

The society of the Troglodytes was numerous, and hierarchically organised. There were several orders of dignitaries. The proofs of this organisation are to be found in the three stations of the last epoch—the Eyzies, Lower Laugerie, and the Madelaine. They are large pieces of deer-horn, carved artistically, and designated in general terms under the name of “batons of command.” These batons are numerous. Here are several, and you can see that they have a uniform type. Their whole surface is richly adorned with various drawings, representing animals or hunting scenes. They are less thick than wide, and the care that has been taken to diminish the thickness proves that they sought lightness rather than solidity. Then, again, the greater number, though not all, are pierced with large round holes, varying in number from one to four (see Figs. 19 and 20). The purpose of these very curious objects is still a disputed point, but most probably they were used as insignia. They indicate the sceptre, borne among the ancients, not only by the king, but by the chiefs of a less elevated rank. The dignity of marshal is to this day characterised by a baton. The batons of command are too numerous to allow of their being considered a sign of royalty. They are only signs of hierarchical distinction. The holes indicate the grade.

This superposition of grades or ranks, a sure sign of a numerous society, might doubtless be utilised in times of war, but it is very probable that it referred primarily to the appointment of hunting expeditions, for the chase was the essential element of public prosperity, and it was necessary to organise it systematically in order to secure food for the community.

Thanks to the organisation and administration of which we recognise the proofs, the society of Troglodytes, though numerous, lived in comfort. Food was sufficiently abundant to enable them to choose the best pieces, and reject those of an inferior quality. Thus, they despised the feet of animals, which nevertheless contain, in the bones and tendons, a remarkable quantity of alimentary matter. The destruction of dangerous animals had given security; the improvement in hunting had given abundance. It was no longer necessary for the entire tribe to devote their whole time, energy, and intelligence to the urgent necessities of daily life. They could rest occasionally. They could have leisure hours, and leisure, joined to intelligence, produces the arts.

(To be continued.)

NOTES

THE names of fifty-three candidates which, in pursuance of the Statute, were read out at the meeting on Thursday last, is a proof that the desire to enter the Royal Society does not abate. Out of this large number the Council will, in April, select fifteen whom they will recommend for election; and the names of these will, as usual, be made known at the meeting of the Society on the first Thursday in May. The selection ought not to be difficult, notwithstanding that in perusing the names we mark not a few instances of misplaced ambition, and indications that an obvious misunderstanding as to the qualification for membership exists on the part of the candidates. It must not be forgotten that the Royal Society is *not* a kind of superior College of Surgeons or Physicians or Preceptors; in fact, that something higher even than the art of healing or teaching must be looked for, namely, research, and the enlargement of the boundaries of knowledge. As in the majority of cases non-election is inevitable, it is as well that the number should be large: disappointment is, thereby, reduced to a minimum. But here is the list, and our readers may judge for themselves. The election day is fixed for June 12. W. Aitken, M.D.; Sir Alexander Armstrong, K.C.B., M.D.; R. Stawell Ball, LL.D.; Rev. A. Barry, D.D., D.C.L.;

