

Ion exchange properties and mineralogy of soils

Work in this area has focussed on the processes of soil genesis and the impacts that different soil mineralogies may have on the behaviour of soils and their response to management. Particular interest has been in soils derived from volcanic ash (Morrison 1991; Naidu et al, 1997) and soils on Pacific atolls (Morrison, 1990; Woodroffe and Morrison, 2001; Morrison and Manner 2005). The other major focus has been on how soils will respond to various management practices, particularly the surface charge properties which are critical for understanding how soils change with liming (Morrison et al, 1989), fertilisation (Gawander et al, 2004) and erosion (Morrison and Clarke, 1990). This work has included theoretical (Gangaiya and Morrison, 1987) as well as practical investigations.



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