

Whither Sustainable Mining in Guyana?



by

Paulette Bynoe, PhD

International Conference on Sustainable Development
of Natural Resources Management in Africa

5-7 December 2011

University of Ghana

Accra

OUTLINE OF PRESENTATION

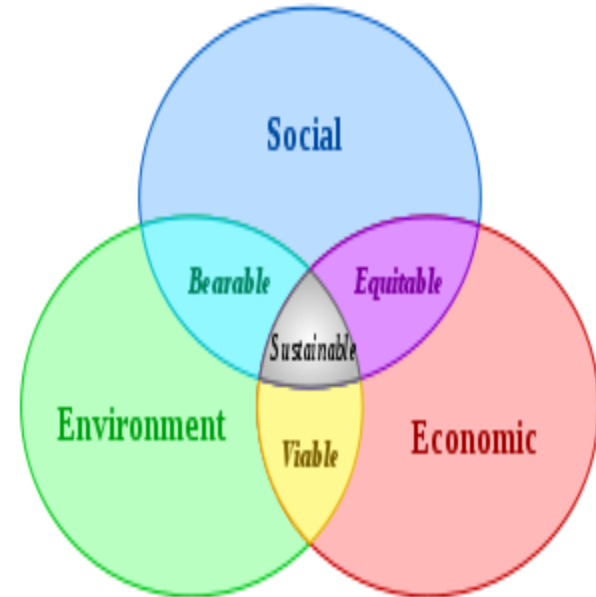
- Demystifying Sustainability and Sustainable mining
- Guyana : A Brief Overview
- Small and Medium Scale Gold Mining in Guyana
- Gold Mining and Sustainability in Guyana: Critical Issues
- Governance Systems for Mining
- Challenges
- Lessons Learnt
- The Way Forward

DEMYSTIFYING SUSTAINABILITY AND SUSTAINABLE MINING

- Mining is given a critical role in economic growth and development of countries with significant mining potential.
- Since 1992 (Rio Summit) increasing attention given to mining activities and their environmental and social impacts: Mining effects environmental and social change regardless of geographic location.
- Global call for a strategic shift in support of improved social, developmental and environmental performance by the mining industry.

DEMYSTIFYING SUSTAINABILITY AND SUSTAINABLE MINING

- **What is sustainable development?**
 - IUCN/UNEP/WWF (1980) World Conservation Strategy focused on conservation of the natural environment..
 - The Brundtland Commission Report (1987): SD is development that meets the needs of the present, without comprising the ability of future generations to meet their own needs...it contains two key concepts: **the essentials needs of the world's poor and the idea of limitations imposed by technology and social organisation.**



DEMYSTIFYING SUSTAINABILITY AND SUSTAINABLE MINING

What is sustainable mining?

- Exploitation of non-renewable resources such as minerals reduces their stock available for future generations’.
- This does not mean minerals should not be used, rather, the search for acceptable substitutes is encouraged. **Technology** should be used to minimise depletion, lessen ecological footprints related to carbon, water etc. (Brundtland Commission, 1987).

