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expert advice

Letters { TO THE } President

SINCE JANUARY, OUR NEW COMMANDER-IN-CHIEF HAS FAMOUSLY LENT AN EAR TO BOTH CRITICS AND ALLIES. HERE'S ADVICE FROM SOME OF NYU'S OWN EXPERTS

ILLUSTRATIONS BY JACK UNRUH

ECONOMICS | DEBT OF RECKONING

Dear Mr. President, The two most pressing economic problems are pretty clear to Americans:

the breakdown of our (and the world's) financial system and the nasty recession that has resulted.

Our government has responded to these crises in time-tested ways. The Federal Reserve has

acted as a "lender of last resort," the Treasury has invested hundreds of billions in financial institutions, and your administration, working with Congress, has fashioned an economic stimulus package calling for public spending and taxpayer relief. These measures, if history

is a guide, will restore the functioning of our financial system. Financial meltdowns and recessions do happen, but they also go away.

The cost of this fight, and victory, however, is likely to come to something in the trillions of dollars. We will see the national debt rise by that amount, and we will pay the interest on

that increased debt for years to come. Social Security and Medicare spending are also likely to increase at even faster rates in the years ahead, as more and more of the baby boomers retire. The yet unfunded liabilities of these programs run into the tens of trillions of dollars, and they beg for reform as Americans are living and

working longer. Should we raise the age at which Social Security retirement benefits begin? Should we ask those who can afford to do so to draw less from Social Security and to pay more of their Medicare costs?

Foreign hands hold much of our debt, which makes it all the more necessary to right our fiscal house. If we are tempted to lighten the real burden of public debt via inflation, foreigners are likely to reduce their holdings, and also to avoid relying on the dollar as a world currency.

Mr. President, we face a ticking fiscal time bomb, made worse by the current financial predicament. So far, politicians and most of the rest of us have ignored it. As our current economic problems recede over the next four years, I hope that you will lead a public discussion of our long-term challenges and how they can be solved.



Sincerely,
RICHARD SYLLA

Henry Kaufman Professor of the History of Financial Institutions and Markets, Leonard N. Stern School of Business

Dear Mr. President, As you said at Grant Park last November, your election victory was a triumph for the American people. They showed that they want change, and that they reject the use of fear in the

justification of policies or the manipulation of opinions, which had come to characterize so much of the public discourse. The people expect you to take bold steps.

In your speech in Prague, you took exactly one such bold step: the proposal to eliminate all nuclear weapons. As you recognize, as long as nuclear weapons exist, they will proliferate amongst states—and possibly nonstate groups. Experts agree that use of them is inevitable, whether by accident or decision, and any use would constitute an environmental, political, and moral catastrophe.

The arguments typically advanced against elimination—it can't be done, others would cheat, we need them to fight terrorists—are, to put it mildly, empty. The deterrence-of-terrorism argument is particularly egregious given the fact that we have developed extraordinarily capable conventional weapons to more effectively combat terrorists' guerilla methods of attack. As I recall, we had plenty of nuclear weapons on 9/11. More to the point, the only way terrorists will acquire such weapons is from those who, like us, continue to possess them.

There is another reason for removing this intolerable danger: energy. Many countries have turned to nuclear power as an alternative to costly, polluting petroleum products. But this must not be permitted to increase the proliferation of nuclear weapons.

Reliable surveys show that some 73 percent of Americans and 63 percent of Russians already support elimination. There are concrete steps that could be taken immedi-

ately to safely and progressively curb these weapons, including urging Congress to ratify the Comprehensive Nuclear-Test-Ban Treaty, negotiating a treaty that prohibits any further manufacture of weapons-grade fissile material, and cooperating with the Russians to take all strategic missiles—some 1,500 on both sides—off of hair-



trigger alert. Another important step is to renew the Strategic Arms Reduction Treaty, which expires at the end of 2009, but with much lower levels of weapons systems.

You and your team have already made strides toward these ends. The leadership you have shown in calling the world to this

task is crucial. The way ahead will be tough and you have many other pressing issues on your agenda. But there's a saying: If you've got a big problem demanding immediate action, give it to a busy man.

Godspeed you.

