

Obituary

Joseph Locke, 1937–2022

MBE, MSc, CEng, FREng, FIStructE, FWeldI



AS A STRUCTURAL ENGINEER, designer, constructor, managing director and industry leader, few people have had as much influence in the progression of the structural steelwork industry as Joe Locke.

Joe's grandfather was a blast furnace man on the first Bessemer converter in the UK, located in his native Bolton, and his father an iron moulder. It is not surprising therefore that he developed a fascination with structural steelwork at a tender age by observing rivetted plate girders supporting a Lancashire cotton mill on his morning walk to school.

Having attended technical college, he joined Robert Watson & Company, in Bolton, at 17 years of age as a technician apprentice. At the end of his training, he was placed in the design office, an environment in which he thrived working alongside chartered structural engineers, fuelling his desire to become one himself.

His practical experiences were supplemented by part-time day and evening classes at Bolton Technical College, enabling him to successfully navigate the Institution examinations through Studentship, Graduateship and Associate Membership without exemptions. By the tender age of just 23, he had satisfied all of the Institution's examinations for full membership and then waited impatiently until he was 25 to become 'fully fledged' in accordance with the rules at the time.

After a spell leading and growing a new engineering department at Watson's facility in Bristol, Joe moved into academia. First as a Lecturer in Structures at Bolton Technical College and then as a Research Assistant at the University of Manchester Institute of Science and Technology (UMIST), where he was awarded his Master of Science degree. While at UMIST, an interest in the relatively new topic of computation was developed and he learned to program the university's Atlas computer, reported to be the largest in the world at that time.

Joe described his time at UMIST as particularly satisfying, but the financial pressures of a family dictated a return to industry back at Watson in Bolton, where his newly found skills in writing software led to his development of a program for the cost optimisation of portal shed buildings. His career progressed rapidly at Watson, a family-owned business, and he soon became responsible for the overseas business, centred mainly around the Middle East region. Appointment to the board of Watson followed in 1980, as Deputy Managing Director, with

responsibility for all aspects of engineering and design.

When the Watson family sold the business to AMEC plc in the mid-1980s, Joe was appointed Managing Director, a position he held for over a decade until compulsory retirement under AMEC rules, at the age of 60. Under his leadership, the Watson business became synonymous with high-quality and complex steel structures throughout the world. Projects including the Kansai airport building in Japan, Chek Lap Kok airport in Hong Kong, and the TGV/RER station at Charles de Gaulle airport in Paris were all successfully completed overseas, while closer to home the Millennium Dome, and stadia structures for Glasgow Rangers, Manchester United, Bolton Wanderers and Lords enhanced its reputation.

Not yet ready to retire, Joe accepted the position of Engineering Director of William Hare Ltd, a position he held until he decided that full-time employment should cease six years later. He also returned to UMIST as Visiting Professor in 2000 for a three-year tenure.

Joe was passionate about the steelwork industry and the advancement of structural engineering. He was President of the British Constructional Steelwork Association in 1988–90, during which time the first edition of the National Structural Steelwork Specification was launched. In 1998–2000, he was President of the European Convention for Constructional Steelwork (ECCS).

A fellow of both the Institution of Structural Engineers and the Welding Institute, he became a fellow of the Royal Academy of Engineering in 1996. He was an Institution council member for three years from 2000 and was appointed Honorary Secretary in 2003. He was awarded the Institution's Gold Medal in 2007, much to his delight and surprise as 'somebody who had spent most of his working life in contracting', as he explained in his Gold Medal Address, titled 'A ductile material in a brittle industry'.

In 1990, he was awarded the MBE for which the citation read, 'for your truly outstanding reputation as an international constructional steelwork engineer of outstanding ability, for your unstinting services to the structural steelwork industry, and for your extensive support and involvement with the Institution of Structural Engineers'.

A real 'man of steel', but also an accomplished pianist, a compassionate family man with a great sense of humour and great company to be with. Joe is survived by his wife and 'lifelong soulmate' Kathleen and his son Tim.