

CHAPTER 13

APPLYING THE LEARNING ALLIANCE APPROACH



Photograph by Monique Mikhail.

The Learning Alliance experience in Maharashtra contains important lessons for the potential upscaling of the MUS concept in the state. By attempting implementation of MUS projects through a larger state-led drinking water scheme, the experience in India has illuminated hurdles and limitations in expanding the MUS concept through a state-government program. MUS work in India took place only in the state of Maharashtra. Therefore, the state-level government represents the “national” level for the MUS Learning Alliance in India.

Information in this document is compiled from interviews conducted in April 2007 with the following:

- IDE staff in India
- Several community members involved in their Village Water and Sanitation Committee
- Two community members involved in their Women Empowerment Committee
- Representatives of local-level NGOs (those who are acting as Support Organizations in the state drinking water projects)
- Intermediate level NGOs working at the district level in each of the three target districts
- The Block Development Officer, Satana Block within Nasik District (Kikwari is in Santana Block)
- The Nasik District Monitoring and Evaluation Specialist for Jalswarajya
- The State Aquifer Pilot Coordinator of the Jalswarajya/Aple Pani project within the state-level Water Supply and Sanitation Department
- The State Coordinator for the Water and Sanitation Program of the World Bank

THE LEARNING ALLIANCE PROCESS

SELECTING PARTNERS

In Maharashtra it is historically the government that is responsible for both irrigation and drinking water supply schemes. The irrigation systems are predominantly large-scale irrigation canals and dams, while drinking water systems are high-cost schemes built by contractors and handed over to the Gram Panchayat (elected members from the village and government Village Development Officer). NGOs have generally not been involved in scheme design or implementation until these recent state projects. However, NGOs have been involved in watershed work for the past few decades, focusing on water budgeting, water source strengthening, and conservation education as the groundwater supply in the state diminishes and wells run dry.

With IDE's small staff in Nasik, the Learning Alliance (LA) concept was incorporated within MUS activities from the onset as a mechanism for promoting MUS. In order to select LA partners, IDE staff collected baseline information about the NGOs working in Maharashtra from two sectors—those working on watershed development and those working as SOs for Jalswarajya and Aple Pani. They obtained information from existing NGO and government acquaintances to profile the various NGOs in the state, and particularly in the three selected districts. They also acquired information on the projects the government (Department of Agriculture, Department of Irrigation, and Department of Water Supply and Sanitation) was working on. IDE staff held meetings and phone conversations with representatives in 40 organizations within the three districts, giving them an overview of the MUS concept, exploring possibilities for collaboration, and inviting them to a state-level LA workshop being planned in Nasik. In these first meetings, it was determined that some of the chosen organizations were no longer working in water resources, so they excused themselves from the LA.

IDE staff also met with district-government employees to gauge government activities at the district level and see the compatibility of MUS work. Included in those meetings were the Executive Engineer from the Department of Irrigation, the Executive Engineer from the Department of drinking water Supply and Sanitation, the Jalswarajya Project Coordinator, the Deputy Chief Executive Officer of the Zilla Parishad, and the District Agriculture Officer.

The major kickoff for the LA in Maharashtra was the Introductory LA Workshop held in Nasik on March 18, 2005 (see Figure 13.1). In addition to the district-level NGOs and government officials, some partner NGOs in other states of India also attended. About 20 of the invited organizations attended. At the workshop, the MUS concept was introduced and its relevance to Maharashtra discussed. The discussion centered on the concept of the LA, its relevance for the water sector and MUS, and how it should function in Maharashtra.

BUILDING RELATIONSHIPS

State Level

After the Nasik workshop, IDE staff met with the director of the Jalswarajya/Aple Pani Project (who was also the director of the Groundwater Survey and Development Agency at the time) and the state coordinator for the Water and Sanitation Program of the World Bank to determine how MUS could be incorporated into their projects in the three chosen districts. This was the first meeting of the state-level officials of the two Projects. Unfortunately, the planning phase had already been completed and rules of operation established. And since the goal of the project was community capacity building, state-level officials directed IDE to approach communities with the MUS idea and attempt to incorporate it into the schemes.

Figure 13.1 Participants discuss MUS in breakout groups during the Introductory LA Workshop in Nasik



Photograph by Sudarshan Suryawanshi.

District Level

With this information from the state level, it was determined that the best course of action would be direct interaction with the SOs in each of the three districts. Thus, the development of the relationships IDE had begun to establish through initial contacts and meetings and the Nasik workshop became critical. The strategy was to have district-level LA workshops to build relationships and establish a functioning NGO network at the district and local levels. At these workshops, a lead organization would be identified for each of the three districts. These organizations would take responsibility for guiding the district-level LA. The other NGOs in the three districts that were acting as SOs for Jalswarajya/Aple Pani would then work with communities to incorporate MUS into their schemes.

This second round of district-level meetings included roughly 30 NGOs in the three districts along with a few government representatives, educational institutions, and other stakeholders in the Jalswarajya/Aple Pani projects (such as Technical Support Providers). NGOs were invited to the workshop in their districts. If the NGOs could not attend the workshop, bilateral meetings were held between IDE and the NGO staff. The organizations who were present at each of the workshops are listed in Table 13.1.

