

**A STUDY ON PATIENT MANAGEMENT IN OUT-PATIENT
DEPARTMENT
AND THEIR LEVEL OF SATISFACTION IN THE MISSION
HOSPITAL, DURGAPUR**

Dissertation Submitted to



The IIHMR University, Jaipur

for the partial fulfillment for the award of the degree of

Master of Business Administration (MBA)

in

Hospital and Health Management

by

AMAN KUMAR SAH

Under the Supervision and Guidance of

DR. GOUTAM SADHU

2023

**A STUDY ON PATIENT MANAGEMENT IN OUT-PATIENT
DEPARTMENT
AND THEIR LEVEL SATISFACTION IN THE MISSION
HOSPITAL, DURGAPUR**

Dissertation Submitted to



The IIHMR University, Jaipur

for the partial fulfillment for the award of the degree of

Master of Business Administration (MBA)

in

Hospital and Health Management

by

AMAN KUMAR SAH

Under the Supervision and Guidance of

DR. GOUTAM SADHU

2023

DECLARATION BY STUDENT

I hereby declare that this dissertation titled To study on patient management in outpatient department and their satisfaction in the mission hospital, Durgapur 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 Information derived from the published or unpublished work of others has been duly acknowledged in the text.

(Signature)

Name of Student

Date

CERTIFICATE BY ORGANISATION



Ref: TMH/HRO/Per.F/May-23/124

Date-31.05.2023

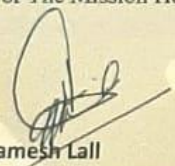
TO WHOM IT MAY CONCERN

This is to certify that **Mr. Aman Kumar Sah** student of **M.B.A in Hospital & Healthcare Management** at **IIHMR University, Jaipur**, has undergone **Dissertation Program** in the department of **Quality Assurance** at **The Mission Hospital, Durgapur** from **01.03.2023** to **31.05.2023**. His topic for Dissertation was **"To Study on Patient Management in Out Patient Department & Their Level of Satisfaction"**.

During the period of dissertation he has been found sincere.

We wish him all the very best for his future endeavors.

For The Mission Hospital, Durgapur


Ramesh Lall
President- HR & Admin.

Ramesh Lall
President (HR & ADMIN)
The Mission Hospital
Durgapur, West Bengal

The Mission Hospital, Durgapur | 219(P) Immon Kalyan Sarani, Sector-2C, Bidhan Nagar, Durgapur - 713212
P: 0343 2535555 | M: 9233355555 | F: 0343 2532550 | Email: hospital@themissionhospital.in | www.themissionhospital.com
Call: 9800881600 for free Ambulance within City Limits of Durgapur
A Unit of Durgapur Medical Centre Pvt. Ltd. CIN: U85110WB1987PTC042580

CERTIFICATE FROM FACULTY GUIDE

ACKNOWLEDGEMENT

The opportunity provided to do dissertation at The Mission Hospital, Durgapur was an enriching and valuable experience. I am highly obliged to have met so many experienced professionals who led me throughout my study period. I am sincerely grateful to them for sharing their truthful and illuminating views on several issues related to the project.

I would like to acknowledge, first and foremost DR. Partha Pal, (Medical Director) and Dr Tarakanath Taraphdar (DMS & Quality Audit) who inspired, guided, and helped me to complete my project at their respected organization, I take this moment to recognize their contribution gratefully.

I would also like to thank Mr. Soham Karmakar, Assistant Manager- OPD, and TMH whose support and guidance was extremely crucial for the fulfillment of the project.

My special gratitude goes to the personnel of Out-patient Department, Nursing staff. Quality Department for their excellent co-operation.

I am extremely thankful to my faculty at IIHMR-Jaipur and specially my Guide Dr. Goutam Sadhu for being my support all through the Dissertation.

I recognize this opportunity as a big milestone in the development of my career, I will strive to use the knowledge and skills gained in the best possible way.

Lastly, I want to express my respects and love to my parents, my siblings and my friends for constant encouragement and motivation in my higher studies.

Sincerely,
Aman Kumar Sah
MBA-HM-(2021-23)
ROLL No-1248

TABLE OF CONTENTS:

<i>LIST OF FIGURES</i>	8
<i>ABBREVIATIONS</i>	9
<i>ABSTRACT</i>	10
CHAPTER 1: INTRODUCTION	11
1.1 OBJECTIVE OF OPD	11
1.2 FUNCTIONS OF OPD	11
1.3 TYPICAL OPD (BACKGROUND):	12
1.4 TYPES OF OUTPATIENT SERVICES	12
1.5 GOALS OF THE DEPARTMENT.	13
1.6 SCOPE & COMPLEXITY OF SERVICES PROVIDED	13
1.7 QUALITY OBJECTIVE:	14
1.8 FEW OPERATIONAL DEFINITION	14
1.9 OPD PROCESS FLOW	15
1.10 REGISTRATION PROCESS	16
1.11 QUALITY INDICATORS	20
CHAPTER 2: LITERATURE REVIEW	21
2.1 Learnings from Review of Literatures:	24
CHAPTER 3: METHODOLOGY	25
3.1 RESEARCH QUESTION	26
3.2 RESEARCH OBJECTIVES	26
3.2 RESEARCH DESIGN:	26
3.2.1 STUDY SETTING:	26
3.2.2 DATA COLLECTION METHODS	26
3.2.3 SAMPLING TECHNIQUE	26
3.2.4 ETHICAL CONSIDERATION	27
CHAPTER 4: RESULTS	27-36
CHAPTER 5: DISCUSSION	37-38
CHAPTER 6: CONCLUSION	39
Recommendation	40
References:	41-42
Annexure	43-44

LIST OF FIGURES

Figure 1: Gender based distribution of Sample Size	28
Figure 2: Age wise distribution of sample size.....	28
Figure 3: Level of satisfaction of Doctor's from all the OPDs.....	28
Figure 4: Overall satisfaction from the hospital.	28
Figure 5: Recommendation of the Hospital.	28
Figure 6: Footfall of Major Departments.....	28
Figure 7: - Average, Consultation, and Total time of major OPD's in the month of March...28	
Figure 8: Average , Consultation, and Total time of major OPD's in the month of April.28	

ABBREVIATIONS

<u>SHORT FORM</u>	<u>FULL FORM</u>
BP	BLOOD PRESSURE
CC	CRITICAL CARE
CRA	CUSTOMER RELATION ASSISTANT
ED	EMERGENCY
EPABX	ELECTRONIC PRIVATE AUTOMATIC BRANCH EXCHANGE
ETC	ET CETERA
GDA	GROUP D ASSISTANT
GM	GENERAL MANAGER
HHIMS	HOSPITAL HEALTH INFORMATION MANAGEMENT SYSTEM
HIMS	HOSPITAL INFORMATION MANAGEMENT SYSTEM
HIS	HOSPITAL INFORMATION SYSTEM
HOD	HEAD OF DEPARTMENT
IEC	INFORMATION, EDUCATION & COMMUNICATION
IP	INPATIENT
IT	INFORMATION TECHNOLOGY
NABH	NATIONAL ACCREDITATION BOARD FOR HOSPITAL & HEALTHCARE PROVIDERS
NQAS	NATIONAL QUALITY ASSURANCE STANDARD
OPD	OUT-PATIENT DEPARTMENT
OT	OPERATION THEATER
SOP	STANDARD OPERATING PROCEDURE
UHID	UNIQUE HEALTH INDENTIFICATION NUMBER

ABSTRACT

Patient Management and Patient satisfaction holds equal significance to other clinical health indicators and serves as a fundamental approach to patient management and assessing the efficiency of healthcare provision, as indicated by patient satisfaction. The main method for gauging how well healthcare is delivered now centres on patient-centered outcomes. The purpose of this assessment is to gauge the level of patient satisfaction regarding outpatient department (OPD) services. This will be achieved by summarizing the experiences of patients who have sought medical attention at The Mission Hospital's OPD and evaluating the accessibility of the services provided.

In the study Observational and descriptive method were used in which patients who were registered for all the major outpatient department of The Mission Hospital of Durgapur, West Bengal over a period of three months were considered. A structured questionnaire was utilized as the research tool to collect data on patient satisfaction. The Likert Scale was employed to quantify the measurements. The assessment of patient experience and accessibility was categorized into five levels: Excellent, Good, Fair, Poor, and Very Poor, for evaluating the satisfaction level. Simple Random Sampling done for selection of patients registered in major OPDs. The data was put in excel and analysed.

The major findings of the study suggested that the patients had the highest level of satisfaction from almost all the OPD majorly from Cardiology, Orthopaedic, Gynaecology Department about helpfulness of nurses, about doctor diagnosis, and GDA staffs and about the good communication from the staffs. The poor experience was from waiting area of all the OPDs, space constraints, and delay in Report generation. As far as waiting time is concerned, in almost all the OPDs waiting time is more than 1 hour. Most respondents had an excellent experience, while only a small portion reported a poor experience. Furthermore, most patients reported good accessibility concerning various aspects such as the service process and working hours, diagnosis, doctors' behaviour, and the pharmacy. Though it was surprising to see that the respondents of the patient like to recommend the hospital to others even after so much of problem.

After observing the findings some technique like queuing technique and crowd management system was recommended to the hospital and as far as patient satisfaction is concerned the immediate action is taken which was possible or incidence report is made for the higher authorities to act.

Hence, Patient management is important in the hospital which has overcrowding due to reason mentioned and to provide services to the patient more than they expect to increase the satisfaction level.

Keywords: Patient Management, Patient satisfaction, Accessibility, Outpatient department.

CHAPTER 1: INTRODUCTION

Effective management of outpatient department (OPD) patients is a crucial aspect of hospital operations. Hospitals that experience overcrowding often face the challenge of patient dissatisfaction. Patient management in this context refers to administrative tasks rather than clinical ones. It involves crowd management, queue management, and ensuring a smooth process flow. Evaluating the quality of healthcare delivery now primarily focuses on patient-centered outcomes. The aim of this assessment is to measure the level of patient satisfaction with OPD services by summarizing patient experiences and assessing service accessibility at The Mission Hospital. The OPD is defined as a hospital department that provides diagnosis and/or treatment without requiring overnight stays for patients. It serves as the initial point of contact between the hospital and patients, often referred to as the "Shop Window" of the hospital. OPD services contribute to reducing morbidity and mortality rates. It is estimated that approximately 30-40 crore outpatients are treated in hospital OPDs in India. Integrated with the in-patient services and manned by Consultant Physicians and Surgeons. ¹

Patient satisfaction serves as a gauge for assessing the level of care provided at your medical practice. It encompasses not only the quality of care but also the patient's contentment with the treatment received. It serves as a measure of care quality, offering healthcare providers valuable insights into different aspects of healthcare, including the effectiveness of their care and the level of patient comprehension.

Patient satisfaction, although always an important consideration, has recently gained significant attention in the healthcare industry. With the shift towards patient-centered care, individuals are increasingly seeking a greater involvement in managing their own healthcare. As a result, they have higher expectations for the commitment and quality of care provided by healthcare providers. Healthcare providers are needed to adjusting their **healthcare marketing strategies** accordingly. ²

1.1 OBJECTIVE OF OPD

- Provide high-quality care.
- Modern technique for investigation and treatment.
- Good Public relation.
- Facilities to ensure complete patient satisfaction.

1.2 FUNCTIONS OF OPD

- Manage diseases through timely diagnosis and prompt treatment.
- Conduct thorough investigations and screenings to determine the necessity of hospitalization.
- Enable screenings and investigations for potential hospital admissions.
- Offer effective outpatient treatment.
- Provide post-discharge follow-up care and assist with patient rehabilitation.
- Offer training opportunities for medical, paramedical, and nursing staff.

- Potentially serve as a platform for epidemiological and social research.
- Implement control and surveillance measures to prevent the outbreak of communicable diseases.

A hospital is a vital healthcare facility that offers specialized staff and equipment for the treatment of patients, playing a significant role in society. Hospitals and health clinics differ considerably from other work environments. Within a hospital, the Outpatient Department (OPD) serves as a crucial component and acts as a reflection of the institution. The OPD receives visits from a large section of the community and serves as the initial point of contact between patients and hospital staff.

The utilization of information technology (IT) holds promise in enhancing the quality, safety, and effectiveness of healthcare delivery. Certain hospitals have already integrated technology into their operations, automating workflows and maintaining electronic records of inpatient information. However, these systems often fall short in effectively managing crowds within the Outpatient Department (OPD) section of the hospital. The OPD serves as the gateway to hospital services, and a patient's perception of the hospital begins there. This initial impression significantly influences the patient's overall experience and satisfaction with the hospital. Therefore, it is crucial to ensure that OPD services deliver an exceptional customer experience. Efficient and dependable patient flow management in the OPD section of a hospital system is an ongoing challenge. Increasing demand and the complexity of patient cases can result in delays in service delivery. Overcrowding has become a recurring issue in the OPD, where patients typically arrive, fill out registration forms, and wait to be called. In some cases, patients may call to schedule an appointment and then wait for a response indicating an agreed-upon date. These waiting periods can be highly frustrating for both patients and staff, highlighting the need for improvements in the OPD section.

