



**United Nations Development Programme
Government of Madagascar
Global Environment Facility**

ADDENDA

**as
SEPARATE FILES
to the**

PROJECT DOCUMENT
English version

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Co-financing Letters (PRODOC Annex 1)

| # | Name of Co-financier | Date of letter | Co-financing Amount (\$) |
|----------|--|----------------|--------------------------|
| <u>1</u> | HELVETAS Swiss Intercooperation, Madagascar * | 05-May-2015 | 1,792,460 |
| | WELTHUNGERHILFE – WHH * | 05-May-2015 | 1,639,213 |
| <u>2</u> | Tany Meva | 04-May-2015 | 350,000 |
| <u>3</u> | Ministère de l'Agriculture | 21-May-2015 | 38,000,000 |
| <u>4</u> | Ader | 14-May-2015 | 931,147 |
| <u>5</u> | GIZ | 02-Jun-2015 | 1,100,000 |
| | TOTAL | | 43,812,820 |

* Same letter for both organisations.

Objet: Confirmation d'intérêt de votre proposition dans le cadre du programme GEF-5

Antananarivo, le 05.05.2015
 Réf : 028/601/2015/cst HELVETAS
 Réf : 134-15-JJ WHH

Monsieur le Représentant Résident du PNUD

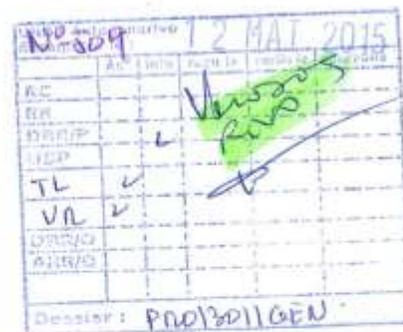
Par la présente lettre, nous tenons à confirmer l'intérêt de deux entités membres de l'Alliance 2015 (www.alliance2015.org), WELTHUNGERHILFE (WHH) et HELVETAS Swiss Intercooperation, au projet intitulé « A landscape approach to conserving and managing threatened biodiversity in Madagascar with a focus on the Atsimo Andrefana and dry forest landscape » soumis par la Fondation Tany Meva dans le cadre de la Cinquième Période du Global Environment Facility.

WHH intervient depuis fin 2013 autour de 3 Parcs Nationaux (Zombitse, Mikea & Tsimanampetsoa), sur un projet d'agroécologie et de protection de l'environnement. HELVETAS intervient depuis 2002 dans le développement d'activités économiques autour d'aires protégées (Coton biologique autour du Parc National Mikea (2012-2017), Vanille biologique autour du parc de Mananara (2002-2009), et l'élaboration et la gouvernance participative des incitations à la réduction de la déforestation (Projet REDD FORECA, de 2007-2011).

Le GEF rejoint donc les mêmes objectifs, et ce projet constitue un appui vital pour renforcer les initiatives locales en matière de conservation et de gestion de la biodiversité endémique de Madagascar. L'appui aux actions alternatives aux pressions sur les ressources naturelles, ainsi que la responsabilisation des communautés dans leur gestion sont autant d'activités importantes pour la préservation de la biodiversité et la promotion du développement local à Madagascar. Pour ce faire, l'accès à des ressources financières valorisées à des fins productives et respectueuses de l'environnement revêt une importance cruciale.

Aussi, réitérons-nous notre appui à votre initiative, qui entre en synergie avec le projet PAPE (Agroécologie & Protection Environnementale) autour de 3 Parcs Nationaux autour de Tuléar, auquel WHH alloue 1.640.000 euros pour la période de 2013 – 2016, et le projet BioCoton autour du parc de Mikea, auquel HELVETAS alloue 1.500.000 euros pour la période de 2012-2017. Il est envisagé d'augmenter nos actions dans cette zone vulnérable en acquérant de nouveaux projets pertinents dans les années à venir.

Vous souhaitant plein de succès dans ce projet, nous vous prions d'agréer, Monsieur le Représentant Résident du PNUD, l'expression de nos sentiments respectueux.



Jean-Philippe WARRY
 Représentant Résident
 WHH



Christian Steiner
 Directeur de Programme
 HELVETAS



HELNETAS Swiss Intercooperation
 B.P. / B044 Antananarivo 101
 MADAGASCAR



Antananarivo, le 04 mai 2015

Madame Edmée Ralalarisoa
Directeur Général de l'Environnement
et Point Focal Opérationnel GEF

Réf : 064/05/15/DE
Objet : Contribution financière de la Fondation Tany Meva pour le projet Atsimo Andrefana Landscape

Madame le Directeur Général,

Nous accusons réception de votre lettre s'enquérant de la contribution de la Fondation Tany Meva pour le projet cité en objet. Nous notons que le Point Focal Opérationnel National confirme le rôle de Tany Meva dans ce projet, mentionné dès 2011 dans le document d'identification dudit projet.

La Fondation Tany Meva œuvre dans le paysage Mikea, site prévu pour l'intervention du projet depuis plusieurs années. Actuellement, les différents fonds mobilisés pour la zone par Tany Meva (auprès de la Fondation MacArthur et la Fondation Helmsley) pour les activités (prévues se réaliser avant la fin de l'année 2016) est de 200,000 dollars américains.

Par ailleurs, le paysage Mikea en question figure parmi les zones clés de la biodiversité (KBA) éligibles pour le financement du CEPF (Critical Ecosystem Partnership Fund) dont Tany Meva a la charge pour toutes les îles de l'Océan Indien. L'enveloppe allouée au site n'est pas déterminée d'avance, mais la moyenne observée pour les demandes de financement déjà enregistrées est de l'ordre de 150,000 dollars américains.

Compte tenu de ces deux lignes de financement, la Fondation Tany Meva peut avancer une contribution financière de 350,000 dollars américains comme co-financement (matching fund) pour le projet de gestion du paysage Sud Ouest, objet de la présente.

Nous espérons que ces précisions satisfont vos attentes sur notre contribution financière pour le projet. Nous profitons de cette correspondance pour vous confirmer notre intérêt pour ce projet, et notre disposition à vous fournir des informations complémentaires si besoin est.

Dans l'attente, nous vous prions de croire, Madame le Directeur Général, l'assurance de nos considérations les meilleures.


Tovondriaka Rakotobe
Directeur Exécutif



Fondation environnementale Tany Meva

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MINISTERE DE L'AGRICULTURE

SECRETARIAT GENERAL

SERVICE DE L'ENVIRONNEMENT

N° 65 /15/ MinAgri/SG/SEnv

**A LA REPRESENTATION DU PNUD
MADAGASCAR**

Lettre d'engagement co-financement dans le cadre du projet PNUD-FEM-Gouvernement
« Approche de paysage à la conservation et à la gestion de la biodiversité menacée à Madagascar,
axée sur le paysage forestier épineux et sec d'Atsimo-Andrefana »

Réf : N° 40-15/MEEMF/SG/DGE du 03 Avril 2015

Antananarivo, le 27 MAI 2015

La présente lettre sert à confirmer que le Ministère de l'Agriculture, à travers son Projet de Réhabilitation des Infrastructures Agricoles du Sud-Ouest (PRIASO), contribuera au cofinancement du projet mentionné ci-dessus pour la période de 2015-2018. Le PRIASO est un projet de 5ans (2013-2018) et dispose d'un financement total hors taxe estimé à 32 086 000 UC soit approximativement 38 000 000 USD.

Ce montant représente des investissements et dépenses prévues dans le cadre de nos programmes d'activités déjà identifiés et planifiés, financés à travers le budget central de l'Etat alloué à notre institution de manière courante et avec l'aide de nos différents partenaires.

Plus spécifiquement, ce cofinancement contribuera à la réalisation des résultats du projet à l'égard de la Composante B du PRIASO : Renforcement des capacités et Développement agricole, incluant les activités suivantes

- B.1. Renforcement de capacités des Associations des Usagers de l'Eau (AUE)
- B.2. Appui à la sécurisation foncière
- B.3. Renforcement des chaînes de valeur agricole

Dans l'attente de la bonne démarche pour l'approbation du projet, je vous prie d'agréer l'assurance de notre haute considération.

Le Secrétaire Général *mn*



Voahangy ARIJAONA



REPOBLIKAN'I MADAGASIKARA
Fitiavana – Tanindrazana -Fandrosoana

MINISTRE DE L'ENERGIE ET DES HYDROCARBURES

AGENCE DE DEVELOPPEMENT
DE L'ELECTRIFICATION RURALE

N° 126 - 15/CSO/DT/ADER /

Antananarivo, le 15 MAI 2015

Le Secrétaire Exécutif

à

La Représentation du PNUD à Madagascar

Objet : Lettre d'engagement co-financement dans le cadre du projet PNUD-FEM-Gouvernement
« Approche de paysage à la conservation et à la gestion de la biodiversité menacée à Madagascar, axée sur le paysage forestier épineux et sec d'Atsimo-Andrefana »

La présente lettre sert à confirmer que l'Agence de Développement de l'Électrification Rurale (ADER) contribuera au cofinancement du projet mentionné ci-dessus pour la période de 2015 à 2016 et à un montant total d'environ 931 147 USD.

Ce montant représente le coût des investissements et dépenses prévues dans le cadre de nos programmes d'activités déjà identifiés et planifiés, financés avec l'aide de nos différents partenaires.

Plus spécifiquement, ce cofinancement contribuera à la réalisation des résultats du projet à l'égard des éléments suivants :

- mise en place des infrastructures électriques à partir de source hybride solaire- thermique diesel dans trois chefs-lieux des Communes Rurales de Saint Augustin, de Manombo Sud, d'Antanimieva dans les District de Toliara II et Morombe, de la Région d'Atsimo Andrefana, d'un montant de 351 724USD,
- mise en place des infrastructures électriques à partir de source hybride solaire- thermique diesel dans les villages d'Andavadoaka et de Befandefa dans la Commune Rurale de Befandefa dans les District de Morombe, de la Région d'Atsimo Andrefana, d'un montant de 579 423USD.

Nous tenons à vous informer que dans le cadre de la mise en œuvre de notre plan directeur indicatif pour l'électrification rurale, nous lancerons prochainement un appel à projet en vue de développer des projets d'électrification rurale dans les Régions d'Atsimo Andrefana, Anosy et Androy.

Dans l'attente de la bonne démarche pour l'approbation du projet, je vous prie d'agréer l'assurance de notre haute considération.

Mamiisoa RAKOTOARIMANANA

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GIZ PAGE/GIZ, BP 999 – Antananarivo 101

A la Représentation du PNUD à Madagascar

Lettre d'engagement co-financement
dans le cadre du projet PNUD-FEM-Gouvernement
< Approche de paysage à la conservation et à la gestion de la biodiversité
menacée à Madagascar,
axée sur le paysage forestier épineux et sec d'Atsimo-Andrefana >

La présente lettre sert à confirmer que la Deutsche Gesellschaft für Internationale Zusammenarbeit / GIZ, à travers le Programme Germano – Malgache PAGE (Programme d'Appui à la Gestion de l'Environnement) contribuera au cofinancement du projet mentionné ci-dessus pour la période de 2015 à 2016 et à un montant total jusqu'à 1.100.000,- USD.

Ce montant représente des investissements et dépenses prévues dans le cadre de nos programmes d'activités déjà identifiés et planifiés, financé par le Ministère fédéral pour la coopération économique et le développement (BMZ) et alloué à notre institution de manière courante et avec l'aide de nos différents partenaires.

Plus spécifiquement, ce cofinancement contribuera à la réalisation des résultats du projet à l'égard des éléments suivants :

- Protection et utilisation durable des ressources naturelles
- Professionnalisation de la chaîne de valeur par l'énergie en biomasse
- Planification territoriale communale et régionale
- Intégration de la durabilité écologique et sociale dans l'exploitation minière artisanale

Dans l'attente de la bonne démarche pour l'approbation du projet, je vous prie d'agréer l'assurance de notre haute considération.



Dr Hermann Fickinger
Coordonnateur Principal PAGE/GIZ

Cc : M. Alan Walsch, Directeur Résident de la GIZ à Madagascar

Coopération allemande au développement
Antananarivo

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Votre référence
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Antananarivo, 02 Juin 2015

Deutsche Gesellschaft für
Internationale Zusammenarbeit (GIZ) GmbH

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Président du conseil de surveillance
Hans-Jürgen Beerteltz, ex-Secrétaire d'État

Directrice
Tanja Gönner (présidente du directoire)
Dr Christoph Beier (vice-président du directoire)
Dr Hans-Joachim Preuß
Cornelia Richter

**Social and Environmental Screening
Checklist and Template (PRODOC
Annex 8)**

11 pages

PRODOC Annex 8. Social and Environmental Screening (separate file)

The completed template, which constitutes the Social and Environmental Screening Report, must be included as an annex to the Project Document. Please refer to the [Social and Environmental Screening Procedure](#) and [Toolkit](#) for guidance on how to answer the 6 questions.

Project Information

| Project Information | |
|-------------------------------------|---|
| 1. Project Title | A Landscape Approach to conserving and managing threatened Biodiversity in Madagascar with a focus on the Atsimo-Andrefana Spiny and Dry Forest Landscape |
| 2. Project Number | PIMS 5263, Atlas numbers tbd GEF Project ID 5486 |
| 3. Location (Global/Region/Country) | Madagascar |

Part A. Integrating Overarching Principles to Strengthen Social and Environmental Sustainability

QUESTION 1: How Does the Project Integrate the Overarching Principles in order to Strengthen Social and Environmental Sustainability?

Briefly describe in the space below how the Project mainstreams the human-rights based approach

- The project will mainstream the HRBA by ensuring that government institutions and legislation (as duty bearers) have the capacity to protect the rights of stakeholders with regard to land use planning in the target areas of the project.
- The obligations of the government, as the duty bearers, in charge of land use and development planning and law enforcement will be supported to ensure they may be duly enforced. The project will reinforce the capacities of government officials, and build a transparency system, enabling local communities, including all members (women, children and men) to duly participate in these processes.
- The project will build the capacity of civil society and the government to deal with emerging threats to biodiversity and to local livelihoods, posed by large scale private sector investments in mining, oil extraction and industrial agriculture which will potentially affect the capacity of the ecosystems to provide short and long term benefits to local community stakeholders, that are potentially threatening the sustainability of biodiversity (sustainability, connectivity, resilience) within existing Protected Areas of the region and fragile ecosystems that provide ecosystem services and benefits to local stakeholders.
- The project will provide support in institutionalizing existing Environmental Discussion Forums within the Ministry of Environment to consolidate a Multi-Stakeholder Platform to allow the general public to access information and increase their negotiating position vis a vis private sector investments when consultations take place.

QUESTION 1: How Does the Project Integrate the Overarching Principles in order to Strengthen Social and Environmental Sustainability?

- The project contains components of capacity building of the Government entities who are in charge of conducting oversight of the environmental mitigation measures contained within EIA's and Land Use Plans through Land Use planning tools (BD LUP) including a Regional Biodiversity Observatory. The latter will have a two way communication channel structure that will enable to apply checks and balances on activities that may pose threats to biodiversity and ecosystems, further enabling the Duty Bearers to protect the Right Holders. The Observatory will serve as an early warning system highlighting violations on the environmental measures contained within plans and contracts, in real time by enabling access to information to relevant law enforcement authorities, and triggering an early response and application of control mechanisms.
- In addition to ensuring the active participation of communities, the project will promote the creation of Community Conservation Areas (CCA), help define environmentally sustainable economic, social and cultural activities, for communities living in the CCA, and integrate these activities within higher level Land Use Planning. The project will enhance the institutional, legislative and law enforcement systems to protect these rights, and in this respect specifically work on building a secure land tenure system for community property within CCA's following the recommendations of the CBD and the AICHI Targets.
- The right holders, which are the local rural communities, including women, children and men, in addition to those living in urban areas, who also rely on the small scale farming activities which provide food to local markets, will be increasingly affected by the loss of livelihoods and benefits provided by ecosystems due to pollution linked to oil extraction and mining, and pesticides used in large scale agriculture (ex. Availability of fish, arable lands, due to the exhaustion of nutrients linked to pollution caused by oil extraction; health problem linked to polluted drinking water sources etc.). By building their capacity to participate in decision making and to be consulted prior to the development of large scale productive investments that may affect their livelihoods, their rights to a safe environment will be protected.
- The system set up by the project as a whole will enable the government to defend the rights of people to a safe environment and secure ecosystem based natural resource management.

Briefly describe in the space below how the Project is likely to improve gender equality and women's empowerment

- Through the project's approach the project will improve gender equality and empower women.
- The project has a gender approach, which is transversal and embedded within the implementation strategy. By conducting disaggregated socio-economic research, to understand the dynamics of environmental management at the community level in the project target sites. Gender sensitive research protocol, ex. engaging women and men separately in focus group discussions, defining survey questions and thematic areas for consultation with gender considerations, will provide key insight as to the differential management capacities, roles and responsibilities, and power of agency by women, men and children. This information will serve to guide the design and implementation of project activities, specifically with regard to land use planning, the management of natural resources at the community level, and the development of alternative livelihoods, which are three of the main components of the project.
- The project is based on the assumption that women, children and men have a differential power of agency in environmental management and that women's rights and power must be enhanced for the benefit of women and children, in addition to the benefits to the general households and the community as a whole.
- Project staff will use tools that enhance women's capacity to participate in all level of project activities; and gender considerations will be integrated within the full project cycle.

QUESTION 1: How Does the Project Integrate the Overarching Principles in order to Strengthen Social and Environmental Sustainability?

Briefly describe in the space below how the Project mainstreams environmental sustainability

- The project's objective is specifically to mainstream biodiversity and environmental sustainability within land use planning in the Atsimo Andrefana Region, located in the South West of Madagascar. The project will work to integrate environmental measures within national, regional and community level land use plans and within development plans at all levels. The Region is currently exposed to emerging threats to biodiversity by large scale private sector investments from extractive industries and industrial agriculture. Historical threats to Protected Areas and fragile ecosystems, such as encroachment by local communities, illegal logging and small scale agricultural expansion is thus compounded by new threats. Environmental sustainability considerations are not mainstreamed sufficiently within land use and development planning.
- The project strategy focuses specifically on building the knowledge of all stakeholders from the different sectors (private, government, civil society), providing tools, enhancing the capacity of institutions, and revising and advancing legislative frameworks to ensure that environmental measures are duly integrated within land management processes, that these measures are monitored and effectively implemented to mainstream environmental sustainability. In order to do so, the project will work with the Ministry of Environment and the Ministry in charge of Land Use Planning at the Regional Level to produce a Biodiversity Land Use Planning system and spatial planning tools.
- Participatory landscape-level economic assessments, ecological assessments, open access mapping, and management planning, and innovative information technology for spatial planning will be proposed by the project to improve the current land use planning processes that are outdated and do not ensure that biodiversity is managed in a sustainable way. Tools provided by the project will be flexible and provide up to date geo-referenced and spatial planning information and analyses that will be of easy access to the general public creating a system of checks and balances at all levels.
- The main product expected to be delivered by the project is a Biodiversity Land Use Planning Tool, which has a landscape management focus. The tool will facilitate (i) land use allocation for major developments that makes due account of the impacts of production activities on biodiversity; (ii) demarcation of the boundaries of existing Protected Areas; (iii) identification of areas of high biodiversity to be afforded higher protection status (as new PAs and Community Conservation Areas - CCAs); (iv) prescribing appropriate management practices in ecologically sensitive areas (including PA adjacent landscapes).
- The project will engage with the private sector formally within multi-stakeholder platforms coordinated by the Ministry of Environment to initiate negotiations pertaining to how to integrate environmental mitigation measures within their activities and project cycles (contracts with the government on off-setting and trade-off's) and how they may collaborate with environmental conservation and sustainability. The project will build the capacity of the government to engage in negotiations on Trade-off's between conservation and large scale investments that are harmful to the environment.

Part B. Identifying and Managing Social and Environmental Risks

| QUESTION 2: What are the Potential Social and Environmental Risks? <i>Note: Describe briefly potential social and environmental risks identified in Attachment 1 – Risk Screening Checklist (based on any “Yes” responses). If no risks have been identified in Attachment 1 then note “No Risks Identified” and skip to Question 4 and Select “Low Risk”. Questions 5 and 6 not required for Low Risk Projects.</i> | | QUESTION 3: What is the level of significance of the potential social and environmental risks? <i>Note: Respond to Questions 4 and 5 below before proceeding to Question 6</i> | | QUESTION 6: What social and environmental assessment and management measures have been conducted and/or are required to address potential risks (for Risks with Moderate and High Significance)? |
|--|-------------------------------------|--|--|--|
| <i>Risk Description</i> | <i>Impact and Probability (1-5)</i> | <i>Significance (Low, Moderate, High)</i> | <i>Comments</i> | <i>Description of assessment and management measures as reflected in the Project design. If ESIA or SESA is required note that the assessment should consider all potential impacts and risks.</i> |
| Risk 1: risk that duty-bearers do not have the capacity to meet their obligations in the Project | I = 2 P = 2 | Low | <p>The risk is low.</p> <p>The duty-bearer in the project is the government at all levels, and different sector ministries. Capacity building activities will be implemented to ensure the government develops the skills to ensure the rights of the communities targeted by the project.</p> | <p>The project aims to build the capacity of decision makers at all levels of government, involved in the design of land use planning. Although the project counterpart is the Ministry of Environment, it aims to work with sector ministries such as the Ministry in charge of Land Use Planning, the Ministry of Agriculture and the Ministry in charge of Mining and Oil investments.</p> <p>With project support, it is expected that the government (form the ministries mentioned above) at the national, regional, communal and municipal/fokontany level, as duty-bearers will enforce existing legislation regarding the application of environmental measures contained within codes, contracts, agreements etc. (Environmental Impact Assessments, Protected Areas, Land Use Management, Mining Code, Community Based Natural Resource Management Laws etc.) and that they are duly enforced. The project will develop a Transparency System (based on access to information and monitoring) and the required tools to improve the systems and processes pertaining to environmental sustainability and biodiversity conservation in the Region of Atsimo Andrefana. It will also build the capacity of the Government as the Duty Bearers to implement these systems.</p> |

| Risk Description | Impact and Probability (1-5) | Significance (Low, Moderate, High) | Comments | Description of assessment and management measures as reflected in the Project design. If ESIA or SESA is required note that the assessment should consider all potential impacts and risks. |
|---|-------------------------------------|---|---|--|
| | | | | <p>There is a risk that sector ministries do not have the willingness to participate actively with the project, because the project has a strong focus on Biodiversity Conservation. It will depend on the capacity of the Ministry of Environment as the coordinator of the project to mobilize other sector ministries to actively participate in project activities.</p> <p>In order to deal with this potential risk the project has built within its strategy to create an Environmental Working Group (within the Ministry of Environment) that will act as a multi-stakeholder platform. The platform will be coordinated by the Ministry of Environment but will have a Technical Council formed by members of sector ministries, the private sector and members of civil society. This will provide incentives to participate. A communication and awareness raising campaign will also be launched to gain further willingness to participate by productive sectors.</p> |
| Risk 2 risk that rights-holders do not have the capacity to claim their rights | I = 2 P = 2 | Low | <p>The risk to the project is low. The project has the aim to build the awareness of right-holders to claim their rights.</p> | <p>The project, will work on building government capacity to develop and apply norms that contain public consultation and participation as an environmental and social safeguard against potential breaches in contracts and environmental measures within laws by the extractive industry companies. Such regulations exist within development and land use planning legislation in addition to the mining code. Where gaps exist, the project will seek to integrate international standards through the revision of norms to ensure and enhance local participation and consultation.</p> <p>In addition, the project will work with local communities to raise awareness and enhance their knowledge on their rights and responsibilities with regards to natural resource management.</p> <p>The project focuses on safeguarding the rights of local communities from unilateral decision making by the government regarding large scale investments in mining, agricultural, and oil extraction, that are damaging to the ecosystems on which people depend on for their livelihoods; and from potential infractions by these private companies.</p> |

| Risk Description | Impact and Probability (1-5) | Significance (Low, Moderate, High) | Comments | Description of assessment and management measures as reflected in the Project design. If ESIA or SESA is required note that the assessment should consider all potential impacts and risks. |
|--|-------------------------------------|---|----------------------|--|
| Risk 3: Are any Project activities proposed within or adjacent to critical habitats and/or environmentally sensitive areas, including legally protected areas (e.g. nature reserve, national park), areas proposed for protection, or recognized as such by authoritative sources and/or indigenous peoples or local communities? | I = 1 P = 5 | Low | | The conservation activities proposed by the project seek to enhance existing Protected Areas, reinforce community based natural resource management in the environmentally sensitive areas adjacent to these PA, and create new community conservation areas. The latter have been identified by the project, in its development phase, in areas adjacent and within existing PA's. The project aims to safeguard the natural capital of these areas and enhance the livelihoods of local communities in addition to their capacity to manage the CCA's in an environmentally sound way. |
| Risk 4: Would the potential outcomes of the Project be sensitive or vulnerable to potential impacts of climate change? | I = 1 P = 3 | Moderate | | The Region of Atsimo Andrefana, which is located in the South West of Madagascar is particularly vulnerable to climate change (refer to the threats analysis section of the PRODOC for further detail on climate change projections for the SW region). The region is prone to natural disasters such as cyclones, and related flooding which potentially affect the area every year. With predicted climatic changes cyclones will tend to intensify. The project will work with communities living in and around Protected Areas in the region. Project activities that enhance livelihoods may be affected by natural disasters and the effects of climate change. In order to counterbalance these effects, the project's activities will integrate climate change adaptation considerations building the resilience of local communities and related project activities. |
| [add additional rows as needed] | | | | |
| QUESTION 4: What is the overall Project risk categorization? | | | | |
| Select one (see SESP for guidance) | | | | |
| | | | Low Risk | <input checked="" type="checkbox"/> |
| | | | Moderate Risk | <input type="checkbox"/> |
| | | | High Risk | <input type="checkbox"/> |
| QUESTION 5: Based on the identified risks and risk categorization, what requirements of the SES are relevant? | | | | |

| Risk Description | Impact and Probability (1-5) | Significance (Low, Moderate, High) | Comments | Description of assessment and management measures as reflected in the Project design. If ESIA or SESA is required note that the assessment should consider all potential impacts and risks. |
|-------------------------|---|---|-----------------|--|
| | Check all that apply | | | Comments |
| | Principle 1: Human Rights | <input type="checkbox"/> | | |
| | Principle 2: Gender Equality and Women's Empowerment | <input type="checkbox"/> | | |
| | 1. Biodiversity Conservation and Natural Resource Management | <input type="checkbox"/> | | |
| | 2. Climate Change Mitigation and Adaptation | <input type="checkbox"/> | | |
| | 3. Community Health, Safety and Working Conditions | <input type="checkbox"/> | | |
| | 4. Cultural Heritage | <input type="checkbox"/> | | |
| | 5. Displacement and Resettlement | <input type="checkbox"/> | | |
| | 6. Indigenous Peoples | <input type="checkbox"/> | | |
| | 7. Pollution Prevention and Resource Efficiency | <input type="checkbox"/> | | |

Final Sign Off

| Signature | Date | Description |
|------------------|-------------|---|
| QA Assessor | | UNDP staff member responsible for the Project, typically a UNDP Programme Officer. Final signature confirms they have "checked" to ensure that the SESP is adequately conducted. |
| QA Approver | | UNDP senior manager, typically the UNDP Deputy Country Director (DCD), Country Director (CD), Deputy Resident Representative (DRR), or Resident Representative (RR). The QA Approver cannot also be the QA Assessor. Final signature confirms they have "cleared" the SESP prior to submittal to the PAC. |
| PAC Chair | | UNDP chair of the PAC. In some cases PAC Chair may also be the QA Approver. Final signature confirms that the SESP was considered as part of the project appraisal and considered in recommendations of the PAC. |

SESP Attachment 1. Social and Environmental Risk Screening Checklist

| Checklist Potential Social and Environmental Risks | | Answer (Yes/No) |
|--|--|------------------------|
| Principles 1: Human Rights | | |
| 1. | Could the Project lead to adverse impacts on enjoyment of the human rights (civil, political, economic, social or cultural) of the affected population and particularly of marginalized groups? | NO |
| 2. | Is there a likelihood that the Project would have inequitable or discriminatory adverse impacts on affected populations, particularly people living in poverty or marginalized or excluded individuals or groups? ¹ | NO |
| 3. | Could the Project potentially restrict availability, quality of and access to resources or basic services, in particular to marginalized individuals or groups? | NO |
| 4. | Is there a likelihood that the Project would exclude any potentially affected stakeholders, in particular marginalized groups, from fully participating in decisions that may affect them? | NO |
| 5. | Is there a risk that duty-bearers do not have the capacity to meet their obligations in the Project? | YES |
| 6. | Is there a risk that rights-holders do not have the capacity to claim their rights? | YES |
| 7. | Have local communities or individuals, given the opportunity, raised human rights concerns regarding the Project during the stakeholder engagement process? | NO |
| 8. | Is there a risk that the Project would exacerbate conflicts among and/or the risk of violence to project-affected communities and individuals? | NO |
| Principle 2: Gender Equality and Women's Empowerment | | |
| 1. | Is there a likelihood that the proposed Project would have adverse impacts on gender equality and/or the situation of women and girls? | NO |
| 2. | Would the Project potentially reproduce discriminations against women based on gender, especially regarding participation in design and implementation or access to opportunities and benefits? | NO |
| 3. | Have women's groups/leaders raised gender equality concerns regarding the Project during the stakeholder engagement process and has this been included in the overall Project proposal and in the risk assessment? | NO |
| 4. | Would the Project potentially limit women's ability to use, develop and protect natural resources, taking into account different roles and positions of women and men in accessing environmental goods and services? <i>For example, activities that could lead to natural resources degradation or depletion in communities who depend on these resources for their livelihoods and well being</i> | NO |
| Principle 3: Environmental Sustainability: Screening questions 3 regarding environmental risks are encompassed by the specific Standard-related questions below | | |
| Standard 1: Biodiversity Conservation and Sustainable Natural Resource Management | | |
| 1.1 | Would the Project potentially cause adverse impacts to habitats (e.g. modified, natural, and critical habitats) and/or ecosystems and ecosystem services? | NO |

¹ Prohibited grounds of discrimination include race, ethnicity, gender, age, language, disability, sexual orientation, religion, political or other opinion, national or social or geographical origin, property, birth or other status including as an indigenous person or as a member of a minority. References to "women and men" or similar is understood to include women and men, boys and girls, and other groups discriminated against based on their gender identities, such as transgender people and transsexuals.

| Checklist Potential Social and Environmental Risks | | |
|--|--|-----|
| | <i>For example, through habitat loss, conversion or degradation, fragmentation, hydrological changes</i> | |
| 1.2 | Are any Project activities proposed within or adjacent to critical habitats and/or environmentally sensitive areas, including legally protected areas (e.g. nature reserve, national park), areas proposed for protection, or recognized as such by authoritative sources and/or indigenous peoples or local communities? | YES |
| 1.3 | Does the Project involve changes to the use of lands and resources that may have adverse impacts on habitats, ecosystems, and/or livelihoods? (Note: if restrictions and/or limitations of access to lands would apply, refer to Standard 5) | NO |
| 1.4 | Would Project activities pose risks to endangered species? | NO |
| 1.5 | Would the Project pose a risk of introducing invasive alien species? | NO |
| 1.6 | Does the Project involve harvesting of natural forests, plantation development, or reforestation? | NO |
| 1.7 | Does the Project involve the production and/or harvesting of fish populations or other aquatic species? | NO |
| 1.8 | Does the Project involve significant extraction, diversion or containment of surface or ground water? <i>For example, construction of dams, reservoirs, river basin developments, groundwater extraction</i> | NO |
| 1.9 | Does the Project involve utilization of genetic resources? (e.g. collection and/or harvesting, commercial development) | NO |
| 1.10 | Would the Project generate potential adverse transboundary or global environmental concerns? | NO |
| 1.11 | Would the Project result in secondary or consequential development activities which could lead to adverse social and environmental effects, or would it generate cumulative impacts with other known existing or planned activities in the area? <i>For example, a new road through forested lands will generate direct environmental and social impacts (e.g. felling of trees, earthworks, potential relocation of inhabitants). The new road may also facilitate encroachment on lands by illegal settlers or generate unplanned commercial development along the route, potentially in sensitive areas. These are indirect, secondary, or induced impacts that need to be considered. Also, if similar developments in the same forested area are planned, then cumulative impacts of multiple activities (even if not part of the same Project) need to be considered.</i> | NO |
| Standard 2: Climate Change Mitigation and Adaptation | | |
| 2.1 | Will the proposed Project result in significant ² greenhouse gas emissions or may exacerbate climate change? | NO |
| 2.2 | Would the potential outcomes of the Project be sensitive or vulnerable to potential impacts of climate change? | YES |
| 2.3 | Is the proposed Project likely to directly or indirectly increase social and environmental vulnerability to climate change now or in the future (also known as maladaptive practices)? <i>For example, changes to land use planning may encourage further development of floodplains, potentially increasing the population's vulnerability to climate change, specifically flooding</i> | NO |
| Standard 3: Community Health, Safety and Working Conditions | | |
| 3.1 | Would elements of Project construction, operation, or decommissioning pose potential safety risks to local communities? | NO |

² In regards to CO₂, 'significant emissions' corresponds generally to more than 25,000 tons per year (from both direct and indirect sources). [The Guidance Note on Climate Change Mitigation and Adaptation provides additional information on GHG emissions.]

| Checklist Potential Social and Environmental Risks | | |
|---|---|----|
| 3.2 | Would the Project pose potential risks to community health and safety due to the transport, storage, and use and/or disposal of hazardous or dangerous materials (e.g. explosives, fuel and other chemicals during construction and operation)? | NO |
| 3.3 | Does the Project involve large-scale infrastructure development (e.g. dams, roads, buildings)? | NO |
| 3.4 | Would failure of structural elements of the Project pose risks to communities? (e.g. collapse of buildings or infrastructure) | NO |
| 3.5 | Would the proposed Project be susceptible to or lead to increased vulnerability to earthquakes, subsidence, landslides, erosion, flooding or extreme climatic conditions? | NO |
| 3.6 | Would the Project result in potential increased health risks (e.g. from water-borne or other vector-borne diseases or communicable infections such as HIV/AIDS)? | NO |
| 3.7 | Does the Project pose potential risks and vulnerabilities related to occupational health and safety due to physical, chemical, biological, and radiological hazards during Project construction, operation, or decommissioning? | NO |
| 3.8 | Does the Project involve support for employment or livelihoods that may fail to comply with national and international labor standards (i.e. principles and standards of ILO fundamental conventions)? | NO |
| 3.9 | Does the Project engage security personnel that may pose a potential risk to health and safety of communities and/or individuals (e.g. due to a lack of adequate training or accountability)? | NO |
| Standard 4: Cultural Heritage | | |
| 4.1 | Will the proposed Project result in interventions that would potentially adversely impact sites, structures, or objects with historical, cultural, artistic, traditional or religious values or intangible forms of culture (e.g. knowledge, innovations, practices)? (Note: Projects intended to protect and conserve Cultural Heritage may also have inadvertent adverse impacts) | NO |
| 4.2 | Does the Project propose utilizing tangible and/or intangible forms of cultural heritage for commercial or other purposes? | NO |
| Standard 5: Displacement and Resettlement | | |
| 5.1 | Would the Project potentially involve temporary or permanent and full or partial physical displacement? | NO |
| 5.2 | Would the Project possibly result in economic displacement (e.g. loss of assets or access to resources due to land acquisition or access restrictions – even in the absence of physical relocation)? | NO |
| 5.3 | Is there a risk that the Project would lead to forced evictions? ³ | NO |
| 5.4 | Would the proposed Project possibly affect land tenure arrangements and/or community based property rights/customary rights to land, territories and/or resources? | NO |
| Standard 6: Indigenous Peoples | | |
| 6.1 | Are indigenous peoples present in the Project area (including Project area of influence)? | NO |
| 6.2 | Is it likely that the Project or portions of the Project will be located on lands and territories claimed by indigenous peoples? | NO |
| 6.3 | Would the proposed Project potentially affect the human rights, lands, natural resources, territories, and traditional livelihoods of indigenous peoples (regardless of whether indigenous peoples possess the legal | NO |

³ Forced evictions include acts and/or omissions involving the coerced or involuntary displacement of individuals, groups, or communities from homes and/or lands and common property resources that were occupied or depended upon, thus eliminating the ability of an individual, group, or community to reside or work in a particular dwelling, residence, or location without the provision of, and access to, appropriate forms of legal or other protections.

| Checklist Potential Social and Environmental Risks | | |
|---|---|----|
| | <p>titles to such areas, whether the Project is located within or outside of the lands and territories inhabited by the affected peoples, or whether the indigenous peoples are recognized as indigenous peoples by the country in question)?</p> <p><i>If the answer to the screening question 6.3 is “yes” the potential risk impacts are considered potentially severe and/or critical and the Project would be categorized as either Moderate or High Risk.</i></p> | |
| 6.4 | Has there been an absence of culturally appropriate consultations carried out with the objective of achieving FPIC on matters that may affect the rights and interests, lands, resources, territories and traditional livelihoods of the indigenous peoples concerned? | NO |
| 6.5 | Does the proposed Project involve the utilization and/or commercial development of natural resources on lands and territories claimed by indigenous peoples? | NO |
| 6.6 | Is there a potential for forced eviction or the whole or partial physical or economic displacement of indigenous peoples, including through access restrictions to lands, territories, and resources? | NO |
| 6.7 | Would the Project adversely affect the development priorities of indigenous peoples as defined by them? | NO |
| 6.8 | Would the Project potentially affect the physical and cultural survival of indigenous peoples? | NO |
| 6.9 | Would the Project potentially affect the Cultural Heritage of indigenous peoples, including through the commercialization or use of their traditional knowledge and practices? | NO |
| Standard 7: Pollution Prevention and Resource Efficiency | | |
| 7.1 | Would the Project potentially result in the release of pollutants to the environment due to routine or non-routine circumstances with the potential for adverse local, regional, and/or transboundary impacts? | NO |
| 7.2 | Would the proposed Project potentially result in the generation of waste (both hazardous and non-hazardous)? | NO |
| 7.3 | <p>Will the proposed Project potentially involve the manufacture, trade, release, and/or use of hazardous chemicals and/or materials? Does the Project propose use of chemicals or materials subject to international bans or phase-outs?</p> <p><i>For example, DDT, PCBs and other chemicals listed in international conventions such as the Stockholm Conventions on Persistent Organic Pollutants or the Montreal Protocol</i></p> | NO |
| 7.4 | Will the proposed Project involve the application of pesticides that may have a negative effect on the environment or human health? | NO |
| 7.5 | Does the Project include activities that require significant consumption of raw materials, energy, and/or water? | NO |

**PPG Study 2 (PRODOC Annex 7):
Report, PPG activities, BDLUP,
technical fonctionnal and
environnemental requirement, Djoan
Bonfils, Avril 2015**

17 pages

REPORT - PPG Activities

**BDLUP technical, functional and organisational
requirements**

**A Landscape Approach to conserving and managing
threatened Biodiversity in Madagascar with a focus
on the Atsimo Andrefana Spiny and Dry Forest
Landscape**

Djoan Bonfils, Juin 2015

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Introduction: Landscape approach and BDLUP

The landscape approach of the biodiversity conservation implies that conservation interventions are not confined to the boundaries of protected areas, and must also integrate and manage various types of land use including protection, restoration, but also industrial, agricultural and livelihood related usages in order to produce environmental, economic and social benefits. Therefore a concerted and integrated mainstreaming approach must take in account biodiversity, and enable collaboration between the various stakeholders (Government, NGOs, economic actors, and civil society).

