

CLIMATE ADAPTATION FUTURES

Edited by Jean Palutikof, Sarah L. Boulter,
Andrew J. Ash, Mark Stafford Smith, Martin Parry,
Marie Waschka and Daniela Guitart



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Preface

As I write this preface, the media is full of accounts of the record-breaking floods in southern Russia, and the record-breaking heatwave in the eastern USA, made worse for many by the power blackouts caused by earlier severe storms. Climate scientists tell us that they cannot unequivocally state that these extremes are caused by climate change but, nevertheless, this is how it begins - with more frequent and more severe extremes, as well as with a gradual increase in temperature and a shift in rainfall patterns. This book sets out to explore some of the challenges that we will all face over the coming decades as we seek to adapt to changing climatic conditions.

It arises out of an international conference on adaptation held on the Gold Coast, Queensland, in June 2012. I had grown weary of the many conferences I had attended on climate modelling which had a day for impacts and adaptation presentations as justification for the large expenditure incurred by the modellers. So, in a new job, in a new organisation, there was the will and the capacity to hold a large international conference dedicated entirely and exclusively to adaptation - a small window of opportunity before we would be overwhelmed by the day-to-day activities of the National Climate Change Adaptation Research Facility (NCCARF, www.nccarf.edu.au). But of course, a new organisation doesn't have the reputation and standing to pull in the crowds - enter the CSIRO Climate Adaptation Flagship (www.csiro.au/ca). So, a natural alliance was formed to hold the conference, which was a grand success, with over 1000 participants from some 50 countries.

This book emerged from the conference, but it has grown to be much more than a straightforward proceedings. Rather, it is a picture of the state of adaptation science built up over the two years since the conference, opening with an in-depth chapter laying out the five challenges of adaptation, followed by 39 chapters/case studies collected into nine sections, which cover the whole spectrum from adapting ecosystems and agriculture through to communication of adaptation knowledge and the intersection of adaptation with issues of poverty, equity, development and sustainability. Ninety authors contributed to the book from 18 countries.

My co-editors are, with one exception, from NCCARF (Sarah Boulter, Marie Waschka and Daniela Guitart) and the CSIRO Climate Adaptation Flagship (Andrew Ash and Mark Stafford Smith). The exception is Martin Parry, who was the Co-Chair of the Intergovernmental Panel on Climate Change Working Group II Fourth Assessment when I was the Head of the Technical Support Unit. I thank these friends and colleagues for their support and commitment to the completion of this book - without them it could not have happened.

Jean Palutikof, NCCARF, Gold Coast
July 2012

Section 1

Introduction