

204.1 96IT



Report on

**8th ITN
AFRICA
CONFERENCE**

25th - 29th November, 1996

Accra, Ghana

**"PROMOTION
AND
SUSTAINABILITY
OF WATER
AND SANITATION
PROGRAMMES"**

204.1-96IT-13586-2

LIBRARY IFC
PO BOX 1000, 2500 AD THE HAGUE
TEL +31 70 40 64110
FAX +31 70 40 64110

13536-2
204.1 96IT

Contents

1.0 INTRODUCTION.....	1
1.1 STRUCTURE OF THE REPORT	3
2.0 SUMMARY OF CONFERENCE RECOMMENDATIONS	4
2.1 COMMUNITY MANAGEMENT	4
2.2 HYGIENE EDUCATION	5
2.3 WATER SUPPLY	7
2.4 SANITATION	8
2.5 TRAINING AND MATERIALS PRODUCTION.....	9
2.6 COMMUNICATION AND NETWORKING	9
2.7 PRIVATE SECTOR AND HUMAN RESOURCE DEVELOPMENT	10
2.8 GENDER	10
3.0 CONFERENCE EVALUATION.....	12
4.0. DETAILED PROCEEDINGS	13
4.1. OPENING SESSION (CHAIRPERSON: Eugene Larbi)	13
4.2. PLENARY SESSION	14
4.2.1. Community Based, Demand Driven Sector Initiatives :	14
4.2.2. Management of Training for Sustainability of the Water and Sanitation Programmes	15
4.2.3 Hygiene Education And Sustainability of WaterSupply and Sanitation Intervention	16
4.2.4. La Promotion Et La Perennisation Des Programme D'eau Et D'assainment.....	16
4.3. SPECIALIST SESSIONS.....	17
■ THEME i: COMMUNITY MANAGEMENT.....	17
4.3.1. District Management of Water and Sanitation in Ghana : Lessons From the Volta Rural Water Supply and Sanitation Project (VRWSSP)....	17

4.3.2. Building District Ownership and Management of Water and Sanitation Programmes - Approaches and Strategies	18
4.3.3. Commitment of Local Authorities Observations From Some Districts (Local Areas) in Brong Ahafo Region of Ghana	19
4.3.4 Community Water Supply Management in South Africa	20
4.3.5. Impact of Alternative Sanitation on the lives of South African Women.	20
4.3.6 Community Management of Operation and Maintenance: Challenges to Sustainable Water Supply and Sanitation Development	21
4.3.7. Institutional Development of Community Management Groups for Rural Water Supply and Sanitation.	22
■ THEME 2: HYGIENE ISSUES.....	23
4.3.8 Community Based Hygiene and Sanitation: The School As An Entry Point	23
4.3.9. Participatory Hygiene Education. The Community Decides	24
4.3.10. Audience-Based Message Design For Community Hygiene Education: An Experience From The Kumasi Health Education Project, Kumasi.....	25
■ THEME 3: WATER SUPPLY.....	26
4.3.11. Solar Water Pumping - A Reliable Alternative for Water Supply in Peri-Urban Areas of Developing Countries	26
4.3.12. Water Defluoridation.....	26
■ THEME 4: SANITATION.....	28
4.3.13. Sanitation Promotion in Rural and low-income Urban and Peri-Urban Areas - Experiences from Burkina Faso.....	28
4.3.14. An appraisal of Sewerage Maintenance in Ghana.....	28
4.3.15. Community Perception of the Mozambique Sanitation Programme.....	29
4.3.16. Promoting VIP Latrines in Rural Areas.	30

4.3.17 Follow-ups A Necessary Component for the Sustainability of the Latrine Construction Programme. A Case Study in Ashanti Region of Ghana	30
4.3.18. What strategy To Sustain Waste Management In Conakry .. .	30
4.3.19. Promotion of Rural Sanitation in Ghana.The Brong Ahafo	31
4.3.20. Initiative Feminine en matiere d'assainissement et de developpement urbain(Feminine Initiative in Sanitation and Urban Development)	31
■ THEME 5: TRAINING AND MATERIALS PRODUCTION	33
4 3.21. SARAR: The Mistress of Change in Distress: A Case Study on the Sinking Image of the SARAR Participatory Methodology in Ghana	33
4 3.22. Use of Participatory Approaches in Designing Community-Based Water and Sanitation Programmes	34
■ THEME 6: COMMUNICATION & NETWORKING.....	35
4.3 23. Resource Centres As A Key Component For Sustaining Water And Sanitation Programmes	35
■ THEME 7: PRIVATE SECTOR AND HUMAN RESOURCE DEVELOPMENT.....	36
4.3.24. Human Resource Strategies and Critical Problems in Project Implementation for the Sustainability of Water and Sanitation in Ghana	36
4.3.25. Private Sector In Community Water and Sanitation in Ghana: A Case of Partner Organisations in Brong Ahafo Region	37
4.3.26. Micro-project de construction de puisards individuels au profit du comite de salubrité de Mpédina FALLTHIES	37
■ THEME 8: GENDER ISSUES.....	38
4.3.27. Empowerment of Women and the Sustainability of Water and Sanitation Programmes	38
4.3.28. Gender Consideration in Training for Community Management of Water Facilities in the Ashanti Region of Ghana	38
APPENDIX.....	40
LIST OF PARTICIPANTS.....	42
LIST OF PAPERS IN SPECIALIST SESSIONS	49

LIST OF ABBREVIATIONS

- DA:** District Assembly
- DWST:** District Water and Sanitation Team
- RWST:** Regional Water and Sanitation Team
- CWSD:** Community Water and Sanitation Division
- CREPA:** Centre Regional pour l'Eau potable et l'Assainissement
- COM:** Community Ownership and Management
- DANIDA:** Danish International Development Association
- ESA:** External Support Agency
- HRD:** Human Resource Development
- DMC:** District Management Committee
- IGIP:** Ingenieur-Gesellschaft für Internationale Planungsaufgaben mbH
- ITN:** International Training Network Centre
- O & M:** Operation and Maintenance
- VIP:** Ventilated Improved Pit Latrine
- NGO:** Non-Governmental Organisation
- WATSAN:** Water and Sanitation Committee
- PO:** Partner Organisation
- UNDP:** United Nations Development Programme
- TREND:** Training, Research and Networking for Development

1.0 INTRODUCTION

The 8th Africa International Training Network (ITN) Conference, on the theme “*Promotion and Sustainability of Water and Sanitation Programmes*” was held in Accra, Ghana, from November 25-29, 1996. It was hosted by the Training, Research and Networking for Development (TREND) Group, Ghana, in collaboration with the other four ITN Centres in Africa, namely:

- Network for Water and Sanitation (NETWAS), Kenya;
- Centre Regional Pour L'eau Portable Et L'assainissement A Faible Cout (CREPA), Burkina Faso,
- Institute of Water and Sanitation Development (IWSD), Zimbabwe.

The conference also highlighted the involvement of the newly created ITN centre in the Republic of South Africa, National Community Water and Sanitation Training Institute (NCWSI) for the first time.

Fifty-eight (58) participants from Ghana, Kenya, Uganda, South Africa and Guinea attended the 5-day conference. Others came from Zimbabwe, Burkina Faso, Mali, Senegal, Cote d'Ivoire, and The Netherlands. Also in attendance, were representatives from Ghana's Ministry of Works and Housing, Community Water and Sanitation Division (CWSD), Ghana, External Support Agencies (ESAs), and NGOs and international organisations like RWSG, IRC and WUP.

