

## Building a Power BI report for Waggle

### *Project Overview*

Waggle is a company that makes intelligent pet toys. Lapdog, a health and wellness collar that lets owners track their dog's activity and change it when it's time to go for a walk, has become a great hit, with high demand and approval. It also plans to release a similar interactive and innovative pet product for another popular domestic animal: a cat, based on the positive consumer feedback and growing popularity of the Lapdog device. The business wants to make a Lapcat device that would accomplish the same things as the Lapdog device but for cats. To do so, the company has distributed hundreds of Lapcat prototypes to users for testing.

### *Project Objectives*

The main aim of this project is to compare the new Lapcat devices to the existing Lapdog collars through the data provided by the Waggle using Power BI as the data visualization tool.

### *Data Overview*

The 'Annual Pet Expenses' dataset was used for the data analysis and graphics. The dataset has 10599 expenditure observations, which is a new high. There are six variables in the dataset. The five attributes or columns are as follows:

*Name:* This column holds the name of each animal recorded to be using Waggle devices, i.e., Lapdog or Lapcat.

*Breed:* This column holds the information on the specific species of the device-bearing pet.

*Age:* The pet's age during the time the data was collected.

*Device type:* The type of device that the pet uses. The device might be Lapdog for dogs and the new Lapcat device for cats.

*Average annual pet expenses:* The total expenses by the household on the specific device-bearing pet for a year.

*Location:* The geographic location of the household that has a dog or cat.

### *Analysis and Visualisation*

See the PowerBI project attached.

### *Conclusion*

This project or investigation resulted in a Power BI report that outlines the significant differences and insights when comparing Waggle's Lapdog and Lapcat intelligent devices. This project used Power BI visuals to present the studied data in graphs and charts so that Waggle executives could quickly comprehend the findings and make business choices based on them. The prevalence of Waggle

devices in the United States and several locations in the United Kingdom and Europe was the first noteworthy finding of the research. This can assist the executives in understanding and attesting to the demands of their leading customer group, or it can motivate Waggle to advertise their gadgets in other regions such as Asia, South America, and elsewhere.

The second result is that Lapdog device usage increases linearly as the total number of steps made by Lapdog-wearing pets increases by 250 million each year. Another key conclusion of the survey is that dogs are far more active than cats, as seen by the significant difference in daily steps made by Lapdog carrying animals and Lapcat animals. The Lapdog gadget has a higher rating and more positive feedback than the Lapcat device. The proportion is around 3:1. Finally, households with higher incomes spend more on pets than those with lower incomes, according to the research. Waggle executives may use the conclusions of this study report to compare the two devices and make business decisions based on them.

### *Recommendation*

After analyzing and displaying the information with Power BI and reviewing the findings, I can advise the dataset creator to include newer metrics to collect additional data on the two devices' activities. Metrics such as device time usage, exercise tracking, nutrition plan, and others. Cats are more active in climbing, leaping, and other similar activities, but dogs are more involved in running and strolling. Newer capabilities, such as a location tracker and others, may be added to smart devices to give

unique benefits, such as helping owners find their missing pets. The corporation should also concentrate on spreading its reach to other continents and lowering the device's price to be affordable to most people. Aside from that, the data in the dataset was sufficient for credible analysis and visualization.