

## US biotechnology

# Another joint venture

Los Angeles

YET another US corporation has joined the biotechnology bandwagon by pledging millions of dollars to help support a basic research laboratory. In exchange, the company will be able to work closely with leading molecular biologists and to profit from products or ideas stemming from the collaboration.

The arrangement is similar to many others that have been struck between academic research institutions and profit-minded corporations over the past seven or eight years. The trend has some scientists worried about academic integrity while others say the relationship is inevitable and healthy.

The newest deal is between Pittsburg Plate Glass (PPG), a chemicals, coatings, glass and resins company in Pennsylvania, and the Scripps Research Clinics of La Jolla. PPG announced on 18 January that it would contribute \$120 million over the next 15 years to a biochemical programme. Depending on how the programme develops, Scripps could receive most of the money.

At a press conference in La Jolla, PPG president Edward J. Slack explained his company's goals. "We've been in the agricultural chemicals business since the early 1940s, and we wanted to expand that effort", he said. So the company searched for a first-rate molecular biology laboratory in which to relocate its own scientific team. Scripps was chosen.

PPG scientists will work side by side with Scripps scientists, renowned for protein analysis through peptide synthesis. Scripps researchers will isolate proteins specific to certain weeds. PPG scientists will then target herbicides to inactivate the selected proteins. "We believe we can develop highly effective agricultural chemicals without side effects that may damage the environment", Slack says.

Hitherto, Scripps scientists have generally not worked on plant materials. A new plant molecular biology laboratory will be built to house the new programme.

Scripps was given its present molecular biology complex thanks to a similar deal signed nearly three years ago with Johnson and Johnson (J&J). Pharmaceuticals house scientists work closely with Scripps scientists in biomedical research. Although J&J has never said how much it contributes to Scripps each year, a major portion of the \$6.2 million that Scripps received last year from industrial sponsors is said to have come from J&J.

In their agreement, J&J scientists get first review of scientific papers flowing from the molecular biology laboratory. They can select items to be patented, although Scripps owns the patents. J&J has exclusive licensing rights. No patents have yet been announced by either party.

Most major research institutions seven or eight years ago realized that, as National Institutes of Health funding began to level off, outside funding was needed, says Scripps director Charles Edwards. "It was obvious to turn to industry. It is difficult [for industry] to put together the kind of research establishment we have here. So the marriage of the two is natural".

Critics of such marriages, however, raise several points. The nature of biology is changed. Every academic biologist of quality is signed up by one company or another. The fear is that the direction of molecular biology will be diverted from following the goals of individual scientists to following industry's goals.

The tradition of biology teaching is changed. Top scientists tend to support top students. The message to today's young biologists is that in order to be smart, you have to be rich.

Trust in universities could be eroded. Public funding of academic institutions has meant that citizens could turn to universities for unbiased, disinterested advice. When the advice is no longer disinterested, the public is cheated.

Companies could invoke the right of keeping information a trade secret (rather than taking out a patent) which would deter the flow of information through the academic community.

Finally, academic researchers cry "foul" when the Department of Defense asks for prior review of any research but allows private enterprise such prior review with no complaint.

Sandra Blakeslee

## Soviet refusniks

# Traps of black market

Paris

JEWISH *refusnik* scientists in the Soviet Union are more than ever dependent on colleagues abroad for moral and professional support, according to an international round table held here last week. But some forms of help should be avoided. One such suggestion, made at the press conference following the round table, brought an impassioned warning from Dr Aleksandr Voronel, himself an ex-*refusnik* and the founder of the Moscow "Sunday seminars", that some actions could make the *refusniks'* already unpleasant plight

much worse, even exposing them to risk of long-term gaol sentences.

The suggestion in dispute was that visitors to the Soviet Union should take with them technically sophisticated goods which the *refusniks* would then sell privately. Since many *refusniks* have been barred from professional work since filing applications to emigrate, some more than ten years ago, and have long-since exhausted their savings, the notion that they might be helped by selling western goods privately obviously seemed a good idea to one naive well-wisher. But although such "left-handed" trading is a feature of Soviet life, what might be tolerated in a citizen otherwise in good standing with the authorities might be unacceptable in a *refusnik*.

Such naivety, in a scientist sufficiently interested in the fate of the *refusniks* to turn up at a meeting on the subject, bodes ill for the knowledge of the less committed. Indeed, even the organizers of the round table, the International Committee of Scientists for Soviet Refusniks, seemed at times a little hazy, departing from the *refusnik* consensus that they must avoid being confused with Soviet dissent to the extent of arranging for the one session about Dr Andrei Sakharov who, although he has a Jewish wife, is not a *refusnik*.

According to reports presented last week, Jewish emigration from the Soviet Union is now virtually at a standstill, and there has been a considerable increase in the number of trials of *refusniks*.

What Western scientific colleagues can do to help is not entirely clear. Last week's round table rehearsed the old debate between boycotting of scientific contacts with the Soviet Union and personal pressure on Soviet colleagues within the framework of normal scientific discourse. The International Committee last week adopted a list of long-term cases for whom special efforts will be made.

Vera Rich

## How to help

**THE *refusniks'* own views on Western help as expressed in a letter to the round table participants are as follows.**

● **Their only aim is to go to Israel. If direct travel there were a condition of emigration they would be delighted to accept it. (In other words, they do not want to "drop out" in Vienna and go to the United States, a growing practice in the later 1970s, and one which the Soviet authorities sometimes cite as a reason for refusing visas.)**

● **Western colleagues should press for them to obtain visas to emigrate. Substitute concessions, such as reinstatement in their professional jobs, freedom of contact with colleagues and correspondence abroad and so on are unacceptable, and in any case are liable to be "ambiguous and temporary".**

● **At the same time, they "cordially invite" more colleagues to visit them and their seminar. They deplore the recent tendency among some Soviet scientists (not officials) who put pressure on Western visitors not to visit the *refusniks*, on the ground that this could be harmful to the visitors themselves. Such pressures, the *refusniks* say, are "devoid of all substance" and should be ignored.**

Vera Rich