**AMBASSADOR
RICHARD BUTLER, AC**

*Global Diplomat in Residence,
Center for Global Affairs, School of
Continuing and Professional Studies*

EDUCATION | FROM CLINIC TO CLASSROOM

Dear Mr. President, Congratulations! As promised in your campaign, you have already launched an ambitious education agenda, including supporting early childhood

education, reforming the No Child Left Behind Act, addressing the dropout crisis, recruiting and retaining teachers, and expanding afterschool programs.

These are all worthy initiatives, but in order to tackle any of them, policymakers and teachers need usable knowledge about how children learn and what teaching methods get the best results. Should a teacher, for example, give homework to first-graders and, if so, what kind and how much? What's the best way to introduce fractions to fourth-graders—or teach high school stu-



dents who failed to learn fractions earlier? How can we help hyperactive children pay attention? Teachers grapple with these questions daily and research can point out clear directions for their decision-making.

However, in education, we have a "clinical lab to classroom" gap. Vital knowledge too often remains with the researchers, unavailable to those in positions to help children and youth. One of your priorities these next four years should be to promote research that easily translates to classrooms by reauthorizing the Department of Education's Institute of Educa-

tion Sciences (IES) and increasing its funding. Just as in medicine, where researchers are now working to overcome their own "bench to bedside" gap, the federal government and universities must ensure with the same urgency and concern that education research translates to practice.

Funding will be critical. The IES budget for 2008 was less than 1 percent of the \$59.2 billion appropriated to the Department of Education. Mr. President, you have already nearly doubled the department's budget, but I urge you to also double the current funding for the IES. If we spend modest amounts on education research, we will know how to invest in reforming our educational system. Without this, we will continue to blindly throw money at our problems.

Sincerely,

MARY M. BRABECK, PHD
*Dean and Professor of Applied
Psychology, Steinhardt School of
Culture, Education, and Human
Development*

Dear Mr. President, Health-care reform is a tough issue in the United States, and while there have been windows of opportunity for change before, this time is different. You have a

mandate: Exit polls showed health care to be the No. 3 issue of concern to voters after the economy and the war in Iraq, and 75 percent of voters think the federal government should play a more active role. So, what should the priorities be?

First, starting with the personal health-care system, most Americans want to see the uninsured provided with coverage, and many say that they're willing to pay more taxes to make it happen. Efforts toward a universal policy could move

quickly through incremental coverage programs such as the State Children's Health Insurance Program, offering buy-in to Medicare for people 55 and older, and extending the age of young



adults who can be covered by their parents' plans up to the age of 30. Then we face the hard questions about strategies to cover those left out and the role that government can play to include them.

Second, we spend more than any other country on health care—more than \$7,000 per person each year—but the return is disappointing. Among the 30 countries in

the Organisation for Economic Co-operation and Development, the American system is the most expensive and least efficient. Our infant mortality and life expectancy rank 27th and 21st, respectively. Why have our investments brought poor results? One reason is that access to medical care is not the major factor in health. It accounts for only about 10 percent of avoidable mortality in the United States but attracts more than 95 percent of health dollars. Health-care reform must spend more on primary care and prevention, as well as on community-based programs in areas such as tobacco use prevention, and healthy diet and exercise promotion, which save nearly \$6 in health-care costs for every dollar invested.

Finally, the public needs to understand that health is everyone's business! As you have said, it is an economic issue, an educational issue, and an environmental issue, and your attention to strengthening these sectors and communicating these links will be critical to improving health for all.

Sincerely,

JO IVEY BOUFFORD

Professor of Health Policy and Public Service, Robert F. Wagner Graduate School of Public Service, and President of The New York Academy of Medicine

CIVICS | ON GOVERNMENT SERVICE

Dear Mr. President, The federal government's 1.8 million civil servants are ready to be called again to faithfully execute the laws and to be partners in changing the way Washington works. All you have to do is ask.

First, you should speak to federal employees as a whole. George W. Bush mostly ignored the federal service. He made dozens of speeches to uniformed officers involved in the war on terrorism but never asked for sacrifice from the civil service. Interviewed in 2002, 65 percent of defense department civil servants said they felt a new sense of urgency after September 11th, while just 35 percent of their colleagues in the domestic departments agreed.

Second, you should cut the number of political appointments at the top of government. You have already promised to cut middle managers, but remember that between a quarter and two-fifths of the stultifying management layers in government

are occupied by political appointees, including more than 2,000 that you will appoint without Senate confirmation. There are plenty of career senior executives who could fill these positions. Doing so would signal that bloat is bloat at whatever level it occurs.