Table 13.1: District-level Learning Alliance workshops

District	Workshop Dates	Organization/ Representative Name	Organization/ Representative Type	Directly Involved in Jalswarajya/ Aple Pani
Nasik	March 2005	Vachan	Local watershed	
	June 2005		NGO	no
	Nov. 2005	Adhar	Support Organization	yes
			BSS	Support Organization
		Samaj Pariwartan Kendre	Local watershed	
			NGO	no
		Sahyog	Support Organization	yes
		Navnirman	Support Organization	yes
		Tehsil Agriculture Officer	Government	no
	Jalswarajya Technical Support Group consultants	Jalswarajya consultant	yes	
Ahmednagar	March 2005	SEVA	Support Organization	yes
	Sept. 2005			
		GARD	Local watershed NGO	no
	NISS	Support Organization	yes	

District	Workshop Dates	Organization/ Representative Name	Organization/ Representative Type	Directly Involved in Jalswarajya/ Aple Pani
Ahmednagar (cont.)	March 2005 Sept. 2005	Bosco Gramin	Local watershed	
		Vikas Kendra	NGO	no
		WOTR	Local watershed NGO	no
		Aikya Seva Kendra	Support Organization	yes
		Director of college Institute of Social Studies	Educational institution	no
Aurangabad	March 2005	GRASP	Local watershed NGO	no
		Janarth	Support Organization	yes
		MSSM	Local watershed NGO	no
		Mano Rural Development and Research Institute	Local watershed NGO	no
		Jankidevi Bajaj Gramvikas Sanstha	Support Organization	yes
		Jeevan Vikas Sanstha	Support Organization	yes
		Agriculture Technology Management Agency ¹	Government Agency	no

Nasik District In addition to the organizations listed in Table 13.1, staff from the Jalswarajya project were invited to the first Nasik district-level workshop but did not attend. An introduction of MUS was given in the workshop to reiterate what had been discussed in the state-level Nasik workshop. IDE staff realized at this first district-level workshop that the message about MUS had not fully reached all of the participants at the state-level workshop. Many of the attendees were confused about the MUS concept and how it could actually be implemented. It was decided that collection of information about de facto MUS systems in the district would help the local NGOs crystallize their conceptualization of MUS. The NGOs BSS, Adhar, and Navnirman showed the greatest interest at the workshop. They agreed to encourage the communities they worked with (about 12–15 villages total) to add a kitchen-garden component to their projects. They would recommend the use of excess drinking water along with IDE’s “family nutrition” drip irrigation kits for application. The family-nutrition kit was demonstrated at the workshop, and IDE agreed to give a more formal training to the NGOs and communities jointly. Since IDE was based in Nasik, it would assume the leadership NGO role for the LA in this district. Kikwari and Samundi villages were chosen to become pilot MUS projects in Nasik District.

Ahmednagar District The Ahmednagar District workshop was organized with the help of SEVA, who was emerging as a strong district leader. The meeting was similar to the one in Nasik with a reiteration of the MUS concept, discussion of MUS activities in the district, and demonstration of the family-nutrition kit. The four NGOs that displayed the most interest in Ahmednagar District were SEVA, GARD, NISS, and WOTR. They agreed to promote the installation of kitchen gardens with the family-nutrition kits in about 20 villages amongst them. Despite the fact that GARD and WOTR were not directly working with Aple Pani, they decided to remain involved in the LA. SEVA decided to take on the leadership role for the LA in Ahmednagar with technical support from IDE.

Aurangabad District In Aurangabad, IDE relied on the assistance of a water-conservation consultant to organize the workshop in the district. He initially showed interest in MUS, but upon realization that there was no employment opportunity, he withdrew. The program for this workshop was the same as the other two districts’, although the meeting proved less fruitful. None of the NGOs present were interested in leading the LA for the district. This was largely due to the choice of organizations that the consultant had selected to invite to the workshop. He had failed to invite Dilasa, the Capacity Building Consortium (CBC) organization for Aple Pani in Aurangabad District. Six months later, Dilasa was working with IDE on another project and came to learn about MUS. They were very interested in the project because of their

role in Aple Pani and also due to their extensive watershed development work. Six months after the Aurangabad LA meeting, Dilasa became the lead organization for Aurangabad District.

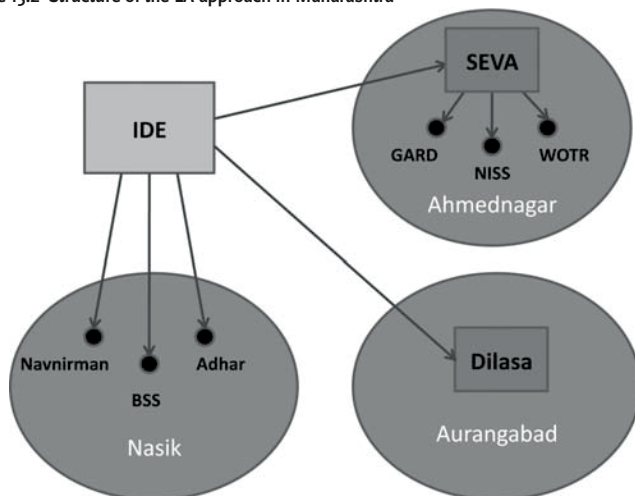
Community Level

Once coordination with the NGOs in the district was established, the focus turned to the local level. Meetings were held with local-level stakeholders—the Village Development Officer, the GP, the three community committees established through Jalswarajya/Aple Pani, and the local Support Organization. Meetings were held in four villages in Ahmednagar, four villages in Nasik, and one in Aurangabad. The purpose of these visits was to assess the planned activities of Jalswarajya/Aple Pani, introduce the MUS concept, and discuss the practicality of kitchen gardens. All villages approached were pleased by the idea and said they would establish the kitchen gardens and use extra water from the water scheme to irrigate once the scheme was completed. After these initial community meetings, IDE focused on building relationships with the stakeholders in the two model villages of Kikwari and Samundi for Nasik District. Partners in the other two districts were simultaneously taking on this task in their own districts. The structure of the LA efforts in the three districts can be seen in Figure 13.2.

