

Global Partnership on Local and Sub-national Action for Biodiversity



TEEB Manual for Cities: Ecosystem Services in Urban Management



**Global Partnership Meeting
5 & 6 September 2011
Bonn, Germany,**

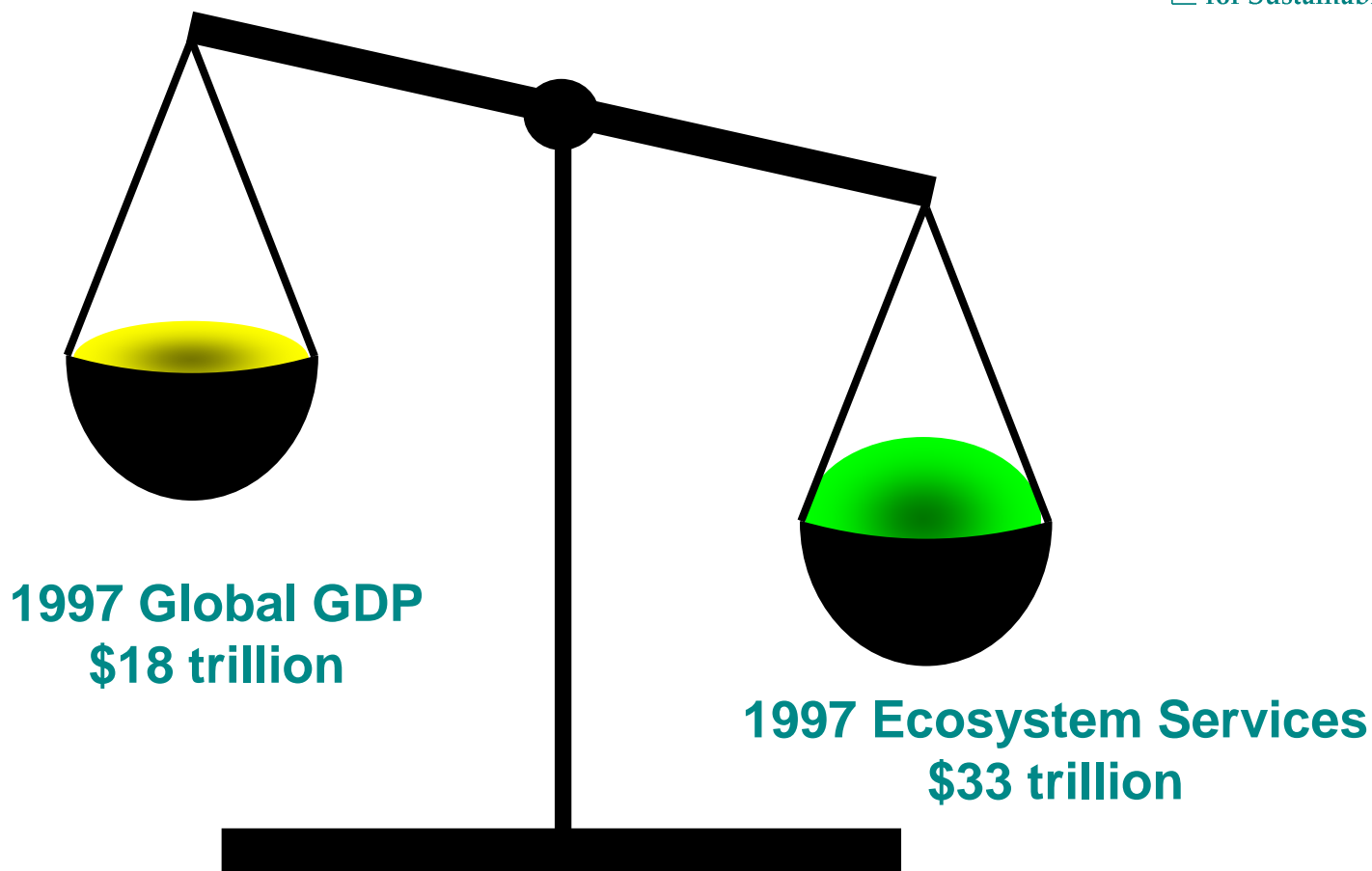


TEEB

The Economics of Ecosystems & Biodiversity

- Hosted by UNEP with financial support from the European Commission, Germany, the United Kingdom, Netherlands, Norway, Sweden and Japan.
- Initiated through a proposal by the German government at a meeting of environment ministers of the G8 countries and the five major newly industrialising countries (“Potsdam Initiative” for Biodiversity) - March 2007.
- Proposal was endorsed by G8+5 leaders at the Heiligendamm Summit on 6-8 June 2007, and work on the TEEB study began.
- The TEEB study is being conducted in phases.

