

Key Primate Research Institute Flounders

Bill Hobson wanted the primate center at New Mexico State to be a world-class AIDS research facility, but budget woes undid him—and his dream

ONE THURSDAY AFTERNOON LAST DECEMBER, Bill Hobson walked into his office at New Mexico State University's Primate Research Institute in a good mood. After 10 years as director of the institute, he felt the place was finally hitting its stride. PRI was home to the world's largest colony of chimpanzees—a resource that had become increasingly important with the advent of the AIDS crisis.

And Hobson was about to preside over the establishment of a world-class virology unit that he hoped would usher in the institute's transition from a breeding and contract research facility to a seat of basic research. Just that summer, redoubtable AIDS researcher Mikulas Popovic and two other investigators had moved from the National Institutes of Health to the 190-acre institute on Holloman Air Force Base in Alamogordo, near the Texas border.

But that day Hobson's boss, vice president for research and economic development Averett Tombes, followed him into his office and handed him a letter. Tombes waited while Hobson read. The letter informed Hobson that he would be put on administrative leave the first of the year and requested that he offer his resignation by the following June.

To many people familiar with PRI, that was the beginning of the end of the institute's bright future. Hobson was relieved of his responsibilities as director on 7 December 1989, and since then the institute has hit hard times. By the end of last summer, Popovic and his hand-picked team of AIDS researchers had departed, leaving the institute without the basic research capability Hobson had labored to build.

As a result, at a time when the search for AIDS therapies and vaccines is at its most intense, the nation has lost the advantage of having a research team at the site where as many as 100 chimps are available for AIDS experiments. According to Stan Smith, professor in New Mexico State's agriculture department who later testified before the state legislative finance committee about the events at PRI, "a program that is of major

importance to the biomedical community is floundering."

Did Bill Hobson deserve the axe? The university has claimed it "reassigned" Hobson because the institute ran a large financial deficit. And some PRI employees weren't sorry to see him go. But other observers say Hobson was a scapegoat for an administration that had already been embarrassed by deficits in other major programs. In sacrificing Hobson, these observers say, NMSU lost a man of vision and energy. And they say the move reflects a lack of commitment on the university's part to basic research at PRI.

There is little doubt that the impetus for the PRI AIDS research program came from Hobson. The ancestors of the 310 chimps at PRI were imported in the 1950s for testing in the U.S. space program—work carried out at Holloman's Air Force Aeromedical Research Laboratory. When the need for

primates, who had been trained at Cornell University.

By the early 1980s PRI was established as a breeding and contract research facility engaged mostly in toxicology testing. But Hobson had bigger plans. PRI owned about one-quarter of the chimps available nationwide for biomedical research—including about the same proportion of the animals available for testing AIDS drugs and vaccines. With that kind of ballast, Hobson figured, PRI ought to be able to make some waves in the research community.

In 1986, Hobson landed a contract from the National Cancer Institute and the chimps soon became a vital component of the nation's AIDS research effort. But the work was done in absentia, with NCI researchers flying to Alamogordo twice a year to perform inoculations and veterinarians there shipping blood samples back to the East Coast every few weeks.

Hobson wanted to bring a team of basic researchers to the institute to reap the advantages of working with the chimps directly. That's why he began courting Popovic, a member of Robert Gallo's lab at the National Cancer Institute and the man who had developed the crucial method for culturing HIV—the method that led to Gallo's key papers nailing down the cause of AIDS in May 1984.

"At first, I wasn't very enthusiastic" about Hobson's offer, Popovic says. "I grew up in cities, and I had never seen a desert before in my life." But he relished the idea of doing on-site research with the chimpanzees. Like most basic research scientists who interact with PRI, he had

been conducting his investigations via Federal Express; he claims that about a third of his shipments—mostly highly perishable blood samples—were being delayed at the company's Memphis hub long enough to render them useless for research.

Popovic decided to go to PRI because he



Desert drama. The corn cribs above, converted to house primates, are part of New Mexico State University's Primate Research Institute. Researchers there have access to a quarter of the chimpanzees in the U.S. available for AIDS research.