The importance of assessing patient satisfaction levels in human services is rightfully gaining attention. It refers to a crucial battleground in the debate about whether consumers are satisfied in interviews with their human services providers when given enough data. Although choosing a medical clinic is a decision that most people make, the individual buyer's ability to make sound, financially savvy selections about medical services goods and administrations is being reviewed and evaluated. An educated customer is capable of altering quality criteria and costs while selecting the most profitable social insurance items and administrations. In any case, the ideal litmus test is the point at which the decisions become increasingly murky and extremely specialized, making correlations far more difficult for buyers. This truth will be used to make light of the buyer's possible job. The patient now has access to a variety of data sources, the most popular of which being the internet. A better knowledgeable patient has more questions about the conclusion, medicine selection, therapy duration, and cost. Inadequate ability to provide agreeable responses might lead to disappointment, loss of trust, and convincing a switch.

1.3 TYPICAL OPD (BACKGROUND):

With the advancement of innovation, the weights of controlling staff and prices, and the advancement of frameworks, the average length of stay in clinics has greatly decreased. Emergency rooms are increasingly willing to admit critical patients for long-term care. As a result, the emphasis on outpatient offices or simple day-care medical clinics has shifted.

1.4 TYPES OF OUTPATIENT SERVICES

OPD SERVICES IS OF TWO TYPES:

- **Centralized Outpatient Services:** Centralized outpatient services refer to a system where all administrative functions, diagnostic services, and medical facilities are consolidated within a single designated area or zone. This arrangement allows for the convenience of patients as they can access all necessary services in one location.
- **Decentralized Outpatient Services:** Designated offices are established to provide services, and these offices can offer an expanding array of accredited therapeutic approaches within outpatient administration centers. Outpatient services are accessible in various settings to cater to diverse needs.
- **Different kinds of outpatient offices include:**
 1. 1. Polyclinics and specialized clinics for referrals.
 2. Outpatient centres located within emergency clinics or other healthcare facilities.
 3. Surgical centres dedicated to outpatient procedures.
 4. Diagnostic imaging centres.
 5. Cardiac catheterization centres.
 6. Mental health or behavioural health centres that may offer substance abuse treatment.
 7. Services for adult and paediatric mental health care.
 8. Medical group practices.

1.5 GOALS OF THE DEPARTMENT.

At Help Desk: -

- To enhance the effectiveness and efficiency of handling inquiries.
- To provide guidance and direction to patients.
- To manage and access relevant information of admitted patients.

AT OPD: -

- Consultation with doctors.
- Creating necessary medical records and patient registration.

1.6 SCOPE & COMPLEXITY OF SERVICES PROVIDED

- Providing a warm welcome to patients, visitors, and the public.
- Managing patient appointments.
- Overseeing registration activities.
- Coordinating insurance and corporate desk tasks.
- Handling the electronic private automatic branch exchange (EPABX) system.
- Attending to patient needs.
- Managing outpatient feedback.

Methods used to access patient needs to customize the services provided.

- By analyzing feedback received from OP (outpatient) interactions.
- By conducting inter-departmental meetings.

1.7 QUALITY OBJECTIVE:

The OPD department is dedicated to delivering prompt services related to registration, admission, appointments, inquiries, health check-ups, and other OPD-related needs with a compassionate approach.

- The average time required for inquiries ranges from 3 to 5 minutes.
- The average time for registration is estimated to be between 5 to 7 minutes.
- The average time for admission is typically 5 to 10 minutes, subject to bed availability.
- The average time for OPD billing is approximately 5 to 10 minutes.

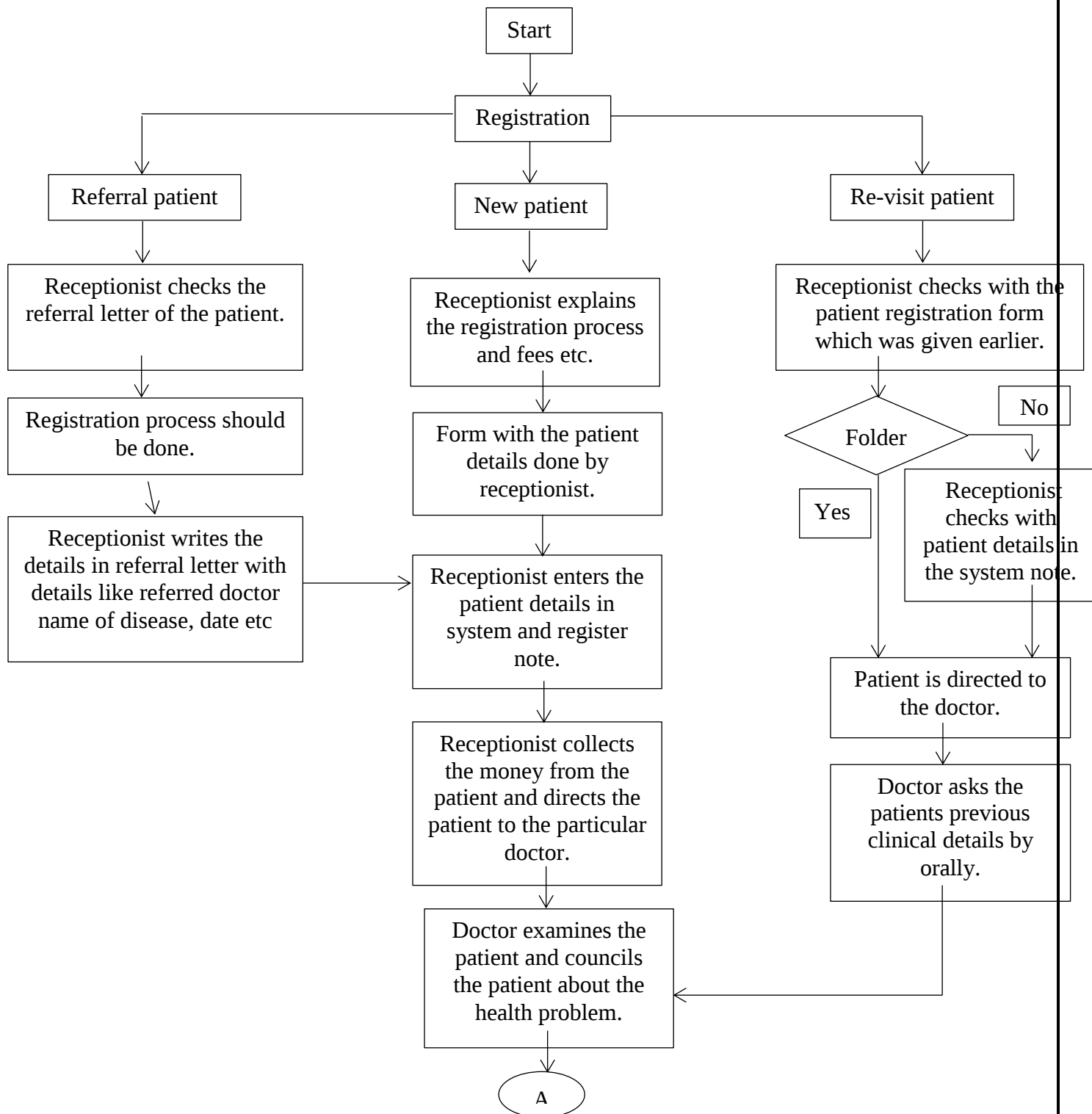
SCOPE SUPERVISOR

- The primary goal of the OPD department is to offer services with a friendly approach, prioritizing customer satisfaction and ensuring the contentment of attendants.
- The department aims to be patient-centric and cultivate patient loyalty by exceeding their expectations.

Background of the study problem

It is widely acknowledged that approximately 8-10% of OPD patients ultimately require hospitalization. Therefore, it is accurate to assert that the OPD acts as a gateway to the hospital's services, shaping the initial perception a patient has of the institution. This initial impression significantly impacts the patient's perception and sensitivity towards the hospital. Consequently, it is crucial to ensure that OPD services consistently provide an exceptional experience for patients, prioritizing their satisfaction and well-being.

1.9 OPD PROCESS FLOW



1.10 REGISTRATION PROCESS

Timings: 24 hrs.

Outpatient Registration:

Registration is a mandatory requirement for individuals seeking consultation at the Hospital. A registration fee of Rs 100/- will be applicable for every new registration.

To complete the 'Registration' process, the patient's personal information such as name, age, gender, email address, contact number, parent's name or spouse's name, and address are recorded in the Front Office module using the Registration Form provided by the hospital. This generates a unique UHID (Unique Hospital Identification) number for the patient. Subsequently, all investigations, consultations, and other relevant details pertaining to the patient are associated with this UHID number for each visit made to the hospital.

- When UHID No. is generated, prescription prints out & Bill Copy is given to the patient. He is informed about the significance of the UHID number & to carry the prescription with him or her or mention the UHID number for appointments or billings for each next visit to the hospital.
- While doing the registration it is ensured that the person is not registered earlier.
- If the patient who is visiting doesn't remember the Registration number, staff try to locate the UHID number by searching through his name, age, address in the system rather than generating a fresh UHID number.

OPD REGISTRATION & BILLING

- Patients visiting the OPD are provided guidance by both the Help Desk and Front Reception, directing them to the appropriate OPD reception counters.
- The process of scheduling prior appointments with OPD Consultants is facilitated through the Appointment module within the system.
- For patients visiting the hospital for the first time, a new registration number is generated at the OPD. A fee of Rs 100/- is charged for this New Registration.
- Consultation fees are collected from patients seeking doctor's consultation.
- Patients arriving from corporate entities are directed to the Corporate Desk for verification, following which the billing process is conducted directly from the OPD. Patient coming for doctors' consultation is guided towards doctor's chamber where OPD Coordinator/ FO assistants assists his/her consultation.
- All OPD assessment is done in a prescribed format by the doctors.
- Patient again comes to OPD counter for post consultation billing (investigation's ETC) if required and after that patient is guided to respective departments through Front Office staff. Patient is guided towards Admission counter if admission is recommended by the doctor.
- Patient is also guided to collect their reports from the report dispatch counter located at Basement Floor.

PATIENT CATCHMENT OPD:

- Walk-In patients.
- Patients coming for consultation – Old, New and Follow Up.
- IP discharged cases for follow up.
- Patients coming via Marketing, Advertisements, camps, Corporate tie-ups etc.
- Internal Staff and their family members and relatives.

TOKEN SYSTEM

Token System implemented in Corporate Desk, Insurance Desk, Phlebotomy and Main Reception.

MAIN RECEPTION

- Patients coming for Registration & Billing on Main Reception collect the tokens from Nursing station near the Help Desk.
- Patients wait for their turn until their Token No. is displayed on the respective Reception counters.
- Patients can sit in the Main OPD Reception waiting area to wait for their turn.

CORPORATE & INSURANCE DESK

- For Corporate & Insurance Desk, Token dispensing machine is mounted on the wall between Corporate & Insurance Desk
- Patients take their token & wait in the waiting area of the Corporate & Insurance desk.
- Patients enter the respective rooms in the respective desks when called according to patient's requirement.

PHLEBOTOMY

- Patients coming for giving the blood & urine sample takes their token from Basement Reception
- Patients wait in the waiting area in Basement till their Token No. is displayed on the display system above Phlebotomy.

COLLECTION OF REPORTS

- Report dispatch counter in basement OPD is one point contact for collection of all reports.
- When report is prepared, it is given to the Report dispatch counter every day from respective departments.
- CRA cross-checks the copy of the bill before dispatching any reports.
- A signature of the patient is taken on report dispatch register after handing over the reports to the patient, except for those which are in-house as we already have in our HIMS.

STORAGE OF THE REPORTS

- Reports are kept in Report Dispatch Counter up to 3 months.
- Backdated reports (after 3 months) are stored in the storage area.