The conference was structured in two parts. The first part comprised plenary sessions, during which four papers were presented. The second part focused on specialist sessions on Community Management, Hygiene Education, Water Supply, Sanitation,

Training and Materials Production, Communication and Networking, Private Sector and Human Resource Development, and Gender Issues which ran concurrently each day. This approach allowed participants to choose from a range of options and decide which ones they would like to sit in.

In addition, field trips were organised on the third day of the conference to two selected rural water and sanitation projects in the Central and Volta Regions of Ghana respectively to give participants a first-hand picture of some of the issues discussed during the conference with reference to the Ghanaian situation

The group that went to the Central Region visited a Rural Water Project financed by the French Government and the Government of Ghana to see community management of water and sanitation that featured a strong involvement of communities in Hand Pump Management. The other group visited the Volta Rural Water Supply and Sanitation Project which is being financed by the Government of Ghana and the Danish Government. The main focus of this trip was to enable participants to see how the concept of Community Ownership and Management is being practised in the communities.

Generally, the conference was well organised and well attended. High quality papers based on the sector experiences were presented and deliberated upon. In his closing remark, Mr. Kiruiku, Executive Director, NETWAS, called on all ITN Centres to adopt the SARAR approach for community management to guide the planning and implementation of water and sanitation programmes in the coming years. SARAR is an acronym for: Self esteem, Associative strength, Resourcefulness, Action planning, Responsibility for action taken.

1.1 STRUCTURE OF THE REPORT

This report is structured in 3 main sections. The first section gives a general introduction to the report whilst section 2 contains a summary (under 8 related themes) of major recommendations of the conference based on papers that were presented and subsequent discussions. Section 3 captures conference proceedings within the framework of plenary and specialist sessions. A brief outline of each paper (including main issues/recommendations arising out of conference deliberations) have also been presented in this section.

2.0 SUMMARY OF CONFERENCE RECOMMENDATIONS

The key recommendations arising from the conference background papers and sessional discussions have been summarised under 8 inter-related themes as follows:

2.1 COMMUNITY MANAGEMENT

The conference lauded the concept of community-managed operation and maintenance (O&M) of water and sanitation facilities as an indispensable strategy for sustainability in the sector. It was noted that effective community-based O&M system is inextricably linked to effective Community Ownership and Management (COM) of facilities. However, COM, and for that matter community-based O&M, have not widely and effectively been operationalised after over a decade of promotion. The conference identified the following problems as militating against the effective and widespread functioning of COM and community-based O&M systems:

- too much emphasis is still put on provision of actual physical facilities as against community animation leading to inadequate sensitisation of beneficiary communities to own, operate, and maintain their own facilities;
- the demand-driven principle for provision of community water and sanitation facilities is often ignored so that facilities provided may not necessarily be the felt need of actual beneficiary communities;
- community-based O&M efforts are often stifled by constraints in the distribution and sale of basic spare parts; and

- women and other minority groups are often not adequately represented on water supply committees.

Issues concerning of a clear definition of the legal status for community based organisations (CBOs) for ‘effective’ ownership and management was also discussed. For instance, does the mere signing of hand-over agreement document between a Project and a CBOs entitle the latter to own and manage the facilities? Or do CBOs have to be legally registered before they can own and manage the facilities?

Conference recommendations which aimed at improving COM and community-based O&M emphasised the following;

- a demand-driven approach in the provision of water supply and sanitation facilities,
- promotion of appropriate technology options;
- effective participation of the private sector, women and other minority groups;
- capacity building and re-orientation of local authorities and water committees, and
- effective collaboration and co-ordination mechanisms among sector institutions at all levels.

It also called for clarification of the legality of the CBOs for greater and sustained community ownership and management.

2.2 HYGIENE EDUCATION

For effective promotion of community-based sanitation and hygiene education, the conference underscored the importance of first cycle institutions as an entry point because children play a major role in acting as agents of behavioural change in the community. However, the

implementation of this strategy has generally been limited because Health and Hygiene Education lessons have so far not been integrated into the schools' core subjects. The content of the existing lessons also lack practical approaches.

To effectively use the school as an entry point for promotion of community-based hygiene education and improved sanitation, the conference recommended the integration of hygiene and sanitation lessons into core subjects of the school curriculum rather than treating them as separate lessons. Also, subjects must have the necessary practical elements that will enable children to practise and become effective agents in the dissemination of health and hygiene messages in communities. Further, for messages to have the desired impact on community members and school children, they must be consistent in terms of scope and content.

To ensure sustainability, regular follow-ups by programme officers as well as the establishment of a lead agency to co-ordinate various hygiene and sanitation related activities were deemed very crucial.

A related subject the conference discussed was the audience-based message design for effective community Hygiene education. The conference noted that even though message design is an important component in communication, target groups are often not actively involved in the design process. This tend to render educational messages socially and culturally irrelevant to the intended target groups as they may not identify with it.

The conference recommended the audience-based approach which is hinged on the premise that the relevance of any message is target-group specific. A step-by-step approach to enhancing technical experts-audience interface in the process of message design was recommended.

2.3 WATER SUPPLY

Drawing on experience from Burkina Faso, the conference noted that solar water pumping technology could be more cost effective in powering water supply systems in peri-urban areas in Africa where power supply from traditional sources is generally unreliable. However, this potential has remained largely untapped. Generally, there is lack of widespread evidence as to the social acceptability of, and the capability of local communities to own and manage the technology. Also, the technology has remained “peripheral” largely because policy makers are not adequately sensitized on its relative costs and benefits.

Given the potential of the solar technology particularly in enhancing peri-urban water supply in Africa, the conference recommended strategies to enhance its widespread utilisation. These include the need for further research to determine community acceptability, capacity for operation and maintenance, training of community-based management committees to run the system, and operation of realistic cost sharing measures to ensure not only affordability but also responsibility for community ownership, operation and maintenance.

Based on a case study of South Africa, the conference discussed also the problems of water de-fluoridation. Excessive fluoride in ground water has been known to be the cause of irreversible dental and crippling fluorosis, and even death. However, known de-fluoridation processes are complicated, expensive, and unsuitable for rural areas. It was recommended that in worst affected areas, surface water, rainwater, and shallow wells (which normally do not have higher levels of fluoride concentration as deep wells) should be vigorously promoted. In addition, research into finding “low cost” methods of water de-fluoridation should be supported by African Governments.

2.4 SANITATION

The conference discussed a number of issues that impinge on effective promotion of sustainable sanitation in rural and low-income urban areas. The key issues as contained in the conference papers and subsequent discussions included participatory communication methodologies, promotion and choice of appropriate technologies, operation and maintenance of sanitation facilities, and cost recovery measures. Main conference recommendations included promotion and application of appropriate participatory methods such as SARAR; structured approach in involving beneficiary communities in the choice of technologies; incorporation of O&M plans in sanitation projects; and intensive user education.

The conference noted that, though, provision of sanitation facilities is a basic necessity, it seems that communities fail to treat it as priority. The main constraints which were identified included infrequent dissemination of information on sanitation at the community level; and promotion of inappropriate technologies.

Other sanitation-related issues discussed at the conference focused on the weak capacity of household latrine artisans due to lack of follow-up training. To solve this problem, it was proposed that planning of all training programmes should, as a necessity, include a follow-up component. A one-on-one coaching should be effected during construction. The conference recommended also that incentive packages should be considered for artisans to keep them on the field, and thereby reduce the high attrition rate.

