A Guide to Biodiversity for the Private Sector

www.ifc.org/BiodiversityGuide

Chemicals

The Bottom Line

The chemical sector faces a significant amount of uncertainty over impacts to human health and ecosystems, as many chemicals in daily use have not yet been assessed for their risks to biodiversity. Some impacts that might not appear for many years may be difficult to predict when a chemical is originally developed. Chemicals such as persistent organic pollutants (POPs) can enter the food chain, causing disease, behavioral changes and population declines for a variety of plants and animals. The chemical sector can also affect biodiversity through the overuse of natural resources such as water, and improper waste handling and disposal, particularly of hazardous wastes generated from the chemical production process.

The chemicals sector and the pharmaceuticals and biotech sector were identified as medium-risk ("amber zone") sectors for biodiversity risk in the September 2004 report ***Is Biodiversity a material risk for companies?*** (F&C Asset Management plc) [Report available from: http://www.businessandbiodiversity.org/pdf/FC%20Biodiversity%20Report%20FINAL.pdf] The report defines amber-zone sectors as those sectors in which *some* companies are likely to be exposed to biodiversity risks and the risks *may be significant*.

Drivers for change

- Managing **risks of use and disposal** of chemicals (community, clients, shareholders, employees)
- Regulatory emphasis on the **precautionary principle** (governments, shareholders, employees)
- Ensuring that **raw materials** are sourced and extracted in a sustainable manner (suppliers)
- **International treaties** that regulate chemical sector activities (governments, regulators)
- Ensuring a sustainable **supply of natural inputs** into products, such as pharmaceuticals (suppliers, clients)
- Maintaining **access to capital** (financiers)

Key sustainability initiatives and good practices

- **The International Council of Chemical Associations' (ICCA) Responsible Care Initiative:** [http://www.icca-chem.org/section02a.html] Responsible Care, a voluntary initiative to help chemical companies improve environmental, health and safety performance, has been adopted by industry associations in 47 countries.

- **The American Chemistry Council's Long-Range Research Initiative (LRI):** [http://www.uslri.org] Sponsored by the U.S. chemical industry, the LRI supports research to increase knowledge about how chemicals may impact human health, wildlife populations and the environment.

- **United Nations Environment Programme, Persistent Organic Pollutants page:** [http://www.chem.unep.ch/pops/default.html] A comprehensive resource on international standards, treaties and activity related to POPs.

- **The Basel Convention on the Control of Transboundary Movements of Hazardous Waste and Their Disposal:** http://www.basel.int

- **The Rotterdam Convention on Prior Informed Consent (PIC):** http://www.pic.int
- **The Stockholm Convention on Persistent Organic Pollutants (POPs):** http://www.pops.int
- **The European Union's Environmental Liability Directive and regulatory framework for the Registration, Evaluation and Authorisation of Chemicals (REACH):** http://europa.eu.int/comm/environment/chemicals/reach.htm