

a welcome improvement on that of those in the last few volumes of the old set. There is, too, a more liberal allowance of space for the letterpress relating to the various plates, of which the number in each volume is to remain at forty-eight. The unofficial relations which have existed for so long between Kew and the *Botanical Magazine* have not been altogether severed, as, under the new régime, the editing is in the hands of Dr. Stapf, late keeper of the herbarium at Kew. The *Botanical Magazine* appeared without a break since its first appearance in 1787 till the completion of volume 146.

UNIVERSITY AND EDUCATIONAL NOTES

UNDER the will of Mrs. Alice H. Plimpton, who died in Norwood, recently, \$50,000 is donated to Harvard University, of which \$30,000 will go to Harvard College and \$20,000 to the medical school.

TRINITY COLLEGE, Hartford, Connecticut, has received a bequest of \$100,000 by the will of the late George E. Hoadley. This brings the amount collected for the Trinity centennial fund to \$650,000.

IN connection with celebration of the eighty-fifth anniversary of its founding, which took place on February 22, DePauw University has started a project to raise one million dollars for endowment and a half million for buildings and equipment.

THE Agricultural School of the University of Cambridge will receive through the Ministry of Agriculture and Fisheries £30,000 from the development commissioners to provide for a chair of animal pathology. On the professor being appointed, he would be required to prepare a scheme for the development within the university of the study of the diseases of farm animals. For an approved scheme the commissioners would be prepared to find a capital sum of about £25,000 for buildings, the sites to be provided by the university.

DR. ROBERT E. VINSON, president of the University of Texas, will succeed Dr. Charles F. Thwing as president of Western Reserve University.

DR. R. A. PETERS, lecturer in biochemistry

in the University of Cambridge, has been elected to the Whiteley professorship of biochemistry in the University of Oxford.

DR. RAFFAELE ISSEL, son of the late Professor Arturo Issel, the geologist, has been appointed professor of zoology in the University of Genoa.

DISCUSSION AND CORRESPONDENCE

DESTRUCTION OF THE POLARIZATION OF RESONANCE RADIATION BY WEAK MAGNETIC FIELDS: A NEW MAGNETO-OPTIC EFFECT

THE earlier studies of the resonance radiation of mercury vapor in exhausted quartz tubes by one of the present writers showed no traces of polarization, even when the exciting light was polarized. Recent experiments by Lord Rayleigh apparently indicated that polarization existed in that part of the excited column at some little distance from the window at which the beam entered, in other words when the excitation was produced by light from which the core of the 2,536 line had been removed by absorption. This observation was not verified in experiments made by one of us last spring and published in a recent number of the *Philosophical Magazine*. The polarization was found to be strong and of uniform percentage right up to the window at which the beam entered.

On commencing a further study of the phenomenon we found it impossible to produce as strong polarization as was indicated by the earlier experiments, and after varying the conditions in every conceivable manner we finally found that the disturbing factor was the magnetic field of the earth, the polarization rising to a very high value (90 per cent.) when the magnetic field of the earth was compensated by a large solenoid carrying a feeble current. In the absence of the solenoid the percentage of polarization dropped to fifty or less. This appears to be a new magneto-optic effect, and is manifested only when the magnetic field is parallel to the magnetic vector of the exciting light and perpendicular to the beam of exciting rays. A field of only five or six times the strength of the earth's field practically destroys the polarization. Discrepancies found previous

to the discovery of this effect were due to the fact that in some cases the apparatus faced north and south, and in others east and west. Lord Rayleigh's observation was doubtless due to the stray field of the electro magnet which was used to flatten the discharge against the wall of his quartz lamp.

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THE JOHNS HOPKINS UNIVERSITY
JANUARY 31, 1923

RATE OF MOVEMENT IN GLACIERS OF GLACIER NATIONAL PARK

IN consequence of letters sent to the U. S. Geological Survey, I send you the following note for publication:

I have hoped at some time to be able to make some careful measurements of the movement of the glaciers in Glacier National Park, as this is a matter of interest to all the tourists,

issued from below the ice. No. 3 was some distance farther north, and No. 4 near the ice cave which was then near the middle of this lobe where there was no moraine. The markers were set between 12:30 and 1:15 P.M., August 26, 1920, and the distances were measured at 4 to 4:13 P.M. of the same day. Again on August 30, after four days, mostly of chilly, rainy and snowy weather, I remeasured the distances with the results shown in the accompanying table. At No. 1, the spike had then fallen out of the hole in the ice but was stuck back in and the distance measured. At No. 2, the spike, though still in the hole, had tipped over so that the measurement is only approximately correct. The apparent movement on the bright sunny afternoon of August 26 ranged from 0 to $\frac{1}{4}$ inch, time ranging from $2\frac{3}{4}$ hours to 3 hours and 36 minutes. The total movement in time ranging from 4 days,

MEASUREMENTS OF ICE MOVEMENT IN GRINNELL GLACIER, AUGUST 26 TO AUGUST 30, 1920

No.	Aug. 26, Markers set	Distance	Aug. 26, time remeasured	Distance	Time elapsed	Distance ice moved
1	12:37 P.M.	66 ⁷ / ₈ in.	4:13 P.M.	66 ³ / ₄ in.	3 hrs. 36 min.	¹ / ₈ in.
2	12:53 P.M.	50 in.	4:06 P.M.	50 in.	3 hrs. 13 min.	0
3	1:02 P.M.	35 ¹ / ₄ in.	4:03 P.M.	35 in.	3 hrs. 1 min.	¹ / ₄ in.
4	1:15 P.M.	28 ³ / ₄ in.	4:00 P.M.	28 ¹ / ₂ in.	2 hrs. 45 min.	¹ / ₄ in.
Aug. 30 time remeasured			Distance	Time elapsed	Distance ice moved	
1	2:45 P.M.	65 ⁷ / ₈ in.		4 d. 2 hrs. 8 min.	1 in.	
2	3:00 P.M.	48 in.		4 d. 2 hrs. 7 min.	2 in.	
3	3:00 P.M.	32 in.		4 d. 1 hr. 58 min.	3 ¹ / ₂ in.	
4	3:10 P.M.	24 in.		4 d. 1 hr. 55 min.	4 ³ / ₄ in.	

but I do not know of any such that have been made thus far.

In my pamphlet on Glaciers of Glacier National Park (published by the National Park Service, 1914) I described (p. 6) some very crude measurements which I made in 1913 on Blackfeet Glacier, on Sperry Glacier (p. 15), on Chaney Glacier (p. 35), and on Vulture Glacier (p. 39). In August, 1920, I made similar crude measurements on Grinnell Glacier. Starting at the moraine on the north margin of the lower front of the ice I set spikes in the ice at four places along the frontal edge of the glacier and carefully measured the distances to marks made on the adjacent exposed bedrock directly in front. No. 1 was at the moraine where no bedrock was exposed, so a rock marker was set up. No. 2 was just south of the point where the main creek

1 hour and 55 minutes to 4 days, 2 hours and 8 minutes, ranged from 1 inch to $4\frac{3}{4}$ inches. It is interesting to note that, as would be expected, the movement, small as it is, is increasingly greater from the side to the middle of the most advanced part of frontal lobe.

These measurements are of course too crude to form a basis for estimating the average daily or annual rate of advance of the ice, yet I think they are of some interest.

WM. C. ALDEN

SODIUM IODIDE IN TABLE SALT

TO THE EDITOR OF SCIENCE: No comment seems necessary regarding the importance of traces of iodides for the well-being of the human body. As iodine is a permanent constituent of several human organs the iodides must be regarded as an essential food material.