

**COMMUNITY INVOLVEMENT IN THE PROVISION OF BASIC
SANITATION SERVICES TO INFORMAL SETTLEMENTS**

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Degree of Master of Technology**

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DECLARATION

The contents of this dissertation represent my own work, and the opinions contained herein are my own, and not necessarily those of the Peninsula Technikon.

Signature : Rebanel Cerna

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SUMMARY

In South Africa, an estimated 15 million people - 38% of our population - do not have adequate sanitation. Every citizen has a constitutional right of access to basic services, which local government has the responsibility to provide. In reality such provision to people living in poverty is a daunting development challenge, exacerbated by growing unemployment and the spread of unplanned informal settlements.

On the other hand, increased government investment in accelerating provision is a significant opportunity to link sanitation delivery to local economic development, as suggested in the recently revised Water Services Strategy document (DWAF, 2003). There is evidence that these two aspects of national policy can be brought together fruitfully.

Community involvement, described as "a commitment to building on people's energy and creativity" (WSSCC, 2001) is consistently advocated by international, national and local government (DPLG, 2001) as essential to sanitation provision. There is broad agreement that a community-based approach is the cornerstone of sustainable service provision.

This research focused on the context of urban poverty in informal settlements, taking community responses to sanitation delivery by local authorities into account. Prevailing approaches have had limited success in preventing health hazards, which *relies on community-level actions to deal with poor use, inadequate maintenance and dysfunction of such sanitation services as are provided*. Implicit in the principles underlying the involvement of communities are substantial community-based roles and functions that the research seeks to make explicit.

Diverse local level capacities emerge as quite distinct opportunities for residents to become more actively involved in improving and sustaining their sanitation services. Two distinct aspects of community involvement became increasingly apparent in roles

and functions as recipients of services, as different from those associated with providing those services.

Civil society roles and responsibilities, based on the familiar principles of beneficiary participation in community development processes, are clearly distinguishable from productive, remunerated, and contracted community-level tasks and functions. Effective community involvement may take the form of local employment in construction, operation and maintenance, as distinguished from the voluntary roles and functions of civil society. Less clear, are the neglected local employment opportunities for providing education, monitoring and evaluation functions that contribute to sustaining services.

As prevailing approaches have demonstrated limited success, this research suggests that different forms of attention and support are required of the external agencies *providing basic services to densely populated urban informal settlements*. In addition to voluntary community participation, cost-effective local employment and the procurement of community-based service providers should be taken up as a substantial form of community involvement. Such an approach would unlock the potential for improving the efficiency of investment in local economic development.

A formative research methodology was adopted to assist in bridging the gap between existing knowledge claims and current knowledge practices of sanitation sector professionals and practitioners in the South African metropolitan environment. Addressing the informal settlements sanitation backlog constitutes a development opportunity for metropolitan local government that is as yet scarcely explored. The results of this research might assist in informing more effective targeting of different and specific forms of community involvement in sanitation provision.

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LIST OF ACRONYMS

CLO	Community Liaison Officer
CMC	Cape Metropolitan Council
CoCT	City of Cape Town
CTM	Cape Town Municipality
DPLG	Department of Provincial and Local Government
DWAF	Department of Water Affairs and Forestry
EHO	Environmental Health Official
eTM	eThwekini Municipality (Durban metro)
eWS	eThwekini Water Services (Durban metro)
h/h	household
IDP	Integrated Development Plan
ISD	Institutional and Social Development
KTT	Khayelitsha Task Team
KDF	Khayelitsha Development Forum
KTCSC	Kayamandi Test Case Steering Committee
LA	Local Authority
M&E	Monitoring and Evaluation
NBI	National Botanical Institute
O&M	Operation and Maintenance
PAWC	Provincial Administration of the Western Cape
PDI	Previously Disadvantaged Individuals
PSC	Project Steering Committee
PSFA	Peninsula School Feeding Association
TMC	Technical Management Committee
UDS	Urine Diversion System
VIP	Ventilated Improved Pit latrine
WHO	World Health Organization
WSDP	Water Services Development Plan
WSSCC	Water and Sanitation Supply Collaborative Committee

CHAPTER 1: INTRODUCTION

1.1 Context of the research

Over the past decade global concern has spread from marginal rural communities without sanitation, to the plight of people living in poverty in dense, informal settlements on the fringes of urban centres. Regardless of whether under-serviced settlements are unplanned and illegal, the reality of informal settlement is now accepted as a permanent or semi-permanent feature of rapid urbanisation. Governments now recognise that they should improve access to essential services and take up responsibility for the alarming increase of public health hazards (WSSCC, 2001) associated with the urbanisation of poverty.

Providing adequate sanitation to people living in poverty continues to present many problems in South Africa. Until recently, national policies and regulations discouraged or prohibited local authorities from providing adequate services to settlements that were considered temporary (NASCO & Makheta, 1998). The speedy delivery of conventional formal housing with costly water-borne sanitation systems, is constrained by a lack of adequate resources to fulfil such expectations. Socio-economic realities facing both local authorities and communities in need make for difficult working conditions and poor cost recovery. This has inhibited effective action by local authorities and those communities living without sanitation.

The international Water, Sanitation and Hygiene for All (WASH) programme has set sanitation delivery targets at halving the world-wide backlog by 2015, and providing access to all by the year 2025. A community-based approach, advocated as the key to sustainable sanitation services, defines community involvement as a situation in which “households and communities take the important decisions and actions” (WSSCC, 2001). In practice, the details of community involvement demonstrate a limited interpretation of principles that are widely accepted.

1.2 The problem: justification for research focus

In the urban context of local government responsibility for provision of at least a basic level of sanitation, as well as for improving and sustaining such services as are provided to informal settlements, is a development challenge that calls for more understanding of appropriate actions on a local level. Local authorities have not resolved conditions of severe health hazards created by poor use, inadequate maintenance and dysfunction of the sanitation services they provide.

Community involvement in sanitation servicing of informal settlements lacks adequate definition for effective application. Due to a lack of differentiation between voluntary civil society (household, committee and social network), and employable or contracted functions, community-level roles and functions remain indistinct. As a result, existing and potential community-level capacities are not appropriately targeted to ensure the proper use, operation and maintenance of sanitation services. Significant investments continue to be dispensed in unsustainable infrastructure and ineffective services.

Therefore, the problems that this study focuses on are that:

- existing and potential community-level contributions to sustaining sanitation services in informal settlements are not sufficiently recognised;
- within the broad concept of community involvement, roles and functions remain indistinct;
- distinguishing between voluntary and employable roles is not adequately differentiated for appropriate and effective allocation of tasks and functions on a community level.

1.3 Research objectives

The primary research objective is to differentiate between the roles and functions of civil society (social networks, households, volunteers and committees), and

community-based employable or contracted roles and functions that contribute to the improvement and sustainability of sanitation services within informal settlements.

The following elements are sub-objectives that involve:

- identifying community-level roles and functions that contribute to the sustainability of sanitation systems within informal settlements;
- clarifying different forms of community involvement in terms of roles and functions;
- distinguishing between voluntary deployment as beneficiaries or remunerated employment for providing services associated with community-level tasks and functions;
- analysing the explicit opportunities for community-based sanitation service provision that are implicit in community involvement principles.

1.4 Hypothesis

It is essential to engage local level capacities to sustain sanitation services from within communities living in informal settlements. Utilising local capacity effectively for sustainable improvement, use, operation and maintenance of sanitation services involves distinguishing between the roles of community committees, volunteers and resident users as recipients of services, and the specific tasks and functions of employees and local contractors in providing those services.

1.5 Delimitation of the study

The proposed research will inevitably be faced with broader socio-economic, formal and informal institutional and planning issues in the context of sanitation service delivery to informal settlements. Investigation will confront aspects of local governance, such as:

- the capacity of local authority officials and internal institutional issues;
- the broader civil society role of representative community committees;

- the complex social networks that function in the day-to-day management of poverty-stricken communities.

While these aspects will be acknowledged inasmuch as they affect the sustainable provision of sanitation, they will essentially be treated as boundaries to this focus.

It will be necessary for data production to avoid digressions that arise from incorporating discoveries related to local authority's institutional and capacity issues that lie beyond the interface of officials with the communities that they serve.

1.6 Definition of terms

Sanitation is a multi-disciplinary field that involves social, economic and technical aspects. While the terms and concepts used in this research are fairly common, there may be certain meanings hidden in the way that they are used in the sanitation development context. They are therefore clarified below.

The revised definitions of *basic sanitation* given in the recent water services strategy, revised in 2003/4 and currently annexed to the published White Papers on national Water and Sanitation policies, are used in this research as follows:

Basic sanitation facility: the infrastructure necessary to provide a sanitation service that is safe, reliable, private, protected from the weather, ventilated, keeps smells to the minimum, is easy to keep clean, minimises the risk of the spread of sanitation-related diseases by facilitating the control of disease-carrying flies and pests, and that enables safe and appropriate treatment and/or removal of human waste and wastewater in an environmentally sound manner

Basic sanitation service: the provision of a basic sanitation facility that is easily accessible to a household, the sustainable operation of the facility, including the safe removal of human waste and

wastewater from the premises where this is appropriate and necessary, and the communication of good sanitation, hygiene and related practices

Sanitation services: the collection, removal, disposal or treatment of human excreta, including appropriate health, hygiene and sanitation-related awareness and consumer care.

(DWAF, 2003)

In addition, the term *sanitation* is applied in general to comprise:

Sanitation systems: sanitation technology, use and management as a set of connected parts forming a complex whole

Sustainable sanitation: sanitation systems that are used and maintained so that barriers to contamination from human faecal waste are effectively maintained.

The definition of *community*, and associated descriptors, is used in their simplest form:

Community: all the people living together in a particular area with certain interests in common, and in the context of this research specifically those with informal settlement conditions in common.

Community involvement: The fact or condition of a community (see above) being involved with, or participating in something, based on the dictionary definition of involvement as removed from the context of the complex community development discourse associated with rural development, and placed in the context of urban developmental local government imperatives for re-interpretation purposes.

Community-level Capacity: the ability of people (in a community) to do, experience and understand their responsibilities and roles, as related to sustaining sanitation services in the context of this research.

(The New Oxford Dictionary of English, 1998)

The following terms are used in the sense and meanings given in the dictionary:

Deploy: bring into effective action and utilise existing abilities and skills

Employ: give work to someone and pay them for it

Empowerment: the act of giving or allowing people the authority or power to do something in such a way that those actions make people stronger and more confident in controlling their lives.

(The New Oxford Dictionary of English, 1998)

1.7 Assumptions

The relevance of this research is based on the assumption that there will be an extended period (up to a decade) in which adequate resources for formal housing and proper planning will not be available for formal provision in the City of Cape Town and other metropolitan municipalities in South Africa.

The relevance and value of this research are based on certain key assumptions, given below.

1.7.1 Policies for developmental local government

Metropolitan local authorities will service Informal settlements in accordance with national sanitation policies, and an informal settlement policy will be developed that upholds the delivery targets supported by all levels of government. The Department of Water Affairs and Forestry is leading the inclusion of an informal settlement component in national sanitation policy and guidelines to local authorities.

In addition, the metropolitan local authorities of Johannesburg, eThekweni (Durban) and the City of Cape Town have each undertaken to develop an informal settlement sanitation policy and develop a protocol for the provision of sanitation services. These policies will incorporate community involvement principles, and local economic

development opportunities will be targeted in the provision and maintenance of services.

1.7.2 The role of local government

Local authorities will continue to undertake basic services provision to un-planned informal areas and endeavour to overcome the current legal constraints to provision that relate to ownership of the land on which many settlements are located. It is worth noting that despite recent incidents of forced removals, there are an increasing number of cases of constitutional rights overcoming laws relating to informal settlement tenancy and services, for example the Grootboom case decision that the state must provide basic services.

In the context of national government's commitment to address the national sanitation backlog in delivery, the poverty alleviation and local economic imperatives of local government may be viewed as an opportunity, rather than too great a challenge.

1.7.3 Community Involvement as a social benefit to informal settlements

Residents have a vested interest in improving their environmental health, sanitation and services, which are given sufficient priority by residents to induce local management structures to invest time and care in facilitating the delivery of improved sanitation services.

1.7.4 Community Involvement as an economic benefit to informal settlements

People living in poverty have the resourcefulness, capacity and skills to contribute to sanitation provision and maintenance, if not the financial resources to pay for services. In addition, employable skills do reside in poor communities, frequently with currently unemployed residents.

1.8 Significance of this study

This research feeds into a component of the priority research areas of the Water Research Commission (WRC) (Key Priority Areas: Thrust 5). Focusing on a particular aspect will contribute to a larger ongoing research project that is focused on local authority protocol for the purpose of developing a planning and implementation framework for sanitation in informal settlements. Community responses to sanitation delivery emerged as a key programme element during the early stages of this current research project, particularly in respect of sustaining such sanitation services as are provided by local authorities (Lagardien & Cousins, 2003).

The product of this research has the potential to contribute to the national sanitation sector's endeavour to provide sustainable basic sanitation to informal settlement residents in accordance with national sanitation policy. As expressed in this document, accelerating delivery to address the sanitation backlog by 2010 may be viewed as an opportunity rather than a barrier to developmental local government.

This research of forms of community involvement is related to local economic development opportunities that arise out of national government's commitment to sanitation delivery and the ongoing servicing of sanitation systems. The aim of examining assumptions about community involvement in this context is to convey that South Africa's basic sanitation backlog provides a neglected opportunity for addressing poverty in informal settlements.

Given the prospect of local authority investments and substantial funding allocations in national and local government budgets, identifying practical opportunities for employment of people living in informal settlements may clarify investment targets. These may be linked to expanded public works initiatives, poverty alleviation and local economic development imperatives, skills development programmes, or may simply be incorporated by local authorities as part of their current approach to implementing sanitation provision.

In aligning local authority business plans with national policy guidelines, access to under-spent national annual funding allocations, such as the Municipal Infrastructure Grant, Capacity Building Grant and Skills Development funding available from the Department of Labour, may be unlocked.

CHAPTER 2: RESEARCH METHODOLOGY

2.1 Introduction

In the discourse surrounding community involvement in sanitation projects generally, many social development practitioners express the view that performance monitoring and evaluation neglect to apply indicators “that are adequate to the subject matter that they are intended to represent” (Weingart, 2000: 24). Practitioners often claim that technical and quantitative outputs of delivery are given preference over social development indicators in reflecting performance and informing decision-making by project managers.

A social versus technical paradigm has been put forward as being responsible for a quantitative bias in measuring the success of sanitation programmes and projects. Arguments that claim that the cause of poor performance and weak practice is the result of the dominance of technical over social aspects of sanitation programmes have not yet come forward with applicable suggestions of ways to address this perceived problem. It is imperative to the credibility of sanitation policy and programmes that neither socio-economic nor technical objectives of community involvement become further alienated and unable to reach agreement. Recognising that social, technical and economic measures are complementary will encourage integration of each aspect’s contribution to effective action on the ground.

A past half century of reflections on Community Development experience has produced a well-documented discourse on participatory community involvement that has largely evolved in the context of rural development. Community involvement is most commonly viewed as an entirely social aspect of sanitation, largely grounded on the understanding that sanitation provision includes a general awareness of hygiene and the impacts of sanitation on health. Research on the nature of community involvement in sanitation provision calls for qualitative indicators that are different from, but not exclusive of, quantifiable elements (such as the type and number of facilities supplied and quantities of expenditure).

This research focus confronts the grey area that is located between the social (descriptive) and the technical and economic (measurable). It is thus necessary that the methodology applied in this research avoids the danger of getting stuck in a paradigm equivalent to “quantitative vs qualitative” debates. The ongoing issue of non-performance is not resolved by an argument that encourages maintaining the rhetorical status of the concept of community involvement in stated global, national and local government policies, strategies and guidelines.

This research has set out to retrieve distinct community actions, roles and functions associated with community involvement in the context of urban poverty and developmental local government. Purposefully moving away from the broader, historical community involvement discourse, the research sets out data that captures specific community roles and functions in a way that can be communicated across the levels of all actors involved in informal settlement sanitation. The methodology draws on evidence that is articulated by the actors themselves and is illustrated in the context of their own practice. This approach aims at gaining agreement that these are valid measures of performance.

The challenge for this research is to capture the qualitative attributes of community involvement that manifest as specific and potentially quantifiable roles and functions in context, so that community involvement objectives may be effectively integrated

with programme goals. Quantification subsequent to this research may thereafter be based on the clear and substantial indicators of community involvement suggested by the product of this research. Evaluation of performance may then be measured against objectives that cross the artificial barriers of social, technical and economic divides prevalent in current approaches.

2.2 Theories underlying the research methodology

In his article on evaluative research methods, Professor Peter Weingart (2000:24) argues that, “only with a *precise* definition of *goals* (my italics) is evaluation of effects possible”. As he suggests, the responsibility for vaguely stated programme goals is often passed on to implementing agents, who may well be tempted to pass responsibility for achieving results on to those in the field. Exploration of the expectations of actors closer to field activity may yield clues as to what and where intended effects are going awry (Weingart, 2000:25).

Community involvement appears to have inherited an entirely qualitative attribute in current associations with well-functioning sanitation systems, while the value of quantifying effectiveness as based entirely on supplied structures and overall expenditure is clearly questionable. There is uncertainty about the specific nature of community involvement as a key objective within the goal of sanitation improvement and sustainability, as conveyed in advocacy and guidelines.

As participatory community development theory and concepts are drawn largely from rural research and experience, this uncertainty persists in generalities that constitute an avoidance of specific and concrete indicators. The measurable value of forms of community involvement needs to progress beyond a situation where all “the measures used are useless” (Weingart, 2000:24), in this instance, in the urban context of adequate basic sanitation provision to people living in poverty in informal settlements.

One way forward is to focus on drawing out indicators of community involvement that reflect specific community roles and functions in this field. Applicable indicators that reflect “involvement” may be developed by firstly identifying specific community roles and functions in the natural setting of current sanitation improvement endeavours. Based on agreement between the actors that these are valid measures, subsequent quantification of performance may then lend substance to measurements that are sufficiently grounded on qualitative attributes identified in this research.

Jennifer Greene (1994) describes variations in approaches in her overview of the justification for qualitative research in social improvement programmes. The characteristics of an interpretivist framework allows for the exploration of varied and contextualised meanings (Greene, 1994), so that practitioners may be encouraged in their own learning process through participating in the research. As the underlying purpose of this research was to enhance the practitioners’ understanding of “community involvement” for the purpose of programme improvement, an interpretivist approach was appropriate to this study.

The formative and developmental nature of the research suggested a methodology that respects the way in which knowledge and skills are distributed amongst the professionals and practitioners who are engaged in sanitation servicing of informal settlements. Towards gaining the agreement of local government managers and officials, appointed implementing agents and local community-based actors, the data is presented in the form of their own articulation of the subject matter. Suggested indicators for the purpose of measuring community involvement are based on analysing evidence as articulated by practitioners, to ensure that results are recognisable and therefore applicable. Practitioners may then pursue objectives on the basis of their new knowledge in the interests of improving their programmes.

An inclusive approach to research activities involved different levels of actors engaged in sanitation improvement, and incorporated the responses of local committees, community volunteers and community users to the sanitation services

provided. Stakeholder validation workshops allowed for further response to presentations of data, and for additional input by practitioners and community participants into the analysis.

The data presented in the text refers to appendices where the evidence is presented in the form obtained from participant practitioners. In this way the research aims to relate conclusions and recommendations arising out of this research to what practitioners have said about what they do.

2.3 Research activities

The research schedule of activities consisted of five stages, namely:

- A comprehensive review of relevant literature
- Investigation of current approaches in context
- Tidying data into broad themes
- Comparison of approaches in their natural setting
- Clarification and analysis of distinctions drawn between differences.

The initial literature review provides the broader background and context that justifies the field of focus for research. Further foci on aspects central to the research problem draw on selected literature, including government publications that relate directly to the topic under review. Emerging themes from the literature discussing community involvement in the context of decentralised local government provided the framework for the sorting of copious data collected from practitioners in the natural settings of case study sites of practice.

Field-based observation and open-ended interviewing were intended to examine what people are doing and hear what they were saying. Over a two-year period multiple field visits took place at progressive stages of sanitation delivery and service provision. Different levels of stakeholder interviews were conducted and project meetings were attended in order to capture perspectives of participating city officials,

consultants and local committees. These perspectives are retained in appendices to the research text and have drawn on data related to the emergent themes, as organised under pertinent headings.

Much of the case study data was initially drawn from internal project reports compiled by practitioners within metro municipalities, provided on an ongoing basis. As an essential source of data is from subsequent field-based interviews with councillors, resident users, project volunteers and local contractors during frequent field visits, key texts are appended as 'Community Perspectives'.

The perceptions of those practitioner Engineers and Environmental Health Officers (EHOs) operating at a project level were sought in cross-checking the information drawn from project document reviews. Of the interviews and opportunities presented during meetings and validation workshops, pertinent texts that authenticate these perspectives are appended to the main document.

Validation workshop processes and outputs aimed at further engaging practitioners in reviewing the extent to which policy guidelines on community involvement were reflected in practice, as articulated by themselves. Additional data was thus gleaned from those operating at a project level, resting largely their own inputs at particular data validation workshops. One particular workshop process and the resultant outputs that captured the community level perspective on interventions by external agencies are appended (Appendix 1b). A visual representation of roles and functions of the municipality, task teams and committees is extracted for discussion in the main text.

A comparative analysis of community roles and responsibilities required multiple levels of practitioner inputs on differentiating between the emergent themes, as related to community involvement within case study project sites. Appendices are attached to verify both the sources and the authenticity of data.

2.4 Natural setting – case study sites of practice

The natural setting of five case study sites, selected by practitioners themselves, constitutes the key source of text for locating community actions, roles and functions within current approaches.

Descriptions of practice found in project documents and reports were crosschecked with those of community users, committees, volunteers and local contractors. Based on observations, descriptions, explanations and the meanings expressed by practitioners working in the field, the mix of field-level interpretations with those reported in project documentation deepened the text available in literature. The resulting mixed text was drawn from across multiple points of view as associated with each natural setting.

Municipal stakeholders with a direct interest in basic sanitation provision initially identified the four informal settlements in the vicinity of Cape Town for field-based research. In each of these four sites, community demand for sanitation improvement was established and local authorities were engaged in responding to that demand. In two of these sites, non-government organisations (NGOs) had taken a lead role in mobilising community involvement in sanitation improvement initiatives.

While data production was copious, comparing different forms of community involvement in providing and sustaining services was constrained by the limited extent to which the municipalities in Cape Town were following through on service provision options, operation and maintenance, particularly on the community level. Therefore, during attempts to compare data on active community involvement surfacing in the four Cape Town case study sites, accessible case study data from another metropolitan initiative were added.

Durban (eThekweni Water Services) offered a wider scope for research of emerging forms of community involvement in the context of an alternative technology option. As

a result, the emergent theme of employment opportunities as different from voluntary functions could be tested for validity across a richer source of text.

Further to discussion in this study, detailed evidence in the form articulated by practitioners themselves is attached in Appendices 1-6. Summaries of collated case study data is sorted into tables and discussed progressively within themes conveyed in headings in the chapters discussing the literature review and the data on current approaches.

2. 5 Managing data production

The literature review encompassed global trends, the South African national policy environment and decentralised local government responsibility for basic service provision. Review of current trends provided the starting point for further investigation. The discourse of community involvement in the provision of basic services could not be usefully confined to the familiar debates and norms that have evolved over the past 50 years. Broader community development discourse was found to rest largely on rural experience, with limited reference to applicability in urban poverty settings.

The conceptual text that reflects community involvement discourse in different levels of government provided insight into current developmental local government and local economic development imperatives. These were evident in government policies, strategy documents and guidelines for local government. The discourse of community involvement was further explored, based on the themes that began to emerge from literature and policy documents on urban poverty, informal settlement and sanitation. The literature review then sought to delineate the over-riding emphasis on community involvement in the text by pursuing these emergent themes.

Suggestions of explicit community-level roles and functions that are seen as crucial to sustaining services in urban informal settlements were further explored in the context

of current local authority approaches. In this second stage of research, the objective of field visits was to identify specific community level roles and functions that emerged in the natural settings of sanitation provision projects in informal settlements. Tables and figures that were compiled to firstly collate data, and then to compare data, were based on the initial themes that had emerged from the literature. Further investigation of these themes was pursued in the case study sites.

Data management rests on the working framework that voluntary or civil society roles were clearly distinguishable in character from remunerated, contracted and employed community-level functions. This framework for managing data grew into a refinement of themes that reflected employment opportunities as being different from voluntary functions. These themes were tested for validity in relation to all the sources of text used in this study by reference to the perspective of practitioners.

