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The principal advantages of this change will be, firstly, that essential works on arterial main highways will not be subject to delay through the financial difficulties of local authorities; secondly, that local authorities which previously contributed towards arterial routes, will be relieved of such contributions, and the relief thus afforded will enable them to give needed attention to main highways and ordinary county or settlement roads; and, thirdly, that continuous works in the way of improvements and permanent surfacing will be possible, without interruptions arising from circumstances involving the position of a local authority. On the other hand, the estimated savings to local authorities in respect of both construction and maintenance, are approximately £120,000 per annum, which sum will now become a liability on the Main Highways Account.

Although the legislation has not yet been passed, the Board has made preliminary arrangements

of a tentative nature, in order to facilitate the change at the appropriate time.

It is of interest to note that, as a result of the announcement regarding the proposed State system, a number of local authorities likely to derive some relief therefrom have sought to obtain further main highways in order to secure additional subsidies; but it is unlikely that the present general highways system will be increased very much in the meantime, in view of the additional cost to the Main Highways Account of the State Highways System.

In the past many local authorities have displayed a tendency to press for special consideration of their claims, without proper regard to the relative merits of their position. Quite frequently application has been made for preferential assistance above the standard rate of subsidy, and it has been noticed that, no matter what the standard rate might be, a higher rate has been sought. It will be necessary in future for the Board to adhere more rigidly to the standard subsidy rates, in view of the fact that

highways funds are to meet the full cost of the requirements of the State system.

Soon after the Government's proposals for the State system were made known some local authorities saw fit to modify their construction activities, presumably with a view to conserving their own finances. In a few instances works in hand were tapered off, and in other cases reconstruction works about to be commenced were postponed indefinitely. Unfortunately, maintenance also was curtailed, and complaints have been received regarding the condition of some highway surfaces, which have been neglected. Where necessary the Board has taken the matter up with the authorities concerned, with a view to essential work being continued. Generally speaking, it may be said that the majority of local authorities have co-operated, by maintaining those highways which have been selected tentatively for inclusion in the proposed State system. Where maintenance is deteriorating, or construction work suspended, the Board will be faced with the necessity of restoring surfaces and resuming work as soon as possible after the inauguration of the State scheme.

Elimination of Level-Crossings on Main Highways.

As reported last year, an agreement was reached between the Main Highways Board, the Railways Department, and the Unemployment Board, dividing the cost of level-crossing elimination in the proportion 50 per cent. to the Main Highways Board, 331 per cent. to the Unemployment Board, and $16\frac{2}{3}$ per cent. to the Railways Department.

However, during the year it was found that Unemployment funds were required for that Department's more urgent requirements, and the Minister of Employment found it necessary to cancel

the agreement in so far as he was concerned.

Fresh arrangements are being made, and the Government has intimated the likelihood of the Board's share being reduced considerably. Although it is anticipated that only some £100,000 will come to charge this year, it is expected that next year's expenditure will reach £1,000,000.

The Government has indicated that it desires to have this work prosecuted vigorously, and with this end in view, a preliminary study has been made of all of the level crossings on main highways,

totalling some 530, the elimination of all of which will cost approximately £3,500,000.

Since this policy has been announced, innumerable suggestions by the public for removing the dangers have been submitted through the Minister. These for the most part are devices to draw the attention of the motorist to the fact that he is approaching the crossing, and take the form of narrowing the trafficable width of pavement, or of introducing sharp curves, humps, or joggles on the road-surface. All of these devices are considered unsatisfactory in that, in attempting to remove one danger, they introduce others potentially as great.

The only way to wholly remove the danger is to separate the grades. This solution can be considered to be the final opinion of the best thought in the world that has been applied to the problem.

The first consideration was to schedule the crossings in order of urgency. This was done by applying a factor obtained by multiplying the road traffic by the rail traffic, and by 1, 2, 3, or 4 depending on whether the visibility at the crossing was described as good, fair, poor, or bad. Of the total of 530 crossings, 100 have a factor greater than 10,000, 23 lie between 7,500 and 10,000, with the rest graduating down to a factor as low as 30.

The methods of elimination are by (a) deviation of highway or railway, (b) road overbridge, and (c) road subway.

The deviation of the highway is not usually a 100-per-cent. solution, since a small amount of local traffic may still require the crossing. The subway often introduces drainage problems, and the great majority of the eliminations will therefore be by overbridge.

In preparing designs it was first thought that it would be possible to standardize a few types, but as site-plans were submitted it became apparent that each elimination required special treatment, due to the varying angles of skew, topographical features, proximity to populous areas, and various railway clearances. However, now that a considerable number of crossings have been designed, it is possible to more or less adapt some of these designs to suit other locations.