#### **CURRICULUM VITAE**

Name: RETIEF GROBLER

Name of Firm: IMPERATA CONSULTING CC

Position: Wetland Ecologist
Nationality: South African

Languages: Afrikaans (mother tongue), English

## **EDUCATIONAL QUALIFICATIONS**

BSc (Botany), University of Pretoria (1999–2001)

BSc Hons (Botany) (cum laude), University of Pretoria (2004)
Title of Thesis: "The Impact of subsistence banana (Musa x paradisiaca) farming on the vegetation of peat swamp forest surrounding the Kosi Bay Lake System."

MSc Botany (cum laude), University of Pretoria (2009)
 Title of Thesis: "Phytosociology of Peat Swamp Forests of the Kosi Bay Lake System."

## **KEY QUALIFICATIONS**

Watercourse Investigations, Including Wetland and Riparian Habitat Delineation (Mapping), Assessments, Management & Rehabilitation:

Involved in wetland inventories, classification and description of watercourses, mapping of drainage lines (e.g. wetlands, rivers and ephemeral headwaters), ecological assessments, and wetland rehabilitation studies. A selection of projects demonstrating relevant experience, include:

## Wetland rehabilitation

- Wetland rehabilitation assessment plans for the South African National Biodiversity Institute (SANBI) for several wetlands in the Eastern Free State. 2005.
- Wetland health and rehabilitation assessments for the Gauteng Province, as part of the Working for Wetlands Project under the auspices of the South African National Biodiversity Institute (SANBI). Wetland Ecologist and sub-consultant to Land Resources International (Pty) Ltd. 2007-2009.
- Wetland health and rehabilitation assessments for the Gauteng Province, as part of the Working for Wetlands Project under the auspices of the South African National Biodiversity Institute (SANBI). Wetland Ecologist sub-consultant to Aurecon South Africa (Pty) Ltd. 2010-2011
- Wetland health and rehabilitation assessments for two wetland rehabilitation projects, upstream of Boksburg Lake, Ekurhuleni Metropolitan Municipality, Gauteng. Wetland Ecologist and sub-consultant to Land Resources International (Pty) Ltd. 2011

- Wetland rehabilitation and assessment report for the Hogsback area (Eastern Cape Province), as part of the Working for Wetlands Project under the auspices of the South African National Biodiversity Institute (SANBI). Wetland Ecologist sub-consultant to Aurecon South Africa (Pty) Ltd. 2011
- Wetland & river reinstatement and monitoring guideline report for the New Multi Product Pipeline (NMPP) Project, Trunkline Section (Jameson Park, Gauteng to Durban, KwaZulu-Natal). Transnet Capital Projects. 2010
- Alien plant control in watercourse crossings (wetlands & rivers) report for the New Multi Product Pipeline (NMPP) Project, Trunkline Section (Jameson Park, Gauteng to Durban, KwaZulu-Natal). Transnet Capital Projects. 2012

Wetland studies for a variety of strategic planning, residential, commercial and industrial projects

- Ecological functional assessment of wetland areas surrounding the Orlando Power Station for the proposed Ekhaya development, Soweto, Gauteng. Strategic Environmental Focus (SEF), (Pty) Ltd 2005.
- Wetland Audit for the City of Johannesburg. Reviewer and sub-consultant for Strategic Environmental Focus (SEF), (Pty) Ltd. 2008
- Elsburgspruit wetland and habitat assessment, Ekurhuleni Metropolitan Municipality,
   Gauteng Province. Sub-consultant for Van Riet & Louw Landscape Architects (Pty) Ltd. 2008
- Wetland and watercourse delineation and assessment for the proposed Sun City Vacation
   Club and Golf Course Phase 3 Development, North West Province. EkoInfo CC. 2008
- Wetland delineation & assessment study for the proposed construction and operation of an aluminium fluoride production facility and associated infrastructure on the farm Jobarne 489 JR, Ekandustria, Gauteng Province. African Geo-Environmental Services (AGES). 2010
- Development of a prioritisation framework for wetland rehabilitation in Ekurhuleni Metropolitan Municipality. Land Resources International (Pty) Ltd. 2011
- Surface watercourse and wetland desktop investigation for the Ivory Park Urban Development Framework, City of Johannesburg, Gauteng Province. Aurecon Group. 2011
- Wetland Study (Delineation & Assessment) for the proposed Witfontein Commercial & Residential Development, Ekurhuleni Metropolitan Municipality, Gauteng Province. Aurecon Group. 2011

Wetland & watercourse assessments in linear developments (power lines, roads, railway. and pipeline projects) and other projects in the energy sector (e.g. solar electricity installations):

