

UNIVERSITY OF ZIMBABWE-SEARCWL MWL 2013

**RESEARCH METHODOLOGIES AND METHODS IN WOMEN'S
LAW AND THE PRACTICAL COURSE**

**IMPACT OF POOR IMPLEMENTATION OF SEWER AND SEWAGE
MANAGEMENT LAWS AND REGULATIONS ON WOMEN IN
KADOMA**

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EXECUTIVE SUMMARY

This is a report of findings of a research that was conducted in Kadoma City as part of the practical course for students and SEARCWL (the women's Law Centre) at the University of Zimbabwe. Specifically, the research was conducted at Rimuka, Ingezi and Eiffel Flats. The research aim was to investigate the problem of poor implementation of sewer and sewage management laws and regulations and its impact on women. To achieve the aim of the research, the research set out to answer the following questions;

1. Whether there is poor implementation of laws dealing with sewage management.
2. Whether poor urban infrastructural planning affects sewage management and leads to environmental and health problems
3. Whether there is awareness of environmental and health problems arising from poor sewage management amongst the communities and the households.
4. Whether government's lack of prioritisation in budgetary allocations on sewer and sewage management leads to ineffective implementation of environmental health issues.
5. Whether communities and households have financial challenges in accessing basic resources for toilets and sewer management which leads to unhealthy domestic environment.
6. Whether exclusion of women in decision making and programmes regarding sewer system and sewage management leads to gender insensitive laws and programmes.

Various methodological and theoretical approaches influenced the conduct of the research and the analysis of the data collected. These included the women's law approach and the gender and sex analysis. Existential feminist theory informed the analysis of the data collected. The data collection methods included interviews, observations and use of written sources.

The research revealed that there are a number of laws including the Water Act, Urban Council's Act, Environmental Management Act, Environmental Management (Effluent and Solid Waste Disposal) Regulations, Housing Standards Control Act and Public Health Act which have a bearing on sewer and sewage management. The City Council and Environmental Management Agency are responsible for implementation, monitoring and

enforcement of the laws on sewer and sewage management. The research also showed that factors that affect sewer and sewage management include; overcrowding, poor infrastructure, improper use of toilets and the sewer system. This improper use arises from ignorance and carelessness in using the system which indicate lack of awareness on proper use and lack of community participation in decision making and programmes relating to sewer and sewage management. All these are worsened by the fact that laws that are aimed at regulating sewer and sewage management are not implemented by the City Council, Environmental Management Agency does not take Council to task in accordance with the law to enforce the non- implementation.

The research also revealed that it is women who suffer most as a result of poor implementation of the laws because of their traditional gender laws of fetching water, caring for the sick and cleaning the toilets. The research also found that women are more affected by the unhealthy environment created by the poor sewer and sewage management as they are the ones who spend most of their time within the homes which are closure to broken toilets and sewers. Children are another category of people that are also affected most because they do not appreciate the danger of unhealthy environments. The research found that children play close to the toilets which were found in very poor condition and also that the conditions of the toilets were not conducive to children.

In view of the findings, the paper recommends that;

1. Council and EMA should in corroboration with NGOs working on different aspects of sewer and sewage management, promote women's' awareness and participation in sewer and sewage management decisions and programmes.
2. Develop and implement action oriented plans for sewer and water infrastructure development through Development Corporation and gender sensitive budgetary allocation.
3. Council and the Agency to implement and enforce the various obligations aimed at improving sewer and sewage management.
4. Communities should act responsibly towards sewer usage, realising the benefits this has to them as users of the system.

5. Communities should organise themselves with help of NGOs to take a class action against Council for violation of their rights as one way of ensuring enforcement of sewer and sewage management laws.

ABBREVIATIONS

EMA	Environmental Management
PHA	Public Health Act
ACPHR	African Charter on Human and Peoples' Rights (The African Charter)
SQs	Single Quarters
ICESCR	International Covenant on Economic Social Cultural Right
CEDAW	Convention on the Elimination of all forms of Discrimination against Women
NGOs	Non Governmental Organisations.
SEARCWL	Southern and Eastern African Regional Centre for Women's Law.
UNICEF	United Nations International Children's Emergency Fund

LIST OF STATUTES

Constitution of Zimbabwe 2013

Environmental Management Act Chapter 20:27

Environmental Management (Effluent and Solid Waste Disposal) Regulations Chapter 20:27 Statutory Instrument No. 6 of 2007

Housing Standards Control Act Chapter 29:08

Public Health Act Chapter 15:09

Urban Councils Act Chapter 29:15

Water Act Chapter 20:24

INTERNATIONAL TREATIES

Aarhus Convention (Convention on Access to Information, Public Awareness, Participation and Access to Justice on Environmental Matters) 1998

African Charter on Human and Peoples' Rights 1986

Convention on the Elimination of all forms of Discrimination against Women 1981

International Covenant on Economic Social Cultural Right 1976

Protocol to the African Charter on Human and Peoples Rights on the Rights of Women 2005

Rio Declaration on Environment and Development 1992

Stockholm Declaration 1972

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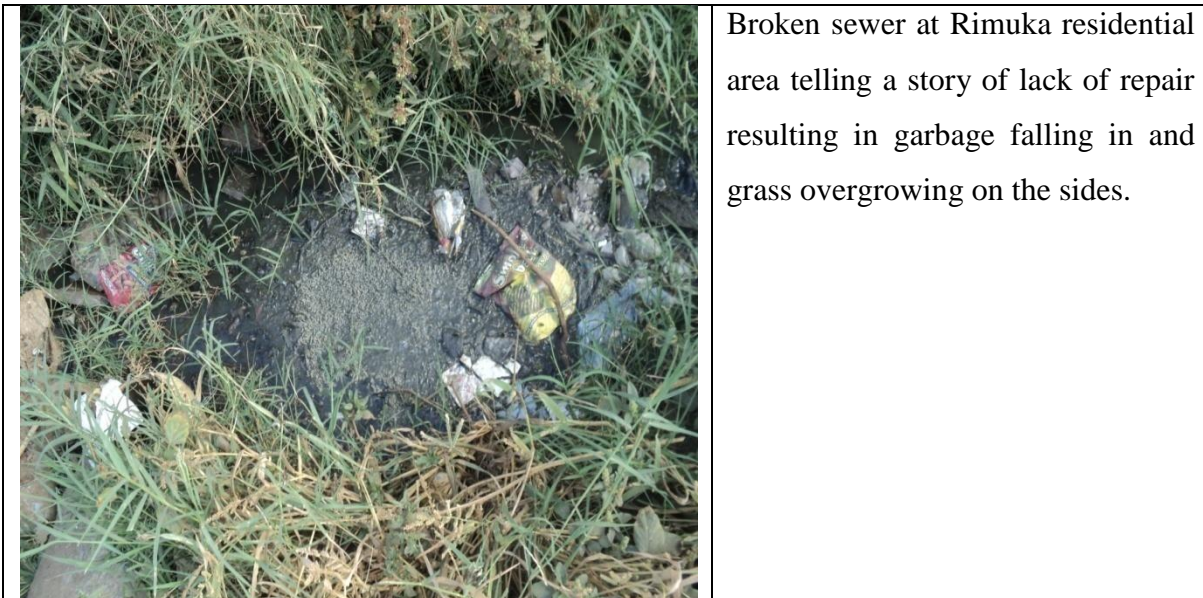
CHAPTER ONE INTRODUCTION

1.1 Background to the Research

“Every person shall have the right to a clean environment that is not harmful to health.” This is one of the rights that are provided for under the Environmental Management Act. Enjoyment of this right is crucial even to enjoyment of other rights. The international community under the Stockholm Declaration (1972) did observe that ‘the right to life, personal integrity, family life, health and development are linked with and depend on protection of the environment’. As such the protection of a clean and health environment is a prerequisite for enjoyment of other human rights. However, the enjoyment of the right to a clean and healthy environment is far from reality even where like in Kadoma, the right is legally recognised. The reality of the enjoyment of this right has also been recognised elsewhere as seen in the following statement;

The practical utility of a human right to a minimally adequate environment is not evident and the right certainly has not been realised in practice in many of the places where it is purportedly guaranteed (Wirth, 1995: 618).

