Whatever Happened to Sanitation? - Practical steps to achieving a core Development Goal

by

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Early in the morning Vidya slips out of his shack on the banks of the Sabermati River and, carrying a precious lota of water, hurries down to the dry river bed. Weaving between the excrement and rubbish he finds an "open" space and, in company with hundreds of other men from his community, he defecates. It is a bit smelly and not very private but he is one of the lucky ones. For a start his walk is short and safe, and his destination at least has the advantage of a freshening breeze even at the height of summer. Others are far less fortunate. As day breaks across the world precious hours are being wasted as men, women and children search for that elusive safe and secluded spot. Women, walking furthest and often running the risk of attack, ridicule and shame, pass young boys and girls who will miss school today because there are no toilets. In the cities working women are gearing up for a day with no chance of a "toilet break" while men will have to find any available open space to the disgust of passing observers. All of them face repeated cases of diarrheoa, schistosomiasis, trachoma or other water related diseases. This is what it means to have no access to "basic" sanitation.

Meanwhile, in capital cities and across Europe and America, the morning starts in a more leisurely fashion; for the men and women on the other side of the sanitation world the biggest annoyance is likely to be that the toilet roll is finished, or the water jug empty.

How can it be that at the dawn of the 21st century this is still true? With all that we know surely it is possible to provide this most basic of services, at once conferring dignity, safety, improved health and better living conditions on the millions who currently live without it. Why is Vidya still defecating in the river-bed and what can be done to change this impossible situation?

1 Whatever happened to sanitation ?

"Water supply and sanitation" occasionally joined by "hygiene" are words that often appear

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together in speeches and pronouncements, and indeed this trio belongs together as a cornerstone of public health as well as social and economic well-being. Sanitation and hygiene, however, somehow tend to disappear during the planning, policymaking, budgeting, and implementation phases, while the lion's share of effort and resources are allocated to water supply. Globally estimated public investment in sanitation in the decade to 2000 stood at one quarter of the investment in water supply in the same period[2]. While the percentage of the world's population with access to water supply rose from 79 to 82% access to sanitation continued to lag stubbornly behind at an estimated 60% of the global population in the year 2000, up from 55% in 1990. Worse still, in many regions and the low levels of initial coverage mean that gains are barely keeping pace with population growth and in Africa percentage coverage has actually dropped slightly in this period.

Yet we all know that sanitation is important. All the evidence suggests that access to hygienic means of excreta disposal, coupled with hygienic behaviours and effective means of maintaining a clean and healthy environment has significant immediate impacts on human dignity, health, education, economic growth and even political stability. It also lies at the heart of poverty reduction and is thus a central plank of all the MDGs, not just those directly referring to water and sanitation[3].

2 Lessons and an inheritance from the 19th Century

The importance of sanitation is well recognised in the industrialized nations where sanitary issues are overseen by government; services are delivered by a range of public and private bodies; professional regulators oversee environmental standards and keep a watching brief on prices, and funding is raised from public, commercial and household sources. Sanitary policy and its management are usually handled in combination with other public health issues, primarily water supply.

Yet this was not always the case; once upon a time newly industrializing nations witnessed the same sort of debates we now see on the international stage.

[2] WHO/UNICEF (2000) Global Water and Sanitation Assessment 2000 Report. Total government and ODA funding for sanitation during the decade was estimated at US$3.148 billion compared with US$12.564 billion for water supply. Expenditure on sanitation includes all sanitary investments including wastewater treatment facilities. Note however that these estimates are subject to much debate and, amongst other possible errors, fail to account for private investments made by households.

[3] Other targets relating to gender, education, slums and poverty reduction are unlikely to be met unless sanitation access increases dramatically. More information and a detailed assessment of the costs and benefits of meeting the sanitation target are included in the Millenium Project's companion paper to this paper: B. Evans, Hutton, G. and Haller, L (2004) *Closing the Saniation Gap: the case for Better Public Funding of Sanitation and Hygiene* prepared for the OECD Roundtable on Sustainable Development and available online.

In common with today's experience in rapidly urbanizing developing nations, the industrialized countries also passed through a period of unplanned and unchecked urban growth. As industrialization gathered pace, poor rural families migrated to the cities to find work, forming a pool of cheap labour upon which the first industrial revolution was built. Wages were low, and investments in services even lower; this first phase of rapid urbanisation was accompanied by massive failures in public health and the growth of unplanned slums. Meanwhile the situation in many rural areas failed to improve either. Middle class and wealthy households simply moved out from congested city centres or paid for better individual services, enabling them largely to insulate themselves from deteriorating health conditions. Far away from the slums, those in positions of power were able to largely ignore the plight of the poor; commonly problems of ill health and insanitary conditions could be attributed to the poor themselves, and their inherently "immoral" condition.

This situation was only fundamentally reversed when sanitation became a popular political issue, which in turn only occurred when Edwin Chadwick and others were able to show that preventing environmental degradation was "cheaper and more effective" *to society* than continuing to pay the price of failure, namely paying directly for poor relief and indirectly for the health costs imposed by the deteriorating sanitary situation in urban slums and poor rural communities[4].