SHIFT FROM “ADVOCACY” TO “FACILITATOR” MODE

Because of IDE’s small reach in Maharashtra, the advocacy role was necessary to spread the idea of MUS, while building the capacity of local partners was essential in reaching more villages for implementation. The lead organization

Figure 13.2 Structure of the LA approach in Maharashtra



for each district was meant to shift quickly from the advocacy role to the facilitator role in order to have further reach and quicker scaleup. However, the advocacy mode took longer than anticipated in Maharashtra because of the inability of partners to truly grasp the concept of MUS. Several meetings were held with both individuals and groups, but in each of the meetings the concept had to be recapped. IDE is just now entering the facilitator mode, particularly with Dilasa, SEVA, and the Water and Sanitation Program within the World Bank. And advocacy of the concept still continues.

BUY-IN AT THE VARIOUS LEVELS

Although some level of buy-in at the state level was required for MUS implementation through Jalswarajya/Aple Pani, state officials did not fully support MUS. This was due to lack of flexibility in the already-established Jalswarajya/Aple Pani process. To be truthful to the project's community-led approach, state-level officials rightly directed IDE to the communities to manage MUS implementation. However, this response was also a way for the officials to brush off the larger implications of planning for multiple uses of water at the state level and a lack of desire or ability to adjust the prevailing paradigm.

At the local level it was apparent that communities were interested in multiple water uses, and some had already been creating their own *de facto* MUS systems with the previous schemes they had available to them. The concept of MUS was not difficult for them to grasp, although the actual implementation was more difficult due to the confines of the Jalswarajya/Aple Pani project. SEVA worked with one village that was so interested in multiple uses of the water that they pressured their district Aple Pani officials to allow water for various industries in their village and then collected tax from these industries for the water use.

District-level buy-in varied per district and per stakeholder. The Jalswarajya/Aple Pani officials at the district level were less interested in MUS and were happy to leave the actual details of implementation up to the CBC, SO, and community. However, as evidenced by the community that worked to have an industrial-water requirement included in their system design, it was difficult to get support from the district Jalswarajya/Aple Pani officials for actual MUS-by-design. District-level officials claimed that they were limited in the ability to support MUS because they needed a directive from the state level. And, while the state was allowing MUS implementation, they were not actively promoting it or changing policy to fully encourage it. The district bureaucrats were also much more comfortable recommending that communities use wastewater for kitchen gardens rather than water directly from the system.

Communities could, however, choose to use the water they received as they wished. The CBC and local SO partners were largely responsible for implementation of the project, training, and the additional development work with WECs. Due to discord between the Nasik CBC and the district Jalswarajya/

Aple Pani officials, the CBC dropped out of the project, leaving a hole in guidance of the local SOs and communities in Nasik District. Therefore, the strongest communities and SOs were the most successful. Since Dilasa was the CBC in Aurangabad and SEVA is the CBC for Ahmednagar, their partnerships with IDE and their buy-in of the MUS concept was critical to MUS implementation in these two districts.

Initially, local NGOs in Nasik were immediately willing to implement MUS, whereas in Ahmednagar, organizations were less receptive. Nasik has relatively more water than Ahmednagar, and much agriculture in Ahmednagar is predominantly rain-fed. Thus, the priority of NGOs in Ahmednagar is solely to provide drinking water. Ultimately, NGOs in Ahmednagar became more receptive to the idea of MUS. And, on the whole, district-level NGOs were very interested in the MUS concept and encouraging implementation, while the district-level government was less supportive.

PARTNER CONCEPTUALIZATIONS

UNDERSTANDING OF MUS

Although it took multiple meetings to truly convey the meaning behind MUS, local NGO partners and community members more readily accepted the concept. One partner stated “MUS is not just a water supply scheme. It involves livelihoods for people.” Another partner mentioned that villagers do not make distinctions between the uses of water, whereas government departments do because their funding is drawn from different sources. A third partner recognized that the user has to understand the water balance and how to use it without disturbing the natural cycle. This partner saw MUS as multiple uses of water on an individual basis: once domestic needs were met, it was up to each individual to use the available water in the most effective way. A fourth partner mentioned that after the MUS workshops they realized that storage of water was an essential component to allowing communities and individuals to better manage the use of their water resources. The key for this organization was not the design of the scheme but the judicious use of water and the creation of a plan for various uses.

RELEVANCE OF MUS FOR MAHARASHTRA

All those interviewed agreed to the relevance of MUS for Maharashtra but elaborated upon many different rationales. First, most of the organizations mentioned the growing need for effective water-use planning due to depletion of water resources for an increasing population in the state. With recent droughts, drying wells, and widespread need for tanker-supplied water in the dry season, all stakeholders are exceedingly aware of the need for groundwater recharge, more efficient use of water resources, and, above all, more cohesive

planning. There was, however, disagreement among partners as to whether the most effective avenue was individual action or community participation.

Second, while Maharashtra has policies that mandate the integration of water resource development, there has been no implementation of these policies, and they are lying dormant. One partner mentioned that MUS would be useful to reduce the dichotomy between domestic and productive water uses, allowing for the true integration of delivery at the grassroots level. The time could be ripe in Maharashtra for the acceleration of this concept because of the recent emphasis on strengthening the GP and its ability to implement projects for communities. If projects could be channeled through the GP, it would be more feasible to combine separate schemes. As such, it would be easier for villagers to work with the government agencies responsible for water resource development. Even according to the Satana Block Development Officer (BDO) in Nasik, drinking- and irrigation-water schemes should be planned together. He has peripheral involvement with Jalswarajya and Aple Pani, but there are two departments within his office that deal with water resources—

Water and Sanitation and Minor Irrigation. He felt that with combined planning, the schemes would be more

“Day by day the quantity of water is reducing and the population is increasing; whatever available sources are there need to be planned properly for multiple uses.”

—Executive Director, GARD

financially viable. The departments could be merged and only one department staff would need to be hired.

