Dimensionalitly Reduction

we have seen that we used
2D, 3D ----------> Scatter plots
4D, 5D, 6D -----> Pair plots
for dealing with data

What if we have 10D data or even higer dimensional data?

we humans can't visualize any dimensions above three. So, we will reduce the dimensions.

nD --(Dimensionality Reduction)--> 2D, 3D

Most commonly used dimensionality reduction techniques are:
1. PCA (Principal component analysis) ----> old technique
2. t-SNE (t-Distributed Stochastic Neighbor Embedding) ----> state of the art technique

Which technique to use depends up on the requirement of what we want to preserve