Even then it still took more than twenty years for a properly organized sanitation system to be established; in the meantime middle-class interests were active in trying to protect municipalities from both the responsibility and the financial burden of providing services to the workers living in the slums. Eventually however, local authorities were persuaded to take on this responsibility and a massive program of public borrowing ensued. Between 1880 and 1891 urban authorities in Britain borrowed more than UK£3.2 million for waterworks and UK£7.7 million for sewage works alone.

With technological advances and the influx of public funds, sanitation finally became a true "public good" with services extended to the entire population in the late nineteenth century. Eventually the public provision of sanitation became "uncontroversial and just a part of every day life"[5].

Today, the provision of safe (and unseen) means of sanitary excreta disposal is taken for granted in those countries that benefited from an early public investment such as that enjoyed in Victorian

[4] Flinn, M.W. (ed) (1965) *Report on the /sanitary Conditions of the Labouring Population of Great Britain by Edwin Chadwick (first published in 1842)* Edinburgh University Press and see also Chaplin, S.E (1999) *Cities, Sewers and Poverty: India's Politics of Sanitation* Environment and urbanisation vol 11 No 1, April 1999.
[5] Chaplin, S. E. (op.cit.).

Britain. Public policy debate, and significant public funding, now generally centre on ever-higher standards of environmental protection while management approaches nearly always pull together two "utility" services (sewered sanitation and piped water supply). Today in the professional world of sanitary engineering, the issue is generally seen as one of environmental health and environmental protection, economies of scale in piped water-borne sanitation are taken for granted, and the early focus on (un-)hygienic behaviours within the household has faded from the collective memory. At the political level it is easy to forget that universal access to sanitation was not always seen as a right; and to underestimate the resistance (both active and passive) which may still exist to changing the status quo.

3 Waiting for the 21st Century Miracle

Today, international calls for improved access to sanitation seem resonant of those early sanitary campaigners in Europe. While few disagree with the need to "do something" opinions vary about what exactly should be done. More money seems to be needed, but there is little clarity about what it is needed for. International pronouncements stress the need for "coordination" and "integration", calls are made for links with Integrated Water Resource Management, better re-use and recycling of wastes, concerns have been expressed about "equity" and the need to pay special attention to women and children[6]. Meanwhile, many countries are facing the reality that sanitation service delivery is embedded institutionally within national, regional or municipal water supply agencies (an inheritance of the European models which developed over a century ago).

There are powerful interests at play – professional experience and prestige, access to funds, ability to influence investment decisions. Further the economic circumstances of most countries with low sanitation coverage are *not* comparable with those in Victorian Britain. Most countries are not in the throes of an industrial or commercial revolution; few can envisage public borrowing on the scale that was possible 140 years ago in Europe and America. More money *is* clearly needed but little is available. What is really needed is to find ways to spend what public funds are available *more effectively at the point of access*. Only then are more people going to be able to get to and use a safe means of excreta disposal.

Sanitation is at heart of all the MDGs and we need action now. But before we can take that action we need to:

[6] Agenda 21, the Program for implementation of Agenda 21 and the Johannesburg Program of Implementation all contain a number of references and commitments to sanitation. Sanitation was also touched upon in CSD6.

- think again about what we mean by sanitation;
- think again about how to do it right; and
- think again about how we are going to find the money.

Fundamentally we have to stop assuming that the situation is comparable to that experienced in Europe today (where universal coverage is the norm) or even to that experienced in Victorian Britain (where municipalities had access to funds that enabled them to establish a luxury service for all, and to finance the costs of cleaning up the mess afterwards). We need a new idea of sanitation.

4 Thinking creatively about what "sanitation" means

The first challenge for countries seeking to solve the problem of access to sanitation is first defining what "sanitation" actually means. The second challenge is to decide what aspects are the most important; in other words, what aspect of the problem is going to be dealt with as a priority. This problem is not a simple one and many professionals confuse the two steps.

Defining sanitation. Most professionals would agree that "sanitation" as a whole is a "big idea" which covers inter alia:

- safe collection, storage, treatment and disposal/re-use/ recycling of human excreta (feaces and urine);
- management/ re-use/ recycling of solid wastes (trash or rubbish);
- drainage and disposal/ re-use/ recycling of household wastewater (often refered to as sullage or grey water);
- drainage of stormwater;
- treatment and disposal/ re-use/ recycling of sewage effluents;
- collection and management of industrial waste products; and
- management of hazardous wastes (including hospital wastes, and chemical/ radioactive and other dangerous substances).

All these sanitation "challenges" also arise in a range of situations – urban/ rural/ small towns, in planned and unplanned settlements, and in different types of communities.

Focusing on the "whole sanitation challenge" can of course seem very daunting, and there is no doubt that in many cases, the enormity of the problem results in stasis. What is often forgotten is that the whole problem *does not have to be solved simultaneously*. In many cases, more progress can be made by focusing on a few solvable problems, and dealing with the most important sanitation challenges first, before turning to the management of the overall sanitation situation,

which may have to be deferred to a later date. Looking back historically, this was the experience in many countries which now enjoy universal access. This is not to say that the approaches of 100 years ago should be followed blindly – we know a lot more now about the environment for example which should enable us to come up with solutions which do less damage in the long run than some "conventional approaches". Nonetheless, while it may be useful to plan for a wholistic solution, practicality and resources may dictate that a phased or stepped approach must be taken to implementation.

