

## EDITORIAL NOTE

# Obituary: Yorick Wilks

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Yorick was a great friend of Natural Language Engineering. He was a member of the founding editorial board, but more to the point was a sage and encouraging advisor to the Founding Editors Roberto Garigliano, John Tait, and Branimir Boguraev right from the genesis of the project.

At the time of his death, Yorick was one of, if not the, doyen of computational linguists.

He had been continuously active in the field since 1962.

Having graduated in philosophy, he took up a position in Margaret Masterman's Cambridge Language Research Unit, an eccentric and somewhat informal organisation which started the careers of many pioneers of artificial intelligence and natural language engineering including Karen Spärck Jones, Martin Kay, Margaret Boden, and Roger Needham (thought by some to be the originator of machine learning, as well as much else in computing).

Yorick was awarded a PhD in 1968 for work on the use of interlingua in machine translation. His PhD thesis stands out not least for its bright yellow binding (Wilks, 1968).

Wilks' effective PhD supervisor was Margaret Masterman, a student of Wittgenstein's, although his work was formally directed by the distinguished philosopher Richard Braithwaite, Masterman's husband, as she lacked an appropriate established position in the University of Cambridge.

Inevitably, given the puny computers of the time, Yorick's PhD work falls well short of the scientific standards of the 21st Century. Despite its shortcomings, his pioneering work influenced many people who have ultimately contributed to the now widespread practical use of machine translation and other automatic language processing systems. In particular, it would be reasonable to surmise that the current success of deep learning systems is based on inferring or inducing a hidden interlingua of the sort Wilks and colleagues tried to handcraft in the 1960s and 1970s. Furthermore, all probabilistic language systems are based on selecting a better or more likely interpretation of a fragment of language over a less likely one, a development of the preference semantics notion originally invented and popularised by Wilks (1973, 1975). As a result, his early work continues to be worth studying, not least for the very deep insights careful reading often reveals.

Underlying this early work was an interest in metaphor, which Yorick recognised as a pervasive feature of language. This was a topic to which Yorick returned repeatedly throughout his life. Wilks (1978) began to develop his approach, with Barnden (2007) providing a useful summary of work to that date. However, there is much later work – for example Wilks *et al.* (2013).

Wilks was an important figure in the attempt to utilise existing, published dictionaries as a knowledge source for automatic natural language processing systems (Wilks, Slator, and Guthrie, 1996). This endeavour ultimately foundered on the differing interests of commercial dictionary publishers and developers of natural language processing systems. However, these early efforts stimulated the development of open-source resources, especially Wordnet (Fellbaum, 1998), many of which continue to be widely used.

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Yorick Wilks passed away peacefully at home on 14 April 2023.

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He also made important contributions to Information Extraction (Gaizauskas and Wilks, 1998), the development of the widely used GATE framework for natural language processing (Gaizauskas *et al.*, 1996), the development of the notion of intelligent companions (Wilks, 2010), and much else in artificial intelligence and language work besides.

Yorick was greatly influenced by the early and tragic deaths of his father and his first wife. The death of his father, in particular, was so painful that he often glossed over this terrible event in his characteristic light-hearted way.

He published widely throughout his life, in a number of genres, sometimes under pseudonyms. Yorick finished a new book – on AI and Religion – shortly before his death. He was also a prolific and successful PhD supervisor, taking dozens of students through to graduation and helping many more, including myself and Branimir Boguraev. Maybury (2007) lists over 70, and that list is undoubtedly incomplete.

Most remarkably, some will always feel Yorick wasted his talents on Artificial Intelligence and Natural Language Engineering, which they saw as the pursuit of unrealistic utopianism, when he could have done something more important. He might well have been successful as an operatic bass (he sang at the Edinburgh Festival), a comedian or actor (he had some success on Californian TV in the 1960s and at various other times), politics, or in one of the many other fields in which he had outstanding talents (Maybury, 2007).

He is perhaps therefore fortunate to have died during one of the periodic AI summers, so the importance of the area to which he devoted so much of his life will be recognised by those outside the field.

Or perhaps it is we who are fortunate to have had the friendship and insights of such a talented and colourful man for so long.

Yorick is survived by his wife Roberta Catizone (also a well-known Computational Linguist), son Seth, daughters Claire, Octavia, and Zoe, and two grandchildren.

He will be greatly missed.

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