Third, it was felt that integrated water resource planning for MUS would increase the transparency of government actions. Due to severe water scarcity caused by drought, overuse of groundwater, and high population growth, several contractors, bureaucrats, and legislators are becoming involved in collusion around emergency tanker schemes. When the district declares a state of water scarcity, the government is legally allowed to take possession of private wells. Some corrupt officials are allowing tanker contractors to take water from a private well in one village and sell it in another village. One partner felt that if there were integration of water resource management at the village level and communities were aware of their water budget, they would be able to assert pressure on the government to reduce this corruption.

Fourth, interviewees thought that MUS would increase the ability of farmers to undertake availability-based irrigation planning. As the community creates a water budget, farmers are allotted a certain amount of water for irrigation. Knowledge of this set amount raises the likelihood they will grow less water-intensive crops.

Lastly, one partner mentioned the relevance of MUS in relation to the gender dimension of drinking water. The enlarged availability of water for both domestic and productive uses would benefit women in many ways. Not

only would they have readily available water for domestic needs (traditionally the female realm), but they would also have water available to grow kitchen gardens. This would increase the amount of vegetables available for consumption as well as generate income for the household. Recognizing the potential impact on women, it is imperative to involve them in the planning process.

DIFFERENCE BETWEEN MUS AND OTHER WATER RESOURCE DEVELOPMENT IN MAHARASHTRA

When queried about the differences between MUS and other water resource development projects in Maharashtra, the major difference mentioned was the involvement of the community. Historically, the Maharashtra government has not included the community in its projects. And although the current trend at the state level is to give control of drinking water schemes to the community, the district-level government institutions are not fully buying-in to the community-involvement concept. Partners also felt that MUS is a more comprehensive way to plan. It takes into account all sources—private and public wells—in water budgeting and use planning. Government schemes, on the other hand, neglect to factor in the private wells.

BARRIERS TO SCALEUP

There are many reasons that interviewees felt MUS is relevant to the state and an improvement upon the current way that water resource projects are constructed. Everyone agreed that the MUS approach should be scaled up in Maharashtra, but they felt that there were many barriers to expansion.

Lack of Awareness

Several of those interviewed mentioned a lack of awareness of the MUS concept as the major barrier in scaling up. Many agreed that there is an understanding of MUS at the community level, but district- and state-level players (SOs and government) were lacking. Many partners voiced frustration that although state-level senior bureaucrats talk about integrated water resource management, they never actually work toward it. Several NGOs indicated that the continual transfer of government staff from one department and region to another made building relationships and spreading the MUS concept difficult because they were perpetually teaching new people within the government about MUS and attempting to get buy-in. The supply-driven approach to local problems is still dominant in Maharashtra. Bureaucrats are used to deciding what a particular type of scheme should look like and imposing those schemes on communities. Plus, the overall hydrology of the system is not studied or well understood. Water resource assessments are often based on British models and standards set prior to independence.

Quality and Quantity of Water Required

The quality of water required for different uses is distinctive. The requirements for drinking water quality are much higher than those for irrigation, and the cost of treatment for potable water is an added investment for a community. Therefore, it is seen by many stakeholders as a waste of funding to treat water to drinking-level standards and then use it for other purposes. This is seen as a major barrier to joint domestic/productive-use schemes. Additionally, there is a lack of sufficient water for some communities for both domestic and productive purpose. And some NGOs mentioned the further stress that population growth will place on available resources. Recognizing that domestic water is a priority, future productive use will become ever more difficult to justify.

Land Use

Farmers that have their own private wells and do not have to depend on the community schemes are less interested in small amounts of water for kitchen gardens. With Indian village houses packed much more densely than Nepali hill villages, there is sometimes a lack of space available for kitchen gardens. Furthermore, agriculture is generally considered a large-scale enterprise in Maharashtra. Therefore, even if space is available next to homes, many do not consider small-scale vegetable plots useful. One organization suggested approaching women's groups instead of farmers because women would be more receptive to the use of water from the domestic system for kitchen gardens since they are the household member most concerned about the nutritional boost a garden would provide.

Timing of Projects

Through Jalswarajya and Aple Pani, the project-implementation phase is fixed at 18 months. However, for many reasons including the inefficiency of the government bureaucracy to give funding, lack of community capacity to swiftly implement a scheme, the timing of the rainy season, ineffectual SOs, and other factors, most communities find it impossible to complete the projects in this required time. Due to the delay of project construction, most of the schemes are not yet completed. Furthermore, the kitchen gardens and family nutrition kits cannot be established until the schemes are finished. This means that MUS initiatives take a long time to come to fruition. Long time lapses between conversations with communities about MUS and actual purchase and installation of the kits are likely to decrease their application. To remedy this, more frequent contact with the communities is necessary, requiring IDE or partner NGO staff time and resources.

Community Barriers

There are several barriers within the community as well. Many villagers do not trust NGOs because they perceive NGOs as merely funding sponges that simply pocket development money without truly benefiting communities. Villagers also find it difficult to take time from their daily work to attend meetings, especially if they do not see the value in such meetings or trust the NGOs that are organizing them.

Because of typical government scheme operation in the past, communities are also used to having

“The major problem [barrier to implementing MUS] is lack of awareness; when there is no awareness, there are less people adopting it but as awareness raises more and more people participate”—Executive Director, GARD

projects given to them by the government without being required to contribute. Due to this reality, they often are unwilling to invest in projects and lack the knowledge of effective project management. The SO is meant to build the community’s capacity to run their project, but some communities involved in Jalswarajya/Aple Pani projects have had difficulty because of ineffectual SOs. For example, communities sometimes pay the contractor the full amount at the onset instead of in installments. In some situations, contractors have taken the money and disappeared without completing the project.

