

 **Human Resources Analysis Project**

Tools used: Tableau, Microsoft Word

From raw data to business insights a full cycle analysis project

Comprehensive Analysis of Workforce, Performance, Salary & Hiring Trends

Dataset Overview:

- **Total Records:** 311 employees
- **Fields Analyzed:** Salary, Demographics, Department, Performance, Engagement, Absences, Satisfaction and Hiring by source
- **New Features Created:** Age, Total Employees, Active Employees and Turnover rate

Key Highlights & Insights

◊ **1. Workforce Composition:**

- **Total Employees:** 311
- **Female Employees:** 176 (57%)
- **Male Employees:** 135 (43%)
- **Highest Citizenship Group:** U.S. Citizens
- **Marital Status:** Majority Single

◊ **2. Hiring Trends:**

- **Active Employees:** 207 (66.6%)
- **Hiring peaks:** Q1 and Q3 (seasonal pattern)
- **Highest Hiring Dept:** Production

◊ **3. Salary Overview:**

- **Total Salary Paid:** ₹21,465,433
- **Average Salary:** ₹69,021
- **Avg Salary (Terminated & Active):** Compared via Pie Chart

◊ **4. Performance & Satisfaction:**

- Most absences among those rated “**Fully Meets**”
- **Lower engagement/satisfaction** among terminated employees
- **Active employees** had **slightly higher absences**

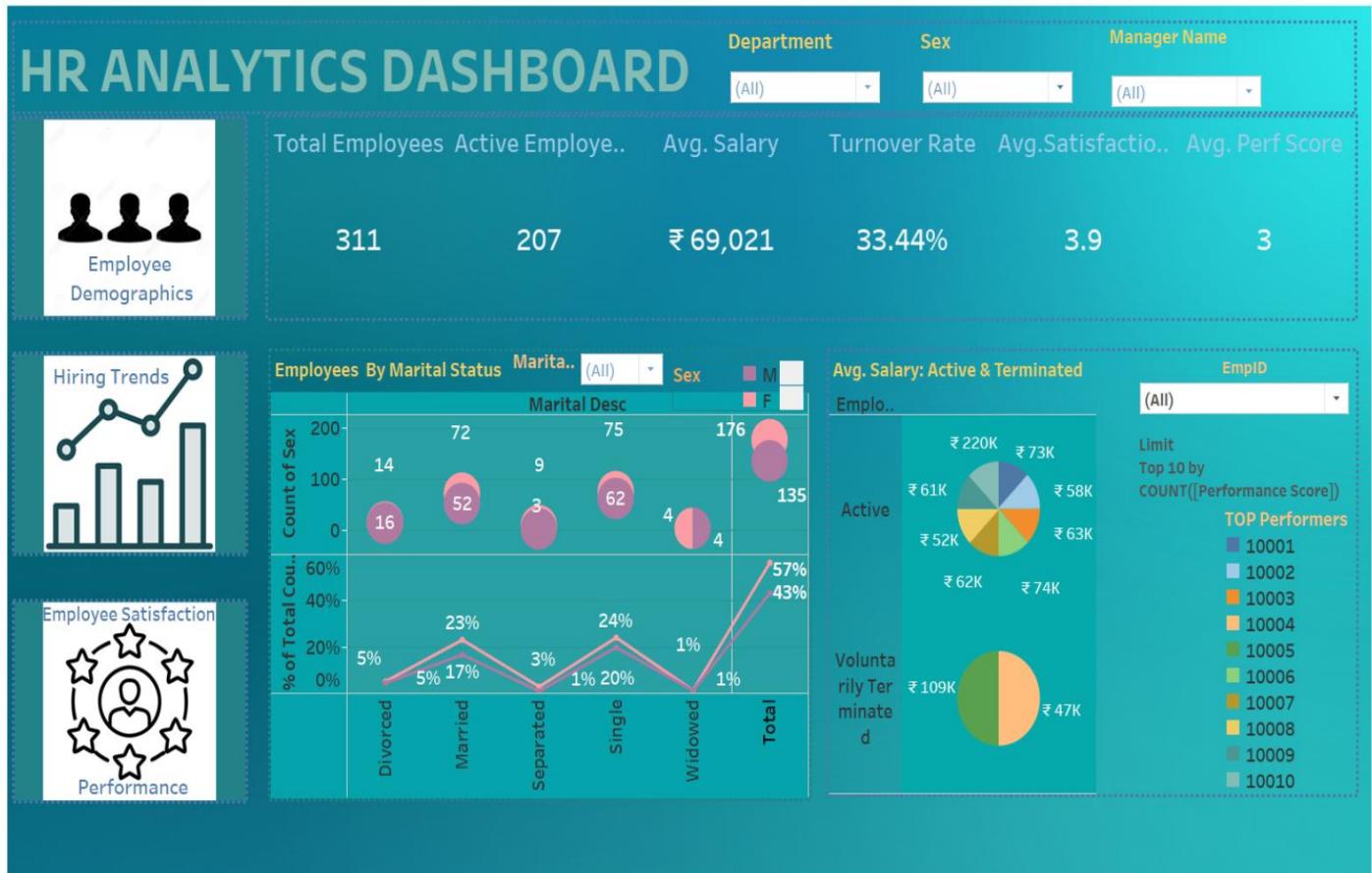
◊ **5. Visuals Used Across 4 Tableau Pages:**

