

GAP ANALYSIS OF DISCHARGE PROCESS IN TERTIARY CARE HOSPITAL

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Title Slides

Introduction

Discharge Process

Literature Review

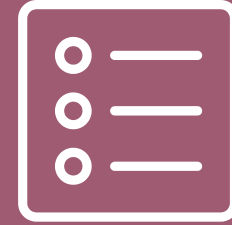
Methodology

Findings

Discussion

Conclusion

Suggestions



Thesis Presentation Outline

INTRODUCTION

01

Official ending of patient's treatment at healthcare facility.

Study aims to understand the Discharge Process at Krishna Hospital and identify areas of improvement.

02

Efficiency of discharge planning

Types:

Discharge on advice
Discharge on request
LAMA Patient
Death

03

Need for the study

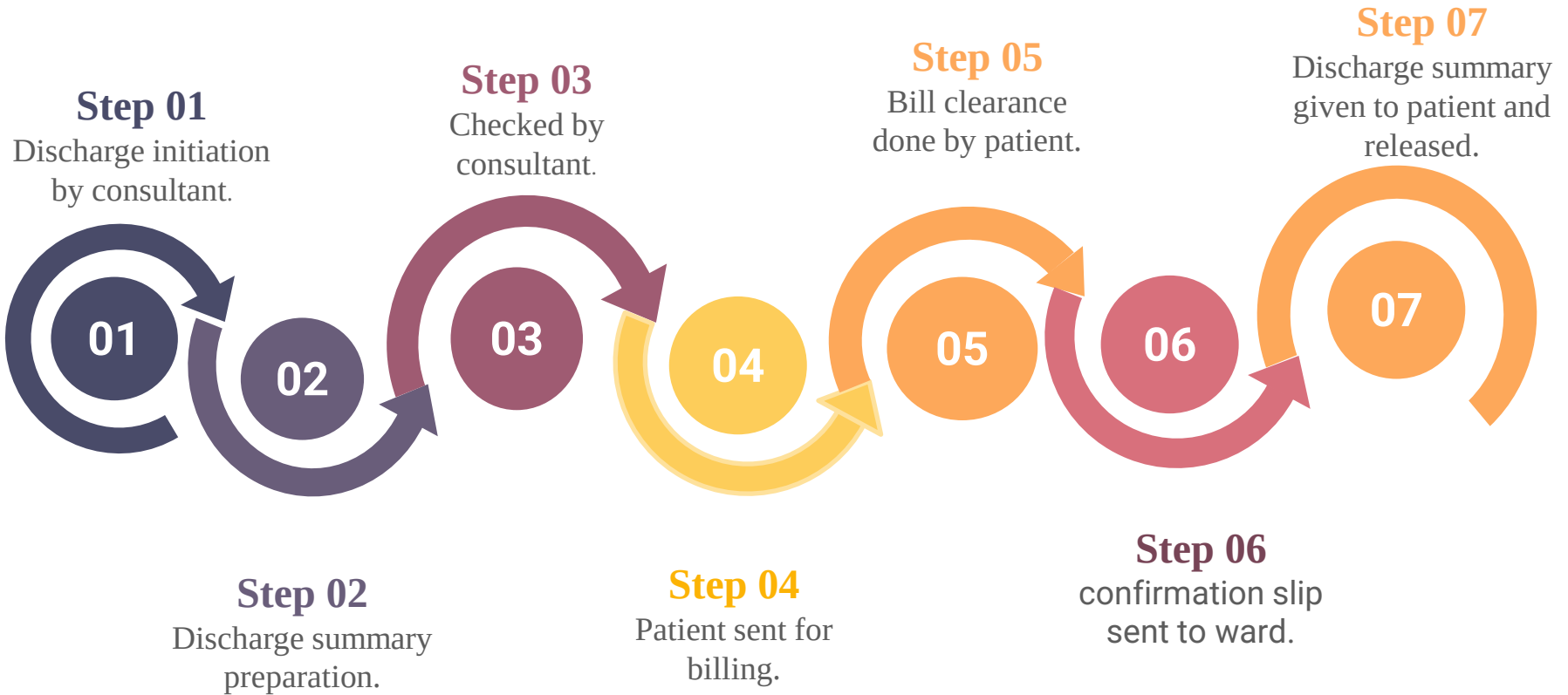
This study aims to improve discharge planning at Hospital to ensure smoother patient transitions, higher satisfaction, and better hospital efficiency.

