SCHOOL SANITATION

School sanitation – Returning dignity to South African schools

The school sanitation management model developed as part of a Water Research Commission (WRC) funded project has been piloted and refined. The model is part of a suite of tools towards truly sustainable management of school sanitation in South Africa. Article by Sue Matthews.



The tragic death of Lumka Mketwa, the five-year-old girl who drowned in a pit latrine at an Eastern Cape school on 12 March, has prompted a renewed uproar about the state of school toilets, a little over four years since Michael Komape suffered the same fate a week after starting school in Limpopo.

President Cyril Ramaphosa reacted by giving Basic Education Minister, Angie Motshekga, a directive to conduct an urgent audit of unsafe structures at schools – particularly ablution facilities – and come up with a plan to fix them within three months. This had in essence already been done, because the National Education Infrastructure Management System (NEIMS) report for January 2018 indicates that 8 702 schools countrywide have pit latrines, which are 'not allowed at schools' according to the Norms and Standards for School Infrastructure regulations, published in November 2013. Although most of these schools have other types of toilet too, 1 426 of the Eastern Cape's 5 393 schools have only pit latrines (37 are reported to have no sanitation facilities at all), and a similar situation exists in KwaZulu-Natal.

In terms of the regulations, the provinces were given a year to draw up plans indicating how they would meet the Norms and Standards by the end of November 2016, and when



New basins installed prior to the start of the pilot programme had ready-made hole for taps, but wall-mounted taps were fitted instead. These do not extend far enough over the bowl, so water falls onto the basin ledge and then through the holes, creating large puddles on the floor. The contractor painted the walls and doors but then left behind the used paintbrushes, which learners used to daub paint on the newly renovated facilities.

that date came around they submitted progress reports on implementation. These documents have been used to guide expenditure of the Accelerated Schools Infrastructure Delivery Initiative (ASIDI) funds administered by the National Department of Basic Education, and the Education Infrastructure Grant made available to the provincial departments.

Minister Motshekga nevertheless convened a Council of Education meeting on 21 March with provincial education ministers, department heads and officials responsible for school infrastructure, and subsequently issued a media release about the agreed way forward.

"One of the big challenges that affects roughly half of the schools that are still reported to have pit latrines is that alternative ablution facilities have been constructed, but that the old pit latrines still remain," she noted. "We already have an existing plan in place that is intended to eradicate these unsafe and inadequate toilets. We need to confirm the information we already have and fast track our existing plans. Our priority is safety."

Unfortunately, the most common alternative to pit latrines in the Eastern Cape, KwaZulu-Natal and Limpopo are so-called 'VIP toilets' – ventilated improved pits – which also pose a safety hazard if they are damaged or not properly maintained. A broken floor, unstable pedestal or loose seat could cause a learner to fall into the pit below.

As part of an earlier WRC-funded study (K5/2381) to investigate the factors contributing to the failure of on-site sanitation at rural

schools, Pietermaritzburg-based firm Partners in Development (PID) developed guidelines for building and managing school toilets (**Report no. TT 698/16**). Ways of making VIP toilets safer were suggested, such as adding parallel bars below the pedestal, putting handles on either side of the toilet seat, offsetting the pit behind the pedestal, and providing lower toilets with smaller holes and seats for younger learners.

It was emphasised throughout the guidelines, however, that without proper management any new or renovated sanitation facilities could quickly revert to an unsafe state – which not only encompasses the risk of falling into latrines, but also the health hazards posed by filthy, unhygienic conditions and the threat of bullying, assault or rape. All learners have the right to health and safety, as well as dignity, so their need for privacy should be respected too.

The PID project team therefore proposed a model for managing school sanitation effectively in the final chapter of the guidelines, and also produced an accompanying management handbook. They recently completed a follow-up project to pilot these outputs in eight schools in the Vulindlela area of Pietermaritzburg, following a selection process and renovations by the KwaZulu-Natal Department of Education.

