

## Question-1

The dataset provided in 'kc\_house\_data.csv' contains house sale prices for King County, which includes Seattle. It includes homes sold between May 2014 and May 2015.

Variable	Description
id	A notation for a house
date	Date house was sold
price	Price is prediction target
bedrooms	Number of bedrooms
bathrooms	Number of bathrooms
sqft_living	Square footage of the home
sqft_lot	Square footage of the lot
floors	Total floors (levels) in house
waterfront	House which has a view to a waterfront
view	Has been viewed
condition	How good the condition is overall
grade	overall grade given to the housing unit, based on King County grading system
sqft_above	Square footage of house apart from basement
sqft_basement	Square footage of the basement
yr_built	Built Year
yr_renovated	Year when house was renovated
zipcode	Zip code
lat	Latitude coordinate
long	Longitude coordinate
sqft_living15	Living room area in 2015(implies-- some renovations) This might or might not have affected the lotsize area
sqft_lot15	LotSize area in 2015(implies-- some renovations)

Perform the following tasks :

- 1) Load the csv to a dataframe named 'house\_survey'.
- 2) Display the first 5 rows of the dataframe.
- 3) Display the data types of each column.
- 4) Obtain a statistical summary of the dataframe.
- 5) Drop the columns "id" and "Unnamed: 0"
- 6) Check all the null values present in all the columns of the dataframe.
- 7) Replace the missing values of the column 'bedrooms' with the mean of the column.
- 8) Replace the missing values of the column 'bathrooms' with the mean of the column.
- 9) Count the number of houses with unique floor values.
- 10) Using boxplot determine whether houses with a waterfront view or without a waterfront view have more price outliers. (Mention your answer as comment in the next cell)
- 11) Use the function regplot in the seaborn library to determine if the feature sqft\_above is negatively or positively correlated with price. (Mention your answer as comment in the next cell).
- 12) Find the feature other than price that is most correlated with price. (Mention your answer as comment in the next cell).