The latter portion of the volume deals with more general aspects of health services from a geographical-cartographical standpoint, such as the spread of epidemics (tuberculosis, AIDS) and the use of geographical databases to provide epidemiological information and to aid in epidemiological evaluation (for example, mapping cancer mortality through the United States, not just in South Carolina, as a tool for researching the spread of the disease and its spatial distribution).

The book's summary offers up-to-date information on computerized tools, software, and geographical data centers that can be of use to the scholar who wishes to obtain additional information or to employ the geographical methodology presented in his/her own research.

While the book's introduction states that it is intended for politicians and administrators of health services, I believe the contents will be most useful as an additional tool for academics, particularly epidemiologists and scholars of health services. Health policy-makers and health system administrators will undoubtedly find the cartographic aspects of the studies useful in formulating policy or explaining changes and trends, though not as a tool for daily use as presented in the volume. While the authors do not state so, their book should be recommended to students who are planning research in health services and epidemiology. The volume can provide students with ideas and ways to organize their research papers and present their findings in a clear and illustrative manner. It is recommended particularly to students researching health care services in border regions and rural areas, such as Israel's Negev.

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FLOODPLAIN PROCESSES by Malcolm G. Anderson, Des E. Walling, and Paul D. Bates. Chichester: John Wiley and Sons, 1996.

This is yet another welcome addition to the manifold array of books edited by British geomorphologists and published by Wiley. The subject matter, floodplain processes, is relatively modern, as the references seldom predate 1980. The book's 19 chapters are assembled in four sections as follows: floodplain evolution (3 chapters), hydrologic modeling (6), sediment and water quality (4), and management of the floodplain environment (5). This unequal distribution of topics demonstrates that the volume has much more to present on hydrology, hydraulics and management than on the classical geomorphological theme of evolution.

The chapter by Howard in the first section treats channel evolution and floodpain morphology theoretically, as that author has done during the past quarter century. Howard utilizes computer techniques such as random walk models, and also more novel ones, while considering bank vs. bed erodibility, types of cutoffs, and oxbow lake plugs. Some of these spatial heterogeneities are applied to high energy, braided, large spatial domain and mainly meandering river systems. Overbank sedimenta-

tion is modelled by Mariott, demonstrating yet again that deposit thickness and texture decrease bankwards. Paleoenvironments are a hot issue, but Brown's treatment is unfortunately rather dull. For the novice, it includes a section on floodplain biogeomorphology and a bit on ecological processes, incorporating somewhat more material on paleoecology—macro and microfossils, snails and paleohabitats. With the exception of some of Howard's treatment, this first section on evolution is not enticing reading.

Hydrologic and hydraulic models of floodplain compound flows are considered in more detail in the second section, beginning with a chapter by Hervouet and Van Haren on recent advances in numerical methods for calculating fluid flows. Some of the titles in this section are inappropriate. For example, Bates et al. write 'An Analysis and Development of Hydraulic models for floodplain flows', but the chapter is merely an example, albeit an interesting one, of the application of the TELEMAC-2D model, a two dimensional finite element model for flow in a compound channel. It is coupled with a very simple hydrologic model representing surface infiltration, in an attempt to predict floodplain water levels. Sellin and Willetts present a discussion discriminating between natural and artificial compound, multistage channels. They used the U.K. Flood Channel Facility (FCF) to measure velocity fields with and without bank vegetation. The results, compared with prototype measurements in the River Roding and Blackwater, appear to be site specific. Younis' chapter on 'Progress in Turbulence Modelling for Open Channel Flows' is not of direct relevance to floodplains. Compound channels are related by the author to single channels, demonstrating that cross sectional variations in bed shear stress, discharge, and velocity contours are in sympathy with current studies, such as those by Rodi, Naot, and Nakagawa. Romanowicz et al. conclude this section by using Generalized Likelihood Uncertainty Estimation (GLUE) to determine the ranges of flow levels, the model calibrated for a reach of the Culm river. The novelty here is the use of a range of several parameters, rather than attempting to define single, exact parameters.

In the third section there are four chapters on sediment and water quality. Walling et al. have contributed an excellent chapter on the problem of suspended sediment and floodplains. They explain the four methods used to calculate suspended sediment rates in floodplains, the last based on dating sediment with radionuclides. This is their forte, and they fittingly explain the use of caesium and unsupported lead with site examples in the Stour and Culm rivers. They also note the difference between the size distribution of overbank floodbank deposits (effective vs. ultimate sizes). The authors add a very simplified numerical model of overbank suspended sediment deposition, concluding with a careful summary and suggested solutions to the remaining unanswered questions. Macklin uses previous literature to describe the four processes which heavy metals undergo: hydraulic sorting, sorption/desorption, mixing processes and floodplain processes. His is a good review, not dissimilar to previous ones, with various examples showing the downstream decrease of heavy metals (Pb, Zn and Cd).

The last section of the book deals with management strategies. It begins with Penning-Roswell and Tunsdall's 'Risks and Resources Defining and Managing the Floodplain'. The merit of this contribution is that it contains a comparison of floodplain management strategies in the U.K., France, U.S.A., the Netherlands, Australia, and Argentina. Brooke's account of floodplain restoration and rehabilitation in the next chapter is also worthy reading. Two disappointing contributions which give little to the reader are Petts' 'Sustaining the Ecological Integrity of Large Floodplain Rivers', and Jolly's 'The Effects of River Management on the Hydrology and Hydroecology of Arid and Semiarid Floodplains'. The final chapter (Richards et al.) is an enigma. The authors worked in the Isore and Drac rivers in the Rhone Basin, using tensiometer transects to study the response of early woody riparian successional species to moisture conditions. They also applied a numerical simulation to evaluate water level and soil moisture levels. How this study may be utilized as a tool for managing water across floodplains is not explained.

In sum, this edited book has contributions that vary widely in quality, but on the whole it is a valuable addition to the literature and to libraries.

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