Third, you should hire at least 100,000 front-line servants for beleaguered agencies that no longer have enough staff to handle their responsibilities. The U.S. Food and Drug Administration needs inspectors to intercept counterfeit drugs and poisoned peppers; the Social Security Administration needs representatives to handle the surge in disability claims; the Internal Revenue

Service needs agents to collect more than \$300 billion in delinquent taxes. And they are hardly alone. Name a front-line agency, such as the Veterans Benefits Administration, and the shortages are palpable. They need new employees and fast.

For inspiration, you might look to George H.W. Bush, who considered himself a product of the federal service and made every effort to engage them. The first president Bush met with senior executives immediately after his inauguration in 1989. The sooner you call on the federal service for commitment, the sooner they will respond.

Sincerely,

PAUL C. LIGHT

Paulette Goddard Professor of Public Service, Robert F. Wagner Graduate School of Public Service



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THE ART OF WAR

VETERANS FIND STORYTELLING OFFERS CATHARSIS AND COMMUNITY

by Anna Weinberg

On the bitterly cold Saturday before Thanksgiving, five veterans gather on West 10th Street in New York to give thanks. “Thanks for the tree / between me & a sniper’s bullet,” reads Roy Scranton, a soft-spoken, 32-year-old Army veteran. “Thanks for deflecting the ricochet / against that anarchy of dusk.”

The poem is by the Vietnam vet Yusef Komunyakaa, a Pulitzer Prize winner and distinguished senior poet in NYU’s graduate creative writing program, and the men are veterans of the first and second Gulf Wars who have come together for a workshop organized by the university’s Graduate Creative Writing Program. The group, which meets once a week for two hours, encourages veterans to bear witness through fiction, essays, and poetry to their own stories of combat and homecoming. While the 18 men and women have varying degrees of comfort

with writing, and wildly different wartime experiences, they manage to find some common, safe ground each week in the calm cream-and-slate confines of the program’s

Lillian Vernon Creative Writers House. Like other veterans before them—Hemingway, Heller, Vonnegut—many use their writing to communicate who or what was taken or gained through their service. “I lost two friends while over there and I feel I would be wasting myself if I didn’t try to do something that educated people on them,” says Jerry Della Salla (TSOA ’92), a 39-year-old actor who enlisted after 9/11 and served as an MP at Abu Ghraib prison from 2004–05.

This November morning, Laren McClung (GSAS ’09), a warm and thoughtful second-year MFA student who leads the group, asks everyone to reflect on the seasonal themes of gratitude and food through poems by Komunyakaa and Langston Hughes. “Let it rise from your own voice into the poem,” she tells them, marking out 15 min-

utes to write. “Don’t worry about forcing the music.” With photographs of Philip Roth, Susan Sontag, and Gwendolyn Brooks gazing down upon them, the men settle into stillness and begin.

“They produce some of the most beautiful writing, really powerful, really horrifying at times,” says McClung, whose father was a Vietnam War draftee and who is currently working on an anthology of writing by the children of Vietnam veterans. “But they’ve all been able to kind of go into themselves and pull out the stories.” When a writer runs into difficulty, McClung simply encourages them to write “whatever comes to mind,” she says. “I tell them not to worry about straying from the assignment, but to just write. And if they want, I encourage them to talk out a memory or an idea until they say something that triggers writing.”

This connection makes it easier to share the intense stories that occasionally spill forth. “Trying to take a lot of this stuff into a [regular] writing group is weird because no one else can relate to it,” says Scranton, who’s completing a joint BA and MA in liberal arts/liberal studies at the New School, and was stationed in Germany, Iraq, and Oklahoma during his four-year tenure with the Army. “It’s like they can’t even talk about the writing because it’s a freak show, whereas coming here, we’re all freaks together.”

Komunyakaa, the poet, says he once thought he would never write about his time in Vietnam but that the need to express one’s self through written words is natural, regardless of the experience that creates it. “A soldier is no different than any other human being,” says Komunyakaa, who served as an information

“Trying to take a lot of this stuff into a regular writing group is weird because no one else can relate to it,” Iraq war veteran Roy Scranton says.

