C.C.: Dr. Henry Ryder
Dr. Wm. F. Ashe

November 16, 1946

Mr. Donald A. Kohr,
The Lowe Brothers Inc.,
Dayton 2, Ohio.

Dear Mr. Kohr:

I fear I am tardy in replying to your letter of September 26. I trust the delay will not have caused you any inconvenience.

The problem of pre-employment examinations is very easy to solve if one can elect to use entirely ideal methods, and if the facilities available are in line with this intention. On the other hand, the matter of deciding what can best be done to meet practical circumstances, both as to the needs of a plant and as to the medical facilities actually available, requires a careful examination of all the available facts.

Dr. Ryder, Dr. Ashe and I talked over your problem, and we are in essential agreement as to what should be done. We believe, however, that we will have to talk with you or your associates in order to make our ideas fit in with what can actually be done. I shall elaborate this point in certain specific matters a little later.

The purposes of the pre-employment examination are at least threefold. First one would wish to eliminate certain candidates for employment whose physical condition is such that their employment will impose undue risks upon themselves and other workmen, and undue liabilities upon the management. In the main such men will be screened out by a careful physical examination, but the possibility of tuberculosis without any physical findings must always be considered, and therefore a screening test by means of an X-Ray examination is always to be contemplated. Consequently we recommend a careful physical examination by a competent medical man, certain necessary laboratory procedures, such as a clinical urinalysis and a microscopic examination of the blood, together with flat X-Ray chest plates. By these procedures one will expect to pick up vascular disease of a potentially disabling type, kidney disease of a threatening type, incipient tuberculosis, and a number of other conditions that either disqualify men for work or require something in the nature of careful placement.

This brings us to the next consideration, namely, that of using pre-employment examinations as a means of properly placing men who have some limitations of capacity. It is obviously impossible to give employment to people who must earn their living if one is to set up standards of physical fitness that exclude all but perfect specimens. Every industry ought to take its share of the partially incapacitated individuals who must earn their living, and protect

itself by placing these individuals where they will be safe, where they can do good work, and where they will not work a hardship upon other employees. This is feasible and it is one of the duties of industrial physicians that must be carried out properly. Here certain special examinations may well be required. Certain individuals, by reason of partial functional inefficiencies of one kind or another, should not be exposed to lead compounds or organic solvents, or in some instances, industrial dusts. The examining physician, therefore, should have a knowledge of the conditions in the plant, and should classify employees of this type, not so much in accordance with where they can work, as where they should not be permitted to work. This all sounds very complicated, but it is not as difficult as it would seem. (In relation to this problem, we would anticipate that certain periodic examinations would be required in the case of employees exposed to potentially hazardous occupational conditions. Therefore, there should be a co-ordination of pre-employment and sebsequent examinations, in which the pre-employment examination is used for the purpose of obtaining base-line data for later comparison. For example, workmen exposed to benzol ought to have careful hematological data obtained before exposure. Likewise men who are to be exposed to lead and a variety of other toxic agents.)¶A third function of pre-employment examinations is that of making some contribution to the health of the community, a duty which the very circumstances of industrial employment visit upon industry. Certainly well over 50% of the people in a community are employed gainfully under conditions involving some degree of medical supervision. The avoidance of unnecessary incidence of disease will contribute not only to the productivity of industry, but to the economic soundness of the community as a whole. For this reason we feel that certain general public health measures which may apply to occupational groups, should be carried out as well as may be feasible. For example, every pre-employment examination should include a serological examination of the blood. Other comparable things can be done, as for example, some industries have considered it advisable and advantageous financially to promote the immunization of their employees against certain epidemic diseases, of which perhaps one of the most important is influenza. This may sound like paternalism, a philosophy which we do not wish to encourage. Actually the philosophy behind it from the point of view of industrial management is that a serious epidemic of influenza may very well cripple the productivity of a plant at a very bad time, and if this can be prevented, it is certainly worth what it costs.

The manner in which all of these things can be done, or whether they can be done at all will have to be decided on the basis of the facilities available. There is no use in recommending good physical examinations unless a good doctor is available to carry them out, and unless he is given the necessary time to do them. By the same token there is no use recommending laboratory procedures unless they can be carried out so as to obtain completely reliable results. Otherwise one is self-deceived, and the results

will be bad. I should rather make no stab at doing any of these things than to set up a mechanism for doing them badly. It is a complete waste of money and time to do industrial medicine in a half-hearted fashion. It is for this reason that we believe we should talk over your plans with you if you have the time and are willing, in order that we might make a proper plan which will include only those things which can be done properly under the existing conditions. For example, is there a physician available to take over the job of doing your pre-employment examinations? Does he have a laboratory in which hematological work can be done properly, or is it your intention to have a laboratory at the plant in which a technician will carry out such work under the guidance of the doctor? If the latter were to be done, we could assist, if it seemed desirable, in the training of the technician so as to get reliable laboratory data. The serological work, we believe, can be done without any cost except that involved in obtaining the specimens for examination. This is either a city or state function, dependent upon the local conditions. We are also inclined to believe that chest plates can be taken periodically at the expense of some local organization. On the other hand, the plates taken at the time of the pre-employment examinations can probably be arranged for at nominal cost, with a local radiologist.

We are prepared, or rather preparing, to make specific recommendations for periodic examinations on certain occupational groups, and this can be made to fit in adequately with the pre-employment examinations, whether they are to be done by your physician or by our staff. We refer to the latter, only because we are making an effort to provide some limited services of this type, where we will not be intruding into the activities of regular practicianers of medicine. Our feeling is that we do not and should not enter into the practice of medicine except in such matters as involve our special skills and facilities.

With all of the above qualifications, we are prepared to recommend the following procedure as mere outlines, the details of which are to be determined following a discussion of the circumstances:

1. Complete physical examination, including previous occupational and medical history with carefully recorded data;

2. Laboratory information, clinical urinalysis, hematologic data, serology (some modification of the Wasserman technique), flat chest plates for screening with stereoscopic examination when required.

I think this will serve as a basis for discussion, and you will see from the comments that there are a number of factors to which consideration will have to be given.

Cordially yours,