04

Objectives of the Study

To understand the current process
To identify the causes of delay
To provide recommendation

DISCHARGE PROCESS



LITERATURE REVIEW

Theory 01

Chaudhari, P.S., Shinde, V., & Gudhe, V.
(2021)

Retrospective data collection
Identifies gaps in communication, handover
processes, and administrative tasks
contributing to discharge delays

Theory 02

Dr. Anil Patel (2019)

Systematic Sampling
Focused on discharge summary preparation
and billing process as major delay points,
recommended automation.

Theory 03

Dr. Sandeep Sharma (2018)

Random Sampling
Analyzed Discharge Process delays,
identified key factors affecting turnaround
time, and suggested workflow improvements

Theory 04

Dr. Rahul Mehta (2020)

Convenience Sampling
Studied the role of interdepartmental
communication, found significant delays due
to poor coordination, proposed regular
training sessions

RESEARCH OBJECTIVES

Objective #1



To understand the current process of discharge and difference between current and desired turnaround time for discharge.

Objective #2



To identify the causes of the delay in discharge. For example, lack of communication, coordination with patients/ relatives' etcetera...

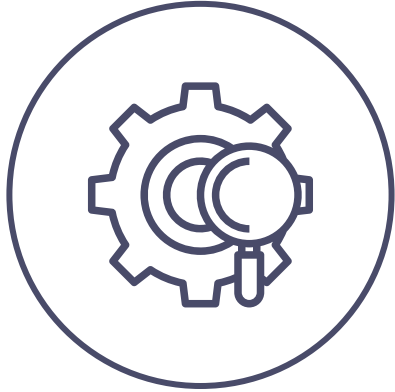
Objective #3



To provide suggestions to streamline discharge process along with optimized use of resources.



METHODOLOGY

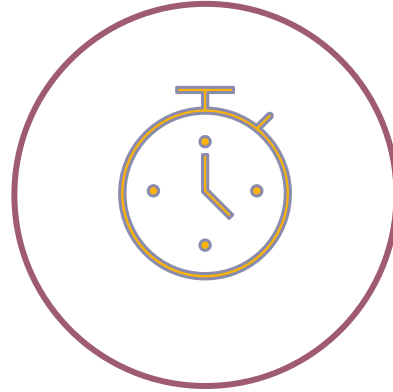


Research Question: What are the factors leading to gap between actual turnaround time and studied turnaround time for patient discharge



Study Design: Cross-sectional observational study

Study setting: Krishna Hospital, Gondal



Duration of Study

3 months



Sample size

50 Patients

(Total: 223 patient

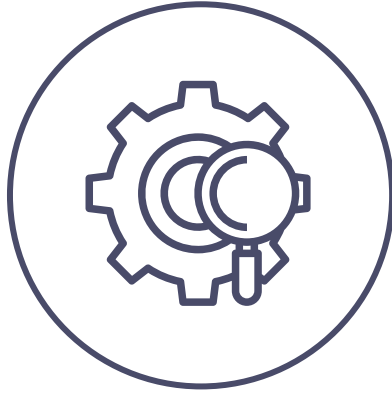
Cash Patient- 80-90

Ayushman Bharat- 60-70

Insurance Patient- 40- 50)

