## SCIENCE.

FRIDAY, MAY 7, 1886.

## COMMENT AND CRITICISM.

THE STATEMENTS of the report and conclusions of Mr. Allison's commission, which have appeared in the public prints, and were partially reproduced in our last number, we learn, on good authority, to be premature in several respects. The fact is, that the commission has not finally formulated either a bill or a report, and may not do so for a week or more. What it has done is to vote on certain general conclusions; to direct its members to draw up reports expressing the views of the commission, or those of the individual members, on points in which they were a minority: to authorize the members to introduce bills expressing their individual views; and to remove the seal of secrecy from the proceedings. In reaching general conclusions, the commission, by a vote of four to two, decided to make no change in the coast survey, and it is not even believed that any legislation defining its work will be formally recommended. The members are unanimously of opinion that the policy of the signal office should be moulded with a view of erecting it, at no distant day, into a civil bureau, but on the question of making the change immediately they are equally divided. They are opposed to the school of instruction at Fort Myer, as now conducted, and, it is said, to what is known as the study-room in Washington. In the matter of the geological survey, they are of opinion that its operations should be restricted by law in the direction indicated by Mr. Herbert's bill, mentioned in our last number, but are not yet agreed upon all details.

All parties will agree that this is a very lame conclusion of two years of such careful investigation as has been bestowed upon this subject by the commission. The only parties that can be pleased are those who, knowing how broad and easy is the road to bad legislation, and how narrow the path to that which is good, will be grateful that more harm has not been done. The most curious feature of the conclusion is, that the complaints which gave rise to the investigation appear

to have been only lost sight of; and the only organization which comes in for serious condemnation is one against the integrity of which no charge has ever been made, except to be refuted. It is now conceded by all disinterested parties, including the members of the commission, that the geological survey has been conducted with the highest ability and integrity, and in accordance with the laws making the appropriations for its support. The ground of complaint is, that it has undertaken too wide a range of geological and allied investigation, not pertaining to its proper functions; that it has secured political support by employing a large body of scientific men scattered over the country in these investigations, and has put the government to great expense in printing the results of such work. Paleontological research seems to have come in for the largest share of condemnation; mainly, we suppose, on the authority of Professor Agassiz, who claims that such research is not a proper function of public geological survey.

On the merits of so broad a question as this, including innumerable details within its scope, it would be unwise to pass a summary judgment. The views expressed in Mr. Herbert's report form, however, a legitimate subject of examination. If correctly reported in the public prints, they are not characterized by judicial impartiality and fairness of statement. For example: he gives what professes to be an exhibit of the cost of the geological surveys in nearly a dozen different countries, so widely separated as Canada, Japan. and Victoria, without any statement of the considerations which determine their selection, and finds that the aggregated cost does not exceed that of our own geological survey. But he gives no definition of the objects and limitations of these various surveys with a view of determining to what extent they are identical with our own. We believe, that, as a matter of fact, the geological survey of England has been completed for some time, and that the work now done, on the small cost of which Mr. Herbert lays stress, is not properly a survey at all. An advocate of the other side might with equal fairness have taken the cost of all the surveys now in progress in

England, and shown that that country alone appropriates twice as much for its surveys as we do. Again, a list is given of some seventy persons having other employments; most of them being college professors, who have been employed by the geological survey. The report fails to state that this list is in no way a list of employees, but a complete list of persons who at some past time have received one or more payments from the survey, for some special service rendered, without being in any way permanently connected with it or salaried by it. It is clear that a final conclusion cannot be drawn from statements like this until the other side is heard.

IN THE JANUARY NUMBER of the Nineteenth century, Mr. Frederic Harrison published an article on the practice, now so common, of spelling foreign and ancient names as they are spelled in the original tongues, even in cases where an anglicized form of the name has been long in use. He spoke particularly of the re-writing of familiar Greek names in conformity with the original spelling, and also of the names of persons and places in the earliest history of England. This practice he characterizes as 'a pedantic nuisance,' and makes some very good points against it. He remarks that "'Alfred,' 'Edward,' and 'Edgar' are names which for a thousand years have filled English homes and English poetry and prose. re-write these names is to break the tradition of history and literature at once;" and he speaks in the same way of the re-writing of familiar Greek names. He also asks where the practice is going to stop, and thinks "we shall soon be invited to call 'Moses,' 'Môsheh,' as his contemporaries did; 'Judah' should be written Yehûda;' 'Jacob' will be 'Ya'aqób;' and 'Jesus' will be 'Jehoshua.' In short, Mr. Harrison condemns the practice in unqualified terms, on the ground that it violates the established usage of English literature without conferring any compensatory benefits.