E. Middleton Barry, R.A.; J. Beddoe, B.A., M.D.; I. Lowthian Bell; G. Bishop, F.R.A.S.; F. J. Bramwell, C.E.; W. Lawry Buller, Sc.D.; Capt. E. Kilwick Calver, R.N.; A. Carte, M.A., M.D.; W. Chimmo, Commander R.N.; H. Davies, M.D.; Henry Dircks; R. L. J. Ellery, F.R.A.S.; J. Fayer, M.D.; P. Le Neve Foster M.A.; T. Minchin Goodeve, M.A.; L. D. Brodie Gordon, C.E.; Lt.-Col. J. A. Grant, C.B.; J. Eliot Howard; Rev. A. Hume, LL.D.; Edmund C. Johnson, F.R.C.S.; Lord Lindsay, F.R.A.S.; Clements R. Markham, C.B.; W. Mayes, Staff-Commander R.N.; E. J. Mills, D.Sc.; R. Stirling Newall, F.R.A.S.; G. E. Paget, M.D., D.C.L.; F. Polkinghorne Pascoe, F.L.S.; O. Pemberton, M.R.C.S.; Rev. S. J. Perry; J. A. Phillips, F.G.S.; W. O. Priestley, M.D.; C. B. Radcliffe, M.D.; A. Rattray, M.D., R.N.; E. J. Reed, C.B.; W. Chandler Roberts, F.C.S.; G. W. Royston-Pigott, M.A., M.D.; W. Westcott Rundell; Osbert Salvin, M.A.; Major-General H. Y. Darracott Scott, R.E., C.B.; J. Spiller, F.C.S.; Hon. J. W. Strutt; G. J. Symons, F.M.S.; Sir Henry Thompson, F.R.C.S.; E. T. Truman, M.R.C.S.; F. H. Wenham; Capt. C. W. Wilson, R.N.; H. Woodward, F.G.S.; Lieut.-Col. A. H. P. Stuart Wortley; J. Young, F.C.S.

M. BERTHELOT, the eminent chemist, has been elected a member of the French Academy.

THE reports of the Hunterian Lectures which appear in NATURE are not written by Prof. Flower.

THE Belgian Academy announces the following as subjects for prizes to be awarded in 1874:—1. To perfect in some important point, either in its principles or its applications, the theory of the functions of an imaginary variable. 2. A complete discussion of the temperature of space, based upon experiments, observations, and the calculus, stating the grounds for the choice made between the various temperatures which have been attributed to it. 3. A complete study, theoretic and, if necessary, experimental of the specific absolute heat of simple and compound bodies. 4. New experiments upon uric acid and its derivatives, principally in relation to their chemical structure and their synthesis. 5. (a.) A succinct critical *résumé* of existing observations of the *Mucedinea*. (b.) The exact determination—applied to only a single species—of the part which is due, first, to the essential nature of the vegetable (its specific energy), and next to the external conditions of its development. (c.) A positive proof, or a satisfactory disproof, of the statement that the fungi of fermentation in certain circumstances, can be transformed into fungi of a higher class. 6. A paper on the Plutonic rocks, or those that are considered such, of Belgium and the French Ardennes, especially in relation to their composition. The prizes for Nos. 1, 4, and 5 will be a gold medal of the value of 600 francs; for No. 6, one of the value of 800 francs; and for No. 3, a medal worth 1,000 francs. The manuscripts, which may be in either French, Flemish, or Latin, must be sent to M. Ad. Quetelet, perpetual secretary, before August 1, 1874.

WE understand that Mr. F. J. M. Page, B.Sc., Assoc. R.S.M., F.C.S., has been appointed chemical assistant to the Brown Institution, under Dr. Burdon Sanderson. It is with much pleasure that we announce this, as it argues well for the attention which will be paid to physiological chemistry, a subject which of late years has received comparatively little attention in England.

AN examination for a Natural Science Scholarship for 60*l.* per annum will be held at Gonville and Caius College, Cambridge, on April 3 and 4. The subjects:—chemistry and experimental physics, zoology with comparative anatomy and physiology, botany with vegetable anatomy and physiology. The Scholarship is tenable for two years, but the tenure may be prolonged for another year if the Scholar sufficiently distinguish

himself in the annual College examinations. No person will be eligible who has commenced residence in the University, and the successful candidate will be required to enter his name at the College forthwith, and begin residence in October next. For further particulars apply to Dr. Drosier, Gonville and Caius College.

WE have received from the Science and Art Department a thick pamphlet containing the prospectus of Sir Joseph Whitworth's Scholarships for mechanical science. These Scholarships are of the value of 100*l.* a year, and are tenable for three years, and the competition is open to all Her Majesty's subjects, at home, in India, and in the Colonies, who have not completed their 26th year, though we see that after the next examination (May 1873) the limit of age will be 22 years. Ten Scholarships will be competed for this year, at examinations which will be partly in practical workmanship, and partly in theoretical subjects. Those who desire detailed information, should procure a copy of the very full prospectus.