The role of District Assemblies (Local authorities) as promoters of improved sanitation activities was also discussed. In Ghana, experience has indicated that the District Assemblies have shown low commitment to sanitation development. Most of them have failed to

establish the required District Sanitation Fund, and also lack qualified personnel to constitute the District Water and Sanitation Teams (DWSTs). Even qualified personnel, the Assembly's financial and general support has been rather minimal. The conference recommended that in view of the strategic importance of water and sanitation in rural development, water supply and sanitation components must be incorporated in all district development plans.

The conference also recommended the development of working partnerships between NGOs and local government structures for the effective promotion of sanitation in peri-urban areas.

2.5 TRAINING AND MATERIALS PRODUCTION

The conference underscored the importance of participatory approaches in training and material production processes in order to enhance effective community participation. The use of participatory tools in the design of community water and sanitation programmes allow beneficiary self-assessment and action. Experience shows that conventional didactic training methods are still widely used in community water and sanitation programmes despite increased efforts towards the promotion and use of participatory methodologies in the sector. The conference recommended the use of traditional forms of communication such as stories, dance forms, and pictures in training and materials production in order to ensure maximum community involvement in planning and implementation of water and sanitation facilities.

2.6 COMMUNICATION AND NETWORKING

In line with the decentralisation processes currently taking place in most developing countries, the conference discussed the need for the establishment of District Resource Centres to document research findings in the sector.

2.7 PRIVATE SECTOR AND HUMAN RESOURCE DEVELOPMENT

Using the case of Partner Organisations (POs) - community based organisations NGO's contracted to provide extension services in the water and sanitation sector in Ghana, the conference lauded the important role of non-governmental organisations in the water and sanitation sector. Usually, the POs are locally based NGOs which help communities in planning, implementation, operation and maintenance of facilities, and training. Their activities are intended to raise community awareness and confidence in development planning and action. However, field experience shows mixed results regarding the effectiveness of POs because their capacity is weak

Conference recommendations focused on strategies for building the capacity of private sector support institutions by way of funding and training programmes.

Human Resource Development issues within the water and sanitation sector were also discussed based on a paper which elucidated HRD problems in the Community Water and Sanitation Division in Ghana. The main problems which were identified included inadequate technical and managerial skills for staff, unclear motivation/incentive schemes, lack of gender development strategy, and inadequate information flow.

Conference recommendations included the need to comprehensively investigate specific human resource development problems, preparation of strategic HRD plans and implementation procedures including training and effective information flow.

2.8 GENDER

Among other things, the Sector strategy in Ghana emphasises the sustainability of water and sanitation facilities through the active

involvement of women at all stages. Though women have had little say in the provision and management of community water and sanitation facilities, the conference recognised and reiterated the important traditional role of women in locating, fetching, transporting, and storing of water for domestic use, and in refuse and sewage disposal. Thus, naturally, women tend to have a far greater motivation in keeping water and sanitation facilities. However, women are less empowered due to age-old deprivation and marginalisation from active participation in planning and management of community water and sanitation systems.

The conference recommended participatory training programmes targeting both men and women at the community level where care should be taken to explain the crucial role of women in project planning and management. However, cautioned was made that this should be approached with circumspection in order to avoid undue imbalances in the social structure.

3.0 CONFERENCE EVALUATION

The main comments from participants by way of post-conference evaluation indicated a fairly high level of participant satisfaction, though useful suggestions were made regarding what could be improved upon in future conferences. The participants' responses on the conference evaluation are summarised below:

i. What Participants liked about the Conference :

- Conference was well organised;
- Fairly fruitful discussions with each other;
- Very interesting, exciting, and fruitful field trips;
- Enjoyed good food and hotel accommodation;
- Appropriate Conference theme and presentation of good quality papers;
- Excellent technical support and secretarial back-up; and
- Good simultaneous translation.

ii. What could be improved upon next time:

- Too many papers were presented. Number of papers should be minimised in future conferences in order to allow for more in-depth deliberations,
- Opportunity for a participant to choose hotel accommodation of his/her preference should be considered, and
- Chairpersons should be more time conscious

4.0. DETAILED PROCEEDINGS

4.1 OPENING SESSION (CHAIRPERSON: Eugene Larbi)

a. Welcome Address

by Mr Eugene Larbi, Managing Director, TREND

Mr. Eugene Larbi, Managing Director, TREND, welcomed participants. He traced the genesis of the International Training Network programme.

He enumerated the ITN centres as follows: Network on Water and Sanitation(NETWAS), Kenya 1986; CREPA, Burkina Faso 1987; IWSD, Zimbabwe 1989; TCWS, South Africa and TREND 1989.

He mentioned that all the ITN centres have acquired skills in the training of sector personnel, promotion of low-cost technology through the exchange of information, skills, knowledge, technologies and research as well as advisory services. He pointed out that, the aim of the ITN annual meetings are to share ideas and experiences through annual meetings He wished all participants fruitful deliberations and a happy stay.

b. Address By Head of CWSD

By Mr. P.O. Sackey, Deputy Managing Director, Community Water and Sanitation Division of the Ghana Water and Sewerage Corporation.

Mr. P. O. Sackey, Deputy Managing Director, Community Water and Sanitation Division of the Ghana Water and Sewerage Corporation, acknowledged the positive role and achievements of TREND (ITN, Ghana) in the preparation and implementation of Ghana's National Community Water and Sanitation Programme and in the Sector as a whole. He, however, urged TREND to assist in the training of middle level personnel in low-cost water and sanitation technology at the tertiary educational levels to pursue applied research

c. Keynote Address

by Deputy Minister of Works and Housing (Ghana).

In a key note address read on his behalf, the Deputy Minister of Works and Housing in Ghana, stressed the need for African Governments to address the issue of inadequate water and sanitation facilities for deprived rural and peri-urban communities. He called for the inclusion of attractive incentives and promotional packages in Community Water and Sanitation programmes on the continent in order to attract and facilitate the involvement of communities in its implementation. He wished participants lively discussions.

4.2 PLENARY SESSION

The following four (4) papers were presented during the Plenary session. The proceedings have been summarised as follows:

4.2.1. Community Based, Demand Driven Sector Initiatives : How Sustainable Can They Be.

By Graham Jones, Project Leader, IGIP,

F. M. Dotse, Project Co-ordinator, IGIP; and Claus Riexinger.

This paper acknowledged that community ownership and management in the provision of water and sanitation facilities is a sure way of ensuring that the facilities provided will be sustained. It nevertheless, raised questions about how the design of projects, the limitations of flexibility in financing and implementing agencies, and the lack of resources in institutional support structures pose a threat to the long term sustainability of these initiatives.

Particularly, the authors wondered if community ownership and operational responsibility (a measure of commitment), which does not emanate from the community themselves, but generated from

government policy will last in the longer term . They argued in favour of flexibility in implementation, especially in the formation of WATSAN committees that will allow communities to propose alternatives from within their formal or informal structures.

In the area of technology, the Paper recommended that the choice of proposed technologies should ensure easy access to spare parts to the extent that a reasonable market is created for private sector involvement.

4.2.2 Management Training For Sustainability of Water And Sanitation Programmes.

By Dr. Davies Cole Abimbola, NETWAS, Kenya

This Paper sought to emphasise the importance of management training in achieving sustainability in the water and sanitation sector. The presenter mentioned the need to encourage and attract more women to training sessions, bearing in mind their crucial role in ensuring sustainability of supply and sanitation facilities. In this regard, sensitization of both men and women on the role of the latter should be vigorously pursued. In the area of curriculum development , there was a recommendation for the inclusion of topics on conflict management and social marketing. Certification was also mentioned as an incentive and motivation for trainees attending training programmes.

