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**REPORT OF**

**SECOND BACKSTOPPING MISSION**

**TO THE NETHERLANDS- SUPPORTED**

**WATER SUPPLY PROGRAMMES IN NAMIBIA**

November 1995

IRC International Water and Sanitation Centre

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**SECOND BACKSTOPPING MISSION**  
**TO THE NETHERLANDS- SUPPORTED**  
**WATER SUPPLY PROGRAMMES IN NAMIBIA**

Mission November 1995

**Backstopping Team:**

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**ABBREVIATIONS AND ACRONYMS USED**

<b>CWC</b>	-	<b>Central Water Committee</b>
<b>DRWS</b>	-	<b>Directorate of Rural Water Supply</b>
<b>DWA</b>	-	<b>Department of Water Affairs</b>
<b>ESA</b>	-	<b>External Support Agency</b>
<b>IRC</b>	-	<b>IRC International Water and Sanitation Centre</b>
<b>LSU</b>	-	<b>Large Stock Unit</b>
<b>LWC</b>	-	<b>Local Water Committee</b>
<b>MAWRD</b>	-	<b>Ministry of Agriculture, Water and Rural Development</b>
<b>NDT</b>	-	<b>Namibia Development Trust</b>
<b>NWC</b>	-	<b>Namibia Water Corporation Limited</b>
<b>O&amp;M</b>	-	<b>Operation and Maintenance</b>
<b>RNE</b>	-	<b>Royal Netherlands Embassy</b>
<b>RWEO</b>	-	<b>Rural Water Extension Officer</b>
<b>RWS</b>	-	<b>Rural Water Supply</b>
<b>TOR</b>	-	<b>Terms of Reference</b>
<b>WASCO</b>	-	<b>National Water Supply and Sanitation Coordination Committee</b>
<b>WASP</b>	-	<b>Water and Sanitation Policy</b>
<b>WPC</b>	-	<b>Water Point Committee</b>

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## 0. EXECUTIVE SUMMARY

The Backstopping Mission aims to review jointly with the counterpart Core Team of the Directorate of Rural Water Supply the achievements, effectiveness and sustainability of two Netherlands-financed rural piped water schemes in the Cuvelai Rural Water Supply Region in Namibia. Furthermore, the joint Teams will assist DRWS to develop and make related community management and support structures operational. In this way increased scheme sustainability will be achieved, field experiences gained and lessons learned. These experiences and lessons will be applicable to all staff of DRWS.

The second Backstopping Mission took place between 13 and 25 November 1995. The main objectives of this second mission were to assess through field visits and discussions with relevant groups the progress in the Netherlands-supported water projects, to identify risks for sustainability at community and Directorate level, and to develop methodologies and action-plans for sustainable community management structure and for sustainable Directorate support structures.

The two schemes are technically fully operational. Supply failures have hardly been experienced up to the time of this mission. Final corrections/repairs are being made by DRWS on the Water Points of the Oshakati-Omakango scheme. The communities are not participating in these repairs.

The community management structures are being build up but are not yet complete, and are far from fully operational and effective.

At the lowest level, the Water Point Committee, the progress on community management is encouraging in the Ogongo-Okalongo scheme, but still limited in the Oshakati-Omakango scheme. The latter is due to the absence of RWEOS in the scheme. As both schemes have now full extension services with trained RWEOS, this situation is expected to change over the months to come. The eagerness of the existing WPCs to take up community management responsibilities was demonstrated by their collecting contributions from users for management and O&M; by their opening of water bank accounts; and by their requests for further support in their management roles from DRWS.

At the time of the Mission, all RWEOS of the two schemes were on training courses in Zimbabwe and in Namibia.

The operational state of the LWCs is low, although they are the actual owners of the scheme. This is due to the facts that there is no actual role for these committees as yet, and that the Chief RWEO to train and support the LWCs is not yet recruited and in place. This post is to be filled before June 1996 for which Netherlands financial support has been secured for a period of three years.

There is a chance that the Control RWEO of the Cuvelai Region will get a new post; his departure will leave a big vacuum in the Extension Service in the Cuvelai Region. If this would happen, a new Control RWEO is urgently to be recruited.

Training or capacity development remains an important issue, which is recognized by DRWS as reflected in their 1996 budget (N\$ 3.5 million). However, the personnel situation is rather alarming with only one DRWS staff, one consultant and one VSO

volunteer available. The continuation of the training programmes for RWEOs, as well as the development and testing of new training for LWCs and the package T4 for RWEOs is at risk. This area needs urgent attention and strengthening. Fortunately, the Netherlands Government has promised to provide three more experts, of whom two would be involved in the Training Section.

The Mission analyzed further issues contributing to or creating risks for sustainability. This resulted in an overview of 12 areas, six at community level and six at DRWS level. These 12 areas were subjected to a detailed problem analysis and solution finding exercise. The tabulated results will be flexibly used in planning for the coming years.

One of the fields of specific attention of the Backstopping Mission is the cost recovery and financial management at WPC and LWC level. A Workshop on cost recovery for rural water supply was held in November 1995, and its recommendations endorsed by WASCO. The financial sustainability of the water systems at WP and scheme level will be monitored throughout.

Environmental issues have been addressed prominently during this Mission through discussions with several key agencies at the National level and by making recommendations for future activities in terms of monitoring by the Missions and the WPCs.

Sustainability and effectiveness of the schemes is not yet clear: community management system are further to be developed and pilot tested in the two schemes. This includes further training and support to the WPCs and their Caretakers; training of LWCs and their Caretakers; developing monitoring systems, communication lines etc.

It is therefore recommended that the Oshakati-Omakango scheme will also become a "development and demonstration scheme", and that O&M responsibilities for WPCs become effective after the training of their caretaker by DRWS. This caretakers has therefore a paramount importance. The O&M responsibilities of LWCs (scheme level) is the next step to be taken. Furthermore, community-based monitoring indicators and tools have to be developed in the period before the next Backstopping Mission to enable the WPCs to execute their managerial responsibilities. To make this "development and demonstration" possible, the Netherlands Government will be requested to make the balance funds of the Ogongo-Okalongo scheme available for small "testing" activities in the two schemes.



## 1. PURPOSE OF THE BACKSTOPPING MISSIONS

The purpose of the Backstopping Mission is related to the Dutch-financed water projects in Cuvelai, i.e. the Ogongo-Okalongo and the Oshakati-Omakango piped water schemes, and the Calueque II project.

The abstracted objectives are (i) to review jointly with DRWS Core Team the achievements, effectiveness and sustainability of the above projects; and (ii) to assist DRWS in the development and demonstration of operational community management systems and related structures contributing towards scheme sustainability and learn from the reviewed experiences.

The main objectives of the second mission were to assess through field visits and discussions with relevant groups the progress in the Netherlands-supported water projects, to identify risks for sustainability at community and Directorate level, and to develop methodologies and action-plans for sustainable community management structure and for sustainable Directorate support structures. The detailed TOR are appended (1).

The Backstopping Team is composed of Mr Jo Smet, Mr Wim Klaassen and Ms Beth Terry.

## 2. MONITORING OF NETHERLANDS-SUPPORTED WATER SUPPLY PROJECTS

The complete list of Dutch financed water projects and activities in Namibia since 1990 is appended (4). The monitoring task of the Backstopping Mission is related to the two rural piped water supply schemes (Ogongo-Okalongo and Oshakati-Omakango), and the rehabilitation of the Calueque Dam and Olushandja Reservoir. Monitoring of physical progress of these projects is reported in chapter 6.

## 3. PROGRAMME OF SECOND BACKSTOPPING MISSION

The second mission took place between 13 and 25 November 1995. After a briefing at the Netherlands Embassy in Windhoek and teaming up with the DRWS Core Team, the mission spent five days in Cuvelai. The two areas with the piped water supply schemes were visited and projects activities and problems were discussed with community members, Water Point Committees (WPC) and Local Water Committees (LWC). Large numbers of people and committees' members came to exchange views with the Teams<sup>1</sup>; in total some 120 people in the two areas, in two meetings. Meetings were held with the DRWS Cuvelai staff, DWA (Bulk Water) and NGOs' staff<sup>2</sup> in Oshakati. The training institute in Okashana where a T3 course for Rural Water Extension Officers (RWEOs) was being conducted was visited and some interviews with staff and participants were done. A Back-from-Field reporting was

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<sup>1</sup>. The term "Team" refers to the joint DRWS Core Team and the Backstopping Team.

<sup>2</sup>. Representatives from Namibia Development Trust, Cooperation for Development, Catholic Diocese Odibo, and from Water Supply and Sanitation Project Ohangwena Region, a government project supported by the Finnish government.

done for DRWS staff. Some selected departments and NGOs were visited for further discussion.

During two days the Teams analyzed the key elements and risks for sustainability of the water supply systems at community level and the support structure at the DRWS level (regional and national) and discussed possible solutions and action points with the participation of Mr Abraham Nehemia. A half-day workshop for DRWS, DWA and other agencies' staff was organized to further discuss in a participatory way problems and possible solutions regarding this sustainability. A meeting with ESAs to exchange information on donor-supported projects and to debrief on the Missions findings was organized by and at the RNE in Windhoek. Present during that meeting were representatives from the French Cooperation, the Embassy of Germany, the Office National de l'Eau (France) and the RNE.

At the end of the Mission the major conclusions and action points were discussed with the DRWS and also with the RNE; a draft Summary Report was submitted.

A detailed itinerary and a list of persons met are appended (2 and 3)

#### **4. PARTNERSHIP WITH THE DIRECTORATE OF RURAL WATER SUPPLY**

The Backstopping Team continued the good relationship with the DRWS Core Team being: Sjaak Zijlma and Godfrey Tjiramba. Mr Willy Iyambo, Regional Head Cuvelai, was not approached to become a member of the DRWS Core Team; the Teams had discussions with him. Mr Abraham Nehemia, Control RWE0 Cuvelai, was a very good resource person and joined the discussions on problems, solutions and action plan in Windhoek.

Back-from-Field reporting was done to DRWS staff including Mr Pita Nghipandulwa (Director), Mr Jürgen Eysselein (Divisional Head North), Mr Harald Koch (Divisional Head Development and Planning).

The workshop was attended by Ms G. Wolters (RNE), Mr Pita Nghipandulwa, Mr Harald Koch, Mr Ken Gibbs (UNICEF) and Mrs Leoni Futter (Training Section DRWS). According to the participants, the workshop was very interesting and raised the right questions using an inspiring participatory approach.

The management of the DRWS expressed the value of this kind of Backstopping support as apart from the important fact-finding of progress and problems on functioning and use of the community-managed water supply systems, constructive solutions and realistic directions were identified jointly with DRWS staff identified. This contributes to further development of strategies and methodologies towards sustainable rural and community-managed piped water supply schemes.

## 5. RE-ORGANIZATION AND DEVELOPMENTS WITHIN THE DEPARTMENT OF WATER AFFAIRS

The commercialization of the "Bulk" Water Supply has not yet materialized; the tentative date of implementation has moved to April 1996.

The shortage of staff in DRWS remains a serious bottleneck for the implementation of the rural water supply projects and the establishment of well-trained and supported water management structures at central, local and water point level. The number of RWEOs has increased significantly: there are now 95 trained RWEOs out of the 231 required in total.

Perhaps this total number could be smaller when LWCs and WPCs have been established and function well, so that less extension support is needed. For 1996, a number of new staff posts for DRWS has been identified to be filled and the following staff will be recruited: 4-6 trainers; 5 Development Planners and 15 technicians.

The extension staff for the two development/demonstration schemes is complete in number and well trained. The Chief RWEO for the Cuvelai Region with a special task to assist in the extension work in the two schemes is still to be recruited.

The tables in appendix 5 give overviews of the staff capacities of DRWS at national and Cuvelai regional level against the establishments. The Administrative and Auxiliary staff are not included.

The need for further re-orientation of the DRWS staff is high; this re-orientation for managerial and technical staff refers to a change in direction from a technical to a community scope, i.e. DRWS is the facilitator and supporter to community managed water supply systems. Although the senior staff needs to follow formal courses on management/planning of community water supply, the Backstopping Missions contributes to this re-orientation through the workshops and discussions on problems and solutions. Furthermore, more specific short training sessions on selected topics can be organized during forthcoming missions.

The National Water Supply and Sanitation Coordination Committee (WASCO) had been established on the initiative of the Ministry of Agriculture, Water and Rural Development. WASCO is a coordinating body of several ministries at Permanent Secretaries level to coordinate activities related to rural water supply and sanitation. Two meetings had already taken place, including one on the results, approval and follow-up of the Swakopmund Workshop on Cost Recovery in Rural Water Supply<sup>3</sup>. The WASCO endorsed the results of the Swakopmund Workshop after some amendments<sup>4</sup>. During the inauguration meeting of WASCO the Ministry of Health and Social Services accepted responsibility for rural sanitation (human excreta disposal). It is hoped that WASCO will continue to function but the interest from the ministries is low which will adversely affect its functioning and effectiveness. WASCO may be transformed into a Technical Committee (or Technical Committee within WASCO) to become operationally more effective.

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<sup>3</sup> See also Proceedings of the Workshop on Policy for Cost Recovery for Rural Water Supply, Swakopmund, November 5-8, 1995

<sup>4</sup> WASCO Workshop Agenda and Minutes, Thursday 9 November 1995

## 6. PHYSICAL PROGRESS OF WATER SUPPLY SCHEMES

### *Ogongo-Okalongo and Oshakati-Omakango schemes*

The Oshakati-Omakango schemes has also been handed over now to DRWS. The scheme is being inspected and corrected/repared where necessary by DRWS. The role of the Construction Department of DWA in these repairs etc is unclear and it seems that DRWS is using own funds to make the required corrections and repairs to this scheme to meet the acceptable standards. Apparently this physical repairs/corrections precede the establishment of most WPCs, which means that a great opportunity is lost to have the users and WPCs involved in this activity including their views and preferences that would have contributed to sense of ownership and recognition of authority of WPCs.

