

facturers are in favor of compounding these two classes by mixing them.

Now I think I have said about all I had come prepared to say. Other points may occur to you which I have not touched on, and perhaps, as I have already remarked, when I sit down, if some of you will ask questions, we will get on faster than if I stand here any longer speaking.

Chairman,—

I would like to ask Professor Bain if there are any electrical tests of oils for lubricating purposes, having in mind the current carried.

Professor Bain,—

By that you mean the creeping properties of the oil in carrying current?

Chairman,—

Yes. It is a well known fact that mineral oils have a higher resistance than other oils.

Professor Bain,—

There are, as you know, general methods of testing the resistance of the oil. I know animal oils have been used in transformer tanks, however, I have not had any occasion to investigate this and cannot say much on the subject.

Mr. T. A. Sperry,—

The Professor has covered the oil proposition pretty well, but has left out any discussion on graphites. I should like to hear from him on that question.

Professor Bain,—

I forgot to mention to-night when I started, that I would not talk on the subject of solid oils. I know very little about them. The only interesting thing I know in connection with this subject is the discovery by Acheson at Niagara Falls of the possibility of suspending graphite in water. This method of using graphite has not been sufficiently long in practice to allow data to be accumulated about it. At least I am not familiar with such.

Mr. H. H. Wilson,—

How can you tell, in a simple way, when oil is worn out, and when it is not advisable to use it any longer?

Professor Bain,—

Do you find that you do not get the same satisfaction with it as in the commencement?