Government Barriers

There are also many barriers within the government itself for scaleup of the MUS concept. The government of Maharashtra (and India on the whole) is very highly centralized. National and state-level policy often does not correspond with reality. For example, although there is a national policy for conjunctive use of surface and groundwater, there is no government program that actually implements this concept. In fact there are actions that discourage the materialization of this concept: government imposes levies on farmers who irrigate with groundwater when there is a surface-water scheme available. Even with progressive policies in place, implementation lags. One NGO mentioned that it is easy to drive policymaking if you know the right person within the government, but implementing the existing policies can be difficult. Political instability, vested interests in party sponsors, and the favoring of closer communities (i.e. spending more money on villages that are closer to where the legislators operate) are all handicaps to effective policy action.

Many interviewees also indicated that coordination between the different government agencies would be a challenge due to a highly compartmentalized approach to water scheme implementation in the state. According to the Block Development Officer, drinking water and irrigation projects will never be planned jointly at the block level. The various departments within the block

office are completely separate with distinct staff, funding, and project plans. In addition, district and state-level policymakers are often unwilling to listen to suggestions of the block-level implementation staff. Since the block level is dependent on funding from the district level, there is very little flexibility to implement a new idea within the block without enabling policy and funding from the district level. Therefore, according to the BDO, state-level policy for MUS would be required to achieve substantial action. Others interviewed felt that the most important level for upscaling would be the district-level line agencies because they have the liberty to interpret the state-level plan in the local context.

Another potential government barrier is pushback from those in government who benefit from the current situation. Officials who are participants in the aforementioned tanker collusion would be resistant to any activity that ameliorates the water-scarcity problem they profit from. NGOs also voiced that both the Department of Irrigation and the Department of Agriculture had a vested interest in maintaining the status quo. The departments would avoid new projects for fear that their power base would be eroded. The Department of Irrigation currently had the biggest budget and largest influence on higher-level bureaucracy. Others perceive the Department as being unwilling to share power with other departments (i.e. drinking water and Sanitation Department or Groundwater Survey and Development Agency).

Ideological barriers also exist due to long-held beliefs about water resource development schemes. When questioned about MUS, the Nasik District Jalswarajya/Aple Pani official stated that use of the system for anything other than drinking would be considered “misuse.” Despite an understanding of MUS and some amount of buy-in at the state level, this particular district-level official maintained old notions of appropriate water use. While this particular official was the only interviewee who voiced such an opinion, it is believed that others within the government infrastructure would believe the same.

In order for MUS to expand, sharing of outcomes is required. Yet, effective monitoring of Jalswarajya/Aple Pani projects is lagging. It was suggested that water resource schemes be brought under the purview of the Outcome Monitoring division within the Department of Planning. Development of this monitoring division is new, however, and the Department head is a low-level bureaucrat at the state level. The appointment of someone with little political clout indicates the lack of emphasis the state level places on effective monitoring.

OVERCOMING THE BARRIERS

MUS and Decentralization

In order to overcome the barriers to scaleup, decentralization of the process would be required. While Jalswarajya and Aple Pani are promising examples of a change in thinking within the government (at least at the state level), the shift toward community-centered projects is just beginning in Maharashtra.

Even Jalswarajya and Aple Pani have only partially transitioned. While communities are responsible for hiring the various engineers and consultants, they do not fully plan the project. Community input is important, but it takes a high level of determination to truly adjust the Jalswarajya/Aple Pani project parameters. The example of Baloni mentioned in chapter 12 was able to successfully lobby Aple Pani to allow the inclusion of local industry into their water system. But it took a great deal of organizing and effort. Most village communities do not have this ability, even with the project capacity-building component.

Many interviewees felt that in order to have sustainability in the long term, it was important to imbed MUS within the government structure itself and not just into a limited-term project like Jalswarajya/Aple Pani. However, there were several ideas as to which government body was most suited to lead the effort. Some thought that the Groundwater Surveys and Development Agency (GSDA) would be the most suitable collaborator. Because most water resource development in the state is groundwater, the GSDA would transition to the role more quickly than other government departments. Others felt that the Department of Irrigation would be the best entity to undertake MUS but would be more difficult to convince. They are currently implementing the Maharashtra Water Sector Improvement Project,² which is rehabilitating 219 minor and medium irrigation schemes in the state. This rehabilitation effort could provide an effective avenue to incorporate MUS. However, most thought that the district-level government had the best ability to lead MUS work. As the head of district-level development, the Panchayat Raj Department is a critical partner. It houses both the Block Development Offices and the Zilla Parishads and is responsible for local self-governance and coordination. The Zilla Parishad contains the GPs, thereby having access to the community level. The Block Development Offices hold the district-level human infrastructure, including the Minor Irrigation, Water Supply and Sanitation, and Agriculture Departments. Additionally, at the Zilla Parishad level there is a separate department for the Total Sanitation Campaign, which already encourages the use of wastewater for irrigation of kitchen gardens and has a more substantial and flexible budget than the rest of the department. On the flip side, mismanagement and a lack of professionalism abound within the Zilla Parishad.

Ultimately, interviewees conceptualized the need for partnership on MUS. NGO/government partnerships were considered critical for MUS success, particularly considering the pattern of development employed through Jalswarajya/Aple Pani and the use of NGOs for training and liaison functions. Expanding the LA to include NGOs that work on issues other than watershed development (such as health and agriculture) would be beneficial. Relationships with academic institutions should also be strengthened. Academic institutions often provide training for both government institutions and NGOs.

