UDACITY



WeRateDogs

DATA WRANGLING ACT REPORT AHMED SHETA

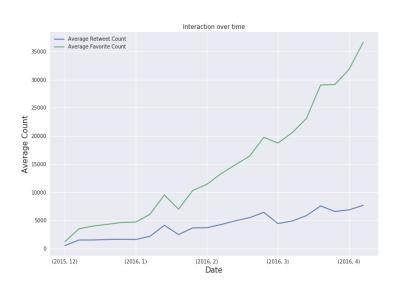
WeRateDogs™: A Glimpse on Insights

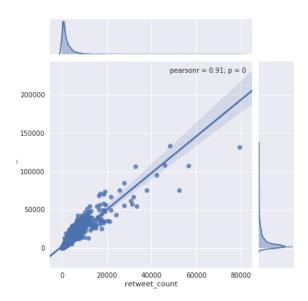
<u>WeRateDogs</u> is a Twitter account that rates people's dogs with a humorous comment about the dog. These ratings almost always have a denominator of 10. The numerators, though? Almost always greater than 10. 11/10, 12/10, 13/10, etc. Why? Because "<u>they're good dogs Brent</u>." WeRateDogs has <u>over 4 million followers</u> and has received international media coverage.

Let's wander through profile contents and activities, Revealing interesting insights about dogs lovers' behavior, interaction with dog related posts.

1. Regarding the interaction of dogs' lovers with tweets over time:

We can measure the interactions with posts by the retweets and favorite counts in the following plot (*figure.01*) it's clearly noticeable the increase of retweets and favorites average over the time which indicates the highly engaging contents to followers.





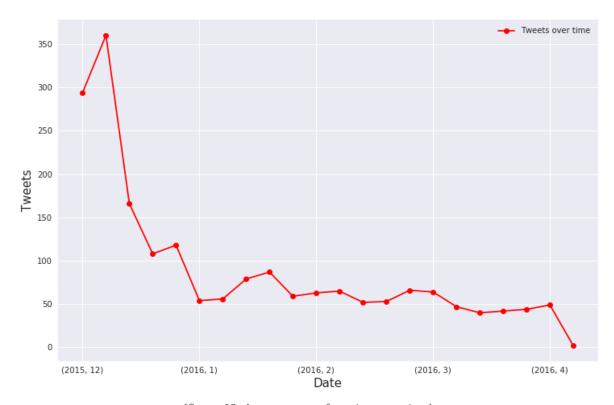
(figure.01: Interaction in terms of Retweets and favorites over time)

(figure.02: Correlation between Retweets and favorites)

From (figure.02: Correlation between Retweets and favorites) a positive correlation is demonstrated between retweets and favorites where both are direct indicator for engagements

The observed increasing trend of engagement over time could be justified by increasing the rate of posting over time, let's check.

2. Checking the average rate of posting over time:



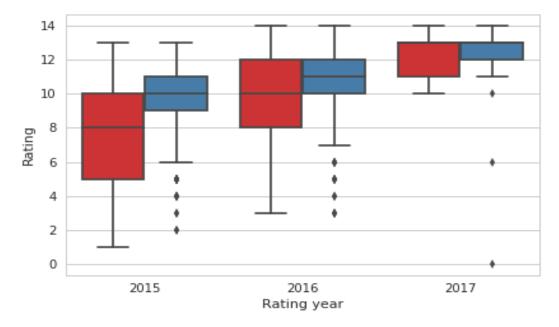
(figure.03: Average rate of posting over time)

After reviewing the average rate of posting over time (figure.03: Average rate of posting over time) we can see that the rate was decreased over time, which give a clue the reason for increasing the interactions trend over time is not the increased rate of posting, but instead the rich engaging content.

But, Is the observed high interactions is focused on all contents or there are special interactions with posts that features dogs' photos, we need to confirm.

