
Toxicology and Clinical Pharmacology of Herbal Products is the third volume in the Forensic Science and Medicine series published by Humana Press. The title captures the goal of the book, which was to provide an objective review of the available information on the pharmacology and toxicology of commonly used herbs. This goal was met to a certain degree, but it often was lost in peripheral information that reduced the focus and impact of the book.

The book is subdivided into three parts. Part I is a brief but well-organized synopsis of some of the regulatory issues surrounding the manufacture and use of herbal products. Important aspects such as product variability are clearly outlined, and appropriate cautions and concerns are raised. Part II is composed of a series of “monographs” written about a set of 28 medicinal plants. The list was reportedly chosen because these are “the herbs that are most often encountered”. It is difficult to believe, however, that pokeweed or calamus can make that claim in today’s marketplace. Although these two plants represent ones classically considered in the toxic category and are of potential interest in such a book, they are confusingly mixed in with products that are top sellers (e.g., Echinacea and St. John’s wort) with more limited, but clearly important, potential adverse consequences.

Within each monograph, information is divided into sections, including History and Traditional Uses, Current Promoted Uses, Products Available, Pharmacologic/Toxicologic Effects, Case Reports of Toxicity, Drug Interactions, Pharmacokinetics/Toxicokinetics, Analysis of Biofluids, and Regulation or Regulatory Status. Each monograph begins with a comprehensive, often dizzying, list of botanical and common names for each plant. The “History and Traditional Uses” section is short but quite thorough and will be of interest to those wanting a historical perspective on a particular medicinal plant. The “Current Promoted Uses” section provides a perspective on how a particular plant is being used today, but it sometimes degrades into a laundry list of conditions that is not supported by the information that follows. The “Products Available” section is of questionable value. Although the problems with plant variability had been outlined in the preface, formulations of so many milligrams of a particular plant part are listed with no comment about the questionable nature of such information as it relates to actual active ingredients.

The essence of the book, the “Pharmacologic/Toxicologic Effects” sections, are somewhat variable but generally thorough, well presented, and well referenced. The “Chemical Analysis” section, another potential pillar of the book, falls short of its mark, especially for clinical chemists and other laboratory scientists. Often only one or two sentences are provided along with an obscure reference, which offers no improvement over other publications with similar brief summaries. This section, especially coupled with pharmacokinetic data, could have set this book apart, but it failed to do so in my opinion.

The “Regulatory Status” section is of most value to those interested in comparative analysis across various countries. All herbal medicines are considered dietary supplements in the US, as was stated in the Forward and Preface, so repeating that detail is not particularly illuminating. All of these sections notwithstanding, it would have been very helpful to have a summary at the end of each monograph to focus attention on issues critical to the plant under discussion.

Part III is listed in the Table of Contents as a “Summary of Toxicity and Drug Interactions”, which caught my attention as potentially very useful to practitioners and scientists alike. Unfortunately, this part consists of two pages that simply list the type of data (e.g., case report, animal data) for a particular toxicity. It is marginally useful in that it supplies a breakdown of the major site or type of toxicity of the herbal medicines covered in the book (e.g., carcinogen, hepatotoxin). The Index is not particularly helpful. Who can imagine a book about drug interactions not listing warfarin in the Index? This volume also suffers from numerous editorial shortcomings, with errors in spelling and punctuation, incomplete sentences, repeated paragraphs, and the like.

I looked forward to this book with great anticipation because of the lack of valid, timely information about the toxicity of herbal products and the observation of important interactions between herbs and drugs, other herbs, vitamins, and/or foods. Healthcare practitioners and scientists of all kinds desperately need reference materials that facilitate their decision making and can advance the study of herbal medicines in reasonable, evidence-based directions. Overall, it appeared that this book had difficulty deciding what it wanted to be. Although it is not without value, especially for the clinical pharmacology summaries, we will have to continue to wait for a focused, definitive work in the area of toxicity and interactions of herbal products.

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As an introduction to human pathology, this book succeeds admirably in its author’s intent to provide an enticement for further studies and a foundation for future professional growth. It is not a comprehensive reference book of pathology, but rather a book designed for a one-semester pathology course for stu-