Working out what is important: For countries with very low access to basic sanitation increasing the effectiveness of management of excreta at the household level may have the biggest health implications and it may be the biggest challenge. For this reason some countries may legitimately decide to focus their efforts at this level in the short term. In other cases specific interlinkages between elements of sanitation mean that a more complete solution may be better – for example in a particularly congested urban community some form of off-site (sewered) sanitation may be the only viable technical choice – in which case there will probably need to be some interventions to improve management of solid wastes and stormwater drainage – otherwise the sewers won't work. Yet other countries or communities may try for a more complete solution which includes a focus on protecting the environment from contamination (as is the case in countries which already have universal access such as Britain). In some cases it will be possible to start with an "ecological" approach to sanitation which seeks to contain, treat and resuse excreta where possible – thus minimizing contamination and making optimum use of resources.

The key issue here is that each community, region or country needs to work out what is the *most sensible and cost effective way of thinking about sanitation in the short and long term* and then act accordingly. Flexibility and pragmatism should be the key words – and both professionals and politicians need to try and see past "experience" and ideas which are developed elsewhere – a pragmatic local approach with an eye to wider environmental issues is likely to result in more progress than blind adherence to a rigid global definition.

5 Getting household excreta management right

For the moment, we will concentrate on what is known about management of excreta at the household level because for many countries this remains the largest single challenge and no real progress can be made unless access starts to increase. Some of the lessons that have been learned about how to increase effective use of sanitation are outlined briefly below. Readers are directed to additional sources for lengthier discussions of these arguments.

- **Hardware alone is not sufficient:** The health gains of universal access to basic sanitation only accrue if people (a) use the available sanitary facilities properly and (b) practice some key hygienic behaviours. This means that hygiene promotion and social marketing are always needed in tandem with hardware provision[7];
- **Household decision making is crucial:** because behaviour change is central to achieving health gains from sanitation it follows that service providers need to focus primarily at this level. Not only does this mean that hygiene promotion is central to any sanitation strategy, it also means that hardware should be appropriate. In simple terms it is no good selling – or even giving – people a toilet which they don't want and are not keen to use[8];
- **The public nature of sanitation remains important but public and private benefits need to be in balance:** There remain public good aspects of sanitation (primarily environmental protection and public health) and while many commentators may call for a "scaling down" of all public provision, it is not feasible to expect households to take responsibility for wider societal concerns. Thus government has to find pragmatic ways of balancing local/ household needs with wider societal ones. Linking household service provision with community level planning (either through "voluntary" type community processes, commonly used in rural areas, or through the due process of local government, more commonly applicable in urban areas) can be vital in creating local mechanisms which can achieve this balance[9].

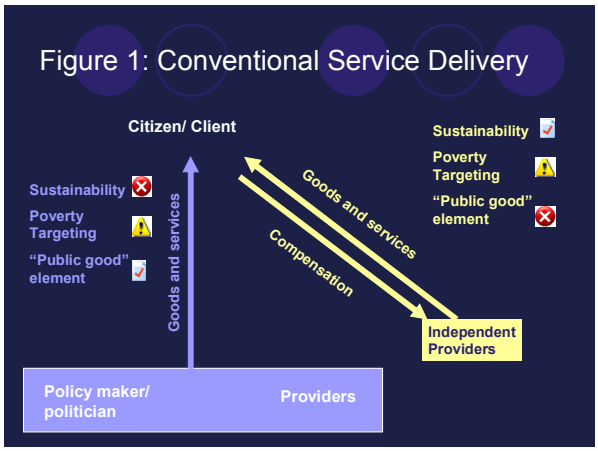
6 The Right Fit: Are our Institutions up to the job?

Excreta management is arguably the most challenging aspect of sanitation for governments precisely because *change revolves around household level decisions – behaviour and investments*[10]. For countries with very low access this means that public funds should be used in ways which *maximise the impact on household behaviours and decisions*. The problem is that most countries don't have institutions that do this very well[11]. It is much more common to find organisations which mirror those arrangements commonly found in countries with very high or universal access to sanitation. Far from focusing on the household, these institutions have

[7] Environmental Health Project (2003) *The Hygiene Improvement Framework: a Comprehensive Approach for Preventing Childhood Diarrhoea* Arlington VA
[8] Water Supply and Sanitation Collaborative Council (2000) *Vision 21 – A Shared Vision for Hygiene, Sanitation and Water Supply and a Framework for Action* Geneva
[9] See for example Wright, A.M. (1997) *Toward a Strategic Sanitation Approach: Improving the Sustainability of Urban Sanitation in Developing Countries* UNDP-World Bank Water and Sanitation Program
[10] This is particularly true in the absence of public funds for universal *operational* piped water-borne sewerage since the bulk of hardware costs are likely to be carried at the level of the household.
[11] Institutions include organisations, and the systems of societal norms, rules and regulations under which they operate

evolved to maximise the *efficiency of operating utility services*, with a focus on managing the *public good* elements of sanitation (protection of the environment and management of environmental heatlh at the societal level). Most of the organisations in industrialized nations no longer have much to do with households at all; hygienic household behaviours are entrenched, and the facilities that make them possible (reliable, abundant piped water and hygienic toilets in the house) are universally available.

