



Short biography of Malcolm Crowe

Malcolm Crowe was born in Dublin 13 January 1948. His first and only employment was at Paisley College in 1972, now the University of the West of Scotland, where he is an Emeritus Professor. He received his D.Phil from Oxford University in 1978 with a thesis entitled “The Connective k-theory of the Infinite Symmetric Group”. Computing rather than Mathematics is his real passion.

During the 1980s and 1990s he worked on several ESPRIT projects and co-authored several books on CSCW, Information Systems, and Interdisciplinary Research, contributing several software libraries adopted within the open-source community, including for SNMP, WordNet and CTools.

Since 2006 he has been developing new ideas for how to improve the implementation of relational DBMS, where he regards the maintenance of the transaction log as the only guarantee of accountability and transactional behaviour. He developed a strongly typed optimistic RDBMS called Pyrrho (www.pyrrhodb.com) to try out several technical additions to relational technology including role-based namespaces and semantic and distributed databases. Collaborating with Fritz Laux, he has made contributions to DBKDA almost every year since 2011, focusing on transaction concurrency, “Big Live Data”, Shared Data Structures, and, recently the new GQL standard (ISO/IEC 39075). He is an IARIA Fellow.

The current version of Pyrrho is dated 1st March 2025 and is available in the PyrrhoV7alpha folder in <https://github.com/MalcolmCrowe/ShareableDataStructures>.