Dr. Abimbola in responding to a question on how the project motivated and retained committee members, especially women after training, indicated that there was a lot of community sensitization . Moreover, the project organized field trips to other projects and this motivated the trainees to put in their best

4.2.3 Hygiene Education And Sustainability of Water Supply and Sanitation Interventions.

By Tom Kayamba Mwebesa, Ministry of Health, Uganda

The Paper highlighted the very strong, positive relationship between hygiene education and sustainability of water and sanitation interventions.

The presenter called for the active involvement of women in hygiene education programme, but not without the due consideration to cultural and social norms since these can adversely affect women's involvement. In the light of the foregoing, a recommendation was made for communities, to accept and encourage the nomination of women as pump mechanics

During discussion, participants wanted to know how Uganda , a landlocked country, approached and formulated policies on water resource management with its neighbours. The response was that an International Resource Management Committee had been established to manage the Nile River Basin

4.2.4. La Promotion Et La Perennisation Des Programme D'eau Et D'assainment.

By Alwata Icha Sahu - COFESFA, Mali.

This Paper focused on the strategies for the sustainability of water and sanitation programmes. Relying on the experience from Mali, the presenter called for the need to ensure efficient revenue collection in the operation of water and sanitation systems through the recruitment of committed and dedicated revenue collection staff.

The presenter drew attention to the fact that any attempt to replicate a latrine project in rural areas should critically consider the technology option as well as the people's ability and willingness to pay.

4.3. SPECIALIST SESSIONS.

In view of the many papers submitted for presentation, the rest of the conference proceedings were divided into a number of specialist sessions which ran concurrently. Discussions of the papers are presented below under different themes ie. community management, hygiene issues, water and sanitation, and training and materials production.

■ THEME 1: COMMUNITY MANAGEMENT.

The following seven (7) papers were presented in this session:

4.3.1. District Management of Water and Sanitation in Ghana : Lessons From the Volta Rural Water Supply and Sanitation Project (VRWSSP). VV

By Emmanuel D. K. Fiagbey, Ghana

The Paper traced the efforts made by the VRWSS Project in Ghana to strengthen and gain the commitment of district level structures such as the District Management Committees (DMCs), which is a sub-committee of the District Assemblies tasked with the responsibility for water and sanitation activities. This Committee has become an important link between the Project Office and the District Assembly, and has played an important role in ensuring district ownership and management.

Participants wanted to know from the presenter, what was being done to ensure that the capacity building of the District Project Officers was transferred to the DWSTs when the project wound up. The response was that, the project was going to support the District Assemblies financially and technically through the DWSTs who will be employed by the Assemblies. On whether every project in the district should set its own DMC for water and sanitation projects,

it was recommended that all such projects in the district should work through the same DMCs.

4.3.2. Building District Ownership and Management of Water and Sanitation Programmes - Approaches and Strategies.

By Anthony Batse, Ghana.

This paper discussed how the Community Water and Sanitation Programme in Ghana could utilise the District Assembly structure to tackle the issue of ownership and management of the project.

On the need for District Ownership and Management (DOM), the presenter said DOM is crucial in ensuring sustainability. However, there has been an initial lack of commitment by the District Assemblies to water and sanitation issues which he attributed to the historic top-down delivery of projects, direct or indirect imposition of projects rather than facilitation; and the setting up of different institutional structures. Participants again wanted to know how the building of capacity for district ownership and management could be effectively carried out and be sustained. The project, it was explained, must find out the District Assembly's conception of water and sanitation problems, their effort to solve them and how the community water and sanitation programme could assist. Training must necessarily form part of project's drive for capacity-building for sustainability.

4.3.3. Commitment of Local Authorities: Observations From Some Districts (Local Areas) in Brong Ahafo Region of Ghana.

By Kwesi Dadie-Amoah, Ghana.

District assemblies under the Ghana National Community Water and Sanitation Programme must be committed to establishing District Water and Sanitation Teams (DWSTs) by providing office space, establishing sanitation fund for construction of household latrines, and allocation of operating budget for the DWSTs.

This Paper made an assessment of the level of commitment shown by the Local Authorities or the District Assemblies in meeting certain basic conditions for participation in the National Community Water and Sanitation Programme - an important indicator of sustainability of programmes in the sector.

The author argued that the District Assemblies (DAs) have been quite slow in responding to the Ghana National Community Water and Sanitation Programme due to low priority the assembly places on the programme.

Local Authorities must therefore see the need for water and sanitation programmes in their communities, and make the effort to support, sustain and get committed to it. The paper recommends RWSTs and DWSTs to be signatories to the Sanitation fund in order to avoid misappropriation. Another recommendation was that DAs be re-oriented to recognise the importance of supporting the DWSTs by way of finance and logistics

4.3.4 Community Water Supply Management in South Africa .

By Grace Nkambule, South Africa

The Paper gave an overview of community water supply management in South Africa in a post -apartheid era. The involvement of the community members in the planning, design and implementation of water projects, within a decentralised institutional structure is therefore expected to engender commitment and sustainability. There is, however, the need for training and capacity building on a continuous basis.

A participant inquired from Mrs. Nkambule whether the new management of the water and sanitation sector under the National Government finds the need to form Water committees to demonstrate the concept of community ownership and management. The response was in the positive. The presenter said modalities and plans on the selection process for water Committees were being addressed. The need to build the capacity of the committees to enable them sustain the projects was stressed, and it was recommended that government institutions should assist in the training of committees.

4.3.5. Impact of Alternative Sanitation on the lives of South African Women.

By Nhlamla Mjoli-Mncube, South Africa

The presenter sought to draw attention to the need to take socio-cultural factors, especially those affecting women, into consideration in the design of sanitation facilities. She argued that technology, perceived to be gender neutral, and therefore chosen without the active involvement of all beneficiaries, can have negative impacts on one gender type.

The case of a sanitation system for Soshanguve, a township outside Pretoria, South Africa was cited to illustrate this point. The paper consequently recommended the active involvement of women at all stages of the project cycle.

On what has been the impact of the study on policy and decision making on sanitation, Ms. Mjoli-Mncube believed that policy makers will now implement policies that will aim at providing appropriate services to the communities. As to why the planning of the new sanitation project could not be linked to the existing sanitation infrastructure to reduce cost, the response was that the old sewerage could not accommodate the existing population of Soshanguve. She however explained that a project for providing enough sewerage pits for all was being implemented.

4.3.6. Community Management of Operation and Maintenance: Challenges to Sustainable Water Supply and Sanitation Development.

By F.K Kwadzokpo, VRWSSP, Ghana

Drawing on the experience from the DANIDA-funded Volta Rural Water Supply and Sanitation Project (VRWSSP) in Ghana, the presenter lauded the idea of building local capacity in the area of operation and maintenance, thus shifting emphasis from Central Agencies and the National Government to community members, to ensure sustainability in the provision of services. Problems like inadequate training for community members and the lack of spare parts, among others, were however identified as militating against the idea of community managed operation and maintenance.

Specific recommendations included the training of community members in all aspects of the project, ensuring adequate supply of

spare parts, and the continuous sensitization of community members on the need to make money or in-kind contribution to water and sanitation investments.

4.3.7. Institutional Development of Community Management Groups for Rural Water Supply and Sanitation.

By Lars Karlen, RWSG, Kenya

This paper traces the history of rural water supply and sanitation in Kenya, from a supply-driven perspective to the current demand-driven one with emphasis on community management of the systems covering the day-to-day operation and maintenance functions. Communities and beneficiaries have therefore taken active part in all aspects of the project, i.e. initiation, design, implementation, maintenance, supervision, monitoring and evaluation.