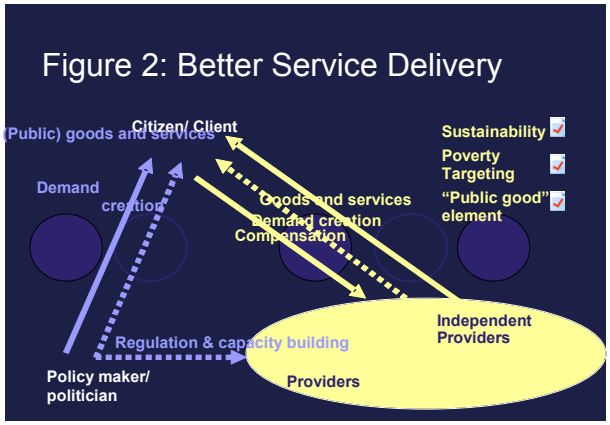
So a key question for countries where access to sanitation remains very low is how to devise new institutional arrangements which do achieve the needed focus on the household.



The recent World Development Report 2003 notes that in "conventional" service delivery arrangements, the same agency is often responsible for both service delivery and oversight while the "citizen/ consumer" is a passive recipient rather than an active participant (see Figure 1). The WDR notes that service delivery has tended to be very much "supply-driven" and centralized (suited to a "public-good" approach to sanitation and assuming that economies of scale could be achieved). Sanitation and water supply have often been delivered in tandem irrespective of relative levels of demand for each service. Over time however, the faults in this approach have become more apparent and many communities who have remained unserved or whose "public" facilities have collapsed over time, have turned to self-provision or provision through unregulated third-party providers, small-scale independent business, or staff of the government agency operating in a private capacity. Recent research in India indicates as many as 8% of rural households across the country had invested their own money and used small private providers to construct latrines which is significant when compared with progress made through the national sanitation program[12]. Research in Africa confirms that the role of the small scale private sector in sanitation provision is significant[13] and these findings are backed up from anecdotal evidence of a high degree of self-provision in East Asia. JMP

[12] Kolsky, P., E Bauman, R Bhatia, J. Chilton, C. van Wijk (2000) *Learning from Experience: Evaluation of UNICEF's Water and Environmental Sanitation Programme in India 1966-1998* Swedish International Development Cooperation Agency, Stockholm

[13] Collignon, B. and M. Vezina (2000) *Independent Water and Sanitation Providers in African Cities: Full Report of a Ten-Country Study* Water and Sanitation Program



confirms this finding. Between 1990 and 2000 the additional people served with sanitation was much larger than could have been expected as a result of the reported investment. .

New approaches need to increase the focus on and influence of the citizen/consumer. For sanitation this probably means recognizing the important role played by small scale service providers, and households themselves in provision, and also the potential for a wide range of additional actors to engage with households at the local level. Even greater gains could arise if sanitation can be brought within a wider process of development at the local level[14]. This would have two broad advantages: firstly in increasing the ability of local governments and communities to have a real influence on investment decisions; and secondly in reducing the costs of local government support by utilizing a common set of human resources to support collective community and household action on a range of developmental issues.

The implications of this may be quite fundamental in many countries.

- Firstly it suggests breaking the automatic link between delivery of water supply and sanitation, and creating much stronger linkages with other services which engage with households in a more direct and continuous manner (such as health, education, agricultural extension, rural development etc). The role of local government and community in service provision may have to grow at the expense of centralized service delivery agencies[15];
- Secondly it suggests a change in attitudes to sanitation – with a greater focus on sanitation as a business that functions at the level of the household. Public funds could leverage access more effectively where they are directed towards hygiene promotion and sanitation marketing along with other "ancilliary" services (micro finance for example) and to supporting an emerging market of smaller service providers who can respond to

[14] This can be done either through local government processes or external mechanisms such as social funds.
[15] While many countries have already achieved this type of decentralisation others have not; many centralized water and sanitation agencies still take full responsibility for all aspects of sanitation service delivery.
The links between water supply and sanitation are of course many and complex; poor sanitation may impact on drinking water supplies – particularly where these depend on shallow groundwater, and in urban settings the impact of networked waste collection and disposal on downstream users must be taken into account. However, such interlinkages do not require services to be delivered in tandem – what is needed is good strategic policy making and planning to ensure that investments in water supply and sanitation are mutually supportive.

changing demand at the household level[16]; and

- Thirdly it suggests a redirecting of public provision away from household facilities towards explicit "public good" elements of the system (waste water treatment and networks in urban areas for example)[17].

Many newer water supply programmes seek to replace centralized service delivery agencies with a range of service providers, offering a wider range of support services. In sanitation progress has sometimes been slower, and there are a number of legitimate technical reasons for this including a weak understanding of how governments can most effectively support and promote demand for sanitation and changed hygiene behaviours.

However, political resistance may be a more significant factor. One hundred and forty years ago middle class Victorian Britains failed to grasp the pressing need to increase access to basic sanitation for everyone; fearing that public expenditure on such services would be wasted and worse, would divert scarce public resources from other "more important" needs. Today the same concerns exist, but in addition countries now have to overcome the institutional barriers of dismantling organisations which are geared up to delivery the wrong sorts of services. The costs of doing this may be too high for many politicians.

