

EXERCISE

Basic graphics (histogram & boxplot)

This exercise will require the data 'lipid' from the previous exercise (CAD excel sheet). You should have already made a subset from 'lipid' called 'patients' containing data for patients only and another subset called 'controls' containing data for controls only.

1. Draw a histogram of Triglycerides (TG) of patients with the following characters:
 - a. Values shown as proportion (density)
 - b. Black bars with gold borders
 - c. Title called "Patients" and coloured gold
 - d. Y-axis label is "TG(mg/dl)"
 - e. No x-axis labels
2. Add a curve to the previous histogram showing the distribution of TG in patients with the following characters:
 - a. Coloured gold
 - b. Line width = 4
3. Repeat steps 1 and 2 but for TG of controls and **replace** the colour gold in border of bars, title and curve with green

EXTRA

- Which group (patients or controls) has a higher level of TG?
- Is the difference significant?

4. Subset from file 'lipid' the 4 lipid types only (HDL, LDL, TG and TC), name the new file 'lipid2'
5. Draw a boxplot for all lipid types together ('lipid2') titled 'Lipid profile', colour the box 'darkgreen'.
6. The figure shows an outlier. Remove it and re-draw the figure
7. From the figure, can you say which is the highest blood lipid and which is the lowest?

EXTRA

Is there a significant difference between blood lipid types (use file 'lipid2')?