

Editorial

"WANTED—A CHEAPER ENGINEER."

Members of the Canadian Society of Civil Engineers who have been discussing the necessity of having the Society support its members in any disputes with municipal councils where the engineers are unfairly treated, will be interested in the following item which appeared in the Toronto "Mail and Empire" under the heading, "Kitchener Wants A Cheaper Engineer":—

"Kitchener, March 20.—Pursuing its policy of retrenchment the city council by a vote of eight to six has decided to call for applications for a city engineer, although no charges of incompetency have been preferred against the present official, Herbert Johnston, who has held the office for the last eight years. Engineer Johnston is receiving a salary of \$2,250 and it is claimed by the 'retrenchment' members of the council that a capable official can be secured at a less figure. No notice has been served on City Engineer Johnston that his services are no longer required."

The rank injustice and the cold-blooded commercialism of the eight Kitchener councillors as expressed in this newspaper report are so obvious that comment is almost superfluous. Their action savors more of Berlin than of Kitchener.

The affair deserves the prompt attention of the council of the Canadian Society of Civil Engineers. The names of these eight councillors, if they do not withdraw from their position, should be made known to every engineer and to all other professional men in Canada. We cannot imagine any advantage that would accrue to professional men in dealing with individuals who would lend themselves to such contemptible tactics.

Mr. Johnston, who is a corporate member of the Canadian Society of Civil Engineers and an S.P.S. alumnus, has been in Kitchener's engineering department for fourteen years,—seven as assistant engineer and seven as city engineer. He has never previously had any serious disputes with any of the various councils, and none of his work has been under fire. He has not been asked by the councillors for his views on this subject, and in fact has not been approached by them in any way. They did not even enquire whether he would consent to a reduction in salary.

The whole affair is no doubt the result of an effort to keep the tax rate at a lower figure than can be done with efficiency in the city service. After the hospital, the school board and other Kitchener institutions had been made to suffer, it was still necessary to reduce expenses by a couple of thousand dollars more, so one alderman moved that the city engineer's salary be reduced by \$1,100. As a result of the following discussion it was decided to advertise for "a cheaper engineer."

It is almost unnecessary to call to the attention of the engineering profession throughout Canada that it would be most unethical and unprofessional for any engineer to answer Kitchener's call for applications while Mr. Johnston still holds the position, or if he is discharged merely because a "cheaper" man is wanted. No self-respecting engineer will pay any attention to Kitchener's call.

SULPHUR IN ROAD OILS.

One of the four main requirements in the Canadian Society of Civil Engineer's tentative specifications for road oils reads as follows: "It shall not contain acid nor sulphur in sufficiently large quantities to attack rubber or rubber compositions."

At first glance such a clause appears to be a praiseworthy effort to reduce the cost of high living for tire-buying motorists. But the thoughts occurred to us upon reading these specifications, "What quantity of sulphur is sufficiently large to injure rubber or rubber compositions under the conditions of contact of auto tires with road oils? and should not a fixed maximum quantity be definitely stated in the specifications? and are there any active sulphur or sulphuric acid compounds in road oils?"

With these questions in mind, the views of several chemists and tire manufacturers were obtained, resulting in the conclusion that the Society would be well advised to discuss thoroughly the wording of this clause in their official standard specification. The specification has not yet been adopted by the Society, nor is it in any way recommended by the Society for use by the Society's members. It is as yet merely a tentative specification which was laid before the Society at its last annual meeting and received but not adopted. The committee that prepared it requested that it be merely received as they wished to report further at the next annual meeting. The tentative specification was offered meanwhile practically as a progress report. The following opinions upon the sulphur and acid requirement will therefore prove timely:—

A. F. Pond, chief chemist, Goodyear Tire & Rubber Co. of Canada, Limited: "It is our opinion that sulphur in an asphaltic road oil will have no injurious effect upon automobile tires."

W. E. Campbell, chief chemist, Gutta Percha & Rubber, Limited: "I do not think that the sulphur contained in road oils would be any danger to tires. Any injurious effect that road oils have upon tires comes more from the softening action of the oil on the rubber, and any vulcanizing or hardening effect of the sulphur would be offset by this softening. But even the softening action is not great enough to be at all serious unless the auto stands for a considerable period in a pool of oil. I do not think that any active injurious compounds of sulphur would be found in the oils in view of the temperatures at which they are refined."

The chief chemist of another large rubber company requested that his name be not published, but says: "My opinion right along has been that no amount of sulphur that would be found in any road oil on the market would damage auto tires. Free sulphur already exists in tires. Almost any rubber goods has a bloom. That's sulphur. We mix in 2, 3 or 5 per cent., or whatever may be called for by the requirements, and possibly only half of this will be used in the manufacturing processes, and the other half remains in the tire as free sulphur, but it doesn't do any harm to the tire. One can scrape sulphur off the surface of almost any piece of rubber goods two or three years old. At all times there is as much free sulphur on