medicine—including the patient's view, even though to a limited extent.

Jones's book is an important work for the social history of medicine and a major contribution to the social history of Ireland, and for the history of tuberculosis it offers more than filling a gap in the research. Studying the specific Irish factors enables the reader to better understand the national perspective. Jones acknowledges that her work has not exhausted all of the questions that need to be asked—with regard to further investigations—about the experiences of Irish emigrants, rural tuberculosis, the institutions of the public health service, the sanatoria, dispensaries, and the individual experiences of the patients. But it is a very good starting point for additional research.

SYLVELYN HÄHNER-ROMBACH

Wendy Kline. Building a Better Race: Gender, Sexuality, and Eugenics from the Turn of the Century to the Baby Boom. xv+254 pp., illus., notes, bibl., index. Berkeley/Los Angeles: University of California Press, 2001. \$35 (cloth).

Since the end of World War II and the revelations of Nazi abuses based on eugenics, the term "eugenics" has evoked a more disreputable than idealistic image in both public and scientific discourse. Historians of science, however, have found that the term is chameleon-like, changing definition, purpose, scope, and values in different eras, countries, and social settings. At one extreme, eugenics is a gigantic umbrella that covers almost all social movements in which sex, gender, heredity, family planning, reproductive options, marriage, immigration, social status, and social failure are involved. It ranges from concerns about the most dependent children and adults to interest in the most successful and eminent high achievers and their roles in shaping future generations of humanity. At a more restricted level of historical interpretation, eugenics is the application of human heredity to an analysis of differential birthrates. The broader historical approach makes eugenics a more difficult target for those concerned about personal liberties. The narrower approach makes the oldline eugenics of the first half of the twentieth century a dead horse that is no cause for present worry.

Wendy Kline's *Building a Better Race* belongs to the umbrella view of eugenics and, as her subtitle reveals, deals with gender, sexuality, and eugenics from the turn of the century to the baby boom. It also focuses primarily on movements in California, a state infamous for having

carried out more compulsory sterilizations against its alleged unfit people than the rest of the United States put together. As Kline reveals, this was the consequence not primarily of a right-wing puritan view that the unfit should be sterilized but, rather, of a widely supported, progressive, middle-class view that healthy babies should be born into suitably capable families and that government should take an active role in improving the social and economic environment so as to bring that about. This raises a problem for interpreting eugenics in American society. Some of it was racist; some was bigoted and anti-Semitic; some was heavily weighted toward seeing a hereditary basis for all of society's problems; and some was scientific, based on a desire to understand what traits in humans do have a genetic underpinning. But clouding these easier components were the motivations of those introducing birth control (later, family planning), identifying deviancy, and promoting family counseling and of those perpetual critics of what constitutes ideal (or normal) male or female behavior and goals. Kline's interpretations may turn out to be exaggerated, as she mixes all these elements in her eugenic "stew," but her arguments are worth reading and she brings forward a cast of characters-including Robert Dickinson, Paul Popenoe, Lewis Terman, Ernest Gosney, and Fred Butler-to remind us that not all of American eugenics operated through the Eugenics Record Office at Cold Spring Harbor under the direction of Charles Davenport and Harry Laughlin.

Kline's book should supplement other books on eugenics to provide a more comprehensive picture of this movement and its various avatars (including its long incarnation as degeneracy theory, established well before Francis Galton gave eugenics its name). Read alone, it presents a curious picture that makes eugenics the progenitor of the baby boom (at best, I would consider Kline's evidence here tangential), the homophobia of most of the twentieth century, and the 1990s activity by the conservative Christian movement that resurrected family values as an issue for presidential debates. Whether you agree with Kline or not, she does make you think, and her book offers constant surprises by raising long-forgotten issues.

ELOF AXEL CARLSON

Judith Robinson. *Noble Conspirator: Florence S. Mahoney and the Rise of the National Institutes of Health.* 342 pp., illus., notes, index. Washington, D.C.: Francis Press, 2001. \$28 (cloth).

