

NOTES AND SOURCES

1. Introduction: the flow of a lifeline

1. Strictly speaking, the administrative district is called the North-West District, which is divided into Chobe, Ngamiland East, Ngamiland West, and Okavango sub-districts. However, the area shown as Ngamiland in Figure 1 is widely recognized as a district and many sets of statistical information are collected for this separate area.

2. Landscapes: the shape of a river

1. This account is based on information provided by Roger Swart, and also by John Ward and Brian Bluck. Important references are: Partridge, T.C. 1998. Of diamonds, dinosaurs and diastrophism: 150 million years of landscape evolution in southern Africa. *South African Journal of Geology*, 101: 167–184; Gumbrecht, T., McCarthy, T.S. & Merry, C.L. 2001. The topography of the Okavango Delta, Botswana, and its tectonic and sedimentological implications. *South African Journal of Geology*, 104: 243–264; Thomas, D.S.G. & Shaw, P.A. 1991. *The Kalahari Environment*. Cambridge University Press, Cambridge.
2. Derived from maps produced by the Council for Geosciences in South Africa, the Geological Survey of Namibia and the Instituto Nacional de Geologia, Angola. Dunes were traced off satellite images. Basalts and volcanics associated with the breakup of Gondwana (e.g. Karoo basalts and Etendeka lavas) have been included in the Karoo Group. For discussions on the ages of dunes see Thomas, D.S.G. & Shaw, P.A. 2002. Late Quaternary environmental change in central southern Africa: new data, synthesis, issues and prospects. *Quaternary Science Reviews* 21: 783–797.
3. Moore, A.E. & Larkin, P.A. 2001. Drainage evolution in south-central Africa since the breakup of Gondwana. *South African Journal of Geology* 104: 47–68.
4. Same as 3.
5. Sophie Simmonds helped compile the information, which was based on InterConsult, 2001. *Natural resource mapping of the Okavango*. Report for the Directorate of Environmental Affairs, Windhoek; Castanheira Diniz, A. & De Barros Aguiar, F.Q. 1973. *Recursos em terras com Aptidão para o regadio na Baía do Cubango*. Instituto de Investigação Agronómica de Angola. No 33; and data compiled by the Ministry of Agriculture, Gaborone.

3. The past: trying times

1. Robbins, L.H. & Murphy, M.L. 1998. The Early and Middle Stone Age. In Lane, P., Reid, A. & Segobye, A. (eds). *Ditau Mmang: The archaeology of Botswana*. Pula Press and The Botswana Society, Gaborone.
2. From Baum, H. 1903. *Kunene-Sambesi Expedition*. Kolonial Wirtschaftliches Komitee. Berlin.
3. From information in Lane, P., Reid, A. & Segobye, A. (eds). 1998. *Ditau Mmang: The archaeology of Botswana*. Pula Press and The Botswana Society, Gaborone for Botswana and provided by John Kinahan for Angola and Namibia.
4. Compiled from Milheiros, M. 1967. *Notas de etnografia Angolana*. Instituto de Investigação Científica de Angola; Redinha, J. 1962. *Distribuição étnica de Angola*. Edição Do Centro de Informação e turismo de Angola; Robins, S., Madzudzo, E. & Brenzinger, M. 2001. *An assessment of the status of the San in South Africa, Angola, Zambia and Zimbabwe*. Legal Assistance Centre, Windhoek; Cassidy, L., Good, K., Mazonde, I. & Rivers, R. 2001. An assessment of the status of the San in Botswana. Legal Assistance Centre, Windhoek; Bendsen, H. 2002. *Arable Agriculture and its significance in terms of spatial coverage, job and income*

generation potential. Unpublished report, Harry Oppenheimer Okavango Research Centre, Maun; Mendelsohn, J.M. & el Obeid, S. 2003. *Sand and water: a profile of the Kavango Region in Namibia*. Struik, Cape Town.