Sample technique

Convenience sampling



Sample selection

**50 Patients data collected of
self paid category**



Data Collection

- 1. Primary sources**
- 2. Secondary sources**

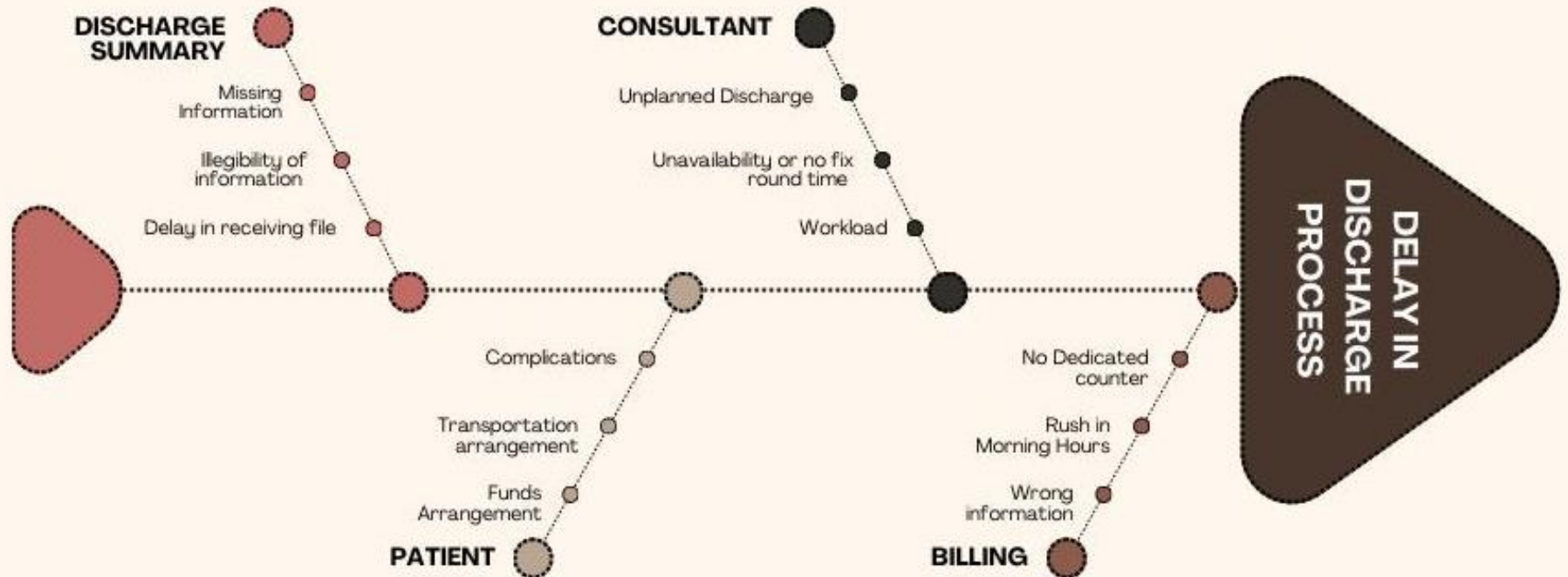


Data Analysis

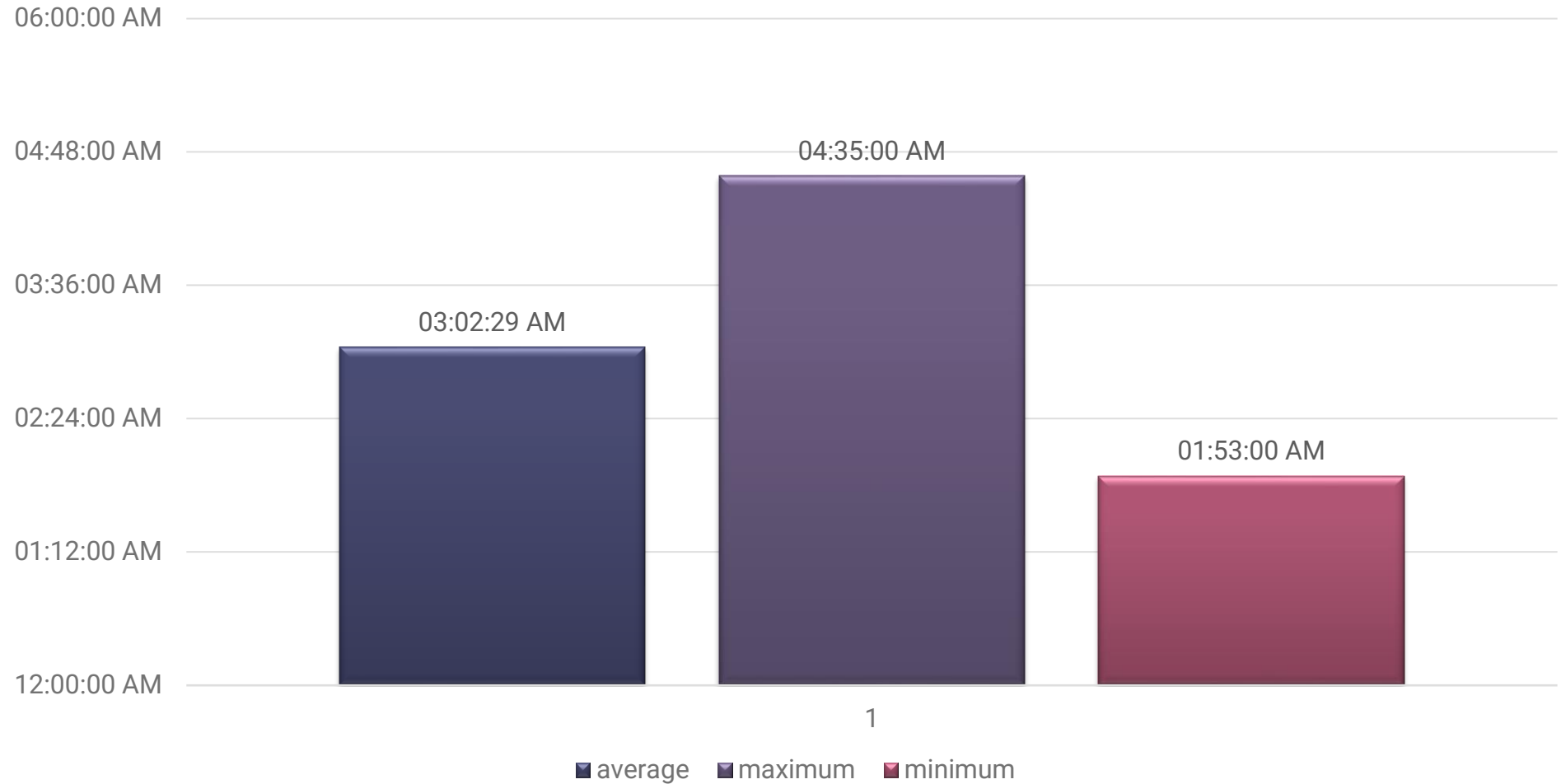
Statistical tools: mean, median

Data Visualization

CAUSE AND EFFECT DIAGRAM



DISCHARGE TIME FOR CASH PATIENTS



FINDINGS



