Gauteng Provincial Integrated Waste Management Policy

Gauteng Department of Agriculture, Conservation and Environment

September 2006
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<td>Small, medium and micro enterprises</td>
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<td>WDCS</td>
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Definitions

**Best Practicable Environmental Option:** The outcome of a systematic and consultative decision-making procedure. The option that provides the most benefit and the least damage to the environment (across air, water and land) as a whole, at acceptable cost, in the long term as well as in the short term.

**Best Practice:** Process, technique, or innovative use of technology, equipment or resources that has a proven record of success in providing significant improvement in cost, schedule, quality, performance, safety, environment, or other measurable factors which impact on an organisation.

**Best Value Performance Indicators:** A set of performance measures that can be used to analyse a range of services within the application of waste management. It provides the public and local and central government with a means of monitoring, analysing and comparing the achievements of role players in terms of waste management principles.

**Best Value Services:** The concept of “best value” provides a framework for the planning, delivery and continuous improvement of services. The overriding purpose is to establish a culture of good management for the delivery of efficient, effective and economical services that meet the users’ needs. It is based on applying the four C’s to all services. These are to:

- challenge how, why and by whom they provide a service
- compare performance with other councils
- consult those using the service; and
- use competition to ensure the best service possible

**Co-mingled collection programmes:** Co-mingled waste is unsorted waste. Collection programmes that involve this are kerbside collection schemes where all the dry recyclable materials from a household are collected mixed.

**Cleaner Production:** A tool to get waste avoidance, e.g. through product design, engineering and processes.

**Duty-of-care principle:** Any person handling or managing hazardous substances or related equipment is ethically responsible for applying the utmost care.

**Full cost accounting:** A tool to identify, quantify and allocate the direct and indirect environmental costs of ongoing company operations. Full cost accounting helps identify and qualify the following four types of costs for a product, process or project: direct costs, hidden costs, contingent liability costs, and less tangible costs.
**Green Procurement:** The selection by an organisation of products and services that have reduced environmental impacts.

**Illegal waste dumps:** Waste sites that are not formalised and permitted according to local and/or provincial or national legislation.

**Integrated Environmental Management:** Aims to ensure efficient and effective:

- administration, implementation and enforcement of constitutional and statutory environmental obligations to ensure that development is environmentally sustainable
- develop, implement, enforce and improve systems, projects and programmes, which support the exercise of statutory obligations; and
- policies, directives and manuals in support of environmental planning are in place.

**Landfill:** Area of land set aside for the deposition of general waste, whether it be by filling in of excavations or the creation of a landfill above ground, where the word ‘fill’ is used in the engineering sense.

**Logical Framework Approach:** A structured 3-tier approach towards strategic planning that includes the listing of aims, objectives and action plans, along with measurable and verifiable indicators, responsibilities, resource requirements, and assumptions and limitations.

**Minimum Requirements:** Refers to the Minimum Requirements series of documents relating to the handling, classification, treatment and disposal of general and hazardous waste, published by DWAF in 1998 and updated from time to time.

**Policy:** Provides guidance for legislation and administration. does not refer to the development of implementation plans; does not refer to operational issues; does not define roles and responsibilities.

**Polluter Pays Principle:** The Polluter Pays Principle is a principle in international environmental law where the polluting party pays for the damage done to the natural environment.

**Precautionary Principle:** The precautionary principle permits a lower level of proof of harm to be used in policy-making whenever the consequences of waiting for higher levels of proof may be very costly and/or irreversible:

- Where a risk is unknown; the assumption of the worst case situation and the making of a provision for such a situation; and
- Principle adopted by the United Nations Conference on the Environment and Development (1992) that, in order to protect the environment, a precautionary approach should be widely applied, meaning that where there are threats of serious or irreversible damage to the environment, lack of full scientific certainty should not be used as a reason for postponing cost-effective measures to prevent environmental degradation.
Risk: The scientific judgement of probability of harm, while taking into account the hazard, vulnerability and manageability.

Significant: Factors or considerations are termed significant when they are important, because they are of consequence. For example, they will have a detectable influence on a process, the environment or the end result.

Sustainable Consumption: The use of goods and services that satisfy basic needs and improve quality of life while minimising the use of irreplaceable natural resources and the by-products of toxic materials, waste and pollution.

Waste: According to the Environment Conservation Act, 1989 (Act 73 of 1989), waste is defined as:

“All matter, whether gaseous, liquid or solid or any combination thereof, which is from time to time designated by the Minister by notice in the Gazette as an undesirable or superfluous by-product, emission, residue or remainder of any process or activity”.