OPD TIMINGS

OPD Timings: 9am – 6pm General Consultations

TIMINGS	TYPE	Category
9 am to 6 pm	General OPD	All
24 hrs. open	Emergency Services	Emergency

SOP for OP CONSULTATION

Procedure:

- To Greet the Patient / Patient party with smile and listen to his / her queries.
- To find out whether the patient is “Old Patient” (Old Patient is one who is registered earlier)
- To hand over the preprinted **Registration form** to the patient / attendants for desired information, if not an old Patient.
- To feed the same information to get the auto generated **UHID No** and records the same in **HIS**.
- To handover the system generated OPD Consultation Slip & Bill to the patient/patient party.
- Guide the patient / Patient party to the respective OPD Chamber.
- If the Consultant after **Initial Assessment** of the patient prescribes the patient certain investigations, then the patient is guided back to the OPD Desk.
- The patient gets the billing done for the tests prescribed & directed to the phlebotomy for sample collection / particular department. If necessary, the patient is given an appointment if it's a particular procedure.
- The reports are collected from the “**Dispatch Desk**”, after collecting the reports, patient goes to the respective consultant for review & thereby goes home.
- Initial Assessment Criteria for specialties which sometimes vary from specialty to specialty. (To be conducted by the **Treating Consultant**)
 - Patient's Age
 - Present Illness
 - History
 - Past Illness
 - B.P, Diabetes or Cardiac History
 - Medication history
 - Provisional Diagnosis.

SOP for ENQUIRY & MAY I HELP U

“Functions & Responsibilities”:

- i. To warmly welcome every caller/visitor, greet them with a smile, and inquire, "How may I assist you?" Endeavor to resolve their concerns independently or with the assistance of colleagues/superiors to the best of your abilities.
- ii. Maintain a courteous and concise manner, avoiding prolonged conversations.
- iii. Identify the whereabouts of consultants within the hospital premises or elsewhere and promptly relay any messages/emergencies/surgeries/admissions under their name, if necessary.
- iv. Customer Satisfaction Survey:
 - a. Distribute patient response forms to OPD patients to evaluate the quality of services.
 - b. Collect OPD Patient's Feedback forms from patients and hand them over to the Assistant Manager-Front Office.
- v. Update the daily schedule of doctors to provide information to the Billing Desks and TV displays.
- vi. Ground Floor OPD.
- vii. Issue temporary passes to patient parties in situations where patients need to visit during non-visiting hours.
- viii. To be update regarding the following: -
 - Customer Satisfaction.
 - Comprehensive information about diagnostic and therapeutic services, including their operating hours and current availability status.
 - Collaboration with public relations for hospital promotional campaigns and fostering positive relationships with stakeholders.
 - Offering health checkup packages for patients.
 - Facilitating appointment scheduling for patients with their preferred doctors.
 - Introducing new facilities and highlighting their significance in enhancing patient care.
 - Monitoring and reporting the status of any breakdowns or functional issues pertaining to major hospital equipment and installations.

Reasons	Plan of Action	Time Frame
1. New Investigations, Procedures prescribed by the doctor.	The approval of the Laboratory Head and the Medical Superintendent (MS) is required before sending a formal email from the MS office to the IT department,	The information should be entered into the system on the day of receipt.
2.System breakdown	IT to rectify	The bills to be entered in the
N.B- Any other conditions with the permission of HOD/ Billing In-charge/GM Operations		

1.11 QUALITY INDICATORS

1. Index of outpatient department.

Methodology:-

Score achieved/Maximum possible scoreX100

2. The duration of waiting for services, including diagnosis and outpatient care, will be assessed.

Methodology:-

Sum (patient in time for Consultation/procedure - patient reporting time in OPD/ diagnostics)/ Number of patients reported in OPD diagnostics

CHAPTER 2: LITERATURE REVIEW

In this study titled "Patient satisfaction among OPD attendees at a secondary care hospital in northern India," it has been observed that patient happiness serves as a reliable measure of the quality and effectiveness of healthcare services. Nowadays, patients are viewed as active consumers who play an active role in their healthcare decisions, resulting in a shift towards patient-centered care. Assessing patient satisfaction levels provides an objective evaluation of the effectiveness of these services. Patient feedback plays a crucial role in improving the responsiveness of healthcare services to meet patient expectations. To assess the level of satisfaction, a cross-sectional survey was conducted involving 200 OPD patients at a secondary-care hospital. The responses were recorded using a 5-point Likert scale. The majority of patients expressed their overall satisfaction with OPD services as "good" or "very good," with a mean (SD) score of 3.8 (0.77).³

The research study was conducted by Sathish Raju Nilakantam, B. Madhu, M. C. Prasad, M. Dayananda, Hathur Basavanagowdappa, Jayati Bahuguna, and Jagiri Narotham Rao in the outpatient departments (OPDs) of general medicine, general surgery, orthopedics, and cardiology at a tertiary care teaching hospital affiliated with a private university in Mysuru, India. Data collection was carried out using a structured and pre-designed questionnaire, which was divided into three main sections.

The first part of the questionnaire gathered sociodemographic information about the patients, including their gender, age, marital status, education, income status, and the source of funds for meeting hospital expenses. The second part focused on the details of the patients' hospital visits, such as the duration of the visit, reasons for the visit, and the time taken to reach the hospital.

The third part of the questionnaire assessed the patients' satisfaction with the OPD services. It included various aspects such as reception and registration, physical facilities, interactions with doctors and nursing staff, experiences with pharmacy services, experiences with laboratory services, overall services offered, and perception of waiting times for different services. The questionnaire employed a 5-point Likert scale, with response options ranging from "excellent" to "poor." Patients were asked to indicate their level of satisfaction by selecting the appropriate response. Those selected excellent, very good, and good were considered satisfied and who chose fair, and poor were considered dissatisfied.⁴

This article highlights the significance of technology and patient satisfaction in the healthcare industry. The proposed system presents a comprehensive approach that integrates hospitals, doctors, patients, and pharmacies into a single system, enabling "patient reviews and ratings for hospitals and doctors" and facilitating online outpatient department (OPD) management.

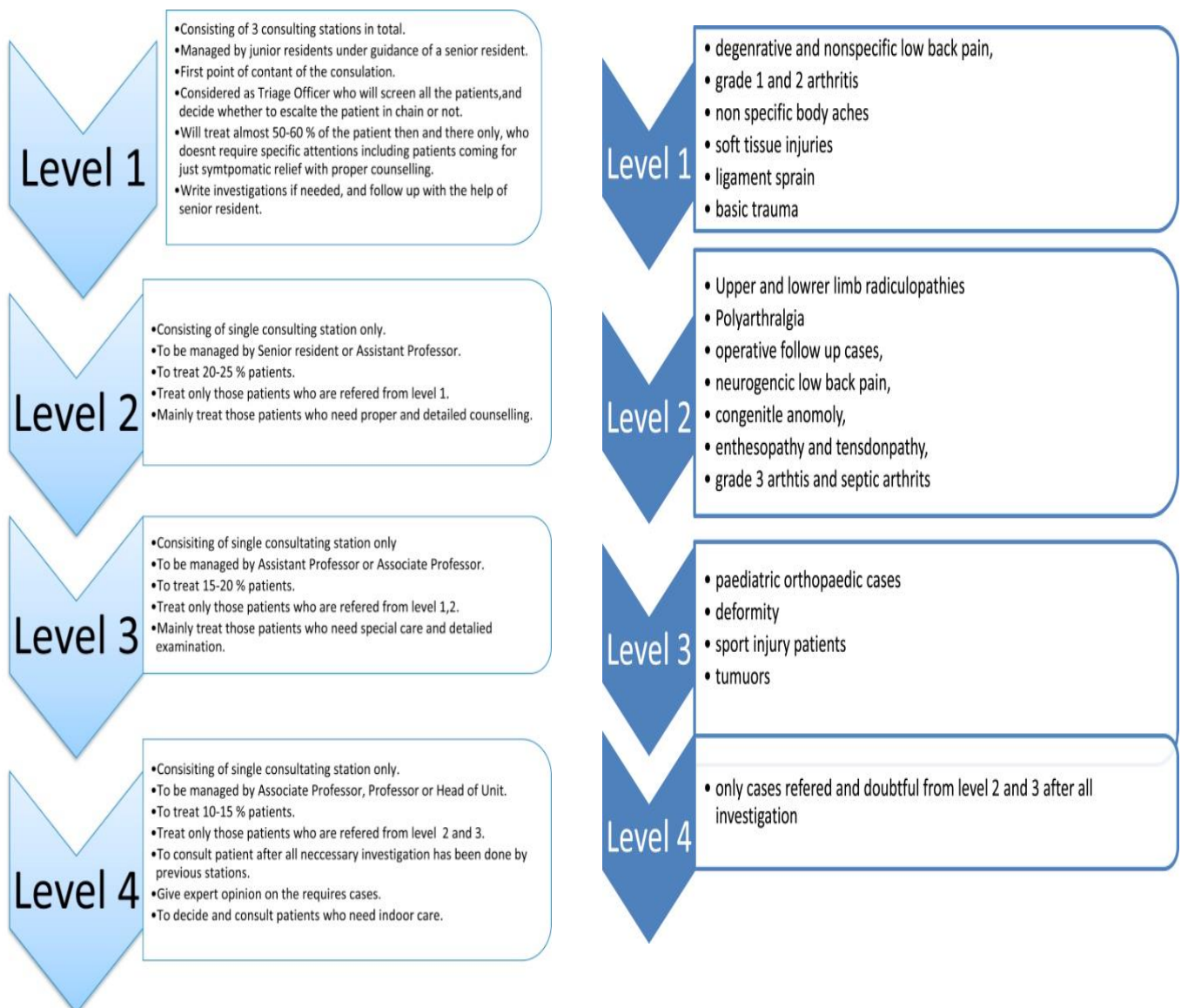
To utilize the system, hospitals, doctors, patients, and pharmacies are required to register and provide their relevant information. After a patient's check-up, the doctor can transmit the prescription electronically to the pharmacy. Patients have the opportunity to rate and review the doctor or hospital based on their treatment experience. This incentivizes physicians to deliver high-quality care in order to receive positive ratings and reviews.

By implementing this system, various time-consuming and inconvenient tasks for doctors and patients can be efficiently managed..⁵

In the orthopedic outpatient department (OPD), Goyal ND, Chavan RK, Pahwa A, Gautam VK, Mishra N, and Tripathi PK conducted a study utilizing the triage method for patient identification and treatment. The triage process involved categorizing patients into four levels based on their condition and urgency of care.

During triage days, approximately 91% of patients expressed satisfaction with the professional care they received, the depth of the doctor-patient relationship, the attitude of the doctors, and the counseling provided by the doctors. In contrast, on non-triage days, this satisfaction rate dropped to only 51%.

In terms of the treating doctors, around 93% of the time, the consultants demonstrated higher levels of happiness and enthusiasm in consulting with patients on OPD triage days. On non-triage days, this percentage decreased significantly to only 32%.⁶



In the article titled "Patient Satisfaction Survey as a Tool Towards Quality Improvement" by Rashid Al-Abri and Amina Al-Balushi, the main objective is to conduct a comprehensive analysis of various research studies that critically examine the relationship between different attributes, both dependent and independent, and overall patient satisfaction. The article also explores the impact of patient satisfaction on the quality improvement process within healthcare organizations. Additionally, the literature review focuses on different measurement tools used to assess patient satisfaction. The authors employed two search strategies to gather relevant research articles. The first strategy involved using specific keywords, while the second strategy, known as the snowball search method, involved exploring references and citations within the identified articles. Various databases such as Google Scholar, Medline, Emerald, Pub-Med, and Science Direct were utilized for the search. The primary keywords used in the search included patient satisfaction surveys, quality improvement, patient feedback, hospitals, and patient satisfaction measurement. As a result of the research study, a total of 29 articles were identified that appeared to be highly pertinent to the subject matter being investigated.⁷

The Hospital Health Information Management System (HHIMS) is a project that has been successfully implemented in several Base Hospitals, including Dambadeniya, Mahaoya, Awissawella, District Hospital Dompe, and Base Hospital Karawanella. The HHIMS offers various functionalities, such as patient registration upon arrival at the Outpatient Department (OPD), generation of reports (including OPD registers and dispensed drugs), and retrieval of patient information.

The project aims to achieve the following objectives:

- i. Develop a patient information registration and management system specifically designed for the OPD.
- ii. Integrate a patient alert system through a mobile application with the existing patient management system.⁸

The goal of the study was to evaluate the effectiveness of OPD services and patient satisfaction at a tertiary hospital and to identify corrective actions that may be taken to improve healthcare services in response to patient suggestions. At the ESIC Medical College and Hospital in Faridabad, a cross-sectional, descriptive study was carried out using exit interviews with new OPD patients from August to September 2016. Thusly gathered data were examined using SPSS 17.0. Out of 145 study participants, 88.9% (129) thought the hospital's services were of a good quality, while 11.1% (16) thought they were of a poor quality. Only 19.31% (28) of individuals were said to be unsatisfied with the hospital OPD services, compared to 80.68% (117) of subjects who were. There was no statistically significant correlation between the study subjects' sociodemographic characteristics and their overall perception of quality.⁹

In this study, a total of 150 healthcare providers were interviewed using a structured interview schedule to gather their opinions. The data collected from the interviews were then presented through graphical representations, specifically in the form of bar charts. The following points were considered during the interviews with healthcare providers and were visualized in the bar charts: The placement of the Outpatient Department (OPD) of the hospital, whether it is under one roof or in the same compound.