In sum it seems likely that increased access to sanitation is bound up with an increased ability on the part of the citizen/consumer to influence wider developmental outcomes. Despite a raft of international resolutions, the real political implications of getting sanitation right may still not be fully understood, or perhaps they are understood only too well.

7 The implications for scaling up sanitation – a new role for government

Given the arguments above we can now ask the question – can existing institutions deliver increased access to sanitation hardware and widespread behaviour change at scale??

Clearly there is no single "right approach" to getting sanitation right, but most of the success

[16] There is a pressing need for more analysis of the most effective ways of utilizing public funds to leverage increased access. The success of approaches such as that adopted by ZimAHEAD in Zimbabwe, and the total sanitation campaign in Bangladesh certainly point to the need to focus on and support local decision making. A recent evaluation of hygiene promotion programmes also suggested that their impacts are robust and long lasting (Bolt, Eveline (2004) *Are changes in hygiene behaviour sustained?* and Cairncross, S. and K. Schordt *It does last! Some findings from a multi-country study of hygiene sustainability* in Waterlines Vol 22, No 3 Jan 2004.) Further work is however needed to evaluate the conditions under which different approaches work best.

[17] This is not to suggest that there is no role for subsidies where they are effective in promoting increased access, but it does suggest that some national sanitation programmes contain latrine subsidy elements which are out of proportion with their effectiveness in increasing access and promoting equity.

stories focus on supporting the household and community to make changes, suggesting that public-sector actions can be most effective when they are geared up for:

- Stimulating demand for sanitation;
- Promoting behaviour change;
- Supporting new providers of services;
- Building capacity of providers and consumers;
- Funding "public" elements of sanitation; including importantly school saniation as well as elements of trunk systems and environmental infrastructure; and finally
- Regulating, for public policy reasons, management of the environment, hospital waste, hazardous waste, industrial waste etc

Where sanitation is still confined within a traditional "utility" organisation it may be difficult to reach households effectively. New skills may be needed; these may be drawn from existing utility service providers, other government agencies (health/ education/ agricultural extension), small scale commercial ventures, civil society groups, NGOs, and community based organisations. At the same time government has to get better at playing its regulatory role, finding ways to foster and promote innovation while holding service providers accountable and affording the right degree of protection to the environment.

For many countries with very low levels of access public support for sanitation is not geared up in this way. While the calls for action on sanitation seem to be getting louder (and arguably more complex), there may not be enough recognition that radical change is needed at the ground level, and there is not enough support for countries seeking to make such changes.

To make the needed shift in progress, many countries need:

- institutional transformation;
- increased focus on household behaviours;
- big push to increase demand;
- increased range of technologies and approaches;
- improved the effectiveness of public expenditure on sanitation and hygiene promotion; and
- more money spent more effectively.

But to do this they need support, money and new ideas.

8 Overcoming the Barriers

8.1 Institutional Transformation

Institutional transformation is difficult because it may entail a complete change in the way things are done. It will have implications for organisations and individuals, it may lead to a change in the way people are trained, what jobs they do and where they work. It may also result in a shift in power – with different organisations, professions or individuals having more or less influence over what is done, and over how money and resources are deployed. For these reasons, and also because new approaches need to be tested and developed, some countries may prefer to take a gradual approach, changing the way services are offered in geographically defined pilot areas for example, or moving staff around on temporary reassignments initially. However this is done, it will require support and resources, and attention to details.

The key issue is how to get the right skills and mix of staff working at the right locations. For some this may mean getting more people involved, in other situations it may also mean cutting back on certain staffing arrangements (for example, where small scale service providers can build latrines more effectively, centralized latrine-construction agencies may need to be scaled back). .

To be effective the system of sanitation service delivery needs:

- presence at the local level (a relationship with households and communities);
- skills to work with communities and households;
- experience and willingness to work with local civil society and/or private sector partners; and
- an ability to innovate and adapt solutions.

The range of possible solutions is wide and needs to be thought through creatively - think about it this way – it may be more important for Ministry of Health outreach workers to know about sanitary disposal of excreta and promote it within the context of hygiene behaviour change than to try and teach water supply engineers how to do hygiene promotion.

A forthcoming publication from the Collaborative Council points out that the needed human resources can be found in a wide variety of locations including[18]:

- **government agencies:** including water and sanitation agencies, health departments, education departments, environmental agencies, rural development teams, urban planning

[18] WSSCC, USAID, UNICEF etc (forthcoming) *Sanitation and Hygiene Promotion: Programming Guidance* WSSCC Geneva

departments, local government. Human resources may be available *at all levels of government from the national down to the local level*;

- **civil society:** households themselves, NGOs (working in water supply , sanitation, social development, health, education etc), community based groups, self-help groups, local/community government, micro-finance organisations etc; and
- **private sector** - small scale private providers, soap companies, building contractors, advertising agencies, media etc.

Given this range of human resources the challenge is to find ways to use them most effectively to make progress.