In Government Notice No. 1986 (in Government Gazette No. 12703 of 24 August 1990), as amended by Government Notice No. 292 (in Government Gazette No. 24983 of 28 February 2003), the following are defined by the Minister as waste:

“All matter, gaseous, liquid or solid or any combination thereof, originating from any residential, commercial or industrial area, which:

(a) is discarded by any person; or

(b) is accumulated and stored by any person with the purpose of eventually discarding it with or without prior treatment connected with the discarding thereof; or

(c) is building rubble used for filling or levelling purposes; or

(d) is stored by any person with the purpose of recycling, re-using or extracting a usable product from such matter”

Certain matter is excluded from the above, as per Government Notice No. 1986 and Government Notice No. 292.

In future, this definition will be superseded by definitions prescribed by relevant national legislation.

Waste Classification: The classification of waste as per the National Waste Management Strategy of South Africa. Regulations on waste classification are to be drafted in terms of Section 24 of the Environment Conservation Act, or within new IP&WM/WIS legislation based on inter alia the DWAF Minimum Requirements.
**Waste Discharge Charge System:** This does not necessarily refer to the system as implemented through catchment management principles in terms of the National Water Act, 1998 (Act 36 of 1998), and can be applied to air quality and land-based waste streams as well.

**Waste Exchange:** The activity that takes place when waste is exchanged between waste management organisations or authorities, in order for it to be of mutual benefit to both parties. Waste from one could even be raw materials for the other.

**Waste Generator:** Please refer to the definition in the National Waste Management Strategy.

**Waste Generation:** The weight or volume of materials and products that enter any given waste stream before recycling, composting, land filling or combustion takes place. Can also represent the amount of waste generated by a given source or category of sources.

**Waste Hierarchy:**

- **Avoidance:** Preventing waste generation altogether (i.e. zero waste generation);
- **Recycle:** The process of collecting, sorting, cleansing, treating, and reconstituting materials that would otherwise become solid waste, and returning them to the economic mainstream in the form of raw material for new, reused, or reconstituted products which meet the quality standards necessary for them to be used in the marketplace;
- **Reduce:** Source reduction, often called waste minimisation, means consuming and throwing away less. It encompasses any action undertaken by an individual or organization to eliminate or reduce the amount or toxicity of materials before they enter the municipal solid waste stream. This action is intended to conserve resources, promote efficiency and reduce pollution. Source reduction includes composting, purchasing durable, long-lasting goods, and seeking products and packaging that are as free of toxic compounds as possible. It can be as complex as redesigning a product to use fewer raw materials in production, have a longer life, or be used again after its original use is completed. Because source reduction actually prevents the generation of waste in the first place, it is the most preferred method of waste management and goes a long way toward protecting the environment and supporting sustainable development;
- **Reuse / recover:** The recovery or reapplication of a package or product for uses similar or identical to its originally intended application, without manufacturing or preparation processes that significantly alter the original package or product. Recovery can also refer to the recovery of energy from waste;
- **Minimisation:** Simple strategic reduction of waste at source, through improved manufacturing methodologies, more careful work procedures, and revised and improved product specifications. Waste minimisation is a broader term than prevention. Waste prevention covers ‘prevention’, ‘reduction at source’ and ‘re-use of products’. Waste minimisation, however, also includes the waste management measures ‘quality improvements’ and ‘recycling’.
**Waste Information System:** A computerised database containing information about waste management organisations and agencies, as directed to be established as part of the implementation of the National Waste Management Strategy of South Africa.

**Waste Manifest System:** A formalised process of waste management, and can include programmes that are used to store, edit and report on waste handling and transportation. It is a set of forms, reports, and procedures designed to seamlessly track waste from the time it leaves the generator facility where it was produced, until it reaches the off-site waste management facility that will store, treat, or dispose of the waste. The system should allow the waste generator to verify that its waste has been properly delivered, and that no waste has been lost or unaccounted for in the process.

**Waste Minimisation Club:** A Waste Minimisation Club is where businesses in a particular geographic area, group together to negotiate better terms/services from waste contractors. The Club may also share facilities, and equipment and exchange waste items that may be of use to another business. The focus should eventually lead to waste minimisation efforts being put in place by the businesses.

**Waste Transporter:** Refer to the definition as per the National Road Traffic Act, 1996 (Act 93 of 1996).

**Waste Stream:** The total flow of waste falling under a particular waste category from activity areas, businesses units, and operations that is recovered, recycled, reused, or disposed of in landfills e.g. domestic waste, hydrocarbon waste, etc.
Gauteng
Integrated Waste Management Policy

Introduction

_Gauteng IWM Policy Motivating Imperatives_

‘Everyone has the right to an environment that is not harmful to their health and well being’

_(The Constitution, 1996),_

‘Everyone has the right to have the environment protected, for the benefit of present and future generations, through reasonable legislative and other measures’

_(The National Environmental Management Act, 1998)._

Recognising that inadequate or inappropriate waste management presents a threat to both human health and environmental protection, Government published, in 1999, a National Waste Management Strategy (NWMS) which presents a long-term plan for addressing key issues, needs and problems experienced with waste management in South Africa. The NWMS translates into action Government’s policy on waste as set out in the White Paper on Integrated Pollution and Waste Management for South Africa (2000).