THE examiners for the Burdett-Coutts Scholarship, Prof. Phillips, Prof. Odling, and Mr. E. Chapman, M.A., have recommended to the trustees for election, Mr. Edward Cleminshaw, Postmaster of Merton College. The Scholarship was founded by Miss Burdett Coutts for the promotion of the study of geology and of natural science as bearing on geology. The Scholarship is tenable for two years. Mr. Cleminshaw was placed in the first class by the examiners in the Natural Science School in December last. He received his Scientific training in the Applied Sciences department of King's College, London.

MR. J. J. TAYLOR, of Giggleswick Grammar School, has been elected to the Junior Studentship in Natural Science at Christ Church, Oxford. This studentship is of the annual value of 100*l.* Mr. Taylor's scientific training has been under the direction of Dr. W. Marshall Watts, the Science Master of the School.

WE understand that Mr. Osbert Salvin, F.Z.S., is about to return to his old collecting quarters in Guatemala for a short period. Mr. Salvin's valuable contributions to the fauna and flora of Central America are well known, but we trust that he will still be able to add to his former discoveries, extensive as they have already been.

THE Russian Government has determined to send a scientific expedition with the military force to Khiva. It will leave in the course of the present month.

WE have received a copy of the syllabus of a course of lectures on botany to be delivered in the Royal College of Science, Stephen's Green, Dublin, by Prof. W. R. McNab. It differs from most other similar courses of lectures in its arrangement, being closely modelled after Sachs's "Lehrbuch." Commencing at once with the morphology of the cell, it proceeds then to the morphology of tissues and the external morphology of plants; then to the special morphology of the various groups of Thallophytes, Characeæ, Muscineæ, Vascular Cryptogams, and Phanerogams; and finally to physiology. Though, perhaps, erring on the side of two great minuteness for a short course of lectures, it is admirable in its comprehensiveness and scientific arrangement.

DR. DAVID MOORE, the Director of the Botanic Garden of the Royal Dublin Society at Glasnevin, has made a successful attempt to propagate the well-known parasite of the South of Europe, *Loranthus europæus*, on oak-trees in the gardens. This has frequently been attempted previously by horticulturists in this country and in Ireland, and Dr. Moore deserves great credit for the energy and perseverance with which he has carried his efforts to a successful issue. The common mistletoe, which is not a native of Ireland, has also been successfully introduced by Dr. Moore and others into that country, and is

now rapidly spreading; and in the Botanic Gardens *Lathraea squamaria* and two species of *Orobanchæ* have also been permanently established, and six species of *Cuscuta* or dodder more transitorily.

Two fine plants, both from Moreton Bay, are at present objects of interest at Kew. The tree of *Araucaria Bidwilli*, in the temperate house, has produced cones for the first time in Europe. It was one of the two original plants brought to this country in 1842 by Mr. Bidwill, the other having been purchased for 100 guineas by the Duke of Northumberland. The Kew tree is about 26 ft. high, and its branches cover a circumference of about 60 ft. The seeds are very important articles of food to the aboriginal inhabitants, and the property of the tribes in individual trees of the Bunya-bunya is the only possession they have, and is the commencement of a communal system amongst them. *Dendrobium Hillii* is the principal feature in the orchid house. The large mass in flower has as many as twenty pale yellow racemes, some being as much as 2 ft. in length.

THE Report of the Ashmolean Society for 1872 shows that a little more life has been infused into that society during the past year, though we think there is still considerable room for improvement, and hope that next year's report will be able to speak of a considerably greater amount of work of permanent value having been done. During the year 1872 the Society has held four General Meetings, at which the following communications have been received:—A paper "On House Temperatures," by Prof. Phillips; a note "On the Meteors of April 19, 1872," by Mr. Lucas; a paper "On the Breaks of Continuity in the Mean Daily Temperature in the months of April and May," by the Radcliffe Observer; a paper "On the Sulphur Compounds in Coal Gas, and the means of removing them," by Mr. A. G. Vernon Harcourt, F.R.S.; a paper "On the Flint implement-bearing beds of St. Acheul," by Mr. James Parker; a paper by Mr. Heathcote Wyndham "On the Recent Eruption of Vesuvius," illustrated by oil paintings of sketches made by the author on the spot.