The picture below confirms this reality.



The above picture brings out the issue of sewer and sewage management which is subject of the present paper. This paper is based on a research that was conducted in the city of

Kadoma as part of practical coursework in Women's Law. It was part of a wider research and it fell under the broader topic of Environmental health problems, their causes, impact and their management. Under the broader topic, I was particularly interested in the "Impact of poor implementation of sewer and sewage management laws and regulations on women in Kadoma." The discussion will have specific reference to the high density areas of Rimuka and Ingezi but also the medium density area of Eiffel Flats for comparison. The choice of the topic was influenced by the fact that the problem of poor sewer and sewage management and disposal is one of the issues that affect high density areas in most of the developing countries (Ali, Cotton & Andrew: 2005).

1.1 Statement of the Problem

The problem of poor sewage management is common in many cities in Zimbabwe and Kadoma is no exception (Duwe, Makaka & Sibanda: 2010). One of the causes of sewer bursts is improper use of toilets and sewage system like throwing of insoluble things in the toilets, sewer system. Unmaintained aging infrastructure for sewage and water systems also contribute to sewer bursts as there is insufficient water in the sewer system leading to lack of movement of sewage. The problem of unmaintained aging sewer pipes is worsened by improper use of the system. Toilet blockages and sewer bursts in residential areas using communal toilets pose serious environmental and health challenges more especially in high density areas where houses are close together and there are too many people within the area. This is the reality of townships of Rimuka and Ingezi in the City of Kadoma where the research was conducted. As revealed by the research both men and women are affected by the problem of poor sewer and sewage management but women are more affected because they are the ones who are in contact with unhealthy environments as the one above as they spend most of their time in the home surrounding and they clean the toilets. The women are also the ones who draw water in case of water shortage for flushing the toilets and they have the burden of care of the sick whose sickness is caused by unhealthy environment as a result of broken sewers and toilets. As the residents are struggling with the challenges of unhealthy environment posed by poor sewage management problems, the laws are there to provide for a clean and health environment; responsibility for management of sewage system and monitoring of the implementation of such laws and regulations on sewage management.

1.2 Aim of Study

The aim of the broader research topic was to investigate urbanisation and its effect on the environmental health especially that of women. Under my specific area of interest, the aim was to investigate the problem of poor implementation of sewage management laws and regulations and its impact on women and men.

1.3 Objective of the Study

In seeking to achieve the aim of the study, the research set out to determine

1. Whether there is poor implementation of laws dealing with sewage management.
2. Whether poor urban infrastructural planning affects sewage management and leads to environmental and health problems
3. Whether there is awareness of environmental and health problems arising from poor sewage management amongst the communities and the households.
4. Whether government's lack of prioritisation in budgetary allocations on sewer and sewage management leads to ineffective implementation of environmental health issues.
5. Whether communities and households have financial challenges in accessing basic resources for toilets and sewer management which leads to unhealthy domestic environment.
6. Whether exclusion of women in decision making and programmes regarding sewer system and sewage management leads to gender insensitive laws and programmes.

1.6 The Research Assumptions and Questions

1.6.1 Research Assumptions

1. There is poor implementation of laws dealing with sewage management.
2. Poor urban infrastructural planning affects sewage management and leads to environmental and health problems
3. There is limited awareness of environmental and health problems arising from poor sewage management amongst the communities and the households.
4. Government does not prioritise issues of sewer and sewage management in budgetary allocations which leads to ineffective implementation of sewage management laws.

5. Communities and households have financial challenges in accessing basic resources for toilets and sewer management which leads to unhealthy domestic environment.
6. Exclusion of women in decision making and programmes regarding sewer system and sewage management leads to gender insensitive laws and programmes.

1.6.2 Research Questions

1. Is there poor implementation of laws dealing with sewage management?
2. Does poor urban infrastructural planning affects sewage management and leads to environmental and health problems?
3. Is there awareness of environmental and health problems arising from poor sewage management amongst the communities and the households?
4. Does government's lack of prioritisation in budgetary allocations on sewer and sewage management leads to ineffective implementation of environmental health issues?
5. Do communities and households have financial challenges in accessing basic resources for toilets and sewer management which leads to unhealthy domestic environment?
6. Does exclusion of women in decision making and programmes regarding sewer system and sewage management leads to gender insensitive laws and programmes?

CHAPTER TWO THE LAW AND LITERATURE REVIEW

2.0 INTRODUCTION

This chapter focuses on the laws and regulations which regulate sewage management as well the institutional framework for the implementation of the laws and regulations. It also includes the theories that informed the research and analysis of the findings.

2.1 The Legal Framework for Sewer and Sewage Management.

The starting point for the legal framework for sewage management is the Constitution which under section 3 is said to be the supreme law of the land to which validity of all other laws is subjected to. The constitution¹ clearly provides for environmental rights in section 73. The Section provides and I quote

- (1) Every person has the right—
 - (a) To an environment that is not harmful to their health or well-being; and
 - (b) To have the environment protected for the benefit of present and future generations, through reasonable legislative and other measures that—
 - (i) prevent pollution and ecological degradation;
 - (ii) Promote conservation; and
 - (iii) Secure ecologically sustainable development and use of natural resources while promoting economic and social development.
- (2) The State must take reasonable legislative and other measures, within the limits of the resources available to it, to achieve the progressive realisation of the rights set out in this section.

The issue of sewage management in as far as it has a bearing on environmental rights, is covered by this section in that failure to implement laws and practices of sewer management can give rise to a breach of environmental rights.

¹ This is a new constitution which was adopted recently in May 2013. The old constitution made no provision for environmental rights.

The Environmental Management Act (hereinafter referred to as the Act) (Cap 20: 27) is an Act whose aim is to provide for “Sustainable management of natural resources and protection of the environment; the prevention of pollution and environmental degradation...”²In order to achieve its purpose of protecting the environment, the Act regulates the disposal and treatment of sewage,³ protection, and maintenance of any works constructed for the management of the environment. Sections 36(d) and 70 (1) together prohibits the discharge or disposal of waste in a manner that causes pollution to the environment or ill health to any person. It also gives room for promulgation of regulations which are aimed at giving effect to the Act. In view of this power, the Environmental Management (Effluent and Solid Waste Disposal) Regulations, 2007 (hereinafter referred to as the Regulations) were promulgated. Section 5 of the regulations prohibits the disposal of waste or effluent into a public stream or onto any other surface water or ground water, whether directly or through drainage or seepage⁴.