To this article of Mr. Harrison's, Mr. E. A. Freeman has replied in the April number of the Contemporary review. Mr. Harrison had spoken of Mr. Freeman as one of the worst offenders in the matter in question, and the historian's reply is little else than a personal vindication of himself. Viewed in this light, his article is more or less successful, and he convicts his opponent of

some mistakes and inaccuracies. But, as a defence of the practice that Mr. Harrison condemns, we are obliged to say that Mr. Freeman's reply is Indeed, he doesn't argue the unsatisfactory. main question at all, but treats the matter as little more than a personal affair between himself and Mr. Harrison. This is disappointing; for the question involved is one that greatly needs a final settlement, and such a settlement can only be reached on some ground of principle. The question is, whether we are to write all foreign names as they are written in the original languages; and. if not, then what ones we are to write in that way, and what ones are to be anglicized. Mr. Harrison shows that the writers he criticises are not at all consistent with themselves; and Mr. Freeman virtually admits that his own practice is not consistent, and that he doesn't follow any general rule. He says that he writes 'Aelfred' and 'Eadward' because he finds these names so written in the ancient authorities: but, nevertheless, he writes 'Rochester' and 'Canterbury,' although the old forms of these names are 'Hrofesceaster' and 'Cantwarabyrig.' He says, too, that he writes 'Buonaparte,' pronouncing the word in four syllables, for the reason that he learned to do so in his childhood, which strikes us as no reason at all. We hoped, when we took up Mr. Freeman's article, to find him laying down some definite rule or principle which might serve as a guide to all writers in this perplexing matter; and we are disappointed at finding that he does not even attempt to do so.

STORIES OF THE OCCURRENCE OF PETRIFIED FLESH. or of frogs and toads enclosed in solid rock, and other fables of the same nature, frequently appear in the daily and weekly papers. One not dissimilar, though vastly more absurd, of the finding of two living bats embedded in a solid lump of bituminous coal, from a coal-mine in Maryland, is now going the rounds, and will probably not rest till the press from Maine to California has given publication to it. There was said to have been no crevice admitting the entrance of these wonderful bats, and that there was a clearly formed impression left by them. The inference, no, the only 'conclusion,' is, that these hoary chiropterans are living remnants of the coal-forming age. It was not long ago that just such a story was told of an ancient toad in another coal-mine, only this time the carboniferous. batrachian had become, as was naturally expected, very much desiccated. It is very strange with what persistence such myths and fables retain their hold on popular credence. Men of high intelligence will aver their belief in petrified human bodies, and we have known a shrewd business-man to exhibit what he firmly believed was a large mass of fossil buffalo flesh, sinews, muscles, blood and all. What more natural thing could there be than the finding of a toad or bat, dead, hibernating or active, in the crevices of a coal-mine? and yet, doubtless, to one wholly unacquainted with geological and zoölogical principles, a carboniferous fossil fish or living bat seems equally inexplicable and wonderful. Such fanciful flights of imagination might pass unnoticed, were they not so industriously circulated in the columns of even the highest class of metropolitan newspapers.

## THE COAST SURVEY AND THE NAVY.

THE latest argument for the transfer of the coast survey to the navy department is embodied in a paper by Lieutenant Dyer, U.S. N., recently published in the Proceedings of the U.S. naval institute. A very slight examination of this production shows that the author travels over an easy and well-trodden path instead of grappling with the real difficulties of the question. Nothing is easier than to demonstrate to the satisfaction of any writer who chooses to espouse the cause, that the coast survey ought to be turned over to the navy department. If nothing more were necessary than a "Be it enacted, etc., that the hydrographic work of the coast survey shall be transferred to the navy department," the problem would be a very simple one. It is to this simple form of it that all the arguments heretofore brought forward by the navy department have been directed.

Fault can be found with every system of public administration; and the thought, "How much better we could manage things if congress would put us in charge of them!" will be prevalent so long as human nature remains as it is. The real difficulties of the question begin when we attempt to decide just what work, what records, and what appliances shall be transferred to the navy department, and how the navy department shall utilize the appliances and carry on the work. One difficulty met with at the very start is found in that custom of the naval service which requires

that almost every officer, certainly every young and energetic officer, shall change his duty at the end of every three years. Howsoever well a cadet at Annapolis may be trained in the theory of marine surveying, he cannot possibly acquire at the academy that experience in practical work of any kind which is necessary to its effective prosecution. His first year, perhaps his first two years, in the work of the survey, would be very largely taken up in learning how to do it, so that he would hardly have become an expert before he must leave to keep watch on board a ship of war. Of course, we refer here to the more difficult and technical work of chart-construction, and not to such matters as running a line of soundings. It would therefore be a necessity of the service that a permanent corps of skilled map-makers should be organized, or that a part of the existing corps should be transferred. Even then it would be contrary to naval custom to allow these civilian assistants to hold any other than subordinate positions; and all branches of the direction, from the head of the office down, would be intrusted to men who were continually changing.

This is a consideration which would have to be kept in view in deciding what work should be transferred. One important function of the survey is the study of the effect of tidal and other action upon harbors. We all know that most of our harbors are in a continual state of change; and the study of the causes of such changes can be effectively prosecuted only by experts who make it a considerable part of the business of their lives. Can the navy be relied upon to furnish such experts? Tidal observations at numerous points along the coast form an essential part of the work. Will they be effectively kept up under the continual changes of naval administration? Can the records of the coast survey which pertain to hydrography be separated from the others and transferred to another department without any inconvenience? If not, can the navy department get along without them, and not waste labor in repeating work already done? Can a portion of the draughtsmen and engravers be transferred, or must new men be employed in their places?

We suggest these questions, not claiming that their solution presents insurmountable difficulties, but only as showing where discussions should be directed in order to be effective. Such general considerations as Secretary Chandler and the naval officers have presented on the subject may be very