Why biodiversity? (TEEB)



Costanza et al 1997

Purpose of the TEEB Study

Inspired by the Millennium Ecosystem Assessment, TEEB aims:

- To promote a better understanding of the true economic value of ecosystem services and to offer economic tools that take proper account of this value**
- To assess and communicate the urgency of action to address ecosystems and biodiversity loss by presenting the economic, societal and human value of the benefits of ecosystems and biodiversity, and the scale of the benefits lost**
- To show how we can take into account the value of ecosystems and biodiversity in our choices and decision-making processes.**

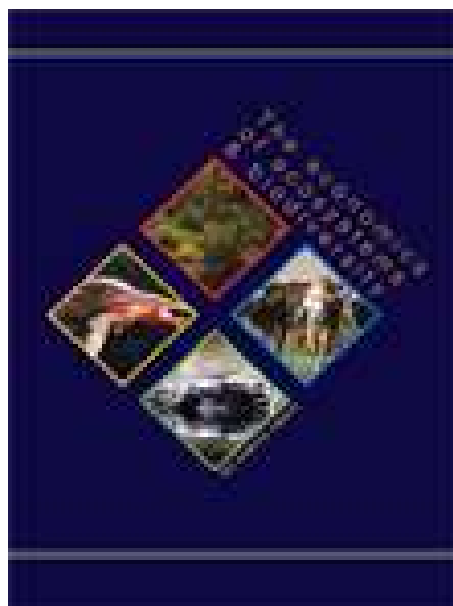
Phases of the TEEB Study

Resulting in a series of reports for distinct end-users:

- for ecologists and economists (TEEB D0)
- for international and national policy makers (TEEB D1)
- for local and regional policy (TEEB D2)
- for business (TEEB D3)
- for citizens (TEEB D4)

Products of the TEEB Study

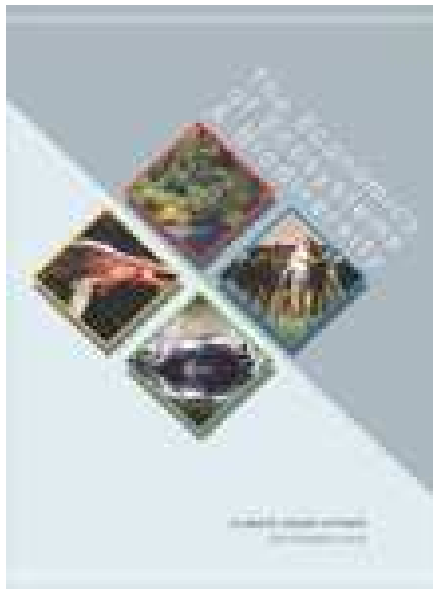
The TEEB Interim Report, 2008



- *"comprehensive and convincing business model for the conservation of biological diversity"*
- **Presented at the 9th meeting of the Conference of the Parties to the CBD in Bonn**

Products of the TEEB Study

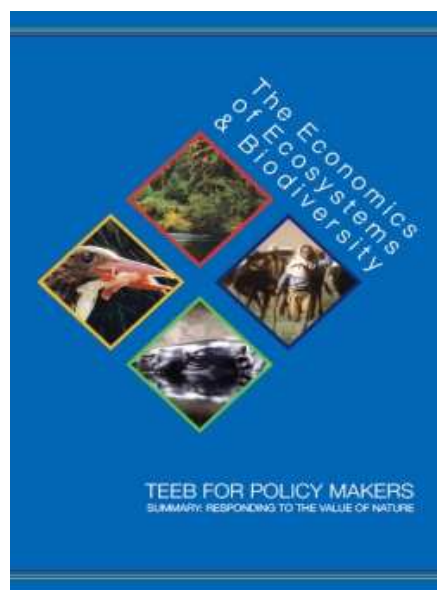
The TEEB Climate Issues, September 2009



- **Climate-relevant economic aspects of biodiversity**
- **Investments in the restoration and conservation of our planet's ecosystems, valued at several trillion dollars, can play a major role in combating climate change**