The management model relies largely on a sanitation team at each school made up of the principal, a teacher acting as a Health and Safety Manager (HSM), and a cleaner or Health and Safety Officer (HSO). The concept was designed to ensure a chain of accountability and communication, and roles and responsibilities were outlined at the start of the programme. In addition, training was given on disease transmission, suitable cleaning techniques, and methods for reporting and monitoring work. Supplies were provided, and their usage was assessed on a monthly basis. Apart from regular visits to each school, interviews were conducted with the sanitation team members every month or two, and with a group of learners mid-way through the pilot programme and after its completion.

Four main aspects were assessed in the pilot programme – supplies, the cleaning protocol, monitoring and reporting, and oversight of learner behaviour.

Supplies

Most of the cleaners were not using a bleach product before the pilot programme, which meant they were unlikely to be effective at killing germs. They were therefore informed of the importance of using bleach to clean taps, handles and toilet seats, and any other sites contaminated by faeces. Unilever donated its bleach product Domestos for the programme, as well as the soapy cleaner Handy Andy for mopping floors and cleaning other surfaces. Typical usage during the programme indicated that schools should budget for 4 litres of bleach cleaner per month, and 5 litres of soapy cleaner.

Half a roll of toilet paper per learner per month should be sufficient, but careful consideration needs to be given about how best to make this available to learners. Leaving toilet paper in the ablution blocks inevitably means that some of it is taken home, but if it is given to teachers for safekeeping they must ensure learners are aware of this and feel comfortable asking for it.

The project team also delivered 25 litres of liquid hand soap per month to each school, but usage was low, because the dispensers were either broken or were not filled when they ran out of soap. If these obstacles are overcome, 25 litres should be enough for 500 learners, or bar soap made available instead.

Apart from these consumables, cleaning equipment such as mops, buckets, wiping cloths and toilet brushes would be needed for a successful school sanitation management programme, and the HSO should be provided with protective gloves, boots, overalls and masks – all replaced at varying intervals. A dose of deworming tablets for the HSO every six months should also be included in the budget. All of this adds up to a total estimated cost of R10 195 per year, which for a school of 500 learners works out at only R20 per learner. This cost could feasibly be covered under the Norms and Standards funding that schools are allocated as a contribution to running costs, but most schools lack the ability to set aside that funding – plus the disbursements are often late, which hampers planning and results in consumables running out.

The project team did not include sanitary pads in the budget as they are being supplied to just under a million learners at KwaZulu-Natal schools by the provincial Department of Education. At the end of March, news reports revealed that the Department had dramatically inflated its budget for this, and there was a huge oversupply problem, with some schools having so many pads that boys were using them as shin guards when playing soccer! It subsequently emerged that the department had spent R40 million on sanitary towels in the 2017/18 financial year, almost as much as the R60 million required to implement the entire sanitation programme outlined above at all of the province's 5 840 schools.

Cleaning protocol

The pilot programme's recommended cleaning frequency in school toilets was three times per day – once in the morning and then after each break – but this could not be achieved. Originally, the Department of Education had agreed to appoint an EPWP worker at each school to clean and monitor the toilets, but this arrangement fell through. The HSO role was therefore undertaken by the schools' existing cleaners, and the cleaning frequency differed from school to school according to the cleaners' willingness. Those who were flexible and recognised the need for regular toilet cleaning thanks to their new-found knowledge on disease transmission were able to adjust their cleaning rosters so that the key disease hotspots were cleaned daily. Some of them noted that the job got easier and easier the more regularly they did it.

At one school, however, the cleaner flatly refused to clean the toilets, claiming it was not part of her job, and since the school did not have a copy of her job description, no action was taken. Yet the Department of Education's standard job description for school cleaners has ablution facilities at the top of the list of locations where cleaning duties must be performed, followed by offices, boardroom, staff room, stores, visitors' rooms, furniture, kitchen, and waste removals. Most cleaners also spend much of



Boys will be boys so active monitoring and awareness of their behaviour is a vital part of any school sanitation management programme. In this case of mischief-making, beans from the previous day's feeding programme had been poured into the urinals and basins, and strewn all over the floor.



A Partner in Development fieldworker shows school cleaners how to use the administrative forms developed for the sanitation management pilot programme.

their time cleaning classrooms and verandas, even though these aren't listed in their official job description. The cleaning activities are no doubt largely influenced by the principal's requirements.

