

**A STUDY ON FACTORS AFFECTING PERCEPTION AND AWARENESS OF
PEOPLE ATTENDING OPD OF MANGALAM HOSPITAL TOWARDS
PREVENTIVE HEALTH CHECKUPS**

Dissertation Submitted to



The IIHMR University, Jaipur

for the partial fulfilment for the award of the degree of

Master of Business Administration (MBA)

in

Hospital and Health Management

By

Himalaya Raj Bhaduriya

Under the Supervision and Guidance of

Dr Anupam Mehrotra

2024

MH/HR/EL/07

18th June-2024**To whom so ever it may concern**

This is to certify that **Mr. Himalaya Raj S/o Mr. Raj kumar Bhaduriya** has successfully completed his internship program from **18th March 2024 to 18th June 2024** at Mangalam Hospitals , Adarsh Nagar, Raja Park Jaipur.

As part of his internship, he has completed his project on “**Study on perception and awareness of people coming in OPD towards preventive health - checkups**”.

We wish him all the best for his future endeavor.

For Mangalam Hospital


Apeksha Khandelwal
Sr. HR Executive

CERTIFICATE OF COMPLETION

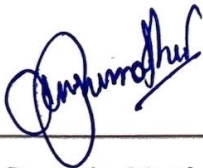


presented to :

Himalaya Raj

for successfully completing his/her..Internship at Mangalam
Hospital, Jaipur from 18/03/2024 to 18/06/2024

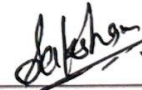
We extend our congratulations and wish them continues
success in their career.



Dr Anju Mathur
Chairperson



Dr Somya Mathur
Medical Superintendant



Dr Saksham Sharma
Executive Director

DECLARATION

I hereby declare that this dissertation titled "**A Study on Factors affecting Perception and Awareness of people attending OPD of Mangalam Hospital towards preventive health checkups**" is the bonafide record of my original research work. I declare that it has not been submitted to any other university or institution for the award of any degree or diploma. Information derived from the published or unpublished work of others has been duly acknowledged in the text.

A handwritten signature in blue ink, appearing to be 'Himalaya Raj', written over a horizontal line.

Himalaya Raj

June 2024

CERTIFICATE

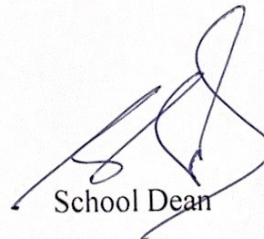
This is to certify that dissertation titled **“A Study on Factors Affecting Perception and Awareness of People Attending OPD of Mangalam Hospital towards Preventive Health Checkup”** is a record of the research work undertaken by **Dr Himalaya Raj Bhaduriya** in partial fulfillment of the requirements for the award of the degree of MBA (Hospital and Health Management) from the IIHMR University, Jaipur under my guidance and supervision and his/her approach to the research study has been sincere, scientific, and analytical.



Faculty Guide

Dr Anupam Mehrotra

IIHMR University, Jaipur



School Dean

Dr Sanjay Gupta

IIHMR University, Jaipur

Date: 24th June 2024

Date: 25th June 2024.

ABSTRACT

Title – A Study on Factors affecting Perception and Awareness of people attending OPD of Mangalam Hospital towards preventive health checkups

Author Name: Dr. Himalaya Raj

Advisor Name: Dr. Anupam Mehrotra

Keywords – Preventive Healthcare, Early disease detection, Health awareness, Health perception, Outpatient Department, Healthcare barriers.

Background of the Study – India is home to nearly 1.4 billion people. In India, out of all fatalities, 58.7 lakh people are affected by NCDs. NCDs claim the lives of 4.1 crore people each year, accounting for 71% of all deaths worldwide.

Preventive Health Checkups are significant in contemporary healthcare processes that are designed to diagnose and treat various diseases at an early stage. This creates a need to understand the factors which might affect the perception, awareness & barriers to not taking Preventive health checkups.

Objective –

To determine the factors affecting the perception & awareness of people about preventive health checkups and to determine obstructions and sources of information.

Methodology – A total of 152 participants, including healthy attendees of the patients coming to the hospital OPD, were selected using the convenience sampling method.

- Inclusion criteria – Healthy attendees coming with patients to Mangalam Hospital OPD.
- Exclusion Criteria – Patients coming to seek treatment and checkups.

Patients admitted to the IPD of the hospital were excluded.

Results – Out of 152 participants, demographic analysis showed that 54.6% were male and 45.4% were females, with the largest age groups being 41-50 years (26.97%) and 21-30 years (23.68%). The study found that 64% of 152 participants were aware of preventive health checkups, while 36% were not aware.

Major sources of information regarding preventive health checkups were communication from hospitals approx. 49%. The study also revealed that most of the participants (50.7%) found the benefits of early disease detection through Preventive Health Checkups.

Conclusion – There is a better understanding concerning the preventive health checkups within the shifting lifestyle that has been found to be the new trend. It is noted from this study that there is a mighty big number of people who are aware about such health checkups than those who are not. This artistically reflects an increased awareness on conducting routine medical tests and checks with the major inputs on the issue coming from the doctors. From this study, it is observed that there is a dire requirement for increasing the receptiveness of people for undergoing preventive health checkups rather taking them after having severity of diseases.

ACKNOWLEDGEMENTS

I would like to extend my sincere fullness and heartless appreciation to all the respected people who have helped me in this endeavour. Without active guidance, assistance, cooperation, and motivation, I would not have made an advancement in this report. It is a privilege to have a wonderful 90-day (March 18th to June 18th, 2024) internship at Mangalam Hospital Jaipur. The internship experience I had with the **Mangalam Hospital Jaipur** was a great chance for growth, learning and professional evolution. I am appreciative of this chance and for getting the opportunity to meet countless brilliant individuals and experts who directed me through this internship.

I would like to take this moment to express my deepest acknowledgement and special recognition to the Senior HR Executive, **Ms Apeksha Khandelwal mam**, who, despite being outstandingly busy with her work schedule to time to listen directly, keeps me on the rightful path and allowing me to carry your internship at the organization and guiding throughout the internship.

It is my deepest emotion to place on record my best compliments and a deep sense of gratitude to **Mrs Heena Kausar Mam** (Head of Operations and Quality) for providing necessary advice, guidance and information during every step. I am using this opportunity to admit their contribution delightfully.

I would like to express genuine thanks to **Dr. P.R. Sodani** (President, IIHMR University Jaipur) for giving me a chance to do a summer internship. Now, I would like to express my honest gratitude to my mentor at IIHMR University, **Dr. Anupam Mehrotra**, for his support, invaluable instructions, and supervision; this report is the result of his meticulous and generous outlook.

I would like to express a deep sense of gratitude to the Placement cell and Academics of my esteemed university for guiding me throughout the internship process and for providing time-to-time internship guidelines.