Products of the TEEB Study

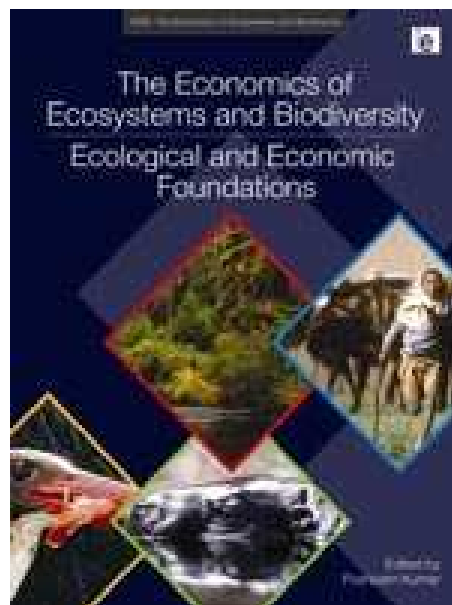
The TEEB for Policy Makers Report, November 2009.



- **Underlines the urgent need to improve knowledge and awareness of the social and economic dimension of the loss of biological diversity.**
- **Aims to assist policy makers in reaching informed decisions regarding nature conservation and sustainable economic development.**

Products of the TEEB Study

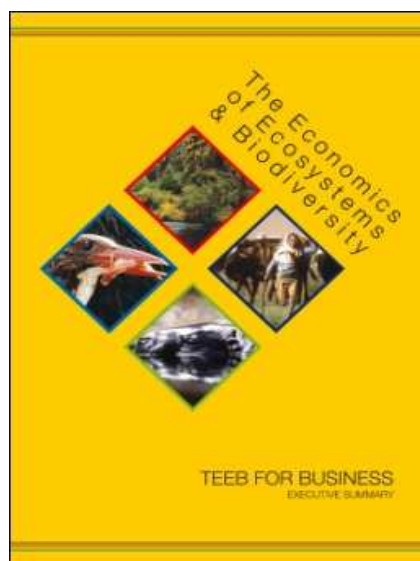
The TEEB Economic and Ecological Foundations, revised in 2010



- **Synthesizes state-of-the-art knowledge on the main concepts, methods and tools for valuation**
- **Provides recommendations on their application and identifies some critical needs in research and data collection.**

Products of the TEEB Study

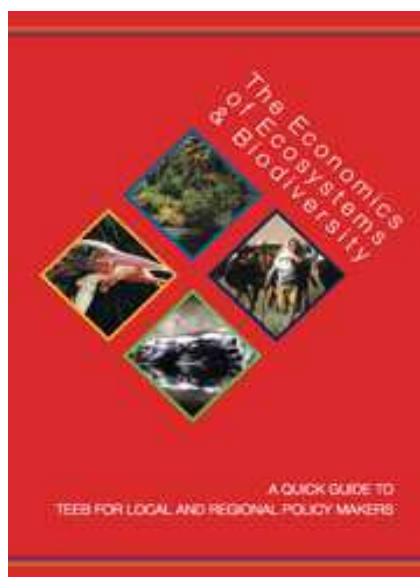
The TEEB for Business Report, July 2010



- Summarizes a major component of TEEB aimed at the business community.
- Sets out the business case for biodiversity and ecosystem services (BES).

Products of the TEEB Study

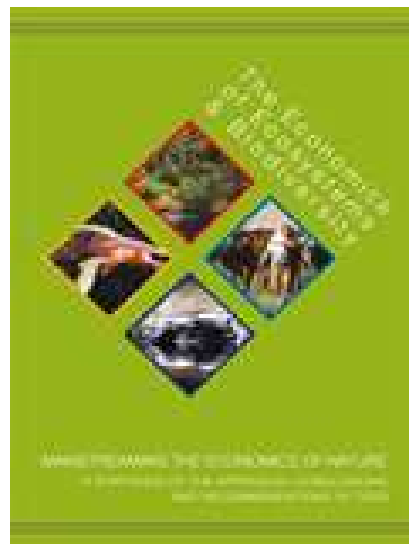
The TEEB for Local and Regional Policy Makers, September 2010



- Illustrates how dependent cities and municipalities are on nature, and that nature has cost-effective solutions to local problems such as drinking water supply or air pollution control.
- TEEB D2 Global Launch, September 2010 in South Africa, Brazil and India