MR. R. W. THOMSON, C.E., the inventor of the road steamer, and a man in many ways remarkable, died at Edinburgh on the 8th inst., in the 50th year of his age.

THE new strip of garden belonging to the Zoological Society on the north side of the Regent's Canal, is now being put into order. The bridge over the canal is already finished, and the new lodge opposite Primrose Hill only wants the entrance gates and turnstiles to make it complete. We understand that it will be open to the public on Easter Monday.

WE see from a leader in the *New York Tribune* of February 26, that the astounding number of almost 200,000 copies of the three cent reprint of Prof. Tyndall's lectures on light has already been sold, and that orders are still pouring in for them from all parts of the States. The *Tribune* also publishes a large number of letters from people throughout the States asking the letters to be sent them, and justly praising the enterprise of the paper in so energetically and wisely meeting a wide popular want. It reminds one of the demands occasionally seen on this side of the water for the last sensation novel or the latest news of the most recent poisoning case. Such a wide-spread taste for *Light* literature of the stamp purveyed by the *Tribune* to its multitudinous readers, is a healthy sign, and bodes well for the future of the country among whose people it exists.

WE have received a copy of a letter from Prof. Hayden, United States geologist, to his Government, asking a further appropriation of 100,000 dols. for the purpose of continuing the geological survey of the territories of the United States during the approaching season. His request is at once granted. For the coming season, the field of labour of the survey is to be

transferred to the eastern portion of the Rocky Mountain Range, in Colorado, and New Mexico.

GENERAL BANKS has introduced into the U. S. House of Representatives a resolution instructing the Secretary of the Navy to make an examination and survey of that section of the American isthmus which lies between Valencia Point and the Changenola River, on the Atlantic side, and the Boca Chica, the Rio Pedrigal, and the upper part of Golfo Dolce, on the Pacific side. This is to include an examination of the intervening country, of the two cordilleras, and exploration of the courses of the rivers from their outlets to their sources, within the above limits, for the purpose of ascertaining the possibility of such a connection as may be feasible for the construction of an inter-oceanic canal.

MISS HANNAH BRAKENBURY has, among other large legacies, left 12,500*l.* to the Owens College, Manchester, and 9,000*l.* to Durham University.

WE learn from the *Times of India* that Mr. Pogson, the Government Astronomer of Madras, has written a long letter to the local Government, suggesting that some special arrangements should be made for observations of the Transit of Venus in December 1874, in Northern India, independently of the Madras Observatory. The letter has been forwarded to the Government of India for consideration.

Les Mondes says that M. Calombel, Procureur-Général of Missions in China, after careful inquiry, gives it as his opinion that Shanghai is one of the most favourable spots for observing the forthcoming transit of Venus. The climate there is somewhat moist, but the month of December is in general very fine; and *Les Mondes* says that without doubt Shanghai will be the scene of M. Janssen's "third glorious campaign." Nankin is also a favourable station, but the inhabitants are not yet sufficiently accustomed to strangers, and the presence there of a scientific expedition might lead to a popular riot.

THE Chinese take a curious method to prevent their pigeons from being attacked by birds of prey while circling over the cities or moving from place to place. This consists in the employment of small, short cylinders of bamboo, arranged so as to form a whistle or reed pipe, in groups of three or four, or more. These are attached to the back of the bird, and so adjusted that as it flies through the air a very sharp sound is produced. Varying lengths of the bamboo give variety of tones to this instrument; and when a large number of birds are flying together in a single flock, as is very frequently the case, the sound produced by them is distinctly audible for a great distance. It is said that rapacious birds are effectively repelled by this precaution, so that the pigeons make their flights with perfect safety from one point to another. Varnish is used for coating these bamboo whistles to protect them from moisture. This practice is said to have been in vogue among the Chinese for a great many years.