Table of Contents

CHAPTER 1: INTRODUCTION	14
Purpose of Research:.....	14
About The Organisation:.....	17
Research Questions:.....	18
Objectives of the Study:.....	18
CHAPTER 2: REVIEW OF LITERATURE	20
CHAPTER 3: METHODOLOGY	22
Research Questions:.....	22
Research Design:.....	22
Study Setting:.....	22
Duration of the Study:.....	22
Study Population:.....	22
Study Tools:.....	23
Data Analysis Tool:	23
Sampling Technique:	23
Sample Size:.....	23
Ethical Considerations:	23
CHAPTER – 4: RESULTS.....	25
CHAPTER 5: DISCUSSION.....	34
CHAPTER-6 CONCLUSION AND RECOMMENDATIONS.....	37
REFERENCES:.....	39
ANNEXURE	41
Questionnaire	41

LIST OF FIGURES

SR. No.	Description	Page No.
Figure 1.1	Types of patients for Preventive Health checkups	16
Figure 1.2	Workflow diagram of PHC in the Wellness department	17
Figure 1.3	Organogram of Organization	18
Figure 4.1	Age distribution of the study population	26
Figure 4.2	Gender Distribution of Participants	26
Figure 4.3	History of NCD in Participants	27
Figure 4.4	Degree of consciousness towards health checkups	27
Figure 4.4.1	Graph depicting participants taking preventive health checkups	28
Figure 4.4.1.1	Reasons for taking 1 st Preventive health checkpoint	28
Figure 4.4.1.2	Frequency of Health checkups	29
Figure 4.4.1.3	Sources of information	29
Figure 4.5	Reasons for unawareness or not undergoing health checkups	30
Figure 4.6	Importance of preventive health checkups	30
Figure 4.7	Perception of participants towards role of health checkups in early disease detection	31
Figure 4.8	Preference towards Lab choice for undergoing health checkups	31
Figure 4.9	Choice of consultant for health checkpoint report analysis	32
Figure 4.10	Coverage of insurance health checkups	32

LIST OF TABLES

S. No.	Description	Page No.
Table 2.1	Review of literature	20
Table 4.1	Demographics of the study population	25

ABBREVIATIONS

S. No.	Abbreviation	Full Form
1.	NCDs	Non-Communicable Diseases
2.	WHO	World Health Organization
3.	PHC	Preventive Health Checkups
4.	OPD	Outpatient Department
5.	IPD	Inpatient Department
6.	HR	Human Resource
7.	US	United States
8.	IBEF	Indian Brand Equity Foundation
9.	UHID	Unique Health Identification Number
10.	NABH	National Accreditation Board for Hospitals & Healthcare Providers
11.	IVF	In-vitro Fertilization

CHAPTER- 1

CHAPTER 1: INTRODUCTION

Purpose of Research:

According to WHO, Health is a state of complete physical, social and mental well-being and not merely an absence of a disease or infirmity. Currently, having good health is among the most valued states because of substantial shifts in the priorities of life, which include dietary patterns, stress levels and activity, among others. It is especially crucial at the mid-life stages to stay healthy. The aspect of good health can thus be considered in terms of preventive health checkup options. These checkups assist in identifying such factors in good time, thereby reducing the possible risk of any disease. There are several diseases that may manifest almost no symptoms in their early stages or are curable only in the early stages, such as cancer. Regular early health checkups help promote the likelihood of diagnosing the condition at its initial stages and provide the best treatment for recovery from the ailment in the first instance.

It is more economical to go for health checkups and screening, which are investments for the future, as opposed to waiting for an illness to take hold before seeking expensive treatments, which can place a significant burden in terms of both social and economic factors.

Indian healthcare industry is believed to grow to US \$372 billion in the next four years (As indicated by the IBEF report during the year 2019). The prose of preventive healthcare currently contributes to 3% of the over-the-counter or retail consumption, and the preventive healthcare market holds a potential Ultra 106 billion by 2022 from ultra 55 billion in 2018 at an 18% compounded annual rate as started. The way that pushes the growth of the market is higher levels of awareness and the desire to live a healthy life.

Compared with the existing literature, such studies have resulted in a relatively high level of awareness and perception towards preventive health checkups. For instance, in **Dr. Ashish Chintamani's (2020)** study, why the awareness of preventive health checkups had a positive attitude, there was a variation across the regions. Similarly, Rath and Deb (2017) described research that was undertaken in Telangana, India and found that demographic and economic related factors influence the perception and readiness to undergo routine health checkups. This is in agreement with the present study, in which a significant proportion of the participants had no knowledge of preventive measures. Moreover, a study by **Ramesh et al. (2016)** agreed with the current study in stressing cost-effective and timely health checkups, which has been stressed as a way of early

disease detection and breaking even the costs of preventive care. Furthermore, **Ahmad et al. (2018)** highlighted financial issues and unawareness as some of the challenges to health services prevention, as seen in their international study conducted in Malaysia. This implies that the difficulties that have been highlighted in the current study are similar to difficulties found in other low and middle-income countries & not just in India.

At present, in India, 90 million of the population is adopting health-conscious living, and it is projected to reach 135 million by 2022, and this will translate to a major proportion of spending on preventive healthcare checkups services. The Indian economy has emerged with several difficulties from earlier times, which has also affected the country's business. Also, the consumers of India have a dynamic consumption pattern as they are very diverse in terms of demography. The consideration of healthy living is more or less operational mostly in the urban sector to date, & people living in such cities or towns mostly avail of preventive healthcare checkup services. Hospitals and Insurance companies started providing service of preventive health checkups on the line of increasing health awareness among the middle-income group population, which was earlier taken up by corporate executives. Primarily, this research was undertaken with the aim of examining the sources of awareness and the sources affecting the perception and preferences for tests and checkups.

PREVENTIVE HEALTH CHECKUP:

Health is one of the most valuable things for a person, and this is why a person should take care of his/her health through a healthy diet, reasonable physical activity and other aspects. Self-health promotion is a lifelong process, and people are supposed to make efforts to incorporate healthy behaviour changes into practice. People see the doctor for various purposes. Some people consult a doctor each time they experience a symptom or have a concern, while others always visit the doctor for a checkup of a certain health issue.

A health checkup is a check on the general health condition of an individual with his or her healthcare practitioner at least once per year. It is also referred to as a wellness screening test, annual health checkup or comprehensive health screening. There has been controversy over the advantages of laying down a master health checkup every year, particularly for healthy people. Preventive health checkups thus cover checking of other habits that are dangerous besides detecting disease at an early stage. Studies conducted

all across the world have shown that it is less costly, to say the least, and significantly less stressful, to be more precise, to pay annually for preventive health checkups than having to rush to the hospital.

BENEFITS OF PREVENTIVE HEALTH CHECKUP:

There are several benefits of taking Preventive Health Checkups from a doctor. Most significant is the prevention of disease in the early stages of ailment. Disease prevention and early detection are significant, particularly for people with predisposing factors for various illnesses. A master's health checkup can also help diagnose a particular health problem and can be advantageous in cancer cases. These checkups that shall be performed when doing this are determined by the age, sex, family history and lifestyle of the patient. Health checkups also facilitate the development of the closed patient-doctor relationship, and the doctor is able to encourage the patients to change their health habits.

Although medical experts recommend preventive health checkups for every person once a year, today, most doctors do not perform annual health checkups, irrespective of the state of health. According to earlier studies, many tests conducted during yearly examinations were deemed costly, ineffective, and invasive, but when conducted annually, they proved detrimental to health in the long run. Instead of the traditional routine checkup every year, some medical organizations recommend periodic health assessments, and these are done over five years for anyone who is 18 years and above until one is 40 years old, and then one should have a checkup every one to three years. There might be a need to see the doctor more often when one is on prescription medication.

