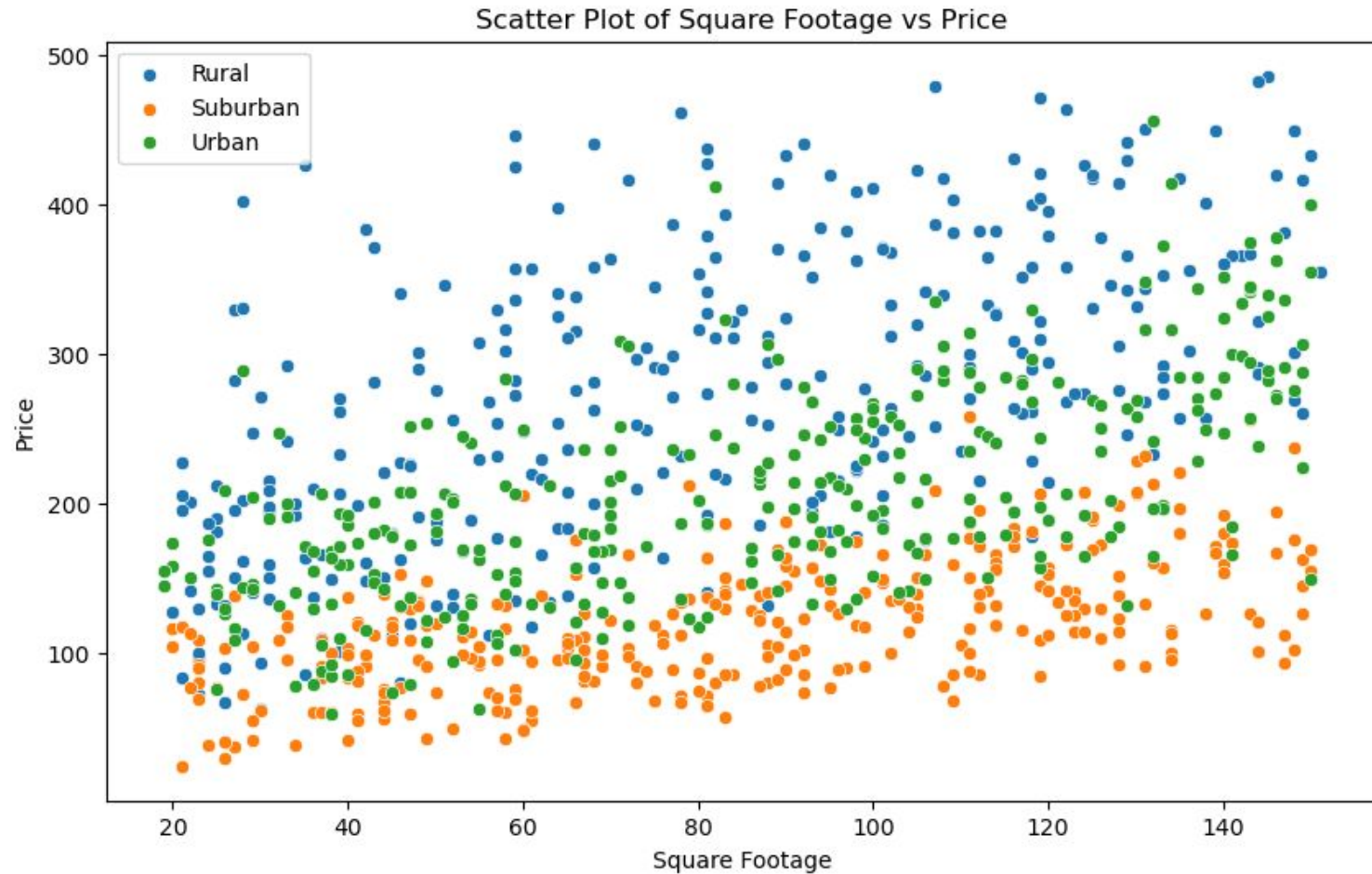


KDDM 1 Project

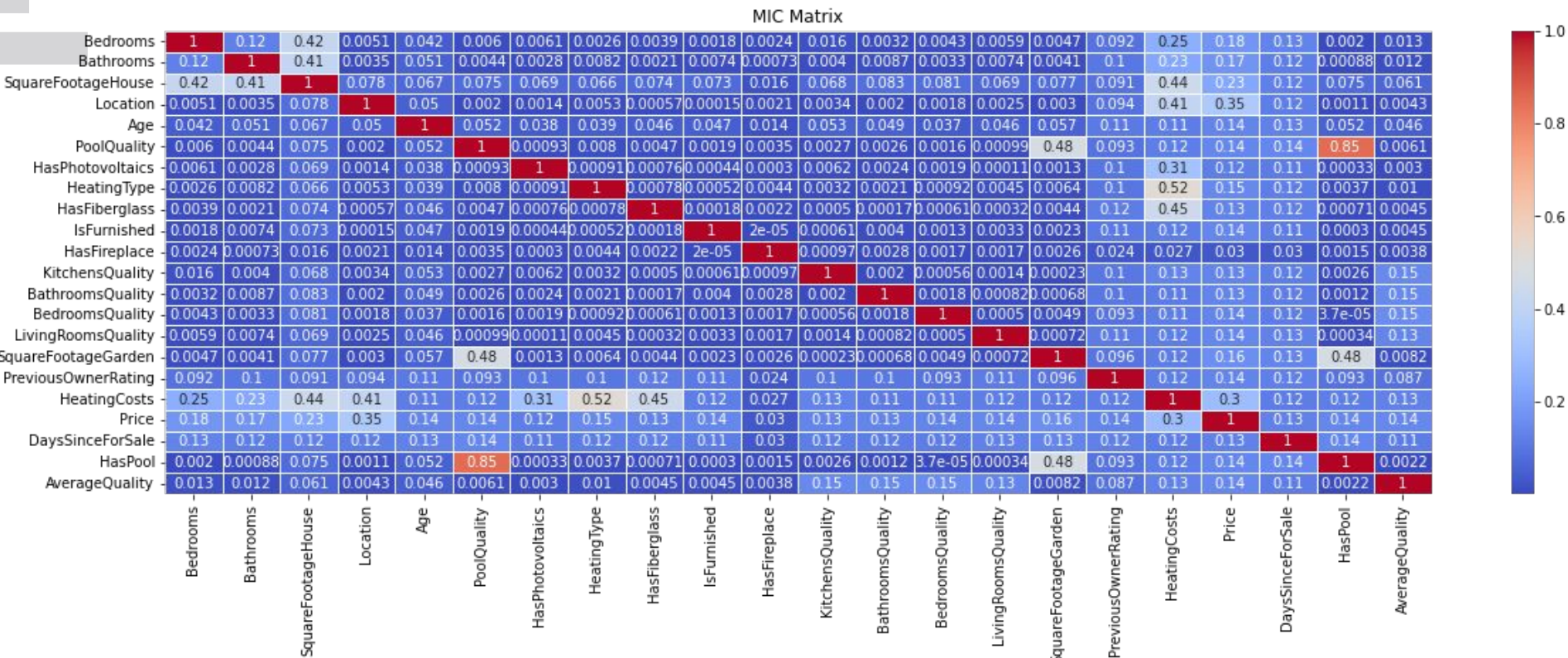
House Price Prediction

Bruno Elie Albanese Hayek
José María González Abad
Pablo Vallespín Aranguren

Multivariate Analysis



Maximal Information Coefficient (MIC)

