Shacks end up on marginal land exposed to the risk of storms, flooding, fire and disease. People suffer physical harm, psychological setbacks, disrupted livelihoods and lost property. Many behave as transient migrants, and remit any spare money to their families in rural areas.

Few shack dwellers advance onto the next rung of the housing ladder, and they only have access to second-class schools, healthcare and basic services, which dampen prospects of future generations. Shacks also burden the local tax base, because public service costs cannot be easily recovered.

> Research is required to track whether households improve

## their economic status

## after moving into informal

 settlements.
## Emerging findings

These perspectives have contrasting implications for government policy. The first suggests nurturing shack areas and investing in the people, while the second implies a more radical approach. Systematic research is required to assess which is most relevant to South Africa.

The author's preliminary analysis using the Labour Force Survey suggested a mixed picture, with an element of truth in both conceptions. There was some sign of progression out of poverty in that many shack dwellers had jobs, yet the extent of improvement was limited for the vast majority whose jobs were low paid and insecure. Moving to the city seemed to have helped rural migrants to access economic opportunities, but the quality was modest. Limited upward mobility could be a reason why there is so much frustration and social unrest in these communities.

Further research is required to track whether, over time, households improve their economic status after moving into informal settlements. Another objective is to identify those settlements in which cities have the greatest positive impact on people's prospects. A deeper understanding of the interactions between 'people' and 'place' is essential for more appropriate policies that support the upgrading of suitable settlements and the redevelopment of shack areas with serious locational problems.

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This article is based on a paper written for the Research Project on Employment, Income Distribution and Inclusive Growth (REDI3X3) funded by the National Treasury.

HIV/AIDS awareness levels of TVET students

South Africa's technical and vocational education and training (TVET) sector comprises 50 colleges with a joint enrolment of some 658000 students and a staff complement of about 16 000. Geoffrey Setswe et al report on a study to determine the level of HIV/AIDS and TB-related knowledge and attitudes of students and staff that could inform the design of HIV/

AIDS and TB interventions in this sector.

The overall purpose of the Higher Education and Training HIV and AIDS (HEAIDS) programme is to reduce the threat of HIV/AIDS in the higher education sector and to mitigate its impact. In 2009, HEAIDS commissioned a pioneering study on HIV prevalence and knowledge, attitudes, behaviours and practices (KAPB) involving almost 24000 students and staff at 21 of the country's 23 universities.

The 2014 national survey of knowledge, attitudes and behaviours (KAB) of students and staff at technical and vocational education and training (TVET) colleges (formerly known as FET colleges) was the first to be conducted in this sector to obtain baseline measures on KAB of HIV and AIDS and related risk factors.

## Study methods

Data was collected from a representative sample of 5651 students and 1003 staff members, covering about $70 \%$ of campuses. The sample was sufficiently large and representative to allow findings to be generalised to staff and first-year students in the TVET sector.

A member of the research team read the questions to the class, with students completing their own questionnaires. Individuals in sampled classes were free to opt out of the survey but the rate of refusals was very low. Staff members who participated in the survey were sampled on an individual basis. They were either privately interviewed by a fieldworker who completed the questionnaire, or completed the questionnaire themselves.

## Findings and discussion

## Demographic profile

Male and female students were almost equally represented in the sample, about $88 \%$ of students were under the age of 25 years and more than three-quarters were from urban areas. Among staff members, nearly 54\% were female, about 90\% were 25 years or older, and the majority were urban dwellers. The racial composition of the two samples differed slightly (Table 1).

Table 1: Racial identity of students and staff at TVET colleges (figures rounded off)

| Racial categories | Students <br> $(\%)$ | Staff members <br> $(\%)$ |
| :--- | :---: | :---: |
| African | 89 | 77 |
| White | 5 | 12 |
| Coloured | 5 | 10 |

The survey cast some light on the financial circumstances of students and staff, indicating that students were in more constrained circumstances than staff (Figure 1).

## Almost one in three students

 indicated they did not have enough money for food and clothing.Figure 1:


Almost one in three students indicated they did not have enough money for food and clothing, and a further $44 \%$ said they went short of other basic things, although could afford to buy food and clothes. Almost three quarters of students ( $74 \%$ ) relied mainly on parents or family members for income, while about one in 10 indicated a bursary was their main source of finance.
About 8\% of male students said they derived most of their income from a part-time job, compared to nearly 3\% of female students. About 5\% of female students relied on a partner or husband for income and another $5 \%$ on child support or a social grant. Male students were less likely to report being supported by a partner, spouse or social grant.

## 83\% reported they were single,

## yet more than $60 \%$ later reported

## they had sexual partners.

The reported relationship status of students is shown in Figure 2. The striking feature was that 83\% reported they were single, yet more than $60 \%$ later reported that they had sexual partners.

Figure 2:


Source: HSRC 2015

Information on living arrangements indicated that $51 \%$ of staff members lived with their husband or wife and $8 \%$ with their sexual partner, while $23 \%$ indicated they were in a relationship but did not cohabit. Table 2 shows the sample composition in terms of sexual orientation.