Extensive data are presented in appendices as obtained from informants. The selection of appended primary data serves to illustrate the articulation of practitioners themselves as recorded from field visits, focus groups and interviews. Rather than revert to hidden meanings in the rhetoric of community involvement discourse, reference to their own meanings is thus retained.

2.6 The research group

Participant practitioners included City of Cape Town and eThekweni (Durban) municipal officials from Water Services departments. Staff employed in construction and training divisions, Development Support departments and Environmental Health Officers, who are at the coalface of environmental health conditions in informal settlements, were key research participants.

These practitioners generated data based on their experience, providing documents, accommodating research opportunities and providing feedback on analysis of the information. The perspectives of municipal engineers and environmental health

officials engaged in the case study projects are captured in the selected appendices. Research reference groups represented the different levels of practitioners involved in each case study project (see Appendix 7), and voluntarily participated in a sequence of Stakeholder Validation Workshops conducted during the research process.

Collaborative partners of the municipalities (professionals, NGOs and community) provided their perspective on the role played by municipalities and the community with whom they worked. The researcher attended project meetings on occasions, particularly when the data reported appeared to be at odds with observations and interviews on site. On all these occasions the project actors welcomed the presence and questions of the researcher, reflecting their interest and participation in further research of their endeavour to involve the community.

Apart from gathering data directly from multiple levels of practitioners associated with each case study site, authentication of the information (which is understood from the researcher's point of view and constantly subjected to interpretation) was through providing opportunities for the practitioners across levels to crosscheck the data gathered from them.

The perspective of community members representing the urban poor from the point of view of practice was the missing voice in much of the literature and documentation that was reviewed. Therefore, a key objective of extensive field-based observation, open-ended interviews and focus group discussion, was to capture the nature and quality of actual practice on the ground. This perspective serves as a means of triangulating the information available in literature and the project reports of municipalities.

CHAPTER 3: LITERATURE REVIEW

3.1 Background

The background and current context of this research focus were informed by a literature review of international trends, national policy frameworks, and the strategies and mechanisms that shape developmental local government imperatives. Against this background the delineated field of this research was located in current approaches of local government in confronting the challenge to provide sustainable sanitation services to people living in poverty within informal settlements.

3.1.1 Global context

Poverty eradication and the promotion of capacities to address the basic needs of people living in poverty have long been key objectives of the international community. At the Millennium Summit of September 2000 Secretary-General Kofi Annan declared that “extreme poverty is an affront to our common humanity” (UN-HABITAT, 2001:1). Heads of state from 189 countries have committed themselves to halving the proportion of people living in extreme poverty by 2015 (UN-HABITAT, 2001).

While the eradication of poverty remains a fundamental development challenge, a specific element of international targets is a commitment to double the number of people with access to safe drinking water and sanitation. Development targets are reported in the Global Water Supply and Sanitation Assessment 2000 Report as “To halve the proportion of people without access to water supply, sanitation and hygiene by 2015” (WSSCC, 2001). The Assessment 2000 Report provides evidence of a growing backlog of 2.4 billion people lacking sanitation, demonstrating that the International Water Supply and Sanitation Decade had achieved limited progress by 2002 (WSSCC, 2000).

An annual 2.2 million toll of deaths (WSSCC, 2000) caused by inadequate disposal of human waste reflects one of the world's most serious poverty-related problems. The scale of reported deaths of infants and young children from diarrhoea over the last 10 years exceeds the toll of deaths from armed conflict since World War II. In response to poor progress, re-doubled international advocacy efforts have included the Bellagio Principles, which call for an "overhaul of conventional policies and practices world-wide, and of the assumptions on which they are based" (WSSCC, 2001).

In addition, world leaders at the Hague Conference of March 2000 engaged formally in a global framework for action: VISION 21: a Shared Vision for Hygiene, Sanitation and Water Supply (WSSCC, 2001). Responses to poor sanitation provision records reiterate the urgency of action that puts people at the centre of development initiatives. Based on decades of international experience of successes and failures, community-based approaches are centrally placed in the VISION 21 framework.

In addition to rural under-servicing, rapid urbanisation and population growth are now recognised by international institutions as a growing constraint to achieving basic services targets. Viewing community involvement as central to addressing the urbanisation of poverty is related to ineffective urban development strategies that have been unable to keep pace with rapid urbanisation (UN-HABITAT, 2002:1).

As defined by HABITAT (2002), involving the community is based on recognising residents and their organisations as development partners. Reported successes have been based upon partnerships across levels, where diverse actors have worked laterally through a "negotiated process to overcome conflicts of interest and realize improvements in the living and working conditions of the urban poor" (HABITAT, 2002:6). Another dimension is expressed in the conviction that the right to participate as "genuine development partners" in urban development "is not only ethical but also economically viable" (HABITAT, 2002:7). This is justified in the view that releasing productive potential in development activities "will release contributions that should

be recognized as a vital resource" (HABITAT, 2002:7), in a manner that reflects the reality on the ground.

From the perspective of the New Partnership for Africa's Development (NEPAD), sustainable development and the eradication of poverty are central to its vision for Africa. It is estimated that more than 40% of the population does not have access to improved sanitation services in Africa (DWAF, 2003) so that improving access to affordable and reliable water and sanitation services are among NEPAD's key specific objectives. The promotion of community and user involvement in infrastructure planning, construction, maintenance and management, especially in poor urban and rural areas (DWAF, 2003), is again put forward as the means to achieving the vision for Africa.

Internationally it is now widely recognised that infrastructure and service provision developments may contribute to urban poverty reduction. Multiple sectors concerned with the growing urban poverty problem agree that community involvement is a cornerstone to achieving targets and must be designed to support local processes. South African policy and legislative reform provide the space for translation of these principles into practice.

3.1.2 National policy environment

South Africa's Department of Water Affairs and Forestry, the lead department for water and sanitation supply, has overseen a national strategy that is perfectly aligned with the NEPAD vision for Africa. Approaching its eighth year of implementation, a national water services sector conference in 2001 gathered lead role-players and practitioners in South Africa together to evaluate and learn from their collective experience. Mr. Gourisankar Ghosh, Executive Director of the WSSCC, in the opening address to this conference conveyed a strong message to local actors: "Put sanitation first!" (DWAF, 2002).

Commenting on national community water supply and sanitation initiatives since the mid-1990s, Ghosh emphasised that South Africa is no exception to the need for all local governments to prioritise sanitation (DWAF, 2002). Although the cholera outbreaks in KwaZulu Natal had demonstrated the need for hygiene education rather than delivery of hardware, which affirms the necessity of community involvement, Ghosh noted that it is still a common belief that water-borne sewerage is the appropriate means of sanitation (DWAF, 2002).

Since the publication in 1994 of the White Paper on Water Supply and Sanitation Policy, the revised National Sanitation White Paper of 1996 (DWAF, 1996) and all subsequent revisions, the South African government's policy principles consistently promote community involvement as core to sanitation provision. In the Framework for National Sanitation Strategy¹, the centrality of a community-based approach is re-affirmed (DWAF, 2001). While broad agreement that community-level actions are core to effective and sustainable sanitation continues to be promulgated (DWAF, 2003), insufficient implementation remains a frequently cited cause of failure, as discussed below.

South Africa's national sanitation policy guidelines point out that "the main obstacle to effective delivery...has been the lack of clarity on the roles and responsibilities of the various role-players" (DWAF, 2001: 27). Details on public and private sector institutional arrangements and a legislative framework for the formal sector are addressed, whereas roles, functions and responsibilities at community-level are cursory in sanitation policy documents. This relative lack of detail does not tally with ample evidence that community-level participation significantly impacts on the efficacy of sanitation services, nor with the persistent promotion of community involvement in policies.

A water services strategy revised in 2003/4, and annexed to the White Paper as published in 2001, attempts to make community involvement more explicit (DWAF,

¹ Annex to the White Paper on Basic Household Sanitation as published in 2001.

2003). Circulated for review in 2003, this document sets out key principles in the revised Planning Framework chapter that places emphasis on “supporting sustainable livelihoods and local economic development”. It is stated that meeting the basic services obligation offers local authorities significant potential for poverty alleviation through job creation, development of skills and providing “long-term livelihoods for many households” (DWAF, 2003:36). The implications for the nature of involvement of those living in poverty are suggestive, but by no means explicit.

National grant allocations to enact poverty alleviation and local economic development are accessible for such local government plans as are clearly aligned with national policy. Specific funds to address sanitation backlogs are made accessible through a number of mechanisms. These include the Equitable Share, the Municipal Infrastructure Grant and the Capacity Building Grant (DWAF, 2003). However, funds allocated annually have been underutilised and the delivery record remains poor, while effective and sustainable basic services have now become the responsibility of local authorities.

As the responsibility to address sanitation backlogs has now completed its devolution to local government from the national lead provided, it is necessary to consider the challenge from this perspective.

3.1.3 Developmental local government

Transformation of local government in South Africa began to take place in terms of the Local Government Transition Act, Act 209 of 1993. Guidance from the Constitution, Act 108 of 1996, section 152, requires that local government to

*provide democratic and accountable government,
ensure provision of services in a sustainable manner
and promote social and economic development within
a safe and healthy environment.*

Demands for more accountable and democratic local government were promoted in decentralisation policies across the world in the late 1980s and early 1990s. While legal and constitutional changes have always had the potential to facilitate significant improvement in local governance, in the early years of decentralization responsibilities were simply passed to the local level without ensuring adequate financing or local capacity to meet the new challenges (UN-HABITAT, 2001:1).

In his discussion of global decentralisation trends, Minogue (1998) has pointed to the tensions created by competing ideologies that underlie the twin objectives of market efficiency and state accountability to all citizens. In Minogue's analysis of failures to meet the demands of "ideas of democratic participation, accountability and empowerment" (1998:17), he explains that local authorities are faced with increasing expenditure due to the social burdens of unemployment, the social imperative that all citizens are recipients of services, and demands for both improving and reducing the public sector. Other reasons put forward for the ineffectiveness of local government include experiences where central government continued to control local resources and planning, and limited local capacity to mobilise local resources (UN-HABITAT, 2001:1).

In South Africa, developmental local government is guided by legislation, compulsory planning instruments and procedures, including those for specific basic services provision. Some of the legislation that furthers the impetus to address the plight of people living in poverty, and that directly relates to sanitation servicing of informal settlements, include the following:

- The Constitution (108/1996) is to ensure the right to adequate housing, health care services, sufficient water...children's rights to basic infrastructure and shelter, health care services and social services (IS handbook, 2003).
- The Health Act (63/1977) requires structures to have adequate sewage, drainage, water for washing and sanitary conveniences, lighting, ventilation and refuse removal.

- The National Environmental Management Act (107/1998) stipulates that people should have access to an environment that is not harmful to their health or well-being. It also stipulates that the state is required to protect, promote and fulfil social, economic and environmental rights of everyone, as well as to produce an environmental plan.

Directly related to municipal service provision are the Municipal Systems Act and the Water Services Act 108 of 1997, that require all municipalities to prepare a Water Services Development Plan (WSDP), designed to form part of each municipality's Integrated Development Plan (IDP). WSDPs must be prepared to "ensure progressively effective, efficient, affordable, economical and sustainable access" to water and sanitation services (DWAF, 2003:10). It is therefore clearly designated to local governments to adopt a developmental role that includes the well-being of people living in poverty within their jurisdiction.

The views that "Poverty reduction and growth are not competing routes to city development" and that "failure to address needs of the poor may jeopardise growth" (Van Ryneveld, Muller & Parnell, 2003) are apparently acceptable statements, while the responsibility to fit the bill has been decentralized to local government. However, the inherent difficulties for local government under pressure to transform public management need to be confronted, as Edgar Pieterse does in finding that it is indeed an ambitious mix of ideologies that is contained in South Africa's White Paper on Local Government (Pieterse, 2002).

In a context of socio-economic inequalities, participatory democracy is embedded at a national level. Local level execution is expected to ensure effective service delivery that fulfils basic needs for all, and enhances economic growth. While the IDP planning tool is meant to bend project cycles towards improving the quality and coverage of service delivery (Pieterse, 2002), limited local authority capacity often leads to a bias towards privatisation, corporations and the wholesale appointment of

professional consultants. As Pieterse (2002) points out, the promotion of civil society's role, poverty alleviation and job creation hovers in contradiction.

Far from throwing in the towel, Pieterse suggests that local government embraces participation, partnership and efficiency to embark on a collective or social learning approach to the dilemma (Pieterse, 2002). He recommends an interactive process of bringing ideas together to explore and experiment. This exchange should be based on the tracking of changes in poverty and indicators that monitor performances in accordance with IDP guidelines. Rather than falling into a preference for the private sector as partners, Pieterse suggests the promotion of collaboration in government and civil society partnerships as a way to ensure that the IDP tool is effectively applied (Pieterse, 2002).

To further economic growth, income generation and opportunities for employment, decentralized planning requires that each municipality establishes an employment generation and Local Economic Development (LED) strategy in its IDP. In this discussion, one significant meaning of developmental local government is provided in IDP guidelines produced by the national Department of Provincial and Local Government (DPLG) in 2001. These guidelines were produced out of concern for the lack of local authority plans reflecting the policy and legal framework, possibly as a result of doubts and misunderstanding (DPLG, 2001).

Particular to this research focus are those pointers summarised in the box below:

Box 1: Summary of local economic development guidelines

- **Poverty alleviation with special consideration of marginalised and disadvantaged groups and gender equity**
- **Economic growth with creation of income and employment opportunities**
- **Community ownership through mobilising local initiative and encouraging partnerships between the municipality and residents for implementation and maintenance**
- **Environmentally sustainable development and a safe and healthy environment**
- **Sustainability of services, municipalities and settlements**

(IDP General Guidelines, 2001)

Kevin Wall (2000) raises the issue that sanitation services are often provided as a public health measure that are not always seen as essential, nor as providing any significant leverage in infrastructure investments for economic effect. Apart from macro-economic and indirect costs and benefits, Wall's chapter on experience in economic issues (2000: 68-87) confirms that servicing low income communities is not favoured as an economic investment, at least partly due to minimal immediate and measurable returns from the customers who are unable to pay for services.

The demand for the health benefits of better hygiene is thus emphasised as a route to motivating payment for services to increase income to the service provider (Wall, 2000). As infrastructure has the most "significant and durable benefits to both productivity and consumption", where it "provides the degree of reliability and quality of services needed by the user" (Wall, 2000:81), further incentives will need to be provided for investing in low-income service provision to address existing inequities. The call for creating conditions for economic viability, other than user charges to the account of those living in poverty, falls within the realm of developmental local government responsibilities.

Wall's (2000) resumé of World Bank experience does not venture beyond the health benefits of better hygiene to create local demand for better services, as a means to mobilise additional resources from within local communities. He does however suggest "new approaches" (Wall, 2000:85) as an important theme for working with low-income settlements, and maintains that much can be done to improve sanitation service provision at affordable costs to local government.

This review will continue to pursue Wall's suggestion that "reduced costs and increased income that are most direct and apparent to beneficiaries", at a "very local level" may have significant potential (Wall, 2000: 86). Exploring avenues to where service provision to people living in poverty allows for maximising employment beyond short-term local labour, draws further attention to local government's

responsibilities and role in the urbanisation of poverty and associated sanitation backlogs.

3.1.4 Local government's role in poverty alleviation and economic growth

Poverty in urban environments exists when an individual's or a household's access to income, infrastructure or services is inadequate to meet their basic needs. More than a lack of income, poverty exists for that section of the population who are unable pay for basic services or access development opportunities (Van Ryneveld, Muller & Pamell, 2003). The cost of providing basic sanitation services in such "abnormal circumstances" must take into account that alternatives to the ability to pay for services must be found. This suggests a much wider issue than public sector capacity required in the "normal circumstances" of providing sustainable sanitation services (Rossouw & Crous, 2001).

Wider international experience shows that urban management practices developed according to a private sector bias often reflect a top-down approach. While public-private partnerships have demonstrated to some extent that the urban poor were both willing and able to pay for services, in many of those cases services have not reached the most needy of the urban poor. Private companies are usually unwilling to provide services at a loss or invest in infrastructure that reaches informal settlements. Meanwhile, local governments have often lost the potential for cross-subsidies by granting monopoly contracts to the private sector (UN-HABITAT, 2003).

Against this background, the aim of the South Africa's Integrated Development Planning (IDP) process is to provide a tool for developmental local government to develop ways of doing and achieving expected outputs. Means of ensuring developmental local government that are put forward as IDP Guidelines (DPLG, 2001), state that communication with communities is core to planning and implementation. Crucial guiding principles related to concepts of community involvement are summarised in the box below:

Box 2: Summary of communication guidelines

- **Offering people choices between services**
- **Citizen and client-oriented ways of service delivery**
- **Partnership between communities and local authorities in implementation of projects**
- **Giving residents the right of petition and complaint and obliging municipal government to respond**

(IDP Guidelines, 2001)

South Africa's national sanitation policy guidelines point out that "the main obstacle to effective delivery...has been the lack of clarity on the roles and responsibilities of the various role-players" (DWAF, 2001: 27). Details on public and private sector institutional arrangements and a legislative framework for the formal sector are addressed, whereas roles, functions and responsibilities at the community level, where implementation and service provision occurs, are relatively cursory in sanitation policy documents.

This relative lack of detail does not tally with the conviction that community-level participation is essential to sanitation provision, nor with the persistent promotion of community involvement in policy principles. This gap in definition leaves a vacuum for interaction and communication that is based on different forms of relationship between parties. The relationship between recipients or users of sanitation services and the municipalities that serve them is explored and discussed further.

3.2 Community involvement in municipal sanitation service provision

It is clear that there is broad consensus that community involvement will provide an effective answer for the provision of basic sanitation to the poorest sectors of society (WSSCC, 2001). All levels of government and the sanitation sector in general have embraced a social definition of sanitation and the principle that households and communities are central role-players (DWAF, 2001). Addressing the definition of sanitation in principles and practices relating to sanitation services " ...as they impact upon people and the environment", national sanitation policy states "it is now

recognized that toilets are just one element in a range of factors that make up good sanitation” (DWAF, 2001: 5).

An adequate sanitation service comprises appropriate technology, its use and maintenance as a set of connected parts forming a complex whole, that depends on effective risk management on a daily basis. Adequate sanitation services are by definition those that effectively maintain the barriers to contamination and infection from human faecal waste. Particularly in the high-density urban context of informal settlements, where sharing overburdened facilities with several families is a norm, the need for community involvement in risk management on a daily basis increases dramatically.

Much evaluative research has found that local authority approaches to sanitation service provision did not adequately incorporate community involvement. In their 1998 evaluation of three large study areas of sanitation interventions, Dunstan and Associates (1998) found that the local authorities interviewed, “define sanitation, almost universally, as toilets” (Dunstan et al., 1998: 45). In concurrence, Pybus, Schoeman & Hart (2001) found that many projects are seen as successful by local authorities in technical objectives, despite the level of service not meeting recipients’ expectations or wishes. They concluded that the widespread failure of systems appears to be partially due to inadequate community involvement at the planning stage (Pybus et al., 2001).

Specific to the urban context, a study of greywater management in dense informal settlements across South Africa, links the degree of community organisation to evidence of “an increasing preparedness to be involved in environmental management of the settlements” (Wood, Uchronska, & Valashiya, 2001). Active community roles and responsibilities are shown in this study to be directly linked to the sustainability of interventions in “best practice” waste management cases (Wood et al., 2001). These examples are among many that continue to discuss community

involvement as a consultative and organisational function in a social development sense.

Research on the difficulties of provision and maintenance of services in dense, informal settlements reaches conclusions that generally reflect on the role of external agents rather than on community-level contributions to service provision. Wood et al. (2001) identify key issues that stand out as major constraints to changing local authority approaches to service provision:

- Fragmentation of services between local authority departments is manifest where engineers handle water and sanitation except where it is “the role of health departments to provide interim bucket toilets” to squatter camps; and
- There is “a general misunderstanding of the role of the Local Authority in service provision and the communities themselves in environmental protection”.

(Wood et al., 2001:13)

Communities recognise the lead role of the local authority as the legal authority that appoints consultants and contractors whose approach is shaped and limited by the brief of the appointing agent (Dunstan et al., 1998). With the onus on local authorities to ensure adequate services, the Dunstan and Associate’s (1998) report emphasises their responsibility to see that contracted work is done properly.

Research across the country over the past decade has persistently research flagged the need to intensify efforts to apply community development principles in sanitation service provision. Extensive attention in research and evaluation in South Africa has largely concerned the social benefits of community involvement in planning and decision-making, with particular emphasis on representation of recipient concerns and interests regarding service provision by external agencies.

Some key issues that have been identified in this respect will be briefly discussed later in this chapter, before moving on to explore a relatively neglected local economic development aspect of community involvement in service provision.

Perhaps the significance of direct economic benefit, such as the prospects of income earning opportunities for those living in poverty, has grown alongside the urbanisation of poverty and increasing concern with providing basic services to urban informal settlements.

3.2.1 Community involvement as a social benefit

As far back as 1992, Pearson reflects that community involvement that is based on *liaison with local committees is a level at which most problems exist* (Pearson, 1992) for the implementation of sanitation programmes. Approaches that embrace community participation by relying heavily on this mechanism, and expectations that community development will result from the establishment of representative project committees, encounter serious barriers that are inherent in this assumption.

Even where an acceptable local decision-making structure that has the support of the community is in place, as a necessary component for sanitation provision projects (Pearson, 1992), the degree to which local committees are expected to reach all the target groups and deal with multiple issues within communities is unrealistic (Pybus et al., 2001). Pybus et al. (2001:26) point out that local committees “do not have the finance, infrastructure or other resources to deal effectively with all aspects of a project...” which need different levels of responses”. Community involvement in sanitation provision can thus not rest solely on “organized involvement of a community in a development effort with all major groups being represented” (Pearson, 1992:9), which is the most commonly applied definition.

However, the evaluative study conducted by Dunstan and Associates (1998) confirms that local perceptions of services provided to communities play a major part in their efficacy. Where the perspective of users was included to inform evaluation of the sanitation systems provided, apart from inadequacies in the systems themselves, a significant finding was an absence of consultation by providers (Dunstan et al., 1998). The report emphasised that “people have been under-consulted...and under-

educated about the use of the system they possess” (Dunstan et al., 1998:47). Subsequent research into the difficulties of provision and maintenance of services in dense informal settlements concurs in that “service provision has historically not involved detailed discussion with the community” (Wood et al, 2001:12).

While community hygiene beliefs and behaviours needed addressing in all their study cases, Dunstan et al. (1996) suggested that local authorities must be targeted for an education that expands their own definitions of sanitation beyond the narrow role of providing toilets. Their report concluded that “the most urgent of all the needs to be addressed” is to target not only communities, but also local authorities, with “a massive education campaign before a service like sanitation can become viable” (Dunstan et al., 1998: 47-48). It is apparent that there are different parties that are engaged in realising any form of community involvement, and that consultation and information sharing are an important part of the process.

Adequate communication takes place between parties, and cannot be achieved through a one-way flow of information, as Pybus, Schoeman and Hart’s (2001) study of levels of communication take pains to point out. Their study focuses on effective communication between ‘providers’ and ‘users’ of services, as a key aspect of all phases of a sanitation project cycle. Involving 14 communities in four provinces as well as six consulting engineers, research aimed to establish the actual understanding achieved between developers and communities (Pybus et al., 2001).

Pybus, Schoeman and Hart’s (2001) study goes on to report that the degree to which local committees are expected to reach all the target groups and deal with multiple issues within communities is unrealistic. Community capacity building for strengthening involvement is defined as “an overarching concept for awareness creation, participation, knowledge transfer and training” (Pybus et al., 2001:34). They conclude that reliance on local committees is misplaced. On the other hand, they criticise skills-oriented approaches in that:

- training that has no relation to community mobilisation or awareness appears to be synonymous with capacity building, and
- capacity building activities were at a low key (Pybus et al., 2001).

While the role of civil society and local-level community governance is acknowledged as providing the context for adequate sanitation, Rossouw and Crous (2000) suggest that additional support is required for well-functioning communities. This involves addressing issues of systems or structure where they are lacking. They suggest that *it is cost-effective to invest in community-based resource centres to enable and support service-related tasks to be carried out more competently, in both the short and the long term (Rossouw & Crous, 2000)*. Community development approaches that rely on sanitation promotion and training inputs, and costly short-term staffing, have doubtful benefits if not invested in clear, delineated and manageable roles and responsibilities that have longer-term benefits.

The literature reviewed suggests that community involvement has different forms and aspects that influence interpretations. A dominant understanding of community involvement in sanitation service provision takes on a social development mantle in that local-level civil society and recipient household responses, roles and functions are a dominant feature in the literature. All appear to agree that social considerations are critical to the successful provision of adequate sanitation.