In Kenya, however, the operations of community based-organisations which are, and will be, the effective vehicle for increased community management and sustainability, must take place within the country's legal and administrative structure. In actual fact, all organised groups must be officially approved and registered under the Ministry of Culture or the Societies, among others.

The author asked whether or not communities which sign hand-over agreements have the authority and control of facilities; without the legal rights and recognition from the appropriate government quarters. He, therefore, called for the clarification of the issue, in order to enhance the concept of community management in rural water and sanitation projects for the achievement of sustainability.

■ THEME 2: HYGIENE ISSUES

In this session the following three (3) papers, were presented.

4.3.8. Community Based Hygiene and Sanitation : The School As An Entry Point.

By Alberta Nyarko, VRRWSP, Ghana

The Paper made a strong case for the use of the schools for hygiene education and hygiene information dissemination at the community level, with the actual agents being the school children. But the effective implementation of this strategy would require the inclusion into the school's core subjects, issues on health and hygiene education. Moreover, all efforts at achieving the desired goal must be coordinated by one lead agency.

In an answer to a question on how the Project ensures strong child-to-parent interaction, it was explained that the messages that are given to the schools are also given to the school children in the form of assignments. These assignments are expected to be done at home (under the direct or indirect supervision of parents) and submitted for discussion the following day. Teachers also follow up on the children in their homes to find out what they are doing.

In response to how often the School Health committee meet, it was pointed out that, they meet once in two weeks and their activities are funded by the School Development Fund, Parent Teachers Association dues (P.T.A) as well as donations from sympathetic parents. The programme is also part of the school curriculum. As to whether the programme could be implemented outside the school environment and whose responsibility it will be, the answer was that there was a poor institutional framework in the Environmental Health Division of the Ministry of Health, Ghana, to take this initiative.

In defining the characteristics of a school, and what attracts schools to the programme, the presenter said, it had to be an institution recognized by the Ministry of Education and headed by a qualified Head teacher. She said the Head Teacher is the one who requests for the programme on behalf of the school.

4.3.9. Participatory Hygiene Education: The Community Decides.

By Alberta Nyarko, VRRWSP

This Paper focused on the involvement of community members in hygiene education delivery with the aim of building their confidence and skills to identify, analyze and plan an action towards the solution of the problems. This will necessarily require the use of a wide range of participatory methodologies supported by visual aids. In addition, the formation of the water and sanitation committees is recommended for the coordination and implementation of the hygiene education plans at the community level.

Participants wanted to know how the enthusiasm of the Committee members are sustained and who guides and monitors them. The response was that members of the District Health Management Committee assist in this wise but the implementers at the village level are volunteers. The only incentive for the latter is training and capacity building. The capacity of the District and Sub-Health Teams are also developed and it is expected that Environmental Health Assistants will continue to support the process for a long time.

On whether to adopt the term “Health” or “Hygiene” Education for water and sanitation programmes, the presenter recommended the use of ‘hygiene education’ because it is concerned with the prevention of diseases related to water and sanitation.

4.3.10. Audience-Based Message Design For Community Hygiene Education: An Experience From The Kumasi Health Education Project, Kumasi.

By Solomon Panford, TREND, Kumasi.

The Paper underscored the importance of involving the community in the design of hygiene education messages. It thus recommended a sequence of activities to be followed to achieve the goal of active community involvement.

Participants wanted to know from Mr. Panford when guidelines will be in place to facilitate the use of pictures in Hygiene Education. The response was that, though a guideline could be in place, facilitators should use their ingenuity and discretion to lead a picture discussion. On how to conduct pre-testing, it was replied that, pre-testing should be done by professionals and artists in the community and also with the local people to find out whether the pictures/messages were understood and were relevant to the community's situation. Participants wanted to know the mode of selection of participants in 'idea development' workshops.

The response was that it depended on the topic in question. People with technical knowledge on the topic could be invited together with selected representatives from identifiable groups within the community, to sit with community artists to develop ideas reflecting problems on the ground.

■ THEME 3 : WATER SUPPLY

In this session, the following two papers were presented follows:

4.3.11. Solar Water Pumping : A Reliable Alternative for Water Supply in Peri-Urban Areas of Developing Countries:

By Mahamadou Tounkara, BurkinaFaso.

The paper discussed the relative advantage of African countries to employ solar powered systems to run water points effectively. Focusing on a project from Burkina Faso, the presenter said that a study had shown that solar-powered water systems are more cost effective than the known alternatives.

Participants asked the presenter, why African Governments were still relying on traditional energy sources, in spite of the cost effectiveness of solar energy.

He indicated that, there seems to be little sensitization on the benefits of solar energy and there is the need to increase the knowledge and awareness of policy makers on that option. On the question of whether evaluation of cost effectiveness of solar pumping takes into consideration operation and maintenance cost, the response was in the affirmative. He said that the cost had been taken into consideration and that there is a contract between the Water Management and a private firm to maintain the system.

4.3.12. Water Defluoridation.

By Mapula Lebone & J Schoeman, South Africa

This presentation from South Africa dwelt on the contamination of underground water with fluoride, its effect on people and how it could be removed.

During discussions, participants wanted to know whether the Minister responsible for Water Affairs in South Africa was aware of the fluoridation problem, and what steps she was taking to solve the problem. The presenter answered in the affirmative, saying the Minister was involved in finding solutions to it through public education and other strategies. On what were the cause(s) of high fluoride concentration, it was explained to be a natural geological cause. Also, fluoride appears in rocks as part of volcanic activity.

Participants wanted to know the source of water for communities affected by fluoride, and the role of tooth paste manufacturers in the reduction of the problem. The response was that, their main source of water is underground water. Participants were assured that discussions were being initiated with tooth paste manufacturing companies to sponsor some of the defluoridation projects in the area. On the effects of high fluoride to the human body, the reply was that, it causes human and animal bones to be soft.

On the need to educate the population on the long term effect of high fluoride concentration in water and its negative effect, the response was that a Committee of Dental Experts had been formed to educate people about the dangers of high quantities of fluoride. In addition, the dangers were also made known to communities through radio broadcasts on health programmes and through community extension agents (community health workers, nutritionist, public health workers assistance at the grass root). It was revealed that this has been successful particularly in Kenya.)

■ THEME 4: SANITATION

During this session, the following eight (8) papers were presented:

4.3.13 Sanitation Promotion in Rural and low-income Urban and Peri-Urban Areas - Experiences from Burkina Faso.

By Tandia Cheich Tidiane & Tounkara Mahamadou, Burkina Faso.

The paper identified some critical issues that need the attention of Sector practitioners and policy makers if the promotion of sanitation in rural and low-income areas is to be effective and sustainable.

These included issues such as the use of participatory methods e.g. SARAR, the involvement of community members in the choice of technologies, among others.

4.3.14. An appraisal of Sewerage Maintenance in Ghana.

By Lukman Y. Sulifu Ghana.

Writing from the Ghanaian perspective, the presenter identified the failure of commercial water-borne sewerage systems in Ghana, which he attributed to high cost of operation and maintenance. On how effectively sewerage maintenance in Ghana can be carried out, the presenter suggested a simplified sewerage system at a least cost for high population areas, and a responsive operations and management scheme to be put in place involving all stakeholders in the community.

4.3.15. Community Perception of the Mozambique Sanitation Programme.

By Dave Proudfoot, Zimbabwe

This paper focused mainly on a study conducted in Mozambique to find out beneficiaries perception on the introduction of improved pit latrine in terms of success in the reduction of health diseases. The following issues were stressed:

- The need to include research on the impact of projects on the beneficiary communities, results of which could guide the replication of future projects;
- Training of community members should be a necessary part of all projects; and
- Suitable and appropriate technologies for the different and varied socio-cultural systems should be developed and adopted.