The Public Health Act (Cap 15:09) which is an Act to provide for public health addresses the issue of sewage management and treatment as it obliges local authorities to maintain cleanliness and prevent nuisance⁵ and to prevent or remedy danger to health arising from unsuitable dwelling⁶. Section 85 of the Public Health Act describes what constitutes nuisance and it includes;

any stream, pool, lagoon, ditch, gutter, watercourse, sink, cistern, sanitary convenience, urinal, cesspool, cesspit, drain, sewer, dung pit, slop-tank, ash pit or manure heap so foul or in such a state or so situated or constructed as to be offensive or to be injurious or dangerous to health; or any collection of water which may serve as a breeding pool for mosquitoes;

The Urban Councils Act among other things makes provision for powers and duties of the Council with respect to construction of works deemed necessary for the collection,

²Preamble to the Act.

³Section 70, 111 of the Act

⁴Similar provision is made under section 68(1) of the Water Act Cap 20:24

⁵Section 83 the Act

⁶Section 84 the Act

conveyance, treatment and disposal of sewage or storm water.⁷ It also protects public sewer by prohibiting construction of buildings over public sewer or drainage.⁸

The legal framework started with the Act instead of

2.3 The Institutional Framework for Sewer System and Sewage Management

There are a number of institutions/departments that are mandated under the various instruments above to carry out various duties and responsibilities with regard to sewage management in order to promote a clean environment which is not harmful to health. Reference here will be made to those that are available in Kadoma where the research was conducted. These include Environmental Management Agency (hereinafter referred to as EMA) and the Municipal City Council (hereinafter referred to as the Council). EMA is a regulatory authority which is responsible for formulation of quality standards on waste management, regulation and monitoring of collection, disposal, treatment and recycling of waste.⁹ This office is available in Kadoma. Interview conducted with the office indicates that the office is well aware of their responsibilities under the Act as well as regulations made under it.

Local authorities¹⁰ are the ones who are vested with the duty of implementing the quality standards on waste management, disposal, treatment and recycling of waste. The Council is also responsible for the construction of works for disposal and management of sewage,¹¹ maintaining cleanliness and preventing nuisance.¹² Under the Council, there are a number of departments whose work has a bearing on sewage management and these include the housing department; public health department and the engineering department, finance department as well as the central administration.

⁷ Section 168 of Urban Councils Act.

⁸ Section 180 of the Urban Councils Act

⁹Section 10 of the Act and 3(1)(b) of the Regulations

¹⁰Local authorities is used to refer to the Council

¹¹Section 111, 168 of the Act

¹²Section 83-85 of Public Health Act.

2.4 Theoretical Framework

2.4.1 Existentialist Feminist Theory

This theory looks at woman as the other. According to Barnett (1998:16), ‘the concept of woman as the other explains much of the traditional and continuing stereotyping of women as bearers of children, the nurturer of children, the home makers and (unpaid) home keepers.’ This theory will be used to show how the stereotypical roles of women affect them when it comes to the impact of poor implementation of laws regulating sewage management and treatment. This theory is linked to sex and gender analysis which is discussed in chapter 3 as it relates to gendered roles of men and women.

Another aspect of otherness of woman can be seen from the housing and toilet infrastructure in the Single Quarters houses at Rimuka and Ingezi. These are very small single roomed houses, without a kitchen, toilet and bathroom commonly known as SQs. The bathroom and toilet are shared and are put separately and designed in a way that does not consider the specific needs of a woman. Since the toilets are designed to serve a number of households, some houses are closer to the toilets and others are far such that their use in the night poses security risks for users more especially women. It is clear from the historical background of these houses that women were excluded in the thoughts of the developers as can be seen from the following comment from a key respondent;

These houses were built long ago during the colonial times and were meant to accommodate single men working for the mines and not families.

Looking at the buildings, it seems to me that they were not built as temporary houses which gives an indication that that the exclusion of women from residence of these areas was meant to be permanent.

2.5 Conclusion

The existence of the laws and regulations for sewer and sewage management is to ensure a clean and health environment which also promotes the enjoyment of other rights. EMA and Council are responsible for implementation of the laws; but enjoyment of a clean and health environment as it relates to sewer and sewage management is far from reality as will be shown in chapter 4. The effect of this reality on women is compounded by their otherness. The next chapter will discuss the methodological approaches and data collection methods

with which women's lived realities with sewer and sewage management laws were interrogated.

CHAPTER THREE METHODOLOGICAL FRAMEWORK

3.1 Introduction

This chapter discusses the methodological approaches which guided the research process, the methods employed for data collection, the limitations of the research process and issues emerging from the research process.

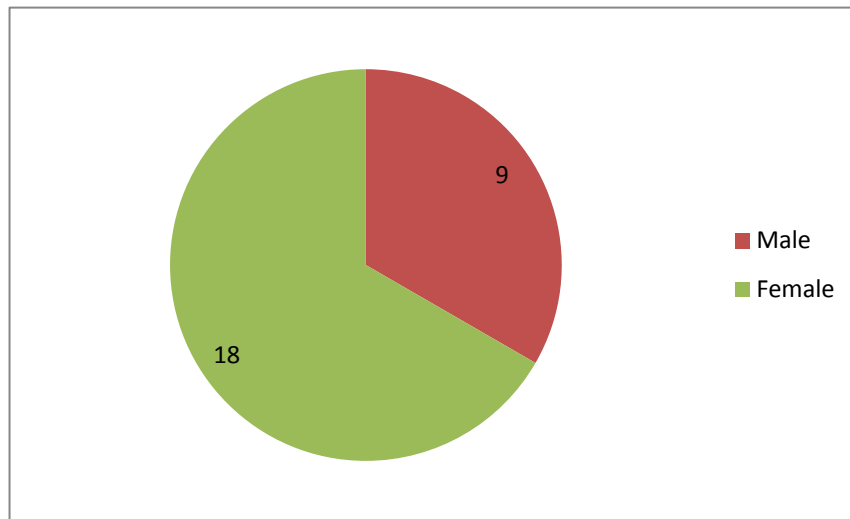
3.2 Methodological Approaches

3.2.1 Women's Law Approach

This is an approach which takes women's actual lived experiences and life situations as a basis for the analysis of the position of women in law and society (Bentzon *et al* 1998: 25). In this research, I was interrogating the women's lived experiences with the laws and regulations relating to sewer and sewage management. The starting point was the Act which regulates the management of sewer system and sewage disposal so as to avoid causing pollution to the environment or ill health to any person.

To understand the women's lived experiences with sewer and sewage management laws, the grounded theory approach was used. This is an approach which engages empirical research as a means of building up appropriate theories and concepts (Bentzon *et al* (1998: 79). I used this approach to obtain empirical evidence on women's lived experiences with access to toilets and how the poor sewer and water infrastructure impacted on their lives. As such I interviewed both men and women. Let it be noted that apart from key informants, most of the respondents interviewed at Rimuka and Ingezi townships were women. This was so because the women were the ones we found in the homes as we went around during the research. The chart below sums it all.