- Wetland investigation for The Hills road alternatives, Pretoria-East, Gauteng. African-EPA.
   2007
- Wetland and river bio-monitoring assessments for the New Multi Product Pipeline (NMPP)
   Project, Trunkline Section (Jameson Park, Gauteng to Durban, KwaZulu-Natal). Transnet
   Capital Projects. 2009-2013
- Wetland and surface watercourse study for the proposed Ariadne-Venus 475 kV transmission line, Kwa-Zulu Natal. Baagi Environmental Consultancy. 2010
- Surface watercourse assessment study for the proposed R5 Rand Water pipeline between Rietvlei N.R. and Mamelodi, Gauteng. Aurecon Group. 2010

- Wetland and surface watercourse study for the proposed Paulputs-Aggeneys 220kV transmission line, Northern Cape. SSI Engineers and Environmental Consultants. 2011
- Surface watercourse investigation for a proposed 20MW solar electricity installation at Kalgold Mine, North West Province. Mark Wood Consultants. 2011
- Wetland and surface watercourse study for the proposed Arnot-Ginaledi 475 kV transmission line, Mpumalanga Province. Baagi Environmental Consultancy. 2012
- Watercourse investigation for the proposed upgrade of a section of the N4 Platinum Highway, Rustenburg, North West Province. Environamic. 2012.
- Wetland delineation review for the proposed 80 MW photovoltaic solar electricity installation, Grootvlei, Mpumalanga Province. Mark Wood Consultants. 2012
- Wetland and watercourse assessment study for a proposed 75MW Photovoltiac (PV) plant and associated infrastructure on a portion of the remaining extent of Erf 1, Prieska Northern Cape Province. Enviro Insight. 2012
- Water Use License application & watercourse assessment for permanent access roads on Section PL1-PL4 (Durban to Kendal) of Transnet's New Multi Product Pipeline (NMPP) Project. Transnet Capital Projects. 2012-2014
- Watercourse assessments for the Ngqura 16 MTPA manganese ore rail expansion: Area 1 & 3 (Coega De Aar; Eastern & Northern Cape). Hatch South Africa. 2013
- Watercourse assessment for the Douglas-Hopetown road upgrade project, Northern Cape.
   EIMS. 2013.
- Specialist Wetland & Drainage Line Investigation for the Proposed Hermes 132 kV
   Distribution Line and Substation, Klerksdorp, North West Province. Envirolution Consulting.
   2013
- Specialist Medupi-Borutho 400 kV Power Line Environmental Management Plan (EMP) Watercourses & Drainage Lines. North West Province. Baagi Environmental Consultancy. 2013.
- Specialist Gromis-Orangemund 400 kV Power Line Environmental Management Plan (EMP)
   Watercourses & Drainage Systems, Northern Cape Province. Baagi Environmental Consultancy. 2013
- Watercourse delineation, PES & EIS assessment specialist study for a Water Use License Application for 8 proposed distribution lines around Ngwedi MTS, SA Chrome, Boschkoppie, Impofu Substation, Styldrift, Bakubung, Ledig, Sun City, Mokwase Industries, and Manyane Substations, North West Province. Baagi Environmental Consultancy. 2014
- Environmental Impact Assessment for the Sasol PSA and LPG Project: Botanical Biodiversity and Terrestrial and Wetland Habitat. Specialist Report, Inhassoro, Mozambique. In collaboration with De Castro & Brits C.C. for Mark Wood Consultants on behalf of SASOL. 2014.
- Specialist Watercourse and Wetland Study For The Proposed 500kV Nzhelele to Triangle Eskom Powerline Project (RSA Section Only) EIA Project, Limpopo Province. Baagi Environmental Consultancy. 2014

# Green Star eco-conditional office development assessments:

 Green Star eco-conditional office assessment for the Lynnwood Bridge retail phase 2 development, Gauteng. Aurecon Group. 2011

- Green Star eco-conditional office assessment for the GCIS Hatfield head office development, Gauteng. Aurecon Group. 2012
- Green Star eco-conditional office assessment for the USAID expansion development,
   Gauteng. Aurecon Group. 2012
- Green Star eco-conditional office assessment for the Atrium on 5th development, Gauteng.
   Aurecon Group. 2012
- Green Star eco-conditional office assessment for the Lynnwood Bridge retail phase 3 development, Gauteng. Aurecon Group. 2013
- Green Star eco-conditional office assessment for the Athol Towers development, Gauteng.
   Aurecon Group. 2013

# Wetlands and surface watercourse assessments for mining-related developments:

- Wetland and drainage line watercourse study for a proposed Fluorspar Mine in Dinokeng,
   Gauteng Province. African Geo-Environmental Services (AGES), (Pty) Ltd. 2009.
- Wetland assessment study for the proposed Northern Coal Colliery near Breyton, Mpumalanga Province. Terra Soil Science. 2010.
- Desktop wetland & watercourse assessment for Harmony Gold's Kusasalethu Mine as part of their ISO 14000 environmental management certification, North West Province.
   DD Science. 2012.
- Watercourse assessment for a water re-use and reclamation project at Mponeng Mine,
   North West Province, De Castro & Brits Ecological Consultants. 2013

# Additional Wetland Related Training:

 Attended a two-day DWAF (DWA) facilitated wetland training course on the Wetland Index of Habitat Integrity assessment technique (Wetland IHI methodology) presented by Mark Rountree, June 2009.

