

NEWS AND VIEWS

Selling Space

THE House of Commons Estimates Committee has just completed the exhausting task of surveying the British space research effort. The results are described in a highly critical report, published this week (HMSO, £1 18s.). "On the whole it has been a story of wasted opportunities brought about by lack of purpose and the lack of any coherent organization. There has been no real space policy and no space programme as such."

The report deals with each of the international organizations in turn. Although ELDO has so far cost Britain £49.8 million, only one buyer (France) is in view for the ELDO PAS launcher which the project is intended to develop. In ESRO, Britain has spent £11 million, and obtained contracts worth £4 million in exchange. France, the committee bitterly points out, has obtained contracts worth more than double what she has so far contributed. On the scientific side, the committee is no happier; ESRO 11 should have been launched by NASA—free of charge—early in 1967, but the Scout launcher failed. It will now be launched in late 1967 or early 1968, about the same time as ESRO 1. As for the large astronomical satellite (LAS) which was to be launched in 1970 as the climax to the ESRO programme, the committee believes that it will be 1972 or 1973 before it is in orbit. CETS, the committee says, is not an organization but a "continuing conference". "Its continued existence in its present form," the committee declares, "would appear unlikely to achieve any useful purpose." In Britain, the decision to proceed with the Black Arrow programme was the right one, but was taken too late: "the fact that in the end the right decision was reached in no way condones the delay in arriving at it".

As the committee discovered, there is no such thing as a British space programme; expenditures and projects are considered on a piecemeal basis. The committee recommends that a space programme with a budget of its own should be drawn up and agreed for the next five years. The Minister of Technology should take charge of the programme, and appoint a minister of state with responsibilities solely for space. The committee believes the present level of expenditure, about £30 million a year, to be about the right figure. As a proportion of GNP it is rather larger than Germany or Japan, rather smaller than that of Italy or France. A much larger part of this money should be spent within Britain, however, and the correct ratio should be something like two to one in favour of national programmes. This, it admits, will be difficult to achieve within the budget suggested if the large contribution to ELDO (£9.7 million this year) is to continue. This is another reason, the committee feels, for questioning the future of ELDO; if it is to continue, the British contribution should not be allowed to rise. Similarly, Britain should oppose any attempt to increase the number of ELDO PAS launches. It should not

take part in the CETS programme for a television distribution satellite, but should attempt to produce a British military communications satellite to replace the existing Skynet satellites in 1971. Expenditure on the Black Arrow programme should be doubled from £3 million to £6 million, with the intention of using electrical propulsion to launch a small communications satellite.

Not all these suggestions will find favour with the Government. They are too closely identified with the space industry lobby and Conservative Party policy for that. In any case, the Government is unwilling to do anything which can be interpreted as anti-European. It is clear, though, that British space expenditures will not be allowed to rumble on untouched for much longer; within the next few months decisions must be taken to bring things under control.

Non-treaty

HOPES for a nuclear non-proliferation treaty, so high three months ago, now seem to have sunk almost out of sight. Mr Fred Mulley, the British minister at Geneva, had some strong words to say on the subject last week. "I am extremely disappointed," he said, "to find on August 3 that we have no draft treaty before us and, as far as I can discover, have made no further progress towards achieving a non-proliferation treaty." He went on to say that if a draft is not tabled very soon, there may not be time to turn it into a treaty, and he urged the co-chairmen, particularly the USSR delegate, to get negotiations moving again.

The sticking point for the treaty is still the safeguards arrangements. Euratom countries have insisted that they be allowed to preserve the safeguards worked out within Euratom, while other countries have favoured safeguard arrangements in the hands of the IAEA. This impasse led to the suggestion that the treaty be drafted with the section on safeguards left blank, a proposal the USSR has so far refused to accept. It is clear that even if a draft acceptable to all the parties can be put together, there will be plenty of steam left in the arguments, and the transition from draft to treaty could be a long business.

The desire for a treaty has been given urgency by the very rapid advance of the Chinese to thermo-nuclear status. Neither China nor France, however, is represented at Geneva, which means that whatever treaty is signed France will not be a party to it. It is distasteful to other Euratom countries to reflect that if they sign the treaty they will be subject to inspections from which France is exempt; this is fundamentally opposed to the philosophy of share and share alike on which Euratom was once based. Of the other states near the threshold of nuclear status, Israel and Japan are not represented, but the UAR and India are. France is entitled to a seat at the negotiating table, but has not taken it up, and will presumably not sign the treaty.

The frustration at Geneva has tended to shift the spotlight to another problem under discussion there—the Comprehensive Test Ban Treaty. This too is making very slow progress, both for technical and political reasons. It is at present impossible to detect all underground nuclear explosions unambiguously by