Minutes and Recommendations of the Regional Project Steering Committee of Kagera TAMP (Transboundary Agro-ecosystem Management Programme) held on 29th November 2005 at Imperial Botanical Beach Hotel, Entebbe

OPENING STATEMENTS

The meeting was opened and chaired by the Executive Director of NEMA, on behalf of the host country Uganda, and was attended by delegations from the 3 beneficiary countries of the PDF-B and a delegation from Burundi. The list of participants and agenda of the meeting are presented in Annexes 1 and 2.

Anna Tengberg, Land degradation programme coordinator, GEF/UNEP, noted that she was impressed by the preparatory work presented and the discussions at the preceding workshop on "Regional Sharing of Experiences from Farm to River Basin Levels" which provides a very good basis for the project formulation process

Sally Bunning, FAO headquarters, and Lamourdia Thiombiano, FAO Regional Office for Africa, both land management officers in AGL, noted the support that FAO has provided as executing agency during the PDF-B:

- ✓ Technical lead has been provided by FAO Land and Water Development Division (AGL) with operational and technical support of RAF and two international consultants and three fulltime national project managers (NPM);
- ✓ FAO missions contributed to launching workshops in each country, backstopping of NPMs, the methodology development workshop for the diagnostic assessment (Kigali and Ngara) and the regional experience sharing workshop (Entebbe)
- ✓ FAO is making available remote sensing information and statistics: Africover, AEZ, SOTER, agricultural statistics, etc,
- ✓ The NPMs with support of national experts have generated a solid information base in each country through the conduct of several community PRAs and transects, district stakeholder consultations, regional and national level meetings.
- ✓ Outstanding actions include the preparation of full country reports of the findings and suggested actions and collaborative arrangements and targeted policy and legal reviews.

FAO emphasized the need for synergy between agriculture programmes and environmental processes and action plans aimed to meet national CCD, CBD and UNFCCC commitments.

The diagnosis in the beneficiary districts and with the many stakeholders in the 3 countries has confirmed major problems (such as severe land degradation- erosion, deforestation, refugee populations –especially since the 1994 genocide, sedimentation of lakes) as well as priority actions requiring consideration in the full project.

COMMITMENT FROM MEMBER COUNTRIES

The chair emphasized the importance and timeliness of the TAMP project. The delegations noted that the Kagera Basin is the main inflow to Lake Victoria and Nile River and thus its sustainable use has wide implications. The challenge of land

degradation affects large populations in the countries sharing the basin, whose livelihoods and survival depends on their sustainable use of resources. There is a need to address the threat of loss of valuable resources and ensure more productive and sustainable use of basin-wide resources and agricultural ecosystems.

The PSC members agreed that the proposed Kagera TAMP is a unique and innovative project, as it aims to use agriculture as an engine for reversing land degradation, biodiversity conservation, carbon sequestration and the protection of international waters. As this project that will generate substantial and long term local, national and international benefits, it must be highly supported.

The Tanzania delegation noted the need for national and regional level action and roles of VPO/DOE in coordinating cross-cutting issues among MAFS, MLWE, MNR and MCM and harmonizing policies and legislative aspects (agriculture, NAP-CCD, NBSAP, UNFCCC). She noted the need for improved land use, maintenance of the hydrology regime, carbon sequestration and reduced emissions, livestock support and diseases, refugees, overgrazing and bushfires and for support to farmers to produce more which requires promoting marketing activities.

The Burundi delegation requested to be integrated into the full project, noting its membership and active partner of NELSAP and its Kagera IWRM project, ratification of MEAs and commitment to undertake any required actions and obtain trust of TAMP partners.

The Uganda delegation noted the very high population density, the overuse of natural resources and severe environmental degradation in steep densely populated lands in Kabale district. There is a need for concerted action across borders to help small farmers sustain resources and livelihoods. He noted collaboration with the PMA (Programme for modernizing agriculture) which is encouraging farmers to commercialise in order to increase income and food security. The strategic investment plan of MAAIF is aimed at improving productivity and environmental issues, which Kagera TAMP could help implement.

