BOOK REVIEWS


This is a valuable book not only for the occupational health nurse starting in industry, but also for the nurse already established or who is engaged in teaching occupational health. The third edition has been revised and largely re-written to bring the knowledge and skill required of the nurse to enable her to meet the new demands made upon her by the expansion in modern industrial technology and recent legislation.

The history of industrial nursing in the first chapter is obviously the product of a deep knowledge and wide experience. The provisions of the Factory Acts which the author has selected as being of interest to the nurse in the U.K. are well chosen and include the recent regulations for first-aid boxes in factories. The work of the appointed factory doctor is also outlined. The pride of the author in her profession shines brightly in her section on ethics for the industrial nurse, and every nurse in industry should read this chapter.

Miss B. M. Slaney has helped in the revision of the chapters on the health department, records and reports, and on the treatment to be given by the nurse. Due emphasis is placed on the limits to which the nurse may go without the supervision or instructions of a doctor. There is a refreshing absence of the stereotyped photographs of health departments so often included in works of this description.

There is a great deal of useful information in this book, not least the last chapter, which contains details of organizations with which the occupational health nurse is likely to be associated or to which she can refer for help or guidance. The nurse's horizon will be widened by the further reading of the recommended list at the end of each chapter.

In the next edition—and a fourth will surely come—one hopes to see rather more than a few lines about industrial dermatitis, as much a problem and a dilemma to many nurses as are eye injuries which, deservedly, have a whole chapter by Dr. H. F. Chard. Possibly some of the specimens of record forms could be sacrificed to make more space for the discussion and treatment of dermatitis and of burns, another common and serious industrial hazard which receives only one paragraph.

But it is captious to make petty criticism of a book which contains so much information so well presented and which demonstrates so clearly the scope of the occupational health nurse. This handbook will help her to meet the increasing complexity of modern scientific, industrial, and business methods.

T. S. Scott


The contents of this book represent the proceedings of the medical and biological section of a symposium of the same name, and is the latest in a series of such symposia. The sub-committee responsible is to be congratulated on devising a comprehensive programme of contributions of a high standard. The symposium is divided into seven sections: (1) Temperature measurement and calorimetry, concerned wholly with techniques; (2) temperature effects in biological systems, with papers on comparative biological problems; it also contains an admirably simple explanation of the importance of counter-current heat exchanges in thermoregulation; (3) tissue heating and thermal sensation, dealing largely with problems concerned with radiant heat, the skin, and its nerve receptors; (4) physiological responses to heat, which first considers the responses of specific physiological systems and then whole-body responses, and includes a paper on psychological performance; (5) physiological responses to cold, in which appear papers dealing with thermoregulatory mechanisms with an emphasis on metabolic changes and hibernation; (6) hypothermia, which deals with physiological mechanisms in body cooling, methods of induction of hypothermia, and their practical value; and (7) temperature regulation, in which the predominant subject is the role of the hypothalamus in thermoregulation. The scope of the symposium is at once broad and detailed, and this book must serve as an excellent source of information on current concepts and development in thought about the responses of man and animals to their thermal environment. The time lag between the symposium and its publication, so often a source of criticism, is long at just over two years, and the cost of the book is high at £9.

A. R. LINDE


The second edition of First Aid in the Factory shows little variation from the first. One main addition is the inclusion of a comprehensive section on the 'mouth to mouth' method of artificial respiration, and the authors must be congratulated on the clarity of their description and for including the answers to some of the common questions.

The criticism of the orthodox first-aid manuals is unduly harsh; criticism might more properly have been
addressed at the teachers and examiners rather than at the content of the manuals.

It is a pity that references to the contents of pre-1960 first-aid boxes have not been omitted altogether. To mention gentian violet and other outdated contents in this edition seems quite unnecessary. The comments on pressure points and tourniquets deserve commendation and it is to be hoped that these will be adopted by the First Aid Organizations in the near future.