The objective of Government is to move away from fragmented and uncoordinated waste management to integrated waste management (IWM). Such a holistic and integrated approach extends over the entire waste cycle, from cradle to grave, covering the avoidance, reduction, generation, collection, transport, recovery, recycling, reuse, treatment and final disposal of waste, with an emphasis on waste avoidance and minimisation.

Stricter national environmental legislation, complimenting the international drive towards increased environmental awareness during the last decade, has resulted in a need for the adoption of improved waste management practices. Environmentally sound and sustainable waste management is recognised as essential to minimise and manage the risk to human health, and the risks of environmental pollution and the depletion of South Africa’s valuable non-renewable resources. An environmentally sound and sustainable waste management approach would include the preparation and implementation of environmental instruments, waste management principles and requirements in national and provincial legislation, the Polluter Pays Principle, and appropriate incentives and penalties.

The forthcoming National IWM Bill will provide an overarching framework for the management of both general and hazardous waste in a manner that both reduces the scale of the country’s waste problem, as well as ensuring that health and safety issues are satisfactorily addressed.

Gauteng, as the Province with the greatest industrial and population density, inherently generates the greatest amount of waste, including hazardous waste, and consequently has a significant need to develop, and apply, an appropriate IWM policy that will ensure that waste is recognised as a serious problem and is managed in an effective and integrated manner to preserve human health and the environment, both presently and for the generations to come.

A process to develop such a policy was therefore initiated. During the stakeholder consultation phase of the process which took place in 2005 and 2006, it was clear that waste issues, problems and needs which were identified as part of the Situation/Baseline Analysis Phase of the NWMS were considered by stakeholders to still be relevant in Gauteng.

The Gauteng IWM Policy which resulted from this process forms the foundation for addressing the waste issues, problems and needs of the Province and serves to inform the Gauteng public and government agencies (in the provincial sphere) of the objectives that the Gauteng Provincial Government (GPG) has identified for integrated waste management.

The Gauteng IWM Policy further serves as a means by which the objectives of the Constitution, 1996 (Act 108 of 1996), the NEMA, the National Water Act, the NWMS, the National Environmental Management: Air Quality Act, the forthcoming National IWM Bill etc. can be enabled in Gauteng.

**Gauteng Provincial Government Vision**

The vision of the GPG for 2014 is a commitment to contributing to the national effort to:

- halve unemployment through ensuring high levels of labour absorption, and economic growth contributing to reduced inequality and the development of our Province, nation and continent; and

- halve poverty through growing secure and prosperous communities with jobs, schools, clinics and other services in a safe and healthy environment which supports active social, cultural and volunteer activities.
The GPG is committed to building a Province where:

- the people are healthy, skilled and productive;
- the government is caring and responsive to the needs of its citizens; and
- citizenship and democracy is deepened.

These statements form the basis of the mission and vision of the Gauteng Department of Agriculture, Conservation and Environment (GDACE) and of the Gauteng IWM Policy which is presented in this document.

**GDACE Vision and Mission**

The vision and mission of GDACE, as per the Strategic Plan for 2004 – 2009, is as follows:

- Vision: Leaders in natural resource management
- Mission: To provide an integrated provincial management system for sustainable utilisation of natural resources towards quality of life for all

**Co-operative governance**

As per the GDACE Strategic Plan for 2004 - 2009, the functional responsibilities of the Department include a range of responsibilities that are concurrent with those of National and Local Government. The Department attaches great importance to the harmonisation of relationships and the management of potentially conflicting mandates with other organs of state at national, provincial and local level.

**Goal of the Gauteng IWM Policy**

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*Goal of the Gauteng IWM Policy*

The overall goal of the development of an IWM Policy for Gauteng is to set out the vision, principles and strategic goals and objectives that the GPG will apply to achieve integrated and environmentally-sustainable waste management in the Province, thereby ensuring that its obligations and duties in terms of the South African Constitution and other relevant requirements are effected.

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The Gauteng IWM Policy therefore provides the foundation for meeting the objectives of the NEMA at provincial level and to provide for co-operative environmental governance by establishing decision-making principles on matters affecting the environment including the following:

- Sustainable Development;
- Integrated Environmental Management using the Best Practicable Environmental Option (BPEO);
- the Polluter Pays Principle;
- the Cradle to Grave Responsibility;
- the Precautionary Principle; and
- the involvement of Interested and Affected Parties (IAPs) and stakeholders in environmental decision-making.