Some WPCs along the Oshakati-Omakango scheme have been established, others will soon be established (i.e. elected or selected- as a community process not interfered by DRWS). Directly after the establishment the WPCs will appoint/select a WP Caretaker, who has to be trained as soon as possible to ensure adequate preventive and corrective maintenance of the WPs.

In discussions with the users, the desire for more water points was expressed, a higher service level resulting in shorter walking distances (also for livestock, small-scale enterprises etc). The standard is now 2.5 km, but also in the Swakopmund Workshop (November 1995) the proposal was made to reduce this to 1 km but the target year was not indicated; whether this extra investment will be paid by GRN is unclear. For the time being extra water points and branch-lines beyond the "lifeline"<sup>5</sup> concept are to be seen as private connections for which full construction and connection costs have to be borne by the users. Private connections for domestic and economic (livestock etc.) purposes is possible provided the source capacity allows it.

### *Calueque Dam Phase II*

The components of this Netherlands-financed project were monitored on progress. A rough sketch was made to give an overview of the different components of the intake works, canals and storage dams at Calueque and Olushandja (see appendix 6; the sketch is for monitoring purposes only).

The rehabilitation of the Calueque Dam (Phase b) has not yet started because of insecurity. Nevertheless, the Teams managed to visit the dam site. DWA has got their staff at the pumping station, while the security staff is Angolan. The structural part of the intake works needs rehabilitation, and the dam needs to be desilted to increase the volumetric capacity of the water reservoir.

New pumps to increase the capacity have not been ordered yet. The present pumping capacity is 4 m<sup>3</sup>/s of which 2 m<sup>3</sup>/s is used for pumping and 2 m<sup>3</sup>/s is stand-by capacity.

The canal to Olushandja is in a reasonable condition but shrubs and small trees have to be removed from the canal slopes and along the canal shores as these can damage the concrete slabs of the slopes. The last seven kilometres of canal (near Olushandja) have been re-constructed. This has been done properly. The volumetric flow capacity of this new stretch of the canal is less than the stream-upward part. It is doubtful whether this canal can accommodate the planned flow of 4 m<sup>3</sup>/s.

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<sup>5</sup> For explanation of "lifeline" concept, see the Proceedings of the Swakopmund Workshop on Cost Recovery for Rural Water Supply

The Olushandja Dam pumping works have been rehabilitated. The pumphouse was closed so no close observation of the condition of the works could be made. The pumps are meant to pump water from the Olushandja reservoir into the canal to Ogongo and to the treatment works for the supply to Tsandi, in case of emergency, i.e. if the supply from Calueque or Ruacana is insufficient. It is unclear whether the rehabilitation of these pumping works was part of the first or second phase of the Calueque Rehabilitation.

Another component of the Calueque Phase II project is the increase of capacity of the Olushandja Dam Reservoir. It is unclear what civil engineering work has been done in this respect, although it was reported to the Mission that the water level of the reservoir has risen. As a result of this, a project supporting small gardening around the reservoir is facing problems as gardens are flooded. The EIA report is not yet available in draft format due to illness of the author.

DWA has been approached by the Backstopping Team to give full project description, planned activities and time schedules. The project started 01.01.94 and has to be completed before 31.12.96. During the next mission the Backstopping Team will monitor the progress of this project versus the planning of DWA.

## **7. ANALYSIS ON EFFECTIVENESS OF WATER SUPPLY SYSTEMS**

### **7.1 Functioning**

Both the piped water supply systems Ogongo-Okalongo and Oshakati-Omakango were functioning and had not faced significant supply problems since last mission. Only a few times the Ogongo-Okalongo scheme experienced reduced pressure or no water at all. This is caused by the procedures "Bulk" Water Supply follows in case of insufficient water, trunk pipe breaks or power failure (see also section 8.1 Relationship with Bulk Water Supply).

The physical structure of the water points (WPs) of the Oshakati-Omakango second scheme was being inspected and faults were being corrected by DRWS. Most of the short-comings in design and choice of materials were being addressed. The Ogongo-Okalongo scheme had 42 WPCs in place in 64 WPs and in the Oshakati-Omakango scheme only 10 WPCs were established out of 80 WPs as RWEOs had started their tasks only a few months ago.

### **7.2 Use**

Water for domestic purposes was mainly coming from the WPs, although other traditional sources, such as open sources (oshana, etale ondobe), shallow wells (omifima), and deep wells (ondungu) were used when available. Because the Second Mission took place during the dry season most traditional sources had dried up. There was hardly cattle seen in the areas of the two schemes as grazing land was exhausted. Cattle had been taken to the Southern areas of the Cuvelai Region.

Water consumption figures were obtained for the Ogongo-Okalongo scheme for a 12-months period from Bulk Water Supply in Oshakati (appendix 7). Analysis indicate large differences in consumption between dry and rainy season. The indicative present consumption figure in this scheme is about 10 lcd. The design figures for human and livestock consumption (25 lcd and 45 l/LSU per day) are not at all reached yet. The

design figure for the scheme is an average daily demand of 2330 m<sup>3</sup> with a daily peak of 3490 m<sup>3</sup>. The experienced maximum monthly consumption (October 1994: 28,746 m<sup>3</sup>) is 41% of the design capacity of the scheme.

The figures of consumption of the scheme and the Water Points will be monitored in the future by Bulk Water Supply, and the WPCs and LWC.

### 7.3 Appreciation

People expressed great appreciation of the water supply for reasons of quality, quantity, reliability and convenience. In closing comments made by people present at the Oshakati-Omakango meeting, one man indicated his appreciation for the water piped scheme and for the interest of DRWS and the Dutch government in the sustainability of the scheme: "..... as you may know the previous regime never worked with black people".

### 7.4 Hygiene and behavioural issues

During the meetings with the communities conducted at the two schemes, several points related to hygiene and health behaviour were expressed by the people or observed later during visits to WPs.

#### *Cleanliness of the WPs*

The area around two WPs on the Ogongo-Okalongo scheme and around one WP on the Oshakati-Omakango scheme, which were observed during the field trip, were very clean and free of litter, animal droppings, and pools of standing water. But as stated earlier, most cattle was taken to grazing areas in the Southern areas of the Cuvelai Region.

WPCs were asked how they organised the cleaning of the WPs. A variety of responses were given, indicating the effectiveness of leaving these types of management decisions at the community level:

- Community members including WPC members are expected to clean every Saturday. Everyone does not come all the time, because some people live far from the WP, but it is not a real problem. The system works.
- One WPC (Epoke C) calls the community together twice a month to clean WP and this system works well.
- Another WPC calls people together when the WP needs to be cleaned and people come freely and do it.
- One WPC member always cleans it himself. Similarly one caretaker cleans it himself ("I call people and no one comes and I want to see the WP clean").
- One WPC member sits at the WP and says to people coming to collect water, "first clean, then you can take water".

#### *Use of washing basin*

There appears to be some confusion and/or mis-communication between Ministry of Health and Social Services staff and DRWS regarding the use of the WP facilities. At one meeting, one woman stated that she was told by Health Staff not to use the clothes washing basin connected at the WP because diseases could be spread from one user to another. This message completely undermines the use of an expensive part of the WP facility designed by DRWS.

*Design of water point*

One WPC member further mentioned a problem regarding the design of the tap stand and washing basin: if someone is washing clothes in the basin with soapy water and someone else is filling her bucket with clean water from the tap at a level below the basin, it happens that the soapy water "jumps" into the clean water, and so "pollutes" the clean water.

*Rural sanitation under MoHSS*

On the national level, a decision has been re-inforced by WASCO that the responsibility for the promotion and development of rural sanitation should fall under the Ministry of Health and Social Services, rather than DRWS. It is unclear what DRWS's official thinking is on broader extension and education work connected to water-related hygiene and environment sanitation around water points. The RNE feels that some effort is needed to ensure continuity and a continuation of hygiene and sanitation education. Especially important are issues revolving on what happens particularly to the drinking water after it leaves the tap. An education and awareness campaign on water handling, carrying, storage and use in the household needs to be connected to the newly developed clean water supplies, otherwise improved technical facilities for the provision of clean water will have limited impact on people's lives and health. The RWEOS have some knowledge on "hygienic water practices" from their training package.

At the moment there appears to be little communication between the DRWS extension team and the Ministry of Health extension cadre. This situation needs to be followed-up. More broadly, the recommendations made in the report, "Piped Water, What More? Options for complementary hygiene and sanitation in piped water schemes in Owambo, Namibia" (Harnmeijer, 1994) on how to institutionalise and organise health education and sanitation activities need to be followed-up.

## **8. ANALYSIS ON SUSTAINABILITY OF WATER SUPPLY SYSTEMS**

### **8.1 Organization of piped water supplies schemes**

The basic features of the organization of the two schemes has been laid out in the First Backstopping Mission report. It was observed that a number of positive developments have taken place since the first mission's visit in February 1995. These are:

- three new RWEOS were appointed and have undergone the initial training (T1, T2, T3);
- these new RWEOS have had some opportunity to begin activities on schemes in-between training programmes;
- three RWEOS of the two schemes are being trained in Zimbabwe and one in Namibia (November 1995); the Teams met Ms Mary Isaac Itembu, one of the RWEOS of the Oshakati-Omakango scheme, who gave a very positive impression;
- the Ogongo-Okalongo scheme has been functioning without major problems. The MT of DWA has been withdrawn. Two out of three WPs of this scheme have trained caretakers;
- final corrections/repairs to the Oshakati-Omakango scheme are being made; handing over to the LWC and WPCs is expected by early 1996;
- most established WPCs are levying (on an ad hoc basis as yet) fees to meet O&M costs at the WP-level;
- the vacant post of Chief RWEOS has been advertised (23-11-1995)

### *Rural Water Extension Officers (RWEOs)*

Having completed their Training, the RWEOs will resume their duties and will particularly concentrate on organizational support to and training of the WPCs. This refers particularly to identified organizational problems at the WPC level and confidence building among WPC and caretakers. Another issue needing urgent attention is the development of a sustainable cost-recovery and financial management system on the level of WPCs.

Transport for RWEOs to the WPCs for meetings/discussions is not experienced as a problem in the two piped schemes as distances are limited and the RWEOs manage to organize this with WPCs and transport owners.

Communication to the Regional Office in Oshakati is an issue to be addressed during next mission; reporting of important issues has now to be done personally by travelling to the office which may take a full day. Radio-communication could be very efficient but the sustainability of such a system is to be checked by DRWS.

DRWS has to look into the performance of the trained RWEOs. Such performance evaluation should include the use of participatory methodologies in their support and advisory services to the WPCs, and the availability of tools to apply these participatory methodologies.

### *Chief and Control Rural Water Extension Officers*

The post of Chief RWEO has not been filled but an advertisement was published with the application deadline 15 January 1996. The expectation is that the Chief RWEO might be in place by mid-1996.

As the RWEOs concentrate on WPCs, one of the Chief RWEO's main tasks is to support and advice the LWCs. The present LWCs are relatively weak in organization and capacities. The first task of the yet to be recruited Chief RWEO is to revitalize the LWCs by discussion and intensive support/training. This applies to the LWCs of Ogongo-Okalongo and Oshakati-Omakango. The training package for LWCs has therefore to be finalized as soon as possible. The Backstopping Team is willing to review the package and support the finalization. The training can be pilot tested in a joint training for the LWCs in the two demo-schemes.

The Control RWEO Cuvelai Region has been recently appointed to the post of National Coordinator of the GTZ Rural Water Supply Projects. If this materializes, DRWS has to look for a suitable replacement in a very short time to minimize the organizational and staff problems caused by this departure. If this post remains unfilled for some time, this may have serious adverse effects on the efficiency and effectiveness of the management of rural water supply in the Cuvelai Region including the two concerned schemes, as well as on the tasks of the Backstopping Missions, particularly on the issues related to the Development and Demonstration activities in the two schemes.

### *Maintenance Teams (MT)*

The Maintenance Team of the DWA Construction Department was withdrawn. Two MTs of DRWS (one south of road and one north of road Tsumeb-Ruacana) are now in charge of major repairs, but the personnel was borrowed from DWA Construction. As the DWA Construction that provided the personnel to the DRWS-MTs, is now being dismantled the continuation of the DRWS-MTs is unclear; own maintenance staff has



to be trained as maintenance staff of DWA Construction seems not to be interested to join DRWS. This problem may jeopardize the timely preventive and corrective maintenance of branch-lines, and the training of caretakers of the WPCs (those not yet trained) and of the two LWCs.

#### *Caretakers (CT)*

One out of three Water point-CTs of the Ogongo-Okalongo scheme and all Waterpoint-CTs of the Oshakati-Omakango scheme have not yet received training. As for the first three batches this will be done by a water supply technician of the MT and a RWEO.

Also the still to be selected CTs of the LWCs have to be trained by the DRWS-MT and the Chief-RWEO. The CTs can further be trained on-the-job with the DRWS-MT. A training package and schedule has to be prepared. To be able to start with the gradual implementation of the O&M tasks and cost recovery of the schemes as such (tentatively scheduled towards the end of 1996) this training has to take place in the first half of 1996.

#### *Water Point Committee (WPC)*

The number of functioning WPCs on the Ogongo-Okalongo scheme currently amounts to 42 (out of the 64 WPs) while the Oshakati-Omakango scheme has 10 committees in place in the 80 WPs).

