
BOOK REVIEWS



THE SCIENCE OF MARIJUANA. Iversen, Leslie L. *Oxford: Oxford Press, 2000, 283 pp., \$29.95, hardcover.*

This book represents the latest entry in popular texts on cannabis, and is a well-written, inexpensive and accessible review of the important topics. After a brief but insightful foreword by Solomon Snyder, Dr. Iversen, a fellow psychopharmacologist, guides us through discussions of the plant, the pharmacology of THC, and its CNS and peripheral effects. Chapters on medical uses of cannabis, its safety issues, recreational use and future prospects follow subsequently. Iversen presents all topics, including more technical aspects of the endocannabinoids in a clear, measured narrative. In fact, one of the primary strengths of this tome is its thoughtful and well-considered moderate tone in pursuit of controversial topics.

The book is well researched and documented. The references, though not exhaustive, include important representative books and articles on selected topics. The index, in contrast, is somewhat limited.

Other criticisms worthy of mention are very few. A couple of errors rankle: a consistent misspelling of *sinsemilla* (modern term for *ganja*, the unfertilized female cannabis flowering tops, “without seed”) as “sensemilla”; multiple citations of Abel’s seminal review of cannabis history, *Marihuana: The First Twelve Thousand Years*, as published in 1943 instead of 1973. These are not substantive complaints. More importantly, the wealth of current data on the role of cannabis, endocannabinoids and synthetics on mechanisms and treatment of pain are given a more superficial discussion than this reader would desire. Some clinicians may take issue with Iversen’s contention that the

current armamentarium of anti-anxiety agents and hypnotics, particularly benzodiazepines, has rendered “obsolete” these debated indications for cannabis.

Iversen emphasizes that dangers of smoked cannabis have been exaggerated. Unfortunately, he succumbs to the traditional pitfall of Western pharmacology that dictates that marijuana merely represents a crude vehicle for THC administration. An exploration of cannabis’ other important terpenoid and flavonoid components and their interactions with the cannabinoids would be welcome. The German concept of phytochemical synergy is not applied herein to this most complicated herbal medicinal.

Lest anyone consider passing up this fine offering on the basis of these criticisms, they would be making a serious error. Iversen’s ability to present complex topics in an understandable and compelling fashion is noteworthy. It is truly refreshing to see a thorough airing of the controversies surrounding cannabis in a manner that appears free from any apparent political agenda. Rather, the scientific facts are weighed on their respective merits. In closing, *The Science of Marijuana* is a finely penned and documented effort that deserves a wide reading by scientists, clinicians, politicians and the public.

Ethan Russo, MD

HASHISH! Clarke, Robert Connell. *Los Angeles: Red Eye Press, 1998, 387 pp., \$29.95, softcover.*

Rob Clarke, a cannabis researcher with HortaPharm in Holland, and projects manager of the International Hemp Association has written an exclamatory book on hashish, that peculiar Middle Eastern crude extract of cannabis.

Clarke presents an in-depth history and analysis of the topic pertaining to its people, places and techniques. Stunning photos accompany the text, which is well-written, lively and sometimes humorous. Although this book will be of greatest interest to past and present *aficionados* of recreational cannabis, who wish to investigate the THC content of that Afghani hashish that invaded their dorm rooms in the ’70’s, there is much here of scientific value.

Clarke devotes a great deal of attention to the methods of cannabis processing including rubbing and sieving that concentrate THC and terpenoid cannabis components. A most complete analysis of water extraction techniques, and vaporization methods for smoking cannabis are also included. Medical application is treated briefly.

There is no doubt that some will see this book as subversive and exploitive, the kind of material that many federal legislators would like to render illegal. In this age where some dare to speak about “harm reduction” as applied to cannabis and other illicit drugs, however, Clarke’s treatise has much to teach clinical cannabis patients and clinicians, while offering a challenge to interested scientists to further investigate the topic.

Ethan Russo, MD