

No Space for ESRO ?

AFTER months of inconclusive debate on the future of Europe's collaborative space organizations, it now seems probable that the member nations will rush into hasty and even ill-conceived decisions. The last ministerial meeting of ELDO (*Nature*, **220**, 109; 1968), the organization developing a European launcher, seems to have been more inconclusive than any held recently—a record which must have taken some beating—but it did take one concrete decision. This was to set up a working group under the chairmanship of Mr Spaey of Belgium to consider the future of both ELDO and of ESRO. Its report is to be ready the day before the next European Space Conference of Ministers, the third of a series of annual meetings dealing with the political aspects of European space policy, which starts in Bonn on November 12. Mr Spaey's working group is to draw up long-term proposals for a European space programme, a laudable enough aim in itself but an exercise which should hardly be necessary so soon after the much longer deliberations of the Causse committee whose report was presented in the spring of this year.

The European space programme is a matter of great complexity, involving as it does two international organizations, ELDO and ESRO, and a dozen or so countries which just now have no common mind about exactly what sort of collaboration they want in technical and economic matters. And all this is being carried on to a background of spectacular space achievements by the United States and the Soviet Union, far more ambitious than anything Europe can attempt within the foreseeable future. What is dangerous about the new working group, which had its first meeting on October 16 in Brussels, is that it is attempting to make pronouncements about the future of European space affairs after a series of meetings lasting less than a month. Worse still, the way things are going there is a serious danger that the fate of ESRO will be made to depend unreasonably on the fate deserved by ELDO. In other words, even though ESRO has in the past few months been looking much more healthy than at any time since its creation, the disaffection of member nations may lead to its premature and unnecessary end.

It is of course understandable that European nations should by now be thoroughly jaundiced about ELDO. As far as the British are concerned, it has been plain for a long time that the continuation of the attempt to develop a European booster rocket might profit other nations indirectly but would bring no benefit to the United Kingdom itself nor lead to the creation of a booster rocket which could be used for launching worthwhile communications satellites. But ESRO is a different kettle of fish. For one thing, it does useful scientific work, even if its output is still enormously costly. For another, it has recently been taking an interest in the development of communications

satellites as well as other applications, and in the long run, of course, this is where European countries must look for such economic benefits as there may be in space technology. No one can deny that ESRO has been in a deep crisis, but Professor Bondi's rescue operation now seems to be paying off, whereas the gloom which surrounds the affairs of the sister organization ELDO shows no sign that it will soon disperse.

The fortunes of ESRO seemed to be at their lowest ebb in April this year when increased costs forced the organization to cancel the satellites TD1 and TD2, which had been the rationale of ESRO's existence since it became clear that ESRO was unable to cope with the building of the large astronomical satellite. As announced at the council meeting of ESRO at the beginning of the month (*Nature*, **220**, 212; 1968), one of the TD projects—named for the Thor-Delta rockets which will launch them—has been resuscitated, financed by nine out of the ten member states. By all accounts, the presentation of the new project as it is now to the ESRO meeting made a very deep impression on all the members of the council. Professor Bondi is not to be blamed if he regards the support that has been shown for the TD satellite, which has as its chief aim the ultraviolet and infrared spectroscopy of the stars, as a show of confidence in the organization. Ways are now being considered of flying the experiments planned for the abandoned TD satellite, and it seems almost certain that these experiments—involved with solar physics—will be accommodated in several small satellites. It has also not escaped notice that the two satellites ESRO 1 and ESRO 2, launched respectively in October and in May, have been working perfectly. In the circumstances, those countries—particularly Belgium—which have been crying for the demise of ELDO chiefly on the grounds that it was doing nothing useful should consider carefully whether it is not foolish of them also to wish to put an end to ESRO.

The Science Research Council would also do well to note that the worst seems to be over as far as ESRO is concerned. In its thoroughly admirable report on astronomy and the space sciences, the Science Research Council rightly raised the point that the wholesale cancellations forced on ESRO left the organization with no projects beyond the scale which could be attempted by Britain working without European collaboration. Because of this the value of continued membership of the organization, together with the considerable imbalance of the council's expenditure that this necessarily involved, was questioned. But in any case the earliest date that Britain could withdraw from the organization is the end of 1971, and notice need not be given until 1970. Now that ESRO's prospects look a little less bleak than they have done—and assuming nothing goes seriously wrong during the next few weeks—it would be wise to give ESRO more time.