The WPCs face a lot of problems. Several issues are being addressed in the further analysis by the Teams (see tables of analysis). These problems include communication between committee and users group; composition of the WPC; WPC-meetings (agenda, frequency); legal status and authority; and cost recovery and financial management. Some WPCs keep a list of users. The legal status of WPCs is being looked into from a legislative point of view (see also 8.7.1 Ownership). It is clear that further organizational support is to be given by the RWEOs on the above and other issues. Factors for success or failure of WPCs should be determined by the RWEOs for learning purposes. As a management committee the WPC needs the appropriate monitoring tools and indicators, e.g. regarding consumption and cost recovery. This will be an area of attention for the Teams before the next Backstopping Mission.

#### *Local Water Committee (LWC)*

Both schemes now have LWCs established, however their role in facilitating community participation and management still appears to be unclear. For example, in the community meeting on the Ogongo-Okalongo scheme nobody could state a function or some of the responsibilities of the LWC. Their presence is merely on paper, actually they do not perform any practical task at the moment! According to a LWC member, most members are only member by name and don't do anything as they are not being paid for the services provided.

The LWCs in both schemes will have to play a crucial role in the overall scheme management and administration. An agreement, which stipulates the duties of the LWC has been signed between the MAWRD and the Ogongo-Okalongo LWC (see appendix 8). The DRWS regards development and capacitating of the LWCs as a priority for the following reasons:

- The LWC is the actual (user) owner of the scheme and is supposed to manage the scheme on behalf of the community;
- The LWC is the actual scheme committee that will be decisive for the functioning of the scheme;

- the functioning of the WPCs and the CWC hinges around proper functioning of the LWC.

At present, there is hardly any communication between LWC and WPCs, and also between LWCs and CWC and vice versa. It is clear that the LWCs have to be revitalized as soon as possible, to be trained including concrete tasks and activities. Some issues that need attention are communication; organizational support to WPCs; scheme O&M; cost recovery; financial management. The LWCs will gradually handle more money for scheme O&M and eventually for the cost of water supply; therefore good financial management systems have to be developed with them and financial control system established (e.g. external audit).

It is clear that the WPCs will not be willing now to pay the LWCs' organizational costs. Therefore the communication between those committees, and organizational and practical support to WPCs have to be established for the benefit of the WPCs which will then increase the WPCs willingness to contribute money to the functions of the LWCs.

Representation of LWCs in the CWC needs urgent attention.

#### *Central Water Committee (CWC)*

As was also recognized in the Swakopmund Workshop, CWCs have a key role to play in the organization and functioning of the rural water supply in the regions. The draft constitution of the CWC is to be finalized. Particularly the representation is to be looked into. Instead of appointed members, the composition should be of elected or selected members supplemented by representation of LWCs, government (DRWS) and service providers (NAMWATER).

The Swakopmund Workshop identified as the CWCs' functions on cost recovery issues as tariff setting (with NAMWATER and DRWS), subsidies, phasing of cost recovery, and information, communication and advocacy.

The communication between the CWC and LWCs and vice versa has to be improved. Appropriate communication channels have to be identified.

The splitting up of the CWC for the densely populated area of Cuvelai was suggested by WASCO (Nov. '95); one Chief RWEO could be reporting to each CWC.

It is clear that the Backstopping Mission has to establish contact with the CWC to communicate and discuss on plans and activities in the two "Development and Demonstration Schemes" in the Cuvelai Region.

#### *Relationship between Water Committees/DRWS and DWA Bulk Water Supply (NAMWATER)*

Good communication between the Teams and the Bulk Water Supply is appreciated and is hoped/expected to continue. Communication between CWC and LWCs at one side and Bulk Water on the other side has to be formalized. The establishment of a Consumer Relation Department in NAMWATER is to be considered. Presently, Bulk Water Oshakati has some 2,000 customers; the addition of two more, i.e. the LWCs, should not create any problem.

Several points that need attention, also during the coming Backstopping Missions, are further analyzed in appendix 11. These include the communication, legal status and authority of WPCs/LWCs, training RWEOs, WPCS, CTs, LWCs

## 8.2 Community Participation

As noted in the first Backstopping Mission Report, the concept of community participation is relatively new to Namibia and the DRWS. To ensure that community participation really occurs, one strategy put into place has been the recruitment and placement of a cadre of RWEOs and the establishment of WPCs at the Water Point (WP) level and LWCs at the scheme level.

The Chief RWEOs have an important position, as they will have an impact on community participation, especially due to their role as organisers and trainers of LWCs and their supervisory role to RWEOs.

### *Relationship within WPCs*

According to representatives from four WPCs, relationships within WPCs are reasonably positive. One man said, "some wanted to 'talk bad words' with others, but it really is not a big problem". Another man said, "at first people did not accept the idea of being on committees: they were looking for salaries, but now it is better". A representative from Cooperation for Development noted that having prominent people on a WPC helped to keep the committee going. Others have experienced the problem that prominent people (e.g., leaders, teachers, business people) do not have the time to fulfil their responsibilities on the WPC. Clearly, if the problem is left in the hands of the community and the community is aware that they have the power to change committee members when necessary, then this type of problem can be addressed if and when it comes up.

### *Relationship between WPCs and community (users)*

Not enough information has been collected to determine the status of the relationships between WPCs and the community at large. For example, one male WPC member (Epoko B) noted that there was good cooperation between their WPC and the community. However, several WPCs mentioned that they had problems of getting community members to attend water management meetings. A few examples were given. Two WPCs call community meetings twice per month and few people come. Attendance was good initially at the one WP, but no longer. At another WP, some people think the meeting venue is not good because it is too close to the cuca shop. Another WPC does not give advanced notice of a meeting. A possible reason for poor attendance may be that the meetings are called too frequently, especially if there are no real problems to discuss.

### *Collecting financial contributions*

Another community participation problem mentioned by one WPC was the difficulty of collecting money from the community. Possible reasons for this problem are discussed under 8.7.3.

### *Respect from children for WPCs*

One problem, which was brought up a few times by different WPCs, was the lack of respect shown by children to the WPCs. Children do not want to listen to the WPCs or follow the rules set down by the committees in regards to water usage, handling the

WP, etc. Furthermore, the parents of these children then tell the WPC members to leave their children alone. This behaviour of the children and parents also links to issues of perceived ownership (see 8.7.1). A suggestion was given that WPCs could give presentations at schools in cooperation with the health/science teachers in order to promote proper water usage, WP handling, and the responsibilities of the WPCs.

#### *Point of attention in community participation*

Overall, the impression at the moment is that there is still a long way to go before there is active, regular participation in water supply management at the community level. A lack of knowledge is found at all levels (i.e., community, WPC, LWC) regarding roles and responsibilities. Some WPCs lack authority and poor communication systems are evident between different levels. Several potential "danger points" have been identified which might possibly affect the community participation process, as follows:

- One of the extension officers on the WSSPOR project noted that community members must be involved in much more than the just labour during the construction phase in order to develop a pro-active attitude towards participation, contribution, and ownership. It is worrisome to note that the community members, especially women, on the two Dutch schemes were not brought into the design phase of the project, nor does it appear that users were well-informed during the planning stages to make realistic choices during the operation phases regarding maintenance, tariff setting, tariff collection, etc.
- Unless a solid link is established early on between the LWCs and the CWC, the RWEOs might feel obliged to be this link, thus undermining the importance of direct community involvement, rather than GRN taking care of any problems.
- Similarly, RWEOs must find the fine balance between having contact with the community at large, while at the same time initiating specific and specialised contact with the WPCs, otherwise community members may not recognise the authority of the WPCs.
- Community members, WPCs, and LWCs must be given, as soon as possible, information on the real costs, O&M costs of an individual WP, branch-line, etc. and anticipated cost recovery tariffs, along with the timing of when they will be expected to pay what. Without this information presented up-front, as soon as possible, there is danger that WPCs, LWCs and RWEOs will lose any authority that they have managed to acquire and communities will lose interest in taking an active role in the management of their water supply schemes.
- See 8.3 for comments concerning the gender balance and roles in the community participation process.

## **8.3 Gender Issues**

### **8.3.1 At the community and committee level**

#### *Community participation and management*

During the discussions at the Ogongo-Okalongo scheme, out of the 32 people present only eight were women. None of the women present were members of WPCs or the LWC. Although one valiant attempt was made to request comments from the women, the male facilitator did little if anything to encourage the participation of women during the meeting, and therefore only two or three comments were made by the women present during the entire three-hour meeting. As an example of the unbalanced situation: the question was posed to the women, "Is there any short-fall of water for

domestic use versus water for livestock?" No woman commented immediately and the men went on to a different topic without the male chair requesting time for the women to respond.

Representation and participation of women at the Oshakati-Omakango scheme meeting was better with approximately 34 of 72 people (47 percent) at the meeting being women. One of four LWC members present and two of seven WPC members were women. The one woman from the LWC took active participation and seemed well-respected by her colleagues and a few comments were made by the two women who represented WPCs.

Although mentioned in the first Backstopping Mission Report (p.14), the need still remains to explore specific areas as:

- the reasons for the election/selection of female versus male committee members;
- the actual roles, power, and authority of women and men within the community structures;
- the situation of women and men as water users in comparison and in relationship to women and men as decision makers;
- the impact of women officer bearers on community participation, management, and equity in access to the water resource and other users' benefits;
- whether any traditional influence that women have had over water resources might be eroded by the new policies.

Activities to obtain information on these areas and others should be incorporated into any further project planning, monitoring and evaluation efforts, and analysis.

#### *Design and operation of water supply structures*

During the meetings on the two schemes, two women from the Ogongo-Okalongo scheme mentioned that there were no problems for them regarding the design of the WPs. One man suggested that more washing basins were needed (currently three at his WP). One woman from the Oshakati-Omakango scheme complained that there was no place to rest the clothes when finished washing.

Two women commented that the WPs were still too far away from their homes (an estimated 3-4 km) and requested additional WPs (it was mentioned that this request should be placed through the LWC).

#### **8.3.2 Within DRWS**

##### *Employment of female staff in DRWS*

Currently, 95 trained RWEOS are still in service. Of these only 18 are women. There is grave concern that less than 19 percent of the RWEOS are women, especially considering that the main collectors of water are women. This situation will possibly have major impact on the overall role of women within the WPC structures, in any decision making process at the community level, and for community management in general.

Regarding the two Dutch supported schemes, a very positive situation exists with an equal gender balance amongst the four RWEOS, with one man and one woman appointed to each scheme. It will be interesting to track the degree of participation by

women in WPCs and for the community at large on these two schemes in comparison to other piped water schemes in Cuvelai that do not have female RWEOs.

DRWS does recognise the need for recruiting more female RWEOs. They should be supported in their efforts to put this recognition into action.

#### *Awareness amongst DRWS personnel*

Amongst DRWS personnel, understanding and attitudes appear to range widely on the importance of active participation of women on any water management project: from taking it seriously and practically, to only a theoretical understanding, to only at a "lip-service" level, while some take it almost as a joke. It appears to be too easy to verbally say that it is important to think about gender balance and then just leave it at that. For example, during all discussions, at the Head Office level during this mission, "the community" was always mentioned without ever making any distinctions about who makes up "the community". Until gender issues are taken out of a box labelled "gender issues" and considered at every point of water supply and management, there is danger that the current imbalance between men and women will be accepted and continue.

#### **8.3.3 At the national level**

The WASCO workshop held on 9 November (attended only by men) decided that the issue of women's roles as discussed at the Swakopmund workshop should be turned into a declarative statement. Thus the following will be incorporated into policy:

"11. It will be ensured that women are included as full partners in the planning, development, management and decision making of rural water supply."

WASCO and DRWS should be supported in their efforts to develop and implement plans and actions that will cause this policy statement to go beyond only policy.

#### **8.4 Technology and service level**

In view of the non-availability of other water sources, the technology seems to be appropriate; the sustainability in terms of supply, costs, community management and technical upkeep will be tested during the entire backstopping period.

It is expected that people use in the rainy season also other water sources including rainwater, groundwater, surface water. It will be looked into how this use and the interrelation with the use of piped water supply can be studied.

There is a trend and a preference towards higher service level, that can be shorter walking distances (to 1 km), house connections and private connections so that water can be used for economic purposes as well.

#### **8.5 Operation and Maintenance (O&M)**

The technical quality of the physical structures of water system of Ogongo-Okalongo is fine; that of the Oshakati-Omakango scheme is being upgraded by DRWS, the First Mission Report gave details on faults.

The schemes and WPs do not face maintenance problems as they have been well constructed and as they are completed in 1994.

About two out of three WPC caretakers on the Ogongo-Okalongo scheme were trained directly after the First Backstopping Mission, an commendable achievement by DRWS staff. Training was carried out by Control RWEO, RWEO and DWA Maintenance Team staff. As WPCs along the Oshakati/Omakango scheme were being established, caretakers had not yet been selected. Training of caretakers by DRWS-MT is envisaged soon after they have been selected. See also remarks on MT section 8.1.

Proper operation of the WPs needs attention, as bibcocks are wearing quickly. The availability and purchase of spares from hardware shops seems not to be a problem for the WPCs as yet. The WPCs with support from the RWEOs have to monitor the condition of the WP, and the performance of the caretaker. These issues will be addressed in the monitoring schedule for WPCs.

The O&M of the two schemes is now still being done by the DRWS-MT. During the next Backstopping Mission the timing for transferring this to the LWCs and their caretakers is to be discussed. Obviously, the formal and on-the-job training of CTS of the LWCs has to be developed, programmed and implemented before mid 1996.

## 8.6 Cost recovery

The issue of cost recovery ranks high on the agenda of the DRWS. In the first week of November a workshop had been held in Swakopmund to discuss this issue with governors, councillors, DRWS-, donor-, and NGOs' staff. The main objectives of this workshop were to discuss how to achieve partnership between DRWS and the people, how to reach ownership, and how to introduce the policy of payment. The workshop proceedings are out including Pricing Statements and Strategy Formulations. The Proceedings were accepted by the WASCO with minor amendments. The Workshop recommendations will be formulated as discussion points by DRWS for further consultations at the regional level (RDCs, REMCs, CWCs) using a questionnaire approach. After reviewing the responses from the regions, the final cost recovery strategy can be formulated for approval by the Cabinet.

