

OBITUARY NOTICES.

WILLIAM HOLDSWORTH HURTLEY.

1865—1936.

WILLIAM HOLDSWORTH HURTLEY was born at Armley, near Leeds, in 1865. He received his training in chemistry at the Yorkshire College, now the University of Leeds, where he was a scholar and prizeman and from which he graduated in the University of London, taking the B.Sc. in 1888 and thirteen years later the D.Sc.

He was for a few years Science master at the Church Middle Class School in Leeds and then came to London to the University Tutorial College in Red Lion Square, where he remained until in 1899 he was appointed Demonstrator of Chemistry in the Medical College of St. Bartholomew's Hospital. This position he held, lecturing also at the Wandsworth Technical College, until he succeeded to the lectureship and headship of the Chemical Department in 1906.

He had decided to resign his position at St. Bartholomew's at the close of the summer session and had been nominated a Governor when in February he fell ill with bronchitis and eventually died in the Hospital on June 2nd. At the funeral service held in St. Bartholomew-the-less the church was completely filled by his colleagues and students. He leaves a widow and three children, a son and two daughters, all three being graduates of London University.

Hurtley was a member of the Board of Studies in Chemistry and for many years acted as one of the Internal Examiners in the University of London, of which he became a Reader in 1919. He also several times examined for the Conjoint Board.

During the whole of his long association with the Medical School of St. Bartholomew's Hurtley endeared himself to all with whom he came into contact by his integrity, modesty, and invariable readiness to devote time and energy to assist any colleague or student. He was prominent in all the activities of the College and was president for many years of the Association Football Club and a member of the Christian Union.

He was especially interested in Old Testament History and served on the General Literature Committee of the Society for the Propagation of Christian Knowledge.

He was an excellent teacher and lecturer and although his duties, especially in recent years, were exceedingly arduous, classes in many cases having to be duplicated owing to the great increase in the numbers of medical students since the war, he conducted much useful and important research. This was at first purely chemical and published in the *Journal* of the Society; but, from his connexion with a great hospital, his attention was soon directed to the more clinical aspects of Biochemistry, in which branch of the science his most important work was done.

He was elected a Fellow of the Chemical Society in 1912, and was an original member of the Biochemical Society.

HARRY LIVSEY.

1878—1936.

IN March of this year, after a very brief illness, there passed away, at Old Trafford, Manchester, Harry Livsey, for 27 years a Fellow of the Society, a leader of the industry with which he was associated, and an acknowledged master of his craft.

He was born at Back Drake Street, Rochdale, 58 years ago, of parents in very humble circumstances. His father died as the result of an accident when Livsey was only four years old, and he lost his mother when he was fourteen. He had little or no early education—just a few years at a small elementary school at Littleborough and then he had perforce to become one of the breadwinners of the family.

At a very early age Livsey obtained employment as the "dyehouse drudge" at the works of the Calderbrook Dyeing Company, Littleborough, and whilst still very young he used to attend a small night school and even took lessons in handwriting. Later, when about 17 years of age, and after working all day as a dyer, he used to tramp from Littleborough to Rochdale, a distance of four miles, in order to attend the Technical School there. At these evening classes he acquired some knowledge of elementary chemistry, a little mathematics and, above all, a great ambition to understand the principles of his craft.

When, in 1899, the already important Salford firm of Messrs. J. & J. Worrall absorbed the Littleborough concern, and the English Velvet and Cord Dyers' Association came into being, Livsey was transferred to Salford and appointed foreman dyer. He now began to attend the evening classes at the Salford Royal Technical Institute, where he acquired a thorough knowledge of organic chemistry, coal tar distillation, and the chemistry of coal tar dyes. His grasp of the constitution, properties, and application of the dyes employed in dyeing velvet was quite remarkable. He could describe, with a wealth of detail, the numerous processes required to produce on the fabric any one of the scores of colour shades for which his firm was so famous, and he could reel off in amazing fashion the formulæ expressive of the complicated reactions involved.

The remarkable success which Livsey achieved in the art of dyeing was, I think, largely due to his singleness of purpose. From the time he entered the dyehouse he determined to know all there was to know about his own craft—he refused to be diverted to the study of any other science, and was always willing to leave the problems of engineering, salesmanship, and publicity to others. The practical dyeing of fabrics was his work, his hobby, and almost, his religion.