Mary Bailey Shelton/NMSU

chimps in space research declined, the Air Force sold the colony to Albany Medical College of New York in 1970. NMSU acquired the colony in 1980. Along with the chimp facility, the university inherited director Hobson, then 38, an endocrinologist and specialist in the sexual development of

knew that on-site access to the chimps would facilitate his vaccine research. He wanted to improve the technique for growing HIV in chimp cells. Eventually he hoped to culture the virus in chimp macrophages—something that's never been done. He also hoped to develop a better animal model for AIDS.

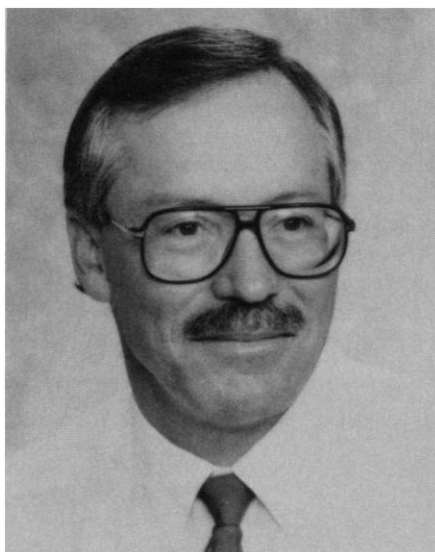
As part of his deal, Popovic stipulated that the university guarantee about 50% of his \$85,000 salary and supply any equipment and reagents not provided for by grant funding. Popovic also got permission to bring Suzanne Gartner, a retrovirologist, and a molecular biologist, Dale Smith, to Alamogordo with him. And he was allowed to bring visiting scientists from Japan, Czechoslovakia, and China. In the end, he says, "most of us were very positive about the decision."

But landing Popovic and his group was only the most recent feather in Hobson's cap. Under his direction, the institute's staff grew from 70 to 150, the number of Ph.D.'s from 5 to 15. Hobson served as principal investigator on grants to PRI worth more than \$20 million. In addition, he had persuaded Congress to provide \$5 million for the construction of a new \$46-million facility that he had conceived and helped design.

Small wonder, then, that Hobson was "totally shocked" by his dismissal. The reasons for it are still a matter of conjecture. Vice president Averett Tombes and NMSU president James Halligan say that, on the advice of counsel, they won't comment on Hobson's reassignment because it is a "personnel matter." Hobson says they never told him why they'd done it, either.

But not long after Hobson got his letter from Tombes, word of a budget deficit at PRI began to spread. And in January, a month after Hobson was put on leave, the vice president of university relations released a list of grievances to the *El Paso Times* that put the blame for the deficit squarely on Hobson's shoulders. Since last December, the amount of the deficit reported by the university has varied from \$700,000 to \$2.2 million, the latest figure. (The total PRI budget is about \$6 million.)

In interviews with *Science*, Hobson maintains that much of the deficit resulted from repeated mid-year changes in accounting procedures beginning in 1988 rather than from actual losses. And if there really was a deficit, he says, he wasn't given much chance to do anything about it. In January 1989, not long after reports of the deficit surfaced, control over PRI finances was taken out of his hands by the university administration. That fall, he says, he made repeated requests in writing for the basic income and expenditure data needed to balance the PRI books as well as for meet-



Big dreams. Bill Hobson wanted PRI to be more than a contract research facility.

ings with university administrators to talk about institute finances. He alleges that his requests were consistently deflected.

Then, in October 1989, an internal audit of PRI accounting practices turned up \$1.5 million in losses that the university business office ascribes to charges inappropriately recorded against contracts and unreported cost overruns. Two months later Bill Hobson lost his job.

Some people close to the scene—both on the PRI staff and outside it—think the university panicked at the prospect of the negative publicity that would follow the announcement of this deficit. There was a history of serious deficits at the school. In 1988, the NMSU athletic department ran a deficit of almost \$700,000, and the computing research lab reported a net loss of more than \$500,000. The NMSU Cooperative Extension Service, which sponsors agricultural research, had by 1988 accumulated a deficit of \$1.2 million.

"A lot of projects haven't worked out for the university," says state senator Maurice Hobson (no relation to the director). "They have no working capital left."

"The problem is that the university business office was so badly mismanaged that they didn't know what was going on at PRI, and they interfered so badly with PRI that the people at PRI didn't know what was going on there, either," says agriculture professor Stan Smith.