"The HSO cannot be able to clean the toilets daily," said one principal during an interview. "If it would be so, it would mean that she would need to sacrifice some of her other duties and not clean maybe the offices and so on."

Clearly, though, offices are a low priority in terms of their potential for disease transmission, and may only need to be cleaned once per week. Learners could even be tasked with cleaning their classrooms or sweeping verandas, perhaps through a roster system, but should never be made to clean the toilets as it puts them at risk of disease.

Monitoring and reporting

The teachers' envisaged role as Health and Safety Managers (HSM) was to monitor the sanitation situation on a daily basis, discuss any issues with the HSO, and report problems to the principal. They were meant to sign a daily cleaning checklist filled out by the HSO, and complete a weekly sanitation infrastructure inspection form. The forms were not used as intended, however, and in some cases the HSMs either did not visit the toilets every day, or did not communicate with the HSO or principal. This was often due to interpersonal issues, feelings of powerlessness, or simple conflict avoidance.

"To the cleaner, it seems like you want to boss him/her around, while he knows the principal to be the boss and only the principal can give him orders," noted one HSM. "Then as a teacher I am afraid to communicate with the cleaner. I have to go to the principal to report. It is the principal who will then have to take action, maybe call the cleaner to have a talk about the reported situation in the toilets. At the same time if the principal does that another challenge arises because to the cleaner you seem like a spy. That is the challenge we face in terms of communication."

Some HSMs did play an active role, however, and provided moral support to the HSO, talked about toilet etiquette at school assemblies, or got learners involved in monitoring and reporting the condition of the ablution facilities – or other learners' behaviour in them.

Oversight of learner behaviour

The PID project team point out in their final report that the behaviour of learners in the toilets will impact the effectiveness of sanitation management, even if a school has all the proper supplies, protocols and structures in place. "If the learners are not properly monitored and disciplined, a cleaner's work in the toilets can be negated within moments by destructive behaviours," they state.

Apart from urinating or defecating on the floor, learners often engage in deliberate acts of vandalism, or mere mischief-making.

"They threw toilet papers out of the windows; the whole school is filled with them," reported one HSO. "Woo! I have to pick them up every morning. They come to me and ask for them, and then I give each class rep. The next thing you know, rolls and rolls of toilet paper are all over the school, on trees, when it's windy they are blown all over and I have to pick them up. There are those who blow their noses and throw it out the window."

In this case, the school responded by discontinuing distribution of toilet paper to the classrooms. Learners now have to go to the office to request toilet paper, and it is likely that many just do without, or have reverted to using scrap paper or textbooks.

The project team stress that it is vital for the school's sanitation team to develop a strategy for keeping learners' behaviour in check, ideally involving both learner reporting and active monitoring by staff.

Model refinements

Based on their findings from the pilot programme, the project team have refined the sanitation management model and changed a number of aspects. For example, roles and responsibilities have been more clearly defined, the forms are being revised – they will now comprise an easily completed daily cleaning checklist, a log of sanitation problems, a weekly supplies inventory and a monthly infrastructure inspection sheet – and the cleaning protocol has been adjusted so that contamination hotspots are cleaned every day, while floormopping and other tasks take place at least twice per week. New tools have also been developed to educate learners and assist with sanitation management planning.

The project team has recently started working on a larger pilot programme being implemented in 100 schools in KwaZulu-Natal and 50 in the Northern Cape, in partnership with Unilever and the Department of Basic Education. If all goes well, it's hoped that the model will be adopted and rolled out to schools throughout South Africa, combined with appropriate training for HSOs and principals, and tools to support school governing bodies (SGBs) in budgeting for sanitation.

Failing that, the project team urge SGBs and education officials at all levels to play a more active role in enforcement and support functions to achieve truly sustainable management of school sanitation. Ensuring that monitoring and maintenance is routinely undertaken will not only cut down on costs for new infrastructure, but also protect learners' rights to health, safety and dignity.



The HSO workshop at the end of the pilot programme closed with 'thank you' gifts for all the school cleaners who took part, as well as trophies for those receiving special recognition.