5. Nettelton, G.E., 1934. *History of the Ngamiland Tribes up to 1926*. Bantu Studies 8.
6. Sillery, A. 1952. *The Bechuanaland Protectorate*. Oxford University Press, Cape Town.
7. MPLA: Popular Movement for the Liberation of Angola, FNLA: National Front for the Liberation of Angola and UNITA: National Union for the Total Independence of Angola.

4. Climate: driving rains, drying sunshine

1. Based on an interpolation of average seasonal totals calculated from records obtained from the Global Historical Climate Network database, and the Botswana and Namibia Meteorological Services.
2. Ministry of Finance and Development Planning. 1997. *Study of poverty and poverty alleviation in Botswana*. Gaborone.
3. Based on an interpolation of the standard deviation of annual totals calculated from records obtained from the sources in Note 1. The coefficient is the standard deviation of annual totals as a percentage of the average rainfall each year.
4. From sources in Note 1.
5. These figures are for an area near Pretoria in South Africa, but the cycles approximate those in the Basin at the same time. Adapted from Tyson, P.D. & Preston-Whyte, R.A. 1998. *The weather and climate of southern Africa*. Oxford University Press, Cape Town.
6. From the Botswana and Namibia Meteorological Services.
7. Data from Namibia Meteorological Services: Marques, R. 1998. *Climate, hydrology and water resources: Angolan sector*. Report for OKACOM Diagnostic Assessment. GEF Project Brief; and Wilson, B.H. & Dincer, T. 1976. An introduction to the hydrology and hydrography of the Okavango Delta. In: *Proceedings of the symposium on the Okavango Delta and its future utilization*. Botswana Society, Gaborone.

5. The River: meandering across the Kalahari

1. Thomas, D.S.G. & Shaw, P.A. 1991. *The Kalahari environment*. Cambridge University Press, Cambridge.
2. Catchment areas were mapped and their sizes calculated by this project. Average rainfall was estimated from interpolated mean annual rainfall figures in each catchment (see page 63). Multiplying average rainfall and catchment areas provided estimates of total volumes of rainfall per catchment. Discharge percentages are the proportions of rainfall volume per catchment relative to the total volume of rainfall over the whole active catchment area. Note that summing the percentages in the table results in an estimated 60% of total flow from the Cubango sub-Basin and 40% from the Cuito sub-Basin, slightly different from the proportions recorded at gauging stations of 55% for the Cubango and 45% for the Cuito.
3. Of the 22% coming down the Cuito, 15% is from its own catchment and 7% collects after its junction with the Cuanavale. Similarly, of the 14% inflow to the Cubango, 9% is from its own catchment, while the remaining 5% drains into the river below its junctions with the Cutato, Cuchi, Cacuchi, Cueleli and Cuele.
4. The figure of 9.4 cubic kilometres was calculated from all measurements of discharge at Moheumbo over the past 68 years. The

estimate of 3.2 cubic kilometres of rainwater (Fred Ellery, personal communication) is lower than other published figures, perhaps because other workers over-estimated the area of swamps.

5. McCarthy, T.S., Bloem, A. & Larkin P.A. 1998. Observations on the hydrology and geohydrology of the Okavango Delta. *South African Journal of Geology* 101: 101–117.
6. Some additional water may be added from the underground flow of water from aquifers in the Kavango (Mendelsohn, J.M. & el Obeid, S. 2003. *Sand and Water: a profile of the Kavango Region in Namibia*. Struik, Cape Town). The amounts of water are unknown, but are unlikely to contribute significantly to river flow.
7. Based on data recorded at gauging stations at different places given in Marques, R. 1998. *Climate, hydrology and water resources: Angolan sector*. Report for OKACOM Diagnostic Assessment. GEF Project Brief, and by the Department of Water Affairs in Namibia and Botswana. The flow of the Okavango (before the Cuito) and the Cuito was compared by subtracting flow at Moheumbo from that at Rundu.
8. From data supplied by the Department of Water Affairs in Botswana and Namibia.
9. McCarthy, J., Gumbrecht, T., McCarthy, T., Frost, P., Wessels, K. & Siedel, E. Flooding patterns of the Okavango Wetland in Botswana between 1972 and 2000. Submitted to *Ambio*.
10. Same as 5.
11. Same as 8.
12. Adapted from McCarthy, J. 2002. *Remote sensing for detection of landscape form and function of the Okavango Delta, Botswana*. Ph D. thesis. Royal Institute of Technology, Stockholm.
13. Gumbrecht, T., McCarthy, J. & McCarthy, T.S. In press. Channels, wetlands and islands in the Okavango Delta, Botswana, and their relation to hydrological and sedimentological processes. *Earth Surface Processes and Landforms*.
14. More information can be found in: Ellery, W.N., Ellery, K., Rogers, K.H., McCarthy, T.S. & Walker, B.H. 1993. Vegetation, hydrology and sedimentation processes as determinants of channel form and dynamics in the northeastern Okavango Delta, Botswana. *African Journal of Ecology* 31: 10–25.
15. Garstang, M., Ellery, W.N., McCarthy, T.S., Scholes, M.C., Scholes, R.J., Swap, R.J. & Tyson, P.D. 1998. The contribution of aerosol- and water-borne nutrients to the functioning of the Okavango Delta ecosystem, Botswana. *South African Journal of Science* 94: 223–229.