However, apart from the communication functions of consultation, facilitation and negotiation through local committees, concerns around functions related to technical aspects of provision remain largely in the domain of external providers.

3.2.2 Community involvement as an economic benefit

The extent to which communities are actively engaged in a range of different kinds of functions is undoubtedly influenced by the way in which partnerships between the external providers and local actors are formed within the social context. On the

whole it appears that concerns about providing the service, as regards the sanitation system itself, are viewed as essentially technical considerations that are associated with the role of external providers.

Municipalities have tended to respond to urban sanitation backlogs by extending commitments to increasing the delivery of waterborne sewerage (NASCO, 1998) notwithstanding the lack of sufficient financial resources for this level of provision. On the other hand, there are many instances where informal settlements are subjected to *forms of rudimentary or temporary services that have failed to forestall public health hazards*. Indeed, such provision has often exacerbated a public health problem (NASCO, 1998).

Such rudimentary options are often provided to informal settlements at unaffordable operation and maintenance costs (City of Cape Town, 2002), as demonstrated in the excessively high operating costs of black buckets and chemical (“container”) toilets. Efficiency and sustainability appear to be sidelined in providing basic services in this instance, as municipal resources are drained while substantial operating costs are paid to suppliers outside the community. Regardless of the technology option or levels of service that may be offered, substantial investments of both capital and operation costs are inevitably incurred.

In the context of national guidelines and strategic opportunities to actively move towards finding solutions, wider experience may provide useful lessons from grappling with similar challenges over a longer period. One cost-effective strategy that municipalities may adopt is the encouragement of small, community-based service providers. Arising from an ongoing search for ways to reduce costs for more effective provision to people living in poverty, this practice is not a new concept or phenomenon. East African experience, for example, can demonstrate an alternative approach to service provision applied over the past decade. This experience may be drawn on to aptly inform local authority initiative in South Africa.

3.2.2.1 Community-based services providers beyond the borders of South Africa

It is of note that the strengths of small-scale service providers lie in the very areas that constrain local authority capacity to deliver to the poor who are settled informally. Experience-based lessons illustrate persuasively that community-based procurement will strengthen capacities for a cost-effective form of service provision.

Studies of cases in Tanzania, Kenya and Uganda confirm that opportunities exist for small-scale service provision in densely settled peri-urban communities. Small providers are noted for having access to high population density communities that are physically difficult for public sector enterprises to cover. Case study research has found that small service providers or local contractors have an innate ability to respond to the dynamics of market need and demand that characterise informality (UNDP, Field Note No. 5). This is explained in part by the multi-livelihood strategies that local contractors often employ in operating several small businesses, which enables flexibility in re-allocating their resources where and when necessary (UNDP, Field Note No. 5).

Based on experience, the Water Utility Partnership initiative in Nairobi has developed a series of steps “towards serving the poor” (WUP, www.wupafrika.org):

- Recognize and support small-scale service providers in order to reduce high costs associated with the risk of carrying out informal or “illegal” activities.
- Encompass all types of service providers in regulations that are simple, user friendly, fair and appropriate.
- Develop specific plans to improve services for the poor either directly or in partnership with small-scale providers.
- Support for the formation of small provider associations community partnerships.

The socio-economic benefits to low-income urban communities that may result from the procurement of local contractors for infrastructure and services, include an attractive list put forward by Sohail and Cotton (2000), summarised below:

- direct and indirect economic benefits to community members through various forms of procurement;
- expanded distribution of benefits; and
- reduced financial costs of provision of facilities.

Sohail and Cotton (2000) advise that the involvement of community members in the procurement process presents an opportunity cost of time that must be set against reductions in the financial cost of facilities and services.

Managing and monitoring improvements in wider poverty relief and the performance of contracts should be based, they suggest, on appropriate performance indicators (Sohail & Cotton, 2000). Sohail and Cotton (2000), ultimately produce a comprehensive checklist of indicators as a tool to evaluate performance of community-based procurement of small service providers. This checklist mixes and obscures distinctions between indirect social benefits and the direct economic benefits to communities through local employment and contracting of services.

3.2.2.2 Community-based employment within the borders of South Africa

In the South African context, the policy environment of local government in 2003 has begun to encourage local contracting of small service providers in concept. Current DWAF guidelines for choosing water services providers advise that "it will not be necessary for the water services authority to go through a competitive tendering process" in selecting community-based service providers (DWAF, 2003:14). Nevertheless, local authority initiatives that include the employment of community-based service providers in preventing the health hazards created by poor use, dysfunction and inadequate maintenance of sanitation on a local level, are still scarce.

However, as early as 1990, the African Development Forum (ADF) reports that studies in South Africa had earmarked urban services as a growing area of opportunity for expanding economic development beyond the boundaries of a well

developed construction industry (ADF, 1990). At that time it was recognised as vital to the broader economy that “policies and systems must be put in place to support the involvement of the communities for whom urban services are targeted” (ADF, 1990: 4). This form of community involvement was concentrated on the cost benefits of employing local unskilled labourers.

The African Development Forum (ADF) (1990) study set out to understand various approaches to increasing socio-economic benefits, based on past and existing projects in the East Rand and PWV and to establish guidelines for projects. Findings stated that, typically, capital-intensive construction techniques that minimised the use of labour resulted in the development opportunity and benefits to the target community being minimised. In attempting to maximise the use of local labour in construction to increase socio-economic benefits while providing residential infrastructure, three different possible approaches were identified.

The ADF (1990) report describes these as follows:

- The *Labour-intensive* approach is the “economically efficient maximizing of labour in the construction process” where the project is designed for high labour input. Local labour is directly contracted and paid on completion of tasks with the intention that spending is local, thus stimulating the local economy (ADF, 1990: 6).
- The *Labour-based* approach, on the other hand, maximizes use of local labour, but endeavours to further development through building technical and entrepreneurial skills and abilities of those employed.
- The *Community-based* construction is defined as involving community input into design and implementation, with the goal that “the community takes ownership of the end result” (ADF, 1990:9).

The way that community involvement may be mixed with civil engineering work is discussed with a strong recommendation that “tasking” under “a contract system is used” (ADF, 1990:11) with an extended goal of creating “a number of entrepreneurs

out of the pool of labourers” (ADF, 1990:11). While it is notable that no project could actually be found for this study that fitted within the definition of “truly community-based”, where involving the community in the initial design and the implementation was evident (ADF, 1990:12), the report continues to include this category.

The common purpose was, explicitly, to pay local residents, who in turn spent the money in the immediate area, thus stimulating the local region’s economy. In the *Labour intensive* approach this stimulus is confined to the duration of the project, whereas the *Labour based* approach invests in skills development of those employed, and *Community-based* skills development contracts budding entrepreneurs in ‘piece-work’ or measured packages of work (ADF, 1990). Short-term poverty relief in the form of labour-intensive approaches such as described above, may be likened to the use of local labour encouraged in infrastructure construction phases of sanitation delivery.

Sustaining a service such as sanitation, however, suggests potential for extending variations of employment beyond the construction or delivery phase of a project. Rossouw and Crous (2000) suggest that the operational abilities to manage, administrate, and apply technical and financial abilities for the tasks and functions at hand (Rossouw & Crous, 2000), require support through viable partnerships.

However, a distinction needs to be drawn between community-based organisation taking on an overall management role through local committees, and independent community-based service providers taking on operational functions of sanitation systems. Where inherent poverty and unemployment may overwhelm latent capacity, it appears to make more sense to leave the responsibility for overall management in well-supported (financially and administratively) public sector hands, rather than attempting to replicate this public sector role locally.

3.2.3 Community involvement themes

The relative wealth of literature emanating from over 50 years of rural community development experience has much wisdom to offer on participatory methodology and inclusive approaches. However, in discussing the meaning of community involvement, digression from holding this research focus on the challenge of service provision in the context of dense, urban, informal settlements is deliberately avoided. For the public sector, the particular challenge of involving communities in sanitation service provision in the context of urban poverty has relatively recently increased in intensity.

Much of the literature on approaches to community involvement in this context reflect a lack of differentiation between the voluntary deployment of civil society (household, committee and social networks) as beneficiaries, and community-based employment for specific tasks and functions associated with providing services. Within broader concerns about community involvement in sanitation provision, different issues may be separated into two different themes. These are:

- Representation of community concerns, interests and responsibilities as recipients and users of sanitation services; or,
- Direct involvement in construction, service delivery, operation and maintenance as functions in providing sanitation services.

A distinction between these themes is not reflected in most literature, policy guidelines or reports of practice, where a mix of social, technical and economic aspects tends to fall under an umbrella concept of community involvement.

Viewed from a local perspective, there are many technical and economic tasks, roles and functions involved in effective and sustainable sanitation services that are relatively unexplored as ways in which urban informal settlement residents may be more involved in provision. The next chapter will examine, in more detail, the differentiation between the two themes of community involvement in receiving and in providing services.

CHAPTER 4: DATA ON CURRENT APPROACHES

4.1 Local authority interpretations of community involvement

Community involvement is a broad concept that encompasses complex interactive roles described broadly as: “to combine forces and share risk with local authorities” (HABITAT, 2001); “action that puts people at the centre of development initiatives” (WSSCC, 2001); “promoting community and user involvement in infrastructure planning, construction, maintenance and management” (DWAF, 2003). Two different forms of community involvement were identified in dealing with the details of data that reflected a wide range of different kinds of actions, tasks, roles and functions enacted by community residents in the context of sanitation provision to informal settlements.

The discourse of participation of the urban poor in urban developments, such as the provision of basic services, is geared towards seeking forms of engagement that are not based on charity. However, cheap or free labour, local materials and other forms of voluntary recipient contributions have become a tradition of the involvement of dispersed recipients of basic services in rural community sanitation programmes.

Inherent differences between rural and urban sanitation service provision in general, and in informal settlements specifically, suggest that alternatives to the ability to pay for services may not lie solely in traditional directions. Therefore, further investigation within current local authority approaches pursued evidence of different interpretations of community involvement, differentiating voluntary roles from community functions that were employed and remunerated.

As a distinction between paid functions and voluntary roles arose early on in the research process, this difference served as a way to sort data into two broad categories. Data is therefore sorted and presented as representing either beneficiary roles that improve civil society’s benefit from the system, or provider functions that

are remunerated for providing services that improve, operate, maintain and sustain the sanitation system.

Each case study site is discussed in terms of the roles and functions evident from across the five project experiences, which reflect the extent to which community capacities were either deployed or employed. The interpretation of community involvement as associated with these two themes is presented within the natural setting of the case study sites.

Appendices are attached to the main body of the research to illustrate that data is based on evidence, as articulated by practitioners themselves. The qualitative nature of much of the research forms the basis for interpretation of evidence that is discussed in this chapter.

4.2 Current local authority approaches in five case studies

Four study sites in Cape Town (see Appendix 1a and Appendices 2-5) and the case of eThekweni Water Services approach (see Appendices 6a and 6b) to basic service provision provided the settings where the demand for sanitation improvement was established and local authorities were engaged in responding to that demand. The appendices provide further details of the data that is summarised for discussion within the themes represented by each heading that follows.

Included in the selection was an informal settlement located on the fringes of Stellenbosch (Appendix 3a-3e), identified as illustrating an approach representing 'best practice' of community involvement in improving the management and maintenance of existing sanitation arrangements. Added to the group of Cape Town case studies, the four sites all illustrate service provision based on households sharing facilities, a predominant approach in densely populated informal settlements. Community involvement in making these shared sanitation options work is a challenge that has been approached by municipalities and non-government initiatives

in a range of ways. Project descriptions and the perspectives of key actors in all the Cape Town sites are provided in Appendices 2-5.

Durban metro (eThekweni) provides a different approach from the Cape Town range, further details of which are shown in Appendix 6a describing the programme. The eThekweni case study illustrates an approach to the provision of individual units to each household, applied across areas situated on the periphery of Durban's urban sprawl. This case study was selected to represent another metropolitan municipality's approach to basic sanitation delivery to widen the field of local government practice for this research.

4.2.1 Beneficiaries: Committee roles and voluntarism

An over-riding concern associated with community involvement, both in literature and in approaches evident in the case studies, is focused on the local authority's capacity to interact with communities. The emphasis on adequate communication between parties to establish "understanding achieved between developers and communities" (Pybus et al., 2001) was reflected in all the current approaches in this study.

The following summary shows that in both **Kayamandi** and **Khayelitsha** community involvement in sanitation improvements were based on extensive communication procedures. This was apparent (see Appendices 2a and 3a) in that:

- Go-between linkages between service providers and users was an overt aim of activities, planning, staffing and initial organising;
- Support was provided for local level dealings through information transfer to local committees for project communication purposes;
- Community input was sought by involving local committees in influencing proposals to municipalities;
- Volunteers were trained to research and disseminate information;
- Visual mapping and problem tree analysis of causes of poor sanitation engaged community-level participants beyond the local committees.

In **Joe Slovo** a partnership between the Ukuvuka Fire-stop Campaign, a Greening Project and the City of Cape Town adopted procedures for communication to the broader community through a local representative committee (see Appendix 4a). Sanitation was an add-on issue that was addressed as follows:

- Demand for sanitation was flagged by the Greening Project initiative and became an add-on to the project which was designed for access tracks, fire hydrants and electricity;
- Communication was accommodated in monthly community liaison meetings, with community leaders representing Block committees and residents;
- The councillor dealt directly with local authority officials in negotiating a budget and optional systems, which was reported to community liaison meetings where questions were raised and further discussions took place;
- Community leaders and volunteers had the responsibility of information transfer from community liaison meetings to residents;
- The Environmental Health Officer (EHO) used this mechanism for planning an education programme, with community volunteers to spread health messages.

In **Imizamo Yethu**, the extent to which the municipality engaged with residents is contained within the “Public Facilitation” brief to the consultant (see Appendix 5a). Part of the output of delivering a project plan to the municipal project manager was:

- Public meetings were held and a local project committee, that represented Block Committees and reported to the Civic Association executive, was set up.
- The consultant reported to this committee, receiving feedback, approval and ideas for overcoming constraints to progress at these meetings.
- The local committee had the responsibility of information transfer to residents.
- Meetings provided feedback and suggestions for overcoming constraints to creating access tracks, largely due to density and requiring moving of shacks.
- The local Project Development Committee was responsible for communicating with the broader community, through local block organisation.

(See Appendix 5c.)

Effective communication was seen as the key to community involvement all the Cape Town approaches, in that local committees were “expected to reach all the target groups and deal with multiple issues”, which is pointed out as unrealistic in Pybus, Schoeman and Hart’s (2001:26) study. This expectation could be detected as the basis on which the external agencies judged the success of the community involvement they had achieved.

The **Kayamandi and Khayelitsha** project processes went further in aiming to develop user responsibility and management of cleaning and maintenance beyond the voluntary household and user roles and functions. Proposals that were put forward and presented to municipalities by local project committees included the appointment of site-based staff, and a local office for administration space (see Appendices 2a and 2b).

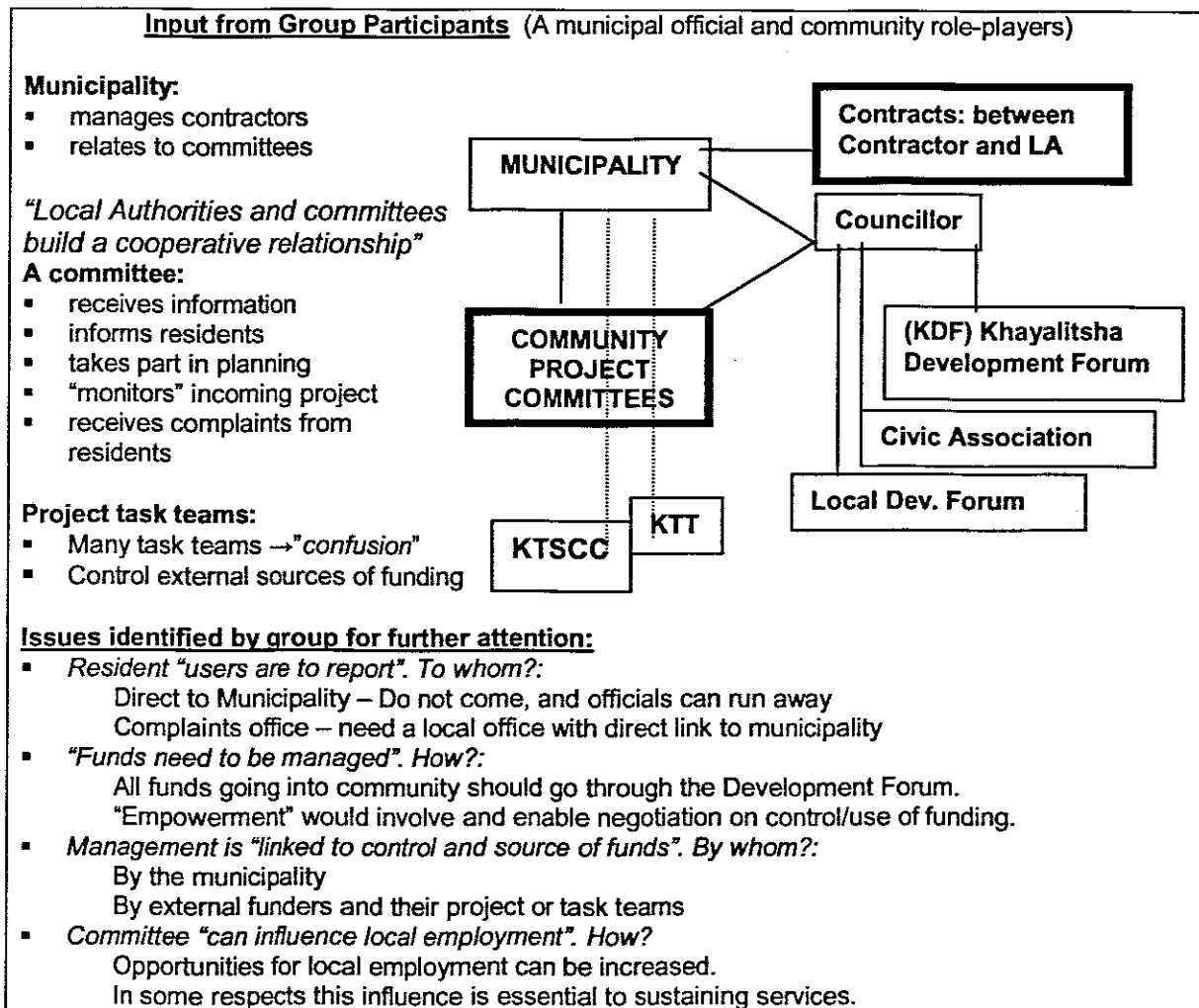
In a stakeholder validation workshop a focus group on committee roles and functions identified the key function of community committees as building relationships with the municipality (see Figure 1). The group confirmed that local committees are dependent on project management by the municipality. They also agreed that external funding of project task teams comprises another set of relationships that are not empowering if the municipality has not bought into the project. This adds another dimension to the concept of involvement, applied here to the importance of the municipal involvement in community-based projects.

The focus group felt it was essential that local capacity to monitor and maintain systems be supported directly by the municipality. Based on case study experience the group agreed that monitoring of employed services needs to be formalised to be more systematic and effective and that a local, staffed office is essential for this key function.

Figure 4.1 captures the input and comments of community committee members, project-related employees and volunteer participants in their diagrammatic

representation of the relationship between role-players from a community level perspective. Appendix 1b is attached for verification of both the source and the authenticity of this extracted data.

Figure 4.1: Cape Town - municipality, task team and committee roles and functions



(extracted from Stakeholder Validation Workshop 2)

The eThekweni (Durban Metro) approach to providing on-site, household-maintained Urine Diversion systems to each household, also aimed to communicate with beneficiary households to transfer information about hygienic use and management of facilities (see Appendix 6a). This programme, however, adopted a sequence of implementation that moved away from distinct awareness creation followed by delivery phases, and evolved an iterative sequence of each component over time

(see Appendix 6a). This shift was informed by monitoring the efficacy of financial and human investments in sanitation awareness and health promotion and the transfer of information about the technology option to the each user household.

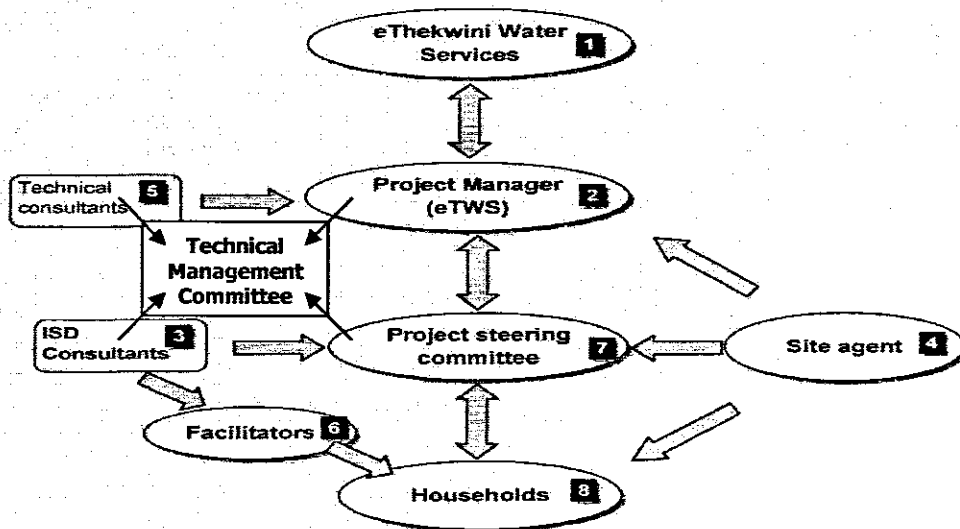
In the improved programme sequence a Project Steering Committee (PSC) is formed to act as a communication mechanism between the community and the programme manager. The PSC includes women (at least 50%), traditional authorities, existing water committees, service providers operating in the area and eThekweni municipal staff. Until the community elects a PSC chairperson, either the ward councillor or the municipal project manager acts as a temporary chairperson. Members of the PSC are paid for attending monthly committee meetings, while all other PSC “services” are voluntary. The PSC function includes:

- continuous communication between the municipality and the community through the PSC;
- support, monitoring and feedback to contribute towards improved delivery;
- allowing space for voicing of concerns, recording and resolving of social issues; and
- deciding on households most in need to address unemployment.

As shown below (Figure 4.2) the communication function of the PSC has been strengthened by adding linkages to specific project functions that are carried out through a firm link with additional employed roles established through the Technical Management Committee.

Figure 4.2 : eThekweni Water Services (eTWS), committees and community liaison

follows.



(source: eTM, 2002)

Appointed Institutional Social Development (ISD) consultants are emerging consultants based in the area, but not necessarily residents of the beneficiary community. They are selected, trained and mentored on general objectives of the project and the training of local facilitators, and attend PSC meetings.

- ISD consultants oversee local facilitators, who are residents, in informing the community about the services to be provided. They also “confirm demographic data, oversee awareness creation, health and hygiene promotion, assess preferred sanitation options, train community committees and liaise with tribal structures (where applicable), and councillors” (eTM, 2002:9).
- Local facilitators are appointed, trained and mentored by the ISD consultants to carry out household visits to disseminate project information and health and hygiene education. The education programme involves four rounds of direct contacts with each target household, conducted intermittently alongside stages of delivery.
- ISD consultants are closely mentored and monitored by the municipal ISD department and Water Services Training Division, through delegated staff.

- A formal external monitoring and evaluation function is currently out-sourced to an external social consultancy that reports to internal municipal staff.

Using local project committees may be a desirable protocol on the face of it but it is difficult in the short term for external agencies to differentiate between self-interested parties with perverse incentives and those truly representing community concerns and interests, with real skills and resources to offer the community as a service. Long-term engagement to see the project through appears to allow these qualities to surface, but not without the performance-based management by the local authority and local level monitoring, lacking in the Cape Town study sites.

4.2.2 Providers: Community-based service provision

Encouragement to “procure community-based services in conditions where people are living in poverty” (WUP) has been adopted in the eThekweni programme. An instance in the Khayelitsha case study site has also demonstrated that the vandalism of ablution facilities and the costs associated with abuse of facilities, has been reduced by employing small-scale service providers (see Appendix 2c).

The local authority’s response to inadequate services in this context was to supplement the supply of shared container toilets (5-8 households per unit) with the additional provision of an ablution facility. After the ablution facility was constructed, immediate vandalism was experienced. A proposal to solve the vandalism was put forward by the Khayelitsha Development Forum, through the councillor (Appendix 2c). A local contractor was appointed to manage maintenance, and local attendants employed to provide toilet paper at the facility were part of the local operation and maintenance contract. Adequate services were thereafter maintained at the public ablution facility.

