

CSIR Report Number: CSIR/NRE/ECO/ER/2007/0098/C

# FYNBOS FIRE-RELATED REFERENCES ADDED TO THE FYNBOS i-FORUM BIBLIOGRAPHY DATABASE

*Prepared for:*



*Prepared by:*

M.R. Levendal and G.G Forsyth  
CSIR:  
Natural Resources  
and the Environment  
Stellenbosch



*June 2007*



# Contents

---

1.	<u>INTRODUCTION</u>	2
2.	<u>APPROACH</u>	2
3.	<u>RECOMMENDATION</u>	3
4.	<u>ACKNOWLEDGEMENTS</u>	3

Appendix 1

Fynbos Fire-Related References added to the Fynbos i-Forum Bibliography Database

---

## 1. INTRODUCTION

The document has been prepared for the Fire Management Data Project Task Team as a record of the process followed in updating fire ecology and management related references in the Fynbos i-Forum Bibliography Database.

This work was undertaken to meet the requirements of Output 4 of Phase 2 of the C.A.P.E Programme's Fire Management Data Project funded by the Global Environment Facility (GEF) through the World Bank.

Output 4 required of us to conduct a survey of all relevant literature on fynbos fire ecology, and any literature which may have a bearing on the management of the fires within the Cape Floristic Kingdom.

Our terms of reference called for the following: "A complete bibliography should be prepared whereby literature can be retrieved in accordance to relevant key words, as well as authors and publishers. The location of the material should be identified. The bibliography should be prepared in a digital format to specifications provided by the Librarian Niven Library FitzPatrick Institute, University of Cape Town and incorporated in the C.A.P.E. Fynbos i-Forum bibliographic database. The records should be consistent with and build on the content of that database. Location data in South African libraries for all existing and new fire literature should be provided.

Due cognisance was taken of similar work that has been conducted in the past, and already incorporated into the Fynbos i-Forum Bibliography Database including "A Bibliography of Fynbos Ecology: 2<sup>nd</sup> Edition A National Science Programme Report No. 66 by Manders P.T. and Dicks F.M (1989)".

---

## 2. APPROACH

We work closely with Margaret Sandwith of the Niven Library at the University of Cape Town who curates the Fynbos i-Forum Bibliography Database to ensure that there was no duplication of effort.

The underlying search engine of the C.A.P.E Fynbos Forum Bibliographic Database is an UNESCO product written in open source and the C.A.P.E Programme has customised the product to suit local needs. It is currently running on a server at the Niven Library but will ultimately be moved to the C.A.P.E. programme. It is possible to export information from the database to other formats such as MS Excel or MS Access. However, since it is very simple to conduct online searches it makes more sense for CapeNature staff to search it via the web rather than to install multiple copies at the many CapeNature offices. The URL for the C.A.P.E Fynbos i-Forum Bibliographic Database is:

<http://nivenlib.pfp.uct.ac.za/wwwisis/FYNBOS.01/form.htm>

In early January the database contained 258 entries relevant to fire in the fynbos. By cross-checking with existing fynbos bibliographies, university libraries and reference lists from key fynbos papers and books, we were able to add a further 166 titles.

A key requirement was that all references entered into the Fynbos i-Forum Bibliography Database be obtainable (i.e. the location of a physical or electronic copy must be known). The database allows for articles to be listed at more than one place. If locality information was not available for a reference it was not entered into the database. This was often the case for so-called "grey literature".

Our focus was on obtaining information on articles that contained some aspect of fire in the fynbos biome. Articles where fire was only mentioned in passing were not included.

In checking the quality of the fire related-records already in the Fynbos i-Forum Bibliography Database we encountered some errors and duplicate entries. However we did not edit these as we understand that this will be undertaken by Margaret Sandwith as part of her extended contract with the C.A.P.E. Programme.

The steps we took in improving the existing Fynbos i-Forum Bibliography Database follow:

1. We obtained a download of all the existing records pertaining to fire in the fynbos contained in the Fynbos i-Forum Bibliography Database.
2. We checked these entries against those contained in, "A Bibliography of Fynbos Ecology: 2<sup>nd</sup> Edition A National Science Programme Report No. 66 by Manders P.T. and Dicks F.M (1989)".
3. We then compiled a list of records occurring in the above report that were not contained in the Fynbos i-Forum Bibliography Database.
4. We then widened our search by examining the reference lists from a number of books on fynbos fire ecology (see Table 1).
5. Next we searched a number of electronic databases for relevant articles on fire in the fynbos biome (see Table 2).
6. We also contacted a number of CapeNature staff involved in fire research as well as Tiaan Pool of the Nelson Mandela Metropolitan University to assist us regarding their "grey literature" holdings.
7. All additional records were then carefully encoded and saved to a text file to facilitate uploading to the Fynbos i-Forum Bibliography Database. The required

format differed slightly depending on whether the record was for an article, book chapter, thesis, technical report or conference proceeding (see Tables 3 and 4).

