



Malawi Government  
Ministry of Natural Resources, Energy and Environment



# Malawi State of Environment and Outlook Report

Environment for Sustainable Economic Growth

2010







Malawi Government  
Ministry of Natural Resources, Energy and Environment

# Malawi State of Environment and Outlook Report

## Environment for Sustainable Economic Growth

2010

Environmental Affairs Department  
Private Bag 394,  
Lilongwe 3, Malawi.  
Tel: (265) 01 771 111 Fax (265) 01 773 379  
URL: <http://www.nccpmw.org>

Copyright ©2010 by Environmental Affairs Department  
© Boxes, Figures, Tables, Maps as specified.

ISBN 978-99960-21-00-8

All rights reserved. No part of this publication may be reproduced, stored in a retrieval system, or transmitted in any form or by any means, electronic, mechanical, photocopying, recording, or otherwise, except for educational purposes, without the prior permission of the Director of Environmental Affairs.

Front and Back Cover Photographs by Subin Sebastian

Available in book form in English (2010)

Supported by UNEP and UNDP under the Malawi Poverty and Environment Initiative  
Printed by UNEP in Nairobi

## Foreword



Malawi's economic development and the livelihoods of its population are largely dependent on natural resources. In order for the country to experience sustainable economic growth and alleviate poverty, Malawi must conserve its valuable environmental resources. Hence, the Malawi Government has taken various measures to safeguard the country's natural resource base. These include, inter alia, the enactment of the Environmental Management Act of 1996; the Forestry Policy of 1996; the Land Policy of 2002; the Water and Sanitation Policy of 2005; and the Biodiversity Strategy and Action Plan of 2008.

Despite these efforts, the degradation of natural resources continues to be a major threat to the social and economic development of Malawi. Malawi's high population density and the dependence of Malawians on agricultural production in the absence of other economic opportunities have led to alarming rates of environmental degradation. The result has been deforestation; decreasing soil fertility and increasing erosion; water depletion, loss of biodiversity; and increasing pollution. These poor environmental conditions are exacerbated by poverty: in order to subsist, a high proportion of the population relies on the exploitation of natural resources such as firewood and fish stocks.

The State of the Environment and Outlook Report 2010 aims to address these challenges in three ways. First, the report provides a knowledge resource for researchers and the general public. Secondly, it serves as a baseline for monitoring trends in environmental change in Malawi. Finally, and most importantly, the report is intended to inform policy-makers about the challenges facing Malawi; outline possible future scenarios for the environment and development; and provide policy recommendations to support the country's sustainable growth.

The 2010 Report is the culmination of an existing process of environmental reporting in the country. Since the passing of the Environment Management Act in 1996, districts have produced State of the Environment reports biannually. These reports have allowed the government to effectively target resource allocation through the development of relevant environmental action plans and environmental micro-projects. It is hoped that the State of the Environment and Outlook Report will increase awareness of environment and natural resources, and encourage effective resource allocation for sustainable development at the local and national levels. It will also enhance Malawi's participation in various inter-regional and international programmes and fora.

I would like to extend my thanks and appreciation to the United Nations Development Programme and United Nations Environmental Programme for supporting the report's development through the Poverty and Environment Initiative. My thanks also go to Leadership for the Environment and Development - Southern and Eastern Africa (LEAD SEA) and CEDRESSA for compiling the report. In addition, I would like to thank all those who made contributions to the report in various ways.

A handwritten signature in black ink.

Grain W. Malunga, M.P.  
Minister of Natural Resources, Energy, and Environment



## Preface



Malawi's continued economic and human development depends highly on the state of the country's environmental resources. In order for Malawians to make informed decisions about their development path, it is necessary to be able to continually assess the health of the natural resources that sustain the country. State of the Environment and Outlook Reports (SEOR) provide a key mechanism for so doing. The purpose of the SEOR is to inform and influence policy and planning processes – such as the implementation of the Malawi Growth and Development Strategy and the Millennium Development Goals— regarding issues of sustainable natural resources management.

The report uses a thematic approach, evaluating a broad range of factors that influence environmental change in Malawi. Themes such as land and agriculture, forestry and woodlands, biodiversity and water resources were assessed using the scientifically valid and well-regarded Integrated Environmental Assessment (IEA) approach. It is crucial for Malawi's policymakers to be able to anticipate how economic and population pressures will affect future development, and as such the 2010 State of the Environment and Outlook report also contains an "Outlook" component, which explores future options for the country's natural resources using scenarios. These scenarios are based on existing scientific knowledge, but adopt different assumptions about how critical uncertainties will unfold, in order to show the range of environmental situations that Malawi may face. The Outlook also assesses existing policy instruments and policy gaps in environmental management, in order to identify appropriate actions policymakers can take to support sustainable development.

The 2010 State of the Environment and Outlook was developed through a participatory and consultative approach. Stakeholders from the government, nongovernmental organizations, civil society, and research institutions were consulted throughout the process, and contributed to the selection of themes, development of scenarios and policy analysis, drafting process, and final analysis. As such, the 2010 SEOR is owned by a range of key stakeholders who have the ability to transform Malawi's environmental management and direct the country towards a sustainable future.

