CORRESPONDENCE

CHEMISTRY HOUSE

SIR,—It seems to be generally recognised that for the adequate discussion of almost every chemical problem it must be considered from many different standpoints. Evidence of this is afforded by the success which has attended the joint meetings of the various chemical societies. It becomes more and more difficult to follow the progress of any but the most limited field of chemical work, and this very limitation tends to stereotype our thoughts and prevent a fresh outlook on our problems. At a university or large university college the workers in the different departments have the great advantage of being brought into contact, but the isolated worker suffers greatly from the lack of this advantage. The realisation of the scheme of Chemistry House would provide some solution of this difficulty. At present we seem to be moving in a vicious circle; support is not forthcoming until a detailed scheme is set forth, and a detailed scheme cannot be put forward until the extent of the support is known. A general scheme has been before us for a long time; surely the time is now ripe for a definite focus to be created. If a group of directors is appointed who will formulate a definite scheme and organise an appeal, it seems difficult to believe that out of the very large number of those associated in one way or another with the science of chemistry or its applications support will not be forthcoming.—I am, Sir, etc.,

IDA SMEDLEY MACLEAN

SIR,—The correspondence which has appeared of late in your columns on "Chemistry House," is indicative of the very diverse views which have been expressed in recent years on this important matter. Various schemes, from time to time, have been brought forward, but they have not proved practicable. The present position appears to be that the majority of chemists desire a common roof under which the different Societies can carry out their respective activities; in addition, the building must serve as a club, and it must be situated within easy access of Piccadilly. At once the question of cost arises, and it would seem that any scheme must be financed by chemists themselves, as, owing to the present position of trade in the country, assistance from the large chemical firms is unlikely to be forthcoming. It would be more in accordance with true professional feeling and certainly more dignified if chemists were to drop the idea of monetary gifts from such firms or from the State and consider a scheme based on the measure of their own resources. If this preamble be a true diagnosis of the feelings of chemists, in what manner should action be taken?

Our personal interests in one or more of the existing chemical societies should not obscure our vision of chemistry as a whole. In the future some of these societies will amalgamate and so reduce overhead expenses, and a central home for chemistry will doubtless hasten this process. Since "Chemistry House" on the magnificent scale appears to be unattainable, we must prune our ideas, and I would suggest it might be possible to discuss usefully some such scheme as will include the purchase of a house or two houses of a suitable size in the district lying between Victoria and St. George's Hospital. The Society of Chemical Industry and other Chemical Corporations might undertake to rent the necessary office space they would require in this building. This would also contain one large and two smaller committee rooms and the accommodation for a club, such as a large dining-room, smoking-room, reading-room and billiard-room. Catering would be done on the premises, but it is improbable that there would be space for bedrooms. Neither would it be possible to have the ordinary chemical meetings on the premises as the adaptation of an existing domestic building to contain a large meeting hall would be extremely costly. For the present the library must remain at Burlington House and chemical meetings would continue to be held there.

If chemists feel that they require a "Chemistry House" they will have to pay an economic rate for the club accommodation, and I do not see how this can be placed at an annual figure lower than £5 5s. for London and £4 4s. for country members. Assuming a membership of 1000—1500 to start with, and the income derived from rents, it would be possible to gauge if the suggestion is likely to be successful. With a reasonable assured income there would be little difficulty in raising the capital for the purchase and adaptation of the premises.

The ideas outlined above will be unacceptable to many members of our profession, but unless a start is made soon the idea of "Chemistry House" will fade into a dream. A measure of success in such a modest scheme would lead to a gradual development, and ultimately the greater conception of a British Chemical Society housed in one building may be attained.—I am, Sir, etc.

JULIAN L. BAKER

THE MANUFACTURE OF LACTOSE

SIR,—On looking through some journals which arrived during my absence on the Continent, I find in your issue of September 24 a short editorial headed "Whey and Lactose." If the words "this country," which occur in the third line, are intended to include Ireland, then the statement in question needs some qualification, since it is well within my knowledge that lactose was made for a good many years on a large scale by an English firm (Lactose, Ltd.) working in Ireland, and was only discontinued about the year 1921 owing to the unfavourable conditions existing in Ireland about that time. It is true that not much lactose of B.P. quality was made, the great bulk of it having been required for certain commercial purposes where the B.P. standard of purity was not essential.

Yours faithfully,

A. CHASTON CHAPMAN

SPECTROPHOTOMETRIC EXAMINATION OF DYES

SIR,—In a valuable paper on "Spectrophotometric Examination of Dyes and Indicators," by Dr. Prideaux, in your issue of September 10, reference is made to the type of photometer operating "(2) By rotating discs with variable sectors (. . . Judd Lewis, *J. Chem. Soc.*, 1919, 812)," and, farther down on p. 665, such an instrument is described. Will you permit me to point out that the instrument which bears my name, "The Judd Lewis Sector Photometer," No. H40, in the price

list of Messrs. Adam Hilger differs from the description implied by Dr. Prideaux in (1) the sectors being still, (2) the whole aperture being utilised, (3) the light being continuous, and not intermittent as with rotating sectors, and other advantages leading to greater precision and more rapid work. The whole idea in this invention was to overcome what I found to be difficulties in using an instrument having rotating sectors.