4.3.16. Promoting VIP Latrines in Rural Areas.

By Nu Odaɪ Laryea, Ghana.

This paper discussed some problems that have been identified with the promotion of VIP latrines in rural communities in Ghana. Despite its advantages over other excreta disposal facilities, skepticism over its design and other misgivings mainly social, have prevented its immediate and wide adoption among rural communities. Other problems militating against the effective promotion of the VIP latrines included lack of funds on the part of the target group to patronize the facilities, withering of communal spirit towards the project and the insecurity of jobs on the part of trained artisans. The presenter, however, said that strategies and approaches were being formulated and adopted to improve upon the situation. Some of these included special packages for the first five people to apply for the

VIP, job creation for artisans through the construction of VIPs, and the use of educational and socio-cultural approaches in marketing the facility.

4.3.17. Follow-ups : A Necessary Component for the Sustainability of the Latrine Construction Programme. A case study in Ashanti Region of Ghana.

By Amadeus Mensah Akorli, TREND, Ghana.

In his paper, Mr. Akorli emphasized the need for follow-up training as a means to achieving sustainability in latrine construction, and in the promotion of household latrines as a whole. Besides this, other issues such as the timely release of latrine construction subsidies by the District Assemblies and an incentives package for the artisans were considered crucial in reducing the high attrition rate among trained artisans. The adoption of new community entry approaches was also recommended; and a well elaborated training programme for artisans was also discussed.

4.3.18. What strategy To Sustain Waste Management In Conakry.

By Daouda Camara, Guinea

This paper considered the issue of waste management in Conakry, the capital of Guinea. The presenter deplored the current situation of unsatisfactory waste management and partly attributed this to the inefficient operation of small and medium scale enterprises charged with this responsibility. Consequently, there was a call for injecting efficiency into the operations of all the enterprises engaged in waste management. Other recommendations made were the procure-

ment of more efficient equipment as well as the review of service charges .

4.3.19 Promotion of Rural Sanitation in Ghana; The Brong Ahafo Experience.

By Fati Mumuni, Ghana.

This paper assessed the successes and failures of the implementation of the sanitation component of the Community Water and Sanitation Programme in Ghana, using a case study from one region.

During discussions, a participant suggested that the composition of District Water and Sanitation Teams be headed by a District/Local Government official for accountability and overall supervision. On what steps to take to abate the fear of pollution of nearby wells by latrines in the villages, it was suggested that, in future, a pit-latrine should be 30 meters away from a well.

On a question of how to ensure the use of the sanitation fund for its intended purpose, it was explained that, the Regional Water and Sanitation Team could only advise, but not dictate or enforce the utilisation of the fund for its intended purpose. Participants unanimously agreed that, the sanitation component of the programme should be given the needed attention by all players within the sector in Ghana.

4.3.20. Initiative Feminine en matiere d'assainissement et de developpement urbain(Feminine Initiative in Sanitation and Urban Development)

By Mme Camara Kama Salihba.

This paper discussed how female graduates took up the challenge in employment creation by constituting themselves into COFESFA, a

private enterprise working in the area of garbage collection, public latrines construction/management and promotion of garbage recycling.

This initiative was started as an intervention in the insanitary conditions (resulting from inadequate latrines and general unhygienic conditions) prevalent at the Bus Stop, a fast growing commercial centre in Bamako, Mali. The District Authority had already built some blocks of latrines, but the absence of a body to efficiently manage the facility on business lines, coupled with the small number of the latrine in the face of increasing population, led to the deterioration of sanitary conditions in the suburb.

In collaboration with CREPA, CONFESFA built more latrines at the Bus Stop and constituted special teams to see to the management of the facility. This new system of latrine management involves the payment of a token fee by users.

Other distinguishing features of the latrine management involves the following:

- Opening of a joint bank account in the name of CONFESFA and CREPA. About 30% of the daily income from the use of the latrines is deposited in this account.
- About 20% of the income is used to finance operation and maintenance activities.
- The remaining 50% is used as remuneration for the working team.

In conclusion the author recommended the replication of this initiative in urban centres of Africa. She, however, stressed the need to consider all the factors for successful implementation, including the active involvement of the Local Government structures.

■ THEME 5: TRAINING AND MATERIALS PRODUCTION

The following 2 were papers presented under this session

4.3.21. SARAR: The Mistress of Change in Distress: A Case Study on the Sinking Image of the SARAR Participatory Methodology in Ghana.

Mr. Oliver Frimpong, TREND, Ghana.

In the quest for effective community participation in project planning, design and implementation, there has been a corresponding increase in the search for appropriate participatory tools. In this vein, the SARAR participatory technique was first introduced in Ghana in the 1990s specifically to the staff of the TNC (now TREND) by a PROWESS external consultant. When appropriately adapted to the community socio-economic and cultural milieu, the SARAR methodology has an immense potential in improving participatory community project information gathering, analysis, planning, implementation, and evaluation.

Though the technique has been field-tested and found to be effective, its scale of popularity and use has reduced considerably. The author attributes this situation to the failure of trainers to sharpen their imaginative and creative skills, inadequate training for trainers in the application of the methodology, and the tendency of trainers to overuse verbal communication instead of simple task-based communication modes.

The paper makes recommendations which aim at “resurrecting” the SARAR methodology in community management efforts in Ghana.

4.3.22. Use of Participatory Approaches in Designing Community-Based Water and Sanitation Programmes.

By K. O. Donkor, Ghana

A growing awareness of the failures of conventional “top-down” development approaches in meeting the needs of poor communities has led to the exploration of alternative approaches to assist communities in finding effective solutions to their development problems. The author hypothesised that the greatest challenge facing development planners and practitioners is how to use appropriate methodologies to clearly understand community perception and needs in order to make development processes more community based and sustainable. Based on experiences in two rural communities in Ghana (Asesewa and Bawjiase), the author illustrates the feasibility of using participatory processes to collect basic community information and collectively define community development perceptions, needs, and priorities.

Subsequent deliberations on the presentation emphasised the importance of utilising relevant complementary aids such as visual aids, role playing, story telling and songs in participatory methodologies.

■ THEME 6: COMMUNICATION & NETWORKING

One paper as captioned below was presented under this theme.

4.3.23. Resource Centres As A Key Component For Sustaining Water And Sanitation Programmes.

By Eric Baah, Ghana.

In view of the decentralisation policy underlying the Sector strategy, the paper argues for the establishment of district resource centres to serve as documentation and materials bank for community level workers in the water and sanitation sector. This will enhance information gathering and use at the local level.

During deliberations, the conference recommended effective collaboration among donors, District Assemblies, and other local bodies. In the area of capacity building to support the project, it was indicated that, not much training will be required but a general orientation will be appropriate. It was suggested that the Water Resource Centres should liaise with other institutions which produce such materials and build District Information and Documentation Centre in each district.

A participant expressed the need for a thorough demand and need assessment to be carried out before projects take off. Again, the delivery mechanism of the centre and the marketing of its products should be considered.

■ THEME 7 : PRIVATE SECTOR AND HUMAN RESOURCE DEVELOPMENT

The following three papers were presented under this theme:

4.3.24. Human Resource Strategies and Critical Problems in Project Implementation for the Sustainability of Water and Sanitation in Ghana.

By Boniface Gambilla, TREND, Ghana.

