SCIENCE

Vol. LVIII

AUGUST 17, 1923

No. 1494

CONTENTS

Earth's Magnetic Field: Dr. Louis A. Bauer	Spencer Fullerton Baird—a Pioneer Disseminator of Science News: Dr. Marcus Benjamin	
Ramsay Memorial Fellowships; The International Physiological Congress; Symposium on Industrial, Agricultural and Food Chemistry; The French Association for the Advancement of Science; The Los Angeles Meeting	Some Physical Aspects of a Recent Analysis of the Earth's Magnetic Field: Dr. Louis A. Bauer	113
Ramsay Memorial Fellowships; The International Physiological Congress; Symposium on Industrial, Agricultural and Food Chemistry; The French Association for the Advancement of Science; The Los Angeles Meeting	Alice C. Fletcher: Francis LaFlesche	115
Physiological Congress; Symposium on Industrial, Agricultural and Food Chemistry; The French Association for the Advancement of Science; The Los Angeles Meeting	Scientific Events:	
University and Educational Notes	Physiological Congress; Symposium on Industrial, Agricultural and Food Chemistry; The French Association for the Advancement of Science; The	
Discussion and Correspondence: Horse Flesh in England in the Eleventh Century: DR. C. F. LANGWORTHY. Effect of Plant Extracts on Blood Sugar: DR. WILLIAM THALHIMER and MARGARET C. PERRY. A Question of Rhetoric: A. W. FORBES	Scientific Notes and News	118
Horse Flesh in England in the Eleventh Century: DR. C. F. LANGWORTHY. Effect of Plant Extracts on Blood Sugar: DR. WILLIAM THALHIMER and MARGARET C. PERRY. A Question of Rhetoric: A. W. FORBES	University and Educational Notes	119
Memories of Sixty Years	DR. C. F. LANGWORTHY. Effect of Plant Extracts on Blood Sugar: DR. WILLIAM THALHIMER and MARGARET C. PERRY. A Question of Rhetoric: A. W. FORBES	120
Scientific Books: Meisinger on Free-air Pressure Maps: Dr. CHARLES F. BROOKS. Hazard on Magnetic Declination in the United States: Dr. H. W. Fisk		101
A-rays and Crossingover: PROFESSOR JAMES W. MAVOR and HENRY K. SVENSON	Scientific Books: Meisinger on Free-air Pressure Maps: Dr. CHARLES F. BROOKS. Hazard on Magnetic Decli-	
		124
Science News viii	The Iowa Academy of Science	126

SCIENCE: A Weekly Journal devoted to the Advancement of Science, edited by J. McKeen Cattell and published every Friday by

THE SCIENCE PRESS

Lancaster, Pa. Garrison, N. Y.

New York City: Grand Central Terminal.

Annual Subscription, \$6.00. Single Copies, 15 Cts.

SCIENCE is the official organ of the American Association for the Advancement of Science. Information regarding membership in the association may be secured from the office of the permanent secretary, in the Smithsonian Institution Building, Washington, D. C.

Entered as second-class matter July 18, 1923, at the Post Office at Lancaster, Pa., under the Act of March 3, 1879.

SPENCER FULLERTON BAIRD—A PIO-NEER DISSEMINATOR OF SCIENCE NEWS

THE nineteenth century stands out prominently in the history of the world as the one in which the greatest development of science occurred. In the United States a series of great dominant figures has always conspicuously exerted a potent influence for the benefit of humanity on the progress of science.

Even when the century was at its very beginning the splendid figure of the many-sided Franklin was already almost at its zenith. He knew this and he knew that; he talked with this friend and discussed with that friend, and from the gathering of his friends grew the American Philosophical Society, and Philadelphia became the scientific center of the new world.

The scientific mantle of Franklin passed to Robert Hare, a man of wonderful attainments, conspicuously in chemistry, and to him came Benjamin Silliman, who, having absorbed all that he could acquire in Philadelphia, supplemented it with study abroad and then settled in New Haven as professor at Yale College.

Dana and Hubbard, his sons-in-law, Loomis, Olmsted, Shepard and others were his followers and the *American Journal of Science* came into existence as the great event in American science of the second epoch of the century.

Like a meteor in his brilliancy, Samuel Latham Mitchill flashed on the scene in New York, and for a time Columbia College with its splendid and distinguished teachers of science was foremost. Bruce, Hosack and Renwick are familiar names of that period.

When the century reached its high tide, Louis Agassiz with his wonderful personality settled in Cambridge, and Harvard became the Mecca to where, besides his own son Alexander, Hyatt, Lyman, Morse, Putnam, Scudder, Shaler and Verrill came and studied and then spread their knowledge abroad, illuminating wisdom with marvelous skill and adding much to what was known in natural history. The founding of the Museum of Comparative Zoology with its many fortunate students is a noteworthy event of this time.

Almost simultaneously with the progress made in natural science in Cambridge was that made in Washington under Baird, who, as assistant secretary of the Smithsonian Institution, was slowly developing the

Cornell University Medical College

First Avenue and Twenty-eighth St.