Figure 1 Total No. of men and women interviewed at Rimuka, Ingezi and Eiffel Flats



In using grounded theory, I started off with assumptions which then guided me in identifying the sources which would answer my research questions (Bentzon *et al* 1998:80). For instance one of my assumptions was that there is poor implementation of laws dealing with sewage management. Following this assumption, an interview was carried out with the EMA an office responsible for monitoring implementation of the laws. A follow up interview was held with Council officials as the EMA indicated that the implementing authority of the sewage management laws is the council. Following interviews with EMA, Council officials as well as residents, it became clear that water shortage is one of the factors contributing to the problem of sewage system management as such I also had to interview official from Zimbabwe National Water Authority (hereinafter referred to as ZINWA).

Another assumption was that there is poor infrastructural planning which affect road networks in a way that the road networks do affect management of sewage system. This necessitated an interview with engineering department of the city council which is responsible for the management, treatment and disposal of sewage. Officers from the department indicated that their challenge is overcrowding which they said puts pressure on the sewage system and not poor infrastructural planning. As such the assumption of poor infrastructural planning was not pursued further and the issue of overcrowding prompted me to interview the housing department on the issue of overcrowding in view of the

Housing Standards Act and their response was that they have plans to decongest the SQs but that they are challenged by financial difficulties. In trying to explain the problem of sewer bursts, Council officials indicated that the problem is high in high density areas. This prompted me to have a comparative view with a different area and so I visited Eiffel flats, a medium density area. Although only four residents were interviewed at Eiffel Flats, they indicated that they also have problem of sewer bursts which is due to water shortage. Their view was corroborated by that of key respondent from the same area who also said that in addition to water shortage the other challenge was aging sewer infrastructure. This showed that the sewage system problem is not just in the high density areas but also medium density which is an indication of poor service provision by the council.

Daily analysis of the data obtained helped to see how the assumptions were holding up and adjusting where necessary. I had to adjust my assumption on sewage harvesting and treatment because EMA and the Council offices indicated that treatment and harvesting of sewage is no longer done as the plants used for the same are not working. Further to this, the whole sewer system in the high density areas is under Councils responsibility unlike in medium density area where Council's mandate begins from the public sewer.

3.2.2 Sex and Gender Analysis

Gender refers to social construction of the roles of males and females. It entails on the one hand, men's and women's active roles in society and on the other hand, ingrained social ideas about what men and women should do and how they ought to behave and interact (Bentzon, et al, 1998: 83). As a social construction, gender plays a role in division of labour at household or community level. There are certain roles at household level that society deems feminine like the cleaning of the house, fetching of water and cleaning of toilets and care giving in times of diseases.

Households and communities as producers of sewage or affluent and users of the toilets and sewer system are also duty bearers in sewer and sewage management. In as far as the management of sewage also relate to management of toilets, the sex and gender analysis was relevant during the research such that it was used to determine how the gender division of labour affects the different sexes. The gender division of labour at household level was also relevant in view of the problem of water shortage which also has an impact on sewer

system management when it came to the issue of fetching water for flushing toilets. The sex and gender analysis was also important in establishing which sex is affected most when it comes to ill health resulting from unhealthy environment created by poor sewage management.

3.4 Data Collection Methods

During the research, I used various data collection methods which included interviews, observations and written records.

3.4.1 Interviews

In an effort to collect data to meet the study objectives, interviews were conducted with key informants but also residents from the research areas. Residents were located in their homes while key informants were located in their offices respectively.

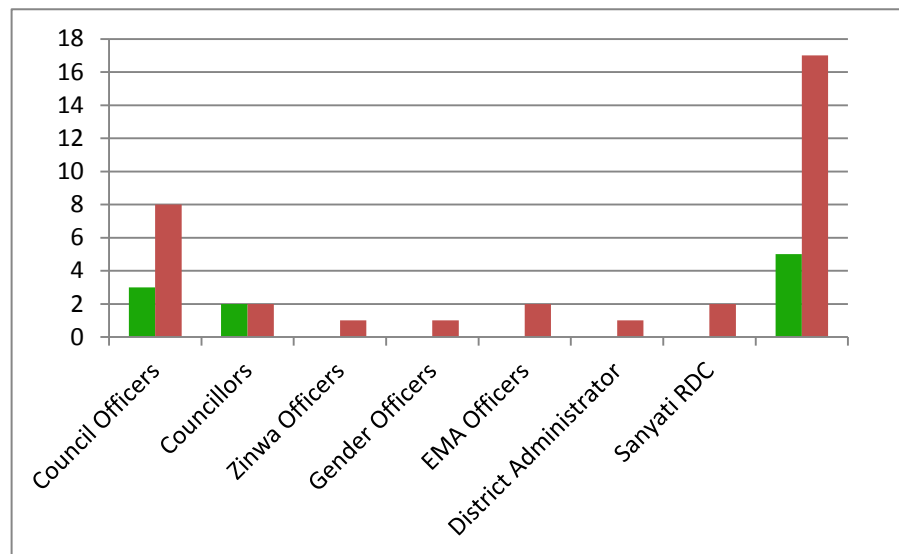
3.4.1.1 Key Informants

The choice of key informants like EMA officials and Council officials was based on their responsibilities as derived from literature on sewage management. Other key informants were linked to me through interviews with other key informants as well as individuals. For instance, the District Administrator (DA) linked me to the Chief Executive Officer (CEO) for Sanyati Rural District Council (RDC) and the CEO linked me to three councillors for the RDC who on the date of the interview were having a meeting in town. The Councillors were able to meet us during break time.

With Council officials there was a meeting where all our research groups were represented and five departments of council were represented to address our various issues relating to the various research issues right at the hotel where we were lodging. This arrangement was made on the first day of research when we went to make appointments for interviews. On the date of interview each research group was given 30 minutes with each department. The benefits of this arrangement were that we were able to hold a number of interviews with all the five departments within half a day and at one place which would not have been possible if all the groups were to be going to the council offices. This also saved us time of travelling and waiting at the offices. The challenge however was time as 30 minutes was not sufficient to exhaust all our issues.

ZINWA was chosen because during the research it came out that water shortage contributed to the problem of sewage management and that ZINWA is responsible for provision of water to Council. The reason was to establish why there was erratic water supply. The key respondents helped me to establish their understanding of their roles in implementation of the laws on sewage management and treatment and how they are implementing or not implementing the same. Below is a table showing the distribution of the sexes of the officials interviewed.

Figure 3. No of key informants and their offices



3.4.1.2 Individual Interviews in Residential Areas.

To understand the women’s lived experiences with the implementation of sewer and sewage management laws, women had to be located in their places of residence. We visited high density areas of Rimuka New Stands, Rimuka SQs, Ingezi SQs and New Stands. Noting that there were similarities in terms of the challenges for the two areas, we decided to also go to Eiffel Flats; a medium density area so that we can have a comparative view of the areas. The other reason was to triangulate the data collected from one of the council officials who said that the problem of sewer bursts was common in the High density areas and that it was connected to poverty.

The choice of respondents was done through random sampling whereby upon arrival at the area we started with any house and then we moved on to another after 6 houses on average but subject to availability and willingness of residents at the houses. At one point however at Ingezi SQs we did not follow the procedure because we were called back by a self - selected respondent who sent for us and asked why we did not interview her. She happened to be one of the women who clean the communal toilets at Rimuka and she said that she is employed by Council. We were aware of the challenges of self -selection respondent but we were able to triangulate her information with observations of the toilets, sewer and water system.