Major cost-recovery issues of the Swakopmund Workshop include:

- human domestic water supply needs will take priority over livestock requirements; livestock needs will be based on the natural carrying capacity of grazing land;
- a "Natural Resource User Fee" will be levied on owners of livestock in excess of subsistence levels;
- "lifeline" subsidies at LWC and WPC level;
- cross-subsidization at WPC level for "lifeline";
- cross-subsidization at higher decision-making levels for economic reasons

It would be worthwhile to consider differentiation of water supply tariffs with cross-subsidization from the more affluent consumers to the poorer sections of the society. Tariffs may differentiate per urban and rural areas, and in rural areas per type of supply: water point supply or yard/house connections. Further categorization may be done to reach a good equity.

Two other issues were raised in our discussions:

- people should be informed on the construction costs of the scheme, and other components of the water supply (per capita investment costs), to indicate the contribution from the GRN side; as a suggestion representatives from CWC,

LWCs and WPCs could be shown the water supply system from the intake at Calueque to the treatment and pumping stations at Ogongo;

- people should be informed during the planning of the scheme on the eventual costs they have to pay, but that this tariff level will be reached after several years only. There also the subsidy of the GRN during this transition period is indicated.

In the pilot schemes improved communication on costs will be tested for improved understanding and willingness to pay. Methods of communication and testing remain to be decided.

For the time being, only the O&M costs of the WPs are being recovered at from the consumers by some of the WPCs. The next step of recovering costs of O&M of the scheme (branch lines) will be introduced (in the pilot schemes) when the LWCs have been trained and are assuming their tasks including appreciated support to the WPCs. The development/demonstration schemes should give room for earlier but well-thought introduction and experimenting of approved policies.

Many WPCs in the Ogongo-Okalongo scheme and some (where WPCs were established) in Oshakati-Omakango scheme, are collecting financial contributions from the households either on an ad-hoc basis or on a regular monthly basis. The level of contribution varies and is not based on any logical reason, such as the actual cost or expense. There are some WPCs along the Ogongo-Okalongo scheme that have opened bank-accounts in Oshakati.

When WPCs and LWCs have only to arrange for the O&M of the WPs and the schemes respectively, these costs will obviously be very low direct after construction, but gradually the O&M costs will increase due to age of the WPs and schemes.

The sustainability issues of cost recovery and financial management at water points and schemes have been further analyzed, see appendix 12, table 3.

## **8.7 Community Management**

### **8.7.1 Ownership**

The issue of ownership remains a problem for some community members. This unclarity gives rise to no-payment of demanded contributions, low authority of WPC members etc. The suggestion was given to include local leaders in the WPC while this may also have the risk of too strong control or misuse by this authority.

At present there is user-ownership of facilities although full ownership is aimed at, but for the time being difficult. Now the agreement between MAWRD and the LWC is merely a gentlemen's agreement. It seems not possible to donate government property to citizens, but would 100% subsidization would be possible?

The new Water Act (being formulated by DWA) will include the legal entities of Local Water Board and Water Point Board, which can legally manage the assets, analogue to School Boards. The Land Bill may interfere with the ownership of the water point as this may be on the land of someone; this problem has to be looked into so that water point and direct surrounding becomes the property of the WPC and the users of the water point get easement.



Advocacy on ownership (even user-ownership) is needed to community members, politicians, traditional leaders etc. to improve status of WPC. Sign-boards with names of WPC members and users may increase the identity of the WPC in the community and give clarity on users group.

### **8.7.2. Community organization**

The relationship of the WPC with the community is in several villages not yet optimal. Several reasons were identified as to why the community base of WPCs is still weak. Reference is made to the analysis the Teams made on communication in appendix 11, table 1.

For future WPCs exposure to successful WPCs (e.g. along the two demo-schemes) may help them in organizing themselves and solving the common problems. Obviously, the role of the RWEOs in this process is crucial, as every WPC again is a learning opportunity on community organization.

### **8.7.3. Community Financial Management**

Money is being collected by most established WPCs but method of collection and amount differs. Some WPCs in the Ogongo-Okalongo scheme collect already money from users for O&M of WP. Presently, the often collected amount of N\$ 2/month per household is probably sufficient for this O&M. But it is unclear how much is needed for O&M of scheme, and for operational costs of LWC, and for costs in the subsequent financial phases. This needs further assessment. (see also section 8.6) Principally, it is upon the WPC to set the tariffs for individuals and arrange for cross subsidy so that households with low or no income can still get the benefits from the improved water supply.

The Swakopmund workshop is a good step ahead in the promotion, advocacy and acceptance of the full payment for supply of water policy. However, the Workshop did not address the community-based financial management issues.

The second phase of the cost recovery, being payment for O&M of the scheme, may be introduced towards the end of 1996. Thereafter the payment for operational and organizational costs of the LWCs will be introduced in the two pilot schemes. This will depend on the success of payment for WP-O&M in the two pilot schemes; therefore the money collection and payment is to be monitored. The introduction of payment of operational and organizational costs of LWCs depends on the appreciation by WPCs of the LWCs as an indispensable committee greatly contributing to their success. The development/demonstration scheme status should give room for earlier but well-thought introduction and experimenting of approved policies.

As mentioned under 8.6 Cost Recovery, people should be informed on (i) the construction costs of the scheme, and other components of the water supply (per capita investment costs), to indicate the contribution from the GRN side; and (ii) on the indicative, eventual costs they have to pay, but that this tariff level will be reached after several years only. This should already have been done during the planning of the scheme. There also the subsidy of the GRN during this transition period is indicated. Unfortunately, this was not done during the planning of the two pilot schemes. The Backstopping Mission is very concerned about this issue.

#### **8.7.4. Community-based Operation and Maintenance**

No problems in O&M were identified during this Backstopping Mission. The systems are all very new and the job of the caretaker is very limited still. It was noted that local arrangements were made on the hours of operation.

Some O&M problems envisaged may be beyond the technical capacities of the caretakers at WP level. For such problems arrangements have to be made with either LWC-caretakers or private plumbers.

#### **8.7.5. Operational capacities and capabilities**

Generally the capacities of the WPCs, including the CTs, the LWCs and the CWC need continued attention. Training will be provided by respectively RWEOS, technicians and the chief RWEOS. The functioning of the CWC has an important political component and deserves separate attention.

#### **8.7.6. Monitoring**

No monitoring is being done in the WPCs and LWCs in the two schemes. The development and establishment of a community-based monitoring system is one of the tasks of the Teams and the RWEOS for the coming period; detailing will be done with the WPCs. The following issues may be included: consumption; cost recovery; number of users; condition of WP; performance of caretakers.

### **9. MONITORING**

A strategy paper with examples of indicators on monitoring at different levels has been developed but not being made operational as yet. Furthermore, based on this strategy paper consultants developed and extensive monitoring system. The proposed system contains mainly forms and a computerized databank for monitoring of physical features (type of systems, water consumption, breakdown, repairs, costs, etc). Issues on community management, community participation, relationships between communities etc. are not included.

As the WPCs will soon all be established in the two schemes, a monitoring system, at WPC, LWC, and RWEOS (regional) level, using the indicators from the strategy paper and the Consultants' monitoring system (where found appropriate) will be developed, discussed, and tested in the two schemes and the DRWS office Cuvelai.

Issues on monitoring at both WPC/LWC and DRWS level have been further analyzed in table appendix 11, tables 4 and 11.

## **10. ENVIRONMENTAL SUSTAINABILITY**

### **10.1. Some aspects of the problem**

Land tenure in the Cuvelai Region is communal; the people graze their cattle on the open and extensive undivided land. The power over the land is legally with the regional Governor and the executive committees of the representative authorities. Chiefs and Headmen, however do hold strong traditional authority on tenure matters and are often being consulted by the government. The land tenure issue is under investigation by Government.

It is this strong local base in the governance of the communal lands that has led to limited control over the natural resources. Despite the vulnerability of the environment in the Cuvelai, no holistic planning with conservation measures has been developed. Due to population growth the numbers of cattle have increased and also pressure on trees and shrubs suitable for firewood, timber and browsing. This process has been accelerated by the fact that grazing areas in Angola are no more accessible and that improved water supplies made the herds no more depending on the traditional water resources which previously determined the trek.

On village level mention was made of large numbers of cattle coming to the water points from other areas. And due to the traditions in the communal lands on hospitality and resources sharing no cattle can be refused water, grazing or browsing; this is regarded as a problem difficult to handle for the local communities. A peculiar problem are the tens of thousands of donkeys in the Cuvelai area who freely roam around.

Another new phenomenon, most likely originating from the depleting natural resources is the fencing-off of land in the communal areas and claims on land title, both by local dwellers as well as by would-be landowners who do not live in the area.

The increased pressure on the land in the Cuvelai by people and their cattle was confirmed during discussions with WPCs. The resulting overgrazing caused a reduced vegetation cover and increased erosion and in later stages irreversible bush encroachment, whereby gradually grasses are replaced by shrub species. Excessive overgrazing will also lead to poorer recovery after the periods of drought, which are so common in Namibia.

### **10.2. Mitigation of the (undesired) effects of improved water supply in the Cuvelai**

The environmental problems in the Cuvelai need be approached from two levels:

1. there should be full knowledge and understanding about the problem by the communities. The WPCs and LWCs will have to play a key role;
2. the responsible authorities on the local and central level should grasp the scope and causes of the environmental problems in the Cuvelai. This applies specifically to the CWC, Governor, the MAWRD and the Ministry.

The first step towards environmental management in the communal areas is to establish jointly with the community simple procedures to monitor what is happening with their natural environment in their direct surroundings. Particularly the RWEOs and the WPCs will assist the communities to develop an environmental monitoring capacity. The following steps are envisaged:

1. in the RWEO-training course the module dealing with environmental management may need review in order to ensure that community level monitoring is included;
2. formulating of operational learning objectives in the course concerning environmental monitoring;
3. making the environment an issue, to be discussed. Rain gauges and cameras (??) to compare the condition of the vegetation cover be used and display boards provided. Those with many heads of cattle to be approached for environmental education;
4. assistance by RWEOs to communities to develop environmental indicators which are locally felt to be most relevant; often indicators are unclear and difficult to measure objectively and verifiably;
5. development the capacity and authority of the community to take (realistic) preventive and curative measures, through legislation and enforcement;
6. awareness building about the need to start ranging schemes for controlled grazing and browsing in the communal areas. The issue of the legal status of the community' committees in order to reinforce decisions on land tenure and water management comes to the fore here.

By introducing locally based monitoring seven questions need to be asked (after M. Seely, personal communication):

1. who is ultimately responsible for the exercise?
2. who is going to manage the data now and in future?
3. who will establish the format of the data collection process and resultant analyses?
4. who will interpret the monitoring data, who will have access to it and will formulate recommendations?
5. budget available?
6. time frame available?
7. who will evaluate the overall monitoring and formulate recommendations?

These question touch on issues beyond the scope of community members and their committees. It is in particular the responsibility of the MAWRD and the Ministry of Environment and Tourism (Directorate of Environmental Affairs) to deal with these questions. It is suggested to request for an representative of the Ministry of Environment and Tourism to participate for a number of days in the mission. With an adequate mandate of the two ministries the mission could discuss the need for and institution of a locally based environmental monitoring activity.

## 11. TRAINING DEVELOPMENT

### 11.1 DRWS Training Activities under pressure

Most people within DRWS clearly recognise the importance of having a sound and effective training programme and its impact on the entire community participation and management process. Thus informal assessments of the training programme will continue throughout the life of the Backstopping Missions, including the facilitation of discussions between the training division and other DRWS personnel.

Training within the DWA was and continues to be under considerable pressure and it is not certain whether the training programme as it was carried out during 1995 can be maintained during 1996. The problems are resulting from (i) shortfall of funds during the 1994/'95 financial year and (ii) personnel constraints. These problems are related to: approving annual budgets without detailed action plans, allowing budgets to rise too fast without assuring the personnel to cope with the work load, non-commitment of donors to their initial pledges. Further reference is made to appendix 11, table 10. The Training Needs Assessment report is still under review. The training budget for 1996/1997 is N\$ 3.5 million.

The personnel situation in the Training Section is a problem as this section is really understaffed in view of the many activities planned and the urgent need for training at all levels. The Training Section has an establishment of eight posts with only three posts being filled presently. Of these three only one is a DRWS staff member but has no experience in community related training. The present Training Coordinator is a Namibian consultant, paid by GTZ. The third member of the team is a VSO volunteer, who recently joined the Training Sector and has not much experience. It is therefore of crucial importance that the present Training Coordinator remains in the post, as she is the only experienced staff member and will assure the much needed continuity. The Mission discussed the option of funding initially a three-four months bridging period for the consultant in which period other options can be investigated.

The difficulty to have training solidly incorporated in rural water supply programmes which do have a considerable 'hardware' component, is often felt. The felt need for water, local political conditions and donor influence tend to encourage development of the construction even though it may result in training lagging behind.

It goes without saying that this would be detrimental for the sustainability of the programme as it would directly affect the capacities and the performance of the WPCs and the LWC in particular. The former are being trained by the RWEOs and the latter by the Chief RWEO (to be started in the two pilot schemes yet).

During the Mission, a short discussion was held with four RWEOs who were participating in the T3 training at Okashana. A summary of their impressions of the RWEO training to date can be found in appendix 9. Another discussion was held with two representatives from AgriFutura and the main points of this can be found in appendix 10.

