Acute Respiratory Disease

Interest in acute respiratory diseases has in some ways become unfashionable. This is partly because many of the illnesses are mild and spontaneous recovery is common, partly because empirical treatment with antibiotics often causes rapid resolution of symptoms, and not least because methods for detection of many of the nonbacterial causative agents have not been available.

Over the last few years new microbiological techniques have opened up the field in a dramatic way, and information about the biological properties of many types of microorganism isolated from human secretions has rapidly accumulated. Perhaps for too long laboratory workers have proceeded in relative isolation from the clinician. Their attitude might be excused when, as in the investigation of viral respiratory disease, a laboratory diagnosis could be made only in retrospect, weeks after the patient had already recovered. But this era now appears to have passed, and so too it seems has the isolation of laboratory from clinical endeavour, to judge by a two-day symposium organized earlier this year by the College of Pathologists.

The proceedings of this symposium on acute respiratory diseases¹ have now been published. In addition to providing notable evidence of collaboration between microbiologist, epidemiologist, veterinary surgeon, paediatrician, and clinician, they also illustrate the value of bringing a variety of scientific disciplines to bear on a single objective. The opening chapters are rightly devoted to the rapidly expanding field of respiratory viruses, and the section is introduced by an important perspective review on the expansion of knowledge about these viruses in relation to the clinical syndromes they cause. From this beginning emphasis on the clinical aspects of the subject is never lost throughout the length of the monograph. The more scientific chapters summarize, for instance, knowledge of the structure of viruses and methods for their identification, thus augmenting the main clinical purpose of the symposium. The section on epidemiology illustrates well that difficulties experienced by the clinician in interpreting survey data are in large part a reflection of our still incomplete knowledge and imperfect laboratory methods. The comparative study of viral and mycoplasma infections in animals both broadens the scope of the review and may be essential for a proper understanding of the experimental work in this field.

Mycoplasmas are being identified as an increasingly important cause of acute respiratory disease. The great volume of recent information about their biological properties and clinical manifestations has been distilled and can be found in this monograph as a comprehensible summary. The role of bacteria in acute respiratory disease may make less exciting reading because the subject is a more familiar one, but we cannot afford complacently to underestimate their importance, of which there is a continual reminder in the persisting mortality figures. These deaths due to bacterial respiratory infections continue in spite of the wide range of antibiotics theoretically available for their treatment.

Many other problems of acute respiratory diseases are discussed in this symposium, including the possible role of viruses and bacteria in acute exacerbations of chronic bronchitis, respiratory damage due to inhaled metals, the characteristic changes due to immunological damage caused by external allergens, and the physiological consequences of such diseases.

Perhaps the greatest value of the symposium is to demonstrate the rapid and important progress being made in a number of widely different disciplines, which are now converging on to some of the problems of chest disease. The monograph should make salutary reading for those who have mistakenly grown to believe that the specialty of chest disease is finished now that tuberculosis has been conquered. Moreover, this symposium, having limited its scope strictly to the subject of acute respiratory disease, only scratches at the surface of the problems in the whole field of chest disease now awaiting study.

Progress in Anaesthesia

A World Congress of Anaesthetists takes place once every four years. The fourth was held a few weeks ago in London and was attended by several thousand anaesthetists from all over the world. Nothing smaller than the Festival Hall complex of buildings would have sufficed to accommodate it. The scientific proceedings at the congress gave a good general picture of the growing points in this rapidly expanding field of medicine.

The content of the training of anaesthetists is still of widespread concern, though it must inevitably be linked to the social and economic conditions of each country. There is thus understandably little international uniformity beyond the fact that specialized training is necessary. Even in countries which are, anaesthetically speaking, more advanced, such as the United Kingdom, the U.S.A., and Scandinavia, the emphasis ranges widely from the straightforward clinical experience in Britain to the more theoretical and research aspects of the subject in the U.S.A. The world-wide shortage of anaesthetists was underlined, and of the several causes, other than financial return, the failure to interest the undergraduate student appears to be an important one. Anaesthesia, however, is still believed to be an essential ingredient in undergraduate instruction, not so much for teaching the techniques of anaesthetizing patients as for the greater understanding it gives of the part it plays in surgical treatment and also the many ways in which the anaesthetist’s skill is applied to other fields of medicine. The broadening of the anaesthetist’s field of work of what used to be exclusively the operating-theatre to embrace a wide range of disorders in other branches of medicine is nowhere better illustrated than in his contribution to intensive therapy.¹ The symposium on this subject was largely devoted to questions of architectural design of the units, and of management and operational