

of how international agreements may potentially end up conflicting with core societal values or beliefs. The *sui generis* clause in the TRIPS agreement stipulates that countries do not have to accept patents on plant varieties, but have to devise their own systems of protection of intellectual property. The book underlines the difficulties for developing countries of doing so, and the pressures on them to adopt stringent IPR legislation, for example through the inclusion of such provisions in bilateral FTAs. On the balance of power between the CBD and TRIPS, the book reminds us that enforceability of international instruments is key to understanding how well they are applied. WTO (and FTAs) have built-in enforcement and sanction mechanisms; the CBD has none. As a result, in practice, WTO-related rules such as TRIPS tend to have predominance over UN Conventions such as the CBD. Lastly, the book shows how FTAs signed between the United States (US) or the European Union (EU) and individual developing countries proceed from a deliberate tactic, often requiring from their signatories more concessions on IPRs in agriculture than multilateral agreements would (the so-called “TRIPS-plus” commitments), and effectively resulting in drastically reducing the room for manoeuvre of developing countries and undermining their position in ongoing international discussions. Requirements to join UPOV or to introduce patent protection for plants, animals and biotechnological inventions, as well as stipulation that access to genetic resources be handled through individual contracts (as opposed to binding, across-the-board disclosure requirements put forward by developing countries in international fora), are common provisions of these trade agreements.

Also discussed in the book are issues such as the protection of traditional knowledge applied to plants. The authors show how the inclusion of these discussions within a dedicated group of discussions under the aegis of WIPO has, for the time being, delivered no concrete results.

The perspective adopted by the book is consciously focused on the imbalance of power and capacity between developed countries and their multinational firms on the one hand, and developing countries on the other hand. The authors look uncompromisingly at the pressures of all kinds that developing countries may face in international negotiations, as well as at the critical gap between the financial, technical and legal firepower of developed country delegations and the limited means of developing countries when it comes to discussing negotiating texts and mobilizing support.

The book also invites the reader to question the position of certain organizations serving as negotiating fora on IPR issues. For example, the book adopts a somewhat hard stance vis-à-vis the WIPO, stating that the agency still leans towards its former mandate to promote the interests of IPR holders and has to pay more attention to its UN-related mandate of taking “appropriate action ... to accelerate economic, social and cultural development”. The book also suggests that, as a main provider of technical assistance delivered on behalf of WTO through the “Cooperation for Development Programme”, WIPO has not done a good job of providing developing countries with an unbiased perspective on how they might deal with IPR issues, promoting instead the TRIPS model as the best route to the adaptation of legal systems.

The resolutely developing country perspective of the book will probably draw some fire from certain quarters and make the book a subject of debate. However, for that same reason the book will be a precious resource for all those whose job is to consider the economic implications of the legal technicalities of IPRs in agriculture for the global food system. In developing countries, the book will be particularly useful to all actors having a stake in the evolution of future trade agreements and other IPR-related negotiations and who do not have the luxury of being able to hire specialized lawyers, such as many NGOs, academics in various

sectors, and the public at large. In developed countries, the book should be an eye-opener for actors, individuals and NGOs alike, preoccupied about the fairness of the development process but who do not have a chance of being directly involved in the negotiation of multilateral and bilateral agreements.

To summarize, the book constitutes a practical tool that should make it an indispensable reference for development practitioners working on global and local agricultural issues.

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Environmental History of Water

Petri S. Juuti, Tapio S. Katko and Heikki S. Vuorinen (editors)

IWA Publishing: London, 2007, 629 pages.

The *Environmental History of Water* edited by Petri S. Juuti, Tapio S. Katko and Heikki S. Vuorinen is an impressive and important work. This environmental history is not occupied with climate change, but with peoples’ actual physical environment or the lack of a proper and healthy environment in their daily lives; namely water supply and sanitation. In today’s world where there are more than 6 billion people, it is estimated that over 1.5 billion people lack access to safe water supplies and that 2.5 billions lack adequate sanitation. The consequence is that some 10,000 people die each day of water borne diseases like malaria, dysentery, cholera and various diarrhoeal diseases. In 2025 it is estimated that the global population will be around 8 billion. Consequently, the future challenges for humans and humanity are closely related to water supply and sanitation. In this context, does an environmental history of water matter?