## 11.2 The DRWS Extension Service and the community management structures

The hierarchical order of RWEOs, Chief RWEOs and Control RWEO is related to the community structure whereby the WPC, the LWC and the CWC make up the community governance of the scheme. The tasks of the RWEOs are specifically related to the WPCs, the Chief RWEO relates particularly to the LWC and the Control RWEO to the CWC. This configuration shows that a lesser number of RWEOs trained will have immediately repercussions for the establishment and support to the WPCs. The same goes for the Chief and Control RWEOs. Apparently, the plan is to have the Control and Chief RWEOs responsible for the training of the CWC and LWCs, while the RWEOs will train the WPCs.

A training package for the various water committees (WPC, LWC, CWC) is in the early stages of being prepared through discussions with the DRWS Training Coordinator, DRWS Community Management Trainer, other DRWS regional and head office staff, and the Senior Community Development Officer on the WSSPOR project.

## 11.3 Strengthening of the Training Component

### *Balance is needed between training and monitoring of training*

During the course of many discussions during this second Backstopping Mission, the issue was raised concerning the hiring and training of more RWEOs versus really following-up on the existing batch of RWEOs. Apparently performance evaluations of RWEOs and other regional DRWS staff have been conducted and the results will be incorporated into the Training Needs Assessment report. Further follow-up exercises, including the monitoring of the training process itself, are being planned by the Training Section for the regional level, which will help to assess the progress of the RWEOs and the effectiveness of the training to date. It is likely that extra efforts to monitor these two activities will decrease the delivery in terms of training, particularly given the expected 1996 budgetary and personnel constraints.

Decreasing the training output, in order to benefit the monitoring, may also solve problems on the short term but certainly increase operational problems of the community structures as most of the WPCs will not have a RWEO to support them for a long time to come. Hence solutions need to be explored to develop a balance between training and monitoring.

### *Backstopping Team support in development and review of curriculum*

The curriculum of the three RWEOs training courses (T1, T2, T3) to date were briefly examined (see Appendix 11 for a summary of these). Without knowing the details of the programme, nor how the actual training was delivered, all that can be said is that the training division appears to be generally on the right track. Some specific comments and suggestions could be made, but these should be made first in a proper discussion with the Training Section. Detailed discussions were not held with the Training Section due to the training staff being involved at the T3 training at Okashana and the missions limited time schedule.

Remedial action will have to be taken in view of:

1. Training of RWEOs: continuation of the existing staff positions need to be assured. At present on both schemes four RWEOs have been deployed.
2. Training of Chief RWEOs: the support in setting up the LWC requires all Chief RWEOs to be employed and adequately trained by mid 1996.

Reference is made to problem analysis Appendix 11, Table 9.

The Backstopping Team is prepared to discuss with DGIS the process of recruitment of three more Dutch Experts, two training advisers and one Development Planner.

## **12. WATSAN FORUM**

The relationship between the DRWS and the NGOs is being intensified. Mutually it is felt that closer communication and in some cases working relations between DRWS and NGOs would be beneficial. During the meeting initiated by the mission with the regional DRWS office in Oshakati and some NGOs working in the Cuvelai it was decided that the dormant WATSAN-forum would be revitalized. A good strategy to raise the interest of the parties is to structure the meetings around a rural water supply and sanitation theme for which all parties prepare a contribution on experiences and plans.

## **13. JOINT CONCLUSIONS AND RECOMMENDATIONS**

1. Although the whole structure of community participation and community management has been well thought-through and developed in a conceptual way (strategy papers) with some issues also having more detailed working documents produced, the field application of the community management has not been done. The major reasons for this are the insufficient DRWS staffing at national, regional and local level. The DWA has incorporated the policy and concept of community-managed rural water supply as the only sustainable modality to provide water to people in rural areas. This incorporation takes time and requires a tremendous adaptation of the earlier engineering-oriented staff. Greatly appreciable efforts are being carried out by the training staff to speed up the adaptation. The established organizational structure can only be fully staffed after some three more years, as the GRN allows only a gradual increase in new staff, particularly required for the extension services at all levels.
2. In the two schemes under observation, four RWEOs have been posted, and the required Chief RWEO is expected soon to be recruited, either internally from the government or externally. The Netherlands Government has made funds available for the salaries of these four new DRWS staff for a period of three years (1995-1997). The three new extension officers have followed the present extension training courses; two of the new and the already employed RWEO have also followed a six-week course on Management for Rural Water Supply in Zimbabwe. One new RWEO still needs to go to the Zimbabwe Course. For this activity, funds from the Capacity Development Fund have been used. This increased extension service will enable the further development of structures (WPCs and LWCs) according to the community-managed rural water supply concept, urgently required to have the effectiveness and sustainability of these systems secured.
3. Furthermore, the conceptually well-structured systems (e.g. for Extension Services, O&M, Cost Recovery, monitoring etc.) for community managed rural water supply systems need to be developed, field-tested and demonstrated for further application in the schemes. As these systems are part of a dynamic environment continuous review and adaptation may be required.

4. The Teams have started with the development of a framework of most relevant elements of sustainability and risks for sustainability, at two levels: (i) at the level where the community management has to take place: WPC and LWC; and (ii) at the level where support to community management has to be given: DRWS regional and national.

Six elements of each level were identified as the most critical ones:

- ◆ for the community management level:
  1. communication
  2. authority and status of management structure
  3. cost recovery and financial management
  4. community-based monitoring
  5. operation and maintenance
  6. environment
  
- ◆ for the DRWS regional and national level:
  1. internal communication
  2. staffing
  3. interpretation of policies
  4. training
  5. monitoring and evaluation
  6. technology selection process

For these 12 elements participatory analysis have been done for problems and solutions. In a half-day workshop senior DRWS and UNICEF staff give enthusiastically their views and additional inputs. Specific activities have been formulated and a time schedule will be prepared also indicating the target dates to complete the activities and the specific timing and role of the Backstopping Mission in the development of these activities.

Draft overview sheets of the analysis of these 12 elements have been attached (appendix 11). In the coming weeks, these activity sheets will be further jointly developed by the DRWS Core Team and the Backstopping Team.



## 14. PROPOSALS

The Backstopping Team and the DRWS Core Team propose the following activities:

***A detailed Plan-of-Action jointly made by DRWS Core Team and Backstopping Team is attached.***

### ***Development and demonstration schemes***

#### ***Ogongo-Okalongo and Oshakati-Omakango schemes***

1. DRWS and DGIS/RNE agreed to give the Ogongo-Okalongo scheme the status of an "development and demonstration" scheme. Now the extension service along the Oshakati-Omakango scheme is also fully staffed, and the LWC and WPCs are expected to be soon all established and operative, it will together with the Ogongo-Okalongo scheme the most developed piped water supply schemes in Cuvelai with all WPCs established. Also this Oshakati-Omakango scheme will be further developed to make it suitable for a so-called "development and demonstration" or "learning" scheme. Community management approaches and tools will be further developed and field-tested in these two schemes.
2. The selected caretakers in the WPCs in the Oshakati-Omakango scheme and the not yet trained caretakers in the Ogongo-Okalongo scheme should be trained by the Maintenance Team of DRWS and the RWEO. The caretakers in the Ogongo scheme can be trained with immediate effect. And as some WPCs in the Oshakati-Omakango scheme still have to be established, the caretakers have still to be selected before they can be trained. However, as the RWEOs will establish the WPCs as soon as possible, the caretaker training can be done in the beginning of 1996. This will be an important step for the transfer of responsibilities on O&M at WP level from DRWS to the communities. Training programme and tools etc. will be provided by DRWS.
3. DRWS with its Core Team and supported by the Backstopping Team will further develop and introduce in the two pilot schemes a system approach at DRWS for supporting community management; such a system approach for support includes a.o. community management such as monitoring, O&M, and cost recovery.

The DRWS Core Team and the Backstopping Team will jointly review the progress of development of support systems, their introduction in the Ogongo-Okalongo and Oshakati-Omakango schemes and their functioning. Wherever needed adaptation will be proposed. The expected gradual increase in the Ogongo-Okalongo and Oshakati-Omakango schemes effectiveness and sustainability will be monitored.

### ***Requested funding Netherlands Government***

4. During this period of further development and demonstration of the two schemes, several activities will take place that have an exploring character and for which no standard procedures have been developed as yet. Such activities may include supporting training for WPCs and LWCs on financial management, monitoring etc., some limited studies on, for instance, affordability, appreciation, and other supporting issues as e.g. small constructional adaptations, WPC and LWC membership/identity items, and sign-boards. For these activities, petty cash will be needed for which DRWS cannot budget, but for which the balance funds of the Ogongo-Okalongo

scheme, being DFI 61,000, could be committed. It was proposed that the Backstopping Team will control this Fund.

### *Discussion on Ogongo and Oshakati schemes' experiences and other issues*

5. The DRWS Core Team and the Backstopping Mission will continue to discuss the experiences of the "learning" project with a wider audience.

If so requested by DRWS, the Backstopping will consider half- to one-day participatory workshops on specific topics related to the Backstopping activities.

### *Capacity Development Fund*

6. DGIS has activated the Capacity Development Fund on request of DRWS and the Backstopping Team. Four RWEOS have been trained in Zimbabwe using this fund. One RWEOS still needs to follow this course. Request for other training activities related to the two schemes and the development and demonstration of sustainable community management systems for piped water supply can be considered. Activities may include (i) training on supervisory skills for controls and chiefs RWEOS; (ii) training on participatory methodologies, participatory monitoring for field staff; (iii) training of DRWS staff involved in the two schemes in Management for Sustainability in Water supply and Sanitation Programmes; and (iv) bridging funds for the DRWS Training Coordinator.

### *Selection and orientation Dutch experts*

7. The DRWS has indicated that they would appreciate a further role for the Backstopping Team in the selection of the most suitable candidates for the three posts of technical trainer and community participation trainer, and the Chief Development Officer. DRWS has requested the Netherlands Government already to send all CVs of short-listed candidates for further consideration. The selected candidates could be briefed at IRC for their jobs in Namibia.

Timing of next mission is tentatively planned for the period June 1996, to be decided later depending on progress on Chief RWEOS recruitment, training and posting.

TABLE 1: OVERVIEW OF AGREEMENTS AND POINTS NEEDING FOLLOW-UP

Per 25.11.1995

Nr	Topic	Description	Follow-up by	Deadline	Status
1.	Reporting	Distribution First Backstopping Mission Report to DWA, Donors, and NGOs	DRWS	January 1996	
2.	Reporting	Distribution Second Backstopping Mission Report to DWA, Donors and NGOs	DRWS	February 1996	
3.	Core Team	Approach Regional Head and/or Control RWEO for participation in DRWS Core Team	DRWS	March 1996	
4.	CWC	Communicate the decision and implications to make both schemes Development and Demonstration schemes; and establish lines of communication between CWC and DRWS (Control RWEO)	DRWS	March 1996	
5.	CWC	Constitution of CWC to be finalized	DRWS and CWC		
6.					
7.	Pilot schemes	Develop a stepwise process of activities to be implemented in these schemes	Core and Backstopping Team	May-June 1996	
8.	LWC	LWCs to be represented in CWC	DRWS	June 1996	
9.	LWC/WPCs	<ul style="list-style-type: none"> <li>• LWCs and WPCs establish lines of communication between them</li> <li>• LWC to develop support structures to WPCs</li> </ul>	DRWS	June 1996	
10.	WPCs	RWEOs Determine factors for success and failure of WPCs			
11.	Training	After recruitment of Chief RWEO, he/she has to be trained all training packages, including Community Management course in Harare or Management for Sustainability course	DRWS	start May 1996	
12.	Training	<ul style="list-style-type: none"> <li>• Review draft LWC training package by Backstopping Team (Beth)</li> <li>• Finalization LWC training package by Core Team and Training Section</li> </ul>	Core and Backstopping Team	February 1996	
13.	Training	Review draft T4 training package by Backstopping Team (Beth)	Core and Backstopping Team	February 1996	
14.	Training	Training of LWCs by Chief RWEO or possible by Control RWEO with possible support from Backstopping Team (Beth)	DRWS	June 1996	
15.	Training	Training of caretakers of WPCs both schemes and caretakers of LWCs	DRWS	June 1996	
16.	Training	Training Ms Mary Isaac Itembu on Community Management of RWS in Harare	DRWS	June 1996	
17.	O&M	Determine costs estimates of (i) O&M of WP (gradual increasing); (ii) O&M of scheme (gradual increasing); (iii) O&M costs of full supply scheme; (iv) costs of water including depreciation costs (differentiation of tariffs)	DRWS and DWA	June 1996	
18.	Finance	Information on costs of investment and O&M (phased approached) to be communicated to CWC, LWCs and WPCs	DRWS	November 1996	
19.	Gender	Exploration of gender-related issues: WPC/LWC composition; roles and authority in WPC/LWC; men/women as users of water versus decision-making; effects of women committee members on performance; erosion of traditional power over water	DRWS, RWEOs and Backstopping Team (Beth)	December 1996	

20.	Monitoring	Development of monitoring structures (methodology, tools and indicators) for basic monitoring at WPC level (including e.g. consumption, cost recovery, number of users, condition of WP, performance of caretakers)	Core Team and Backstopping team, and RWEOs	April 1996	
21.	Environment	Obtain copy of the EIA of the Olushandja Dam Project from DWA (Construction)	Backstopping Team	April 1996	
22.	Environment	Approach Ministry of Environment (Oshakati office?) to participate for some days in Third Backstopping Mission	DRWS and Backstopping Team	May 1996	
23.	Hygiene	Communication between DRWS and MoHSS on proper hygiene education and water handling (also from Harneijer report)	DRWS	May 1996	
24.	Hygiene	Water handling education by RWEOs and Health staff	DRWS and RWEOs	May 1996	
25.	Mission Methods	Split up Teams during coming Missions when meeting communities (through FGDs) and other activities	Core and Backstopping Team	June 1996	
26.	Rural Water Development Fund	Find out the developments of this interesting RWDF, including procedures and criteria.	DRWS and Backstopping Team	March 1996	
27.	Calueque Dam Phase II	<ul style="list-style-type: none"> <li>• Planning and progress reports to come from DWA</li> <li>• Next Backstopping Mission, progress monitoring to be included versus planning</li> </ul>	DWA and Backstopping Team	May 1996	