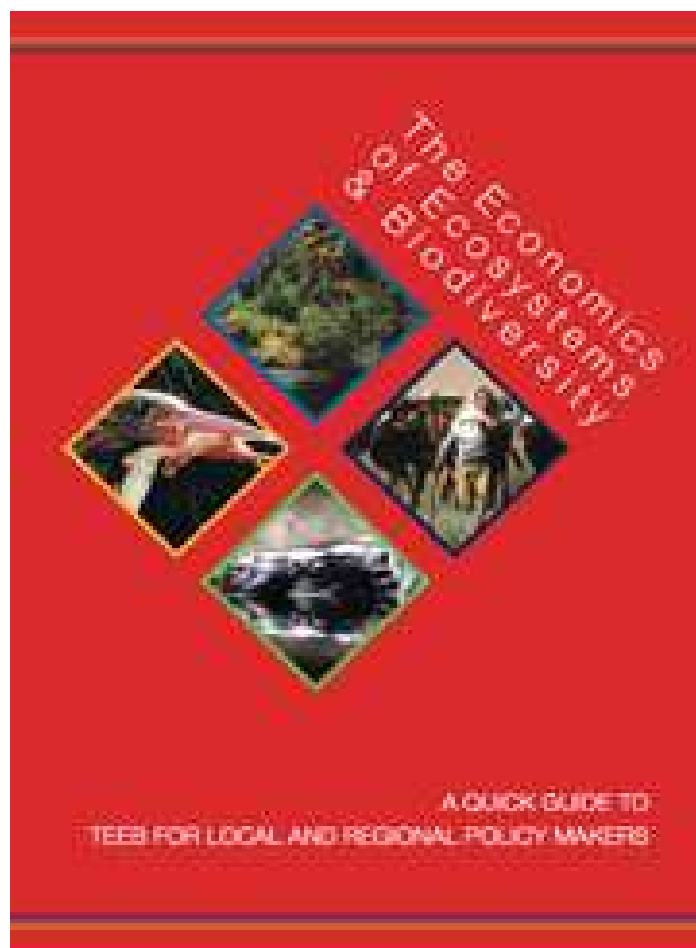
Products of the TEEB Study

The TEEB Synthesis Report Mainstreaming the Economics of Nature: A synthesis of the approach, conclusions and recommendations of TEEB, October 2010.



- **"Mainstreaming the Economics of Nature" is the last of four reports produced by the U.N. Environmental Program over the past two years**
- **Aims to capture how habitats such as tropical forests and coral reefs contribute to countries' economic bottom lines.**

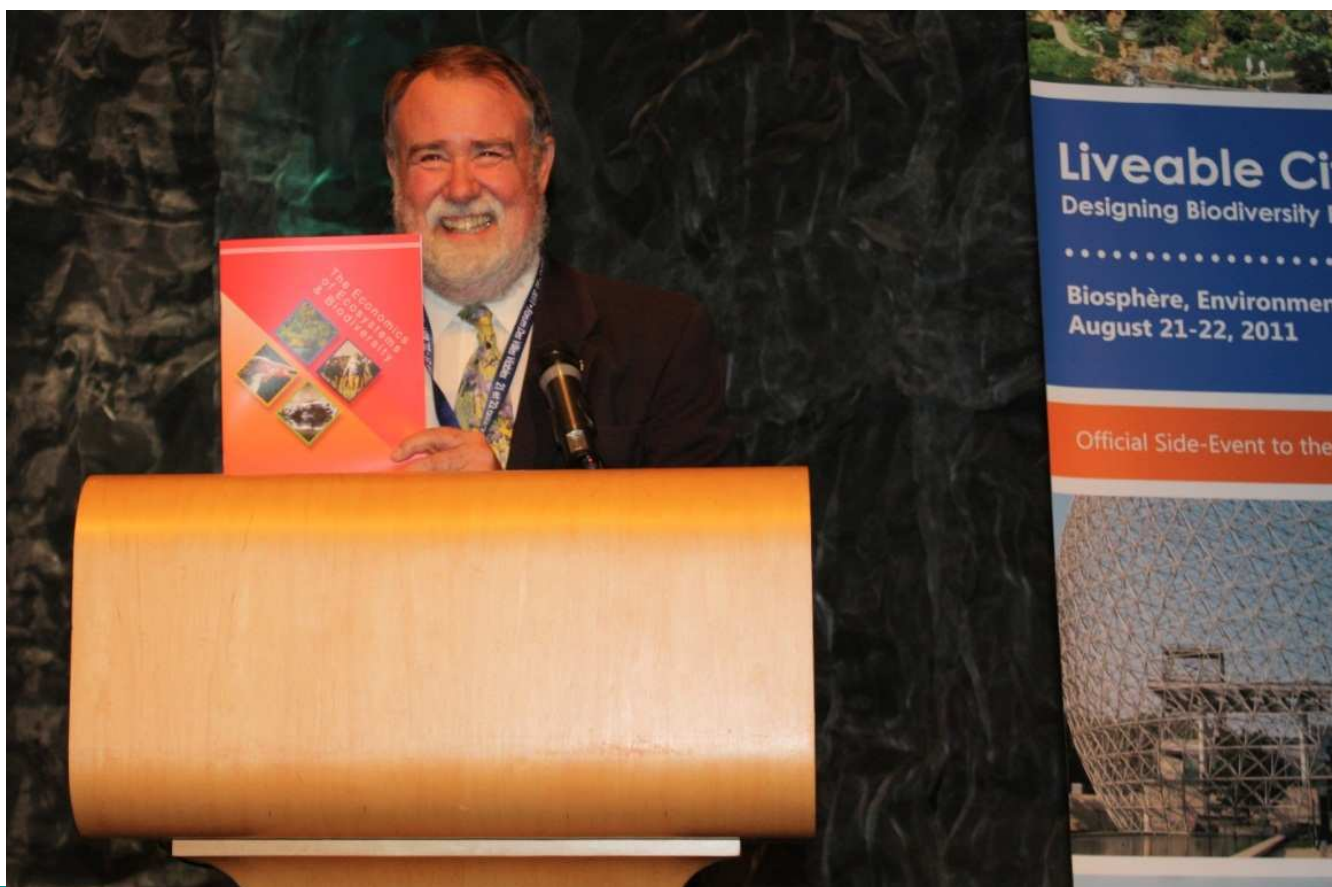
TEEB Manual for Cities: Ecosystem Services in Urban Management