The primary objective of the **BDLUP tool (Biodiversity Land Use Planning)** is to facilitate this concerted approach by providing a relevant geo-spatial information for planning of land use as well along with monitoring and warning system to address real-time threats

Thematic, technical and organizational of the **BDLUP** components:

1. Thematic component: a set of synthetic geo-spatial layers providing relevant information on biodiversity and other relevant thematic data allowing the realization of a a **Plan of Recommendations on Land-Uses based on a Biodiversity Component (PRLUBC)**
2. Technical component: An opened geospatial Portal providing a set of decision-making support tools online with:
 - a. A geographic information system supporting the planning of land use that can be used at local level for individual sites based on **the PRLUBC**
 - b. A catalog application to manage geo-spatial resources and a digital document management system
3. Organizational component: **An Observatory for Regional Biodiversity and Ecosystems (ORBE)**, responsible for the maintenance and update of data, the formulation of recommendations and evaluations for land-use proposals, the issue of monitoring and warnings alerts based on the aforementioned system

1. BDLUP, technical and functional characteristics

1.1. Purpose of BDLUP

We have already mentioned that the first objective of the BDLUP is to be a tool for promoting the mainstreaming of biodiversity for the Atismo-Andrefana region. To fulfill this mission the BDLUP consists in a **Portal** grouping several topics and features online.

The portal will provide access to an **online mapping system** for viewing and querying the available spatial data layers. **The online Geographic Information System** will also provide a **Toolbox for land-use planning** offering advanced functionalities for various user profiles or stakeholders.

The portal will also propose an online catalog software harboring these data. This application, which features will be detailed later, will also allow data and documents storage and search. Data access will also be possible by downloading files and/or their associated metadata, the application will also consist in a **document management system**.

Furthermore the portal will be a communication tool for **the biodiversity Observatory** which will issue bulletins and alerts broadcasted through the website but also through social networks. We'll details each of these features in the following sections.

1.2. Online Geographic Information System (WebGIS)

Thematic information layers

During our survey on the State of Madagascar national land use management systems, we realized that many spatial datasets (topography, administrative boundaries, infrastructure, populated places...) actually existed but were not regrouped into a centralized portal or data warehouse. It is a global trend to centralize national datasets within open and free access portals allowing the sharing of information. Allowing free access to data through portals and data catalogs facilitates scientific research and, as a positive side effect, contributes to the production of new synthetic data.

It is therefore relevant to provide access to up to baseline datasets on land cover/land use within the proposed open Web portal. In addition, because the BDLUP focuses on the management of biodiversity, it will propose synthetic spatial datasets on ecology and biodiversity derived from research, analysis and synthesis updated on a regular basis.

The main deliverable from this analysis and synthesis exercise mentioned earlier will allow the realization of a **systematic biodiversity Plan (PRLUBC)** that identifies priority areas for biodiversity conservation within the landscape. With the limited resources available for biodiversity conservation it is important to have a mechanism to prioritize areas for conservation action.

Systematic biodiversity planning uses a rigorous, data-driven approach to identify geographic priorities for biodiversity conservation. It represents best available science internationally and is the standard approach to biodiversity planning

Layers of external sources to the project

- **International data services** accessible through various data fetching protocols (WMS, WFS, or other...)
 - Google maps Layers(Earth, Physical, Streets)
 - Global Forest Watch forest cover layers
 - Global Forest Watch Fires layers
 - Landsat 8 imagery - monthly update
 - Other relevant services...
- **National datasets** (in production phase the project team will be responsible for **coordination** with the providing institutions and will carry out data acquisition and update)
 - TFM BD 500, 200, 100
 - main towns and villages, populated place
 - hydrographic network
 - transportation network
 - administrative boundaries
 - Infrastructures
 - Topography
 - Pedology
 - mining claims and titles
 - Madagascar protected area system data (SAPM):
 - Protected area Protected areas with a temporary status
 - New protected areas
 - Important Sites for Conservation
 - Potential Sites for Conservation
 - Key biodiversity areas (KBA) according to experts opinions (Conservation International)

Layers of internal source (produced by project resources in collaboration with partners)

Synthetic data production, carried out by project resource persons in collaboration with partners during year 1 of the project:

- Cartography of ecosystems and land use
- Indicator of degradation of ecosystems (critical, endangered, vulnerable)
- Indicator of human the pressure due to the use of resources
- Important areas for the maintenance of regional ecological processes
- Sub-watersheds, critical areas in terms of ecological services maintenance, water supply , water quality
- Extensive use of experts to map biodiversity hotspots
- Areas of endemism and rare and/or endangered species and irreplaceable Sites
- Mapping and design of important ecological corridors networks
- geo-alert layers from crowd-sourcing, violation reports, reports on event of perpetrated damage to the environment

Layer for the Plan of Recommendations on Land-Uses based on a Biodiversity component (PRLUBC)

The synthetic datasets production described previously will result from a collaboration between experts in GIS, biodiversity fields and will lead to the development of a systematic biodiversity plan: **the Plan of Recommendations on Land-Uses based on Biodiversity (PRLUBC)**.

The key characteristics of this systematic biodiversity plan are:

- The principle of representation: the need to conserve a representative sample of all biodiversity pattern (ecosystems and species).
- The principle of persistence: the need to maintain ecological processes that allow ecosystems to function and enable biodiversity to persist in the long term.
- The setting of quantitative biodiversity targets for biodiversity features, indicating how much of each feature is required in order to conserve a representative sample of biodiversity pattern and key ecological processes.
- Spatial efficiency (meeting biodiversity targets as efficiently as possible in terms of the amount of land required), and conflict avoidance (where possible avoiding conflict with other land uses).

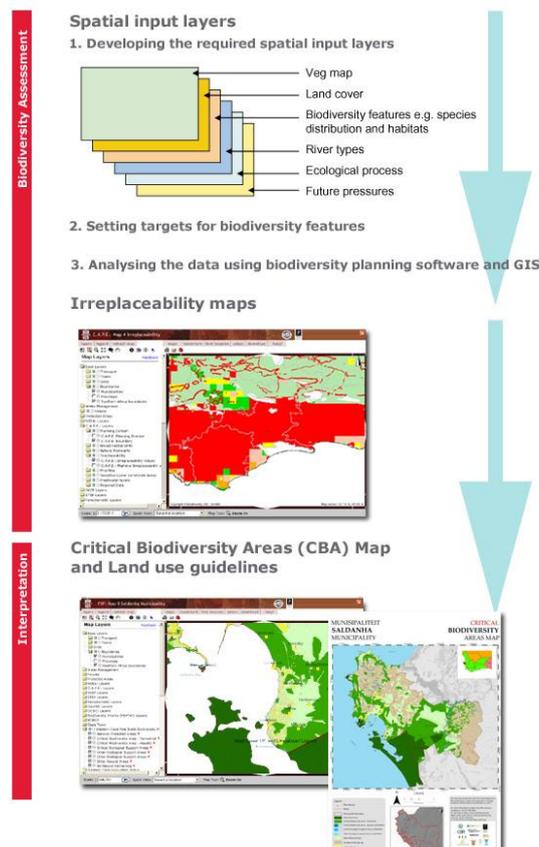


Figure 1 systematic biodiversity plan production

In his final product form, the **PRLUBC** for the Atsimo-Andrefana region will consists in a geo-spatial data layer mapping important areas for the conservation of biodiversity patterns across the landscape associated with a land use recommendation classes. The realization of this end product will rely on following datasets production:

- A map of ecosystems at an appropriate level (1: 50 000) with higher resolution mapping for riparian zones and wetlands.
- Identification of **critical Biodiversity areas** including the needed areas for conservation of biodiversity patterns and corridors necessary for maintaining connectivity in the landscape and which should be kept or operated in a measured manner
- identification of **areas of support** for the maintenance of ecological services (wetlands, riparian zones, sub-watersheds important for water supply)

Classes of land use recommendations compatible with area categories, for example:

| Category of areas | Management objectives | Types of use |
|--|--|---|
| Critical areas for biodiversity | Maintain in its natural state or almost Rehabilitation of degraded areas Limit degradation | Prohibit intensive or extensive agriculture Sustainable use in consultation with communities First goal: conservation |
| Support areas for ecological services | Maintain their services | extensive agriculture establish a threshold of development / transformation |
| Other natural or already degraded areas | The intensive development in these areas | Areas suitable for intensive use |

Previous table shows a 3 types of zone, but of course these 3 General classes described above can be decomposed into more precise sub-classes along with derived land use compatible activities. Consider next table as an exploded view of previous one

Table 1 : Plan of Recommendations on Land-Uses based on Biodiversity (PRLUBC)

| | | | 1 : GO | | 2 : RESTRICTED | | | | 3 : NO-GO | | | | | | | |
|-----------------------------|--|--|---------------------|------------------------------|-------------------|--------------------|----------------|-------------------|-----------------|-----------------|--------------------|-------------------------------|-------------------|-------------|-------------------|-------------------------|
| Category | Description | Conservation at the landscape level objectives | Strict conservation | conservation and restoration | Extensive farming | Tourism activities | Village, camps | Extensive culture | Intensive farms | Irrigated crops | Urban developments | Major infrastructure projects | Linear structures | Water pipes | Underground mines | Surface mines, quarries |
| Protected area | Protected areas with status | Maintain the natural state with little or no loss of biodiversity | 1 | 1 | 3 | 2 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 |
| KBA 1: irreplaceable Sites | The most important areas for biodiversity conservation | Maintain in a natural state without further loss of biodiversity | 1 | 1 | 1 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 2 | 3 | 3 | 3 |
| KBA 2: important areas | Other known areas of high biodiversity value | Maintain landscapes close to the natural state, conservation of biodiversity patterns, limited ecological processes loss | 1 | 1 | 1 | 2 | 2 | 3 | 3 | 3 | 3 | 3 | 2 | 2 | 1 | 3 |
| Ecological support services | Areas of support for resources (water, ecological corridors, subsistence...) | Maintain landscapes close to the natural state, conservation of biodiversity patterns, limited ecological processes loss | 1 | 1 | 1 | 2 | 2 | 2 | 3 | 2 | 3 | 2 | 2 | 2 | 1 | 2 |
| Other natural areas | Areas of natural vegetation where land was not cultivated, may mining activity | Functional landscapes: manage land to maintain basic ecological processes | 1 | 2 | 1 | 1 | 2 | 1 | 3 | 1 | 2 | 2 | 2 | 2 | 1 | 2 |
| Agricultural land | Land grown with little or no natural vegetation | Sustainable management | 1 | 2 | 1 | 1 | 1 | 1 | 3 | 1 | 1 | 1 | 2 | 2 | 2 | 2 |
| Human infrastructure | Urban areas and roads | Sustainable management | 1 | 3 | 1 | 1 | 1 | 1 | 3 | 1 | 1 | 1 | 2 | 2 | 2 | 2 |

The different land use / land cover categories described in previous table are represented spatially on a regional map. The land-use matrix will be stored in a geospatial database as a series of attribute for the area category. The final resulting map can be spatially queried with proposed development or infrastructure footprint spatial data. The Output of the spatial query will provide advices regarding the compatibility of projects or activities footprints with conservation guidelines associated with area category.

For example, a KBA 2 area could harbor some community managed hunting activities since the corresponding management objective allow a measured use of resources (not exceeding a threshold for natural regeneration).

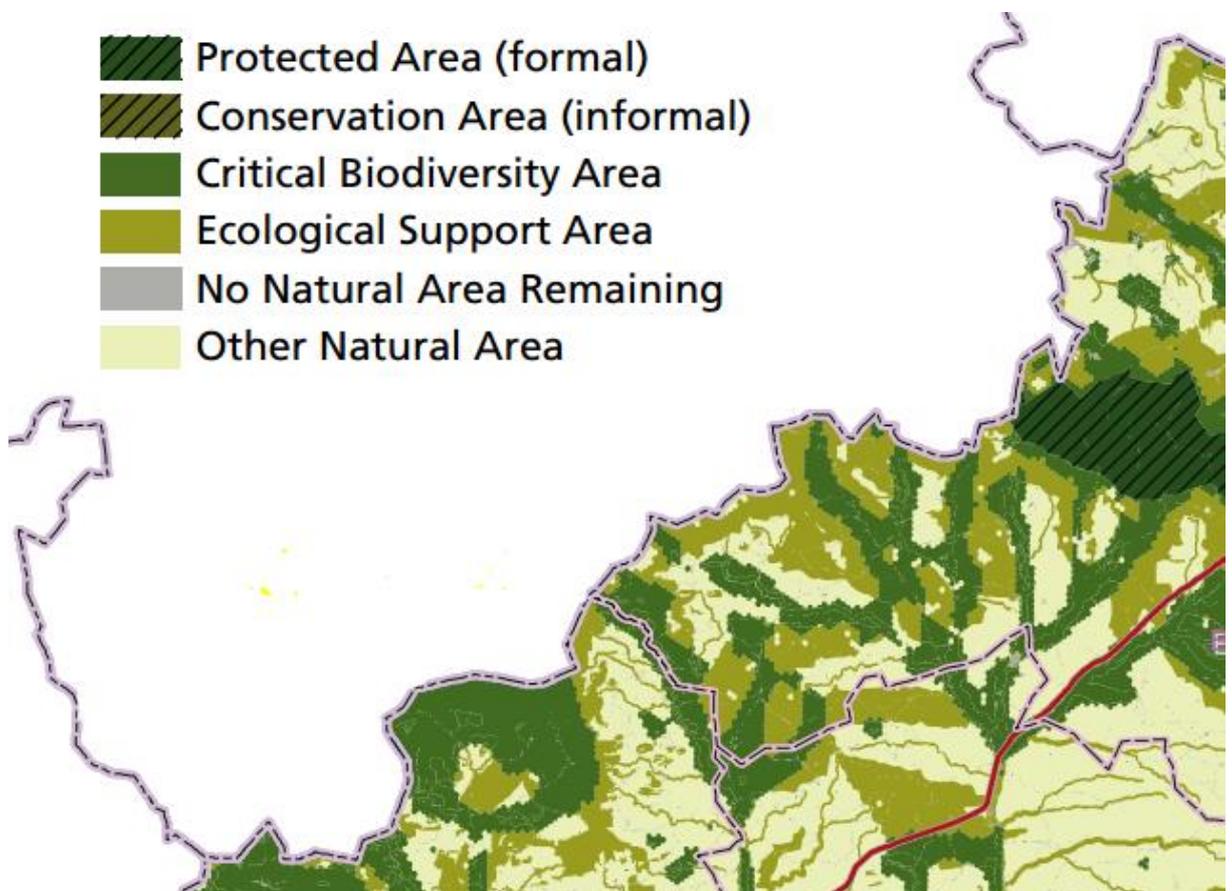


Figure 2 Example of a spatialized Plan of Recommendations on Land-Uses based on Biodiversity (PRLUBC)

The Plan of Recommendations on Land-Uses based on a Biodiversity component (PRLUBC) is a **The Systematic biodiversity plan**, a synthetic spatial layer that can be appended to the SRAT in his static form (a map), it will be also accompanied by a series of guidelines in tabular and narrative form. This is therefore a static input to SRAT but this *Systematic biodiversity plan* may also be dynamically queried dynamically through the online GIS. It can then assist planners and managers feeding into a wide range of multi-sectoral plans and assessments including spatial development frameworks, environmental assessments, environmental management plans and integrated development planning.

Data storage display and querying

Web mapping is the process of providing tiles or images issued by a map server through the Internet to an end user accessing data through a client (web browser). The WebGIS has therefore two major components a server side system and a client side system.

Server side: Geospatial server

Previously described thematic spatial data are hosted on a **server** where data layers are stored as records in a relational database system, or in the form of vector and matrix files. These layers of geo-spatial information are broadcasted over the Internet through a service that provide to the web client tiles (images) or vector data. Server-side configuration specify the stylization of the layers and the logical conditions of their rendering.

Client side: WebGIS Client

The second component consists in a **web client** accessible through a standard browser that allows any authorized user logged to have access to the spatial layers of information previously organized and structured for an intuitive consultation and query. Client-side configuration will allow to hierarchically organize the spatial layers in a structured way, and is used to instantiate widgets (controls) to perform operation and queries on data. The system we'll the following toolsets:

- *A standard WebGis toolbox allowing to*

- show/hide layers
- Zoom in/out
- Control layers transparency
- Query a layer and display associated tabular data
- Perform dynamic transactions with the server by clicking on a location or delineating an area
- Print a cartographic composition

- *The LUP Toolbox (Land Use Planning Toolbox)*

the LUP Toolbox aims to assist planners and environmentalists by providing a set of controls integrated into the Web Client which will allow to extract the most important biodiversity information for a given an area of the region. The information is then summarized in an on-demand **automatic report** (containing maps and guidelines, indications and contraindications) and **exportable map** will facilitate the process of consultations, deliberations and decision when one may wish to assess the possible impacts of development or change in land use.

The report contains data that are specific to **the area or the footprint** defined by a free hand delimitation widget within the web-client or through importation **of a vector data** (point, line, or polygon) representing the activity or project footprint. The system must be able to process spatial query with intersection of theses footprints and, among others spatial layers, the *Systematic biodiversity plan*. The

Exportable and printable report will contain area-specific information in the form of synthetic tabular summaries and a map centered on to the impacted zone:

- The list of ecosystems threatened area
- The types of vegetation in the area
- Remaining portions of primary forest
- Pedology
- sub-watersheds and wetlands
- Formal and informal Protected areas
- Statistical information (at districts, communes and fokontany levels) impacted by development
- classes of the *Systematic biodiversity plan* contained in the footprint or analysis area and associated guidelines

Before producing the report, a dialog box will allow the user to specify the expected development or infrastructure type, a predefined list of choices will be offered. Account will be taken of this choice and the system will issue to an advice on the proposed development.

Features of the LUP Toolbox:

- Edit control to draw: point, line, polygon
- Geometry importation tool
- Control to specify a bounding box by coordinates of longitude and latitude
- Control allowing the export of the report and dialog box to select the type of development

The ergonomic design for ease of use of the toolbox will allow to quickly obtain information about a potential impact but also to test **mitigations strategies** by enabling testing of alternative footprints and issuing quick assessments.

1.3. Geocatalog: a cataloging application for spatially referenced resources and document management system

The Geocatalog

The **Geocatalog** allows the search and access to geographical resources through metadata that meet the ISO 19115 standard. It aims to promote the sharing and use of relevant and quality geographical data to support decision making. This data and metadata sharing tool will facilitate synergy between stakeholders.

The **Geocatalog** will offer access spatial layers to available to download or simply referenced through consultation of their metadata (data on the data) to obtain the necessary information on the nature, the type, the scale, the date of production and any other relevant information in order to:

- help users to identify the data that may be helpful
- assist producers to facilitate the access of their spatial data to potential users
- the exchange of spatial data between organizations by the distribution of metadata
- provide sharable standard format metadata allowing potential users to use data knowing the context of their production

Document management system on environment for the Atsimo-Andrefana region

The document management system allows the "archiving" of digital documents or metadata on these documents. It provides automatic indexing and searching of content functionalities as well as the generation and use of descriptive metadata. It facilitates the resolution of storage problems, facilitates tracking and acquisition of documents. Here again the idea is to make them available or simply advertise their existence. Exchange and share of biodiversity related research literature will facilitate the synergy between stakeholders.

1.4. Technical (Hardware and software) system architecture

Technically speaking, nothing prevents all the previously mentioned features to be grouped within a single application, many Open Source applications can be used for this purpose.

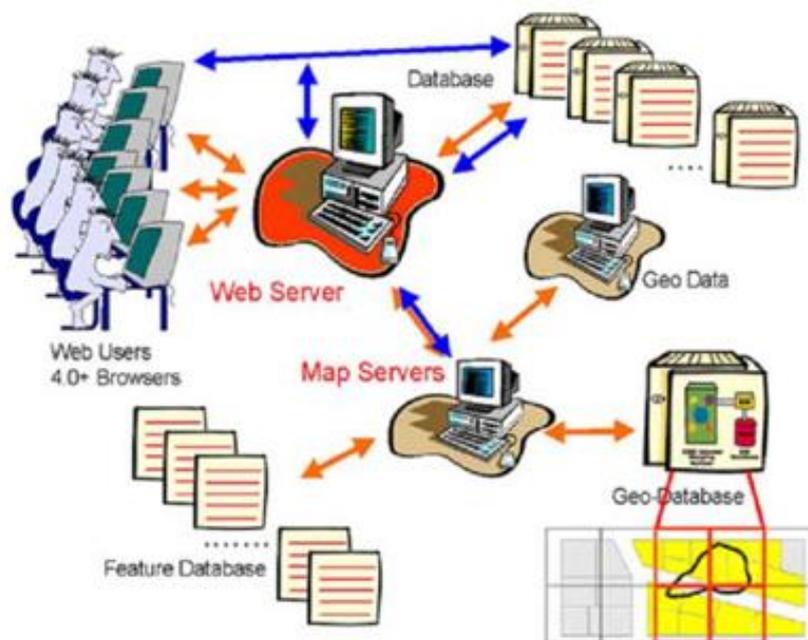


Figure 3 example of WebGis system architecture, note that Webserver, Dataserver and Mapserver can physically be hosted on a single server

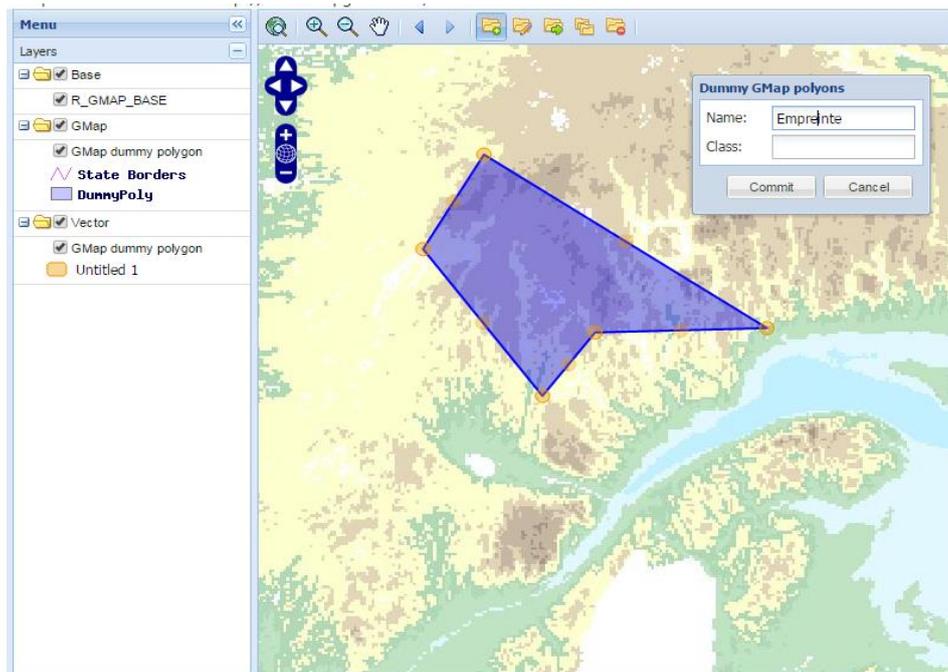


Figure 4 Geoprisma, an Open Source mapping client based on Open Layers featuring many querying functionalities, XML tags configuration

Software (services installed on the server)

A cocktail of Open Source Solutions offering good users community support can be used to avoid recurring costs. The system architecture is based on a set of services that can be hosted by a single physical server:

- o **Web server** Apache: Apache HTTP Server free software (www.apache.org) is an HTTP created and maintained within the Apache Foundation Server. It is the most popular HTTP server on the World Wide Web. It is distributed under the terms of the Apache license.
- o **Content Management System (CMS)** for the Portal: WordPress (www.wordpress.org), Joomla and other CMS Open Source
- o **Cartographic web mapping client** with JavaScript API (display, fetching of geospatial data), many free solutions exist and have all more or less similar functionalities: Geoprisma (www.geoprisma.org), OpenLayers (www.openlayers.org) or other
- o **Map server** (Issued in the form of tiles, or vector geospatial data): Mapserver (www.mapserver.org) or Geoserver (www.geoserver.org) are both OpenSource solutions enjoying a very good support from the community. MapServer and Geoserver are all part of "Open Source Geospatial Foundation" which is one of the most dynamic and most innovative communities in this area.
- o **Data service** (files and databases): PostgreSQL with PostGIS extension (postgis.net). PostGIS allows geospatial support for PostgreSQL database systems. Very well interfaced with Mapserver, PostgreSQL is also fully compatible with certain cartographic clients popular at the present moment like CartoDB.
- o **Reporting service** : JasperReport (community.jaspersoft.com) is a robust free license reporting service that has been proven valuable since almost a decade. Allows creation

of dynamic reports, it also interfaces very well with a PostgreSQL database and also enables to generate embed maps on the fly.

- o **GeoCatalog and Document mangament system:** GeoNetwork (geonetwork - opensource.org) is an Open Source application, based on ISO standards, offering the ability to effectively manage metadata for spatially referenced data. It offers an easy to use web interface to search geospatial data across multiple catalogs. The search provides full-text search as well as faceted search on keywords, resource types, organizations, scale ... Users can easily refine the search and quickly gets to the records of interests. GeoSpatial layers, but also services, maps or even non geographic datasets can be described in the catalog. Easily navigate across records and find sources or services publishing a dataset.

Hardware

A dedicated or shared reliable and efficient Web hosting UNIX web server. The location of hosting of the system can be anywhere on the planet. It must take into account the reliability of the hoster, its reactivity in terms of technical support, the width of its bandwidth and the response time.

2. Observatory for Regional Biodiversity and Ecosystems (ORBE): the organizational counterpart of the BDLUP

An observation and information platform, a liaison role between stakeholders

A biodiversity Observatory is an Observatory of the environment, specifically intended for the observation of biological diversity at the regional level. The members of this Observatory will work in a multidisciplinary context which will involve networking of experts. We think here of stakeholders of the region in the conservation sector should be regularly consulted and even maybe associated into a formal consultation platform.

The biodiversity observatories have mission to fill important gaps in knowledge. They should do so by observing the biodiversity, qualitatively and quantitatively by collecting, centralizing and synthesizing data on the theme of biodiversity, in the form of indicators for the mapping, monitoring, and for the management and the evaluation of conservation policies. Members of the Observatory will be responsible for the maintenance and update of the BDLUP data.

One of the main roles of the ORBE is also to broadcast the information to create a synergy between the partners thanks to its privileged position. Indeed the idea of an Observatory evokes a high and isolated place where you can observe the whole landscape. The ORBE therefore enjoys an overall vision that allows a better coordination and diffusion of information through the various stakeholders. One of these communications tools is the web portal that will be used to broadcast information on the web and to reach individuals through social networks.

Monitoring and alerts Role

Because of its “elevated” position, the Observatory should be the best asset also to spot the dangers appearing on the horizon while remaining away from the noise. Even if very well connected to the social network, the Observatory must retain a certain independence to fulfill without constraint its duty of surveillance and warning. Being responsible for the data maintenance and update, the Observatory is very aware of the State of ecosystems throughout the region and has access to near real time environmental data. The Observatory is in a privileged position to give the alert, inform and increase continuously the knowledge about the biodiversity in the Atsimo-andrefana region

Consulting Role

Stakeholders, economic and social actors may also challenge the Observatory for consulting, for advice on infrastructure projects impacts. During the realization of regional land management plans (SRAT, PRD), the Observatory and its members will be able to play an active role in the production of these plans.

3. Implementation: Activities and timetable

Development of the BDLUP (year 1)

Activities

| | | | | | | | | | | | | | |
|---|--|---|---|---|---|---|---|---|---|---|----|----|----|
| 1 | Data gathering and production | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 |
| 2 | Technical infrastructure set up | | | | | | | | | | | | |
| 3 | WebGis Developpment and implementation | | | | | | | | | | | | |
| 4 | Geocatalog and Document management system | | | | | | | | | | | | |
| 5 | portal CMS set up | | | | | | | | | | | | |
| 6 | Production deployment and data integration | | | | | | | | | | | | |

Staff

- a programmer-analyst specialized in development of Web Gis solutions (1 year)
- a data entry agent (3 months)
- a GIS specialist to produce the synthetic geospatial layers and the **PRLUBC**
- an expert in biodiversity supporting the GIS specialist for the realization of the synthetic geospatial layers and the **PRLUBC**

| | | |
|---|--|---|
| 1 | Data gathering and production | GIS & BIODIVERSITY EXPERTS |
| 2 | Technical infrastructure set up | PROGRAMMER ANALYST |
| 3 | WebGis Developpment and implementation | PROGRAMMER ANALYST |
| 4 | Geocatalog and Document management system | PROGRAMMER ANALYST |
| 5 | portal CMS set up | PROGRAMMER ANALYST |
| 6 | Production deployment and data integration | PROGRAMMER ANALYST, GIS & BIODIVERSITY EXPERT, DATA ENTRY AGENT |

Note: the GIS and biodiversity experts should be members of the Observatory and assume the maintenance and support of the system after implementation.

Implementation and identification of recurrent activities of the Observatory (year 2)

Recurring activities

- harvest and update of spatial data (monthly, annually)
- maintenance and support of the BDLUP
- alert, consulting and coordination

Staff

- a GIS specialist performing the synthetic layers and **PRUSCB** (duration of the project)
- an expert in biodiversity **PRUSCB** (duration of the project)

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PRODOC Figures in Medium Resolution

40 pages



United Nations Development Programme
Government of Madagascar Global
Environment Facility

PRODOC FIGURES IN MEDIUM RESOLUTION

English version (v.051215)

**A Landscape Approach to conserving and managing
threatened Biodiversity in Madagascar with a focus on the
Atsimo Andrefana Spiny and Dry Forest Landscape**

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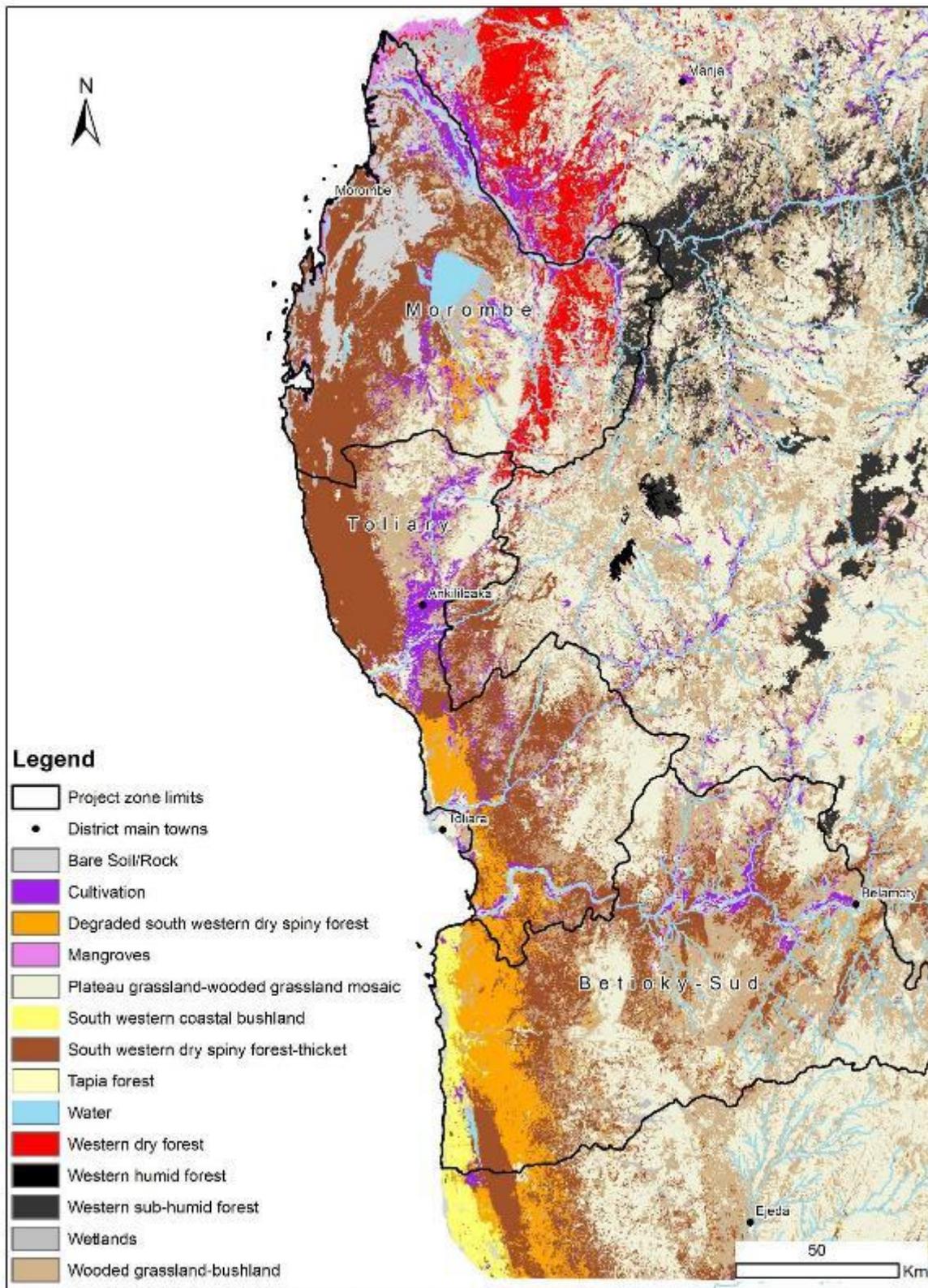
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Figure 2: Dry spiny forest, Atsimo Andrefana, Madagascar



Figure 3: Map of Protected Areas in the study area (SAPM 2013)



Sources : Rebioma Atlas de la végétation Madagascar 2008, Hansen Global Forest Cover 2014, Landsat Décembre 2014
 Auteur : Djoan Bonfils 2014

Figure 4: Map of ecosystems in the study area (Landsat Classification December 8, 2014, Hansen Global Forest cover, Atlas of the Rebioma vegetation 2008)

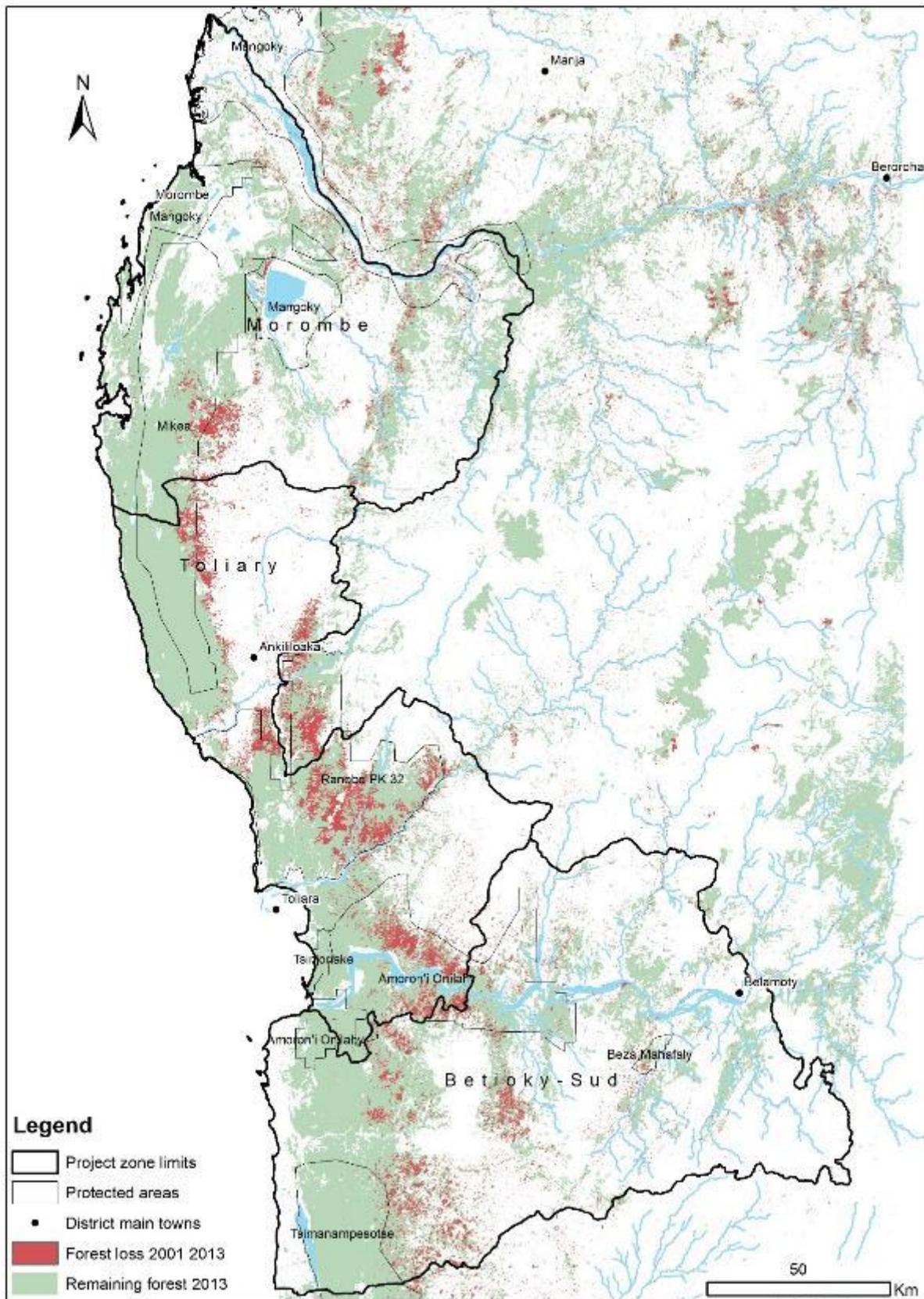


Figure 6: Map of the deforestation of the study area 2000 - 2013 (Hansen GFC2014)

