

purchase has now been completed. For the present, the Institution will use the top two floors of the new house for storage of books and apparatus, releasing valuable accommodation elsewhere for other purposes. It is proposed to let the lower floors, and to devote any income obtained to research purposes. Eventually, as the research activities are enlarged, it may prove necessary to occupy a larger part of the house.

Royal Institution: Reconstruction of the Library

ABOUT April last it was noticed that a sinking had occurred of the ceiling of the Library on the first floor at the Royal Institution, and of the floor of Sir William Bragg's rooms immediately above. The ceiling, which was old and of timber construction, was found to be defective. It was temporarily propped, and at the end of the lecture season a thorough examination was made. An astonishing state of disrepair was discovered. Not only was the heavy timber ceiling defective, but also the brick walls upon which it was supported were cracked and broken in all directions. The examination was carried down to the rooms on the ground floor and here a similar state of affairs was revealed. When in 1799 the Royal Institution was founded, a large town house was purchased and considerably altered to suit its new purpose. Further alterations have been made at intervals. Vulliamy added the Corinthian column front in 1837. In 1930 a large part of the building, including the lecture theatre, was completely reconstructed, but the Library and rooms below it were left untouched. These it has now proved necessary to rebuild, largely, it must be said, due to faulty workmanship in the past, as the various alterations to the structure have been made.

THE reconstruction is now in progress. The defective brickwork of the walls is being replaced, including that of the front wall, which is being worked at from the inside, so that the elevation to Albemarle Street will remain untouched. New fire-resisting floors are to be supported on a steel structure, which is being erected within the walls. The steelwork, the foundations for which are being carried to basement level, will also serve to strengthen the rebuilt walls. When completed, the rooms on the first and second floors will appear much as they were before, but advantage is being taken of the alterations to construct a large new research laboratory in the basement. The work is expected to be completed about April next, and it is understood that it will cost about £12,000.

November Floods

THE past week or so has been characterised by rains and floods of exceptional severity, extending over a widespread area in western Europe, including the Rhone Valley, the Riviera, parts of Switzerland and of Great Britain. At Avignon, in the south of France, a large section of the town was inundated in places to depths of so much as six feet, and the famous Pont d'Avignon has been seriously damaged. At Nîmes, the Rhone reached the record height of

26 feet, and about 125 square miles of the valley were submerged. As an unfortunate consequence of so disastrous a visitation, there has been much distress and several deaths among the inhabitants of Provence and Languedoc. One village, Aurlot, near Marseilles, has been almost destroyed, whilst in various districts, thousands of people have been rendered homeless. Damage has also been reported from Fréjus and Hyères. In Switzerland, wide areas near Geneva have been under two feet of water, and it is stated that no such floods have been recorded since so far back as 1890. The rainfall was particularly persistent and lasted without intermission for sixty hours.

IN Great Britain, inundations of considerable tracts have followed locally unprecedented rainfalls for November, the first seventeen days of the month having yielded about twice the amount of rain normally experienced at a number of places in the south of England. Flooded districts are reported from Swanage in Dorset and many parts of Kent and Sussex, while in the Midlands, the River Trent has overflowed its banks. The Thames valley has also been seriously affected. Presiding at the meeting of the Thames Conservancy Board on November 18, Lord Desborough, the chairman, said that the state of the river was causing some anxiety. The flow was exceeding the 'root figure' (when the river is flowing bank high) by a thousand million gallons daily. The 'root figure' for the discharge of the river is 4,500 million gallons a day measured at Teddington; the comparable November average is 1,486 million gallons a day. The rainfall in the Thames Catchment Area had been quite exceptional for the time of the year. In September, there was a rainfall of 4.59 inches; in October, 4.09 inches and for 17 days of November, 4.11 inches. The total for two and a half months was 12.79 inches. Looking back over previous records, Lord Desborough said he had not been able to trace a similar case. The unexpected and catastrophic occurrence of such floods serves to emphasise the importance of the national inland water survey, so repeatedly advocated in NATURE, and now in the hands of a committee of the Ministry of Health, appointed nearly a year ago, under the chairmanship of Sir Henry Lyons. It is obvious that only by accurate and reliable records of floods can adequate precautionary measures be devised and undertaken so as to remove a serious menace to life and property.

Brauner Memorial Lecture

FROM the time of the founding of the University at Prague in 1347 by Charles IV, Bohemia has been an important centre of learning. Komenský, Purkyně and Mendel all attained fame beyond the frontiers of their country, but the first Czech chemist to gain world-wide recognition was Prof. Bohuslav Brauner, who died on February 14 of this year. He had been a student at Manchester under Sir Henry Roscoe in the 'eighties, and whilst in England began some of his famous researches on the rare earths. He came to acquire an international reputation also by his advocacy of Mendeléeff's Periodic Law, to the

substantiation of which he directed his investigations, especially his redeterminations of atomic weights. He was elected an honorary and foreign fellow of the Chemical Society soon after the Great War, and the Society's Brauner Memorial Lecture was delivered by Dr. S. I. Levy on November 14. Dr. Levy has himself contributed to our knowledge of the rare earth elements and he was able to give a very lucid account of the way in which these very similar and difficultly separable bodies were isolated and identified as pure substances. Brauner's share in this work was very great, and is all the more noteworthy since it was very largely performed in adverse circumstances, for it was not until 1903 that the chemical institute of the Charles University of Prague was erected, largely as a result of Brauner's insistent pleas.