The Gauteng IWM Policy embraces all sectors of society of Gauteng and each objective is to be applied to all waste generators, waste managers and waste service providers in all sectors, including, but not limited to, (i) Provincial and Local Government, (ii) industry and commerce, (iii) agriculture, (iv) mining and power generation, (v) the military, and (vi) residents of, and visitors to, Gauteng.

The Gauteng IWM Policy is seen as part of a series of co-ordinated efforts by the GPG to improve the management of waste in the Province. The Policy will be implemented in part through action plans and business plans developed by the GPG.

The objectives of the GPG for IWM are presented below.

**Objective 1: Integrated Waste Management Planning**

The NWMS presents a long-term plan for addressing key issues, needs and problems experienced with waste management in South Africa. It also identifies the roles and responsibilities of National, Provincial and Local Government that arise out of the adoption of an integrated waste management approach.

Local Government is already obliged – industry will shortly have the same obligations too – to develop IWM Plans for consideration by Provincial Government. This is in order to ensure the effective integration and optimisation across Provinces of appropriate waste management services to address needs and problems holistically.

The GPG embraces an integrated approach to waste management planning, which will provide the desired move away from fragmented and uncoordinated waste management to coordinated, effective
and appropriate waste management. This approach provides for integrated planning over the entire waste life-cycle, from cradle to grave, whilst applying the Precautionary and Polluter Pays Principles. This includes – but is not limited to – the generation, avoidance, reduction, collection, transport, recovery, recycling, reuse, treatment and final disposal of waste (including waste facility siting), with an emphasis on waste avoidance and minimisation.

The GPG recognises that one cannot manage something that is not measured. The starting point of effective IWM is therefore the identification of the key issues, needs and problems being experienced, and the prioritisation of waste streams. This includes the collection, collation and interpretation of adequate and representative information on the amounts of waste being generated and managed in the Province (as well as entering and leaving the Province), the type (classification) of the waste, the level of waste management service and environmental protection provided, according to prioritised waste streams. The research should also identify instances of inappropriate waste management practices and calculate the risk that this imparts. The above-mentioned activities need to take place according to agreed national and provincial requirements.

It is further recognised that the above-mentioned activities require appropriate resources in manpower and economics, supported by appropriate enabling and supporting legislation, close co-operation between Provincial and Local Government, and stakeholder participation.

**Objective 2: Roles and Responsibilities**

The GPG recognises the need for a clear definition of the roles and responsibilities of National, Provincial and Local Government, and industry and other stakeholders. These roles and responsibilities are directly linked to those that are defined for each of these role players in the Constitution and other relevant legislation. In essence the GPG is committed to providing leadership, guidelines and support to Local Government, industry and other waste role players with regards to waste management.

In particular, all waste role players, particularly Local Government and industry, are expected to accommodate necessary capacity-building, education and awareness-training, as well as job creation initiatives and associated funding thereof, within their own IWM Plans.

In line with the fact that the predominant responsibility for waste service provision lies with Local Government, it is expected that the enforcement of aspects such as the Polluter Pays Principle will be undertaken primarily by Local Government, as far as is practicable, for which contingency should be made in Local Government IWM Plans and financing.

The GPG encourages partnerships between all spheres of government to coordinate national, provincial, and local planning efforts and to find the best practicable, environmentally safe and equitable solutions to waste management problems.
Objective 3: Waste Information Management

3.1 Waste information

The GPG recognises the need for the collection and dissemination of accurate waste information by each Local Government in the Province and all waste role players, for purposes of the National Waste Information System (WIS) that is being implemented in terms of the NWMS. Minimum reporting requirements have been established for Provincial and Local Government and it is the responsibility of Provincial Government to ensure that these are applied.

The National WIS Framework Document was approved by the Director General of the Department of Environmental Affairs and Tourism on 2 June 2005. This document details the requirements of the National WIS, in particular the data requirements of Local Government, private waste contractors, their roles and responsibilities, and expected time frames for implementation.

The GPG promulgated Waste Information Regulations in 2004 for the development of a Provincial WIS to:

(a) enable GDACE to compile and make available – to the public and other organs of state – data and information regarding waste in the Province, so as to further the protection of the environment and the continuous improvement of integrated waste management throughout the Province;

(b) make information available to organs of state and the public regarding waste for:
   i) education, research and development
   ii) spatial planning and environmental impact assessment
   iii) public safety and disaster management
   iv) the development of waste streaming and the assessment of the quantities of various waste streams for monitoring government strategies with regard to waste management and
   v) state of the environment reporting; and

(c) to create a uniform reporting method which incorporates secure internet reporting formats and monitoring intervals.