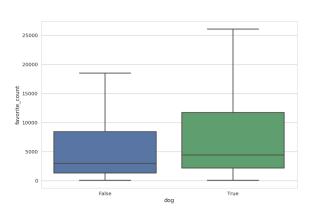
3. Comparing interactions with posts features dogs' photos against those that doesn't:

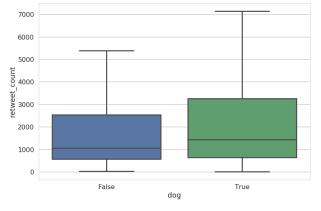
To analyze the interaction with posts features dogs' photos against those that doesn't, we check first the rate of posting in both terms over time from (figure.04: posts feature dogs' photos against those that doesn't over time)



(figure.04: posts feature dogs' photos against those that doesn't over time)

It's clear that most of posts are focused on posts featuring dogs' images, now let's compare the average retweets and favorites for tweets for posts feature dogs' photos against those that doesn't.





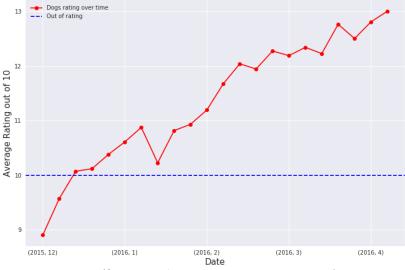
(figure.05: Favorites for posts dogs' photos against those that doesn't)

(figure.06: Retweets for posts dogs' photos against those that doesn't)

The Average retweets and favorites for posts of dog's images dominating those which doesn't, and that ensures the fact that most of the followers are **Dog's lovers**.

4. Average dog rating over time:

As mentioned previously, <u>WeRateDogs</u> rates people's dogs with a humorous comment and giving ratings almost always have numerator greater than denominator, lets have a look on this ratings average over time:



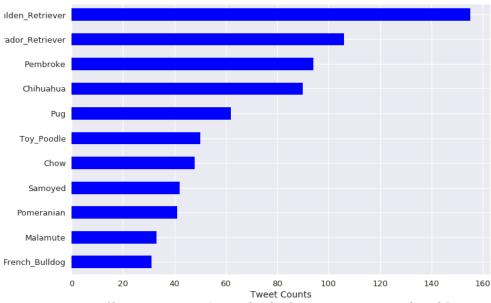
(figure.07: Average Dog ratings over time)

We find the dog rating average numerator initially was less than the denominator and then increased gradually over time giving the current special rating method.

5. Dog breed as a factor:

WeRateDogs Posts featuring dog pictures with different breeds, those variety of breeds could be a key indicator revealing some interesting facts, pictures from posts were analyzed resulting dog breed predictions, we will use those predictions for analysis.

5.1. Tweets counts for dog breeds

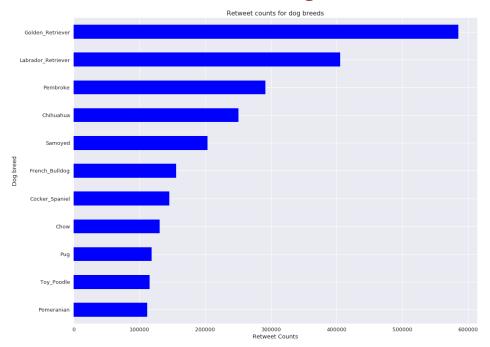


(figure.08: Tweet Counts for the first 10 most common breeds)

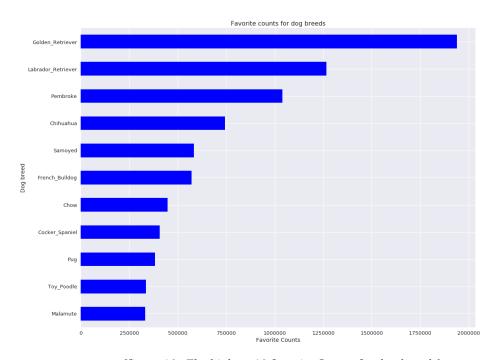
The previous plot resembles the 10 most common dog breeds as a result of tweet counts, but it's not a must that the most common breed gets the highest interactions.