Out of total 50 Patients, the average time taken for discharge was 3 hours 2 minutes

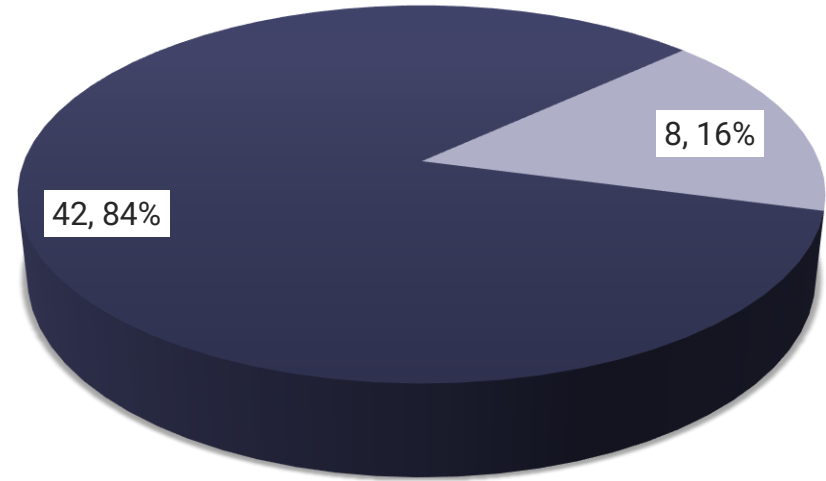
Out of 50 patients, 13 patients were discharged under the standard discharge time for patients.

Rest of the patients took more than 2 hours for completion of discharge process.¹

The maximum time recorded was 4 hours 35 minutes.
The minimum time recorded was 1 hour 53 minutes.