While topics range from a sailor’s love of the sea to the perennial fallback of writer’s block, the singular experience of war presents its own complications and urgency for the workshop. Fewer than 2 percent of Americans serve in the military, and this is a part of what the writers consider each Saturday. “[War] changes you on so many levels—you don’t feel the same, you don’t look at things the same way,” says Alexander Misiewicz, 49, a gruff Army captain who composes a prayerful poem about a promise he made to his wife. “It’s very lonely because there are so few. Even though everybody’s experience is different, there are things that connect us.”

specialist and then as an editor with the Army’s *Southern Cross* newspaper in 1969, and who, along with other guest writers, is leading workshops this spring. “He or she possesses attributes of a complex organism, the innate capacity to respond to stimuli. But each of us also possesses the capacity of reflection and compassion. Maybe poetry is a path.”

When the 15 minutes are over and it’s time to share the day’s endeavors, Scranton offers up his poem of thanks for his own survival. “My amazement at being alive / when I remember / remember / a bullet / a truck / a night / a mistake / glows so hard,” he reads, “I can’t even say thanks.” ■



IN BRIEF

AN "A" FOR RESEARCH

The ABC's really can be as easy as 1, 2, 3—or at least, in a phrase, that's what Richard Arum, professor of sociology at the Steinhardt School of Culture, Education, and Human Development, hopes to prove with the recently formed Research Alliance

for New York City Schools. The nonpartisan group will use data-based evidence to determine which policies within the school system are most effective.

"Education policy too often has been made based on hunches, fads, and good intentions," Arum explains. "The Research Alliance

is designed to help support policy and practice that is based on data-driven research." With an emphasis on improving student outcomes, the alliance will use independent research from NYU, Columbia University's Teachers College, and the City University of New York to better inform policymaking for educators, administrators, researchers, and parents.

First on the to-do list is finding out why large numbers of teachers give up working for the New York City schools in their first five years in the position. Attrition rates are particularly high in the city's schools and the Alliance will study how this affects learning environments. The researchers are also creating an archive that will combine survey data about students, teachers, and schools from throughout the city to guide current policy and simplify future research.

—Jaclyn Perry

BUSINESS WITHOUT BORDERS

The financial world is no longer bound by time and national borders, so why should business school be? Starting in fall 2009, the Leonard N. Stern School of Business will offer 50 undergrads a chance to learn as they travel the world through the new Business and Political Economy program. These budding globetrotters will examine political economy in London during their sophomore year and learn about emerging markets in Shanghai during the second semester of their junior year. The rest of the time will be spent studying in Washington Square. "It is no longer sufficient to simply understand another country and culture," Stern undergraduate dean Sally Blount says. "Now an educated person needs to understand the convergence points across multiple countries and cultures."

