and reference made to the peculiar properties of certain substances at low temperatures. Prof. M. Polanyi, professor of physical chemistry in the University of Manchester, gave the second lecture, his subject being "Reaction Velocity and Thermodynamics". He discussed the general effect of pressure on the velocity of chemical reactions, using relations deduced in accordance with thermodynamical principles, and referred among other things to the alteration of the equilibrium of reactions due to pressure, the grouping of reactions, and the connexion between reaction velocity and the heat of reaction. He also described recent work on the mechanism of ionogenic reactions. The lectures were well supported by members and friends, and were followed by helpful discussions of the various points raised.

Chemical Industry and Water Problems

THE presidential address of Mr. Edwin Thompson, at the annual general meeting of the Society of Chemical Industry at Glasgow on July 2, dealt with the question of water supply in Great Britain and covered a wide range of topics in that connexion. Mr. Thompson considered the problem of a national water policy to call for immediate investigation. He deplored the spirit of localism which still manifests itself in connexion with every water supply scheme of magnitude, despite the recommendation made nearly seventy years ago by the Royal Commission of 1868 "that no town should be allowed to appropriate a source of supply which naturally and geographically belongs to a town or district nearer to such source, unless under special circumstances which justify the appropriation". He said there is too much selfishness among water undertakings, and that they could do much to relieve the needs of those who have no water supply. He went on to discuss a number of difficulties and problems which are associated with questions of supply: water pollution, rural requirements, misuse and waste of water, the increase during recent years of the *per capita* consumption, diversion of supplies for canals, storage reservoirs, biological factors of storage, sewage effluents into rivers, compensation water, etc. He alluded to and endorsed the necessity for a survey of the water resources of Great Britain and instanced from the report of the British Association Committee the example set in this respect by other nations. The idea of a water grid was dismissed. The valuation of waterworks for rating purposes has a serious financial bearing on the administration and working expenses of an undertaking. The formation of a Select Committee of the Houses of Parliament to go fully into the question of national water supplies made him confident that the anxieties and hardships of the past year will never be repeated.

The Annual Tables of Constants

AT the conference of the International Union of Chemistry, held in April 1934 in Madrid, it was recommended that a substantial part of the funds at the disposal of the Union should be transferred to the International Committee of Annual Tables of Constants, in order to assist in the publication of these valuable tables. This recommendation was passed unanimously by the Union's executive in Paris in last October and confirmed by the national organisations representing the various countries adhering to the Union, such as Verband Deutscher Chemischer Vereine representing Germany, Comité National Belge de Chimie representing Belgium, National Research Council, Division of Chemistry, representing the United States, and so on. The sum thus put at the disposal of the Committee of the Annual Tables is 150,000 francs; the amount indicates the importance which international chemical circles attach to the continuation of the Annual Tables. This sum will be used up for printing the index of the second series (vol. 6–10, 1923–1930), which is now ready. In return for this gift, the Committee of the Annual Tables is going to put at the disposal of the chemical organisations adhering to the Union a certain number of complete sets of the Tables.

Atmospheric Pollution

THE twentieth report on atmospheric pollution issued by the Department of Scientific and Industrial Research (H.M.S.O., 5*s*. net) records observations for the year ending March 31, 1934. This report, like its forerunners, shows that preconceived notions are not always supported by measurement. If the conditions of sampling and test are valid, then the City of London has the most polluted atmosphere observed in Great Britain, and deposits of solids and tar show annual increase. Again, foggy weather, judged by measurement of 'smoke haze', appears to reach greatest prevalence in Westminster, and some of the highest figures for sulphur pollution are also found in London observing stations. Some so-called industrial cities apparently have atmospheric conditions much superior to those in London. London may, however, take comfort from the fact that comparable measurements show that atmospheric pollution in Philadelphia is almost twice as bad. Experience is recorded with the use of a 'candle' of lead dioxide for measuring atmospheric sulphur compounds. Another interesting apparatus has been devised for recording the quantity of light. The light received by a photo-electric cell develops a current which imparts to a condenser a charge. When this reaches a certain amount, it discharges through a neon lamp and causes an ordinary counter to advance one unit. The difference between the records at the various stations is great, and it may be inferred that large improvements in atmospheric conditions are possible by using experience already known.

Epidemic of Green Fly

WE learn from the Ministry of Agriculture and Fisheries that, in many districts in the southern half of England, oats have suffered from severe infestations by aphides or 'green fly'. Similar attacks on grassland have taken place in certain northern counties, including Lancashire. The insects occurred often in swarms, smothering the crops and causing