EE550
Computational Biology
Homework 4
Due 24.5.2022

Instructions: Please return your homework as a single PDF document by the due date with "EE550" and your student number in the file name. Sharing of ideas and discussions is encouraged but sharing of results and/or text is not. Show the details your work including the intermediary results.

Question (100 points) The microarray data with the accession number GDS2958 at the Gene Expression Omnibus database that was used in the lecture will also be used for this homework. Make sure that the data is properly transformed and normalized before the analyses. You are tasked with carrying out 5 comparisons using the Significance Analysis of Microarrays method on the data and obtaining the list of differentially expressed genes including up to about 1 falsely identified gene. Make sure to provide the SAM graphs as well as the list of differentially expressed genes.

(Hint: The comparisons must be meaningful.)