Visuals	Usage Areas
Line & Pie Chart	Employees by Marital
Pie Chart	Salary: Active & Terminated
Bar Chart	Age by Department
Stacked Bar Chart	Race by Gender
Line & Square	Term Reason, Date of Hire, Turnover Rate
Tables(square)	Performance vs Review Date
Dual Combination	Satisfaction score / Engagement
Lines(Discrete)	Date of Hire vs EmpID
Pie Chart	Count by Source
KPI Cards	Total Emp, Active Emp, Ag Salary, Turnover Rate, Avg.Satisfaction, Avg.Perf. score

Deliverables:

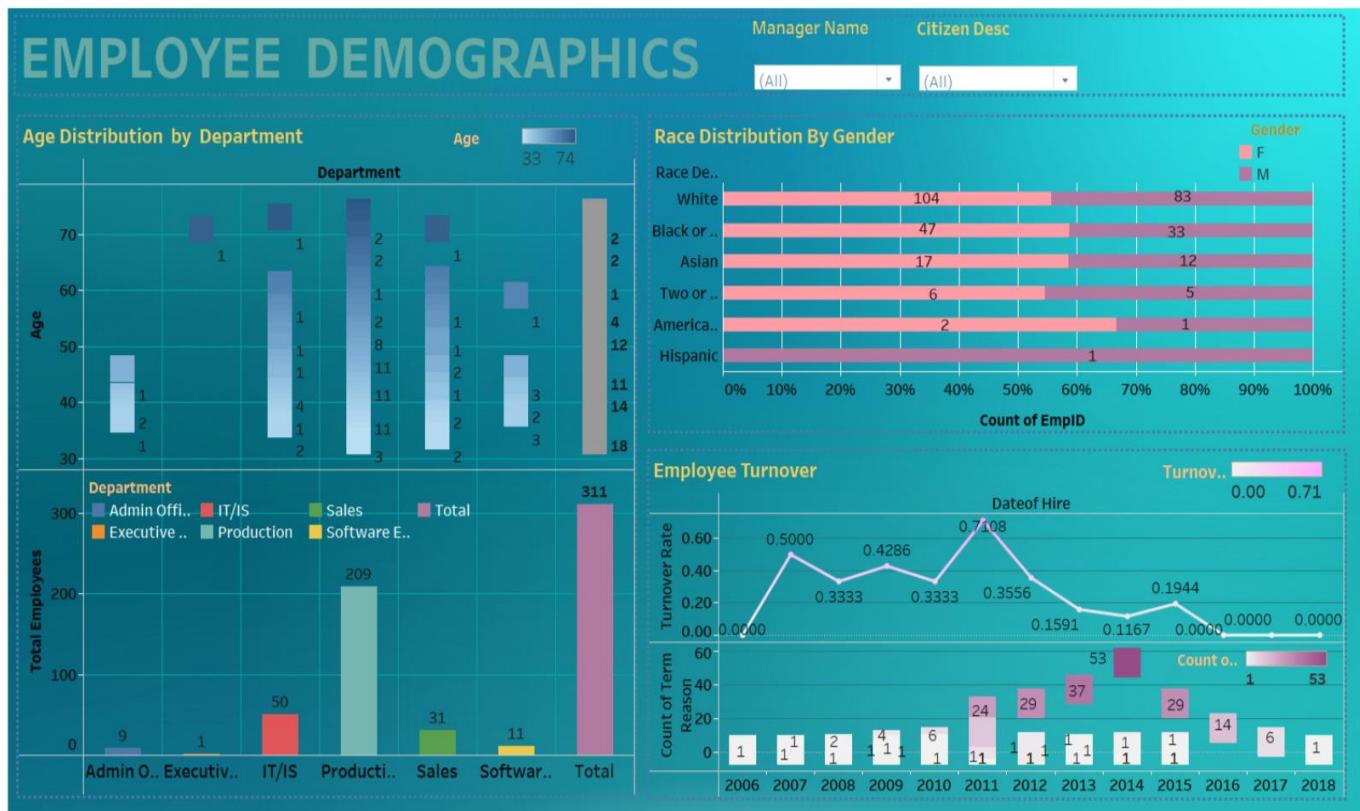
- Tableau.twb dashboard (4 themed pages)
- PDF export for offline presentation
- Project screenshots for LinkedIn / Resume
- GitHub-ready README

Tableau Dashboard – Page 1



This dashboard page provides a comprehensive summary of key HR metrics across the total & active employee base. It highlights employee distribution by marital status, gender, department and manager name. It includes insights into salary ranges and top performers.

Tableau Dashboard – Page 2



This page focuses on insights into the workforce composition based on age, race and gender across departments and management levels. Key insights include time-based turnover rate and term reason.

Tableau Dashboard – Page 3



This page focuses on hiring trends section displays the number of employees hired over time, with filters for position, department and gender. Key insights include hiring count by source to identify recruitment pattern.

Tableau Dashboard – Page 4



This page focuses on employee satisfaction levels and performance scores across the department. It helps how employee engagement may relate to productivity and retention.

HR Analysis Tableau Calculations

A.KPI's

1. Total Employees:

tableau code:

COUNT ([Employee Name])

2. Active Employees:

tableau code:

```
IF [EmploymentStatus]="Active"  
THEN 1 ELSE 0 END
```

3. Turnover Rate:

tableau code:

```
(COUNTD  
(IF [EmploymentStatus]="Voluntarily Terminated" OR  
[EmploymentStatus]="Terminated for Cause"  
THEN [EmpID] END  
)  
/ COUNTD([EmpID]))
```

B. Chart Requirements:

1. Age Distribution by Department:

tableau code:

DATEDIFF('year',[DOB],TODAY()