SOME INFLUENCES FAVORING THE DEVELOPMENT OF
THE AMERICAN JOURNAL OF ANATOMY AND THE ANA-
TOMICAL RECORD.

BY

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The establishment of THE ANATOMICAL RECORD has naturally resulted from the conditions which produced and continue to foster the growth of the *American Journal of Anatomy*. A brief resumé of some perhaps quite familiar facts may still be of interest in connection with the history of these journals.

The biological sciences have made such remarkable progress in America in the last thirty years, that it now seems trite to point out that our zoologists, physiologists and botanists have won a position of respect and influence, not only among their fellow scientists the world over, but in the educational system of this country. Their problems and results are appreciated, and their influence in the universities, colleges and schools is welcomed, as is shown by the introduction of many essential modifications of the curricula, which they have brought about.

During the same period medicine has been profoundly modified through these developments and through the rise of modern pathology, bacteriology and experimental medicine. These changes have given medical education a new and far wider meaning.

In the meantime anatomy has also been most actively cultivated, but, until very recently, for the most part under obscure and perhaps confusing circumstances. (See Dr. Mall's address on "Some Points of Importance to Anatomists, THE ANATOMICAL RECORD, No. 3, April, 1907.)

Some peculiarities of the development of medical education in this country explain this. Anatomical teaching in medical schools had become too largely a discipline, and it was considered important chiefly as furnishing information which could be shown to have a practical value. The teaching was, as a rule, entrusted to the surgeon; who has incidentally made many valuable contributions to anatomy and has done much to develop those special aspects of the science with which he has a daily familiarity, and which, indeed, he should teach in a special course of applied anatomy to advanced students. As a professor of anatomy, however, he was evidently not in a position, nor had he the time, to correlate his teaching with the very rapid advances of the biological sciences—and his research problems lay in another direction. Hence in place of the

modern anatomical laboratory was found merely a dissecting room and a hall for didactic lectures. Naturally those interested in working out the problems of anatomy were found elsewhere.

The scope of research in anatomy is so wide in dealing with the human body in all its relations to other organisms, and her problems are so fundamental in seeking to explain the evolution and adaptations of this highly specialized structure, that the field had been invaded and extended by investigators working in many special departments of biological science. The term anatomist had, as has been said, acquired a very technical and restricted meaning; but the results of many of these biologists entitle them in reality to be called anatomists, though they were identified as morphologists, zoologists, cytologists, neurologists, etc. An examination of the files of a variety of biological journals, whether observational or experimental, discovers the interesting fact that many important papers from American workers are to be recognized as contributions to anatomy without any undue extension of the term. (We may cite, for example, Howell's work on the blood; Conklin, Lillie and Wilson, etc., on germ-cells, cell-division, and fundamental problems of development; Loey, Platt, etc., on the morphology of the head; Herrick, O. Strong and Johnston on the nervous system; Kingsley, Osborn and their students on comparative anatomy and palæontology; Harrison, Morgan and many others on experimental embryology and regeneration, etc.)

It was the influence of the University Medical Schools that brought order out of this confusion. Here were professional anatomists who devoted all of their energies to research in, as well as to the teaching of this science. Their work finally secured recognition and proper facilities.

Histology, embryology, neurology and comparative anatomy were, for the most part, removed from the zoological or other laboratories to their proper place under anatomy. This process is not yet completely carried out everywhere, but the progress made in so short a period is really astonishing.

The result was to attract investigators interested in anatomical research to an environment created to make it possible for them to work to better advantage than elsewhere. Researches which formerly would have issued from laboratories of various types now began to appear uniformly from anatomical laboratories. There was, however, no suitable medium of publication for the results of these activities, hence the numerous papers were scattered through many different journals at home and abroad, and, consequently, left a very inadequate impression of anatomy as a science.

The founders of the *American Journal of Anatomy* hoped to remedy this state of affairs, and not only to gather together this valuable material but to make of it an exhibit of what is being accomplished for this subject in America, as well as to teach the methods, aims and scope of scientific anatomical research. The enterprise has proven to be well worth while. An abundance of good material is constantly supplied from all parts of the country. The subjects of investigation are selected from a representative range of topics, and already a number of papers have been quoted as important contributions. American anatomists have become a more definite group.