PHC PATIENTS: Patients coming for Preventive Health Checkups are as follows:

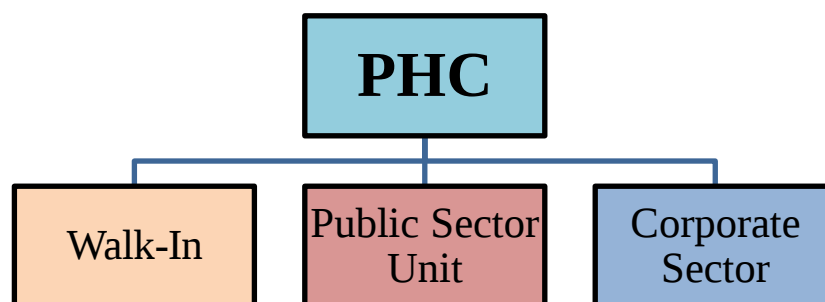


Figure 1.1 Types of patients for Preventive health checkups

PREVENTIVE HEALTH CHECKUP PACKAGES:

1. Wellness Package
2. Cardiac Package
3. Premium Cardiac Package
4. Diabetic Package
5. Premium Diabetic Package
6. Whole Body Package (Male+Female)
7. Premium Whole Body Package (Male+Female)
8. International Package

WORKFLOW DIAGRAM OF PHC:

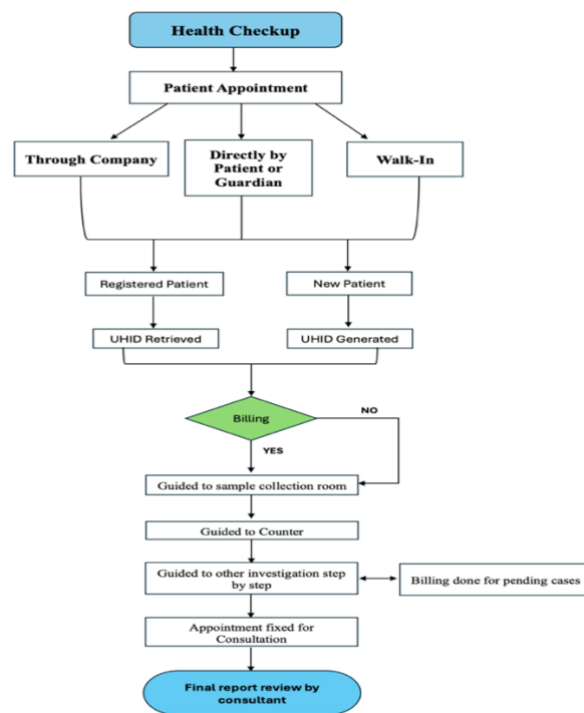


Figure 1.2 Workflow diagram of PHC in the Wellness Department

About The Organization:

Mangalam Hospital Started with 50 Bedded Hospitals in 2002 and later expanded to 100 Bedded and Multi-Specialty Hospitals in Jaipur.

- It is a NABH Accredited Hospital.
- Mangalam Hospital offers–speciality health care services, from IVE, Gynaecology,

Infertility, Orthopaedics, Psychiatry, Gastroenterology, Laparoscopic surgeries, General Medicine, Laboratory, Physiotherapist and Pharmacy under one roof.

ORGANISATION ORGANOGRAM:

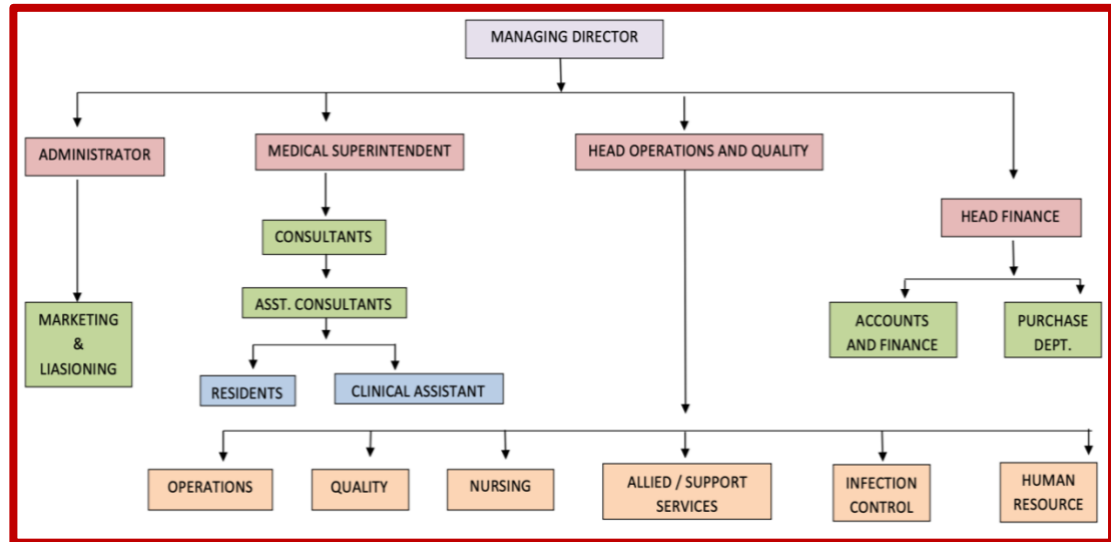


Figure 1.3 Organogram of Organization

Research Questions:

1. What are the factors affecting the perception and awareness of people coming to Mangalam Hospital OPD towards Preventive Health Checkups?
2. What are the obstructions and sources of information for people coming to Mangalam Hospital OPD to avail themselves of preventive health checkups?

Objectives of the Study:

- a. To determine the factors affecting the perception & awareness of people coming to Mangalam Hospital OPD about preventive health checkups.
- b. To determine obstructions and sources of information for people coming to Mangalam Hospital OPD to avail themselves of preventive health checkups.

CHAPTER-2

CHAPTER 2: REVIEW OF LITERATURE

Table 2.1 – Review of Literature

S. No.	Title	Authors/Year	Study location	Sample size	Salient features
1	“A Study on Perception, Awareness and Behaviour of People Towards Preventive Health Checkups”	Dr. Ashish Chintamani (2020)	India	305	1. The study reveals people's positive attitudes towards preventive health checkups. 2. It also highlights the importance of regular health checkups for early disease detection 3. The study also discussed financial constraints as a major barrier for low- and middle-income people.
2	“Impact of Preventive Healthcare on Indian Industry and Economy (No.198) Working Paper”	Chadha, A., Mehdi, A., & Malik, G. (2007)	India	NA	1. The study discussed super-speciality hospitals' high-cost treatments for lifestyle diseases. 2. Stressed the importance of preventive measures to reduce the burden of diseases.
3	“Perception towards regular health checkups: a case study from a selected village in Telangana state in India”	Rath, B.N., & Deb, A. (2017)	Telangana, India	NA	1. The study investigated the viewpoint of rural Indians towards regular health checkups. 2. Demographic and economic factors were also identified as barriers to regular checkups. 3. Highlighted the need to increase awareness and willingness to pay for these services in rural areas.
4	“A Study on the utility of Preventive Health Checkup in Early detection of disease states.”	Ramesh, R. et. al (2016)	India	262	1. This study discussed the importance of offering Preventive Health Checkups at a reasonable cost with quality assurance. 2. Also highlighted the necessity for appropriate tests at timely intervals to ensure beneficial outcomes and avoid harm to life.
5	“Effect of preventive health screening on long term primary healthcare utilization: A randomized control trial.”	Janus Laust Thomsen (2005)	NA	3464	1. The rate ratios for daytime consultations had a strong pattern, with an initial increase followed by a gradual drop. 2. More research is needed to validate and investigate the causes of this tendency.

CHAPTER – 3

CHAPTER 3: METHODOLOGY

Research Questions:

1. What factors affect the perception and awareness of people coming to Mangalam Hospital OPD towards Preventive Health Checkups?
2. What are the obstructions and sources of information for people coming to Mangalam Hospital OPD to avail themselves of preventive health checkups?

Research Design:

Descriptive Cross-Sectional Study Design was used to conduct the study.

Study Setting:

The study was conducted in the Outpatient department and Wellness Centre of the Mangalam Hospital, Jaipur.

Duration of the Study:

The study was done from March 18th till June 18th, 2024 (90 Days).

Study Population:

In this study, people who came to the Mangalam Hospital Jaipur from 9 AM to 5 PM from Monday to Saturday were selected.