The **Khayelitsha** intervention by the Khayelitsha Task Team (KTT) was successful in achieving its worms treatment objectives by engaging with local parents and staff at

the targeted schools in the area (see Appendices 2a and 2b). The KTT had stimulated the demand for improved sanitation to prevent worms infestations through the school-based project committees. Volunteers were mobilised by the local KTT sub-committee to undertake home-based testing of an alternative type of facility to container toilets (see Appendices 2b and 2c).

The following progression unfolded in the project between 1999 and 2003:

- The poor sanitation issue was raised with the local authority by means of a community presentation of assessment and demand for improved sanitation;
- Local authority representation on the project's management committee (KTT) by environmental health officers allocated to the project area aimed to influence the engineering department's plans for improving provision;
- External funding and supply of materials for a trial of an alternative Urine Diversion option,
- Ten volunteer households were identified by the local KTT sub-committee to undertake the trial of an experimental technical option supplied by external agents (a form of Urine Diversion system);
- Households involved were entirely responsible for the method of collecting and disposing of faeces (manually transporting collected faeces to bury in the adjacent school grounds);
- The EHO of the area monitored the trial of the externally funded and supplied option, reporting informally to KTT;
- The Councillor's role in channelling proposals for further improvements was deemed adequate for addressing sanitation issues by the City of Cape Town.

(See Appendices 2d and 2e).

At the time of the research, mobilising improved sanitation conditions beyond the schools was most effectively activated through the councillor's direct link between the local authority and the local organisation representing the residents. The proposal was developed and put forward by the community-based Khayelitsha Development Forum (KDF). The operation and maintenance of the ablution facility was

consequently improved by the municipality's appointment of a local contractor, on the condition that local residents were employed as facility attendants.

The "eyes of the community" (Appendix 2c) were said to thereafter prevent further vandalism. Observation on three site-visits on different occasions over two years confirmed that proper use, hygienic conditions and cleanliness of the facility was maintained. Attendants who were interviewed reported that soap and toilet paper was adequate as provided, and that repairs (e.g. malfunctioning washers and valves) were done when necessary (reported to contractor), while blockages were prevented by frequent checking after users had completed their ablutions.

Each of these case studies illustrate further that there are different interpretations of community involvement in servicing or operational functions for maintaining the service on a local level. This is further explored as a form of community involvement.

In the case of **Imizamo Yethu**, the existing inadequate bucket systems that were serviced by a local contractor, were to be augmented with ablution facilities (see details in Appendix 5b and 5e). Each facility was to be cleaned and maintained by locally nominated and employed attendants, appointed by the local authority (Appendices 5a and 5c). This plan entailed that:

- a consultant would report on progress in developing the plan to the local Project Development Committee Meetings;
- for each facility, three nominees for the appointment of one attendant per facility were to be put forward by the local Project Development Committee;
- an "education drive" component comprising house-to-house pamphlet distribution and an additional house visit would be led by the municipal EHO.

(See Appendix 5a.)

The possible training of appointed attendants for their function as caretakers of facilities was not followed up and did not materialise (Appendices 5c and 5e). The plan to transfer direct management of employees by the local authority to

entrepreneurships, whereby each caretaker would charge community users a small fee for their income, has therefore not been tested in practice.

In the case of **Joe Slovo**, the local authority rapidly progressed to the delivery of container toilets while a feasibility study established that the cost of a conversion to water-borne, shared units was beyond the budget available (Appendices 4c and 4e). In respect of community-level roles and functions (see details in Appendix 4a), the following points emerged:

- Community leader representation was deemed adequate for addressing sanitation provision in Joe Slovo (Appendix 4c);
- Regular (monthly) community liaison meetings continued to function as fulfilling the need for community organisation around sanitation provision (Appendix 4b);
- The EHO “Perceptions Survey” results indicated an adequate understanding of hygiene and health issues related to sanitation;
- Volunteers in the “Greening project” (food gardening) were trained as health promoters;
- Despite training 10 volunteers, a planned education drive did not materialise (see Appendix 4d).

In the above instances there was no evidence of community roles and functions in service provision beyond representation of the community and volunteer health promoters. Families sharing container toilets were provided with a lock and key and allocated a facility to share as they saw fit (Appendix 1a). A range of hazardous, hygiene-related conditions was observed during each field visit, with surrounding areas usually fouled.

In the two projects examined above, sanitation services were not the central focus of the interventions, whereas in the Kayamandi (water quality) Khayelitsha (child-health) interventions, poor sanitation had retained urgency as a major block to enabling progress of the projects aims.

The **Kayamandi** intervention produced workable plans to address the problems of overburdened ablution facilities based on community-level input (Appendices 3a and 3b). The proposed plan that was promoted to the local authority included:

- Employ local plumbers for repair and maintenance support;
- Establish a local project manager in an unused local office;
- Establish this as a complaints office for liaison between the local authority service providers, and those responsible for cleaning, maintenance and on-site repairs.

A cost-effective plan was presented by the local project manager to the local authority as a product of this project. However, the externally funded project manager did not succeed in getting the proposed plan, the key product of the intervention, adopted by the local authority. Follow-through organisation and capacity building, in the interests of progress beyond the externally funded period, were lacking (Appendix 3c).

A summary of the roles and functions of city officials, and contracts carried out by appointed consultants and contractors employed within each of the Cape Town case study sites, is given below in Table 4.1. The emergent community roles and functions associated with each project are summarised in the table as local committee or community actions that manifested in each of the case study projects. The extent to which community-level roles and functions were employed or deployed in services provision is evident in the nature of functions as summarised in the table.

Table 4.1: Summary of Cape Town study sites: emergent roles and functions of municipal officials, contractors, local committees and community residents.

Case Study	OFFICIALS	CONTRACTORS	COMMITTEES	COMMUNITY
IMIZAMO YETHU (HOUT BAY) <i>Municipal Service Provision</i>	Engineer: manages and compiles brief, appoints and manages consultant; project liaison with other departments; appoints caretakers. EHO oversees the awareness campaign.	Consultant- Plan, Public Facilitation – sets up and reports to Committee for comment. Reports to engineer. External Contractors hired for construction. Local Contractor - services bucket system	local Project Development Committee - Feedback to contractor re: Plans/ Phases, means of overcoming constraints. Informs residents, reps. of street Blocks, and nominates caretakers .	Community Health Worker reports on hygiene to clinic, Local voluntary Environmental Group does clean up campaigns. Local Contractor services bucket system.
JOE SLOVO, LANGA <i>Ukuvuka Campaign/ Greening project</i>	Project Manager (Dev. Support dept.); sets up a local liaison committee; manages consultant. Councillor negotiates for budget/sanitation with Sewerage Works dept.	Consultant appointed, reports to City of Cape Town's project manager (Development Support dept). ; manage construction Contractors . External Contractors service container toilets (weekly).	Community Liaison Committee: informs residents, organises cooperation in moving shacks; and assists with the location of container facilities. Councillor pursues the issue of sanitation with the municipality.	Block Committees : encourage co-operation by residents in moving shacks. Households share, lock and clean facilities (minimum of 4 h/h per unit). Unlock doors for weekly servicing by contractor.
KAYAMANDI <i>Western Cape Test Case (Water Stream Pollution)</i>	Municipal staff :service and repair overloaded ablation facilities. Representative Officials participate in project steering meetings.	Local Project Manager trains plumbers, liaises between municipality and the community. Permanent Complaints Office and Project Coordinator is proposed by project.	KTCSC (project steering committee) meetings are attended. Prioritised improving sanitation and the need for more toilets (survey); planned for local repairs and supervision.	Community Volunteers (14) trained to conduct survey, clean up. Volunteers (20p.-) rehabilitate 29 toilet blocks. Local Plumbers trained (13 p.) and do repairs.
KHAYALITSHA <i>Site B, KTT Worms pilot</i>	Water Services dept.'s Engineer provides facilities and consults councillors and local Dev. Forum; tenders for and appoints contractors. Municipal EHO is designated to monitor all services.	Local Contractor appointed to service and maintain ablation facilities. Employs local Attendants at facility. KTT and external funders for "Worms project" accesses external NGO funder who contracted supplier of units for UDS trial.	Councillor participates in planning. KDF (local Development Forum) addresses vandalism, suggests local contractor and caretakers. KTT Sub-Committee attends meetings and workshops; organises 10 volunteers to undertake trial of on-site system per h/h.	Households share units (5-8h/h p. unit), act as "the eyes" of ablation facility security. Local Attendants are employed residents. School staff, parents do community mapping to identify the causes of worm infestations. 10 Volunteers undertake UDS trial.

(See Appendices 2-5 for project profiles and evidence.)

In contrast, the eThekweni Water Services (eWS) division of the municipality minimised the appointment of external consultants and contractors. A dedicated internal project team of staff was designated from across construction, training and development support divisions to run the sanitation programme. According to internal reports the project functions are delegated as follows:

- The Construction Branch of eWS acts as programme manager using their own staff to manage projects, appoint local contractors and use local labour on a task basis to carry out construction activities.
- The Training Division of eWS plays a key role in linking social and technical departmental inputs and supporting skills development for implementing and maintaining sanitation services.
- The Development Support department oversees social consultants and community facilitation activities through regular progress reporting, monitoring and evaluation of impact.

Management of implementation was supported on a daily basis by a Technical Management Committee (TMC), which comprised a local PSC representative, Institutional and Social Development (ISD) consultants and designated eThekwini Water Services (eWS) staff (including the project manager). The resulting integration across social and technical aspects of the project management, and community involvement in these aspects, is summarised in Table 4.2 below:

Table 4.2: Summary of eThekwini study site: emergent roles and functions of municipal officials, contractors, local committees and community residents.

Case Study	OFFICIALS	CONTRACTORS	COMMITTEES	COMMUNITY
ETHEKWINI (Durban Metro) Municipal Service Provision	Water Services Construction division Programme manager manages project team through the TMC . Municipal staff designated as needed for their expertise. Training division oversees and supports education and training.	Local Contractors are mentored to carry out construction. Local Suppliers are set up as entrepreneurs. Local emerging ISD Consultants are trained and mentored. Professional social research consultants (HSRC) are contracted to monitor the community education programme.	Local Project Steering Committee (PSC): informs residents, gives feedback from residents to the TMC; nominates local facilitators and rotation of employing local labour from poor households.	Local facilitators are trained to conduct h/h contact visits on UDS option, health and hygiene. Local suppliers supply bricks and building materials on site. Local labourers are rotated for construction from needy h/hs. Households maintain own on-site facilities.
Technical Management Committee (TMC): all members are employed or paid for contributing to the joint management function. A representative of the PSC serves on the TMC.				

The TMC structure was established to “iron out problems” in implementation that if left unattended might escalate, and has defined functions, which are:

- recording and resolving of technical and delivery issues and allowing space for the voicing of concerns,
- monitoring the performance of locally employed/contracted teams together with municipal officials.

All people serving on the TMC, including PSC representatives, are paid by the municipality for providing a functional service of joint management

A direct management approach appears to facilitate the employment of local contractors for construction works, aided by simplified procurement and task-based payment systems (see Appendix 6a for details). According to the current programme manager, the simple technical design of the system reduces the need for employing engineering consultants. Simplified procurement procedures that have been devised for local employment are transparent to the TMC, where community involvement takes on a function-based nature for the effective management of services. The features and details of simplified procedures adopted for enabling community-based employment of local contractors and local labourers are listed below.

Local contractors:

- Specific contractor requirements avoid grey areas: payment stipulations are linked to expected time frames; contractors are required to keep detailed records of tasks completed and labourers’ rates as stipulated by the eWS. Regulations for costing and time-frames make the projects more manageable.
- Payment is regulated by unit payments for cost-effective efficiency. Control measures include 10% retention of each administration fee, held to the end of the contract and released three months after completion to rectify possible defects at the contractor’s expense.
- Sanitation units are constructed by local emerging contractors, and blocks or bricks and building sand are supplied by local individuals or small businesses.

- Local emerging contractors, preferably from the local ward/area are nominated, listed as approved by the TMC/PSC and then selected by the TMC together with municipal officials.

Local labourers:

- Labourers are sourced from beneficiary households (one labourer per h/h) to assist in poverty alleviation. Labour recruitment for sanitation allows for a minimum of five persons who live within the area of construction. The TMC/PSC assists in identifying local labour.
- The employment policy targets people most in need (focus on women, youth, unemployed and single-headed households).
- Labour is appointed for four weeks – the first week for the house connection (sweat equity) and the balance for cash.

An interview with eWS Construction division project manager (Jacque Rust, September 2004) confirmed his key mentoring role that is not reported as such in municipal reports, although acknowledged and relied upon by internal managers and staff.

The summary report below relates delivery to community-based service provision, and training to increased employment and enterprise development.

Table 4.3: eThekweni's outputs and investments

OUTPUTS	INVESTMENT
<ul style="list-style-type: none"> • 18 900 h/h being served under 19 projects • 52 000 h/h to be served <p>Basic water and sanitation delivered by 2010.</p>	<p>8 300 units 42 new projects</p> <p>10 000 units@ R50m p.a.</p>
<ul style="list-style-type: none"> • 200 local contractors trained and employed • 105 local facilitators/health promoters trained and employed • Local brick/block manufacturers employing 354 people • 8 ISD consultants (black employment) trained by eWS • Approx. 5 510 local labour employed 	<ul style="list-style-type: none"> • R 16 m • R 4 m • R 2 m • R 3.5m • R 12 m
Total of local economic development investment:	R 37.5 m

(OUTLET Number 57, Issue 1 - 2004)

In order to locate key role-players within the community, health promoters selected from the recipient community are trained to fulfil communication functions that are closely related to the use, operation and maintenance of the technology. Communication is scheduled alongside delivery milestones throughout the project (See Appendix 6b).

Considering the expectations of the impact of community involvement, the data has substantiated the differentiated nature of community-level roles and functions in current approaches. Distinguishing between community-level task-based functions as those involving either voluntary deployment or remunerated employment allows for further analysis of the explicit opportunities for community-based sanitation service provision. These may be viewed as implicit in community involvement principles in sanitation.

The different community-based opportunities for improving and sustaining sanitation services in informal settlements that are hidden in undifferentiated forms of community involvement may be distinguished as either:

- Community involvement as communication, facilitation and negotiation related to the representation of concerns, interests and responsibilities of recipients and users of sanitation services; or
- Community involvement as community-based construction, delivery and operational functions that contribute to the provision of sanitation services.

4.3 Comparing approaches and assumptions about community involvement

Opportunities for expanding on community involvement are presented within the broad range of on-site roles and functions associated with what must be done to sustain sanitation systems. Failure to attend to operational and maintenance functions on the ground result in the persistence of health hazards, undermining the purpose of sanitation delivery. Understanding how local authority approaches may make use of those opportunities as part of community involvement, and as a local

economic development initiative that targets people living in poverty, is discussed further in the following analysis.

A comparison of findings across each case study area shows the roles and functions that actually materialised as community involvement in the study-site experiences, and reflects the extent to which community capacities were deployed and employed across projects (see Table 4.1, and Table 4.2 above).

4.3.1 Community involvement as communication, facilitation and negotiation

It was evident from the Cape Town case studies that indigent communities are willing and able to inform planning and that community demand for improving sanitation is readily engaged. Despite differences in the degree and quality of communication and facilitation procedures, cooperative inputs have been attempted and pursued by both residents and their representatives, on occasion with positive effects. The kind of partnerships that local representative committees aim to build with municipalities acknowledges local capacity for a social networking role, while accepting community dependence on municipalities for project management.

In the second Stakeholders Validation Workshop (see extract in Figure 4.1 and Appendix 1b) it was noted that the core function of community committees, in their view, is “to build relationships with the municipality”. In all the Cape Town case studies the committee’s role was viewed as being based on communication rather than on specific operational functions (see Figure 4.1). Local committee functions are described as:

- negotiating on the use of funding, as all funds going into community “should go through” the local development forum or Committee (**advise and negotiate**);
- monitoring developments from a community-level perspective and providing feedback to the service providers and municipality (**inform**);
- addressing local experience that officials “do not come”, and “officials can run away” when residents report problems individually (**facilitate**);

- expanding opportunities for local employment, as committees “can influence local employment” (**advise, inform and facilitate**).

The issues identified for improving the efficiency of municipal management reflected roles and responsibilities to be taken up by the municipality in partnership with local committees. These functions are associated with roles, as follows:

- Funding of projects with different task teams comprises another set of relationships that are not empowering of the community if the municipality has not bought into the project (**municipal role**);
- Local monitoring of employed services needs to be formalised to be more effective (**community-level role**);
- A local, staffed office with a direct link to the municipality is essential for the resident users to report breakdowns, blockages and needs for repairs that are immediately evident on site (**community-municipal partnership role**).

In all but one site (Kayamandi), the extent to which community responsibility for sanitation translated into active roles and functions was limited to a representative project committee with a communication function. Where there was evidence of innovative local-level planning, as in Kayamandi, externally funded activities in line with those plans were neither sustained nor adopted by the local authorities responsible for sanitation provision.

The Khayelitsha Task Team (KTT) project delegated the role of involving the broader community in a sanitation improvement initiative to the local KTT sub-committee, which did organise 10 volunteer households to test an experimental on-site system. However, addressing the cause of worm infestation (poor sanitation) in the environment of the informal settlement, did not progress to engaging wider community involvement beyond the school-based worms treatment programme.

In both of the cases discussed above (Kayamandi and Khayelitsha), external resources and role-players remained core to achieving the objectives enshrined in

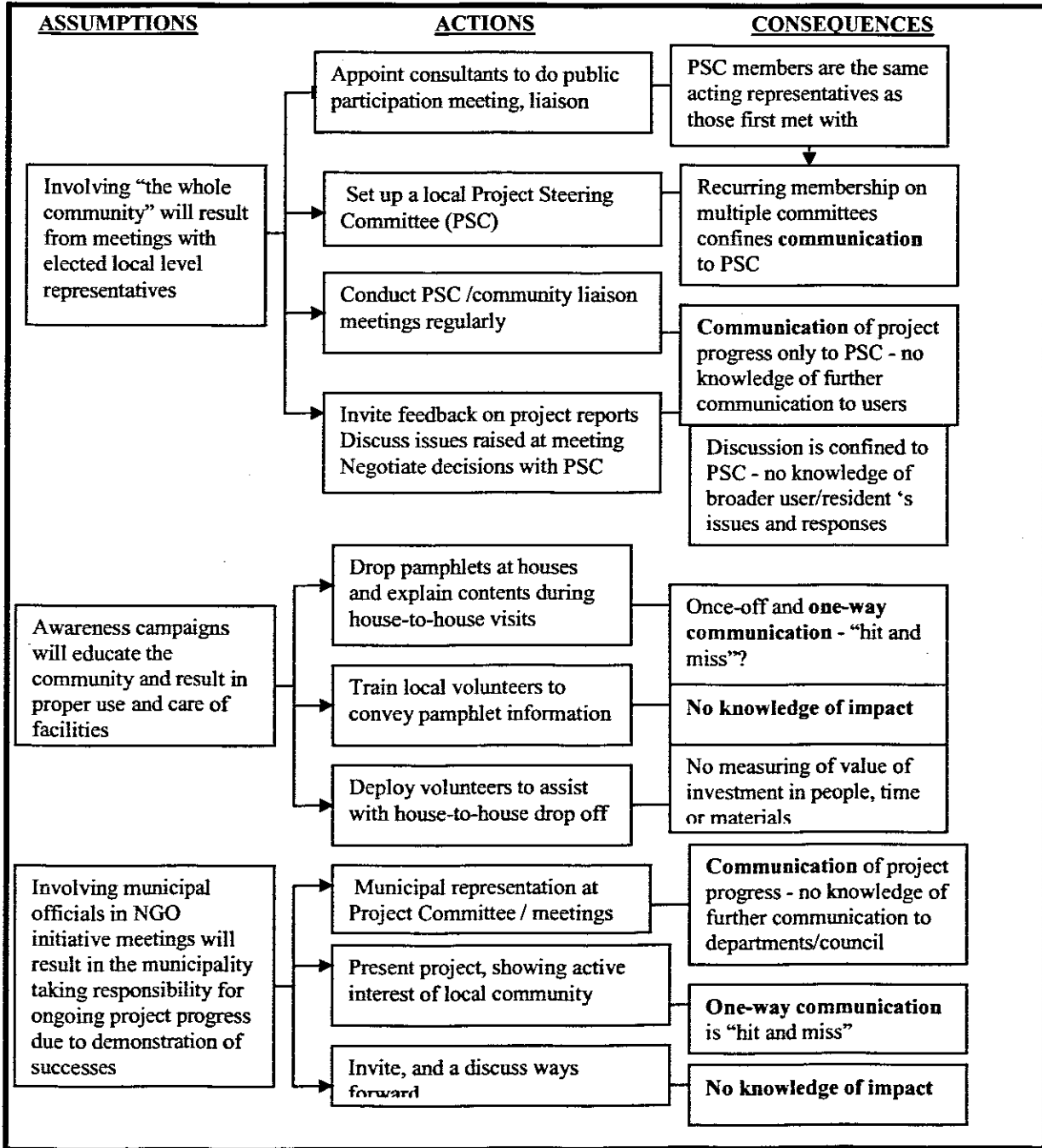
plans that had been genuinely generated with the broader participation of community residents. The project approaches carefully ascribed to the principles of community involvement by setting up ongoing to-and-fro communication mechanisms and establishing community links through a local committee.

In Joe Slovo and Imizamo Yethu, the extent to which information was transferred and understood by the community is hidden in broad, once-off awareness raising activities. Information sharing in pamphlets and house-to-house visits aimed to address vandalism, mis-use and unhygienic conditions around facilities. The difficulties of sharing overburdened systems were not addressed in the information disseminated in the “awareness campaigns”.

In both the cases discussed above, community involvement through local project committees consisted of information sharing conducted in a one-directional flow. Meetings served to communicate the plans and progress and decisions made by external service providers, and aimed at gaining approval. Discussion at meetings was largely confined to local committees giving feedback to the municipality and their consultants, making suggestions when problems arose for pre-planned delivery. Further communication about progress to affected residents was not followed up or accounted for, but left to the discretion of committees.

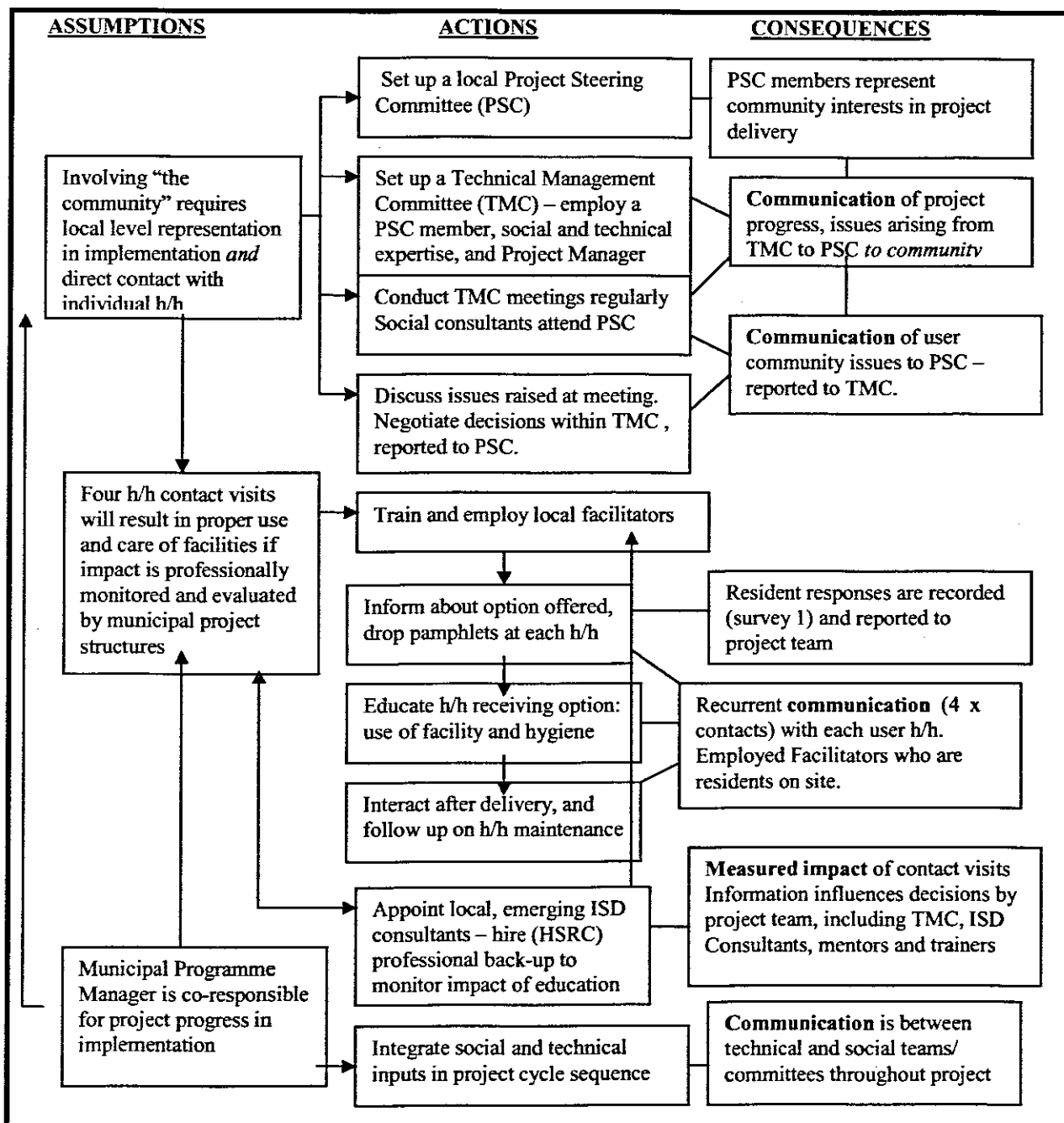
In all four cases, when practical plans to address overburdened and poorly maintained facilities were frustrated, there was a tendency to fall back on broad education and awareness raising. The kind of community involvement that would lead to solutions to the persistent dysfunction of sanitation systems. The figures below illustrate assumptions, actions and consequences as they manifested in the Cape Town case study sites (Figure 4.3), compared to the consequences apparent in the eThekweni case study (Figure 4.4). Comparative differences in conceptualising and carrying out communication as a form of community involvement are illustrated.

