Winter Term 2004/05

Workshop
Practical Analysis of Gene Expression Data

jointly organized by

the Department of Statistics/LMU and the MPI for Psychiatry

Teachers:
LMU: Korbinian Strimmer, Juliane Schäfer, Rainer Opgen-Rhein.
MPI: Alexander Yassouridis, Bertram Müller-Myhsok, Benno Pütz, Klaus Hechenbichler,
          Shaun Seaman, Daria Salyakina

Date: **23-25 November 2004   (11:00-13:00 and 15:00-18:00)**
Location:
a) Lectures: Max-Planck-Institute of Psychiatry, Kraepelinstr. 2, 3rd floor, conference room
b) Computer exercises with tutorial: Dept. of Statistics/LMU, Ludwigstr. 33, computer room (ground
                                                                                          floor)

Registration:
For participation **please register** with either:
• Korbinian Strimmer (strimmer@stat.uni-muenchen.de) or
• Alexander Yassouridis (yassou@mpipsykl.mpg.de)

Overview:
This microarray workshop provides a practical introduction to statistical and computational
aspects of gene expression analysis. Emphasis is put both on the theoretical background, such as
normalization procedures, differential expression, ANOVA, and clustering and classification
procedures, as well as on practical exercises using R packages for gene expression analysis (in
particular the Bioconductor packages).

Agenda:
• Introduction to microarray technology
• Normalization procedures
• Differential expression
• Clustering gene expression data
• Classification of tissue samples
• Inference of genetic networks

On each topic there will be both lectures and practical excercises. Lectures will take place in the
morning in Max-Planck-Institute of Psychiatry and practical exercises in the afternoon in LMU.
For program details please download the attachments or go to

              http://www.stat.uni-muenchen.de/~strimmer/teaching/ws04/

Note: All lectures will be in German.