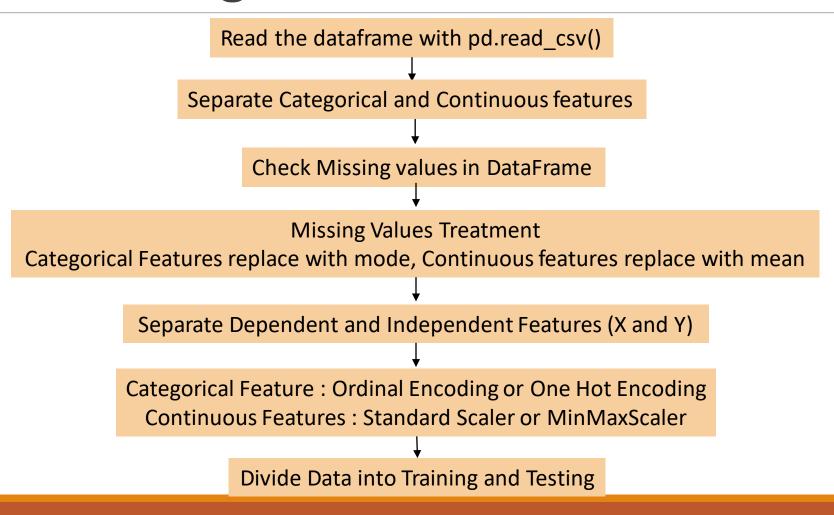
# Preprocessing with Sklearn pipeline

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CLASS STARTING SHARP AT 8:05 PM

## Basic Steps in creating a Data Preprocessing



#### Sklearn pipeline numeric features

SimpleImputer
Used to replace missing values
from sklearn.impute import Simple Imputer
strategy = 'mean' or 'median'

Standard Scaler
From sklearn.preprocessing import StandardScaler

#### Sklearn pipeline for categorical features

SimpleImputer
Used to replace missing values
from sklearn.impute import Simple Imputer
strategy = 'most\_frequent'

Ordinal Encoder / OneHotEncoder from sklearn.preprocessing import OneHotEncoder from sklearn.preprocessing import OrdinalEncoder

#### Column Transformer

Numeric Pipeline, Numeric features (con)

Categorical Pipeline , Categorical features (cat)

#### Example Code with all pipeline

```
from sklearn.pipeline import Pipeline
           from sklearn.impute import SimpleImputer
                                                                                Import the Pipeline functions
           from sklearn.preprocessing import OrdinalEncoder, StandardScaler
           from sklearn.compose import ColumnTransformer
           # Numeric pipeline
           num_pipeline = Pipeline(steps=[('imputer',SimpleImputer(strategy='mean')),
                                                                                          Numeric Pipeline
                                           ('scaler', StandardScaler())])
           # Categorical Pipeline
                                                                                                    Categorical
           cat_pipeline = Pipeline(steps=[('imputer',SimpleImputer(strategy='most_frequent')),
                                                                                                    Pipeline
                                           ('ordinal_encoder',OrdinalEncoder())])
Combine
           # Column Transformer
Cat and
           preprocessor = ColumnTransformer([('num_pipeline',num_pipeline,con),
num pipes
                                              ('cat pipeline', cat pipeline, cat)])
```

### Thank you

PING ME ON SKYPE FOR ANY QUERIES