GUYANA: A BRIEF OVERVIEW

Location: NE Coastline of South America

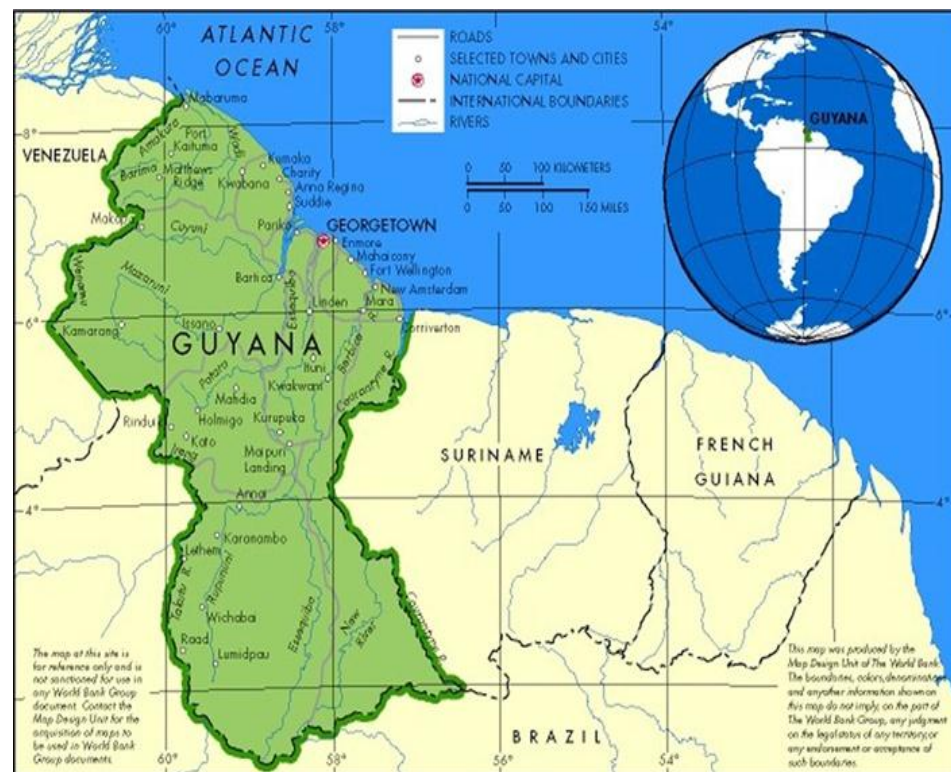
Area: Approx. 215,000 sq. kms

Population: 754,493 (2010 est.)

Main Exports: Gold, sugar, rice, timber and bauxite.

External debt: increased by 12% (approx. 64% of GDP)
\$US933 million in 2009

Source: ECLAC, 2009



GUYANA: A BRIEF OVERVIEW

Mining:

- accounts for 10.5% GDP
- foreign exchange earnings (US\$ 891.9 million in 2010, and gold (only) US\$346.4 million in 2010)
- employs about 10% of Guyana labour force



Source: Ministry of
Finance, 2011

SMALL AND MEDIUM SCALE GOLD MINING IN GUYANA

Guyana Mining Act (1989) Act defines a medium scale mine as one with property size of between 150 to 1200 acres,

Small scale mine has size of a land claim fixed at 27.5 acres.

Other factors: investment, labour force and crude ore production annual sale



SMALL AND MEDIUM SCALE GOLD MINING IN GUYANA

- Increasing as a livelihood activity (income and better quality of life)
- A total of 339 active dredges in the 6 mining districts were registered in 2009; in 2010 this total by 40.4% (Guyana Geology and Mines Commission Register, 2011).
- In 2009 small and medium size miners exceeded projections of 257, 503 ounces of gold by declaring 305,178
- Figure represented a 17.2 percent increase over 2008 figure.



SUSTAINABILITY ISSUES

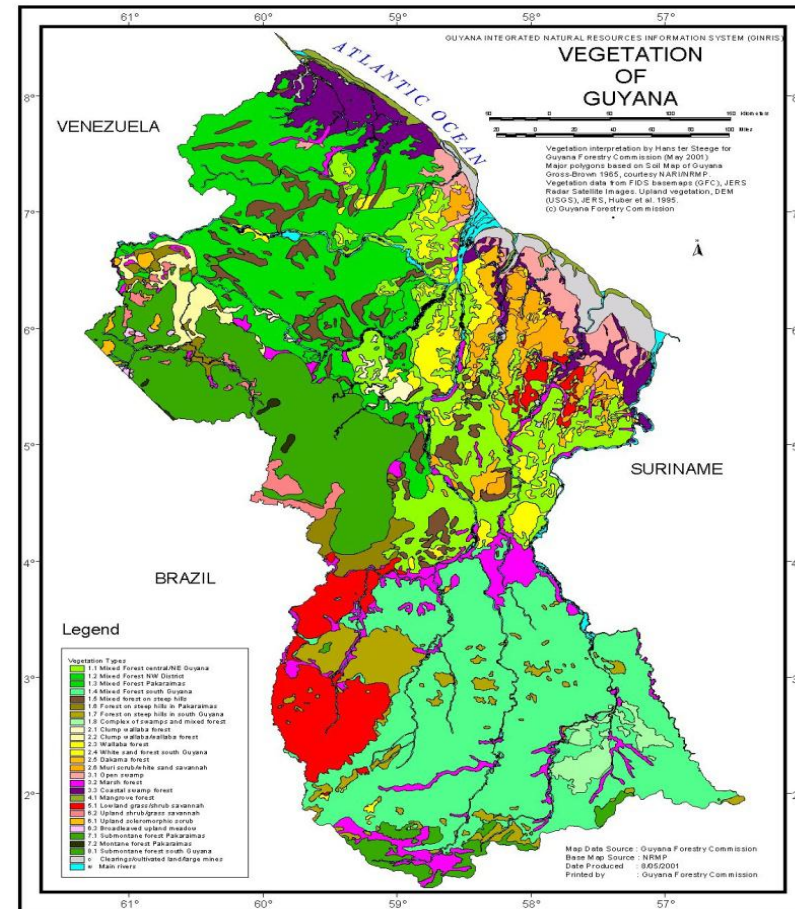


Sustainability Issues



GUYANA'S LOW CARBON DEVELOPMENT STRATEGY

- Forest: 77.2% per cent of the country (152,050 km²)
- Standing forest: Guyana 's commitment to tackle global warming.
- Avoided deforestation in Guyana could bring for the world avoided emissions of greenhouse gases the equivalent of 1.5 gigatons of CO₂e by 2020.