- Partnership between ICLEI-Local Governments for Sustainability's Cities Biodiversity Center and the TEEB for Local and Regional Policy Makers teams.
- Tailored specifically for cities, drawing on ICLEI and IUCN's LAB Pioneer Programme
- Highlights how a focus on ecosystem services and their valuation can create direct benefits for cities.
- Provides stepwise guidance on how to do this illustrated by in-depth case studies.

TEEB Manual for Cities: Ecosystem Services in Urban Management

- Officially launched at the Liveable Cities Forum and EcoCity World Summit in Montreal 22-26 August 2011



TEEB Manual for Cities: Content

- Section 1:** An introduction to ecosystem services and cities
- Section 2:** How to include ecosystem services in decision making & policy - “The TEEB Stepwise Approach”
- Section 3:** Applying the TEE B stepwise approach within city management



TEEB Manual for Cities:

Section 1: An introduction to ecosystem services and cities

- 1.1 The Value of Nature for Cities
- 1.2 Ecosystem services: definitions and examples
- 1.3 A focus on ecosystem services: helping cities to achieve their goals



Michael Sondemann/City of Bonn

TEEB Manual for Cities:

Ecosystem services: definitions and examples

Provisioning services: Ecosystem services that describe the material or energy outputs from ecosystems
















Regulating services: The services that ecosystems provide by regulating the quality of air and soil or providing flood and disease control, etc.

Habitat or Supporting services: These services underpin almost all other services. Ecosystems provide living spaces for plants or animals: they also maintain a diversity of plants and animals.

Cultural services: These include the non-material benefits people obtain from contact with ecosystems. They include aesthetic, spiritual and psychological benefits.

TEEB Manual for Cities:

The ecosystem services icons

<i>Provisioning Food</i>		<i>Regulating Pollination</i>	
<i>Provisioning Raw Materials</i>		<i>Regulating Biological Control</i>	
<i>Provisioning Fresh Water</i>		<i>Habitats for Species</i>	
<i>Provisioning Medicinal Resources</i>		<i>Habitats for Genetic Diversity</i>	
<i>Regulating Local Climate</i>		<i>Cultural Service: Recreation</i>	
<i>Regulating Carbon Sequestration</i>		<i>Cultural Service: Tourism</i>	
<i>Regulating Extreme Events</i>		<i>Cultural Service: Aesthetic appreciation</i>	
<i>Regulating Waste Water Treatment</i>		<i>Cultural Service: Spiritual Experience</i>	
<i>Regulating Soil Erosion and Fertility</i>			