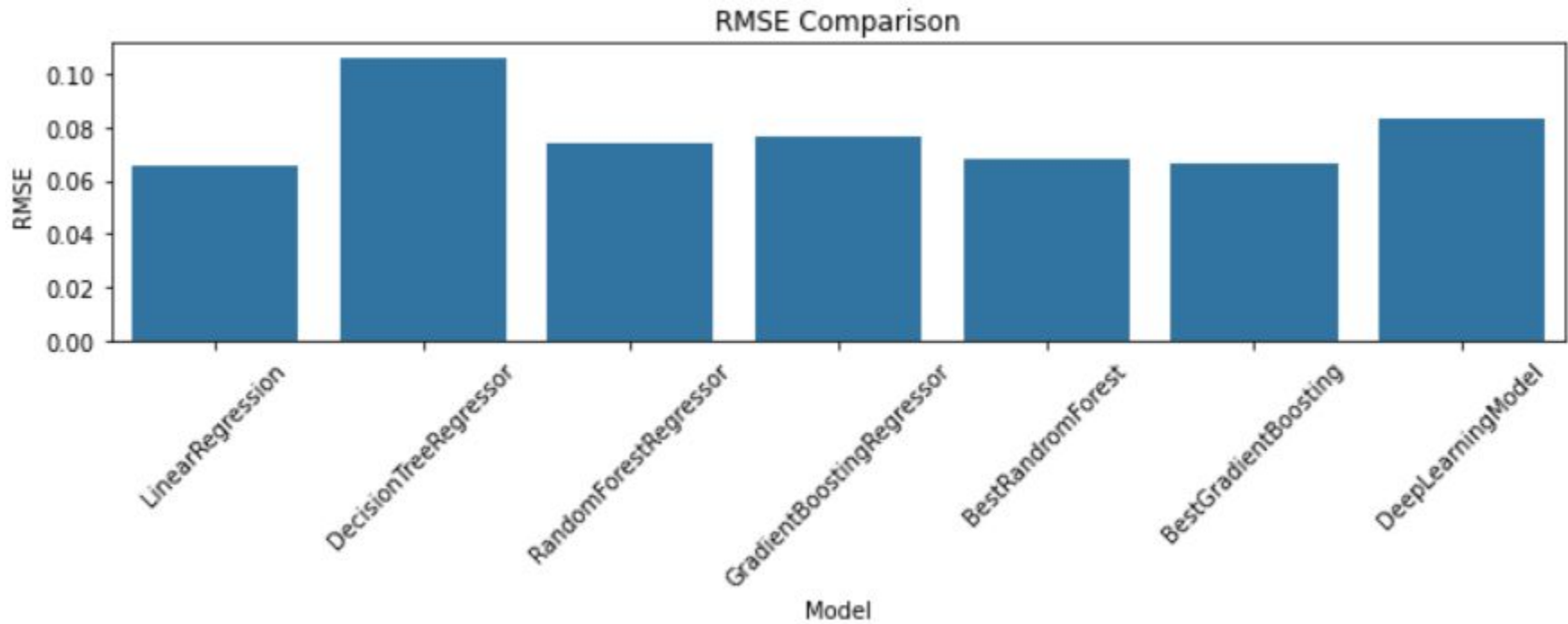


Methods

- Linear Regression.
 - Decision Tree.
 - Random Forest.
 - Gradient Boosting.
 - Best Estimator Random Forest.
 - Best Estimator Gradient Boosting model.
 - Deep Learning.
 - Feature selection.
-
- Best method: Random Forest Regressor.