NEW YORK CITY



The first year of the course is also offered at Ithaca, N. Y., subsequent years at New York City only.

For information address THE SECRETARY

COMPLETE STOCK OF

C. A. F. Kahlbaum's Chemicals and Reagents

-1-

Baker's Analyzed Chemicals

and

Dr. Gruebler's Biological Stains For Prompt Shipment



C. P. CHEMICAL & DRUG CO

(Incorporated)

114 Liberty St. New York City

Phone-Rector 4787

Marine Biological Laboratory Woods Hole, Mass. Biological Material



1. ZOOLOGY. Preserved material of all types of animals for class work and for the museum.

2. EMBRYOLOGY. Stages of some invertebrates, fishes (including Acanthias, Amia and Lepidosteus), Amphibia, and some mammals.

3. BOTANY. Preserved material of Algae, Fungi, Liverworts, Mosses, Ferns and Seed Plants.
4. MICROSCOPE SLIDES in

Bacteriology, Botany and Zoology.
5. LIFE HISTORIES, Germination Studies, and Natural History Groups.

Catalogues furnished on application to

GEORGE M. GRAY, Curator
WOODS HOLE MASSACHUSETTS

THE MICROSCOPE

By SIMON H. GAGE of Cornell University 13th Edition, Published December, 1920 In this edition, special emphasis is put upon the Dark-Field Microscope. POSTPAID, \$3.00.

Comstock Publishing Co., Ithaca, N.Y.

"TURTOX" CATALOGS include

Aquaria
Bird glasses
Charts
Chemicals
Dissecting outfits
Earthworms (special)
Entomological supplies
Glassware
Lantern Slides
Life Histories
Microscopes
Microscopes
Microscope slides
(General)

Microscope slides
(special for High
Schools)
Microtomes
Models
Museum Preparations
Preserved Material
for Botany, Embryology and
Zoology
Insect Mounts
Skeletons
Syringes, Injecting
Vascula

and many other items.

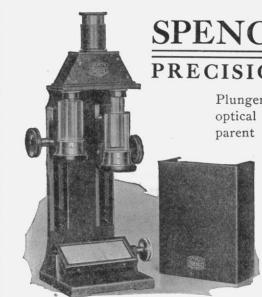
Items in black type are our own special products.

We are Manufacturers and Preparators of
Biological Supplies.



Catalogues to cover any or all of the above items will be sent on request.

GENERAL BIOLOGICAL SUPPLY HOUSE
1177 East 55th Street, Chicago, Ill.



SPENCER-DUBOSCQ

PRECISION COLORIMETER

Plungers carefully matched are made from optical glass especially selected for transparent qualities. Cups are 50 m/m high.

Positions of both cups are adjustable by independent rack and pinion movements. Verniers read to tenth millimeters.

Constructed with the same care and precision that characterizes our microscopes and other optical instruments.

Catalog M-16 Sent on Request



SPENCER LENS COMPANY

MANUFACTURERRS

Microscopes, Microtomes, Delmeascopes, Optical Glass, Telescope Discs, Optical Measuring Instruments, Etc.

BUFFALO, N.Y.

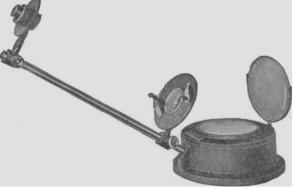


Student's Polariscope and Accessories

Our new Student's Polariscope is a scientific instrument showing by the interference of light waves the remarkable color effects of polarized light. It provides one of the most fascinating experiments in Elementary Physics and constitutes a never-ending source of instruction and enjoyment.

The instant favor with which our larger Polariscopes were received, has led us to offer a smaller instrument containing all essential parts at a price well within reach of every school and college. Daylight or artificial light diffused by a ground glass plate is reflected at a polarizing angle by a black glass mirror to the stage. The stage may be rotated or shifted up and down the rod and carries a glass plate and clips for holding the object under examination. The latter is viewed through a nicol prism analyzer which rotates in a collar graduated to 5°, making quantitative measurements possible.

The base of the instrument is hollow and felt lined so that the preparations and accessories may be kept with the instrument. A selected set of accessories is listed below. A number of others,



L 260-Student's Polariscope.

along with our larger Polariscopes are listed in Bulletin No. 102, which will be mailed on request.

L 260. L 265.	Student's Polariscope\$30.09 Set of Seven Accessories, compris- ing:
L 277. L 278.	Glass Plate for Clamp \$1.30 Pressure Clamp for showing double
L 279.	refraction in glass under strain \$1.50 Rhombohedron of Iceland spar \$1.00
L 286. L 292.	Tourmaline Tongs\$3.50
	Spar Plate cut perpendicular to axis
	Sheet of Clear Mica
Comple	te at Special Price\$20.00

WM. GAERTNER & CO. 5345-39 LAKE PARK AVENUE

CHICAGO, ILL. U. S. A.