TIME TAKEN FROM DISCHARGE INITIATION TO BILLING

Duration	Patient Count
More than 1 hour	42
Within 1 hour	8
Grand Total	50



■ More than 1 hour
■ Within 1 hour

FINDINGS

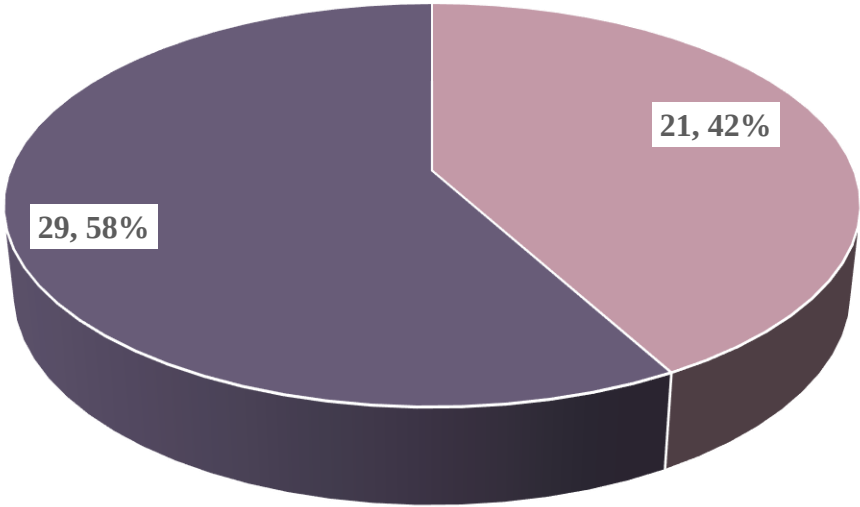


The above Graph depicts time taken from orally discharge declared by consultant to initiation of billing. In which the average time taken for this process was 1 hour 23 minutes.

However, the maximum time taken for this process was 2 hour 21 minutes. While minimum time taken for this process was 40 minutes.

TIME TAKEN FROM BILLING TO BILL CLEARANCE

Duration	Patient Count
More than 15 minutes	21
Within 15 minutes	29
Grand Total	50



- More than 15 minutes
- Within 15 minutes

FINDINGS

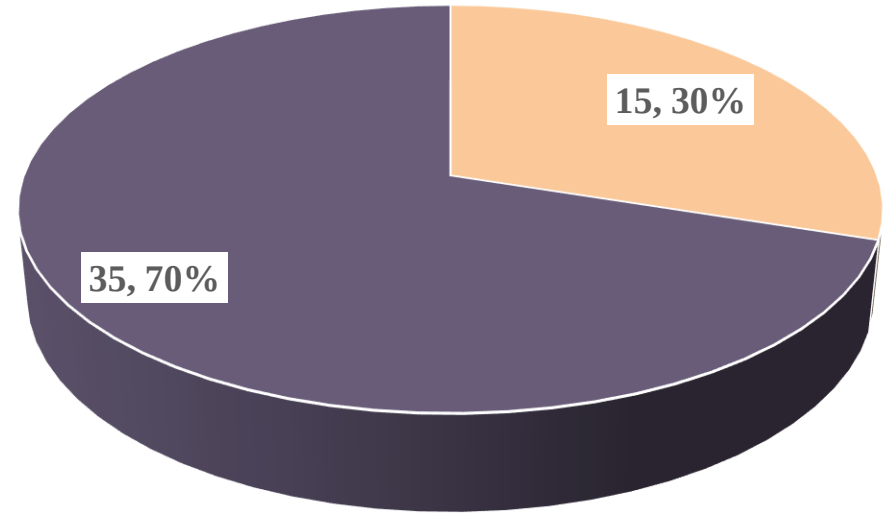


The above Graph depicts time taken from orally discharge declared by consultant to initiation of billing. In which the average time taken for this process was 17 minutes.

However, the maximum time taken for this process was 1 hour 12 minutes. While minimum time taken for this process was 3 minutes.