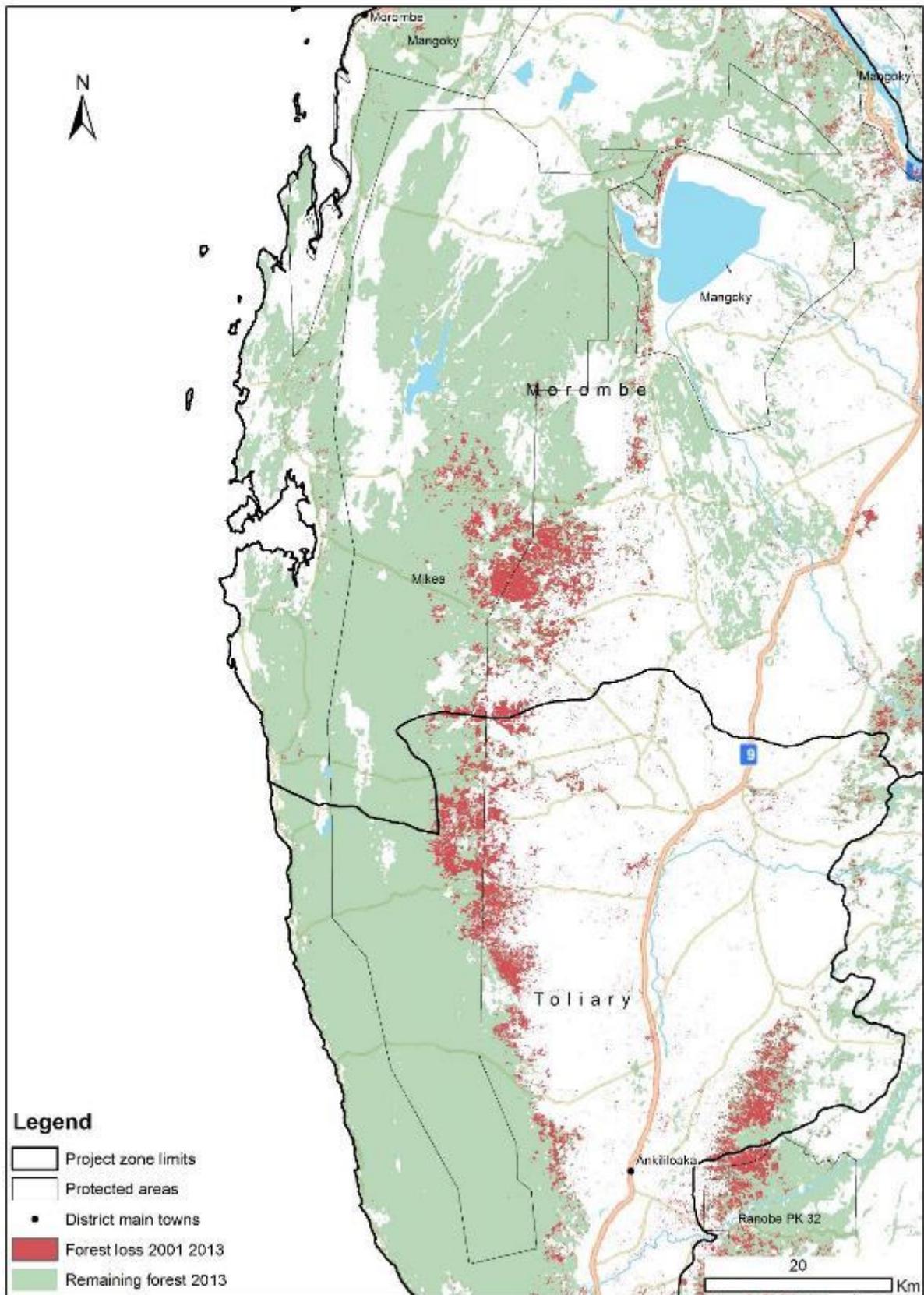


Figure 7: Deforestation to the east of Mikea (Hansen GFC2014)

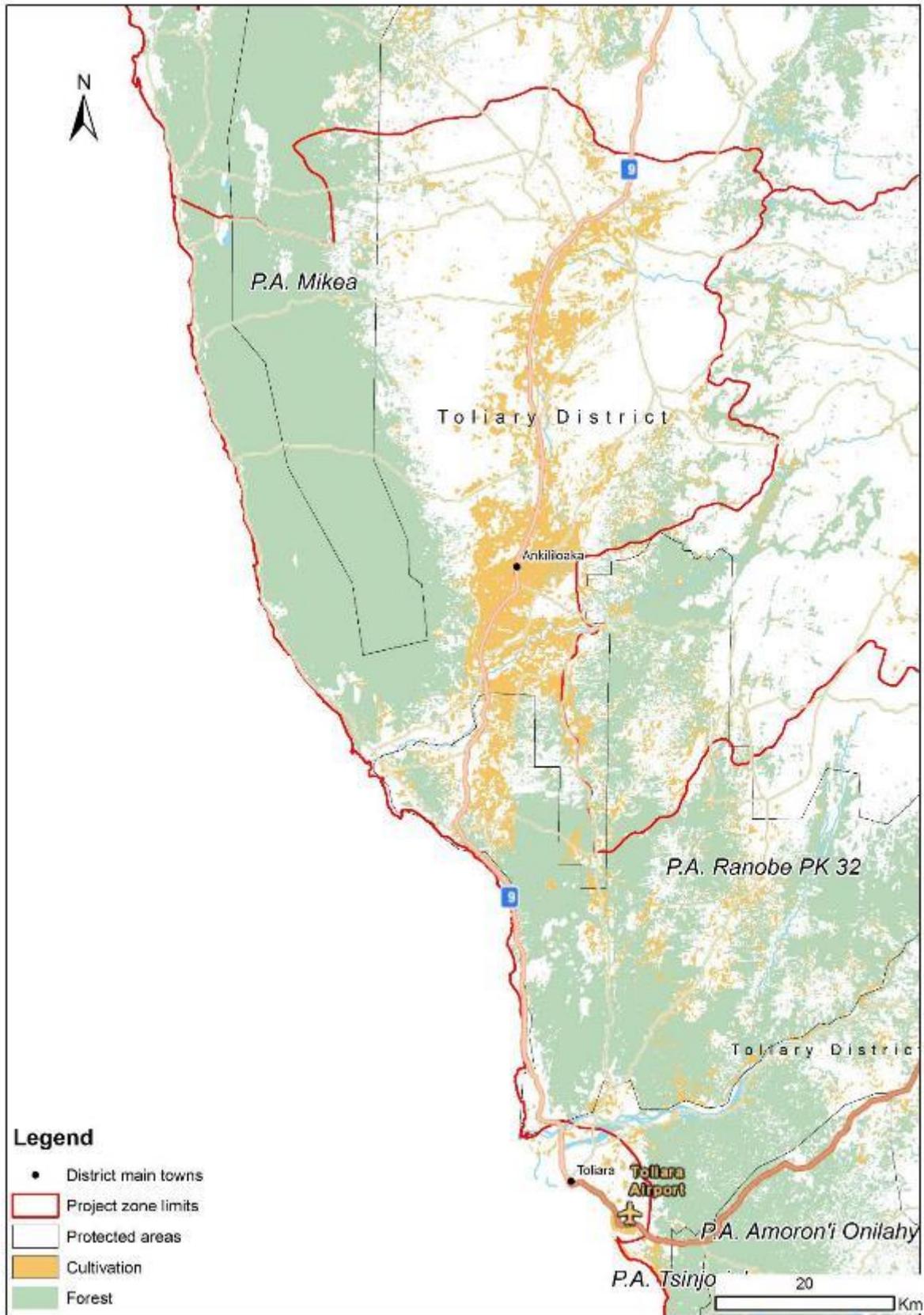


Figure 8: Main sectors where agricultural practices are intensifying (Ankililoaka)

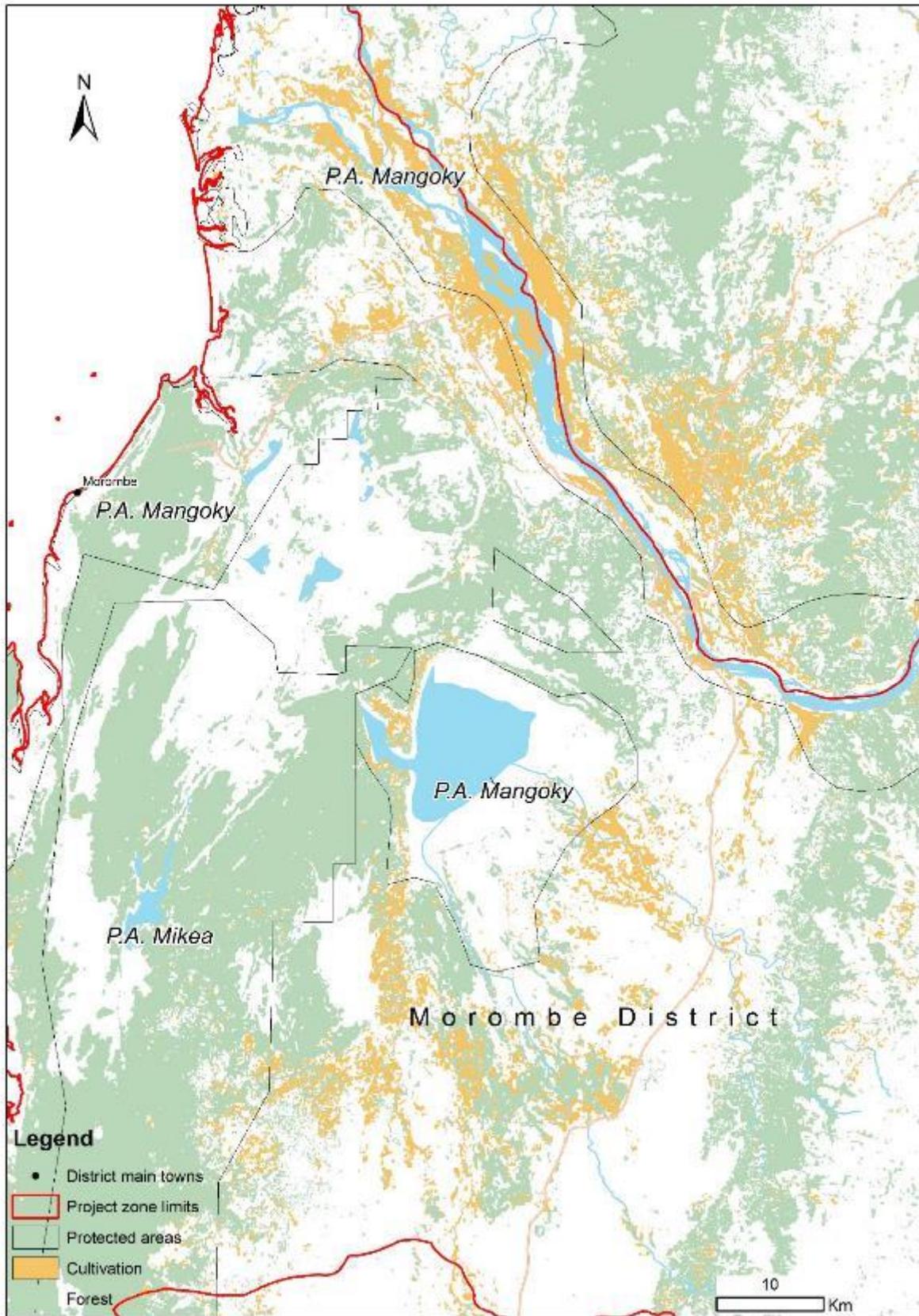
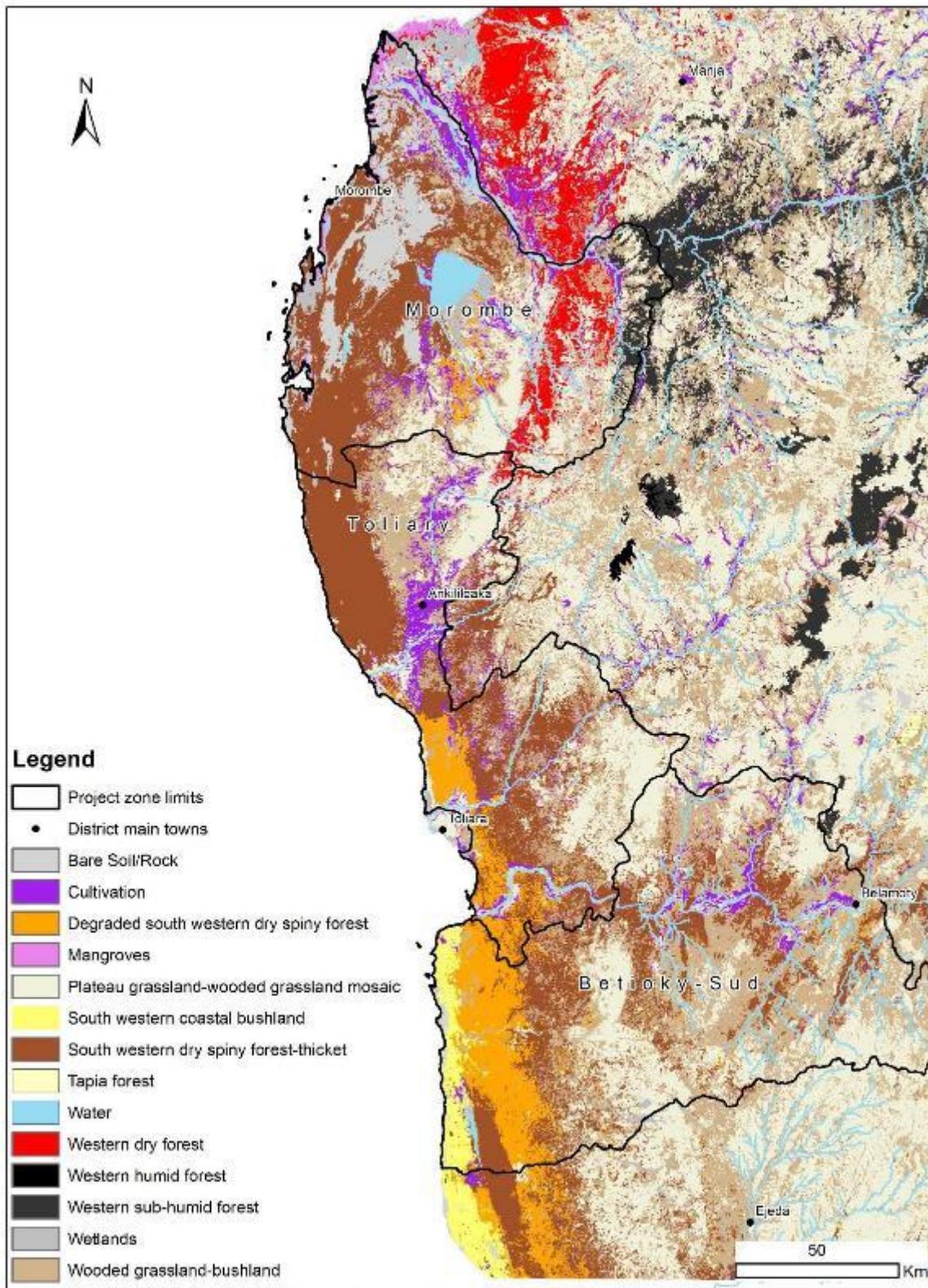


Figure 9: Main sectors where agricultural practices are gaining in intensity (Morombe)



Figure 10: Project focus districts in Atimo-Andrefana region



Sources : Rebioma Atlas de la végétation Madagascar 2008, Hanser Global Forest Cover 2014, Landsat Décembre 2014
 Auteur : Djoan Bonfils 2014

