

Lone Star vs creationism

The battle against anti-scientific literalism continues. Next stop Texas.

The creation–evolution debate in the United States is ever-changing: any given week might bring good news for science advocates in some states, but bad news in others. At the moment, the good news is coming from Florida, which on 19 February voted to adopt new science standards that significantly strengthen the role of evolution in the state's biology curriculum (see page 1041).

But the next round of news will undoubtedly come from Texas, where a state agency faces a decision whose ramifications could resonate across the United States for years to come. The Texas Higher Education Coordinating Board is considering an application by the Institute for Creation Research (ICR) to grant online master's degrees in science education. And an advisory panel to the board has recommended that Texas should accept the application.

The ICR accepts the Bible as literal truth on all topics. According to its website, the palaeoclimatology class covers “climates before and after the Genesis Flood”. Anatomy lab includes “limited discussion of embryology and accompanying histology, specifically in regards to evolutionary theory and its alternative — the creation of fully functional major groups of animals”.

For most of its existence the ICR was ensconced in the San Diego

area, but in 2007 it relocated to Dallas, in an apparent move to expand its national reach. California may have been glad to see it go; the state had been battling the ICR over accreditation since 1981, when, under a sympathetic official, the institute first got the go-ahead to offer degrees. But in Texas the ICR must win approval from the state board to continue setting up its graduate programmes before seeking permanent accreditation.

The decision falls to the nine-member higher-education board. It had been expected to vote on the issue in January, but instead asked the ICR for more information — about the research done by its faculty members, about how an online course would teach experimental science, and about why its curriculum is so different from other degree-granting institutions in science education. A vote is expected at the board's 24 April meeting.

High-powered scientists in Texas are already weighing in, asking board commissioner Raymund Paredes to deny accreditation. And there are signs that the board is listening. In a response to Nobel laureate Steven Weinberg, Paredes wrote that “our primary criterion will be how the proposed program will contribute to preparing high school students to do rigorous science in higher education”. One can only hope such rational approaches will outweigh the primary ICR reaction, which has been to send out a call for prayer.

Scientists in Texas and the rest of the country must continue to make it clear to Paredes why the board should deny accreditation to this organization. The ICR has managed to con its way into the California educational system for decades. Texas must not succumb as well. ■

Time to take control

With money now flowing in, the fight against malaria must shift from advocacy to getting results.

“The billion-dollar malaria effort is flying blind,” declares Mark Grabowsky in a Commentary on page 1051 of this issue. And given that Grabowsky is malaria coordinator of the Global Fund to Fight AIDS, Tuberculosis and Malaria, which disburses almost half the US\$1 billion spent annually on malaria control, we might do well to listen.

Grabowsky argues that, above all, malaria control requires data: to assess the present situation, to target control measures and to evaluate their effectiveness. He also says that an adequate surveillance programme would cost as little as \$10 million a year. Yet that money has not been forthcoming; malaria managers still lack even the most rudimentary information (see *Nature* doi:10.1038/news.2008.621; 2008).

The surveillance problem is symptomatic of a wider failure in basic project management. The ‘international’ malaria effort is actually a hotch-potch of fragmented, country-level projects funded by multiple donors, with little regional and international coordination. Such leadership would normally be provided by the World Health Organization (WHO), as it has done to great effect in the fight against measles and polio. But the WHO-led Roll Back Malaria initiative is mired in bureaucracy and anything but effective (see *Nature* 430, 935; 2004).

That management problem, in turn, reflects a still deeper issue:

the agencies involved in the malaria fight, including the WHO, have for too long been driven largely by advocacy. It's true that advocacy was a supreme need a decade ago, when malaria control was off the radar and gathering a mere \$100 million a year. But that mindset has persisted even as the funding has multiplied tenfold.

Take the good news spin put on recent studies showing that bed nets and drugs cut the malaria burden by as much as half in Zanzibar, Ethiopia and Rwanda. That sounds dramatic. But it's hardly unexpected, as the low malaria transmission rates in these countries make the disease comparatively easy to control. And in the meantime, silence surrounds the lack of a single win in high-transmission areas such as the Democratic Republic of the Congo or Nigeria, which account for half the malaria mortality in Africa.

Yes, on-the-ground conditions are difficult, as is reported in Zambia, the flagship of international efforts (see page 1047). But the international malaria effort is still geared towards maintaining donor support instead of getting teams into the field gathering data and delivering basic items such as bed nets. That's why almost no country is near to meeting Roll Back Malaria's target of having 80% coverage with bed nets and drugs by 2010; why malaria is still killing more than 1 million people every year; and why the global control effort is way off track to meet the internationally agreed goal of halving malaria deaths by 2010.

Such goals are undeniably ambitious. But they are a spur to action — and in line with what the WHO has already achieved with measles and polio. What the malaria effort urgently needs now is leadership, and a shift from spin to substance and results. ■

UK scientists keep access to the Gemini telescopes

Britain has reached an agreement that will allow UK astronomers continued access to the Gemini Observatory.

In November, the UK Science and Technology Facilities Council (STFC) announced its intention to withdraw from the observatory — which has 8-metre telescopes in Mauna Kea in Hawaii and Cerro Pachon in Chile — because of a budget shortfall (see *Nature* 450, 468; 2007). Subsequent negotiations to retain access to the Hawaiian telescope failed, raising fears that British astronomers would have no access to a large telescope in the Northern Hemisphere.