The availability of sufficient staff in the OPD for both technical and administrative work.

The impact of easy access to OPD services on the provision of better and more efficient healthcare services. The level of satisfaction with the facilities provided by the hospital in the OPD.¹⁰

This study includes a total of 48 studies that examine strategies and contextual elements that promote patient engagement. These strategies were thematically classified and linked to various approaches aimed at improving design, recruiting, involvement, and leadership actions, as well as creating a receptive context. The reported benefits of patient engagement varied, ranging from improved care processes and service delivery to the creation of instructional tools and informed policy papers. The level of patient engagement was found to influence the outcomes of service redesign, with low-level engagement primarily resulting in discrete products such as consultative feedback, and high-level engagement primarily leading to care process improvements and structural outcomes through co-design or partnership strategies. Only a small number of studies (12 out of 48) formally assessed patients' experiences of the engagement process. While most of these experiences were positive, with increased self-esteem, empowerment, and independence, some patients expressed a desire for greater involvement and felt that their participation was tokenistic, particularly when their requests were denied or decisions had already been made. Overall, patient engagement has the potential to inform patient and provider education, shape policies, and improve service delivery and governance. However, more evidence is needed to better understand patients' experiences throughout the engagement process and determine whether these outcomes translate into improved quality of care.¹¹

This paper authored by Jagruti Pancham, Prajakta Bhakare, Suruchi Kitey, Prajakta Kajale, Neha Shegaokar focuses on the operational flow within hospitals, including tasks such as appointment scheduling, handling emergency cases, and providing information about nearby hospitals. To address these challenges, the authors are developing a web application that integrates an automatic billing system and pharmacy services. Real-time data from various parameters is collected and displayed on the web application's dashboard. The development of the web application involves the use of technologies such as the Django framework and Visual Studio. Python and SQL are utilized for data parsing and retrieval.

The primary goal of this project is to reduce manual work and facilitate easy appointment scheduling from the comfort of one's home, especially during pandemic situations. The web application for online OPD management and hospital management system has been successfully designed and tested to handle real-time data. Patients can use the application to request appointments and specify their preferred time slots. This helps address issues such as long waiting times and overcrowding in hospitals. The validation process ensures that hospitals and doctors provide safe and secure healthcare treatments from the best professionals.

This project is software-based and can be accessed on various platforms, including PCs, tablets, laptops, and mobile devices connected to the internet. It aims to provide solutions to problems faced by patients and hospitals, ultimately improving healthcare services. Additionally, the rating system implemented within the application ensures that patients' satisfaction is prioritized, helping to identify and resolve issues within the healthcare system.¹²

In this study report, a total of 5,996 titles were identified, out of which 44 studies were deemed eligible and covered 17 types of Health Information Systems (HIS). Among these studies, 22 (50%) focused on patient flow at the department level, particularly in the emergency department, while 18 studies (41%) examined HIS at a hospital-wide level, and four studies (9%) investigated network-wide HIS.

The majority of the research analyzed process outcomes using time-related metrics such as "length of stay" and "waiting time." The findings revealed that HISs played a significant role in addressing flow issues by identifying bottlenecks, optimizing care operations, and improving care coordination. However, it was concluded that further investigation is needed to understand the mechanisms and reasons behind how HISs influence patient flow at different levels of

care.¹³

This study, authored by Duangpun Kritchanchai and Soriya Hoeur, explores the allocation of OPD (Outpatient Department) facilities using the value chain concept. The methodology involves analyzing the patient flow within the existing OPD, followed by the design of a new OPD and the relocation of support facilities. Discrete-event simulation techniques are employed to model the patient flow in both the existing and new OPD settings. The results of the simulation experiments reveal that separating primary and support facilities can effectively alleviate congestion in the clinic floor area of the OPD. Importantly, the findings suggest that optimizing capacity in the new facility should focus primarily on processes that occur after the clinical processes. This indicates that enhancing efficiency in these later stages can significantly contribute to the overall performance and effectiveness of the new OPD facility.¹⁴

2.1 Learnings from Review of Literatures:

- According to study there is scope of improvement in future perspective by digitalizing the process.
- Patient satisfaction is one of the important factors in Hospital industry and it can be made much more convenience and easy by providing services to patient according to the expectation of patients.
- In the excess patient flow hospital, they can use triage method for the selection of patient according to the incidence and prevalence of disease and type of disease.
- According to the patient footfall the manpower should be provided for administration and support services.
- Continuous feedback is only key to success for any hospital it will also lead to increase the efficiency of the hospital by analysing and resolving the gaps in available resources and change in the condition accordingly.

CHAPTER 3: METHODOLOGY

This Chapter provides the readers with a detailed explanation of how the data was collected and analyzed. It allows the reader to understand the research design, the population studied, the sampling methods used, and the data collection and analysis techniques employed.

3.1 RESEARCH QUESTION

1. What are the factors leading in increasing the crowd in OPD?
2. What is the satisfaction level among the patients in the Outpatient Department and the possible reasons for dissatisfaction?

3.2 RESEARCH OBJECTIVES

Objective 1: To study and suggest for smoothen the flow of patients/crowd in OPD.

Objective 2: To assess the satisfaction levels among the patient.

Objective 3: To identify the strategies and to help the hospital increase their patient satisfaction levels.

3.2 RESEARCH DESIGN:

Descriptive and Observational Study.

3.2.1 STUDY SETTING:

This study was conducted at The Mission Hospital, Durgapur a multi-specialty hospital with 350 beds and approximately 30+ specialties, located in the West Bengal region. The study was conducted under the guidance of Head, Quality department, of the hospital and spanned from March to May of 2023.

3.2.2 DATA COLLECTION METHODS

- Primary data - Collected from records of each OPD consultants. (Interaction with patient)
- Secondary data – Collected from Hospital Records

3.2.3 SAMPLING TECHNIQUE

Simple Random Sampling.

Simple Random Sampling- Simple random sampling is a method that ensures every item or individual in a population has an equal opportunity to be chosen. In the study conducted at OPDs, patients were randomly selected and interviewed to assess their satisfaction with the services and treatment they received. This approach allowed for a representative sample of patients to be included in the study, providing valuable insights into the overall level of patient satisfaction.

❖ SAMPLE SIZE –800

3.2.4 ETHICAL CONSIDERATION

The proposed research conforms to the consent given by participants regarding data collection. However, any confidential information that may potentially reveal the participants' identities were safeguarded to prevent any unintended consequences. To ensure that the study does not violate any copyright laws, proper attribution and referencing was given in the research. This was done with an aim to maintain the integrity of the research while also protecting the privacy of the participants and ensuring that their rights are respected.

CHAPTER 4: RESULTS

OBSERVATION AND ANALYSIS: -

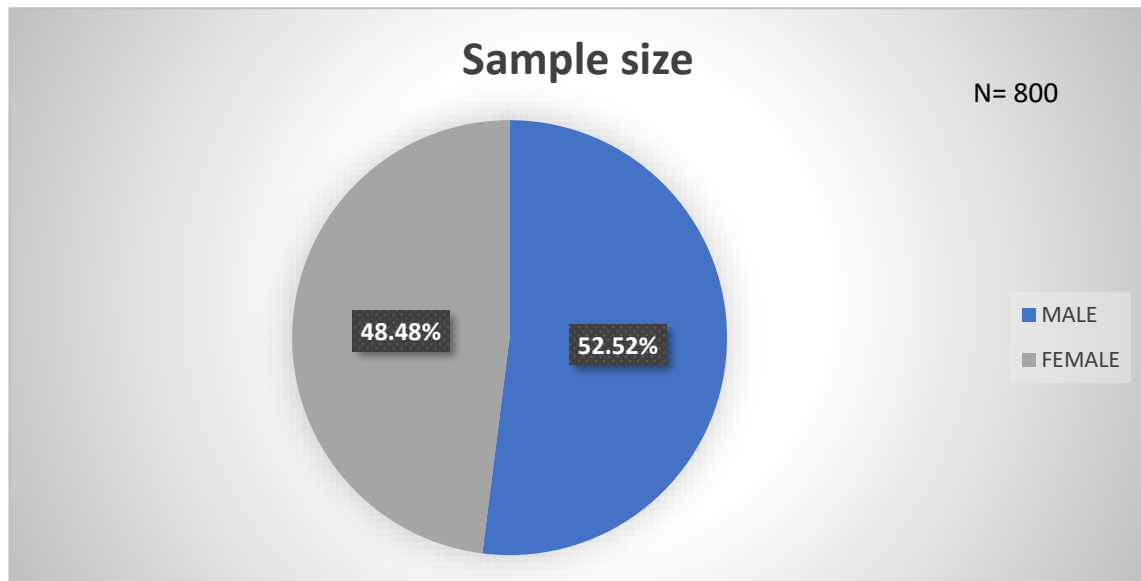


Figure 1: Gender based distribution of Sample Size

The above figure 1 stated that out of total sample size of 800 in the study, 413 (48.13 %) are male patient whereas 387 patients are female.

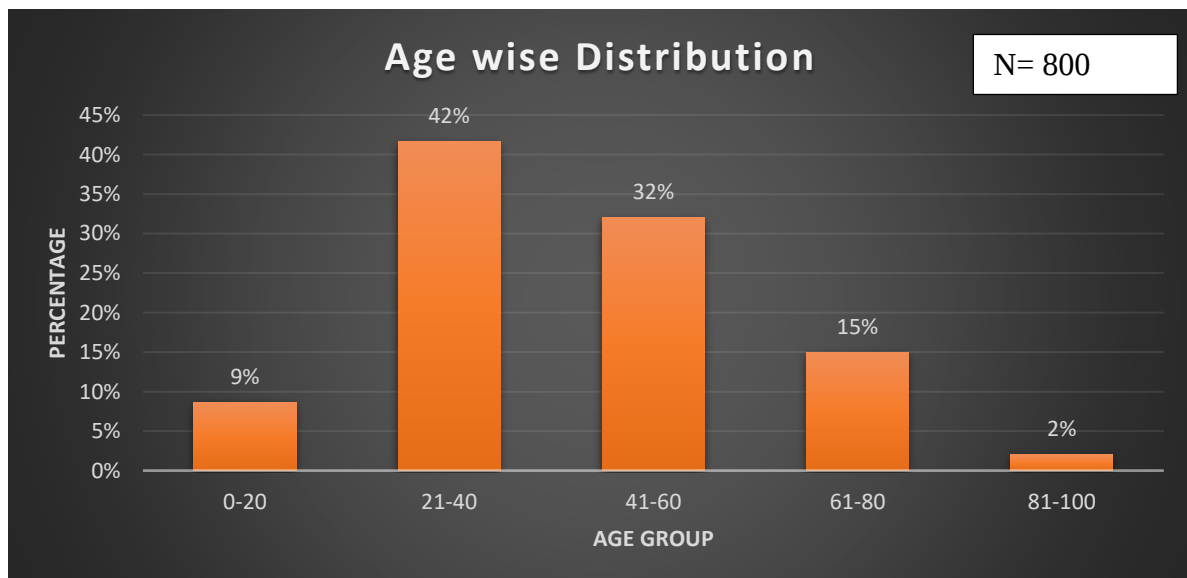


Figure 2: Age wise distribution of sample size.

Out of sample size of 800 it has been that one out of nine (72) patients were between the age of 0-20 years, 333 patients were between the age of 21-40 years, 262 patients were between the age of 41-60 years, followed by 120 patients between the age of 61-80 years and 16 patients fall under the age category of 80-100 years.

