US students not taking the Japanese bait

- Student exchange imbalance worsens
- Culture gap remains the problem

Tokyo

THE imbalance in the flow of researchers between Japan and the United States continues to grow, with more than ten times as many Japanese going to the United States as US researchers are coming to Japan, according to new statistics from the Science and Technology Agency (STA). The gap is widening despite Japanese government programmes to encourage Western scientists to visit Japan, and some officials are concerned that the situation could become a renewed source of friction between the two countries.

The unbalanced exchange of researchers became a contentious issue during renegotiation of the US-Japan Science and Technology Agreement in 1987-88, and Japan agreed to take steps to open up its public research laboratories to foreign scientists, in particular those from the United States. Since then, the government has introduced new postdoctoral fellowship schemes, and the number of foreign scientists in Japan is increasing. But the new STA data show that the number of Japanese researchers going to the United States and other Western countries has been growing at a far greater pace.

The STA analysis is based on two sources of data: exit/entry immigration statistics from the justice ministry, and a questionnaire sent to all Japanese national laboratories (except universities and research institutes belonging to the Ministry of Education, Science and Culture).

The justice ministry statistics, which include students and researchers in the social sciences and humanities and scientists on short-term as well as long-term stays, give the widest measure of exchange and show that the number of Japanese going to the United States each year has increased from 18,000 in 1984 to nearly 70,000 in 1989. On the other hand, the reverse flow of researchers from the United States to Japan has increased only from just over 3,000 to 5,252. Similarly, the questionnaire data show that the number of researchers from national laboratories going to the United States increased from 426 to 1,592 during the same period, but the inflow of US researchers to these laboratories increased only from 30 to 119.

The same trend can be seen in data on exchanges with other Western countries. The situation is reversed, however, in the case of South-East Asian countries and China. From those countries, there has been a rapid

growth in the number of researchers coming to Japan.

STA officials are not sure why there has been such an increase in the number of Japanese researchers going to the United States, but they think it may be due to the rapid increase in value of the yen against the US dollar since 1985. And in the case of researchers at national laboratories, it is probably due in part to a new government fund of ¥200 million (\$1.5 million) for short-term overseas travel introduced in 1987.

To balance the outward exchange, the Japanese government has been actively trying to encourage Western and US scientists to take up the new fellowships it has offered — so much so that some Japanese scientists claim that well qualified South-East Asians, Indians and Eastern Europeans are being rejected in the selection process.

Nevertheless, few US scientists are taking up the awards. When STA introduced a new scheme of 100 fellowships in 1988, they hoped to give half of them to US scientists. But in fiscal year 1990, with the scheme expanded to 160 fellowships per year, only 25 went to US scientists.

Why is Japan having difficulty attracting

Figures from exit/entry immigration statistics (left) tell the same story as an STA questionnaire to national laboratories.

researchers from the United States? Kaname Ikeda of the Ministry of International Trade and Industry (MITI), who helped to set up the STA scheme, says part of the problem is that young US scientists are generally reluctant to go abroad because it will not enhance career prospects at home. Akira Nakanishi, deputy director of STA's international affairs division, echoes this view and adds that there are several other disincentives. Japanese national laboratories, he says, do not provide a particularly attractive environment for Western scientists, visiting researchers have problems with schools for their children, and spouses cannot easily get employment.

David Swinbanks

BSE

First vache folle

Paris

THE first case in France of bovine spongiform encephalopathy (BSE) has been declared on a dairy farm at Plouha, in Brittany. The Ministry of Agriculture and Forests (MAF) says the infected cow comes from British stock and remains the only case so far in the herd.

Following a procedure agreed by MAF last year, the Ministry has bought the entire herd for epidemiological research, at FF2,000 (about \$400) a head over the wholesale abattoir price. It is statistically unlikely, however, that other cases will appear in the same herd, says Dr Brougère, an expert in scrapie at the Maison Alfort veterinary school south of Paris.

The MAF will also try to establish whether the infected cow was given English cattle-feed containing ground offal from ruminant carcasses — a task that Brougère fears will be 'almost impossible'. This feed, thought to be one of the vectors for the agent causing BSE, was banned in Britain from 1988. But it continued to be exported to France until a similar ban was introduced there in 1989.

The MAF does not expect the same kind of epidemic to occur in France as in Britain, as the feed was apparently used in smaller proportions. But Brougère feels it will be only a matter of time before other, 'sporadic' cases appear. With an incubation period of 2-9 years, 'we know there is a risk', she says, 'but we do not know how serious a risk'. One of the problems, she says, has been that veterinary surgeons have not always known the characteristic signs of the illness. But last year a videotape on BSE was sent to all veterinary surgeons, explaining how to distinguish symptoms from those for rabies and hypomagnesia.

Peter Coles

SEAL HUNTING

Moratorium in South Africa

THE South African Minister of Environment Affairs, Louis Pienaar, announced recently that the cabinet had decided to continue the suspension of all commercial seal harvesting on the South African coast until additional research on the issue has been completed and evaluated, which will not be before mid-1992. In doing so, they acted on the recommendation of an independent committee of scientists under the chairmanship of John Hanks, chief executive of the Southern African Nature Foundation.

The committee was appointed to investigate sealing in the wake of the suspension of sealing operations last July, following a public outcry over the granting of a concession to a Taiwanese entrepreneur, Hsien Hsu, to harvest 30,500 Cape fur seals at Kleinsee.

Michael Cherry