

# THE DENIALISTS

*The dangerous attacks on the consensus about H.I.V. and AIDS.*

BY MICHAEL SPECTER

Zebon Gwala is a husky forty-nine-year-old man with an unusually vivid dream life. For many years, he worked as a long-haul truck driver, crisscrossing South Africa from his base, in Durban. But he is in a different business now. A few years ago, Gwala began to dream about herbs. Some nights he would see just one, on others two or three. Gwala's grandfather, who died when he was a boy, was a traditional village healer, and in the dreams he would tell Gwala which herbs to collect and where to get them. Gwala kept a list next

to his bed, and eventually, when it had grown to eighty-nine, his grandfather instructed him to divide the herbs into two groups and boil each batch. The resulting concoctions, the apparition assured him, would cure AIDS, the disease that was destroying his country. Gwala followed instructions. He quit his job, turned his garage into a factory, and opened a storefront dispensary in downtown Durban, wedged between a dry cleaner and a furniture store. He hung two signs next to the door: one has "Doctor Gwala" written on it, and the other

says "H.I.V. and AIDS Clinic." There are no doctors, nurses, or medical technicians at this particular clinic, and just one product: ubhejane, which is the Zulu word for black rhinoceros. Every day, from eight in the morning until four—unless he runs out first—Gwala sells ubhejane in litre-sized milk containers. There are two kinds. The bottle with a white lid holds an herbal mixture intended to rebuild an immune system ravaged by the AIDS virus. The second, with a blue lid, is a potion to reduce the amount of the virus that has already accumulated in the bloodstream.

On a typical day, as many as a hundred people come to Gwala's clinic, each paying the equivalent of about a hundred dollars—nearly two weeks' pay—for a thirty-day supply. Gwala says that the medicine never fails. He also says that he has no idea how it works. "Ubhejane protects the cells from any virus," he told me when I met with him at his clinic, last



*As prominent South African politicians dismiss antiretroviral drugs as "poison," traditional healers have flourished.*

fall. "I don't know how that happens. I am not a scientist. But what I do know is that people who were on the edge of death go back to work. It makes them feel better, and it gives them life."

The use of ubhejane has been encouraged by President Thabo Mbeki's Health Minister, Manto Tshabalala-Msimang, and by the Director-General of Health, Thami Mseleku. The health minister in the province of KwaZulu-Natal has also spoken in favor of the remedy, and the mayor of Durban has supplied funds to buy it for patients at a hospice not far from the city. Ubhejane's most vigorous promoter, a retired professor of sociology named Herbert Vilakazi, says that anti-retroviral drugs, or A.R.V.s—which have proved to be the only successful treatment for the millions of people infected with H.I.V.—are so toxic that they can cause more harm than good. Like Mbeki himself, he seems to be convinced that a genuine cure for AIDS is more likely to be found in the arsenal of traditional African medicine than in any chemical compound sold by a Western pharmaceutical company. For years, Vilakazi, Mbeki, and Tshabalala-Msimang have used words like "damaging," "toxic," and "poison" to describe A.R.V.s.

Ubhejane is far from the first untested remedy that South African leaders have recommended to AIDS patients. Virodene, a powerful industrial solvent with no medicinal value, was embraced by Mbeki and his comrades as soon as it was introduced by South African researchers, in 1997. More recently, Secomet V, an extract from red clover, made a splash in the market. It is sold as Ithemba Lesizwe—Hope of the Nation. Minister Tshabalala-Msimang, whose antipathy toward pharmaceutical AIDS treatments has long been an international scandal, has never wavered in her support for such remedies. Last summer, she astonished participants at an international AIDS conference in Toronto by presenting a government public-health display that focussed on beetroot, olive oil, garlic, lemons, and African potatoes. Antiretroviral drugs were included only after furious protests.