Efforts for Scaleup

Education of all stakeholders about MUS was the most cited tool for scaleup. Nearly all those interviewed felt that exposure visits to demonstration projects would be the most compelling way to educate people about MUS and expand the approach. For those who are beyond the reach of exposure visits, strong documentation and publicity of the successes of pilot projects will be necessary. There are also SOs in each district that are responsible for performing Information, Education, and Communication (IEC) activities for the district-level government, communities, and other NGOs. Although some partner NGOs (mainly SEVA and Dilasa) have already incorporated the MUS concept into their IEC activities, other NGOs responsible for IEC could be educated about MUS. However, both SEVA and Dilasa agreed that bureaucrats often resist training. For example, many government agencies have training quotas. Instead of using educational institutions for training, the agency will send staff to other government agencies. This allows the agencies to exchange money within government instead of actually spending the money. To overcome this, a training of trainers was suggested, which would be conducted by the CBCs in each district. In essence this would create a team of individuals who would encourage MUS in each district, casting a wider net to generate interest. A few interviewees mentioned that policymaking at the state level would be key to upscaling. They suggested a full-fledged advocacy campaign as the most effective method. Tools mentioned for upscaling information dissemination included:

- exposure visits
- newspapers, TV, radio, a promotional video
- songs and slogans
- holding Gram Sabha meetings that include movies, posters, etc.
- training materials in Marathi for district officials
- presenting at water resource conferences and the Institute of Engineers and Indian Water Works Association conferences³
- posters, pamphlets, pictures, handouts for Village Development Officers

Most interviewees also mentioned funding as a critical component for scaling up. Without the finances to fund MUS projects, the effort to spread the approach would be unlikely to succeed. This was evidenced by IDE's experience with local NGOs in the three districts. Some who were initially interested in participating dropped out when they realized that IDE would not be providing them with funding for the projects. Additionally, in order to strengthen the capacity of Water Users Associations, funds need to be provided for community capacity building. The members of the Water Users Association would then be able to share the concept with other neighboring villages.

OUTCOMES/CURRENT STATUS

COMMUNITIES/LOCAL NGOS

Due to the extension of scheme implementation beyond the planned 18 months, the execution of the MUS component has been delayed. IDE and partner organizations have received verbal agreement from villagers to purchase family nutrition kits and from some community organizations (such as schools) to grow kitchen gardens with the excess scheme water. Initial training on the family nutrition kits has been conducted, and follow-up training is forthcoming.

INTERMEDIATE LEVEL

At the district level, NGOs are the most interested in moving MUS forward. They are interested in establishing pilot MUS projects for exposure visits. NGO LA partners have agreed to collaborate on these exposure visits.

Dilasa—Lead Organization in Aurangabad

The case of Dilasa is an interesting one and worth elaborating upon. The partnership between Dilasa and IDE went beyond MUS to include another Challenge Program project for lift technology development. As part of this other project, an exposure visit to Nepal was arranged for Dilasa staff. Through this exposure visit they were able to see firsthand the MUS-by-design projects developed in Nepal and their effects on the lives of the community members there. Prior to their visit to Nepal, Dilasa had been actively promoting the MUS concept. They shared the idea with SOs and TSPs they worked with through Aple Pani. Within villages they taught the women SHGs and members of the three project committees about the concept. Before their Nepal visit Dilasa had also spoken with the Executive Engineer of Aurangabad District Department of Irrigation. They have ample quantity of water in their dams, but there is no adequate distribution system because previously built canals are crumbling. Dilasa explained to them that through MUS systems there could be both an increase in water availability for agriculture and income generation as well as domestic use at the farm level.

Even though these contributions to MUS were substantial, Dilasa staff mentioned that their conceptualization of MUS was fully actualized during their visit to Nepal. They were able to see concrete examples of MUS-by-design and the impact it could make with small plots of land. Due to their experience, Dilasa feels that true propagation will only come through demonstrations. They wish to give communities options for use of the excess water (i.e. kitchen gardens, food processing, or other small enterprises, depending on space availability and the skills of community members).

Within two weeks of returning from their visit, the director of Dilasa had established funding for MUS through two separate mechanisms. He met

with the District Collector⁴ of the Jalna District⁵ and explained at length about the MUS projects in Nepal. The District Collector agreed that if Dilasa put forward a proposal for MUS development in his district, they would receive as much funding as they required for project implementation and community capacity building. Second, The Dilasa director met with Sterlites Optical Corporation because they had previously expressed interest in funding Dilasa for development projects. Since Dilasa is already working on capacity building with WUAs near the Sukhana Dam on the Godavari River, he encouraged the company to fund MUS projects using water from the dam.

SEVA—Lead Organization in Ahmednagar

As the lead organization for Ahmednagar District, SEVA has discussed MUS in many contexts. They are the CBC for Aple Pani in their district and have spoken with the Aple Pani staff about inclusion of livestock requirements in system construction. They also use meetings, conferences, and workshops that they attend as mechanisms for sharing the MUS concept with other NGOs. The local watershed NGOs in Ahmednagar already participate in a Learning Alliance of their own, meeting in small groups throughout the year and holding an annual conference in one of the villages they work with. SEVA also convenes regularly with other SOs working for Aple Pani. They have discussed MUS with these organizations. They have also shared information about the MUS approach with government organizations: the Zilla Parishad, District-level office of the Department of Agriculture, and the GSDA. SEVA presented the MUS concept at a workshop in March 2007 that was arranged by the GSDA. Staff of the GSDA voiced interest in seeing MUS projects that have been implemented at the grass-roots level and have promised to give information to their superiors once they have seen these pilots. SEVA is planning to have MUS-specific workshops in the future.

GARD

GARD is an SO for five villages under the Aple Pani Project. As such, they have shared the MUS concept with the GPs and communities of these villages. They also spoke with the BDO of the block in which they work (Parner Block) and his staff, and various Zilla Parishad departments. In addition to Aple Pani projects, GARD works with 400 women SHGs in the Ahmednagar District and has shared the MUS concept with all of these groups. GARD is also a member of the same Learning Alliance of watershed organizations that SEVA is a part of and presented on MUS at the annual workshop in March 2006 in conjunction with SEVA. Several of the NGOs in the MUS LA were present at this meeting, along with the District Agriculture Officer, participants from the host community, and 15–20 people from other villages where watershed work is occurring. The director of GARD mentioned that the communities they work with are demanding water resource development for all of their needs—productive as well as domestic—which he interprets as demand for MUS. However, due to the way schemes have been constructed in the state

historically, communities are unaware that the two uses can be planned within the design of one system.

