strikingly exemplified in the case of a recent pamphlet containing 'a few facts about carpets;' but the result is the more interesting, since in this one example the analogies of the various stages of percolation are clearly seen. The writer starts with his pure *spiritus vini Gallici*, good in itself, but capable of being considerably changed by the maceration of improper substances. This alcohol is the fact, capable of scientific demonstration, that moths destroy carpets. Thus he runs on: "Moths. — Many are not aware that all the present damage is done when the millers commence to fly, as their very presence indicates the absence of the worm. It is to prevent the miller's incubating, that precautions should be taken." The alcohol with the next step begins to be discolored in the following manner, though to a slight extent: "A large proportion of the millers never hatch eggs, but die without causing any harm." We will let it soak awhile, and then this result is found: "The male miller, which does not fly, but runs very rapidly, is easily detected by his triangular-shaped figure; but, keeping himself out of sight, he is not so easily found."

Dropping our simile for the moment, we wish to call attention to a peculiar and reprehensible bit of wickedness of the 'males' in hiding from their lawful 'better halves;' for, so our author says, "his hiding explains the devious flights of the female in his search." Give ear now, good housewife, and recollect, that, besides protecting your carpets, you are avenging a great slight upon your sex — a slight which brings about a perpetual leap-year — by following out to its fullest extent the suggestion embraced in the following sentence, which, to return to our simile, renders our percolate still darker: "The killing of one male is equal to the extinction of many ordinary millers." Our alcohol is now almost saturated. Let us draw the stopper from the percolator, and allow the fluid to run out. It appears as follows: "The male miller is commonly known by the name of 'silver-fish.'" The process is complete; we have obtained our percolate; by degeneration our moth has evolved a thysanure. Our alcohol is spoiled: what shall we do with it?

A newspaper rumor from Washington, printed in the Boston *Advertiser* last Monday, to the effect, that, in consequence of a charge of extravagance in the conduct of the U. S. geological survey, Professor Shaler of Cambridge was 'talked of to succeed Major Powell,' brought out an immediate rejoinder from the former on the following day, defending the survey from a charge so injurious and so untrue. "It is my firm belief," says Mr. Shaler, "that no one of the scientific departments of the government has been so well and economically managed as the geological survey since it came under the able direction of Major Powell." The same conclusion will be reached by any one who gives the subject any proper attention, or who is acquainted with the character and methods of the able chief of this survey. A change made on such a charge, without honest and open investigation, would be iniquitous: after such investigation, there could be no doubt of the result.

LETTERS TO THE EDITOR.

*** Correspondents are requested to be as brief as possible. The writer's name is in all cases required as proof of good faith.*

Solar eclipse of March 16.

The solar eclipse was very successfully observed here to-day, under good atmospheric conditions. Cumulus clouds were scattered here and there about the sky, but fortunately they did not obscure the sun at any critical moment.

The photographic apparatus was in perfect working-order, and about fifty pictures of the eclipse were secured, with the assistance of Mr. J. L. Lovell. All of these developed well; and the exposures were so distributed with reference to the times of the two contacts, and to the occultation of solar spots, that they may be expected to give good results for the relative positions of the centres of the sun and moon.

The last contact was also observed optically by Professor Esty, Mr. B. Rush Rhees, Mr. Thomas C. Esty, and myself, the results all agreeing within seven seconds. David P. Todd.

Lawrence observatory, Amherst, Mass., March 16.

Hereditary abnormality of sense-organs.

Dr. Mason's note on 'Hereditary malformation' (*Science*, v. 1885, 189) reminds me of a case in which inherited abnormality of sensitiveness in sense-organs is of opposite signs.

The father (D. A. of Independence, Io.) has unusually acute hearing. The degree of acuteness cannot well be expressed in terms of normal audition: but it will suffice to say that he distinguishes voices, whispers, and other sounds at considerably beyond the ordinary range; that he frequently hears sounds inaudible to his companions; and that he perceives, discriminates, and comprehends faint sounds with great facility. His wife's audition was normal, and that of the progeny is variable. Expressing normal audition by N, and arbitrarily evaluating acuteness above and below this standard, the status of the family, including consorts (indicated by italics), is about as follows: —

FIRST GENERATION.	SECOND GENERATION.	THIRD GENERATION.
D. A. 65—N+2 *Mrs. L. S. A.* (deceased) —N	*G. W.* 45—N	
	Mrs. M. A. W. 42—N	(5 children, all —N)
	J. A. 40—N+1	
	Mrs. M. D. A. 38—N	(7 children, all —N)
	G. M. 42—N—1	
	Mrs. J. A. M. 37—N—3	Miss E. M. 11—N+1
		J. M. 9—N
		Miss B. M. 7—N
	Miss M. A. 32—N+3	
	D. H. A. 30—N—3	
	T. A. 28—N—3	

The partially deaf members do not perceive the ordinary voice, but follow conversation readily if the voice be raised as high, say, as that of an out-door speaker.