Denying the scientific consensus about what causes AIDS and how to treat it is not limited to South Africa, of course. H.I.V. itself is now on trial before the Supreme Court of South Australia. Last

year, a thirty-five-year-old man who had unprotected sex with three women—and infected one—despite knowing that he was H.I.V.-positive, was found guilty of endangering their lives. He has appealed, saying that H.I.V. does not cause illness. His main witness is Eleni Papadopulos-Eleopulos, a medical physicist at Royal Perth Hospital, who claims that H.I.V. has nothing to do with AIDS. The Perth Group, as she and several other Australian H.I.V. denialists are known, has argued for more than twenty years that the virus has never been isolated or identified properly. Papadopulos-Eleopulos and her colleagues insist that AIDS in gay men results from drug abuse and repeated exposure to semen. Last month, the President of Gambia, Yahya Jammeh, disclosed that he had found a secret remedy for AIDS and asthma, and announced that he would begin to cure AIDS on Thursdays and asthma on Saturdays.

AIDS denial plays a corrosive role in the health policies of many countries, but nowhere has the damage been as extreme or as enduring as in South Africa. Five and a half million of the country's forty-eight million people are infected with H.I.V., which makes South Africa by any epidemiological standard the country with the world's deadliest AIDS epidemic. Nearly a thousand people there die of AIDS every day, and at least twice that many are newly infected. Between 1997 and 2004, death rates from infectious diseases more than tripled for men and increased fivefold for women—from numbers that were already among the worst in the world. The country, while not rich, has sub-Saharan Africa's largest economy, and it is one of the few on the continent that could genuinely afford to administer an antiretroviral-drug regimen that would cover those people who need it. Today, only about two hundred thousand receive the drugs.

Recently, there have been hints that the government might be open to a new approach. Last fall, South Africa's Deputy President, Phumzile Mlambo-Ngcuka, a progressive and measured leader, emerged as the government's most prominent spokesman on AIDS—in part, it seemed, because Mbeki's Health Minister, Tshabalala-Msimang, had been seriously ill. Ever since her appointment, in 1999, Tshabalala-Msimang has been one of the world's most polarizing



Cold. Colder.  
Freezing.  
More freezing.

## Sex Games of the Married

WARP

and controversial public-health officials. She and her husband, Mendi Msimang, a senior official in the African National Congress—the country’s ruling party—became close to Mbeki in the nineteen-sixties, when the A.N.C. was exiled in Zambia.

Mlambo-Ngcuka’s new role has been greeted with caution, because Mbeki has inched away from AIDS denialism in the past. In 2002, the cabinet took the unusual step of officially affirming that H.I.V. causes AIDS. The next year, the government issued a comprehensive—and forward-looking—AIDS policy for the country. It has never been fully implemented, however. The cabinet also instructed Tshabalala-Msimang to make AIDS medications available to the public. She began doing so only after South Africa’s highest court ruled that she must, and the pace has been slow. Mbeki, an economist who is one of Africa’s most respected leaders, has never disavowed the view that H.I.V. medicines are Western inventions aimed at maiming Africans. In 2000, news reports said that Mbeki had hinted at C.I.A. involvement in propagating the belief that H.I.V. causes AIDS.

With government encouragement, clinics like Gwala’s are thriving. The day I was there, an old woman walked in carrying a baby girl wrapped in a blanket, like a papoose, on her back. The baby’s mother died of AIDS shortly after giving birth. The father died of AIDS before she was born. “I am what she has left,” the woman—her grandmother—told me. “Everyone else is

dead.” She said that she was at the clinic because she believes in President Mbeki and suspects that Western drugs won’t save her granddaughter; she knows too many people who have died.

“The people who want to take those A.R.V.s can take them,” Gwala told me as we watched his wife hand out bottle after bottle of ubhejane. “But they don’t cure anything. The side effects are like poison, and people get sicker. Ubhejane doesn’t hurt anyone. And it works. I can feel it. I know I am not a scientist. But look at these people. They have hope now and before they had nothing.”

In 1987, three years after French and American scientists announced that AIDS was caused by the human immunodeficiency virus, an eminent molecular biologist named Peter Duesberg published a paper in the journal *Perspectives in Cancer Research* entitled “Retroviruses as Carcinogens and Pathogens: Expectations and Reality,” in which he argued that H.I.V. cannot cause AIDS. Duesberg grew up in Germany and was educated there and in Switzerland. He was among the first to discover, in the nineteen-seventies, that a particular class of viruses—a type of retrovirus—carries genes capable of transforming normal cells into cancer cells. Duesberg’s research established his international reputation and helped him win tenure at the University of California at Berkeley. In 1986, he was invited to join the National Academy of Sciences, and he was even mentioned as a possible recipient of the Nobel Prize.

