classification of wheat, explores the biochemical and molecular basis for grain quality and finishes with a review of the US marketing and price discovery system.

The book is a sound reference source for academics, students, breeders and professionals in the wheat industry. It leaves the reader reflecting on the view of the contributors Baenziger and DePauw that "Wheat breeding... will remain a profession that is filled with the joy and satisfaction of creating new cultivars that can change human lives for the better."

Frank Curtis

Expl Agric. (2010), volume 46 (1), © Cambridge University Press 2009 doi:10.1017/S0014479709990664

Rainfed Agriculture: Unlocking the Potential. Comprehensive Assessment of Water Management in Agriculture Series 7. Edited by S. P. Wani, J. Rockstrom and T. Owels. Wallingford, UK: CABI (2009), pp. 310, £85.00. ISBN 978-1-84593-389-0.

The introduction of this book states that water is an important driver to achieve four of the Millennium Development Goals. Using this argument, the book focuses on the challenges of how to deal with extreme rainfall variability in the semi-arid tropics (SAT) for the benefit of agriculture, mainly cereal production.

For those who wish to be apprised of the current thinking and practice in the capture of rainfall, and its use as supplemental irrigation for rainfed crops, with emphasis on the SAT of West and South Asia and North Africa, then this is the ideal up-to-date source. The book deserves to be browsed chapter by chapter, although as with most edited texts, the quality and relevance of chapters vary enormously. For the reader wishing to read cover to cover, verbatim duplication between and within chapters and of the repetitions of justification for, and the outcomes of, the research will become tedious. Principles grounded in one area are likely to be similar in another. Major detractions are: from an environmental perspective, the lack of discussion of negative impacts on wildlife due to impounding of overland water flows; from a social perspective, absence of discussion on the impact of reduced availability of water for domestic usage; and from a geographic perspective, the missing yet relevant deliberations from the American and Australian continents.

Notwithstanding these, the book presents important contributions towards a more efficient capture and use of rainfall, with a major focus on engineering and agronomic practices, but also elaborating on the necessary genetic enhancement.

David Midmore

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Agriculture at a Crossroads: Synthesis Report of the International Assessment of Agricultural Knowledge, Science, and Technology for Development (IAASTD). Edited by B. D. McIntyre, H. R. Herren, J. Wakhungu and R. T. Watson. Washington, DC: Island Press (2008), pp. 95, US\$20.00. ISBN 978-1-59726-550-8.

This cross-cutting Synthesis Report builds upon the Global and Sub-Global reports of IAASTD that provide evidence for the integrated analysis of the main concerns necessary to achieve development and sustainability goals. The first part of the Report identifies the current conditions, challenges and options for action that shape agricultural knowledge, science and technology (AKST), while the second part focuses on eight cross-cutting popular themes.

IAASTD responds to the realization that the significant scientific and technological achievement in our ability to increase agricultural productivity has come with some unacceptable social and environmental consequences. The IAASTD process concludes that given the challenges we confront today, the current AKST model required revision. Given that the mounting crisis in food security and sustainability is of a different complexity and potentially different magnitude to that of the 1960s, business as usual is no longer an option.

The IAASTD process makes a unique and significant contribution to our understanding of what has been going on in the AKST sector internationally during the recent decades. However, the proposed options for action would have been more convincing had the process been linked to the World Development Report 2008/09 process with which it overlapped. Equally, the AKST sector would have gained much from the