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# SYNOPSIS

## TITLE

Process of Activities Between Hospitals and Insurance Companies: Identifying the Company with Longer Resolution Time and Strategies to Mitigate It

## INTRODUCTION

The relationship between hospitals and insurance companies is essential to ensuring timely treatment and financial reimbursement for patients. However, delays in the resolution of insurance claims can cause significant disruptions in patient care, leading to potential negative outcomes. This study focuses on identifying the time taken by insurance companies to process claims and resolve issues in medical, surgical, and emergency cases. The study aims to identify insurance companies with longer resolution times, understand the underlying factors, and suggest strategies to improve turnaround time.

## RESEARCH QUESTION

What is the variation in the resolution time for insurance claims between Godrej Memorial hospital, Mumbai and insurance companies, and what strategies can be employed to mitigate longer resolution times?

## OBJECTIVES OF THE STUDY

- To estimate the resolution time taken by different insurance companies in processing claims for admitted patients, including medical, surgical, and emergency cases.
- To compare the resolution times between various insurance companies and identify which takes the longest.
- To suggest strategies that hospital can implement to mitigate delays and improve efficiency.

## HYPOTHESIS

- **H1**: There is a significant difference in the resolution times for claims processed by different insurance companies.
- **H0**: There is no significant difference in the resolution times for claims processed by different insurance companies.

## MATERIAL AND METHODS

### STUDY DESIGN:

Observational study (Cross-sectional survey and Time-motion study)**SETTING:**

- The study will be conducted in Godrej Memorial Hospital , Mumbai , involving insurance claims processing data from both medical and surgical admissions, as well as emergency cases.

### STUDY POPULATION:

- **Inclusion Criteria:**
    - Admitted patients in the hospital.
    - Patients with medical, surgical, and emergency cases.
    - Patients who have claims processed by different insurance companies (excluding pre-authorized patients).
- **Exclusion Criteria:**
    - Pre-authorized patients.
    - Patients whose claims have been settled or processed before the study period.

**DURATION OF STUDY**

- The study will be conducted over a period of 3 months starting from March to May 2025.

**SAMPLE SIZE**

- A total of 100 patients will be included in the sample. The sample will consist of 100 patients who have been admitted to the hospital under medical, surgical, or emergency categories, with insurance claims processed by various companies.

**SAMPLING TECHNIQUE**

- Simple random sampling will be used to select patients from the hospital admissions who meet the inclusion criteria.

**DATA COLLECTION PROCEDURE**

- Data will be collected by tracking the whole process flow from time of admission to the final discharge of the patient with final insurance approval and insurance claims database to collect claim settlement data . The time taken for claims to be processed from submission to resolution will be recorded and analyzed.

**STUDY TOOLS**

data abstraction form will be used to extract data from hospital records and time motion study .

- Data collection will include reviewing hospital records of insurance claims, including dates of claim submission and resolution.
- Study the process flow of the TPA department from admission to discharge of patient until claim settlement is done.

Analysis plan : Individual patient level information will be analysed. Continuous variables (like time) will be expressed as mean/ median with respective measurement of dispersion ( Standard deviation/interquartile range). Categorical data will be expressed with frequency and percentages. Under the Time-motion analysis individual steps will be identified and time taken for each step will be noted and further analysed.

**ETHICAL CONSIDERATIONS**

- Data security measures will be implemented to ensure the confidentiality of patient information.
- All patient information will be anonymized and kept secure according to hospital privacy policies.
- The study will adhere to ethical guidelines to ensure that no harm comes to patients and that data is handled responsibly.

**Expected outcome:** The expected outcome of the study is to analyze and conclude which insurance company and TPA on the hospital panel takes longer resolution times for claim settlement of the patients.

**Study timeline:**

1) 4 weeks data collection of admitted patients and tracking them until discharge total of 100 patients to be completed.

2) 4 weeks tracking the claim settlement of same 100 patients which takes 30-45 days for from the date of discharge of the patient.

3)4 weeks tracking claim settlement and excel sheet and analysis of the collected data and presentation of the same .