Vol. ii. contains the articles on meteorology, photography, geology, natural history, anthropology, medical hints, &c. Of these, the sections on meteorology and medical items have been entirely re-written and considerably enlarged; the others all revised and brought up to date.

This work has already gained its reputation as a most serviceable and complete guide for almost all classes of travellers, and in its present elaborated form cannot fail to give additional satisfaction.

L'Optique des Rayons de Röntgen et des Rayons secondaires que en dérivent. Par G. Sagnac. Pp. 166. (Paris : Gauthier-Villars, 1900.)

THIS book gives a useful account of some of the properties of the Röntgen rays. The earlier chapters deal with the properties of the primary rays as they issue from the vacuum tube. A valuable feature is the explanation given of the cause of certain spurious effects which have been put forward as proving diffraction of the rays.

The second and larger part of the book deals with the secondary rays which issue from heavy metals when the primary rays from the tube falls on them. M. Sagnac makes it clear that this phenomenon is not properly to be described as a "surface effect." He shows that an element of volume of a heavy metal traversed by the rays gives out secondary radiation equally in all directions. The sudden change of conditions at the surface of the metal is not what is primarily concerned. The heavy metals absorb the primary rays so powerfully, however, that they can only penetrate to a small depth, consequently the secondary radiation does, in fact, come principally from near the neighbourhood of the surface. Many other original observations are described, but though of considerable interest they seem to leave the question of what causes the secondary radiation, and why only heavy metals emit it, almost as far from solution R. J. S. as ever.

Cerebral Science. Studies in Anatomical Psychology. By Wallace Wood, M.D., Professor of History of Art in the New York University. Pp. xii+128. (London : Baillière, Tindall and Cox, 1901.)

THE subordinate title of this book alone renders it impossible for us to take it seriously, despite the fact of its being dedicated to the memory of Taine and Broca. The book abounds in platitudes, ejaculations and short dictatorial declarations, with here and there an allusion to the historic, poetic and classic; but all without plan or logical sequence of ideas. The "creation of the human head—the study of the human brain," is defined as "the new science for the opening century," and "character-ology" is regarded as the great field through which, by the study of man and the lower animals, there is to be reached the classification of souls. Of these our author would distinguish five classes, and when it is seen that he would locate the "strong" soul in the "parietal regions," the "good" in the "metopic chambers" and the "beau-tiful" in those of the "summit," we deem further comment needless, except to remark that the author is indeed amusing.

The Humane Review. Vol. i. April, 1900, to January 1901. Pp. 384. (London: Ernest Bell, 1901.)

WITH a few of the contributions to this volume, men of science and other observers of nature will find themselves in sympathy. Mr. W. H. Hudson pleads for the preservation of the furze wren or Dartford warbler, and other rare birds, and criticises the feather fashion; Prof. J. Howard Moore writes on the psychical kinship of man and the other animals; Mr. H. R. Fox Bourne states the claims of uncivilised races; M. Elisée Reclus champions vegetarianism; and Mr. Bernard Shaw makes amusing and characteristic remarks upon the alleged conflict between science and common sense.

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LETTERS TO THE EDITOR.

[The Editor does not hold himself responsible for opinions expressed by his correspondents. Neither can he undertake to return, or to correspond with the writers of, rejected manuscripts intended for this or any other part of NATURE. No notice is taken of anonymous communications. 1

The National Anti-Vivisection Society and Lord Lister.

I HAVE read your attack upon me in your issue of May 16. In your comments on the anti-vivisection meeting at St. James's Hall you say that I "discoursed inaccurately on Lord Lister's scientific work." I did nothing of the kind, I never made any allusions whatever to his scientific work. You next say with respect to the fifty-eight vivisectors for whom Lord Lister signed certificates exempting them from the use of anæsthetics that "the probability is that personally he was not acquainted with half-a-dozen of the licensees." This is to bring a graver charge against Lord Lister than anybody has yet formulated, for the signature of Lord Lister is the evidence offered the public in the parliamentary report that the vivisectors in question are individually known to Lord Lister to be persons who will not inflict needless cruelties upon animals. I preferred to assume that they were all his intimate friends than to suppose that he had signed such certificates merely because he was asked to do so.

You are quite right in saying that I did not tell the audience that the vast majority of experiments under these certificates are mere "pin pricks." If I had done so I should have been misleading it. Inoculations may begin with a pin prick, but they

commonly involve much subsequent suffering. You next complain of my statement that "the more hospitals connected themselves with vivisection the larger was the grant per bed they might expect to receive from the Prince of Wales's Fund." It is simply waste of time to abuse me for making that statement till you can disprove it. I have given the figures and you will find them in the audited accounts of the hospitals.

Your account of what passed between my Society and the Poplar Hospital is inaccurate, and "the reply of this institution ' cited by you is not to be found in the correspondence which has been published and which you should have read before affecting to quote from it.

Lastly, what we have suggested to the heads of the religious bodies in the matter of Hospital Sunday is, that if the offertories are to be handed into the general funds of hospitals from which same general funds schools licensed for vivisection are subsidised, the congregations should be informed from the pulpits that their money is not exclusively intended for the of medical students and to the support of vivisectional laboratories.

May I ask what is your objection to such a course being pursued ?

I do not mind your attacking me in your paper personally by name-I have entered this controversy intending to give and expecting to receive good blows-but I have myself been scrupulous to make no statement that is not supported by unimpeachable authority, and I have a right to expect that a responsible paper such as yours should exercise a similar exactitude if it joins in the controversy and takes upon itself to allude to any statement of mine as "scurrilous." STEPHEN COLERIDGE.

The National Anti-Vivisection Society, London, S.W., May 21.

[(1) Mr. Coleridge is reported to have stated that Lord Lister's experiment consisted in passing a needle and thread through the eyeball of a rabbit and leaving the thread there. The needle and thread were passed through a special part of the skin of the eye only (cornea). The object of the experiment would the eye only (cornea). The object of the only thread had been have been entirely frustrated if the needle and thread had been passed through the eye. The question to be answered was whether inflammation could be caused by irritation of nonvascular tissues. Speaking of Lord Lister's experiment as he did, showed that Mr. Coleridge not only did not take the trouble to get accurate fact with regard to the experiment, but also was totally ignorant of its object.

(2) The inference to be drawn from Mr. Coleridge's remark that Lord Lister was the "intimate friend" of fifty-eight vivifrom the use of anæsthetics, was of the nature of a "job." This remark was obviously "scurrilous." Lord Lister signed