In one respect, especially, the experience of this journal has been quite noteworthy. It has furnished a remarkable example of co-operation in science. An acknowledgment has already been made in the first volume of the *Journal of Anatomy* for the generous response which was received from many quarters from those who must be regarded as the founders of the *Journal*, since their co-operation made its establishment possible—a special circular, in which a list of these founders is published, may be had on application to the *Journal*. The editorial board adopted from the first as liberal a policy as possible towards papers, illustrations, subscriptions, everything, and the management has been allowed the greatest latitude in order to secure a result which might be worthy of a national journal. All doubtful questions have been settled without dispute by simple submission to several editors, who invariably made a solution easy. Authors have aided the *Journal* in many ways, especially in regard to adapting their illustrations to less expensive methods, or in helping to defray excessive expense when requested. Several laboratories have also furnished aid towards this object. The steady support of so technical a journal given by many busy practitioners has discovered a widespread and encouraging interest in the problems of modern medical education; and, lastly, the co-operation of the Association of American Anatomists has been of the greatest assistance, not only in aiding the *Journal* to pay its own way, which it has managed to do, but also in assuring to it a circulation among the most desirable class of readers.

Probably few even of those who, as investigators in anatomy, are vitally interested in the standard maintained and in the success of the *Journal* realize how great and constant effort must be expended in such a campaign as this journal has undertaken in their behalf and in the cause it represents. It is absolutely necessary that every anatomist should feel a personal responsibility for the extension of the *Journal's* influence, whether on the board of editors or not. There is need of steady and en-

terprising loyalty to secure a worthy and national development for the science.

Perhaps, after all, the best method of attaining this object would be simply to continue the publication of carefully selected scientific research of respectable quality in the *American Journal of Anatomy*, until the impression made by the accumulation of these results shall produce an adequate effect on scientific medicine and education. Without doubt this must be relied upon as the most efficient agency in advancing the cause; but there are many subordinate, yet important aids to this end which it would be a mistake to neglect.

THE ANATOMICAL RECORD represents an effort to make use of these additional forces. It should furnish anatomists and others a reliable and ready means of keeping in touch with, and bringing opinion to bear upon, the whole range of problems involved in the organization and teaching of anatomy in America. Since it was begun in 1906 there has been a steady growth of interest in its work. Many of our representative anatomists have expressed an earnest desire that the RECORD be continued along the lines originally planned, and have indicated an intention of co-operating actively in making it a success. A strong feeling is expressed that there is really need for it, and for its publication at more frequent intervals than hitherto. Indeed, so great has been the enthusiasm displayed that the editorial board of the *American Journal of Anatomy* has thought it best to entrust the future management of the RECORD to an entirely new and independent board of editors, composed of those who have exhibited the greatest interest in its development.

Just at this juncture the WISTAR INSTITUTE, with Dr. Horace Jayne, has generously come forward and made it possible for the Record to be issued separately from the *Journal of Anatomy*, at the same time finally providing adequate office facilities for both journals, as well as for some other related journals, at the Institute. This is a very important step. It is more; it is a distinct and valuable contribution to science. It should be clearly understood, however, that the Wistar Institute does not undertake to furnish the entire support of the journals. These journals have become self-supporting, and there seems every reason to expect that they will continue to be so. The most careful management has been required, however, to accomplish this result, and it is a great satisfaction to feel that the financial affairs will be henceforth under such expert control. While, therefore, the business management of the office will continue much the same, the transfer makes possible many economies in routine: permanent and well-trained assistance can give much better and prompter service;

there are opportunities to improve illustration; much more can now be done to develop advertising and promoting features, reviews, bibliographies of anatomy, etc.; and foreigners will hear of and secure the Journals much more readily.

This change will, of course, relieve the editorial boards of the various journals of much work and administrative cares, which can be carried better by a permanent, central office; but the Wistar Institute has shown great foresight and sagacity in insisting that each journal retain its peculiar organization, and that each board of editors shall still continue its scientific responsibilities and activities as hitherto. There is, then, no less demand for active promoting and loyalty in support from collaborators and subscribers to the *Journal* and to the RECORD. In order to secure a distribution to libraries and to all who can use the results and data published, which after all is the most important function of such journals, a very considerable degree of enterprise will be required, and past experience has demonstrated that progress in this direction is made chiefly by personal solicitation. If the members of the Association of American Anatomists will continue to do their part, there is little doubt that a brilliant future awaits both journals, as well as great usefulness to the further development of modern scientific and medical education.