TIMING OF ACTIVITIES

The timing of project formulation and submission for GEF approval was discussed and the following timeline proposed for 2006:

- $\sqrt{10^{\text{th}}}$ January: Final country reports with activity costings and co-funding;
- √ 24th January: Deadline for project document submission for peer review by (GEF/UNEP, STAP, World Bank, UNDP);
- $\sqrt{24^{\text{th}}}$ February: Finalize the Project Document and Executive Summary in consultation with governments for FAO clearance (TCA, AFF, RAF).
- $\sqrt{}$ March: Prepare transboundary diagnostic analysis for the GEF review
- ✓ 24th March: At the very latest, UNEP submit full project to GEF Sec with letters of endorsement from GEF focal points and to UNDP, WB, IFAD to assess risk of duplication with other GEF projects
- $\sqrt{6^{\text{th}} \text{April:}}$ Final submission to GEFSec with letters of endorsement by GEF focal points, co- funding pledges on the basis of the logframe, expressions of interest (and confirmations if possible) and demonstrating complementarity with other GEF projects, NELSAP, etc.,

- $\sqrt{13^{th} April:}$ Final project review by GEFOP meeting which may call for further review meeting on 20th April
- $\sqrt{27^{\text{th}} \text{ April final submission of revised project document}}$
- ✓ 5-9 June: Project presented for approval by GEF Council in Washington for comments by members (before end of GEF-3)
- $\sqrt{10^{\text{th}} \text{ July Response with final documentation if approved}}$
- ✓ After July: Appraisal and revisit institutional arrangements, finalise detailed budget in UNEP and FAO formats. Obtain remaining co-funding letters and country endorsement.
- $\sqrt{}$ Before end 2006 resubmit for endorsement and funds.

CO-FUNDING OPPORTUNITIES

Anna Tengberg confirmed that GEF has earmarked US\$ 6mn for the transboundary project by 3 beneficiary countries: Uganda, Tanzania and Rwanda (Burundi was not initially included due to security situation at the time of approval of PDF-B).

Anna emphasised the need for co-funding to ensure sustainability and ensure the project is demand driven and has country ownership. She clarified that the 3:1 co-funding ratio for the LD focal area includes cash and in kind support from partner governments down to community level. In this process of confirming co-funding, it is important to liaise with and involve the Ministries of Finance.

Discussions were held on how to mobilise an overall co-funding of 1:3 - i.e. for every US\$1 of GEF funds for land degradation, US\$3 of co-funding need to be found, in kind and cash. If biodiversity issues are included they can be costed at 1:1.

The meeting recommended that extra funding be taken seriously and identification of extra sources should begin immediately by identifying government programmes, projects, NGOs and local contributions.

In accordance with the willingness expressed by delegations during the technical workshop, PSC members were asked to take an active role in finding co-funding and obtaining formal, official country endorsement. The project logframe should be used to identify for the various outputs, co-funding from national to local levels (e.g. community land and time).

Additional donor support that that should be considered to support the project includes, for example, national programmes such as NAADS in Uganda, regional programmes such as LVEMP, NGOs, etc.

PROPOSED GEOGRAPHIC SCOPE

Although the PDF-B focused in the lowland districts in Rwanda and Burundi was not included, it was proposed by FAO that the project include the highland areas in Rwanda and Burundi which form the upper part of the catchment. It is necessary to improve resources management in the upstream, highland areas in order to address issues of land use, erosion and sedimentation upstream and linkages with water users and impact on the hydrological regime and ecosystems downstream, and thereby protect the watershed.

Rwanda and Burundi noted the huge challenge this would present to cover the whole river basin as this would include some 75% and 50% respectively of the country land area. It was agreed that there would be a need to target and focus in certain areas to avoid spreading resources too thinly and ensure that the project will achieve expected impact. For example, target communities and micro-catchments should be supported in each district and each agro-ecological zone which should through demonstrations, capacity building and experiences/impacts on the ground, provide the reference for further mainstreaming and scaling up and out. Activities for awareness raising and commmunications could eventually cover the full basin.

GEF/UNEP agreed fully on the focus of the project for demonstrations and activities to remove system-wide barriers to land degradation. It was suggested to find out about the Nile basin Transboundary management issues discussed at the PSC in Khartoum in December 2005.

The RPSC recommended that the National Project Manager (NPM), on the basis of the GIS analysis and with guidance of the Technical Advisory Committee (TAC), identify representative micro-catchments in each key agro-ecosystem.

The project should ensure impact, to both generate global environmental benefits and produce environmental, livelihood and food security benefits at micro-catchment level.