Without Duesberg’s research, there might have been no significant progress in treating AIDS. In the nineteen-eighties, Robert Gallo, the American scientist who shares a negotiated credit with the French virologist Luc Montagnier for discovering the AIDS virus, had high praise for Duesberg. Introducing him at a scientific conference in 1984, he said, “He was among the first, or perhaps even the very first,” to characterize the structure of the viruses. “He was involved in the first work that provided a genetic map of retroviruses.”

Retroviruses can cause several illnesses, including some cancers, but it wasn’t until 1983, when French scientists conducted a biopsy on the lymph nodes of a gay man who had suddenly become sick, that antibodies from a retrovirus were found. For more than a hundred years, the presence of antibodies against any disease had been interpreted as good news: antibodies are proteins that the immune system uses to fend off attacks by viruses and bacteria as they circulate in the bloodstream; if you have antibodies against chicken pox or measles, it means that your immune system is ready to fight the virus. That is how most vaccines work: they train blood cells to secrete the specific antibodies needed to recognize and overcome an infection. But H.I.V. is an entirely new kind of virus, one that doesn’t simply attack our cells. It takes control of the entire immune system. At first, scientists wondered if the disease was related solely to the life styles of those who fell ill. By 1984, however, the correlation between infection with H.I.V. and the development of AIDS in humans had become hard to ignore. “Wherever H.I.V. was found, AIDS was present or soon present,” Gallo wrote in “Virus Hunting,” his 1991 book about the discovery of AIDS. “Conversely, no H.I.V.—no AIDS.” Thousands of subsequent studies support this contention. Other illnesses, like malaria and tuberculosis, can hasten the decline of a person who is infected, and so can poor nutrition. But if you don’t have H.I.V. you can’t have AIDS.

Just as most scientists became convinced that H.I.V. was the cause of the epidemic, however, and as, for the first time, a drug, AZT, was shown to interfere with the virus directly, Peter Duesberg insisted that H.I.V. had nothing to

do with the disease. In his initial paper, in 1987, and in more than a dozen since, Duesberg has argued that H.I.V. is harmless, a mere “passenger” virus—one of the thousands of organisms that live within and among us, never causing damage or requiring us even to notice that they exist. “To pretend to think that H.I.V. causes AIDS is politically correct, socially attractive, and very, very fundable,” Duesberg told an interviewer not long ago, adding that even in “the freest of all countries, as George Bush calls the U.S., nonconformists are excommunicated at all social and scientific levels.”

Duesberg argues that recreational drugs are what destroy the immune system, not a retrovirus. He believes that a virus cannot be the cause of an illness if the illness becomes evident only many years after the initial infection. Viruses typically make people sick shortly after infecting them, before their immune system can respond. With H.I.V., more than a decade can pass between the moment a person becomes infected and the time when he becomes visibly ill. Duesberg also has written that no virus can cause disease after the body starts to produce a neutralizing immune response.

Duesberg contends that to prevent AIDS—and even to cure the disease—it is necessary only to eat properly and abstain from harmful drug use. In 1998, he and one of his collaborators, David Rasnick, wrote, “All infectious epidemics of the past, such as polio, cholera, tuberculosis, smallpox and syphilis, have long been brought under control, or even eliminated, at a fraction of the cost of AIDS with technology that was far less sophisticated than what is available now.” The focus on H.I.V., Rasnick later argued, is “the biggest scientific, medical blunder of the 20th century”; the tens of thousands of researchers who have devoted their lives to treating the virus have been wasting their time and billions of dollars.