But on 27 February the STFC announced that it would remain in the Gemini partnership. It plans to save money by selling a portion of its nearly £4 million (US\$7.9 million) annual subscription for telescope time to other interested nations.

“I welcome this announcement,” says Michael Rowan-Robinson, president of the Royal Astronomical Society. Dropping out, he says, would have been “very bad for the United Kingdom’s reputation as an international partner”.

Massachusetts gears up to boost cash for life sciences

House lawmakers in Massachusetts on 27 February passed a bill that would provide \$1 billion to life sciences in the state over ten years. The state Senate is expected to take up the bill next week. If it passes as expected, Massachusetts will be behind only California and Texas in state dollars recently earmarked for biological research.

The Massachusetts package features \$250 million in grants, including \$25 million in paediatric stem-cell research training grants; \$250 million in tax credits for life-sciences firms that promise to create jobs in the state; and \$500 million for bonding for capital investments, including \$90 million and \$95 million for building life-sciences facilities at the Worcester and Amherst campuses of the University of Massachusetts. Among the grant monies are \$5.7 million for a stem-cell bank and registry at the University of Massachusetts Medical School in Worcester.

Governor Deval Patrick introduced the measure last spring.



Deval Patrick.

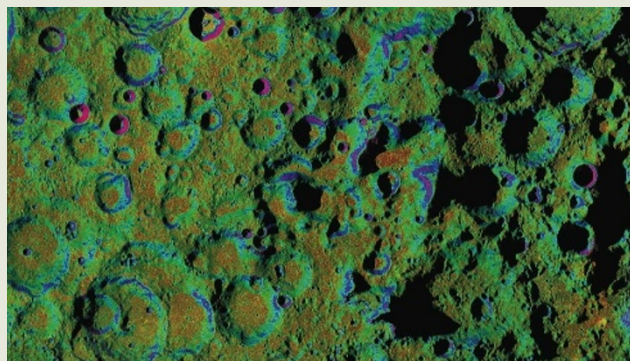
Lunar pole is revealed in high resolution

NASA has released radar pictures of the Moon’s south polar region — the best ever, with a resolution of 40 metres, showing up the steep slopes and rugged topography (see right).

Taken using the Goldstone Solar System Radar facility in California’s Mojave Desert, the pictures could help NASA to

find smooth, flat landing areas for future rovers, or suitable spots for a lunar base. The south polar region is of particular interest because some areas, particularly those deep inside craters, are in perpetual shadow and may contain permanently frozen water that could be used as a resource.

But the Goldstone pictures, released on 27 February, do nothing to resolve the debate about whether there is water ice buried beneath the surface because the radar wavelengths used (3 centimetres) do not penetrate the surface well and an analysis of the polarization of the returning signal wasn’t performed. Scientists hope that the Lunar Reconnaissance Orbiter, scheduled to launch later this year, will settle the ice question.



NASA

First of three contested stem-cell patents upheld

In a dispute over three stem-cell patents, Wisconsin Alumni Research Foundation (WARF) is claiming victory, after an interim decision from the US Patent and Trademark Office to uphold one of its patents.

On 28 February, WARF said that the claims of a 2001 patent on a method for growing and sustaining cultures of embryonic stem cells had been upheld. The patent is one of three on work led by James Thomson of the University of Wisconsin. The other two cover methods for deriving primate embryonic stem cells — including human ones — and the cells themselves.

In 2006, after critics challenged the patents on the basis that they were too broad and hindered the field of embryonic stem-cell research, the patent office said it would re-examine the three. The critics played down last week’s decision, saying that WARF has already limited its claims in the upheld patent, and that the other two patents are more important. Rulings on those are still pending.

India to propose regulatory body to curb misconduct

India is to consider creating a national body to investigate plagiarism and misconduct in science after a string of high-profile frauds.

C. N. R. Rao, who heads the national science advisory committee, told *Nature* that he will discuss the proposal at his next meeting with Prime Minister Manmohan Singh. Rao was reacting to the news that Sri Venkateswara University in southern India

is to reopen a massive fraud case involving chemistry professor, Pattium Chiranjeevi. Last month, Chiranjeevi was found guilty of plagiarizing or falsifying more than 70 research papers published in a variety of Western scientific journals between 2004 and 2007. Some of the journals have started retracting the articles.

US\$50 billion agreed for Bush’s global AIDS plan

Lawmakers in the US House of Representatives reached a key compromise last week clearing the way for a vote that could more than triple US funding to fight AIDS, malaria and tuberculosis.

The bill renews the President’s Emergency Plan for AIDS Relief, a \$15-billion, five-year law created by President Bush in 2003. Its new incarnation would provide \$50 billion over the next five years, with \$9 billion of that earmarked for fighting tuberculosis and malaria, which often affect patients with AIDS. Crucially, it does not require, as did its predecessor, that one-third of HIV/AIDS prevention money be spent on advocating abstinence. Instead, it asks countries to justify to Congress any decision to spend less than 50% of prevention dollars on promoting abstinence and faithfulness.

The Senate Foreign Relations Committee is working on its own version of the bill aiming for a similar compromise on the abstinence language.

Correction

The Editorial ‘Time to take control’ (*Nature* 451, 1030; 2008) failed to make it clear that Mark Grabowsky’s assertion that “the billion-dollar malaria effort is flying blind” relates specifically to a lack of disease surveillance. Apologies.