Figure 11: project focus zone ecosystems in Atimo-Andrefana region

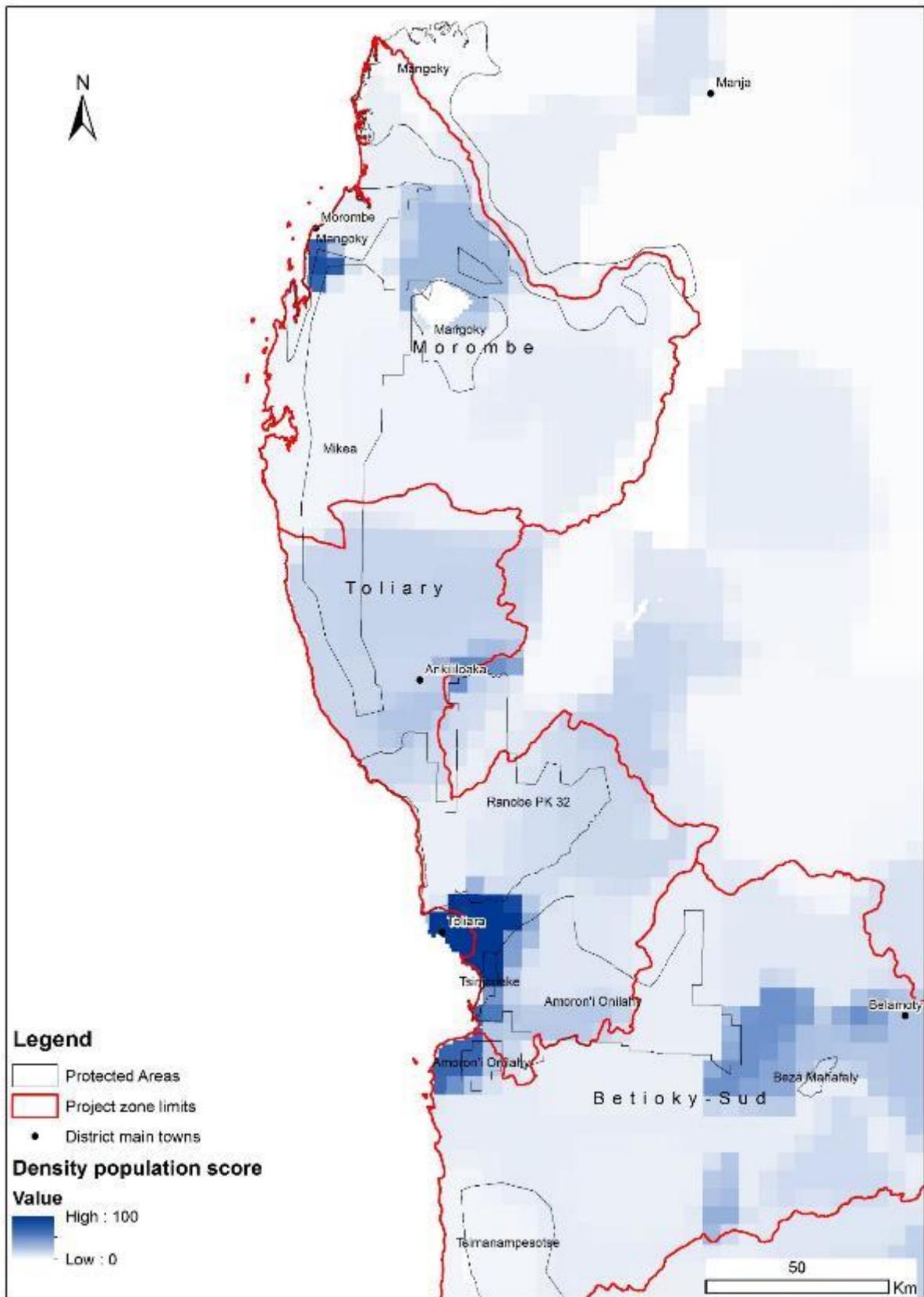


Figure 12: Population density score map

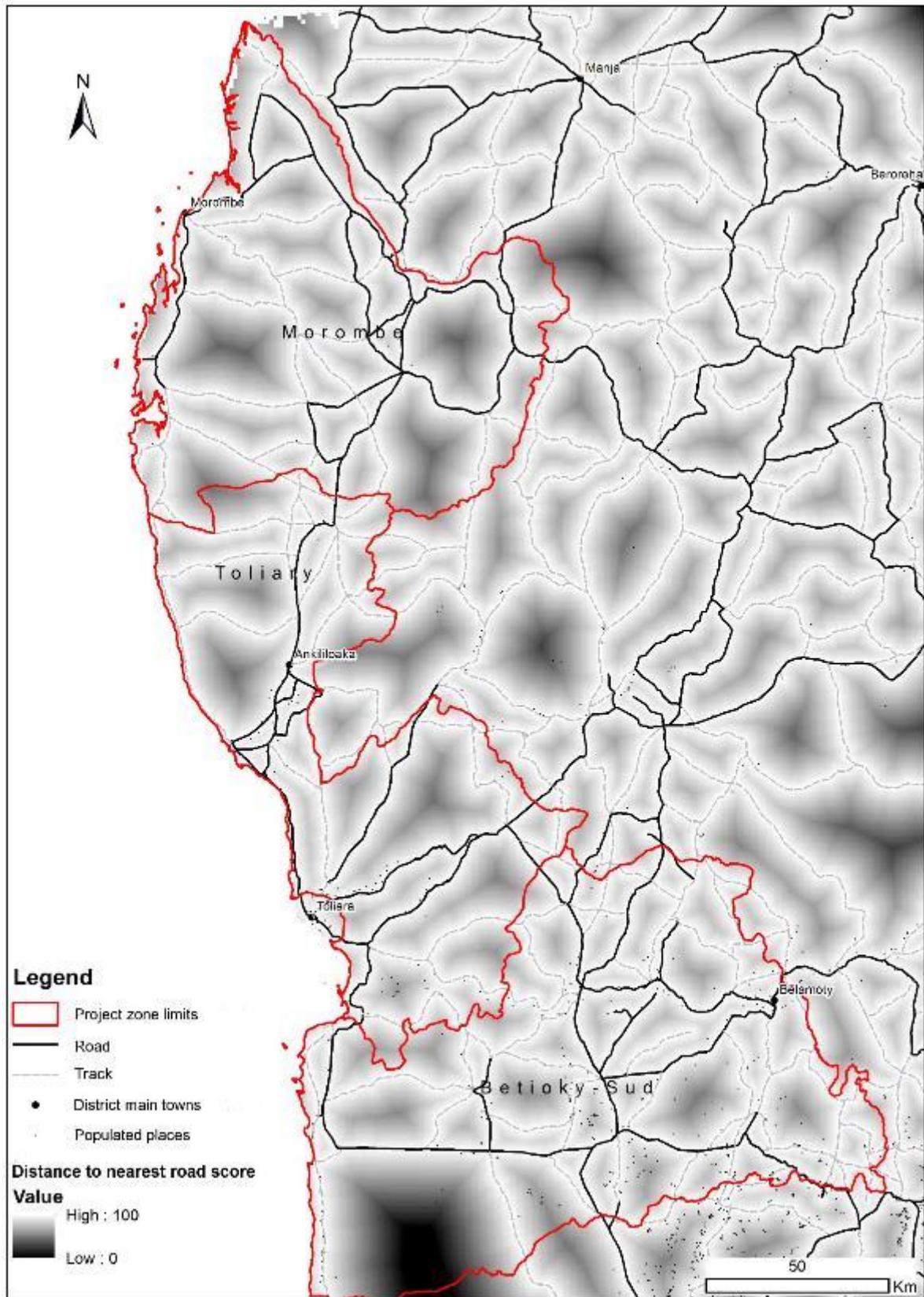


Figure 13: Impact of road network score map

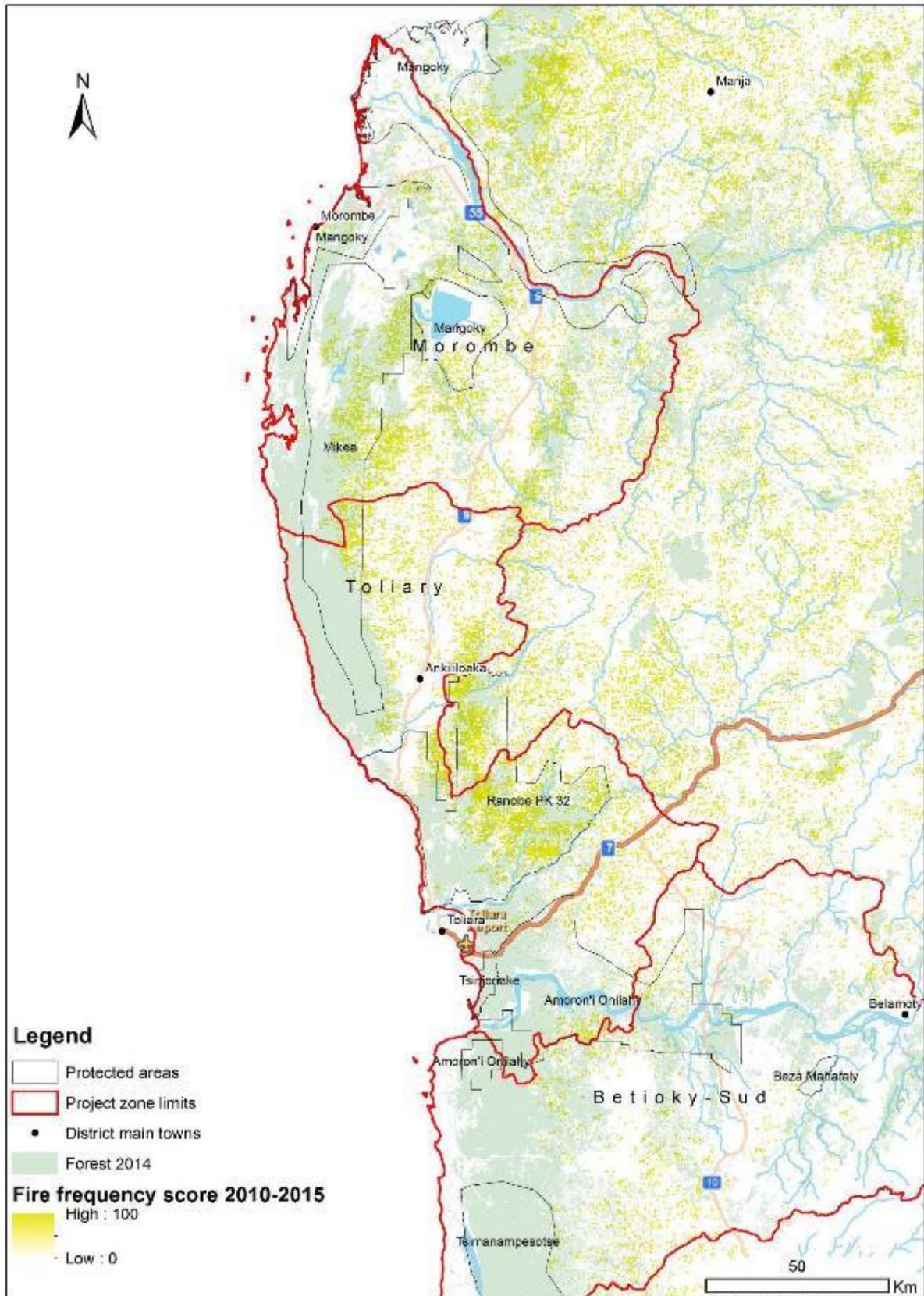


Figure 14: Intensity of bush fires score 2010 – 2015 map

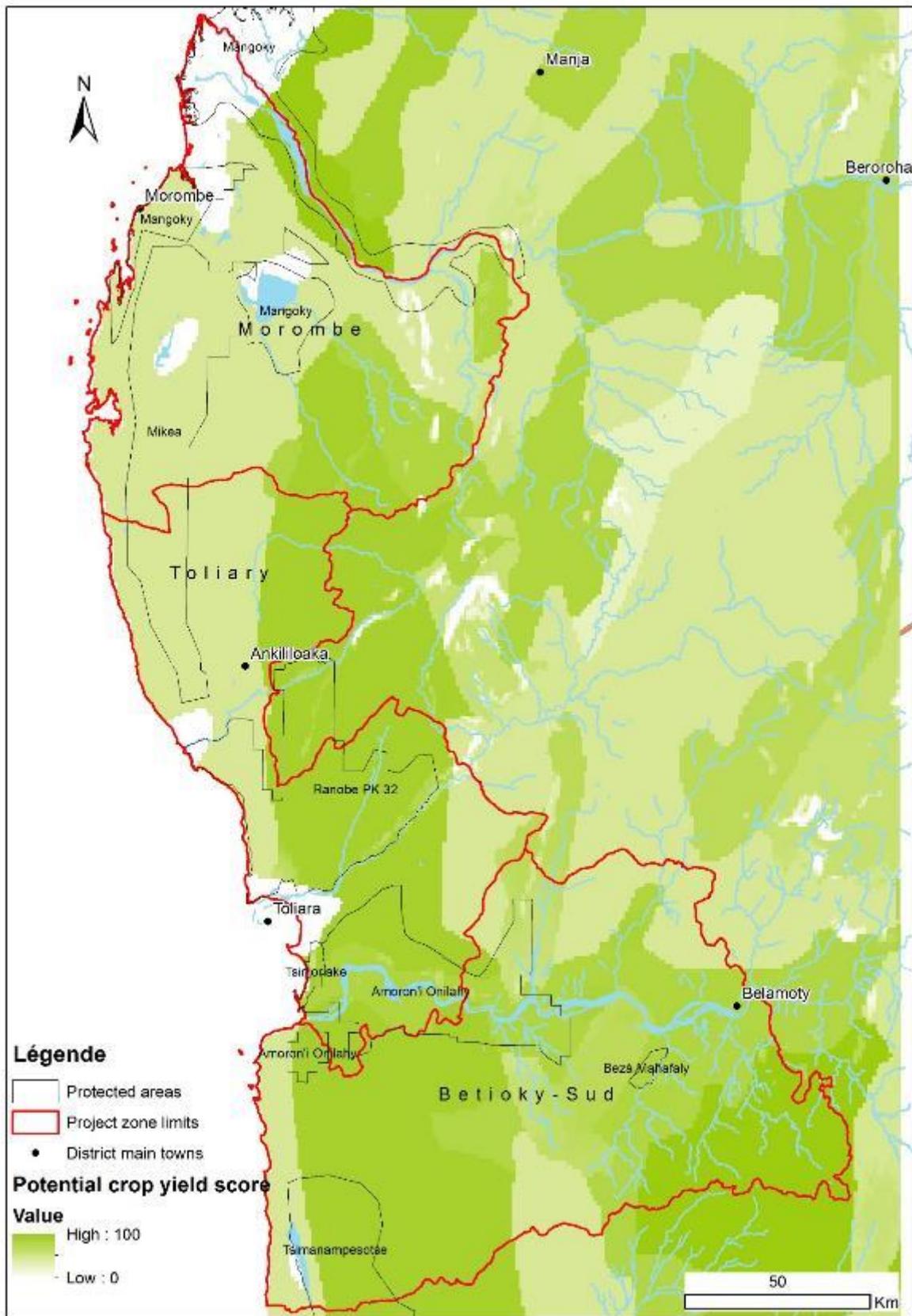


Figure 15: Potential yield score 2011-2040 map

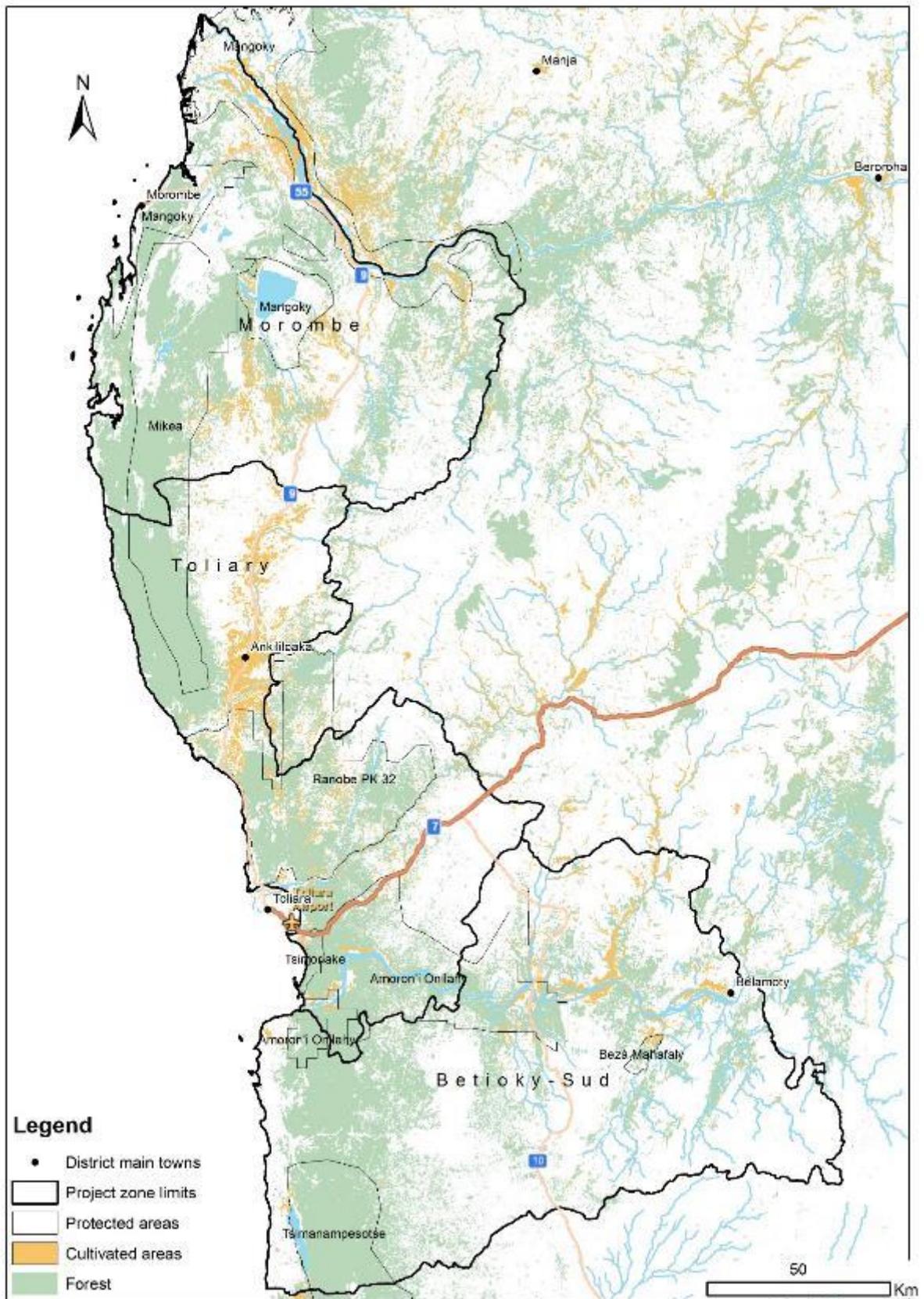


Figure 16: Cultivated areas map

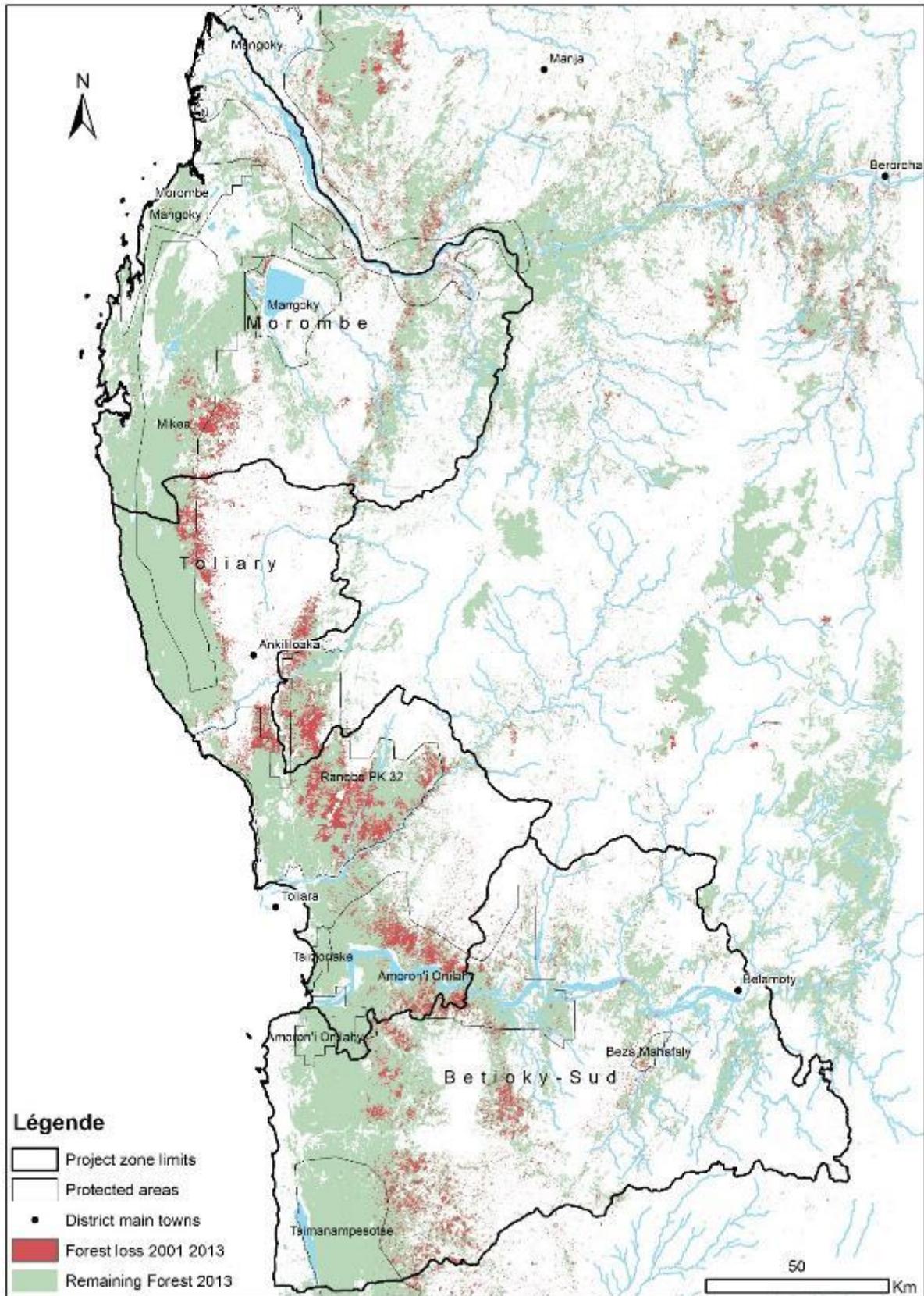


Figure 17: Deforestation intensity Score map

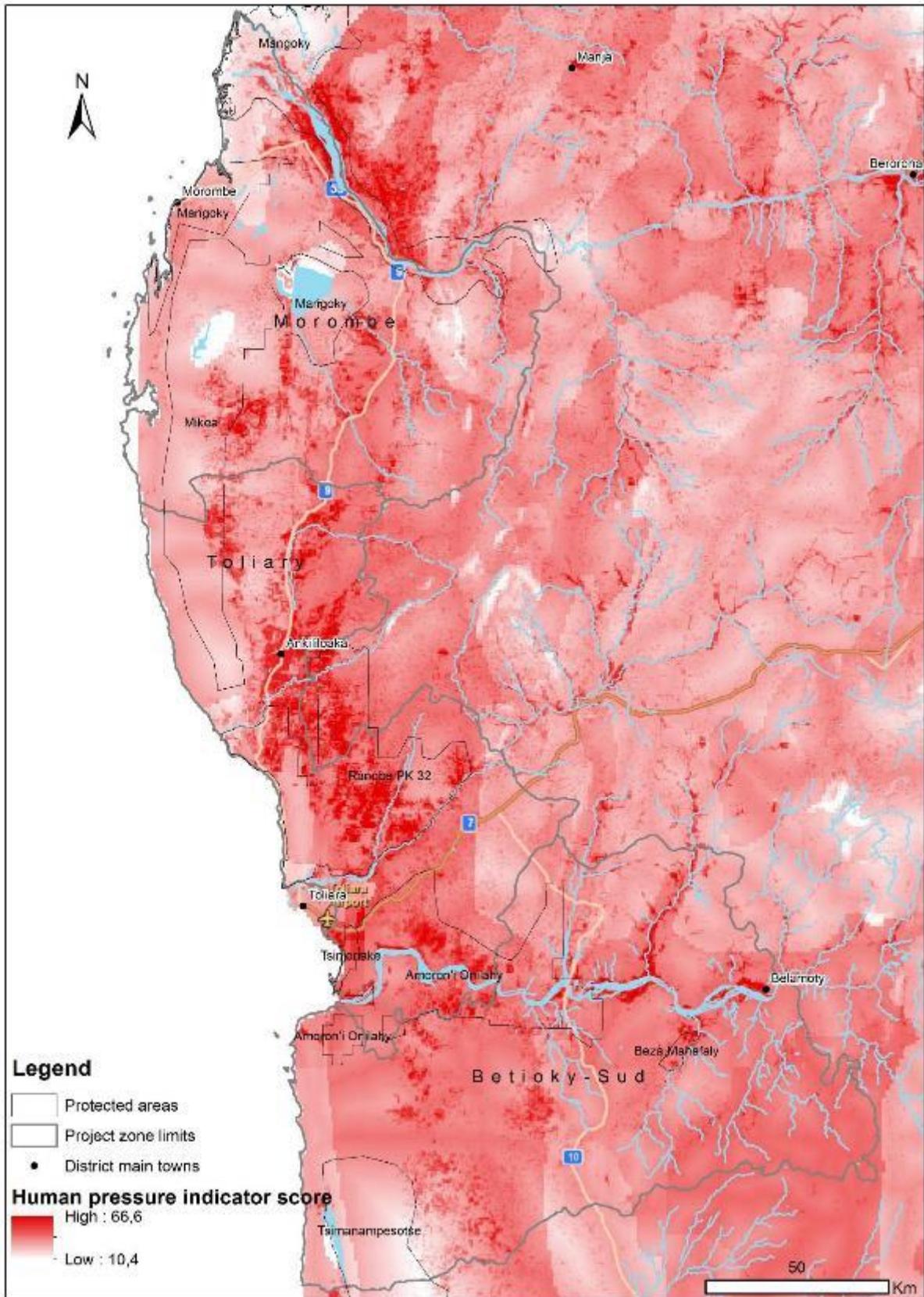


Figure 18: Composite indicator of anthropic pressures score map

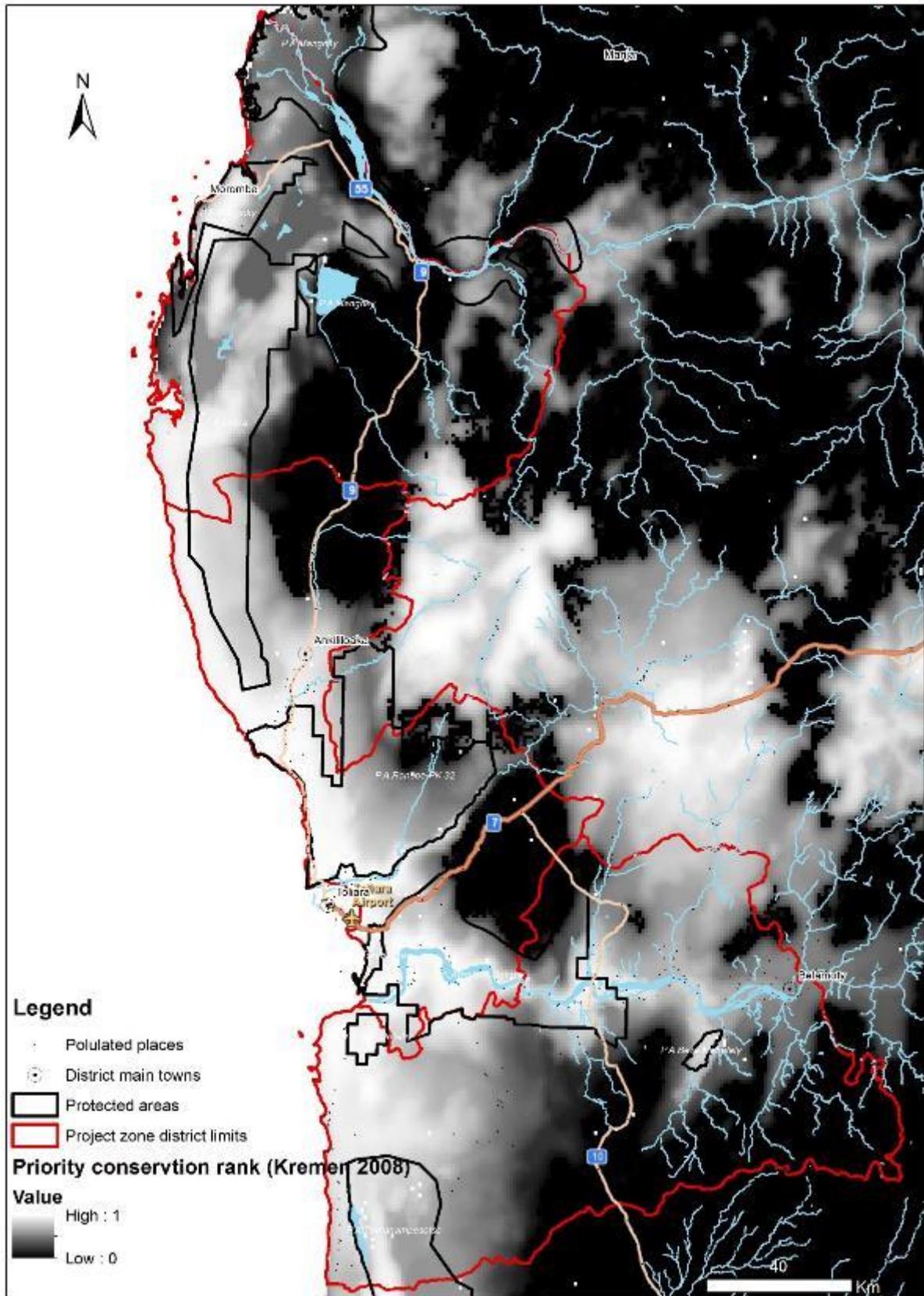


Figure 19: Biodiversity conservation rank score from Kremen study (2008)

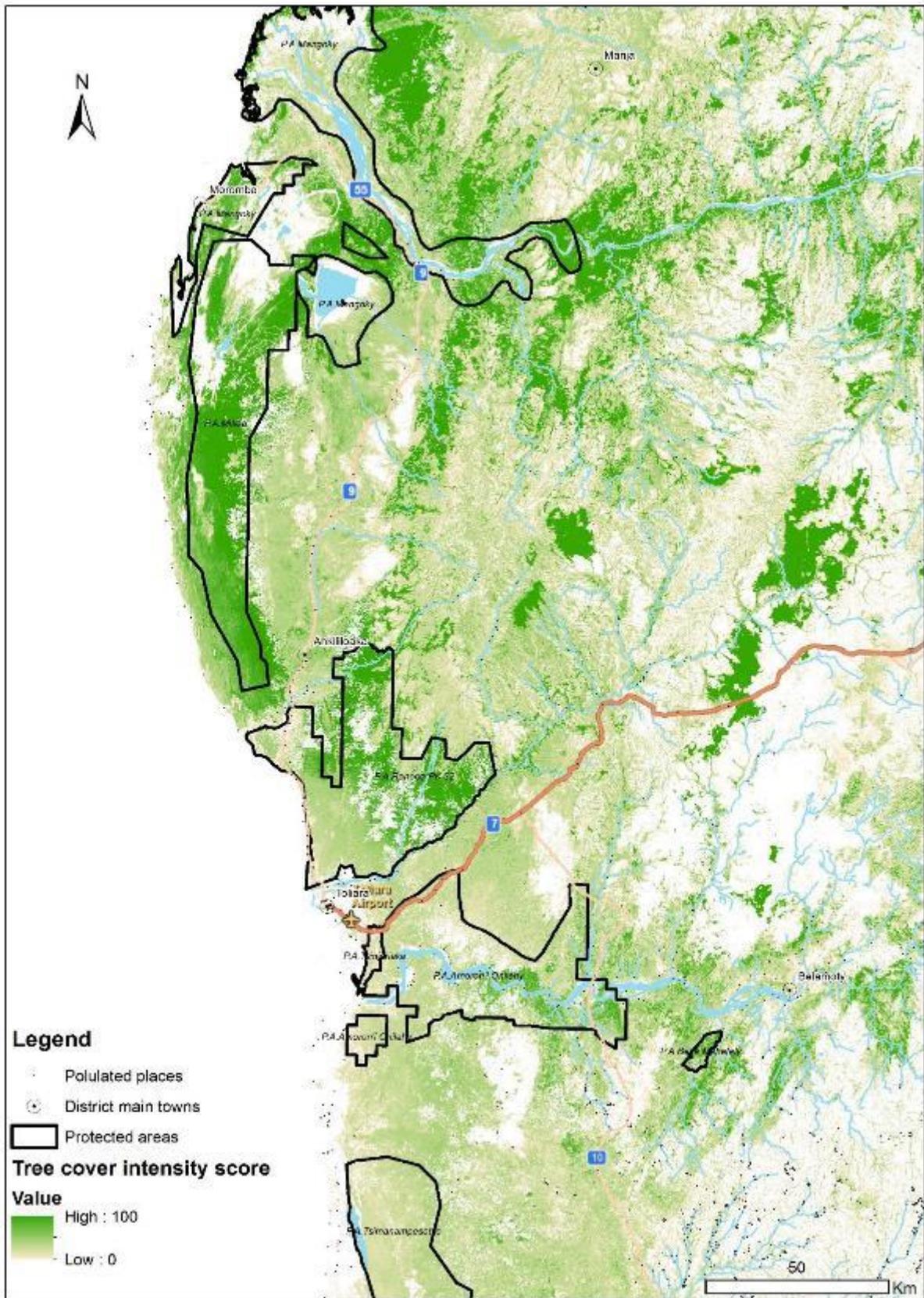


Figure 20: Tree cover intensity score map

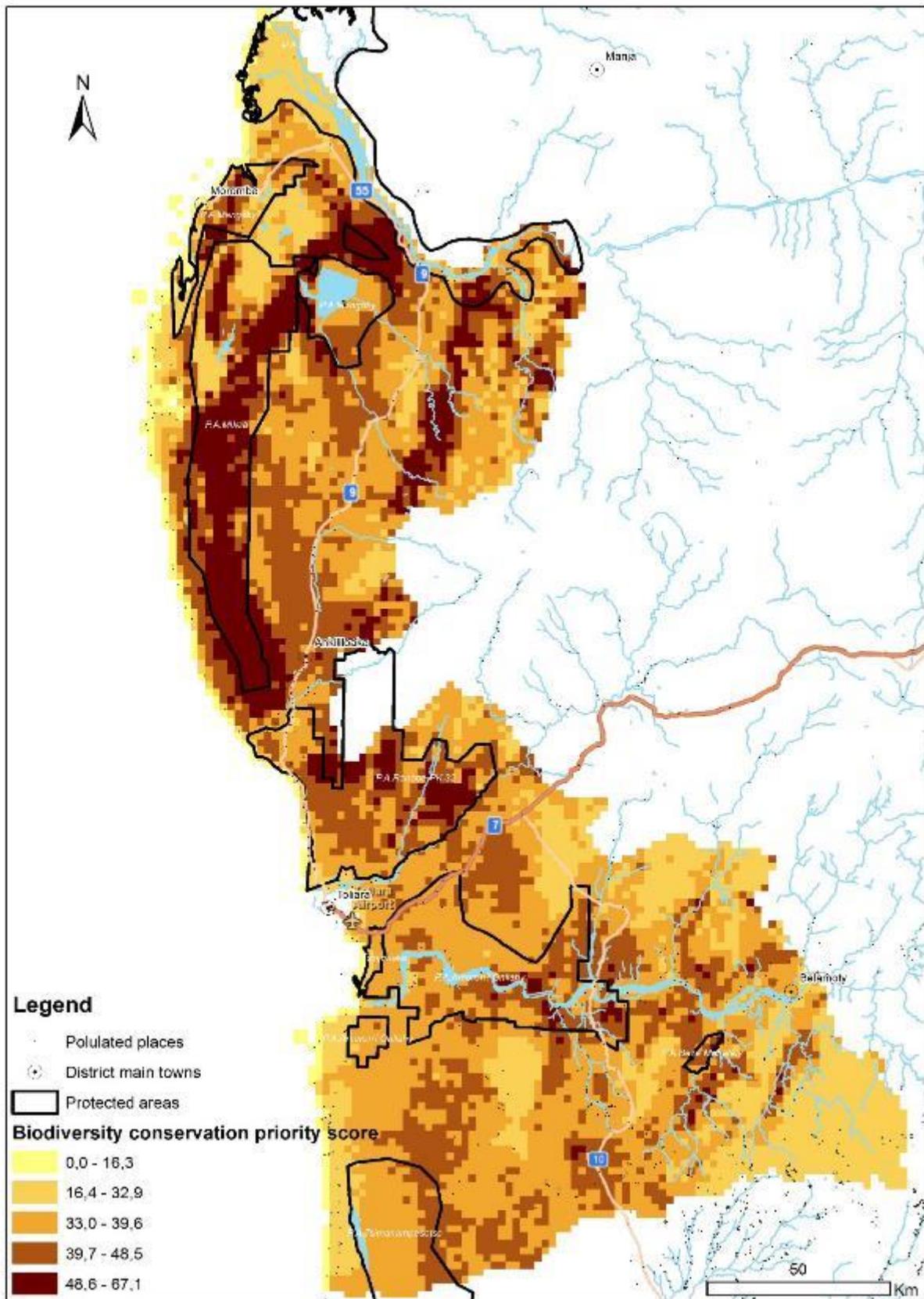


Figure 21: Composite updated indicator of conservation priority score map



Figure 23: Highest decile of conservation priority map: every yellow squares of 2.5 km sides represent a zone maximizing the conservation priority score (top 10% priority of conservation)

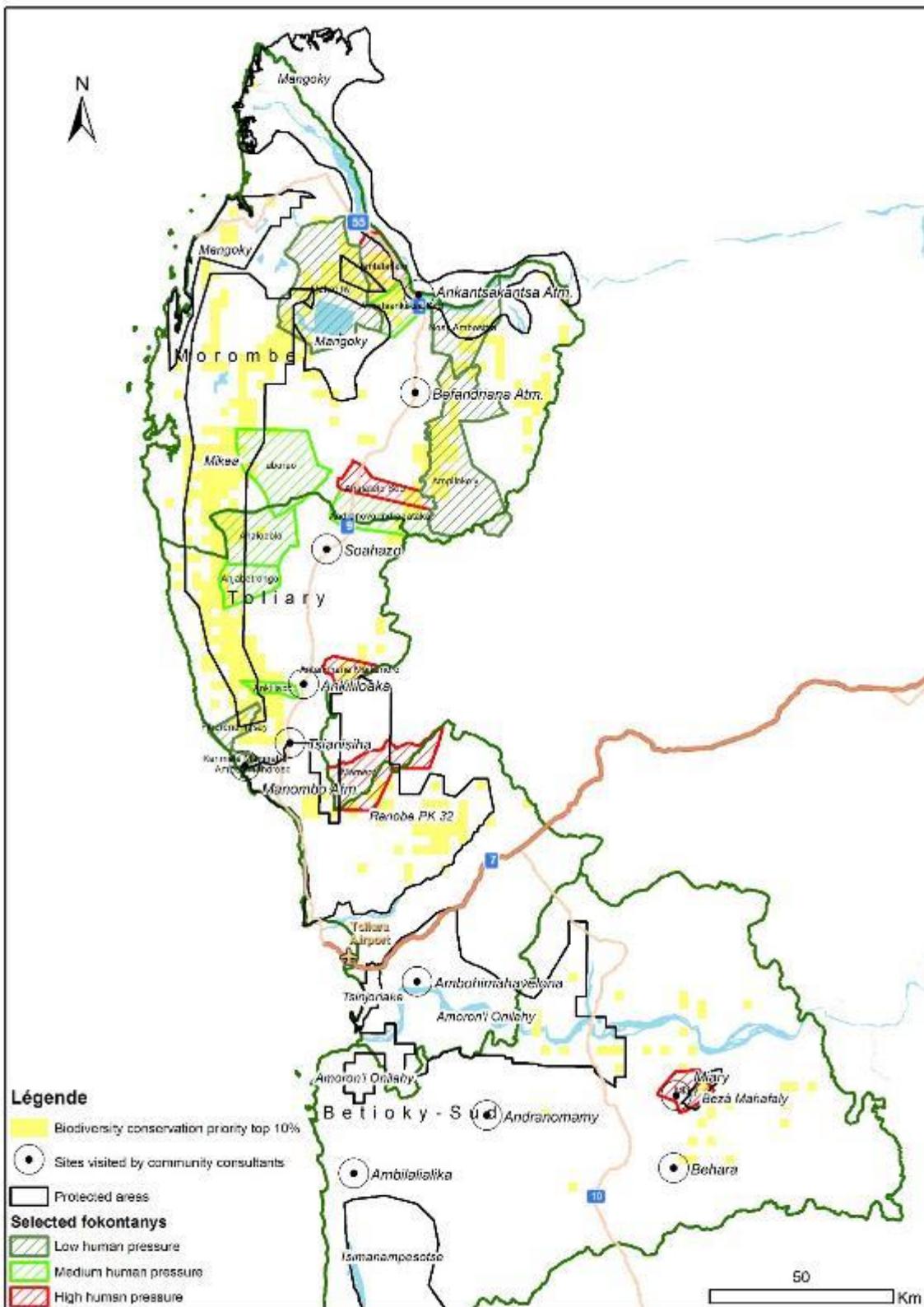


Figure 24: Fokontany chosen for project conservation initiatives, the yellow squares represent the superior decile of priority for conservation score (areas constituting the top 10% priority conservation area of total area)

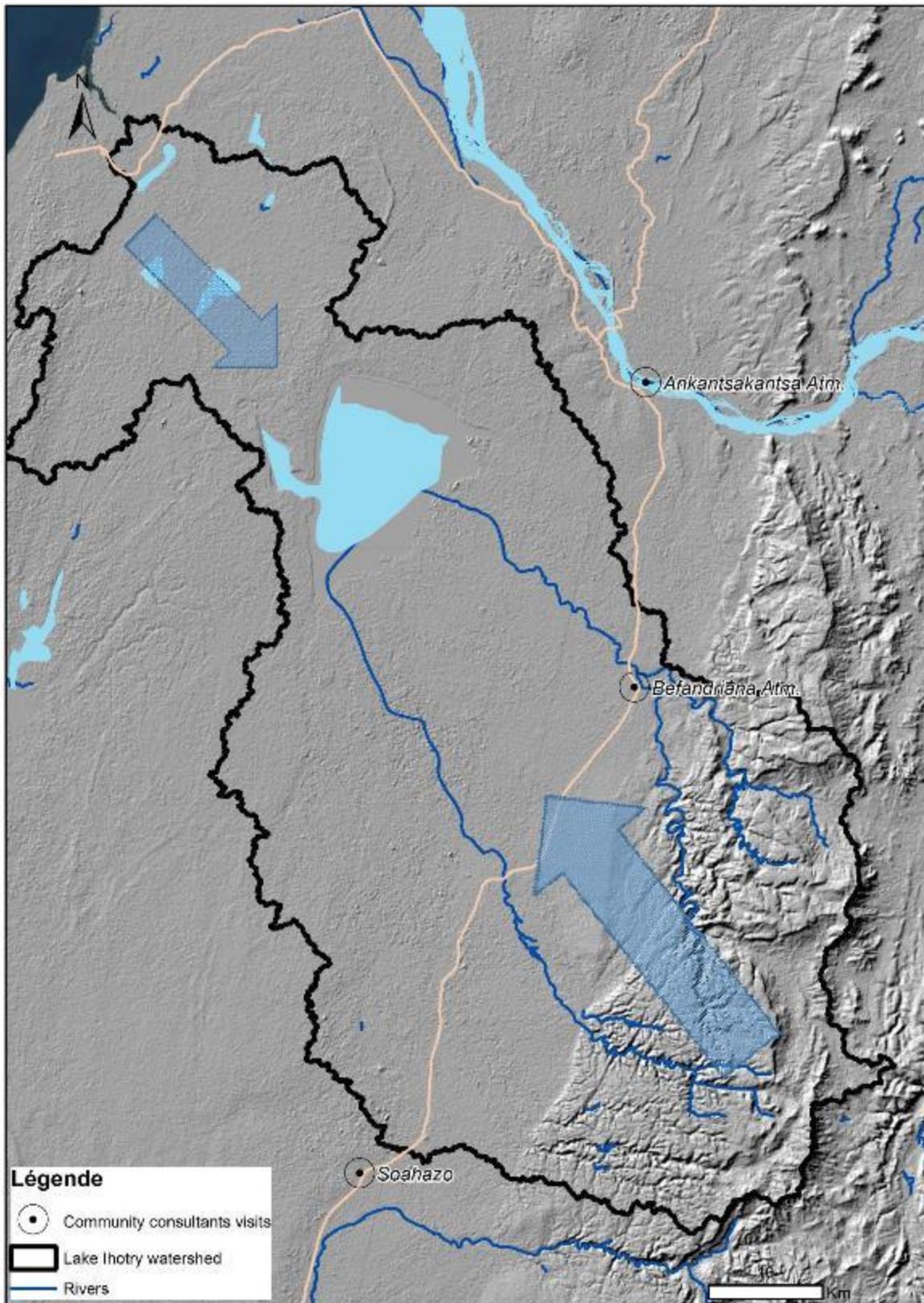


Figure 26: Lake Ihotry watershed, blue arrows indicate the direction of water flow

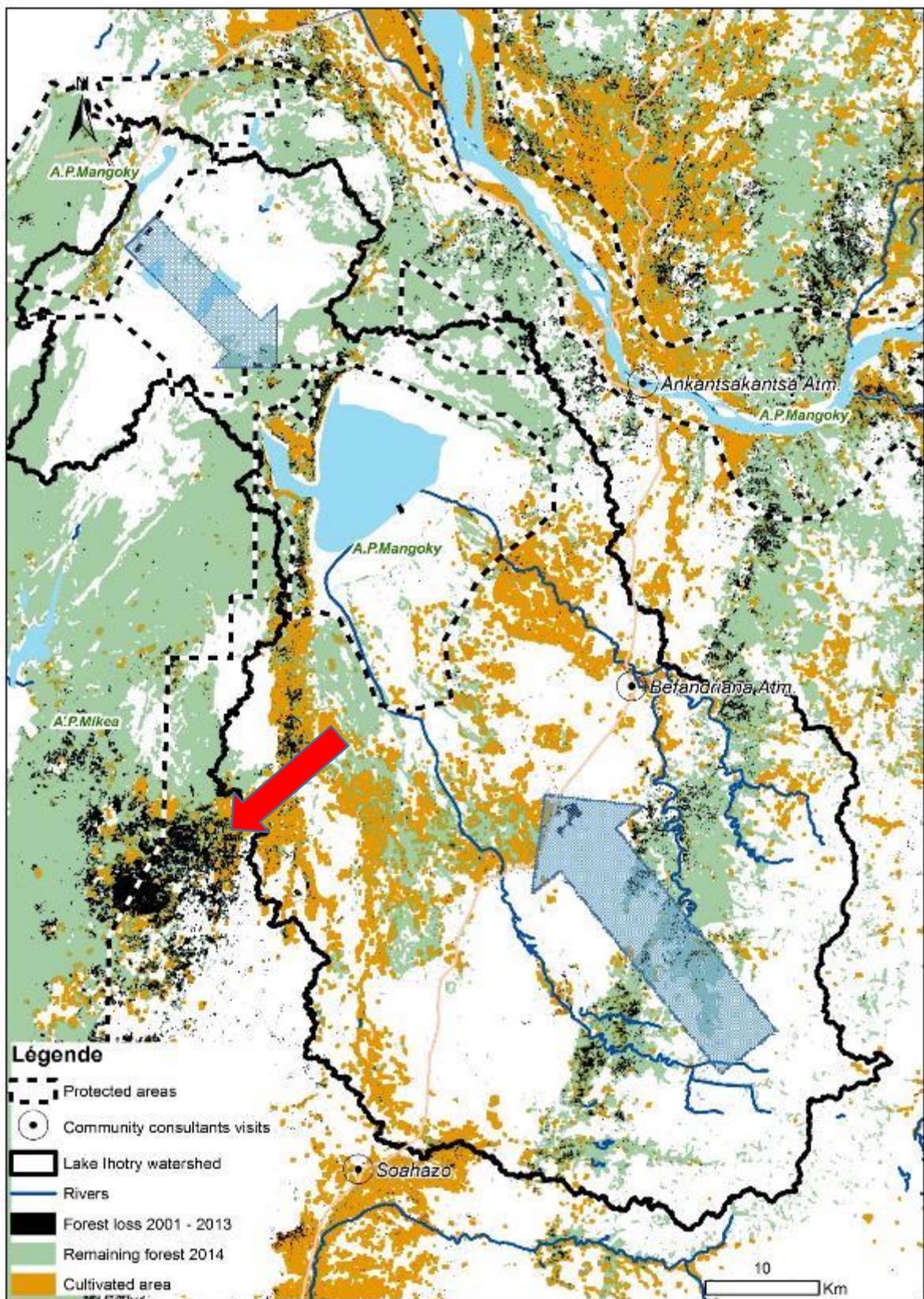


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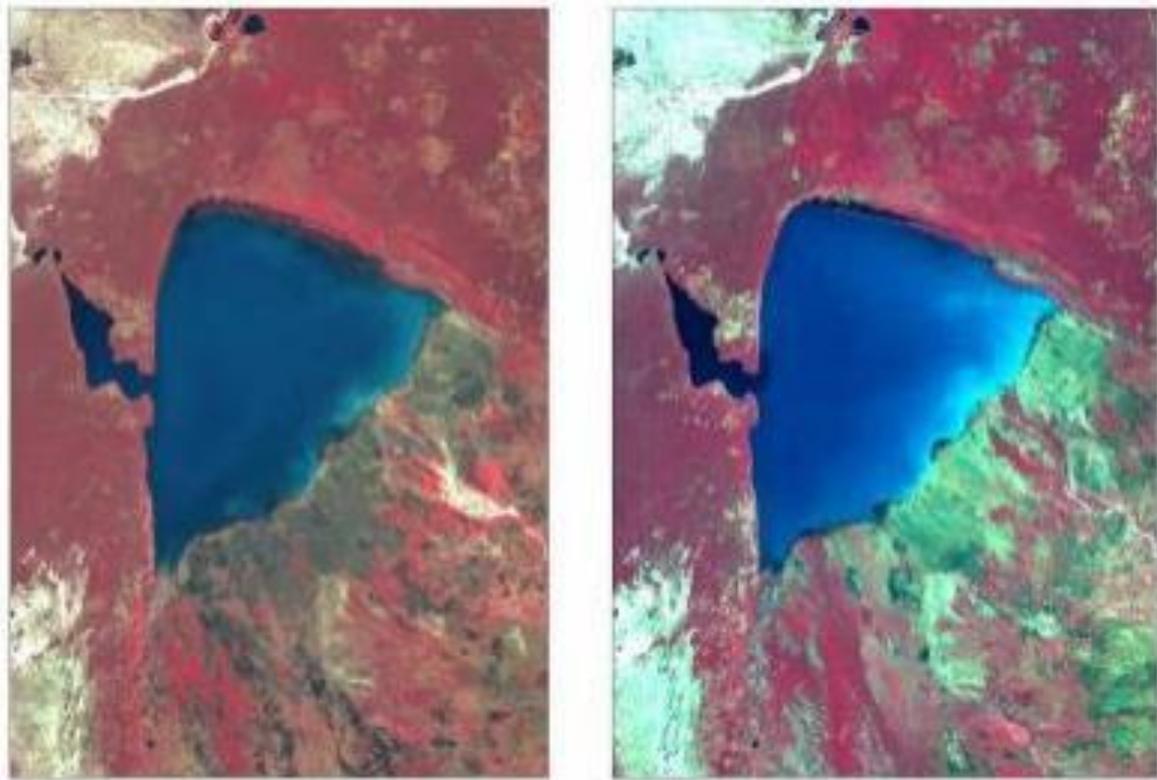


Figure 28: Evolution of the siltation situation of Lake Ihotry over 5 years (2000-2005)

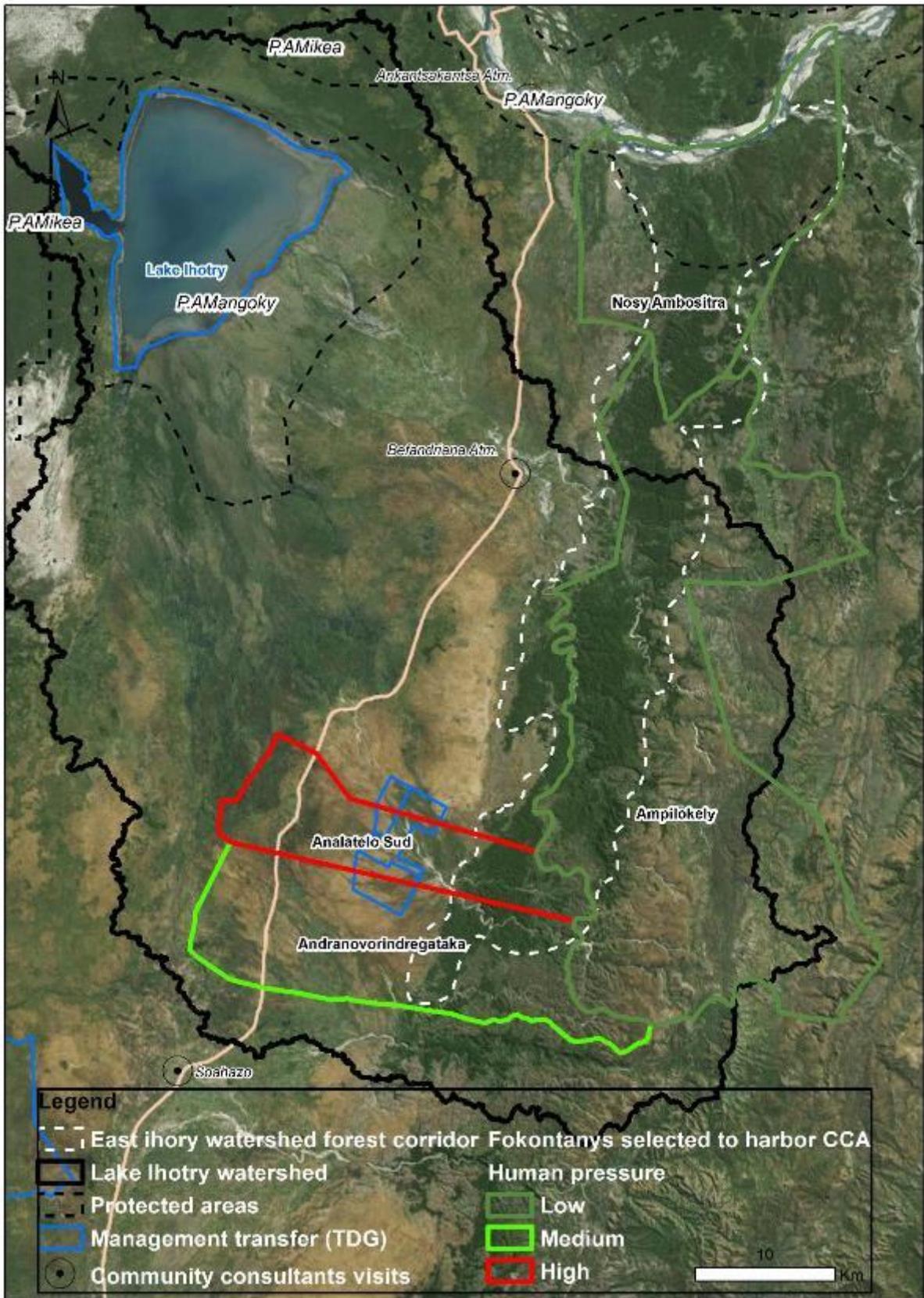


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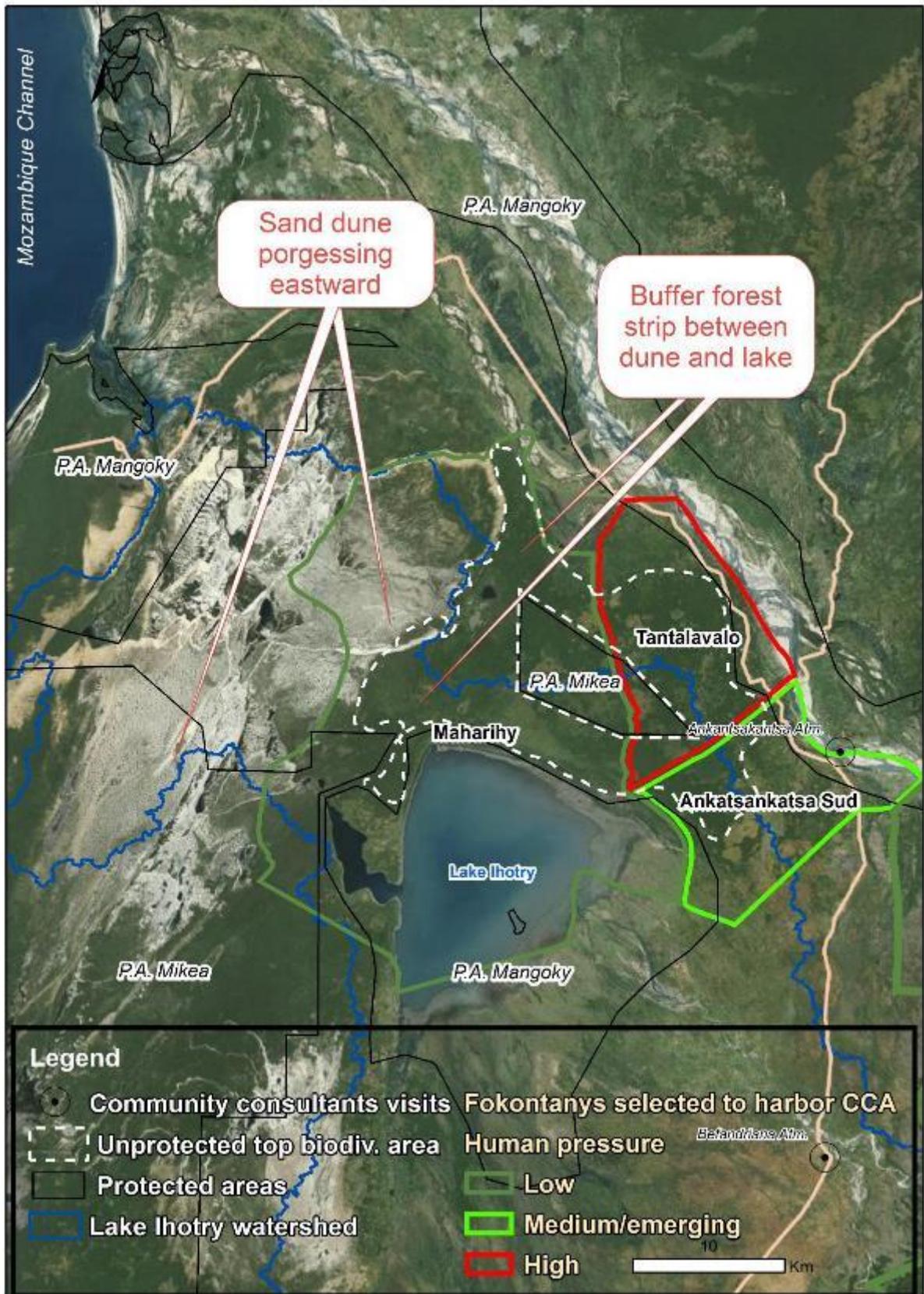


