Averaged American

Over half of U.S. women now live without a spouse. Nearly seven in 10 Americans disapprove of the president’s handling of the war in Iraq. Statistics, surveys and polls, we believe, tell us what “America” is thinking and doing. “Being studied, and being privy to the results, is an understood and unexceptional feature of modern life,” writes Sarah Igo, an assistant professor of history. “It is perhaps the principal way that we know ourselves to be part of a national community.” In her new book, The Averaged American: Surveys, Citizens, and the Making of a Mass Public, Igo tells the story of the rise of statistical studies in modern America. Her narrative starts with the 1929 Middletown study of Muncie, Ind., and moves through the political polling of George Gallup and Elmo Roper during the ’30s and ’40s, and then looks at the infamous Kinsey reports of 1948 and 1953. The “scientific” tabulations of Middletown showed us what an “average American” is, and the Gallup and Roper polls revealed the fluctuations of the “mass mind,” while Kinsey’s frank reports on American sexual practices brought into question the very idea of “normal.” All this social information — the graphs, percentages, curves and data points that measure and express the nation — became part of America’s popular culture and self-understanding. “By mid-century, it was clear that impersonal techniques and facts about strangers could penetrate the most private domains of individuals’ lives,” Igo writes. “Americans were in effect speaking a new language, one they could not unlearn.”

DNA Gets Bent

The nucleus of each of our body’s cells contains long strands of DNA. To keep the strands from turning into a tangled mess, cells have evolved a tidy packaging scheme, with the DNA wound around tiny bobbins made of protein to form nucleosomes. Physics professor Philip Nelson says that DNA’s propensity to coil and kink when it interacts with other molecules was once considered surprising. “Common sense and physics seemed to tell us that DNA just shouldn’t spontaneously bend into such tight structures, yet it does. In the conventional view of a DNA molecule, wrapping DNA into a nucleosome would be like bending a yardstick around a baseball.” To understand this puzzle, Nelson and Caltech Ph.D. student Paul Wiggins brought together a team of scientists from the U.S. and the Netherlands to test the mechanics of DNA over length scales shorter than had ever been studied. Using atomic force microscopy, they measured the energy needed to bend DNA at lengths as short as five nanometers (about 2,000 times smaller than the width of a human cell). “We found that the properties of DNA when probed at the short lengths relevant to cell biology are quite different from those inferred from earlier, longer-scale experiments,” he explains. “Its resistance to large-angle bends at this scale is much smaller.” Nelson, a member of Penn’s Nano-Bio Interface Center, says that “the nanoscale, where so much exciting materials science is emerging, also happens to be the scale at which cell biology operates. We’re entering an era when we are able to use the tools of nanotechnology to answer fundamental puzzles of biology.”

Sarah Igo

Topography of a single DNA strand on a surface as reported by atomic force microscopy
Sex and Cigarettes

Population scholars have long observed that life expectancy for women in the U.S. is greater than for men. In recent years, they have noted that the difference in longevity between the sexes has decreased (from 7.8 years in the 1970s to 5.3 in 2003). That narrowing gap in mortality is due primarily to differences and changing habits in cigarette smoking say Samuel Preston, the Frederick J. Warren Professor of Demography, and Ph.D. student Haidong Wang, G’04. “The different smoking histories of women and men provide a telling vantage point from which to view the havoc that smoking has wrought on national mortality patterns,” they write in their study, “Sex Mortality Differences in the United States: The Role of Cohort Smoking Patterns.” Preston and Wang looked at mortality rates in the U.S. over a half century (1948-2003) as a function of age, time period and birth cohort. Incorporating data from national surveys on smoking habits and histories as well as lung-cancer death rates clearly shows that “smoking is principally responsible for change in the pattern of sex mortality differences,” due to recent increases of smoking among women. The authors note that an upsurge in smoking just after World War II blunted a significant fall in mortality during that period, and a sharp drop in the numbers of people who smoke in the last two decades exaggerated more recent improvements in longevity. Mortality for men will continue to fall faster than for women over the next 30 years, Preston comments. “This will help equalize sex ratios at older ages but create a bigger fiscal problem for Social Security.”

Girly Man

At a 2004 Republican rally in an Ontario, Calif., food court, Governor Arnold Schwarzenegger mocked the Democratic-controlled state legislature as “girly men” and bid his supporters to “terminate” the legislators at the polls. Charles Bernstein, the Donald T. Regan Professor of English, responds to Schwarzenegger’s call with poetic wit. “The Ballad of the Girly Man,” a poem for his son, Felix, calls upon us to celebrate the girly man and indeed, to become one: “So be a girly man / & sing this gurly song / Sissies and proud / That we would never lie our way to war.” A girly man, according to Bernstein, values complexity, reason and interdependence. A girly man proclaims his “faith in listening, in art, in compromise.” A girly man recommends poetry as a form of resistance. His new book, Girly Man, challenges and delights with innovative poetry that addresses many of our current concerns and cultural obsessions head on. The sequence “Some of These Daze” chronicles Bernstein’s response to September 11 and its aftermath; the poem “In Particular” takes the notion of sexual, ethnic and racial identities to ridiculous extremes by listing “types” of people (“A Hindu hiding in an igloo,” “A Sunni boy on a scooter”) linked by rhyme, contingency and wordplay rather than more familiar relationships. Many of the poems in Girly Man are provocative — preposterous, even — in their insistent humor and antic formal play. Girly men, be proud. Charles Bernstein is your fierce defender. — JESSICA LOWENTHAL

Between Two Empires

It has been argued that immigrants to the U.S. must choose between loyalty to their homeland and adopting American traditions. In his latest book, Between Two Empires: Race, History, and Transnationalism in Japanese America, Eiichiro Azuma provides another view. By examining rarely consulted personal papers, vernacular newspapers, immigrant publications and government reports, Azuma, an assistant professor of history, investigates the formation of Japanese-immigrant or Issei communities in the American West before World War II. At the time, Imperial Japan demanded loyalty from Issei, and American racism against Asians was prevalent. Azuma finds that in trying to create a “space where Issei could forge their own interpretations and self-definitions,” they were able to “navigate through the two state ideologies, not only by turning one against the other but also by conveniently fusing aspects together.” Between Two Empires has been widely recognized for its excellence and received numerous awards.

—JOANNE SIDAROV, C’09