In terms of national policy, all waste is required to be reused, recovered or disposed of at a registered landfill or other registered waste disposal, treatment or recycling facility. Waste must be managed according to the principles of international treaties to which South Africa is signatory, including the Basel Convention with respect to the trans-boundary transportation of hazardous waste.

Ultimately, waste information management will be applied to the entire waste hierarchy.
3.2 Definition of waste

For the purposes of the Gauteng IWM Policy, the definition of waste as found in the Environment Conservation Act, 1989 (Act 73 of 1989) and the relevant Government Gazette is to be used. In future, the definition prescribed by relevant national legislation will prevail for the purposes of this policy. The National Waste Classification System will be used as the foundation for all waste classification in the Province.

Recognising that, in some cases, a waste stream may be considered as a resource for recovery and reuse or recycling purposes, including the generation of energy, the GPG embraces a system of classification of waste that facilitates the separation at source of different waste types.

3.3 Waste manifest system

The GPG embraces the implementation of a Waste Manifest System, on the basis of the requirements of a Provincial WIS, to track waste from the time it leaves the generator where it was produced, until it is recovered and reaches the waste management facility that will store, reuse, recycle, treat or dispose of the waste. The manifest system should also be used within all on-site waste management facilities to ensure proof of safe disposal for auditing and verification purposes. Thresholds will be set for use with the manifest system.

The Waste Manifest System will require the registration of all waste generators and transporters, as per action plans to be developed at provincial level. The GPG will develop these action plans based on prioritised waste streams, in conjunction with other legislation and regulations. This system should consist of appropriate standardised manifest forms, reports and procedures that allow the waste generator to verify that its waste has been properly delivered, processed and ultimately disposed of or recycled, and that no waste has been lost or unaccounted for in the process.

Objective 4: Institutional Development

4.1 Lead agent for IWM

The GPG recognises the role of GDACE as the lead agent, with the close cooperation of, but not limited to:

- the Department of Minerals and Energy (DME), especially with respect to mining and power generation waste aspects;
- the Department of Water Affairs and Forestry (DWAF) in terms of water resources environmental issues;
- the Department of Health (DoH) in terms of health care risk waste (HCRW);
• the Department of Provincial and Local Government (DPLG) with regards to the provision of basic services; and

• the Department of Transport (DoT) with respect to waste transportation.

GDACE is mandated responsibility to facilitate sustainable waste management for the Province, and to facilitate the implementation of national policies at the Provincial and Local Government and industry level.

4.2 Organisational design

The GPG embraces the formalisation of organisational design by GDACE as well as by Local Government. The organisational designs of each should follow a similar model to promote uniformity and ease of use, and to ensure that managers can co-operate with each other effectively.

The broad framework for IWM service provision is provided at the level of Local Government in an IWM Plan. The GPG embraces effective waste management planning through close working relationships and a full exchange of information between Local Governments in the Province, and between Departments at the provincial and national levels.

4.3 Best practice models

The GPG requires the implementation of appropriate best practice models by Local Government for the management and functioning of all waste management service-related issues in an effective, co-ordinated and integrated manner to foster cost-effective, appropriate and sustainable service provision to the residents of the Province, including the public, and industrial and institutional entities.

The GPG recognises the adoption of planning principles such as that of the Logical Framework Approach (LFA) – as applied in the development of the NWMS – for waste management planning, service provision, needs assessments, and the encouragement of effective IWM for the Province. The adoption of such common decision-making tools in all spheres of government will provide standardisation in approach, support equity in decision-making, and ensure that targets can be easily tracked.

In line with international practice, it is the intention that the GPG will establish appropriate and achievable targets for improved waste management service provision, and will work with Local Government and all waste role-players to ensure that appropriate best-value services can be provided, that failure to deliver best-value services is minimised, and that interventions will be the exception.

In the enabling of the Gauteng IWM Policy, appropriate Best Value Performance Indicators (BVPIs) for non-municipal waste service provision will be developed to monitor the performance of industries and agriculture with respect to IWM.
The GPG recognises the need for the setting of targets for waste minimisation, recovery, reuse and recycling – taking account of the NWMS – and recognising that waste minimisation and recycling will be a priority wherever practicable. The targets should also take into account associated waste management initiatives and regulations as may become necessary.

BVPIs will be monitored and reviewed predominantly to achieve improvements in service delivery, as opposed to tackling procedural failures. Similarly, in line with international practices, BVPIs will be applied in the development of appropriate environmental and service indicators such as those utilised in the drafting of State of the Environment Reports (SoERs) by Local, Provincial and National Government.

**Objective 5: Capacity-building**

This policy item should be read in conjunction with policy item 2, regarding Provincial Government support to Local Government.

**5.1 Job creation**

The GPG recognises the need for the implementation of waste management systems and services by Local Government, waste service providers, industry and the private sector, with the intention of creating jobs for unemployed members of their communities, and also because they may provide opportunities for small, medium and micro enterprises (SMMEs) in waste management service provision.