For the local and national benefits, over the next 2 months, partnerships need to be secured by each country for co-funding in line with incremental cost analysis. This should include collaboration with private sector and civil society organizations

INVOLVEMENT OF BURUNDI

The RPSC recommended that Burundi should be integrated in the full project, inter alia:

- $\sqrt{}$ it represents some 30% of the basin area and a large share of the upper catchment;
- $\sqrt{}$ it is a member of the NBI-NELSAP initiative;
- $\sqrt{}$ it now has political stability;
- $\sqrt{}$ it has ratified the UN environmental conventions CCD, CBD, FCCC.

After discussion, Burundi was endorsed by the meeting as a full member of the PSC. It was agreed that the financial implications of Burundi's inclusion in the project will be examined with GEF/UNEP and GEF Secretariat. Possible options included a request for an MSP for Burundi and/or a request for additional funds (15%) for the full project for inclusion in regional activities, or tranching to avoid having to re-enter in the pipeline.

FAO agreed to support a national consultant in Burundi to help collect required information for the project formulation.

TRANSBOUNDARY ISSUES

The PSC was informed of a number of transboundary issues hat had arisen during the PDF-B phase through consultations with stakeholders at community, district/province and regional levels. It was noted that the uniqueness of Kagera TAMP lies in its

ability to deal with priority transboundary challenges in collaboration with other regional projects. It was proposed that mechanisms are set up to learn from experiences of and collaborate with other transboundary projects. The following issues that have been identified are detailed in Annex 3:

- $\sqrt{}$ Bush burning
- $\sqrt{}$ Need for guidelines and harmonized policies
- \checkmark Livestock movement
- √ Overgrazing
- $\sqrt{}$ Water use in the Kagera basin
- $\sqrt{}$ Water hyacinth in rivers and lakes
- $\sqrt{}$ Soil erosion and its effects on wetlands
- $\sqrt{}$ Pest and disease control
- $\sqrt{}$ River bank management
- √ Wildlife management (Akagera park)
- \checkmark Refugee settlement.

The PSC recommended that policies and regulations be harmonised to address such transboundary issues through Kagera TAMP.

LOCATION OF PROJECT HEADQUARTERS AND LINKAGES WITH OTHER PROJECTS

The PSC discussed the possible locations and agreed that the regional coordination unit should be based in Kigali, for the following reasons:

- $\sqrt{}$ Kigali is the most important city lying centrally within the basin
- \checkmark As a capital, it can provide the required facilities, communications, transport FAO Representation and government support
- ✓ Close linkages and collaboration will be ensured with NELSAP and its Kagera Integrated water resources management project (IWRM) based in Kigali;
- $\sqrt{}$ The GIS/RS institution is the most competent to provide basinwide support
- $\sqrt{}$ Dar-es-Salaam in Tanzania and Entebbe in Uganda are too far away.
- \sqrt{R} Rwanda will be pleased to host the project and can confirm good security and a stable political situation.

The PSC emphasized the need for close collaboration with regional programmes and bodies such as LVEMP, NBI- NELSAP (its Kagera-IWRM project), ASARECA etc.

PROJECT MANAGEMENT

Charles Rusoke, national project coordinator, MAAIF, Uganda confirmed his role in providing advice and links with other relevant country experiences. He raised the problems faced by the NPM in accessing funds in Kabale and burocratic delays during the PDFB. The NPM in Bukoba, Tanzania, also faced administrative problems and failed to get a project bank account approved in Bukoba. The delays were regretted by FAO which also suggested that forward planning is required for financial and contractual arrangements (e.g. 6 month budgets in country). It was noted that the PDF-B had run smoothly in Rwanda and the placing of the project HQ in a capital where the FAO Representation is located would greatly facilitate project management.

INSTITUTIONAL ARRANGEMENTS

In regard to project endorsement it was noted that the GEF focal points should be cosignatories but also the Ministries of agriculture should also approve he project.

The PSC discussed CSO involvement in the project and proposed that there should also be CSO representation on the National Steering/Technical Advisory Committees.

The PSC raised the importance of being realistic in establishing project institutional structure (in terms of costs, timing, etc.) and if necessary should scale down the proposals from the preceding workshop.

The PSC also stressed the need for the full project to organize and provide budgets for regional meetings/critical consultations to ensure satisfactory results, while at national level co-funding could be worked out.

It was agreed that the next PSC meeting would take place in Kigali for one day on $13^{\text{th}}/14$ th February 2006 with an optional field excursion.