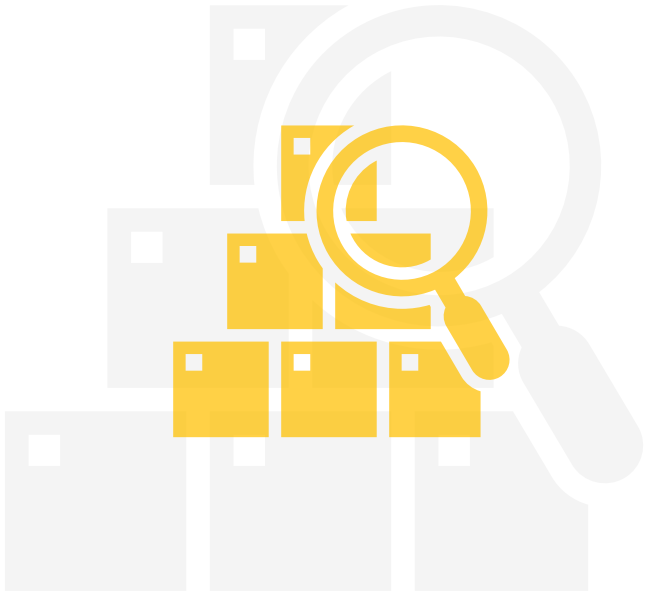
TIME TAKEN FROM BILL CLEARENCE TO PATIENT LEFT HOSPITAL

Duration	Patient Count
More than 1 hr 30 mins	15
Within 1 hr 30 mins	35
Grand Total	50



- More than 1 hr 30 mins
- Within 1 hr 30 mins

FINDINGS



The above Graph depicts time taken from orally discharge declared by consultant to initiation of billing. In which the average time taken for this process was 1 hour 21 minutes.

However, the maximum time taken for this process was 1 hour 58 minutes. While minimum time taken for this process was 40 minutes.

AVERAGE TIME TAKEN TO COMPLETE MAJOR ACTIVITIES

SR. NO.	ACTIVITIES	AVERAGE TIME
1	Preparation of Discharge Summary	00:28:19
2	Billing Process	00:55:14
3	Billing Cleared	00:17:29

AVERAGE TIME COMPLETE MAJOR ACTIVITIES



FINDINGS



The average time taken for the preparation of discharge summary was 28 minutes 19 seconds.

While the average time taken for billing process was 55 minutes 24 seconds.

However, the average time taken for bill clearance was 17 minutes 29 seconds.

Discussion

Discussion Tip #1

Results reveal critical inefficiencies in the discharge process, emphasizing the need for streamlined communication and standardized protocols to enhance patient care and hospital operations."

Discussion Tip #3

It was found that certain administrative steps took longer than expected indicating need for further investigation and targeted training programs.

Discussion Tip #2

Major findings include communication breakdowns and administrative delays. Implementing targeted interventions can significantly reduce discharge times, leading to better resource utilization

Discussion Tip #4

Based on findings it is recommended for implementing an electronic discharge system and real-time data sharing to improve discharge efficiency



CONCLUSIONS / FINDINGS

This study aimed to investigate the turnaround time (TAT) in the discharge process at Tertiary care hospital