Although our target was women as we needed to get their lived experiences with the problem of sewage management, we also interviewed men within the residential areas. The challenge however was that there were few men whom we found at the houses as men were reportedly at work or business. This buttressed the idea of stereotypical roles of men as bread winners and women as homemakers.

3.4.1.3 Mode of conducting the Interview

All the interviews started with self-introductions, introduction of our study objective and then sought permission to interview the respondents. If they accepted, we proceeded with our questions and if they refused, we would proceed to another house. The questioning followed a semi-structured interview as we were guided by the research questions but did not follow them to enable the respondents to tell their own story. Follow up questions depended on the responses but where necessary, they would depend on uncovered pertinent areas of the research objectives.

3.5 Observations

The Nature of my topic required that I visit the women in their homes. This enabled me to observe their environment which included the toilet, water and sewer infrastructure and even the housing infrastructure. This helped me to take note of the toilet, sewer and water system conditions which provided a good triangulation for the data collected from individuals and officials. This included taking photographs of the toilets and the sewer. It has to be indicated that for all the pictures that were taken both at Rimuka and Ingezi SQs,

the respondents invited me to enter the toilets and take the photos. At Ingezi SQs the toilets were locked and a respondent had to take keys to open the toilet for me.

3.6 Written Sources

Data was also collected from written records at the public health office on diseases reported and treated at the clinics at Rimuka and Ingezi. I also managed to obtain Kadoma City Strategic Plan, Environmental Management (Effluent and Waste Disposal) Regulations.

3.7 Emerging Issues

Using the grounded theory approach of continuance analysis of data during the process of data collection, it transpired contrary to my assumptions that improper use of the sewer system was also caused by careless. This carelessness in my analysis is caused by lack of sense of ownership and sense of responsibility in the SQs where the toilets are communal. It also transpired that cultural beliefs also influence the throwing of insoluble things like sanitary pads in the toilets. It also emerged contrary to my assumptions that failure to implement and enforce sewage management laws is not just a result of inadequate resources but also lack of political will and lack of consideration.

3.8 Limitations of the Research

The research methods and methodologies that I used were useful but I had challenges. Firstly, language was a serious challenge as being a foreigner I did not understand the language of the people. Since our group was composed of foreigners only, we had to rely on interpreters and trust that their interpretation was in order. This created a challenge in deciding where to go next as we had to choose where both interviewers had an interest as each of us could not move without an interpreter except when going to the offices.

The other challenge was time constraint which made me unable to exhaust or to interrogate the assumptions to their point of saturation. For instance on assumption that women are the ones who suffer most because they stay at home where the environment is unhealthy, women at Rimuka confirmed this and when we went to the public health office to obtain statistics the figures were such that in other instances it was actually more men who were reported sick than women. I continued to interrogate this when I went back to the field now at Ingezi where a respondent said that they do not go to hospital but just use herbs and

another said they rely on prescription given to one person but I did not manage to get back to the health officials to ask as to how much is charged for the medical treatment. The other challenge was the nature of our group assumptions which created repetitive questions for each topic as we all had six major assumptions and then sub-assumptions for the major assumptions, some information could be left out as asking questions on each and every issue meant eating so much time of the respondents.

3.9 Evaluation of Research Methodology

The methods and methodologies adopted assisted in obtaining relevant data for the research topic. Using women's lived realities; I was able to get first-hand information from the women on their lived realities. Both the random sampling and the inclusion of men helped us to get a fair view of the problem under discussion. Although there were some challenges, the process of triangulation using observation and key informants as well as information from colleagues in the same group helped to ensure that I still had sufficient information with which to address the research problem.

CHAPTER FOUR SEWAGE AND SEWER MANAGEMENT: THE LIVED REALITIES OF WOMEN OF RIMUKA AND INGEZI LOCATIONS

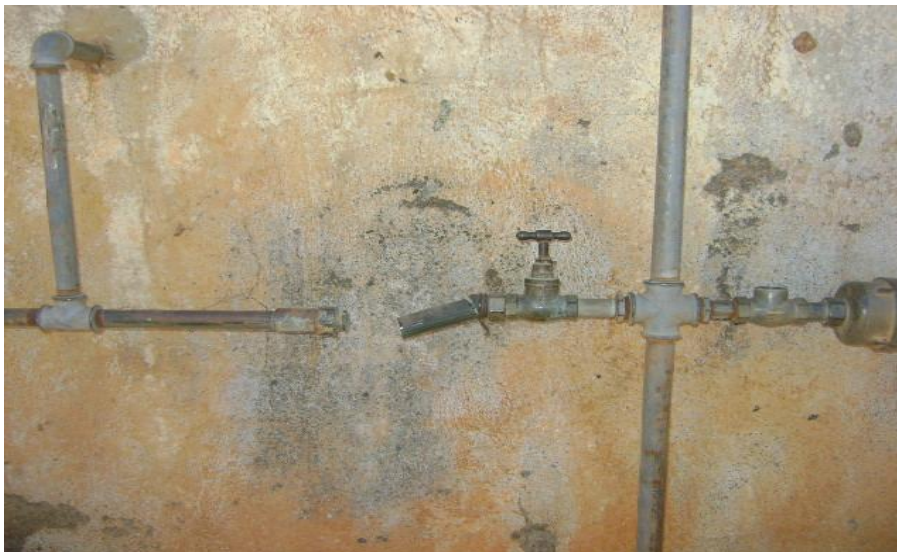
4.1 INTRODUCTION

Sewage and sewer system management is an integral part of the protection of the right to a clean environment that is not harmful to health. In this paper sewage is used to refer to liquid or solid waste whether domestic, commercial or industrial. Sewer system on the other hand refers to the system which conveys the sewage from generation point to disposal point. Sewage management therefore refers to the handling of sewage in the sewer system from the point of generation to the point of disposal. This chapter discusses the experiences of Rimuka and Ingezi with sewer system and sewage management by looking at the sewer infrastructure conditions and its implications. It also discusses the problem of sewer bursts, its causes and its implications on the environment and health of the people.

4.2 Sewer Infrastructure Conditions

In discussing sewer infrastructure conditions, I will include toilets, sewer pipes, septic tanks and water infrastructure as the research revealed that they have a bearing on sewage management. Most of the infrastructure in the SQs is aged, unmaintained and is not functioning. The picture in figure 4 shows the condition of water infrastructure at Ingezi SQs.

Figure 4



In the SQs toilets are communal; and the flushing system and the water system are not working such that the users have to rely on pushing faeces with sticks.

Figure 5



The condition of the flushing system and water infrastructure coupled with non availability of running tap water is a cause of frequent toilet blockages. Figure 6 illustrates this situation with regard to toilets in the SQs at Rimuka and Ingezi;

Figure 6



The toilet and water infrastructure conditions in the SQs differ from those of Eiffel Flats and the New Stands at Ingezi and Rimuka where the toilets are not communal. The toilets and the water systems are in working conditions and they did not complain of toilet blockages. However, they do experience sewer blockages just as the SQs which they attributed to erratic water supply, a problem common to all areas. The observation made is that the systems that are causing problems are the ones that are under Council's mandate. Apparently in these areas where households are responsible for their own systems the systems are in working conditions except where they connect to public system. This suggests poor service delivery on the part of the Council. Figure 7 is a table which summarises the water and toilets infrastructure conditions in the visited areas.