Through force of will, Peter Duesberg essentially invented the AIDS dissident movement, and remains its most prominent proponent. For years, he has maintained that, since antibodies are generally signs that our immune system is doing its job, anybody who tests positive for H.I.V. ought to be happy. In 1988, in an effort to put Duesberg’s theories to rest, the American Foundation for AIDS Research sponsored a scientific

forum, in Washington, D.C., on the origins of the epidemic. One after another, researchers presented data linking the increase of H.I.V. infections around the world to the growing number of AIDS cases. Duesberg rejected the data completely. This was at a time when in the United States AIDS was still widely seen as a death sentence, and people had even committed suicide after learning that they were infected. Anthony Fauci, the federal government’s leading AIDS expert, sat silently for hours. Usually the most circumspect of scientists, he finally erupted. “This is murder,” he said after listening to Duesberg speak. “It’s really just that simple.”

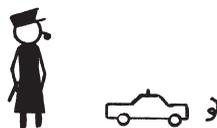
Duesberg has come to expect responses like that. He was once asked how long it might take for the scientific establishment to recognize that it was wrong about H.I.V. He replied, “It took the highly established and affluent Catholic Church four hundred years to ‘understand’ Galileo.” He went on to say that it might take the scientific establishment, “the Church of the twentieth/twenty-first century,” at least that long.

The AIDS dissident community may be small, but its impact has not been. The climate in which medicine is practiced has changed dramatically since the beginning of the epidemic; medical authority is no longer revered, and pharmaceutical companies are increasingly portrayed as criminals. The Internet has made it possible for every conspiracy theory to flourish. There are three basic versions of the H.I.V.-denial credo. The first arises from Duesberg’s conviction that H.I.V. does not cause AIDS. The second argues that, even if the virus is harmful, the risks of antiretroviral drugs far outweigh the benefits: AIDS drugs are poisons, pushed by doctors corrupted by the pharmaceutical industry. The “poison” argument has been proved untrue in hundreds of studies across the globe, among women, men, drug users, homosexuals, and infants. Finally, and most perniciously, there are those who argue that sub-Saharan Africa—where nearly two-thirds of H.I.V.-infected people live

and as many as twenty million have died—simply has no AIDS epidemic. Instead, they blame the absence of proper nutrition or clean water—factors that certainly exacerbate the effects of AIDS but do not cause it. On the Internet, where anyone can profess to be an expert, rumor sites can make all these theories seem plausible, particularly to a new generation that has not been educated properly about the risks of H.I.V. One site, virusmyth.net, has more than a thousand Web pages attached to it, and its opening page features an illustration of the AIDS virus with dollars pouring out of it. There is a photograph of Thabo Mbeki and a call to arms: “Support President Mbeki to find the truth about AIDS.”

Duesberg’s influence gained new momentum when Mbeki, shortly after succeeding Nelson Mandela as President, in 1999, discovered his work while rooting around on the Internet. Mbeki has responded harshly when people criticize him for supporting Duesberg. “I am also amazed at how many people, who claim to be scientists, are determined that scientific discourse and inquiry should cease, because ‘most of the world’ is of one mind,” Mbeki wrote in 2000. “By resort to the use of the modern magic wand at the disposal of modern propaganda machines, an entire regiment of eminent ‘dissident’ scientists is wiped out from the public view, leaving a solitary Peter Duesberg alone on the battlefield, insanely tilting at the windmills.”

For Mbeki and many other South Africans whose world views were defined by their struggle with apartheid, it is understandably hard to see white men in lab coats as people who want to help them. In the past, many drugs and vaccines have been tested on Africans and proved effective only with their help. But the drugs are often far too expensive for African countries to acquire. Americans seek medical solutions to nearly every health problem—whether it’s hair loss, cancer, AIDS, or one of the many diseases that stem from the fact that we eat too much. Mbeki argues that what his people need is decent food and clean water. “You can’t say the response to a healthy human body is drugs,” he told Parliament in 2004. “Your first response is proper feeding. The Minister of Health”—Tshabalala-Msimang—“repeats this thing every day and what do they do,



they mock her. It's like she's some crazy person of the moon!"

Mbeki rarely addresses scientific solutions to the AIDS epidemic. Instead, he focusses on politics and the injustices done to Africans. In his first years in office, Mbeki was openly hostile to the idea of H.I.V. In 2000, after he appointed a Presidential advisory panel, which included Duesberg and other denialists, to study the cause of AIDS, he was so brutally repudiated by world leaders and public-health professionals that he essentially ceased talking about the issue. But, with Tshabalala-Msimang as his mouthpiece, Mbeki has since urged Africans to turn away from the medicine that most of the world has come to rely upon. Recently, though, when he appeared to be stepping back, and public-health officials were permitted to speak for the government, he also created a new commission on African traditional medicine, and chose as its leader Herbert Vilakazi, the South African academic who is notorious for his disdain for Western medicine.