Communication Breakdowns,
Inefficient Workflows,
Administrative Delays

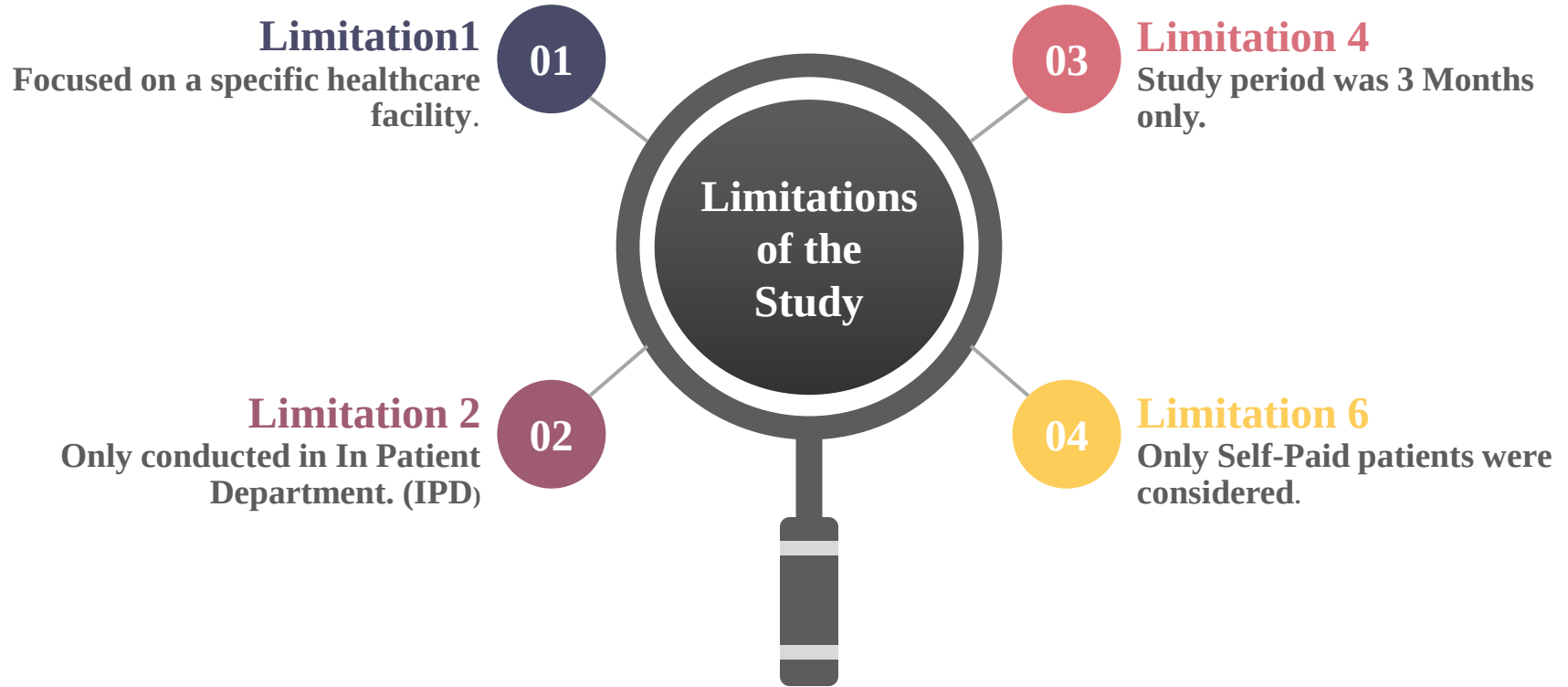
Providing a comprehensive analysis, Highlighting specific areas for improvement

single healthcare facility, limited period, Only included cash (self-paid) patients

impact of specific communication strategies, cost-effectiveness of implementing the suggestions, The role of patient education and engagement

Implement Planned Discharges, Introduce Feedback Mechanisms, Improve Interdepartmental Coordination

LIMITATIONS OF YOUR STUDY



SUGGESTIONS

1

Planned Discharge

Planned discharge should be initiated which leads to completion of some steps beforehand.

2

Doctor's round timings

The round timings should be fixed and preferably in the morning.

3

Expected Discharge date known priorly

The medical officer and nurse should be aware of expected discharge date.

4

Parallel Workflow

Nurse should arrange for parallel workflow. Notify dietitian or transport team or housekeeping staff.

5

Feedback Mechanism

Feedback regarding discharge process should be taken for continuous improvement.

6

Explain discharge process to patient

Patient should be informed at prior about the whole discharge process.

7

Training and education

Training and knowledge about discharge process and summary preparation should be provided.

8

Quarterly decrease of 15 minutes

Will be an ongoing process and target should be set to reduce timing to 30 to 35 minutes within 2 years.

9

Proper interdepartmental communication and coordination

To reduce communication gap during discharge process.

10

Timely report collection

Timely report collection and departmental clearance should be conducted to avoid delay in discharge.

REFERENCE



Reference 1

Chaudhari PS, Shinde V, Gudhe V. Predictive Modelling for Turn Around Time (TAT) of Discharge Process for Insured Patients in a Corporate Hospital of Pune City. Indian J Health Sci. 2021;11(2):89-95.

Reference 2

Predictive modelling for discharge process. Health Informatics Res. Available from: <https://www.e-hir.org/m/journal/view.php?number=1029>

Reference 3

An Analysis of the Average Waiting Time during the Patient Discharge Process at Kashani Hospital in Esfahan Iran: A Case Study. J Res Health Sci. [https://jrh.gmu.ac.ir/browse.php?a_id=1884&slc_lang=en&sid=1&ftxt=1&html=](https://jrh.gmu.ac.ir/browse.php?a_id=1884&slc_lang=en&sid=1&ftxt=1&html=1)

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Reference 4

Smith, J. (2016). "Improving Patient Discharge Process: A Case Study from XYZ Hospital," Journal of Healthcare Management, vol. 45, no. 2, pp. 112-118.



QUESTIONS