A review of Spodosols and spodic definitions was developed prior to the Fifth International Soil Correlation Meeting that was held in New Brunswick, Canada, New England, and New York during the first 2 wks of October 1988. During the meeting, a review of soil morphology and laboratory data was conducted at each field site. These reviews were interspersed with paper sessions that resulted in a vigorous discussion of not only field methods of spodic identification, but also laboratory criteria.

The inadequacy of the current definition of the spodic horizon has become evident during the last several years as the International Committee on the classification of Andisols (ICOMAND), working to describe volcanic soils as a discrete entity, has attempted to separate Andisols from Spodosols. The chemical criteria currently in use to define spodic horizons does not exclude the volcanic material Leamy (1988). This creates considerable confusion when Soil Taxonomy (Soil Survey Staff, 1975), is applied to various soil areas of the world. There does not appear to be much difficulty with the spodic definition as it pertains to Aquods or Humods. Perhaps because these two suborders have been distinguished by morphology (ortstein or cracked coatings) more often than chemical criteria. The conference in 1988 spent most of its time reviewing the Orthod/Inceptisol confrontation from the view point of laboratory and/or field separation of these two categories in an area not containing volcanic materials.

Agricultural practices in the northeast have altered the soil profile in many areas so that soil classification in the present system could be changed from Spodosols to Inceptisols, or Entisols. This alteration was considered not to be acceptable in Soil Taxonomy (Soil Survey Staff, 1975), and has caused some to consider the use of the Ap horizon as part of the spodic definition. As a result, spodic materials are being defined in one proposal rather than spodic horizons.

During this soil correlation meeting, attempts were made to develop a definition of spodic horizons that would meet the needs of the international group in attendance. As a result, there are three proposals being tested and undergoing periods of revision as their inadequacies are discovered. There are also other proposals that have yet to reach the level of being ready for testing. The proposals currently being evaluated are presented in the following paragraphs.

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