However, birds and lizards are bad subjects for experimenting upon with supposed poisons, and do not conclusively prove that they might not be poisonous, or perhaps even fatal, to man. But being very busy at the time, I had no opportunity to carry my experiments further.

The forked tongue continually playing in and out of the mouth like a serpent's, the snake-like hiss, and the bright colors, together with their aggressive disposition, are well calculated to excite the suspicions of the Arizona Indians, who are reputed to greatly fear and thoroughly believe in the extreme venomousness of this reptile.

When intent on going anywhere in particular, their gait changes from a dragging of the body along the ground to that which an alligator assumes under similar circumstances; i.e., the body is carried high on the legs, clear from the ground, and the tail carried rigid and in line with the body.

They showed a peculiar fondness for water. When placed in a large tank with sloping bottom, in one end of which was water, all would spend most of their time lying where it was about an inch deep. This appears strange when recalling the arid character of the plains that they inhabit.

Their rations consisted of raw hen's-eggs, one of which made a full meal for a good-sized individual, which would not appear to care to dine more than once in about four days. These were given whole to the larger ones, which, having gotten the egg fairly in their jaws, experienced no difficulty in breaking the shell. Their mode of eating is by running the tongue into the mass of the egg, drawing it into the mouth, repeating this in a very deliberate manner, and spending from twenty minutes to a half-hour on an egg.

Their ability to climb is considerable; quite out of keeping with their heavy, unwieldy appearance. A tolerably smooth stick, an inch in diameter, standing at an angle of about sixty degrees, is quite easily ascended.

Several of them laid eggs during August and September. These were 53 millimetres long by 26 millimetres in transverse diameter, were perfect ellipsoids, having a finely granulated, soft, tough, translucent skin or shell.

HENRY L. WARD.

Tambaya, D.F., Mex., Dec. 25.

Sections of Fossils.

IN *Science* for Nov. 18, Prof. Joseph F. James, in speaking of the production of sections of *Bryozoa* for microscopic examination, says, "I can quote no higher authority than Mr. Archibald Geikie (*Text-Book of Geology*, pp. 85–88, where elaborate directions are given for making rock sections; Professor Prestwich also considers it 'an expensive and tedious process,' *Geology*, i. p. 43) as to the tediousness of the process." The pertinence of these references immediately vanishes if a person take but the pains to look them up. In both it will be found that the authors have been referring to the making of slides of Plutonic and metamorphic rocks. Of course, any one knows that a limestone in which *Bryozoa* are usually embedded cuts far more readily than crystalline rocks. Now, with a little practice, a man can soon cut from six to ten slides of crystalline rocks in a day; and he can cut six times as many slides of calcareous *Bryozoa* in the same time, as I have often seen done by college students, not by lapidaries. An average of from forty to sixty slides a day certainly cannot be complained of. Of course, no one will deny that the use of the microscope in fine petrographical studies of crystalline rocks has become imperative. We are here referring to *Bryozoa*.

Feeling convinced, from my own study of the writings of these authors, that they had never expressed an opinion of this subject, least of all with special reference to the *Bryozoa*, I sought for further information. Under date of Dec. 10, Prof. Joseph Prestwich writes me, "The question you ask about the *Bryozoa* is quite beyond my knowledge. I have never studied the *Bryozoa*. In fact, there are very few persons in England who have studied them. We lost our great authority in my old friend Mr. George Busk." In a letter dated Dec. 8, Prof. Archibald Geikie writes, "The question you propose to me in your letter is really one to which I do not feel myself competent to give an answer. I haver never given special study to the *Bryozoa*, and I have nowhere ventured to publish an expression of opinion."

The sentence quoted from Professor James's article concludes with the following words: "nor a better one than Dr. Nicholson as to the uncertainty of the results." In my article of Nov. 4, I mentioned Prof. H. A. Nicholson as one of the leading men who first took a decided stand in favor of the prominent use of internal characters as a means of classification. Now, it would not be fair to construe the above sentence as meaning that Professor Nicholson's writings are themselves a manifest example of the viciousness of the methods pursued by the new school. It must mean, therefore, that Professor Nicholson does not believe in the use of these microscopic sections. Since we interpret the spirit of Professor Nicholson's 'Genus Monticulipora' (1881) and 'Tabulate Corals' (1879) so differently, it will certainly be fair to quote his later writings, since they at the same time must contain his more mature views. Thus in the *Annals and Magazine of Natural History*, February, 1884, he writes, "The earlier observers of these fossils, as, for example, Mr. Lonsdale, necessarily founded their names upon macroscopic characters principally, the method of investigation by means of thin sections being of recent origin; and they also gave, as a rule, extremely brief descriptions. Hence it is exceedingly difficult, in many cases, among the monticuliporoids, to be certain as to the precise forms to which the older names should be attached." Then he proceeds to an investigation of both external and internal characteristics, accompanying the same with figures, of which those illustrating internal features alone are of value. In the number for December, 1885, he and Foord discuss the genus *Fistulipora* on the basis of the new light cast upon it by an investigation of the internal structure. Again in May, 1886, they make use of this method when they say, "Having recently had the opportunity of making a microscopical examination of a very extensive series of these forms, we have satisfied ourselves that they cannot be referred to the genus *Chætetes*, Fisher." And they propose the new genus *Rhaphidopora*. The plates 15, 16, and 17, accompanying this article, do not leave any doubt as to the position taken by these authors. The same is true of an article published by Nicholson and Etheridge in the same journal (March, 1886), where indeed they go so far as to separate *Stenopora australis* from *S. ovata*, with which "the specimens in question agreed entirely in external form and in macroscopic characters," solely on the basis of distinct internal features.

I cannot do better to express the opinions which actuate the new school of students than to quote from a letter from Prof. Archibald Geikie: "The common-sense view of such questions seems to me to be this. In dealing with fossils we are precluded in a vast number of cases from appealing to the evidence of internal structure, for it has not been preserved. Hence, if an organism can be satisfactorily determined from external characters, that is the most desirable means of identification, for it is the most generally applicable. If external characters are proved to be insufficient, and even misleading, we must fall back on internal structure when we can get it." Now, the new school believe that external characters often are misleading, where internal characters may more safely be followed. Since any *Bryozoa*, to be determined even according to the old method, must have the minute external structure well shown, and since in these cases the minute internal structure is also usually well preserved, we believe that the new method is eminently practicable. Nobody denies that external characters may be of great additional assistance.

AUG. F. FOERSTE.

Cambridge, Mass., Dec. 29.

Weather-Predicting.

IT has become a well-worn adage that half of the disputes would be avoided if the disputants had a thorough mutual understanding of the terms used by each. In weather predictions and verifications a clear understanding of the meaning of the terms used certainly seems very necessary. If a weather-predictor concludes that a satisfactory definition of a fair day is one on which less than .01 of an inch of rain falls, and a foul day is one on which more than .01 of an inch falls, and makes predictions accordingly, his predictions, when verified by this rule, will give a certain success in proportion to his skill. If, now, some one should object to cloudy days without rain being called fair, and record all cloudy days for which fair weather had been predicted as failures, he would give the predictions a much lower percentage of success