Figure 7 Toilets and Water infrastructure conditions at Rimuka, Ingezi and Eiffel Flats

LOCATION	Type of toilets: Communal/family		Condition of toilet: functional or not functional		Condition of Water system in the toilet		Running Tap Water Infrastructure	
	Communal	family	functional	Not functional	working	Not working	Good	Poor
RIMUKA SQs	✓			✓		✓		✓
RIMUKA NEW STANDS		✓	✓		✓		✓	
NGEZI SQs	✓			✓		✓		✓
NGEZI NEW STAND		✓	✓		✓		✓	
EIFFEL FLATS		✓	✓		✓			

4.3 Implications of Poor Toilet, Sewer and Water Infrastructure on Sewer and Sewage Management

The poor infrastructure impacts on the sewer and sewage management in a number of ways. These include causing frequent toilet blockages, sewer bursts, nuisance and putting residents at risk of diseases.

4.3.1 Poor Water Infrastructure and Erratic Water Supply

For the SQs as noted above, there is no running water for the toilet flushing but since they have no other alternative, they still use the toilets and this results in frequent toilet blockages. At Ingezi SQs one resident had this to say

We have serious problems of sewer and toilet blockages. Due to absence of running water we have to use sticks to push the faeces and at times the toilets are full to the brim. In cases of blockages, council takes time to come and fix the problems and this poses health challenges as people are put at risk of diseases like cholera, typhoid and dysentery.

The non availability of running water also causes sewer bursts due to non movement of sewage in the sewer. The problem of sewer bursts as resulting from the water shortage is not unique to the SQs. A respondent at Rimuka New Stands and a key informant at Eiffel Flats said that the absence of running water poses challenges to the sewer system which experiences frequent bursts as there is no movement of sewage in the sewer.

The erratic running water supply requires that households and users of toilets find alternative water supplies for flushing. Respondents indicated that due to erratic running tap water supply they have to rely on boreholes. Most of the respondents do not have their own boreholes so they rely on the boreholes sunk by council or government partners like UNICEF¹³ and this means walking distances of not less than 500meters. Traditionally, the gender division of labour tasks women with the drawing of water for household use. Rimuka and Ingezi are not exceptions to this traditional gender division of labour as can be seen from the three voices below.

We have had no running water since 2008 until 2 months ago. As of now this is the third day without running water so we have to rely on boreholes. I have to keep a lot of water to service the toilets and this burden's women and children (*voice of an elderly woman at Rimuka New Stands*).

The challenge is that there is no running water so we rely on borehole water which is drawn by the wife and children. Sometimes we men go to the borehole but we do so at night (*voice of a man at Rimuka New Stands*)

Women are more affected because they are involved in water management in the home. In critical moments which occur at least once a month, people queue for long

¹³ Respondents in all areas reported that UNICEF is one of the International Organisations that is helping government with provision of water through sinking boreholes.

hours. 30 to 40 people would be queuing at one time. Women sometimes fight on who should get water first and how much one should get (*voice of a man at Rimuka New Stands*).

It is clear from the respondent's voices that it is the women and children who are burdened with the drawing of water for household use which includes flushing of toilets. It is inevitable that the water has to be drawn for toilet flushing otherwise the houses will be in conditions unsuitable for dwelling during times when there is no running water as already seen from the conditions of the communal toilets. One of the Council officials interviewed indicated that to counter the erratic water supply *they do water tracking for toilets* but the situation on the ground in the areas visited was quite contrary.

4.3.2 Poor Toilet and Sewer Infrastructure

As one gets close to the broken sewers or the communal toilets, she/he cannot escape the sorry sight and foul smell coming from the toilets and the broken sewers. This brings to mind section 85 of the Public Health Act. The section defines nuisance in the following terms

The following shall be deemed to be nuisances liable to be dealt with in the manner provided in this Part—

(a) any dwelling or premises which is or are of such construction or in such a state or so situated or so dirty or so verminous as to be injurious or dangerous to health, or which is or are liable to favour the spread of any infectious disease;

(b) any stream, pool, lagoon, ditch, gutter, watercourse, sink, cistern, sanitary convenience, urinal, cesspool, cesspit, drain, sewer, dung pit, slop-tank, ash pit or manure heap so foul or in such a state or so situated or constructed as to be offensive or to be injurious or dangerous to health; or any collection of water which may serve as a breeding pool for mosquitoes;

The situation of the toilets and the sewer in the SQs clearly amounts to a nuisance as defined in section 85 and such a nuisance is prohibited in section 82 of the Public Health Act. Not only do the toilets and sewer cause nuisance but are also a health hazard. The respondents indicated that the conditions expose them to diarrhoea, dysentery, typhoid and cholera especially during the rainy season. Even the health officials agreed to the health implications posed by the poor toilets and sewer conditions. It was found during the research that Kadoma was one of the areas worst hit by cholera outbreak in 2008/2009. One respondent actually told us that she lost her husband to the cholera outbreak.

A number of respondent said that women and children are more affected as they are the ones who are within the home surroundings for the most part of the day as men go out to work or business. Going through the areas our observations confirmed this view. As indicated in Chapter three out of 27 respondents found in the residential areas, only 9 were men. For children the problem is worsened in that for them, they may not even appreciate why they should not play close to the toilets or the sewer. In fact during our visit at the two places, we saw children playing close to the toilets whose conditions were poor. Women are further burdened in cases of sickness because of their stereotypical role of nurturing of children and caring for the sick. This inhibits them from participating in development activities.

4.4The Problem of Sewer Bursts and its Causes

The causes of sewer bursts in Rimuka and Ingezi are diverse. They include water shortage and poor water infrastructure, improper usage of toilets and the sewer, poor sewer infrastructure and overcrowding. The challenges posed by water shortage on the toilets, sewer and lives of women have already been discussed above so I will proceed with the other causes. The table below sums up the respondents views on the causes of sewer bursts.

LOCATION	CAUSES OF SEWER BURSTS			
	Water shortage	Improper use	Old age infrastructure	Overcrowding
RIMUKA SQs	II	IIII		II
RIMUKA NEW STANDS	II		III	
INGEZI SQs	III		I	I
INGEZI NEW STANDS				
EIFFEL FLATS	III	I	I	
Total No. of Views	12	7	5	3

4.4. 1 Overcrowding

Overcrowding in the SQs was one of the realities in both Rimuka and Ingezi. On average the respondents indicated that one SQ is occupied by 6-8 people yet these houses were

meant for single men.¹⁴ Occupants include parents, children and grandchildren.¹⁵ This is contrary to the original arrangement of single men which would have meant 580 occupants and 189 occupants for Rimuka and Ingezi SQs respectively but it also contravenes sections 43 of the Housing Standards Act which deems a dwelling to be overcrowded when 2 or more persons not being husband and wife and being over the age of 10 sleep in one room. The situation in the SQs is that the 6-8 people mentioned sleep in one room with all their property in the same room. This overburdens the system which was meant to serve a smaller population. With over population come different lifestyles which also affect toilet and sewer usage.