Figure 4.3: Communication as community involvement – Cape Town case studies



The assumption that committee meetings will accommodate adequate communication between key actors, leads to actions that constrain the space for the intended involvement of a targeted community, while leaving that space wide open to missing the targets of substantial investment in meetings and house-to-house visits.

Figure 4.4: Communication as community involvement – eThekweni case study



In comparison, the eWS municipal officials directly engage in managing the tasks that contribute to specific functions in their area of responsibility. Clear line functions are evident both within the municipality and on a community-level. While committees are mechanisms for communication, the purpose of communication is differentiated and functional – called “steering” or “technical management”.

The eThekweni communication flow demonstrates the integration of the social and technical aspects of their programme. This occurs through an interactive to-and-fro flow between structures that function as communication links between distinct functions. Community education and sanitation service delivery functions are inextricably related, but the relationship is visible and explicit. Communication links are structured to operate between different aspects of the programme that are recognisable in the specific functions carried out by different roles. A system that accommodates explicit differences, develops different function-based support structures.

In all four cases in Cape Town the end results were the same. Health hazards and overburdening of facilities has persisted after lengthy project processes, including different hygiene and health awareness initiatives, delivery of various technologies and levels of service provision. The one case in Cape Town where sanitation was improved and remained safe, accessible and functional was at the public ablution facility provided by the City of Cape in Khayalitsha, Site B, the same area targeted by the KTT. The only remarkable difference between this and other shared facilities was that the local committee and councillor's proposal was put into action. A local contractor was appointed and local attendants were employed to maintain facilities.

For decades widespread knowledge practices that are based on field-tested experience have been available to the sanitation sector, including local authority practitioners. Nevertheless, it appears that the danger of limiting and reducing communication to one-way information sharing persists in closing down opportunities for community-based involvement in improving and sustaining sanitation. Recurrent poor practice occurs across the globe (Simpson & Wood, 1998) and is not confined to the South African local authority context of sanitation delivery, as reflected by the scale of international investment in the advocacy of deeper community engagement. While community involvement is dependant on adequate communication, if the scope for interaction between municipalities and residents is confined to social and voluntary purposes opportunities are inevitably constrained, as discussed below.

4.3.2 Community involvement as roles and functions in service provision

In all of the Cape Town study sites, clearly defined community-based roles and functions that are directly related to the sanitation systems provided are scarce. Beyond the temporary project facilitation role of committees, there is a lack of evidence of community-based partnerships between local authorities and residents of informal settlements. In the comparative table below (Table 4.4.) the tendency of Cape Town officials was to rely on the voluntarism of committees to manage local actions and functions that may, or may not, indirectly impact on the sustainability of the services provided by the local authority.

Technical guidance for developing community capacities and functions within the projects was confined to the Worms Treatment project in schools (KTT), and plumber training in Kayamandi (KTSSC). Where community capacity was engaged in task-based functions with local authority agreement, in no case was this assumed as the responsibility of, nor funded by, the local authority responsible for the area.

Evidence of community-level tasks and functions that related directly to sanitation services was generated and maintained by external role-players and resources for only as long as these were available. All the areas in need received support from financial resources outside the local authority's internal budget allocations before action was taken. In all cases external stimuli were acquired through external donors to enable and drive interventions, particularly in respect of community mobilisation. The extent to which local authorities budget for community involvement, beyond catering for information meetings with representative committees, is thus not apparent in the Cape Town case study sites.

However, the extent to which sanitation systems of any kind work effectively is dependent on voluntary on-site management by the users of container units. Container toilets require that families sharing units arrange access, locking and

cleaning to make the best use of weekly collection and disposal services provided by external contractors. On-site maintenance of facilities, in particular where staffing of the ablution facility is contracted out locally, has improved and maintained sanitation conditions. Environmental health officers appeared unable to assist significantly, beyond the often once off direct communication with recipient households, which usually occurred in the mode of pamphlet distribution. There was some training of volunteers for this purpose, but that lacked follow-through of any kind.

Table 4.4: Comparison of roles and functions in providing sanitation services

Roles	ETHEKWINI (Durban)	CAPE TOWN
Managers	eWS Construction designates staff as Programme Manager Technical Management Committee (TMC) includes a PSC representative	CoCT Water Services appoints a Consultant to manage contractors Internal Project Team is established.
Committees	Project Steering Committee (PSC) represents community interests and issues, reported to TMC	Public Participation meetings (broad) are conducted prior to project implementation Local project committee is set up for liaison with consultants and during construction
Consultants	Local ISD consultants are trained and mentored on objectives of project and the training of local facilitators (attend PSC, TMC). External consultants are appointed to monitor the impacts of educational contact visits, reported to eWS	External Consultants are appointed to assess, design, plan, manage and monitor contractors. Paid a % of what the entire project will cost - the higher the whole project cost, the higher the % to consultants fee PDI consultants are given preference
Educators	Local facilitators conduct project information dissemination and health and hygiene education to households	Volunteers are used and municipal EHO manages distribution of pamphlets to households
Contractors	Local contractors are trained and paid by Municipality using a unit payment/task-based method. They get paid in accordance with delivery and accessibility to households. A 10% administration fee is withheld from each payment until the end of the contract to ensure good quality work from contractor. Registration of local plumbers , to supplement staff, is encouraged.	External contractors: Tender process can take up to 6 months to award contract to tenderer that obtains the highest no. of points. Tender price gets a max. of 90 points and the status of enterprise (ownership) gets a max. of 10 points based on adjudication. Maintenance contractor are appointed annually to collect buckets. Local SMME's can be appointed on smaller contracts (eg. MASISCO, in Imizamu Yethu). Paid monthly for work completed (source: N. Hendricks 29/01/04)
Labourers	Local labourers are paid R65.27 per day for full production as tasked by contractor and paid by municipality every 2 weeks. A min. of 5 labourers supplied by contractor and another 5 sourced by TMC/PSC from the poorest families and rotated every 4 weeks. Only 1 labourer allowed per household.	Local labourers: It is a condition in the tender document that contractor employs local labour from the area to form teams of workers. The number of people employed is decided by the contractor and the min. pay to local labour should be no less than the min. requirements of SAFCEC. At the end of employment, labourers are provided with a certificate of service.

In comparison to Cape Town, the eThekweni case study reflects the advantages of integrating the social and technical aspects of sanitation, both institutionally and programmatically. There is a distinction between the roles and functions of the PSC as primarily social, and the TMC as a significant entity involved in delivery of sanitation. This arrangement appears to have enabled a relationship to develop between the social, technical and economic aspects of sanitation service provision.

The eThekweni approach to organising community roles and functions in service provision appears to have adapted to facilitating delivery while at the same time recognising local needs. Local employment opportunities have been more readily taken up as part of community involvement in service provision. Health and hygiene promotion, as a function that firmly linked the social benefits with the technical aspects of sanitation provision, became an employed versus a voluntary role.

Further economic benefits accruing directly to residents include construction activities that have readily integrated community involvement through targeting local labour and local contracting. Whereas the management and monitoring of construction-related performance was addressed internally, monitoring of awareness raising and educational components of the projects was contracted to an external agency. However, this arrangement may come to accommodate local employment opportunities as capacity building of local ISD consultants and local facilitators progresses.

4. 4 Community-based procurement and skills development

Cape Town's approach to community involvement has not adequately enabled the emergence of defined functions for local employment in improving and sustaining sanitation services. The potential role of community-based service provision is undermined from the start, at least partly because the procurement process itself is bound by procedures and contractual arrangements between external professional

parties (see Appendices 1c, 1d and 4e). These arrangements tend to be costly and impose inappropriate “efficiencies” measured against delivery time, budgets and professional fees rather than ensuring sustainability within socio-economic realities.

On the other hand, the eThekweni Water Services programme for implementation successfully addresses preferential procurement, employment issues and skills development opportunities simultaneously. Local authority management decisions and municipal resources that are made available to develop particular roles and functions control the extent to which employable roles and functions may emerge.

Informal mentoring and formal training is associated with community-based procurement and developing the skills to carry out those tasks and functions that community members are employed to do. The table below (Table 4.5) shows the extent to which community-based procurement and local employment are evident in the Cape Town studies, as compared with the eThekweni approach. The comparison shows the relative extent of capacity building in mentoring and training inputs that result from the eThekweni approach to sanitation services provision to informal settlements.

Investment in community capacity building and training is thus directly related to the extent that community-based procurement and employed roles and functions manifest on a local level in the implementation of sanitation provision to informal settlements.

Table 4.5: Comparing approaches to procurement and capacity building

Case Study	Project function	Procurement	Capacity building	
			Current training	Accredited training
EThekweni (one facility per household)	Project management	Water Services Construction Division	Water Services Training Division	Applied for Accreditation
	Health & sanitation promotion	ISD consultants Local facilitators	Trained Facilitators Trained to educate households	Trainer staff (x 7) as candidate NQF Assessors Levels 2 & 4 : Health Promotion
	Construction	Local contractors Local labour Tech Management Committee (TMC)	On the job mentoring with controls and guidelines On the job training	Level 4 -(San) SMME, for local service providers Level 4 -Quality Assurance; Level 2- (San.) Builder; Level 1-Builder Assistant.
	M & E	External consultant give formal feedback Local contractors supplement staff	-	-
	O & M	Municipal staff	-	-
City of Cape Town (Households sharing facilities)	Project management	External consultants Report to municipal project managers	-	-
	Health & Sanitation Promotion	Health Dept staff (EHOs)	Health Dept Resource Centre - Pamphlets - (no training at present)	-
	Construction	External contractors (to employ local labour) Report to consultants	-	-
	M & E	Health Dept staff (EHOs) NGO (KTT) pursued 2 x local appointments to supplement staff.	Formal and informal mix of reporting on health conditions (1 site: 2 x Community Facilitators)	-
	O & M	Local and External contractors (service containers, maintain ablution facilities) report to Maintenance officials (various depts)	-	-

The limitations and potential of local roles and functions that are procured from the community by the local authority appear as directly related to training and capacity building initiatives that unfold within a programme.

CHAPTER 5: CONCLUSIONS

Evidence suggests that residents of informal settlements are resourceful and able to contribute substantially to sustaining sanitation systems. Identifying opportunities for collaboration between community (users) and local authority (providers) entails a clear understanding of the potential and the limitations of social organisation and beneficiary roles and functions.

Confining community involvement to recipient or beneficiary roles and functions imposes unnecessary limits on addressing clearly identified gaps in inadequate sanitation service provision in informal settlements. This limiting approach to community involvement contributes to the persistence of health hazards as a norm, even after sanitation service provision to informal settlements. The extent to which community-based functions manifest in providing sanitation services is a neglected measure of community involvement goals.

The question that begs attention is: What do local authorities need to do to employ local people to do the jobs that their appointed consultants and contractors are not doing? A starting point is provided by recognising that community involvement may take different forms, and that direct employment of people living in poverty is a way to take up opportunities for integrating sanitation service delivery with local economic development.

5.1 Different forms of community involvement

While community-level roles and responsibilities that reside in individuals, households, neighbourhoods, committees and social networks, may influence the quality of benefits received from sanitation services, this form of involvement must be distinguished from community-based tasks and functions that benefit and strengthen the sanitation services provided.

Communication with beneficiaries, whether through local committees, awareness campaigns or broader participatory processes, is an important component of community involvement. This does not, however, constitute an adequate approach to involving communities in improving and sustaining their sanitation services.

Reliance on the representatives of recipients of services to enact community involvement may reduce the urgency of addressing dysfunction and inadequacies in service provision, as demonstrated by the Cape Town case studies. As a means and not an end in itself, adequate communication, negotiation and facilitation may enable a range of differentiated community-level roles and functions to emerge. However, apart from not addressing inadequacies in externally provided services, an approach that relies solely on representation and voluntarism constrains opportunities for local employment in providing services.

On the ground, the functions necessary to sustain technology options and systems, depend a great deal on appropriate designation of specific tasks associated with service provision. Technical and economic aspects of providing basic services tend to be separated from community involvement as concerns that lie exclusively in the terrain of external providers, be it a public sector, private or public/private agency. Taken out of their local context, technical aspects of sanitation provision are given due attention as a discreet engineering issue.

Provider roles and responsibilities are different from beneficiary roles and responsibilities. Roles and functions that are directly linked to providing the sanitation service should be identified on a community-level, as demonstrated by the eThekweni case study. Community involvement must be seen in the light of distinct functions that relate to providing benefits to the service, as opposed to those roles that relate exclusively to receiving benefits from provision.

5.1.1 Community involvement as a social development opportunity

Acknowledgement that sanitation and hygiene knowledge and practices on a community-level are imperative to sustaining sanitation tends to be reduced to broad-stroke applications of public education campaigns and “awareness” drives, which previous research has shown to have limited impact (Simpson & Wood, 1998).

Understanding the limitations and scope of the role of local social organisation will assist in making appropriate provision to support communication, facilitation and negotiation functions. Beneficiary roles and responsibilities fall into two categories of roles and functions, namely customer/user roles, and volunteer committee roles.

- **Customer/user roles** are identified with health and sanitation promotion, hygiene education and awareness of risk management undertaken by households. Ongoing promotion of sanitation and hygiene practice requires that ongoing support is computed into sanitation programmes. Information dissemination must be shaped according to the particular technology option being provided.
- **Volunteer and committee roles** contribute a great deal of added value on the basis of social good, negotiated on behalf of benefiting the broader community of recipients of services. Undermining the value of social networking with excessive expectations is a miscalculation that can be avoided. Monitoring and evaluation of public awareness, and associated practices and behaviours are *in the interests of all the beneficiaries*. *Voluntary community action* may be therefore expected in facilitating processes and ongoing communication.

Sanitation promotion that targets the user groups and recipient households is an ongoing and essential function in maintaining the whole sanitation system over time. Over and above beneficiary responsibilities as recipients of services, this function represents another employment opportunity in high-risk conditions, whichever technology is put in place.

5.1.2 Community-based service provision as a local economic development opportunity

Effective sanitation interventions ultimately manifest in the effective functioning of the sanitation system provided. It follows that maintaining risk management over time is reliant on adequate management of roles and functions on all levels and not least those that function on site.

There are many advantages to specific tasks and functions being located closest to the daily workings of the sanitation system. Provider roles and responsibilities that may be located on site fall into two categories, namely contracts and direct employment, and operation and maintenance.

- **Contracts and direct employment** may fit the needs of the abnormal conditions intrinsic to informal settlements, rather than attempting to squeeze the context into a fit with conventional contracting and project cycle models used in normal (tariff-paying) circumstances.
- **Operation and Maintenance** addresses the issue of sustainability on site where technology options will influence the level of service provision, the functions and roles that need to be fulfilled and which service providers are best suited to the associated tasks.

It has been recognised that supporting small-scale service providers has reduced the high cost associated with the risk of informal and counter-productive activities on site. This approach may encompass all types of service providers with regulations and payment procedures that are simple, user friendly, fair and appropriate. Significant advantages to investing public sector resources and capacity in local employment have been demonstrated by the eThekweni case study,

Essential to sustaining adequate services is the operation and maintenance of sanitation systems after delivery of infrastructure. As risk management and controls devolve from an off-site, external agency (the local authority or their appointed consultants) through a chain of linkages that go all the way to individual households

on site, breaks in the linking parts will result in breakdown of the system. It is thus apparent that those functions carried out on site and closest to the ground are key links in sustaining such services as are provided to informal settlements.

Inadequate project role development and capacity building in project design mitigates against the development of community partnerships. Contractual arrangements that result in service delivery arrangements that include direct local employment and small-scale providers must be developed. In addition, the sustainability of sanitation systems in informal settlement conditions will be considerably strengthened by effective local-level monitoring of the functioning of systems, and regular evaluation of ongoing services.

5.1.3 Implications for capacity building and skills development

Investment in building on existing and potential community-based capacities to contribute to the effective use, operation and maintenance of sanitation services, must be effectively targeted by local authorities and reflected in operation and maintenance budgets. The sustainability of each technology option depends on appropriate roles and specific responsibilities being located closest to the sanitation system.

Further support for sustaining services on a local level will add substantial value by generating and encouraging employment opportunities in situations of poverty and scarcity. Before capacity-building investments and activities can be developed, explicit community-level roles and functions must be identified and defined for each local context and technology provided. Implicit in the adoption of community involvement in sustaining sanitation systems are investments in existing capacities that are located closest to the day-to-day elements that affect sustainability.

Training of utility staff and the allocation of budgets for training that is based on specific plans to improve services for the poor, can achieve the short-term benefits of

once-off activities, while the potential for enabling longer-term socio-economic benefits will unfold over time. As an effective form of community involvement, direct employment or partnerships with small-scale providers will inform the training of specific technical, administrative and management competencies. Targeted skills training and mentorship should continue through the construction phase to operation and maintenance functions once systems are in place.

Appropriate investment in building on local capacities for sustaining the proper use, operation and maintenance of sanitation services must be more effectively targeted by local authorities.

5.2 Recommendations

There are various roles and specific functions to be fulfilled on different levels in the quest for providing adequate and sustainable sanitation to informal settlement communities. For the purpose of informing project planning and guiding management, it is therefore recommended that:

- specific roles and functions that may be fulfilled on a local level are identified at the planning stage,
- provision is made in budgets to support and build appropriate community-level functions,
- procurement procedures are adapted in consideration of sustainability.

An initial process of information sharing and to-and-fro communication with representative committees, while targeting resident users through broad awareness and household education, should accommodate the next phase in a continuum from construction to operation and maintenance.

The substantial servicing costs of technical options, such as communal ablution facilities and container toilets, provide immediate opportunities for SMME and workplace skills development as meaningful poverty alleviation objectives.

Contracting local service providers and employees along with associated skills training and mentorship must continue through to operation and maintenance services once sanitation infrastructure is in place.

Municipalities must ensure that capacities, resources, the tools and equipment that enable the optimal functioning of specific community-level roles and functions in service provision are in place, as part of their public sector responsibility. It is a recommendation of this research that community involvement achievements are measured against these objectives rather than gauging performance in terms of adherence to processes.

As community involvement continues to be viewed largely as a process, it is best understood as a means by which to achieve objectives. It is recommended that the outcomes of community involvement that manifest in measurable substance are applied as the indicators for measuring progress and achievements. In the context of basic sanitation delivery to urban informal settlements, the extent to which local residents are employed and community-based service providers are engaged in service provision will reflect relative success. Successful community involvement will thus be measured in a value related to sanitation services that is significant to people living in poverty.

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APPENDIX 1a: Roles and functions of officials, contractors and community across Cape Town case studies

CASE STUDY	OFFICIALS	CONTRACTORS	COMMITTEES	COMMUNITY
IMIZAMO YETHU (HOUT BAY) <i>Municipal Service Provision</i>	Engineer manages and compiles brief, appoints, and manages consultant; Project liaison with other departments; Appoints caretakers. EHO oversees awareness campaign.	Consultant plans, conducts public participation, sets up and reports to committee for comment. Reports to Engineer. Appoints construction contractors . Local contractor services bucket system	Local project committee gives feedback to consultant/contractor on: plans, phases, means of overcoming constraints. Informs residents through Civic reps. of street blocks. To nominate local caretakers .	Community health worker reports on hygiene to clinic. Local environmental Group conducts clean up campaigns. Local contractor services bucket system.
JOE SLOVO, LANGA <i>Ukuvuka Campaign/ Greening project</i>	Project manager (Dev. Support) sets up community liaison committee. Councillor negotiates for budget/sanitation with Sewerage Works dept.	Consultants and contractors appointed. Regular reporting of progress to City of CT's Project manager (Dev). Contractors service container toilets (wkly).	Community liaison committee: Informs residents and organises cooperation in moving shacks. Pursues issue of sanitation and location of facilities.	Block committees get co-operation by residents in moving their shacks. Households share facilities (4 h/h per unit) unlocking doors for weekly servicing by contractor.
KAYAMANDI <i>Western Cape Test Case (Water Stream Pollution)</i>	Municipality services the overloaded ablation facilities. Representative officials participated in project steering meetings.	Project manager trains plumbers, liaises with municipality and community. Permanent complaints office and project coordinator proposed.	KTCSC (steering committee) meetings. Prioritised improving sanitation, need for more toilets (survey). Plan for local supervision, repairs.	Community volunteers (14) trained to conduct survey, clean up. Volunteers (20p.) rehabilitated 29 toilet blocks. Local plumbers trained (13 p.), do repairs.
KHAYELITSHA Site B, <i>KTT Worms pilot</i>	Engineer provides facilities, consults councillors, tenders and appoints contractors. EHO monitors sanitation services.	Local contractors to service and maintain public ablation facilities, employs local attendants at facility. KTT Worms project access funders and supplier for UDS trial	Councillor participates in planning. KDF – Dev. Forum address vandalism, suggest local caretakers. KTT Sub-committee - meetings and workshops. Organised 10 volunteers.	Households share units (5-8 h/h per unit). Act as "the eyes" for security of public ablation facility. School staff, parents do mapping to identify cause. 10 volunteers - UDS trial

APPENDIX 1b: Community focus group – interaction with officials

STAKEHOLDER VALIDATION WORKSHOP (number 2)

Date :13th September 2002

As the Stakeholder Validation Workshop followed a Quarterly PSTT Meeting, some of the broader provincial stakeholders in attendance chose to remain as a matter of interest. Those involved in sanitation delivery represented the four case study sites, including a local authority official, local contractors and community role-players.

Workshop programme:

1. Summary of progress in research
2. Positive and negative experiences in projects (ice-breaker)
3. Presentation of Sanitation Delivery issues in study sites– presentation of tabled data
4. Validation of key elements drawn from all sites in focus groups

Ice-breaker: Your *Positive* and *Negative* project experiences

The workshop participants were asked to write down their significant *Positive* and their *Negative* experiences as individuals, during their involvement in their own project sites.

