easily accessible
- ☐ Moderately accessible
- ☐ Difficult to access
- ☐ Only accessible to certain demographics

10. What do you consider to be the biggest drawback of Jan Aushadhi Kendra? \*

*Mark only one oval.*

- ☐ Limited range of medicines
- ☐ Poor customer service
- ☐ Long waiting times
- ☐ Lack of trust in generic medicines

11. How likely are you to recommend Jan Aushadhi Kendra to friends and family? \*

*Mark only one oval.*

- ☐ Very likely
- ☐ Somewhat likely
- ☐ Not likely
- ☐ Not sure

12. How do you view the pricing of medicines at Jan Aushadhi Kendra? \*

*Mark only one oval.*

- ☐ Expensive
- ☐ Comparable to branded medicines
- ☐ Affordable
- ☐ Unpredictable

13. How do you perceive the quality of medicines available at Jan Aushadhi Kendra? \*

*Mark only one oval.*

- ☐ Superior to branded medicines
- ☐ Inferior to branded medicines
- ☐ Comparable to branded medicines
- ☐ Unreliable

14. How do you perceive the availability of specialty medicines at Jan Aushadhi Kendra? \*

*Mark only one oval.*

- ☐ Limited
- ☐ Extensive
- ☐ Comparable to private pharmacies
- ☐ Not sure

15. How do you perceive the quality of consultation provided at Jan Aushadhi Kendra? \*

*Mark only one oval.*

- ☐ Excellent
- ☐ Adequate
- ☐ Poor
- ☐ Not sure

16. How do you feel about the staff expertise and assistance at Jan Aushadhi Kendra? \*

*Mark only one oval.*

- ☐ Knowledgeable and helpful
- ☐ Uninformed and unhelpful
- ☐ Indifferent
- ☐ Varies depending on the location

17. How do you perceive the speed of service at Jan Aushadhi Kendra? \*

*Mark only one oval.*

- ☐ Fast and efficient
- ☐ Slow and inefficient
- ☐ Varies depending on the location
- ☐ Not sure



18. What impact do you believe Jan Aushadhi Kendra has on the overall healthcare system? \*

*Mark only one oval.*

- ☐ Positive impact
- ☐ Negative impact
- ☐ No impact
- ☐ Not sure

19. How do you perceive the overall impact of Jan Aushadhi Kendra on their healthcare expenses? \*

*Mark only one oval.*

- ☐ Significant reduction
- ☐ Moderate reduction
- ☐ No impact
- ☐ Increase in expenses

20. What impact do you believe Jan Aushadhi Kendra has on other pharmacies in the area? \*

*Mark only one oval.*

- ☐ It drives them out of business
- ☐ It has no impact
- ☐ It creates healthy competition
- ☐ It reduces the availability of medicines in the area

21. How do you view the level of trustworthiness of Jan Aushadhi Kendra compared to private pharmacies? \*

*Mark only one oval.*

- ☐ More trustworthy
- ☐ Equally trustworthy
- ☐ Less trustworthy
- ☐ Not sure

22. What do you appreciate the most about Jan Aushadhi Kendra? \*

*Mark only one oval.*

- ☐ Its convenience in terms of location
- ☐ Its customer service
- ☐ Its contribution to reducing healthcare expenses
- ☐ Its range of branded medicines

23. How do you perceive the reliability of Jan Aushadhi Kendra in terms of medicine availability? \*

*Mark only one oval.*

- ☐ Very reliable
- ☐ Somewhat reliable
- ☐ Not reliable
- ☐ Varies depending on the location

24. What do you believe is the most significant advantage of Jan Aushadhi Kendra compared to other pharmacies? \*

*Mark only one oval.*

- ☐ Lower prices
- ☐ Better quality medicines
- ☐ Wider range of medicines
- ☐ Better customer service

25. What do you believe is the biggest challenge faced by Jan Aushadhi Kendra in maintaining quality standards? \*

*Mark only one oval.*

- ☐ Lack of trained staff
- ☐ Inadequate infrastructure
- ☐ Supply chain issues
- ☐ Government regulations

26. What do you believe is the biggest challenge faced by Jan Aushadhi Kendra in fulfilling its objectives? \*

*Mark only one oval.*

- ☐ Lack of awareness among the public
- ☐ Limited availability of medicines
- ☐ Quality control issues
- ☐ Government regulations

### **Section III : Feedback about Jan Aushadhi Kendra**

27. How do you generally rate the overall effectiveness of Jan Aushadhi Kendra in fulfilling its objectives? \*

*Mark only one oval.*

- ☐ Ineffective
- ☐ Moderately effective
- ☐ Highly effective
- ☐ Not sure

28. How do you perceive the cleanliness and hygiene standards at Jan Aushadhi Kendra? \*

*Mark only one oval.*

- ☐ Excellent
- ☐ Adequate
- ☐ Below average
- ☐ Poor

29. How do you view the role of Jan Aushadhi Kendra in promoting healthcare awareness? \*

*Mark only one oval.*

- ☐ Very effective
- ☐ Somewhat effective
- ☐ Not effective
- ☐ Not sure

30. How do you perceive the government's efforts in promoting Jan Aushadhi Kendra? \*

*Mark only one oval.*

- ☐ Very effective
- ☐ Somewhat effective
- ☐ Ineffective
- ☐ Not sure

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