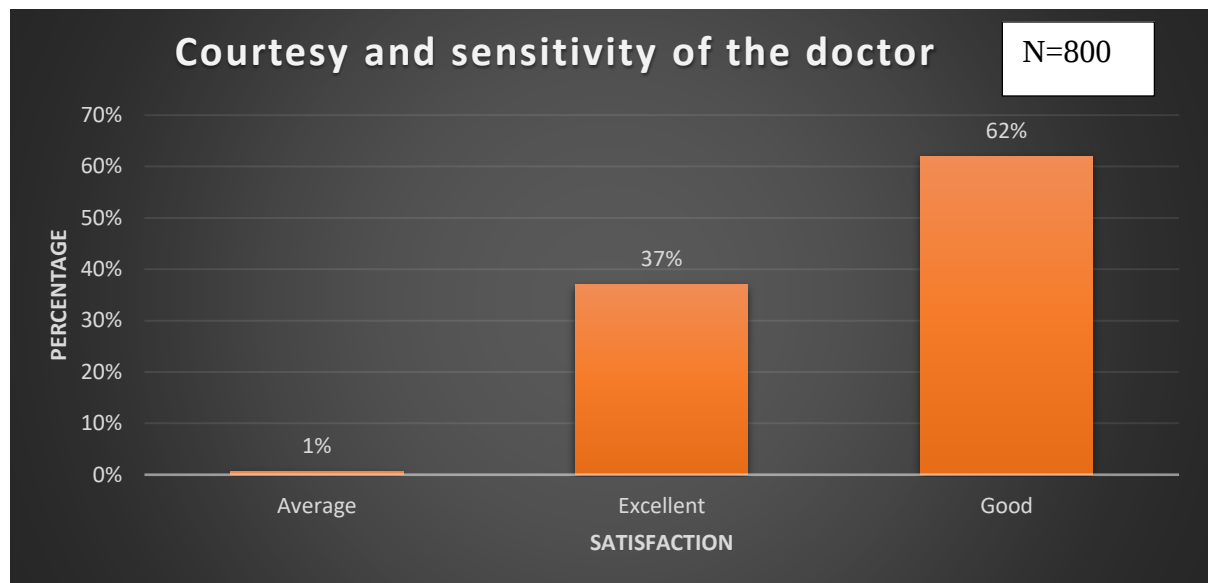


Figure 3: Level of satisfaction of Doctor's from all the OPDs.

The above figure 3 states that out of 800 sample 495(62%) patients gave feedback as Good to the Doctors, followed by 300(37%) as Excellent and very few patients rated average. Likert scale has been used to assess the satisfaction level of patients and surprisingly no patients has rated poor or very poor for the diagnosis of the doctors.

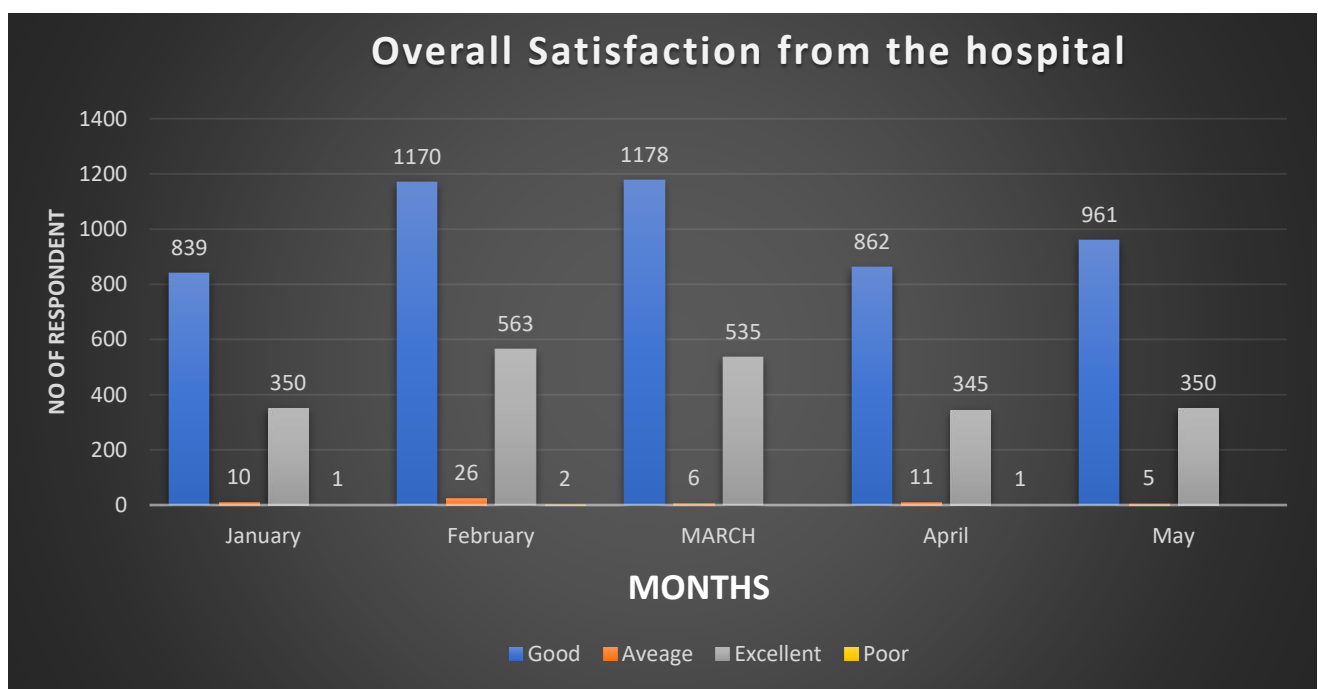


Figure 4: Overall satisfaction from the hospital.

In this graph retrospective data is also taken for 2 months. According to the graph the trend shows that maximum patient rated Good for the level of satisfaction from the hospital Excellent and Average. Very few patients are not satisfied by the hospital.

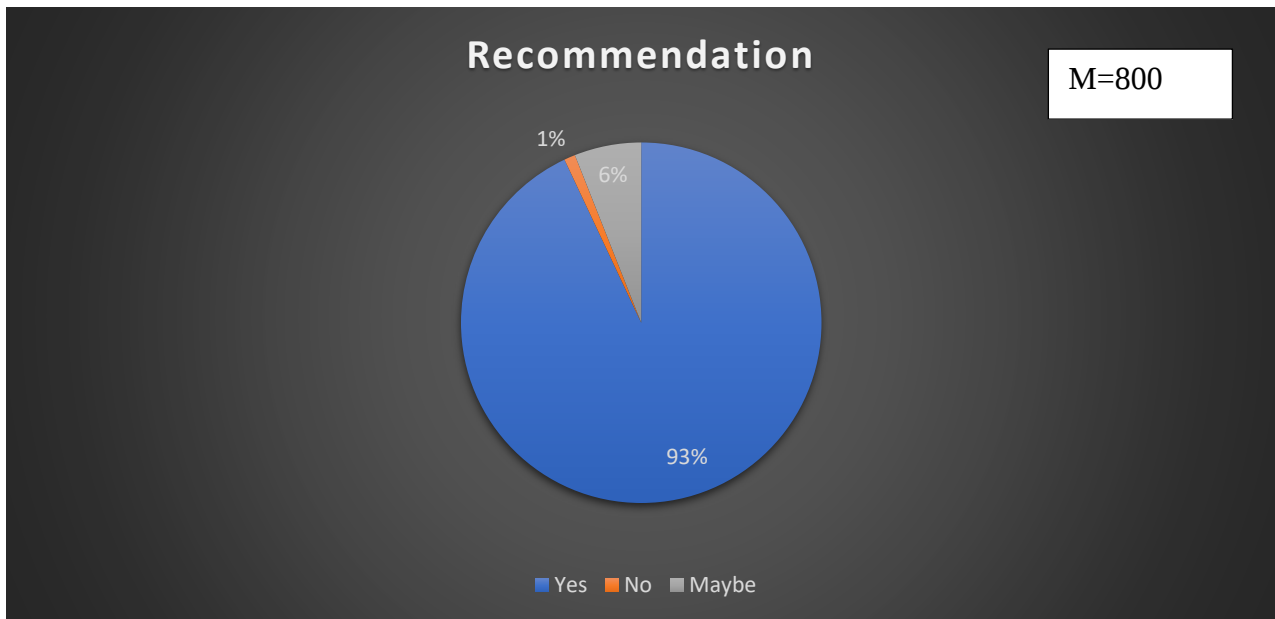


Figure 5: Recommendation of the Hospital.

Almost majority of patients (93%) were willing to recommend the hospital to others whereas very less number of patients answered no or most likely.

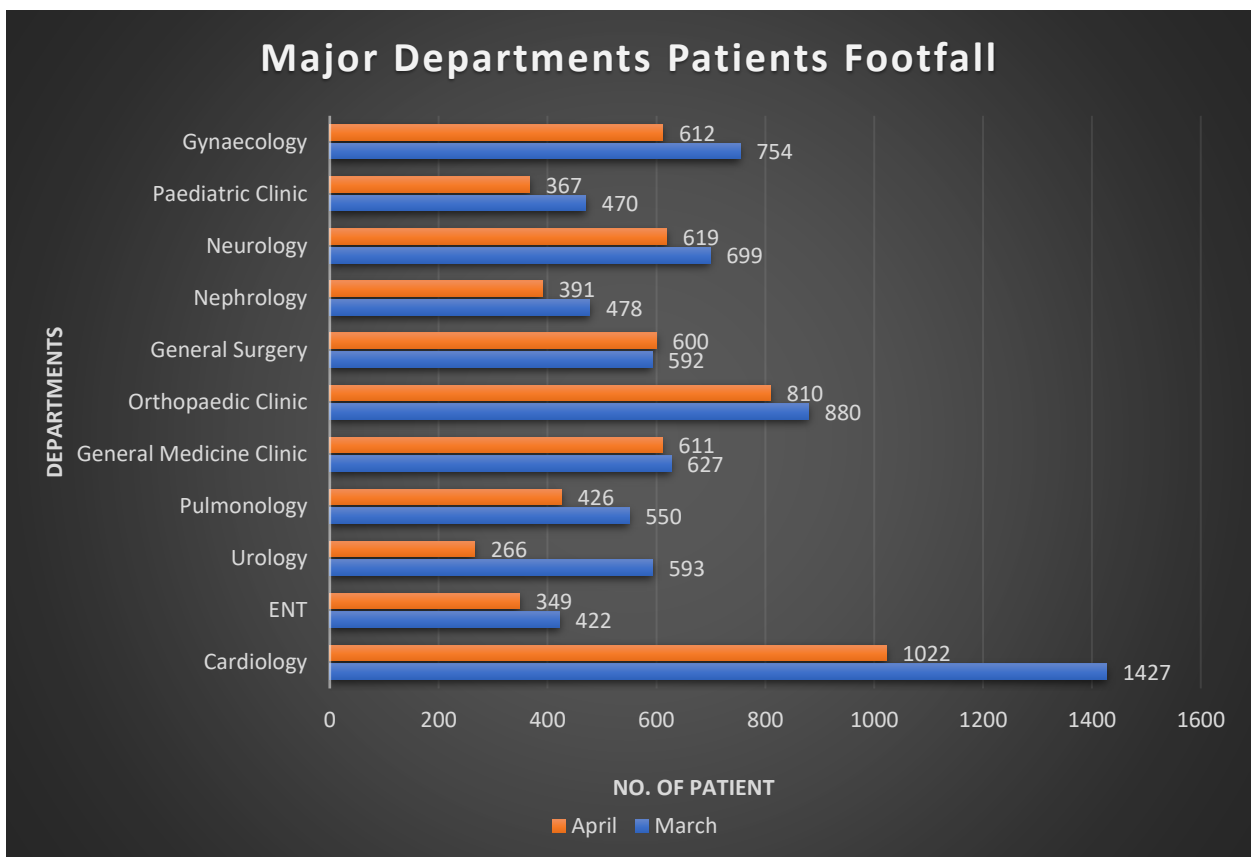


Figure 6: Footfall of Major Departments

Trend shows that in almost all the OPDs footfall has decreased in the month of April as compared to the month of March reason might be seasonal trends.

- It has been seen that Cardiology department has major footfall followed by Orthopedic and Gynecology.
- ENT shows the less no of patient foot fall.