It is pleasant to be able to record that Livsey's energy and skill constantly met with the reward they deserved. About the year 1924 he was appointed manager of the works of the English Velvet and Cord Dyers' Association. Later, in 1926, he was given a seat on the Board and became Managing Director, and in November last he became Chairman of the important company he had, as boy and man, so ably served.

Harry Livsey was elected to the Chemical Society in 1909. He was also a member of the Society of Dyers and Colourists for many years. In 1933 he became a Governor of the Salford Royal Technical Institute.

He was married at Rochdale Parish Church in 1900 to Miss Clara Horrocks of that town, who survives him together with a daughter Constance Muriel and a son Harry Kenneth.

D. V. HOLLINGWORTH.

ALFRED E. MACINTYRE.

THE chemical world in general and Canadian chemists in particular are poorer by the death of Alfred E. Macintyre on March 13th, 1936.

Not only because of friendship and professional association, but for another reason, I claim a peculiarly complete appreciation of that loss. We first met when both were of mature years; neither had previous knowledge of the other's personality and little of the other's professional reputation. Our meeting resembled that of two strange dogs, each on his guard and uncertain whether to wag a tail or to growl. Then suddenly I recognised a rare and delightful smell—that of good days long past—and each wagged a tail. I had met a type rare on the American continent, but that among which my earlier student days had been spent. Gradually, I found that Macintyre was a superior and well-developed example of this type. His talk was such as I used to hear in the early nineties as I sat, with open ears and shut mouth, among my elders or betters.

Macintyre was a man of wide interests and of abilities in many spheres. He was a chemist first and last, but he was a greater chemist by reason of his other interests. Scottish by birth as well as by ancestry, he was transplanted, while still a small boy, to Canada. His family settled in Saint John, New Brunswick, even at that time a seaport of importance and the centre from which large quantities of lumber were exported. An instinctive interest in chemistry was satisfied as best it could be with the imperfect teaching facilities

of the time and place. The knowledge so gained found an outlet in connexion with local industry and young Macintyre, not yet twenty, erected and successfully operated for six years the first wood distillation plant in the Dominion. It was a paying venture, but was ultimately destroyed by fire. Free of commercial responsibility and realising by experience the limitations of his scientific knowledge, Macintyre took ship for Glasgow, where he studied under Dittmar and received a diploma from the Royal Technical College. Like all ambitious chemical students of his day, whose ambitions had sufficient financial backing, Macintyre went to study in Germany. In Jena he studied organic chemistry, but his ever wide-awake intellect led him also into subjects which were developing along such lines that their alliance with chemistry was becoming important—bacteriology, optics and hygiene for example. He became lecture assistant to the Director of the Institute of Hygiene and had charge of the chemical work there. Social activities were by no means neglected; an instinct for their cultivation was an integral part of the man.

Returning at last to Canada, Macintyre practised as a consultant in the Maritime Provinces, having his laboratory in Saint John, N.B. He did much work for both the Dominion and Provincial governments in these days, but without receiving appointments which limited his other activities. His social connexions naturally led him into politics. His temperament made him an ardent politician. He became the official organiser of the Liberal Party in New Brunswick and was an extremely efficient one. The action and reaction of political and social intercourse helped to broaden his knowledge of the world and its affairs. He learned too much ever to preach the doctrine of a universal automatic cure for troubles, whether of an industrial process or of international affairs. To the end, Macintyre hated and despised a pedant as much as he did a self-advertiser. He must have been a wonderful tonic for intellectually anæmic students.

Leaving Saint John, he became professor at Morrin College, an offshoot of McGill University situated in Quebec City. In 1900 Morrin College was reabsorbed by its parent institution.

Macintyre did not move to Montreal. He would probably have found that atmosphere uncongenial. He made once more for Jena and after three more semesters spent happily there he returned to Canada, a Ph.D. *magna cum laude*, but still much more than a chemist. He was so much more that it was difficult for him to find his place in the profession, as things were in the Canada of a generation ago. The times were a hard but useful discipline to Macintyre as to some others. For a while he abandoned the practice, but not the study, of chemistry and joined the editorial staff of the *Saint John Telegraph*, a paper of no small repute in the Dominion. If every young chemist were compelled, before practising his profession, to spend a year or so working as a newspaper man, the mortality might be high, but the average common sense of the survivors would be enormously increased.