POSITIVE	NEGATIVE
<ul style="list-style-type: none"> ▪ Good cooperation from communities (Kayamandi) ▪ Good interaction with all role-players (Kayamandi) ▪ Integrated Development (Im. Yethu) ▪ Good participation (Im. Yethu) ▪ Brought pride to affected residents (Im.Yethu - official) ▪ People-centred project management (Im.Yethu - official) ▪ Health Risks reduced (Im.Yethu - official) ▪ Positive Role played by authorities (Im.Yethu - official) ▪ To educate people with HIV and encourage them – we are there for them (Siyakhana Project) ▪ I was in the Quaker Peace Centre and I learned how to solve the conflict between 2 companies and people – I know everything now (Joe Slovo Greening Project). ▪ To plant vegetables is better, because we sell vegetables and can have something at the end of the day (Joe Slovo –Greening project). ▪ We want to continue with the garden if we can have someone to thanks us (Joe Slovo – Greenbelt) ▪ Education by KTT and providing toilets to the community and school help a lot (KTT- sub committee). 	<ul style="list-style-type: none"> ▪ High expectation from community (Kayamandi) ▪ High population and density – lack of space for positioning (Im.Yethu - official) ▪ Lack of cooperation with departments (Kayamandi) ▪ Lack of funding (Kayamandi) ▪ Poor legal strength of community (I.Yethu - committee) ▪ Too far for effective research? (Im.Yethu official) ▪ Not all the areas that need facility could be addressed (Im.Yethu - committee.) ▪ Capacity / Funding (I.Yethu- official.) ▪ Political interference (I.Yethu. - committee) ▪ Lack of funds from other departments (Im.Yethu -official) ▪ Municipality failed to bring water where it is needed (Im.Yethu.- contractor) ▪ It is very hard work for us to work for nothing. It is very hard to clean and plough in the garden with your own hands (Joe Slovo – Greening Project) ▪ I don't see any movement – we never even get a certificate (Joe Slovo – Greenbelt) ▪ Community buy in (KTT) ▪ Funds (KTT) ▪ Lack of sanitation causes Worms, especially in children (KTT- community)

<ul style="list-style-type: none"> ▪ Community Participation (KTT – sub committee). 	<ul style="list-style-type: none"> member) ▪ Insufficient toilets is the problem to the community, especially the informal settlement (Kayamandi)
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COMMUNITY FOCUS GROUP: (see extracted organogram in Figure 4.1)

Community group comprised : Joe Slovo - Volunteers and Committee members, including Langa representatives; Imizamu Yethu – Committee chairperson and a local Contractor, Kayamandi - local Project Manager and a Committee health volunteer; Khayalitsa - KTT sub committee community members and a Khayalitsa Development Forum (KDF) representative.

City official was Michael Page (MP) - CoCT Sewerage Branch – was the official participating in this group discussion. He responded to questions put forward by community members. Joe Slovo dominated discussion, serving as a case study for community participants from the other case study areas.

Creating and assessing demand for sanitation:

Community: Joe Slovo has existed since 1994, but there were no services till the year 1998 when Municipality provided container toilets. The Council saw the sanitation demand. They provided 400 container toilets. Some of them were destroyed by fire; most of them were vandalised by the community because they were too close to their shacks.

MP:The numbers of the container toilets left now (2002) are 190.

Meeting the demand for improved sanitation:

Community: Unresolved issues:

- Location of toilets
- Type of toilets

In the past there were two types of toilets that were provided for the informal settlements: bucket system and container toilets. Community rep's said they need flush toilets, but the engineers said it is difficult for flush because of payment (water cost a lot of money) and there is no one looks after or owns it.

MP: It is difficult to cater for temporary residents. Temporary status has to be sorted out before underground pipes can be constructed, because they are expensive. A feasibility study (estimated cost R 500 000) is being conducted on the councilor's request.

Meantime:

MP: The Municipality can provide 1100 container toilets - one toilet per 4 families, within the R2M budget negotiated by Councilor. Container top structures can be re – used for flush if possible will need more money. Meantime they are using their self-pit latrine toilets.

Community: They are using their own pits, the bush or the flats toilets because they have no choice, and they will continue using it because container toilets will be shared. Location of the container toilets must be acceptable to residents (the community leaders will liaise with the community to find a place for them).

Questions from community members to official (Michael Page, Sewerage branch):

- Who services the pits?

MP: In the meantime nobody does that.

- Can more sanitary toilets be built in Joe Slovo?

MP: Yes, but in a form of Container toilets only.

- Why temporary, to be moved at a later stage?

MP: Temporary issue is depends on Langa Community, not Joe Slovo only.

APPENDIX 1c:

Cape Town's strategy in 2003

Interview with City of Cape Town (CoCT) officials - 24 August 2003

Respondents: Mr. F. van Niekerk (Dev Support dept.), Ms. L. van Oordt (Health dept.)

1. Update on draft Health Department Strategy:

L. van Oordt (EHO), representing the health department's dedicated Working Group member compiling a draft strategy, explained the status of the document to F. Van Niekerk, the delegated manager for implementing the city's informal settlements strategy. Dr Ivan Thoms (Health Department Manager) had provisionally approved substance of strategy but requires that drafted document be "formatted for general consumption".

- Cooperation between departments will be enacted through an informal settlements upgrading Project Team made up of dept. representatives.
- Strategic Planning Framework has been adopted by the health dept.'s Working Group. Dr Thom's requested adaptations that divert intentions.
- Prioritisation of informal settlements, based on priority zones, is still underway due to another audit and inclusion of Mayor's "Listening Campaign" outputs.

Comment: Concern about the plan to engage Consortia of Consultants from outside the city to conduct the strategy was expressed by the EHO, and the health department's control over management of consultants was raised.

- Building EHO capacity to oversee programmes forms an important part of the health dept's strategy.

It was agreed that the project team must address the issue of managing consultants, particularly the concern of health dept EHOs about controlling quality. Representation of Health dept. dedicated working group was identified as key to ensuring the aim to integrate and coordinate across city departments.

2. Update on implementation of the CoCT's informal settlements strategy:

F. Van Niekerk explained that the CoCT's strategy (as presented by D. Hugo, Implementation Manager, at a WISA meeting in July 2003) has been interpreted into implementation and added some aspects.

2.1 Consultation, communication and facilitation has been added as an important component of implementation, aimed at buy-in from communities, which involves:

- communication of current crisis situation;
- adding the objective of consultation;
- ensuring that all stakeholders are consulted and involved.

Implementation involves targeting of local ward councillors and community leaders for meetings. Presentations to broader groupings will be followed by a workshop for community feedback a week later. CoCT's Executive is still to approve this strategy, after which community engagement will be based on prioritisation.

2.2 Community education element will be coordinated and linked across several departments, to include:

- solid waste management, disaster management, health issues, etc;

- using existing materials and resources of the different departments, and drawing on an audit of the CMC Resource Centre materials;
- departments that will fit together, working in particular settlements;
- Communication and Education people will develop more definite programmes for engaging settlements, as well as a Programme Identity (logo).

2.3 Technical Options

- Hierarchy of standards have added another 'Temporary' level at the bottom of scale, for unsuitable and private Land.
- To accommodate cases on private land a legal document/opinion has been prepared that requires political approval. With consent of owner, costs for emergency/temporary services will be carried by the city. Where there is no consent, a By-law (takes one year) will be promulgated. In excessive immediate needs, a medical officer of health is to advise delivery priorities.
- Rudimentary services stand in the configuration of Levels of Service (LOS).
- In line with a national emergency level, 5 families may share 1 toilet facility.

2.4 Implementation update

- Re-prioritisation is underway, with the current year's budget shrinking to about R28mil. due to lack of city capacity to spend R53mil. in current financial year.
- A spreadsheet is being produced for prioritisation and ranking – criteria reactive to data on spreadsheets (e.g. how many standpipes etc)
- Health inputs to Audit to come (Chris O'Connor).
- Implementation will start in November 2003 and have delivered hard services on the ground by end January 2004.
- Programme to tie in with Housing Programme – some settlements have already been identified.
- Boundaries of areas to be established, dates to be set for facilitation to begin.
- A coordination team with servicing, housing, community services, etc. legs is to be endorsed by the Mayor. There may be a few changes.
- Consortia will be appointed to work in 3 Areas. A project office with a planner (Johan Keeler), engineer (Denzil Faure), and a community education link.
- Develop best practice believing there are competent people. "Best" is currently Containers, serviced by external contractor who is paid for the service.

Outstanding Issues/Questions:

1. How is health department going to manage consultants in respect of health and sanitation promotion? Who is going to drive the Health dept. strategy?
2. Is the pro-poor point of view factored in? What are the pro-poor strategies?
3. Are local employment opportunities coming out in city's Requests For Proposals (RPF) process, roster system? – O&M and M&E gaps are acknowledged but not yet addressed.
4. What capacity-building plans are underway for staff and community?
5. How will operation and maintenance of different levels of service, and monitoring and evaluation of services, establish what is enough?

APPENDIX 1d: Cape Town's Strategy in 2004

Interviews with City of Cape Town (CoCT) officials: Dec 2003 – Jan 2004

Respondents: Denzil Faure, N. Hendricks, F. van Niekerk, Dave Hugo.

Research Assistant: Jessica Katz

- **City's Indigent Policy:** Policy to ensure rights of poor upheld and basic needs met in a sustainable and affordable manner through the introduction of: pro-poor consumption tariff structures for water (6kl free p/month); sanitation (4.2kl free p/month); electricity (30kwh electricity free p/m); and solid waste (free waste removal for properties less than R50 000).
- **Background to budget:** The background to the city's present strategy to upgrade informal settlements in Cape Town is informed by the budget formulated by the ANC/NNP coalition Executive Team. City's budget for upgrading informal settlements came out of the Mayor's Listening campaign conducted early 2003 to encourage public participation.
- **City's budget:** In June 2003, R104,3 million was set aside by the City of Cape Town (Executive council) for servicing informal settlements in this financial year: R13 million for sanitation and R1.5 million for providing water . The total budget for the provision of Rudimentary Services was approx. R58 million (Hugo, June 2003).
 - ⇒ The capital budget for rudimentary services was cut to R28 million (sanitation to about R3 million) in Aug 2003 (van Niekerk, Aug. 2003) due to lack of implementation.
- **National budget:** This year the City will receive R159 million for poverty relief from National government to be spent on: free basic water to IS (Informal Settlements); free refuse removal and cleanups in IS and subsidised refuse removal for properties under R125 000; grants for new Indigent policy; urban renewal projects in Khayelitsha and Mitchell's Plain
 - ⇒ CCT has recently given been allocated national funding from DWAF, about R41 million, for basic services (sanitation) by March 2004.
- **Inability to implement:** The reluctance of delegated city officials to take risks, hence accept responsibility, contributes to the inability to spend budgets set aside for implementing services. To date (Jan. 2004) what's left of the budget (about R3 million for sanitation) has still not been spent.
 - ⇒ Instead of implementing services, city officials have been working on an audit since Jan. 2002, still incomplete in Jan. 2004. The over-cautiousness of the city is related to statements such as, "City government has a large responsibility to plan carefully and wisely so that we grow our city without putting its finances at risk in the long term", found in the Mayor's speech and the City's budget document for 2003/4.

⇒ Lengthy and broad information-sharing processes that do not target intended beneficiaries appear to delay implementation further.

CITY'S INFORMAL SETTLEMENT UPGRADING STRATEGY

Types of services provided (Source: Denzil Faure, Dec. 2003):

- Steps in upgrading informal settlements:
 - 1) Provide Temporary Services
 - 2) De-densify if too dense (200 du/ha)
 - 3) Rudimentary services
 - 4) Area identified as an incremental upgrade area (hand in hand with housing) otherwise relocated
 - 5) Basic services
 - 6) Full standards – associated with top structure

Different levels of service (source: Denzil Faure, Dec 2004):

Rudimentary	{	Sanitation: 4 du/toilet	} Temporary
		Water : 1 standpipe every 200m (100m)	
		Bulk water meter: per settlement	
		Solid waste	
		Electricity: area lighting; street lighting	
National Std's	{	Tracks (incl. sewage pipes)	}
		Basic services: complies with national norms and std's (1 toilet per h/h etc.)	
		Full services are associated with formal top structure and including black tar roads, waterborne sanitation etc.	

→ City only involved in the provision of rudimentary services and considers all settlements identified as temporary with possibility of formalising in the future.

Current status of City's strategy

- Non-specific feedback meetings on service provision in informal settlements (from 1/12/03 – 9/12/03), held by City officials and attended by community leaders (and non-targeted residents), was completed in Dec. last year in various locations throughout the city. → Next step is to take compiled report on meetings and suggestions on implementation to Mayor for approval.
- Audit still being completed.
- What is left of this year's budget – present capital of R28 million with about R3 million allocated for sanitation until May 2004 (Van Niekerk: Dec 2003) - will only be spent on Sweet Home, Strip along N2 (Europe, Vukuzenzele, Barcelona), and Imizamo Yethu.
- 12 - 16 Jan 2004: Senior managers (different line directorates) met to discuss the overall strategy in implementing services in selected informal settlements.

APPENDIX 2a: KHAYELITSHA (SITE B) communication, roles and functions

INTERVENTION SEQUENCE	Assessing/ Creating Demand	Informing demand, Communication	Community Responses	Community Roles & Responsibilities
KTT WORMS TREATMENT PILOT PROJECT (sanitation-related)	<p>MRC Research results - worms infestation levels very high at schools.</p> <p>School staff and Parents do community mapping and photo-diary.</p> <p>Assessment includes poor sanitation as cause of infestations.</p>	<p>Facilitate presentations of Assessment.</p> <p>Engage schools in Worms Treatment pilot.</p> <p>Education materials, Training programme.</p> <p>Set up Community Sub-Committee.</p>	<p>Present to Tygerberg Admin./ City Task Teams.</p> <p>Attend meetings and workshops of KTT.</p> <p>Seek assistance for sanitation options.</p> <p>Visit Namaqualand UDS site, approve UDS trial.</p>	<p>KTT Sub-Committee: organise local meetings.</p> <p>KTT Sub-Committee and co-opted Councillor: communication with broader community.</p> <p>School parents assist in worms treatment</p>
SANITATION SERVICE PROVISION	<p>Provides container units and construction of ablution facilities.</p> <p>Consults Councillor, Community Dev. Forum – planning process.</p>	<p>Tenders for and appoints local contractors to service, maintain facilities.</p> <p><i>Liaises with councillors.</i></p>	<p>Address vandalism – propose local caretaker employment.</p> <p>Organize user sharing container units (5-8 h/h per unit).</p>	<p>Act as "the eyes" for security of ablution facilities.</p> <p>Councillor participates in planning processes.</p> <p>Attendants employed</p>
ENVIRONMENTAL HEALTH (LA)	<p>Motivates replication of Worms Treatment programme.</p>	<p>Container users education campaign.</p> <p>Monitors contractor services - reports to engineer.</p>	<p>EHO monitors UDS experiment.</p> <p>Attendants report to contractor.</p>	<p>Users maintain shared container units.</p> <p>Report problems to EHO.</p>
KTT/MVULA TRUST OPTIONS	<p>Namaqualand UDS site visit - options.</p>	<p>Funding, management of UDS trial. Reports to KTT Sub-Committee.</p>	<p>Provide 10 volunteers for UDS experiment.</p>	<p>Communication with broader community.</p>

APPENDIX 2b: KHAYELITSHA project profile and initiation

Background to case study project:

Source: Report - "Khayelitsha Task Team (KTT): Building partnerships that work"

KTT Project Participant Profile:

Community	Pilot Sites	Organisations	Additional Data
School community	Ikhusi – Site B Nolungile – Site C	Health Promoting Schools Programme (PAWC)	Clinic report and MRC: worm infestation @ 91% - 99% in primary schools in this area
Pupils/ learners	1 x school: 316 pupils tested for worms (91% infestation) 4 x schools: (96% of learners affected)	<u>Site B schools:</u> <ul style="list-style-type: none"> • Ntwasahlabo Primary • Sakumlandela Primary • Soyisile P.P. School • Ummamgaliso Primary • Ikhusi P.P. School • Sobambisana P.P. <u>Site C schools:</u> <ul style="list-style-type: none"> • Vuselela Primary School • Sivile Public P.P. School • Isikhokelo Public Primary • Vuzamanzi Primary • Enchotsheni Primary • Nolungile Primary School 	School-based deworming programme: + 11,000 children in 12 schools
Parents	Site B and Site C	All participating schools	Photos, posters
Residents	25 houses next to Ikhusi school, 25 households next to Vuzamanzi school	Community task teams formed from people living in these areas	Participated in survey of causes of worms – took photos on site

Collaborating organisations

External role-players	Institutions	Support services	Programmes
Educational	Health Promoting Schools: Provincial Admin of W.Cape	WCED – Curriculum Services Educational Support Services Trust	UWC: Public Health Programme
Health Services	School Nurses	Nolungile Clinic Site B Day Hospital Nolungile Day Hospital	Medical Research Council, Tygerberg
Environmental Health	Tygerberg Administration: EHOs	Tygerberg Administration Health Service – Area Manager	Healthy Cities Project (Cape Metropolitan Council)
Khayelitsha Task Team (KTT)	Peninsula School Feeding Association (PSFA)	Municipality Provincial departments of Education and Health	Central government's education, health and sanitation policies
PSFA	Link to funders	Access to funding	School feeding

Summary of review of project documents for background data:

- a) Report 2001, "Khayelitsha Task Team: Building Partnerships that work"
 b) KTT Minutes received from Benita Mayosi (coordinator, KTT)

Date	Event/ Minutes	Location	Participants
6 July 1999	Feedback about Namaqualand Visit, on dry sanitation system.	Site B	Parents, Teachers, School nurses, EHO & KTT reps
7 July 1999	Authorisation of the erection of Demo-dry system.	Ikhushi Primary	School Committee of Ikhushi Governing Body, KTT & Principal.
8 July 1999	Erection of a demo - dry system.	Ikhushi School grounds	School Committee of Ikhushi Governing Body, KTT & Principal.
9 July 1999	Walkabout	Site B	Visitors from Mvula Trust, Deputy Director of Water Affairs, KTT.
9 July 1999	Erection of dry - sanitation system	Site B	Semi-force employees, community members
Nov 10 and 11, 1999	Survey Feedback	Area around schools - Site B and C	Parents, Teachers, School nurses, EHO's, researchers, PHP - UWC
Feb 28 2000	Workshop on findings from survey	Encotsheni School - Site C	Parents, Teachers, EHO's, KTT
6 April 2000	Meeting of Planning Committee.	Stocks & Stocks building Khayelitsha	Area Planner, Parents, Teachers, Reps of KTT
7 June 2001	U-section Task Team meeting	Ikhushi Primary, Site B	KTT members, SACLA reps & community members.
12 June 2001	Intervention Task Team meeting	Stocks and Stocks	KTT members: 2 EHO's, 2 School teachers, 2 School nurses, MRC, 1 Parent
14 June 2001	U-section Task Team meeting	Ikhushi Primary - Site B	KTT members.
14 July 2001	Workshop U-section community health education	Ikhushi Primary - Site B	KTT members as facilitators, SACLA & community
29 Nov 2001	U-section community general meeting	Ikhushi Primary Site B	KTT, community

a) The Khayelitsha Task Team (KTT) reports describe their responsibilities as:

- Monitor the worms treatment programme.
- Develop hygiene educational materials.
- evaluate implementation of sanitation improvements.

KTT reports that they involved the community in a programme of workshops and participatory community mapping, with photographs of causes of worm infestation taken by school teachers and parents living in the area.

b). Attendance lists have not been accessible (minutes of all meetings) to verify the extent of community participation in many of the events and meetings.

KTT was to do the following to engage the community (minutes):

- Meet with street committees - an important role in entering the community.
- Organise and gather information about street committees.
- Inform the community about the proceedings.
- Follow up the history of the community.

Example of meeting minutes: KTT U-Section Task Team meeting.

Date: 7 June 2001,

Venue: Ikhusi Primary, Site B

Attendance:

Thembeke Mayekiso (SACLA), Nosizwe Cweya (SACLA), Jane Pambo (SACLA), Micky Chopra(UWC, Public Health Programme). *Local KTT sub-Committee members:* Martin Ngcime, Nikiwe Tukani , Johnson Nogqala , Lulu Mtshiselwa, Whitie Njobe, Ndumiso Manjati .

Resolutions:

- Create awareness through community workshops about health and hygiene.
- Parents to be educated on breaking re - infection cycle on children.
- SACLA to spearhead the workshops, since they have already been involved with the community.
- Kick off awareness dates, development of pamphlets and demonstrations in the area.
- Organise participation by community in workshops by using Street Committees to liaise with groups and sections.

APPENDIX 2c: COMMUNITY PERSPECTIVES - KHAYELITSHA

Report of Interview with Ward Councillor – Khayelitsha (Site B)

Date: 17/07/2002

Researchers: SS, DC

Purpose of the research: Understanding sanitation issues in Site B

Communication?

In Khayelitsha communication is through weekly street committee and Block committee meetings, held on Tuesdays and Thursdays.

If complaints on sanitation, drainage and sewer blockages arise the community reports to the councillor, and the municipal office. The councillor forwards the complaints to the engineering department. Through the Khayelitsha Developmental Forum a 2-day summit was hosted to address various problems including sanitation problems encountered by the community in Khayelitsha. One of the resolutions was that due to the high unemployment rate the community proposed that a toll free number for complaints must be established. Benita informed the councillor about the KTT over the phone towards the end of 2001. The councillor was also part of the local authorities present in the KTT presentation of the project to the provincial stakeholders.

Operation and maintenance?

The tender is responsible for the maintenance and operation of the toilets.

Solid waste is collected by 2 schemes (Charles -Tetco) twice a week.

Sanitation demand?

±400 000 population in Khayelitsha informal settlement the population and area is too dense. Congestion makes it difficult to construct individual toilets (councillor).

People dispose of their night soil in plastic bags and drains, causing blockages.

New Urine Diversion System (UDS) input by KTT?

Intervention on UDS community conflict was needed. 6 UDS toilets are working and 4 not yet installed.

The community complained that they did not have a workshop on the operation and maintenance of the system.

Maintaining the trial UDS system is demanding, according to the councillor's findings. People prefer to be served.

Further questions:

How can the health hazards be addressed?

- By adding one additional ablution block there will be better access to the toilets for users.
- By extending the time of operation to 24 hours and employing more night staff and security.

What does she think can be done?

- It is difficult to say because there is a lack of political will from the community.

Is there any plan of constructing more toilets in Site B?

- Yes after the land is available, there is a plan to redesign even if it can be given a small piece of land.

What type of toilets are going to be constructed?

- One ablution block.

How long will it take for the residents to get the toilets?

- The council has started with the redesigning of the roads.

Does the community get involved in improving the existing facilities?

- There are 2 community members per ablution who are cleaning and issuing toilet paper to users. The community suggested the appointment of the ablution caretakers.

What kind of facilities do you recommend for the community?

- Flush toilets.

Are there any development plans in terms of setting out a supervisory structure for toilet management?

- There are developments on infrastructure redesigning.

There is still a problem of greywater,. How is it going to be solved?

Redesigning to close dams and to instal pipes that will lead the water to the main drainage system.

Views of local Sub-Committee member (school care-taker- Ikhusi Primary

Date: October, 2002

Researchers: Lwandile and Sivatu

Source: interview with caretaker of the school about the Urine Diversion option,

Local KTT Sub-Committee member (Ikhusi school caretaker) said that 10 units of Urine Diversion System (UDS) toilets had to be built.

- So far two have been completed and of those two only one is working.
- The material is supplied by the Mvula Trust to 10 volunteer households.
- The construction is the responsibility of each householder.

On a site visit to see toilet and interview volunteer householder.

Mrs. Nokhwe chose the first UDS option so that she could have her own toilet.

- Since the toilet was built adjacent to her house she only had to find materials for a side and backwall, the door and the roof, using old zinc.
- The completed UDS units are built close to the house.
- It becomes problematic in raining season. If water gets into the faeces, the people nearby the toilets experience a bad smell. The toilet attracts flies.
- The idea is to empty the contents into a trench at Ikhusi school (200 m), but she has permission from neighbours to empty behind the shack.
- It is not clear when they can get them, but about 50 people are interested in their own UDS unit.

APPENDIX 2d: ENVIRONMENTAL HEALTH PERSPECTIVE - KHAYELITSHA

Khayelitsha –Interview and site visit – J Moghatle, EHO for area

Date: 7/06/2002

Researchers: DC, SS

Purpose: Access EHO role, initiatives and perspective on sanitation delivery

Sanitation facilities?

- For 1 month (Jan – Feb 02) an unusual Urine Diversion unit (the first set up out of 10 expected to be installed) has been managed by a volunteer householder (KTT Options).
- It has a single chamber under the pedestal, with a net (that catches the faeces and cleaning material/newspaper) suspended from a sliding mechanism that is emptied by hand once a week. The urine is diverted with a pipe into the ground. The chamber is not waterproof.
- It is not clear when the next installations will take place, but about 50 people are interested in this system.
- An alution block for the neighbouring area has 6 taps on outside, 6 communal showers (3 per gender) and 6 toilets with squat seats, per gender.
- Individual units (container toilets) are shared by 5-8 households.

Management of project?

UDS experiment is being monitored by himself (EHO), reporting about monthly to KTT. So far the idea is to empty the contents into a trench at the neighboring school (about 200 meters away), but the household has permission from neighbors to empty the faeces in a hole behind the shacks.

Ablution Block was initially closed on account of vandalism (a week after completion of the building). Maintenance has now been contracted out to a local transport company.