Table 2: Sexual orientation of students and staff members at TVET colleges (figures rounded off)

| Sexual <br> orientation | Students <br> $(\%)$ | Staff members <br> $(\%)$ |
| :--- | :---: | :---: |
| Heterosexual | 83 | 87 |
| Homosexual | 7 | 5 |
| Bisexual | 5 | 4 |
| Other | 4 | 4 |

## Awareness and knowledge of HIV/AIDS andTB

Staff members consistently showed higher awareness and knowledge of HIV, AIDS and TB compared to students. There was high awareness about sexual transmission of HIV and the preventative role of consistent condom use. Knowledge of mother-to-child transmission of HIV and antiretroviral (ARV) prevention was slightly lower than knowledge of sexual transmission. A surprising finding was that about that $30 \%$ of students and about $19 \%$ of staff were not clear on the fact that AIDS could not be cured.

## Staff mostly reported that they

sourced information on HIV/ AIDS from the mass media.

Staff mostly sourced information on HIV/AIDS from the mass media, including TV ( $68 \%$ ), radio ( $59 \%$ ) and newspapers ( $48 \%$ ), and about half also got information from health facilities. Only one in five students obtained information from the media or health facilities, and even fewer from education institutions. Online and social media were not widely used by TVET students to access HIV/AIDS information.

Figure 3:


Source: HSRC 2015

## Attitudes towards condoms and their use

Half of male respondents and a third of females said condoms felt unnatural (Figure 4). In addition, 38\% of male students and $40 \%$ of male staff felt that condoms changed the sensation of orgasm. Female respondents were only half as likely to report this as their male peers.

A third of male respondents and one in five women said they only used a condom if their partner wanted this. Four in 10 male respondents said condoms should only be used when having sex with non-regular partners. One in four females shared this opinion.

Figure 4:


## Patterns of condom use

- Reported condom use at last sex with a (main) partner was 55\% for students and 35\% for staff.
- Condom use at last sex with a non-regular partner was around $75 \%$ for all respondents.
- Consistent condom use ('every time' or 'almost every time') was reported by $80 \%$ of students when having sex with their partner and by $74 \%$ when with a nonregular partner.
- The corresponding figures for staff members were $72 \%$ and $74 \%$ (Table 3).

Table 3: Consistency of condom use with partner and nonregular partner

| Frequency of <br> condom use | Partner <br> $(\%)$ | Non- <br> regular <br> partner <br> $(\%)$ | Partner <br> $(\%)$ | Non- <br> regular <br> partner <br> $(\%)$ |
| :--- | :---: | :---: | :---: | :---: |
| Every time | 57 | 58 | 52 | 55 |
| Almost every <br> time | 23 | 16 | 20 | 19 |
| Sometimes | 17 | 11 | 22 | 13 |
| Never | 2 | 6 | 4 | 9 |
| Don't know | 2 | 10 | 3 | 5 |

Rates of consistent condom use
were considerably higher than
those in the 2012 study.

Rates of condom use at last sex for students and staff were consistent with previous studies, including the 2012 HSRC household HIV prevalence survey and the HEAIDS 2010 study. However, reported rates of consistent condom use in this study were considerably higher than those in the 2012 study.

## Conclusion

It is clear the students surveyed have acquired a fair amount of knowledge about HIV/AIDS, but some lack an appreciation of their personal risk for, and the relationship skills that would allow them to conduct their sex lives in a way that keeps them safe from, HIV, unwanted pregnancy and STIs. Staff were a step ahead of their students in terms of HIV knowledge, their active search for information, and more accepting views of HIV treatment, people living with HIV, and lesbian, gay, bisexual, transgender and intersex groups (LGBTI). More than half of staff members were married and living with their spouse; this may have contributed to their low perception of personal vulnerability to HIV.

The survey revealed relatively high levels of knowledge on HIV prevention methods, alongside negative attitudes to
condom use. The figures on self-reported condom use at last sex and on unplanned pregnancies indicated that a high proportion of students and staff engaged in unprotected sex with their regular sexual partner. But data on consistent or 'almost' consistent condom use painted a different picture, yielding the high rates of consistent condom use relative to other studies. The subjectivity of self-reporting on sexual behaviour might have influenced this result.

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# Drug-resistant TB treatment: concerns over absconding patients 

A study in Khayelitsha in the Western Cape illustrated the difficulty of retaining patients on drug-resistant TB treatment, a tendency that poses a significant threat to containing the spread of multidrug-resistantTB in the country, writes Sizulu Moyo. That drug-resistant TB is increasing year-on-year is clear when analysing the number of multidrug-resistant TB cases.

Tuberculosis (TB) is one of the major causes of morbidity and mortality in South Africa, with 328896 new and relapse cases reported in 2013, and an overall total of 380000 prevalent cases in the country in the same year. Approximately 89000 people died from TB in South Africa in 2013, of who 64000 were also HIV positive.

A major concern in the country is the development of resistant strains of the bacteria that causes TB resulting in multidrug-resistant TB (DR-TB), which is more difficult and more expensive to treat and cure. Multidrug-resistant TB refers to cases of TB that are resistant to two of the most effective drugs used for treatment, isoniazid and rifampicin.