8. The text file containing the additional 166 records was then checked by Margaret Sandwith and final editing completed before these records were uploaded into the Fynbos i-Forum Bibliography Database on 6<sup>th</sup> June 2007. Appendix 1 contains a complete list of these additional records.
9. The search capabilities of the Fynbos i-Forum Bibliography Database were demonstrated to the members of the Fire Management Data Project Task Team at Jonkershoek on 6<sup>th</sup> June 2007.

---

### 3. RECOMMENDATION

The Fynbos i-Forum Bibliography Database needs to be kept up to date on a regular basis to ensure that in future all relevant articles are captured. How this will work in practice is a matter for the C.A.P.E Programme and CapeNature to decide.

---

### 4. ACKNOWLEDGEMENTS

We are very grateful for the assistance we received from Margaret Sandwith, the Librarian at the Niven Library FitzPatrick Institute, University of Cape Town, who currently manages the C.A.P.E. Programme's Fynbos i-Forum Bibliographic Database.

We would also like to thank our colleague Bulelwa Sithetho who assisted us in the searching of electronic databases.

*Table 1: Books consulted for relevant references*

Book	Author (s)
Heathlands of the world	Specht, R.L.
Mediterranean-type ecosystems: the role of nutrients	Kruger, F.J. Mitchell, D.T. Jarvis, J.U.M.
The biogeography and ecology of southern Africa	Werger, M.J.A.
Fire in South African Mountain Fynbos	Van Wilgen, B.W. Richardson, D.M. Kruger, F.J. Van Hensbergen, H.J.
Veld management in South Africa	Tainton, N
Table Mountain. A natural history	Pauw, A. Johnson, S.
Landscape degradation and biodiversity in Mediterranean-Type Ecosystems	Rundel, P.W. Montenegro, G. Jacksic, F.
Ecological effects of fire in South African ecosystems	Peter de V. Booyesen Neil M. Tainton
The Ecology of Fynbos: Nutrients, Fire and Diversity	Richard Cowling
Fynbos: South Africa's unique floral kingdom	Cowling, R.M. Richardson, D.
Biogeography and ecology of Southern Africa Volumes 1 and 2	M.J.A. Werger

*Table 2: Electronic databases reviewed for relevant references*

Institute / Network	Database	Web address
South African Biodiversity Institute	Harry Molteno Library Catalogue	www.sanbi.org
	Mary Gunn Library Catalogue	
South African Bibliography Network (Sabinet)	Forestry database	www.sabinet.co.za
	SA ePublications	
	SA Catalogue	
Stellenbosch University	Stellenbosch University Library Services – CALICO Database *	http://www.sun.ac.za/library http://alephrod.calico.ac.za
	Google Scholar	http://scholar.google.com/scholar

\* Allows access to all university libraries in the Western Cape.

*Table 3: Example of the fields and codes required for entering an article in the Fynbos i-Forum Bibliography Database.*

Field	Code	Details
Location	984^p	CSIR Stellenbosch - Documentation Centre
Shelf No.	984^c	FR-PAM 04556
Author	100	Seydack, A.H.W. Bekker, S.J. Marshall, A.H.
Title	245	Shrubland fire regime scenarios in the Swartberg Mountain Range, South Africa: implications for fire management
Date	260^c	2007
Keyword	650	Fire
Source	801	International Journal of Wildland Fire 16 : 81-95
Format	080	Article

*Table 4: Example of the fields and codes required for entering a book chapter in the Fynbos i-Forum Bibliography Database.*

Field	Code	Details
Location	984^p	UCT Library
Shelf No.	984^c	c581.709687 FIRE
Author	100	Richardson, D.M. van Wilgen, B.W.
Title	245	Ecosystem, community and species response to fire in mountain fynbos: Conclusions from the Swartboskloof experiment.
Place	260^a	Heidelberg
Publisher	260^b	Springer-Verlag
Date	260^c	1992
Keyword	650	Fire
Source	801	In: B.W. van Wilgen D.M. Richardson F.J. Kruger and H.J. Van Hensbergen (eds.), Fire in South African Mountain Fynbos, pp 273 – 283
Format	080	Chapter