

## C. B. & C. I. CONFERENCE AT OTTAWA

### Circular Letter Issued by President J. P. Anglin Definitely Changes Date to February 2nd to Avoid Conflict with Engineering Institute's Meeting

**F**OLLOWING is a circular letter that has been issued by J. P. Anglin, president of the Association of Canadian Building and Construction Industries, announcing the change in dates of the second annual conference of that association:—

"In order to avoid conflicting with the annual meeting of the Engineering Institute of Canada, we have decided, after consulting with members of our National Council throughout the Dominion, to alter the dates previously set for our second general conference.

"We shall now meet on Monday, Tuesday and Wednesday, the second, third and fourth of February.

"Sessions will be held in the Chateau Laurier, Ottawa, commencing 10 a.m., Monday, February 2nd.

"In view of the importance of the problems which face the building and construction industries of Canada this season, we earnestly urge you to attend this conference.

"It will be advisable for you to make your own hotel reservations early in order to obtain accommodation. Please advise our secretary, on receipt of this notice, that you intend to be present."

## RECONSTRUCTION OF TRUNK HIGHWAYS\*

**I**T would be unwise to draw definite conclusions from factors which are still indefinite in the building of roads and pavements, so only a report of progress can be made by the committee† on "Reconstruction of Narrow Roadways of Inter and Intra State Trunk Highways with Adequate Foundations and Widths for Intensive Motor Truck Traffic."

In our preliminary report we subdivided our topic into the following heads as being best adapted for our discussion:—

1. Width (a) of the pavement, (b) of the shoulders.
2. Drainage (a) surface, (b) sub-surface.
3. Foundations (a) of new construction, (b) of previous construction.
4. Pavement surfaces.
5. Desirability of maintaining traffic during construction.
6. Economic improvement of line and grade.

We realize that in the choice of these elements for discussion, we have restricted the scope of our work. The line had to be drawn somewhere and the topics above may be interpreted broadly enough to cover the essentials of our subject.

### Width

We reaffirm our recommendation on width; that is, that the paved surface of the roadway on trunk highways should be at least 20 ft. in width. For each additional line of traffic, 9 ft. more should be added.

We recommend that the minimum of the shoulder be 5 ft. except in cases where new right-of-way is to be acquired; then the additional width of shoulder should be at least 9 ft. in order that, should additional traffic require it, four lines of traffic may be accommodated without requiring additional right-of-way.

### Drainage

We reaffirm our recommendation that the present drainage systems be examined and placed in such condition that

\*Report of committee to American Road Builders' Association.

†H. Eltinge Breed, chairman; Prof. T. R. Agg; Maj. Fred. A. Reimer; W. G. Thompson; Lt.-Col. W. D. Uhler; and Chas. M. Upham.

they will function properly. Such additions should be made as are necessary to keep the sub-grade dry.

We suggest that where under-drains are necessary, that they be placed alongside of the pavement and not directly under it. The advantage of this method is that they can be cleaned without disturbing the pavement surface, and to a large extent safeguarded from vibration, which has a tendency to fill them. It has been found in many cases that a line each side of the pavement requires less linear feet of drain than a single line with spurs running under the pavement.

### Foundations

Where of new construction, we reaffirm our recommendation that all foundations be of concrete or other suitable material. We do not recommend thickness for the different kinds of foundation, because the data in regard to experiments being carried on by the federal government are not yet available. Valuable as these will be, we believe that before definite recommendations are made, they should be supplemented by reports of traffic census and service conditions on many types of road now in use, in order that we may properly anticipate the motor truck need of the future.

Where the present pavement can be utilized, we recommend that the widening be of the same kind of construction as the portion to be utilized. Where, however, it appears feasible to anticipate future needs, then we recommend that the widening be of a type appropriate to them. It is suggested that when widening a pavement, edging be used to prevent lateral movement.

No definite conclusions have been formed as yet with regard to bituminous macadam foundation. The cases that have been brought to the attention of the committee are so limited in extent that we are not prepared to make a definite recommendation at this time.

### Pavement Surfaces

We recommend that pavements on trunk line highways be of concrete, brick, wood block, stone block, asphalt block, bituminous concrete of the mixed type, or sheet asphalt.

### Maintaining Traffic

We wish to suggest that all detours be made adequate for the traffic that they must carry; that they be maintained during the time of detour; and that they be put in passable shape at the completion of the work. The expense of the detours is to be assumed by the governing body doing the main construction work.

We also suggest that where there are two main lines in the same direction between two centers of population, only one should be improved at the one time, in order that traffic may have one through route at its disposal.

We reaffirm our statement that the best possible methods should be used to maintain traffic.

### Line and Grade

We recommend a thorough study of line and grade in order that sharp turns and steep grades may be eliminated at the time of reconstruction.

It is suggested that greater safety may be had by cutting back existing banks on the inside of curves, thereby giving greater sight distance. In all reconstruction work, curves should be eased to give greater sight distance.

There is a revival of plans originated nearly two years ago to extend the high pressure and domestic water distribution system of Winnipeg. Tests have been carried on extensively during the past year by the city engineer's staff in order to determine the necessity of increasing the pressure and the capacity of the mains. Several additional mains are recommended, including an 18-in. main from the central pumping station along McPhillips, Maryland and Notre Dame streets. Alterations to the McPhillips street station will cost \$22,075, and to the high pressure plant, \$6,000, with an additional \$25,000 for a 10,000,000-gal. pump.