

Prof. Antony Unwin
Dept of Computer-Oriented Statistics and Data Analysis
Institute for Mathematics
University of Augsburg
http://stats.math.uni-augsburg.de/

Stochastik IV – Graphical Data Analysis Exercise Sheet 4: Multivariate categorical data

Tutorial: Tuesday, 15th November, 2011, 10.00 - 11.30 Uhr, Room 3029

Background

There is a vignette by Michael Friendly for the R packages *vcd* and *vcdExtra*. These packages were written with contributions by a number of people to complement Friendly's book

Friendly M (2000). Visualizing Categorical Data. SAS Insitute, Carey, NC.

Chapter 5 of the vignette discusses mosaicplots in conjunction with modelling using the following datasets available in R:

- 1. Arthritis (vcd)
- 2. HairEyeColor (datasets)
- 3. tv.dat (*vcdExtra*) [This file is not listed in the package help but can be loaded as given in the vignette.]
- 4. Mental (vcdExtra)
- 5. UCBAdmissions (datasets)

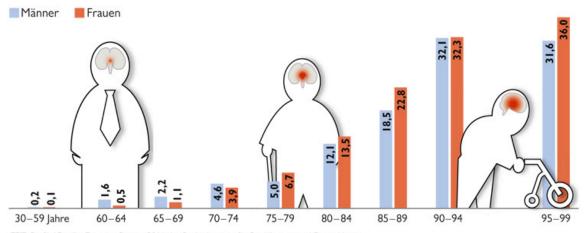
Which mosaicplots would you recommend for graphically analysing the data in each of these datasets (i.e. ignore the use of mosaicplots for supporting modelling)? You may wish to suggest more than one plot to ensure that all information of interest can be displayed.

Extra: see next page

Graphic on Alzheimer's disease

Ab 80 steigt das Risiko

Häufigkeit von Demenz in verschiedenen Altersgruppen nach Geschlecht, in Prozent



ZEIT-Grafik/Quelle: Demenz-Report 2011 des Berlin-Instituts für Bevölkerung und Entwicklung

Figure 1: Frequency of Alzheimer's by gender and age (Source: www.zeit.de/2011/20/Diagnose-Alzheimer/seite-2)

Is this an effective graphic? What information do you draw from it? Can you suggest improvements or alternatives?