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Figure 31: Flamingos on Ihotry Lake



*Figure 32: The long-tailed ground roller (*Uratelornis chimaera*)*



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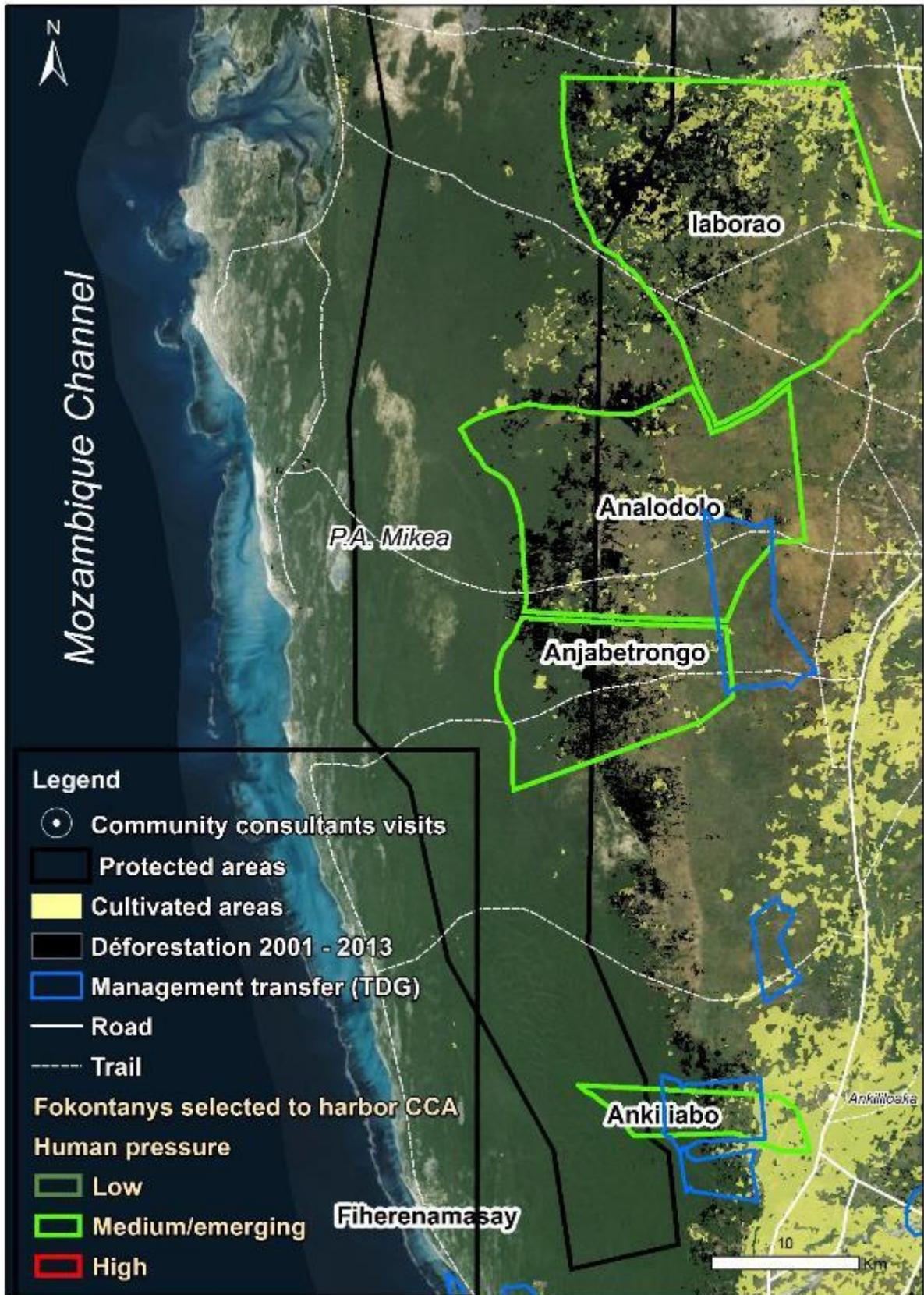


Figure 34: Selected sites, East Mikea sector

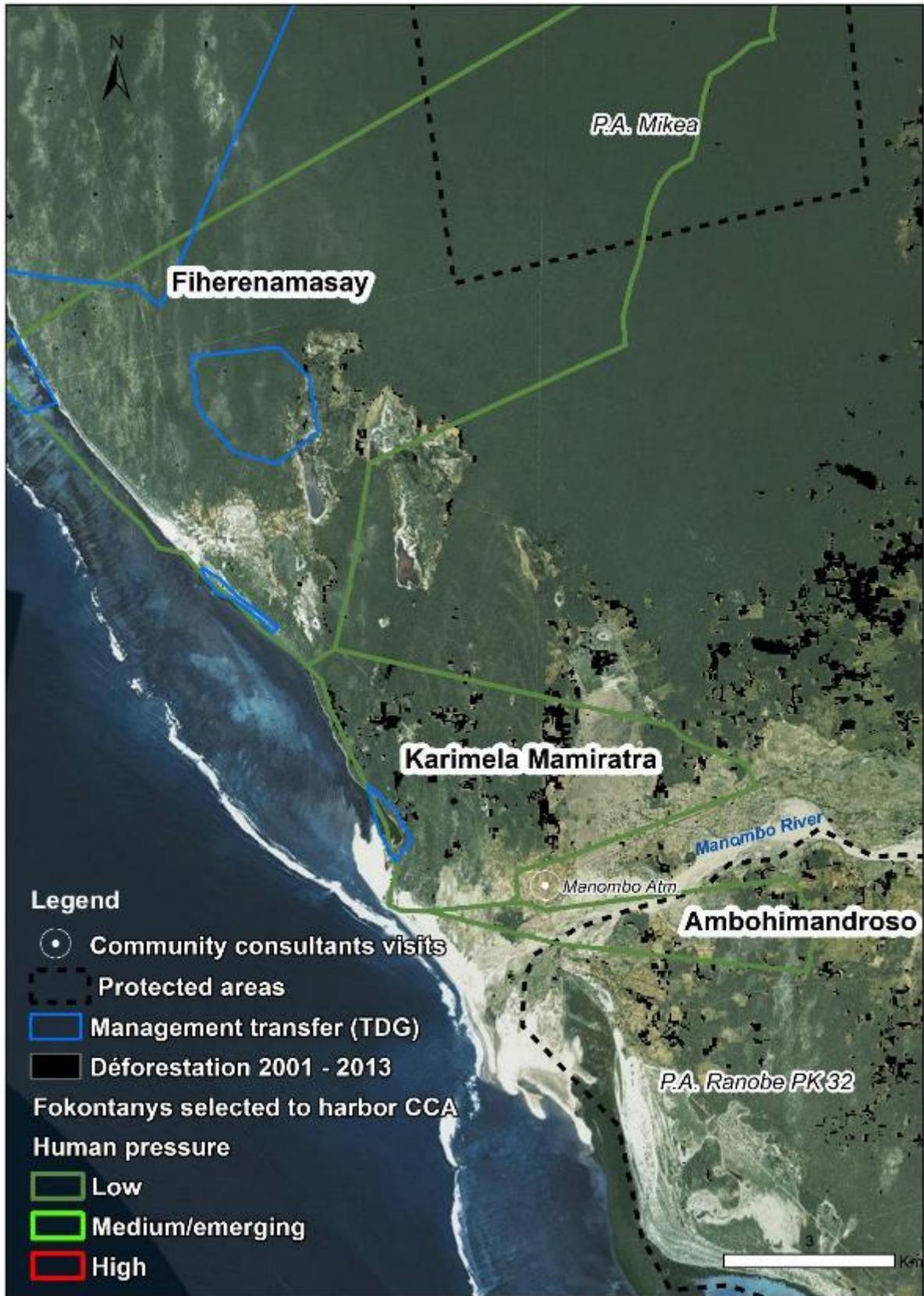


Figure 35: Selected sites, South-West Mikea corridor

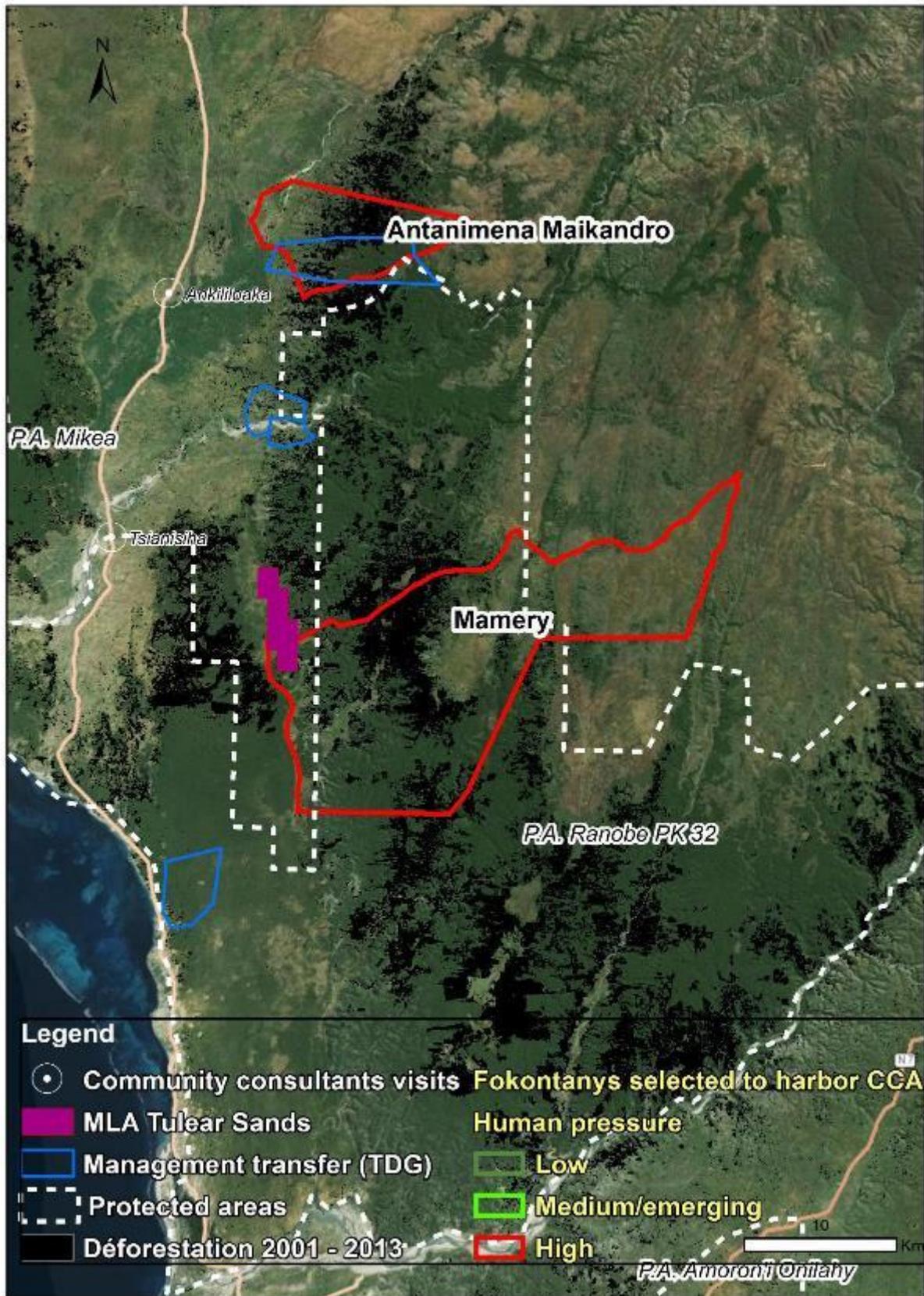


Figure 36: Selected sites for Ranobe sector



Figure 37: Drilling operation in the mining lease of Tulear sands project



Figure 38: Site selected, Miary sector



Figure 39: Forest gallery in the reserve of Behaza Mahafaly

Printable Biodiversity Tracking Tools (PRODOC Annex 3)

| | |
|--|----------------|
| BD SO2 TT Main Form on Landscape and Sectoral Mainstreaming | 4 pages |
|--|----------------|

BD SO1 TT on Protected Areas:

| | |
|-----------------------------|----------------|
| Main Form, Section I | 2 pages |
|-----------------------------|----------------|

| | |
|-------------------------|---------|
| METT Assessment – Mikea | 9 pages |
|-------------------------|---------|

| | |
|------------------------------------|----------|
| METT Assessment - Amoron'I Onilahy | 10 pages |
|------------------------------------|----------|

| | |
|-----------------------------------|---------|
| METT Assessment - Bezaha Mahafaly | 8 pages |
|-----------------------------------|---------|

| | |
|-----------------------------------|---------|
| METT Assessment – Tsimanampesotse | 8 pages |
|-----------------------------------|---------|

SO2 TT Main Form on Landscape and Sectoral Mainstreaming



Tracking Tool for Biodiversity Projects in GEF-3, GEF-4, and GEF-5

Objective 2:

Mainstreaming Biodiversity Conservation in Production Landscapes/Seascapes and Sectors

SO2 TT - 5263 Madagascar Landscape Conservation

Objective: To measure progress in achieving the impacts and outcomes established at the portfolio level under the biodiversity focal area.

Rationale: Project data from the GEF-3, GEF-4, and GEF-5 project cohort will be aggregated for analysis of directional trends and patterns at a portfolio-wide level to inform the development of future GEF strategies and to report to GEF Council on portfolio-level performance in the biodiversity focal area.

Structure of Tracking Tool: Each tracking tool requests background and coverage information on the project and specific information required to track portfolio level indicators in the GEF-3, GEF-4, and GEF-5 strategy.

Guidance in Applying GEF Tracking Tools: GEF tracking tools are applied three times: at CEO endorsement, at project mid-term, and at project completion.

Submission: The finalized tracking tool will be cleared by the GEF Agencies as being correctly completed.

Important: Please read the Guidelines posted on the GEF website before entering your data

| I. General Data | Please indicate your answer here | Notes |
|--|--|---|
| Project Title | Approche de paysage à la conservation et à la gestion de la biodiversité menacée à Madagascar, axée sur le paysage forestier épineux et sec d'Atsimo-Andrefana | |
| GEF Project ID | 5486 | |
| Agency Project ID | 5263 | |
| Implementing Agency | Ministère de l'Environnement et des Forêts (MEEMF) en collaboration avec la Fondation TANY MEVA et SAGE | |
| Project Type | FSP | FSP or MSP |
| Country | MDG | |
| Region | AFR | |
| Date of submission of the tracking tool | December 5, 2015 | Month DD, YYYY (e.g., May 12, 2010) |
| Name of reviewers completing tracking tool and completion date | | Completion Date |
| Planned project duration | 5 | years |
| Actual project duration | 5 | years |
| Lead Project Executing Agency (ies) | MEEMF in collaboration with Tany Meva, SAGE | |
| Date of Council/CEO Approval | | Month DD, YYYY (e.g., May 12, 2010) |
| GEF Grant (US\$) | 5,329,452 | Project net of fees |
| Cofinancing expected (US\$) | 43,812,820 | |
| Please identify production sectors and/or ecosystem services directly targeted by project: | | |
| Agriculture | 1 | 1: Primarily and directly targeted by the project 2: Secondary or incidentally affected by the project |
| Fisheries | | 1: Primarily and directly targeted by the project 2: Secondary or incidentally affected by the project |
| Forestry | 2 | 1: Primarily and directly targeted by the project 2: Secondary or incidentally affected by the project |
| Tourism | | 1: Primarily and directly targeted by the project 2: Secondary or incidentally affected by the project |
| Mining | 1 | 1: Primarily and directly targeted by the project 2: Secondary or incidentally affected by the project |
| Oil | 1 | 1: Primarily and directly targeted by the project 2: Secondary or incidentally affected by the project |
| Transportation | | 1: Primarily and directly targeted by the project 2: Secondary or incidentally affected by the project |
| Other (please specify) | | |

II. Project Landscape/Seascape Coverage

1. What is the extent (in hectares) of the landscape or seascape where the project will directly or indirectly contribute to biodiversity conservation or sustainable use of its components? An example is provided in the table below.

| | | |
|--|--|---|
| Designations (please choose 1-3) | 1 | 1: Foreseen at project start 2: Foreseen at mid-term 3: Foreseen at project closure |
| Landscape/seascape ^[1] area directly ^[2] covered by the project (ha) | 2,400,000 | hectares foreseen |
| Landscape/seascape area indirectly ^[3] covered by the project (ha) | the entire country | hectares foreseen |
| Explanation for indirect coverage numbers: | Quoted from PRODOC paras: "228. [...] the land use governance challenges faced by the Atsimo Andrefana landscape are also seen elsewhere in the country. While the project needs a scope that is compatible with the funding available, its approach is highly replicable and should also be applied elsewhere in the country." "229. [...] The Region of Atsimo Andrefana is engaged with government donor support, and is currently launching the Land Use Planning process (SRAT). The project will work alongside government partners, to pilot the integration of a BD LUP within this plan. The product of the project, the SRAT with a Biodiversity component, in addition to the Observatory and the products and tools that the project will build and develop, will inform decision making regarding development planning for the region (PRD). This pilot experience will be unique to the Atsimo Andrefana Region and will serve as an example that may be replicated in other regions of Madagascar." | |

[1] For projects working in seascapes (large marine ecosystems, fisheries etc.) please provide coverage figures and include explanatory text as necessary if reporting in hectares is not applicable or feasible.

[2] Direct coverage refers to the area that is targeted by the project's site intervention. For example, a project may be mainstreaming biodiversity into floodplain management in a pilot area of 1,000 hectares that is part of a much larger floodplain of 10,000 hectares.

[3] Using the example in footnote 5 above, the same project may, for example, "indirectly" cover or influence the remaining 9,000 hectares of the floodplain through promoting learning exchanges and training at the project site as part of an awareness raising and capacity building strategy for the rest of the floodplain. Please explain the basis for extrapolation of indirect coverage when completing this part of the table.

2. Are there Protected Areas within the landscape/seascape covered by the project? If so, names these PAs, their IUCN or national PA category, and their extent in hectares

| Name of Protected Areas | IUCN and/or national category of PA | Extent in hectares of PA |
|---|-------------------------------------|--------------------------|
| 1 NAP Complexe Zone Humide Mangoky-Ihotry | V | 315,000 |
| 2 PN Mikea | II | 321,772 |
| 3 NAP PK 32 Ranobe | V | 287,530 |
| 4 NAP Amoron'i Onilahy | V | 102,179 |
| 5 NAP Tsinjoriake | V | 5,440 |
| 6 RS Beza Mahafaly | IV | 4,200 |
| 7 PN Tsimanampesotse | II | 203,740 |
| Total | | 1,239,861 |
| Corresponding to % of the total landscape | | 52% |

3. Within the landscape/seascape covered by the project, is the project implementing payment for environmental service schemes? If so, please complete the table below. Example is provided.

| | | |
|-----|-----|---|
| n/a | n/a | Please Indicate Environmental Service |
| | n/a | Extent in hectares |
| | n/a | Payments generated (US\$)/ha/yr if known at time of CEO endorsement |
| n/a | n/a | Please Indicate Environmental Service |
| | n/a | Extent in hectares |
| | n/a | Payments generated (US\$)/ha/yr |

Part III. Management Practices Applied

4. Within the scope and objectives of the project, please identify in the table below the management practices employed by project beneficiaries that integrate biodiversity considerations and the area of coverage of these management practices. Please also note if a certification system is being applied and identify the certification system being used. Note: this could range from farmers applying organic agricultural practices, forest management agencies managing forests per Forest Stewardship Council (FSC) guidelines or other forest certification schemes, artisanal fisherfolk practicing sustainable fisheries management, or industries satisfying other similar agreed international standards, etc.

| | | | |
|---------------------------|--|---|------------|
| Foreseen at Project Start | Application of the mitigation hierarchy at the landscape level | Please indicate specific management practices that integrate BD | See note 1 |
| | n/a | Name of certification system being used (insert NA if no certification system is being applied) | See note 2 |
| | 2400000 | Area of coverage foreseen at start of project | See note 3 |
| By project end | n/a | Please indicate specific management practices that integrate BD | |
| | n/a | Name of certification system being used (insert NA if no certification system is being applied) | |
| | n/a | Area of coverage foreseen at start of project | |

| | | |
|--|--|--|
| <p>Notes [1] The mitigation hierarchy is a method for evaluating options in a step-wise and prioritised manners during the implementation of various phases of a high impact project (in mining e.g.). Currently, it is not being systematically applied in the target Atsimon Andrefana landscape. However, by implementing the suit of activities foreseen primarily under Component 1, including training of key decision-makers, and with a facilitated access to relevant biodiversity information through a tailor-made spatial planning tool (the BD LUP), it is expected that the application of the mitigation hierarchy becomes much more widespread in decision-making processes.</p> | <p>Note [2] It is not a given that the mitigation hierarchy constitutes a 'certification scheme' as other known examples. It is however an integral part of International Finance Corporation Performance Standard 6 (i.e. IFC PS6 on Biodiversity Conservation and Sustainable Management of Living Natural Resources), where compliance or non-compliance can be asserted.</p> | <p>Note [3] At project start, it is foreseen that a total terrestrial area of 2.4 million hectares, corresponding to the surface of three districts within the Atsimon Andrefana Region, will be the direct target landscape: Tulear II, Morombe and Betsioky.</p> |
|--|--|--|

Part IV. Market Transformation

5. For those projects that have identified market transformation as a project objective, please describe the project's ability to integrate biodiversity considerations into the mainstream economy by measuring the market changes to which the project contributed. The sectors and subsectors and measures of impact in the table below are illustrative examples, only. Please complete per the objectives and specifics of the project.

| | | Unit of measure of market impact |
|---|-----|----------------------------------|
| Name of the market that the project seeks to affect (sector and sub-sector) | n/a | |
| | n/a | |
| | n/a | |
| Name of the market that the project seeks to affect (sector and sub-sector) | n/a | |
| | n/a | |
| | n/a | |

Part V. Policy and Regulatory frameworks

6. For those projects that have identified addressing policy, legislation, regulations, and their implementation as project objectives, Please complete these tables for each sector that is a primary or a secondary focus of the project. Please answer (1 for YES or 0 for NO) to each statement under the sectors that are a focus of the project.

| | | |
|---|---|-----------------|
| <i>Biodiversity considerations are mentioned in sector policy</i> | | |
| Agriculture | 1 | Yes = 1, No = 0 |
| Fisheries | | Yes = 1, No = 0 |
| Forestry | 1 | Yes = 1, No = 0 |
| Tourism | | Yes = 1, No = 0 |
| Mining | 1 | Yes = 1, No = 0 |
| Oil | 1 | Yes = 1, No = 0 |
| <i>Biodiversity considerations are mentioned in sector policy through</i> | | |
| Agriculture | 1 | Yes = 1, No = 0 |
| Fisheries | | Yes = 1, No = 0 |
| Forestry | 1 | Yes = 1, No = 0 |
| Tourism | | Yes = 1, No = 0 |
| Mining | 0 | Yes = 1, No = 0 |
| Oil | 0 | Yes = 1, No = 0 |
| <i>Regulations are in place to implement the legislation</i> | | |
| Agriculture | 1 | Yes = 1, No = 0 |
| Fisheries | | Yes = 1, No = 0 |
| Forestry | 1 | Yes = 1, No = 0 |
| Tourism | | Yes = 1, No = 0 |
| Mining | 0 | Yes = 1, No = 0 |
| Oil | 0 | Yes = 1, No = 0 |
| <i>The regulations are under implementation</i> | | |
| Agriculture | 1 | Yes = 1, No = 0 |
| Fisheries | | Yes = 1, No = 0 |
| Forestry | 1 | Yes = 1, No = 0 |
| Tourism | | Yes = 1, No = 0 |
| Mining | 0 | Yes = 1, No = 0 |
| Oil | 0 | Yes = 1, No = 0 |
| <i>The implementation of regulations is enforced</i> | | |
| Agriculture | 0 | Yes = 1, No = 0 |
| Fisheries | | Yes = 1, No = 0 |
| Forestry | 1 | Yes = 1, No = 0 |
| Tourism | | Yes = 1, No = 0 |
| Mining | 0 | Yes = 1, No = 0 |
| Oil | 0 | Yes = 1, No = 0 |
| <i>Enforcement of regulations is monitored</i> | | |
| Agriculture | 0 | Yes = 1, No = 0 |
| Fisheries | | Yes = 1, No = 0 |
| Forestry | 1 | Yes = 1, No = 0 |
| Tourism | | Yes = 1, No = 0 |
| Mining | 0 | Yes = 1, No = 0 |
| Oil | 0 | Yes = 1, No = 0 |

All projects please complete this question at the project mid-term evaluation and at the final evaluation, if relevant:

7. Within the scope and objectives of the project, has the private sector undertaken voluntary measures to incorporate biodiversity considerations in production? If yes, please provide brief explanation and specifically mention the sectors involved. An example of this could be a mining company minimizing the impacts on biodiversity by using low-impact exploration techniques and by developing plans for restoration of biodiversity after exploration as part of the site management plan.

[completed at baseline because relevant]

Yes, but not in the region targeted by the project. Refer to PRODOC PRODOC Box Situation Analysis. A summary of the relevant info re. the question follows (quoted from PRODOC, various sections):

[para 27] "The profile of threats affecting biodiversity at the landscape level is changing. This is due to the rising importance of mining, oil, and gas development, as well as agribusiness. These sectors are also likely to attract migration and the establishment of informal settlements, generating a number of secondary impacts. [...]"

[para 78] "The ONE, which is the entity in charge of coordinating the monitoring activities pertaining to the application of environmental mitigation measures contained in EIA's, does not count with resources at the Regional level. Currently, only private companies investing in the Region conduct the studies required to complete an EIA, through company human and financial resources."

"[Activity 1.2.3] "To date, the 'Ambatovy off-setting project' [in another region] is seen as the most thorough example for the application of the Mitigation Hierarchy in Madagascar (refer to PRODOC BOX 3 for more information). This GEF project proposes to expand this experience, by showing e.g. that, by intervening early in the project cycle, the opportunities for threat avoidance and minimisation can in fact pay-off in certain circumstances, in particular depending on how trade-offs are negotiated."

SO1 TT on Protected Areas, Main form + 4 METT sites



Tracking Tool for Biodiversity Projects in GEF-3, GEF-4, and GEF-5

Objective 1: Catalyzing Sustainability of Protected Area Systems SECTION I

Objective: To measure progress in achieving the impacts and outcomes established at the portfolio level under the biodiversity focal area.

Rationale: Project data from the GEF-3, GEF-4, and GEF-5 project cohort will be aggregated for analysis of directional trends and patterns at a portfolio-wide level to inform the development of future GEF strategies and to report to GEF Council on portfolio-level performance in the biodiversity focal area.

Structure of Tracking Tool: Each tracking tool requests background and coverage information on the project and specific information required to track portfolio level indicators in the GEF-3, GEF-4, and GEF-5 strategy.

Guidance in Applying GEF Tracking Tools: GEF tracking tools are applied three times: at CEO endorsement, at project mid-term, and at project completion.

Submission: The finalized tracking tool will be cleared by the GEF Agencies as being correctly completed.

Important: Please read the Guidelines posted on the GEF website before entering your data

SO1 TT - 5263 Madagascar Landscape Conservation (NOT required by GEF Sec under this project)

| I. General Data | Please indicate your answer here | Notes |
|--|---|-------------------------------------|
| Project Title | A Landscape Approach to conserving and managing threatened Biodiversity in Madagascar with a focus on the Atsimo-Andrefana Spiny and Dry Forest Landscape | |
| GEF Project ID | 5486 | |
| Agency Project ID | 5263 | |
| Implementing Agency | UNDP | |
| Project Type | FSP | FSP or MSP |
| Country | Madagascar | |
| Region | AFR | |
| Date of submission of the tracking tool | | Month DD, YYYY (e.g., May 12, 2010) |
| Name of reviewers completing tracking tool and completion date | | Completion Date |
| Planned project duration | 6 | years |
| Actual project duration | 6 | years |
| Lead Project Executing Agency (ies) | Ministry of Environment, Ecology, Forests and Water (MEEF) | |
| Date of Council/CEO Approval | February 5, 2014 | Month DD, YYYY (e.g., May 12, 2010) |
| GEF Grant (US\$) | 5,329,452 | Project net of fees |
| Cofinancing expected (US\$) | 43,812,820 | |

| II. Total Extent in hectares of protected areas targeted by the project by biome type | Please indicate your answer here | |
|--|----------------------------------|----|
| Please use the following biomes provided below and place the coverage data within these biomes | | |
| Terrestrial (insert total hectares for terrestrial coverage and then provide coverage for each of the terrestrial biomes below) | | |
| Total hectares | 494,749 | ha |
| Tropical and subtropical moist broadleaf forests (tropical and subtropical, humid) | | ha |
| Tropical and subtropical dry broadleaf forests (tropical and subtropical, semi-humid) | 494,749 | ha |
| Tropical and subtropical coniferous forests (tropical and subtropical, semi-humid) | | ha |
| Temperate broadleaf and mixed forests (temperate, humid) | | ha |
| Temperate coniferous forests (temperate, humid to semi-humid) | | ha |
| Boreal forests/taiga (subarctic, humid) | | ha |
| Tropical and subtropical grasslands, savannas, and shrublands (tropical and subtropical, semi-arid) | | ha |
| Temperate grasslands, savannas, and shrublands (temperate, semi-arid) | | ha |
| Flooded grasslands and savannas (temperate to tropical, fresh or brackish water inundated) | | ha |
| Mangroves | | ha |
| Montane grasslands and shrublands (alpine or montane climate) | | ha |
| Tundra (Arctic) | | ha |
| Mediterranean forests, woodlands, and scrub or Sclerophyll forests (temperate warm, semi-humid to semi-arid with winter rainfall) | | ha |
| Deserts and xeric shrublands (temperate to tropical, arid) | | ha |
| Mangrove (subtropical and tropical, salt water inundated) | | ha |
| Freshwater (insert total hectares for freshwater coverage and then provide coverage for each of the freshwater biomes below) | | |
| Total hectares | 0 | ha |
| Large lakes | | ha |
| Large river deltas | | ha |
| Polar freshwaters | | ha |
| Montane freshwaters | | ha |
| Temperate coastal rivers | | ha |
| Temperate floodplain rivers and wetlands | | ha |
| Temperate upland rivers | | ha |
| Tropical and subtropical coastal rivers | | ha |
| Tropical and subtropical floodplain rivers and wetlands | | ha |
| Tropical and subtropical upland rivers | | ha |
| Xeric freshwaters and endorheic basins | | ha |
| Oceanic islands | | ha |
| Marine (insert total hectares for marine and then distinguish coverage between each of the following zones) | | |
| Total hectares | | ha |
| Coral reefs | | ha |
| Estuaries | | ha |
| Ocean (beyond EEZ) | | ha |

| III. Please complete the table below for the protected areas that are the target of the GEF intervention. Use NA for not applicable. | | Please indicate your answer here | |
|--|----------------------------|----------------------------------|--|
| (1). Protected Area | | | |
| Name of Protected Area | Mikea | | Mikea has been recently re-classified and has lost area |
| Is this a new protected area? | 1 | | Yes = 1, No = 0 |
| Area in Hectares | 184630 | | Tropical and subtropical dry broadleaf forests (tropical and subtropical, semi-humid) |
| Global designation or priority lists | WWF Global 200, CI Hotspot | | (E.g., Biosphere Reserve, World Heritage site, Ramsar site, WWF Global 2000, etc.) |
| Local Designation of Protected Area | Parc National | | (E.g, indigenous reserve, private reserve, etc.) |
| IUCN Category | 2 | | <p>1: Strict Nature Reserve/Wilderness Area: managed mainly for science or wilderness protection</p> <p>2: National Park: managed mainly for ecosystem protection and recreation</p> <p>3: Natural Monument: managed mainly for conservation of specific natural features</p> <p>4: Habitat/Species Management Area: managed mainly for conservation through management intervention</p> <p>5: Protected Landscape/Seascape: managed mainly for landscape/seascape protection and recreation</p> <p>6: Managed Resource Protected Area: managed mainly for the sustainable use of natural ecosystems</p> |

| | | | |
|--------------------------------------|----------------------------|--|--|
| (2). Protected Area | | | |
| Name of Protected Area | Amoron'I Onilahy | | |
| Is this a new protected area? | 1 | | Yes = 1, No = 0 |
| Area in Hectares | 102,179 | | Tropical and subtropical dry broadleaf forests (tropical and subtropical, semi-humid) |
| Global designation or priority lists | WWF Global 200, CI Hotspot | | (E.g., Biosphere Reserve, World Heritage site, Ramsar site, WWF Global 2000, etc.) |
| Local Designation of Protected Area | Nouvelle Aire Protegee | | (E.g, indigenous reserve, private reserve, etc.) |
| IUCN Category | 5 | | <p>1: Strict Nature Reserve/Wilderness Area: managed mainly for science or wilderness protection</p> <p>2: National Park: managed mainly for ecosystem protection and recreation</p> <p>3: Natural Monument: managed mainly for conservation of specific natural features</p> <p>4: Habitat/Species Management Area: managed mainly for conservation through management intervention</p> <p>5: Protected Landscape/Seascape: managed mainly for landscape/seascape protection and recreation</p> <p>6: Managed Resource Protected Area: managed mainly for the sustainable use of natural ecosystems</p> |

| | | | |
|--------------------------------------|----------------------------|--|--|
| (3). Protected Area | | | |
| Name of Protected Area | Bezaha Mahafaly | | |
| Is this a new protected area? | 0 | | Yes = 1, No = 0 |
| Area in Hectares | 4,200 | | Tropical and subtropical dry broadleaf forests (tropical and subtropical, semi-humid) |
| Global designation or priority lists | WWF Global 200, CI Hotspot | | (E.g., Biosphere Reserve, World Heritage site, Ramsar site, WWF Global 2000, etc.) |
| Local Designation of Protected Area | | | (E.g, indigenous reserve, private reserve, etc.) |
| IUCN Category | 4 | | <p>1: Strict Nature Reserve/Wilderness Area: managed mainly for science or wilderness protection</p> <p>2: National Park: managed mainly for ecosystem protection and recreation</p> <p>3: Natural Monument: managed mainly for conservation of specific natural features</p> <p>4: Habitat/Species Management Area: managed mainly for conservation through management intervention</p> <p>5: Protected Landscape/Seascape: managed mainly for landscape/seascape protection and recreation</p> <p>6: Managed Resource Protected Area: managed mainly for the sustainable use of natural ecosystems</p> |

| | | | |
|--------------------------------------|---|--|--|
| (4). Protected Area | | | |
| Name of Protected Area | Tsimanampesotse | | |
| Is this a new protected area? | 0 | | Yes = 1, No = 0 |
| Area in Hectares | 203,740 | | Tropical and subtropical dry broadleaf forests (tropical and subtropical, semi-humid) |
| Global designation or priority lists | WWF Global 200, CI Hotspot, Ramsar site | | (E.g., Biosphere Reserve, World Heritage site, Ramsar site, WWF Global 2000, etc.) |
| Local Designation of Protected Area | National Park | | (E.g, indigenous reserve, private reserve, etc.) |
| IUCN Category | 2 | | <p>1: Strict Nature Reserve/Wilderness Area: managed mainly for science or wilderness protection</p> <p>2: National Park: managed mainly for ecosystem protection and recreation</p> <p>3: Natural Monument: managed mainly for conservation of specific natural features</p> <p>4: Habitat/Species Management Area: managed mainly for conservation through management intervention</p> <p>5: Protected Landscape/Seascape: managed mainly for landscape/seascape protection and recreation</p> <p>6: Managed Resource Protected Area: managed mainly for the sustainable use of natural ecosystems</p> |



Tracking Tool for Biodiversity Projects in GEF-3, GEF-4, and GEF-5

Objective 1: Catalyzing Sustainability of Protected Area Systems SECTION II: Management Effectiveness Tracking Tool for Protected Areas

Note: Please complete the management effectiveness tracking tool for EACH protected area that is the target of the GEF intervention.

Structure and content of the Tracking Tool - Objective 1. Section II:

The Tracking Tool has two main sections: datasheets and assessment form. Both sections should be completed.

1. Datasheets: the data sheet comprises of two separate sections:

Data sheet 1: records details of the assessment and some basic information about the site, such as name, size and location etc.

Data sheet 2: provides a generic list of threats which protected areas can face. On this data sheet the assessors are asked to identify threats and rank their impact on the protected area.

2. Assessment Form: the assessment is structured around 30 questions presented in table format which includes three columns for recording details of the assessment, all of which should be completed.

