Robert F. Legget

1904-1994

By Alan G. Davenport

Robert Ferguson Legget, a Canadian engineer of international distinction, died in Ottawa on Sunday, April 17, 1994, at the age eighty-nine. His achievements were many. He was the driving force behind the establishment of the Canadian National Building Code, a model code now used throughout Canada; the founding director of the National Research Council of Canada's Division of Building Research (now the Institute for Research in Construction); the author of a dozen books; the founding president (1987) of the Canadian Academy of Engineering; and the recipient of many honors, including election as a foreign associate of the United States National Academy of Engineering in 1988.

Born in Liverpool, England, on September 29, 1904, of Scottish parents, Robert Legget graduated with both bachelor's and master's degrees (in 1927) from the University of Liverpool. After working in construction in Scotland, he came to Canada in April 1929. On his arrival, he worked in the design and construction of major power projects and geotechnical engineering.

Between 1936 and 1947 he taught civil engineering, mainly soil mechanics and foundation engineering, first at Queen's University at Kingston, Ontario, for three years and then at the University of Toronto. His students remember him as a superb teacher, always animated and well prepared with illustrations

from practice. At the same time he continued to be involved with major engineering construction and wartime engineering works.

In 1947 he was invited to establish the Division of Building Research of the National Research Council of Canada. He laid down a complete spectrum of research on building problems in Canada, with particular emphasis on those arising from building in a cold climate. Through his leadership and the outstanding research staff, this organization became respected far outside Canadian borders. At the same time he initiated the work on the Canadian National Building Code.

Robert Legget had a pivotal role in boosting geotechnical engineering in Canada and internationally. He established the Canadian National Research Council's Associate Committee on Soil and Snow Mechanics (later the Associate Committee on Geotechnical Engineering), held the first Canadian soil mechanics conference in 1947, and hosted the Sixth International Conference on Soil Mechanics and Foundation Engineering in Montreal in 1965. He established the Canadian Geotechnical Society together with the *Canadian Geotechnical Journal.*

He recognized the importance of close engineering ties internationally and in particular with the United States. In 1965 he became president of the Geological Society of America, and at the same time was president of the American Society for Testing and Materials—the first Canadian to hold these positions. From 1966 to 1969 he was also president of the International Council for Building Research, Studies, and Documentation.

He wrote extensively, his first book being a classic text on geology and engineering. His book on the Rideau Waterway describes the construction of the canal built between the Ottawa River and Kingston on Lake Ontario during hostilities between Canada and the United States in the early 1800s. Describing vividly an early engineering achievement in Canada, it has become popular with engineers and the public. His book helped to attract many visitors from the United States and elsewhere to this "silver chain of rivers and lakes linked by small locks and winding channels."

Robert Legget received honorary degrees from thirteen universities and a long list of honors and awards from around the world.

Robert Legget was widowed in 1984 and is survived by his son, David, who lives in Toronto.