Vilakazi is a retired professor of sociology who has taught at, among other places, the University of Cape Town, and he dresses the part: crisp blue blazer, button-down oxford shirt, light-gray pants. He lives in a well-appointed, book-filled house in one of Pretoria's more fashionable gated communities. He was born in Zululand, but spent his adolescent years in Hartford, Connecticut, and received his undergraduate degree from Columbia University. Vilakazi believes that the long traditions of African medicine have been ignored by Western scientists because Africans are black—an assessment that many scientists in and outside of Africa share. He goes further, however. "The West simply took it for granted that the mind of humanity was full of nothing but error, rubbish, nonsense, and superstition, until Whites emerged with a more superior mind," he wrote recently. "The West then proceeded, with amazing folly, to start accumulating modern scientific thought, using the famous 'scientific method' and the method of 'experiment,' formulated during the 'Scientific Revolution,' without paying the least respect to, without building upon, the knowledge accumulated by Africans, Asians, and Native Americans."

Vilakazi believes that Western soci-

ety has turned the scientific method into a fetish. "Orthodox medicine has reached a dead end," he told me. "There is walking evidence and evidence that comes from a lab. There are plenty of people who rely on walking evidence. A person has terrible arthritic pains. An old man gives them herbs and they get relief. We can't say that the only thing that matters comes in reports from Western labs." Nobody denies that traditional remedies play an important role in medicine. Aspirin is a more modern form of willow bark, and thousands of other drugs have herbs as their base. Artemisinin, which when used in combination with other medicine is the best treatment available for malaria, is derived from an herb that the Chinese have relied upon for thousands of years. Nonetheless, most researchers would say that any potential medicine—herbal or chemical—needs to be subjected to the rigors of testing and analysis. Vilakazi disagrees. "Take Gwala, for example," he said. Vilakazi, who has no medical training, helped arrange for the former truck driver to meet senior government health officials, including Tshabalala-Msimang. He has also testified before Parliament on ubhejane's behalf. "I have personally seen hundreds of people who have taken ubhejane, and they get relief," he told me. "All I am saying is let's look at the results of that, as well as using drugs like A.R.V.s.

"The situation in America is one of intolerance," he continued, never raising his voice. "There are A.R.V.s. Only one approach to treating this deadly illness is permitted. You are not allowed to talk about anything else." He said that people are obsessed with whether H.I.V. causes AIDS, but that he considered such arguments "completely academic and not relevant for the treatment of sick people." He went on, "Let us be honest. Who benefits from A.R.V.s? Hundreds of millions of U.S. dollars have been spent on research and you have to get a return on your investment. It is the first rule of pharmaceutical companies, and they simply terrorize their opponents. Very frankly, in America there is an official literature—and there are a lot of people in the African-American community who feel maybe there is a conspiracy and that racism has a lot to do with it. Why, for instance, is AIDS the biggest problem that exists in Africa? You start to

wonder if there is a social selection for this disease. Is it not a coincidence that Africa is the poorest continent in the world? Did you ever think that it's in the interest of some people for it to stay that way?"

One morning, I took a short ride from Cape Town to the region's largest township, Khayelitsha, to visit Marta Darder, a physician working there for Médecins Sans Frontières. It was a brisk day, and the flat expanse of Table Mountain was bathed in the cool light of the Southern Hemisphere, and so was the harbor, which was full of tourist boats and fishing trawlers.

For the past five years, Darder has fought to make sure that the township's half-million residents have access to the H.I.V. medicines that the government promises to supply. "We have seen so many people who claim to have a cure for AIDS," she told me. "Mostly, they were ignored. But there has never been anything here like Matthias Rath. His strategy, power, and connections were incredible. He knew how to play the business and the politics of South Africa."