On the one hand, the answer is ‘no’ because their conclusion is, in accordance

with the UN *World Water Development Report 2003*, that ‘the water crisis is largely a crisis of governance’ (p. 597), and a single book can hardly help this situation. On the other hand, the answer is ‘yes’ because through detailed, empirical and historical analyses of case studies throughout the world, successful and unsuccessful implementations and projects are discussed. Their most intriguing and frustrating conclusion is that there are some structural similarities where the water supply and sanitation has failed despite time and cultural differences, thus it is possible to learn from the past with regards to present and future water challenges and governance. Still, as opposed to aid organizations’ reports with operational goals for future developments, each chapter is a scholarly work which can be read separately just as a culture historical analysis, but since all people at all times have had to solve the same problems — adequate water supply and sewerage systems — there are also lessons to be learnt and implications for the future.

Apart from an overall introduction and an epilogue, the book has 39 chapters and it is divided into five parts: Early systems and innovations; Periods of slow development; Modern urban infrastructure; Expanding rural water supplies in historical perspective: six cases from Finland to South Africa; and Future challenges in water supply and sanitation services and environmental health. Each of the parts has an introduction and a conclusion which makes the book well organised and easy to read.

The case studies do not focus on the major capitals and European cities, but rather smaller cities, townships, urban centres and rural areas in the countries, in alphabetical order, Argentina, Brazil, Chile, Egypt, England, Finland, France, Gibraltar, Hungary, Italy, Japan, Kenya, Latvia, Mexico, Nepal, New Zealand, Nigeria, Senegal, South Africa, Tanzania, USA, Uzbekistan and Yemen. With this global approach following the first water supply systems and sanitation from 10,000 years ago to modern

times, the book covers not only an important part of an often untold chapter of world history, but with its ‘bottom-up’ perspective it is also a social history of those who have suffered most from inadequate water supply and sanitation: the poor. Hence, the history of water supply and sanitation, from its earliest times through the Roman Empire to the devolving ideas of health and water-borne diseases and urban planning, is on its own a highly interesting history worth reading.

The essence of the book can be summed up by two quotes which are referred to: ‘Water is Life; Sanitation is Dignity’ and ‘Bad water management is worse than losing a war’. But what is good water management? Throughout the various chapters there are a couple of themes which reoccur. First, long-term stability and planning. The most successful implementations of water supply and sanitation had at least visions that they should work for a century or more, and the only agency committed to such long investments, apart from for instance in France, has been the public sector. This conclusion relates directly to the debate on whether water is a commodity or for the commons where private enterprises may gain short-term profits from long-term challenges and needs. Second, in a plural and cultural diverse world, the water needs and demands are culture-specific and the best solutions are based on local initiatives and knowledge which have gradually expanded. Thus, although in metropolises ‘top-down’ approaches have to be applied, in less densely populated areas ‘bottom-up’ approaches in combination with governmental initiatives have been the most successful.

Not all the chapters have a clear future prospective and implications which can be learnt from the past, without that being a criticism of the *Environmental History of Water*, which first and foremost is a scholarly work. Nevertheless, this volume has more potential consequences for future developments and planning than most other historic books.

Despite all its strengths, in such a major undertaking as this there will obviously be some chapters which are shorter, weaker and not as in depth as others, and this volume is no exception. Lastly, an aspect that reduces the general impression of this work is the quality of the pictures and the illustrations, which in some cases are so low that many pictures would have been better left out.

That being said, it reduces not the overall importance and impression of this book, because the *Environmental History of Water* highlights the importance of water studies both as an academic discipline which emphasises some of the most important, but often neglected, structures at work in history, and in this case, water supply and sanitation which has mattered for all humans throughout history. Moreover, as this study shows, the solutions to future challenges can be found in historical analyses, thus uniting the past with the present and the future. In this regard the *Environmental History of Water* is an example for other studies.

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Sustainable Development in Water-Stressed Countries

A Quantitative Policy Analysis

Satoshi Kojima

Edward Elgar Publishing: Cheltenham,
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The stated purpose of *Sustainable Development in Water-Stressed Countries* is to expose how quantitative analytical tools can be used to study sustainable development in developing countries. The book, based on Kojima’s thesis, actually presents in great detail a particular model developed for Morocco, which the author argues can be adapted for use in other developing countries. Kojima’s view on sustainable development