Some three years later the Government of the day recognised that a chemist was a necessary adjunct to the Quebec Arsenal. It had the good sense to secure Macintyre's services for the job. His work included metallurgical problems, the chemistry of explosives, the investigation of accidental explosions, drafting specifications for materials, and much besides. He was there still in 1914 and became the representative in Canada of Woolwich Arsenal in connexion with the inspection of supplies. He did not limit his work to giving approval or disapproval. Where he found defects he tried, generally with success, to show how they could be avoided. When a new arsenal was under construction at Lindsay, Ontario, he supervised much of the installation. Later, he became Superintendent in charge of the whole plant.

At the close of the war an Explosives Division of the Canadian Department of Mines was created, with Macintyre as its Chief Chemist. The Division had to draw up and put into force regulations for the manufacture, importation, transportation, storage, etc., of explosives for use in Canadian industries. Everything connected with explosives for non-military purposes seems to come within its scope. Macintyre, the indefatigable student, the man of detail and wide vision, the man of practical experience in making and handling explosives, was the one man for the position. He was superannuated in 1931. His position, which exists by specific provision of an Act of Parliament, has never since been filled.

Superannuation from the Civil Service did not involve the immediate close of Macintyre's useful career. A little earlier there had been a series of serious explosions in the Ottawa sewers. He was called into consultation on the cause of these and for some time after "retirement" continued to direct the investigation, which was carried out in masterly fashion. Physical disabilities were, however, increasing. This was the last work with which his name can be directly associated. For some of us, however, he continued to the end as our unofficial consultant. "Let us find out what Macintyre can suggest." The inquirer never came empty away, whether he asked for facts or advice as to the wisest line of conduct.

Macintyre became a Fellow of the Chemical Society in 1890, but geographical considerations prevented his taking an active part in its affairs. His chief interest lay with the Society of Chemical Industry as the one which by its constitution can be as potent in Canada as elsewhere. The offices he held in that Society (he was Chairman of the Ottawa Section, 1923—1924 and 1924—1925, Vice-President of the Society, 1925—1928, and Trustee of the Queen's Prize Fund from the time of its foundation till his death) he held for the purpose of giving service and by no means for self-glorification.

He hated humbugs, but he was a good friend to any earnest student or worker in need of help.

No one person has any idea of the liberality with which he has dispensed time, trouble, advice, and money to those in need who seemed worthy.

The writer can reasonably claim to have known and observed closely acknowledged leaders in many varied fields of human endeavour, and in his opinion A. E. Macintyre belongs by mental stature to their class. Perhaps the most important thing to us is that he was a gentleman and a most loyal friend.

ALFRED TINGLE.

WILLIAM ERNEST MARTIN.

1876—1935.

WILLIAM ERNEST MARTIN was born at Waltham Abbey in 1876. He received his chemical training at the Government Laboratory, Royal Gunpowder Factory, Waltham Abbey, under James M. Thomson, F.I.C., and Dr., later Sir, R. Robertson, and at the City and Guilds Technical College, Finsbury, under Professor Meldola, John Castell Evans, and F. W. Streatfeild.

He was at Waltham Abbey from 1891 to 1898, and then joined the firm of Kynoch Ltd., as chemist-in-charge of the guncotton plant at Kynochtown in Essex. He was transferred to Arklow, Ireland, in 1900, where he filled the positions of chief chemist and, later, works manager. In 1909 he came to South Africa, and took up the position of chief chemist in the Kynoch factory at Umbogintwini, Natal, becoming works manager in 1912, a position he held throughout the war, and until he left the firm in 1922 when the explosives works were closed down.

During 1922 he was engaged in research on the manufacture of paper from local raw materials. From 1923 he was chemist to the Natal Navigation Group of Collieries, and in 1933 he took over their laboratory on his own account, and was actively engaged as a fuel technologist until his death.

He took a keen interest in the promotion of technical education and for a number of years was a member of the Chemical Advisory Board of the Durban Technical College.

His death took place on December 17th, 1935, and he is survived by his widow and two sons.

He became a Member of the Society of Chemical Industry in 1899 and was elected a Fellow of the Chemical Society on June 16th, 1910.

W. A. MARTIN.