Rath is a German physician and health entrepreneur who urges people to substitute remarkably high doses of multivitamins for proved therapies like AZT. He has offices in the United States, Germany, Holland, and South Africa. (Duesberg's co-author David Rasnick has worked with him in South Africa.) Rath believes that huge doses of vitamins and micronutrients—which he sells on the Internet—can treat AIDS (as well as heart disease, cancer, diabetes, and many other maladies). Rath has placed advertisements in several newspapers, including the *New York Times* and the *International Herald Tribune*, railing against pharmaceutical companies and urging people to stop using their products. His ads almost always appear beneath headlines like "Why Should South Africans Continue to Be Poisoned with AZT?" and "Stop AIDS Genocide by the Drug Cartel." On his Web site, which notes, "The End of the AIDS Epidemic Is in Sight," he declares:

Never before in the history of mankind was a greater crime committed than the genocide organized by the pharmaceutical drug cartel in the interest of the multibillion-dollar investment business with disease. Hundreds of millions of people have died unnecessarily from AIDS, cancer, heart disease and other preventable diseases and the only reason that

these epidemics are still haunting mankind is that they are the multibillion-dollar marketplace for the pharmaceutical drug cartel.

A couple of years ago, Rath began distributing his multivitamin products in some of the country's poorest townships, including Khayelitsha. According to doctors there, staff members advised H.I.V.-positive patients to refrain from taking antiretroviral drugs, and claimed that Rath's vitamins would cure them or prevent further illness. Rath has been criticized in public statements by many organizations, including UNAIDS, the South African Medical Association, and the Southern African H.I.V. Clinicians Society. In the United States, the F.D.A. has informed Rath that it considers advertisements on his Web site to be misleading.

I visited Rath's offices in Cape Town, which occupied two floors in one of the city's most expensive buildings. He wasn't there. I have tried to reach him on three continents, but neither he nor any of his associates has returned my calls or made him available for interviews. Shortly before this article was published, however, Rath began to place a series of lengthy letters to the editor of *The New Yorker* on his main Web site. In them, he asserts, inaccurately, that most antiretroviral drugs are derivatives of drugs used for cancer chemotherapy. He also continues his attack on the pharmaceutical industry, and in one letter claims, despite his unwillingness to speak to me, that "the possibility for the natural control of the AIDS epidemic triggered" a historic "public debate between Dr. Rath and *The New Yorker*," which, he says, "has generated global interest."

Rath no longer seems to spend much time in South Africa. In early 2005, he conducted a medically unsupported clinical study on patients in Khayelitsha who were using his multivitamins. That June, he held a press conference in Cape Town and claimed that the study demonstrated that "the course of AIDS can be reversed naturally."

Soon after Rath showed up in South Africa, Marta Darder told me, "everyone knew who he was and what he did. It was amazing. His pills look like A.R.V.s. They are the same color and shape. He would tell people to take fifteen or more a day." (Rath has denied these accusations.) Darder went on, "The govern-

ment could have stopped him; it never did." Darder has spent many of her working hours struggling to convince Khayelitsha residents who revere the A.N.C. that their leaders have misled them. "The whole thing was disgusting," she said. She and her colleagues at Médecins Sans Frontières did what they could to counteract the government's false information. "It took months, and we were trying to help people," she said. "For us, it was an incredible distraction, an amazing waste of time. And it cost lives. But we had to defeat him, and at least here we did."

South Africa's Director-General of Health, Thami Mseleku, sees the whole episode as one in which a good man was driven from providing the type of health care that Africans really need. "What, exactly, was Rath's crime?" Mseleku asked when I visited him in his office, adjacent to Parliament. A week earlier, there had been hearings there on the state of AIDS treatment in South Africa. A number of prominent researchers testified, and so did Zebulon Gwala and Herbert Vilakazi. When Vilakazi launched into his standard speech about how the great promise of traditional medicine had been hindered by "scientists and other economically interested parties," many legislators nodded enthusiastically.

