

Power BI HR Analytics Dashboard – Absenteeism Report

- **Project Overview:**

The Power BI HR Analytics Dashboard provides a detailed analysis of employee absenteeism across various demographics, departments, and job roles. It serves as a tool to help HR professionals monitor workforce trends, identify patterns of absenteeism, and take proactive measures to improve employee attendance. The dashboard helps in understanding key absenteeism metrics such as average absent hours, length of service, absenteeism by job title, age group, department, and location.

- **Key Performance Indicators (KPIs):**

The top of the dashboard displays the following KPIs to give an overview of the organization's workforce and absenteeism patterns:

- Total Employees: 8,336
 - Shows the current total headcount of employees in the organization.
- Average Age: 42.01 years
 - Indicates the average age of employees, suggesting a mature workforce.
- Average Length of Service: 4.78 years
 - Highlights employee retention, with the average employee working for nearly 5 years in the company.
- Average Absent Hours: 61.28 hours
 - Indicates the mean number of hours employees are absent, helping HR assess whether absenteeism levels are within acceptable limits.
- Max Absent Hours: 272.50 hours
 - Shows the maximum number of absent hours logged by an employee, helping to identify outliers who may require attention.

- **Visual Insights:**

3.1. Absenteeism by Department:

This section offers insights into how absenteeism is distributed across departments.

- Departments with Highest Absenteeism: Departments such as Customer Service, Process, and Meats show higher average absenteeism hours.
- This visualization helps HR professionals identify departments that may be facing operational challenges due to absenteeism and investigate the root causes, such as workload, job demands, or other environmental factors.

3.2. Absenteeism by Job Title:

This graph shows absenteeism patterns based on employee job titles.

- Employees in physically demanding roles, such as Dairy, have the highest absenteeism (192 hours on average). Senior-level roles like Directors and VPs have lower absenteeism hours (around 66-87 hours).
- Insights here can guide targeted programs like health and wellness for certain job roles or departments to reduce absenteeism.

3.3. Employees by City:

This chart provides a breakdown of the number of employees across different cities.

- Vancouver has the largest number of employees (1,780), followed by Victoria and New Westminster. Cities with larger employee populations could be targeted for location-based HR strategies, including absenteeism reduction efforts.

3.4. Length of Service by Department and Gender:

This section compares the length of service for male and female employees across different departments.

- The departments with the longest service for both genders are Customer Service (avg. 7,930 hours) and Meats.
- These insights help determine department loyalty and stability. Differences in service length between genders in the same department may highlight areas for gender equity analysis.

3.5. Absenteeism by Age Group:

The above 50 age group shows the highest absenteeism (124 hours on average), while employees under 30 show significantly lower absenteeism (4 hours).

- This data can help the HR department focus on developing wellness programs for older employees, who may face more health-related absenteeism.

3.6. Gender Distribution:

The Male vs. Female donut chart shows an almost equal distribution of male (4216) and female (4120) employees. This balanced gender ratio indicates diversity within the workforce.

- **Conclusion and Recommendations:**

The dashboard effectively identifies key areas of concern regarding absenteeism within the organization. Based on the data, the following recommendations are suggested:

1. Targeted Health Programs: Given the higher absenteeism rates among older employees and specific job roles (e.g., Dairy), the company could consider offering health and wellness programs tailored to these groups.
2. Departmental Reviews: Departments like Customer Service, which shows both high absenteeism and long tenure, may benefit from workload reviews, wellness initiatives, or team restructuring to maintain employee morale and reduce absences.
3. Focus on High-Absenteeism Cities: Locations like Vancouver, with the highest number of employees, could be assessed for absenteeism trends to see if additional localized strategies are needed.
4. Engage with Senior Employees: Employees aged 50 and above show significantly higher absenteeism, suggesting that flexible work hours, health incentives, or better work-life balance options may be required to keep them engaged and productive.
5. Balanced Gender Strategy: While there is a good balance of male and female employees, further exploration into absenteeism by gender may highlight additional trends worth addressing.

- **Technical Aspects:**

- Data Source: The dataset contains key HR metrics such as employee demographics, job titles, departments, absentee hours, and length of service.
- DAX Formulas: The KPIs and visualizations are supported by DAX formulas for calculating average age, absent hours, and length of service.
- Visualization Techniques: Bar charts, pie charts, and KPI cards are used to visually represent the data. Slicers are available to filter the data by department and gender, allowing for detailed, interactive exploration of the insights.