- **Inclusion Criteria:**

- The study population consists of healthy individuals/attendees who come with patients to the hospitals for any purpose.
- People of the age group of 21 years and above.
- People who attended hospital OPD between 9 AM to 5 PM and from Monday to Saturday.

- **Exclusion Criteria:**

- Patients who came to seek treatment and checkups.
- Patients admitted to IPD of the hospital were excluded.
- People coming to the hospital on Sundays.

Study Tools:

Primary data was collected via Semi-structured Questionnaires in both English & Hindi languages. One-to-one interviews were also conducted with people/attendees of patients with OPD at Mangalam Hospital, Jaipur.

Data Analysis Tool:

MS Excel

Sampling Technique:

A convenient sampling method was used.

Sample Size:

A sample size (n) of **152** participants was taken for this study.

Ethical Considerations:

Consent was taken from the Management of the organization- "Mangalam Hospital, Jaipur" to maintain confidentiality and voluntary participation of the study subjects. Verbal Informal consent was also obtained from all the participants; if they agreed, the interview was conducted only then. It was ensured that the personal details were not shared in any of the sections of this dissertation and will not be shared in case of a research publication. Hence, their confidentiality was maintained.

CHAPTER – 4

CHAPTER – 4: RESULTS

A) Demographic Analysis:

Table 4.1 Demographics of Study Population

Parameter		Sample size: - 152 (n)
Gender	Male	83 (54.6%)
	Female	69 (45.39%)
Age Groups	21-30 years	36 (23.68%)
	31-40 years	29 (19.07%)
	41-50 years	41 (26.97%)
	51-60 years	27 (17.76%)
	60 & above	19 (12.5%)
Awareness about Preventive Health Checkups	Yes	98 (64%)
	No	54 (36%)

From Table 4.1, we can see that 26.97% of respondents belong to the age group of 41-50 years. 63.15% of study participants were aware about preventive health checkups, while the rest were unaware.

The Demographic status like age and gender were analyzed as graphs below –

1. Age in years:

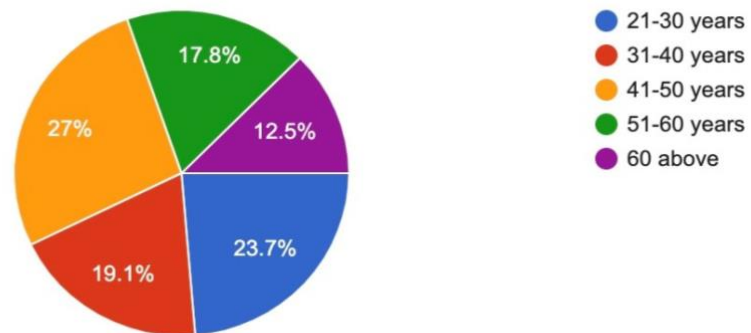


Figure 4.1 Age Distribution of Study Population (n=152)

The above graph depicts that most participants, i.e., 27%, were 41-50 years old. 23.7% belonged to the age group of 21-30 years, and 19.1% belonged to the age group of 31-40 years. Similarly, 17.8% fell in the age group of 51-60 years, and 12.5% belonged to the 60 years & above age group.

2. Gender:

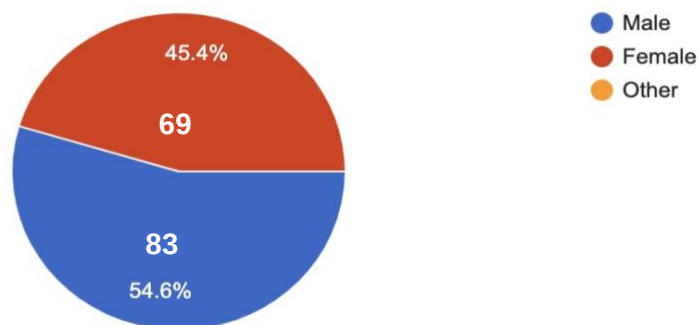


Figure 4.2 Gender Distribution of participants (n=152)

The graph represents the gender distribution among 152 participants, i.e., 54.6% were males and 45.4% were females. This was done to see whether age and gender have any association with respect to perception and awareness.

3. Medical history with NCD:

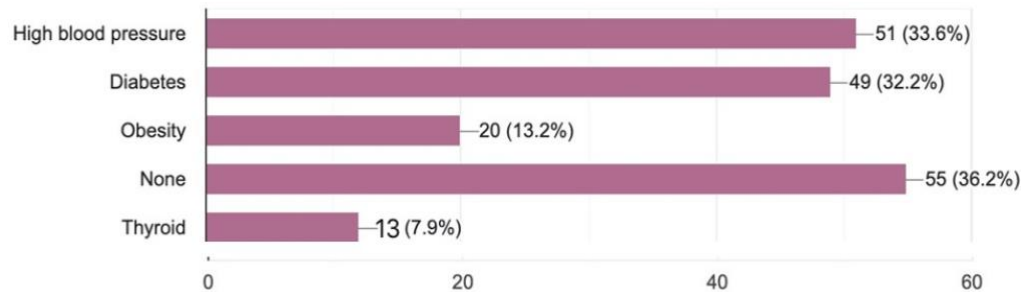


Figure 4.3 History of NCD in Participants (n=152)

The above graph represents the number of participants already suffering from NCDs. Majority of participants (36.2%) did not have any non-communicable disease, followed by High blood pressure (33.6%) and Diabetes (32.2%).

B) Perceptions of aware respondents:

4. Awareness towards health checkups:

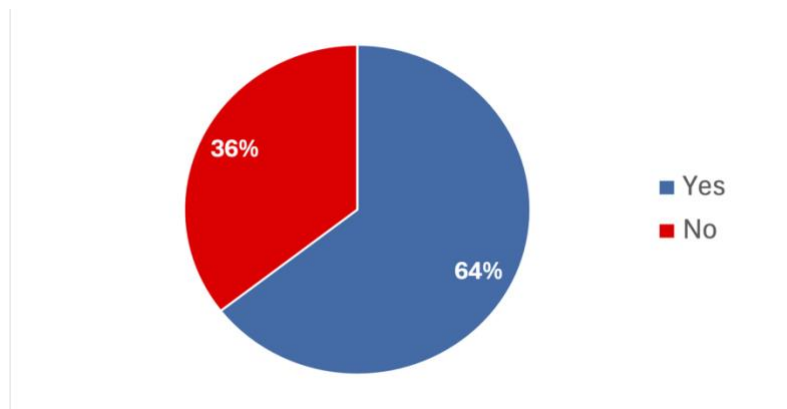


Figure 4.4 Degree of consciousness towards health checkups (n=152)

Out of 152 respondents, the majority of 64% (98) respondents were aware of preventive health checkups and the rest, 36% (54) were unaware of these checkups.

a) Ever had a preventive health checkup:

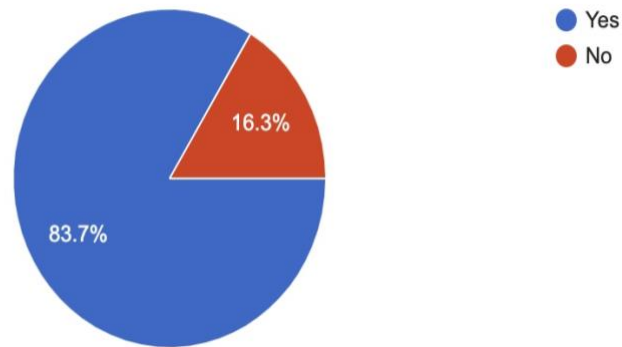


Figure 4.4.1 Graph depicting participants taking preventive health checkups (n=98)

This question was asked of the participants who were aware of preventive health checkups. Out of 98 respondents, 82 participants (83.7%) had gone for health checkups at least once during their lifetime, and the remaining 16 participants (16.3%) had never gone for such checkups.

