

ENGINEERING GEOLOGY  
OF  
UNDERGROUND MOVEMENTS

Dedicated to  
Dr Roy Kenneth Taylor  
1929 to 1987

# ENGINEERING GEOLOGY OF UNDERGROUND MOVEMENTS

Proceedings of the 23rd Annual  
Conference of the Engineering Group of  
the Geological Society  
held at Nottingham University  
13–17 September 1987

edited by

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## Preface

The twenty third Annual Conference of the Engineering Group of the Geological Society was held at Nottingham University between 13 and 17 September 1987. The theme of the Conference was 'Engineering Geology of Underground Movements' and was concerned with those ground movements which man's activity initiates by deep or subsurface construction, by mining practices and the abstraction of fluids, as well as induced seismicity.

The theme of the Conference owed much to Dr R. K. Taylor who was then Chairman of the Engineering Group. Sadly, Dr Taylor died only a few weeks after the Conference. Accordingly this volume is dedicated to him and should be regarded as a tribute to his work in the field of ground movements.

The majority of the papers presented at the Conference are represented in this Proceedings, along with

most of the addresses given by the lead speakers and the discussion. In keeping with previous years, an introductory review is provided which attempts to survey the various themes of the Conference.

As usual, the Conference attracted a good attendance, especially from the construction and mining industries and associated public services, as well as scientists and academics. It again was gratifying to have a significant number of delegates from abroad to help provide the Conference with an international flavour.

Thanks must be recorded to all the lead speakers and contributors whose efforts helped make the Conference a success.

F. G. BELL, M. G. CULSHAW, J. C. CRIPPS, M. A. LOVELL  
Blyth, Notts, 1988

## OBITUARY

### DR ROY KENNETH TAYLOR

**Born 2 June 1929, died 21 October 1987**

Dr Taylor, a Lancastrian by birth and educated at Wigan Grammar School, obtained a BSc Honours Degree in Geology from Reading University in 1953 after doing National Service in the Royal Artillery. After University he worked for the Ministry of Housing and Local Government (1953–54), British Coal as Prospecting Officer (1954–59), and Soil Mechanics Ltd (1959–60). From 1960 to 1965 he was a Lecturer in Soil Mechanics and Engineering Geology at Sheffield College of Technology and was promoted to Senior Lecturer in 1966. In the same year he became Lecturer in Engineering Geology at Durham University and was promoted to Senior Lecturer in 1972 followed by Reader in 1983. He obtained an MSc degree from Sheffield University Geology Department in 1966 by part-time study and a Durham University PhD in 1972 as a staff candidate.

Dr Taylor joined Durham University at a time when the subject of Engineering Geology was growing as an academic discipline. He accepted a major responsibility for developing the subject at undergraduate and particularly at postgraduate level, his major activity being with the MSc Advanced Course in Engineering Geology which enjoys an international reputation.

In addition to his University work, Dr Taylor was active in outside committee membership, public service, such as the UK Warning and Monitoring Organization, and consultancy. Between 1968 and 1987 he was prominent in the affairs of the Yorkshire Geological Society and the Geological Society of London, and was Chairman of the Engineering Group of the Geological Society at the time of his death. From 1975–79 he was an advisor to the World Health Organization in the management

of mining wastes. Since 1974 he was a member of a British Coal working party on the design of spoil heaps and lagoons (and author of a handbook on the subject), and from March 1979 to November 1980 was Mining Assessor for the Vale of Belvoir Coalfield Inquiry in England.

Much of Dr Taylor's research into the stability of waste heaps and tailings lagoons and, more generally, the strength of mudrocks developed from the South Wales Aberfan disaster of 21 October 1966, which predated his death by exactly 21 years. His scientific and technical publications number about 70 and include two books, one jointly edited. He acted as external examiner for undergraduate and postgraduate degrees of British universities and polytechnics and was called to referee funding applications to the British Research Councils.

Roy Taylor was recognized by his close colleagues and former students as an informed teacher and a caring supervisor. His lectures were uniquely supported by a wealth of research and consultancy experience. The considerable respect that he achieved in the geological, mining and geotechnical engineering fields ensures that his life and work will be long remembered.

Dr Taylor is survived by his wife Valerie, son Alexander and daughter Tandy.

P. B. Attewell  
Professor of Engineering  
School of Engineering & Applied Science  
University of Durham  
England.

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Thanks are also due to all authors, lead speakers and discussion contributors for making this volume possible. The Engineering Group is grateful to the session Chairmen for their work in keeping the Conference flowing and to the University of Nottingham for its contribution to the success of the Conference.

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