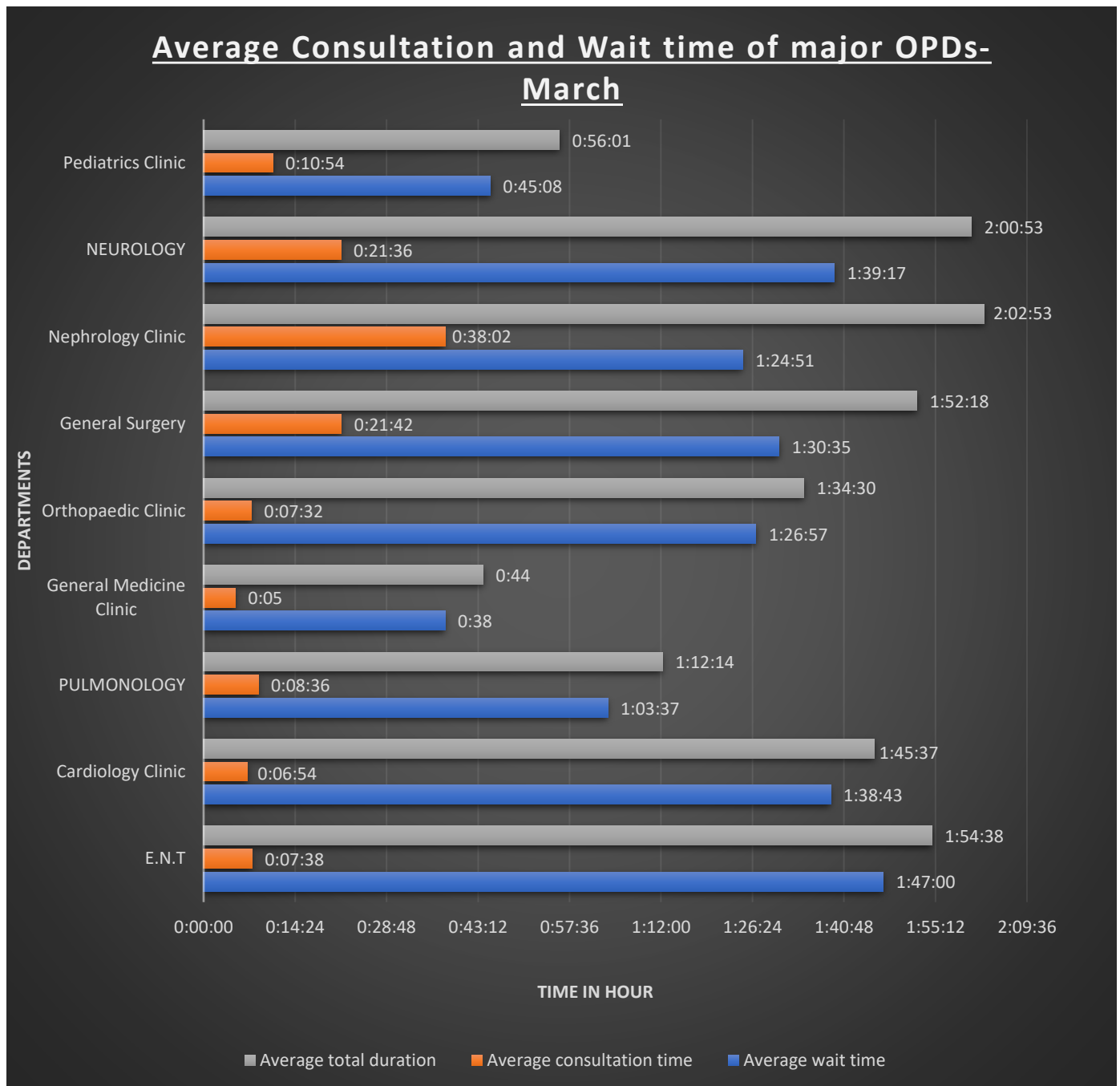


Figure 7: - Average waiting, Consultation, and Total time of major OPD's in the month of March.

It has been observed that ENT has the maximum waiting time followed by Neurology and General surgery.
General Medicine Clinic shows the lowest waiting time.

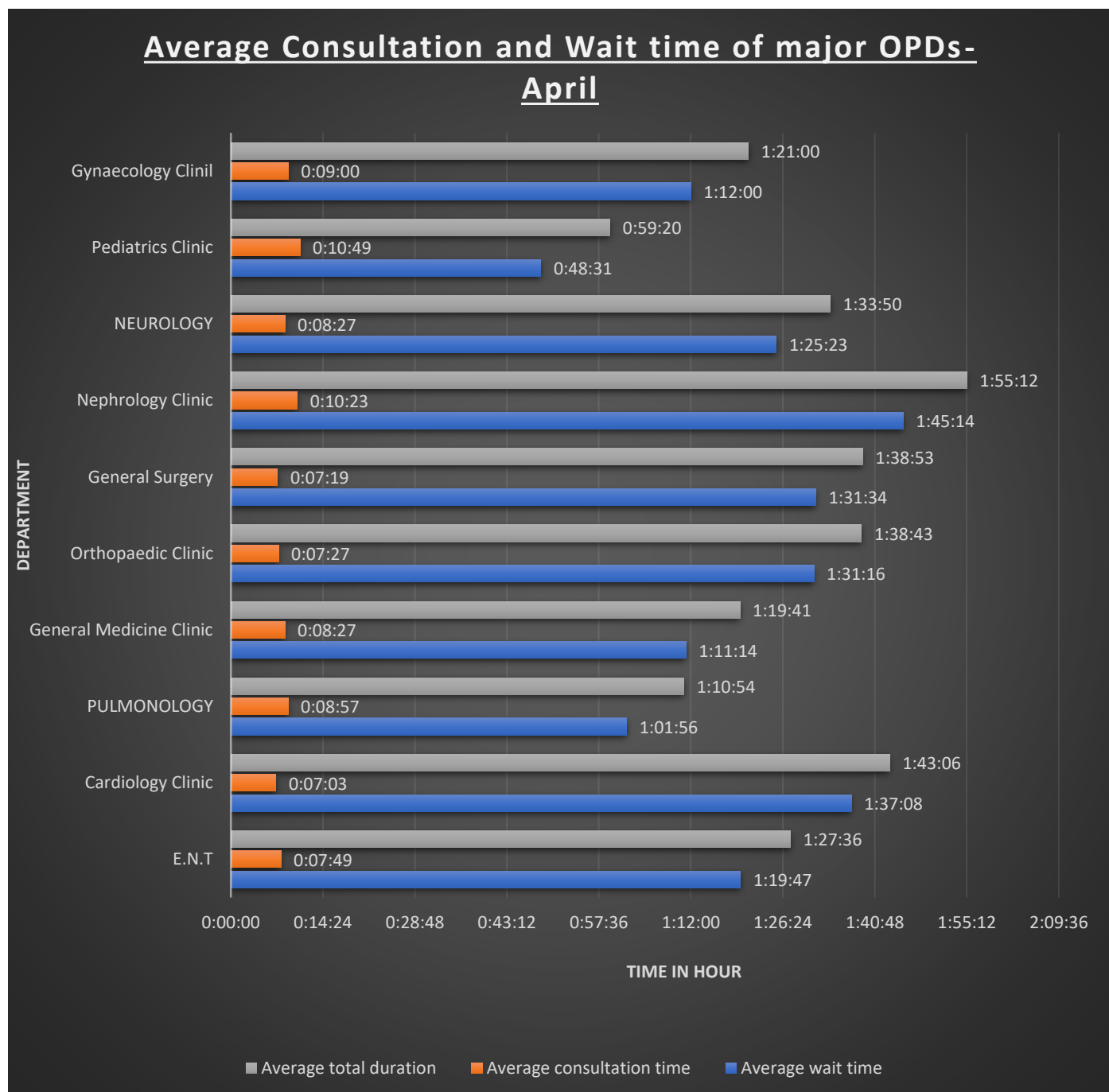


Figure 8: Average waiting, Consultation, and Total time of major OPD's in the month of April.

It has been observed that Nephrology has the maximum waiting time followed by Orthopedic and General surgery.

Pediatric Clinic shows the lowest waiting time.

Apart from the core work given by the hospital. The assessment has been done by the NQAS checklist to know weather the hospital can pass the NQAS percentage which is 70% for accreditation. With this checklist assessment has been done and the score was 83 % which is mentioned below. Some gaps were observed and opportunity for improvement was suggested.

National Quality Assurance Standards for District Hospitals	Version: DH/02/19
--	------------------------------

Checklist for Outdoor Patient Department	2
---	----------

Assessment Summary

Name of the Hospital	THE MISSION HOSPITAL	Date of Assessment	
Names of Assessors	AMAN KUMAR SAH	Names of Assesses	
Type of Assessment (Internal/External)	INTERNAL	Action plan Submission Date	

OPD Score Card

	Area of Concern wise Score	OPD Score
A	Service Provision	70%
B	Patient Rights	67%
C	Inputs	68%
D	Support Services	93%
E	Clinical Services	98%
F	Infection Control	93%
G	Quality Management	90%
83%		

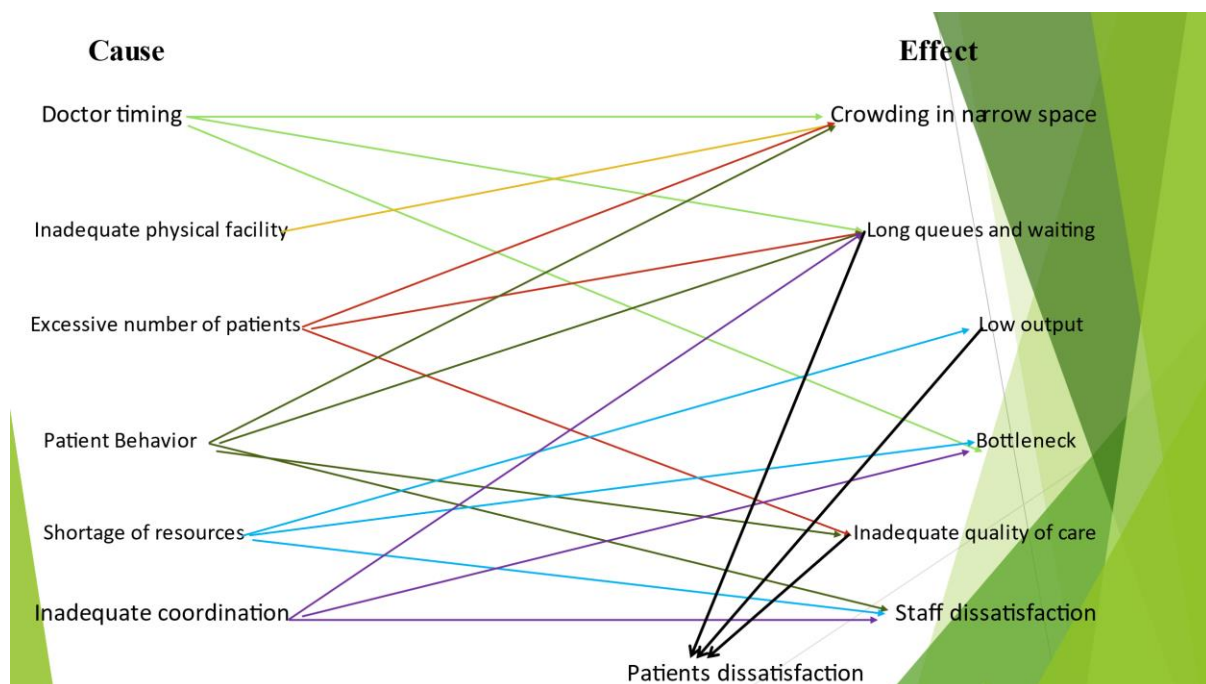
H	Outcome	50%	

	Major Gaps Observed
1	Department does not have adequate space as per patient load that why the outcome percentage is very low.
2	Patient amenities was not provided as patient load which decrease the patient satisfaction also the IEC material is very less in the departments which decrease the patient right percentage.
3	In few areas there was no demarcated clinics or rooms available.
4	Access to facility is provided without any physical barrier & friendly to people with disabilities.
5	Outcome measures are not calculated but registers are maintained.
	Strengths / Good Practices
1	Clinical services are the main strength of the hospital because of doctors' treatment and goodwill.
2	Support services are also good as their support services are divided into two segments one is GDA second is housekeeping.
	Recommendations/ Opportunities for Improvement
1	Structural changes at some area (waiting area) will lead to increase the efficiency of the hospital.
2	Demarcated clinics and specific room should be there for the better outcome as these are also considered important.
3	Awareness Signages and IEC material should be displayed.

Problem Identified (collective from all the OPDs)

1. Patient is standing or sitting or lying on the stretcher on lobby waiting for doctor and there is no announcement or sign that doctor has come in the cabin there is no one to guide (Except GDA), it's just the person accompanying patient is roaming and checking after all there is no place to sit.
2. No caretaker for patient as due to crowd AC runs in low temperature which lead to shiver the patient and search for blanket those who are in stretcher.
3. Patients arriving 2 to 3 hours prior to the appointment schedule. (Mainly outside patient)
4. Increased waiting time of patients due to non-availability of doctors due to their rounds and OT schedule.
5. Confusion regarding the direction. Signages are not clear, or we can say its useless in some places.
6. Confusion among patient to find the doctor chamber.
7. More than one attendant with the patient for OPD consultation which ultimately increase the crowd.
8. Monday and Friday is observed as overcrowded hence there is need for increased number of workforce.
9. No Proper Board of doctors List. (Digital Signage show 2-3 doctors at a time.)
10. Token Box is not highlighted/visible, even person standing there cannot identify that it is token box though it has written above.
11. Arrangements for Sitting for patient party who wait for doctor advice during/after OT. (Sitting on the stairs.)

Cause and Effect Diagram



Solution/Suggestion for OPD- Patient Management

1. Only one patient attendant allowed with the patient in OPD.
2. Floor wise token system. (Even in Pharmacy)
3. Doctor name guide at appropriate places on basement, ground floor and first floor. (Co-Ordinator)
4. Sample collection top board to guide near the basement entrance.
5. The coordinators will coordinate on the doctor's arrival and the appointments of the patients, proper announcement should be made.
6. The patients would be called in to the hospital as per their turn in the appointment. (Tracking System)
7. Patients with a confirmed appointment either walking or taking prior appointment would be allowed half an hour prior to the appointment inside the hospital.
8. Adequate Sitting arrangements for patients and their relatives. (Outside Main building)
9. Requirement of detailed signage speaking about the name of doctors and their room numbers on the entrance.
10. Digital appointment with payment method should be introduced.
11. Some signage or band for value patients.