The intention is to create jobs by design, that is, to promote the implementation of waste management practices, procedures and processes that increase job creation potential.

It is furthermore recognised that jobs are not created only through recovery and recycling processes, but also within other elements of the waste hierarchy, such as waste minimisation, waste avoidance and waste collection.

**5.2 Technical recruitment and training**

**5.2.1 Government**

The GPG recognises the need for the recruitment, training and selection of staff to positions identified in the NWMS Action Plan for Capacity Building, Education, Awareness and Communication (1999). The GPG recognises that the recruitment of additional staff or the development of additional skills may be necessary at local and provincial level if the implementation of the NWMS is to be successful. The GPG will, where possible, assist Local Government in this regard.
Training should include, but not be limited to, waste management principles, waste management technological options, pollution control and cleaner technology, recovery, recycling and reuse initiatives, best value services and BVPIs.

5.2.2 Other sectors

The GPG encourages capacity-building and education on IWM within primary, secondary and tertiary education, non-governmental organisations (NGOs), communities and industry, whether presently affected by poor waste management service provision or not. This is aimed at improving appreciation of the GPG’s waste management objectives and policies, and of the National Government’s strategy with respect to the waste management hierarchy and environmental commitments.

5.2.3 Education

The GPG recognises the need for comprehensive education programmes on the need for IWM and public responsibility to encourage waste avoidance, substitution, minimisation, recovery, reuse and recycling. These programmes should involve, for example, the media, industry, business, labour organisations, government, schools and tertiary education institutions. These programmes will be developed through cooperation between the GPG and relevant educators.

5.2.4 Awareness

The GPG recognises the need for the implementation of comprehensive awareness campaigns to encourage and maintain positive change in public awareness, attitudes and behaviour towards waste generation and management.

Awareness campaigns should aim to encourage people to adopt more responsible attitudes towards waste and to deal with it in ways that are more sustainable. These campaigns should focus on the problem of litter, promoting the avoidance and minimisation of waste and pollution, greening the environment of communities to enhance the aesthetic beauty of their areas and to build a culture of cleanliness in the Province, and promoting recovery and recycling at source. These campaigns should use all relevant forms of media, challenge complacency and misconceptions, and avoid blame or allocation of guilt.

5.2.5 Participation

The GPG is committed to ensuring broad public and industry involvement as well as participation by Local and Provincial Government in its decision-making processes.

Objective 6: Alignment with National Legislation
6.1 Supporting legislation

The GPG recognises the need to implement relevant law reform initiatives with regards to waste management.

The GPG embraces the adoption and enforcement of all legislation dealing with the safe management, handling and transportation, treatment and disposal of waste, as well as the adoption of appropriate waste management standards and performance indicators with respect to all aspects of IWM to improve waste management service delivery.

6.2 Enabling legislation

The GPG will develop appropriate legislation and regulations to support and enable the Gauteng IWM Policy, and to foster consistency between national, provincial and local waste management requirements, capacity building and filling of gaps in existing waste management regulations and requirements.

Objective 7: Funding

7.1 Investment and financing

The GPG confirms the principle of funding of waste management at the level of Local Government. This means that the management of waste must be fully accounted for. This should be done through full cost accounting of payments for services rendered. The waste management services that Local Government provides include refuse collection, waste disposal at landfills and associated services provided to the public and industry, subject to best value performance principles. The rollout of such services must recognise and mitigate the impact of the historical discrepancy in waste management service standard provision at all levels.

The GPG recognises the need for the development of appropriate funding mechanisms that can ensure the effective implementation of the Provincial IWM Policy.

7.2 Polluter Pays Principle

The GPG recognises the need for the development and implementation of a practical Polluter Pays Principle system for all forms of waste generated, whether solid, liquid or gaseous.
7.3 Incentives, rewards, promotions and penalties

The GPG recognises the need to promote incentives and other means of creating an economic and social environment wherein the principles of the waste hierarchy are promoted. This could include the provision of recognition for good practices followed, according to the waste hierarchy.

A programme of financial penalties is supported where best practice is not being followed and is resulting in unacceptable waste management service provision and/or detrimental impacts on human health or the environment, or where compliance with national and international waste management agreements and protocols is not being achieved. These incentives and penalties will be defined in the action plans that flow from the Gauteng IWM Policy.

The GPG recognises the need for legislation and incentives that encourage the use of reused, recovered and recycled materials, and the development of strategies and targets appropriate to the effective management of each prioritised recoverable or recyclable waste stream.

The GPG confirms the need for procurement strategies that promote the implementation of the principles of the waste hierarchy.

