Comecon technology

Plans laid for collaboration

THE Soviet bloc seems on the brink of novel schemes for technical collaboration. The Comecon economic summit in Moscow last month outlined five key areas of cooperation in its "Comprehensive programme" for collaboration among member countries "up to the year 2000". The five priorities, electronics, automation, nuclear power, new materials and biotechnology, hold no surprises — they were already earmarked for "integrated" cooperation at a previous summit in June 1984. More interesting, however, are the measures proposed for implementing cooperation, and the suggestion that the new programme could be the basis for cooperation outside Comecon itself.

The programme notes that the member countries have decided to translate the priorities "immediately" into specific agreements and contracts, embracing all stages of the "science/technology/production/market" process. The programme provides for direct relationships between scientific organizations and production enterprises in the member countries. Such relationships have until now usually been channelled through high-level organizations situated in the capitals of the countries concerned. This organizational development may fit in with the interest expressed by some Comecon countries in technical collaboration with West European governments. Direct relations of the kind now proposed would thus facilitate possible cooperation between the "comprehensive programme" and the West European Eureka programme, in which companies rather than governments will be the principal actors.

Comecon interest in Eureka has not been great, and the Czechoslovak party daily *Rude Pravo* has been downright hostile, alleging that Eureka and the US Strategic Defense Initiative (SDI) are closely linked, and that many companies likely to be involved in Eureka have already been contacted by the Pentagon, and will work simultaneously for both projects.

The one Comecon country to show real interest in a possible link-up with Eureka is East Germany, an interest that dates back to the visit of French Prime Minister Laurent Fabius to East Germany in June 1985. Perhaps significantly, the main Western interest in such cooperation seems to be coming from West Germany. Last month, Rudi Arndt, chairman of the socialist group in the European Parliament and himself a member of the West German Socialist Party (SPD), told a Moscow press conference that the delegation he had brought to Moscow might "smoothe the way for a formal agreement between the EEC and Comecon", and

noted that the prospects for cooperation between the "comprehensive programme" and Eureka were "good".

The Soviet response to Eureka has so far been noncommittal. A Moscow television press conference after the Comecon summit noted that "there are a number of spheres of research and development of new technologies which are to be found in our programme and in the Eureka programme", but pointed out that the decisions leading to the Comecon programme were taken in June 1984, "at a time when no one had yet heard of Eureka".

West German space

Ministers at odds about Hermes

Bonn

THE federal ministers for research and foreign affairs are sharply in conflict over the proposal that West Germany should participate in the French plan to develop a space shuttle called Hermes. Heinz Riesenhuber, the Christian Democrat (CDU) Minister for Research and Technology, has set his face against collaboration in the project, saying that this could not be justified within the framework of his ministry's strategy for research and development. But the Free Democrat (FDP) foreign minister, Hans-Dietrich Genscher, is keen that West Germany should collaborate in the French project for the sake of Franco-German relations.

Riesenhuber's objections to collaboration have their root in budgetary problems. The minister says that German collaboration could not be financed out of the research budget as it stands, and that if West Germany is to take part in the Hermes project, the federal government will have to allocate extra funds for the work. This position is consistent with the decision of the federal cabinet a year ago that it would support no further large research projects until the 1990s.

Riesenhuber also argues, in further support of his unwillingness to participate in Hermes, that it would be senseless to invest in an "outdated technology", implying that Hermes is a copy of the US shuttle system. He compares the Hermes concept unfavourably with other schemes for the development of reusable space vehicles, such as the British Aerospace HOTOL concept. There is also, in Riesenhuber's mind, anxiety that the French project assumes continued use of the launching site at Kourou, in French Guiana, despite the "explosiveness" of the political climate there.

The dispute between the ministers appears to spring from the decision at the most recent meeting between the federal

Such an emphasis on the priority of the comprehensive programme is not, however, without its risks. President Ceausescu of Romania has already criticized the programme, suggesting that the planners should first have implemented what they undertook to do in June 1984.

What Ceausescu was referring to is not entirely clear, but he may well have meant the much publicized decision in 1984 to raise the economies and technological bases of the "less developed" Comecon countries (Mongolia, Cuba and Vietnam), to the level of the rest; the comprehensive programme says nothing specifically about these countries although the benefits they might expect were mentioned at the press conference afterwards. **Vera Rich**

Chancellor, Helmut Kohl (CDU), and the President of France, François Mitterrand, that the two governments should sponsor a joint study project aimed at turning Hermes into a practical machine.

Riesenhuber's coolness on Hermes conflicts with the technical opinion given to him some months ago by the German Air and Space Research Institute (DFVLR), which recommended participation. But the minister points out that the DFVLR report drew attention to several technical defects of the French proposal such as the inability of the new Ariane V rocket system to compete economically with the new US shuttle-based technology and the intended polar orbit of Hermes, which would be incompatible with the orbits of the US space stations. The French plan would also require new emergency landing sites and data transmission networks. But Riesenhuber may have been chiefly influenced by the consideration that West Germany hopes to influence the development of an independent European space technology would be undermined if the funds were to be paid directly to the French.

The DFVLR proposals for a new West German initiative in advanced space technology are ambitious. The institute recommended spending about DM600 million a year on a three-cornered programme including both Hermes and the proposed European space vehicle "Columbus", intended as an adjunct to the proposed US space station.

Riesenhuber says that his research budget cannot cover costs on this scale, and is urging that any programme of this kind sponsored by the federal government should be partly financed by industrial sources, perhaps to the tune of 20 or 30 per cent. Riesenhuber points out that many of the proposed experiments could be of industrial value to German industry.

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