



Monkey Business

Primate lab and animal rights group fight over land and principles.

Land, law, and research ethics are combining to stir up a bitter feud on the south side of campus. The UW's National Primate Research Center and an animal rights organization called the Primate Freedom Project are fighting over a parcel of property on Capitol Court, and the battle is likely to end up before a judge. But the land squabble is merely the latest skirmish in the organizations' ongoing struggle over the nature of the center's research and the treatment of the monkeys it studies.

In May, according to Primate Freedom Project founder Rick Bogle, the group entered into an agreement with **Roger Charly '78**, who operates Budget Bicycles, to buy a warehouse that is adjacent to one of the research center's facilities.

The group offered \$675,000 and intends to use the property to set up a National Primate Research Exhibition Hall.

"We'd like to have periodic exhibitions looking at the history of the use of primates in behavioral and biomedical research," says Bogle. He imagines the hall as a site to explore the ethics of doing research on animals that are not only physically, but, he contends, mentally and emotionally similar to humans. "The whole reason for being of the place is the ethical implications of the similarities between our minds," he says.

The Primate Research Center studies a variety of human conditions, including aging and metabolic disease, reproduction and development, and immunogenetics and virology, using marmosets, rhesus monkeys, and other primates as test subjects. The center's scientists are conducting embryonic stem cell research and studying such diseases as HIV/AIDS and Parkinson's. But Bogle feels that the work too often leads to injury and death for the monkeys.

In August, the UW's University Research Park made its own offer on the land — \$1 million — which Charly then accepted. Bogle believes that this is an effort to silence his organization.

The primate research center, he says, operates under "intense secrecy. What goes on in the labs is probably more secret than inter-office White House memos. [Its managers] are doing everything they can to close off public information." The Primate Freedom Project has launched a lawsuit, claiming that its agreement with Charly was binding and he had no right to sell the property to the UW Research Park instead.

The primate research center sees it differently. According to

its director, **Joseph Kennnitz '69, MS'74, PhD'76**, the center had been working to buy the property long before Bogle came along. "We've been interested in acquiring that piece of land for some time," he says. "It's a natural place for us to look for the expansion of our research facility." The university had not been able to come to terms with Charly about the land's value, he says.

The center does have concerns about having the Primate Freedom Project as a neighbor, though. The organization has conducted a Primate Freedom Tour that brought protesters to the Madison facility several times since the 1990s. During one of the visits, says Kennnitz, one of the center's buildings was vandalized when a group of protesters squirted glue in exterior door locks and then chained themselves to railings around an entranceway. Researchers at the center have also been the targets of personal attacks. "Several people here and at primate research centers around the country have received envelopes in the mail with razor blades in them," he says.

In November, groups of protesters showed up at the homes of several UW primate researchers, including Kennnitz's, where they handed out fliers and shouted at Kennnitz through a bullhorn.

Bogle rejects claims that he and his organization incite violence. He has launched a slander lawsuit against the Primate Research Center after a public information officer accused him of encouraging illegal acts.

In the meantime, progress on the piece of land is stalled. "I guess it's a sort of no-man's land," says Charly.

— John Allen



JEFF MILLER

Two marmoset monkeys groom each other in a display at the UW National Primate Research Center, which has long been a target of animal rights activists. Now, one protest group wants to move in next door to the center, but the university seems ready to prevent it.

Gender Bender

Differences between the sexes may be overblown.

Despite widely prevalent stereotypes about the differences between the genders, science is showing that, at least psychologically, there is no interstellar gap between men and women. More likely, they are chapters from the same book.

Janet Hyde, a psychologist at UW-Madison and an expert on the psychology of women, recently distilled the results of forty-six large-scale studies on gender differences into one overarching analysis. She found that in the case of most traits, such as self-esteem and mathematical ability, men and women are pretty much the same. Taken together, the studies puncture many social stereotypes that Hyde believes are harmful, such as the belief that men make better leaders or that adolescent girls have lower self-esteem than boys.

"If we keep thinking that girls are the ones with all the self-esteem issues, then we miss all the boys with low self-esteem," says Hyde. "And those are the boys who may end up doing something like [the shootings at] Columbine," the Colorado high school where in 1999 two disillusioned male students killed twelve classmates and a teacher.

In her analysis, Hyde explored the relationship of gender to an array of psychological traits, including cognitive abilities, verbal and nonverbal communication, psychological well-being, and motor behaviors like throwing distance. In 78 percent of cases, she found little or no difference between the sexes, although she did find that men display more physical aggres-



sion and throw much farther than women. Men also deal differently, Hyde found, with certain aspects of sexuality.

But the differences pale in the light of the overwhelming similarities, providing one of the most thorough scientific counterpoints to the popular notion of a significant gender gap. Those beliefs will fade only with more hard data and more education, Hyde says.

"Finding unambiguous scientific evidence of similarities between the sexes can open our eyes to phenomena that we routinely see but miss due to public perceptions about gender differences," she says.

— Paroma Basu

COOL TOOL

The Little Pipe that Could

When she does the routine bench work of biotechnology, Tricia Nason relies on the invaluable assistance of an unheralded tool: a pipette that functions like an ink dropper.

A humble gadget invented by two UW-Madison alumni, the Pipetman has become an indispensable part of lab work in fields ranging from plant genetics to cancer research. "Every day I do dilutions, and the first thing I reach for is my Pipetman," says Nason, a laboratory technician at the Madison-based firm NeoClone Biotechnology.

Ingenious for its sheer simplicity, the Pipetman was the first adjustable pipette, allowing scientists to collect and dispense varying amounts of liquid with the touch of a button. Before **Warren Gilson '38** and his son **Robert '68** invented the device, pipettes had to be made for each specific volume, forcing scientists to constantly switch pipettes and wait for custom-made versions.