—Candice Horn

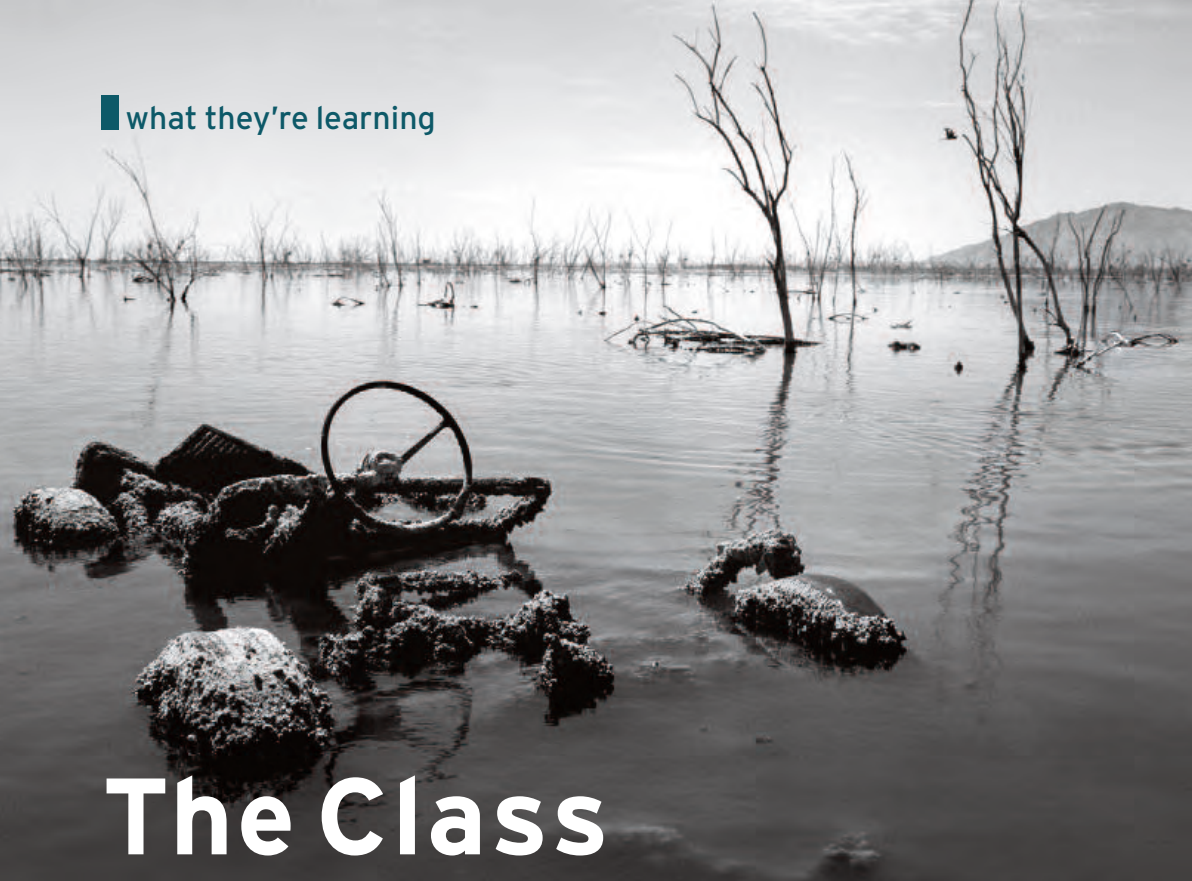
ABU DHABI COMES TO WASHINGTON SQUARE

The northern strip of Washington Square, which Henry James depicted in his eponymous 1880 novel, has a classic Greek revival facade. But this fall one will be able to walk through the door of 19 Washington Square North, a new gateway to NYU Abu Dhabi, and be transported across cultures. The space will house a communication center to hold live conferences between NYU Abu Dhabi and New York, a scholars' library, faculty and administrative offices, and a formal gathering area. The research center will videocast programs from the Abu Dhabi campus and offer podcasts, video links, and person-to-person computer conversations. In choice of lighting, color, and decor, the renovated building will not only promote integration across cultures but will remind Middle Eastern students of home, says Academic Program Director Maura McGurk.

—Crystal Rodriguez



WITH LIVE-CONFERENCING AND A WARMLY LIT RENOVATION, 19 WASHINGTON SQUARE NORTH WILL BE A PORTAL TO NYU'S NEW CAMPUS IN ABU DHABI.



A RUSTED CAR EMERGES FROM THE WATER IN SOUTHERN CALIFORNIA'S SALTON SEA.

Here's a quick look at some of the class's expansive readings:

L.R. Brown, "The Effect of Emerging Water Shortages on the World's Food," from *Whose Water Is It? The Unquenchable Thirst of a Water-Hungry World* (2003).

K.M. Strzepek and D.N. Yates, "Responses and Thresholds of the Egyptian Economy to Climate Change Impacts on the Water Resources of the Nile River," from *Climate Change* (2000).

S. Galiani, P. Gertler, and E. Schargrodsky, *Water for Life: The Impact of the Privatization of Water Services on Child Mortality* (2002).

L. Smith, "The Murky Waters of the Second Wave of Neoliberalism: Corporatization as a Service Delivery Model in Cape Town," from *Geoforum* (2004).

J.A. Allan, "Hydro-Peace in the Middle East: Why No Water Wars? A Case Study of the Jordan River Basin," from *SAIS Review* (2002).

V. Bennett, *The Politics of Water: Urban Protest, Gender and Power in Monterrey, Mexico* (1995).

E. Yuhas and T. Daniels, "The U.S. Freshwater Supply Challenge: Experiences With Desalination as Part of the Solution," from *Journal of Environmental Planning and Management* (2006).

S. Burra, S. Patel, and T. Kerr, "Community-Designed, Built and Managed Toilet Blocks in Indian Cities," from *Environment and Urbanization* (2003).

