

Professor Kurt Irgolic 1938–1999: An appreciation

The present issue of *Applied Organometallic Chemistry* is dedicated to Kurt Irgolic, a founder member of the Editorial Board of the Journal from 1987, who died tragically in an accident in the Austrian mountains on 23 July 1999.

Kurt was born on 28 September 1938 in Hartburg, Austria, which town was his home at the time of his death. His advanced education was at the Karl Franzens University Graz, where he received his PhD in 1964. Kurt was Head of the Institute of Analytical Chemistry at this University when he died. After his PhD he undertook postdoctoral studies at Texas A&M University at College Station Texas with Dr R. A. Zingaro until 1966.

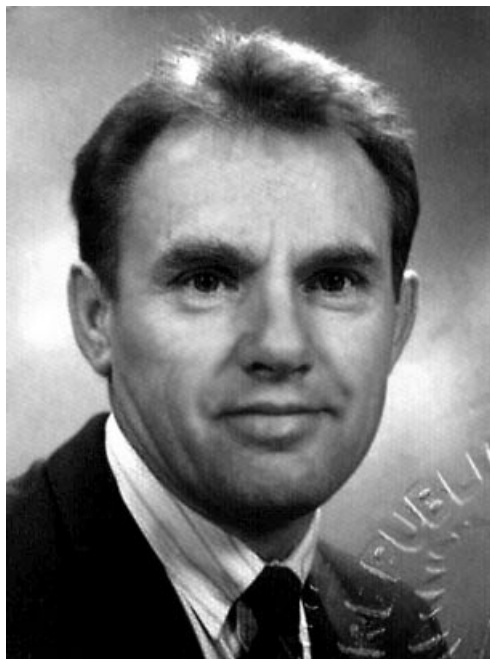
In addition to his PhD in Inorganic and Analytical Chemistry, Kurt also received a Teaching Certificate in Elementary Education from the Federal Teachers Training College at Graz in 1957. In an active and innovative teaching career in the university sector, he was therefore unusual in having a formal training and qualification to do so.

Following his doctoral and postdoctoral training, Kurt became an Assistant Professor at Texas A&M in 1966. He spent the next 23 years of his career in that Department, becoming Chairman of its Inorganic Division in 1986. He was also involved with the Center for Energy and Mineral Resources at A&M from 1975 until 1986 and was Research Coordinator of the Office of University Research from 1972 to 1975.

In 1989 Kurt returned to Graz as Professor and Head of the Institute for Analytical Chemistry at the Karl Franzens University. While at Graz he served at various times as Chair of the Senate Committee for International relations and as Vice Chair of the Finance Committee.

During his career Kurt served on numerous Editorial Boards in addition to that of the present Journal. These included at various times *Chemical Speciation and Bioavailability*, *Heteroatom Chemistry*, *Journal of Chromatography*, *Marine Chemistry* and *Science of the Total Environment*. He was honoured by the Universidad Catolica de Santa Maria, Arequipa, Peru and was an Honorary Fellow of the Japanese Arsenic Scientists Society. Kurt had acted at various times as a Consultant to numerous industrial concerns including Atlantic Richfield, Eastman Kodak, Shell, National Bureau of Standards, USA (now National Institute of Standards and Technology), and Pennzoil.

Despite having a very busy life Kurt had many outside interests, including reading and book collection (scientific texts), outdoor activities such as caving and minerology, mountain exploration and also soccer. In



the latter context this writer well remembers watching an exciting Austrian FA Cup soccer game with Kurt involving Hartburg in 1994.

Kurt had produced more than 250 scientific publications between 1963 and the time of his death, had authored or co-authored 16 books and had written 30 other scientific reports. The key themes of his research throughout this time were in the Group 15 and 16 areas, with papers involving selenium, tellurium, phosphorus and especially arsenic. Many of these papers, especially in the second half of his career, had strong environmental themes in chemistry. In particular, following on the unexpected discovery by Edmonds and Francesconi in 1981 of a marine natural product chemistry for arsenic (where many naturally occurring methyl arsenic species existing in marine animals and biota are now known to exist), Kurt was pioneering an important extension of this research into the area of naturally occurring methyl arsenic species in terrestrial biota, and had published much work on this topic in the last few years.

Limitations of space unfortunately forbid a full summary here of Kurt's research over the whole of his

career. We attempt to make recognition of this, however, by way of a formal statement of the wide range of research topics researched by him since 1963. These can conveniently be divided into the areas of Chemistry and Energy Studies and follow below:

Chemistry: Solvent extraction; synthesis of organic compounds of arsenic, selenium and tellurium; long chain dialkyl tellurides, tellurium–nitrogen compounds, and heterocyclic tellurium compounds (dye intermediates); biological transformation of arsenic and selenium compounds; identification and determination of naturally occurring organic arsenic and selenium compounds; trace element determinations; element-specific detectors for chromatography; inductively coupled argon plasma emission spectrometry; trace element determination by polarography; high pressure liquid chromatography; graphite furnace atomic absorption spectrometry; inductively coupled argon plasma mass spectrometry; laser micromass analysis (LAMMA-500); determination of trace elements in subcellular compartments; determination of trace elements in biological samples (hair, human

brain, lung, blood, plasma, urine, bone); analysis of archeological materials.

Energy: Trace element determination in lignite; identification of trace element compounds in energy-related materials; abstracting and indexing of German synthetic fuel records; determination of arsenic compounds in natural gas, coals, petroleum, coal fly ash.

Kurt is survived by his wife Gerlinde and his daughter Birgit and is sadly missed by his friends and research and teaching colleagues, and very much by the present author. His memorial in our own context is, of course, the enduring contribution of his own researches and as they guide and impinge on continuing developments in the field by his former scientific colleagues and friends.

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