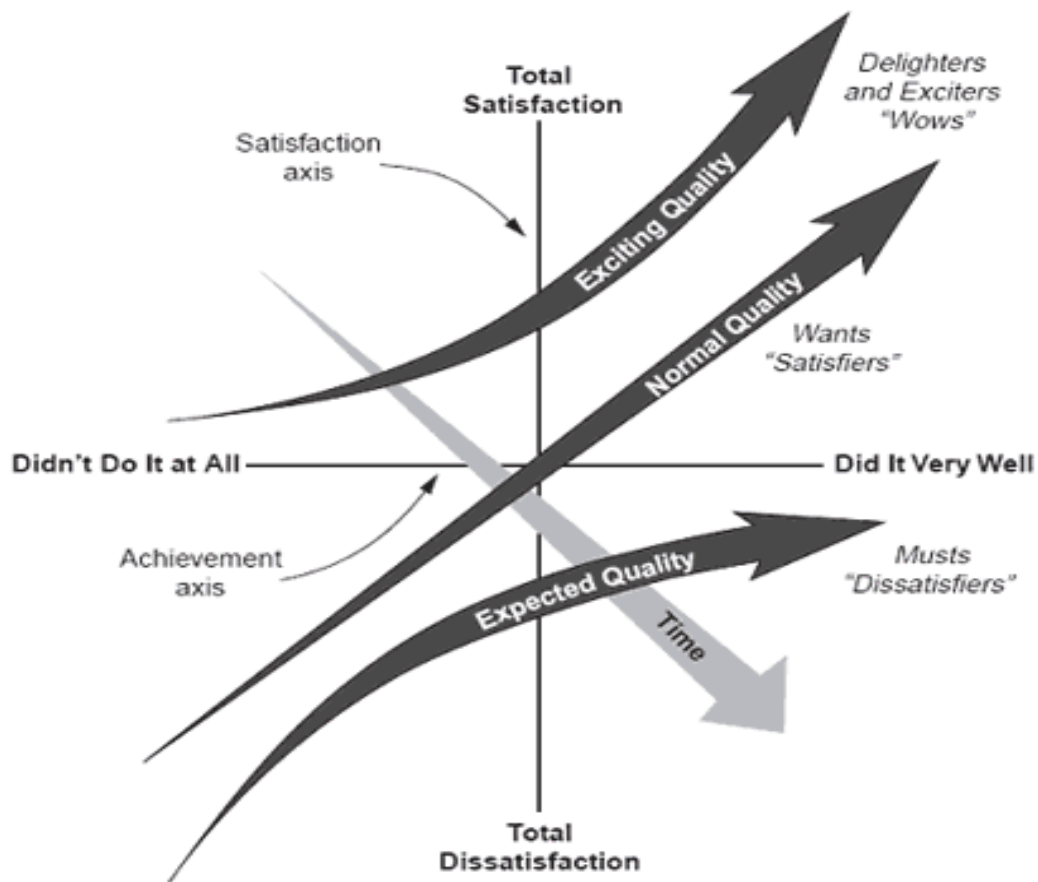
Reasons of Patient Dis-satisfaction.

1. Sitting Area problem in 1st Floor, Ground Floor and Basement (Lack of Chairs).
2. Cafeteria services (sitting space) is insufficient should be improved.
3. Online Payment should be there in Cafeteria.
4. As per patient flow, washroom (mainly restroom) is very less, during peak hour patients have to wait for a long time.
5. Services are expensive.
6. Very long waiting time in pharmacy also medicines are not in the places, no separate line for senior citizen.
7. Need advanced technology and machines for testing and processing.
8. Issue for Parking area both Bike and Car. (Mainly Car) for the patient and visitors.
9. Proper information to patient party about diagnosis and revisit.
10. Rude Behaviour of Security.
11. Delivery of reports are late.
12. Feeding room, diaper changing room is not there in OPD.
13. OPD Appointment process is not satisfactory.
14. There should be separate arrangement for the patient coming from outside the city. Many times, beds are not readily available for the patient coming from other city and they must suffer a lot.
15. Drinking water facility is not there in every floor.
16. When doctors come in OPD some announcement, or some indication should be there for arrival of doctor.
17. Doctors are not present during OPD hours.

Suggestion or changes of Patient Satisfaction

1. At least there be sufficient chair for the patient to sit.
2. Online payment must be present in cafeteria.
3. Increase rest room capacity, mainly in basement and ground floor.
4. Token no in pharmacy should introduce.
5. Appointment system should improve (self-registration and payment by portal).

KANO MODEL



- **Must be/Basic level of satisfaction** - OPD consultation Infrastructure, Washroom and drinking water facility, Best Doctor diagnosis, Sitting arrangement.
- **Normal need/Performance/Satisfier** – Pharmacy, Registration process, Queuing system, Support staff (GDA), Diagnostic services. Prioritization, identification of vulnerable patient, attention to special needs, staff behaviour.
- **Exciting Quality/ Delighters** - Early detection of disease (Advanced medical devices), Robotic Nurse, Transparent process, Tracker in Doctors (Optional), Digitalised tracking of process, least waiting time.
- **Indifferent attributes** – Hassle free registration process, single window policy, smooth transaction from one process to other, attention of care giver.

CHAPTER 5: DISCUSSION

The efficient management of outpatient department (OPD) patients plays a vital role in delivering excellent healthcare services and ensuring patient contentment. This research aims to examine the patient management practices employed in the OPD of Mission Hospital in Durgapur, along with assessing the level of patient satisfaction with the provided services. By identifying areas for improvement and addressing gaps, this study has the potential to enhance patient experiences and optimize patient management practices within the OPD.

Appointment scheduling, registration, waiting times, consultation, and follow-up are all part of patient management in the OPD. These processes have a substantial impact on the patient experience and overall satisfaction with healthcare services. In recent years, there has been an increasing emphasis on patient-centered care, which emphasises not only medical treatment but also patient comfort, convenience, and participation in decision-making. As a result, healthcare organisations are becoming more aware of the need of effective patient management in meeting patient expectations and improving healthcare results.

Patient Satisfaction and Quality of Care: In this study it has been observed that substantial correlation between patient satisfaction and the quality of care provided. A satisfied patient is more likely to stick to treatment regimens, have better health results, and show greater trust and loyalty to healthcare professionals. In the article "Patient Satisfaction Survey as a Tool for Quality Improvement" by Rashid Al-Abri and Amina Al-Balushi, it was found that patient satisfaction plays a significant role in promoting treatment compliance and ultimately improving health outcomes. Recognizing the factors that impact patient satisfaction is essential for delivering patient-centered care and ensuring positive healthcare experiences.

Efficient management of patient flow and minimizing waiting times are crucial aspects of patient care, and these are particularly important concerns at Mission Hospital. Prolonged waiting times can lead to patient dissatisfaction, frustration, and a negative perception of healthcare services. The research paper "Determinants of Patient Waiting Time at a Tertiary Health Institution's General Outpatient Department in North Western Nigeria" by MO Oche and H Adamu sheds light on the factors influencing waiting times in the General Outpatient Department (GOPD) of the study area. The study revealed varying degrees of waiting time, with more than half of the patients waiting for over an hour, which is similar to the situation at Mission Hospital. The primary causes of these long waits were identified as a high patient load and a shortage of doctors and nurses. To achieve the Millennium Development Goals and meet the recommendations of the Institute of Medicine (IOM), it is crucial for healthcare facilities to urgently increase the number of healthcare workers in GOPDs, which serve as the hospital's entry point. This would significantly contribute to reducing patient waiting times and ultimately enhancing patient satisfaction with the provided services. Healthcare providers also need training on various strategies to reduce waiting times, such as utilizing computer simulation to allocate appointment times effectively and implementing a triage system to prioritize patients requiring immediate attention. Studies have shown that longer waiting times in outpatient settings are associated with lower patient satisfaction. Therefore, enhancing patient satisfaction requires optimizing patient flow, streamlining appointment processes, and implementing measures to minimize waiting times.

Effective communication and staff behavior play a crucial role in ensuring patient management and satisfaction. This is evident in the context of Mission Hospital, where the front office executives, who are the initial point of contact for patients in the OPD, hold a critical role in communication and behavior. A study titled "Unprofessional behaviours experienced by hospital staff: qualitative analysis of narrative comments in a longitudinal survey across seven hospitals in Australia" conducted by Antoinette Pavithra, Neroli Sunderland, Joanne Callen, and Johanna Westbrook provides evidence that unprofessional behaviors are encountered by hospital staff across various professional groups and functions. These behaviors are perceived and experienced differently by staff members, but they can be described as actions that have a negative impact on other staff members, patients, and the overall organizational outcomes related to team cohesion, work efficiency, and efficacy. The study also indicates that a perceived lack of organizational action, based on existing reporting and employee feedback, undermines employees' confidence in the hospital's leadership and their ability to effectively address and mitigate unprofessional behaviors.

Clear and empathetic communication is highlighted as a significant factor in patient satisfaction. Patients who feel that their healthcare providers listen to their concerns, explain treatment plans, and involve them in decision-making are more likely to report higher levels of satisfaction. In addition, staff behavior, including politeness, respect, and empathy, significantly influences patient satisfaction. The study underscores the importance of positive staff interactions in enhancing patient experiences.

Appointment Scheduling and Accessibility: Efficient appointment scheduling systems and accessibility to healthcare services are crucial for patient management. During the study conducted at the mission hospital, it was observed that patients prioritize convenience and easy access to healthcare facilities. A research conducted by Sathish Raju Nilakantam, B. Madhu, M.C. Prasad, M. Dayananda, Hathur Basavanagowdappa, Jayati Bahuguna, and Jagiri Narotham Rao supports this finding, indicating that patients who have the ability to schedule appointments easily and access care without difficulty tend to report higher levels of satisfaction. Furthermore, providing flexible appointment options, such as online or telemedicine consultations, can further enhance patient satisfaction and convenience.

CHAPTER 6: CONCLUSION

Smoothen the flow of patients/crowd in OPD.

The Cardiology Clinic experiences the longest waiting times, which can be attributed to several factors, including:

- A high number of patients visiting the department.
- Scheduling conflicts with operating theatres (OT).
- Time taken for doctors' rounds.

Long waiting times contribute to an accumulation of unnecessary crowds in the waiting area, which in turn slows down the patient flow. The departments with the highest patient footfall, such as Cardiology and Orthopedics, may have several reasons for this, including:

- The reputation and expertise of the doctors in the department.
- The quality of services provided.
- Adherence to protocol and quality standards.
- Proximity of the department for people during emergencies.
- On the other hand, the General Medicine and Pediatric Cardiology departments have the shortest waiting times in the hospital.

Satisfaction levels among the patient.

- 1) Patients visiting The Mission Hospital's OPD generally have a positive experience. They express satisfaction with the quality of counseling provided by the doctors, and they find the staff to be courteous. Many patients are even willing to recommend the hospital to others due to their overall satisfaction.
- 2) Patient dissatisfaction with the hospital mainly stems from inadequate waiting space, long waiting times, and delays in receiving reports. These factors contribute to a less-than-desirable patient experience.
- 3) The primary reasons for choosing the hospital are its reputable brand name, positive word-of-mouth publicity, and the advantage of its location. These factors heavily influence patients' decision to seek healthcare services at The Mission Hospital.
- 4) Maximum patient rated Good for the level of satisfaction from the hospital Excellent and Average. Very few patients are dis-satisfied by the hospital.

Strategies to help the hospital increase their patient satisfaction levels.

- 1) The marketing efforts of hospitals significantly contribute to attracting a higher number of patients.
- 2) When comparing satisfaction levels across different specialties, the Cardiology, Orthopedics, and Gynecology departments consistently exhibit the highest levels of patient satisfaction.
- 3) Root cause analysis and Corrective and preventive action of problem identified will increase the level of satisfaction in the hospital.
- 4) Crowd/Queue management is the major issue in the hospital.

RECOMMENDATIONS:

Smoothen the flow of patients/crowd in OPD.

- In order to decrease waiting times at The Mission Hospital's OPD in Durgapur, it is recommended to implement a mandatory appointment system across all departments and fully digitize the process.
- Introducing a token system in both the OPD and pharmacy can help streamline patient flow and reduce waiting times.
- The implementation of a "Kiosk Desk" for self-registration near the help desk in the OPD area can significantly reduce registration time for patients.
- Providing comprehensive and adequate training to doctors and other staff members is essential to minimize patient dissatisfaction.
- The customer care department should identify doctor availability and proactively inform patients about estimated waiting times, promoting transparency and enabling patients to better manage their time and work routines.