8.2 Focus on Household Behaviours

In general existing water supply and sanitation organisations are not very good at thinking about or engaging with communities and households. This is largely as a result of the inherited institutional arrangements which mirror those in areas where sanitation is seen as the delivery of latrines and the management of an existing utility service with oversight of environmental issues, rather than a 'start-up' business with a focus on changing attitudes and behaviours in the household. There is almost certainly a need to shift the arrangements so that people who have the right skills have an incentive to promote sanitation and hygiene behaviour changes at the local level. Those who have other skills (technicians for example) can provide support in three areas;

- Responding to demand for sanitation created at the local/ household level and supporting the development of new technologies and approaches (ie as service providers or in research);
- Supporting the provision of "public good" elements of sanitation such as public latrines, trunk infrastructure, pit emptying services, and environmental infrastructure (ie in the private sector or in research institutions); and
- Providing regulatory oversight on environmental and public health issues (ie in the public sector).

8.3 Big Push to Increase Demand for sanitation

One of the major reasons cited for the failure of sanitation programmes is the low level of expressed demand. This is often assessed within the context of an integrated water supply and sanitation project – the well-documented health benefits of improved water supply and sanitation have led many donor-supported and national programmes to tie delivery of these two services

closely together. This can however be problematic because of the differing nature of demand for the two services. In situations where both water supply and sanitation services are scarce or of poor quality, demand for improved access to water will almost always outstrip demand for sanitation. The benefits of the former are immediate, primarily private and accrue to the household irrespective of whether other households gain increased access. The benefits of sanitation, by contrast, are generally less immediate or obvious to the household (the connection between improved hygiene and health is often poorly understood), have a significant public element (improved health of the population as a whole is significant) and may not be secured by an individual household unless other households also act – a factor over which any individual household may have little influence.. Demand for sanitation may however change over time, as access to water supply improves, and as an appreciation of the wide range of benefits from sanitation grows[19].

As well as access to water supply other factors which may influence demand for sanitation may include[20]:

- **Awareness:** knowing that the goods/services exist and that they have benefits. For example, knowing that latrines exist and can be used to store excreta and knowing that a latrine can improve the health of children and have a positive impact on household income;
- **Priority:** deciding that the service is sufficiently important to merit needed investment For example, deciding to build a latrine rather than construct an additional room in the house or invest in a bicycle. Priority may be influenced by access to other services or a range of other factors such as status or social conventions. Priority may also vary between members of the households – and it is important to target demand creation and assessment activities appropriately (for example building a latrine requires a decision by the member of the household responsible for major capital investments in the home and that person should be a key target of a latrine marketing campaign);
- **Access:** having access to a service provider who will market and provide the specific service. For example having a local mason who knows what types of latrines can be built, help decide what is the most appropriate and build it; and
- **Influence:** being able to take effective individual action, or being in a position to participate in effective collective action. For example, having space to build an on-plot

[19] It is well documented that people value sanitation for many reasons ahead of health. Other factors include reduced nuisance from smells and flies; cleanliness; privacy and status or pride in surroundings.
[20] WSSCC et al (ibid.)

latrine, or being in a location where it is possible to participate in a condominial sewerage scheme.

The truth is that there is very little experience or knowledge about the best ways to go about promoting demand for latrines although more is known about promoting hygienic behaviours. What we do know is that people invest in latrines for a wide range of reasons, health usually comes low on the list, so it is important to understand this motivation and use the right "levers" to sell the product. Public funds can be legitimately used to improve marketing and hygiene promotion because these are areas that have significant public-good elements and which do not lend themselves to any form of commercial service delivery. One important area is clearly to keep up the pressure on development of good approaches to hygiene promotion. Other areas include development of new marketing approaches, supporting mass media and advertising as part of an overall marketing campaign, and improving the business and marketing skills of small scale service providers.

Marketing sanitation and promoting behaviour change are key areas where most countries have few skills, few incentives, and limited capacity. This is a priority area in the reshaping of public sanitation programmes.

Importantly countries need to use people and organisations who have an incentive to respond and who may be able to use their experience to develop new approaches. A first step is to look at who is providing latrines, soap and other hygiene-related goods and services and use them as part of the solution.

8.4 Increased range of technologies and choices

For many countries and regions, technical innovation is constrained by a series of limitations imposed through policies, planning regulations, technical norms and standards, and conventions. Technical conventions are usually developed for good reasons and may embody the technological "state-of-the-art". This does not prevent them from constraining innovation and preventing progress being made against access targets. The problem for sanitation is that many of these norms have been imported from elsewhere without due attention being paid to the local situation. Furthermore, written norms tend to describe a "best case" approach – an idealized solution which theoretically provides for a uniformly high level of services. This may be inappropriate if it is prohibitively costly cost or irrelevant (typical problems include a very high specification for levels of service, absence of appropriate standards for congested urban areas and rural districts and lack of flexibility).

Changing these norms and standards can however be challenging. Entrenched resistance may arise from technocrats who have a stake in preserving the status quo and whose training is rooted in accepted norms and standards. Organsiations may also resist change as they may not be geared up to deliver innovation and improved approaches were standards to be modified.

However we know that this is an important issue. It is clear that the world cannot afford water-borne sewered sanitation for all, and that this approach would not work for many of the communities and households that currently lack access. Even some of the best known "appropriate" technologies cannot appropriately be used in every situation[21]. We also know that money is in short supply – so cheap and effective ways of increasing access are more important than rigid adherence to existing norms. The key probably lies in supporting local innovation based on a good understanding of what has been tried elsewhere.

