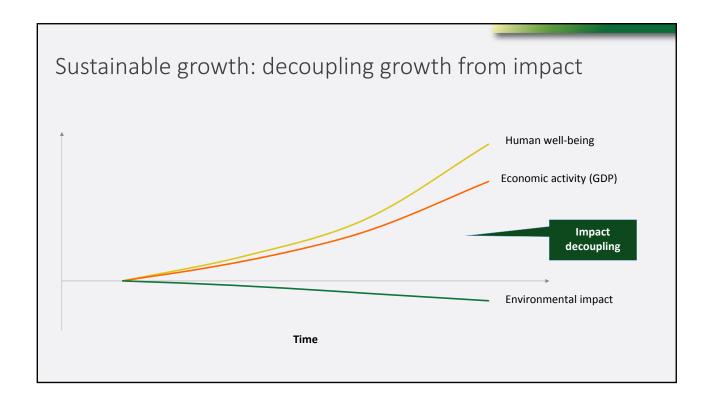


Valuing the economic and natural capital benefits of sustainable palm oil practices

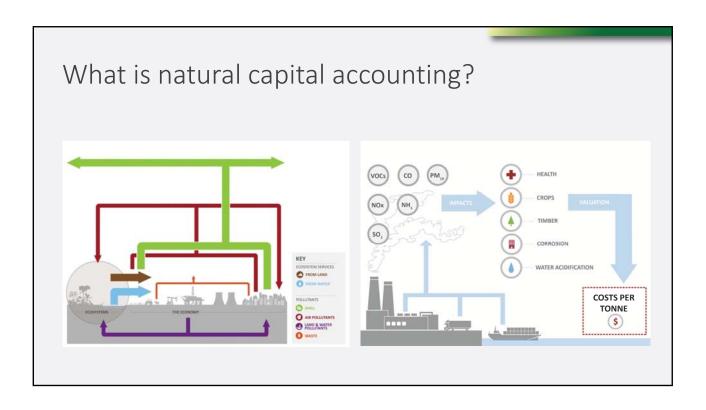


Dr Richard Mattison CEO Trucost

19 November 2014







Application of natural capital accounting

- Understand level of control over environmental impact reduction
- Determine impact materiality
- · Assess environmental trade-offs
- Understand regional risk differences (e.g. Water availability)
- Integrate the results with business metrics
- Communicate the results to a general audience

Communication & reporting

Strategic decision making



How can natural capital accounting help?

Natural capital accounting can help to evaluate the environmental and economic sustainability of palm oil production scenarios. This enables companies to understand the economic and environmental consequences of palm oil production practices, making informed choices that protect profitability and reputations.

Natural capital accounting can help companies to answer questions such as:

- Can sustainable agricultural practices improve yield and financial returns?
- Which countries and regions should we be procuring palm oil from in three/five years?
- What intensification practices have a positive impact on the environment?
- What are the economic and environmental impacts of different expansion practices?

Benefits for palm oil producers

Natural capital accounting helps palm oil producers to:

- Conduct responsible plantation practices
- Manage reputational risk
- Make informed production growth
- Communicate with buyers, investors, NGO's and regulatory stakeholders

Benefits for palm oil producers Increase production output by 100% Intensification option \$500 NATURAL CAPITAL NET PRESENT VALUE (Billion \$) Expansion option \$400 \$300 \$200 What are the Natural Capital and \$100 -\$20 -\$10 Financial Net Present Values of \$30 different agricultural scenarios enabling -\$100 Indonesia to double its production in -\$200 the future? -\$300 -\$400 FINANCIAL NET PRESENT VALUE (Billion \$)

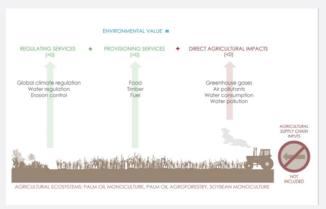
Benefits for palm oil buyers

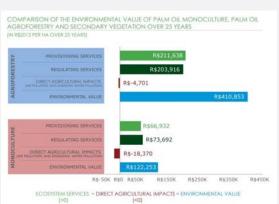
Natural capital accounting helps palm oil buyers to:

- Secure sustainable supply
- Make strategic sourcing decisions
- Manage reputational risk
- Communicate with growers, consumers and other stakeholders

Benefits for palm oil buyers

For Natura, the environmental value associated with single crop, or 'monocultural' production, of palm oil was compared to agroforestry, where the crop is integrated with trees as green manure, cacao and other crops such as passion fruit.





GMO regulation and diffus

ASSETS STRANDED AS PARAGIDM

SHIFTS

Consumer-behaviour or citizen-political change

ASSETS

FUTURE

INVESTMENT PARADIGM

Source: Smith School of Enterprise and the Environment Stranded Assets in Agriculture: Protecting Value from Environment-Related Risks

Biodiversity pressures on ecosystem

Markets

Policy

Culture

Infrastructure

Technology

ASSETS

viruses