Objective 8: Avoidance and Substitution

The GPG embraces the principles of Cleaner Production or Sustainable Consumption and Production, which is aimed at avoiding the generation of waste traditionally associated with industrial and public activities and processes.

Waste avoidance and substitution initiatives should apply to all waste. The GPG promotes the utilisation of waste above the use of new or raw materials for production purposes, subject to compliance with relevant legal requirements.

Cleaner Production and Sustainable Consumption and Production compliant with international protocols and associated initiatives should be considered as a means of reducing the negative effects of waste generation and/or treatment, whilst optimising the use of energy in production processes and encouraging Green Procurement initiatives.

Objective 9: Waste Reduction and Minimisation

The GPG endorses the development and adoption of appropriate and realistic targets requiring reduction and minimisation in waste generation of all forms of waste. This includes the implementation of waste minimisation options at source (also see policy item 10 in this regard).
The GPG recognises the need for the development and implementation of waste exchange and waste minimisation clubs to facilitate the avoidance, substitution, recovery, reuse and recycling of waste between different industries and organisations.

The GPG recognises the need to supply Local Government, industries and other waste role players with information and guidance on, for example, waste reduction and minimisation initiatives as well as other waste databases available to the GPG.

**Objective 10: Waste Recovery and Recycling**

The GPG confirms the need for laws for the recovery, reuse and recycling of all waste as well as guidance for and encouragement of the recovery, reuse and recycling of all waste. This can take place through source-separation or co-mingled collection programmes, manual or mechanical separation, or waste exchange, to provide recovery and recycling of appropriate prioritised waste streams.

The GPG confirms that increased waste separation at source, recovery and recycling are necessary. The GPG encourages actions that lead to the expansion and stabilisation of the economic base for recovery and recycling in the local, provincial, and national economy, including the support of existing and new laws designed to encourage the manufacture and purchase of products made from recovered and recycled materials.

**Objective 11: Waste Collection and Transportation**

11.1 Regulation of the collection and transportation of waste

The GPG endorses the development of collection and transportation requirements that are compatible with national, provincial and local legislation.

The GPG embraces the development and implementation of legislation that governs the transport of waste material in line with the principles of the National Road Traffic Act, 1996 (Act 93 of 1996), relevant South African National Standards (SANS) codes of conduct, and relevant international codes of conduct. This legislation should ensure that any person(s) transporting waste without a license to do so, or transferring custody of waste to a transporter who is not registered, will be prosecuted.

11.2 Alternative waste transportation

The GPG recognises the need for the use of forms of transport other than road haulage for the transportation of waste in line with environmental best practices. These forms of transport should be
considered by planning authorities when preparing waste management plans, taking into account economic principles and the practicality thereof.

**Objective 12: Waste Processing**

The GPG recognises that alternative waste processing options exist for circumstances in which it is not possible or economically viable to recycle certain waste. These provide for the recovery of waste or components of waste (e.g. energy, minerals) and should be considered as long as legal requirements are satisfied.

**Objective 13: Waste Treatment and Disposal**

13.1 Waste treatment and disposal

The GPG recognises the need for the safe treatment and disposal of waste only as a last option in terms of the waste management hierarchy.

13.2 Illegal waste dumps

The GPG recognises the need to close and remediate illegal waste dumps, including redundant and abandoned mine tailings and slimes dams, in accordance with national legislation.

13.3 Illegal waste dumping

The GPG recognises the need for the removal of illegally dumped waste (including but not limited to abandoned cars and construction and demolition debris), not expressly covered by permitting policies, to safe disposal facilities. The GPG also recognises the need for the implementation of legislation to trace and prosecute illegal waste disposers for the costs incurred in the management of such wastes and the environmental and human health damage caused by such activities, according to the Duty-of-care Principle.

13.4 Energy recovery

The GPG recognises the need for the use of waste treatment and recovery technologies that can generate or replace energy using waste resources, with the recognition that energy recovery from waste should not compromise South Africa’s standing as a signatory to international treaties and policies such as the Montreal and Kyoto Protocols.
Objective 14: Environmental Management

14.1 Environmental process

The GPG recognises the need for the preparation of environmental instruments and the inclusion of waste management principles and requirements in national and provincial legislation to guide environmental processes. These must lay down the procedures to be followed and the institutional arrangements that are required for such processes.

It is recognised that, where applicable, all environmental process reports should address the waste hierarchy and define a waste management plan.

This policy item should be read in conjunction with policy item 7.2 that pertains to the Polluter Pays Principle, and policy item 7.3 that refers to incentives and penalties.

14.2 Waste management facility environmental control

The GPG recognises the need for strategic planning and guidelines for the planning and operation of waste buy-back stations, water-care works, landfills and associated waste management facilities, to prevent or reduce as far as possible the negative effects of the handling and transportation of wastes on the environment and on human health.

