**Data Science Test**

**Background**

A paired transaction (also known as ‘property flipping’) occurs when a property is sold twice within a relatively short period. For example, an individual buys a property and sells it a month later to make a quick profit.

The dataset that came with this assignment includes records of property transactions over a ten year period. The data itself is completely fictional, but for this assignment you are being asked to use this dataset to provide some analysis of paired transactions.

Please comment your code and provide it with your assignment. You will receive bonus points if your entire assignment is written in R.

**Question 1:**

How many paired transactions occurred over:

1. a 30-day period?
2. a 90-day period?
3. a 180-day period?

**Question 2:**

A policy analyst wants to know which factors influence the volume of paired transactions. Restricting your analysis to the set of 180-day paired transactions, please provide a brief analysis to show how the factors provided in the dataset influence the volume of paired transactions. Please provide a visual (table or chart) and write a few sentences to explain your methodology and describe what you found.

**Question 3:**

A policy analyst wants to know if there are any trends in the volume of paired transactions over time. Please provide a visualization to show whether there are any trends in the data, and please write a few sentences to explain your methodology and describe what you found.

**Submission**

To complete this assignment please submit as per the instructions in the email:

* Your code in a .txt file
* Your answers to questions 1 through 3 including any visuals you have made in a doc/docx or pdf document