- Going quite well – closes at about 7/8pm. Caretaker employed by contractor. No payment for use by residents.
- Caretaker provides: toilet paper; flushes toilets; reports defects; cleans inside and outside.
- EHO reports on status to chief engineer – drafting a checklist.
- Regarding community consultation, he had problems because “Councillor did not do his job properly.”

Individual units (containerised toilets) are shared by 5-8 households – lock and key system for access is managed by neighbour groups of users. 49 clusters of 3 units in area (TR section)

In addition, plastic bags are evidently thrown into stormwater drain (stagnant) next to school and playing field.

LA Service Delivery?

- Appoints contractors, monitors and reports to engineering dept. – EHO has about one monthly contact with Engineer.

- Sewer maintenance to be outsourced to “give over ownership”. LA will supervise.
- Solid waste disposal is tendered out to external contractor.
- Container toilet supply and ratio are a decision of Council. The EHO is involved in management of container toilets. According to EHO health conditions are bad and service providers are not happy – see articles in newspapers (Vukani and Cape Times – 2000, 2002).
- January 2001: Education proposal for users about Container Toilets – Business plan and materials produced.
- EHO not involved in locating facilities and had no input on tender process – Engineering dept. is responsible.

Partnerships?

- EHO designs and conducts health Awareness Campaigns in partnership with Sports and Recreation, Schools, Community Development Support and community members, and has links with stakeholders from outside to promote issue (KTT).
- Schools programme has included a greening project (NBI and Abalimi Bezakaya) with school, including fencing off an area to prevent defecation next to school fence by shack dwellers and spot checking as part of a plan developed with school principal.
- Informal Settlements Task Team not functional since integration of Administration.

KTT project roll out is intended for entire Khayelitsha (official responsible is Edgar Pieterse, “Healthy Cities Programme”, CMC), although presently operating at schools only. Cutting transmission rate is the aim, but many kids don’t go to schools. The “Worms project” project aims to spread de-worming to neighbouring schools. Financial constraints are a reality.

APPENDIX 2e: ENGINEERING PERSPECTIVE - KHAYALITSHA

Researchers: SS., C.O, D.C.

Respondent: Tertius de Jager (TdJ), Chief Engineer for area

Date: 29/ 09/ 02

KTT's Urine Diversion System trial and other options:

Do you have any knowledge about the worm programme and if so what is your contribution from the engineering department? Are you aware of the sanitation options that KTT is embarking on?

Yes, he views KTT as a research-like team that is looking and assisting the community with options. He went together with KTT to Gordon's Bay to see the Conveyer Belt system, which he feels is not going to work as an option for Khayelitsha because of space constraints.

At first EHO had proposed that he purchase the 10 Enviro loos and 10 Econo loos, but the supplier was only willing to offer 5. He later asked him to withdraw from that proposal.

How many Urine Diversion units are in place and who is responsible to construct the units?

He is aware of the trial but does not have any idea about the design. Urine diversion units are supposed to be 10.

What is your opinion about the Urine Diversion Option?

He would prefer the waterborne units, as he is aware of the shortcomings of the container toilets.

Are you informed about the process followed for the UDS option?

The location of UDS is questionable, according to TdJ.

EHO insists on community-driven sanitation.

The community is supposed to be involved for buy-in to these options.

Information on the structure and costs of this Urine Diversion option did not come to his attention.

What is his involvement in sanitation upgrading?

He is mainly responsible for the bucket (container) system, which the EHO is not supportive of. He is planning to upgrade the bucket system by

- privatising it to 2 contractors who will be chosen by the community,
- put in place manuals on site for bucket system (containers),

Cost of bucket system is R7 – R6 per collection, each. Twice a week collection adds up to R30 per household.

According to the community, container toilets are not collected as they are supposed to be. What developments are in place on improving that?

TdJ bought two disinfectant tankers that he is considering for privatisation for a community tender for the cleaning of the container toilets.

Are there future plans in place to address the sanitation backlog in Khayelitsha. If yes, what are they?

The options are still being explored and he is waiting for confirmation of options from councillor and KTT.

What is the recent budget on sanitation for Khayelitsha?

There is some money he found when he took over office and would like to utilise it for sanitation improvement.

The recent budget of R500 000 is to be used to purchase the top structure for the options.

Ablution blocks:

T. d. J. has proposed to the local authority that:

The ablution facilities are handed back to the technical team in-house as it is cheaper, and because of their experience and potential in maintenance.

It costs the authorities R12,000 per month for O&M and R2,500 for the tender.

Grey water problems:

E.g. The stagnant water behind the container facilities next to the Ikhusi primary open grounds.

The grey water is a result of the drainage retention escapement that occurred after pipes were installed in order to drain the water to the retention ponds on the right side, which is a low-lying area.

The community was asked to move their shacks from that space in order to make space for the development of the ponds.

APPENDIX 3a: KAYAMANDI (STELLENBOSCH) communication, roles and functions

INTERVENTION SEQUENCE	Assessing/ Creating Demand	Informing demand, Communication	Community Responses	Community Roles & Responsibilities
WESTERN CAPE TEST CASE FOR MANAGING THE WATER QUALITY EFFECTS OF SETTLEMENTS – Kayamandi Test Case Steering Committee (KTCSC)	<p>Community survey to serve as basis for Problem Tree Analysis & level of community awareness</p> <p>14 community volunteers trained to conduct survey – 10% random sampling</p>	<p>Public Meeting to establish platform for information sharing</p> <p>KTCSC meetings monthly</p> <p>2 Workshops (officials, community) – Problem Tree & Intervention</p> <p>Plan: 3 priority areas with SEWAGE focus. Training 13 plumbers</p> <p><i>Awareness 1 – Pamphlets distributed, Posters at toilet blocks</i></p> <p><i>Awareness 2 – ownership of toilets</i></p>	<p>Good cooperation with survey</p> <p>Prioritised improving sanitation services, need for more toilets (survey)</p> <p>Participate – volunteer workers clean (20 p.), Plumbers trained and repair (13 p.)</p> <p>Propose supervision plan for each toilet block – user families both contribute and benefit on rotation.</p>	<p>Attended monthly KTCSC meetings</p> <p>Conducted community survey</p> <p>Clean up and rehabilitation: 29 toilet blocks cleaned and repaired (once off project exercise)</p> <p>Project manager liaises with Municipality to promote sustained implementation</p> <p>Propose permanent complaints office and Project Coordinator</p>
SANITATION SERVICE PROVISION	Municipality is aware of overload of existing toilet facilities	Officials participated in project	Questions about commitment of municipality	Liaison role between municipality and community needed

Councillor C Mchako	Stellenbosch Municipality
Councillor Ortell	Stellenbosch Municipality
R. van Wyk	WRC Research Assistant

Assessing Demand

There is a need for the Kayamandi Test Case Steering Committee to be recognised and become part of greater Stellenbosch. There is a need for constant interaction between DWAF, the Council and KTCSC. This is crucial to sustainability of the project.

Responding to demand (choices/options)

A plan should be submitted to executive committee (municipality). Additional municipal funding will only be available from 1st July.

The next meeting will be held on Thursday, 20 June 2002 at 09h00 at the Stellenbosch Council Chambers.

Delivery

- Some reorganisation will be taking place, e.g. river projects; building of toilets and waste will be under Engineering Department.
- Suggested that a working group or sub-committee of not more than 8 members get together to reorganize disciplines.
- All minutes of meetings will have to go to the Technical Committee (Council) as well as all decisions that were made should be revised by Council.
- The focus of the Committee (KTCSC) previously, was to improve the quality of the water in the Plankenbrug River.
- We need a more focused approach in terms of
 - Basic sanitation – 1 toilet per family
 - Education and hygiene campaign
 - How to structure the committee and what is the purpose of the committee?

Wilna Kloppers (DWAF) responded that she would provide LA with a CD to use as a tool.

Community responses to delivery

- Inadequate service provision is still the order of the day. It came up during discussions that a complaint was made - drainage problem was reported and still has not been fixed after 3 weeks. It is evident that the complaints office is not effective.
- There is definitely a communication gap between the users and the service providers. A proper mechanism is desperately needed to overcome problems like these.
- House to house education had to be done. Posters and pamphlets were not very appropriate to carry the message over, due to high level of illiteracy.

The committee's purpose is to "work towards a clean Kayamandi".

APPENDIX 3c: COMMUNITY PERSPECTIVES - KAYAMANDI

1. Source: Report of field visit and interviews – Kayamandi (Stellenbosch)

Date: 14/06/2002

Research Assistant: OG, MM

Communication

Their way of communication is through meetings and interviews with the local authorities, engineers, NGO and stakeholders. Their project as a help desk is not working at the moment - reason given is that there is no money.

It seems that there is a contradiction in expectations between the municipality and the help desk team because funds are available for sanitation for this year. The local help desk team said municipality does not want to provide good services to the people because they do not pay for services. From their meeting with the Council they decided that they are going to speak with the community in connection with the paying of services. Liaison meetings are in progress with the community in connection with the issue. A good result of the project research was the community saying they are willing to contribute.

Operation & Maintenance

The help desk team accuses the municipality of not doing the proper maintenance on toilets.

- Many toilets are blocked, and although reported to municipality a long time ago, they did not respond.
- Things that are blocking the toilets are food leftovers, newspapers, etc. suggested solutions
- in connection with the matter workshops will train the community.
- Because of the lack of space at the moment they have one toilet per 5 families.
- From municipal information: the council budgeted R1 million for ablution blocks structure (from 1999-2000). Two years after that R3 million spent for maintenance.

Demand

They need more toilets and housing for the people. Problem, there is no land. Available land is farm-land and is too expensive. The help desk team needs some funds in order for them to continue with their project.

Structure

The help desk team, composed of the local Project Manager (Sipho), reporting to the local council (Mr. Fourie). The employer is the KTCSC steering committee, which includes DWAF.

Under the project manager there are 30 general cleaners and 13 plumbers

- They must also consult the engineering department in connection with funds.
- Reason: there is an operational budget for sanitation for this year.

APPENDIX 3d: ENVIRONMENTAL HEALTH PERSPECTIVE - KAYAMANDI

Report on Kayamandi interviews

Date: 14 May 2002:

Researchers: DC, AL, OG

Purpose: Lessons and suggested follow up

Respondents: Siphso Menziwa Local Project Manager (072 311 9834) & Jake, the municipal EHO for the area

1. Research on sanitation conducted as early as 1989 and resulted in the planning of communal ablution facilities for the settlement (Jake). In 1999 R1 million was spent on capital cost of facilities and over the ensuing two-year period R3 million was spent on operating the facility. Council decided to do maintenance in-house subsequently by appointing staff.

Follow up on the health department research, cost of maintenance of ablution facilities HR & materials etc.

2. Urbanisation post-influx control and lack of land for new facilities (and the cost of acquiring prime agricultural in the vicinity) and small pipes resulted in service failure due to overstressed facilities despite attempts by municipality to provide maintenance through staff employed to service ablution facilities on a rotational basis. Provision of formal housing and a flat service fee rate was suggested as a possible by the EHO.

Follow up on IDP/WSDP details for basic sanitation in Kayamandi.

3. The Danida/DWAF project on pollution control of the Plankenbrug River resulted in a programme of rehabilitation of sanitation facilities, training of 13 plumbers, the employment of 30 cleaners to maintain facilities, a project manager and health workers. When project funding ceased only the project manager continued as a contact between the community and the local authority.

Obtain copies of minutes of steering committee meetings and final project report.

4. Project leader and EHO had different perceptions on the current provision of an operational budget for the management of the facilities. The EHO focused on the capacity of maintenance team and the project manager on opportunities for community employment post the project capacity building exercise.

Financial and institutional aspects of O& M at communal ablution facilities, based on the Kayamandi experience.

5. Stellenbosch Municipality is moving towards the organisational structure consisting of Community Services (incl. Housing, Health): Engineering Services (incl. sanitation and solid waste) and Security Services.

Engineering Services control the finances as far as sanitation is concerned.

Follow up on micro-design.

APPENDIX 3e: ENGINEERING PERSPECTIVE - KAYAMANDI

Interview S. Moorgas – Engineering dept, Stellenbosch Municipality

Date: 7/07/2002

Researchers: AL, DC

Purpose: To access municipal engineering perspective on project

Sanitation facilities

- 29 Ablution blocks for 16,000 people
- *Is there an update/when was this figure was settled on/is it realistic?*
- Include washstands/laundry facilities.

Management

- Appointing members of public to operate and maintain
- Community groups
- Contracts
- Vandalism has been a problem – community liaison.

LA Services

- Funds made available for low-cost housing/flats – relocate squatters temporarily.
- Health and Housing holding position on allocation/housing awarded.

Partnerships

- Gareth McConkie (LA) links with Water Pollution project - Wilna Kloppers (DWAF) Jo Barnes (Stellenbosch University).
- Councillors' roles: community interaction
- Lots of people want to get involved
- Community mind set has to change
- *LA approaches to this? Find records and perspectives to fill in the picture.*

Contacts:

- Mr Quotoyi (EHO) 072 122 5681
- Mr Japie Haremse (Head of Health Services) 808 8476
- Gavin Pridgeon (Superintendent - Sanitation in Kayamandi) 808 8320 – working with Andrew and Kobus Fourie on ground level
- Francois van Dalen (Projects manager) 8088 8312 for costs
- Mr Carstens (Building) 808 8366
- Dirk Haden (WSDP/IDP coordinator) 082 853 7174
- Kobus Fourie – link with Wilna's project (next door to Shaun's office)
- Ys Dudcliffe – (Water Dept)
- Keith Ford (Masekane Project/Housing) 808 8108

Research follow-up:

1. Health campaign and promoter/promotion, and EHO
 - Superintendent
 - WSDP and Masekane, Housing and Gareth McConkie (LA contact)
2. Obtain reports and minutes from Sipho (Mthetho to do)

APPENDIX 4a: JOE SLOVO (LANGA) communication, roles and functions

INTERVENTION SEQUENCE	Assessing/ Creating Demand	Informing demand, Communication	Community Responses	Community Roles & Responsibilities
UKUVUKA CAMPAIGN	Fire-stop campaign: funds tracks, electricity, fire hydrants Moving shacks from under powerlines	Fund workshops, pamphlets C of CT (Dev. Support) sets up Community Liaison Committee (CLC)	Co-operation with campaign Reconfiguration of shacks for tracks, greening area	Manage community cooperation in moving shacks Communication with broader community
GREENING PROJECT	Collaboration with : UKUVUKA, Tsogo local Env. CBO, City of CT depts, SANCO. Conduct community workshops, do pamphlet distribution Identify poor sanitation	Workshops, pamphlets Initiate Greening project <i>Community Group</i> Conduct Training Workshops -Greening Link site to PSTT Peri-Urban focus group	Attend workshops Join Greening group (x 30 local members) Attend weekly meetings Attend Training Workshops	Communicate with broader community
SERVICE PROVISION (Sanitation and greywater)	Assessment, Planning, Delivery - appointed Contractors	Regular report of plans and progress to CLC by CoCT (Dev. Support)	Attend monthly CLC meetings Cooperation with CLC	<u>Councillor</u> : negotiates for budget - sanitation facilities with Engineering dept.
ENVIRONMENTAL HEALTH	Perceptions survey, Plans training of local trainers	Reports to CLC – gets feedback on plans	Questions to survey and results, and training programme	To select nominees as volunteers for training

APPENDIX 4b: JOE SLOVO project profile and initiation

Background : review minutes of JOE SLOVO meetings (Sanitation)

Dates	Event	Location	Participants	Decisions
21 March 2002	Community liaison meeting	Langa housing/rent offices	Vusi Magagula, Alex Godden (CTA), Thembelihle (Tsoga centre), T.G.Rengqe (City of Cape Town)	Provision of toilets must be preceded with community involvement and must include education 30 participants groups will be trained
13 April 2002	Tsonga environmental project and greening project meeting	Isilimela High School	6 out of 30 greening project members facilitated by Jennifer Soshweshwe (Greening project, NBI)	Participants to register for training workshops for green belt development
18 April 2002	Community liaison meeting: sanitation, contract and related work	Langa Housing/Rent offices	X.O.Gophe (clr.); M.N. Kosile (SANCO); D. Cousins (WRC); S.Simelane (WRC); G. Davis (NBI); F. van Niekerk; V. Magagula (Cof CT)	New container toilets will augment the existing ones Concrete lined channels will be installed between the shacks to prevent flooding

BACKGROUND – Joe Slovo

Fire triggered the track development and sanitation issues came later.

900 shacks were destroyed by fire.

Eskom did not want the shacks under the power line – took City to task.

Space that is under the power line will be reserved for a Greening project (NBI).

He also mentioned that there is money that is in the Sewerage branch (R2 mil.) for sanitation.

Councillor has negotiated with the Sewerage Branch.

Councillor proposed a waterborne type of toilet system.

Source: Interview with Mr. Michael page (Engineer, Sewerage Branch)

Date: 11/07/2002

Assistant Researcher: Odwa Gabuza

Joe Slovo's sanitation service background:

- 4 years back they were planning sanitation for informal settlements, but the problem was that informal settlements were considered as temporary structures.
- At Joe Slovo they provided 190 container toilets initially.
- Many of these were vandalized.
- Containers are collected every week by three private companies.
- Before they put in the container toilets they ran a workshop with the community and they provided people, based on their agreement.
- Some of the toilets were destroyed by fires.

APPENDIX 4c: COMMUNITY PERSPECTIVES – JOE SLOVO

1. Report of Joe Slovo Community Liaison Committee meeting (1)

Date: 18/4/2002

Assistant Researcher: Odwa Gabuza

Sanitation services:

Questions asked by community block representatives (serving on Community Liaison Committee):

- What types of toilets are we going to get?

Francois Van Niekerk (FVN) said that Michael Page, the Engineer of the Sewerage Branch, said he would add more container toilets.

- Is it going to be the same as the toilets we have at the moment?

FVN replied - Yes, but Michael Page is busy investigating the possibility of waterborne sanitation.

Report from FVN on investigation: He asked the engineers Law Gibb to do the investigation and survey the area. Results: Big problem in Joe Slovo as there is no existing sewer line. Another problem: the area is too steep so it will be difficult to make a connection from the existing line that is in Settlers as sewers have to go downhill not uphill. Gibb consulting engineers said the area will need a sewer line with pump station at the end to pump the sewer and it will be very expensive.

- Councilor Gophe reported that he had also asked Michael Page to do an investigation of a waterborne system.

Response from Michael Page was that even if it is feasible he cannot do this year because it is too late - the option he has to offer is the addition of container toilets. At the moment they want to use this (R2 mil.) before the financial year-ends. Mr. Page has not finished his investigation of waterborne system yet.

- This toilet, is it possible to be converted to a waterborne system?

FVN replied: Yes, but it will be expensive to do that. Waterborne system is not an easy and cheap system, especially in Joe Slovo because the area is very steep. If Michael Page's investigation is feasible the best toilets that can be provided in Joe Slovo are the communal toilets (ablution blocks).

Community leaders were asked to go back to the people to tell them about the addition of container toilets. If they allow this provision the community will be asked to not vandalise the toilets as they did before.

Flood disaster (Report from FvN)

There are four companies that have put forward a tender but they chose one, namely Paradine. FvN said he would introduce the contractor to the leaders and the community before they start.

- Question, what about the people who are staying under the powerline?

FVN replied: Mr. Gophe said last time those people are staying there temporarily. They are part of the relocation team moving to Delft formal housing.

Greening Project (Report from Greening project Volunteers)

They had 2 workshops they felt were successful. One was for five days and the other for three days, conducted by Abalimi Bezakhaya.

➤ Where should the greening be located?

It is supposed to be under the power-line (greening belt), but we have not started there yet. At the moment we do our workshops and gardening on a plot for training at Isilimela High School. In addition FvN said that Mr. George Davis (Kirstenbosch, NBI) had reported that implementation of tree planting will start during winter, before September month.

➤ Who is going to do the planting?

Everybody is welcome as long he/she is a Langa community member.

Next meeting will be confirmed later.

2. Interview with the Langa Councillor (Mr.X. Gophe)

Socio-political viewpoint

He said politics of the day plays a major role. He said the municipality does not care about people staying in the informal settlements. Reason is that some of them stay illegally and they don't pay municipal services (no income generation happening). There is no proper management structure for squatter settlements. Currently the municipalities throughout the country are forced and bound by the national policy to provide good services for all the people.

Current project

Tracks are provided to stop fires that are happening daily in the area.

Toilet system at the moment is very bad. As a councillor he made a request to the department of health to come and investigate the health situation in Joe Slovo and the surrounding areas because of poor sanitation. People can make their water dirty or polluted through bad toilet habits. Many people become ill because they drink water that is contaminated by human waste. Present situation in Joe Slovo: some people use the bush as their toilet, flies carry germs from human waste onto food that people eat, and people get sick from these germs.

Relocation issue

Because of the lack of land in Joe Slovo the council wants to relocate people to Delft to about 5,000 sites. Joe Slovo is going to have 2,500 sites but at the moment they have 1,000 sites. This can create a space whereby the CCT can do proper planning for housing. At the moment everything is just temporary.

Request to the department of housing:

He requested the department of housing to do some geotechnical tests on the soil surrounding the area.

Finances

R2 million that was left from last year's money was budgeted for container toilets (that is a bucket system sanitation). That money is in the department of

engineering, Sewerage Branch. Person responsible is Mr. Mike Page. Councillor suggested to him that this money be used before June otherwise it will be forfeited. Next year's budget will start from July this year - they must use this for sanitation as phase 1 and the coming budget as phase 2. Response from Mike Page was positive.

He said on the 11th of April they have a site visit at Joe Slovo together with the 5 sub-councillors and chairperson, Mr. J. Smith. They will move around the area and look at the current situation. After the site visit they can sign for the R2 million and take the issue forward to decision-makers - then the project can start.

Councillor's plan for budget (R2 million)

Installation of sewer line in Joe Slovo and ablution blocks for the time being as part of phase 1 (rather than containers). Phase 2 : the construction of formal houses whereby the municipality can benefit, because residents will be bound by the law to pay for higher level of services. At the moment the municipality is working within limitations because they get nothing from the people living in JS.

3. Report of field visit and community interviews

Date: 28/05/2002

Assistant Researcher: OG

Respondents: Community members

Research questions

1. Why is the community building its own toilets?
2. Is there a possibility that the people are using the canal as an ablution block?
3. Does the community understand and see the need for sanitation?

Responses

- The community builds their own toilets where they can.
- Solid waste is being disposed in the canal.
- People are using the canal as a toilet.
- The community does understand about the usefulness of sanitation.
- The contractor is breaking down some self-built pit toilets.
- People go to the bush because of the toilets being broken down.
- The toilets provided by the government are not adequately serviced.

Observation of environmental impacts

- The toilets built by the community need some pipes and fly-net so that they cannot be a nuisance to the environment.
- There is faecal contamination in the canal caused by the community. This can lead to diseases in the community, since the children play in this water.
- Even though people understand about adequate sanitation, they continue to build their own toilets due to lack of units provided.
- There is faecal contamination in the environment because people who do not have toilets use the canal and bush.

- People continue to contaminate the canal, even if there are government toilets, because the toilets are full most of the time.
- Pollution of the canal will continue until more toilets are built.

4. Community Block Committee meeting

Date: 13/7/2002

Assistant Researcher: Odwa Gabuza

Sanitation issues discussed

- Municipality has promised them a public toilet per zone.
- Their zones are subdivided into 5 zones, that is Zone 28 – Zone 32.
- At the moment they are complaining because the council has not started the project yet.
- Some of them built their own pit latrine toilets, some are using the toilets that are at New Flats (formal toilets), some just go to the nearest bush.
- That is unhygienic so they need toilets. The municipality is their responsible for providing those facilities.

Finishing of the tracks

The tracks are not yet finished and they are supposed to have been completed already, but they do not know the reason.

APPENDIX 4d: ENVIRONMENTAL HEALTH PERSPECTIVE – JOE SLOVO

1. Initial telephonic discussion with Mr Alex Godden (Health Manager, C of CT)

Date: 21/04/2002

Researcher: Odwa Gabuza

Mr. Alex Godden said there is no plan for sanitation at Joe Slovo at the moment. No funds are available (asked him about R2 million, but he doesn't know anything about it).

Follow up on that with the councilor.

2. Research Questions to the EHO department:

1. What measures are you taking as an EHO, to control the impact that lack of sanitation have on the environment?
2. Do you think the residents are adequately educated about sanitation?
3. Why do you think makes them to continue building their own toilets?
4. Are you aware that people use the canal as a toilet, and what measures are you taking about that?

3. Follow up Interview with the Health Dept.: (Mr. Alex Godden)

Date: 04/06/2002

Assistant Researchers: Odwa Gabuza, Charity Gaosonkwe

EHO's role in Joe Slovo sanitation?