The Class

THE THIRSTY WORLD

by Renée Alfuso / CAS '06

Given the array of bottled water lining supermarket shelves these days, it's difficult to imagine what life is like for the one-in-six people worldwide—about 1.2 billion—who live without access to clean drinking water. But over the next 50 years, it will become increasingly clear, even in the United States, as that number skyrockets along with the world's population. And as climate patterns shift because of global warming, the distribution of water availability will also change, so that water may soon soar past oil as a resource in crisis. "Water will be the defining issue of the next century," says Natasha Iskander, assistant professor of public policy at the Robert F. Wagner Graduate School of Public Service. "While we have enough land to feed the world's growing population, we may not have enough water unless we discover new ways of using it much more efficiently."

Iskander's fieldwork on labor migration in Morocco and Mexico gave her a firsthand look at how water availability, or lack thereof, led many people to leave their home villages. Compelled to better understand the issue and how to avoid shortages that could reach catastrophic levels, Iskander designed a new course called Water Sourcing and Delivery in an Era of Climate Change. The class simulates real-world problem solving by assigning student teams to examine five existing cases of water harvesting and distribution systems, such as the Ghana Water Company's delivery in Accra and the supply shortages in Las Vegas. Because it's an emerging field, the students must take initiative and think creatively about the problem in a way that few courses require. "There is no textbook on this," Iskander says.

The students analyze their assigned sites through various lenses, such as the political economy of water and how each system is like-

ly to be affected by climate change, and file reports for each. And after exhaustive readings and guest lectures from experts, including senior research scientist Daniel Hillel, who is an international authority on water sustainability at the Center for Climate Systems Research at Columbia University, they share their findings with the class. This way, colleagues can consider how, for example, negotiations on industrial water use in San Diego might inspire the expansion of sanitation services in Cuenca, Ecuador. Many students are also completing projects in Wagner's Capstone program, in which they offer recommendations to real international clients, such as the World Bank.

"The problem is at once ecological, political, and logistical," Iskander says. "This class is trying to create a dialogue among those areas in order to produce public servants who can act as a bridge between the people who worry about hydrological cycles and climate change, and those who are worried about pricing systems and infrastructure for municipal water." ■

PHOTO © JOHN TROTTER

An NYU Student Will Be Calling You... *And It Might Be Romina.*

Romina (CAS '11)



PART-TIME JOB: NYU Phonathon
Student caller
CAREER ASPIRATIONS: Anthropologist
SUMMER '09 PLANS: Study Abroad in Florence
FAVORITE CLASS: Conversations of the West
FAVORITE BOOK: A Tree Grows in Brooklyn
FAVORITE SPORTS TEAM: New York Mets
PLACE TO EAT ON CAMPUS: Cafe Spice

Nearly 1/2 of her annual tuition is covered by financial aid and scholarships.



I actually get to talk to the alumni who make it possible for me to be a student here. It's an amazing feeling.



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Gifts from alumni, parents, and friends make it possible for students like Romina to pursue the kind of top-notch education only found at NYU. She, and the 70% of NYU students who receive financial aid, are enormously thankful for the generosity of donors to The Fund for NYU. Many of these students, including Romina, reach out by phone to over 150,000 alumni every year. When one of them phones you this year, please answer the call and support The Fund for NYU.



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CUTTING-EDGE

neuroscience

FORGING A NEW PATH TO TREAT AUTISM

by Matthew Hutson

RECOGNIZING A FACE. RIDING A BIKE. READING A BOOK. WITHOUT LONG-TERM MEMORY, NONE OF THESE

tasks would be possible. Neuroscientists have long aimed to explain the intricate molecular clockwork that allows experience to accumulate so that we may tackle each day more capably than the last. A malfunction in any one cog can leave us forgetful or, as NYU researchers have found, not forgetful enough. Their work, published recently in *Neuron*,

reveals new information about one of the enzymes crucial to long-term memory and may soon lead to novel treatments for neurological disorders, such as autism and obsessive compulsive disorder, or OCD.