STATE LEVEL

IDE staff has held multiple meetings with the State Coordinator of the Water and Sanitation Program of the World Bank. Through these meetings, his understanding and interest in MUS has grown. He has expressed interest in meeting with IDE-Nepal staff who have implemented MUS projects to obtain a more thorough understanding of their experience. He has also decided to put out a call for research and documentation on pilot MUS projects in a few states of India to further develop the concept. If these pilots are successful, he will share the idea with other countries in the region.

LESSONS LEARNED

DIFFICULTY GRASPING THE CONCEPT

The idea of MUS seems to be a very hard concept for people to grasp without seeing an actual example. Although some organizations or individuals readily grasped the concept, for others it was intangible and confusing. At the Nasik state-level workshop, the sizeable organizations (state-level or larger district-level organizations) were more engaged and interactive and seemed to grasp the concept. Staff from smaller and more local-level NGOs, on the other hand, seemed to have more difficulty. This could be due to varying education levels of staff working in larger organizations versus smaller organizations. Yet for some, even after multiple meetings, the concept had to be reiterated and clarified. This indicates that the idea is difficult to elucidate.

Also telling is the fact that all interviewees stated that the best way to advance MUS would be to arrange exposure visits to pilot projects. This belief was proven by Dilasa's visit to Nepal and subsequent enthusiasm for the concept and follow-through on garnering funding to build pilot projects. When comparing the propagation of the MUS concept in India versus Nepal, it becomes clear that seeing MUS in action is much more compelling than simply explaining the concept. In India, they initiated the MUS process with meetings and a state-level workshop. In Nepal, they began with building projects and then developed the Learning Alliance around sourcing of funds for those projects.

There is a catch in propagating the concept through projects, however, because people tend to envision only one model for the concept instead of seeing it as a larger platform with multiple manifestations. In Maharashtra, there was a tendency to view MUS as simply microirrigation or kitchen gardens because that is the current mechanism for MUS promotion. Similarly in Nepal, the conceptualization of MUS is based on the form that MUS projects have taken in the past few years.

Another important lesson from the experience in Maharashtra is the power of using the term “MUS” itself. Although the name chosen could vary, having set terminology for the concept is a useful tool for proliferation of the idea. In India they used “MUS” to some extent, but mostly in terms of integrating water resource use. Often the MUS concept was discussed more broadly without coining the terminology for it. This was a hindrance to spreading the idea. Having one name helps those involved to have a common understanding of the concept and gives individuals new to the idea a framework to hang their understanding on. However, as evidenced by the Nepal LA (chapter 7), even when using a common term, multiple meanings exist. Practitioners engaging in MUS should be careful to ensure that when they share the idea, they clarify what they mean by “MUS.” All should seek to continually reflect upon their understanding of the ways MUS takes shape. As an expanding concept, all possibilities for MUS have not yet been explored.

LIMITATIONS OF IMPLEMENTING MUS THROUGH JALSWARAJYA/APLE PANI

Despite the possibilities for MUS, attempting to work through the state-level drinking water programs proved a difficult route. State-level officials within the Jalswarajya/Aple Pani projects were amenable to incorporating MUS into the projects but claimed that it was the choice of communities whether or not to incorporate it. However, through the various interviews, it became clear that in order to have MUS applied through state-level projects like Jalswarajya/Aple Pani, a directive is required from the top. The projects are incredibly structured, from the selection of the NGOs, consultants, and contractors to the allocation of project funds. Therefore, even though the community could in essence “choose” MUS, it was not a real choice. The amount of water allocated by design is fixed at the 40 liters/capita/day required for the projected domestic use in the year 2021, and financial provision for the projects is planned accordingly. Although there is currently excess water for productive use, the productive-use component was not actually included in the design of the systems of the Jalswarajya/Aple Pani projects.

The restrictions on this “choice” were also evident in an observation of one IDE staff member. During the interviews, individuals (particularly those from local SOs) were afraid to say that communities were actually using drinking water for kitchen gardens and emphasized that households were mostly using wastewater. This echoes the comment of the Jalswarajya district-level official who stated that use of water for anything other than drinking was “misuse” of the scheme. While this sentiment was not repeated by her superiors, it spoke to residual sectoral views of water resource development schemes and the potential mixed messages communities are receiving about the appropriate use of water.

In order to have MUS-by-design in Jalswarajya/Aple Pani, the MUS concept needed to be presented at the onset of project design. Unfortunately, project design was completed during 2000–2002, prior to MUS. Yet even if

MUS had been presented during this period, it is unclear whether it would have been planned into the project structure. There are significant barriers to integrated water resource planning in Maharashtra. And although officials are beginning to move in the right direction with water budgeting, watershed-development work (mostly groundwater recharge of wells), and increased use of water-saving technologies like microirrigation, there is still no funding support for schemes that include productive use other than traditional large-scale irrigation schemes. Even trying to explain the concept to a state-level Jalswarajya/Aple Pani coordinator in the Water Supply and Sanitation Department proved difficult. He had trouble

“MUS is not just a water supply scheme. It involves livelihoods for people.”

—Social worker, SEVA

He even recognized the government neglect of productive uses of water. All of the other puzzle pieces are there—water budgeting, groundwater recharge, encouragement of wastewater reuse, and schemes for adequate domestic water. Water is being accounted for, the government is encouraging judicious use, and funding is given for drinking water schemes. But productive-use schemes are completely overlooked. It is assumed that communities will somehow figure out how to access productive-use water on their own. And although there are private wells in most villages, it is the relatively wealthier farmers who own them. This points to a lack of awareness of the importance of small-scale productive use; most “agriculture” in Maharashtra is conceptualized as large farms. Plus, these private wells are responsible for much of the groundwater depletion problem the state is facing.