We can review the below plots explaining the total Retweets & Favorites for dog breeds (which is a reflection of tweet counts) against the average retweets and favorite (which is a reflection of real interaction)

5.2. Retweet & favorite counts for dog breeds

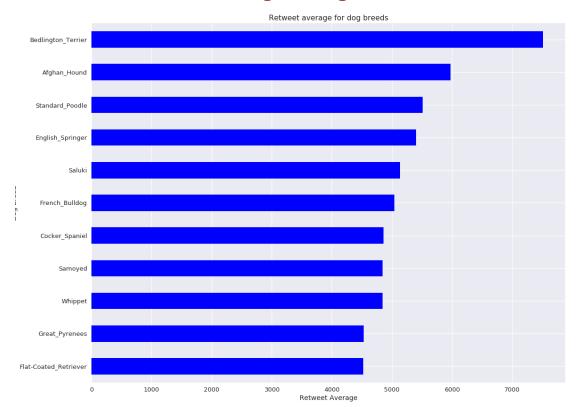


(figure.09: The highest 10 retweet Counts for dog breeds)

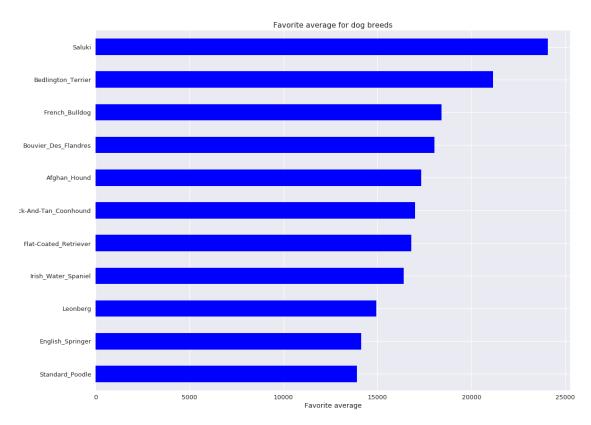


(figure.10: The highest 10 favorite Counts for dog breeds)

5.3. Retweet & favorite average for dog breeds

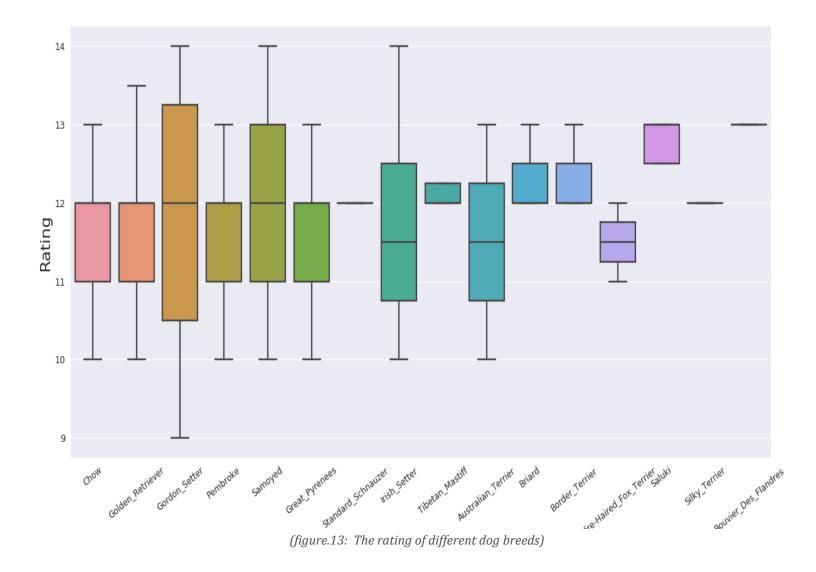


(figure.11: The highest 10 retweet Average for dog breeds)



(figure.12: The highest 10 favorite Average for dog breeds)

