

Less Bliss in China?

Is marital satisfaction about the same the world o'er? Not according to a three-nation comparison, which suggests that Chinese couples are less happy with their lot than either Turkish or U.S. pairs.

Evolutionary psychologists Glenn and Carol Weisfeld of Wayne State University in Detroit, Michigan, and colleagues gave more than 1000 married couples in the three countries a five-item questionnaire asking each person whether he or she had considered divorce, regretted choice of partner, felt sexually fulfilled, argued with the spouse, or felt mis-

treated. On a scale of 1 to 5 (5 being the least satisfied), Chinese couples averaged 2.38—as opposed to 1.91 for Americans and 1.99 for Turks. The difference was statistically significant for everything except the argument item, says Glenn Weisfeld.

The authors say the continuing practice of arranged marriage may be a factor in Chinese discontent. But they favor a more evolutionary explanation: Many Chinese women outrank their husbands economically. More women—92% of them—than men hold jobs, the researchers report. Research has shown that “marriages in which the wife dominates the husband in nonverbal behavior, income,

or decision-making tend to be less satisfactory, especially for her,” says Weisfeld. So, just as females in many other species seek dominant males, the study suggests that in humans “moderate husband dominance seems to maximize marital satisfaction.”

Psychologist Linda Mealey of the College of St. Benedict in St. Joseph, Minnesota, says this is consistent with research showing that men are typically expected to be “the main contributor to the family.” She says even in subsistence cultures where women bear most of the load, men have higher rank—men in such cultures are more likely to have multiple wives, for example.

Fed Chief Leery of Ed Tech

U.S. Federal Reserve Board chair Alan Greenspan likes to emphasize that innovation, fueled by cutting-edge science and technology, is the key to a robust economy. But last month the maker of the nation's monetary

policy gave a surprising endorsement of some very old-fashioned educational tools: pencils and paper.

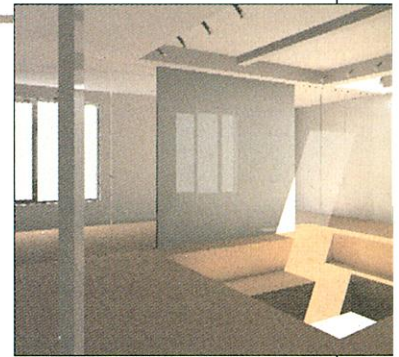
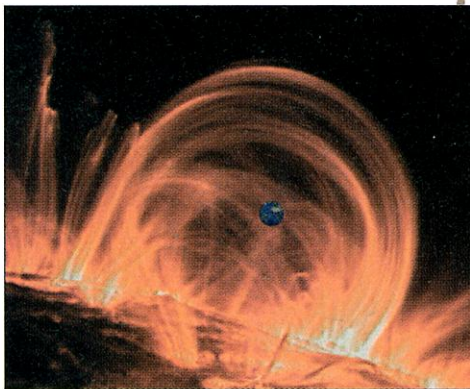
“I’m glad I was brought up in a generation without calculators,” Greenspan told the

House Education and Workforce Committee at a hearing on a bill to improve elementary and secondary school math and science education. Learning the nuts and bolts of long division, for example, without benefit of calculator has “enduring value,” said Greenspan. The exercise is crucial to the “early sharpening of intellectual rigor” as well as building the confidence to tackle higher level problems, he asserted. Greenspan also said he felt that too much time in front of computers is bad for cognitive development, robbing children of crucial interactions with parents and teachers.

Educators take issue with part of Greenspan’s message. Lee V. Stiff, math education professor at North Carolina State University in Raleigh and president of the National Council of Teachers of Mathematics, says rote pencil-and-paper calculations don’t guarantee success, whereas “calculators, when used appropriately, can facilitate a student’s understanding of concepts.”

Solar Pyrotechnics

Loops of fire are shining light on a solar mystery. Scientists have long wondered how the corona—the sun’s wispy outer layer—can be 300 times hotter than the solar surface. Now NASA’s TRACE spacecraft has taken high-resolution pictures of coronal loops, which are helping to narrow down plausible theories. Scientists had speculated that a chunk of plasma gets heated fairly uniformly as it shoots away from the sun, which implies that the loops of plasma are much hotter at the top than at the bottom. However, the pictures show that the gas apparently gets most of its energy near the sun’s surface. (Earth image is superimposed to show scale.)



Swiss Open 21st Century Science Consulate

Glass walls signify “transparency of communication” throughout science in what the Swiss government has dubbed its “digital consulate,” opening next week in Cambridge, Massachusetts. The new Swiss House for Advanced Research and Education (SHARE) is to be “a large-scale physical interface to a distributed virtual community of Swiss and other scientists,” says Jeffrey Huang, professor of digital media at Harvard, who designed it with architect Muriel Waldvogel. Officials say it will also be a “privileged observatory” from which the Swiss will observe “the efficient American innovation and technology-transfer system.”

The core of the building is a sunken “arena” (at right in picture) with up-to-the-minute technology including plasma displays, wireless microphones, video ports for laptops and PDAs, a “digital wall,” and video cameras that will transmit goings-on in real time to the Internet. A Swiss bank footed the \$2 million bill for the center, strategically located between Harvard and MIT. The country’s U.S. science attaché, Xavier Comtesse, is moving up from Washington, D.C., to run it (creativeswitzerland.com).