For the planned donor meeting in Kampala, Uganda, it was suggested to invite Embassies of the other countries to inform them of the project and need for cofunding. Such donor and embassy meetings are also proposed to take place with support of the FAO representation in the other beneficiary countries and on the basis of the sum-up report/ powerpoint results of the experience sharing workshop.

.../...

List of Participants

Members (12)

Mr. David O.O. Obong, Permanent Secretary (PS), Ministry of Agriculture, Animal Industry and Fisheries (MAAIF), Uganda

Eng. Kabanda, PS Ministry of Water, Lands and Energy (MWLE), Uganda

Dr. Aryamanya Mugisha, Executive Director, NEMA, Uganda

Mr. Wilson Bamwerinde, National Project Manager (NPM) Kagera TAMP, Uganda (Meeting secretary)

Mr. Eugène Rurangwa, Director Land Department and PSC Member Ministry of Land, Environment, Forest, Water and Mines (MINITERE), Rwanda

Mr. Juvenal Kabiligi, National project Manager (NPM) Kagera TAMP Rwanda

Ms. Faina Happy Kimambo, on behalf of Directorate of Environment, DOE/VPO (for Richard Muyungi, NPC and GEF focal point), United Republic of Tanzania

Mr. Paulo Tarimo, Director Lands and soil conservation, MAFS, U.R. Tanzania

Mr. Paulin Ambrose Msafiri, Regional Administrative Secretariat (RAS), Kagera

Mr. Freddie Baijukia, NPM Kagera TAMP Soils & land use research, Lake Zone Agric. Research & Development Institute (stand in for Valentini Rugambwa)

Ms. Anna Tengberg, Programme Coordinator Land degradation, GEF/UNEP

Ms. Sally Bunning, Land management officer, FAO Land and Water Development Division (AGL), Rome

Mr. Lamourdia Thiombiano, Soils and land management officer, FAO Regional office for Africa (RAF), Accra, Ghana

Absent (sick): Mr. Révérien Harindtwali, Project Focal Point, and PSC Member, Ministry of Agriculture and Animal Resources (MINAGRI) Rwanda

Observers (6)

Mr. Charles Rusoke, National project coordinator, MAAIF, Uganda

Ms. Sandra Mwebaze, Assistant Commissioner Livestock, MAAIF, Uganda

Ms. Suzanne Uwimana, Director Environment Department, Ministry of Land, Environment, Forests, Water and Mines (MINITERE)Rwanda

Mr. Sylvestre Ntibashirwa, Chef du Service Fertilisation, ISABU (Institut des Sciences Agronomiques du Burundi)

Ms. Eugènie Nduwayo, Responsable du Programme de lutte Anti Erosive, Ministère de l'Environnement,

Mr. Anaclet Nzirikwa, Member of NELTAC & IWRM RPSC, Chef de Cabinet, Ministère du territoire, de l'environnement et du tourisme.

<u>Kagera TAMP First Regional Project Steering Committee Meeting,</u> <u>Tuesday 29 November 2005, 10.00 - 13.00 Entebbe</u>

Draft Agenda

Participants

- Members: Representatives of ministries of agriculture and environment coordination bodies, including National Project coordinators (NPCs), GEF/UNEP, National Project Managers (NPMs) and FAO
- Observers: Burundi delegation

1. Opening of the Meeting

- Welcome Remarks by the Permanent Secretary for Agriculture, Ministry of Agriculture, Animal Industries and Fisheries (MAAIF), Uganda (Chair)
- Introductions of participants and introductory remarks by each country and by GEF/UNEP and FAO
- Agree on agenda
- 2. Summary report on activities and findings of the PDF-B phase: Progress and achievements to date and remaining activities for PDF-B completion (by the 3 NPMs) (20-30 mins *could include discussion on remaining activities*).
- **3.** Process and Outcomes of the Lessons learnt and sharing experiences workshop, 23-26 November, 2005, Entebbe: Sum up report (by Sally Bunning) and proposed scope/major activities of the TAMP (by Freddie Baijukia) (30 mins)
- 4. Issues requiring guidance of the PSC:
 - 4.1. Geographic scope Full Kagera river basin or "Lower" river basin
 - 4.2. Involvement of Burundi and funding implications
 - 4.3. Trans-boundary issues requiring attention (technical and policy)
 - 4.4. Linkages and collaboration with LVEMP, NBI-NELSAP and its Kagera IWRM project
 - 4.5. National co-funding (in cash and in kind)
 - 4.6. Institutional arrangements for the Kagera TAMP
- 5. Co funding opportunities
- 6. Any other issues
- 7. Sum up and agreement on Recommendations of the Regional Project Steering Committee (RPSC-1) and closing of the meeting

