OBITUARY
Sheila Scott Macintyre

MANY members of the Society would be shocked to hear of the untimely death of Mrs Sheila Macintyre, which took place in Cincinnati, Ohio, on 21st March 1960.

Mrs Macintyre had close connections with Edinburgh throughout her life. She was born there, the daughter of Mr James A. Scott, M.A., F.E.I.S., for many years Rector of Trinity Academy; was joint Dux and Dux in Mathematics of Edinburgh Ladies' College (the Mary Erskine School); graduated with first class honours in Mathematics and Natural Philosophy at Edinburgh University in 1932; was later a member of this Society, and served on the Committee; and was elected a Fellow of the Royal Society of Edinburgh in 1958.

After taking her Edinburgh degree she entered Girton College, Cambridge, and was a Wrangler in the Mathematical Tripos. In 1935, during a year spent in research at Cambridge, she published her first paper, on the asymptotic periods of integral functions.

Her teaching career began with four years on the staff of St Leonards School, St Andrews. After a further short period of teaching she married Dr A. J. Macintyre of Aberdeen University in 1940, and was for a time Assistant and later Lecturer in the Mathematics Department there. In 1958 Dr Macintyre became Research Professor in the University of Cincinnati, and in the following year his wife was appointed to a Visiting Professorship. She carried on her duties, in spite of deteriorating health, up to a fortnight before her death. She is survived by her husband, their children Alister and Susan, and her father.

Mrs Macintyre's chief mathematical interest was the theory of functions of a complex variable, and from 1947 onwards she made regular contributions to the subject. Some of her earlier work of this period was concerned with integral functions of exponential type, and in particular included a determination of bounds for the value of the " Whittaker constant ". Much of her work was on interpolation series associated with analytic functions. In a joint paper with her husband, convergence properties of the Abel series of a function, which had been discussed by several writers in the case of an integral function, were investigated for a class of functions regular in an angle. The Laplace transformation was applied here, as it had been by various previous writers on the theory of functions, notably by A. J. Macintyre. Mrs Macintyre later devised an integral transform in which the kernel was obtained from that of the Laplace transform by a process involving fractional differentiation, and applied it to extend the theory of the Gregory-Newton and Abel interpolation series. A long-standing conjecture on the convergence properties of the former was settled in one of her papers. In another, using results of the joint paper already mentioned, she solved a problem posed by Ramanujan in 1914.

Mrs Macintyre also produced, in collaboration with Mrs Edith Witte, a *German-English Mathematical Vocabulary*.

<div align="right">J. COSSAR</div>