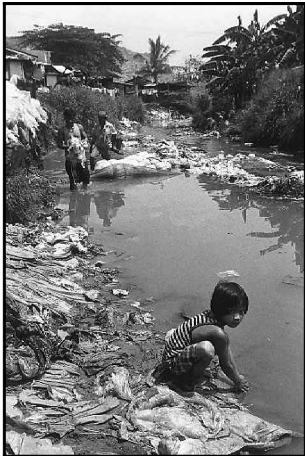




# Sitting in the hot seat: The role of the sanitation manager

Adrian Coad

Jeremy Horner/Panos Pictures



Residents are accustomed to flooding and the stench of clogged drains; water resources may also be polluted by waste.

The collection and disposal of solid wastes are not going well. Some residents suffer from irregular collections; others have no collection service at all and live in an environment of flies, mosquitoes and rats. They are accustomed to frequent flooding and the stench of clogged drains; the pervasive, choking smoke from burning refuse is inescapable. Other residents are unhappy about the charges they are asked to pay for an inadequate service. Who is to blame?

The mayor and other senior political and administrative leaders are tired of receiving complaints from residents and businessmen about the solid waste collection service. Some important citizens seem to complain every week about delays in collection or the behaviour of the waste collectors; there are frequent complaints about waste scattered on the streets. Central government transfers of finance are often late and are never for the full amount requested. Why are there so many problems?

Villagers living near the disposal site complain about its appearance, the smell, smoke and flies. University lecturers and environmental groups claim that water resources are being polluted by the waste and demand that the site be closed.

The municipal sanitation manager hears all these complaints again and again. He did not ask for this job, and he has not been trained to do it. He is trying to arrange to be transferred to any other part of the municipal organization. He works long hours, and receives no thanks. There are insufficient funds to provide a good service, and he is not free to decide how the money that he does have should be spent. He has inherited a large workforce of men who are willing to work only four hours a day, and he cannot dismiss those who refuse to do even that much work. Most of his vehicles are old, and the few new ones are always breaking down and spend most of their time in the workshop, awaiting repair. He knows that the disposal site is unsatisfactory and is looking for a new technology to solve his problems. He is sitting in the hot seat.

**T**he situation in many municipalities in low- and middle-income countries is similar to that described above, but there are large variations. This article focuses on the situation of the sanitation manager and discusses some solutions. In many ways the person in charge is the most important part of the system.

## Where do good managers come from?

In some countries, the men or women in charge of solid waste collection and disposal have a background in medicine or veterinary science and have responsibilities which include food inspection, vector control and other public health functions. Elsewhere the manager is a municipal engineer, and may also be responsible for roads, bridges and buildings, water supply and drainage, while in larger cities solid waste management (SWM) may be the sole responsibility of engineers who have been appointed to this function from other departments, often against their will.

In most cases the manager has had very little training for the post. Some general principles of the science of waste disposal may be included in engineering

and public health courses, but usually these programmes do not contain sufficient practical details or training in management skills to be of much use. Training needs to be appropriate to the local conditions, and should encourage managers to go back to first principles and design local systems that meet local needs instead of simply copying what is done elsewhere. To make matters worse, there may be few opportunities for managers to exchange information and ideas with their counterparts from other cities. Lack of information about available literature and difficulties in ordering books from overseas add to the knowledge deficiency.<sup>1</sup>

Training should aim to build both knowledge and confidence — this latter being needed to counter the persuasive talk of salesmen making exaggerated claims for their products, the arguments of academics who are not aware of practical aspects, and even of superiors who tend to make decisions without consulting specialists. Confidence can be built up by seeing and doing, so it is important that managers have opportunities to gain experience in waste management systems that are well operated by, for example, working alongside skilled managers in

1. Coad, A. (ed.), (1998), *Solid Waste Management Directory of English-language publications and organisations*, SKAT, Switzerland, available from Intermediate Technology Publications.

**In many cases income is only sufficient for operational expenses; purchases of new vehicles must wait for offers from donors or for a grant from central government, neither of which allows an opportunity to specify the type of vehicle the situation requires.**

# solid waste management

other cities and seeing for themselves different methods of operation.

More crucial than knowledge is motivation. A manager who has been ordered to work against his or her will in waste management will be more concerned with arranging a transfer elsewhere. Motivated officers, on the other hand, will take every opportunity to understand more and to make improvements, passing their enthusiasm on to co-workers. Many professionals have discovered solid waste management to be a challenging, interesting and worthwhile field of activity; such managers make an impact and promote improvements. Motivation is caught rather than taught, so opportunities for waste managers to meet with each other and share their ideas can be very helpful.

## Managing the finances

Lack of money is often a major problem, and there are at least three aspects to this — how money is raised, how it is spent and how it is administered:

**Revenue generation.** Usually the finance that is raised for SWM comes partly from local government revenues and partly from central government. Sometimes the local government income is from general taxation, and sometimes from special sanitation or conservancy fees. Amounts collected are often too small, which may be the result of restrictions imposed by central government, low existing charges which cannot be increased significantly, inadequate fee collection methods, or a widespread refusal to pay. In many cases residents might be willing to pay more for a better service (as shown by the engaging of private contractors or making extra payments to municipal sweepers in return for a more convenient or frequent service), so any improvement in service level is an opportunity to increase the charges. The collection of charges might also be improved by the use of a sanction to punish non-payment, such as disconnection of the electricity supply. Transfers from central government, on the other hand, can be unpredictable, making it difficult to plan and to provide a reliable service. In many cases income is only sufficient for operational expenses; purchases of new vehicles must wait for offers from donors or for a grant from



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The alternative offering the lowest capital cost may be expensive to operate because of its unsuitability, inefficiency or unreliability.

central government — neither of these cases allowing an opportunity to specify the type of vehicle the situation requires.