6. Living resources: the Okavango's plants and animals

1. Important publications on fish are: Hay, C.J., van Zyl, B.J. & Steyn, G.J. 1996. A quantitative assessment of the biotic integrity of the Okavango River, Namibia based on fish. *Water S.A* 22: 263–284; Van der Waal, B.C.W. 1991. A survey of the fisheries in the Kavango, Namibia. *Madogaqa* 17: 113–122; and Mosepele, K. 2002. *Trends in fisheries development and fish utilization in the Okavango Delta*. Unpublished report, Harry Oppenheimer Okavango Research Centre, Maun.
2. Based on Hay, C.J. 1995. *The development of a database for the assessment of the biotic integrity and sustainable utilisation of the Okavango River, Namibia*. Ph D. Thesis, Rand Afrikaans University, Johannesburg; Fox, P.J. 1976. Preliminary observations on fish communities of the Okavango Delta. In *Proceedings of the symposium on the Okavango Delta and its future utilization*. Botswana Society, Gaborone.
3. Van der Waal, B.C.W. 1991. A survey of the fisheries in the Kavango, Namibia. *Madogaqa* 17: 113–122; Tvedten, I., Girvan, L.-A., Maasdorp, M., Pomuti, A. & Van Rooy, G. 1994. *Freshwater fisheries and fish management in Namibia: A socio-economic background study*. Social Sciences Division, University of Namibia, Windhoek; Income and Expenditure Survey of 1994, conducted by the Namibian Central Statistics Office; and extrapolations in Mendelsohn, J.M. & el Obeid, S. 2003. *Sand and*

water: a profile of the Kavango Region in Namibia. Struik, Cape Town.

4. Tvedten, I., Girvan, L.-A., Maasdorp, M., Pomuti, A. & Van Rooy, G. 1994. *Freshwater fisheries and fish management in Namibia: A socio-economic background study*. Social Sciences Division, University of Namibia, Windhoek.
5. Mosepele, K. 2002. *Trends in Fisheries Development and Fish Utilization in the Okavango Delta*. Unpublished report, Harry Oppenheimer Okavango Research Centre, Maun.
6. Same as 5.
7. Same as 5. Figures amount to more than 100% because some people use more than one method.
8. Same as 5.
9. Louis du Pisani analyzed NOAA NDVI satellite data to produce these maps. Data from 1993/94 and 1994/95 were not available.
10. Map and text based on: Dos Santos, R. M. 1982. *Itinerários florísticos e carta de vegetação do Cuando Cubango. Estudos, ensaios e documentos* 137. Instituto de Investigação Científica Tropical, Junta de Investigações Científicas do Ultramar, Lisbon; Smith, P.A. 1976. An outline of the vegetation of the Okavango drainage system. In *Proceedings of the symposium on the Okavango Delta and its future utilization*. Botswana Society, Gaborone; Ellery, W.N., McCarthy, T. & Dangerfield, W.J. 2000. Floristic diversity in the Okavango Delta, Botswana as an endogenous product of biological activity. *Biodiversity in wetlands: assessment, function and conservation*. Vol. 1. Backhuys Publishers, Leiden; and our interpretation of satellite images.
11. Jones, B.T.B. 2001. *Results of a socio-ecological survey carried out in the Kavango Region, Namibia, May–August 2001*. Report for the Every River has its People project, Windhoek.
12. Data provided by Alex Verlinden, National Remote Sensing Centre, Windhoek.
13. From the Botswana Department of Wildlife and National Parks reports on aerial surveys.
14. Figures summarized by Mendelsohn, J.M. & el Obeid, S. 2003. *Sand and water: a profile of the Kavango Region in Namibia*. Struik, Cape Town.
15. Mbatwa, J.E. 2002. *The socio-economic and environmental impact of tourism development in the Okavango Delta, Botswana*. Harry Oppenheimer Okavango Research Centre, Maun.
16. From records kept at Popa Game Park.
17. Note 15 and Scott Wilson Resource Consultants. 2000. *Environmental assessment of veterinary fences in Ngamiland*. Report for the Government of Botswana.