4.4.2 Improper Use.

It came out in the research that improper use of the toilets and the sewer system leads to toilet blockages and sewer bursts which affect the management of sewage. This improper use covers throwing of insoluble things in the toilet like pampers menstruation clothes, sanitary pads, clothes, *and sadza* and chicken feathers. Reasons for throwing the insoluble things included ignorance on proper use of toilets and sewer, carelessness and culture. Lack of financial resources was also mentioned as being a cause of use of things like newspapers, cartons or maize cobs in place of tissues. Lack of awareness came out clear even from key informants who said that awareness campaigns are usually carried out when there is an outbreak. Five key respondents confirmed this view. This being the case, it would appear to me that their target is the prevention of further spread of the outbreak and not necessarily the proper use of the toilets and the sewer. If that were the objective, then a more proactive than reactive approach to awareness would have been adopted.

Although the respondent's mentioned ignorance on proper use as a cause for the improper use, the fact that they were able to point at these things as being a cause of the blockages, indicate that there is some level of awareness but that some people are just careless. One respondent clearly came out on this as she said

People know proper use of systems but still choose to throw these things.

¹⁴ Voice of Key Respondent from Housing Department

¹⁵ Voice of a respondent at Rimuka SQs

The issue of carelessness seems to me to be arising from a lack of sense of ownership and sense of responsibility on the communal toilets. When I asked the respondents as to who cleans the toilet they mentioned council which means that when they are using the toilets, they do not feel bound to leave them clean as households using individual toilets do. In the SQs nobody seemed to have considered the use of bucket for flushing. At least at Ingezi some of the respondents said that they use sticks to push the sewage but at Rimuka they said they just leave the sewage. In fact when I was invited to enter the toilets to appreciate the conditions, upon entry, I found a lady helping herself and I turned back out of respect. When she came out, I entered again and found that she had just left the sewage without even trying to push the same as the respondents at Ingezi said they do. At Rimuka SQs it also came out that since the toilets do not have doors they so can be used by anyone even non residents who may feel they have no reason to keep the toilets clean.

Improper use is also caused by cultural beliefs on disposal of sanitary pads. Although the respondents did not say that the cultural belief was the cause, one respondent at Ingezi when asked on how she disposes of her sanitary pads, she said that she burns them because she believes that if she just disposes of them anyhow, she may be bewitched. This partly explained to me why other women choose to throw their sanitary pads in the sewer or toilets and not in the garbage containers for collection by council.

4.4.3 Poor infrastructure

The sewer infrastructure is in very poor condition because it is not maintained and also because it is very old. One key respondent said that some of the infrastructure was built in the 1940s. Most of the infrastructure therefore has outlived their lifespan thereby being prone to frequent blockages. This is even made worse by overcrowding which puts a huge strain on the already fragile system. According to council, financial challenges are a reason why they do not maintain or replace the infrastructure. However we did not come across any action oriented plan with regard to allocation of financial resources to progressively realise the responsibilities in the light of shortage of resources.

4.5 Implications of Sewer Bursts on Environment and Health

Burst sewer leads to disposal of sewage into the open environment. Respondents said that sometimes when the sewer is broken, there is overflow of sewage unto the streets such that

walking becomes difficult more especially for children. This not only causes nuisance to people but also pollutes their environment and puts the people at the risk of disease outbreaks. Sometimes, the sewage pollutes water sources. A number of respondents said that sometimes water from the tap comes out greenish as it is mixed with sewer. Even officials from the engineering department of council confirmed this saying

Water pipes and sewer pipes run parallel to each other and residents sometimes break the water pipes to get access to water pipes so this breakage causes mixture with sewage when the sewer system is faulty. As a result when water gets to the tap it is mixed with sewage.

4.6 Conclusion

Lived realities of women and children at Rimuka and Ingezi locations confirms the negative impact of poor toilets, water and sewer infrastructure on women especially in the light of traditional gender roles of cleaning toilets and fetching water for toilet flushing. Overcrowding, improper use of the sewer and toilets and lack of resources exacerbates the problems as the health and environment of the people is affected. Since sewer and sewage management is legally regulated, the next chapter discusses responsibility of various players in sewer and sewage management

CHAPTER FIVE THE UNCLEAN AND UNHEALTHY ENVIRONMENT OF RIMUKA AND INGEZI: WHOSE RESPONSIBILITY IS IT?

5.1 INTRODUCTION

From the findings discussed above the problem of poor sewer and sewage management can be attributed to various players which include the Council, the Agency, individuals and communities. There are various legal obligations imposed on each of these players for the realisation of the right to a clean and health environment, protection of the environment and prevention of pollution to which sewer and sewage management is an integral part. This chapter discusses the role of these various players in the light of their contributions to the problem of sewer and sewer management in as far as the implementation and enforcement of the law is concerned. Human rights implications of the players' failure to implement the law will also be discussed.

5.2 Individuals and the Community

Individuals as users of the sewer system contribute to poor sewer and sewage management by improper use of the toilets and sewer system which results in nuisance as defined in section 85 of the Public Health Act.¹⁶ Under section 82 of the Public Health Act, all persons are prohibited from causing nuisance or other condition which is dangerous or injurious to health. This nuisance violates the rights to environmental protection and the principles of environmental management as provided under section 4 of the Act¹⁷. In as far as the improper use is caused by the people and communities' carelessness; they are equally liable to the state of environment in which they are. Individuals and communities need to develop a sense of ownership and responsibility of the sewer system not only because they are the ones who use the system but also because in case of nuisance, they are the ones who suffer. Much as it is Council's responsibility to provide the sewer services, its adherence to its obligations contributes to a clean and health environment. As both men and women benefits from and are affected by the sewer system, this responsibility is for both men and women. Carelessness and ignorance on proper usage of the sewer reflects on people's lack of involvement in sewer and sewage management decisions and programmes and lack of awareness.

¹⁶For what amounts to a nuisance see chapter 4

5.3 Council as Service Provider

There are a number of areas that reveal Council's failure in implementing the law on sewer and sewage management. These include; poor service delivery vis a vis water, toilets and sewer infrastructure and water supply, overcrowding and prevention of nuisance, and people's improper use of the toilets and sewer system.

5.3.1 Poor Service Delivery as a breach of legal obligations

Moving around the areas of Rimuka and Ingezi and hearing the lived experiences of women and observing the water, toilets and sewer infrastructure, the fact of poor service delivery is evident.

5.3.1.1 Water infrastructure and water supply

Council as a Local Authority has a duty to provide sufficient water for domestic purposes. This duty is recognised under sections 32 of the Water Act, 64(1) of the Public Health Act and 183(1) of the Urban Councils Act. Council is further obliged to maintain water works within its distribution for the effective distribution of a supply of pure water for drinking and domestic purposes. The failure to maintain the water infrastructure and to provide running water is a failure of these legal obligations. I am mindful that Council mentioned of provision of boreholes. These however are not sufficient and do not really solve the problem of running water for the flushing toilets. The provision of borehole water other than providing water to the communities has a negative implication of burdening women whose perceived traditional gender roles demand that they fetch water for flushing toilets for the management of the toilets. Running tap water is therefore the best.

