Data Analysis Report by Kevyn.ai

Executive Summary

This report presents a comprehensive analysis of electric vehicle (EV) data for the state of Washington. It includes the distribution of EV types, ranking of the top 5 electric motor vehicles, and trends in EV adoption by model year. The findings indicate a dominant presence of battery electric vehicles, with Tesla models being particularly prevalent. Additionally, there's a notable increase in EV adoption in recent years, especially in 2023.

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Introduction

This report delves into the dataset of electric vehicles, aiming to understand the distribution of EV types, identify the most popular models, and examine the trend in EV adoption over the years. The analysis is intended to provide insights for stakeholders in the EV industry.

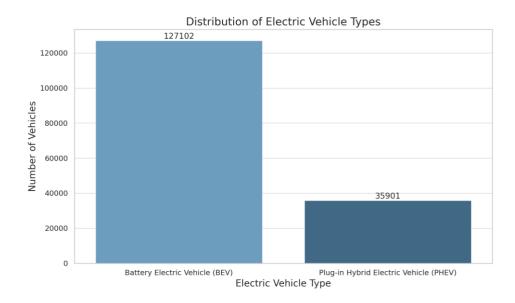
Methodology

The analysis was performed using the provided electric vehicle dataset. Key steps included data cleaning, categorization of EV types, ranking of models based on frequency, and trend analysis of model year adoption. Tools used include Python for data processing and matplotlib for visualization.

Data Analysis

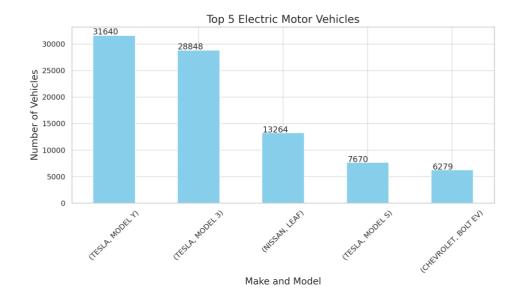
3.1 Distribution of Electric Vehicle Types

The dataset shows two main types of electric vehicles: Battery Electric Vehicles (BEVs) and Plug-in Hybrid Electric Vehicles (PHEVs). BEVs are more prevalent, with a total count of 127,102, compared to 35,901 PHEVs.



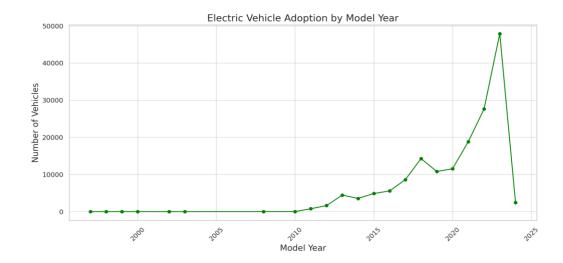
3.2 Rank of the Top 5 Electric Motor Vehicles

The top 5 electric vehicles are Tesla Model Y, Tesla Model 3, Nissan Leaf, Tesla Model S, and Chevrolet Bolt EV. Tesla models, particularly the Model Y and Model 3, dominate the EV market.



3.3 Electric Vehicle Adoption by Model Year

There's a growing trend in EV adoption, with a significant increase in recent years. The year 2023 saw the highest number of EVs, indicating a rising popularity and adoption of electric vehicles.



Results and Discussion

The findings from this analysis provide valuable insights into the current state of the EV market. The dominance of BEVs and specific models like Tesla's indicates market trends and consumer preferences. The increasing adoption rate in recent years suggests a growing acceptance and potential for future growth in the EV sector.

Conclusion

This report highlights the significant trends in the electric vehicle market, showcasing the prevalence of certain EV types and models, and the increasing adoption of EVs over the years. These insights are crucial for stakeholders in making informed decisions and strategies in the evolving landscape of electric mobility.