7. People: change and motion

1. Based on the total estimated population in the Basin area of each country as a percentage of the national population, taken as 13 million for Angola, 1.9 million for Namibia and 1.7 million for Botswana. The map is based on Morebodi, B.B.H. 2001. *Botswana National Atlas*. Department of Surveys and Mapping, Gaborone; and Namibian 2000 Demographic and Health Survey; Mendelsohn, J.M., Jarvis, A.M., Roberts, C.S. & Robertson, T. 2002. *Atlas of Namibia*. David Philip, Cape Town; and UNEP database of population density in Angola (grid2.cld.usgs.gov/globalpop/Africa).
2. Densities in Kavango were from Mendelsohn, J.M. & el Obeid, S. 2003. *Sand and water: a profile of the Kavango Region in Namibia*. Struik, Cape Town. For Ngamiland, numbers of people recorded in the 2001 census were 'spread' over distances of five kilometres around each village. For Angola, we used population estimates for different towns supplied by OCHA (Office for Co-ordination of Humanitarian Affairs), our own estimates of village sizes from aerial and ground surveys and density estimates from the UNEP database of population densities for certain areas. These sources provided a total estimate of about 370,000 people in Angola. In addition, from areas cleared for cultivation (mapped off recent satellite images) and our assumption that an average household

of five people had cleared 10 hectares, a total population of 320,000 people in Angola is estimated. We are thus fairly confident that the real total is unlikely to be less than 300,000 or more than 400,000 people. Official estimates of populations in Angola are far too high, a consequence of how the central government allocates funds to each province on the basis of the number of people claimed by each province.