Long-term memory is thought to rely on a process called long-term potentiation, where, when two neurons fire together, their synaptic connection is altered to let them communicate more easily. As we learn, certain connections are strengthened more than others, etching pathways in the networks of our brains. This requires the synthesis of new proteins, and neuroscientist Eric Klann, along with col-

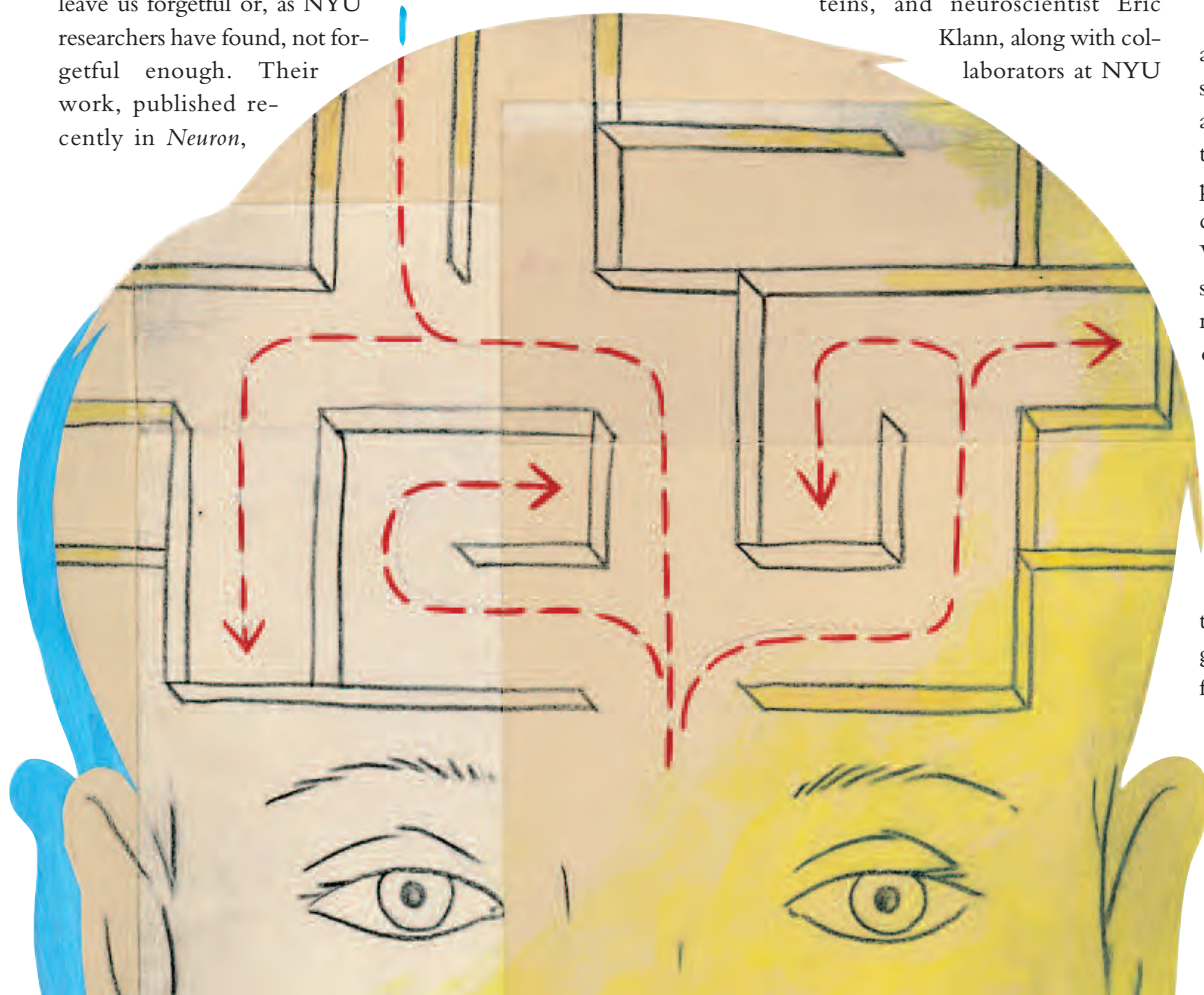
laborators at NYU

and the Baylor College of Medicine in Houston, found some surprising things about one of the enzymes critical to the process.

The researchers developed mice lacking FKBP12, a protein that interferes with the enzyme in question, mTOR, which regulates the cellular manufacture of other proteins. Removing FKBP12 should let mTOR do its thing unchecked, facilitating long-term potentiation. “In our original tests, it looked like there was enhanced memory,” Klann says, “but then we found it was a little more complicated. Although the mice could memorize things—in some cases better than normal mice—they weren’t flexible.” The mice could learn a maze without a hitch, but if you put them in a slightly different maze, they hit a dead end. They couldn’t adjust to changing conditions.