"[The Pipetman] is the product of which we're most proud, because we think it made the most difference to the research community," says Robert Gilson, the chairman and president of Gilson, Inc., a large-scale maker of scientific instruments.

So much of a difference, in fact, that the unassuming lab tool wound up at the center of a long legal spat between Gilson and Mettler-Toledo, an instrument maker that acquired a company that sold Gilson Pipetmans for more than two decades. Since 2001, Pipetman sales have plummeted from around \$400,000 a year to \$240,000, and the Gilsons alleged Mettler-Toledo was badmouthing the Pipetman in order to sell its own rival products. A three-year court battle ended in June, with a jury awarding nearly \$600,000 to the Gilsons' company.

That is good news for UW-Madison. Since Warren Gilson's death in 2002, the Wisconsin Alumni Research Foundation has received royalties for every Pipetman sold.

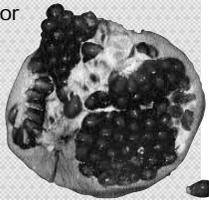
— P.B.



The Pipetman, an adjustable micropipette invented by two UW alumni, is a ubiquitous tool of biological research.

COURTESY GILSON, INC.

Add **pomegranates** to the menu of foods that combat cancer. Researchers at the UW Medical School say that the juice of the fruit, native to the Middle East, shows major potential to combat prostate cancer, the most common form of invasive cancer and the second-leading cause of cancer death in American men. Like red wine and green tea, pomegranate juice is rich in antioxidants, and in studies with mice, extracts of the juice helped significantly slow tumor growth. Next, researchers will test the fruit's ability to prevent and treat cancers in humans.



High-quality preschool programs are the most cost-effective way of **preventing juvenile delinquency**, according to a new report produced by UW-Madison and the UW Extension. Synthesizing three decades of evidence on crime prevention programs, researchers concluded that well-run intervention and prevention programs are less expensive than the costs of juvenile crime. Along with preschool, programs that had the greatest benefit were intensive home visitation, school-based socio-emotional learning, therapeutic interventions, and targeted diversion.

UW-Madison's **Katherine Cramer Walsh '94** is among a group of nineteen leading political scientists recommending a package of reforms to increase civic involvement and participation in the political process. In their new book, *Democracy at Risk: How Political Choices Undermine Citizen Participation, and What We Can Do about It*, the authors advocate nearly four dozen steps, including declaring Election Day a holiday, taking redistricting out of the hands of politicians, and encouraging more civics education.

Selling Smut

UW researchers help local farmers market a Mexican delicacy.

At a late-summer festival in Madison's Troy Gardens, the center of attention was a pan full of what looked conspicuously like black beans.

Consumer science professor **Lydia Zepeda** stood nearby, encouraging passersby to sample the pan's contents — which turned out not to be beans, but a mushroom known in Mexico as huitlacoche.

"It's kind of spicy," said Dave Drapac, as he tasted one of the tortilla-wrapped mushrooms. He said he'd seen huitlacoche — more commonly known in the United States as corn smut — growing in a garden in Indiana. "I remember not thinking of it as a good thing," he added wryly.

That perception is changing quickly. Popular in Mexico as early as the 1500s, huitlacoche has been used traditionally as a meat substitute and is high in important nutrients, including essential fatty acids and fiber. More recently, the fungus has caught the attention of gourmet magazines such as *Bon Appétit*, which has published recipes that call for it.

"Not many people know about this product, but when they taste it, they love it," says **Martin Hernandez**, a graduate student in development studies.

Hernandez is working on a strategy to market huitlacoche through restaurants and ethnic grocery stores around Madison, a project that grew from the UW's involvement with the

five-acre community-supported farm at Troy Gardens, on Madison's north side. University researchers have been helping farmers there identify high-

city's Mexican-American population is growing rapidly. Additionally, most local groceries sell only canned huitlacoche, which Zepeda says tastes

nothing like the fresh variety. "There's no texture," she says.

Producing fresh huitlacoche in Wisconsin, however, involved a scientific challenge — developing a consistent way to introduce the fungi into the ears of corn. At Troy, **Camilla Vargas '03**, a graduate student in agronomy, injects a spore-bearing liquid into each ear in a process developed by Professor Jerald Pataky at the University of Illinois at Champaign-Urbana. The liquid travels down the corn silk and into each kernel. The resulting ears bulge with black fungi that fill each kernel completely, making the corn look dark gray.

Huitlacoche thrives on moisture and grows unevenly during years of drought, which affected the crop this

year, Vargas says. But she adds that the fungus would not be difficult to grow in the Midwest. "I think any farm could do it," she says.

The main barriers to making the crop a success in this part of the country may be cultural, not technological. Zepeda, Vargas, and UW agronomy professor **William Tracy** wrote in a recent paper that researchers tried for two hundred years to prove that the fungus was toxic. During this time, they noted, "Mexicans continued to eat huitlacoche with gusto."

— *Katherine Friedrich*



MICHAEL FOISTER/ROTHBART (2)

Volunteers cook pans of huitlacoche, a fungus that grows on ears of corn (left), during a festival at Madison's Troy Gardens.

UW researchers are helping local farmers market the food, a delicacy in Mexico, to new consumers.

value products that they can grow and sell, and huitlacoche may fit the bill, Zepeda says.

"If you look at the global gourmet food world, every chef likes putting their mark on things," she says. "I've seen [huitlacoche] with crepes, in lasagna. You could use it in Chinese food. It goes very well with mild cheeses."

Zepeda says that fresh huitlacoche sells in Florida for twenty dollars per pound. Around Madison, consumers are willing to pay less than half that amount. But Hernandez is optimistic, in part because the