### Wrangle Report

#### Introduction

A dataframe was created to merge:

- 1) Twitter\_archive: dataset created by streaming the account WeRateDogs
- 2) Image prediction: variables dog type, confidence interval and true for three prediction attempts.
- 3) Favorite counts and retweet counts. : data obtained by the library Tweepy and a Twitter API

These three dataframes have been merged to get one full dataset. But as image predictions weren't available for every row, I've created a second dataset with Image Predictions.

A dataframe copy was created to preserve the original one.

#### One column doggo/floofer/pupper/puppo

I've created one column to say if there was any value in the "doggo", "floofer", "pupper" or "puppo" columns. If it wasn't the case, there was a "No Nickname" value in this variable.

As I finished it, I've dropped the "doggo", "floofer", "pupper" and "puppo" columns from the database.

### Dataframe cleaning: retweets and reply to

As not every row was a dog rate, I've cleaned rows with retweet status and reply to status from the dataset to get only the rating dogs' data.

## Dataframe Cleaning: removing data without retweet and favorite counts

As the retweet and favorite counts are key insight, I've decided to remove all the data without these two variables.

# Dataframe variable types: retweet counts, favorite counts, timestamp and img\_num

Favorite counts, retweet counts, and img\_num were in float instead of integral, so I've changed these types into the right ones.

As timestamp was in a string instead of a datetime type, I've changed the timestamp in a type more appropriate for dates.

#### Rating value

As the "rating\_numerator" and the "rating\_denominator" columns weren't usable, I've created a "rating\_proportion" column, which divided the numerator by the denominator.

#### Source: URL address and anchoring text

As the source variable couldn't, I've decided to get two variables instead of this one:

- 1) URL address: for example <a href="http://twitter.com/download/iphone">http://twitter.com/download/iphone</a> (so I've extracted this variable from the HTTP coding)
- 2) Anchoring text: for example: "Twitter for iPhone. This is the text which was contained the URL address".

Then I've dropped the "source" column.

#### **Expanded URL:**

To be able to use this variable, I've kept only one URL address for this variable. In most cases, there were duplicate URL addresses in the same column, so I didn't lose a lot of data.

#### **Dogs Names**

I've extracted names which began by "name is", "named", "meet" and "Meet". Doing this, I've reduced the "None" values to 676, and I've transformed these into Null values.

#### New image predictions database

As this was another type of data, I've created an image prediction database, and I've created a variable that considered only the first prediction from 3 possible ones if they contained a dog race. I've also transformed the image number into integral.

Then I've removed p1/p2/p3 variables from the main database and the number of images as well.