"Bill Hobson may have been used as a scapegoat," says Smith. "The man who brought in major funding to the institute has been summarily dismissed for reasons that no one has been able to clarify," he adds. "In relieving Bill Hobson, they've practically wiped out the research group out there. . . . If the institute is worth saving,

then the pattern of administration that has been demonstrated over the past few months should be changed."

In retrospect, the firing of Bill Hobson seems a bit like the fall of the first domino. Each month since then has seemed to bring a new crisis, involving first the PRI staff, then the university research council, then the board of regents, and finally the state government.

A lot of the furor came from Hobson, who didn't take his dismissal lying down: he gave interviews to local papers and offered statements claiming his innocence in the budget mess. And many came to his defense. Following hearings in December, the university research council wrote a memorandum to president Halligan and vice president Tombes expressing the opinion that "without the scientific leadership of Dr. Hobson at this time, the research effort at PRI will be severely damaged." The council requested "that Dr. Hobson be allowed immediately to assume responsibility for the scientific oversight of PRI's operation."

In January, 15 members of the institute's senior research staff, including nine Ph.D.'s and three D.V.M.'s, wrote to the NMSU board of regents to protest Hobson's dismissal. And in his own letter to the board of regents, Mika Popovic wrote: "Bill Hobson showed himself to have the vision, leadership skills, and scientific understanding to maintain an environment in which our research could be expected to make rapid progress."

But that view wasn't universal. In January a group of 16 PRI employees signed a petition backing the university's action in suspending Hobson. The petition was circulated by Brenda Billhymer, head of the clinical laboratories at PRI. Billhymer's statements to *Science* seem to reflect the attitude of the employees there who carried out the contract research—an attitude quite different from that of the researchers.

"The university has a right to replace directors. It doesn't disturb me," says Billhymer. "In our day-to-day workings, it really doesn't matter who the director is. They could hire King Kong for all I care, as long as I still have a job to come to."

And this July the university's five-member board of regents voted to support the administration's action in dismissing Hobson. The regents did see a deficit, board chairman Donald Kidd said, and felt that was sufficient grounds for dismissal.

The true reasons for Hobson's firing may never be fully sorted out. But some observers feel that the style of the firing—with its emphasis on finances—seems to point to a deeper problem at the university. Research universities everywhere today are faced with problems of financial constraint. But at

NMSU, insiders say, the emphasis on finances seems to have created a climate in which research could not be done at PRI. Mika Popovic puts this view graphically: "Up until March 1990, all I had heard was 'science, science, science.' In March, all I heard was 'money, money, money.'"

In May an assessment committee was convened at the behest of Senator Pete Domenici and Representative Joe Skeen to review the events at PRI. The committee, headed by Leonard Napolitano, dean of the University of New Mexico School of Medicine, and including researchers from NCI, Harvard University, and Duke University, concluded financial commitment was indeed crucial. In their report to Halligan in June, the committee said: "The committee was in unanimous agreement that development of a basic research program at PRI could only be achieved by an infusion of funds from the university."

That infusion has been lacking from the time that Popovic and Gartner arrived. Gartner says she didn't realize how scant PRI's resources were until she got there—and then spent the first 6 months trying to pull together a lab. For example, the P3 containment facility housing the lab—arranged according to government regulations to prevent escape of dangerous vectors—lacked the most rudimentary tools of the trade, she recalls; there were no vacuum pumps, no fume hoods, no liquid nitrogen freezers, and no emergency generators.

To remedy these deficiencies, the research team turned to several expedients. Gartner asked her former colleagues at NIH to send her some supplies. Then, she says, "I even offered to purchase reagents out of my paycheck." But when she conveyed this to university vice president Tombes, he didn't take her seriously. "He thought I was a hysterical female. His attitude was, if we can't afford it, you can't get it."

