EDITORIAL COMMENT

Getting Results from Signal Failure Reports

THE real purpose of detailed reports of train interruptions caused by the failure of signaling apparatus should be to develop the information necessary to determine ways and means of so improving the equipment and methods of construction and of maintenance as to eliminate the faults which cause the trouble. Although certain failures may result from neglect on the part of the maintainer, some roads believe that he should not be blamed for all types of failures. In fact, if too much pressure is brought to bear, it is only natural for a maintainer to acquire the habit of shifting at least a part of the blame for many failures to causes which are beyond his control and which cannot readily be refuted. The result is that the signal engineer does not get a true picture of the circumstances, and may be influenced to form erroneous conclusions as to the merits of certain devices or methods. Such a tendency has been prevented on one large road through the development of a spirit of co-operation and confidence between the maintainers and their supervisory officers. When a supervisor investigates conditions in the field at a location where a failure has occurred, he endeavors to make his comments as constructive suggestions rather than caustic criticisms. As a result, the original signal interruption reports give accurate and detailed accounts of all the factors involved in each failure. The results obtained from this method of procedure on this road are reported to be satisfactory from the standpoint of the maintainers, as well as the supervisors and the signal engineer.

What Can Be Done Now?

WITH the volume of railroad traffic at the present low ebb, every effort must be made to reduce operating costs, especially those that continue at a constant rate regardless of the volume of business being handled. The signal departments have an opportunity to render extensive service toward this end. For instance, where an automatic interlocking can be installed to replace one requiring the services of levermen, an annual saving of from 80 to 100 per cent on the expenditure can be accomplished. Similar results can be secured under certain conditions by combining the control of two or more plants, or controlling a plant from an existing office where operators are otherwise required. The use of the code control system practically eliminates the factor of distance from the layout to the point of control.

The remote control of manual block signals at intermediate block offices not only affords the ordinary means of spacing trains on light-traffic lines, but also gives an OS for the passing of each train, the same as if operators were on duty. Going further along the same lines, certain roads are considering the use of centralized traffic control for the sole purpose of directing train movements by signal indication, with power switches only in a few locations; the installation being fully justified by the elimination of operators at intermediate stations.

Likewise, in towns where several street-railroad crossings are protected by flagmen or by gates and signals controlled locally, a system for controlling the equipment from a central point will not only result in a decided saving, but will in many cases, afford better protection. Where switching movements during certain periods of the day require manual control, the system can be arranged for automatic track circuit control during the remainder of the 24-hr. period.

In many of the projects suggested above, the requirements for materials and labor are comparatively small, and therefore, do not involve any large amount of money. Especially when considering that the savings are not only worthwhile but will continue regardless of the volume of traffic, it would seem that special efforts should be made at this time to search out conditions where such changes can be made profitable, and then to push the projects to early completion.

A Definition for Centralized Traffic Control

IT SEEMS high time that a proper definition be prepared for the term, "centralized traffic control." At the recent convention of the Signal Section, a member suggested that Committee X include such a definition in the requisites on the subject. A member of the committee explained that the Train Rules committee of the Pennsylvania had worked for two days trying to formulate a definition for centralized traffic control and, after failing to reach an agreement, concluded that "anybody ought to know what it is, anyhow!" Other committees, including Committee I, have discussed this matter, but each time the "hot potato" has been passed on to someone else.

Realizing that sometimes "fools rush in where angels fear to tread," the editor of *Railway Signaling* has the following suggestions to offer as a means of differentiating between remote control and centralized traffic control. It is common knowledge among those familiar with modern signaling that a centralized traffic control installation is one in which semi-automatic power-operated signals, and, in most cases, power-operated switches, are controlled from a central point, train movements in the entire territory being directed by signal indications which supersede the superiority of trains, regardless of whether this superiority is by train order, time table, direction or class. Where switches are involved and the controlled signal governs more than one route this signal is the equivalent of a home signal at an interlocking plant, and such a signal, according to the standard code of the A. R. A., governs the use of routes of an interlocking plant and for movements within home signal limits, its indications supersede the superiority of trains.

So far so good, but we find that another function of centralized traffic control is to direct the movement of