It would be helpful if the section on electric shock treatment was tied more closely to the recommendations on resuscitation. The mouth to mouth method is probably more deserving of special mention than a rocking stretcher, which may well not be available, and surely if it is believed that external cardiac massage is a technique suitable for use by first aiders, this is the place to draw attention to it. The description of cardiac massage is very sketchy and no mention is made of any of the dangers inherent to the method.

The accuracy of the statement 'voltages under 150-250 are not often fatal' must be queried; of 38 fatal electrical accidents in 1958, 20 were due to voltages up to 250, the majority from voltages between 200 and 250. It is usually accepted that there is a risk of electrocution above 150V, and the figures quoted by the authors may give workers a false sense of security when dealing with ordinary domestic voltage.

These are all minor points; this book continues to give an excellent background to the industrial first aider, although it is doubtful if six instruction periods are adequate.

J. R. Bowker


As a young man Haldane made the important discovery that breathing is regulated to a greater extent by carbon dioxide excess than by oxygen lack. This finding arose out of interest in the effects of overcrowding on health. It turned Haldane's attention to blackdamp which he found to contain about 12% CO₂ in nitrogen, and afterdamp, when he revealed the hazard from carbon monoxide after explosions in mines. This led him to develop oxygen breathing apparatus for rescue teams and to use small animals to monitor the atmosphere. These remarkable contributions to industrial hygiene are part of the debt we owe J. S. Haldane, the Centenary of whose birth was commemorated for the Physiological Society by a Symposium at Oxford.

The published proceedings start with a curriculum vitae, bibliography, and tribute by Professor C. G. Douglas which demonstrate the enormous range of Haldane's interest and achievement. Haldane published extensively in journals concerned with industry including Transactions of the Institute of Mining Engineers and the Journal of Hygiene, which he founded; he worked more in an industrial than academic environment and was for four years President of the Institute of Mining Engineers. These aspects of Haldane's life demonstrate the inter-relation of pure and applied science. They introduce the symposium which stemmed from his work. This was attended by 132 physiologists from 14 countries.

The bulk of the book consists of 27 papers and discussion which provide an authoritative description of control of normal breathing. Contributions on carotid glomus sensory mechanisms by Neil and Joels, arterial CO₂ and hydrogen ion as respiratory stimuli by Perkins, and papers on adaptation to high altitude seem to the reviewer to be particularly interesting; these subjects are pertinent to the regulation of breathing in patients with chronic lung disease which is not discussed.

The symposium contains hypotheses to explain the increase in ventilation on exercise, which are to some extent incompatible; it is evidence for the usefulness of the occasion that some have since been modified or restated (for example British Medical Bulletin, January 1963). Meanwhile the facts they seek to explain are summarized clearly in this account which can be recommended to all disciples of Haldane; if they are not yet interested in respiration this book should convert them.

J. E. Cotes


This is a short book based on a series of articles which appeared in The Practitioner and represents a practical approach to a group of everyday problems. The practice of rehabilitation is not itself restricted to the specialist in physical medicine, and this book is mainly directed towards the doctor interested in total patient care, but who lacks special training in rehabilitation. It is full of valuable advice for the general practitioner, industrial medical officer, hospital doctor, and all interested in problems of locomotor and physical disability. Almoners, occupational therapists, and social workers should also read this book. The most important sections are those on methods of achieving personal and domestic independence. The adaptation of simple and easily obtained apparatus, such as industrial hoists and overhead garage door tracks to enable the severely handicapped to transfer from bed to chair or bath, is clearly described and illustrated by well-chosen photographs and excellent line diagrams. All gadgets described are cheap, and work. Criticism may be directed towards the chapter on Treatment at Home, which is inadequate, and to the book's title. It would be better called Some Aspects of Rehabilitation, as it is far from being a complete outline of rehabilitation principles or rehabilitation practice. It is however a sensible book and can be strongly recommended to all interested in physical disability.

R. Harris