Important: Please read the Guidelines posted on the GEF website before entering your data

| Data Sheet 1: Reporting Progress at Protected Area Sites | Please indicate your answer here | Notes |
|---|--|---|
| Name, affiliation and contact details for person responsible for completing the METT (email etc.) | Toany, Directeur du Parc National Mikea, toanydp@yahoo.fr, mka@parcs-madagascar.com, +261334940179, +261325561616, BP 400 - 601 Toliara; Rabemamanjara Henintsoa, Consultant Expert en Biodiversité et Aires Protégées PNUD, henintsoa_rabemamanjara@yahoo.fr, +261325720136, Lot II J 32 A Ivandry - 101 Antananarivo | |
| Date assessment carried out | Feb 24, 2015 | Month DD, YYYY (e.g., May 12, 2010) |
| Name of protected area | Mikea | See also: |
| WDPA site code (these codes can be found on www.protectedplanet.net) | WDPA ID354012 | http://www.protectedplanet.net/sites/Mikea Not Reported |
| Designations (please choose 1-3) | 2 | 1: National 2: IUCN Category 3: International (please complete lines 35-69 as necessary) |
| Country | MDG | |
| Location of protected area (province and if possible map reference) | Toliara | |
| Date of establishment | 06/11/2011 | |
| Ownership details (please choose 1-4) | 1 | 1: State 2: Private 3: Community 4: Other |
| Management Authority | Madagascar National Parks (MNP) | |
| Size of protected area (ha) | 184630 | |
| Number of Permanent staff | 17 | |
| Number of Temporary staff | n/a | |
| Annual budget (US\$) for recurrent (operational) funds - excluding staff salary costs | 125,000 | 375000000 arriary |
| | 416,667 | 1 milliard 250 million arriary |
| What are the main values for which the area is designated | Threatened forest block and traditional people | 125000000 arriary |
| List the two primary protected area management objectives in below: | | |
| Management objective 1 | Preservation of biodiversity | |
| Management objective 2 | Preservation of the integrity of Mikea's Culture | |
| No. of people involved in completing assessment | 496 | CLP's member (Comité Local du Parc) |
| Including: (please choose 1-8) | 7 | 1: PA manager 2: PA staff 3: Other PA agency staff 4: Donors 5: NGOs 6: External experts 7: Local community 8: Other |

| Information on International Designations | Please indicate your answer here | |
|---|----------------------------------|------------------------|
| UNESCO World Heritage site (see: whc.unesco.org/en/list) | n/a | |
| Date Listed | n/a | |
| Site name | n/a | |
| Site area | n/a | |
| Geographical co-ordinates | n/a | |
| Criteria for designation | n/a | (i.e. criteria i to x) |
| Statement of Outstanding Universal Value | n/a | |
| Ramsar site (see: http://ramsar.wetlands.org/) | | |

| | | |
|---|---|---|
| Date Listed | n/a | |
| Site name | n/a | |
| Site area | n/a | |
| Geographical number | n/a | |
| Reason for Designation (see Ramsar Information Sheet) | n/a | |
| UNESCO Man and Biosphere Reserves (see: www.unesco.org/mab/wmbrs.shtml) | n/a | http://www.unesco.org/new/en/natural-sciences/environment/ecological-sciences/biosphere-reserves/mab/ |
| Date Listed | n/a | http://www.unesco.org/new/en/natural-sciences/environment/ecological-sciences/biosphere-reserves/africa/madagascar/littoral-de-toliara/ |
| Site name | n/a | |
| Site area | n/a | Total, Core, Buffer, and Transition |
| Geographical co-ordinates | n/a | |
| Criteria for designation | n/a | |
| Fulfilment of three functions of MAB | n/a | conservation, development and logistic support |
| Please list other designations (i.e. ASEAN Heritage, Natura 2000) and any supporting information below | | |
| | MG062 Lake Ihotry Hunting Reserve - Mangoky Delta complex | Name |
| | Location Madagascar, Toliara | |
| | Central coordinates 43o 39.00' East 21o 38.00' South | |
| | IBA criteria A1, A2, A3, A4i | |
| | Area 139,520 ha | |
| | Altitude 6 - 50m | |
| | Year of IBA assessment | Detail |
| http://www.birdlife.org/datazone/sitefactsheet.php?id=6583 | | |
| | | Name |
| | | Detail |
| | | Name |
| | | Detail |

Data Sheet 2: Protected Areas Threats

Please choose all relevant existing threats as either of high, medium or low significance. Threats ranked as of high significance are those which are seriously degrading values; medium are those threats having some negative impact and those characterised as low are threats which are present but not seriously impacting values or N/A where the threat is not present or not applicable in the protected area.

1. Residential and commercial development within a protected area

Threats from human settlements or other non-agricultural land uses with a substantial footprint

| | | |
|---|---|--|
| 1.1 Housing and settlement | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 1.2 Commercial and industrial areas | - | 0: N/A 1: Low 2: Medium 3: High |
| 1.3 Tourism and recreation infrastructure | - | 0: N/A 1: Low 2: Medium 3: High |

2. Agriculture and aquaculture within a protected area

Threats from farming and grazing as a result of agricultural expansion and intensification, including silviculture, mariculture and aquaculture

| | | |
|--|---|--|
| 2.1 Annual and perennial non-timber crop cultivation | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 2.1a Drug cultivation | - | 0: N/A 1: Low 2: Medium 3: High |
| 2.2 Wood and pulp plantations | - | 0: N/A 1: Low 2: Medium 3: High |
| 2.3 Livestock farming and grazing | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 2.4 Marine and freshwater aquaculture | - | 0: N/A 1: Low 2: Medium 3: High |

3. Energy production and mining within a protected area

Threats from production of non-biological resources

| | | |
|--------------------------|---|--|
| 3.1 Oil and gas drilling | - | 0: N/A 1: Low 2: Medium 3: High |
| 3.2 Mining and quarrying | - | 0: N/A 1: Low 2: Medium 3: High |

| | | |
|---|---|--|
| 3.3 Energy generation, including from hydropower dams | - | 0: N/A 1: Low 2: Medium 3: High |
| 4. Transportation and service corridors within a protected area | | |
| Threats from long narrow transport corridors and the vehicles that use them including associated wildlife mortality | | |
| 4.1 Roads and railroads (include road-killed animals) | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 4.2 Utility and service lines (e.g. electricity cables, telephone lines.) | - | 0: N/A 1: Low 2: Medium 3: High |
| 4.3 Shipping lanes and canals | - | 0: N/A 1: Low 2: Medium 3: High |
| 4.4 Flight paths | - | 0: N/A 1: Low 2: Medium 3: High |
| 5. Biological resource use and harm within a protected area | | |
| Threats from consumptive use of "wild" biological resources including both deliberate and unintentional harvesting effects; also persecution or control of specific species (note this includes hunting and killing of animals) | | |
| 5.1 Hunting, killing and collecting terrestrial animals (including killing of animals as a result of human/wildlife conflict) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 5.2 Gathering terrestrial plants or plant products (non-timber) | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 5.3 Logging and wood harvesting | 3 | 0: N/A 1: Low 2: Medium 3: High |
| 5.4 Fishing, killing and harvesting aquatic resources | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 6. Human intrusions and disturbance within a protected area | | |
| Threats from human activities that alter, destroy or disturb habitats and species associated with non-consumptive uses of biological resources | | |
| 6.1 Recreational activities and tourism | - | 0: N/A 1: Low 2: Medium 3: High |
| 6.2 War, civil unrest and military exercises | - | 0: N/A 1: Low 2: Medium 3: High |
| 6.3 Research, education and other work-related activities in protected areas | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 6.4 Activities of protected area managers (e.g. construction or vehicle use, artificial watering points and dams) | - | 0: N/A 1: Low 2: Medium 3: High |
| 6.5 Deliberate vandalism, destructive activities or threats to protected area staff and visitors | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 7. Natural system modifications | | |
| Threats from other actions that convert or degrade habitat or change the way the ecosystem functions | | |
| 7.1 Fire and fire suppression (including arson) | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 7.2 Dams, hydrological modification and water management/use | - | 0: N/A 1: Low 2: Medium 3: High |
| 7.3a Increased fragmentation within protected area | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 7.3b Isolation from other natural habitat (e.g. deforestation, dams without effective aquatic wildlife passages) | - | 0: N/A 1: Low 2: Medium 3: High |
| 7.3c Other 'edge effects' on park values | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 7.3d Loss of keystone species (e.g. top predators, pollinators etc) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 8. Invasive and other problematic species and genes | | |

| Threats from terrestrial and aquatic non-native and native plants, animals, pathogens/microbes or genetic materials that have or are predicted to have harmful effects on biodiversity following introduction, spread and/or increase | | |
|--|---|--|
| 8.1 Invasive non-native/alien plants (weeds) | - | 0: N/A 1: Low 2: Medium 3: High |
| 8.1a Invasive non-native/alien animals | - | 0: N/A 1: Low 2: Medium 3: High |
| 8.1b Pathogens (non-native or native but creating new/increased problems) | - | 0: N/A 1: Low 2: Medium 3: High |
| 8.2 Introduced genetic material (e.g. genetically modified organisms) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9. Pollution entering or generated within protected area | | |
| Threats from introduction of exotic and/or excess materials or energy from point and non-point sources | | |
| 9.1 Household sewage and urban waste water | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.1a Sewage and waste water from protected area facilities (e.g. toilets, hotels etc) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.2 Industrial, mining and military effluents and discharges (e.g. poor water quality discharge from dams, e.g. unnatural temperatures, de-oxygenated, other pollution) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.3 Agricultural and forestry effluents (e.g. excess fertilizers or pesticides) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.4 Garbage and solid waste | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.5 Air-borne pollutants | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.6 Excess energy (e.g. heat pollution, lights etc) | - | 0: N/A 1: Low 2: Medium 3: High |
| 10. Geological events | | |
| Geological events may be part of natural disturbance regimes in many ecosystems. But they can be a threat if a species or habitat is damaged and has lost its resilience and is vulnerable to disturbance. Management capacity to respond to some of these changes may be limited. | | |
| 10.1 Volcanoes | - | 0: N/A 1: Low 2: Medium 3: High |
| 10.2 Earthquakes/Tsunamis | - | 0: N/A 1: Low 2: Medium 3: High |
| 10.3 Avalanches/ Landslides | - | 0: N/A 1: Low 2: Medium 3: High |
| 10.4 Erosion and siltation/ deposition (e.g. shoreline or riverbed changes) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 11. Climate change and severe weather | | |
| Threats from long-term climatic changes which may be linked to global warming and other severe climatic/weather events outside of the natural range of variation | | |
| 11.1 Habitat shifting and alteration | - | 0: N/A 1: Low 2: Medium 3: High |
| 11.2 Droughts | - | 0: N/A 1: Low 2: Medium 3: High |
| 11.3 Temperature extremes | - | 0: N/A 1: Low 2: Medium 3: High |
| 11.4 Storms and flooding | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 12. Specific cultural and social threats | | |

| | | |
|--|---|--|
| 12.1 Loss of cultural links, traditional knowledge and/or management practices | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 12.2 Natural deterioration of important cultural site values | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 12.3 Destruction of cultural heritage buildings, gardens, sites etc | 1 | 0: N/A 1: Low 2: Medium 3: High |

| Assessment Form | | |
|---|---|---|
| 1. Legal status: Does the protected area have legal status (or in the case of private reserves is covered by a covenant or similar)? | 3 | 0: The protected area is not gazetted/covenanted 1: There is agreement that the protected area should be gazetted/covenanted but the process has not yet begun 2: The protected area is in the process of being gazetted/covenanted but the process is still incomplete (includes sites designated under international conventions, such as Ramsar, or local/traditional law such as community conserved areas, which do not yet have national legal status or covenant) 3: The protected area has been formally gazetted/covenanted |
| Comments and Next Steps | | |
| 2. Protected area regulations: Are appropriate regulations in place to control land use and activities (e.g. hunting)? | 3 | 0: There are no regulations for controlling land use and activities in the protected area 1: Some regulations for controlling land use and activities in the protected area exist but these are major weaknesses 2: Regulations for controlling land use and activities in the protected area exist but there are some weaknesses or gaps 3: Regulations for controlling inappropriate land use and activities in the protected area exist and provide an excellent basis for management |
| Comments and Next Steps | | |
| 3. Law Enforcement: Can staff (i.e. those with responsibility for managing the site) enforce protected area rules well enough? | - | 0: The staff have no effective capacity/resources to enforce protected area legislation and regulations 1: There are major deficiencies in staff capacity/resources to enforce protected area legislation and regulations (e.g. lack of skills, no patrol budget, lack of institutional support) 2: The staff have acceptable capacity/resources to enforce protected area legislation and regulations but some deficiencies remain 3: The staff have excellent capacity/resources to enforce protected area legislation and regulations |
| Comments and Next Steps | | |
| 4. Protected area objectives: Is management undertaken according to agreed objectives? | 3 | 0: No firm objectives have been agreed for the protected area 1: The protected area has agreed objectives, but is not managed according to these objectives 2: The protected area has agreed objectives, but is only partially managed according to these objectives 3: The protected area has agreed objectives and is managed to meet these objectives |
| Comments and Next Steps | | |
| 5. Protected area design: Is the protected area the right size and shape to protect species, habitats, ecological processes and water catchments of key conservation concern? | 3 | 0: Inadequacies in protected area design mean achieving the major objectives of the protected area is very difficult 1: Inadequacies in protected area design mean that achievement of major objectives is difficult but some mitigating actions are being taken (e.g. agreements with adjacent land owners for wildlife corridors or introduction of appropriate catchment management) 2: Protected area design is not significantly constraining achievement of objectives, but could be improved (e.g. with respect to larger scale ecological processes) 3: Protected area design helps achievement of objectives; it is appropriate for species and habitat conservation; and maintains ecological processes such as surface and groundwater flows at a catchment scale, natural disturbance patterns etc |
| Comments and Next Steps | | |
| 6. Protected area boundary demarcation: Is the boundary known and demarcated? | 3 | 0: The boundary of the protected area is not known by the management authority or local residents/neighbouring land users 1: The boundary of the protected area is known by the management authority but is not known by local residents/neighbouring land users 2: The boundary of the protected area is known by both the management authority and local residents/neighbouring land users but is not appropriately demarcated 3: The boundary of the protected area is known by the management authority and local residents/neighbouring land users and is appropriately demarcated |
| Comments and Next Steps | | |
| Between the 1960s and the 2000s, forest cover had declined by 16% and deforestation was accelerating. | | |

| | | |
|---|----------|---|
| <p>7. Management plan: Is there a management plan and is it being implemented?</p> | <p>3</p> | <p>0: There is no management plan for the protected area 1: A management plan is being prepared or has been prepared but is not being implemented 2: A management plan exists but it is only being partially implemented because of funding constraints or other problems 3: A management plan exists and is being implemented</p> |
| <p>Comments and Next Steps</p> | | |
| <p>7.a Planning process: The planning process allows adequate opportunity for key stakeholders to influence the management plan</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>7.b Planning process: There is an established schedule and process for periodic review and updating of the management plan</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>7.c Planning process: The results of monitoring, research and evaluation are routinely incorporated into planning</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>8. Regular work plan: Is there a regular work plan and is it being implemented</p> | <p>2</p> | <p>0: No regular work plan exists 1: A regular work plan exists but few of the activities are implemented 2: A regular work plan exists and many activities are implemented 3: A regular work plan exists and all activities are implemented</p> |
| <p>Comments and Next Steps</p> | | |
| <p>9. Resource inventory: Do you have enough information to manage the area?</p> | <p>2</p> | <p>0: There is little or no information available on the critical habitats, species and cultural values of the protected area 1: Information on the critical habitats, species, ecological processes and cultural values of the protected area is not sufficient to support planning and decision making 2: Information on the critical habitats, species, ecological processes and cultural values of the protected area is sufficient for most key areas of planning and decision making 3: Information on the critical habitats, species, ecological processes and cultural values of the protected area is sufficient to support all areas of planning and decision making</p> |
| <p>Comments and Next Steps</p> | | |
| <p>10. Protection systems: Are systems in place to control access/resource use in the protected area?</p> | <p>3</p> | <p>0: Protection systems (patrols, permits etc) do not exist or are not effective in controlling access/resource use 1: Protection systems are only partially effective in controlling access/resource use 2: Protection systems are moderately effective in controlling access/resource use 3: Protection systems are largely or wholly effective in controlling access/resource use</p> |
| <p>Comments and Next Steps</p> | | |
| <p>11. Research: Is there a programme of management-orientated survey and research work?</p> | <p>1</p> | <p>0: There is no survey or research work taking place in the protected area 1: There is a small amount of survey and research work but it is not directed towards the needs of protected area management 2: There is considerable survey and research work but it is not directed towards the needs of protected area management 3: There is a comprehensive, integrated programme of survey and research work, which is relevant to management needs</p> |
| <p>Comments and Next Steps</p> | | |
| <p>12. Resource management: Is active resource management being undertaken?</p> | <p>2</p> | <p>0: Active resource management is not being undertaken 1: Very few of the requirements for active management of critical habitats, species, ecological processes and cultural values are being implemented 2: Many of the requirements for active management of critical habitats, species, ecological processes and, cultural values are being implemented but some key issues are not being addressed 3: Requirements for active management of critical habitats, species, ecological processes and, cultural values are being substantially or fully implemented</p> |
| <p>Comments and Next Steps</p> | | |
| <p>13. Staff numbers: Are there enough people employed to manage the protected area?</p> | <p>1</p> | <p>0: There are no staff 1: Staff numbers are inadequate for critical management activities 2: Staff numbers are below optimum level for critical management activities 3: Staff numbers are adequate for the management needs of the protected area</p> |
| <p>Comments and Next Steps</p> | | |

| | | |
|---|---|---|
| 14. Staff training: Are staff adequately trained to fulfill management objectives? | 2 | <p>0: Staff lack the skills needed for protected area management 1: Staff training and skills are low relative to the needs of the protected area 2: Staff training and skills are adequate, but could be further improved to fully achieve the objectives of management 3: Staff training and skills are aligned with the management needs of the protected area</p> |
| Comments and Next Steps | | |
| 15. Current budget: Is the current budget sufficient? | 2 | <p>0: There is no budget for management of the protected area 1: The available budget is inadequate for basic management needs and presents a serious constraint to the capacity to manage 2: The available budget is acceptable but could be further improved to fully achieve effective management 3: The available budget is sufficient and meets the full management needs of the protected area</p> |
| Comments and Next Steps | | |
| 16. Security of budget: Is the budget secure? | 2 | <p>0: There is no secure budget for the protected area and management is wholly reliant on outside or highly variable funding 1: There is very little secure budget and the protected area could not function adequately without outside funding 2: There is a reasonably secure core budget for regular operation of the protected area but many innovations and initiatives are reliant on outside funding 3: There is a secure budget for the protected area and its management needs</p> |
| Comments and Next Steps | | |
| 17. Management of budget: Is the budget managed to meet critical management needs? | 2 | <p>0: Budget management is very poor and significantly undermines effectiveness (e.g. late release of budget in financial year) 1: Budget management is poor and constrains effectiveness 2: Budget management is adequate but could be improved 3: Budget management is excellent and meets management needs</p> |
| Comments and Next Steps | | |
| 18. Equipment: Is equipment sufficient for management needs? | 2 | <p>0: There are little or no equipment and facilities for management needs 1: There are some equipment and facilities but these are inadequate for most management needs 2: There are equipment and facilities, but still some gaps that constrain management 3: There are adequate equipment and facilities</p> |
| Comments and Next Steps | | |
| 19. Maintenance of equipment: Is equipment adequately maintained? | 2 | <p>0: There is little or no maintenance of equipment and facilities 1: There is some ad hoc maintenance of equipment and facilities 2: There is basic maintenance of equipment and facilities 3: Equipment and facilities are well maintained</p> |
| Comments and Next Steps | | |
| 20. Education and awareness: Is there a planned education programme linked to the objectives and needs? | 3 | <p>0: There is no education and awareness programme 1: There is a limited and ad hoc education and awareness programme 2: There is an education and awareness programme but it only partly meets needs and could be improved 3: There is an appropriate and fully implemented education and awareness programme</p> |
| Comments and Next Steps | | |
| 21. Planning for land and water use: Does land and water use planning recognise the protected area and aid the achievement of objectives? | 3 | <p>0: Adjacent land and water use planning does not take into account the needs of the protected area and activities/policies are detrimental to the survival of the area 1: Adjacent land and water use planning does not takes into account the long term needs of the protected area, but activities are not detrimental the area 2: Adjacent land and water use planning partially takes into account the long term needs of the protected area 3: Adjacent land and water use planning fully takes into account the long term needs of the protected area</p> |
| Comments and Next Steps | | |
| 21a. Land and water planning for habitat conservation: Planning and management in the catchment or landscape containing the protected area incorporates provision for adequate environmental conditions (e.g. volume, quality and timing of water flow, air pollution levels etc) to sustain relevant habitats. | - | <p>0: No 1: Yes</p> |
| Comments and Next Steps | | |
| 21b. Land and water planning for habitat conservation: Management of corridors linking the protected area provides for wildlife passage to key habitats outside the protected area (e.g. to allow migratory fish to travel between freshwater spawning sites and the sea, or to allow animal migration). | - | <p>0: No 1: Yes</p> |
| Comments and Next Steps | | |

| | | |
|---|---|---|
| 21c. Land and water planning for habitat conservation: "Planning addresses ecosystem-specific needs and/or the needs of particular species of concern at an ecosystem scale (e.g. volume, quality and timing of freshwater flow to sustain particular species, fire management to maintain savannah habitats etc.)" | - | 0: No 1: Yes |
| Comments and Next Steps | | |
| 22. State and commercial neighbours: Is there co-operation with adjacent land and water users? | 2 | 0: There is no contact between managers and neighbouring official or corporate land and water users 1: There is contact between managers and neighbouring official or corporate land and water users but little or no cooperation 2: There is contact between managers and neighbouring official or corporate land and water users, but only some co-operation 3: There is regular contact between managers and neighbouring official or corporate land and water users, and substantial co-operation on management |
| Comments and Next Steps | | |
| 23. Indigenous people: Do indigenous and traditional peoples resident or regularly using the protected area have input to management decisions? | 3 | 0: Indigenous and traditional peoples have no input into decisions relating to the management of the protected area 1: Indigenous and traditional peoples have some input into discussions relating to management but no direct role in management 2: Indigenous and traditional peoples directly contribute to some relevant decisions relating to management but their involvement could be improved 3: Indigenous and traditional peoples directly participate in all relevant decisions relating to management, e.g. co-management |
| Comments and Next Steps | | |
| 24. Local communities: Do local communities resident or near the protected area have input to management decisions? | 2 | 0: Local communities have no input into decisions relating to the management of the protected area 1: Local communities have some input into discussions relating to management but no direct role in management 2: Local communities directly contribute to some relevant decisions relating to management but their involvement could be improved 3: Local communities directly participate in all relevant decisions relating to management, e.g. co-management |
| Comments and Next Steps | | |
| 24 a. Impact on communities: There is open communication and trust between local and/or indigenous people, stakeholders and protected area managers | 1 | 0: No 1: Yes |
| Comments and Next Steps | | |
| 24 b. Impact on communities: Programmes to enhance community welfare, while conserving protected area resources, are being implemented | - | 0: No 1: Yes |
| Comments and Next Steps | | |
| 24 c. Impact on communities: Local and/or indigenous people actively support the protected area | 1 | 0: No 1: Yes |
| Comments and Next Steps | | |
| 25. Economic benefit: Is the protected area providing economic benefits to local communities, e.g. income, employment, payment for environmental services? | 2 | 0: The protected area does not deliver any economic benefits to local communities 1: Potential economic benefits are recognised and plans to realise these are being developed 2: There is some flow of economic benefits to local communities 3: There is a major flow of economic benefits to local communities from activities associated with the protected area |
| Comments and Next Steps | | |
| 26. Monitoring and evaluation: Are management activities monitored against performance? | 3 | 0: There is no monitoring and evaluation in the protected area 1: There is some ad hoc monitoring and evaluation, but no overall strategy and/or no regular collection of results 2: There is an agreed and implemented monitoring and evaluation system but results do not feed back into management 3: A good monitoring and evaluation system exists, is well implemented and used in adaptive management |
| Comments and Next Steps | | |
| 27. Visitor facilities: Are visitor facilities adequate? | 1 | 0: There are no visitor facilities and services despite an identified need 1: Visitor facilities and services are inappropriate for current levels of visitation 2: Visitor facilities and services are adequate for current levels of visitation but could be improved 3: Visitor facilities and services are excellent for current levels of visitation |
| Comments and Next Steps | | |
| 28. Commercial tourism operators: Do commercial tour operators contribute to protected area management? | 1 | 0: There is little or no contact between managers and tourism operators using the protected area 1: There is contact between managers and tourism operators but this is largely confined to administrative or regulatory matters 2: There is limited co-operation between managers and tourism operators to enhance visitor experiences and maintain protected area values 3: There is good co-operation between managers and tourism operators to enhance visitor experiences, and maintain protected area values |
| Comments and Next Steps | | |

| | | |
|--|---|--|
| 29. Fees: If fees (i.e. entry fees or fines) are applied, do they help protected area management? | 1 | 0: Although fees are theoretically applied, they are not collected 1: Fees are collected, but make no contribution to the protected area or its environs 2: Fees are collected, and make some contribution to the protected area and its environs 3: Fees are collected and make a substantial contribution to the protected area and its environs |
| Comments and Next Steps | | |
| 30. Condition of values: What is the condition of the important values of the protected area as compared to when it was first designated? | 2 | 0: Many important biodiversity, ecological or cultural values are being severely degraded 1: Some biodiversity, ecological or cultural values are being severely degraded 2: Some biodiversity, ecological and cultural values are being partially degraded but the most important values have not been significantly impacted 3: Biodiversity, ecological and cultural values are predominantly intact |
| Comments and Next Steps | | |
| 30a: Condition of values: The assessment of the condition of values is based on research and/or monitoring | 1 | 0: No 1: Yes |
| Comments and Next Steps | | |
| 30b: Condition of values Specific management programmes are being implemented to address threats to biodiversity, ecological and cultural values | 1 | 0: No 1: Yes |
| Comments and Next Steps | | |
| 30c: Condition of values: Activities to maintain key biodiversity, ecological and cultural values are a routine part of park management | 1 | 0: No 1: Yes |
| Comments and Next Steps | | |
| TOTAL SCORE (102 is the max if all questions are valid) | | 72 Pls add up numbers from assessment form (questions 1 to 30) |



Tracking Tool for Biodiversity Projects in GEF-3, GEF-4, and GEF-5

Objective 1: Catalyzing Sustainability of Protected Area Systems SECTION II: Management Effectiveness Tracking Tool for Protected Areas

Note: Please complete the management effectiveness tracking tool for **EACH** protected area that is the target of the GEF intervention.

Structure and content of the Tracking Tool - Objective 1. Section II:

The Tracking Tool has two main sections: datasheets and assessment form. Both sections should be completed.

1. Datasheets: the data sheet comprises of two separate sections:

Data sheet 1: records details of the assessment and some basic information about the site, such as name, size and location etc.

Data sheet 2: provides a generic list of threats which protected areas can face. On this data sheet the assessors are asked to identify threats and rank their impact on the protected area.

2. Assessment Form: the assessment is structured around 30 questions presented in table format which includes three columns for recording details of the assessment, all of which should be completed.

Important: Please read the Guidelines posted on the GEF website before entering your data

| Data Sheet 1: Reporting Progress at Protected Area Sites | Please indicate your answer here | Notes |
|---|---|--|
| Name, affiliation and contact details for person responsible for completing the METT (email etc.) | Lead: Rabemananjara Henintsoa, Consultant Expert en Biodiversité et Aires Protégées PNUD, henintsoa_rabemananjara@yahoo.fr, +261325720136, Lot II J 32 A Ivandry - 101 Antananarivo | Andriananirnanana Manjakalaza, Chef de Projet WWF, mandriananirnanana@wwf.mg, +261344981433, Boulevard De Lyautey - Wwf Tulear Face Region Militaire N.5 Tulear Centre - 601 Toliara; Robe Jen, Maire Tameantsoa, +261344339370; Raleva Désiré, Secrétaire COBA Somanampy Maroamalo; Diene Bezay Faustin, Président COBA Tsara Omena Antanimena, Commune Rurale Antanimena Onilahy, +261330864519; Razafindrafaho Flerissé, Adjoint-Maire a.i. Manorofofy, +261344000385; Razafisoa Ratalata, Président COBA FIMITOA Ambiky, Ambomahavelona, +261331769451; Zafiraza, Président COBA TAFITA Mhaleotse; Sitra Nantoany, Secrétaire COBA TSIFA, Ranomay, Tameantsoa, +261334937980; Aly Jean-Tsieho, Président de l'OPCI OHEMIHA et Maire d'Antanimena, +261331988319, +261325774674; Rapanoelimanana Ratsimbazafy, Agent de changement COBA, Tongobory; Victor, Conseiller Technique OPCI OHEMIHA et Maire Ambomahavelona, +261325541926, +261346959527 |
| Date assessment carried out | Feb 23, 2015 | Month DD, YYYY (e.g., May 12, 2010) |
| Name of protected area | Amoron'Il Onilahy | See also: |
| WDPA site code (these codes can be found on www.protectedplanet.net) | WDPA ID 352253 | http://www.protectedplanet.net/sites/Onilahy_Proposed_Protected_Area |
| dddd | | 1: National 2: IUCN Category 3: International (please complete lines 35-69 as necessary) |
| Country | MDG | |
| Location of protected area (province and if possible map reference) | Toliara | |
| Date of establishment | 27/01/2007 | |
| Ownership details (please choose 1-4) | | 1: State 2: Private 3: Community 4: Other |
| Management Authority | Comanagement, assisted by WWF | |
| Size of protected area (ha) | 102,179 | |
| Number of Permanent staff | 2 | |
| Number of Temporary staff | 4 | |
| Annual budget (US\$) for recurrent (operational) funds - excluding staff salary costs | 47,000 | |
| Annual budget (US\$) for project or other supplementary funds - excluding staff salary costs | N/A | |
| What are the main values for which the area is designated | conservation | |
| List the two primary protected area management objectives in below: | | |
| Management objective 1 | conservation | |
| Management objective 2 | L'écotourisme contribue à l'amélioration des conditions de vie des populations riveraines de la NAP | |
| No. of people involved in completing assessment | | |
| Including: (please choose 1-8) | | 1: PA manager 2: PA staff 3: Other PA agency staff 4: Donors 5: NGOs 6: External experts 7: Local community 8: Other |

| Information on International Designations | Please indicate your answer here | |
|--|----------------------------------|---|
| UNESCO World Heritage site (see: whc.unesco.org/en/list) | | |
| Date Listed | | |
| Site name | | |
| Site area | | |
| Geographical co-ordinates | | |
| Criteria for designation | | (i.e. criteria i to x) |
| Statement of Outstanding Universal Value | | |
| Ramsar site (see: http://ramsar.wetlands.org/) | | |
| Date Listed | | |
| Site name | | |
| Site area | | |
| Geographical number | | |
| Reason for Designation (see Ramsar Information Sheet) | | |
| UNESCO Man and Biosphere Reserves (see: www.unesco.org/mab/wnbrs.shtml) | | http://www.unesco.org/new/en/natural-sciences/environment/ecological-sciences/biosphere-reserves/mab/ |
| Date Listed | | |

| | | |
|---|--|--|
| Site name | | |
| Site area | | Total, Core, Buffer, and Transition |
| Geographical co-ordinates | | |
| Criteria for designation | | |
| Fulfilment of three functions of MAB | | conservation, development and logistic support |
| Please list other designations (i.e. ASEAN Heritage, Natura 2000) and any supporting information below | | |
| | | Name |
| | | Detail |
| | | Name |
| | | Detail |
| | | Name |
| | | Detail |

Data Sheet 2: Protected Areas Threats

Please choose all relevant existing threats as either of high, medium or low significance. Threats ranked as of high significance are those which are seriously degrading values; medium are

1. Residential and commercial development within a protected area

Threats from human settlements or other non-agricultural land uses with a substantial footprint

| | | |
|---|---|--|
| 1.1 Housing and settlement | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 1.2 Commercial and industrial areas | - | 0: N/A 1: Low 2: Medium 3: High |
| 1.3 Tourism and recreation infrastructure | 1 | 0: N/A 1: Low 2: Medium 3: High |

2. Agriculture and aquaculture within a protected area

Threats from farming and grazing as a result of agricultural expansion and intensification, including silviculture, mariculture and aquaculture

| | | |
|--|---|--|
| 2.1 Annual and perennial non-timber crop cultivation | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 2.1a Drug cultivation | - | 0: N/A 1: Low 2: Medium 3: High |
| 2.2 Wood and pulp plantations | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 2.3 Livestock farming and grazing | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 2.4 Marine and freshwater aquaculture | - | 0: N/A 1: Low 2: Medium 3: High |

3. Energy production and mining within a protected area

Threats from production of non-biological resources

| | | |
|---|---|--|
| 3.1 Oil and gas drilling | 3 | 0: N/A 1: Low 2: Medium 3: High |
| 3.2 Mining and quarrying | 3 | 0: N/A 1: Low 2: Medium 3: High |
| 3.3 Energy generation, including from hydropower dams | - | 0: N/A 1: Low 2: Medium 3: High |

4. Transportation and service corridors within a protected area

Threats from long narrow transport corridors and the vehicles that use them including associated wildlife mortality

| | | |
|---|---|--|
| 4.1 Roads and railroads (include road-killed animals) | - | 0: N/A 1: Low 2: Medium 3: High |
| 4.2 Utility and service lines (e.g. electricity cables, telephone lines,) | - | 0: N/A 1: Low 2: Medium 3: High |
| 4.3 Shipping lanes and canals | - | 0: N/A 1: Low 2: Medium 3: High |
| 4.4 Flight paths | - | 0: N/A 1: Low 2: Medium 3: High |

5. Biological resource use and harm within a protected area

Threats from consumptive use of wild biological resources including both deliberate and unintentional harvesting effects, also persecution or control of specific species (note this includes hunting and killing of animals)

| | | |
|--|---|--|
| 5.1 Hunting, killing and collecting terrestrial animals (including killing of animals as a result of human/wildlife conflict) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 5.2 Gathering terrestrial plants or plant products (non-timber) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 5.3 Logging and wood harvesting | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 5.4 Fishing, killing and harvesting aquatic resources | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 6. Human intrusions and disturbance within a protected area | | |
| Threats from human activities that alter, destroy or disturb habitats and species associated with non-consumptive uses of biological resources | | |
| 6.1 Recreational activities and tourism | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 6.2 War, civil unrest and military exercises | - | 0: N/A 1: Low 2: Medium 3: High |
| 6.3 Research, education and other work-related activities in protected areas | - | 0: N/A 1: Low 2: Medium 3: High |
| 6.4 Activities of protected area managers (e.g. construction or vehicle use, artificial watering points and dams) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 6.5 Deliberate vandalism, destructive activities or threats to protected area staff and visitors | - | 0: N/A 1: Low 2: Medium 3: High |
| 7. Natural system modifications | | |
| Threats from other actions that convert or degrade habitat or change the way the ecosystem functions | | |
| 7.1 Fire and fire suppression (including arson) | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 7.2 Dams, hydrological modification and water management/use | - | 0: N/A 1: Low 2: Medium 3: High |
| 7.3a Increased fragmentation within protected area | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 7.3b Isolation from other natural habitat (e.g. deforestation, dams without effective aquatic wildlife passages) | - | 0: N/A 1: Low 2: Medium 3: High |
| 7.3c Other 'edge effects' on park values | - | 0: N/A 1: Low 2: Medium 3: High |
| 7.3d Loss of keystone species (e.g. top predators, pollinators etc) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 8. Invasive and other problematic species and genes | | |
| Threats from terrestrial and aquatic non-native and native plants, animals, pathogens/microbes or genetic materials that have or are predicted to have harmful effects on biodiversity following introduction, spread and/or increase. | | |
| 8.1 Invasive non-native/alien plants (weeds) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 8.1a Invasive non-native/alien animals | - | 0: N/A 1: Low 2: Medium 3: High |
| 8.1b Pathogens (non-native or native but creating new/increased problems) | - | 0: N/A 1: Low 2: Medium 3: High |
| 8.2 Introduced genetic material (e.g. genetically modified organisms) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9. Pollution entering or generated within protected area | | |
| Threats from introduction of exotic and/or excess materials or energy from point and non-point sources | | |
| 9.1 Household sewage and urban waste water | - | 0: N/A 1: Low 2: Medium 3: High |

| | | |
|--|---|--|
| 9.1a Sewage and waste water from protected area facilities (e.g. toilets, hotels etc) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.2 Industrial, mining and military effluents and discharges (e.g. poor water quality discharge from dams, e.g. unnatural temperatures, de-oxygenated, other pollution) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.3 Agricultural and forestry effluents (e.g. excess fertilizers or pesticides) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 9.4 Garbage and solid waste | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.5 Air-borne pollutants | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.6 Excess energy (e.g. heat pollution, lights etc) | - | 0: N/A 1: Low 2: Medium 3: High |
| 10. Geological events | | |
| Geological events may be part of natural disturbance regimes in many ecosystems, but they can be a threat if a species or habitat is damaged and has lost its resilience and is vulnerable to disturbance. Management capacity to respond to some of these changes may be limited. | | |
| 10.1 Volcanoes | - | 0: N/A 1: Low 2: Medium 3: High |
| 10.2 Earthquakes/Tsunamis | - | 0: N/A 1: Low 2: Medium 3: High |
| 10.3 Avalanches/ Landslides | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 10.4 Erosion and siltation/ deposition (e.g. shoreline or riverbed changes) | 3 | 0: N/A 1: Low 2: Medium 3: High |
| 11. Climate change and severe weather | | |
| Threats from long-term climatic changes which may be linked to global warming and other severe climatic/weather events outside of the natural range of variation | | |
| 11.1 Habitat shifting and alteration | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 11.2 Droughts | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 11.3 Temperature extremes | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 11.4 Storms and flooding | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 12. Specific cultural and social threats | | |
| 12.1 Loss of cultural links, traditional knowledge and/or management practices | - | 0: N/A 1: Low 2: Medium 3: High |
| 12.2 Natural deterioration of important cultural site values | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 12.3 Destruction of cultural heritage buildings, gardens, sites etc | - | 0: N/A 1: Low 2: Medium 3: High |

| Assessment Form | | |
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| add | | |
| 1. Legal status: Does the protected area have legal status (or in the case of private reserves is covered by a covenant or similar)? | 2 | 0: The protected area is not gazetted/covenanted 1: There is agreement that the protected area should be gazetted/covenanted but the process has not yet begun 2: The protected area is in the process of being gazetted/covenanted but the process is still incomplete (includes sites designated under international conventions, such as Ramsar, or local/traditional law such as community conserved areas, which do not yet have national legal status or covenant) 3: The protected area has been formally gazetted/covenanted |

| | | |
|---|---|--|
| Comments and Next Steps | Le dossier de création de la NAP est constitué à 85% : théoriquement, la NAP obtiendra son statut de protection définitive au mois de mai 2015 | |
| 2. Protected area regulations: Are appropriate regulations in place to control land use and activities (e.g. hunting)? | 2 | <p>0: There are no regulations for controlling land use and activities in the protected area</p> <p>1: Some regulations for controlling land use and activities in the protected area exist but these are major weaknesses</p> <p>2: Regulations for controlling land use and activities in the protected area exist but there are some weaknesses or gaps</p> <p>3: Regulations for controlling inappropriate land use and activities in the protected area exist and provide an excellent basis for management</p> |
| Comments and Next Steps | La convention sociale "Dina" homologuée pour la NAP est le principal outil de gestion des CBO et des KASTI (membres de l'Unité Locale de gestion). Ils assurent le contrôle, la surveillance et le suivi de infractions sur le terrain. Il y a aussi la Cellule de Suivi et d'Application du Dina (CSAD). Ces entités font toutes parties de l'organe d'exécution de la NAP e sont opérationnelles depuis | |
| 3. Law Enforcement: Can staff (i.e. those with responsibility for managing the site) enforce protected area rules well enough? | 2 | <p>0: The staff have no effective capacity/resources to enforce protected area legislation and regulations</p> <p>1: There are major deficiencies in staff capacity/resources to enforce protected area legislation and regulations (e.g. lack of skills, no patrol budget, lack of institutional support)</p> <p>2: The staff have acceptable capacity/resources to enforce protected area legislation and regulations but some deficiencies remain</p> <p>3: The staff have excellent capacity/resources to enforce protected area legislation and regulations</p> |
| Comments and Next Steps | La structure de gestion mise en place est basée sur la "cogestion" et opérationnelle, le renforcement de capacités de ces membres doit être encore assuré. | |
| 4. Protected area objectives: Is management undertaken according to agreed objectives? | 3 | <p>0: No firm objectives have been agreed for the protected area</p> <p>1: The protected area has agreed objectives, but is not managed according to these objectives</p> <p>2: The protected area has agreed objectives, but is only partially managed according to these objectives</p> <p>3: The protected area has agreed objectives and is managed to meet these objectives</p> |
| Comments and Next Steps | La NAP dispose d'un outil de gestion et de suivi (le PAG et le PGEISS) : le plan stratégique de la NAP est établi dans le PAG pour atteindre les objectifs fixés sur 05 ans. | |
| 5. Protected area design: Is the protected area the right size and shape to protect species, habitats, ecological processes and water catchments of key conservation concern? | 3 | <p>0: Inadequacies in protected area design mean achieving the major objectives of the protected area is very difficult</p> <p>1: Inadequacies in protected area design mean that achievement of major objectives is difficult but some mitigating actions are being taken (e.g. agreements with adjacent land owners for wildlife corridors or introduction of appropriate catchment management)</p> <p>2: Protected area design is not significantly constraining achievement of objectives, but could be improved (e.g. with respect to larger scale ecological processes)</p> <p>3: Protected area design helps achievement of objectives; it is appropriate for species and habitat conservation; and maintains ecological processes such as surface and groundwater flows at a catchment scale, natural disturbance patterns etc</p> |
| Comments and Next Steps | Le zonage de la NAP est entièrement adapté aux enjeux écologique, sur la biodiversité, sociaux, économiques de la NAP et à la capacité de gérer. L'affinage final du zonage est concerté à l'issue des séries de consultations publiques. | |
| 6. Protected area boundary demarcation: Is the boundary known and demarcated? | 3 | <p>0: The boundary of the protected area is not known by the management authority or local residents/neighbouring land users</p> <p>1: The boundary of the protected area is known by the management authority but is not known by local residents/neighbouring land users</p> <p>2: The boundary of the protected area is known by both the management authority and local residents/neighbouring land users but is not appropriately demarcated</p> <p>3: The boundary of the protected area is known by the management authority and local residents/neighbouring land users and is appropriately demarcated</p> |

