## Japanese science stands out as recession squeezes budget

**Tokyo**. Japan's science-related ministries and agencies have managed to receive comparatively healthy budgets for 1993 despite a clampdown on government spending because of the recession. But some of the most ambitious proposals, in particular from the

## What Japan will spend on science in 1993

(in billion yen; 125 yen = US\$1)

MITI	Amount	Change
Overall R&D	281.9	+ 8.7%
Industrial technology	25.3	+ 7.2
New Sunshine Project	53.9	+ 7.2
Human Frontier Program	3.9 *	>+ 1.0

\* shared with Science and Technology Agency

91A		
Overall R&D	581.5	+ 5.4%
Special Promotion Funds	13.3	+ 20.9
Space	157.0	+ 8.5
Nuclear Energy	323.6	+ 2.7
ITER	6.9	+ 27.8
Ocean Research	12.0	+ 7.1
ERATO	6.9	+ 9.5
Human Genome	1.6	+ 45.5
MESC		
Grants-in-aid of research	73.6	+ 13.9
AIDS	10.1	+ 480.0

Ministry of International Trade and Industry (MITI), have been quite severely trimmed, and the date for achieving the goal of doubling the government budget for science and technology is receding far into the future.

The total budget for fiscal year 1993, which starts on 1 April, was set last week by the cabinet at just over \$72,000billion (US\$580 billion), an increase of only 0.2 per cent from 1992 and the smallest in six years. Proposals for science and technology were treated favourably, however, in line with a commitment last year to double the government budget for science and technology "as soon as possible". The budget must be approved by the Diet in the next few months, but funding for science and technology is unlikely to change.

Despite the favoured status of science, MITI received only slightly more than half (8.7 per cent) of its request for an increase of 16 per cent in research and development, to more than ¥300 billion (US\$2.4 billion). Nevertheless, MITI has succeeded in giving a large boost to its New Sunshine Project, which covers research on alternative energy, energy conservation and 'environment friendly' technology. The Industrial Scientific Technology programme, covering the ministry's 'largescale' (*ogata*) and 'next-generation'

> (*jiseidai*) projects and attracting foreign as well as Japanese companies (see *Nature* **360**, 500; 1992), received an increase of 7.2 per cent. But at the same time, the Human Frontier Science Program, which is funded jointly with the Science and Technology Agency (STA) and which supports international research on the brain and molecular biology, was held practically constant, at ¥3.9 billion.

The Ministry of Education, Science and Culture (MESC) received most of its request for a 16 per cent increase in the budget for research grants for university researchers. Its 14 per cent increase, the largest in more than a decade, will raise its budget to \$73.6 billion.

The Ministry of Health and Welfare (MHW) also succeeded in getting a significant increase in its budget to fight AIDS through research, screening, counselling, local government subsidies and public education. But even with a fivefold increase,

to just over ¥10 billion (US\$80 million), its budget is tiny compared with those in the West.

STA also will receive 20 per cent more for its 'Special Promotion Funds' to provide grants for government researchers. But its budget of \$13.3 billion is still small compared with that of MESC.

The agency's space budget continues to rise rapidly because of Japan's commitment to the US Space Station Freedom while nuclear energy, which consumes over half of the STA's budget, has been given an increase of only 2.7 per cent. However, within this outlay the budget for the International Thermonuclear Experimental Reactor (ITER) project will increase by nearly 30 per cent as Japan begins the engineering design phase of ITER at Naka in Ibaraki Prefecture (see Nature 360, 615; 1992). The agency's small (¥1.6 billion) budget for the human genome project will increase by 45 per cent, with most of the extra money going towards a computer link with the database at John Hopkins University in Baltimore.

US report finds NIH's Gallo guilty of misstatement

Washington. In a new twist to the case of Robert C. Gallo and the AIDS virus, a high-level review body of the US Department of Health and Human Services (HHS) has partially overturned an earlier report that vindicated the National Institutes of Health (NIH) researcher of scientific misconduct in a long-running dispute with scientists from the Pasteur Institute in Paris. Specifically, the HHS's Office of Research Integrity (ORI) says in a report issued last week that Gallo lied when he wrote in a 1984 paper that a putative AIDS virus (then called LAV) developed by Luc Montagnier of the Pasteur had not been transmitted to a permanent cell line.

The dispute centres on the fact that LAV and HTLV-IIIb are structurally nearly identical, even though in the early stages of AIDS research they seemed to be biologically different — one grew in culture and one did not. The confusion was cleared up more than a year ago when unpublished data from Montagnier's laboratory revealed that both research groups had actually been working with a virus designated LAI that contaminated the LAV sample at Pasteur before it was sent to Gallo.

In May 1992, NIH cleared Gallo of charges of scientific misconduct for allegedly "misappropriating" an AIDS virus from French collaborators. But it found his colleague, Mikulas Popovic, guilty of misconduct on minor counts regarding the way in which data were reported in a paper published in May 1984 in *Science* (see *Nature* **357**, 3; 1992).

These conclusions came from NIH's Office of Scientific Integrity and were approved by NIH director Bernadine Healy, who forwarded the NIH report to the newly formed Office of Research Integrity in NIH's parent Department of Health and Human Services. Reviewing the case herself, Healy found no evidence of fraud and said so. But her position plainly angered US Representative John Dingell (Democrat-Michigan), who accused Healy of conducting a whitewash and who called the NIH report a "deeply flawed" document.

This posed a dilemma for ORI. If it rejected Healy's endorsement of the report, ORI would be criticizing her judgement and that of other NIH officials who also stood behind Gallo. But if it supported Healy, it would have to explain itself to Dingell.

The new report finds Gallo guilty of one count of scientific misconduct for allegedly falsifying part (but not all) of a sentence in the *Science* paper. Gallo wrote that the apparent differences between his virus (then called HTLV-IIIb) and Montagnier's might be "due to insufficient characterization of

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