The GPG recognises the need for procedures that ensure that waste handling and management facilities, landfills, incinerators or water-care works (including industrial effluent and sewage treatment works) meet existing and, where practical, new standards, and operate in an environmentally-safe way in accordance with the principles of the relevant regulations and their specific certification requirements.

14.3 Brownfield site rehabilitation and clean-up

The GPG recognises the need for strategic intervention and the development of soil and related contamination remediation guidelines to complement the Minimum Requirements, based on the practical risk posed by soil contaminants to the environment and human health.

The GPG recognises the need for the assessment and clean-up of historically industrialised, mined or contaminated (brownfield) sites with appropriate assurances, so that sites may be returned to productive use to the community, and/or at least be rendered safe, in accordance with the acceptable risk for a particular land use. Unless proven to represent an unacceptable risk to existing and future site users, it is preferred that contaminated sites be remediated on-site as far as possible and practical, rather than occupying available landfill space.

The Polluter Pays Principle will be applicable to brownfield site rehabilitation and clean-up activities.
Objective 15: Selected Waste Streams

The waste streams that are listed below have been selected to serve as examples of the possible waste streams that could be listed in this policy document. The selected waste streams are not the only ones that are relevant to the Gauteng IWM Policy and this policy item can be amended to include more selected waste streams, as and when required.

15.1 Health care risk waste

The GPG recognises the need for the safe handling, storage, transport, treatment and disposal of HCRW according to the Gauteng HCRW Regulations (2004).

15.2 Hazardous domestic waste

The GPG recognises the need for the segregation and separate collection of hazardous domestic waste from the general waste stream for safe removal and disposal in accordance with a prioritisation of waste streams, such as batteries, paints, solvents, engine oils, old refrigerators, asbestos sheeting/lagging, fluorescent tubes, etc.

15.3 Hazardous industrial and agricultural waste

The GPG recognises the need for the responsible handling, storage, transport, treatment and disposal of hazardous industrial, agricultural and chemical waste, including industrial slag, as well as the need for on-site hazardous waste management facilities and practices at industry level and off-site regional hazardous waste handling and management facilities.

All hazardous waste facilities, whether on-site or off-site, should comply with the principles of the Gauteng IWM Policy and associated legislation.

The GPG recognises the need for adequate and competent facilities to accommodate hazardous waste generated within the Province and on a national basis, where coordinated hazardous waste management is warranted.

The GPG recognises the need for the development of a provincial profile on chemicals and industrial slag management, to determine the status of compliance with national policies and legislation.

The GPG recognises the need for the development of IWM Plans at generator level (industrial, mining, power generation, etc.), as well as at the level of Local Government, to support the co-ordinated implementation of the principles of the Gauteng IWM Policy.

15.4 Mining and power generation waste
The GPG recognises the need for the development of guidelines to complement the Minimum Requirements. The GPG also emphasises the application of Acts such as the National Environmental Management: Air Quality Act, based on the practical risk posed to the environment and human health by mining and power generation wastes, and the future decommissioning and closure of mining and power generation sites and residues, to include appropriate consideration of nuisance issues associated with such residues.

15.5 Military waste

The GPG recognises the need for the development and implementation of regulations that clarify when conventional and chemical military munitions become a hazardous waste and make provision for the safe storage and transportation of such waste. Categories of military waste that should be defined in such waste management regulations include, but are not limited to: (i) unused munitions, (ii) munitions being used for their intended purpose, and (iii) used or fired munitions.

15.6 Radioactive waste

The GPG recognises the need for the management of radioactive waste in a manner that protects the environment and human health, in accordance with the following principles and requirements (in addition to the general principles of the waste management hierarchy):

- the Hazardous Substances Act, 1973 (Act 15 of 1973) and regulations pertaining to it;
- regulations and guidelines as specified by the regulatory national bodies, such as DME and DoH;
- the requirement that no unlicensed person or organisation may be in possession of radioactive waste;
- radioactive waste will be managed in a way that secures an acceptable level of protection for human health, the environment (including natural resources), protection beyond South Africa’s borders, and protection of future generations; and
- radioactive waste will be managed within the national legal framework, which will include clear the allocation of responsibilities and provision for independent regulatory functions.

15.7 Waterborne waste

The GPG embraces the establishment of Catchment Management Agencies (CMAs) and the adoption of a Waste Discharge Charge System (WDCS), as per the National Water Act, 1998.

15.8 Airborne waste
The GPG supports the implementation of the National Environmental Management: Air Quality Act and compliance to international air quality treaties, protocols and initiatives – for example, the Kyoto and Montreal Protocols – and the participation of Gauteng industry in international programmes to reduce world-wide carbon emissions. Existing air quality permits will be reviewed, amended and implemented as appropriate.