

Abstract published in Indiana Academy of Science Proceedings, Vol. 91, p. 91, 1972.

A study was undertaken to reevaluate the fossil record of Sassafras using a comparison of leaf form and fine venation of modern and fossil material. Sassafras, a monotypic genus which has been identified early in the fossil record of angiosperms, has leaves that are entire, asymmetrically bilobed, or trilobed, but may possess up to six lobes (Berry, 1902). The form of the lobes and sinuses may be extremely variable. Berry stated that the venation of the basal portion of the blade was a constant character which could be used to differentiate Sassafras from Aralia, Cissites, and Platanus. The distinctive marginal vein pattern of Sassafras may also be used in classification, however this character could be obliterated easily or overlooked in fossil forms. Ward (1887) pointed out the remarkable character of the marginal veins of the sinuses in modern leaves. Lesquereaux (1892) wrote of many of his identifications of leaf remains from the Dakota Group with some uncertainty. By 1902, twenty-eight American forms of Sassafras had been published. Berry retained only six forms in the genus Sassafras, referring others to Aralia, Cissites and Platanus. The leaf form and venation characters of Sassafras have been reevaluated and applied to the fossil record.