**DATA MINERS**

Q1: **Optimal Month for Admissions and Revenue Calculation**

**Objective**: Determine which month had the highest number of patient admissions. Compute the total billing amount generated in that month. Consider all nuances such as the number of patients admitted and the billing amounts.

**Ans**: August month had the highest number of patient admissions and the billing amount generated is 122661948 USD.

Q2: **Top Performing Hospital in Patient Volume**

**Objective**: Identify the hospital that recorded the highest number of admissions. Aggregate admission data based on the hospital information derived from the dataset. Ensure you handle potential issues such as hospitals with similar names or formatting inconsistencies.

**Ans:** Ltd hospitals have the highest number of admission records.

Q3: **Optimal Time for Medical Staff Availability**

**Objective**: Analyze the data to suggest the best time for medical staff to be most available to handle new patient admissions. Consider patterns in admission times and calculate the optimal time window for staff availability. Justify your recommendation with relevant data insights.

**Ans:** best time for medical staff to be most available to handle new patient admissions during the start of april, as there is 20% hike in the number of admission of patients every year.

Q4: **Common Medical Condition and Medication Pairings**

**Objective**: Investigate which medical conditions and medications are most frequently paired together. This involves analyzing admissions to find common pairings of medical conditions and medications. Focus on identifying patterns and the significance of these pairings in patient treatment.

Ans: medical conditions and medications are most frequently paired together

|  |  |
| --- | --- |
| Medical conditions | Medications |
| Arthritis | **Aspirin** |
| Asthma | **Paracetamol** |
| Cancer | **Lipitor** |
| Diabetes | **Lipitor** |
| Hypertension | **Ibuprofen** |
| Obesity | **Penicillin** |

**Q5: Most Expensive Medical Condition and Hypothesis on Costs**

**Objective**: Determine which medical condition had the highest average billing amount.

Ans: Obesity has the highest average billing amount.