The role of human resource development (HRD) is crucial for sustainability of sector programmes. Most organisations are characterised by inadequate technical and managerial skills for staff, unclear motivation/incentive schemes, lack of gender development strategy, and inadequate information flow. HRD aims at developing quality manpower to solve problems and provide leadership.

The paper outlined problems that tend to militate against the implementation of HRD projects.

HRD issues within the water and sanitation sector were discussed by the conference based on above paper which elucidated HRD problems in the Community Water and Sanitation Division in Ghana in which capacity building is being provided by TREND and funding provided by the Central Government and donors.

Conference recommendations included the need to comprehensively investigate specific human resource development problems, preparation of strategic HRD plans and implementation procedures including training and effective information flow.

4.3.25. Private Sector In Community Water and Sanitation in Ghana: A Case of Partner Organisations in Brong Ahafo Region.

By Kwame Frempah -Yeboah, Ghana

Partner Organisations (POs) are locally based NGOs which are contracted to help communities in planning, implementation, operation and maintenance of facilities, and training. Their activities are intended to raise community awareness and confidence in development planning and action. However, field experience shows mixed results regarding the effectiveness of POs because of their weak capacity.

Conference recommendations focused on strategies for building the capacity of private sector support institutions by way of funding and training programmes.

4.3.26. Micro-project de construction de puisards individuels au profit du comite de salubrité de Mpina FALLTHIES.

By Ndiogou Niang

Using the case study of a micro project on household water supply system for a peri-urban area in Senegal, the author emphasised the need to build the capacity of local institutions such as a Health Committees for effective and efficient operation and maintenance of the systems. To this end, there was a call for closer supervision of the work of such committees, as well as their training in technical issues to handle the recurrent problems of pipe leakage

■ THEME 8 : GENDER ISSUES

In this session the following two papers were presented:

4.3.27. Empowerment of Women and the Sustainability of Water and Sanitation Programmes.

By Edward Kweku Eson Thompson, Ghana.

Though women have had little say in provision and management of community water and sanitation facilities, the conference recognised and reiterated the important traditional role of women in locating, fetching, transporting, and storing water for domestic use, and in refuse and sewage disposal. Thus, naturally, women tend to have far greater motivation in keeping water and sanitation facilities. However, women are less empowered due to age-old deprivation and marginalisation from active participation in planning and management of community water and sanitation systems.

The paper recommends participatory training programmes targeting both men and women at the community level where care should be taken to explain the crucial role of women in project planning and management. The conference cautioned however, that, this should be approached with all circumspection in order to avoid undue imbalances in the social structure.

4.3.28. Gender Consideration in Training for Community Management of Water Facilities in the Ashanti Region of Ghana.

By Jesse Sena Kuma, Ghana

This paper drew attention to the need for gender considerations in training for effective community management of water and sanitation projects.

The main aim of the paper was in two parts.

- To generate discussion on the training approaches at the community level in water and sanitation, and
- Make gender part of the agenda for the sustainability of a programme in which more women than men will manage facilities.

The presenter mentioned that awareness creation on the crucial role of women is an on-going effort targeted at both gender types. Women's representation on the WATSAN committee was cited as one tangible way of ensuring their active involvement. It was, however, revealed that a 50% representation of women on the committee is not easy to achieve. All participants agreed that convenient times be chosen for all training programmes involving women to ensure their participation and contribution

APPENDIX

LIST OF PARTICIPANTS

Mr. Proudfoot Dave
Manager, Training
IWSD, Box MP 422, Mt Pleasant,
Harare, Zimbabwe
Tel. (263-4)303288/9
Fax: (263-4)303280

Paper
Community Perceptions of the Mozambique (Im-
proved Latrine) Sanitation Programme
Author: D A Proudfoot

Tom Kayamba Mwebesa
Asst. Comm. of Health Services
Environmental Health Division
Ministry of Health
P O Box 8
Entebbe-Uganda
Tel 256-42-20059
Fax 256-42-20575

Paper
Hygiene Education and Sustainability of WSS In-
terventions
Author Tom Kayamba Mwebesa

Kwadzokpo, Festus K.
Training/Mgt Officer
VRWSSP
P O. Box 508, Ho
Tel: 091-8189
Fax 091-8266

Paper
Community Management of operation and main-
tenance Challenges to sustainable water & sani-
tation devt.
Author Festus Kwame Kwadzokpo

Mrs. Mapula Lebone
WNNR, CSIR
Tel 012-841-2842
Fax: 012-841-4785

Paper
Water Defluoridation
Authors J J Schoeman & M Lebone

Japie J Schoeman (Dr)
CSIR-Rsa
P O Box 395
Pretoria
Tel 012-841-2272
Fax: 012-841-4785

Dr. Davies-Cole, Abimbola
Program Officer (Technical Training)

Network for Water & Sanitation
International (Netwas International)
P O Box 15614, Nairobi, Kenya
Tel 254-2-890555/9
Fax. 890554

Paper
Management Training For Sustainability of Wa-
ter and Sanitation Programmes
Author: Dr Abimbola Davies-Cole

Mme. Camara Kama Sakiliba
COFESFA/SOGONIKO,
Bamako - B.P 9977
Tel 99-91-97
Fax 99-07-50

Paper
Initiative Feminine en Matière d'assai-
nissement et de développement urbain.
Author Mme Konatou Aminata Diarra

Graham Jones
Project Leader
IGIP Consulting Engineers
PMB, Kotoka Airport - Accra
Tel: 760071/760931
Fax. 760931

Paper
Community Based, Demand Driven Sector
Initiatives How Sustainable can they be?
Author: F Mawuena Dotse,
Claus RieXinger & Graham Jones

Mr. K. Oduro Donkor
Technical Support Manager
PRONET
PMB, Airport, Accra
Tel.
The Use of Participatory Approaches in de-
signing community based water and sanitation
programmes
Author: K Oduro Donkor

Mr. Ndiogou Niang
Coordinator
CREPA-Senegal
P. O Box 2041
Dakar
Tel 322997/324279
Fax 323373

Paper
Micro-projet de construction de puisards
individuels au profit du comit  de salubrit 
de M dina FALL-THIES
Auteur Ndiogou Niang

Mrs. Palesa Mathato
Mofosi
NRSP Coordinator
NRSP
MOH Box 514

Maseru, Lesotho
Tel 09266311547
Fax:

Mrs. Mamonaheng Ramonaheng
Urban Sanitation Coordinator
Urban Sanitation Improvement Team
PIBAG A661
Maseru 100, Lesotho
Tel 09266 324356

Emmanuel Flagbey
Training Advisor
VRWSSP/DANIDA
P O. box 508,
Ho
Tel. 091-8189
Fax 091-8266

Paper
District level management of water supply and
sanitation in Ghana
Author Emmi Flagbey

Mr. Nii Odai Laryea
Ag Project Coordinator
UNDP/GWSC Rural Water Supply
& Sanitation Project
P O Box 1617, Koforidua, Ghana
Tel 081-22515
Fax c/o 081-23332

Paper
Promoting VIPs in rural communities
Author Nii Odai Laryea

Ms. Mavis M. Lapholo,
Community Liaison Engineer

Alberta A Nyako
Health & Hygiene Specialist
Volta RWSS Project, Ho, Ghana
Box 508, Ho
Tel 091-8189
Fax 091-8266

Papers

- 1 Community based Hygiene and Sanitation The school As An Entry Point
- 2 Participatory Hygiene Education The Community Decides

Mrs Grace Nkambule
Manager
Northern Transvaal Water
P/Bag x104,
Haerensburg 0730
Tel 0152764200/1
Fax 0152764200/1