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| | Comments and Next Steps | Le processus de délimitation et de redélimitation finale est toujours accompagné d'une concertation et de consultation publique (propriétaires des terres privés, sociétés minières, particuliers, ...). Le processus a duré 04 ans, afin d'établir des limites acceptées par tous. | |
| | 7. Management plan: Is there a management plan and is it being implemented? | | 2 0: There is no management plan for the protected area 1: A management plan is being prepared or has been prepared but is not being implemented 2: A management plan exists but it is only being partially implemented because of funding constraints or other problems 3: A management plan exists and is being implemented |
| | Comments and Next Steps | Le PAG et le PGEES de la NAP sont déjà validés au niveau national. Le cahier de charges environnementales de la NAP est validé. Le permis environnemental de la NAP est déjà délivré par l'ONE. | |
| x | 7.a Planning process: The planning process allows adequate opportunity for key stakeholders to influence the management plan | | 1 0: No 1: Yes |
| | Comments and Next Steps | | |
| x | 7.b Planning process: There is an established schedule and process for periodic review and updating of the management plan | | 1 0: No 1: Yes |
| | Comments and Next Steps | Le PAG est le principal outil de gestion est il est mis à jour. | |
| x | 7.c Planning process: The results of monitoring, research and evaluation are routinely incorporated into planning | | 1 0: No 1: Yes |
| | Comments and Next Steps | Chaque élaboration de PTA au début de l'année tient compte des réalisations de l'année passée. | |
| | 8. Regular work plan: Is there a regular work plan and is it being implemented | | 2 0: No regular work plan exists 1: A regular work plan exists but few of the activities are implemented 2: A regular work plan exists and many activities are implemented 3: A regular work plan exists and all activities are implemented |
| | Comments and Next Steps | Le PAG de la NAP est mis en oeuvre depuis 2014. Seulement les activités prioritaires sont réalisées faute de financement conséquent. | |
| | 9. Resource inventory: Do you have enough information to manage the area? | | 2 0: There is little or no information available on the critical habitats, species and cultural values of the protected area 1: Information on the critical habitats, species, ecological processes and cultural values of the protected area is not sufficient to support planning and decision making 2: Information on the critical habitats, species, ecological processes and cultural values of the protected area is sufficient for most key areas of planning and decision making 3: Information on the critical habitats, species, ecological processes and cultural values of the protected area is sufficient to support all areas of planning and decision making |
| | Comments and Next Steps | Les données à disposition permettent de gérer et de prendre des décisions. Cependant, des inventaires scientifiques et enquête socio-économiques périodiques doivent être menés. | |
| | 10. Protection systems: Are systems in place to control access/resource use in the protected area? | | 2 0: Protection systems (patrols, permits etc) do not exist or are not effective in controlling access/resource use 1: Protection systems are only partially effective in controlling access/resource use 2: Protection systems are moderately effective in controlling access/resource use 3: Protection systems are largely or wholly effective in controlling access/resource use |
| | Comments and Next Steps | Réalisation systématique de patrouilles périodiques mensuelles (contrôle, suivi et surveillance) par les KASTI de 39 Fokontany prioritaires et les Polisin'Ala des 07 CBO de la NAP. | |
| | 11. Research: Is there a programme of management-orientated survey and research work? | | 3 0: There is no survey or research work taking place in the protected area 1: There is a small amount of survey and research work but it is not directed towards the needs of protected area management 2: There is considerable survey and research work but it is not directed towards the needs of protected area management 3: There is a comprehensive, integrated programme of survey and research work, which is relevant to management needs |

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| | Collaboration avec les Universitaires sur la réalisation des inventaires et des recherches sur les cibles de conservation | |
| 12. Resource management: Is active resource management being undertaken? | | <p>0: Active resource management is not being undertaken</p> <p>1: Very few of the requirements for active management of critical habitats, species, ecological processes and cultural values are being implemented</p> <p>2: Many of the requirements for active management of critical habitats, species, ecological processes and, cultural values are being implemented but some key issues are not being addressed</p> <p>3: Requirements for active management of critical habitats, species, ecological processes and, cultural values are being substantially or fully implemented</p> |
| | La structure de gestion de la NAP est opérationnelle depuis juillet 2014 avec la mise en oeuvre du PAG. | |
| 13. Staff numbers: Are there enough people employed to manage the protected area? | | <p>0: There are no staff</p> <p>1: Staff numbers are inadequate for critical management activities</p> <p>2: Staff numbers are below optimum level for critical management activities</p> <p>3: Staff numbers are adequate for the management needs of the protected area</p> |
| | Le personnel technique permanent est insuffisant. Avec la cogestion, les Unités de Locales de Gestion (CBO, KASTI), le COGE (Cellules Techniques de l'OPCI OHEMIHA et la Cellule de Suivi du Dina) assurent le contrôle, la surveillance. Mais ce n'est pas suffisant. | |
| 14. Staff training: Are staff adequately trained to fulfill management objectives? | | <p>0: Staff lack the skills needed for protected area management</p> <p>1: Staff training and skills are low relative to the needs of the protected area</p> <p>2: Staff training and skills are adequate, but could be further improved to fully achieve the objectives of management</p> <p>3: Staff training and skills are aligned with the management needs of the protected area</p> |
| | Le personnel technique permanent du projet pour l'appui au gestion sont des techniciens qualifiés mais le nombre est très limité. | |
| 15. Current budget: Is the current budget sufficient? | | <p>0: There is no budget for management of the protected area</p> <p>1: The available budget is inadequate for basic management needs and presents a serious constraint to the capacity to manage</p> <p>2: The available budget is acceptable but could be further improved to fully achieve effective management</p> <p>3: The available budget is sufficient and meets the full management needs of the protected area</p> |
| | Depuis 2014 : seules les activités prioritaires (création définitive de la NAP, contrôle et surveillance, appui aux AGR et les Suivi écologique) sont assurées, faute de financement. Or le budget adéquat pour la Planification est déjà établi. | |
| 16. Security of budget: Is the budget secure? | | <p>0: There is no secure budget for the protected area and management is wholly reliant on outside or highly variable funding</p> <p>1: There is very little secure budget and the protected area could not function adequately without outside funding</p> <p>2: There is a reasonably secure core budget for regular operation of the protected area but many innovations and initiatives are reliant on outside funding</p> <p>3: There is a secure budget for the protected area and its management needs</p> |
| | | |
| 17. Management of budget: Is the budget managed to meet critical management needs? | | <p>0: Budget management is very poor and significantly undermines effectiveness (e.g. late release of budget in financial year)</p> <p>1: Budget management is poor and constrains effectiveness</p> <p>2: Budget management is adequate but could be improved</p> <p>3: Budget management is excellent and meets management needs</p> |
| | Le manque de financement limite la réalisation des activités prévues dna Is le PAG malgré une bonne gestion du budget du Projet. | |
| 18. Equipment: Is equipment sufficient for management needs? | | <p>0: There are little or no equipment and facilities for management needs</p> <p>1: There are some equipment and facilities but these are inadequate for most management needs</p> <p>2: There are equipment and facilities, but still some gaps that constrain management</p> <p>3: There are adequate equipment and facilities</p> |
| | L'achat de matériel et d'équipement est limité par le manque de moyen financier. | |

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| | 19. Maintenance of equipment: Is equipment adequately maintained? | 3 | 0: There is little or no maintenance of equipment and facilities 1: There is some ad hoc maintenance of equipment and facilities 2: There is basic maintenance of equipment and facilities 3: Equipment and facilities are well maintained |
| | Comments and Next Steps | Le peu de matériel et infrastructure que dispose la NAP est bien entretenu | |
| | 20. Education and awareness: Is there a planned education programme linked to the objectives and needs? | 2 | 0: There is no education and awareness programme 1: There is a limited and ad hoc education and awareness programme 2: There is an education and awareness programme but it only partly meets needs and could be improved 3: There is an appropriate and fully implemented education and awareness programme |
| | Comments and Next Steps | L'éducation environnementale a besoin d'amélioration et d'appui financier. Par contre la sensibilisation sur : le zonage, le Dina et la structure de gestion, ces activités sont planifiées et réalisées depuis 2014. | |
| | 21. Planning for land and water use: Does land and water use planning recognise the protected area and aid the achievement of objectives? | 3 | 0: Adjacent land and water use planning does not take into account the needs of the protected area and activities/policies are detrimental to the survival of the area 1: Adjacent land and water use planning does not take into account the long term needs of the protected area, but activities are not detrimental the area 2: Adjacent land and water use planning partially takes into account the long term needs of the protected area 3: Adjacent land and water use planning fully takes into account the long term needs of the protected area |
| | Comments and Next Steps | Le fleuve Onilahy et les petits lacs et marais (zones humides) font partie de la Zone de Protection de la NAP (adjacentes à la NAP). La gestion des lacs sont assurées par les CBO en GELOSE. La gestion nécessite plus de proximité. | |
| x | 21a. Land and water planning for habitat conservation: Planning and management in the catchment or landscape containing the protected area incorporates provision for adequate environmental conditions (e.g. volume, quality and timing of water flow, air pollution levels etc) to sustain relevant habitats. | 1 | 0: No 1: Yes |
| | Comments and Next Steps | | |
| x | 21b. Land and water planning for habitat conservation: Management of corridors linking the protected area provides for wildlife passage to key habitats outside the protected area (e.g. to allow migratory fish to travel between freshwater spawning sites and the sea, or to allow animal migration). | 1 | 0: No 1: Yes |
| | Comments and Next Steps | | |
| x | 21c. Land and water planning for habitat conservation: "Planning addresses ecosystem-specific needs and/or the needs of particular species of concern at an ecosystem scale (e.g. volume, quality and timing of freshwater flow to sustain particular species, fire management to maintain savannah habitats etc)." | 1 | 0: No 1: Yes |
| | Comments and Next Steps | | |
| | 22. State and commercial neighbours: Is there co-operation with adjacent land and water users? | 1 | 0: There is no contact between managers and neighbouring official or corporate land and water users 1: There is contact between managers and neighbouring official or corporate land and water users but little or no cooperation 2: There is contact between managers and neighbouring official or corporate land and water users, but only some co-operation 3: There is regular contact between managers and neighbouring official or corporate land and water users, and substantial co-operation on management |
| | Comments and Next Steps | quelques industries minières (extraction de calcaire) existent mais ne sont pas encore en activité, en phase de prospection. La collaboration reste au stade d'attente mutuelle sur les limites et le respect du cahier de charges environnementales. | |
| | 23. Indigenous people: Do indigenous and traditional peoples resident or regularly using the protected area have input to management decisions? | 3 | 0: Indigenous and traditional peoples have no input into decisions relating to the management of the protected area 1: Indigenous and traditional peoples have some input into discussions relating to management but no direct role in management 2: Indigenous and traditional peoples directly contribute to some relevant decisions relating to management but their involvement could be improved 3: Indigenous and traditional peoples directly participate in all relevant decisions relating to management, e.g. co-management |
| | Comments and Next Steps | La structure de gestion de la NAP même est la cogestion. Tout le processus de création de la NAP est suivi et accompagné par les populations locales. | |

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| | 24. Local communities: Do local communities resident or near the protected area have input to management decisions? | 3 | 0: Local communities have no input into decisions relating to the management of the protected area 1: Local communities have some input into discussions relating to management but no direct role in management 2: Local communities directly contribute to some relevant decisions relating to management but their involvement could be improved 3: Local communities directly participate in all relevant decisions relating to management, e.g. co-management |
| | Comments and Next Steps | Les communautés locales dans le Unités Locales de Gestion (ULG) gerent directement (ex : les sites TGRN dans la NAP et les KASTI dans les zones hors TGRN) et participent dans la cogestion de la NAP. | |
| x | 24 a. Impact on communities: There is open communication and trust between local and/or indigenous people, stakeholders and protected area managers | 1 | 0: No 1: Yes |
| | Comments and Next Steps | Toutes les grandes décisions prises lors du processus de création sont concertées avec les communautés locales (PV de consultation publique sur le zonage et les limites extérieures et les Noyaux Durs de la NAP). | |
| x | 24 b. Impact on communities: Programmes to enhance community welfare, while conserving protected area resources, are being implemented | 1 | 0: No 1: Yes |
| | Comments and Next Steps | Le Cahier de Charges Environnementales de la NAP stipule la mise en œuvre des mesures (activités) d'amélioration des conditions de vie des communautés concernées par la NAP. Initiées depuis 2012 et à renforcer à partir de 2015. | |
| x | 24 c. Impact on communities: Local and/or indigenous people actively support the protected area | 1 | 0: No 1: Yes |
| | Comments and Next Steps | Les indicateurs : comme la diminution de 90% des activités de défrichement dans la NAP de 2010 à décembre 2014 montrent que les populations locales soutiennent la NAP. Ainsi que la réalisation des patrouilles périodiques mensuelles sans rémunération. | |
| | 25. Economic benefit: Is the protected area providing economic benefits to local communities, e.g. income, employment, payment for environmental services? | 1 | 0: The protected area does not deliver any economic benefits to local communities 1: Potential economic benefits are recognised and plans to realise these are being developed 2: There is some flow of economic benefits to local communities 3: There is a major flow of economic benefits to local communities from activities associated with the protected area |
| | Comments and Next Steps | Comme la NAP est en cours de création, les retombées économiques ne sont encore palpables, même si quelques revenus générés par les AGR commencent à se faire sentir. Cependant, la stratégie et la planification pour atteindre cet objectif sont déjà élaboré et débute à être mis en œuvre. | |
| | 26. Monitoring and evaluation: Are management activities monitored against performance? | 3 | 0: There is no monitoring and evaluation in the protected area 1: There is some ad hoc monitoring and evaluation, but no overall strategy and/or no regular collection of results 2: There is an agreed and implemented monitoring and evaluation system but results do not feed back into management 3: A good monitoring and evaluation system exists, is well implemented and used in adaptive management |
| | Comments and Next Steps | Le PAG de la NAP définit les stratégies et les actions de suivi et d'évaluation à mener pour la NAP. Les profils souhaités pour 2018 sont même défini's. | |
| | 27. Visitor facilities: Are visitor facilities adequate? | 1 | 0: There are no visitor facilities and services despite an identified need 1: Visitor facilities and services are inappropriate for current levels of visitation 2: Visitor facilities and services are adequate for current levels of visitation but could be improved 3: Visitor facilities and services are excellent for current levels of visitation |

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| | Comments and Next Steps | Nous n'avons pas de budget pour les infrastructures d'accueil (aménagement et construction) | |
| | 28. Commercial tourism operators: Do commercial tour operators contribute to protected area management? | - | 0: There is little or no contact between managers and tourism operators using the protected area 1: There is contact between managers and tourism operators but this is largely confined to administrative or regulatory matters 2: There is limited co-operation between managers and tourism operators to enhance visitor experiences and maintain protected area values 3: There is good co-operation between managers and tourism operators to enhance visitor experiences and maintain protected area values |
| | Comments and Next Steps | La NAP dispose déjà d'un Plan de Développement Ecotouristique et débute avec la promotion de la potentialité écotouristique de la NAP. Il a des intéressés mais aucun contrat ou convention n'est encore signé. Les investisseurs attendent la stabilité politique et sociale (insécurité) avant d'investir. Mais beaucoup sont intéressés. | |
| | 29. Fees: If fees (i.e. entry fees or fines) are applied, do they help protected area management? | - | 0: Although fees are theoretically applied, they are not collected 1: Fees are collected, but make no contribution to the protected area or its environs 2: Fees are collected, and make some contribution to the protected area and its environs 3: Fees are collected and make a substantial contribution to the protected area and its environs |
| | Comments and Next Steps | Le tarif et les droits d'entrée sont déjà fixés mais comme l'aménagement des sites n'est pas encore effectif, il est difficile d'appliquer le mécanisme de perception. | |
| | 30. Condition of values: What is the condition of the important values of the protected area as compared to when it was first designated? | | 3 0: Many important biodiversity, ecological or cultural values are being severely degraded 1: Some biodiversity, ecological or cultural values are being severely degraded 2: Some biodiversity, ecological and cultural values are being partially degraded but the most important values have not been significantly impacted 3: Biodiversity, ecological and cultural values are predominantly intact |
| | Comments and Next Steps | Comme la NAP est en cours de création est que le mode de gestion est la "cogestion", nous arrivons à limiter la dégradation est de maintenir le service écologique de la NAP à niveau acceptable. | |
| x | 30a: Condition of values: The assessment of the condition of values is based on research and/or monitoring | 1 | 0: No 1: Yes |
| | Comments and Next Steps | Analyse des fiches de suivi de la surveillance faite par les KASTI de 39 Fokontany et les Polisin'Ala des 07 CBO de la NAP ; recherche et inventaire scientifiques réalisées par les Universitaires | |
| x | 30b: Condition of values Specific management programmes are being implemented to address threats to biodiversity, ecological and cultural values | 1 | 0: No 1: Yes |
| | Comments and Next Steps | Plan de gestion mis en oeuvre depuis juillet 2014. | |
| x | 30c: Condition of values: Activities to maintain key biodiversity, ecological and cultural values are a routine part of park management | 1 | 0: No 1: Yes |
| | Comments and Next Steps | Activités planifiées dans le PAG et mis en oeuvre depuis juillet 2014. | |
| TOTAL SCORE (102 is the max if all questions are valid) | | 74 | Pls add up numbers from assessment form (questions 1 to 30) |



Tracking Tool for Biodiversity Projects in GEF-3, GEF-4, and GEF-5

Objective 1: Catalyzing Sustainability of Protected Area Systems SECTION II: Management Effectiveness Tracking Tool for Protected Areas

Note: Please complete the management effectiveness tracking tool for **EACH** protected area that is the target of the GEF intervention.

Structure and content of the Tracking Tool - Objective 1. Section II:

The Tracking Tool has two main sections: datasheets and assessment form. Both sections should be completed.

1. Datasheets: the data sheet comprises of two separate sections:

Data sheet 1: records details of the assessment and some basic information about the site, such as name, size and location etc.

Data sheet 2: provides a generic list of threats which protected areas can face. On this data sheet the assessors are asked to identify threats and rank their impact on the protected area.

2. Assessment Form: the assessment is structured around 30 questions presented in table format which includes three columns for recording details of the assessment, all of which should be completed.

Important: Please read the Guidelines posted on the GEF website before entering your data

| Data Sheet 1: Reporting Progress at Protected Area Sites | Please indicate your answer here | Notes |
|---|---|---|
| Name, affiliation and contact details for person responsible for completing the METT (email etc.) | | |
| Date assessment carried out | March 03, 2015 | Month DD, YYYY (e.g., May 12, 2010) |
| Name of protected area | Beza Mahafaly | See also: |
| WDPA site code (these codes can be found on www.protectedplanet.net) | WDPA ID 10634 | http://www.protectedplanet.net/sites/Bezaha_Mahafaly_Special_Reserve |
| Designations (please choose 1-3) | 2 | 1: National 2: IUCN Category 3: International (please complete lines 35-69 as necessary) |
| Country | MDG | |
| Location of protected area (province and if possible map reference) | Betioky | |
| Date of establishment | 04/06/1986 | |
| Ownership details (please choose 1-4) | 1 | 1: State 2: Private 3: Community 4: Other |
| Management Authority | MNP | |
| Size of protected area (ha) | 4,200 | |
| Number of Permanent staff | 9 | |
| Number of Temporary staff | 5 | |
| Annual budget (US\$) for recurrent (operational) funds - excluding staff salary costs | 48,672 | |
| | 36,538 | |
| What are the main values for which the area is designated | Deux especes de lemuriens diurnes: Lemur catta, Propithecus verreauxi verreauxi avec une densité élevée | |
| List the two primary protected area management objectives in below: | | |
| Management objective 1 | 0% de perte de forêt | |
| Management objective 2 | 2 de groupe de lémurien à 2 groupes à l'hectare | |
| No. of people involved in completing assessment | | |
| Including: (please choose 1-8) | 2 | 1: PA manager 2: PA staff 3: Other PA agency staff 4: Donors 5: NGOs 6: External experts 7: Local community 8: Other |

| Information on International Designations | Please indicate your answer here | |
|---|----------------------------------|------------------------|
| UNESCO World Heritage site (see: whc.unesco.org/en/list) | | |
| Date Listed | | |
| Site name | | |
| Site area | | |
| Geographical co-ordinates | | |
| Criteria for designation | | (i.e. criteria i to x) |
| Statement of Outstanding Universal Value | | |
| Ramsar site (see: http://ramsar.wetlands.org/) | | |
| Date Listed | | |
| Site name | | |
| Site area | | |
| Geographical number | | |

| | | |
|--|--|---|
| Reason for Designation (see Ramsar Information Sheet) | | |
| UNESCO Man and Biosphere Reserves (see: www.unesco.org/mab/wmbrs.shtml) | | http://www.unesco.org/new/en/natural-sciences/environment/ecological-sciences/biosphere-reserves/mab/ |
| Date Listed | | |
| Site name | | |
| Site area | | Total, Core, Buffer, and Transition |
| Geographical co-ordinates | | |
| Criteria for designation | | |
| Fulfilment of three functions of MAB | | conservation, development and logistic support |
| Please list other designations (i.e. ASEAN Heritage, Natura 2000) and any supporting information below | | |
| | | Name |
| | | Detail |
| | | |
| | | Name |
| | | Detail |
| | | |
| | | Name |
| | | Detail |

Data Sheet 2: Protected Areas Threats

Please choose all relevant existing threats as either of high, medium or low significance. Threats ranked as of high significance are those which are seriously degrading values; medium are those threats having some negative impact and those characterised as low are threats which are present but not seriously impacting values or N/A where the threat is not present or not applicable in the protected area.

1. Residential and commercial development within a protected area

Threats from human settlements or other non-agricultural land uses with a substantial footprint

| | | |
|---|---|--|
| 1.1 Housing and settlement | - | 0: N/A 1: Low 2: Medium 3: High |
| 1.2 Commercial and industrial areas | - | 0: N/A 1: Low 2: Medium 3: High |
| 1.3 Tourism and recreation infrastructure | 2 | 0: N/A 1: Low 2: Medium 3: High |

2. Agriculture and aquaculture within a protected area

Threats from farming and grazing as a result of agricultural expansion and intensification, including silviculture, mariculture and aquaculture

| | | |
|--|---|--|
| 2.1 Annual and perennial non-timber crop cultivation | - | 0: N/A 1: Low 2: Medium 3: High |
| 2.1a Drug cultivation | - | 0: N/A 1: Low 2: Medium 3: High |
| 2.2 Wood and pulp plantations | - | 0: N/A 1: Low 2: Medium 3: High |
| 2.3 Livestock farming and grazing | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 2.4 Marine and freshwater aquaculture | - | 0: N/A 1: Low 2: Medium 3: High |

3. Energy production and mining within a protected area

Threats from production of non-biological resources

| | | |
|---|---|--|
| 3.1 Oil and gas drilling | - | 0: N/A 1: Low 2: Medium 3: High |
| 3.2 Mining and quarrying | - | 0: N/A 1: Low 2: Medium 3: High |
| 3.3 Energy generation, including from hydropower dams | - | 0: N/A 1: Low 2: Medium 3: High |

4. Transportation and service corridors within a protected area

Threats from long narrow transport corridors and the vehicles that use them including associated wildlife mortality

| | | |
|---|---|--|
| 4.1 Roads and railroads (include road-killed animals) | 2 | 0: N/A 1: Low 2: Medium 3: High |
|---|---|--|

| | | |
|---|---|--|
| 4.2 Utility and service lines (e.g. electricity cables, telephone lines.) | - | 0: N/A 1: Low 2: Medium 3: High |
| 4.3 Shipping lanes and canals | - | 0: N/A 1: Low 2: Medium 3: High |
| 4.4 Flight paths | - | 0: N/A 1: Low 2: Medium 3: High |
| 5. Biological resource use and harm within a protected area | | |
| Threats from consumptive use of "wild" biological resources including both deliberate and unintentional harvesting effects; also persecution or control of specific species (note this includes hunting and killing of animals) | | |
| 5.1 Hunting, killing and collecting terrestrial animals (including killing of animals as a result of human/wildlife conflict) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 5.2 Gathering terrestrial plants or plant products (non-timber) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 5.3 Logging and wood harvesting | 3 | 0: N/A 1: Low 2: Medium 3: High |
| 5.4 Fishing, killing and harvesting aquatic resources | - | 0: N/A 1: Low 2: Medium 3: High |
| 6. Human intrusions and disturbance within a protected area | | |
| Threats from human activities that alter, destroy or disturb habitats and species associated with non-consumptive uses of biological resources | | |
| 6.1 Recreational activities and tourism | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 6.2 War, civil unrest and military exercises | - | 0: N/A 1: Low 2: Medium 3: High |
| 6.3 Research, education and other work-related activities in protected areas | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 6.4 Activities of protected area managers (e.g. construction or vehicle use, artificial watering points and dams) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 6.5 Deliberate vandalism, destructive activities or threats to protected area staff and visitors | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 7. Natural system modifications | | |
| Threats from other actions that convert or degrade habitat or change the way the ecosystem functions | | |
| 7.1 Fire and fire suppression (including arson) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 7.2 Dams, hydrological modification and water management/use | - | 0: N/A 1: Low 2: Medium 3: High |
| 7.3a Increased fragmentation within protected area | - | 0: N/A 1: Low 2: Medium 3: High |
| 7.3b Isolation from other natural habitat (e.g. deforestation, dams without effective aquatic wildlife passages) | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 7.3c Other 'edge effects' on park values | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 7.3d Loss of keystone species (e.g. top predators, pollinators etc) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 8. Invasive and other problematic species and genes | | |
| Threats from terrestrial and aquatic non-native and native plants, animals, pathogens/microbes or genetic materials that have or are predicted to have harmful effects on biodiversity following introduction, spread and/or increase | | |

| | | |
|--|---|--|
| 8.1 Invasive non-native/alien plants (weeds) | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 8.1a Invasive non-native/alien animals | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 8.1b Pathogens (non-native or native but creating new/increased problems) | - | 0: N/A 1: Low 2: Medium 3: High |
| 8.2 Introduced genetic material (e.g. genetically modified organisms) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9. Pollution entering or generated within protected area | | |
| Threats from introduction of exotic and/or excess materials or energy from point and non-point sources | | |
| 9.1 Household sewage and urban waste water | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.1a Sewage and waste water from protected area facilities (e.g. toilets, hotels etc) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 9.2 Industrial, mining and military effluents and discharges (e.g. poor water quality discharge from dams, e.g. unnatural temperatures, de-oxygenated, other pollution) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.3 Agricultural and forestry effluents (e.g. excess fertilizers or pesticides) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.4 Garbage and solid waste | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.5 Air-borne pollutants | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.6 Excess energy (e.g. heat pollution, lights etc) | - | 0: N/A 1: Low 2: Medium 3: High |
| 10. Geological events | | |
| Geological events may be part of natural disturbance regimes in many ecosystems. But they can be a threat if a species or habitat is damaged and has lost its resilience and is vulnerable to disturbance. Management capacity to respond to some of these changes may be limited. | | |
| 10.1 Volcanoes | - | 0: N/A 1: Low 2: Medium 3: High |
| 10.2 Earthquakes/Tsunamis | - | 0: N/A 1: Low 2: Medium 3: High |
| 10.3 Avalanches/ Landslides | - | 0: N/A 1: Low 2: Medium 3: High |
| 10.4 Erosion and siltation/ deposition (e.g. shoreline or riverbed changes) | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 11. Climate change and severe weather | | |
| Threats from long-term climatic changes which may be linked to global warming and other severe climatic/weather events outside of the natural range of variation | | |
| 11.1 Habitat shifting and alteration | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 11.2 Droughts | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 11.3 Temperature extremes | 1 | 0: N/A 1: Low 2: Medium 3: High |

| | | |
|--|---|--|
| 11.4 Storms and flooding | - | 0: N/A 1: Low 2: Medium 3: High |
| 12. Specific cultural and social threats | | |
| 12.1 Loss of cultural links, traditional knowledge and/or management practices | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 12.2 Natural deterioration of important cultural site values | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 12.3 Destruction of cultural heritage buildings, gardens, sites etc | | 0: N/A 1: Low 2: Medium 3: High |

Assessment Form

| | | |
|---|---|---|
| 1. Legal status: Does the protected area have legal status (or in the case of private reserves is covered by a covenant or similar)? | 3 | 0: The protected area is not gazetted/covenanted 1: There is agreement that the protected area should be gazetted/covenanted but the process has not yet begun 2: The protected area is in the process of being gazetted/covenanted but the process is still incomplete (includes sites designated under international conventions, such as Ramsar, or local/traditional law such as community conserved areas, which do not yet have national legal status or covenant) 3: The protected area has been formally gazetted/covenanted |
| Comments and Next Steps | | |
| 2. Protected area regulations: Are appropriate regulations in place to control land use and activities (e.g. hunting)? | 2 | 0: There are no regulations for controlling land use and activities in the protected area 1: Some regulations for controlling land use and activities in the protected area exist but these are major weaknesses 2: Regulations for controlling land use and activities in the protected area exist but there are some weaknesses or gaps 3: Regulations for controlling inappropriate land use and activities in the protected area exist and provide an excellent basis for management |
| Comments and Next Steps | | |
| 3. Law Enforcement: Can staff (i.e. those with responsibility for managing the site) enforce protected area rules well enough? | 2 | 0: The staff have no effective capacity/resources to enforce protected area legislation and regulations 1: There are major deficiencies in staff capacity/resources to enforce protected area legislation and regulations (e.g. lack of skills, no patrol budget, lack of institutional support) 2: The staff have acceptable capacity/resources to enforce protected area legislation and regulations but some deficiencies remain 3: The staff have excellent capacity/resources to enforce protected area legislation and regulations |
| Comments and Next Steps | | |
| 4. Protected area objectives: Is management undertaken according to agreed objectives? | 2 | 0: No firm objectives have been agreed for the protected area 1: The protected area has agreed objectives, but is not managed according to these objectives 2: The protected area has agreed objectives, but is only partially managed according to these objectives 3: The protected area has agreed objectives and is managed to meet these objectives |
| Comments and Next Steps | | |
| 5. Protected area design: Is the protected area the right size and shape to protect species, habitats, ecological processes and water catchments of key conservation concern? | 1 | 0: Inadequacies in protected area design mean achieving the major objectives of the protected area is very difficult 1: Inadequacies in protected area design mean that achievement of major objectives is difficult but some mitigating actions are being taken (e.g. agreements with adjacent land owners for wildlife corridors or introduction of appropriate catchment management) 2: Protected area design is not significantly constraining achievement of objectives, but could be improved (e.g. with respect to larger scale ecological processes) 3: Protected area design helps achievement of objectives; it is appropriate for species and habitat conservation; and maintains ecological processes such as surface and groundwater flows at a catchment scale, natural disturbance patterns etc |
| Comments and Next Steps | | |
| 6. Protected area boundary demarcation: Is the boundary known and demarcated? | 3 | 0: The boundary of the protected area is not known by the management authority or local residents/neighbouring land users 1: The boundary of the protected area is known by the management authority but is not known by local residents/neighbouring land users 2: The boundary of the protected area is known by both the management authority and local residents/neighbouring land users but is not appropriately demarcated 3: The boundary of the protected area is known by the management authority and local residents/neighbouring land users and is appropriately demarcated |
| Comments and Next Steps | | |

| | | |
|--|---|--|
| 7. Management plan: Is there a management plan and is it being implemented? | 2 | 0: There is no management plan for the protected area 1: A management plan is being prepared or has been prepared but is not being implemented 2: A management plan exists but it is only being partially implemented because of funding constraints or other problems 3: A management plan exists and is being implemented |
| Comments and Next Steps | | |
| 7.a Planning process: The planning process allows adequate opportunity for key stakeholders to influence the management plan | 1 | 0: No 1: Yes |
| Comments and Next Steps | | |
| 7.b Planning process: There is an established schedule and process for periodic review and updating of the management plan | 1 | 0: No 1: Yes |
| Comments and Next Steps | | |
| 7.c Planning process: The results of monitoring, research and evaluation are routinely incorporated into planning | 1 | 0: No 1: Yes |
| Comments and Next Steps | | |
| 8. Regular work plan: Is there a regular work plan and is it being implemented | 2 | 0: No regular work plan exists 1: A regular work plan exists but few of the activities are implemented 2: A regular work plan exists and many activities are implemented 3: A regular work plan exists and all activities are implemented |
| Comments and Next Steps | | |
| 9. Resource inventory: Do you have enough information to manage the area? | 2 | 0: There is little or no information available on the critical habitats, species and cultural values of the protected area 1: Information on the critical habitats, species, ecological processes and cultural values of the protected area is not sufficient to support planning and decision making 2: Information on the critical habitats, species, ecological processes and cultural values of the protected area is sufficient for most key areas of planning and decision making 3: Information on the critical habitats, species, ecological processes and cultural values of the protected area is sufficient to support all areas of planning and decision making |
| Comments and Next Steps | | |
| 10. Protection systems: Are systems in place to control access/resource use in the protected area? | 2 | 0: Protection systems (patrols, permits etc) do not exist or are not effective in controlling access/resource use 1: Protection systems are only partially effective in controlling access/resource use 2: Protection systems are moderately effective in controlling access/resource use 3: Protection systems are largely or wholly effective in controlling access/ resource use |
| Comments and Next Steps | | |
| 11. Research: Is there a programme of management-orientated survey and research work? | 2 | 0: There is no survey or research work taking place in the protected area 1: There is a small amount of survey and research work but it is not directed towards the needs of protected area management 2: There is considerable survey and research work but it is not directed towards the needs of protected area management 3: There is a comprehensive, integrated programme of survey and research work, which is relevant to management needs |
| Comments and Next Steps | | |
| 12. Resource management: Is active resource management being undertaken? | 2 | 0: Active resource management is not being undertaken 1: Very few of the requirements for active management of critical habitats, species, ecological processes and cultural values are being implemented 2: Many of the requirements for active management of critical habitats, species, ecological processes and, cultural values are being implemented but some key issues are not being addressed 3: Requirements for active management of critical habitats, species, ecological processes and, cultural values are being substantially or fully implemented |
| Comments and Next Steps | | |
| 13. Staff numbers: Are there enough people employed to manage the protected area? | 3 | 0: There are no staff 1: Staff numbers are inadequate for critical management activities 2: Staff numbers are below optimum level for critical management activities 3: Staff numbers are adequate for the management needs of the protected area |
| Comments and Next Steps | | |
| 14. Staff training: Are staff adequately trained to fulfill management objectives? | 1 | 0: Staff lack the skills needed for protected area management 1: Staff training and skills are low relative to the needs of the protected area 2: Staff training and skills are adequate, but could be further improved to fully achieve the objectives of management 3: Staff training and skills are aligned with the management needs of the protected area |
| Comments and Next Steps | | |
| 15. Current budget: Is the current budget sufficient? | 2 | 0: There is no budget for management of the protected area 1: The available budget is inadequate for basic management needs and presents a serious constraint to the capacity to manage 2: The available budget is acceptable but could be further improved to fully achieve effective management 3: The available budget is sufficient and meets the full management needs of the protected area |
| Comments and Next Steps | | |