i) Source of advice/reason for taking 1st Preventive Health Checkup:

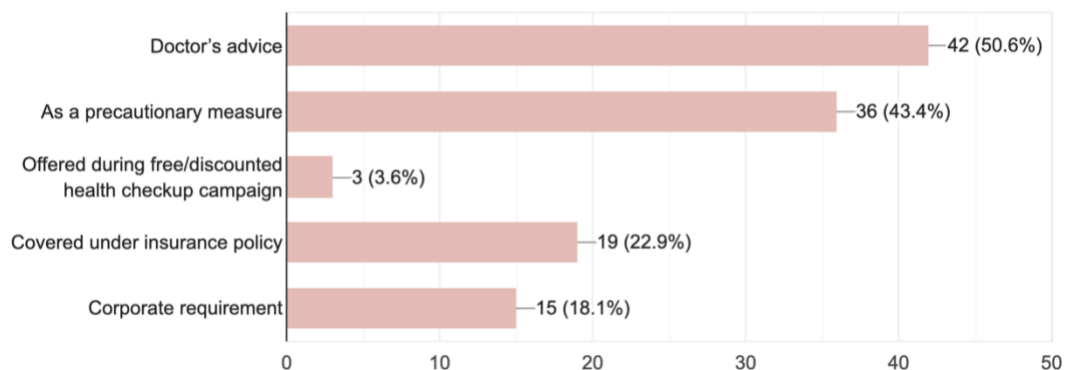


Figure 4.4.1.1 Graph showing reasons for taking 1st Preventive health checkup (n=82)

This question was asked of the participants who gave a positive response for having gone for preventive health checkups, i.e., 82 respondents. In the above figure, it is noted that the prime source for undertaking their 1st health checkup was by Doctor's Advice, i.e., approximately 51%. It is also seen that 43.4% of respondents stated that the reason for undergoing these checkups is mostly to ensure better health. Also, some had undergone checkups as a requirement from their employers (18%), followed by 23% had availed as their insurance policy covers the checkups, and only 3.6% of respondents under free health checkups offered during campaign programs.

ii) Frequency of health checkups:

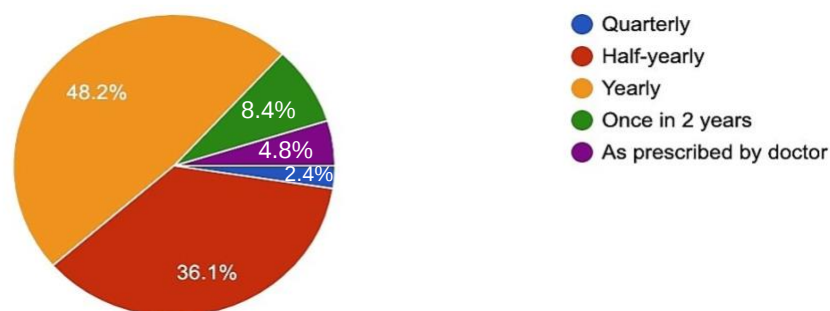


Figure 4.4.1.2 Frequency of health checkups (n=82)

The participants who responded positively to having gone for preventive health checkups, i.e., 82 respondents. The graphic illustrates that 48% of survey participants prefer to have health examinations annually, with 36% choosing to do so every six months, and 8.4% going once every two years. About 4.8% undergo checkups upon a doctor's recommendation or prescription. A mere 2.4% undergo these assessments quarterly.

iii) Information source of preventive health checkups:

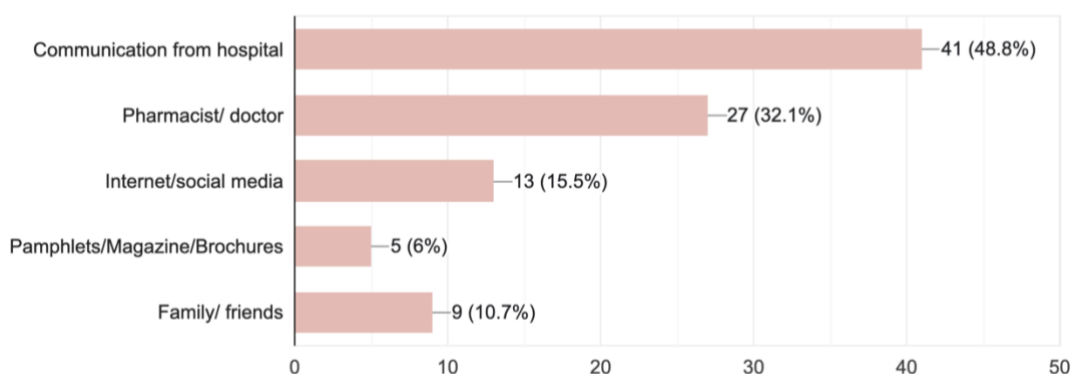


Figure 4.4.1.3 Sources of Information (n=82)

This question was posed once more to the 82 participants who had previously undergone a preventive health checkup. There are several sources of information available regarding preventive health checkups. The following chart illustrates the most popular sources of information: hospital communications (49% of respondents), doctors/pharmacists (32% of respondents), internet/social media (15.5% of respondents), family/friends (10.7%), and pamphlets or magazines/brochures (6%).

5. Reasons for unawareness or not undergoing health checkups:

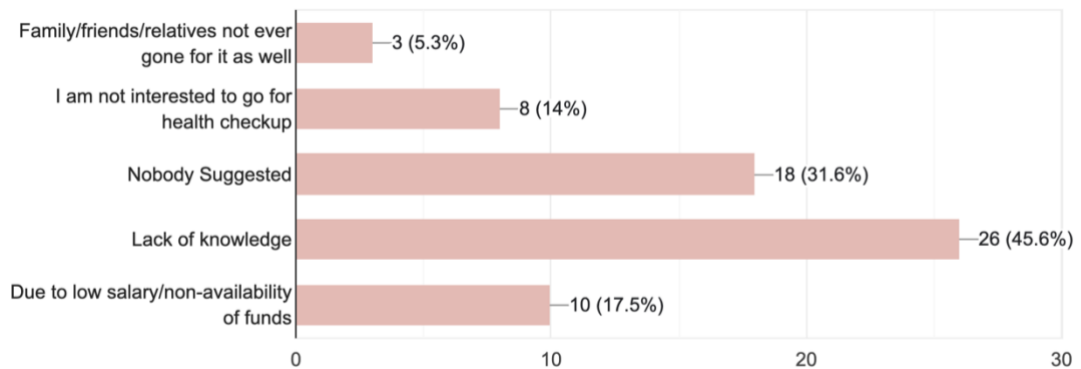


Figure 4.5 Reasons for unawareness or not undergoing health checkups (n=54)

It was asked from the respondents who were not aware about preventive health checkups as per Question.4, i.e., 54 respondents.

It was observed from the unaware respondents that lack of knowledge (45.6%) is the highest opted cause of unawareness, followed by nobody suggesting to undergo these checkups (31.6%). Other reasons included low salary/ non-availability of funds (17.5%), not being interested in undergoing these checkups (14%), and lastly, friends/family/relatives not going for it as well (5.3%) reason opted.

