Abstract

The utilization of ESRI's ArcGIS software greatly facilitates the management of cultural resources on Federal lands. Correlation between archaeological sites and environmental variables can be rapidly accomplished through the analysis of both vector and raster data sets. The ability to join multiple feature classes based on spatial location has greatly aided the identification of areas of high, medium, and low probability for prehistoric site locations. Applications of relatively simple statistical techniques, such as chi-square evaluations, can then be applied to this spatial data to weight different environmental variables for final model production using the Spatial Analyst extension. This paper explores the procedures involved in developing a usable predictive model within a GIS-based environment utilizing data from Fort Stewart Military Installation, Georgia. Implications for the greater body of anthropological knowledge concerning human settlement in the Southeast United States will also be briefly touched upon.

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