THE temperature of February of this year has shown some very curious peculiarities, and a marked contrast to that of the earlier part of the winter, as may be seen from Mr. Glaisher's tables of observations at Blackheath, published weekly in the *Gardener's Chronicle*. While, during the whole of the three preceding months there were only twelve frosty nights, with the temperature of the twenty-four hours almost uniformly above the average of the last fifty years, the thermometer fell below the freezing point in eighteen nights in February, and the temperature was below the average on every day except two, the total depression for the month being 4°·3 Fahr. The records of very few winters will show so high a minimum as 25°·0 Fahr., the lowest temperature of the past winter at Blackheath, which occurred on February 24 and 25, the thermometer falling

below 30°·0 on only seventeen nights during the whole winter. Since March 2 the temperature has been again uniformly above the mean.

A VERY important extension of the work of the U.S. signal-office, as far as its system of weather telegraphy is concerned, is about to go into operation. It is proposed to call the post-offices of the country into requisition as intermediate agents for disseminating weather intelligence, for which purpose the territory east of the Mississippi has been divided into districts of about two hundred miles in extent each way, and each having a point of distribution near its centre, to which the "probabilities" will be telegraphed from Washington, and from which two copies of the report are to be sent to all post offices within the district which can be reached by mail as early as six o'clock P.M. each day. It is well known that country post-offices are the centres of intelligence to rural districts, and in order to afford the farmers in the community, especially, an opportunity of profiting by this information, postmasters receiving these despatches are to place a copy as soon as furnished in a conspicuous situation, where the public can see and read it.

Apropos of the correspondence going on in our columns on "Inherited Instinct," we take the following from the *Evening Standard* of March 8, though it would have been more satisfactory had the *Standard* named its authority for the statement:—During a recent gale the brig *Blue Jacket*, of West Hartlepool, from Rouen to Shields, was abandoned off Flamborough Head. The crew were taken off, but a cat was left on board. This cat had been given as a kitten to the captain twelve months ago by a lady named Mowbray, living at West Hartlepool, and had never been ashore since that time. On Wednesday last the cat made its appearance at Mrs. Mowbray's house, having swum ashore from the wreck, and travelled thence on foot. It was in a very emaciated condition.

DR. ELSNER, of Berlin, has found that iron is volatilisable at a temperature of at least 3000° centigrade. He experimented with a small piece at this heat, and on uncovering the crucible, distinguished small needles of crystallised iron, says *Les Mondes*.

WE are glad to note that *Ocean Highways* has been so successful that next month it is to be considerably increased in bulk, as also in price, the size of the page being at the same time, wisely, we think, somewhat reduced. It is to be hereafter published by Messrs. Trubner.

THE Japanese Government proposes to have an institution for the study of practical engineering, and have instructed their agents to procure a set of machinery and tools similar in all respects to that which the Crystal Palace Company last autumn constructed, for the purposes of their admirable school for practical engineering, under the supervision of Prof. Wilson, as Principal.

THE additions to the Zoological Society's Gardens during the last week include a puff adder (*Vipera arietans*), a horse-shoe snake (*Zamenis hippocrepis*), and a lactative snake (*Colopeltis lacertina*) from Morocco, presented by Sir John Drummond-Hay, K.C.B.; a Rose Hill parakeet (*Platyercus eximius*), from N. S. Wales, presented by Mrs. Hewett; two Moorish tortoises (*Testudo mauritanica*), and three Spanish terrapins (*Clemmys leprosa*), from Algeria, presented by Mr. E. C. Taylor; a crested porcupine (*Hyrrix cristata*), born in the gardens; a Malayan bear (*Ursus malayanus*), deposited; a pig-tailed monkey (*Macacus nemestrinus*), from Java; a white-cheeked monkey (*Cibus lunatus*), from Brazil; a talapoin monkey (*Cercopithecus talapoin*), and a pluto monkey (*C. pluto*), from West Africa; a Bonelli's eagle (*Aquila bonelli*), from Morocco; two canary finches (*Serinus canarius*), from the Canary Islands; and an Iceland falcon (*Falco islandus*); all purchased.

