Statistics 1B Interludes

1. Guidelines for alcohol and toast

Both men and women advised not to drink more than 14 units a week

But where does this come from?

One alcohol unit = 10ml or 8g of pure alcohol.

Model output provided in expert report

Estimated lifetime risk from daily alcohol consumption

% chance of dying from an alcohol-related condition

Guideline

Units of alcohol every day

So what did the Department of Health say?

New alcohol guidelines show increased risk of cancer

These issues prompted changes to alcohol guidelines for men. Men should not drink more than 14 units of alcohol each week, the same level as for women. This equals 6 pints of average strength beer a week, which would...
Statistical analysis is vital
But many uncertainties/assumptions are not reflected in the final guidance

Table 1: It is the exposure of acrylamide which toxicologists think unlikely to cause increased tumours in mice. The "margin of exposure" is the RAC (LB) divided by the estimated exposure of acrylamide in diets. But, for cancer, toxicology committees demand a rather arbitrary margin of exposure of 10,000 before considering the chemical essentially acceptable. That's 33

Conclusions
- Statistical analysis is vital
- But many uncertainties/assumptions are not reflected in the final guidance