is confined within narrow limits to certain divisions of the science of geology, in which very detailed knowledge and country-wide experience are necessary. The State Surveys are not able individually or independently to maintain a staff of such specialists and have therefore long maintained cooperative agreements with the U. S. Geological Survey, by which these special problems are referred to the specialists of the National Survey. Many of these problems are of fundamental importance and their solution is necessary to reliable economic work.

Further, the areal and structural geologic work in the various States is dependent on the progress and completion of the topographic maps of the United States, which are made by the Topographic Branch of the U. S. Geological Survey. The States usually have contributed one half of the cost of this work, the Federal Survey the other half, both parties to this cooperation having approximately equal need for the results.

Therefore, the Association of American State Geologists, in the interest of their work, ask that you use your good office to strengthen the research and specialistic staff of the U. S. Geological Survey, Department of the Interior, and to promote and hasten the topographic mapping in conformity with the plan recently adopted by Congress and approved by yourself. What has been said about specialists in the U. S. Geological Survey is equally true of specialists in the U. S. Bureau of Mines, the Bureau of Soils, and other Federal organizations with which the members of our association cooperate.

The justification of the above letter has recently been emphasized by the action of the director of the Budget Bureau in ignoring the provisions of the Temple Bill, "An Act to provide for the completion of the topographical survey of the United States," which contemplates an appropriation of $950,000 for the next fiscal year as the first year's requirement of the twenty-year program. The budget bureau director recommended $477,000.

On January 9, the chairman of the Subcommittee on Appropriations for the Department of the Interior, House of Representatives, represented that the provisions of the Temple bill would be met if the federal government met the sum total of the state allotments. On this basis the House on January 9 passed the appropriations bill carrying an amount of $525,000 for topographic mapping. This misinterpretation of the Temple bill is now being protested before the Senate by the engineering societies of the country and the Association of American State Geologists who point out that in the hearings of the Temple bill it was contemplated that the federal expenditures would be nearly three times those of the states. These organizations are therefore urging that the full appropriation of $950,000, which can be economically and effectively used, be made in accordance with the provisions of the Temple bill, to fully sustain the twenty-year program.

M. M. LEIGHTON,
Secretary,
Association of American State Geologists

EVOLUTION AND THE UNIVERSITY OF NEBRASKA

REFERRING to Franklin D. Barker's communication in SCIENCE of January fifteenth regarding the quotation from the New York *Times* of November 29, 1925, may I quote the actual passage from my recent address, "How to Teach Evolution in the Schools," as printed in *School and Society,* January 9, 1926:

"In a recent journey through the politically progressive state of Nebraska I was amazed to learn from the senior professor of geology, Erwin H. Barbour, that even in the university there was a hush on the word 'evolution.' I was not less amazed to learn from an extremely able high-school teacher in the western part of the same state that the word 'evolution' must not be used at all; so powerful is the influence of a certain class of theological teachers on their congregations, so strong is the influence of these congregations with their representatives in the state legislature and so potent are these representatives in affecting state appropriations for education that no teacher in the whole state of Nebraska is entirely free to be sincere but is more or less obliged to dissemble his real beliefs."

I deeply regret if in any way I misrepresented the meaning of my honored friend, Professor Erwin H. Barbour, or the general atmosphere in the University of Nebraska, an institution for which I have the greatest admiration and with which I have long been in most friendly association through Professor Barbour and other friends. The concluding words are somewhat ambiguous; what I intended to say is that no (school) teacher in the state is entirely free to be sincere.

As regards the University of Nebraska, I am only too happy to learn from Professor Barker that I was mistaken and that the teaching of evolution as a law, no longer as a theory, is entirely free. I trust this will soon be the case among all the school teachers of the state of Nebraska, as well as among other school teachers all over the United States, to whom my address was especially directed.

HENRY FAIRFIELD OSBORN
COLUMBIA UNIVERSITY

LOSSES IN TROUT FRY AFTER DISTRIBUTION

SINCE sending to SCIENCE my article on this subject I have received from Mr. White a summary of

his seining experiments on Forbes' Brook, Prince Edward Island, for the past summer.

During the first week of July four thousand trout fry were distributed along a length of about one quarter of a mile of this stream. It was seined three months later with the following results:

Trout, yearlings and older	319
Fundulus	82
Atlantic salmon parr	33
Stickleback	16,152
Total	16,586
Surviving trout fry	1,064

To test the efficacy of the seining twenty-five marked fingerlings were dropped into the brook at a point which was considered a fair average as regards difficulties of seining. In three quarters of an hour twenty-four of them had been removed by the seine, which represents an error of 4 per cent. for this method of recovering fry.

The superintendent of fish culture for the Dominion of Canada assures us that Forbes' Brook is a typical trout stream. The approximate loss of trout fry in Prince Edward Island streams will average therefore about 73 per cent. for three months.

QUERIES

(1) Are we feeding trout fry to older trout and to inferior fish? What rôle is played by the 16,152 stickleback?

(2) Are the fry being starved to death through shortage of natural food for 16,586 fish, apart from the food required for the 4,000 fry?

(3) How many of the surviving 1,064 fry (if any) will be alive when they shall have become four years old?

(4) Should we continue to distribute trout fry irrespective of the presence in streams of many enemy and competitor fish?

A. P. KNIGHT,
Chairman, Biological Board of Canada
KINGSTON, ONTARIO
December, 1925

WORK ON SPHENODON

IN the issue of SCIENCE for December 25, 1925, there appeared under the heading of "Science News" an item concerning work in the University of Chicago on *Sphenodon*. It seems desirable in this connection to make the following statement: In 1922 an expedition from this university visited New Zealand and brought back four living specimens of *Sphenodon* as well as one preserved in fluid, and on the basis of this material and the literature procurable we have undertaken a monographic account of this interesting reptile. Papers have already been prepared on the muscular system, digestive system and habits in captivity. Work on the nervous system, particularly the brain, has been going on for six or eight months under the supervision of Dr. Gilbert L. Houser of this university. Other papers will deal with the urogenital system, the blood supply, the skeleton, etc. While of course no one can claim any monopoly in scientific investigation this statement will show that the work on *Sphenodon* has already been going on for several years at the University of Iowa.

C. C. NUTTING
STATE UNIVERSITY OF IOWA

THE FOURTH EDITION OF THE BIOGRAPHICAL DIRECTORY OF THE AMERICAN MEN OF SCIENCE

A FOURTH edition of the *Biographical Directory of American Men of Science* will be published as soon as the compilation can be made and about five years after the publication of the third edition, which was issued in 1921. The work is intended to be a contribution to the organization of science in America, and the editor will greatly appreciate the assistance of scientific men in making its contents accurate and complete. Those whose biographies appear in the third edition have received or will later receive copies of the sketches for correction which should be promptly returned. The editor will be under obligations to scientific men who will send sketches of those who should be included, or let us have their names and addresses. All those engaged in scientific work whose biographies are not included in the third edition are requested to send the information needed. For this purpose the blank that is given on an advertising page (xiii) of the current issue of SCIENCE may be used.

It is intended that each entry shall contain information as follows:

1. The full name with title and mail address, the part of the name ordinarily omitted in correspondence being in parentheses.

2. The department of investigation given in italics.

3. The place and date of birth, including month and day.

4. Education and degrees, including honorary degrees, with dates.

5. Positions or professional occupation with dates, the present position being given in italics.

6. Temporary and minor positions; scientific awards and honors; expectations, etc.

7. Membership in scientific societies with offices and dates at which they were held.

8. Chief subjects in which research has been published or is now in progress.