Kagera Basin: Transboundary Environmental Issues

Environmental problems in the Kagera Basin include soil erosion, degradation of agricultural lands, reduced biodiversity in agricultural, forestry, pasture and wetland systems, deforestation and loss of wetlands, overgrazing of pastures, declining water quality, overexploitation of fish stocks and wildlife, invasive aquatic species and eutrophication of inland water bodies, inadequate waste management in urban and peri-urban areas, waterborne diseases and threat of climate change, especially less reliable distribution and increased storms.

The linkages between environmental conditions and human activities and welfare are extremely complex. Sustainable human development depends on the ability of the environment to provide a variety of goods and services to meet current and future demands in terms of food and livelihood security and socio-economic and cultural wellbeing.

Ecological processes maintain land productivity through nutrient, hydrological and climatic cycles ensuring available plant nutrients, water retention and purification, carbon sequestration and reduced greenhouse gas (GHG) emissions. Soil biological activity and the restoration of nutrients that are removed through harvesting are vital for healthy soils and sustained production of food, fuelwood, building materials and other agricultural and medicinal products. Sustained biological diversity at landscape, ecosystem and genetic levels – including between species diversity and, in particular, within species diversity in regard to crops and domesticated animals - is essential for resilience, risk aversion and sustainability.

The Kagera Basin originates in the highlands of Burundi with the Ruvubu and Nyawarongo headstreams which run east-west, converge at the Rusoma falls and flows northwards, as the Kagera river along the Rwanda-Tanzania border, into Uganda and then meanders east flowing back into Tanzania a few km before entering into Lake Victoria. The Ruvubu's longest tributary, the 480 kilometer long Ruvinzora headstream, is considered the remotest source of the Nile River. Lake Victoria (65,000 km2) is the largest lake in Africa and is also fed by several other rivers in Kenya an d Tanzania including the Mara, Nzoia, Sondu-Miriu, Kuja and others. The Kagera river system is estimated to contribute between 8 and 10% to the Nile drainage system.

The Lake Victoria Basin, and those of the smaller George, Edward and Albert lakes, support an abundant and rich diversity of animals and plants and diverse forest, woodland, shrubland, grassland and wetland ecosystems. Though relatively low in plant endemism, it is one of the most important areas in Africa in terms of biological diversity and food production, with a combination of West and East African flora and fauna. The lake supports over 300 endemic fish species and provides the natural storage for the White Nile as well as purification and oxygenation of the water. The many wetlands and swamps and seasonally inundated grasslands and swamp forests are among the most productive ecosystems in the world and they provide buffering and regulation functions. They help maintain water quality by trapping sediment and

filtering nutrients and biodegradable pollutants and regulate the volumes and energy of river flows despite strong seasonal variations in the bimodal rainfall pattern.

The original vegetation would have been extensive tropical forests, which was transformed into shifting cultivation and more recently increasing deforestation, especially in parts of Burundi and Rwanda, and more intensive cultivation and livestock production systems. The current land use is mainly rainfed agriculture and agro-pastoralism, sometimes supplemented by fishing, with some transhumant pastoralists who general supplement livestock grazing with smallscale or seasonal crop production or fishing. There is relatively little irrigated agriculture. The degradation of land, water and biological resources resulting from human and natural processes, affect the individual states as well as having transboundary effects. This is reflected in a diminution of the productive potential of a given tract of land for a particular use, for example, lower crop yields, fewer livestock units, fewer plant and animal species and less diversity. It is often caused by unsuitable uses for example encroachment of cultivation onto marginal lands, overexploitation of resources, inappropriate technologies and inputs (seeds and chemicals) and pollution of inland waters from sewage as well as breweries and processing industries for example for sugar, tanning, paper, abattoirs.