SCIENTIFIC SERIALS

THE *American Naturalist* for February, among others, contains an article by Dr. Gill on "The Limits of the Class of Fishes," in which he endeavours to modify their generally accepted classification by dividing them up into two classes and three sub-classes, of equal significance with the reptiles and birds. The names he proposes are (1) Pisces; (2) Marsipobranchii; and (3) Leptocardi, which sufficiently indicate the genera he includes in each class. Such an amount of division we think excessive, and it would undoubtedly necessitate the removal of the crocodiles from the reptilia, among other changes. Mr. A. S. Packard gives an account of one of the beaks of a cuttle-fish, probably *Architeuthis dux*, which is four and a half inches long; he also describes other colossal specimens. There is a paper by Prof. Jordan on the colours of vegetation, one by Dr. Abbott on the habits of certain crawfish, and another by Dr. Foster on the pottery of the mound-builders, which is fully illustrated.

THE Munich *Zeitschrift für Biologie*, Bd. 8, Heft 4, contains the following papers of purely medical interest: on the occurrence of enteric fever in the Bavarian army, by Dr. Port, with charts of the mortality in the different barracks and of the amount of subsoil water; on the present state of the cholera problem, by Prof. von Pettenkofer; and on the processes of decomposition which result from venesection, by Dr. J. Bauer.

Schriften der Naturforschenden Gesellschaft in Danzig, New Series, vol. 3, Part I. The first paper in this publication of the Danzig Society is a contribution to primitive German history by Dr. Lissaicer of Danzig, being a very careful and elaborate monograph on some skulls found at Meisterswalde and Krissau, a short distance from Danzig. The paper is accompanied by some capitally executed photographs of the skulls. The next paper is also a contribution to the history of the early inhabitants of Pomerania, being a description by Herr Kasiski of the numerous and varied contents of some of the ancient graves which abound in the district around the village of Persanzig, on the river Persante, a short distance west of Neustettin. The district abounds with material for the archaeologist. The paper is accompanied with numerous illustrations of the contents of the graves. The next paper is a long one by Dr. C. J. H. Lampe, of Danzig, on the Movement of Water in pipes, accompanied by some calculations as to the pressure and speed of the water in the pipes by which Danzig is now supplied with water from a considerable distance. This paper is also illustrated, as is also the last one, which is the fifth part of A. Menge's Catalogue of Prussian Spiders.

Der Zoologische Garten (Frankfurt a. M.), January 1873, contains an excellent article, with maps in illustration, of the geographical distribution of the Birds of Paradise, with which are included *Epimachus* and *Ptiloris*. There is also an article by Dr. H. Dörner on the tongue of the Ka-ka Parrot (*Nestor meridionalis*), in which he shows clearly that in structure it presents none of the characters of the *Trichoglossinae*, and in other points his results quite agree with those read before the Zoological Society of London in June last, although he, following Dr. Finsch, does not feel disposed to remove this parrot from among those with trichoglossal tongues, because of a supposed similarity in their beaks, which we find it difficult to appreciate, the Ka-ka's being black and ribbed, whilst that of *Lorius* is smooth and with an orange tint. There is not the least doubt that, now it has been doubly demonstrated that their tongues are not similarly constructed, there is not any good reason for associating the Nestors with the Lories.

SOCIETIES AND ACADEMIES

LONDON

Royal Society, March 6.—"On the Vapour-density of potassium."—Preliminary notice. By James Dewar and William Dittmar.

The results of their observations conclusively show that the density of potassium-vapour, as produced in the process described, cannot exceed 45 times that of hydrogen, and that therefore the molecule of potassium consists of two atoms (K_2).

"On New Sources of Ethyl- and Methyl-Aniline." By John Spiller, F.C.S.

