

Decoupling and Sustainable Resource Management – A South African Perspective

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Introduction

Although the South African Government has systematically increased financial support for scientific research because it is believed that scientific knowledge reinforces development, this self-same community of scientists is generating research that raises very serious doubts about whether South Africa's resource-intensive economic growth path can continue in light of the rapid depletion and degradation of the country's natural resources (see Burns & Weaver 2008).

Global Context

There is a broad global consensus that we face the unprecedented twin challenge created by inter-linked economic and environmental crises. As the economic and environmental crises mutually reinforce one another, decision-makers across the public, private and non-profit sectors in both the developed and developing world intensify demands for practical solutions. A succession of global mainstream assessments over the past decade have together raised very serious questions about the sustainability of a global economic growth model that depends on material flows that have reached – or soon will reach – their natural limits (Barbier 2009; Gleick 2006; Intergovernmental Panel on Climate Change 2007; United Nations Environment Programme 2007; United Nations 2005; Watson *et al* 2008; World Resources Institute 2002; World Wildlife Fund 2008). The crisis of resource depletion and the negative economic implications of climate change have even been recognized by mainstream reviews such as the Stern Report (Stern 2007) which estimated the economic costs of climate change and the International Energy Agency, which finally acknowledged in 2008 that the “era of cheap oil is over” (International Energy Agency 2008).

The International Panel for Sustainable Resource Management (IPSRM) has highlighted the crucial role that material resource flows and associated environmental impacts (see <http://www.unep.fr/scp/rpanel/biofuels.htm>). By resource flows we mean primarily the metabolic flow of fossil fuels, biomass, minerals and metals through the global economy. The focus is on extraction and domestic use of materials quantified in tons. The aim is to analyze the relationship between economic growth and resource use. Material Flow Analysis (MFA) is the methodological tool that is used to conduct this analysis. MFA has matured over the past five years and has become an established method for assessing the sustainability of local, national and global economies (Bringezu & Schutz 2001; Bringezu & Bleischwitz 2009; Bringezu *et al* 2004; Fischer-Kowalski 1998; Fischer-Kowalski 1999; Haberl *et al* 2004; Krausman *et al* 2008; see Krausmann *et al* forthcoming).

Policy and strategic decisions can be made that foster the relative/absolute decoupling of both resource use and impacts in contextually specific ways that reduce the significance of resource limits as a constraint to growth (Swilling *et al* 2010).

Limits of Resource Intensive Growth¹

It is becoming increasingly apparent that key ecological thresholds in South Africa are being breached by its prevailing approach to growth and development, and that this is resulting in dysfunctional economic costs. This condition of rising costs caused by a new set of material, ecologically driven constraints sets the context for new ways of thinking about the country's economic growth model and poverty reduction strategies.

Since the first democratic elections in 1994, South Africa has experienced an unprecedented growth period that came to an end towards the end of 2008. As a resource-rich resource exporting country, South Africa benefited from the rise in commodity prices over the past decade, but suffered as they collapsed temporarily during 2008 as a result of the global financial crisis.

In short, South Africa is a good example of an economy caught up in the financialization of a globalised economy, with debt-driven consumption as the key driver of growth. This has undermined manufacturing as tariff barriers have been lowered and cheap imports from Asia have risen. It has also resulted in debt-financed consumption spending, and increased dependence on revenues from exported primary resources at low prices. The unsustainability of this growth strategy is partially recognised by the Government and key stakeholders, and various interventions are being considered by a wide range of state institutions, including the Department of Environmental Affairs, National Treasury, Department of Trade and Industry, Department of Human Settlements, Department of Energy, Department of Water Affairs, Department of Transport and key financial institutions such as the IDC and DBSA. However, South Africa is a robust constitutional democracy with three layers of Government (National, Regional, Local) that are, in turn, relatively independent from one another. This has resulted in very low levels of intra-governmental co-ordination. Each sector responds to the sustainability challenges in their own way. What is lacking is a government-wide approach that connects industrial policy, resource management strategies and protection of eco-system services. However, 2010 is slated as a key year for consolidating the Green Economy policy framework, which could become the focus of the newly established National Planning Commission. In February 2010, the Cabinet approved a Department of Environmental Affairs document entitled *Proposals on Green Jobs – A South African Transition*. This will be followed up by a comprehensive strategy document called *National Green Economy Strategy* which will be considered at the Cabinet Legotla in July 2010 which is fairly soon after the Green Economy Summit planned for 19-21 May. Both the IDC and DBSA are working together with the Department of Environmental Affairs to work out detailed financial plans for implementing the Green Economy Strategy. In the meantime, the Gauteng Government has adopted what it calls a “Developmental Green Economy Strategy” that is heavily focussed on decoupling by targeting investments in renewable energy, water efficiency, recycling of solid and liquid wastes, moving people into public transport and massively increasing locally produced food to improve food security and create jobs.

¹ This section is based primarily, but not exclusively, on background research materials commissioned to inform the writing of the National Framework for Sustainable Development that was adopted by Cabinet in June 2008. The materials were circulated publicly and most are available on www.deat.gov.za. The commissioned research papers are referenced in the subheadings that follow, and additional research integrated where necessary. Because this section relies quite heavily on these papers, they are not specifically referenced in detail. The supporting research and backup references can be found in these commissioned papers.

Conclusion

The dominant economic paradigm in post-apartheid South Africa has to date failed to address a wide range of underlying resource constraints that will almost certainly undermine many preconditions for growth and development. The body of evidence that has emerged over the past decade at both the global level and within South Africa clearly demonstrates that there are very serious material resource and ecological limits to the type of growth and poverty eradication policies that are proposed by economic policy think-tanks such as the Growth and Development Commission (that the Minister of Finance so admires). With significant exceptions, growth models have not emphasized the need for decoupling growth rates from rates of resource consumption and associated declining quality of the environmental systems that we depend on for things like clean air, productive soils, and clean water. Reversing this trend will require policy frameworks and interventions that are currently absent from national economic policy documents but which are slowly starting to emerge, with 2010 clearly set to be a watershed year. However, it is one thing to formulate policy; it is a very different matter when it comes to implementation through inter-institutional coordination, budget reform and regulatory interventions. Like many other policy realms, the South African state's capacity to formulate policies is not matched by its capacity to implement these policies.

There is broad consensus around two economic and social challenges for South Africa's second decade of democracy:

- how to boost growth to 6% and ensure a more equitable distribution of wealth;
- how to eradicate poverty, with special reference to the Millennium Development Goals.

The sustainability perspective means there now is a third challenge, and due to the adoption of the NFSD and LTMS, this is being recognised:

- how to decouple growth rates and poverty eradication from rising levels of natural resource use and waste.

Many of South Africa's leading scientists have for some time been saying that economic growth policies are premised on incorrect assumptions about the health and durability of our natural resources and eco-system services. Aligning economic policy with Section 24 (b) of the Constitution is not simply about preserving the environment. As other countries have experienced, it is also about preventing wasteful expenditures on avoidable system failures. But above all, it can also be about the creation of new opportunities for driving non-material forms of growth that improve quality of life for all, forever.

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