Marjorie Shiels (nee Collins) 1895-1970: Pioneering ecologist

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Marjorie Shiels (nee Collins) 1895–1970
Pioneering Ecologist

Marjorie Collins' life and career were typified by the value of education in her family and by her warm personal connection to her work in both research and teaching. She was the daughter of two teachers and, despite the financial struggle of living solely on her widowed mother's teaching salary, four of the six Collins children attended the University of Sydney. Like many women of her generation, Collins anticipated teaching. She began a B.Sc. degree as an expedient choice instead of her first love, English. However, her wholehearted entry into her subject, Botany, during a distinguished undergraduate degree led her first to 2 years of research funded by university scholarships and then, in a move highly unusual among women of her era, to a demonstratorship at another university (Adelaide) in 1917.

Despite the onerous teaching and laboratory duties for which she was employed, Collins blossomed in Adelaide. There she was encouraged and inspired by Professor T. G. B. Osborn and his professional botanist wife, Young, dynamic and enthusiastically embracing the new concepts of ecology with a view to applying them to specifically Australian preoccupations. Osborn led Collins to turn to broad questions of climatic effects on vegetation and on the ecology of semi-arid regions. She returned to Sydney fired with these ideas to take up a Linnean Macleay Fellowship. The President's Address commented:

"Miss Collins has qualifications which justify our expectation of an enlargement of the Society's scope of work in a very desirable direction ... for some time she has been actively interested in the effect of certain climatic factors - especially drought and excessive sunlight - upon the distribution and structure of Australian plants. This is a very characteristic, important, comprehensive and promising Australian problem."

It was also a problem that required extensive, rough fieldwork, and Collins recalled waking with her ears full of sand after sleeping in a crude board hut, although she also enjoyed meeting the people of such rural communities.

Collins held continuous Linnean Macleay Fellowships until mid-1924 (gaining her M.Sc. with University Medal), publishing ecological papers in the Proceedings, but the discouragement she received both as a woman and as an intellectual pioneer in Sydney left her increasingly disheartened. In correspondence to Osborn she remarked on her failing courage for fieldwork, her loneliness and the lack of both employment prospects and of understanding colleagues in Sydney. She was engaged to be married before she left for Imperial College, London, on a Dominion Fellowship in 1924. While overseas she enjoyed her attendance at the Fourth International Phytogeographic Expedition to Norway and Sweden, but she married with the desire of devoting herself to family life immediately on her return in December 1925.

Family life did not exclude botanical work, and (particularly during the Depression) Collins - now Shiels - taught for long periods most of her life. In the late 1920s she wrote the section on Australian flora for an Italian encyclopedia as well as small natural history articles for the popular press. In the 1960s she co-authored school biology texts.

An excellent teacher characterised by her enthusiasm, warm interest in people, unfailingly high standards and a strong belief in practical work over rote learning, she remained distinctive and inspiring to many others. Her scientific service in this respect is more difficult to quantify, but she regarded it as no less important.

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