Further tests revealed that these affected mice showed behavior resembling that of humans with autism and OCD. For example, they repeatedly buried marbles, a pattern similar to tics in autism or constant hand-washing in OCD. When presented with a previously seen object and a novel one, the mice showed more interest in the old object, revealing discomfort with the unfamiliar. And when given a shock in one environment, they were more likely than normal mice to freeze when placed back in that environment. “If something bad happens at school,” Klann says, “some autistic children have a difficult time going back because they’re fearful.” The memory is too persistent.

Both biochemical and neurophysiological experiments confirmed the source of the repetitive behavior. Removal of FKBP12 did indeed enhance the activity of the mTOR en-



zyme, and scientists found increased mTOR signaling in several areas of the mouse brains. Klann's team is now trying to isolate which molecules downstream of mTOR's enzymatic activity are responsible for its effects on memory. Then maybe they can pharmacologically target those pieces of the clockwork.

Importantly, the changes in the mice did not kick in until two or three weeks after birth, implying that autism and related disorders can develop even in people who are born healthy. "It's not necessarily the case that the brain is wired differently," Klann says. "It also could be that these pathways are just misregulated." While correcting the misregulation may be too tall an order, Klann hopes that some of the symptoms that decrease the quality of life, such as repetitive behaviors, could be treated—even in an adult. Such a breakthrough, he believes, is "not far off at all." ■

■ parasitology

Cracking Malaria's Code

by Lindsay Mueller / CAS '09

Plasmodium vivax is not the type of malaria parasite that kills you, explains parasitologist Jane Carlton, "but they say it makes you wish you were dead." It causes flu-like symptoms—aches, shivers, high temperature, and a general feeling of malaise—and is responsible for more than a quarter of the 515 million malaria cases diagnosed worldwide each year. If infected, a patient might feel fine one day and ill the next. "The danger is that you can have it and not even know it because the parasite can hibernate in the liver and remain dormant for months, even years," Carlton says.

So many will take heart in knowing that Carlton and a team of colleagues at the NYU School of Medicine have decoded the DNA for this species, which is endemic in Asia and the Americas. Their



work, published as the cover story in a recent issue of the journal *Nature*, will allow them to identify weak spots in the parasite's armor and, most important, provide a foundation for the development of a vaccine.

Carlton's discovery marks a milestone in malaria research. It is impossible to grow the parasite in a culture, mainly because it requires young red blood cells, which are notoriously difficult to cultivate. Carlton and her team partnered with the Centers for Disease Control and Prevention to infect several South American squirrel monkeys with an El Salvadorian strain of *P. vivax* in order to obtain sufficient DNA for the project.

In the future, Carlton and her team plan to collect blood samples from *P. vivax*-infected patients all over the world to better understand different strains of the disease and, in time, target treatments for it. ■

■ dentistry

MOUTH REVEALS AN ALZHEIMER'S CLUE

by Ted Boscia

For most people, the nightly ritual of brushing, flossing, gargling, and rinsing is ingrained at a young age in the hopes of keeping their teeth sparkling white and armed against decay. But a new study suggests that these simple acts, which take just a few minutes each day, might also help

stave off one of the most devastating diseases of the brain.

A team of NYU doctors recently linked Alzheimer's disease to gum disease, the latest discovery in a growing body of evidence tying bacterial infections that elevate inflammatory molecules in the brain to Alzheimer's, which more than five million Americans suffer from. Earlier research at the

University of British Columbia showed that those suffering from dementia also had high levels of the bacterium found in periodontal disease.

"I can't state that the management of periodontal disease would suddenly or immediately halt Alzheimer's," cautions Angela Kamer, assistant professor at the College of Dentistry, and leader of the NYU study. "But it could slow its progression and also warn doctors and patients to be more aware of the risk."

Kamer and her team compared 18 patients with early signs of Alzheimer's to 16 patients with normal brain function and discovered a sharp difference. While 72 percent of the Alzheimer's

patients displayed an antibody associated with periodontal bacteria, only 38 percent did in the other group.

Kamer recently presented her findings at the Alzheimer's Association's International Conference in Chicago. While the work may lead dentists to screen their patients more actively for periodontal disease, it could also help scientists more precisely identify the causes of Alzheimer's and shape the search for more effective treatments, or even a cure. Already, brain specialist Mony de Leon, director of the NYU Center for Brain Health, has integrated Kamer's findings into his hunt for biological markers for the disease. ■