3. Population figures for Kavango and Ngamiland are for the whole region or district from government population censuses.
4. Populations on the north bank were 35% of those in Kavango in 1940, 40% in 1950, and 46% in 1960. From Gibson, G.D., Larson, T.J. & McGurk, C.R. 1981. *The Kavango Peoples*. Franz Steiner Verlag, Wiesbaden.
5. Namibian 2000 Demographic and Health Survey and Morebodi, B.B.H. 2001. *Botswana National Atlas*. Department of Surveys and Mapping, Gaborone.
6. For several accounts see Pacheco, F. 2001. Rural communities in Huambo. In Robson, P. (ed.). *Communities and reconstruction in Angola*. Occasional Paper No. 1 of the Development Workshop, Guelph, Canada.
7. Based on sources listed in Note 4, chapter 3 on history.
8. Porto, J.G. & Clover, J. 2002. *The peace dividend in Angola: strategic implications for the Okavango Basin cooperation*. Report for African Security Analysis Programme, Institute of Security Studies; World Health Organization Indicators for 2001 (www3.who.int).
9. From discussions with various people in Menongue in May 2003.
10. From Sentinel Surveys conducted and reported by the Botswana and Namibia Ministry of Health. A sentinel survey was not done in 2000 in Ngamiland.
11. Combined schools offer some primary and secondary grades. Information from Morebodi, B.B.H. 2001. *Botswana National Atlas*. Department of Surveys and Mapping, Gaborone; el Obeid, S., Mendelsohn, J.M., Lejars, M., Forster, N. & Brulé, G. *Health in Namibia: progress and challenges*. RAISON, Windhoek; Ministry of Basic Education, Sport and Culture in Namibia and Harry Oppenheimer Okavango Research Centre, Maun.
12. See Mendelsohn, J.M. & el Obeid, S. 2003. *Sand and water: a profile of the Kavango Region in Namibia*. Struik, Cape Town.
13. From World Health Organization indicators for 2001 (www3.who.int); the Namibian 2000 Demographic and Health Survey; and Morebodi, B.B.H. 2001. *Botswana National Atlas*. Department of Surveys and Mapping, Gaborone.
8. **Farming: food, income and security**
1. These estimates are based on average household sizes and the density of people in rural areas within the Basin (see page 126).
2. New irrigation projects are in accordance with Namibia's 'Green Scheme' to promote food production and security. The projects will be large commercial enterprises that support groups of nearby small-scale irrigation farm units.
3. Bendsen, H. 2002. *The dynamics of the land use systems in Ngamiland*. Unpublished report, Harry Oppenheimer Okavango Research Centre, Maun.
4. Data from Kavango analyzed from the Population Survey of the Kavango Region by Lux Development in 1999, while that for Ngamiland comes from Van Hoof, P.J.M., Kirkels, M.A.I.J., Riezebos, H.Th., Schledorn, J.L.M. & de Wit, M.J.M. 1991. *Socio-economic baseline survey and land suitability analysis of Ngamiland district CYDA, Western part*. University of Utrecht.
5. Van Hoof *et al.* (see Note 4) and Rashem, K. 1988. *Economic findings and results: dryland and molapo farming systems of western Ngamiland*. Technical Report No.5. Department of Agricultural Research, Ministry of Agriculture, Botswana.
6. Ministry of Finance and Development Planning, 1997. *Study of poverty and poverty alleviation in Botswana*. Gaborone.
7. Mendelsohn, J.M. & el Obeid, S. 2003. *Sand and water: a profile of the Kavango Region in Namibia*. Struik, Cape Town; and Kgathi, D.L. 2003. *Natural resources tenure and access in the Okavango Delta*. Unpublished report, Harry Oppenheimer Okavango Research Centre, Maun.
8. Mendelsohn, J.M. & el Obeid, S. 2003. *Sand and water: a profile of the Kavango Region in Namibia*. Struik, Cape Town.
9. Same as 8.
10. For Angola, yields are reported by Borchert, G. 1963. *Südost-Angola*. Institut für Geographie und Wirtschaftsgeographie der Universität, Hamburg. In Kavango, yields are given by Keyler, S. 1995. *Economics of the pearl millet subsector in northern Namibia. A summary of baseline data*. International Crops Research Institute for the Semi-Arid Tropics. Working Paper 95/03. Anon. 1997. *Farm management survey of the Okavango Region, Analysis Report 1*. Ministry of Agriculture, Water and Rural Development, and Yaron, G., Janssen, G & Maamberua, U. 1992. *Rural Development in the Okavango Region of Namibia: An Assessment of Needs, Opportunities and Constraints*. Windhoek, Gamsberg Macmillan. For Ngamiland, yields are reviewed by Bendsen, H. 2002. *The dynamics of the land use systems in Ngamiland*. Unpublished report, Harry Oppenheimer Okavango Research Centre, Maun.
11. Rashem, K. 1988. *Economic findings and results: dryland and molapo farming systems of western Ngamiland*. Technical Report No.5. Department of Agricultural Research, Ministry of Agriculture, Botswana.
12. For a fuller argument see Mendelsohn, J.M. & el Obeid, S. 2003. *Sand and water: a profile of the Kavango Region in Namibia*. Struik, Cape Town.
13. Figures for Angola are guesses based on our observations that only a small proportion of farmers own cattle, their herds are generally small, and there are very few cattle in the northern half of the catchment, even though there are many more farmers in the northern areas. Similar points are made by Borchert, G. 1963. *Südost-Angola*. Institut für Geographie und Wirtschaftsgeographie der Universität, Hamburg. For Kavango, there are about 150,000 cattle in the Kavango region, but roughly 90,000 of these are on farms beyond 20 kilometres from the river. The estimate of 50,000 cattle within 20 kilometres of the Delta is based on there being about 8,500 rural households in the area, each of which would have about six cattle. Most other cattle in Ngamiland are at cattle posts and on farms to the west and south of the Delta. Similar methods were used to estimate numbers of goats.
14. For Ngamiland, figures are from Van Hoof *et al.* (see Note 4); while for Kavango data are from a Population Survey of the Kavango Region by Lux Development in 1999. The ownership of goats seems low in Ngamiland and more recent figures may show that more households have goats.
15. From census and vaccination campaign figures of the Directorate of Veterinary Services in Namibia and Agricultural Planning and Statistics of the Ministry of Agriculture, Central Statistics Office, Gaborone.
16. For Angola, derived from an estimate of cattle distribution relative to the distribution of rural farmers (see page 127), for Kavango from Mendelsohn, J.M. & el Obeid, S. 2003. *Sand and water: a profile of the Kavango Region in Namibia*. Struik, Cape Town, and for Ngamiland from Scott Wilson Resource Consultants. 2000. *Environmental assessment of veterinary fences in Ngamiland*. Report for the Government of Botswana.
17. Estimates for Kavango are based on annual Meatco sales of about 2,500 head and extrapolations from Kirsten, J. 1999. *Livestock marketing study*. Report for Northern Regions Livestock Development Project (NOLIDEP), Windhoek, while figures for Ngamiland are reported by Scott Wilson Resource Consultants. 2000. *Environmental assessment of veterinary fences in Ngamiland*. Report for the Government of Botswana.
18. Same as 8.
19. Andersson, C.J. 1861. *The Okavango River. A narrative of travel, exploration and adventure*. London.