| | | |
|---|---|---|
| 16. Security of budget: Is the budget secure? | 2 | <p>0: There is no secure budget for the protected area and management is wholly reliant on outside or highly variable funding</p> <p>1: There is very little secure budget and the protected area could not function adequately without outside funding</p> <p>2: There is a reasonably secure core budget for regular operation of the protected area but many innovations and initiatives are reliant on outside funding</p> <p>3: There is a secure budget for the protected area and its management needs</p> |
| Comments and Next Steps | | |
| 17. Management of budget: Is the budget managed to meet critical management needs? | 2 | <p>0: Budget management is very poor and significantly undermines effectiveness (e.g. late release of budget in financial year)</p> <p>1: Budget management is poor and constrains effectiveness</p> <p>2: Budget management is adequate but could be improved</p> <p>3: Budget management is excellent and meets management needs</p> |
| Comments and Next Steps | | |
| 18. Equipment: Is equipment sufficient for management needs? | 1 | <p>0: There are little or no equipment and facilities for management needs</p> <p>1: There are some equipment and facilities but these are inadequate for most management needs</p> <p>2: There are equipment and facilities, but still some gaps that constrain management</p> <p>3: There are adequate equipment and facilities</p> |
| Comments and Next Steps | | |
| 19. Maintenance of equipment: Is equipment adequately maintained? | 1 | <p>0: There is little or no maintenance of equipment and facilities</p> <p>1: There is some ad hoc maintenance of equipment and facilities</p> <p>2: There is basic maintenance of equipment and facilities</p> <p>3: Equipment and facilities are well maintained</p> |
| Comments and Next Steps | | |
| 20. Education and awareness: Is there a planned education programme linked to the objectives and needs? | 2 | <p>0: There is no education and awareness programme</p> <p>1: There is a limited and ad hoc education and awareness programme</p> <p>2: There is an education and awareness programme but it only partly meets needs and could be improved</p> <p>3: There is an appropriate and fully implemented education and awareness programme</p> |
| Comments and Next Steps | | |
| 21. Planning for land and water use: Does land and water use planning recognise the protected area and aid the achievement of objectives? | 2 | <p>0: Adjacent land and water use planning does not take into account the needs of the protected area and activities/policies are detrimental to the survival of the area</p> <p>1: Adjacent land and water use planning does not take into account the long term needs of the protected area, but activities are not detrimental to the area</p> <p>2: Adjacent land and water use planning partially takes into account the long term needs of the protected area</p> <p>3: Adjacent land and water use planning fully takes into account the long term needs of the protected area</p> |
| Comments and Next Steps | | |
| 21a. Land and water planning for habitat conservation: Planning and management in the catchment or landscape containing the protected area incorporates provision for adequate environmental conditions (e.g. volume, quality and timing of water flow, air pollution levels etc) to sustain relevant habitats. | 1 | <p>0: No</p> <p>1: Yes</p> |
| Comments and Next Steps | | |
| 21b. Land and water planning for habitat conservation: Management of corridors linking the protected area provides for wildlife passage to key habitats outside the protected area (e.g. to allow migratory fish to travel between freshwater spawning sites and the sea, or to allow animal migration). | 1 | <p>0: No</p> <p>1: Yes</p> |
| Comments and Next Steps | | |
| 21c. Land and water planning for habitat conservation: "Planning addresses ecosystem-specific needs and/or the needs of particular species of concern at an ecosystem scale (e.g. volume, quality and timing of freshwater flow to sustain particular species, fire management to maintain savannah habitats etc.)" | 1 | <p>0: No</p> <p>1: Yes</p> |
| Comments and Next Steps | | |
| 22. State and commercial neighbours: Is there co-operation with adjacent land and water users? | 2 | <p>0: There is no contact between managers and neighbouring official or corporate land and water users</p> <p>1: There is contact between managers and neighbouring official or corporate land and water users but little or no cooperation</p> <p>2: There is contact between managers and neighbouring official or corporate land and water users, but only some co-operation</p> <p>3: There is regular contact between managers and neighbouring official or corporate land and water users, and substantial co-operation on management</p> |
| Comments and Next Steps | | |
| 23. Indigenous people: Do indigenous and traditional peoples resident or regularly using the protected area have input to management decisions? | 2 | <p>0: Indigenous and traditional peoples have no input into decisions relating to the management of the protected area</p> <p>1: Indigenous and traditional peoples have some input into discussions relating to management but no direct role in management</p> <p>2: Indigenous and traditional peoples directly contribute to some relevant decisions relating to management but their involvement could be improved</p> <p>3: Indigenous and traditional peoples directly participate in all relevant decisions relating to management e.g. co-management</p> |
| Comments and Next Steps | | |

| | | |
|---|------------------|--|
| <p>24. Local communities: Do local communities resident or near the protected area have input to management decisions?</p> | <p>3</p> | <p>0: Local communities have no input into decisions relating to the management of the protected area 1: Local communities have some input into discussions relating to management but no direct role in management 2: Local communities directly contribute to some relevant decisions relating to management but their involvement could be improved 3: Local communities directly participate in all relevant decisions relating to management, e.g. co-management</p> |
| <p>Comments and Next Steps</p> | | |
| <p>24 a. Impact on communities: There is open communication and trust between local and/or indigenous people, stakeholders and protected area managers</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>24 b. Impact on communities: Programmes to enhance community welfare, while conserving protected area resources, are being implemented</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>24 c. Impact on communities: Local and/or indigenous people actively support the protected area</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>25. Economic benefit: Is the protected area providing economic benefits to local communities, e.g. income, employment, payment for environmental services?</p> | <p>2</p> | <p>0: The protected area does not deliver any economic benefits to local communities 1: Potential economic benefits are recognised and plans to realise these are being developed 2: There is some flow of economic benefits to local communities 3: There is a major flow of economic benefits to local communities from activities associated with the protected area</p> |
| <p>Comments and Next Steps</p> | | |
| <p>26. Monitoring and evaluation: Are management activities monitored against performance?</p> | <p>3</p> | <p>0: There is no monitoring and evaluation in the protected area 1: There is some ad hoc monitoring and evaluation, but no overall strategy and/or no regular collection of results 2: There is an agreed and implemented monitoring and evaluation system but results do not feed back into management 3: A good monitoring and evaluation system exists, is well implemented and used in adaptive management</p> |
| <p>Comments and Next Steps</p> | | |
| <p>27. Visitor facilities: Are visitor facilities adequate?</p> | <p>1</p> | <p>0: There are no visitor facilities and services despite an identified need 1: Visitor facilities and services are inappropriate for current levels of visitation 2: Visitor facilities and services are adequate for current levels of visitation but could be improved 3: Visitor facilities and services are excellent for current levels of visitation</p> |
| <p>Comments and Next Steps</p> | | |
| <p>28. Commercial tourism operators: Do commercial tour operators contribute to protected area management?</p> | <p>1</p> | <p>0: There is little or no contact between managers and tourism operators using the protected area 1: There is contact between managers and tourism operators but this is largely confined to administrative or regulatory matters 2: There is limited co-operation between managers and tourism operators to enhance visitor experiences and maintain protected area values 3: There is good co-operation between managers and tourism operators to enhance visitor experiences, and maintain protected area values</p> |
| <p>Comments and Next Steps</p> | | |
| <p>29. Fees: If fees (i.e. entry fees or fines) are applied, do they help protected area management?</p> | <p>1</p> | <p>0: Although fees are theoretically applied, they are not collected 1: Fees are collected, but make no contribution to the protected area or its environs 2: Fees are collected, and make some contribution to the protected area and its environs 3: Fees are collected and make a substantial contribution to the protected area and its environs</p> |
| <p>Comments and Next Steps</p> | | |
| <p>30. Condition of values: What is the condition of the important values of the protected area as compared to when it was first designated?</p> | <p>3</p> | <p>0: Many important biodiversity, ecological or cultural values are being severely degraded 1: Some biodiversity, ecological or cultural values are being severely degraded 2: Some biodiversity, ecological and cultural values are being partially degraded but the most important values have not been significantly impacted 3: Biodiversity, ecological and cultural values are predominantly intact</p> |
| <p>Comments and Next Steps</p> | | |
| <p>30a: Condition of values: The assessment of the condition of values is based on research and/or monitoring</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>30b: Condition of values Specific management programmes are being implemented to address threats to biodiversity, ecological and cultural values</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>30c: Condition of values: Activities to maintain key biodiversity, ecological and cultural values are a routine part of park management</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>TOTAL SCORE (102 is the max if all questions are valid)</p> | | |
| | <p>71</p> | <p>Pls add up numbers from assessment form (questions 1 to 30)</p> |



Tracking Tool for Biodiversity Projects in GEF-3, GEF-4, and GEF-5

Objective 1: Catalyzing Sustainability of Protected Area Systems SECTION II: Management Effectiveness Tracking Tool for Protected Areas

Note: Please complete the management effectiveness tracking tool for **EACH** protected area that is the target of the GEF intervention.

Structure and content of the Tracking Tool - Objective 1. Section II:

The Tracking Tool has two main sections: datasheets and assessment form. Both sections should be completed.

1. Datasheets: the data sheet comprises of two separate sections:

Data sheet 1: records details of the assessment and some basic information about the site, such as name, size and location etc.

Data sheet 2: provides a generic list of threats which protected areas can face. On this data sheet the assessors are asked to identify threats and rank their impact on the protected area.

2. Assessment Form: the assessment is structured around 30 questions presented in table format which includes three columns for recording details of the assessment, all of which should be completed.

Important: Please read the Guidelines posted on the GEF website before entering your data

| Data Sheet 1: Reporting Progress at Protected Area Sites | Please indicate your answer here | Notes |
|---|---|--|
| Name, affiliation and contact details for person responsible for completing the METT (email etc.) | Lead: Rabemananjara Henintsoa, Consultant Expert en Biodiversité et Aires Protégées PNUD, henintsoa_rabemananjara@yahoo.fr, +261325720136, Lot II J 32 A Ivandry - 101 Antananarivo | Jaonera Volatiana Frediana, Chef de Volet Ectourisme du Parc National Tsimanampesotse, jaonerav@yahoo.fr, tsp@parcs-madagascar.com, +261344940295; Menjanahary Tahiana, Chef de Volet de Conservation et de la Recherche du Parc National Tsimanampesotse, mnj_tahina@yahoo.fr, tsp@parcs-madagascar.com, +261344940294; Dresy Lovasoa, Directeur du Parc National Tsimanampesotse, dresyl@yahoo.fr, tsp@parcs-madagascar.com, +261344940230, Bureau MNP, Route d'aéroport - Andranomena, BP 400 -601 Toliary; |
| Date assessment carried out | Feb 26, 2015 | Month DD, YYYY (e.g., May 12, 2010) |
| Name of protected area | Tsimanampesotse | See also: |
| WDPA site code (these codes can be found on www.protectedplanet.net) | WDPA ID 2307 | http://www.protectedplanet.net/sites/Tsimanampetsotsa_National_Park |
| Designations (please choose 1-3) | 2 | 1: National 2: IUCN Category 3: International (please complete lines 35-69 as necessary) |
| Country | MDG | |
| Location of protected area (province and if possible map reference) | Sud Ouest de Madagascar | http://www.parcs-madagascar.com/fiche-aire-protgee.php?Ap=27 |
| Date of establishment | 1927 | Tsimanampesotse figure parmi les premières aires protégées à Madagascar car il a été classé une réserve naturelle intégrale en 1927. Cette réserve a été élargie de 17.520ha à 43.200ha en 1966 et reclassée en parc national en 2002. Depuis 2005, Madagascar National Parks a travaillé avec la région et la population locale afin d'agrandir le parc à 203.740 ha pour une meilleure représentation de la biodiversité. Cette extension a un statut de protection temporaire à l'heure actuelle. |
| Ownership details (please choose 1-4) | 1 | 1: State 2: Private 3: Community 4: Other |
| Management Authority | Madagascar National Parks | |
| Size of protected area (ha) | 203,740 | |
| Number of Permanent staff | 30 | |
| Number of Temporary staff | n/a | |
| Annual budget (US\$) for recurrent (operational) funds - excluding staff salary costs | 1,148,227 | |
| costs | n/a | |
| What are the main values for which the area is designated | | |
| List the two primary protected area management objectives in below: | | |
| Management objective 1 | conservation et maintient de la biodiversité | |
| Management objective 2 | soutien des communautés riveraines et son implication dans la protection du parc | |
| No. of people involved in completing assessment | 3 | |
| Including: (please choose 1-8) | 2 | 1: PA manager 2: PA staff 3: Other PA agency staff 4: Donors 5: NGOs 6: External experts 7: Local community 8: Other |

| Information on International Designations | Please indicate your answer here | |
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| UNESCO World Heritage site (see: whc.unesco.org/en/list) | | |
| Date Listed | | |
| Site name | | |
| Site area | | |
| Geographical co-ordinates | | |
| Criteria for designation | | (i.e. criteria i to x) |
| Statement of Outstanding Universal Value | | |
| Ramsar site (see: http://ramsar.wetlands.org/) | | www.ramsar.org/wetland/madagascar |
| Date Listed | 25/Sep/98 | |
| Site name | 962, Lac Tsimanampetsotsa | |
| Site area | 45,604 | |
| Geographical number | Ramsar site no. 962. | |
| Reason for Designation (see Ramsar Information Sheet) | This site is a shallow lake with open water and mudflats, while the eastern shore of the lake is bounded with calcareous cliffs and a number of caves with underground freshwater lakes and rivers. The site is habitat for a threatened endemic bird species, as well as for a threatened blind fish found in the underground rivers and caves. The forest around the site is the only known habitat for the carnivorous mongoose species, which is endangered. The area also has a population of two of Madagascar's endemic species of vulnerable tortoise, which are protected by a local taboo that prohibits hunting them. The site area is used for its rich natural resources by the local communities roundabout and some ecotourism as well. | |
| UNESCO Man and Biosphere Reserves (see: www.unesco.org/mab/wmbrs.shtml) | | http://www.unesco.org/new/en/natural-sciences/environment/ecological-sciences/biosphere-reserves/mab/ |
| Date Listed | | |
| Site name | | |
| Site area | | Total, Core, Buffer, and Transition |
| Geographical co-ordinates | | |
| Criteria for designation | | |
| Fulfillment of three functions of MAB | | conservation, development and logistic support |
| Please list other designations (i.e. ASEAN Heritage, Natura 2000) and any supporting information below | | |
| | | Name |
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| Data Sheet 2: Protected Areas Threats | | |
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| Please choose all relevant existing threats as either of high, medium or low significance. Threats ranked as of high significance are those which are seriously degrading values; medium are those threats having some negative impact and those characterised as low are threats which are present but not seriously impacting values or N/A where the threat is not present or not applicable in the protected area. | | |
| 1. Residential and commercial development within a protected area | | |
| Threats from human settlements or other non-agricultural land uses with a substantial footprint | | |
| 1.1 Housing and settlement | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 1.2 Commercial and industrial areas | - | 0: N/A 1: Low 2: Medium 3: High |
| 1.3 Tourism and recreation infrastructure | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 2. Agriculture and aquaculture within a protected area | | |
| Threats from farming and grazing as a result of agricultural expansion and intensification, including silviculture, mariculture and aquaculture | | |

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| 2.1 Annual and perennial non-timber crop cultivation | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 2.1a Drug cultivation | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 2.2 Wood and pulp plantations | - | 0: N/A 1: Low 2: Medium 3: High |
| 2.3 Livestock farming and grazing | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 2.4 Marine and freshwater aquaculture | - | 0: N/A 1: Low 2: Medium 3: High |
| 3. Energy production and mining within a protected area | | |
| Threats from production of non-biological resources | | |
| 3.1 Oil and gas drilling | - | 0: N/A 1: Low 2: Medium 3: High |
| 3.2 Mining and quarrying | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 3.3 Energy generation, including from hydropower dams | - | 0: N/A 1: Low 2: Medium 3: High |
| 4. Transportation and service corridors within a protected area | | |
| Threats from long narrow transport corridors and the vehicles that use them including associated wildlife mortality | | |
| 4.1 Roads and railroads (include road-killed animals) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 4.2 Utility and service lines (e.g. electricity cables, telephone lines,) | - | 0: N/A 1: Low 2: Medium 3: High |
| 4.3 Shipping lanes and canals | - | 0: N/A 1: Low 2: Medium 3: High |
| 4.4 Flight paths | - | 0: N/A 1: Low 2: Medium 3: High |
| 5. Biological resource use and harm within a protected area | | |
| Threats from consumptive use of "wild" biological resources including both deliberate and unintentional harvesting effects; also persecution or control of specific species (note this includes hunting and killing of animals) | | |
| 5.1 Hunting, killing and collecting terrestrial animals (including killing of animals as a result of human/wildlife conflict) | 3 | 0: N/A 1: Low 2: Medium 3: High |
| 5.2 Gathering terrestrial plants or plant products (non-timber) | - | 0: N/A 1: Low 2: Medium 3: High |
| 5.3 Logging and wood harvesting | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 5.4 Fishing, killing and harvesting aquatic resources | - | 0: N/A 1: Low 2: Medium 3: High |
| 6. Human intrusions and disturbance within a protected area | | |
| Threats from human activities that alter, destroy or disturb habitats and species associated with non-consumptive uses of biological resources | | |
| 6.1 Recreational activities and tourism | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 6.2 War, civil unrest and military exercises | - | 0: N/A 1: Low 2: Medium 3: High |
| 6.3 Research, education and other work-related activities in protected areas | 1.00 | 0: N/A 1: Low 2: Medium 3: High |

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| 6.4 Activities of protected area managers (e.g. construction or vehicle use, artificial watering points and dams) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 6.5 Deliberate vandalism, destructive activities or threats to protected area staff and visitors | - | 0: N/A 1: Low 2: Medium 3: High |
| 7. Natural system modifications | | |
| Threats from other actions that convert or degrade habitat or change the way the ecosystem functions | | |
| 7.1 Fire and fire suppression (including arson) | 2 | 0: N/A 1: Low 2: Medium 3: High |
| 7.2 Dams, hydrological modification and water management/use | - | 0: N/A 1: Low 2: Medium 3: High |
| 7.3a Increased fragmentation within protected area | - | 0: N/A 1: Low 2: Medium 3: High |
| 7.3b Isolation from other natural habitat (e.g. deforestation, dams without effective aquatic wildlife passages) | - | 0: N/A 1: Low 2: Medium 3: High |
| 7.3c Other 'edge effects' on park values | - | 0: N/A 1: Low 2: Medium 3: High |
| 7.3d Loss of keystone species (e.g. top predators, pollinators etc) | - | 0: N/A 1: Low 2: Medium 3: High |
| 8. Invasive and other problematic species and genes | | |
| Threats from terrestrial and aquatic non-native and native plants, animals, pathogens/microbes or genetic materials that have or are predicted to have harmful effects on biodiversity following introduction, spread and/or increase | | |
| 8.1 Invasive non-native/alien plants (weeds) | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 8.1a Invasive non-native/alien animals | - | 0: N/A 1: Low 2: Medium 3: High |
| 8.1b Pathogens (non-native or native but creating new/increased problems) | - | 0: N/A 1: Low 2: Medium 3: High |
| 8.2 Introduced genetic material (e.g. genetically modified organisms) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9. Pollution entering or generated within protected area | | |
| Threats from introduction of exotic and/or excess materials or energy from point and non-point sources | | |
| 9.1 Household sewage and urban waste water | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.1a Sewage and waste water from protected area facilities (e.g. toilets, hotels etc) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.2 Industrial, mining and military effluents and discharges (e.g. poor water quality discharge from dams, e.g. unnatural temperatures, de-oxygenated, other pollution) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.3 Agricultural and forestry effluents (e.g. excess fertilizers or pesticides) | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.4 Garbage and solid waste | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.5 Air-borne pollutants | - | 0: N/A 1: Low 2: Medium 3: High |
| 9.6 Excess energy (e.g. heat pollution, lights etc) | - | 0: N/A 1: Low 2: Medium 3: High |
| 10. Geological events | | |
| Geological events may be part of natural disturbance regimes in many ecosystems. But they can be a threat if a species or habitat is damaged and has lost its resilience and is vulnerable to disturbance. Management capacity to respond to some of these changes may be limited. | | |

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| 10.1 Volcanoes | - | 0: N/A 1: Low 2: Medium 3: High |
| 10.2 Earthquakes/Tsunamis | - | 0: N/A 1: Low 2: Medium 3: High |
| 10.3 Avalanches/ Landslides | - | 0: N/A 1: Low 2: Medium 3: High |
| 10.4 Erosion and siltation/ deposition (e.g. shoreline or riverbed changes) | - | 0: N/A 1: Low 2: Medium 3: High |
| 11. Climate change and severe weather | | |
| Threats from long-term climatic changes which may be linked to global warming and other severe climatic/weather events outside of the natural range of variation | | |
| 11.1 Habitat shifting and alteration | - | 0: N/A 1: Low 2: Medium 3: High |
| 11.2 Droughts | 1 | 0: N/A 1: Low 2: Medium 3: High |
| 11.3 Temperature extremes | - | 0: N/A 1: Low 2: Medium 3: High |
| 11.4 Storms and flooding | - | 0: N/A 1: Low 2: Medium 3: High |
| 12. Specific cultural and social threats | | |
| 12.1 Loss of cultural links, traditional knowledge and/or management practices | - | 0: N/A 1: Low 2: Medium 3: High |
| 12.2 Natural deterioration of important cultural site values | - | 0: N/A 1: Low 2: Medium 3: High |
| 12.3 Destruction of cultural heritage buildings, gardens, sites etc | - | 0: N/A 1: Low 2: Medium 3: High |

| Assessment Form | | |
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| 1. Legal status: Does the protected area have legal status (or in the case of private reserves is covered by a covenant or similar)? | 2 | 0: The protected area is not gazetted/covenanted 1: There is agreement that the protected area should be gazetted/covenanted but the process has not yet begun 2: The protected area is in the process of being gazetted/covenanted but the process is still incomplete (includes sites designated under international conventions, such as Ramsar, or local/traditional law such as community conserved areas, which do not yet have national legal status or covenant) 3: The protected area has been formally gazetted/covenanted |
| Comments and Next Steps | | |
| 2. Protected area regulations: Are appropriate regulations in place to control land use and activities (e.g. hunting)? | 3 | 0: There are no regulations for controlling land use and activities in the protected area 1: Some regulations for controlling land use and activities in the protected area exist but these are major weaknesses 2: Regulations for controlling land use and activities in the protected area exist but there are some weaknesses or gaps 3: Regulations for controlling inappropriate land use and activities in the protected area exist and provide an excellent basis for management |
| Comments and Next Steps | | |
| 3. Law Enforcement: Can staff (i.e. those with responsibility for managing the site) enforce protected area rules well enough? | 3 | 0: The staff have no effective capacity/resources to enforce protected area legislation and regulations 1: There are major deficiencies in staff capacity/resources to enforce protected area legislation and regulations (e.g. lack of skills, no patrol budget, lack of institutional support) 2: The staff have acceptable capacity/resources to enforce protected area legislation and regulations but some deficiencies remain 3: The staff have excellent capacity/resources to enforce protected area legislation and regulations |
| Comments and Next Steps | | |

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| <p>4. Protected area objectives: Is management undertaken according to agreed objectives?</p> | <p>3</p> | <p>0: No firm objectives have been agreed for the protected area 1: The protected area has agreed objectives, but is not managed according to these objectives 2: The protected area has agreed objectives, but is only partially managed according to these objectives 3: The protected area has agreed objectives and is managed to meet these objectives</p> |
| <p>Comments and Next Steps</p> | | |
| <p>5. Protected area design: Is the protected area the right size and shape to protect species, habitats, ecological processes and water catchments of key conservation concern?</p> | <p>3</p> | <p>0: Inadequacies in protected area design mean achieving the major objectives of the protected area is very difficult 1: Inadequacies in protected area design mean that achievement of major objectives is difficult but some mitigating actions are being taken (e.g. agreements with adjacent land owners for wildlife corridors or introduction of appropriate catchment management) 2: Protected area design is not significantly constraining achievement of objectives, but could be improved (e.g. with respect to larger scale ecological processes) 3: Protected area design helps achievement of objectives; it is appropriate for species and habitat conservation; and maintains ecological processes such as surface and groundwater flows at a catchment scale, natural disturbance patterns etc</p> |
| <p>Comments and Next Steps</p> | | |
| <p>6. Protected area boundary demarcation: Is the boundary known and demarcated?</p> | <p>3</p> | <p>0: The boundary of the protected area is not known by the management authority or local residents/neighbouring land users 1: The boundary of the protected area is known by the management authority but is not known by local residents/neighbouring land users 2: The boundary of the protected area is known by both the management authority and local residents/neighbouring land users but is not appropriately demarcated 3: The boundary of the protected area is known by the management authority and local residents/neighbouring land users and is appropriately demarcated</p> |
| <p>Comments and Next Steps</p> | | |
| <p>7. Management plan: Is there a management plan and is it being implemented?</p> | <p>2</p> | <p>0: There is no management plan for the protected area 1: A management plan is being prepared or has been prepared but is not being implemented 2: A management plan exists but it is only being partially implemented because of funding constraints or other problems 3: A management plan exists and is being implemented</p> |
| <p>Comments and Next Steps</p> | | |
| <p>7.a Planning process: The planning process allows adequate opportunity for key stakeholders to influence the management plan</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>7.b Planning process: There is an established schedule and process for periodic review and updating of the management plan</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>7.c Planning process: The results of monitoring, research and evaluation are routinely incorporated into planning</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>8. Regular work plan: Is there a regular work plan and is it being implemented?</p> | <p>2</p> | <p>0: No regular work plan exists 1: A regular work plan exists but few of the activities are implemented 2: A regular work plan exists and many activities are implemented 3: A regular work plan exists and all activities are implemented</p> |
| <p>Comments and Next Steps</p> | | |
| <p>9. Resource inventory: Do you have enough information to manage the area?</p> | <p>2</p> | <p>0: There is little or no information available on the critical habitats, species and cultural values of the protected area 1: Information on the critical habitats, species, ecological processes and cultural values of the protected area is not sufficient to support planning and decision making 2: Information on the critical habitats, species, ecological processes and cultural values of the protected area is sufficient for most key areas of planning and decision making 3: Information on the critical habitats, species, ecological processes and cultural values of the protected area is sufficient to support all areas of planning and decision making</p> |
| <p>Comments and Next Steps</p> | | |
| <p>10. Protection systems: Are systems in place to control access/resource use in the protected area?</p> | <p>2</p> | <p>0: Protection systems (patrols, permits etc) do not exist or are not effective in controlling access/resource use 1: Protection systems are only partially effective in controlling access/resource use 2: Protection systems are moderately effective in controlling access/resource use 3: Protection systems are largely or wholly effective in controlling access/resource use</p> |
| <p>Comments and Next Steps</p> | | |
| <p>11. Research: Is there a programme of management-orientated survey and research work?</p> | <p>2</p> | <p>0: There is no survey or research work taking place in the protected area 1: There is a small amount of survey and research work but it is not directed towards the needs of protected area management 2: There is considerable survey and research work but it is not directed towards the needs of protected area management 3: There is a comprehensive, integrated programme of survey and research work, which is relevant to management needs</p> |
| <p>Comments and Next Steps</p> | | |

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| <p>12. Resource management: Is active resource management being undertaken?</p> | <p>2</p> | <p>0: Active resource management is not being undertaken 1: Very few of the requirements for active management of critical habitats, species, ecological processes and cultural values are being implemented 2: Many of the requirements for active management of critical habitats, species, ecological processes and, cultural values are being implemented but some key issues are not being addressed 3: Requirements for active management of critical habitats, species, ecological processes and, cultural values are being substantially or fully implemented</p> |
| <p>Comments and Next Steps</p> | | |
| <p>13. Staff numbers: Are there enough people employed to manage the protected area?</p> | <p>2</p> | <p>0: There are no staff 1: Staff numbers are inadequate for critical management activities 2: Staff numbers are below optimum level for critical management activities 3: Staff numbers are adequate for the management needs of the protected area</p> |
| <p>Comments and Next Steps</p> | | |
| <p>14. Staff training: Are staff adequately trained to fulfill management objectives?</p> | <p>2</p> | <p>0: Staff lack the skills needed for protected area management 1: Staff training and skills are low relative to the needs of the protected area 2: Staff training and skills are adequate, but could be further improved to fully achieve the objectives of management 3: Staff training and skills are aligned with the management needs of the protected area</p> |
| <p>Comments and Next Steps</p> | | |
| <p>15. Current budget: Is the current budget sufficient?</p> | <p>3</p> | <p>0: There is no budget for management of the protected area 1: The available budget is inadequate for basic management needs and presents a serious constraint to the capacity to manage 2: The available budget is acceptable but could be further improved to fully achieve effective management 3: The available budget is sufficient and meets the full management needs of the protected area</p> |
| <p>Comments and Next Steps</p> | | |
| <p>16. Security of budget: Is the budget secure?</p> | <p>3</p> | <p>0: There is no secure budget for the protected area and management is wholly reliant on outside or highly variable funding 1: There is very little secure budget and the protected area could not function adequately without outside funding 2: There is a reasonably secure core budget for regular operation of the protected area but many innovations and initiatives are reliant on outside funding 3: There is a secure budget for the protected area and its management needs</p> |
| <p>Comments and Next Steps</p> | | |
| <p>17. Management of budget: Is the budget managed to meet critical management needs?</p> | <p>2</p> | <p>0: Budget management is very poor and significantly undermines effectiveness (e.g. late release of budget in financial year) 1: Budget management is poor and constrains effectiveness 2: Budget management is adequate but could be improved 3: Budget management is excellent and meets management needs</p> |
| <p>Comments and Next Steps</p> | | |
| <p>18. Equipment: Is equipment sufficient for management needs?</p> | <p>2</p> | <p>0: There are little or no equipment and facilities for management needs 1: There are some equipment and facilities but these are inadequate for most management needs 2: There are equipment and facilities, but still some gaps that constrain management 3: There are adequate equipment and facilities</p> |
| <p>Comments and Next Steps</p> | | |
| <p>19. Maintenance of equipment: Is equipment adequately maintained?</p> | <p>2</p> | <p>0: There is little or no maintenance of equipment and facilities 1: There is some ad hoc maintenance of equipment and facilities 2: There is basic maintenance of equipment and facilities 3: Equipment and facilities are well maintained</p> |
| <p>Comments and Next Steps</p> | | |
| <p>20. Education and awareness: Is there a planned education programme linked to the objectives and needs?</p> | <p>3</p> | <p>0: There is no education and awareness programme 1: There is a limited and ad hoc education and awareness programme 2: There is an education and awareness programme but it only partly meets needs and could be improved 3: There is an appropriate and fully implemented education and awareness programme</p> |
| <p>Comments and Next Steps</p> | | |
| <p>21. Planning for land and water use: Does land and water use planning recognise the protected area and aid the achievement of objectives?</p> | <p>3</p> | <p>0: Adjacent land and water use planning does not take into account the needs of the protected area and activities/policies are detrimental to the survival of the area 1: Adjacent land and water use planning does not takes into account the long term needs of the protected area, but activities are not detrimental the area 2: Adjacent land and water use planning partially takes into account the long term needs of the protected area 3: Adjacent land and water use planning fully takes into account the long term needs of the protected area</p> |
| <p>Comments and Next Steps</p> | | |
| <p>21a. Land and water planning for habitat conservation: Planning and management in the catchment or landscape containing the protected area incorporates provision for adequate environmental conditions (e.g. volume, quality and timing of water flow, air pollution levels etc) to sustain relevant habitats.</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>21b. Land and water planning for habitat conservation: Management of corridors linking the protected area provides for wildlife passage to key habitats outside the protected area (e.g. to allow migratory fish to travel between freshwater spawning sites and the sea, or to allow animal migration).</p> | <p>-</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |

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| <p>21c. Land and water planning for habitat conservation: "Planning addresses ecosystem-specific needs and/or the needs of particular species of concern at an ecosystem scale (e.g. volume, quality and timing of freshwater flow to sustain particular species, fire management to maintain savannah habitats etc.)"</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>22. State and commercial neighbours: Is there co-operation with adjacent land and water users?</p> | <p>3</p> | <p>0: There is no contact between managers and neighbouring official or corporate land and water users 1: There is contact between managers and neighbouring official or corporate land and water users but little or no cooperation 2: There is contact between managers and neighbouring official or corporate land and water users, but only some co-operation 3: There is regular contact between managers and neighbouring official or corporate land and water users, and substantial co-operation on management</p> |
| <p>Comments and Next Steps</p> | | |
| <p>23. Indigenous people: Do indigenous and traditional peoples resident or regularly using the protected area have input to management decisions?</p> | <p>1</p> | <p>0: Indigenous and traditional peoples have no input into decisions relating to the management of the protected area 1: Indigenous and traditional peoples have some input into discussions relating to management but no direct role in management 2: Indigenous and traditional peoples directly contribute to some relevant decisions relating to management but their involvement could be improved 3: Indigenous and traditional peoples directly participate in all relevant decisions relating to management, e.g. co-management</p> |
| <p>Comments and Next Steps</p> | | |
| <p>24. Local communities: Do local communities resident or near the protected area have input to management decisions?</p> | <p>2</p> | <p>0: Local communities have no input into decisions relating to the management of the protected area 1: Local communities have some input into discussions relating to management but no direct role in management 2: Local communities directly contribute to some relevant decisions relating to management but their involvement could be improved 3: Local communities directly participate in all relevant decisions relating to management, e.g. co-management</p> |
| <p>Comments and Next Steps</p> | | |
| <p>24 a. Impact on communities: There is open communication and trust between local and/or indigenous people, stakeholders and protected area managers</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>24 b. Impact on communities: Programmes to enhance community welfare, while conserving protected area resources, are being implemented</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>24 c. Impact on communities: Local and/or indigenous people actively support the protected area</p> | <p>1</p> | <p>0: No 1: Yes</p> |
| <p>Comments and Next Steps</p> | | |
| <p>25. Economic benefit: Is the protected area providing economic benefits to local communities, e.g. income, employment, payment for environmental services?</p> | <p>2</p> | <p>0: The protected area does not deliver any economic benefits to local communities 1: Potential economic benefits are recognised and plans to realise these are being developed 2: There is some flow of economic benefits to local communities 3: There is a major flow of economic benefits to local communities from activities associated with the protected area</p> |
| <p>Comments and Next Steps</p> | | |
| <p>26. Monitoring and evaluation: Are management activities monitored against performance?</p> | <p>3</p> | <p>0: There is no monitoring and evaluation in the protected area 1: There is some ad hoc monitoring and evaluation, but no overall strategy and/or no regular collection of results 2: There is an agreed and implemented monitoring and evaluation system but results do not feed back into management 3: A good monitoring and evaluation system exists, is well implemented and used in adaptive management</p> |
| <p>Comments and Next Steps</p> | | |
| <p>27. Visitor facilities: Are visitor facilities adequate?</p> | <p>2</p> | <p>0: There are no visitor facilities and services despite an identified need 1: Visitor facilities and services are inappropriate for current levels of visitation 2: Visitor facilities and services are adequate for current levels of visitation but could be improved 3: Visitor facilities and services are excellent for current levels of visitation</p> |
| <p>Comments and Next Steps</p> | | |
| <p>28. Commercial tourism operators: Do commercial tour operators contribute to protected area management?</p> | <p>3</p> | <p>0: There is little or no contact between managers and tourism operators using the protected area 1: There is contact between managers and tourism operators but this is largely confined to administrative or regulatory matters 2: There is limited co-operation between managers and tourism operators to enhance visitor experiences and maintain protected area values 3: There is good co-operation between managers and tourism operators to enhance visitor experiences and maintain protected area values</p> |
| <p>Comments and Next Steps</p> | | |
| <p>29. Fees: If fees (i.e. entry fees or fines) are applied, do they help protected area management?</p> | <p>2</p> | <p>0: Although fees are theoretically applied, they are not collected 1: Fees are collected, but make no contribution to the protected area or its environs 2: Fees are collected, and make some contribution to the protected area and its environs 3: Fees are collected and make a substantial contribution to the protected area and its environs</p> |
| <p>Comments and Next Steps</p> | | |

| | | |
|---|-----------|---|
| <p>30. Condition of values: What is the condition of the important values of the protected area as compared to when it was first designated?</p> | 2 | <p>0: Many important biodiversity, ecological or cultural values are being severely degraded 1: Some biodiversity, ecological or cultural values are being severely degraded 2: Some biodiversity, ecological and cultural values are being partially degraded but the most important values have not been significantly impacted 3: Biodiversity, ecological and cultural values are predominantly intact</p> |
| Comments and Next Steps | | |
| <p>30a: Condition of values: The assessment of the condition of values is based on research and/or monitoring</p> | 1 | <p>0: No 1: Yes</p> |
| Comments and Next Steps | | |
| <p>30b: Condition of values Specific management programmes are being implemented to address threats to biodiversity, ecological and cultural values</p> | 1 | <p>0: No 1: Yes</p> |
| Comments and Next Steps | | |
| <p>30c: Condition of values: Activities to maintain key biodiversity, ecological and cultural values are a routine part of park management</p> | 1 | <p>0: No 1: Yes</p> |
| Comments and Next Steps | | |
| TOTAL SCORE (102 is the max if all questions are valid) | 82 | Pls add up numbers from assessment form (questions 1 to 30) |