Transboundary environmental issues have immediate proximity to and/or impact on neighbouring states including the shared water resources and other natural resources, the overall functioning of the ecosystem and management issues. Those identified in the Kagera Basin include:

- Downstream physical or chemical impacts resulting from deforestation and unsustainable land use and management practices leading to increased runoff, soil erosion, vulnerability to drought, sedimentation and pollution of water resources, loss and degradation of wetlands and greater flood risk.
- Ecological changes and loss of resilience of fragile and vulnerable ecosystems especially inland water bodies and steeplands and marginal agro-pastoral systems.
- Loss of key habitats (e.g. wetlands and watersheds) and/or key ecosystem functions (e.g retaining nutrients and water quality; pollination and predation) and/or unique and threatened animal, plant and microbial species.
- Loss of resilience and stability of human and natural land use systems to stresses and change for example those caused by pests and disease outbreaks, climatic vagaries such as drought periods, storms and floods and climatic change.
- Spread of exotic and invasive species that lead to impaired functions of ecosystems including water hyacinth and other aquatic weeds such as elephant grass and papyrus, that lead to blocked waterways, eutrophication and threatened fish and other species.
- Waterborne diseases due to increased breeding grounds and poor sanitation and hygiene such as malaria, diarrhoea, bilharzia (schistosomaisis) which especially threaten infants and the elderly.
- Finally, refugee movements are also significant as in addition to enormous humanitarian and economic costs, the increased pressures on local resources and the poverty and lack of security often leads to substantial resources degradation

Solving such environmental issues within the Kagera basin requires national efforts and transboundary cooperation including improved awareness, knowledge and information sharing, stakeholder involvement and capacity building, as well as the identification and promotion of sound land use and management practices. This requires measures to prevent land degradation - where land includes soil, water, biological and atmospheric resources - as well as measures to restore degraded resources and well-functioning, resilient ecosystems. Specific measures are required to address problems, constraints and conflicts arising in wetlands, agro-pastoral, and forest ecosystems through human induced (anthropological) and natural processes. In order to ensure the food and livelihood security and wellbeing of current and future generations, efforts need to focus on sustaining the diverse human activities that contribute to food and agricultural production and poverty alleviation.

The identification of objectives and priority activities requires a thorough review and analysis of basin-wide natural resources status, environmental and demographic trends, threats and development constraints and opportunities. The preliminary identification and scoping exercise by the current identification mission and workshop among national and international resource persons is expected to contribute to improved understanding, selecting priority issues and critical areas and the identification of required actions for further development of the proposed project.

In identifying priorities there is a need to understand the values of the ecosystems and resources and the wide ranging benefits they generate. The economic value of some of the ecosystems is considerable, for example, the annual value of wetland products and services are estimated to be as high as US\$220 per capita for farm-households in some areas around Lake Victoria. This includes direct values of production and consumption of goods, indirect values of ecological goods and services that support the land use activity, as well as option values for potential future uses and attributes (.e.g unknown needs for the conservation of genetic resources in wild relatives of domesticated plants) and intrinsic values in terms of cultural, aesthetic and heritage and bequest value.

There is also a need to understand not only the direct threats, often attributed to population growth and poverty, but also the underlying or root causes that are often related to sectoral and macro-economic policies, institutional, governance, awareness and information issues. The design of effective remedial actions requires an understanding of the complex interactions between these factors and the environmental resources so as to include complementary technical, policy and institutional considerations. In order to address poverty and to reduce vulnerability of the poor who depend on the natural resources, the challenge is to accelerate equitable income growth and promote access to necessary resources and technologies. In order to bring about a change from unsustainable practices into appropriate land management practices in the short and long term, local communities need secure user/ property rights, local governance, incentive measures, adequate institutions and harmonised sectoral policies, opportunities and empowerment.

In advocating an integrated river basin approach, possible areas for action include:

• political commitment and international cooperation;

- outreach through public awareness, knowledge, information sharing and education, stakeholder participation, especially NGOs, and conflict resolution;
- preventive measures including environmental impact assessment, integrated ecosystem approach, early warning systems, identification of hotspots/critical ecosystems, local and national land use planning, harmonised policy framework among diverse sectors, and cost effective alternative energy sources;
- Curative measures such as improved waste water treatment, water quality and pollution control, integrated waste management, appropriate use of agro-chemicals, control of exotic species introduction;
- integrated natural resources management programmes, including local level planning, strengthened watershed and wetlands management, conservation of critical ecosystems/ habitats and important species; and
- monitoring and evaluating environmental change and trends through appropriate impact and performance indicators