

BOOK REVIEW

Faraone, S. V., Tsuang, M. T. & Tsuang, D. W. (1999)
GENETICS OF MENTAL DISORDERS
New York: Guilford, 272 pp, ISBN: 157230-479-0
\$33 U.S.D. Hardcover, \$22 U.S.D. Paper

As the diagnosis and treatment of mental disorders become increasingly complex, so do mental health professionals' conceptualization of etiology and development. In response, the field of psychiatric genetics has been gaining more attention; not only because of the promise it holds for reducing human suffering, but also because of its mystique.

Psychiatric genetics is considered to involve a complex interplay of human genes and environmental factors that facilitate the causation and expression of mental disorders. Until now, mental health experts have been somewhat intimidated by the austere and involuted nature of genetics, but with the introduction of this text to the professional literature, there is reason to believe that the tide is turning. Co-authored by noted experts in the field of psychiatric epidemiology and genetics, this volume is a well-crafted, comprehensive, and readable primer on one of the most powerful topics in contemporary science.

The introductory chapter provides a clear definition of psychiatric genetics and its broad, clinical use in the field of mental health. The chapter effectively whets the appetite for more information on genetic research and lays the groundwork for future speculation regarding genetic technologies, measurements, and new treatments for mental illness. Divided into seven main chapters (including the introduction), the book addresses the epidemiological basis of psychiatric genetics, highlighting family, twin, and adoption studies. These chapters do a good job of answering the questions around how to separate the aspects of genetic etiology from changing environments. Other chapters explore causal and clinical heterogeneity and how different phenomena can arise from the same genetic cause, yet yield different outcomes. The authors attempt to isolate the salient factors that determine these differences in a clear and concise manner. Also discussed is how genetic spectrum disorders can be discreetly identified among the psychiatric population and the morass of sundry disorders.

Of special interest is a chapter on mathematical models of inheritance, which describes the use of the multifactoral polygenic inheritance model to explain various disorders. The concept of locating genes and the use of lineage studies to narrow the search for genetic disorders are clearly detailed.

Two subsequent chapters consider the clinical application of psychiatric genetics and what the future holds for this field. The authors present an overview of the initiation of the human genome project and how its advances have led to new technologies, such as gene location and a psychiatric genetic nosology for decreasing false negatives and false positives. The book provides a well-rounded discussion of the future of "gene therapy" in which mutant gene cells are removed and replaced with normal versions.

Finally, the important topic of ethical issues is addressed, including the potential ethical challenges that scientists and clinicians will face in the future, particularly in a field that focuses on the core features that define "the individual self."

Overall, this book is extremely well written and is organized in such a way that renders it appealing to both students and to seasoned practitioners and researchers. Given the intricacy of the

subject, the book is, perhaps necessarily, chock-full of technical terms, but the authors provide a copious glossary for quick reference. Another useful feature is the inclusion of “key points,” which are boxed under “tips to remember” and serve as prompts for important facts.

The thought-provoking nature of this book highlights new avenues for investigation into further developing the field of genetic psychiatry and epidemiology. The authors are to be commended for making a truly complex topic very palatable and enlightening. Their book is sure to stand as a pioneering text, one that should usher in a anew wave of serious exploration.

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