**APPROACH USING BI REPORTING TOOLS**

**TOOLS USED -   
1.DATA PROFILING – ALTERYX  
2.STAGING PIPELINE (DATA INTEGRATION) - TALEND  
3.MYSQL WORKBENCH – TO AUDIT AND STORE DATA FOR VISUALIZATION**

**4.TABLEAU - TO VISUALIZE THE DATA**

1.Firstly I started by performing basic profiling for each csv using Alteryx and observed the nulls and length of each field. Provided an example of the same below.

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2. Secondly after analyzing the data I started importing the csv files into talend and made basic setups. The following represents my orchestration of the jobs. I have used joins to join them.

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Below I have orchestrated all the jobs so that its easier to run all at once for analysis.

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Example of one of my jobs is as follows.

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After populating the fields according to each analysis asked and also for extra analysis, It got populated to MySQL using which I had setup the connection to my Tableau.  
The following represents my Tableau visualization along with the values that I have obtained.

**ANALYSIS 1**

|  |  |
| --- | --- |
| MOST COMMON PRIMARY DIAGNOSIS IS  **Z38.00 WITH 74 NUMBER OF ACCOUNTS DURING THE YEAR 2019** | **A screenshot of a computer  Description automatically generated**  A screenshot of a graph  Description automatically generated |
| MOST COMMON SECONDARY DIAGNOSIS IS **I10 WITH 775 NUMBER OF ACCOUNTS DURING 2019** | A screenshot of a computer  Description automatically generated  A graph with blue and white bars  Description automatically generated |

**ANALYSIS 2**

|  |  |
| --- | --- |
| THE MS-DRG WITH THE HIGHEST TOTAL AVERAGE PER PATIENT IS  **004 - TRACHEOSTOMY WITH MV >96 HOURS OR PRINCIPAL DIAGNOSIS EXCEPT FACE, MOUTH AND NECK WITHOUT MAJOR O.R. PROCEDURES** with an average charge of **630043.40 USD** | **A screenshot of a computer  Description automatically generated**  A screenshot of a computer screen  Description automatically generated |

**ANALYSIS 3**

|  |  |
| --- | --- |
| **Provider Service** which had the highest volume of accounts in the month of December in 2018**: Internal Medicine with a Volume of Accounts as 77**  And  **The provider ID** which had the highest volume of accounts was **PHY\_003777 with 10 accounts** | **A screenshot of a graph  Description automatically generated**  **A graph with numbers and text  Description automatically generated with medium confidence** |

**ANALYSIS 4**

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**Corresponding Visualization -**

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**ANALYSIS 5**

**Service Line Description with the highest difference in length of stay**

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|  |  |
| --- | --- |
| The **Service Line Description** with the highest difference in length of stay is: **SURGICAL TRACHEOSTOM**  The maximum difference in length of stay value is: **19.33** | A screenshot of a computer  Description automatically generated |

**EXTRA ANALYSIS – 1  
ZipCode which has the highest number of patients recorded**

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|  |  |
| --- | --- |
| ZipCode with highest number of patients: **45202 with 217 patients** | A graph of blue bars  Description automatically generated |

**EXTRA ANALYSIS – 2  
Facility service that had the highest revenue  
  
TRINITY HOSPITAL (F\_0120) had the highest revenue of $39228315.52**

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|  |  |
| --- | --- |
| **TRINITY HOSPITAL (F\_0120)** had the highest revenue of **$39228315.52** | A pie chart with numbers and a few colored circles  Description automatically generated |

**EXTRA ANALYSIS 3 -   
Provider who provided the most treatments  
  
The provider Coffey, S at facility LONGWOOD provided the most treatments with a total of 685 unique charge descriptions.**

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**EXTRA ANALYSIS 4**

**Most Common Charge Descriptions for Patients**

**HC RX – SELF ADMINISTERABLE DRUGS was the most common charge description**

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