

the emphasis is on control, almost to the neglect of an analysis of its conditions, especially of the penetration of the occupational world by the natural and the social sciences. But technical competence is precisely a central element in the concept of "professionalization." The neglect of this element is due to the fact that the author focuses exclusively on skilled occupations in Germany. The question of the applicability of the "professionalization" approach to the analysis of the German occupational structure is, therefore, still an open one; it has to be answered by considering the processes of change in other occupational strata too.

Game Theory in the Behavioral Sciences. Edited by I. R. Buchler and H. G. Nutini. Pittsburgh: University of Pittsburgh Press, 1969. Pp. xiii+268. \$8.95.

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Government funding agencies, together with the academic reward system, do not seem to admit the possibility of useful conferences which end on their last day. And so we are confronted with volumes, such as this one, which solemnize miscellaneous thoughts, opinions, and the beginnings of analyses which naturally occur when a field—in this case, anthropology—is first trying on some new ideas from other fields—in this case, mainly graph, game, programming, and decision theories. Such papers are appropriate to a conference and to self-destroying dittoed materials, but they generally do not warrant widespread and archival distribution without careful refereeing, which is not often done. The conference that gave rise to this volume was held at McGill University in 1966; it had a similar title which, you will note, describes the mathematical ideas much too narrowly and the substance much too broadly.

The book has three parts: part 1, on "Applications" (presumably of game theory), has six chapters; part 2, on "Experimental Games" (which is the only real justification for not restricting the title to anthropology), has two; and part 3, on "Applications of Related Approaches," has four. The last two chapters of part 1, B. Lieberman's "Combining Individual Preferences into a Social Choice" and R. Kozelka's "A Bayesian Approach to Jamaican Fishing," actually belong in part 3. All of the "applications" chapters are better described as analyses that have been influenced by decision-theoretic thinking—by such notions as strategies, payoffs, interlocking control, coalition formation—since virtually no result of any mathematical theory is really applied to anything. In the few cases where it looks as though an application is immanent, one is frustrated that the final calculations are not made (e.g., the linear programming analyses suggested by H. Hoffman, chap. 9, and in a curiously disjointed and unclear article by I. R. Buchler and R. M. McKinlay, chap. 10).

For me the best articles are T. C. Schelling, as always lucid and clever, exploring possible insights game theory may provide into ethical systems; the informal strategic reanalysis by R. F. Salisbury of the social role played

by the 22-level shell currency of Rossel Island; A. Rapoport and A. M. Chamamah's careful experimental study of repeated play of the game "chicken" and the comparison of these results with their earlier ones on the "prisoner's dilemma"; and the very neat analysis by J. Atkins and L. Curtis of the conditions that must be met for a wedding to occur in the Tenejapa culture.

Aside from Rapoport and Schelling, none of the authors is (and none professes to be) an expert in the mathematical theories being discussed, and so it is not surprising that some misleading statements have crept in. Examples: "But once we know the goals, knowledge of the strategies is already in hand and game theory has nothing to offer us" (p. 66). "We must remember also that in game theory, the goals of the contestants must be the same, or must be such that the gain for one can be expressed as the negative of the gain for another" (p. 68). The description of linear programming on page 198 suggests that the direction of the inequalities is independent of whether the objective function is to be minimized or maximized.

It is vexing that, in a 1969 volume for nonexperts, the latest reference in M. Shubik's partially annotated bibliography on game theory and related matters is 1962 (an apparent 1964 exception, a W. Edwards paper, was actually published in 1954).

Smoking, Health, and Behavior. Edited by Edgar F. Borgatta and Robert R. Evans. Chicago: Aldine Publishing Co., 1968. Pp. xii+288. \$10.75.

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This book is an excellent critical review of current research and public policy on the relationship between smoking and health. It is comprised of twenty-one chapters which are based in large part on papers and reports presented at the 1967 National Research Conference on Smoking and Health, held at the University of Wisconsin, Madison. It presents a comprehensive and well-integrated introduction to the health consequences of smoking, to theory and research on the social and psychological causes of cigarette smoking, and to the political and social policy implications of the smoking and health problem. *Smoking, Health, and Behavior* is required reading for those interested in current research on cigarette smoking, and in the relationship between smoking and health.

Part 1 presents five chapters on smoking and health. The first, "Some Notes on the History of Tobacco Use," by Edgar Borgatta, briefly traces the history of the use of tobacco for chewing and smoking. Daniel Horn's, "Some Factors in Smoking and Its Cessation," describes several accounting schemes that have been used in recent research on smoking and its cessation. Joan Guilford's, "Smoking and Health—Revisited," reviews and evaluates some of the evidence for smoking and disease linkages. She concludes (p. 38): "Cigarette smoking is positively associated with lung cancer and that the greater the amount of cigarettes smoked, the greater is the probability of dying from almost all causes." David R. Hardy, a lawyer