Icons designed by Jan Sasse for TEEB, available for non-commercial purposes, for details see teebweb.org

TEEB Manual for Cities:

Section 2: How to include ecosystem services in decision making & policy - “The TEEB Stepwise Approach”

- Step 1: Specify and agree on the problem or policy issue with stakeholders**
- Step 2: Identify which ecosystem services are most relevant**
- Step 3: Determine what information is needed and select assessment methods**
- Step 4: Assess (future changes in) ecosystem services**
- Step 5: Identify and assess management/policy options**
- Step 6: Assess the impact of the policy options on the range of stakeholders**

TEEB Manual for Cities:

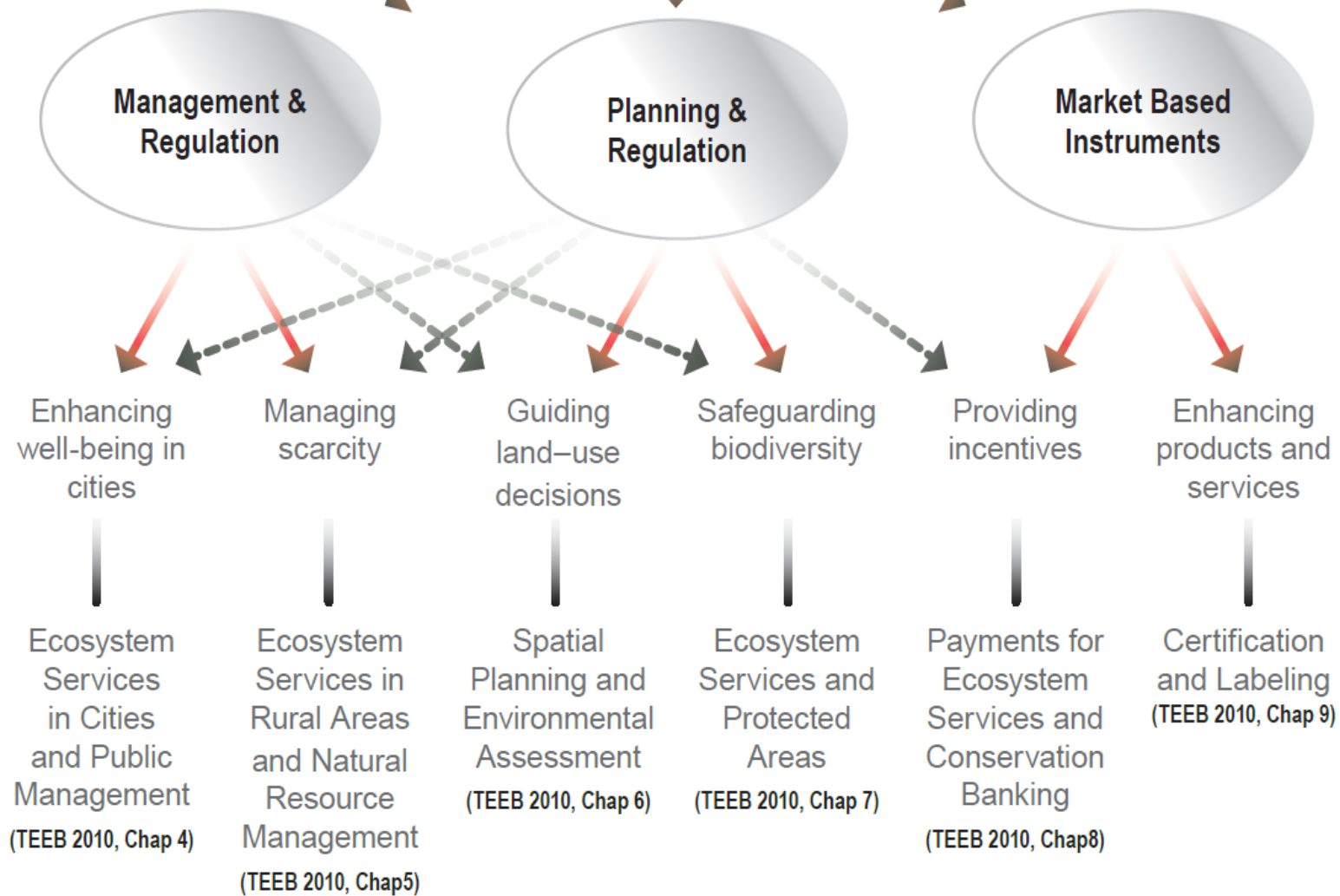
Section 3: Applying the TEEB stepwise approach within city management

