19.1: Introduction to intervention costing and economic analysis

This book is focused on intervention trials in which the effectiveness of some new or modified intervention is compared with a control intervention, which would generally be the currently used intervention for a particular disease or condition. At the end of the study, estimates should be available of the impact of the intervention, compared to the control intervention. However, the decision on whether or not to apply the new intervention in a public health programme will be governed not only by the effectiveness of the intervention, but also by its costs. This chapter gives an overview of the main methods used to assess the costs of health interventions and summarizes the types of economic analyses that can be conducted to assist decisions concerning resource allocation to the deployment of health interventions. Just as the statistical design and analysis aspects of a trial will generally require the involvement of a statistician, from an early stage, in the planning of a trial, similarly it is highly recommended that a health economist be involved from the stage of initially planning the trial to advise on how costs should be measured during the course of the trial and on how these will be used at the end for an economic analysis that may ultimately influence whether or not an intervention is implemented on a widespread basis. The chapter is aimed at those who will be working with economists, in order to help design and conduct the economic aspects of a field trial to collect the appropriate data and to obtain the most useful results from an economic analysis.

In the wider scheme of things, governments have to make decisions about resource allocation between health and all the other sectors such as defence, education, and agriculture. Along with social, political, and logistic considerations, economic analyses should be an important component in decision making about those allocations. In general, economic analysis should take into account the benefits of using resources for a proposed action, compared to the use of those resources for any other purpose. However, such broad considerations are well beyond the scope of the present book! Instead, we focus on the more narrow comparison of the costs and benefits of deploying a new or modified health intervention, compared with the currently used intervention.