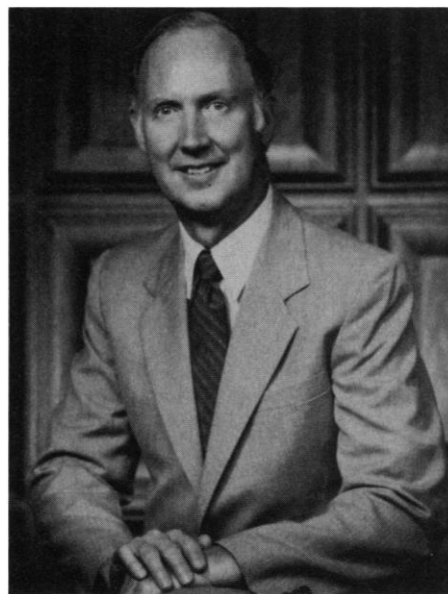
Gradually, Gartner and Popovic became dispirited: "Eventually I lost confidence in the university administration's intention to provide an environment conducive to basic research," Gartner says. "The final turning point was when I had my meeting with president Halligan." This key event occurred at the end of May and represented a last-ditch attempt by Gartner and Popovic to come to some reconciliation with the university. Gartner brought a list of questions about the lab's administration that she wanted Halligan to address.

"As the meeting wore on I got the feeling that his understanding of what goes on at PRI was minimal," she says. "He said he wanted a basic science laboratory, but that it had to be set up along the lines of their financial constraints. There was no way to

do science under the guidelines they were providing."

Gartner describes NMSU's lack of insight as a cultural barrier. "They were confronted with a whole different kind of person. They didn't realize how important our work is to us; they're not used to people who are willing to work on a project night and day. They don't understand our motivation." By July, she and Smith had left.

NMSU still apparently wanted the basic research unit to continue—and wanted



Financial concerns. *NMSU president James Halligan dismissed Hobson because of the deficit at PRI.*

Popovic to stay. Tombes had given him a glowing evaluation in March. And when his first anniversary rolled around, Popovic got a \$7000 raise. But Popovic says that, at the same time, he was asked to cut costs in his department by 20%, which meant letting one of his people go. That didn't sit well with him. "I had some funny feelings around my stomach," Popovic says. "I had to get out."

In his 28 June resignation letter to Tombes, Popovic said his decision was "a logical consequence of the regressive developments at PRI which started in the fall of 1989 and culminated recently with the resignations of my key personnel." Among those developments, Popovic said, are the "weak research environment, lacking of key personnel and little financial support."

And that's where the matter stands for now: a smoking crater where the basic-research component of PRI used to be. Whether NMSU can rescue the possibility of such a research facility depends on its degree of commitment.

"I think it's unfair to say that no one at NMSU understands basic research," says Bill Goodwin, associate scientific director of

the Southwest Foundation for Biomedical Research. Goodwin has consulted for NMSU for more than a decade and was a member of the blue-ribbon panel that reviewed the status of PRI in June. But, he adds, "you have to have a scientific staff to take full advantage of a facility. Right now, they don't have the staff. And the university must be willing to commit the money."

Administrators Tombes and Halligan say they've signaled the sincerity of their intentions by hiring as PRI's new director the well-respected virologist Preston Marx from the University of California at Davis. And they say they've created four tenure-track openings there, one of which will go to the new director.

Marx, for his part, is bent on keeping PRI in the national eye. He has not succeeded in filling any of the institute's vacancies since he joined PRI in September, but says he feels optimistic about the recruitment effort. "I saw the potential to develop something world-class here," says Marx. "And I still see that potential. There's no reason why PRI can't function at least as well as the virology and immunology departments at other primate centers."

But asked if NMSU will cooperate by producing the financial or moral support needed to make PRI what he envisions, he hesitates. "I don't know yet," he says. "I'm just beginning to find out."

Marx says he doesn't expect NMSU to subsidize his ambition. He will require the institute's faculty to bring in at least 75% of their funding from contracts and grants.

"I think people may have a misperception that other major universities pour money into their primate centers. They don't," says Marx, who led the virology and immunology unit at the California Primate Research Center and brought \$2-million worth of grants and contracts to PRI with him. Marx says many of the investigators at CPRC were 100% self-supporting and that UC Davis's contribution to the center as a percentage of incoming funding was much less than what NMSU returns to PRI.

But Stan Smith thinks the university administration could foil Marx's best efforts. "They said they were going to get rid of Bill Hobson and keep everything else running," he says. "But instead they've still got Hobson—and PRI's shutting down." (Hobson has been reassigned to administrative duties.)

For the moment, PRI certainly hasn't shut down. But it doesn't have much in the way of an AIDS research component now. And, with the fight against AIDS at a crucial point, losing an on-site research program at PRI seems like a high price to pay in a campus dispute. ■ KAREN WRIGHT