Table: PROPOSED OVERALL PLANS AND ACTIVITIES RELATED TO COMMUNITY MANAGEMENT IN NETHERLANDS-FINANCED WATER SCHEMES IN CUVELAI

per 25.11.95

	Activity	Time schedule	Actors	Finance	Status
1.	<i>Ogongo-Okalongo scheme</i> Agreement on development scheme into "development & demonstration" scheme	March 1995	DRWS	nil	approved DGIS
2.	<i>Ogongo-Okalongo scheme</i> Recruitment and training of one Chief RWEO and one RWEO	March-September 1995	DRWS	see 7.	RWEO recruited; Chief RWEO not yet
3.	<i>Ogongo-Okalongo scheme</i> Training of caretakers of LWC and WPCs by DRWS and MT	March-September 1995	Training Programme by DRWS; on-Training by Maintenance Team DWA and RWEO	??	2/3 care-takers WPCs done; not yet for LWC
4.	<i>Ogongo-Okalongo scheme</i> DRWS with support Backstopping Team develop and introduce support systems for community management	March 1995-mid 1997	DRWS; DRWS Core Team; Backstopping Team	??	framework prepared
5.	Regular review of development, introduction and functioning of community management systems	continuous	WPCs; LWCs; CWC; RWEOs, Chief RWEO; DRWS; DRWS Core Team; Backstopping Team	??	ongoing
6.	<i>Oshakati-Omakango scheme</i> Reactivating LWC and WPCs; recruitment of two RWEOs; monitoring progress community management	March 1995-January 1996	as for 5.	see 7.	LWC active; two RWEOs recruited and trained; some WPCs established
7.	Request to Netherlands Government to fund the four new DRWS extension staff for three years	February/April 1995	DRWS	DFL 90,000	done and approved
8.	Request to Netherlands Government to fund purchase of transport for Chief RWEO	February/April 1995	DRWS	DFL 40,000	done, approved, not ordered yet
9.	DRWS Core Team and Backstopping Team organize workshops on experiences "learning" project	Backstopping Mission periods	DRWS Core Team and Backstopping Team	DFL 2,500	not yet done
10.	Backstopping Team organizes short workshops on specific topics	Backstopping Mission periods	DRWS Core Team and Backstopping Team	DFL 2,500	not yet done
11.	Request to DGIS to activate the Capacity Development Fund	March/April 1995	DRWS Core Team and Backstopping Team	nil	done and approved
12.	Assistance to DGIS in final selection (best three) and briefing of Dutch experts for Namibia	continuous	DGIS and Backstopping Team	to be indicated per activity	to be discussed with DGIS



## APPENDICES

1. TERMS OF REFERENCE OF THE SECOND BACKSTOPPING MISSION TO NAMIBIA
2. ITINERARY OF THE SECOND BACKSTOPPING MISSION TO NAMIBIA
3. LIST OF PEOPLE MET DURING THE SECOND BACKSTOPPING MISSION TO NAMIBIA
4. OVERVIEW OF DUTCH FINANCED WATER PROJECTS AND ACTIVITIES IN NAMIBIA SINCE 1900
5. DRWS STAFF CAPACITIES AT NATIONAL AND CUVELAI REGIONAL LEVEL
6. OVERVIEW OF THE DIFFERENT COMPONENTS OF THE INTAKE WORKS, CANALS AND STORAGE DAMES AT CALUEQUE AND OLUSHANDJA
7. MONTHLY CONSUMPTION FIGURES FOR THE OGONGO-OKALONG SCHEME
8. AGREEMENT BETWEEN MAWD AND LWC
9. SUMMARY OF DISCUSSIONS BETWEEN TWO BACKSTOPPING TEAM MEMBERS AND FOUR RWEOS ATTENDING T3
10. SUMMARY OF DISCUSSIONS BETWEEN ONE BACKSTOPPING TEAM MEMBER AND TWO REPRESENTATIVES FROM AGRIFUTURA
11. TABLES RESULTING FROM TEAMS' ANALYSIS ON ELEMENTS OF AND RISKS FOR SUSTAINABILITY

APPENDIX 1

TERMS OF REFERENCE OF THE SECOND BACKSTOPPING  
MISSION TO NAMIBIA

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## Second Backstopping mission to Namibia November 1995

- to assess the recent developments in the water supply sector and related sectors as water resources, sanitation and environment with the relevant authorities at national and regional level
- to assess through field visits progress of the Netherlands-supported water activities: (i) the two piped water supply schemes; (ii) Olushandja water works and dam (Phase II); and (iii) rehabilitation of Calueque intake structures (Phase II); and also to make a concise financial statement of the Netherlands-supported water activities
- to discuss the progress of proposed activities during the First Backstopping Mission
- to discuss methodologies to re-activate LWC and WPCs along Oshakati-Omakango scheme, vis à vis presence of RWEOS and assess operational level of LWC and WPCs along Ogongo-Okalongo scheme
- to develop methodologies and detailed action-plans for the development and establishment of community management systems including community-based monitoring
- to develop methodologies and detailed action-plans for the development and establishment of community management support structures including monitoring
- to develop methodologies for monitoring of (i) "development and establishment of community management systems" and (ii) "development and establishment of community management support structures"
- to discuss rural water supply sector issues with other donor-supported projects staff while in the North of Namibia
- to propose further activities to be financed through the "Capacity Development Fund"
- to jointly present the DRWS Core/Backstopping Team's preliminary findings to DRWS and if preferable to a selected group of professionals of related sectors (water, community development, health, environment) for discussion and follow-up
- to jointly present the DRWS Core/Backstopping Team findings, conclusions and recommendations of Mission to donors to the rural water supply sector and discuss water sector developments and inputs from donors at meeting at and chaired by the RNE

- to discuss and agree on follow-up activities by DRWS core team and DRWS staff, and the Backstopping Team itself, on the joint mission findings; these activities have to be endorsed by DRWS and RNE
- to discuss and agree on the future backstopping missions and interim activities: scope, methodologies, activities, fields of attention and timing, also in relation to the IRC's contract with DGIS; these planning and activities have to be endorsed by DRWS and RNE
- to produce a brief report on the mission's agreed findings, recommendations and follow-up

APPENDIX 2

ITINIRARY OF THE SECOND BACKSTOPPING MISSION  
TO NAMIBIA

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## ITINERARY

ADV/Namibia 228

Second Backstopping mission to Namibia November 1995

from 14 to 24 November 1995

- Mon 13 Nov travel Amsterdam - Windhoek
- Tue 14 Nov noon arrival Windhoek  
14:30h discussions DRWS Core Group  
16:00h joint discussions with Ms Wolters RNE  
Windhoek
- Wed 15 Nov travel to North by DRWS car  
p.m. discussions with DRWS staff of Cuvelai Region  
in Oshakati  
p.m. Teams' meeting<sup>1</sup> - daily wind-up
- Thu 16 Nov  
a.m. visit Oshakati-Omakango and Ogongo-Okalongo  
schemes and (informal) meeting with some  
members of LWCs and WPCs  
p.m. continue  
p.m. Teams' Meeting - daily wind-up
- Fri 17 Nov  
a.m. meeting with DRWS on water supply activities  
and systems management developments  
a.m. meeting with Bulk Water Supply Cuvelai  
p.m. meeting with ESAs' supported project staff:  
WSSPOR; UNICEF (?); NGOs (?)  
p.m. Teams' meeting - daily wind-up
- Sat 18 Nov visit to Olushandja Dam/Works and Calueque  
Intake Works (Angola)
- Sun 19 Nov travel back to Windhoek by DRWS car  
a.m. visit to Oshakana and discussion with RWEOS  
trainees  
p.m. Backstopping Team discussion
- Mon 20 Nov  
a.m. participatory discussions on development issues  
among Teams  
p.m. continuing  
p.m. Teams' meeting to further analyze findings trip  
and make conclusions  
p.m. Teams' meeting - daily wind-up

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<sup>1</sup>. Teams' meeting involves both DRWS Core Team and Backstopping Team

Tues 21 Nov

- a.m. meeting with DRWS Management (briefing and suggestions)
- a.m. discussions with sector organizations in Windhoek: UNICEF; Ministry of Lands, Resettlement and Rehabilitation
- p.m. participatory discussions on development issues among Teams
- p.m. Teams' meeting - daily wind-up

Wed 22 Nov

- a.m. Teams' meeting on workshop preparation
- p.m. workshop on findings for selected professionals of DRWS, DWA, RNE and other relevant sector organizations (by DRWS Core/Backstopping Team)
- p.m. Teams' meeting - daily wind-up

Thu 23 Nov

- a.m. Teams' meeting on donor-meeting preparation
- a.m. meeting at RNE on donor-supported activities on rural water supply in Namibia: RNE; Embassy of Finland; French Cooperation; Embassy of Germany; UNICEF; others...
- p.m. Teams' meeting on preparation summary report and Plan-of-Action for DRWS
- p.m. Presentation Draft Summary report and Plan-of-Action to DRWS Management
- p.m. Teams' meeting - daily wind-up

Fri 24 Nov

- a.m. final debriefing to DRWS and agreement on follow-up
- a.m. final discussions with RNE on follow-up
- noon departure for South Africa

Sat 25 Nov

arrival in Amsterdam

APPENDIX 3

LIST OF PEOPLE MET DURING THE SECOND BACKSTOPPING  
MISSION TO NAMIBIA

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## LIST OF PEOPLE MET DURING THE SECOND BACKSTOPPING MISSION

Department of Water Affairs

- Mr. Richard Fry - Deputy Permanent Secretary  
(Directorate of Rural Water Supply)
- Mr. Pita Nghipandulwa - Director of DRWS
- Mr. Lutz Ebrecht - Deputy Director DRWS South
- Mr. Jürgen Eysselein - Deputy Director DRWS North
- Mr. Sjaak Zijlma - Control Engineering Technician
- Mr. Abraham Nehemia - Control RWE0, Cuvelai Region
- Mr. Godfrey Tjiramba - Development Planner, DRWS
- Mr. Willy Iiyambo - Regional Head, Cuvelai Region
- Mr. Fenias Elago - RWE0 Deputy, Cuvelai Region
- Ms. Mary Isaac Itembu - RWE0, Oshakati-Omakango scheme
- Mr. Wally Schmidling - DWA - Bulk Water North (Oshakati)

Several RWE0s attending T3 at Okashana

Others

- Ms. Geeskelien Wolters - RNE Delegate
- Mr. Matthijs Everard - RNE Head Administration
- Mr. Harst Gebauer - Embassy of Germany
- Mr. Jean Pierre LaHaye - Adjoint du Chef, Mission Française de  
Cooperation et d'Action Culturelle
- Mr. Philippe le Lourd - Programme Officer, Office  
International de l'Eau
- Mr. Ken Gibbs - Water and Sanitation Officer, UNICEF
- Ms. Frances Chinemana - Project Officer Area-Based Intergarted  
Programmes, UNICEF
- Dr. Mary Seely - Director, Desert Research Foundation

- Dr. Jan A. Huesken - Advisor in Land Use Planning, Ministry of Lands, Resettlement and Rehabilitation
- Ms. Lindi Kasambaue - Director Namibia Development Trust
- Mr. Colin Usurua - Manager AgriFutura
- Mr. Hentie Spangenberg - Manager: Training AgriFutura
- Mr. Gideon Kathima - Field Coordinator, WSSPOR
- Ms. Rose M. Sheehama - Project Officer, Namibia Development Trust
- Mr. Chappel Hankongo - Project Officer, Doicese Odibo
- Mr. J. Nakashole - Project Officer, Cooperation for Development
- Mr. Henk van der Leest - Project Manager, WSSPOR

LWC members of the Ogongo-Okalongo and Oshakati-Omakango schemes

WPC members of WPs along the two schemes

DWA Pump and Plant Operators of the Calueque Intake and Pumping Works



APPENDIX 4

OVERVIEW OF DUTCH FINANCED WATER PROJECTS AND  
ACTIVITIES IN NAMIBIA SINCE 1900

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## **NETHERLANDS-SUPPORTED WATER PROJECTS AND WATER-RELATED SUPPORT ACTIVITIES IN NAMIBIA**

The Netherlands government has been involved in a number of water projects and water-related support activities in Namibia since 1990:

- ◆ Rehabilitation of Calueque dam and Olushandja reservoir phase I (1990)
- ◆ Rehabilitation/upgrading of water purification plant at Ogongo (1991)
- ◆ Construction of rural piped water scheme Oshakati/Omakango (1991)
- ◆ Provision of three integrated experts in DWA (1992 onwards)
- ◆ Construction of rural piped water scheme Ogongo/Okalongo (1993)
- ◆ Baseline survey for socio-economic information in Owambo (1993)
- ◆ Rehabilitation of Calueque dam (phase b) and Olushandja reservoir (phase a) phase II (1994) (phase a is being implemented)
- ◆ Mission on hygiene education and sanitation in relation to rural water supply (1994)
- ◆ Backstopping missions on rural water supply projects (1994 onwards)
- ◆ Publication "Water, Namibia's most precious resource" (1994)
- ◆ Groundwater Recharge and Evaluation Study (1994) (identified activity)

APPENDIX 5

DRWS STAFF CAPACITIES AT NATIONAL AND CUVELAI  
REGIONAL LEVEL

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**APPENDIX 5**

**DRWS STAFF CAPACITIES AT NATIONAL AND CUVELAI REGIONAL LEVEL**

The following tables give overviews of the staff capacities of DRWS at national and Cuvelai regional level against the establishments. The Administrative and Auxiliary staff are not included.