6. Importance of Preventive health checkups:

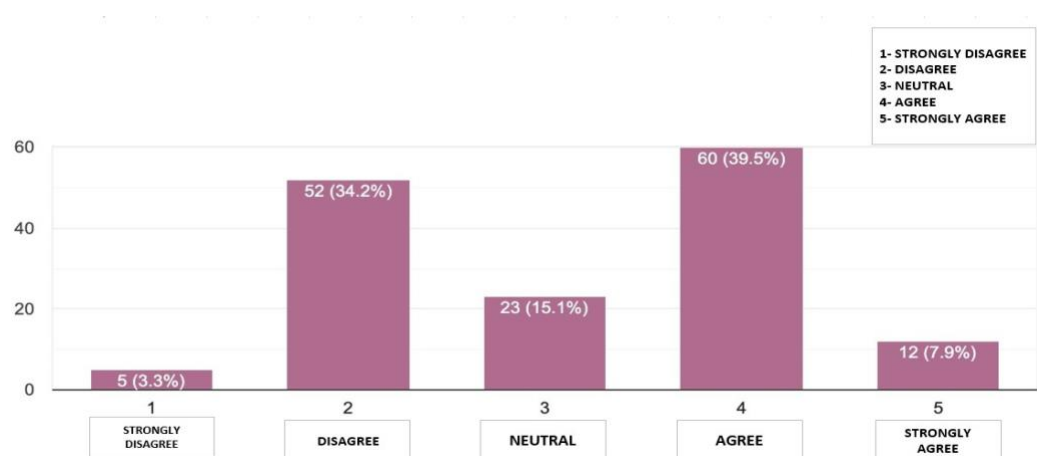


Figure 4.6 Importance of preventive health checkup (n=152)

This question was asked to understand people's perceptions of the importance of undertaking preventive health checkups. From this figure, we can see that 34.2% of respondents consider preventive health checkups over self-medication, while majorly

39.5% consider self-medication as their 1st priority. At the same time, 15% study participants had a neutral opinion for this. These checkups aid in diagnosing disease in its early stages to provide better treatment and hence enhance the chances of recovery from the ailment.

7. Early detection of disease:

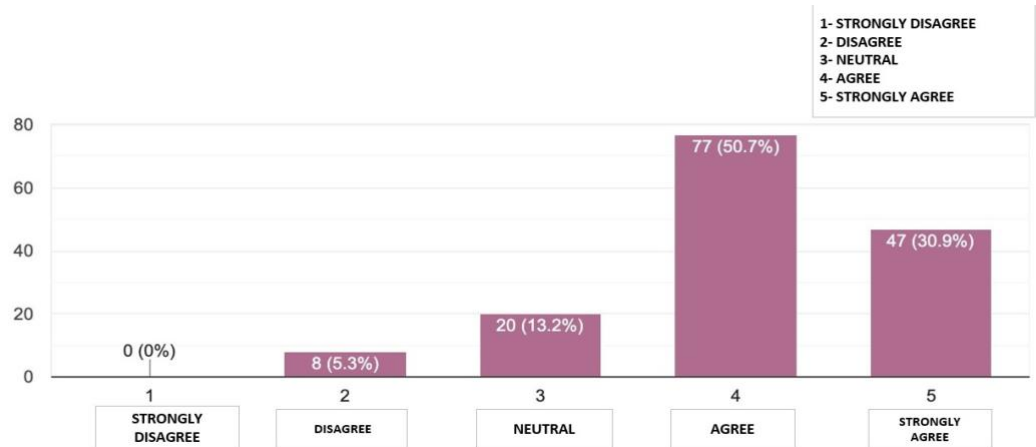


Figure 4.7 Perception of respondents towards role of health checkups in early disease detection (n=152)

This figure shows that almost 31% of respondents strongly agreed, and 51% agreed that health checkups aid in the early detection of diseases. About 13% of respondents had a neutral response, while 5% disagreed for the same.

8. Laboratory preferences getting checkups:

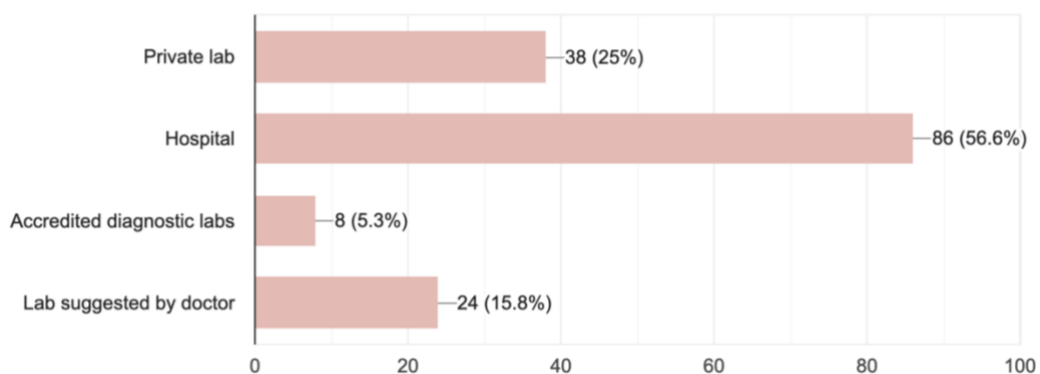


Figure 4.8 Preference of lab choice for undergoing health checkups (n=152)

In current scenario, very less options of good laboratories are available in the market for undertaking these checkups. So, it was observed that majorly hospitals are the most preferred choice for 56.6% of study participants, following private labs for 25% of

respondents, labs suggested by doctors for nearly 16% of respondents and lastly, accredited labs chosen by 5.3% of respondents.

9. Consultation for health checkup report analysis:

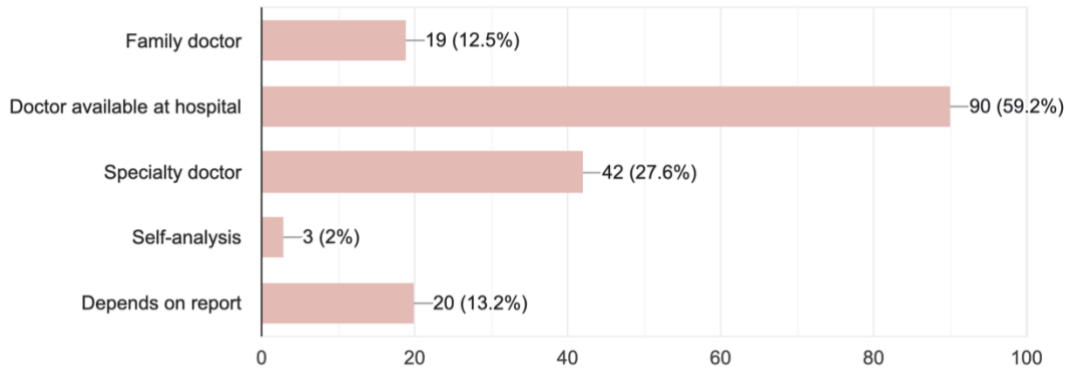


Figure 4.9 Choice of consultant for health checkup report analysis (n=152)

The following graph depicts 59.2% of respondents prefer a doctor available at the hospital to be consulted for report analysis, and by a speciality doctor opted by 28% of participants. 13.2% of study participants feel the consultation depends on the report, followed by family doctor by 12.5% of respondents. It was also observed that 2% feel for self-analysis of the report.

10. Health insurance coverage:

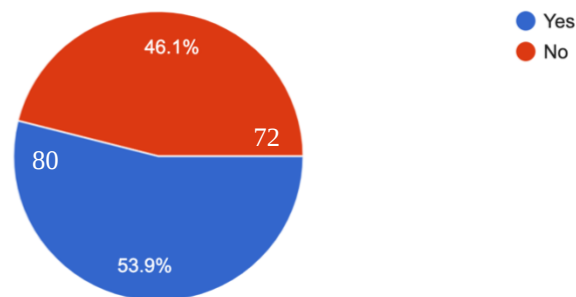


Figure 4.10 Coverage of Insurance Health Checkups (n=152)

Nowadays, number of health checkup plans are offered by many health insurance companies.

From this illustration, 54% of all participants were covered under some of the policies given by health insurance firms, while 46% were left covered.