20. Same as 8.
21. Social Impact Assessment and Policy Analysis Corporation (SIAPAC). 2001. *Rural Development Policy Review Nationwide Consultations*. Botswana Institute for Development Policy Analysis (BIDPA), Gaborone, Botswana.
22. Keyler, S. 1995. Economics of the pearl millet subsector in northern Namibia. A summary of baseline data. *International Crops Research Institute for the Semi-Arid Tropics*. Working Paper 95/03.
23. Fidzani, B., Mlenga, W.S., Athlopheng, M. & Shatera, M.M. 1999. *Socio-economic effects of CBPP in Ngamiland*. Ministry of Agriculture, Gaborone.
24. Income and Expenditure Survey of 1994, Central Statistics Office, Namibia.

9. Okavango: opportunities and challenges

1. Mendelsohn, J.M. & el Obeid, S. 2003. *Sand and water: a profile of the Kavango Region in Namibia*. Struik, Cape Town.
2. Information from the Namibian Department of Water Affairs. There are also more tentative plans to develop a further 2,000 ha at Kangongo, bringing the total area of irrigation there to 4,000 ha.
3. Previous estimates have put Namibia's use at 0.05% and Botswana's use

at 0.04% of total flow into the Delta (see Ashton, P. J. 2000. Water security for multi-national river basin states: The special case of the Okavango River. In Falkenmark, M & Lundqvist, J (eds). 2000 *SIWI seminar – Water security for multi-national river basin states – Opportunity for development*. Stockholm: Swedish International Water Institute).

4. Kgathi, D.L. 2002. *Natural Resources Tenure and Access in the Okavango Delta*. Unpublished Report, Harry Oppenheimer Okavango Research Centre, Maun.
5. The following conventions, treaties and protocols are relevant: Ramsar Convention on Wetlands of International Importance, United Nations Convention on Biological Diversity, United Nations Convention to Combat Desertification, United Nations Convention on the Non-Navigational Uses of International Watercourses, United Nations Framework Convention on Climate Change, and Revised Protocol on Shared Watercourse Systems (SADC 2001). These are discussed in detail by Ashton, P. & Neal, M. 2003. An overview of key strategic issues in the Okavango basin. In Turton, T., Ashton, P. & Eugene Cloete, E. (eds). 2003. *Transboundary rivers, sovereignty and development: hydrological drivers in the Okavango River basin*. African Water Issues Research Unit, Pretoria and Green Cross International, Geneva.