DRWS National level: functions	Posts established and adjustments	Posts filled (31.12.95)	Posts filled (30.06.96)	Posts filled (31.12.96)	Posts filled (30.06.97)	Posts filled (31.12.97)
Director and Deputy Directors	4	4				
Chief Control Engineering Technician	5	?				
Control Engineering Technician	8	?				
Chief Engineering technician	8	?				
Engineering Technician	16	?				
Survey Officer	1	?				
Chief Works Inspector	2	?				
Works Inspector	7	?				
Chief Development Planner	1	vacant				
Assistant Development Planner	10	2				
Control Instructor	1	vacant				
Chief Instructor	3	1 (Leoni)				
Instructor (A or B)	4	1 expat				

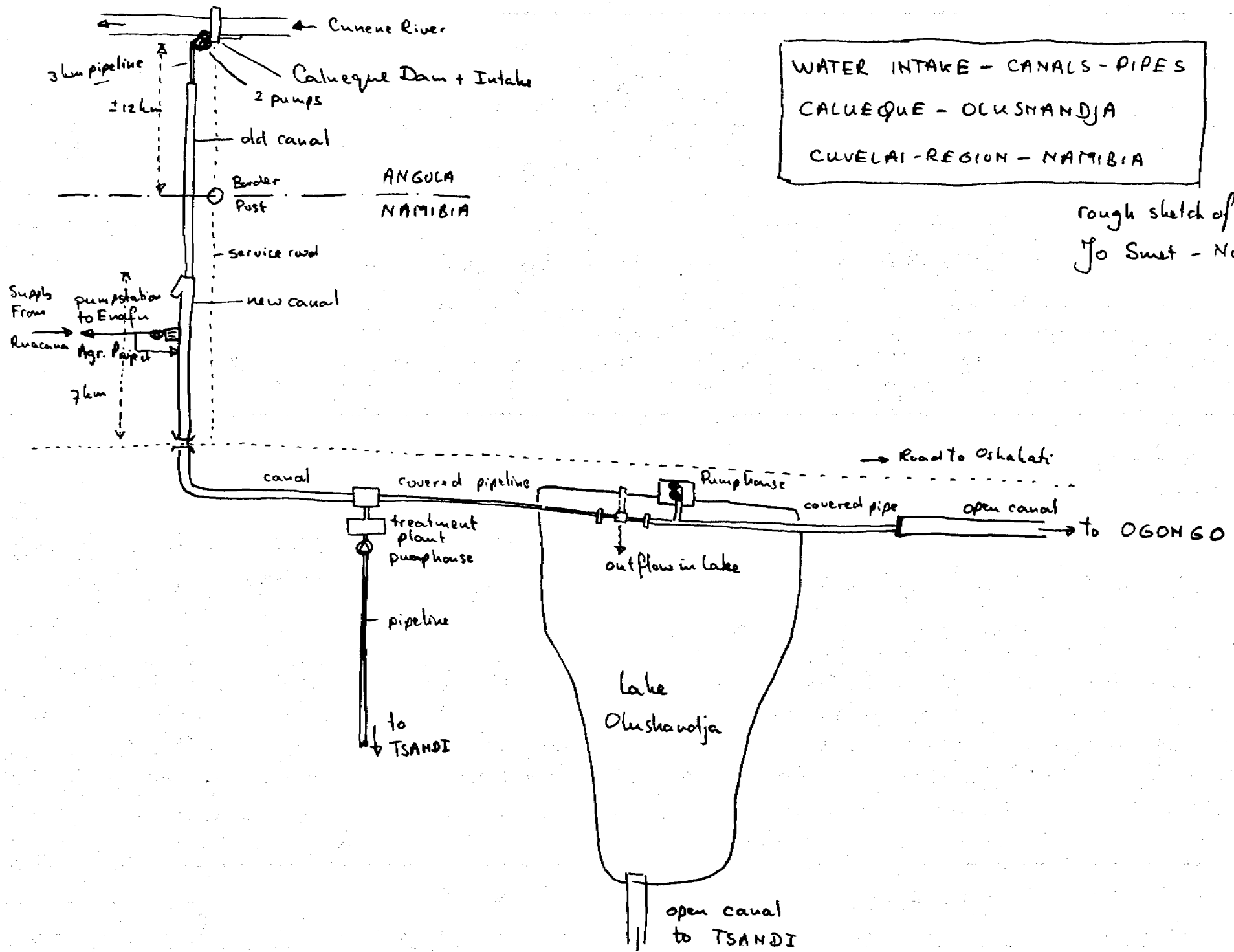
For the Cuvelai Region:

DRWS Cuvelai Regional level: functions	Posts established and adjustments	Posts filled (31.12.95)	Posts filled (30.06.96)	Posts filled (31.12.96)	Posts filled (30.06.97)	Posts filled (31.12.97)
Chief Engineering technician	1 (10) <sup>2</sup>	1				
Control RWEO	1 (10)	1				
Chief RWEO	2 (20)	0				
RWEO	25 (231)	?				
Senior Artisan Foreman	1 (10)	?				
Artisan Foreman	1 (10)	?				
Artisan (A and B)	5 (40)	?				
Handyman Senior	12 (86)	?				
Workhand	16 (118)	?				
Labourer	22 (198)	?				

APPENDIX 6

OVERVIEW OF THE DIFFERENT COMPONENTS OF THE  
INTAKE WORKS, CANALS AND STORAGE DAMS AT  
CALUEQUE AND OLUSHANDJA

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WATER INTAKE - CANALS - PIPES  
 CALUEQUE - OLUSHANDJA  
 CUVELAI-REGION - NAMIBIA

rough sketch of situation  
 Jo Smet - Nov 1995

APPENDIX 7

MONTHLY CONSUMPTION FIGURES FOR THE OGONGO-  
OKALONG SCHEME

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## SECOND BACKSTOPPING MISSION NAMIBIA -- NOVEMBER 1995

MONTHLY CONSUMPTION FIGURES FOR THE OGONGO-OKALONGO SCHEME  
(measured at Ogongo)

Month and year	meter reading	monthly consumption
September 1994	112,490	
October	141,236	28,746
November	no data	average 9,523
December	no data	average 9,523
January 1995	no data	average 9,523
February	no data	average 9,523
March	188,853	average 9,523
April	199,757	10,904
May	208,290	8,533
June	220,561	12,271
July	232,769	12,208
August	249,851	17,082
September	268,671	18,820
October 1995	289,846	21,175

Assuming that the 30,000 people in the area are all consumers, the minimum consumption of 10 lcd would give a monthly consumption of  $30,000 \times 10 \times 30 = 9,000,000$  l or  $9,000$  m<sup>3</sup>. Institutional consumption is not incorporated as this may be rather small.

Consumption per LSU<sup>3</sup> is set at 45 l/d. In the month of October 1994 with the highest consumption, about 20,000 m<sup>3</sup> was consumed by livestock. So about  $20,000,000 : 45 = 15,000$  LSUs were using the piped water supply.

Assuming an average of 7.5 members per household and 30 LSUs per household (at design consumption rates of 45 per LSU/d and 25 lcd), the total consumption for the Ogongo/Okalongo scheme would be 6,150 m<sup>3</sup>/day or 184,500 m<sup>3</sup>/month.

The designed capacity of the scheme is 3490 m<sup>3</sup>/day. For livestock the basis was the grazing capacity of the area, i.e 0.08 km<sup>2</sup> per LSU, which led to an allowance of 8545 LSUs. In the actual situation, this figure may be substantially higher.

<sup>3</sup>. LSU = Large Stock Unit

APPENDIX 8

AGREEMENT BETWEEN MAWD AND LWC

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*Copy of signed agreement*

# **A G R E E M E N T**

**BETWEEN**

**O G O N G O - O K A L O N G O**

**LOCAL WATER COMMITTEE**

**AND**

**DIRECTORATE OF RURAL WATER SUPPLY**

# **AGREEMENT**

**between:**

**OGONGO-OKALONGO LOCAL WATER COMMITTEE**

**and**

**DIRECTORATE OF RURAL WATER SUPPLY**

1. The Directorate of Rural Water Supply shall entrust the Ogongo-Okalongo Local Water Committee with the **USER OWNERSHIP** of the Ogongo-Okalongo Rural Water Supply Scheme
  
2. No section or part of the scheme and its facilities may permanently be removed by any of the partners of the agreement.

3. **RESPONSIBILITIES OF THE DIRECTORATE OF RURAL WATER SUPPLY:**

- to guarantee a sustainable water supply to the community,
- to employ a Rural Water Extension Officer for the area who will assist the Local Water Committee in carrying out its functions,
- to assist, through the Rural Water Extension Officer, the Local Water Committee with setting up and training Water Point Committees,
- to assist in arranging for major maintenance and repair jobs which are beyond the capacity of the local community,
- to carry out on-the-job training for the caretakers, appointed by the Local Water Committee and the Water Point Committees and
- to advise on technical and financial matters when requested

**4. RESPONSIBILITIES OF THE LOCAL WATER COMMITTEE:**

- to operate and maintain the scheme in a sustainable way
- to carry out preventive and routine maintenance and minor repairs
- to finance the operation, maintenance and repair activities from funds collected from the end users
- to set the tariff for the end users from which all activities can be financed
- to set up and train Water Point Committees, with the assistance of the Rural Water Extension Officer
- to direct the Water Point Committees to collect financial contributions from the end users
- to make sure that the scheme is well looked after,

- to ensure that all members of the community have access to the available water,
- to encourage the Water Point Committees to maintain and improve their water points,
- to direct all communications with the Government to the Rural Water Extension Officer,
- to appoint one or more caretakers, as members of the Committee, to advise and assist the Water Point Caretakers,
- to report all maintenance and repair requirements, which go beyond the capacity of the local community, to the Rural Water Extension Officer,
- to keep proper records of all income and expenditure in a Treasurer's account book, and
- to report regularly, on standard Water Committee Meeting Reports, to the Directorate of Rural Water Supply on financial and technical progress.

5. THE AGREEMENT

The Agreement is entered into voluntarily by both parties. Either party may call for the agreement to be altered at any time. If the other party does not agree with the proposed alteration, the dispute should be referred to arbitration. In each case, an Arbitration Committee is to be set up, consisting of representative of the Central Water Committee, of the Department of Water Affairs and a local Councillor. The decision of the Committee will be binding.

SIGNED ON BEHALF OF THE OGONGO-OKALONGO LOCAL WATER COMMITTEE IN

*Okalongo* ON THIS THE *27<sup>th</sup>* DAY OF *May* 19*94*

THE CHAIRPERSON *[Signature]*

THE SECRETARY *[Signature]*

THE REGIONAL COUNCILLOR (OGONGO CONSTITUENCY) *[Signature]*

THE REGIONAL COUNCILLOR (OKALONGO CONSTITUENCY) *[Signature]*

SIGNED ON BEHALF OF THE DIRECTORATE OF RURAL WATER SUPPLY IN

*Okalongo* ON THIS THE *27<sup>th</sup>* DAY OF *MAY* 19*94*

THE MINISTER *[Signature]*

THE DEPUTY PERMANENT SECRETARY *[Signature]*



APPENDIX 9

SUMMARY OF DISCUSSIONS BETWEEN TWO BACKSTOPPING  
TEAM MEMBERS AND FOUR RWEOS ATTENDING T3

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**SUMMARY OF DISCUSSIONS BETWEEN TWO BACKSTOPPING TEAM MEMBERS AND FOUR RWEOS ATTENDING T3**

The objectives of the RWEO training according to the four trainees:

1. To go out and help people with the things we have learned.
2. To learn how to make and use some tools/methods to work with the community.
3. To learn how to behave towards and work with the community.
4. To learn the steps of how to address the community.
5. To make people aware of their environment.

One most important thing that they have learned during the training:

1. How to approach the community.
2. How to make and run a community meeting.
3. Not to sympathize, but rather empathize with the community.
4. How to communicate with the community.

One main thing they have learned from the community during their field work:

1. Who to speak to first (e.g., in some cultures you cannot go directly to the headman).
2. The best time to hold meetings.
3. Include the youth in meetings to hear about government programmes and policy.
4. People expect to be paid to attend meetings or at least be given food. He tries to explain that he does not have money for this.
5. Best way to pass messages is through the radio and schools.
6. Even people who are illiterate can contribute information and ideas.

One main thing that they still need/want to learn:

1. How to pass information to old people.
2. What to do if people are not participating at all; if they do not come to meetings.
3. Solutions to cost recovery problems: what to do when some people are not able to pay.
4. More methods to pass information to people.

APPENDIX 10

SUMMARY OF DISCUSSIONS BETWEEN ONE BACKSTOPPING  
TEAM MEMBER AND TWO REPRESENTATIVES FROM  
AGRIFUTURA

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## SUMMARY OF DISCUSSIONS BETWEEN ONE BACKSTOPPING TEAM MEMBER AND TWO REPRESENTATIVES FROM AGRIFUTURA

Regarding appropriate background of RWEOs in terms of ability to absorb training information

- \* Grade 12 is best, Grade 10 okay depending on other qualities
- \* Qualities needed to be a good extension officer (and to absorb training information) include: able to talk to groups, able to present information, self-confident, leadership qualities, English language abilities. Recommend that these qualities are judged during interview/application process.
- \* The more "even" the RWEO trainees education/experience/background the easier it is to direct the training at a certain level. For example, three old people in the last T3 training have been hired as RWEOs so they can remain in government service until it is time to get their pension. They are having real trouble grasping the information and will probably not be effective extension officers.
- \* There appears to be different expectations in recruitment at Head Office and at the Regional Offices. Recruitment and identification of RWEOs should be based on the same criteria. Trainers can provide additional advice for next recruitment.