It is noteworthy that none of the family were born deaf, but that sensitiveness of the auditory apparatus diminished during youth, either progressively or by stages coinciding with slight catarrhal attacks or other physiologic disturbances. The grandchildren born thus, scarcely reached the age at which deafness began to appear in the second generation.

W. J. MCGEE.

Washington, D.C., March 11.

Preservation of jelly-fishes at the Naples zoölogical stations.

Zoölogists are to be congratulated upon the success which has at last attended the efforts of Signore Lo Bianco, the skilful conservator of the zoölogical station in Naples, towards the preservation of Siphonophorae. So extremely delicate are these complicated organisms as to have rendered futile all efforts hitherto made for their preservation; and students have been compelled to have recourse to drawings or models for the study of their structure in the absence of living specimens. The least carelessness on the part of the collector, results, as a rule, in the loss of many of the slightly attached parts; and if, perchance, the animals are brought in safety to the laboratory, they are available for study only during a very brief period. For over eight years Signore Lo Bianco has carried on experiments, attended with the greatest patience and skill and no small pecuniary outlay, only to meet with the fate which has ever attended attempts at their preservation, — to see them fall into a hundred pieces. Every working zoölogist can therefore readily imagine the satisfaction following the discovery of a method through which every museum may now place upon its shelves specimens of Mediterranean Siphonophorae retaining all the beauty and transparency of living specimens, — a privilege of which the directors of the various European museums are by no means slow in availing themselves, a large number of orders having already been received at the station for complete sets. Henceforth students of inland laboratories can study these interesting animals as satisfactorily as those at seaside laboratories, specimens being furnished, if desired, prepared especially for histological purposes. At no other place in the world has the art of preserving marine animals attained such perfection as in the Naples station, and at no other place is it possible. Owing to the large corps of skilled collectors, and to the rich fauna of the Gulf of Naples, material is constantly on hand for experimentation, and is manipulated by experts, who are instructed to spare no time or expense in the search for methods which shall retain the animals in their natural expanded conditions, and, if possible, with the brilliant colors of living specimens. A most interesting example is that of Corallium rubrum; the precious coral in which all the minute polyps are seen, with their tentacles fully expanded, furnishing a much more instructive object than the bits of dried twigs ordinarily to be seen in collections. Of the Siphonophorae, the most difficult of preservation were Forskalia contorta, Apolemia uvaria, Agalma Sarsii, Halistemma rubrum, Physophora hydrostatica, and Praya diphyes. These, besides many others, may now be obtained at prices which barely cover the cost of preparation, varying according to size, rarity, and process required, from one to thirty francs. The last two forms, owing to their habits, are not always on hand, appearing one day in hundreds, months elapsing before the collector again meets with them. American institutions have thus far been much behind those of Great Britain and the continent in taking advantage of the unparalleled facilities afforded by the Naples zoölogical station; Williams college and the University of Pennsylvania being the only ones which have taken tables and sent representatives, the latter being the only one represented at present. Several Americans have been able to occupy tables for short periods through the courtesy of German universities; but it would be much more creditable to America were her zoölogists able to meet with similar encouragement from home institutions.

C. S. DOLLEY.

Naples, Feb. 28.

Economy of fuel.

In your No. 103 of Jan. 23, 1885, under the heading 'Economy of fuel,' the coal-consumption of the steamship Oregon is stated at 16 tons per mile, which is equivalent to 48,000 tons for the Atlantic voyage! [Corrected, vol. v. p. 122.] I beg to request that you will publish, in correction of the above, the accompanying table, compiled from data furnished me through the courtesy of Mr. A. M. Underhill of the Guion line.

Name of steamer.	Tonnage.	Horse-power.	No. of boilers.	No. of furnaces.	Average speed of best trip from Sandy Hook to Queenstown, Ireland.	Fuel consumed per 24 hours, at 4½ tons per furnace.
					Knots.	Tons.
Arizona .	5,147	6,000	6	36	16.21	162
Alaska . .	6,932	11,000	9	54	17.44	243
Oregon . .	7,374	13,000	9	72	18.56	324

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