- Educating and training of people about sanitation – a survey will look at their level of understanding.

He explained as follows:

•Information they have is that 37% households in the shacks have diarrhoea and worm infestations. They asked the community whether they washed their hands after coming from the toilet, and 99% said yes.

•According to their plan they want to do the training of volunteer health promoters/trainers. They need ten people who can be trained to train the wider community.

•At the moment they do not have a person in the council who can do the job of training the trainers.

APPENDIX 4e: ENGINEERING PERSPECTIVE – JOE SLOVO

Interview with Mr. Michael Page (Engineer, Sewerage Branch, C of CT)

Date: 11/07/2002

Assistant Researcher: Odwa Gabuza

Proposed plan for Joe Slovo sanitation

- They are planning to provide 1,000 toilets (that means one toilet per four households).
- He is investigating sewers for waterborne system as another option.
- He also gets pressure from Councillors Gophe and Smith because they came to him personally to address the issue of sanitation in Joe Slovo.
- The R2 million budget was not specifically for Joe Slovo area. It was for all the informal settlements, but Joe Slovo has the greater need. We cannot provide each shack with a toilet due to the shortage of land.
- When the investigation for waterborne system is done he will consult Mr. Gophe (Councillor), to find a land or open space and also consult the community, as the community must decide. After that he will send the contractor to do the job.
- He mentioned that at the moment they are waiting for a policy to emerge. In the past there were six municipal bodies and they all had different ways of dealing with sanitation, which is a major problem they have at the moment.

Greywater issue

He said they are looking for a piece of land in the area for a wetland, because greywater is another big problem in the informal settlement.

Problems with other options

He said if they provide a waterborne system there is the disadvantage of sewers blocking. People have to be taught that they must not use newspapers, as they must use toilet paper. It will be too costly for municipality to provide toilet paper. Pit latrines will also be a problem because of the high water table in the area.

O&M of container toilets: There are three contractors that are doing operation and maintenance at the moment. They are paying R108.00 p/toilet for operation p/m and R122 p/m per toilet for servicing.

Interview with Mr. Michael page (Engineer, Sewerage Branch) Cape Town

Date: 19/01/04

Assistant Researcher: Jessica Katz

Would you use local contractors?

He prefers SANNITECH, an established large contractor, not a local contractor. Socio-economic losses in the community would be dealt with by possibly linking to the Social Support team that is working with the Development Support Branch in Informal Settlement Upgrading.

He believes that there is a need for a social department within his department.

APPENDIX 5a: IMIZAMO YETHU (HOUT BAY) communication, roles and functions

INTERVENTION SEQUENCE	Assessing/ Creating Demand	Informing demand, Communication	Community Responses	Community Roles & Functions
SERVICE PROVISION	<p>Engineer assesses lack of / poor services (SPA takes over from PAWC) Compiles brief for integrated approach to rudimentary service provision</p> <p>Consultant: Plan for service stations (ablution facilities)</p> <p>Liaison with all SPA departments</p>	<p>Consultant conducts public facilitation – set up local project development committee</p> <p>Holds regular (monthly) meetings – reporting for comment/approval</p> <p>Education and training drive: R12,500 for training and leaflets; R3,000 for trainer fees</p>	<p>Feedback to consultant re: Plans/ Time-frame/ Phases to ensure expenditure</p> <p>Suggest to consultant means of overcoming density constraints to constructing public facilities</p>	<p>Project Development Committee comprises representation of blocks/residents</p> <p>Communicate with broader community</p> <p>To nominate 3 Facility caretakers for 1 appointment by municipality (SPA)</p>
ENVIRONMENTAL HEALTH	<p>Collect materials for education & training drive pamphlets.</p> <p>Conduct h/h visits</p>	<p>Report on project to local Hout Bay Health Forum</p>		<p>Community health worker reports health impacts of poor hygiene, sanitation services</p>
NGOs	<p>Solid Waste link with Fairest Cape Assoc. – potential training of trainers assistance</p>	<p>Support from Fairest Cape Association to local environment group (youth)</p>	<p>Local environment al group runs clean up campaigns, willing to assist in education drive</p>	<p>Link with Fairest Cape Association</p>

APPENDIX 5b: IMIZAMU YETHU project profile and initiation

Researcher: Deborah Cousins

Purpose of Research: To introduce and establish research participants and conduct open-ended interviews on site

Respondents: N. Hendricks (SPA Engineer), J. Mzomba (Consultant)

Observations on field walkabout (covered whole area, all facilities)

Sanitation demand?

- Inadequate facilities – bucket/containers but have no lids, doors are often missing and are reported by consultant and LA to be “not used”.
- Observation shows that bucket/containers are serviced and in use (not full, freshly used and in use). Some self-provided pit latrines are evident, some individual bucket toilets are still in use, and some are standing empty.
- A woman spontaneously approached us to point out where toilets are needed (YMCA area).
- A South Peninsula Development Health Forum (SPDHF) member reported those people empty faeces like greywater into open drains.

Communication?

- Consultant relies on local development committee for communication with the broader community. Level of communication by committee has been assessed from random community member responses to consultant presence. Consultant: “They know what I am doing here.”
- Consultant says that he “makes suggestions” and receives “acceptance” at committee meetings where community’s “ideas” are incorporated into plans: e.g. looping of the suggested access road.
- Moving of shacks will “need more negotiation with the people” (SPA).
- Consultant instructed by SPA to set up additional meetings to convey that washing facilities are to solve dumping outside.

Organisation?

- Residential area divided into blocks – each block has 2 representatives serving on a local development committee for the project.
- Representatives of the Community Health Forum are “supposed to be” on this committee – consultant will check.
- Local Civic Association is said to be strong. Project has worked with existing Civic Association and has sought to link, not create new structures.
- Moving issue: Next meeting with community. They plan to take photos and plan to show resettlement to residents to see their reaction.

Capacity Building?

- It was emphasised that there will be an educational component to the project (SPA)

Operation and maintenance?

- Consultant explained that this is a project of “service provision, then ownership” – maintenance is separate from construction and will be managed by the LA.
- Operational aspect will be managed by the City (SPA)
- “People will have to keep it clean” (SPA) in reference to planned grids and channels.
- Ablution Blocks will be “formal” – e.g. someone will be paid to maintain

Responsibilities?

- SPA/Contractor to community

Evident roles (from fieldtrip only):

Agencies	Purpose of activity	Description of activity
Engineer Consultant	Respond to prelim. reports, plans, liaises with local committee	Walkabout, discuss proposed plans. Project meetings off site.
Civic chairperson	Consult with client	Get feedback/input on planning
Dev. Com. Rep	Retain contact	Report on addressing land issue
Health Forum rep	Retain contact	Greet in passing
Community member	Make contact Query	Narrate hygiene behaviour issue Show where facilities are needed

LA Protocol notes

1) The local authority (SPM Engineer) site visit was a response to the Preliminary Report submitted by the appointed consultant. This was clearly an important opportunity for cross-checking the client/consultant understanding and approach to the brief, the work that had been conducted to date, the immediate process requirements, and to clarify plans and options available to consultant.

2) Technical considerations discussed between the providers for an integrated approach to service provision:

- Electricity: Illegal connections to be addressed – example of distribution box to 12 households pointed out; high priority of upgrading electrification was emphasised by LA.
- Roads: As access to service points (toilets and wash, standpipes, drainage); as boundaries to informal housing area; location (also re: levels and contours) dictate some shack moving. Reconfiguration requires land that is not available (political constraint), but needed.
- Greywater: Damage to new roads; grid inlets blocked; many open drains created by erosion in lanes between houses – not connected to self-dug run-off channels; set up additional meetings to convey that washing facilities are to solve dumping outside.

- Run-off management: evidence of varying local efforts (terracing, bridges, channels, and furrows); planning for steep gradients and contours; problem of unplanned building above.
- Sewers: Ablution blocks sited for connecting to main sewers and water supply; upgrading of rows (also with buckets) to water-borne ablation facilities; integrate greywater solution by adding washing troughs to toilet facilities (concrete, not steel due to anticipated vandalism).
- Water points: Where located along channel cause problems of greywater surplus; additional standpipes needed.

3) Planning

- Municipal engineer and consultant agreed to start work February and end in June (winter). Possibly continue after winter – discussed phasing. Consultant to submit plan with phasing breakdown.
- Boundaries/growth/relocations – discuss with Housing department. Check on pegs/coordinates for correct boundaries.
- Utilisation of space/levels
- Relocation and house numbers – moving is the major challenge – Land to move to?
- Programme to phase in improvements and upgrades over time. Demonstration effect will show other areas how facilities work.

Follow up:

- Is there an audit of current facilities? - Talk to contractor who services them (I think it may be Lunga Willems - MASISICO).
- Frequency of servicing arrangements and costs need to be checked.

APPENDIX 5c: COMMUNITY PERSPECTIVES – IMIZAMU YETHU

Local Community Development Committee/Consultant Meeting

Date: 7/07/02

Researchers: TL, DC, SS

Purpose of research: To observe information-sharing approach and record key issues

Communication?

Consultant reports progress to Development Committee, made up of community committee representatives of Street Committees and Civic Association (same Chairperson/ Leader). He invites feedback and responds to any questions.

- This meeting is planned to take place every 2 weeks.

Key issues discussed were:

- Moving of houses to make way for new ablution infrastructure – committee to facilitate houses involved. Said they can do this.
- Budget and expenditure – committee keen to make progress to ensure expenditure.
- Need for more land to accommodate moved houses – consultant to take up with municipality.

Research questions arising:

- Role/responsibilities details – start with “baseline” (as *planned* by consultant/committee) and then track and compare actual implementation of organisational functions.
- Does this committee have any other functions before/beyond the project?
- How many Street Committees in total – record of attendance at bi-monthly meetings?
- Were the Shooting Range, YMCA, H.Pieterseon representatives present at this/other meetings? How will the information be relayed to the residents in the affected blocks (streets)? – Who tracks the process between meetings?

Follow up research:

- Compare minutes of our discussion from our separate notes and supplement/cross-check with such data as attendance, accurate figures, etc.
- Introduced assistant researcher to Lunga Willems, the local contractor currently servicing existing sanitation facilities, with the consultant’s (Jongi) approval of an interview.

Report of interview with local contractor – Imizamu Yethu

Date: 1/07/2003

Researchers: DC, KG

Respondent: Masisico Service and Sanitation – Lunga Willems

Purpose of the research: Understanding local sanitation service provision

What are your contractual arrangements?

- Contracted by the Municipality, reporting to Ronnie du Plessis (Roads dept) – has been renewed every year.
- Contracted to: service bucket system (includes containers) twice a week; service ablution facilities and sanitise flush system.
- Municipality provides stock of materials for servicing – sometimes run out of stock and it takes time to get supplies.

Is there any other local employment for sanitation and if so, for what tasks?

- Contract covers the costs of employing 6 men and 2 women as supervisors, plumbers and cleaners.
- Supervisor is employed to monitor and report to me; plumber to repair reported breakdowns when they occur.
- The idea of local entrepreneurship for new ablution facilities maintenance services did not materialise, so I have taken on that role as part of my contract.
- The idea was that they would purchase toilet paper, soap, etc to be initially provided by municipality. This idea was scrapped. Charging users of the facility to cover costs and pay local entrepreneurs for their service.

Was there any training or capacity building?

- No training has ever been provided for entrepreneurs – I am seeking my own capacity development for myself.

Other comments on the sanitation project?

- Three months after completing the building of the blocks they were still locked. The building contractor had to be called to explain and note the unfinished work and poor water supply to the top block (Madiba block).
- They told us that funding was reduced during the project so that initial plans were changed.

APPENDIX 5d: ENVIRONMENTAL HEALTH PERSPECTIVE – IMIZAMU YETHU

1. SPA depts. Project Coordination Meeting (called/chaired by Engineer)

Date: 23/06/02

Researcher: DC

Purpose: To examine inter-departmental “integrated” approach

Envisaged education programme (Environmental Health designated to champion)

- House-to-house visits will distribute a pamphlet.
- UKUVUKU firestop campaign will fund the production of the pamphlet.
- Other programmes that may contribute and assist: Waste Management - Fairest Cape; MPC project budget; Clinic. Bring people on board – contacts.
- Literature, pamphlets: put together a literature programme, what training can be provided by different depts and programmes?
- Health, Hygiene and Environment to include: refuse (Raphael, A Isaacs), environmental (Terry Burn), electricity, housing, fire and safety, roads and stormwater, waste management (B Genman)
- Role of caretaker at ablution facilities – includes the need for contact person for city procedure when something is wrong, broken, etc; facilitate education of the users of facility.

Research to follow up:

Development of training package, progress and content – access pamphlets.

How do they intend to measure the impact of house-to-house, once off approach?

2. Interview with N. Hendricks of CoCT

Date: 13/02/04

Researcher: Jessica Katz

Purpose: Follow up on Education Drive in Imizamu Yethu

Costs of Education Drive?

- R3 000 for Youth Group assistance + R 12 500 for material (pamphlets)

Results of the community education (health and hygiene) approach ?

- The initial house-to-house pamphlet drops were in December 2002, intended to be followed up with another round, but that never materialised. No evaluation was done after the first drive.
- The council does not employ attendants at the ablution facilities (3 were constructed out of the 6 planned for).
- The local contractor (Lunga Willems) who services the buckets employs part-time attendants who clean out facilities weekly. They received no health and hygiene education or training.

APPENDIX 5e: ENGINEERING PERSPECTIVE – IMIZAMU YETHU

SPA depts. Project Coordination Meeting (called/chaired by Engineer)

Date: 23/06/02

Researcher: DC

Purpose: To examine inter-departmental “integrated” approach

1. Envisaged Education programme (Env. Health designated to champion) – (SEE APPENDIX 5d)

2. Integrated Approach by Municipality

- Funding: UKUVUKA (firebreak and hydrants) – want to roll over. PHASES: R500,000 for this year, upgrades next year
- Training: O&M and Education go hand in hand (NH)
- Programme progress report (see consultant brief and outputs):

Major constraints in re-locating for roads – nowhere to move houses.

Moving 50 families to secure 1/2 hectare – nowhere to put them + time constraint + additional funding for next year = phase it in.

1st doing easiest installations at 3 areas: Madiba, YMCA, Hector Pieteron.

Consultant brief stops at report – extend to include implementation and construction.

Infrastructure design: Modified shipping container (company) – to re-price structure with plumbing, base etc. Ablution block: 8 x toilets (4 male/4 female with partition), wash basins - 4 wash troughs to be fitted, night soil disposal point with cover, shallow pipes (rodding eyes not manholes) + tap at night soil dump.

3. Contributions requested from other SPA departments

Mobilise municipal electricity, water, roads and stormwater, parks departments

4. Data inputs on neighbourhoods

- Greywater problem at Hector Pieteron area
- YMCA very narrow – erect facility as demo.
- Shooting Range has no services at all.

5. Priorities - Meeting Outcomes:

- Sketches re-done by consultant (Mon am)
- Education programme
- Re-appointment of consultant
- Moving issue – space for new facilities, land shortage

Follow up Discussions with engineer– August 2002

Assistant Researcher: CO

Respondent:

1. Mr N Hendricks (Project Engineer, SPM) has just returned from leave and reports that progress at Imizamu Yethu was stifled during his absence. He was on his way to site last Wednesday to try and 'revive' the work there. He feels that opposition from Hout Bay Rate-payers Association has a lot to do with the issues.

Issues

1. No-one amongst community stake-holders who can drive the process forward
2. Consultant has been re-appointed for 2nd Phase
 - Design and Construction of ablution facilities
 - Public Participation (within established institutional arrangements) (Completed first appointment: Public Participation and Conceptual Design)
3. Political Tension around Land Issue- Should not cause any further delay in service delivery as this matter has been handed over to SPM Housing.
4. Education Drive – Integrated Sanitation, Health and Fire: Adopting the Fairest Cape Training Strategy (Ms Barbara Genman) – to use volunteer Youth Environmental group with EHO leading.
5. Maintenance and Operation Strategy:
 - SPM Housing will adopt the services.
 - Community Ablution Facilities (8 waterborne toilets) serves approx. 50 families. They will nominate 3 local women to manage the facility. SPM will appoint one nominee @ R200 per week. She will be responsible for general cleaning of the facility. This will run for around 2 years.
 - Payment for services: Entrepreneurial training - toilets will be leased at nominal R10 pa and used at R 0,50 per toilet
 - New Unicity Structures pose a problem/threat to this maintenance proposal.
6. Funding issue:
 - *CO follow up research:* Fax to Dept Housing re: funding applications for 2002/3 (CMIP and Human Resettlement Programme)

2. Discussion with Mr Christy De Wit of Dept Housing (WC)

Funds for this project were allocated from CMIP (Consolidated Mun Infrastructure Program). Exact figures and details will be forwarded to us. Financial year 2001/2 ends end March.

- Roll-out Workshop in Malmesbury: NH (Unicity co-ordinator of CMIP) – will propose national policy amendments as to use of R84 million in the 2002/3 CMIP budget

APPENDIX 6a: ETHEKWINI CASE STUDY – Programme sequence

eThekwini programme sequence & improvements

Source: eTWS, Water & Sanitation Projects: Guidelines, August 2003

2002 Sanitation Programme

Project initiation:

Project boundaries are carefully selected by eWS to ensure that at most one tribal authority and one political ward is included to deal with local power struggles that may have an impact on the project and cause substantial delays.

Prior to implementation, eThekwini Water Services (eWS) Community Liaison Officers (CLOs) work with ward councillors in the communities to explain the broad issues associated with eThekwini's approach.

A Project Steering Committee (PSC) is formed to act as a communication mechanism between the community and the programme manager. The PSC includes women (at least 50%), traditional authorities, existing water committees, service providers operating in the area and eWS.

Either the Ward Councillor or the Project Manager acts as a temporary Chairperson until a Chairperson for the PSC is elected by the community. Members of the PSC are paid for attending monthly committee meetings - all other services are voluntary.

Consultants are employed for project specific tasks: ISD consultants, engineers and hydrogeologists are employed as required for specialist inputs in compiling individual business plans. The simple design of the system ensures that the need for engineering consultants is limited.

Implementation procedure:

- The project manager appoints an ISD Consultant and a Site Agent.
- The Site Agent has a number of responsibilities, as follows:
 - Lays out the route through consultation with the community.
 - Identifies suitable plumbing contractors.
 - Purchase and supply of materials (preference is given to local emerging contractors for supply and delivery of materials at set rates).
 - Establishes a block manufacturing enterprise if not already there.
 - Employs people from the community as labourers. The employment policy targets individual most in need (focus on women, youth, unemployed and single headed households).
 - General supervision and provision of training and guidance to local enterprises
 - The PSC decides on h/h most in need, addressing unemployment. Labour is appointed for four weeks – the first week for the house connection (sweat equity) and the balance for cash.
 - Households are provided with the skills, materials and tools required to build and maintain household toilets and water supply. Specifically the householder is required to decide with the contractor where the facility will be constructed.
 - Excavate the trench from the communal supply point to the position of the water supply tank and backfill the trench once the pipe has been laid.

Each milestone has to be achieved before the householder can progress towards the next milestone.

The tasks and associated milestones are as follows:

Task Description	Milestone Description
Task 1 – Disseminate information about the project	Milestone 1 – Confirm willingness to participate by completing application form
Task 2 – Agree on the position of the VIP and assist contractor as required.	Milestone 2 – Completion of toilet
Task 3 – Pay water connection fee	Milestone 3 – Details are registered and materials are handed over
Task 4 – Excavate trench and backfill pipeline	Milestone 4 – Ground tank system is checked and water is switched on

(Source: eTM, 2002b:22).

Operation and maintenance

- Maintenance is undertaken by the household receiving on completion of the on-site unit. The municipality does urine diversion/VIP maintenance and empties the composted contents as required. (eTM, 2002:10-11).

2003 - Programme improvements

Project initiation:

- Local ISD consultants are trained and mentored on general objectives of the project and the training of local facilitators. They attend Technical Management Committee (TMC) and PSC meetings.
- Local health facilitators are trained (mentored by the ISD consultants) to carry out project information dissemination and health and hygiene education on household-level, including technical, operation and maintenance of systems (4 household contact visits).
- Training includes extensive mentoring and management by eWS Training Division and ISD management staff. NQF alignment and accreditation being pursued.

Implementation:

- Contractors may be trained to become specialist contractors after proven competence, based on performance during project progress (eWS, 2003).
- Local emerging contractors from the local area are nominated and selected by the PSC and TMC, and trained by eWS staff. Based on discussion of the performances of listed (most qualified and proven) contractors a collective decision is made with regard to training of approved specialist contractors (eWS,2003).
- Basic requirements for contractors are stipulated regarding: transport, qualified staff, full-time supervision capacity, registration, details and contacts.
- Local labour is sourced from beneficiary households (1 labourer per h/h) to assist in poverty alleviation. Labour recruitment for sanitation allows for a minimum of 5 persons who live within the area of construction. The TMC/PSC assists in identifying local labour.

Monitoring and evaluation:

A formal external monitoring and evaluation function is currently out-sourced to a social consultancy (HSRC) that reports on impact of education of h/h to programme staff.

APPENDIX: 6 b: eThekweni case study - Targeted capacity building

Sources: Interviews and focus group discussion with eWS trainers, LGWSETA Sanitation Sector Skills Development project reports

1. Who conducts current training?

- eWS in-house training experience and training resources have been delegated to staff in Training Division.
- Procurement of local contractors, suppliers and direct employment from beneficiary communities needs on the job mentoring by Construction Division.

2. How has the content of Facilitator training been developed?

- Household education and community training programmes have adapted to specific technology options
- Household level operation and maintenance functions need to be informed.

3. Motivation for undertaking formal skills programmes?

- Build capacity to implement projects in order to address the backlog by 2010 - aims to enhance local employment for roll-out of delivery.
- Aligning with national policy and programmes.
- On the job training on the construction of sanitation units is based on building local employment opportunities.
- Staff capacity is currently over-extended in maintaining their current delivery rate.

4. How will training be formalized?

Extending and formalising skills development will be in alignment with the NQF and LGWSETA accreditation processes. The municipality is able to access additional national funding allocations to invest in local development. Skills Development Programmes will be used to qualify learners in sanitation sector career paths for both construction and promotion functions, as follows:

- Health and Sanitation Promotion (NQF Levels 2 and 4) is to enable local facilitators to extend their limited knowledge of community sanitation and environmental hygiene, assess local knowledge and practices, plan and conduct sanitation promotion programmes and evaluate effectiveness.
- Builder Assistants (labourers), Builder and Quality Assurance (NQF Levels 1 – 4) will enable learners to gain entry to increasing levels of recognised sanitation and broader construction skills.
- SMME (sanitation) (NQF Level 4) will provide additional access for local contractors and suppliers to training in entrepreneurial competencies.

TRAINING PROVIDER: ETHEKWINI TARGET NUMBER of LEARNERS: 125		ACCREDITATION APPLICATION : YES LGWSETA status: ELIGIBLE	
PROJECT SITES	Sanitation Skills Programme (ESU)*	NQF LEVEL	SELECTED TRAINER/ASSESSORS (eWS staff)
NWABI, EKUKHANYENI, UPPER MAPHEPHE, MOPHELA.	Health Promotion Assistant Builder Builder	L2	L. Sibiya (DipPub Man.; P.Grad Dip Pub Admin; Certificate PR) A.Mncwabe (Cert. Proj Man; N.T.C. 3 Plumber/Water Treatment), N. Gordon (Cert. Plum (BIFSA Cert), R. Jones. Y. Essack (Dip Data Matrics; NH.Dip Civ; BSc.) J. Rust (B.Com; NHDip, BTech, HOD),
		L1	
		L2	
	SMME Quality Assessor	L4 L4	

Source: LGWSETA Progress Report 4, 2004

APPENDIX 7: CASE STUDY REFERENCE GROUPS & RESEARCH ASSISTANTS

1. Khayelitsha Case Study Research Reference Group

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- Sandra Simelane (N.Dip, Env. Health)
- Simpiwe July (Btech. Civ. Eng)
- Lwandile Msweti (N. Dip, Eng.)
- Kehilwe Gaotlhokwe (BTech, Pub. Man.)

2. Kayamandi Case Study Research Reference Group:

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3. Joe Slovo Case Study Research Reference Group:

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Xolile Gophe	Langa (Ward Councillor)	021 694 3774 083 635 6099		
S. Penze	JoeSlovo Community Liaison Committee (Exec. Chairperson)	Access on site only		

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- Renaye van Wyk (MTech, Env. Health)
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4. Imizamo Yethu (Hout Bay) Case Study Research Reference Group

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Man-0-Man	Civic Association and Project Committee Chairperson			

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5. eThekweni Case Study Research Reference Group

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