

## **Before you see a statistician....**

Researchers are often inadequately prepared when they first visit a statistician to discuss their study and may have unrealistic expectations! It will save both your time and theirs if you consider the following points beforehand.

## **What do you need help with?**

Requests made to statisticians vary enormously but usually include some combination of the following. It may help to formulate your ideas if you tick the box (es) which apply.

### ***Prior to Study***

- Advice on study design
- Advice on the statistical method of randomisation
- Help writing the study protocol, and/or submissions to Research Governance and Ethics committees.
- Sample size calculations.
- Advice on the method of analysis.

### ***Analysis***

- Analysis of data already collected / to be collected

### ***Reporting***

- Help writing up the results
- Responding to referees' comments

## **How to get the best from a statistician**

Seek advice as early as possible in a project. A statistician can have important input, particularly on the design of a study, method of randomisation, method of analysis and sample sizes. Whilst we may be able to come on board at a later date, a statistician cannot 'rescue' poorly designed research and may not wish to be involved in such studies. Further, priority for data analysis will usually be given to studies for which there was an early involvement.

It is expected that studies protocol-driven, peer reviewed and publishable in the public domain. They should have, or will have, approval by relevant Ethics and Research Governance committees.

## **How we work**

We are usually happy to offer an initial consultation to discuss your study and any statistical issues it may entail and provide what advice we can at this stage. We are happy to offer a one-off meeting with research students\* within the medical school, provided this is arranged with the permission of the supervisor, who is welcome to attend.

Often, further involvement is required beyond the first meeting. When this is the case, there is an expectation that appropriate recognition will be made for any contribution, depending on the level and context of involvement. This may be in the form of co-authorship for any papers to which a statistician contributes. If support is required for a new project for which funding is being sought then statistical support should be budgeted for. Alternatively, it may be appropriate to include as statistician as a co-applicant for funding or a named collaborator.

Where a statistician is named on a document, e.g. an ethics application, they should be shown a draft and allowed sufficient time to comment before it is submitted.

Please bear in mind that a statistician may have many commitments at any one time and may not be able to respond to requests immediately. Whilst we will attempt to meet externally imposed deadlines we cannot always guarantee to do so and will attempt to prioritize work fairly.

\* If the work is for a degree the usual rule is that the statistician should give advice and only limited help as the student needs to understand fully the analysis in order to defend it at a viva. Advice must therefore necessarily be limited to methods which are within the student's existing knowledge or which the student is willing to find out about themselves.