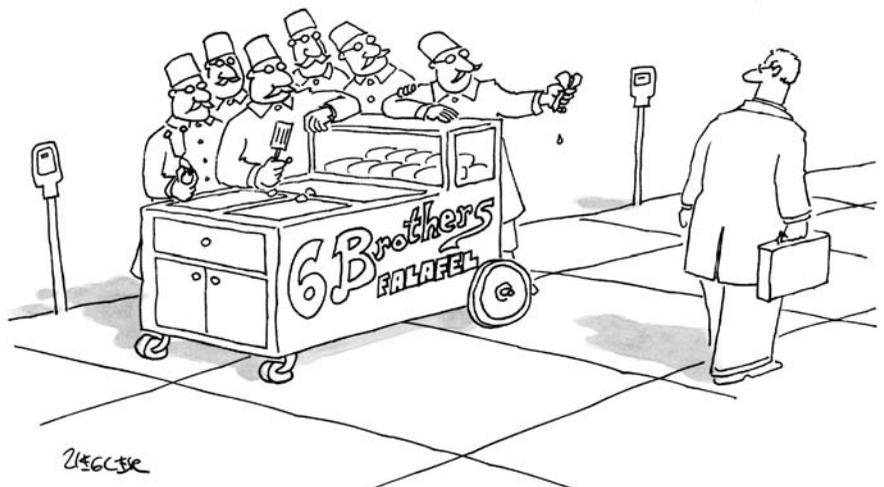
"This chap Gwala has a right to be heard in Parliament just as much as any doctor," Mseleku told me. "And it is not promoting democracy to believe otherwise." Mseleku is a huge, pear-shaped man with short curly hair. He was wearing a yellow checked shirt and a blue suit, and several times during our conversation he leaped nimbly from his desk to stroll about the office: "Every citizen is equal

before the law, whether he is a scientist or the President or a truck driver. You know Gwala is not going to stop making ubhejane and people are not going to stop using it. So we would have to put them in prison to stop them, and how can you put people in prison for doing what they have a right to do?" Once again, he rose from his seat. "I am African, and I will never condemn him," he said. I asked whether merit might help decide whether a medical treatment was valuable, and suggested that training—as a doctor, for instance, rather than as a truck driver—would serve as a better guide to who should practice medicine.

"That is because you come from the West, with one perspective," he replied. "And you think it's the only perspective one can have. But in South Africa we are more open than that."

Quarraisha Abdool Karim, a handsome woman with gray threading through her black hair, is a professor of epidemiology at the Nelson R. Mandela School of Medicine, in Durban. She is also on the faculty at Columbia University, and is an adviser to the World Health Organization, UNAIDS, and many similar groups. When Nelson Mandela became President, he placed Abdool Karim at the head of South Africa's AIDS program, and she spent nearly two years in Pretoria. By the time Mbeki was elected, however, she had returned to academic life. She and her husband, also an epidemiologist at the university, run a clinic and research facility in a village west of Durban.

Abdool Karim's progressive policies came into question soon after Mbeki



assumed office. Tshabalala-Msimang took a delegation to Uganda and looked at a study, called H.I.V.NET, which found that just a few doses of Nevirapine, an antiretroviral given to the mother at the beginning of labor, and then to the infant within the first three days of life, dramatically reduced the risk of passing on the virus. The regimen is cheap and easy to use, and is now in place throughout the developing world. In just a few years, it has saved the lives of hundreds of thousands of infants.

But not in South Africa. "When Tshabalala-Msimang came back, that was when we started to hear the Duesberg-type pronouncements," Abdool Karim recalled. "It was the beginning of our downward spiral"—which ended in disaster at the XIII International AIDS Conference, held in Durban in 2000. "That was our lowest point," she said. In response to the many denialist statements issued by Mbeki and others, more than five thousand researchers who had gathered for the conference prepared one of the saddest documents in modern scientific history, the Durban Declaration, which stated that the evidence that H.I.V. causes AIDS is "clear-cut, exhaustive and unambiguous," and meets the "highest standards of science." Tshabalala-Msimang called it an élitist document, and Mbeki's spokesman said that it would quickly find its way to "the dustbins of the office." "It was so very, very depressing," Abdool Karim said. "Here was the world in Durban for this amazing event. But it had come to a desert.

