

Course 4: Exploratory Data Analysis

④ why do we use graphs in data analysis?

- ✓ To understand data Properties
- ✓ To find Patterns in data
- ✓ To suggest modeling strategies
- ✓ To "debug" analyses
- ✓ To communicate results

④ five number summary, Boxplot, hist(), etc

↓
summary() → min. 1st Qu. median. Mean 3rd Qu. Max.

* ggplot1 → ggplot2, lattice pkg

// pch: the plotting symbol (default is open circle)

// lty: line type (default is solid line)

// lwd: line width

// col: plotting color

④ dev.copy() → copy plot to a Png file

dev.off() → close PNG

③ `ggplot: () + facet_wrap ()`
↑
make panels

③ Hierarchical clustering

// `hclust ()`

// `kmeans ()`



Requires a number of cluster

③ SVD matrix Decomposition → `svd ()`

PCA

③ color → grDevices pkg }
 } ColorRamp
 } ColorRampPalette

RColorBrewer pkg