FROM his exhaustive researches, which led, among other things, to the fractionation of didymium into praseodymium, neodymium and samarium, Brauner came to the conclusion that the rare earth elements from lanthanum to lutecium should be placed together in the Periodic Table. Brauner's other contributions to chemistry include his work upon the compounds of cerium and tellurium, concerning the homogeneity of which he was for a long while doubtful. It is interesting to note that some of his atomic weight determinations, even those of forty years ago, remain the accepted standards even to-day. It has perhaps never been generally realised how great his contributions were to the fundamentals of inorganic chemistry. Few of Brauner's original British friends remain. They include Mr. W. Macnab, who came to move the vote of thanks to Dr. Levy, and who recalled how Brauner's fine physique and unconventional, friendly manner always attracted admiration. Reference was made by Dr. G. Druce in seconding the vote of thanks to Brauner's interest in the transcription of Russian names into English, concerning which he had written several times in *NATURE*, and to the rapid progress in scientific research in many fields at Czechoslovak universities, largely as a result of Brauner's inspiring influence and example.

Anatomy Department of St. Thomas's Hospital

IMPORTANT alterations and additions to the Anatomy Department of St. Thomas's Hospital Medical School, London, have just been completed, and an "At Home" was held in the Department on November 14 when it was visited by representatives of the universities and of various London hospitals. Three new research laboratories and a large radiological laboratory, together with a director's room and an office, are housed in the new block. The dissecting-room has been completely renovated, and a new terrazzo floor has been laid. The museum has been equipped with special lighting arrangements for the exhibition of lantern-slides, X-ray negatives, bottled specimens and models. The X-ray equipment is of the latest pattern, and is completely shock-proof, and will serve not only for the instruction of students in all normal radiological appearances but also for research. An optical bench for photomicrography and for the reduction of X-ray negatives has

also been accommodated in the radiological laboratory, adjacent to which is a dark-room. The research laboratories are situated in the upper floor of the new block. They are magnificently lighted, and are furnished throughout with the most modern fittings. The visitors were afforded an opportunity of seeing some of the results of experiments which are being carried out in the Department in the use of the cinematograph for the teaching of anatomy. A composite film comprised portions of films showing respectively a dissection of the forearm, some examples of muscle-nerve paralyses, the surface anatomy of normal shoulder movements and a dissection illustrating the mechanism of the knee-joint. This Department is admirably fitted for the teaching of anatomy by modern methods, with emphasis on the study of living anatomy.

Sir James Walker and the University of Edinburgh

To commemorate the services of Sir James Walker, professor of chemistry at the University of Edinburgh from 1908 until 1928, to chemistry in general and to the Chemistry Department of the University of Edinburgh in particular, it is proposed to establish a fund for a Walker Memorial Lecture to be delivered annually by an eminent chemist invited to Edinburgh by the Edinburgh University Chemical Society for that purpose. Sir James Walker, who died in May of this year, was the leading exponent of physical chemistry in Great Britain for nearly fifty years. During the Great War he did valuable work in the manufacture of high explosives, and the new chemical laboratories which he designed and fitted up at Edinburgh are among the foremost, both in equipment and in research activity, in Great Britain. The Chemical Society of the University of Edinburgh enjoys the distinction of being the oldest chemical society in the world, since it has recently been established that it existed as far back as 1785 under the sponsorship of Joseph Black. It is felt that a yearly meeting at which the student members of this body may have the opportunity of making direct contact with the researches of distinguished investigators in chemistry from other universities will provide a most stimulating permanent memorial of the labours of Sir James Walker for the advancement of the science in Edinburgh and elsewhere. Former students of Sir James Walker and any others who may wish to assist in the project are invited to send contributions to Mr. J. E. Rocca, honorary secretary of the Edinburgh University Chemical Society, King's Buildings, West Mains Road, Edinburgh.

Memorial to Viscount Grey of Fallodon

LORD ARMSTRONG, president of the Natural History Society of Northumberland, Durham and Newcastle-upon-Tyne, has issued an appeal for subscriptions towards a permanent 'North Country' memorial to commemorate the life of Viscount Grey. It is proposed to place a tablet to the memory of the great statesman and bird-lover in the Hancock Museum and to found a trust fund, the income of which will be applied to the endowment of the Museum. This