### Language Problems

- \* Even though different levels of language understanding complicates training, this is basically a fact of life of training in Namibia. AgriFutura trainers have worked out methods for dealing with the varying levels of English comprehension amongst the trainees, and therefore, do not feel that separate training should be given to English-speakers versus Afrikaans-speakers.
- \* Furthermore, trainees who struggle with English need this exposure to English so that they will be better able to access needed information that may only be available in English or be able to attend training programmes, outside of Namibia, that may be conducted only in English.
- \* If separate training is planned later at a regional level (or north/south) then language difficulties will ease-up at that time.

### Follow-up on training to date

- \* It would be important to follow-up on the existing RWEOs before hiring new ones. In this way, training can be adjusted as necessary and extension officer qualities can be assessed, before bringing on new people. Then the next RWEOs can "follow in good footsteps".
- \* The follow-up does not necessarily have to be done with all RWEOs. However, a sample should be chosen, based on location (i.e., considering cultural variability, environmental conditions, population densities, and water supply technology).

- \* AgriFutura does not know what is being planned for the T4, so they cannot comment on when the follow-up should be done (i.e., before or after the T4 training).
- \* AgriFutura would like to be involved in the follow-up exercise and in the planning of T4.
- \* Others should also be involved in the follow-up: regional heads, LWCs, WPCs, general community members.

#### Other training needed

- \* "Awareness" training for regional heads. Apparently, some regional heads do not know what the RWEО cadre is all about. RWEОs complain that they ask their regional head if they can do "such and such" and the regional head responds, "I don't know, you're the one who went through the training".
- \* Training of certain RWEОs (the ones most capable) in "training of trainers" so that they can be used as specialised trainers (see next point). They guess that may be only 25 percent of the current RWEОs are capable of learning how to be trainers and conducting any specialised training. Some of these RWEОs could also help the training staff when new RWEОs are recruited and trained.
- \* Specialised training for WPC chairs, secretaries, treasurers.
- \* Specialised training for RWEОs at the regional (or north/south) levels.

APPENDIX 11

TABLES RESULTING FROM TEAMS' ANALYSIS ON ELEMENTS  
OF AND RISKS FOR SUSTAINABILITY

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Table 3. COMMUNITY MANAGEMENT ELEMENT: FINANCIAL MANAGEMENT AND PAYMENT

PROBLEMS	SOLUTIONS	ACTIVITIES	TIME-SCHEDULE						
<ul style="list-style-type: none"> <li>lack of information on investment costs of scheme and other hardware; and operational/treatment costs</li> </ul>	<ul style="list-style-type: none"> <li>to provide per capita costs of investment of scheme and other hardware;</li> <li>to provide indicative operational costs per cubic metre (or per 20-litre bucket)</li> </ul>	<ul style="list-style-type: none"> <li>DRWS: to collect investment and depreciation costs of scheme and hardware (intake/main/treatment/ trunkline)</li> <li>DRWS: to collect data on operational costs</li> <li>DRWS: to calculate the per capita costs</li> <li>DRWS: to communicate this information to CWC; LWC and WPC</li> </ul>							
<ul style="list-style-type: none"> <li>lack of information on what eventually to pay for and indicative (range of) tariff level</li> </ul>	<ul style="list-style-type: none"> <li>to estimate gradually increasing tariffs (per cost recovery phase)</li> </ul>	<ul style="list-style-type: none"> <li>DRWS: to estimate the total cost (O&amp;M part and Bulk water tariff part)</li> <li>DRWS: to communicate this information to CWC; LWC and WPC; and WPC to communicate this to users</li> </ul>							
<ul style="list-style-type: none"> <li>lack of understanding why to collect money for at this moment and how much would be required at this phase of cost recovery</li> </ul>	<ul style="list-style-type: none"> <li>to estimate the O&amp;M costs of the WP and scheme (increasing O&amp;M per year and so increasing O&amp;M costs)</li> </ul>	<ul style="list-style-type: none"> <li>DRWS: to estimate the total yearly O&amp;M costs at WP and scheme level</li> <li>DRWS: to communicate this to CWC; LWC and WPCs</li> <li>WPC: to communicate this information to users</li> </ul>							
<ul style="list-style-type: none"> <li>lack of information on costs of water point varying per technology and service level</li> </ul>	<ul style="list-style-type: none"> <li>to estimate on the different water supply costs per technology and service level and inform people accordingly</li> </ul>	<ul style="list-style-type: none"> <li>DWA and DRWS to develop costs and frequently update figures</li> </ul>							
<ul style="list-style-type: none"> <li>lack of penalty for defaulters</li> </ul>	<ul style="list-style-type: none"> <li>to register users (households)</li> <li>to facilitate the process at the WPC to make their own appropriate decisions (e.g. traditional ways; publication of defaulters)</li> </ul>	<ul style="list-style-type: none"> <li>WPC: start listing users and type of use (cattle and/or domestic)</li> <li>RWEO: discuss with WPC traditional ways to address defaulters and/or give suggestions</li> </ul>							
<ul style="list-style-type: none"> <li>possible capacity problem regarding books records and financial management</li> </ul>	<ul style="list-style-type: none"> <li>to develop capacities on record keeping and financial management skills through LWC and WPC training programme</li> </ul>	<ul style="list-style-type: none"> <li>DRWS: develop suitable training programme and materials</li> <li>RWEO and Chief RWEO: implement training programme and monitor training effects</li> </ul>							
<ul style="list-style-type: none"> <li>(DRWS) method of introduction of payment "idea"</li> </ul>	<ul style="list-style-type: none"> <li>to structure an awareness campaign providing information as it becomes available</li> </ul>	<ul style="list-style-type: none"> <li>DRWS: design awareness campaign</li> <li>DRWS: use all available channels</li> </ul>							

<ul style="list-style-type: none"> <li>• (DRWS) lack of clarity on cost levels</li> </ul>	<ul style="list-style-type: none"> <li>• (DRWS) to estimate the O&amp;M costs and to get from Bulk Water the estimates of tariffs of water</li> </ul>	<ul style="list-style-type: none"> <li>• DRWS: calculate as accurate as possible cost levels</li> <li>• DRWS: monitor the O&amp;M costs at WP and scheme level</li> </ul>								
<ul style="list-style-type: none"> <li>• (DRWS) lack of transmitting information to community</li> </ul>	<ul style="list-style-type: none"> <li>• (DRWS) to provide cost recovery information nationally at the same time</li> </ul>	<ul style="list-style-type: none"> <li>• DRWS: to utilize all effective communication channels for information dissemination to communities</li> </ul>								







<p>5. Unclear indicators for status of environmental conditions</p>	<ul style="list-style-type: none"> <li>- Facilitate process so that community can establish indicators (i.e. disposable cameras, discussions, etc.)</li> <li>- Plan siting of WPs better with discussions between community/DRWS/agric., etc.</li> <li>- in training programme, RWEOs and trainers should be involved in establishing indicators with community.</li> <li>- Keep it simple!</li> <li>- Encourage nurseries to grow indigenous seedlings and community to plant woodlots with indigenous trees.</li> </ul>	<p>solutions are activities</p>								
<p>6. Daily pressure to use (up) natural resources (grass, trees)</p>		<p>solutions are activities</p>								
<p>7. Such a severe problem that it is "difficult to get a hold of"</p>	<ul style="list-style-type: none"> <li>- RWEOs should discuss with WPCs + discussions should be initiated amongst community members, WPCs, traditional leaders, etc.</li> <li>- Policy/'rules' established at community level</li> <li>- short + long-term solutions (strategy) should be assessed</li> </ul>	<p>solutions area activities</p>								

Table 7. DRWS SUSTAINABILITY RISK ELEMENT: INTERNAL COMMUNICATIONS

PROBLEMS	SOLUTIONS	ACTION	TIME SCHEDULE
Lack of Chief-RWEO	Advertise post (internal and external) THIS IS A PRIORITY!		
Lack of technical staff -- DRWS MT	Technical training of MT staff by Team Leader		
Situation of Control RWEO for Cuvelai Region ???	Clarify! Appointment of new Chief-RWEO??		
Lack of Development Planners (only 2/11)	Recruit Development Planners (use donor and GRN funds)		
Lack of clarity on function of Development Planners vs Chief RWEOs	Clarify function of Development Planners and Chief RWEOs		
Lack of training staff at * professional level for content * logistical level for arrangements	Recruit more training staff (using donor and GRN funds)  Discussion of RNE/BT to speed up defreezing of training staff at PSC		
Lack of communication between regional offices and head office	Agree on regular communication channels  Structure regular reporting meetings		

Table 8. DRWS SUSTAINABILITY RISK ELEMENT: ATTITUDES TOWARDS POLICIES/INTERPRETATION

PROBLEMS	SOLUTIONS	ACTIVITIES	TIME SCHEDULE
<ul style="list-style-type: none"> <li>• Personal interpretation of policies</li> </ul>	regular workshops with RWEOs, regional staff (incl.regional heads) and DRWS HQ staff (including management level staff)		
<ul style="list-style-type: none"> <li>• conflicting messages from RWEOs and Chiefs RWEO</li> </ul>	regular workshops with RWEOs and Chief-RWEOs		
<ul style="list-style-type: none"> <li>• demotivation of WPCs and RWEOs</li> </ul>	regular workshops with RWEOs and Chief-RWEOs		
<ul style="list-style-type: none"> <li>• lack of knowledge on policies (people)</li> </ul>	<ul style="list-style-type: none"> <li>• simplified summarized version of policy paper and strategy papers, only on rural water supply</li> <li>• translation in local languages when possible</li> </ul>		
<ul style="list-style-type: none"> <li>• absence of sufficiently clear policy, strategies and guidelines</li> </ul>	<ul style="list-style-type: none"> <li>• follow-up Swakopmund workshop (1st week November)</li> </ul>		



Table 9. DRWS LEVEL: TRAINING FUNCTIONS

PROBLEMS	SOLUTIONS	ACTION	TIME SCHEDULE
Training needs assessment not finalised Regional heads are not providing needed information	Provide assistance to finalise training needs assessment <i>(2 divisional heads will help to finalise)</i>	1. Needs assessment to be finalized 2. and discussed by DWA national, divisional & regional leadership for their approval	
Lack of funding until April 1996 due to donor funding being withdrawn after plan and budget had been prepared <i>Training staff does not have the time to chase funding</i>	Re-shuffle DWA's budget  Access funding from donors <i>(possibly end of year fallout)</i>	1. Communicate with regional leaders about management targets 2. Indicate which information will be required and when	
Jump in budget: lack of resources to deal with increase, possible spending pressure	Base budget on realistic training plans	1. DWA confirmation or tr. needs assessment 2. Write up of plan of action-phase wise 3. Funds seeking 4. Reschedule and adjustment of plan and budget	
Uncertain personnel situation	Assure continuity of present training staff Acquire: (i) Trainers - 6 (+2 outside); (ii) Development Planners - 5; (iii) Technicians - 14	1. Tune budget to needs assessment, organizational capacity and human resources availability	
Effectiveness of RWEO training	Monitor and evaluate performance of RWEOs and then assess effectiveness of training programme <i>(evaluation has been done on RWEOs; this will be used to assess training programme)</i>	1. Recruitment for 2 external Trainers to be completed soon 2. Recruitment for Namibian trainers to follow plan of recruitment 3. ToR of Development Planners to be clarified. Further recruitment to be scheduled and followed. 4. Technicians' recruitment to be scheduled and followed.	

<p>Risk of NGOs diverting from government policy within training</p>	<p>Revive national and regional WATSAN forums  <i>Put in place 2-way communication</i>  <i>Show appreciation to NGOs for their complementary efforts</i>  <i>Continue process of cooperation and communication which was started 1 month ago</i></p>	<p>1. Develop monitoring procedures and feedback arrangements to policy, plan and implementation  2. Develop indicators for evaluation</p>	
<p>Lack of coordination/cooperation between DRWS and NGOs regarding training programmes and materials</p>		<p>1. Watsan forum to deal with practical problems; thematic approach  2. Involve the NGOs in (national and regional) planning matters  3. Provide training opportunity for NGO-project staff, jointly with DWA staff  4. Share experience</p>	

Table 10. DRWS LEVEL: MONITORING AND EVALUATION (M&E)

PROBLEMS	SOLUTIONS	ACTION	TIME SCHEDULE
Lack of information for management	Identify minimum information requirements for management  Field test M&E system in one region and evaluate		
Lack of resources to implement	Identify required resources for minimum package		

Table 11. DRWS LEVEL: OPERATION AND MAINTENANCE

PROBLEMS	SOLUTIONS	ACTIVITIES	TIME SCHEDULE
Training of caretakers lacking	<ul style="list-style-type: none"> <li>• involve RWS Maintenance Team in training</li> <li>• provide food, drinks and logistics</li>   <li>• assess</li> <li>• assess (via C-B MID) functioning of systems and performance of RWROs on O&amp;M</li> </ul>		
construction work by community not well understood	participation of elected/appointed foreman of community workers (representing the community) in supervision		
money for O&M collected not based on actual parts prices	<ul style="list-style-type: none"> <li>• RWEOs to communicate to WPCs (caretaker; treasurer) and LWC the average price of required parts (provide current list)</li> <li>• RWEOs to communicate to WPCs/LWCs the envisaged, yearly increasing average annual O&amp;M costs</li> </ul>		
quality of tap poor	replace by best, affordable and locally available tap (best-buy)		
handling (e.g. of taps) is not always properly understood.	<ul style="list-style-type: none"> <li>• awareness raising on proper handling (operation)</li> <li>• train caretakers, and via her/him the WPCs and users (also sessions at school; also for school water supply)</li> </ul>	<ul style="list-style-type: none"> <li>• use participatory methods for discussion of these issues with the users' groups</li> </ul>	
storage tank volume indicator not well designed	leave floatball valve out of design (?? alternatives??)		

**Table 12. DRWS SUSTAINABILITY RISK ELEMENT: TECHNOLOGY SELECTION PROCESS**