GUYANA'S LOW CARBON DEVELOPMENT STRATEGY

- Guyana has charted an economically rational“ deforestation path that involves reducing forest cover by approximately 4.3 percent (630,000 ha) per annum over 25 years .
- Guyana signed MOU with Norway for US\$250 million over 5 years period: based on conditions including system of MRV



PROMISE



THREAT: 91% of deforestation leveled at mining: 02 % to 0.6 % since 2009.



SUSTAINABILITY ISSUES



- Miners have protested against restrictions on tree felling proposed by the GoG.
- BBC News Article on “How Guyana Gold Mining Threatens its Green Future” (26 November 2011) notes that “ mining threatens what could be the greatest asset for Guyana-its pristine rainforests.

SUSTAINABILITY ISSUES

- Some downstream Amerindian communities have been denied access to potable water supply due to mismanagement of tailings etc.
- Elementary exposure to mercury
- Proliferation of malaria due to large stagnant flooded pits.
- Very little community benefits
- Exploitation regarding remuneration for labour
- Dispossession of lands for sustenance and livelihoods.

ENVIRONMENTAL GOVERNANCE SYSTEMS

Organisational Setting

- Guyana Gold Board
- Guyana Geology and Mines Commission
- Environmental Protection Agency
- Guyana Gold and Diamond Miners Association

- Others include Guyana Forestry Commission, Guyana Lands and Survey Commission and Ministry of Amerindian Affairs.

Issues

- Duplication and overlapping functions

- Limited capacity (financial, human, material resources) to carry out mandate

- Low level of awareness and training

ENVIRONMENTAL GOVERNANCE SYSTEMS

- Environmental Rights in the Guyana Constitution
- National Environmental Action Plan (NEAP) of 2001-2005
- Land Use Policy (Draft), 2005
- National Action Plan for Combating Land Degradation
- Environmental Protection Act, 1996

ENVIRONMENTAL GOVERNANCE SYSTEMS

SECTOR

- The Mining Act (No. 20 of 1989)
- The Mining (Amendment) Regulations 2005
 - Exploration Disturbance
 - Mining Excavation
 - Deforestation
 - Removal of Top Soil
 - Tailings Pond
 - Use of and handling of mercury
 - **Reclamation Fee/Environmental Bond**
 - Contingency, Emergency Response and Clean up Plans

CHALLENGES

- Monitoring and for enforcement and compliance
- Reclamation
- Low Carbon Development Strategy
- Research
- Extension of Amerindian Lands
- Accessibility to new areas
- Capacity building



LESSONS

- Sustainability itself is a very complex issue. Achievement of only one element can undermine the achievement of another, due to an imbalance in policy development. **IT IS WORK IN PROGRESS.**
- Poverty cannot be the socio-economic baseline scenario for sustainability: Poverty itself is an environmental pollutant .
- **Institutional capacity building** is key to enforcement of legislation
- Information and training must be given a greater role in the sustainable development of the sector: Miners' understanding is risk is a critical factor.

LESSONS

- **DECISION MAKING:** Pressure to save forest to mitigate climate change and role of mining in national development. Investment flows from other economic activities must be guaranteed before REDD Plus policy decisions are finalised. **NEED for SEA**
- **SUSTAINABILITY is about also about people** and requires a social engagement process with local communities as well as a functional dispute resolution mechanism to ensure human rights and justice are upheld.

LESSONS

- **PROLIFERATION OF SMALL SCALE MINING ACTIVITIES:** Governments cannot afford to neglect small scale mining sector.
- **CLARIFICATION OF TENURE RIGHTS:** a priority
- **RESEARCH:** environmental friendly, low cost technologies

THE WAY FORWARD

- INSTITUTIONAL CAPACITY BUILDING
- INTEGRATION OF SMALL SCALE GOLD MINING IN NATIONAL DEVELOPMENT PLANNING
- INCREASED TRAINING OPPORTUNITIES
- LAND INFORMATION SYSTEMS TO INFORM DECISION MAKING CONCERNING ALLOCATION OF LANDS

THE WAY FORWARD

- APPROPRIATE EMS FOR PROCEDURAL BASE
- TARGETED PUBLIC AWARENESS, EDUCATION AND TRAINING PROGRAMMES FOR MINERS

THANKS FOR LISTENING

paulette.bynoe@uog.edu.gy

bynoep2000@yahoo.com