

sell read a very interesting article "On the Improvements that have been made in Steam Navigation," showing the beneficial effects resulting from the labours of a Committee of the British Association, in consequence of whose suggestions the best steamers now in the service are constructed on scientific principles, securing greater speed, and affording better accommodation.—Mr. W. P. Struve read a description of a "Low Pressure Atmospheric Railway," illustrated by a working model, twenty feet in length, which excited much interest.

Zoology and Botany.—President, Mr. L. W. Dilwyn.—The President drew attention to the recently-published volumes of the Ray Society: especially the monograph "On the British Medusæ," by Professor E. Forbes, and the great work of Messrs. Alder & Hancock, on the Nudibranchiata Mollusca. He also recommended to the attention of naturalists the new work by Mr. H. S. Strickland "On the History and Structure of the Extinct Bird, the Dodo."—Dr. Lankester read a Report from the Committee appointed for drawing up tables for the registration of periodical phenomena occurring in plants and animals. Proofs of the proposed tables were exhibited; in which arrangement was made for the registration of particular phenomena in animals and plants that had been named by the Committee in a former Report, printed in the Transactions for 1846. Lists of these animals and plants were subjoined. The phenomena to be observed were, the appearance and fall of the leaves, the flowering and ripening of the fruit of plants, and the opening and closing of their flowers; the appearance, disappearance, pairing, moulting, the deposition of eggs, and the birth of young, in animals. Members and others were invited to apply for tables for the purposes of registration; and, when filled up, to send them to the Assistant-General Secretary of the Association.—An essay by Professor Owen, "On the Development and Change of the Teeth in the Kangaroos; and on the Homologies and Notation of the Teeth in Mammalia," attracted much attention, and was received with great applause. The Professor proposes to substitute symbols and numbers for verbal definitions, and thus to save the student an immense amount of time and labour.—Several other valuable communications were read, which we have not room to notice.

We are sorry to learn that the funds of the Association are not in a prosperous state. In consequence, the grants for the year are on a very economical scale. This is much to be regretted. The object is truly national, and a liberal vote from the Public Revenue would be a legitimate and useful appropriation.

The next meeting will be held at Birmingham, in the month of September, 1849.

In preparing this Report we have been mainly indebted to the London *Athenæum*.

FIRE ANNIHILATOR.—The Fire Annihilator is a small machine of the size of a common pail, containing several iron encasements, and in the middle 7lbs of nitre, carbon, and gypsum, in the proportion of six, two, and two, and also one quart of water; at a touch of the finger on a small piston, charged with a small quantity of chlorate of potass and sugar, the compound is in a moment converted into steam, to an amount so enormous, that it equals the quantity produced by a five-horse steam-boiler, and is equivalent to a brigade fire-engine. The whole machine can be made for £1, of which the combustibles spent are worth only 14d.—*Builder*.

ORE OF IRON IN NOVA SCOTIA.—Almost every day brings to light some new example of the abundant mineral or other natural resources of Nova Scotia. Amongst the most prominent of these is iron, abounding as it does in either extremity of our Province. With remarkable aptness has it been said, that we possess an iron-bound coast! How this circumstance is to be turned to our advantage, the future only can decide. In the mean time, we are gratified to notice even the slightest efforts that are made for the development of the rich mines referred to.

We were yesterday favoured with a brilliant specimen of what is termed specular iron ore—from the vicinity of "Big Village River," Londonderry (which may be seen by the curious at this office), and are informed that an immense deposit of this mineral has recently been traced by Dr. Gesner, of Cornwallis, (now of Sackville,) along the Cobequid Mountain to the distance of ten miles. It is said that at several situations there are facilities for its mining, smelting, and manufacture. When we consider that this is the most useful of all metals, inasmuch as everything we possess is manufactured more or less by its means, we may well be solicitous that so wide a field of enterprise as it includes may be speedily opened up for Nova Scotia.—*Halifax Guardian*.

SALT WATER AND FRESH.—We have just had the pleasure of drinking a goblet of water taken from the sea at Margate, as sparkling and agreeable as if drawn from the best pump in London; indeed, it was impossible to tell the difference. The water had been previously distilled in the usual way, and then treated by the simple galvanic process, as patented by Mr. Crosse. The invention, for emigrant ships and others on long voyages, will be invaluable.—*The Emigrant*.