MEDICAL EMERGENCIES IN DENTISTRY

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This book is the collaborative work of over 50 contributors, many with maxillofacial surgery backgrounds and experience in other specific areas of medicine, science, and dentistry. It emphasizes an understanding of the etiology, anatomy, and pathogenesis of disease, as well as improved diagnosis, advanced surgical procedures, and pharmacology. The authors effectively attempt to integrate knowledge of the areas mentioned above with a wide variety of disciplines such as human physiology, pathophysiology, and internal medicine. The authors frequently acknowledge that much of the discussion is beyond the scope of the general dentist and dental student. For instance, it is doubtful that the dental student or graduate dentist would understand some of the terminology (eg, autoregulation) or diagnostics (eg, abdominal palpitation or hip fracture).

The text is divided into 4 parts. Part 1, Patient Assessment, basically lays the foundation for the management and prevention of medical emergencies. Part 2, Problem-Based Assessment, and part 3, System-Based Assessment, address the diagnosis, management, and protocols of medical emergencies by concentrating on symptoms and the implications of preexisting conditions. Part 4 discusses patients of special interest, including those who are pregnant, sedated, abused, or occupational. This section includes excellent information on herbal medications, especially those with the potential for altering hemostasis, interacting with sedatives, or causing diuresis.

The 4 parts of the book comprise 35 chapters. One chapter, “Basic Principles of Resuscitation,” focuses on airway management. As with the rest of the book, it is well illustrated, with basic concepts summarized in tables or boxes. However, I am surprised that the Combitube is discussed in detail though the laryngeal mask airway, a more easily mastered adjunct, is unmentioned. Additionally, I am unsure how practical an extensive discussion of the intraosseous administration of fluids is for the dentist, whereas the Cincinnati Stroke Scale (eg, facial droop, arm drift, and garbled speech) is a more easily mastered technique for diagnosing stroke, as is the Glasgow Coma Scale and the National Institutes of Health Stroke Scale.

The chapter “Geriatric Considerations” emphasizes the impaired reserve of most aging body systems, and it also discusses differences between dementia and delirium. Emphasis on syncope, the most common dental office emergency, is extensive. The use of the simple screening tool of the peak expiratory flow meter is nice to see, as is the in-depth discussion of steroid use by patients and its effects on the hypothalamic pituitary axis. For example, remembering that the normal adrenal cortex secretes 20 mg of cortisol per day (equivalent to 5 mg of Prednisone), it has been estimated that dental surgery can increase this to 50–150 mg during major stress. Caution is also advised when administering nitrous oxide to a patient who is taking folic acid or who has a vitamin B₁₂ deficiency.

This book is well referenced with both up-to-date and classic references, and it concludes with an extensive index. Of special benefit are the rarely taught techniques for the submental route for drug injection, the use of a spacer for administration of bronchodilators, the setting up of a simple intravenous drip, and the use of the automated external defibrillator.

Overall, this book is invaluable in its approach to prevention, recognition, and treatment of a vast array of medical emergencies, especially with its emphasis on pathophysiology. In many instances, situations discussed in the body of the text are further clarified with the use of illustrated case scenarios. As such, although it may be occasionally challenging to the average reader for which it is intended, this is an outstanding book to keep in the library of any health provider and can serve well as a daily reference.

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