

Tracked Hovercraft—the Need to Retain Options

TRACKED Hovercraft Limited is dead and Mr Michael Heseltine's political future is in jeopardy. These are the unmistakable facts to emerge from a week full of incident following the publication of the Select Committee on Science and Technology's report on the circumstances of the closure of the National Research Development Corporation's subsidiary.

But all is not completely lost and while the corpse is still at Earith the persuasiveness of Mr Airey Neave and the showmanship of Professor Eric Laithwaite might combine, even now, to resurrect at least a part of the project.

The scientific and technological aspects of the closure of THL have in the past week unfortunately received a great deal less attention than the deeds and denials of Mr Michael Heseltine, Minister for Aerospace and Shipping. There seems little doubt that in spite of Mr Heseltine's hastily-called press conference last week to rebut the accusations of the committee, he made a grave error on February 12 by telling the House of Commons that at that time the government was still considering whether or not to provide financial assistance for THL. Nothing in the past week, even Mr Heseltine's own words, has occurred even to suggest that this statement was true. Mr Heseltine's fate, however, should not affect the future of the work in Britain on linear motors and novel means of transport.

One hopes the political element can be separated from the decision now urgently needed from the government on whether or not a national centre for linear motor work is to be set up in Britain. It must be made clear that the proposal of Professor Laithwaite and the Imperial College group for such a centre to be set up at Earith—a proposal that has been eagerly adopted by the select committee—does not in any way constitute the resetting up of Tracked Hovercraft Limited.

The government was right to decide that THL did not merit further financial support in order to develop the vehicle then under test. But the select committee is also right to point out that the government did not realize the full implications of its decision and that the closure of a major centre (the only one in Britain) of a new technology had been premature. At Earith too much faith was placed in an aspect of fundamental science which has quite rapidly become outdated. Professor Laithwaite himself, in a television interview last week, said that even since February, when support for THL was withdrawn, important discoveries have been made in the field of linear motor research. The vehicle under test at THL relied on air suspension but the Imperial College group has recently developed a motor which as well as providing propulsion also provides suspension and levitation. Such a motor, in principle, is far better than any previously developed, but whether it is a better prospect for large-scale development and, in the long run, a better commercial proposition can only be assessed after a model has been built and tested on an appropriate length of track. Here lies the nub of Professor Laithwaite's and the select committee's arguments. The government has arranged

for linear motor work and other aspects of the THL technology to be continued elsewhere but it is essential that the track be available for field tests of models.

Mr Heseltine was cool to the idea that the facilities at Earith be turned into a national centre when the select committee suggested this in July. It is hoped that he may even now admit that he was wrong and that such a centre should be given the wholehearted support of the government. Mr Airey Neave and the select committee seem to have no such faith in the minister, for they have turned directly to the Prime Minister in the hope that he will refer the matter to Lord Rothschild and the Central Policy Review Staff. There are few who would query Lord Rothschild's ability to make a judgment on the scale of support that linear motor research, work on high speed transport systems, and such related technology should receive in Britain. If the by now historic green paper on government research and development is anything to go by, Lord Rothschild would give a quick answer.

Britain in the past has suffered much from lost opportunities in the fields of novel means of transport. Remarks to the select committee by Mr John Peyton, Minister for Transport Industries, that the problems of the 1980s were impossible and those of the 1990s quite beyond him, although probably true, are deplorable. Planning for the future is one of the tasks of the Minister for Transport Industries and the future does not end when a political career might. Other countries, including the United States of America, have advanced at a faster pace than Britain in the past twenty years, in a large part because they have kept many more options open. At this stage of the development of linear motors and high speed suspension systems in Britain the options must be renewed, not rejected.

100 Years Ago



In the observations which I have to address to you I shall not attempt a general survey of a subject so vast and so varied as the manufactures of this country, nor shall I attempt to describe the many new and beautiful inventions and mechanical appliances which form a distinguishing feature of the age in which we live; but I shall endeavour to draw your attention to one of the new materials, namely *modern steel*—a material which, though of comparatively recent origin, has already become an important industry, and whose influence in the future seems destined to vie in importance with that resulting from the introduction of iron.

From the opening address to the British Association by the President of the Mechanical Science Section, W. H. Barlow, C.E., F.R.S.

From *Nature*, 8, 426, September 18, 1873.