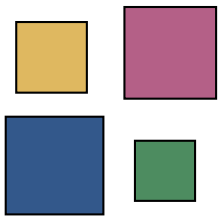

Prof. Antony Unwin
Dept of Computer-Oriented Statistics and Data Analysis
Institute for Mathematics
University of Augsburg
http://stats.math.uni-augsburg.de/

Stochastik IV – Graphical Data Analysis

Exercise Sheet 13: Perception and colour

Tutorial: Tuesday, 24th January, 2012, 10.00 - 11.30 Uhr, Room 3029

1. Odd one out
   Buja, Cook, Hofmann and Wickham suggest that graphic features can be checked by generating a number of other graphics based on the appropriate null hypothesis and seeing if the graphic with the real data looks different. Using the Titanic dataset, check whether the lower survival rate for the second class males stands out. Ignore the age variable and use a null hypothesis where the rates of survival of females/males in a class are the products of the overall female/male rates and the relevant class survival rates. Or use a null hypothesis of your own choosing. Generate 9 plots and display all 10. What do you think?

2. US Election 2004
   The dataset and map are available on Mondrian's webpage. Which of the colour schemes available in Mondrian's map window would you recommend for maps relevant to the following questions:

   (a) Where was Ralph Nader strongest?

   (b) Where was the election closest?

   (c) Where were the most partisan areas for the two parties?

   (d) How could you colour each state?

   Would some other colour scheme possibly be better? And if so, which?