"On a new genus of Amphipod Crustaceans. By Rudolph von Willemoes-Suhm, Ph.D., Naturalist to the *Challenger* exploring expedition.

In lat. $35^{\circ} 47'$, long. $8^{\circ} 23'$, off Cape St. Vincent, the trawl was sent down to a depth of 1090 fathoms on the 28th of January and brought up among other very interesting things a large, transparent Amphipod with enormous faceted eyes. The animal evidently hitherto unknown, will be the type of a new genus, having the following characters:—

THAUMOPS, nov. gen.

Caput oblongum, inflatum, oculis maximis superiorem capitis partem tegentibus. Segmenta thoracica 6, abdominalia 5. Antennarum in feminis par unum, maxillarum par unum, pedum paria duo minima maxillarum locum tenentia. Mandibulæ nullæ. Pedes thoracici 5, abdominalia 3 in quoque latere. Appendices caudales 4. Gangliorum pectoralium paria 5, abdominalium 3.

T. pellucida, n. sp.

Corpus longitudine 14 mm., latitudine 21 mm., pellucidum.

It could not be made out whether *T. pellucida* inhabits the deep sea, or whether it is, like *Phronima*, a pelagic animal, having been caught by the trawl only as the latter came up from the depth.

Geological Society, February 26.—Prof. Ramsay, F.R.S., vice-president, in the chair.—The following communications were read:—"On the Jurassic Rocks of Skye and Raasay," by Dr. James Bryce. In this paper the author described numerous sections of Jurassic rocks exposed chiefly in the sea-cliffs of Skye and Raasay, indicating the presence in those islands of a complete series of beds ascending from the Lower Lias to the middle of the Middle Oolite. He noticed the occurrence in these sections of fossils belonging to the zones of *Ammonites angulatus* and *A. Buchlandi* in the Lower Lias, to the zones of *A. Jamesoni*, *A. capricornus*, *A. margaritatus*, and *A. spinatus* in the Middle Lias, of Upper Lias fossils, including *Anmonites communis*, *falcifer*, *heterophyllus*, and *bifrons* and of others indicating beds belonging to the Inferior Oolite and Cornbrash, and to the Oxford Clay. The Loch Staffin beds were described as an estuarine series, nearly approaching the Oxford Clay in geological age, and including a bed almost entirely made up of shells of *Ostrea hebridica*. The whole series of Jurassic rocks in these islands reposes on the Torridon sandstone of Cambrian age; and the author discussed the question whether or not the intervening beds have ever existed in this locality, and came to the conclusion that they probably existed, and have been swept away by denudation. He remarked further upon the resemblance in lithological characters of the beds described with the corresponding deposits elsewhere in Britain. The traprocks intruded between the Jurassic deposits he regarded as of post-oolitic date.—"Observations on the more remarkable Boulders of the North-West of England and the Welsh Borders," by Mr. D. Mackintosh. In this paper the author described the situation and indicated the probable origin of many of the more striking known boulders in Westmoreland, Cumberland, Lancashire, Cheshire, and on the borders of Wales. The northern boulders seem to have originated chiefly from Westdale Crag, Criffel, Ennerdale, and Eskdale; those of Cheshire chiefly from the Lake District and South of Scotland; and many of those on the Welsh borders from the mountains of Wales. Many of the boulders noticed by the author exhibit glacial striae. The author also especially referred to the occurrence of boulders at high levels.

Linnæan Society, March 6.—Mr. Bentham made some observations on the homology of the perigynium or utricle of the female flowers of *Carex* and *Uncina*, with a view to calling to the disputed points in question the attention of botanists used to microscopical investigation, who may have the opportunity of examining living specimens in the earliest stages of flowering. Two principal explanations of the homology of the perigynium of *Carex* have been given. Brown, relying upon its being composed of two squamæ, considered that it represents a perianth, and Payer and Schleiden have adopted the same view, after an examination of its appearance at a very early stage. Kunth, on the contrary, believed it to be formed of a single scale, and to be an ordinary glume subtending the female flower on a secondary axis, of which the seta of many species of *Carex*, and of