5.4. Average Rating for dog breeds



6. Dog breed as a factor:

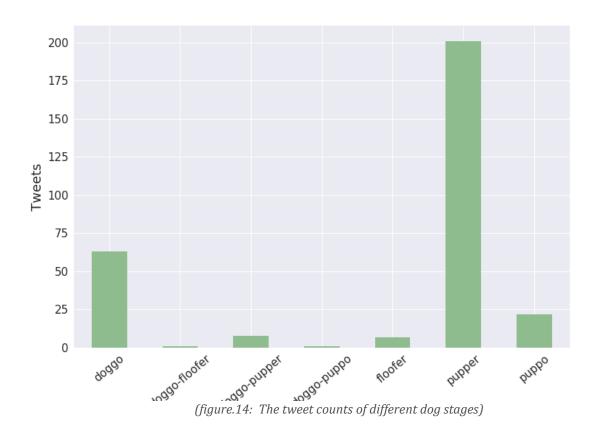
In Addition to dog breeds, Dog stages are also a key indicator for interaction, Dog Stages resembles the ages of dogs.

These screenshots from the WeRateDogs book, (The Dogtionary) explain this classification.

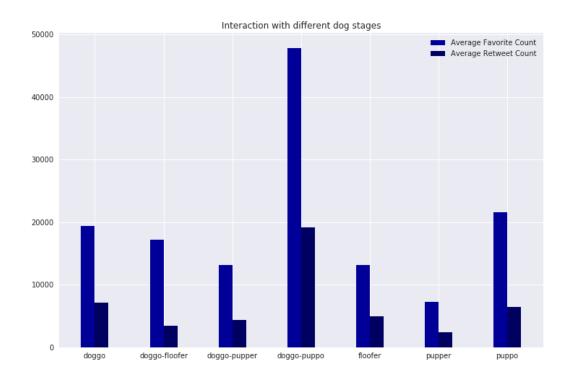


The Dogtionary explains the various stages of dog: doggo, pupper, puppo, and floof(er) (via the <u>#WeRateDogs</u> <u>book</u> on Amazon)

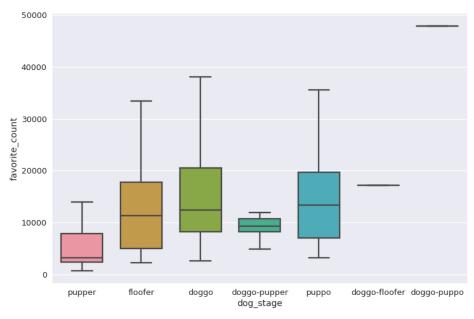
6.1. Tweets counts for dog stages



6.2. Retweet & favorite for dog stages



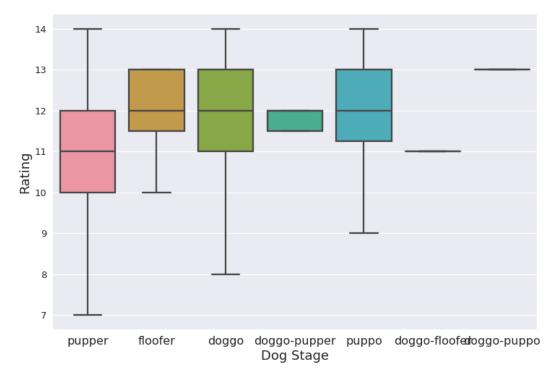
(figure.15: The interaction with different dog stages)



(figure.16: The interaction with different dog stages)

Puppo Stage is a baby dog which justify the high rate of interaction

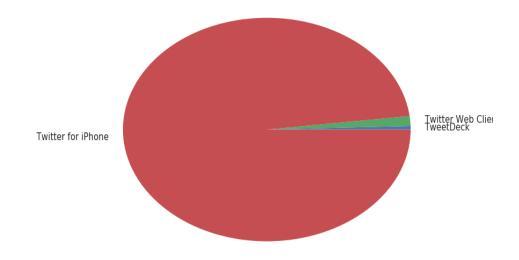
6.3. Average Rating for dog stages



(figure.17: Ratings of different dog stages)

7. Source of tweets - user device access:

It's very clear that most of users access the profile and engage using their iPhones (figure.18).



(figure.18: Source of tweets)

Image ratings are not always following the same rules

The below two images were found to be with exceptional ratings, Have a Clue!.

