meteorite fell, which he described as in a ravine four and one half miles southeast of Oxford, Ohio. Hence, also, the size of it was variously estimated as "six inches in diameter," "as large as a dinner plate," "as large as a lard can," "as large as a barrel"; and the path of it on the face of the firmament was described as "descending toward the earth" (really it was passing toward the horizon) "with a moderately descending course," "at an angle of 45 degrees," "at an angle of 65 degrees"—all blissfully unconscious that these estimates mean nothing to any one but the one making it. A doctor described the bright trail left by the meteor as "20 feet long." Two of the observers at different points, neither of them closer to it than 50 miles, despite the fact that sound waves travel with a very low velocity as compared to those of light, were certain that they heard a "swishing" or "hissing" noise accompanying the meteor as it sped across the sky. A number attempted to give the direction of the *path* of the meteor with reference to the points of the compass, not realizing that this was impossible in all cases where it did not pass through the zenith of the observer, because only one of the components of its course—that athwart the line of his vision—could be determined by him.

Let us hope that when our present boy scouts come to maturity, having been trained in a proper knowledge of their relation to their physical environment, which has been so sadly neglected in our schools—is it because the teaching of the boy has been so exclusively delegated to women?—those who then follow "meteor chasing" as a scientific recreation may find their efforts to elicit information concerning things celestial, when they come into relation to things terrestrial, crowned with better success than were those of their predecessors.

Meanwhile the meteorite of May 30, 1922, lies hidden somewhere in the most mountainous portion of West Virginia, probably, according to the advices received from Dr. I. C. White, state geologist of that state, within the area covered by the counties of Fayette, Greenbrier, Raleigh and Summers. What an exasperating way meteorites seem to have of so frequently selecting the wildest and most rugged portions of our earth in which to bury themselves![1]

ARTHUR M. MILLER
THE UNIVERSITY OF KENTUCKY

THE FOURTH RECORD OF THE OCCURRENCE IN THE ATLANTIC OCEAN OF THE WHALE SHARK, RHINEODON TYPUS

ON the early morning of May 19, 1922, while the Munson liner, *American Legion*, Charles H. Zearfoss master, was crossing over the banks which lie northeast of the Abrolhos Light, off the coast of Brazil, in Lat. 17° 57′ S. and Long. 38° 41′ W., a large shark was struck by the stem of the vessel and held doubled around the bow for some hours. It was photographed and an attempt was made to get it aboard, but the weight was too great.

It was struck just behind the gills and, with about eight feet of the head end on one side of the bow and some twenty-two feet of the body and tail on the other, it was so perfectly balanced that the vessel had to be stopped and backed before it could be got rid of.

Photographs sent me by Mr. C. F. Krauss, a passenger on the steamer, and by Captain Zearfoss, show only a part of the body, but they show plainly the spots arranged in vertical rows and separated by vertical bars, the distinctive markings of the whale shark. These photographs leave not the faintest shadow of doubt that the shark was *Rhineodon*.

This then definitely constitutes a fourth record for the Atlantic Ocean of the occurrence of the largest of all the sharks, and of the rarest of all the large sharks. The other

[1] Since writing the above, letters from two persons in West Virginia—W. T. Hill, Eskdale, Kanawha County, and M. W. Venable, who saw the meteor from near the mouth of Glade Creek, Raleigh County—indicate that the meteorite is probably to be looked for in Greenbrier County, that state. The former heard a "rumbling sound" in a due east direction about one minute after the meteor disappeared, and the latter a "tremendous roar similar to a salvo of artillery" simultaneous with the bursting of the meteorite with a "brilliance almost blinding" in a direction a little east of north.

records are as follows: In January, 1902, an 18-foot specimen came ashore at Ormond, Fla. It was described by Mr. B. A. Bean in SCIENCE, February 28, 1902. Its skin is now in the U. S. National Museum. A second specimen was taken at Knight's Key, Fla., in May, 1912. It was put on record by me in SCIENCE of August 22, 1913, and the fish and its capture were fully described by me in "Zoologica," *Scientific Contributions N. Y. Zool. Soc.*, March, 1915. Its mounted skin is in the possession of Captain Charles Thompson of Miami, Fla. The third, and, except the Abrolhos Light specimen, the only other definite record, is of a fish taken near Cape Sable, Fla., in June, 1919. This I have also put on record in SCIENCE for August 27, 1920. The indefinite record in the Atlantic, to which reference has been made, is found in George Bennett's "Wanderings in New South Wales, Batavia, Pedir Coast, Singapore and China," London, 1834. In Vol. II, p. 267, is a notice of a giant shark seen near the Azores in 1831. It was of great size, but too far off for spots and stripes to be seen, and while it was probably a *Rhineodon* it cannot be so stated definitely. Hence the specimen, referred to in the body of this article, constitutes our fourth definite record for the Atlantic Ocean.

E. W. GUDGER
AMERICAN MUSEUM OF NATURAL HISTORY

DISCHARGE OF STATIC ELECTRICITY

A SPLENDID example of the discharge of static electricity between two persons was witnessed at one of the games in the gymnasium of Iowa Wesleyan College at Mount Pleasant during the recent southeastern Iowa high school basketball tournament, and is reported by Ben H. Wilson, a member of the Iowa Academy of Science.

While the game was in progress between the Wayland and Ft. Madison teams, Saturday evening, March 11, 1922, two players in pursuit of the ball came together in the southeast corner of the court, after a fast run of almost half way down the length of the floor. A deep yellow spark was discharged between their bodies, the flash of which was plainly visible to spectators in the top row of the balcony in the northwest corner of the gymnasium, over one hundred feet distant. This could be no illusion as it was witnessed by over a dozen persons who made exclamation of the fact almost simultaneously. The spark appeared to be emitted at about knee height. Both players had on rubber-soled athletic shoes which would be non-conductors, and wore woolen shirts and cotton flappers. That this was visible in a well lighted room makes the phenomenon all the more remarkable.

Shocking the cat by rubbing the fur on its back; lighting the gas from a spark emitted from one's knuckle; witnessing sparks while combing one's hair in the dark; and children's shocking each other while playing on woolen carpets, are all quite common experiences, but this is the first time that the writer has heard of a similar occurrence being reported during an athletic contest.

H. E. JAQUES
IOWA WESLEYAN COLLEGE

PARAFFINE PAPER SCREEN FOR SHOWING THE POSITION OF RETINAL IMAGE

UNDER the title, "The Inversion of the Retinal Image," Hartridge[1] refers to a statement by Senet[2] that the retinal image is not inverted. The former author then states that the evidence for that inversion is absolutely reliable and proceeds, in five paragraphs, to summarize the evidence on which the inversion of the retinal image is based. I quote his first two paragraphs:

"(1) If the eye ball of an albino animal be removed intact, and be mounted in a tube, so that while the rays from external objects enter the pupil, the posterior surface of the eye ball can be examined by an observer, then owing to the absence of pigment in the choroid the image formed on the retina is clearly visible. This image is seen to be inverted, top being at bottom and right being at left.

(2) In the case of an ordinary animal the choroid and selera can with care be removed from the eye ball, leaving the retina *in situ;* observa-

[1] Hartridge, H.: Proc. of the Physiol. Soc., May 15, 1920, published in the *J. of Physiol.*, Vol. LIV, August 1920, p. 6.

[2] Senet: *Revista de la Universidad de Buenos Aires,* 41, p. 398, 1919.