This is one area where the international community can clearly provide needed support – through development and research, and through support to indigenous research and development, both in the private and public sectors.

8.5 Improving the effectiveness of subsidies in sanitation and hygiene promotion

Increased access to sanitation and improved hygienic behaviours have a significant positive public health impact; public subsidies are therefore justified. Traditionally, many subsidy programmes have focused on latrine construction – with public funds made available to households either before or after completion of a latrine. Many of these subsidy programmes appear to be pro-poor, and therefore usually attract strong political support. However, there is growing evidence that they may not be the most effective vehicle to increase access to sanitation and may also be subject to corruption and malpractice. Subsidy programmes which focus solely on construction of latrines may fail because:

- they are not self-sustaining – the level of funding required to finance needed increases in access is not available at the prices set by the subsidy regime;
- they fail to raise demand– either because cost is not the primary constraint faced by the household, or because demand is so low that households fail to access the subsidy;
- thay fail to reach the poorest people because the "household contribution" for a "standard" latrine is too expensive;

[21] footnote Zimbabwe case

- they distort the market when overdesigned "standard" latrines keep prices at an artificially high level, pricing households and suppliers out of the market and preventing innovation; or
- they distort demand when poorly constructed subsidised latrines fail to attract households.

Subsidies need to be designed to achieve whatever public policy objective has been agreed upon. Thus in countries where increased access is deemed to be the priority then subsidies should be designed accordingly. Where environmental protection is rated more highly, more funds can be diverted for this purpose.

Where subsidies for latrines are being considered the following general principles may be helpful[22]:

- in the public interest use subsidies to maximise health benefits and increase access specifically to groups who are persistently excluded;
- subsidise the lowest possible level of service to maximise spread and avoid distortions to the market. Leave room for households to make incremental improvements over time;
- base subsidies on solid and rigorous information about what types of service people want and are willing-to-pay for, what is the affordability for the target group, and what can be scaled up in the long term.

However, there is also a strong argument for viewing subsidies in a holistic manner – looking at the full range of services and support needed to increase access, and distributing public funds accordingly. A clear understanding of the current situation – what people want and are willing to pay for, and the reasons why households are failing to adopt hygienic practices or construct latrines, can provide insights into the most effective ways of supporting increased access. In general governments may end up deciding to:

- commission and pay for formative research to identify what motivates behaviour change;
- pay for national programme of hygiene promotion;
- pay for a elements of a national programme designed to stimulate demand for sanitation through mass media, social marketing etc;
- support small scale independent service providers;
- promote and finance technical innovation;
- finance school sanitation; and

[22] WSSCC et. al (ibid.)

- pay construction costs only for elements of the system whose public benefit is greater than the private benefit (trunk infrastructure, shared facilities, household facilities for the minority of households whose demand would otherwise not be high enough to construct hygienic means of excreta disposal, environmental infrastructure etc)[23].

8.6 More Money

There is no doubt that, even if investments can become very much more effective, there is still need to increase resources to this important development sector, if progress is to be made towards the MDG targets. There are a limited range of sources of funding including:

- central government;
- regional/ local/ urban government;
- external support agencies (donors);
- large scale private sector;
- shared community resources;
- small scale private sector; and
- the household.

Of course any private sector investment will ultimately be repaid from one of the other sources (government, community or household) while the majority of donor funds will also have to be repaid from government sources.

Currently the bulk of the investment is probably coming from government, donors and households themselves although exact figures are hard to estimate because of the range of sources and the fact that many expenditures are bound up with general investments in water supply *and* sanitation.

Attracting additional funds into the sector is difficult because no-one knows much about how to do sanitation well at scale; donors fear funds will be wasted, the private sector is unwilling to invest because demand is not clear and institutional constraints may make investments risky and household demand is often too low to precipitate investments.

What we do know is that good policies and institutions will attract more funds. For many this means that there needs to be an overhaul of the system to attract more money. This may sound like an insurmountable challenge but in many cases it is not – in many countries it may simply be a case of getting people who are already out in the field to work more effectively on sanitation

[23] The role of public funding in urban sanitation is crucial. In congested urban areas, shared infrastructure or systems of waste disposal are essential if household actions are to result in a cleaner and healthier living environment.

marketing and hygiene promotion. Furthermore, a thorough review of the effectiveness of existing national or local programmes may conclude that money currently used to finance construction of latrines for example, may be more effectively used elsewhere. Substituting appropriate levels of household investment for public investment may free up additional funds.

9 What Next? Raising the Political Profile of Sanitation and Hygiene

Over the years it has been clear that raising the profile of sanitation and hygiene is difficult principally because it is a topic subject to wide ranging cultural taboos. In industrialized nations and amongst those in positions of power, this plays out as a reluctance to discuss the looming, ever present sanitary crisis (no-one wants to read about toilets in their morning paper). Lacking the facts, many people have assumed other development issues dwarf the sanitation crisis – there is a lack of public awareness and support for sanitation as a core development concern.