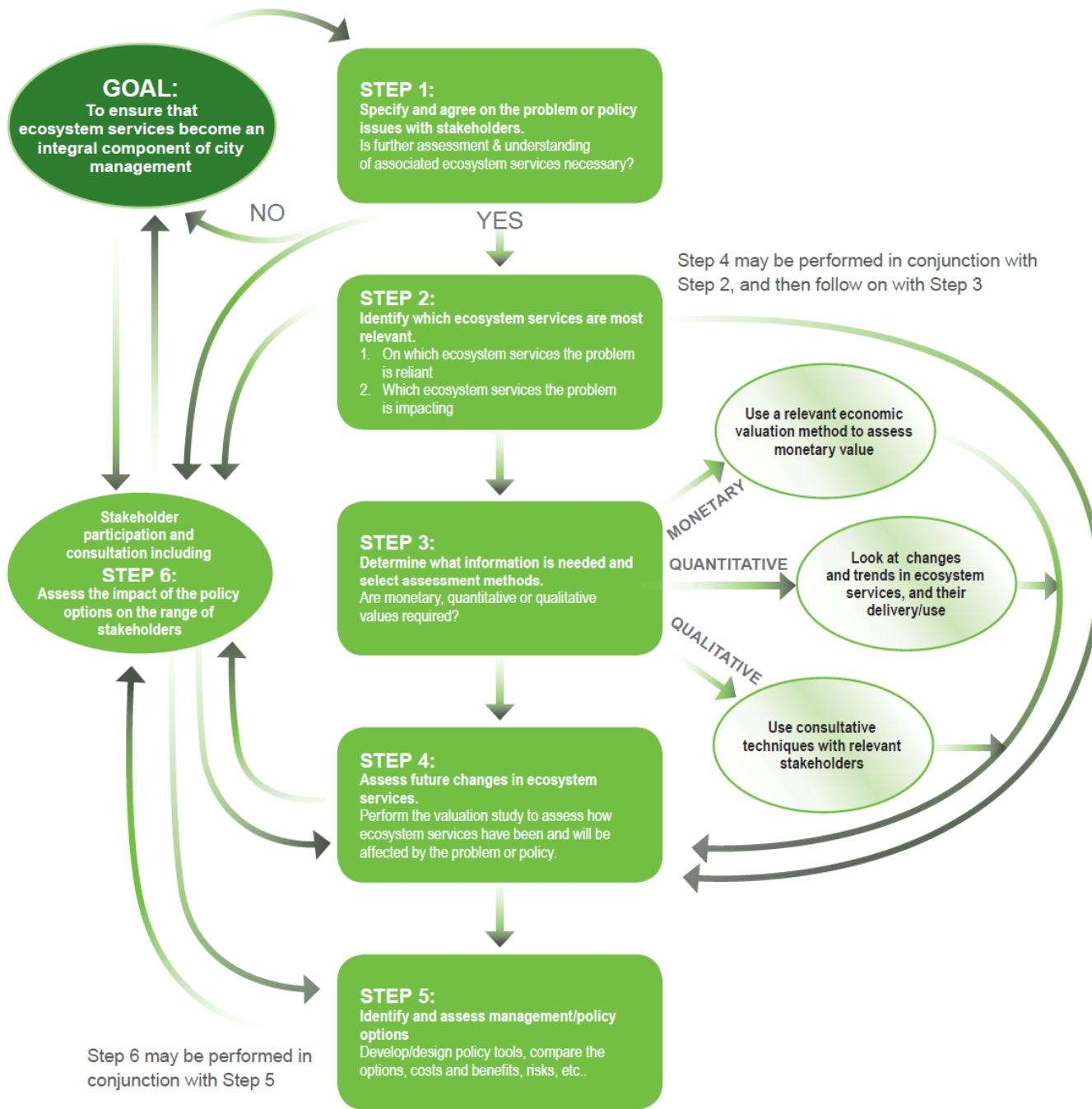
- 3.1 Communicating to decision makers & other line functions
- 3.2 Budget cycle
- 3.3 Spatial planning
- 3.4 Concluding remarks



City of Nagoya

Integrating Ecosystem Services and Biodiversity in Local & Regional Policy Making







Thank you

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