Green Growth, Green Economy and the SEEA

statistics for informed decision making
Green economy initiatives

International
• OECD ‘green growth’,
• UN ‘green economy’,
• International Labour Organisation ‘green jobs’

Australia
• Clean Energy initiative,
• Solar Flagships,
• Re-tooling for Climate Change
• Green Building Fund
• Green Car Innovation Fund
‘Green economy’ definition (UN)

'An economy that results in improved human well-being and reduced inequalities over the long term, while not exposing future generations to significant environmental risks and ecological scarcities. It is characterised by substantially increased investments in economic sectors that build on and enhance the earth’s natural capital or reduce ecological scarcities and environmental risks. These investments and policy reforms provide the mechanisms and the financing for the reconfiguration of businesses, infrastructure and institutions and the adoption of sustainable consumption and production processes. Such reconfiguration leads to a higher share of green sectors contributing to GDP, greener jobs, lower energy and resource intensive production, lower waste and pollution and significantly lower greenhouse gas emissions.'
'Green growth is about fostering economic growth and development while ensuring that the quality and quantity of natural assets can continue to provide the environmental services on which our well-being relies. It is also about fostering investment, competition and innovation which will underpin sustained growth and give rise to new economic opportunities.'
Both the green growth and green economy cover:

• Investing in cleaner energy (lower CO2 emissions)
• Investing in natural resource efficient technologies and products
• Sustainable use of natural resources
• Repair and maintenance of natural ecosystems
• Enabling policy settings, including the regulatory environment, taxation and subsidies.
The SEEA and green economy

- Resource efficiencies are shown in hybrid flow accounts (i.e. combining physical and monetary flows) with information on valued added, employment etc.
- Stocks of natural resources are shown in physical and monetary asset accounts
- The green goods and services produced are defined in the Environment Goods and Services Sector (EGSS)
- The goods and services used in environment protection and resource management are identified in environmental protection and resource management expenditure accounts (EPE and RME)
Green economy data for Australia

The ABS currently produces a range of information on aspects of the green economy, including:

- Energy use and energy efficiency by industry and households (Energy Account, Australia - cat. no. 4604.0)
- Water use and water efficiency by industry, household water use per capita (Water Account, Australia - cat. no. 4610.0)
- Land use by industry and households (Pilot Land Account, Great Barrier Reef Region - cat. no. 4609.0.55.001)
- National (monetary) balance sheets including estimates of the value of land, subsoil assets, native standing timber and permissions to use natural resources (Australian National Accounts – cat. no. 5204.0)
- R&D where the intended purpose is to improve environmental outcomes (Research and Experimental Development - cat. no. 8112.0)
Environmental goods and services sector – EGSS

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• Defines the sector businesses that produce goods and services that:
  – ‘Measure, control, restore, prevent, treat, minimise, research and sensitise environmental damages to air, water and soil as well as problems related to waste, noise, biodiversity and landscapes. This includes ‘cleaner’ technologies, goods and services that prevent or minimise pollution.
  – Measure, control, restore, prevent, minimise, research and sensitise resource depletion. This results mainly in resource-efficient technologies, goods and services that minimise the use of natural resources.’ (Emphasis added)

• The scope of environmental goods and services is unclear in some areas e.g. Should the construction or operation of mass transit systems and green certified buildings be included?
Environmental protection expenditure (EPE) is to avoid or minimise the impact of economic activity on the environment – the reduction or elimination of air emissions, the reduction or treatment of waste and wastewater etc.

Resource management (RM) expenditures are aimed at reducing the extraction of natural resources, re-use and recycling, replenishment and general management of natural resources.

Primary purpose criterion (what is the primary purpose of low energy light bulbs?)

Demand-side of EGSS

Valuation differences – extra cost vs full cost

Interpretation – Does rising EPE / RM indicate improvement or regression?
Green jobs can be considered:

- Narrowly as employment in the environmental goods and services sector (the ‘output’ approach),
- More broadly, as employment in occupations where the primary purpose is to make production processes more environmentally efficient for all goods and services (the ‘process’ approach).
- Biggest obstacle is the lack of agreement around meaning and scope of the term ‘green job’
Possible future work at the ABS

• Imports and exports of environmental goods and services
• Environmental R&D and innovation
• Environmental taxes and subsidies
• Integrated Greenhouse gas emissions accounts
• Energy, water and CO2 emissions embodied in final goods and services
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