# Training - Course Lecturer :

Co-lecturer and founding member of an Introductory Wetland Training Course, presented by the Department of Botany (University of Pretoria) through the University's Continued Education at UP (CE@UP) program, and the Gauteng Department of Agriculture, Conservation and Environment (GDACE). Aspects focussed on include the legislation, delineation, drivers and ecology, assessments, management and rehabilitation of wetlands. This course was started in November 2004 and presented since then on September 2005, November 2005, May 2006, July 2007, May 2008, May 2010, and May 2012.

# Publications:

- Grobler, R., Bredenkamp, G. & Grundling, P-L. 2004. Subsistence farming and conservation constrains in coastal peat swamp forests of the Kosi Bay Lake System, Maputaland, South Africa. Géocarrefour 79: 4.
- Grundling, P-L. & Grobler, R. 2005. Peatlands and mires of South Africa. In: Steiner, G.M. (ed.) Mires from Siberia to Tierra Del Fuego. Stapfia 85, Landesmuseen Neue Serie 35, pp. 379-396.

Sliva J., Grundling P-L., Kotze D., Ellery F., Moning C., Grobler R., Taylor P.B. (2005).
MAPUTALAND – Wise Use Management in Coastal Peatland Swamp Forests in Maputaland, Mozambique / South Africa. Wetlands International, Project No: WGP2 – 36 GPI 56.

### MEMBERSHIPS IN PROFESSIONAL AND GENERAL SOCIETY

## Professional Society

- Pr. Sci. Nat (Professional Natural Scientist) in the fields of Botanical and Ecological Science (Registration No. 400097/09).
- Please refer to the SACNASP website to undertake a search of their registered scientists in order to authenticate that Mr. LER Grobler is registered SACNASP member and is registered for the two fields indicated. Searches can be done according to employer (Imperata Consulting) or other criteria provided in this document.

http://www.sacnaspregister.co.za/search/

## General Society

- International Mire Conservation Group (IMCG), since 2003.
- Gauteng Wetland Forum (GWF), since 2006.
- South African Wetland Society (SAWS), since 2007.

# **EMPLOYMENT EXPERIENCE**

# ▶ Wetland Ecologist and Project Manager: Imperata Consulting (March 2007 – Current) Tasks include:

- Wetland and riparian habitat delineation according to the DWAF (2005) prescribed delineation guideline, as well as the demarcation of other drainage line types (e.g. headwater streams or A Section Channels)
- Wetland Present Ecological State (PES) and Ecological Importance and Sensitivity (EIS) assessments.
- Ecosystem assessments based on phytosociological investigations (vegetation unit identification, description, and assessment), as well as associated mapping and sensitivity rating of vegetation assemblages.
- Inventory, classification and mapping of wetland ecosystems.
- Wetland rehabilitation and monitoring.
- Wetland management and recommendation of impact mitigation measures.
- Environmental risk assessments related to the presence of wetland and riparian ecosystems.
- Project management related to specialist wetland, riparian and headwater ecosystem investigations.

- ▶ **Wetland Ecologist: SEF** (January 2006 February 2007) Tasks included:
  - Wetland and riparian habitat delineation and wetland ecosystem functional assessments.
  - Strategic wetland assessments and mapping.
  - Vegetation analysis and description, including mapping of sensitive vegetation assemblages.
- Nature Conservator: Tshwane Nature Conservation (July 2005 December 2005) Tasks included:
  - General management of the ecological integrity of greenbelt areas in the eastern section of the City of Tshwane Metropolitan Municipality, including the Colbyn Valley Peatland, Faerie Glen Nature Reserve, Moreletakloof Nature Reserve, Meyerspark Bird Sanctuary, and Murrayfield Koppie.

## **REFERRALS**

Mr. Tim Liversage: NMPP Environmental Manager at Transnet

Email: Timothy.Liversage@transnet.net

Cell: 079 529 7715

Mr. Umesh Bahadur: Director: Working for Wetlands at the Department of Environmental

Affairs (DEA)

Email: Ubahadur@environment.gov.za

Office: 012 399 8980 Cell: 072 072 0750

Mr. Piet-Louis Grundling: Independent Wetland Consultant and Researcher, as well as Chair of the South African Wetland Society (SAWS) and the International Mire Conservation Group (IMCG).

Email: peatland@mweb.co.za

Cell: 072 793 8248