In many scientific and popular publications, soils of the tropics are considered to be universally acid, infertile, and often incapable of sustained agricultural production (Gourou, 1966; McNeil, 1964; Goodland & Irwin, 1975; Friedman, 1977; Irion, 1978; Reiss et al., 1980; Jordan, 1985). The soil science literature shows that universal tropical soil infertility is a myth devoid of scientific validity. This myth has generated major misconceptions relevant to current global issues such as rural poverty, land degradation, deforestation, biodiversity, and climate change.

The historical development of this misconception has been recently analyzed by Richter and Babbar (1991) who traced it from the initial explorations in the tropics in the early 19th century (Buchanan, 1807), through the prevalence of broad soil genesis theories during the first half of the 20th century (Sibirtzev, 1914; Jenny, 1941), and finally to the lack of utilization of quantitative data about the diversity and management of soils in the tropics, generated largely during the second half of this century. Richter and Babbar cite telling examples of how major ecological texts still use obsolete concepts about soils, and conclude that the myth is a consequence of a major communications gap between soil scientists and other environmental scientists. Newer books, products of multidisciplinary efforts, put this misconception aside (Leith & Werger, 1989; Coleman et al., 1989).

The myth about universal soil infertility in the tropics is readily counteracted by two kinds of evidence. First, the vast diversity of soils in the tropics (Sanchez & Buol, 1975; Moormann & Van Wambeke, 1978; Drosdoff et al., 1978) which is now systematized according to quantitative soil taxonomy (Soil Survey Staff, 1975), a world soil map (FAO, 1971–1979), and numerous and