Abstract

Interpolating Singlebeam Hydrographic Survey Data With ArcGIS Spatial Analyst
Track: Ocean, Coastal, and Marine Resources
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Singlebeam hydrographic survey data requires interpolation into a continuous grid for most GIS analysis. ArcGIS provides several interpolation methods and techniques. This paper will provide a general methodology for interpolating singlebeam hydrographic data using the ArcGIS Spatial Analyst extension. Discussion of Inverse Distance Weighted (IDW) and Kriging will be covered including the various input parameters for each. The variance grid feature incorporated with Kriging is detailed. Examples will illustrate how the variance grid feature is useful in determining optimal gridding parameters.

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