Satisfaction levels among the patient

- 1) To increase the satisfaction level in OPD, waiting space should be increase in the hospital.
- 2) Doctor should be available on time for the OPD.
- 3) Any problem occurs in OPD related to services has to be resolved as soon as possible.

Strategies to help the hospital increase their patient satisfaction levels.

- To address the high patient footfall and long waiting times in the Critical Care department, it is recommended to increase the number of beds available in that department.
- To attract more patients and improve footfall in specialties that currently have lower patient numbers, it is important to enhance brand marketing efforts. Regular updates to the hospital's website should also be prioritized.
- Brand marketing should be extended to include participation in events, conferences, and camps, which can help increase awareness and attract more patients.
- If feasible, the implementation of new technologies should be considered to further enhance the quality of care and services provided by the hospital.

REFERENCES:

¹ [Outpatient Department \(OPD\) \(slideshare.net\)](#)

² [Patient Satisfaction, Improving Patient Experience & Satisfaction by Patient Satisfaction Scores - Blog \(practicebuilders.com\)](#)

³ Patient Satisfaction Among the OPD Attendees at a Secondary Care Hospital in Northern India - Ravneet Kaur, Akhil Dhanesh Goel. 2022; [Patient Satisfaction Among the OPD Attendees at a Secondary Care Hospital in Northern India - Ravneet Kaur, Shashi Kant, Akhil Dhanesh Goel, Nitika Sharma, 2022 \(sagepub.com\)](#)

⁴ Nilakantam SR, Madhu B, Prasad MC, Dayananda M, Basavanagowdappa H, Bahuguna J, et al. Quality improvement project to assess patient satisfaction towards outpatient services of a tertiary care teaching hospital, South India - A cross-sectional study. Ann Afr Med [Internet]. 2021 [cited 2023 Jun 4];20(3):198–205. Available from: http://dx.doi.org/10.4103/aam.aam_42_20

⁵ Garware C, Sutar R, Londhe K. Online OPD management with rating and review system to hospitals and doctors. In: International Conference on Computing, Communication, Electrical and Biomedical Systems. Cham: Springer International Publishing; 2022. p. 39–49. https://link.springer.com/chapter/10.1007/978-3-030-86165-0_4

⁶ Goyal ND, Chavan RK, Pahwa A, Gautam VK, Mishra N, Tripathi PK. “OPD TRIAGE” - A novel concept for better patient management in heavily loaded orthopaedic OPDs. J Clin Orthop Trauma [Internet]. 2020 [cited 2023 Jun 4];11(Suppl 4):S472–8. Available from: <https://pubmed.ncbi.nlm.nih.gov/32774014/>

⁷ Al-Abri R, Al-Balushi A. Patient satisfaction survey as a tool towards quality improvement. Oman Med J [Internet]. 2014;29(1):3–7. Available from: <http://dx.doi.org/10.5001/omj.2014.02>

⁸ Akmal Jahan MA, Rathnayake S, Kalansuriya M, Subair F. OPD-PMMAS: Patient Management and Mobile Alert System for OPDs in Sri Lankan Hospitals-A Prototype [Internet]. Seu.ac.lk. [cited 2023 Jun 4]. Available from: http://ir.lib.seu.ac.lk/xmlui/bitstream/handle/123456789/5808/35%20P_ICST2021%20Final%20v11_win_Done_sec_.pdf?sequence=1&isAllowed=y

⁹ Cloudfront.net. [cited 2023 Jun 4]. Available from: https://d1wqtxts1xzle7.cloudfront.net/82493996/1564-libre.pdf?1647955061=&response-content-disposition=inline%3B+filename%3DPatient_perception_and_satisfaction_are.pdf&Expires=1678103033&Signature=BS5O6lPrY1hHkqLsUXYItAcjvoFCSl82RoWGwAr-B01YhJ-Vw6ISzXNPRMXPxjctn~rwsb9cv~ItUq0f4~YbNDS9MBH2VB6eyGQGSHWX4eLECfL5RIpgOaWFJH~lEbGfJ2xGT9Nr9Dh6DjGV82V9WHE6P4pg6GMfWeaNxlzhiq6ynR8d-t1IBhE2lhyKEZGjyrr7V7JHzt7TmC4fb8zFj9LsRALQy2Ja4hasXWUS4LdBlksNsku95Uq1LMOdKKmGoejsJ5VA~nZrswqqF96f9qrRAKdn3hcJO6cXA~dYDuUPHLkYArEd6VMholbsf74fBqLr7QfQukr~aDgUZKH0Og&Key-Pair-Id=APKAJLOHF5GGSLRBV4ZA

¹⁰ Project submitted to osmania university towards the partial fulfilment of the award of masters degree in hospital management [Internet]. Scribd. [cited 2023 Jun 4]. Available from: <https://www.scribd.com/document/434600125/OPD>

¹¹ [Engaging patients to improve quality of care: a systematic review - PMC \(nih.gov\)](#)

¹² **ONLINE OPD MANAGEMENT & HOSPITAL ...**

¹³ Nguyen Q, Wybrow M, Burstein F, Taylor D, Enticott J. Understanding the impacts of health information systems on patient flow management: A systematic review across several decades of research. PLoS One [Internet]. 2022;17(9):e0274493. Available from: <http://dx.doi.org/10.1371/journal.pone.0274493>

¹⁴ Researchgate.net. [cited 2023 Jun 4]. Available from: https://www.researchgate.net/figure/Patient-flow-and-delay-through-healthcare-system_fig1_318831512

ANNEXURE

HELP US TO REACH YOU

You are Patient ☐ Relative ☐

Name IP No.....

Contact no..... Email.....

Address

Date & Time Consultant

Signature

Help us to find a personnel (doctor/nurse/other staff) with whom you had wonderful experience

Name :

Contact point of the Hospital :

Your Experience :

আপনার কাছে পৌঁছানোর সাহায্য করুন

আপনি ☐ রোগী ☐ রোগীর আত্মীয়

নাম : আই.পি. নং :

যোগাযোগ নং : ইমেইল :

ঠিকানা :

তারিখ ও সময় : পরামর্শদাতার নাম :

স্বাক্ষর :

কর্মীদের মধ্যে এমন কেউ কি রয়েছেন যিনি আপনাকে বিশেষভাবে সাহায্য করেছেন? তাঁর কথা জানান আমাদের।

নাম :

হাসপাতালের কোথায় তাঁর সঙ্গে দেখা?

আপনার অভিজ্ঞতা :

PATIENT FEEDBACK OPD SERVICES

বহির্বিভাগের মূল্যায়নপত্র

Please hand it over to Floor Co-ordinator or any Hospital Staff or drop in Suggestion Boxes
দয়া করে এটি ফ্লোর কো-অর্ডিনেটর বা অন্য যে কোন হাসপাতালের কর্মীর হাতে তুলে দিন বা সাজেশন বক্সে ফেলুন

WISHING YOU A VERY
HAPPY AND HEALTHY LIFE

আপনার সুখী ও সুস্থ
জীবন কামনা করি

Please provide your valuable feedback for the following services:

- Experience with the first point of contact (front office assistant, concierge, receptionist etc) in the hospital:
- Experience with the consultation provided by the doctor:
- Experience with nursing services:
- Experience with Laboratory service:
- Experience with Radiology service:
- Timely delivery of reports:
- Waiting area amenities (washroom, seating, drinking water, facilities for specially abled etc):
- Cleanliness and hygiene (overall):
- Support services (Security, GDA and Housekeeping):
- How will you rate your experience at the hospital?

Comments & Suggestions :

অনুগ্রহ করে অন্তর্বিভাগের নিম্নলিখিত পরিষেবাগুলি সম্বন্ধে আপনার মূল্যায়ন মতামত জানান:

- ১। হাসপাতালে প্রথম সংযোগের অভিজ্ঞতা (ফ্রন্ট অফিসের সহায়িকা/সহায়ক, গ্রহণী, অভ্যর্থনা কর্মী রিসপন্সনসিটি)
- ২। চিকিৎসকের প্রদত্ত পরামর্শ
- ৩। নার্সিং পরিষেবার অভিজ্ঞতা
- ৪। ল্যাবরেটরি পরিষেবার অভিজ্ঞতা
- ৫। রেডিওলজি পরিষেবার অভিজ্ঞতা
- ৬। নির্দিষ্ট সময়ে রিপোর্ট প্রাপ্তি
- ৭। অপেক্ষার স্থানের সুবিধা (বসার ব্যবস্থা, পানীয় জল, শৌচালয়, বিশেষভাবে সক্ষমদের জন্য সুবিধা ইত্যাদি)
- ৮। পরিচ্ছন্নতা ও স্বাস্থ্যসম্মত পরিবেশ
- ৯। সহায়ক পরিষেবার মান (সিকিউরিটি, ডিভিএ, পরিচ্ছন্নতা কর্মী)
- ১০। হাসপাতালের বহির্বিভাগ সম্বন্ধে আপনার সামগ্রিক অভিজ্ঞতা:

মন্তব্য এবং পরামর্শ :

5 Schedule of Accommodation – Outpatients Unit

Outpatients Unit located within a health facility

The following Schedule of Accommodation includes both combined and separate Consult/ Examination Rooms.

ROOM/ SPACE	Standard Component Room Codes	RDL 2 & 3 Qty x m ²	RDL 4 Qty x m ²	RDL 5 Qty x m ²	RDL 6 Qty x m ²	Remarks
Entry / Reception		3 Rooms	6 Rooms	12 Rooms	18 Rooms	
Reception/ Clerical	RECL-9-I RECL-15-I RECL-20-I	1 x 9	1 x 9	1 x 15	1 x 20	May include space for self-registration of patients
Waiting	WAIT-10-I WAIT-15-I WAIT-25-I	1 x 10	1 x 10	1 x 15	1 x 25	May be divided into Female/ Family areas as applicable Part may be provided as Sub Waiting near Consult rooms
Waiting - Family	WAIT-10-I WAIT-15-I WAIT-25-I		1 x 10	1 x 15	1 x 25	
Play Area	PLAP-8-I PLAP-10-I		1 x 8	1 x 10	1 x 10	
Bay - Wheelchair Park	BWC-I		1 x 4	1 x 4	1 x 4	May share with Main facility if located close
Bay - Drinking Fountain	BFD-1-I	1 x 1	1 x 1	1 x 1	1 x 1	
Interview Room - Family	INTF-I		1 x 12	1 x 12	2 x 12	
Store - Files	STFS-8-I STFS-10-I	1 x 8	1 x 8	1 x 10	1 x 10	For clinical records; optional if electronic records used
Toilet - Accessible	WCAC-I	1 x 6	1 x 6	1 x 6	1 x 6	May share with Main facility if located close
Toilet - Public	WCPU-3-I		2 x 3	2 x 3	2 x 3	May share with Main facility if located close
Consult Areas		3 Rooms	6 Rooms	12 Rooms	18 Rooms	
Consult Room	CONS-I	3 x 14	6 x 14	12 x 14	9 x 14	Combined Consult/ Examination Room
Consult - Office	CONS-I				9 x 14	Separate Consult/ Office and Examination rooms
Examination Room	CONS-I				9 x 14	Separate Consult/ Office and Examination rooms
Interview Room - Family	INTF-I		1 x 12	1 x 12	1 x 12	Also for Allied Health use
Meeting Room - Small	MEET-9-I		1 x 9	1 x 9	1 x 9	Optional; Interviews, private discussions, team meetings
Vital Signs Room	NS		1 x 8	2 x 8	2 x 8	
Bay - Handwashing, Type B	BHWS-B-I	1 x 1	2 x 1	3 x 1	4 x 1	In corridors and staff work areas
Bay - Linen	BLIN-I	1 x 2	1 x 2	1 x 2	1 x 2	
Bay - Mobile Equipment	BMEQ-4-I		1 x 4	2 x 4	2 x 4	For scales, lifting equipment
Bay - Resuscitation Trolley	BRES-I	1 x 1.5	1 x 1.5	1 x 1.5	1 x 1.5	
Blood Collection Bay	BLDC-5-I	1 x 1.5	1 x 5	1 x 5	2 x 5	Optional; may use a shared facility if located close
Clean-up Room	CLUP-7-I		1 x 7	1 x 7	1 x 7	Optional; may use Dirty Utility
Clean Utility	CLUR-8-I CLUR-12-I CLUR-14-I		1 x 8	1 x 12	1 x 14	
Dirty Utility	DTUR-8-I DTUR-10-I DTUR-12-I	1 x 8	1 x 8	1 x 10	1 x 12	
Staff Station	SSTN-5-I SSTN-10-I SSTN-14-I		1 x 5	1 x 10	1 x 14	May be provided as small sub stations to a group of rooms