IMPORTANT REFERENCES

1. Barnes, J., Cannon, J. & Morrison, K. 2001. *Economic returns to selected land uses in Ngamiland, Botswana*. Conservation International.
2. Baum, H. 1903. *Kanene-Sambesi Expedition*. Kolonial Wirtschaftliches Komitee, Berlin.
3. Bendsen, H. 2002. *The dynamics of the land use systems in Ngamiland*. Harry Oppenheimer Okavango Research Centre, Maun.
4. Bendsen, H. 2002. *Arable Agriculture and its significance in terms of spatial coverage, job and income generation potential*. Harry Oppenheimer Okavango Research Centre, Maun.
5. Bethune, S. 1991. Kavango River wetlands. *Madoqua* 17: 77–112.
6. Borchert, G. 1963. *Südost-Angola*. Institut für Geographie und Wirtschaftsgeographie der Universität, Hamburg.
7. Castanheira Diniz, A. & De Barros Aguiar, F.Q. 1973. *Recursos em terras com Aptidão para o regadio na Baía do Cuiabá*. Instituto de Investigação Agronomica de Angola. No 33.
8. Dos Santos, R. M. 1982. *Itinerários florísticos e carta de vegetação do Cuango Cuiabá. Estudos, ensaios e documentos* 137. Instituto de Investigação Científica Tropical, Junta de Investigações Científicas do Ultramar, Lisbon.
9. Ellery, W.N., Ellery, K., Rogers, K.H., McCarthy, T.S. & Walker B.H. 1993. Vegetation, hydrology and sedimentation processes as determinants of channel form and dynamics in the northeastern Okavango Delta, Botswana. *African Journal of Ecology* 31: 10–25.
10. Fidzani, B., Mlenga, W.S., Athlopheng, M. & Shatera, M.M. 1999. *Socio-economic effects of CBPP in Ngamiland*. Ministry of Agriculture, Gaborone.
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12. Gibson, G.D., Larson, T.J. & McGurk, C.R. 1981. *The Kavango Peoples*. Franz Steiner Verlag, Wiesbaden.
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14. InterConsult. 2001. *Natural resource mapping of the Kavango*. Report for the Directorate of Environmental Affairs, Windhoek.
15. IUCN. 1992. *Angola: Environment status quo assessment report*. IUCN Regional Office for Southern Africa, Harare 1992.
16. Kgathi, D.L. 2003. *Natural resources tenure and access in the Okavango Delta*. Harry Oppenheimer Okavango Research Centre, Maun.
17. Lane, P., Reid, A. & Segobye, A. (eds). 1998. *Ditswa Mmung: The archaeology of Botswana*. Pula Press and The Botswana Society, Gaborone.
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21. Mendelsohn, J.M., Jarvis, A.M., Roberts, C.S. & Robertson, T. 2002. *Atlas of Namibia*. David Philip, Cape Town.
22. Mendelsohn, J.M. & el Obeid, S. 2003. *Sand and water: a profile of the Kavango Region in Namibia*. Struik, Cape Town.
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24. Ministry of Agriculture, Water and Rural Development. 1996. *Feasibility study on the Okavango River to Grootfontein link of the Eastern National Water Carrier*. 6 volumes. Windhoek.
25. Morebodi, B.B.H. 2001. *Botswana National Atlas*. Department of Surveys and Mapping, Gaborone.
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27. Scott Wilson Resource Consultants. 2000. *Environmental assessment of veterinary fences in Ngamiland*. Report for the Government of Botswana.
28. Scudder, T. et al. 1992. *The IUCN review of Southern Okavango Integrated Water Development*. The World Conservation Union.
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