Those interested in the development of sector photometers will find a comprehensive résumé of the subject in some Cantor Lectures on "Recent Applications of the Spectroscope and the Spectrophotometer to Science and Industry," by myself, published by the Royal Society of Arts, 1921 (2s.). The reference to my paper in the *J. Chem. Soc.* should be 1919, p. 312 (not 812).—I am, Sir, etc., S. JUDD LEWIS

ANALYTICAL METHODS FOR OXIDES OF NITROGEN, NITROSYLSULPHURIC ACID, AND SOME OTHER RELATED NITROGEN COMPOUNDS

SIR,—The purpose of this letter is to call to the attention of English chemists some work done in America on analytical methods for oxides of nitrogen and some other related nitrogen compounds, which seems to have been overlooked.

The researches to which I refer were carried out at Cornell University under the general direction of Prof. Wilder D. Bancroft, and are reported in two articles published in the *Journal of Physical Chemistry* for 1924, under the titles "The Quantitative Determination of Reduction Products of Free Nitric Acid Solutions: Namely—Nitrogen Peroxide, Nitric Oxide, Nitrous Oxide, Nitrogen, Nitrous Acid, and Salts of Hydroxylamine, Hydrazine and Ammonia," and "The Reduction of Free Nitric Acid by Means of Ferrous, Stannous, or Titanous Salts." Recent articles in the *Journal of the Society of Chemical Industry* by Mr. Edward Barnes,* and by Mr. F. J. Wilkins and Mr. Harry W. Webb,† report researches which might have been aided by data contained in these papers, reprints of which are enclosed.

When the work was begun at Cornell the entire subject of analytical methods for the nitrogen compounds involved was studied with great care, and the 34 pages of the first article contain a general discussion of the properties of the compounds together with detailed analytical procedures which are shown to be successful by applying them to known amounts of the compounds and mixtures of the compounds. The second paper gives results using these analytical methods for studying three specific reactions.

Subsequent studies involving nitrogen compounds have been made at Cornell University by different workers and reported in the *Journal of Physical Chemistry*. It is likely that more will be published in the future. If anyone wishes to use gas-washing bottles similar to those described in our papers, they may be obtained, under the name "Milligan Gas-washing Bottle," from the Fisher Scientific Company of Pittsburgh, Pennsylvania.

Yours very truly,

Norton Company, LOWELL H. MILLIGAN
Worcester, Massachusetts, U.S.A.
September 20, 1926.

* July 30, 1926, page 250 T. † August 27, 1926, page 301 T.

PERSONAL AND OTHER ITEMS

Sir Max Muspratt, speaking recently at a luncheon of the American Chamber of Commerce, at which he was the guest, made an appeal to business men to take a larger share in public life, and said there was a call for greater leadership from industrialists and financial and commercial leaders.

Prof. J. N. Collie is to receive the honorary degree of LL.D. at the forthcoming installation of Dr. Nansen as Rector of the University of St. Andrews.

Dr. R. H. Pickard, F.R.S., has been elected to represent the science graduates on the Senate of the University of London.

Mr. S. Marshall has been elected Prime Warden of the Dyers' Company.

The Secretary of Mines has appointed Messrs. J. R. L. Allott, A. Davies, S. Edwards and L. Holland to be members of the committee created to investigate, under the general direction of the Safety in Mines Research Board, methods of reducing accidents from falls of ground in coal mines.

An honorary research fellowship at Cambridge has been awarded to Mr. A. H. Wilson for investigations on the quantum theory of spectra.

Mr. H. O. Weller, who established the Building Research Station under the Department of Scientific and Industrial Research, will sail next week for Kenya as Supervisor of Technical Education.

Dr. R. B. Mouse has resigned his post as general manager for the Dorr Co., to become head of the department of chemistry at Purdue University, Ind. Dr. Moore, who was the Perkin medallist in 1925, is the author of many papers on radioactivity and other chemical subjects.

Mr. A. G. Charleton, a past-president of the Institute of Mining and Metallurgy, left £3,513.

Dr. G. v. Hevesy has succeeded Prof. Bodenstein in the chair of physical chemistry in the Hanover "Technische Hochschule."

Hugo Müller Memorial Lecture

Professor S. P. L. Sörensen, of Copenhagen, will deliver the Hugo Müller Memorial Lecture, entitled "The composition and characterisation of proteins," before the Chemical Society, on Thursday, October 28, at 8 p.m., in the Lecture Hall of the Institution of Mechanical Engineers, Storey's Gate, S.W.1.

Research Association of British Paint, Colour and Varnish Manufacturers

The Secretary of the Department of Scientific and Industrial Research announces that a licence under Section 20 of the Companies (Consolidation) Act, 1908, has been issued by the Board of Trade to the Research Association of British Paint, Colour and Varnish Manufacturers which has been approved by the Department as complying with the conditions laid down in the Government Scheme for the Encouragement of Industrial Research. The Secretary of this Association is Mr. J. B. Graham, 8, St. Martin's Place, Trafalgar Square, W.C.2.