5.3.1.2 Sewer Infrastructure

It is Council's responsibility under section 168 of the Urban Council's Act to construct works necessary for the collection, conveyance, treatment and disposal of sewage or storm water.¹⁸ Failure to maintain the sewer breaches not only the principles of environment as

¹⁸Section 111 of the Act also recognizes this responsibility but of course with direction from the Minister.

recognised under the Act but also the principles of maximising environmentally sound management of solid waste and sewage as provided for under Agenda 21.¹⁹

5.3.1.3 Control of Overcrowding and Prevention and Remedy of Nuisance

The responsibility of prevention and remedying of nuisance is vested in Council under Part IX of the Public Health Act and control of overcrowding under part IV of the Housing Standards Act. Holding people liable for causing nuisance would to some extent prevent the recurrence of the conduct which gives rise to the nuisance. It would appear that Council's failure to hold people liable is because Council itself does not have clean hand as it is also responsible for nuisance by failing to maintain or replace the aging sewer.

5.3.1.4 Improper usage of toilets and sewer system

Improper usage of the sewer as caused by ignorance and careless of the users reflects on failure of the obligation to provide information and to involve the communities in decision making and programmes relating to sewer and sewage management²⁰. Raising people's awareness not only on health hazards of poor environment but also on proper use and management of the sewer and promotion of community involvement in decision making and programmes on sewer and sewage management is essential not only in developing people capacity and skills for effective participation in sewer and sewage management but also in influencing attitudes and behaviour consistent with environmental management.²¹

5.4 Environmental Management Agency

The Agency is vested not only with the responsibility of monitoring the implementation of sewer and sewage management laws but also enforcing the same under the Act and regulations made under it. The Agency is obliged to issue a spot fine to any person who contravenes the regulations and to take the person to court in the event of failure to pay the fine within a prescribed time. Contrary to these provisions in cases of Councils' failure to adhere to laws, the Agency issue order directing Council to remedy the breach.²² This in my analysis contributes to Council's attitude towards the management of the sewer system

¹⁹ www.unrep.org

²⁰ Section 4(1) (b), (2)(c) and (d) of the Act

²¹ Section 4(2) (c) and (d) of the Act. This is recognized in Article 1 of Aarhus Convention

²² A Key respondent said that this is so because they consider Councils financial challenges

as they know that no real action will be taken against them. Toilets and sewer infrastructure therefore are not prioritised in resource allocations.

5.5 Human Rights Implications

The foregoing discussion clearly indicates failure to implement the laws relating to sewer and sewage management, environmental rights to a clean environment that is not harmful to health, access to environmental information and participation in decision making and programmes on environment management.²³The right to a healthy environment is a recognised human right.²⁴A poor sewer and sewage management not only violates the right to a clean and health environment but also affects other rights which are interlinked and interdependent on this right. These include the rights to health, life, access to quality water, housing, work, economic activity and education. Unhealthy environment affect the quality of water, quality of life of the people and can lead to disease outbreak which in some cases results in death.²⁵Sickness would affect people's realisation of the rights to education, work and economic activity.

5.6 Financial Inadequacy: A Challenge or Scapegoat?

It is not in dispute that the Council and the Agency have financial challenges which affect their operations with regard to implementation of the laws on sewer and sewage management including maintenance or replacement of aging infrastructure. However, considering that there problem of sewer has been there since 2005 (Mangizvo: 2009) and yet there are no action oriented programmes on the ground for progressive realisation of the right to a clean and health environment through provision of sound sewer and water services, there is also lack of political will to address the problem. Interconnectedness and interdependence of human rights on a clean and health environment ought to be taken seriously by the responsible authorities. The authorities can explore international cooperation as a means of raising finances geared at improving service delivery. Since Council indicated that many people do not pay rent and service charges which the people

²³Section 4 (1) of the Act.

²⁴Articles 12(2) (b) of the ICESCR, 14(2) (h) of CEDAW, 24 of African Charter and 18 of Women's Protocol.

²⁵As seen in the testimony of a respondent who lost her husband to the cholera outbreak of 2009.

attributed to poor service delivery, improved service delivery would help Council in raising more money for its operations.

5.7 Conclusion

Observance and adherence to the laws on sewer and sewage management by individuals, communities and Council, as well as monitoring implementation of the same and enforcement of their breach would reduce the problems of sewer and sewage management so as to ensure sound environmental rights. With the interconnectedness and interdependence of other rights on environmental rights, implementation of sewer and sewage management laws is a must. The next chapter concludes the paper and suggests recommendations for realisation of the right to a clean and health environment with regard to sewer and sewage management.

CHAPTER SIX. WHATS THE WAY FORWARD?

This chapter concludes the paper and makes recommendations for improved service delivery with regard to sewer and sewage management.

6.1 Conclusion

The foregoing discussion has shown that laws and regulations relating disposal and treatment of sewage, protection and maintenance of works for sewer and sewage management, control of overcrowding and prevention and remedy of nuisance are not adhered to and enforced by the communities, Council and the Agency as the case may be. It has also been shown that urban infrastructure planning affects sewer and sewage management in as far as it relates to failure of housing planning to respond to growing population and lack of maintenance of toilets, sewer and water infrastructure.

There is also failure to adhere to environmental management principles of community awareness and involvement in decision making and programmes of sewer and sewage management which contributes to communities' improper usage of the system. This is exacerbated by Council's failure to enforce nuisance and overcrowding provisions. Communities financial inability contributes to improper use of the sewer system as communities use hard papers instead of tissues.

It has also been shown that authorities' performance of their obligations results from inadequate financial resources as well as lack of political will to deal with the problem of sewer and sewage management.

The discussion has also shown that the most affected by this poor implementation of the laws are women due to their perceived traditional gender roles of cleaning the toilets, fetching water, caring for the sick. In the words of Naqui (2012), it is high time the issue of toilets and sewer was taken seriously to address the challenges faced by women. The government of Zimbabwe through the Kadoma Council and Kadoma Agency has a duty both under the various mentioned local instruments as well as international obligations to uphold the people's right to a clean and healthy environment by ensuring sound sewer and sewage management.

6.2 The Way Forward.

Toilets (and sewer) are not a trivial matter. Toilets are a sanitation issue, a health issue, privacy and dignity issue and yes, a gender right issue. It's time we take them seriously (Naqui, 2012)²⁶.

It is hoped that a clean and healthy environment is possible if various players undertake their responsibilities and the interconnectedness and interdependence of this right to other rights is taken seriously. The following short term and long term suggestions are made with the aim of restoring a clean and health environment in Ingezi and Rimuka and reducing the burden poor implementation of sewer and sewage management laws has on women.

6.2.1 Short Term

1. Council and EMA should in corroboration with NGOs working on different aspects of sewer and sewage management in the area, promote peoples' awareness and participation especially that of women in sewer and sewage management decisions and programmes to cultivate the spirit of sense of ownership and responsibility on the toilets and sewer management.
2. Communities should act responsibly towards sewer usage, realising the benefits this has to them as users of the system.

6.2.2 Long Term

3. Develop and implement action oriented plans for sewer and water infrastructure development aimed at prioritisation of sewer and water infrastructure development through development corporation and gender sensitive budgetary allocation.
4. Council and the Agency to implement and enforce the various obligations aimed at improving sewer and sewage management and to cultivate a sense of responsibility but also to ensure the realisation of those rights that are dependent on the environment.
5. Considering that the duties with regard to sewage management are legally recognised and that failure to uphold them leads to breach of rights, communities are encouraged to organise themselves with help of NGOs to take a class action against Council for viola0tion of their rights so as to ensure improved service delivery.

²⁶The words and sewer are my own addition.

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