I am deeply grateful for the support of the UNDP and UNEP, which made the development of the 2010 SEOR possible while contributing to the expansion of our national capacity in environmental reporting.

A handwritten signature in black ink, appearing to read 'Ben Botolo', written in a cursive style.

Ben Botolo  
Principal Secretary of Natural Resources,  
Energy and Environment

# Table of Contents

Foreword.....	iii
Preface.....	iv
Integrated Environmental Assessment in Malawi .....	xii
Editorial and Production Team .....	xiv
Authors .....	xv
Acknowledgements.....	xvi
List of Acronyms and Abbreviations.....	xviii
<b>PART 1 - ENVIRONMENT, PEOPLE AND DEVELOPMENT.....</b>	<b>1</b>
CHAPTER 1 - ENVIRONMENT AND ECONOMIC DEVELOPMENT .....	3
1.1 Introduction .....	4
1.2 Size and Structure of the Economy .....	4
1.2.1 The Economy of Malawi .....	5
1.3 Incidence and Distribution of Poverty .....	6
1.4 Causes of Poverty .....	6
1.5 Economic Development and Strategies .....	7
1.5.1 The Growth of the Economy .....	7
1.5.2 Employment Expansion .....	7
1.5.3 The Budget and the Environment .....	8
1.5.4 The Malawi Growth and Development Strategy (MGDS) .....	8
1.5.5 Millennium Development Goals (MDGs) .....	11
1.6 Threats to the Environment .....	12
1.6.1 The Global Financial and Economic Crisis .....	12
1.6.2 Poverty and the Environment .....	13
1.6.3 Inflation and the Environment .....	13
1.6.4 Aggregate Income and Demand .....	14
1.7 The Impact of Environmental Degradation .....	14
1.7.1 Environment and Economic Growth .....	14
1.7.2 Environment and National Savings .....	15
1.8 Policy Responses and Recommendations .....	16
1.9 References .....	23
CHAPTER 2 - POPULATION AND HUMAN SETTLEMENTS .....	25
2.1 Introduction .....	26
2.1.1 Population Characteristics in Malawi .....	26
2.1.2 Urbanization .....	26
2.2 The State of Human Settlements in Malawi .....	27
2.2.1 Household and Housing Characteristics in Malawi .....	27
2.2.2 Poor Quality Housing and Unplanned Settlements .....	27
2.2.3 Housing Tenure and Occupancy .....	28
2.2.4 Environmental Degradation .....	29
2.2.5 Safety of Housing .....	29
2.2.6 Urban Agriculture .....	30
2.2.7 Government Initiatives .....	32

2.3	Water Supply, Sanitation and Waste Management in Human Settlements .....	33
2.3.1	Access to Safe Water .....	33
2.3.2	Sanitation and Hygiene .....	33
2.3.3	Waste Management .....	33
2.3.4	Responses .....	34
2.4	Transport Infrastructure and Human Settlements .....	35
2.4.1	Key Concerns for Transport Infrastructure .....	35
2.4.2	Transportation Challenges .....	37
2.4.3	Transportation, Health and the Environment .....	39
2.4.4	Interventions and Policy Options .....	40
2.5	Conclusion .....	41
2.6	Recommendations .....	41
2.7	References .....	44
CHAPTER 3 - ENERGY, INDUSTRY AND MINING .....		47
3.1	Introduction .....	48
3.2	Overview of the Energy, Industry and Mining Sectors in Malawi .....	48
3.2.1	Energy Resources.....	48
3.2.2	The Industry Sector .....	51
3.2.3	Mining Activities in Malawi .....	52
3.2.4	Minimizing Pollution Associated with Mining, Energy and Industrial Activities .....	54
3.2.5	Minimizing Social Impacts Associated with Mining, Energy and Industrial Developments .....	54
3.3	Opportunities Provided by Energy, Industry and Mining Sources .....	55
3.4	Strategies for Promoting Industrial, Energy and Mining Development in Malawi .....	56
3.4.1	Promoting Alternative Energy Sources .....	56
3.4.2	Diversification of Hydropower Resources and Electricity Sources.....	56
3.4.3	Improving Quality of Industrial Products .....	56
3.4.4	Lobbying and Advocacy .....	56
3.4.5	Improving Energy, Industrial and Mining Human and Infrastructure Capacity .....	56
3.4.6	Promoting Public Private Partnerships (PPPs) .....	57
3.5	Challenges Facing the Industrial, Energy and Mining Sectors in Malawi .....	57
3.5.1	Contributing to Reduced Deforestation .....	57
3.5.2	Inadequate and Unreliable Power Supply .....	57
3.5.3	Strengthening, Institutional and Human Capacities for Improved Coordination and Enforcement	57
3.5.4	Inadequate and Unharmonised Investment Policies .....	57

预览已结束，完整报告链接和二维码如下：

[https://www.yunbaogao.cn/report/index/report?reportId=5\\_9993](https://www.yunbaogao.cn/report/index/report?reportId=5_9993)