CHAPTER- 5

CHAPTER 5: DISCUSSION

The purpose of this study was to identify the factors that were decisive for people's perception and awareness of preventive health checkups, particularly those who are clients of the outpatient department (OPD) of the Mangalam Hospital in Jaipur. In this present study, 64% of the respondents claimed to be aware of preventive health checkups. The level of awareness regarding preventive health checkups among the studied populations can be deemed moderate, but still, 36% of them were not aware of this fact, indicating that there could be a lot of work done in terms of educating the people about the importance and precautions towards public health. This study demonstrated a fairly even gender distribution with a slight male dominance with 54.6% of the respondents, while only 45.4% of the respondents were female. In the age-wise distribution, it was higher for 41-50 years (27%) and 21-30 years, at 23.7%. This shows that middle-aged adults and young adults are more aware of health checkups.

The most common reason for taking the first preventive health checkup was the doctor's recommendation, i.e. 51%, and the most common source of information regarding preventive health checkups was the hospitals i.e., 49%. This reveals that healthcare institutions are the most significant influencers, enabling people with information on preventive care. However, it is critical to note that the main barrier mentioned by the respondents was the lack of knowledge, which was 45.6% and indicates the need for more extensive educational campaigns and awareness-raising events towards preventive health checkups.

Compared with the existing literature, such studies have resulted in a relatively high level of awareness and perception towards preventive health checkups. For instance, in Dr. Ashish Chintamani's (2020) study, why the awareness of preventive health checkups had a positive attitude, there was a variation across the regions. Similarly, Rath and Deb (2017) described research that was undertaken in Telangana, India and found that demographic and economic related factors influence the perception and readiness to undergo routine health checkups. This is in agreement with the present study, in which a significant proportion of the participants had no knowledge of preventive measures. Moreover, a study by Ramesh et al. (2016) agreed with the current study in stressing cost-effective and timely health checkups, which has been

stressed as a way of early disease detection and breaking even the costs of preventive care. Furthermore, Ahmad et al. (2018) highlighted financial issues and unawareness as some of the challenges to health services prevention, as seen in their international study conducted in Malaysia. This implies that the difficulties that have been highlighted in the current study are similar to difficulties found in other low and middle-income countries & not just in India. Such comparative analysis of firms shows the need and importance of increasing awareness and utilization of preventive health services simply among various locations as well as populations.

Study Limitations:

- i) Generalizability: Non-random sampling and a small sample of 152 participants are the major limitations of the study, which may not allow the generalization of the findings to general populations. The findings may not be true representative of Jaipur or other areas of study.
- ii) Information bias: Another limitation is the data collection method; a self-administered questionnaire may lead to response bias, where respondents may give socially desirable answers about their behaviour.
- iii) Short study time: A study period of 90 days might not be sufficient to record long-term trends and variations in perception & awareness.

Strengths of study:

- i) Relevance to public health: The findings also reveal specific first-level preventive interventions that the targeted population should be involved in, specific health educational information pertaining to facial disproportion, and healthcare services from which the targeted population group should seek funds.
- ii) Comprehensive analysis: It provided an overall and individual percentage of demographic factors, information sources, perceived barriers, and the importance of preventive health checkups effectively. These figures could be used by healthcare professionals and policymakers.
- iii) Focused study settings: This made the conduct of the study easier since the research environment was limited to a single hospital's OPD and ensured that the data gathered was systematic.

CHAPTER-6

CHAPTER-6 CONCLUSION AND RECOMMENDATIONS

This study is in view of prevention rather than cure, as the population is encouraged to undertake regular checkups to help in the early detection of diseases. Despite the fact that there is a moderate level of awareness among the study population, a number of barriers, including ignorance and inability to afford the services, are significant hurdles to its use. These barriers can be eliminated or controlled with pre-conceived and structured health education, financial assistance, and better involvement of healthcare providers to increase the utilization of preventive health checkups. As for future investigations, the emphasis should be placed on tracking the changes in knowledge and practice over time and assessing the effectiveness of the introduced measures. In this regard, it is crucial to focus on the education of people to provide them with necessary financial help and conduct the assessment of their condition to improve the general state of the population's health.

The key points of summary from this study are as follows:

1. The study revealed that the majority of the respondents (64%) have a moderate level of awareness regarding preventive health checkups, as the number of aware people is higher than that of unaware people.
2. Awareness about these checkups was slightly higher among the male participants (54.6%) than the female participants (45.4%)
3. The age group with the highest awareness levels indicated by the study was between 41-50 years (27%), followed by (23.7%) of the 21-30 years age group. Educational level and income were the most relevant predictors of awareness levels, and they aligned with the trends observed by other researchers.
4. The leading sources of information concerning preventive health checkups were hospitals (49%) and doctors (51%), thus highlighting the essential role of healthcare facilities in raising awareness.
5. Lack of knowledge (45.6%) was the most rampant factor mentioned, followed by nobody suggesting them (31.6%), financial factors (17.5%) and lack of interest in opting for these checkups (14%).
6. A significantly higher percentage of respondents feel the usefulness of these checkups if their disease got early detected, with 31% fully agreeing and 51% agreeing with this statement.

Findings from this study can have several useful implications in the public health sector

and policy making:

1. **Role of Healthcare Providers:** This highlights the fact that healthcare providers are responsible for educating people on the need to attend preventive health checkups; professional educational intervention can improve health literacy and, subsequently, the communication of this information to the people.
2. **Health education campaigns:** There is a significant void in the general population's knowledge regarding these checkups, and thus, there is a dire need for health education campaigns on preventive health checkups. Such campaigns should focus on both male and female candidates as well as youth generations.
3. **Financial support:** Lack of finance was another hindrance that patients faced when it came to preventive health checkups. The government must, therefore, look into avenues to provide subvention to these services or introduce affordable health checkup programmes for all people.

Based on the findings of the study and other literature available, the following recommendations are offered:

1. Community outreach programs and health workshops can be helpful to increase awareness among the youth and middle-aged populations of society.
2. Introduce and arrange free preventive health checkup programs for low-income populations. These are occasionally appointed by public-private partnerships or within government funding programs that could widen the delivery of such checkup services.
3. Extension of one-to-one contact between healthcare providers and the targeted clients so as to enhance the sharing of health information through training.
4. Promotion of information about the importance of preventive health checkups through the provision of information technology and social networks, including digital campaigns.
5. **Proper establishment of policies and a system of continuous monitoring and evaluation of health education campaigns and preventive health programmes.**
6. **Counselling can be done by junior doctors at the reception desk for the people coming in OPD regarding the importance of preventive health checkups.**
7. **Perceptions towards the high cost of health checkup packages can be changed by displaying a comparison between the cost of individual investigation and preventive health checkup packages.**

REFERENCES:

1. Chintamani P. Attitudes towards preventive health checkups across different regions [Internet]. 2020 [cited June 21st 2024]. Available from: <http://sersc.org/journals/index.php/IJAST/article/view/30731>
2. Ramesh, R., Gagarin, Y. P., Murugan, S. R., Rizwan, S. A., Joena, V. M., & Aravind, A. (2016). A study on the utility of preventive health checkup in early detection of disease states. *Int J Res Med Sci*, 4(9), 4022-4025. Available from: <https://www.msjonline.org/index.php/ijrms/article/view/183>
3. Rath S, Deb P. Influence of demographic and economic factors on health checkup perceptions [Internet]. 2017 [cited June 21st 2024]. Available from: <https://www.researchgate.net/publication/314097581>
4. Lee S, Huang H, Zelen M. Early detection of disease and scheduling of screening examinations. *Stat Methods Med Res*. 2004; 13:443–456. Available from: <https://pubmed.ncbi.nlm.nih.gov/15587433/>
5. Sabates R, Feinstein L. The role of education in the uptake of preventative health care: the case of cervical screening in Britain. *Soc Sci Med*. 2006; 62:2998–3010. Available from: <https://doi.org/10.1016/j.socscimed.2005.11.032>.
6. de Waard AM, Wändell PE, Holzmann MJ, et al. Barriers and facilitators to participation in a health check for cardiometabolic diseases in primary care: a systematic review. *Eur J Prev Cardiol*. 2018; 25:1326–1340. Available from: <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6097107/>
7. Varshini A, Rani SL, Brundha MP. Awareness of annual doctor checkups among general population. *Drug Invent Today*. 2020; 14:274. Available from: <https://openurl.ebsco.com/EPDB%3Aagcd%3A14%3A7561646/detailv2?sid=ebsco%3Aplink%3Ascholar&id=ebsco%3Aagcd%3A142963150&crl=c>
8. What percentage of Indians get full body health checkups done? [Jan; 2024]. 2023. Available from: <https://redcliffelabs.com/myhealth/lifestyle/what-percentage-of-indians-get-full-body-health-check-ups-done/>
9. Zhou L, Ju P, Li Y, Liu B, Wang Y, Zhang X, Yin H. Preventive health behaviors among the middle-aged and elderly in China: does social capital matter? *Prev Med Rep*. 2023; 35:102329. Available from: <https://doi.org/10.1016/j.pmedr.2023.102329>
10. Hoebel J, Starker A, Jordan S, Richter M, Lampert T. Determinants of health check attendance in adults: findings from the cross-sectional German Health Update (GEDA) study. *BMC Public Health*. 2014; 14:913. Available from: <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4167266/>
11. Nielsen KD, Dyhr L, Lauritzen T, Malterud K. You can't prevent everything anyway: a qualitative study of beliefs and attitudes about refusing health screening in general practice. *Fam Pract*. 2004; 21:28–32.

Available from: <https://pubmed.ncbi.nlm.nih.gov/14760040/>

12. Wall M, Teeland L. Non-participants in a preventive health examination for cardiovascular disease: characteristics, reasons for non-participation, and willingness to participate in the future. *Scand J Prim Health Care*. 2004; 22:248–251. Available from: <https://pubmed.ncbi.nlm.nih.gov/15765642/>
13. Ismail H, Atkin K. The NHS Health Check programme: insights from a qualitative study of patients. *Health Expect*. 2016; 19:345–355. Available from: <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC5055268/>
14. Chatterjee S, Roy B, Wadhwa M, Jani D. Factors affecting the utilization of preventive health checkups amongst the healthcare professionals at a teaching hospital. *Int J Res Anal Rev*. 2019; 6:124–140. Available from: https://www.researchgate.net/publication/333650738_Factors_Affecting_The_Utilization_Of_Preventive_Health_Check-Ups_Amongst_The_Healthcare_Professionals_At_A_Teaching_Hospital
15. Vaidya V, Partha G, Karmakar M. Gender differences in utilization of preventive care services in the United States. *J Womens Health (Larchmt)*. 2012; 21:140–145.
Available from: <https://pubmed.ncbi.nlm.nih.gov/22081983/>
16. Patel V, Desai A. "Barriers to Preventive Health Services in Low-Income Communities." *Glob Health Action* [Internet]. 2019 [cited 21 June 2024];12(1):1602-1609.
Available from: <https://www.globalhealthaction.net/index.php/gha/article/view/1602/>
17. Kumar N, Singh M. "Preventive Health Care: Strategies and Challenges." In: Rao P, editor. *Health Systems in Developing Countries*. 2nd ed. New York: Springer; 2017. p. 145-168.
18. Baum F. *The New Public Health: An Introduction for the 21st Century* [Internet]. 4th ed. Melbourne: Oxford University Press; 2016 [cited June 21st 2024]. Available from: https://www.researchgate.net/publication/262840295_The_New_Public_Health/

ANNEXURE

Questionnaire: Google forms were used for collection of responses from the participants–

"PERCEPTION AND AWARENESS OF PEOPLE COMING IN OPD (MANGALAM HOSPITAL, JAIPUR) TOWARDS PREVENTIVE HEALTH CHECKUP"

* Indicates required question

1. 1. What is your age? *

Mark only one oval.

- ☐ 21-30 years
☐ 31-40 years
☐ 41-50 years
☐ 51-60 years
☐ 60 above

2. 2. What is your gender?

Mark only one oval.

- ☐ Male
☐ Female
☐ Other

3. 3. Have you been earlier diagnosed with any of the lifestyle diseases?

Tick all that apply.

- ☐ High blood pressure
☐ Diabetes
☐ Obesity
☐ None
☐ Other: _____

4. 4. Are you aware about Preventive health checkups?

Mark only one oval.

- ☐ Yes
☐ No ((if No, then go to question.5)

5. (a) Have you ever had a preventive health checkup?

Mark only one oval.

- ☐ Yes
☐ No

6. (i) [If Yes] What was your source of advice/ reason for taking 1st preventive health checkup?

Tick all that apply.

- ☐ Doctor's advice
☐ As a precautionary measure
☐ Offered during free/discounted health checkup campaign
☐ Covered under insurance policy
☐ Corporate requirement

7. (ii) [If Yes] Frequency of preventive health checkup?

Mark only one oval.

- ☐ Quarterly
☐ Half-yearly
☐ Yearly
☐ Once in 2 years
☐ As prescribed by doctor

8. (iii) [If Yes] From where did you come to know about preventive health checkup?

Tick all that apply.

- ☐ Communication from hospital
- ☐ Pharmacist/ doctor
- ☐ Internet/social media
- ☐ Pamphlets/Magazine/Brochures
- ☐ Family/ friends

9. 5. [If No] What is the reason of unawareness or not undergoing preventive health checkup?

Tick all that apply.

- ☐ Family/friends/relatives not ever gone for it as well
- ☐ I am not interested to go for health checkup
- ☐ Nobody Suggested
- ☐ Lack of knowledge
- ☐ Due to low salary/non-availability of funds

10. 6. Do you prefer self-medication as the first recourse for majority of health issues?

Mark only one oval.

	1	2	3	4	5	
Stro	☐	☐	☐	☐	☐	Strongly agree

11. 7. Do you find any benefit if the disease is detected in early stages?

Mark only one oval.

	1	2	3	4	5	
Stro	☐	☐	☐	☐	☐	Strongly agree

12. 8. What are your laboratory preferences for health checkup?

Tick all that apply.

- ☐ Private lab
- ☐ Hospital
- ☐ Accredited diagnostic labs
- ☐ Lab suggested by doctor

13. 9. Whom do you prefer to consult for your preventive health checkup report analysis?

Tick all that apply.

- ☐ Family doctor
- ☐ Doctor available at hospital
- ☐ Specialty doctor
- ☐ Self-analysis
- ☐ Depends on report

14. 10. Are you a health insurance policy holder?

Mark only one oval.

- ☐ Yes
- ☐ No

Google Forms

ANNEXURE

Plagiarism report:

Dr. Himalaya Raj Dissertation IIHMR			
ORIGINALITY REPORT			
2%	1%	1%	1%
SIMILARITY INDEX	INTERNET SOURCES	PUBLICATIONS	STUDENT PAPERS
PRIMARY SOURCES			
1	www.studymode.com Internet Source	<1 %	
2	Submitted to American InterContinental University Student Paper	<1 %	
3	Submitted to University of Stellenbosch, South Africa Student Paper	<1 %	
4	hdl.handle.net Internet Source	<1 %	
5	Submitted to Kennedy-Western University Student Paper	<1 %	
6	vital.seals.ac.za:8080 Internet Source	<1 %	