Even if the “choice” is truly up to communities to incorporate MUS into their projects as they wish, they need information to make that choice. If the idea had been fully embraced at the state level, the community would have been educated about the concept through the CBC or training organization. Supposedly, kitchen gardening was included in the information the SOs were meant to train the community about. But it is unclear the extent to which SOs actually promoted their cultivation. It became clear through the interviews that the information transfer through Jalswarajya/Aple Pani varied across each district and depended on how effectual the CBC and SOs were. Although a minimum standard of information was intended to be conveyed, the situation from district to district differed considerably.

Furthermore, even if there is adequate information transfer, community “choice” can be easily swayed. The assisting organizations (CBC, SO, and training organization) hold considerable power to shape a community’s actions. For example, the chairwoman of the Women Empowerment Committee in Samundi was very keen to start a dairy in the village despite the high initial costs and inability to receive a loan. Her enthusiasm was not due to her own initiative. It was largely due to the local training NGO who had strongly encouraged the committee to establish a dairy.

In summary, too many limitations existed within the Jalswarajya/Aple Pani framework for MUS-by-design to materialize in Maharashtra. While it was a good opportunity to attach MUS efforts to the dissemination of a larger project, the project leaders never fully embraced the MUS concept. Moreover, without direct control over implementation of the projects, IDE was limited in its capacity to expand MUS. The Maharashtra experience showed the difficulty in advocating for the MUS concept through a government project: lack of direct input over implementation, an established relationship with the community, and real influence with the local NGO partner.

RESTRICTIONS IN THE CULTURE AROUND WATER RESOURCE DEVELOPMENT SCHEMES IN MAHARASHTRA

There were also limitations embedded in the culture and prevailing water resource development paradigm in Maharashtra. Many organizations who were initially interested in the MUS concept and implementation dropped out once they realized that they would not receive funding for the projects. It was reiterated repeatedly during the interviews that the mentality regarding funding can be a difficult hurdle for execution. Because the government gives large sums of money for drinking water schemes, money is the only thing that “talks” with local NGOs and communities. When trying to propagate a new idea, particularly if it is attached to a state-level project like Jalswarajya/Aple Pani, the NGOs expect to get funding. If there is no funding attached, their interest level diminishes. It is also very difficult for organizations to get communities to participate in scheme cost and construction because they are used to being “given” water schemes. Through Jalswarajya/Aple Pani the communities are expected to contribute 10 percent of the cost (5 percent if they are tribal). Even though this percentage seems low, it is a new endeavor for the state to actually require funding from communities. Interestingly, Dilasa has somehow managed to convince communities to contribute around 40 percent on average in their projects. Sharing successful methods such as theirs should be further encouraged through Jalswarajya/Aple Pani.

Communities and NGOs are also inclined to construct new projects regardless of whether there is an existing scheme that could be renovated for less cost. Even though the Jalswarajya/Aple Pani project plans encourage the improvement of existing resources/schemes as the first action, those implementing the schemes have by and large ignored this standard. Instead, they opt to build new, and often expensive, systems.

CONCLUSION

The MUS Learning Alliance in Maharashtra was mostly successful in establishing NGO networks in the three chosen districts as well as the incorpora-

tion of MUS into partner organizations' watershed projects. Unfortunately, government participation in the LA was less than anticipated. Whereas the LA was useful for expanding the concept of MUS to some extent and has resulted in some concrete outcomes, attachment of MUS implementation to Jalswarajya/Aple Pani encountered serious unforeseen setbacks. With few staff, IDE did not have the capacity to implement MUS projects independently. Consequently, IDE became an enabling organization instead of an implementing organization. From initial conversations with Jalswarajya/Aple Pani officials, the government seemed supportive of the concept and was allowing communities to decide whether to use water for productive use. Because the government sector is responsible for village water supply in Maharashtra, IDE staff felt that combining with a government program was the best vehicle for implementation. Furthermore, of all government programs, Jalswarajya/Aple Pani is a new wave in state-level thinking and the most focused on community-based decision making.

Due to IDE efforts, some villages are currently using or are planning to use some of the excess water productively. Moreover, it is possible that if IDE had presented the MUS concept during the planning phase of Jalswarajya/Aple Pani a few years earlier, the ability to create MUS-by-design schemes would have been greater. However, with a better understanding of the history of drinking water schemes in the state, the centralized and sectoral nature of the government structure, and the lack of desire within government to implement already-existing integrated water resource management policy, it is understood that true MUS-by-design was unlikely to come to fruition in this short timespan.

The Jalswarajya/Aple Pani projects do indicate a changing standard toward community-led water schemes. This provides fertile ground to sow the seeds of MUS in Maharashtra. The MUS project was a beginning step in raising awareness of the need to deliberately incorporate productive use. However, there is much work to be done. The productive-use component must be more deliberately included in existing efforts on water budgeting, source strengthening, conservation, and efficient water use. Furthermore, despite the stated purpose of Jalswarajya/Aple Pani to build the water-management capacity of the community, the government's own inability to embrace the productive-water-use component translated into incomplete knowledge transfer to communities. The only mechanism for communities to factor in productive use was exceptional community initiative or NGO encouragement. By drawing upon the idea of partner organizations to build pilot MUS projects in each district, concrete examples for MUS may lead to expansion of the idea. Then, the enabling environment of the government can be fully tapped. Full buy-in and an attitude shift of the state-level government is required for real scaleup in the state. With buy-in at the state level, implementation can then take place through the district-level human-resource infrastructure, drawing upon the knowledge and expertise of partner NGOs.