The rise of the National Institutes of Health (NIH) as the major patron of biomedical research in the United States after World War II is an important yet largely unexplored subject in the history of science and medicine. Not only does the NIH's remarkable growth—from one institute with an annual budget of \$3 million in 1946 to a research complex with twenty-seven institutes and centers and an annual budget of \$27 billion in 2003—deserve full historical scrutiny, but the NIH's increased role in academia, industry, and public health also merits further examination. For instance, for decades the NIH has been at the top of the list of federal agencies, including the National Science Foundation and the Department of Defense, in terms of support for academic R&D and for basic research in general. What led lawmakers and administrators to become interested in improving the nation's health through research? Who was the prime mover behind the scenes? Noble Conspirator seeks to find an answer in the life of Florence S. Mahoney (1899-2002), one of the most influential lobbyists for health causes in twentiethcentury America.

Mahoney grew up in a small town in Indiana, lived in Miami as a mother of two boys, and spent her later life as a health advocate in Washington, D.C. Judith Robinson, the author of Noble Conspirator, links these three phases of Mahoney's life in a narrative that underscores the nobility of her motives and activities. "Awakened" to the issues of health, Mahoney elected to follow a career path not usually taken by women. She first went to a booming railroad town in southern Canada to teach dance and other physical activities at a health center operated by the YWCA. She then volunteered to work in the Crippled and Disabled Hospital in New York and ran her own health studio in Miami for counseling on diet and nutrition. Mahoney's activism took an important turn after she married the general manager of the Miami Daily News, who later became its publisher. As a "newspaper wife" Mahoney had easy access to people in power—local politicians and some national figures coming to Miami Beach for vacation. The list of people she befriended in the 1940s includes Senator Claude Pepper, President Harry Truman, and the future president John F. Kennedy. Mahoney also forged a strong alliance with other health activists, such as Mary Lasker and Michael Gorman, who were dedicated to government-funded research in biomedicine and debuted as a newspaper columnist on health issues. After her divorce in 1950 Mahoney moved to the nation's capital, where she furthered an

"extraordinary inventory of acquaintances" with policymakers, scientists, and doctors. "It is probable that there is no one who has been important to health policy in Washington who has not dined . . . at Mrs. Mahoney's," observed a reporter (p. 159). Never a registered lobbyist, Mahoney developed a unique style of lobbying and advocacy through personal friendships and social gatherings. Robinson aptly contrasts Mahoney's gentle, in-the-background style with Lasker's aggressive, chart-showing approach.

One may wonder, however, to what extent Mahoney's dinner parties actually helped gain votes in Congress and how crucial her rapport with some Democratic presidents was in helping the NIH sail through political debates. To be sure, Robinson has no shortage of colorful anecdotes that illustrate the personal relations Mahoney cultivated with politicians in Washington. These stories are then followed by accounts of legislative and administrative moves that led to the increase of NIH's budget or the creation of new institutes. For example, there are instances in which Mahoney inspired congressmen to submit a bill for supporting research on specific diseases, urged the president to sign the bill despite opposition from the Budget Bureau, and persuaded the NIH director to appoint a scientist she recommended. Mahoney's efforts were deeply appreciated afterward in thank-you memos, public speeches, and personal recollections.

There is no doubt that Mahoney was an extraordinary lobbyist whose enthusiasm for biomedical research was infectious among many decision makers. But her influence should be examined and assessed within the context of the development of American science, medicine, and public health policy. For this, Robinson draws on the existing literature, particularly Stephen P. Strickland's Politics, Science, and Dread Disease (Harvard, 1972), offering very few original findings or interpretations. Robinson could usefully have paid more attention to the official records of Congress, the Public Health Service, and the NIH. It is especially disappointing that she does not seek to analyze Mahoney's activities on the advisory councils of several institutes of the NIH, on which she served as a layman for about twenty years. As is often the case in conspiracy theories, the evidence in Noble Conspirator that links Mahoney and the rise of the NIH appears circumstantial and indirect and is too much dependent on personal memories.

