Q1) include or Exclude Outliers:

It mostly depends on what you are trying to achieve with your model. Sometimes the information carried by outliers is indeed negligible if not of interest (say, for example, that those high values are caused my data collection/input **errors**), and may affect your model performance. In some other cases though, outliers carry a lot **meaning** and you might want your model to be **aware** of their existence/possibility. In other scenarios, the outliers are what you actually care about (see **Anomaly/Novelty detection** e.g.).

Long story short, if these outliers are really such (i.e. they appear with a very **low frequency** and very likely are bad/random/**corrupted measurements**) and they do not correspond to potential events/failures that your model should be aware of, you can safely **remove** them. In all other cases you should **evaluate** case by case what those outliers represent.

Q2) K-means and outliers

k-means can be quite sensitive to outliers in your data set. The reason is simply that k-means tries to optimize the **sum of squares**. And thus a large deviation (such as of an outlier) gets a lot of weight.

If you have a noisy data set with outliers, you might be better off using an algorithm that has specialized noise handling such as [DBSCAN (Density-Based Spatial Clustering of Applications with Noise)](http://en.wikipedia.org/wiki/DBSCAN). Note the "N" in the acronym: Noise. In contrast to e.g. k-means, but also many other clustering algorithms, DBSCAN can decide to not cluster objects that are in regions of low density.