born left kin and early associates in another land. Such kin are apt to be poor and in any case are hardly likely to send money to support one who migrated to rich America. We can also remember the huge sums our government pays annually in pensions to Civil and Spanish war veterans and their widows, for these must keep many a native out of the poorhouse, while a much lesser proportion of foreign-born are helped in that way.

ANITA NEWCOMB MCGEE Woods Hole, Massachusetts

## INVESTIGATIONS OF MAGNETOSTRICTIVE PHENOMENA

In compiling the data for the various tables to appear in the International Critical Tables under the heading of Magnetostriction it is desired that as complete a survey as possible be made of the literature. In the hope of uncovering all possible sources of materials bearing on the various phases of magnetostriction, this call is sent out asking any one who has reprints of articles covering any particular subdivision of the subject to please send reprints of their work to the undersigned and where reprints are not available will those who have made contributions to this field please send references to the same address?

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QUOTATIONS

## **POPULAR SCIENCE EXHIBITIONS**

Now that the British Empire Exhibition has come to an end—for this year at any rate—it may be of interest to record some impressions of the manner in which the Royal Society's Exhibition of Pure Science, which was arranged in the government building, has appealed to the public, and of the extent to which it has fulfilled the objects with which it was organized.

The arrangement of this exhibition was undertaken by the Royal Society, at the request of the government, for the purpose of showing the essential part played by pure science among the multifarious interests and activities of the empire. Everywhere in the great exhibition the applications of science to industry were to be seen, but the fundamental work of scientific inquiry, in which many of them had their origin, would have been unrepresented unless some special effort had been made to bring it to the public notice. Accordingly, this exhibition, illustrating many aspects of purely scientific research at the present time, and indicating how industry has developed from similar inquiries in the past, was arranged. The exhibition has not been without its humors. One was the difficulty of returning a satisfactory answer to the inquirer who, after spending some time in the galleries, said, "Yes, but how do you know there is an atom, and how do you know there are electrons inside it?"; and another, the problem presented by a visitor who, on observing that the Milne-Shaw seismograph has a rotating drum giving a record which has to be changed every twenty-four hours, asked, "What happens if there is an earthquake while you are changing the record ?"

Nevertheless, it may be said that the exhibition has been an unqualified success. The public, non-scientific as well as scientific, has been really interested, and some, at least, must have gone away with a clearer understanding of the purposes for which men devote their lives to scientific experiment and inquiry. This success may be attributed largely to the policy adopted of making the exhibition a living one. The exhibits were contributed by scientific workers actually engaged in the researches represented, and supplemented where necessary to illustrate a subject fully, by instruments contributed by some of the leading makers. Wherever possible, actual demonstrations were given, and a scientific staff was in attendance throughout to carry out the demonstrations and to explain the exhibits. This policy was fully justified by the continued interest of visitors.

The handbook published in connection with the exhibition has been of great assistance. In this book is made available, for the small cost of a shilling, a series of non-technical articles on current scientific topics by leading authorities; and the best proof of its popularity is the fact that more than two thousand copies were disposed of, while its sale is increasing as it becomes better known, and is likely yet to continue now that the exhibition is closed.

The encouraging success which has met this attempt to present pure science in a less austere light than often surrounds it in the eyes of the general public, leads naturally to the inquiry as to whether a greater use can not be made of scientific exhibitions as a means to this end. Nothing but good can result from such efforts to spread a clear understanding of the true aims and purposes of science. That pure science is the modern expression of the elementary desire for knowledge—for the discovery of natural truths—that it is only by the disciplined quest in unknown fields that those benefits which science gives to the human race can accrue, is too little understood and too easily lost sight of, because of the very magnitude of the results themselves.

It ought to be possible to make an exhibition of this kind an annual event. The Scientific Products Exhibitions, organized by the British Science Guild in