Data Processing:

Dimension reduction - PCA Application:

[How to Calculate Principal Component Analysis (PCA) from Scratch in Python (machinelearningmastery.com)](https://machinelearningmastery.com/calculate-principal-component-analysis-scratch-python/)

PCA Dictionary:

[sklearn.decomposition.PCA — scikit-learn 1.0.2 documentation](https://scikit-learn.org/stable/modules/generated/sklearn.decomposition.PCA.html)

PCA Find out which features are more important:

[python - Feature/Variable importance after a PCA analysis - Stack Overflow](https://stackoverflow.com/questions/50796024/feature-variable-importance-after-a-pca-analysis#:~:text=The%20important%20features%20are%20the,value%2Fscore%20on%20the%20component.&text=So%20on%20the%20PC1%20the,and%20on%20PC2%20the%20d%20.)

Example presentation pitch for ML projects

Kaggle

<https://www.youtube.com/watch?v=zA72cyCJqOg>

Student project

<https://www.youtube.com/watch?v=GLaEPvKh0qE>

How to deal with the outliner:

[Detecting and Treating Outliers | How to Handle Outliers (analyticsvidhya.com)](https://www.analyticsvidhya.com/blog/2021/05/detecting-and-treating-outliers-treating-the-odd-one-out/?fbclid=IwAR31b9DyYnFYSC2viRjSHiUd3uxwm5ROriDI4vTHRKpOPBO2Qa1jpuzPnLQ)