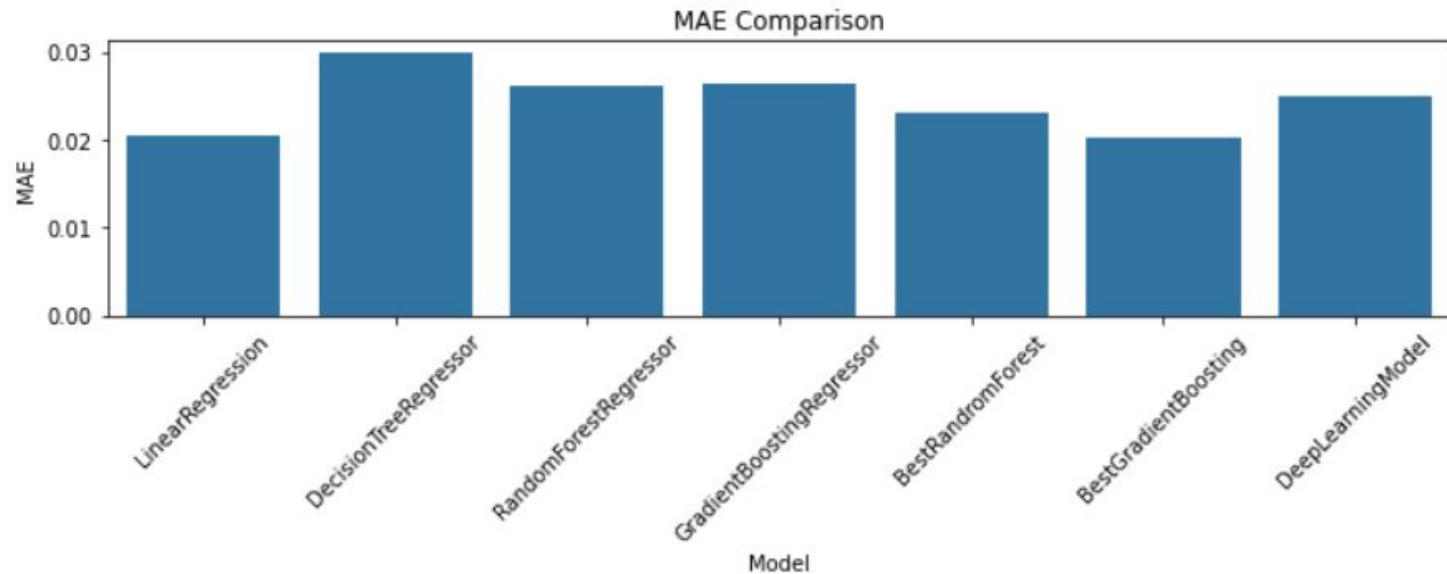
Evaluation

- RMSE

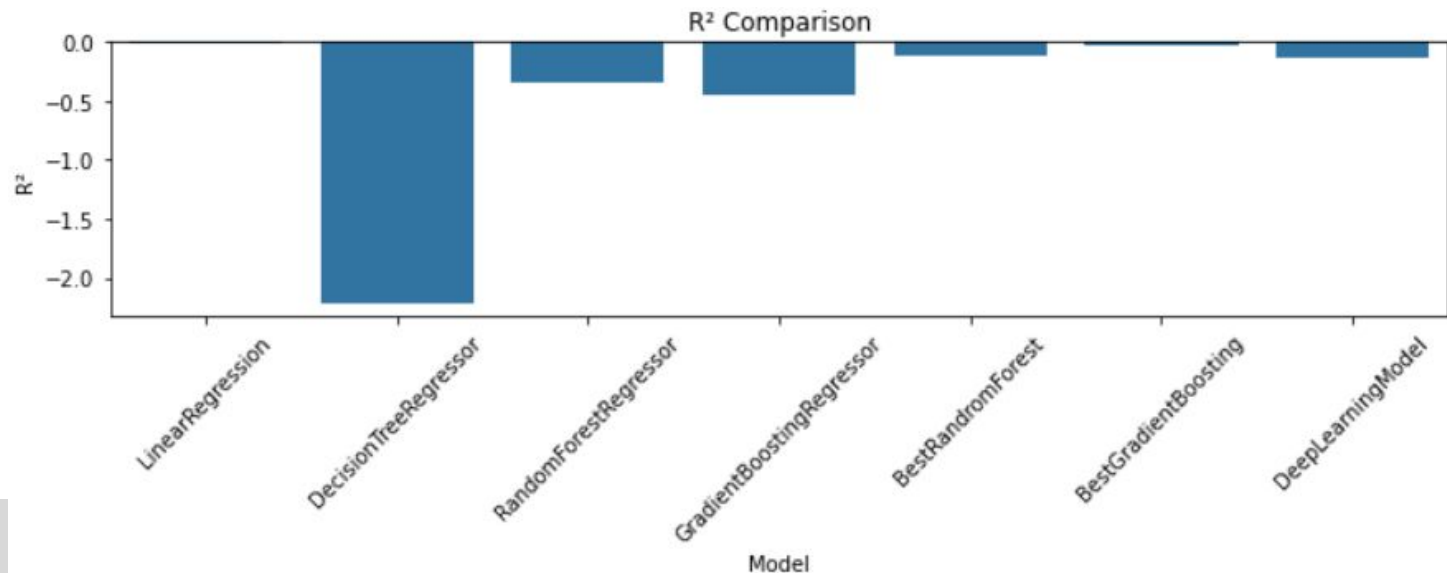


Evaluation

- MAE



- R^2



Discussion

- If I have a budget of €100,000, what kind of houses will I be able to buy?

Suburban, with approximately 172 square footage, electric heating, with no pool, with 1 bedrooms, 1 bathroom and 8 square footage of garden.

- How much money can I save if I decide not to get a house with a pool?

~46k EDA Estimation & ~53k Model Estimation

A large, faint, grayscale background image of a classical building with a prominent dome and columns, likely a university building, spanning the entire width of the slide.

Thank you !