"Mbeki couches his opposition to H.I.V. in ways that some would say are racist," she continued. "I would prefer to say that he wants to be seen as an Africanist—and that can mean many things. But part of it is to seek indigenous solutions to what appear to be indigenous problems. That is fine, but our health system is built on the foundations of Western medicine. We have the same immunization program for children that you have. Ours may even have better coverage. We manage hypertension, cardiac problems, and cancers in the same way that you do. We read *The New England Journal of Medicine*. We have t.b. We have malaria. We don't hear him saying, Where are the indigenous solutions for these illnesses?"

Last September, while I was in Cape Town, eighty-one of the world's most accomplished scientists sent a letter to Mbeki, demanding that Tshabalala-Msimang be fired. Mbeki has ignored such demands before.

"We should be acting on what we know," Abdool Karim told me. "And what we know is very grave." Not only has the death rate risen sharply but the age of those who are dying keeps falling. For the first time, deaths among people in their thirties or forties have exceeded those of people in their sixties or seventies. In her studies, Abdool Karim found that thirty per cent of women under the age of twenty are infected. "For those between ages twenty and twenty-five," she pointed out, "the rate is fifty-four per cent. Then it keeps rising: sixty-six per cent of the women between twenty-five and thirty years old are infected." She took her glasses off and wiped her eyes. "When you look past thirty, they are all dead."

That month, Nozizwe Madlala-Routledge, the deputy health minister, came to see me in Cape Town. She and her boss, Tshabalala-Msimang, could not disagree more on how to respond to the epidemic. A former deputy defense minister, Nozizwe, as she is called by everyone, is a large, warm woman, who immediately placed a beaded AIDS ribbon on my lapel. "You are from New York and today is 9/11," she said. "So you are our brother."

We went to a lounge in my hotel, and as soon as we sat down she dumped a giant document in my lap, entitled "Operational Plan for Comprehensive H.I.V. and AIDS Care, Management and Treatment for South Africa." "This is the official policy of our nation," she said. "And it is a very good policy. Before we say anything else, it is important to recognize that the policy of this country is not at fault." The plan, first published at the end of 2003, was not adopted until more than a year later. By then, a fifth of South African women were testing positive for H.I.V.

When we met, Nozizwe had been prohibited from speaking about AIDS for more than a year. "I won't ever forget the day," she said. "It was on Nelson Mandela's birthday, July 18th. They told me that I was not to talk about AIDS. And that I was not to disagree with my minister."

She said that she tried to comply, but that in the end she had a greater responsibility: "It is important that I say the truth, because that is what sustains me. This is not *my* truth. But it is *the* truth. The values that taught us it is possible to fight an enemy like apartheid, which appeared impossible to defeat. It is *that* truth.

"You hear people talking all the time about traditional science as opposed to Western science," she went on. "This debate does not need to happen in a way that stops people from taking medicine that will save their lives. But it is killing large numbers of our citizens." That week, the country's statistical agency had announced that between nine hundred and a thousand people were dying every day from AIDS. "This is the reality we live with," she said. "I have lost relatives to AIDS. We all have. So let us not, as officials, say to people that they may go and use untested traditional medicine to treat their disease. Because it is killing them. It is killing all of us."

The recent decision to permit Nozizwe to speak out about AIDS was met, like the government's previous turnabouts, with wariness. Shortly before Tshabalala-Msimang, who had been ill for months, returned to work, she unleashed an attack, clearly aimed at her deputy, through the A.N.C. Web site, condemning those who were using her illness "as an opportunity to turn others into champions of a campaign to rid our government of the so-called H.I.V. and AIDS denial at the highest level." Two weeks ago, she was hospitalized again, and it is not clear what will happen next. For now, Mbeki has appointed the country's transport minister to act in her place. Some believe that Tshabalala-Msimang's illness may provide the President with a politically acceptable way to step away from his most extreme views, and that state support for AIDS denialism is waning. On February 9th, Mbeki, in his annual State of the Nation speech, declared that the government "commits itself to intensify the campaign against H.I.V. and AIDS." Nozizwe was not yet ready to declare victory. But she is more optimistic than she was last fall. "I never lose hope," she told me recently. "I went to jail during apartheid. I fought injustice and I know how to fight. We are a country in pain. I think that has to be said. A country in great pain and mourning. But I still believe the truth will win." ♦