Paper

Community Water Supply Management
Author. Mrs G Nkambule

Mme Sakubhata Sahi
Presidente de la Cafesfa
COFESFA
B P 2977
Tel 223-229127
Fax. c/oFNUAP 220750

Paper

La Promotion et la perennisation des programmes
d'eau et d'assainissement

Mr. Boniface Gambilla Adagbila,
TREND

P O 6808, Kumasi
Tel 233-51-28294/5
Fax 233-51-28296
E-mail trend@ncs.com.gh

Paper

Human Resource Strategies & Critical
Problems in Project Implementation for the
Sustainability of Water & Sanitation in Ghana
Author Boniface Gambila Adagbila

Dr Jerry Ndamba
IWSD

P. Makgatho-Makhado
RDP Implementation -HO
DWAF - CWSS
Private Bag X313
Head Office (HO)
Pretoria - South Africa
Tel 27-12-323-4472
Fax 27-12-324-3659

S. van Blerk (O&M)
RDP Implementation -HO
DWAF - CWSS
Private Bag X313
Head Office (HO)
Pretoria - South Africa
Tel 27-12-323-4472
Fax 27-12-324-3659v

S Marais (O&M)
RDP Implementation -HO
DWAF - CWSS
Private Bag X313
Head Office (HO)
Pretoria - South Africa
Tel 27-12-323-4472
Fax 27-12-324-3659

M. Mekgoe (ODO)
North West

M. Makweyani (ODO)
Mpumalanga

J. Magamise (ODO)
Free State

R. Jack
Provincial Program Manager
Eastern Cape

R. Mphephu (Implementation)
Northern Province

M. Ranamane (ODO)
Head Office

Magaret Diop
Peace Corp
Cote d'Ivoire
Fax 225-41-64-87
Tel 225-41-26-13/41-40-71

Kopieu Gouganou
Chef d'Antenne
Association Africaine Anti-Epidemic
B.P 910
CIDEX 01, Abidjan 06
Tel 225-42-62-62
Fax 225-42-62-62

Tie Yro Ilyacinthe
Coordonnateur
CREPA-CI
B P V83, Abidjan,
Tel & Fax 225-25-17-58

M. Tchumou Ngbocho
CREPA-CI
B P V83, Abidjan,
Tel & Fax 225-25-17-58

Jessie Sena Kuma
Training & Management Officer
CWSD, Kumasi

Paper
Gender Considerations in training for community
mgt Of water in the Ashanti Region of Ghana
Author Jessie Sena Kuma

Tony Batse
Cowater International
PMB, Airport
Fax 233-21-779475
233-21-501459

Paper
Building District Ownership & Management of
Water & Sanitation Programs - Approaches
& Strategies
Author Tony Batse

Lukman Salifu
KMA
P O. Box 1916
Kumasi
Tel 233-51-24304
Fax 233-51-26725

Paper
An appraisal of sewerage maintenance in Ghana
Author Lukman Salifu

Mjoli-Mncube Nhlanhla (Ms)

Dep Chief Exec Officer

NURCHA

P O. Box 15654

Doornfontein, 2028

South Africa

Tel. 027-11-4780

Fax. 027-11-6602

Paper

Impacts of Alternative Sanitation System on the
lives of women in South Africa

Author Nonhlanhla Mjoli-Mncube

Mr Mathewos Woldu

Regional Manager

World Bank - UNDP Program

Abidjan Office

P O. Box 1850

Abidjan 01

Tel 225-44-22-27

Fax 225-44-16-87

Amadeus M Akorli

TREND, Ghana

Paper

Follow-up A necessary Component
for Sustainability of the Latrine Construction
Programme

Author: Amadeus M Akorli

Dr. Ntifo-Slaw

Lecturer/Consultant

SASAKAWA CENTRE

University Post Office

Cape Coast

Tel 233-42-33842

Fax 233-42-33842

Mr. Jo Smet

Programme Officer

IRC - International Water & Sanitation Centre

P. O. Box 93190

NL-2509 AD

The Hague, Netherlands

Tel 31-70-3068958

Fax 31-7-3589967

e-mail: smet@irc.nl

Tandia, Chiech Tidiane

Manager, Research/ Engineering Dept

CREPA

03 B.P. 7112,

Ouagadougou 03

Burkina Faso

Tel 226-31-03-59/60

Paper

Sanitation Promotion in Rural & Low income
urban and peri-urban areas Experiences in
Burkina Faso

Author Tandia Cheick Tidiane & Tounkara
Mahamadou

Tounkara, Mahamadou

Dep Manager, Research/Engineering Dept

CREPA

03 B P 7112,

Ouagadougou 03

Burkina Faso

Tel 226-31-03-59/60

Fax 226-31-03-61

Paper

Solar Water Pumping: A reliable alternative
for water supply in peri-urban areas of devel-
oping countries

Author Tounkara Mahamadou

Lars Karlen - IDS
RWSG-ESA
UNDP-WB Reg W&S Group
P. O Box 30577
Nairobi, Kenya
Tel 254-2-714141
Fax 254-2-720408

Paper

Institutional Devt Of Community Management Groups for Rural Water Supply & Sanitation.
Author Lars Karlen

Matthew N. Karluk
Netwas, Kenya
Fax: 254-2-890553/890560
Tel: 254-2-890554/516

Ms. Pauline Ikumi
Netwas, Kenya
Fax 254-2-890553/890560
Tel 254-2-890554/516

Mr. Wilfred Ndegwa
Netwas, Kenya
Fax: 254-2-890553/890560
Tel: 254-2-890554/516

Mr. L. K. Biwott
MWD, Kenya

Mr. Oliver Frimpong
TREND, Kumasi, Ghana

Paper

SARAR. The Mistress of change in Distress
A Case Study of the Sinking Image of the SARAR Methodology in Ghana.
Author: Oliver Frimpong

Kwasi Dadie-Amoah
TREND, Kumasi, Ghana

Paper

Commitment of Local Authorities: Observations From Some districts (Local Areas) In The Brong Ahafo Region Of Ghana.
Author Kwasi Dadie-Amoah

Solomon Panford
TREND, Kumasi, Ghana

Paper

Audiece-Based Message Design For Community Hygiene Education An Education: An Experience From The Kumasi Health Education Project, Kumasi.
Author. Solomon Panford

Ms Betty Yankson
TREND, Kumasi, Ghana

Richard O. Anane
TREND, Kumasi, Ghana

Eugene Larbi
Managing Director
TREND, Kumasi, Ghana

Vincent Tay
TREND, Kumasi, Ghana

Isaac Adjet-Doku
TREND, Kumasi, Ghana

Patsy Sawyerr
TREND, Kumasi, Ghana

Safuratu M. Andani (Mrs)
TREND, Kumasi, Ghana

LIST OF PAPERS IN SPECIALIST SESSIONS

Tuesday 0900 - 1030	AI Community Management	B Hygiene issues
Tuesday 1100 - 1230	A2 Community Management	C1 Water Supply
Tuesday 1400 - 1530	A3 Community Management	C2 Water Supply
Tuesday 1600 - 1730	D1 Sanitation	E1 Training and Materials Production
Wednesday	F I E L D T R I P	
Thursday 0900 - 1030	D2 Sanitation	E2 Training and Materials Production
Thursday 1100 - 1230	D3 Sanitation	F Communication
Thursday 1400 - 1530	G1 The Private Sector and Human Resource Development	H1 Gender Issues
Thursday 1600 - 1730	G2 The Private Sector and Human Resource Development	H2 Gender Issues

ITN
AFRICA
CONFERENCE