"Give me one breakthrough that extends human life and I'll get you all the money you want from Congress" (p. 251), Mahoney once said.

For those historians interested in further examining the role of this confident, nonprofessional, female activist in American science and medicine, *Noble Conspirator* will be a useful reference in locating a number of oral history interviews and other source materials. For the general public—its targeted audience—this book can be enjoyable reading.

BUHM SOON PARK

Brian Balmer. *Britain and Biological Warfare: Expert Advice and Science Policy, 1930–65.* 246 pp., notes, bibl., index. New York: Palgrave, 2001. \$75 (cloth).

The community of scholars and practitioners in international security is in difficult and unfamiliar territory at the present time: gone are the old Cold War certainties of the biopolar strategic standoff and the simplicities of nuclear deterrence. We live in a world in which dramatic new strategic policies are being enacted by a unipolar power and in which different weapons of mass destruction—biological weapons—that raise complex new questions will probably be increasingly deployed.

A major problem, in addition to the scientific and political complexities that require elucidation, is that we have few good accounts of previous major offensive biological weapons programs. In short, we lack understanding of the history of this aspect of biological science. Brian Balmer's book, *Britain and Biological Warfare*, provides a detailed and invaluable account of one of the key programs. It is based on many original official documents recently made available at the Public Record Office in London, and while Balmer is careful to note that not everything is yet released, it is doubtful that the main points of his analysis of the U.K. program itself will be changed in the future.

The book is subtitled Expert Advice and Science Policy, 1930–65 (official papers in the United Kingdom are subject to a standard thirty-year retention prior to potential open availability), and it provides an analysis of the complex interplay between advice and policy during the fluctuating fortunes of the program over this period: as mainly a public health hazard during the 1930s, as a search for a retaliatory weapon during World War II, as a continued search for a biological bomb during the 1940s and early 1950s, and as a gradual shift from an offensive to a defensive policy in the later 1950s. The account of each period is enriched with considerable detail from the original official sources.

It is, of course, possible to criticize such a pi-

oneering study. For example, it would have been of considerable interest to juxtapose the author's understanding, gleaned from the official records, with the views of those involved—some of whom must still be alive and perhaps open to interview. Would the civil servants and military personnel involved, and the many eminent scientists on the controlling committees, necessarily have agreed with the account derived from the minutes of many different meetings? That approach might have generated different perspectives on Balmer's main argument that "policy shifted along with the dominant conceptions of the threat in the scientific and policy arena" (p. 9).

Such reservations should not be viewed as diminishing the importance of this account of how, despite the limitations of biology at the time and the advent of nuclear weapons, an enterprise dedicated to turning medicine on its head—to using disease deliberately to cause harm—secretly continued, by a variety of means, as a major policy in a modern industrial democracy for decades. Understanding processes like this better may, we must hope, help us navigate the years ahead, when the current advances in biology may produce massive new temptations for misuse.

MALCOLM DANDO

■ Recent (1950-)

Douglas M. Surgenor. Edwin J. Cohn and the Development of Protein Chemistry: With a Detailed Account of His Work on the Fractionation of Blood During and After World War II. xx+434 pp., frontis., illus., index. Boston: Center for Blood Research, 2002. \$34.95, £23.95, €34.95 (cloth).

It has been fifty years since the death of Edwin Cohn, one of the country's most enterprising biochemists. This book, the first biography of Cohn, conveys his scientific trajectory from rather arcane chemical investigations of amino acids and peptides in the 1920s and 1930s to industrial involvement with the development of blood fractions during and after World War II. Douglas Surgenor was associated with Cohn's laboratory beginning in 1943 (when he was a doctoral student), and he devotes three-quarters of the biography to Cohn's work on blood fractions. Although Cohn's involvement with blood derivatives lasted only thirteen years, his patented plasma fractionation method has remained a point of reference in industry, research, and transfusion medicine.