**How finances are used.** Many municipalities are burdened by large workforces which operate at very low productivity levels. In some cases the income and job security of manual workers have been boosted beyond reasonable limits by successive strikes, although productivity may also be poor because of unsuitable equipment, or too little attention being given to maintenance. If a good manager has the opportunity to modify procedures, he or she may be able to do much more with the same resources.

**How finances are administered.** There are two main issues here. First, good financial management needs information about how the money is spent, but municipal records are often kept in such a way that it is impossible to determine the actual expenditures on SWM services; this makes it very difficult for a manager to make good decisions about the allocation of scarce resources. Records of expenditures on these services should be separated from those for other municipal activities perhaps by the formation of a financially independent utility or arm's length company. If the private sector is to be involved, it is important that the local government body that is responsible knows how much the service currently costs so that bids can be assessed.

Secondly, managers should be given sufficient authority to make decisions about expenditures. Often municipal procedures and restrictions are made with

## Decision-making

Errors which often result in bad decisions being made:

- Insufficient attention being given to local conditions. This may be the result of lack of training or unhelpful inputs from consultants.
- Decisions being made by high-ranking politicians or administrators without reference to the technical specialists within the local government organization. This may be the result of their having been persuaded by salesmen, or because they think that SWM decisions do not require specialist knowledge.
- Choices are made on the basis of capital costs rather than the combination of capital and operating costs in an all-inclusive cost per ton. There are many cases where the alternative offering the lowest capital cost is expensive to operate because of its unsuitability, inefficiency or unreliability.
- Decisions may be forced on municipalities because of bilateral aid. When equipment is provided by an international donor at no cost, it may be difficult to refuse it, even when such gifts involve high local expenditures in terms of operation costs — installation, power costs, related equipment etc.

# webwatch

## ■ MandE News

Accessible by e-mail and Web browsers, this news service is oriented towards NGOs and focuses on developments in monitoring and evaluation methods. Relevant to development projects with social development objectives, the overall objective of MandE NEWS is to improve learning between NGOs and, ultimately, to increase the value poor people get from development aid.

<http://www.mande.co.uk/news>

## ■ Global Environmental Sanitation Initiative (GESI)

This is a new global activity led by an international steering committee and carried on under the umbrella of the Water Supply and Sanitation Collaborative Council (WSSCC). The overall aim of GESI is to raise the profile of sanitation and hygiene behaviour globally through a major thrust in advocacy, collaboration and funding. The site currently includes recent sanitation-related news items, published tools and documents, and links to sanitation related websites.

<http://www.wsscc.org/gesi/index.html>

## ■ African Water Page

This was established as a resource for African water sector professionals, with the aim of encouraging members of a closed forum to share information and to promote discussion. The site is packed with links and documents of topical relevance. An interesting addition has been a page devoted to private sector engagement in the water supply and sanitation sector, with arguments 'for' and 'against'.

<http://www.sn.apc.org/afwater/entry.htm>

## ■ InterWATER

InterWATER aims to help individuals find sources of information about water and sanitation in developing countries. It is maintained by the International Water and Sanitation Centre (IRC) under the auspices of the WSSCC and includes sections on Key International Organizations in Water and Sanitation, and the Guide to Organizations — a comprehensive list of national and regionally based organizations, providing addresses and Internet site reference points.

<http://www.wsscc.org/interwater/index.html>

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the sole objective of reducing corruption, apparently without any concern whether the manager is actually able to provide the required service. Transparency and accountability are important principles, but it is possible to give a manager authority to spend up to a reasonable limit without losing the opportunity of checking how the money has been used.

## Facilities and support

It is worthwhile to undertake a periodical review of the manager's job description, and the support facilities that are provided. Some managers are expected to deal personally with complaints and requests from influential citizens, leaving them little time or energy for real management tasks; others may be required to spend long hours in trivial paperwork or at unproductive meetings. It is important that there is time for planning and strategic decisions, and that the manager has the opportunity to observe crews in action and is able to visit trouble spots.

## Contractors — a way out?

After considering all these problems, the option of engaging contractors seems like a magic solution. But before contracting out waste services, the following points should be considered:

- What will happen to the existing labour force? The new contractor may be reluctant to hire them if they have developed bad working habits;
- The contract should be very carefully written, defining unambiguously the tasks to be undertaken, and the penalties for shortcomings;
- The municipality retains ultimate responsibility for the service, both in terms of performance and in ensuring that the required environmental standards are met;
- Costs must be kept under control, requiring an element of competition. The municipality should be aware of its own costs and should consider retaining the ability to replace contractors that try to charge too much.

## A final word

The manager responsible for solid waste collection and disposal is sitting in the hot seat. The responsibility is not an easy one. Whilst the job can never be changed so that it can be compared to sitting in a comfortable easy chair, there are ways of lowering the temperature and making the job less frustrating, more tolerable — and popular. ■

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