There are however, lessons to be learned from the experience with HIV/AIDS, another subject riven with cultural taboo, which has nonetheless succeeded in gaining the spotlight and mobilizing general support across cultures. The problem with this comparison is that HIV/AIDS is something which has touched people in rich and poor countries and across households irrespective of wealth or influence. It has also been able to mobilize support around some key actions with clear cut goals and objectives (the development of ever-improved drugs for example and the success of national campaigns which have brought the disease under a degree of control in some middle-income and wealthier countries).

Nonetheless some lessons can and have been learned. The importance of a single coherent call for action cannot be played down – and indeed the impact of a coordinated campaign of awareness raising has already been felt with sanitation being added to the MDGs in Johannesburg, Much of the credit for this achievement can be laid at the door of the Water Supply and Sanitation Collaborative Council whose advocacy campaign: “Water, Sanitation and Hygiene for All (WASH)” has had impact at international level. This has been achieved largely because the Council, formed as it is from a coalition of many key sector players, has been able to coordinate and use all their efforts to speak to a few selected simple messages which have all served to reinforce each other. The campaign has also highlighted the importance of information – and there are still many key information gaps which could usefully be filled to help analyse the most appropriate ways to increase access to sanitation.

At national level too, there is a need for coherence of action, and information. More efforts are needed to establish what is really happening in sanitation – a number of useful tools can be used

to enable policy makers and professionals to start a dialogue with communities and households about how to better address their needs. Simply studying what people are doing, and exploring how they have changed their hygiene habits over time can open the way to such a debate[24]. Finally of course, the lesson of the WASH campaign can be replicated at local level – if more people can be drawn into the process of promoting sanitation, both the strength and the coherence of the message will grow until it is undeniable. This is a process which requires support and may take time. As we saw at the beginning, sanitation has many facets and difficult decisions may need to be taken about how to best deploy public funds over time to achieve the overall objective. Such decisions can best be made in the context of open and fair discussions with all sector actors, based on a good understanding of what is currently happening, and by involving households and communities in an evaluation of their needs.

We also saw that getting sanitation right may entail radical changes in the way it is conceived institutionally. Recognising that this may be a political process is important – once again the lessons from the HIV/AIDS are important – politicians have a stake in significant development subjects and should be drawn in rather than excluded from the debate.

10 The Selling Points – Key messages from the sector

10.1 Sending Clear Messages

In summary sanitation is important. It entails both changes in behaviour and greater access to sanitation hardware, and the key changes take place at the household level. New institutional arrangements are almost certainly needed if change at this level is to take place at the scale needed to meet the MDGs. Importantly sector professionals need to send strong coherent messages to policy makers, backed up with better information about what is currently happening, to enable difficult changes to be effected. No action is not an option – the one clear and undeniable fact is that, without significant changes to the common conception of sanitation , there is no prospect of achieving the MDGs and providing a huge number of people with the means to act and live with dignity and in safety.

10.2 Sanitation and Hygiene Promotion "front and centre" - not just as add-ons to water supply

Sanitation lags behind water supply because it is a different type of service and one to which

[24] Tools for doing this are many and varied – the construction of simple latrine acquisition curves for example will force professionals into a discussion with households about what has changed over time, and the reasons why some households have made investment and behaviour decisions about sanitation and hygiene. It also provides needed information which can be used in the development of hygiene promotion and sanitation marketing campaigns.

households have a very different attitude. For too long the two have been automatically joined together institutionally. While it is clear that access to both is a key determinant of improved health and reduced poverty, this does not mean that the two have to be delivered in tandem. Governments can set up institutional arrangements which increase households' ability to access both services but this does not mean that the same approaches are needed for both.

10.3 Sanitation as a High Profile Concern

Sanitation has been a "hidden" development issue for a long time. Recent successes at international level (the WASH campaign) and at national level (South Africa, India, Zimbabwe and many other countries have made high-profile efforts to focus on sanitation) show that it is possible to bring the spotlight to bear on this important subject. New approaches are probably needed to raise it's profile – one area which has not really been explored is to use glamour to highlight the issue by finding champions (sportsmen/ film stars from poor regions, etc etc) rather than "sanitation specialists" to discuss the need for action.

10.4 Generate information about what is happening

As well as highlighting the needs, there is an urgent requirement to know more about what is happening locally, nationally and internationally. Information on investments and coverage are generally thought to be flawed or incomplete and could be improved. At the local and national level there is little reliable understanding of what households actually experience, and what they would like to have access to. Assumptions can rapidly become outdated, and there is little effort to find out what is the current situation. More work is needed to unpack what is happening at this local level.

10.5 Use shock tactics

Fundamentally the sector must not be afraid to tell the truth about what really happens. The lack of sanitation is shocking and has a devastating impact on peoples' lives. We should not be afraid to say so.

10.6 Focus on getting the job done

Sanitation is not rocket science – but in many ways it is more difficult because it is primarily about understanding what motivates people to act in certain ways, and then finding ways to change those motivations. In many countries, the understanding that sanitation is about household behaviours has been subverted by a focus on hardware delivery. Hardware is important there is no doubt; people need latrines, environmental infrastructure is vital; but it

should be understood in the context of the full range of services which should be deployed to serve peoples' needs and increase their access to what is a very basic service.

More people need to be pulled into this effort, which will require many "traditional" sanitation service providers to draw back and allow more actors to enter and support the market. Innovation and pragmatism must be brought to bear to find local solutions which respond to local needs in a cheap and effective manner.