

in the Royal Engineers from 1916–19. He saw action in Belgium and France and for a time also worked in the War Office, attaining the rank of Captain.

In 1927 he was commissioned by Tanganyika Concessions to make a report on the possibility of railway connexions between mining centres and prospecting districts in Kenya, Uganda and along the Congo border, and from 1940–3 he was engaged on a similar report on arterial roads in Kenya.

Mr Varian was instrumental in mapping out the road in Kenya, now known unofficially as “The Varian Way”, which runs from Nairobi to Naivasha, cutting out the old and dangerous Escarpment Road; this work won him wide acclaim.

He was elected a Member in 1921 without passing through the stage of Associate Member.

He is survived by his widow.

Publications:

H. F. Varian, “Some African Milestones”. George Ronald, Wheatley, Oxford, 1953.

H. F. Varian, “The geography of the Benguela Railway”. *Geogr. J.*, vol. 78, 1931, pp. 497–523.

H. F. Varian, “Notes on a Survey of the Victoria Falls in 1905–6”, *Geogr. J.*, vol. 84, 1934, pp. 65–72.

JAMES LAWRENCE SANDERS, B.Sc.(Eng.)(Lond.), who was born on 19 July, 1888, died on 9 October, 1960.

He was educated at Merchant Taylors School, London, and studied engineering at the City and Guilds (Engineering) College. He obtained his B.Sc. Honours degree in 1910.

From 1911 until the outbreak of World War I he was an Assistant Engineer under Prud’homme, Rothplatz & Cie (Société Franco-Suisse de Construction). He was engaged on the construction of the 5-mile single-line tunnel between Moutier and Granges in the Jura, and was later selected for precise survey control, together with other engineers, of the 9-mile Loetschberg double-line tunnel.

In 1914 he enlisted in the Royal Fusiliers and saw service in France as a second Lieutenant in the Devonshire Regiment and Captain in the Royal Engineers. In 1919, as Captain, Royal Engineers, he was remobilized for reconstruction work and administration with the Military Operating and Control Staff, Anatolian Railways in the capacity of Divisional Engineer, and later as Chief Assistant to the Chief Engineer.

From 1921–25 he was Assistant with the Railway Extensions Department, Ceylon Government, in charge of a section of railway construction through virgin jungle.

He remained in the Ceylon Government Service, where he held positions of increasing importance, until his retirement as Chief Engineer, Government Railways, in 1946.

During his service he was responsible for comprehensive investigations into the tunnel and bridge systems of the Ceylon Railway. Following his recommendations a heavy programme of improvements was carried out involving the construction of several bridges and embankments.

Elected an Associate Member in 1919, he was transferred to the class of Members in 1936.

Mr Sanders is survived by two sisters.