Spatial Data Summary

Title: Percentage of Protected Area Amounts within each Watershed Boundary for the Conterminous US

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Abstract: This dataset uses spatial information from the Watershed Boundary Dataset (WBD, March 2011) and the Protected Areas Database of the United States (PAD-US Version 1.0). The resulting data layer, with percentages of protected areas by category, was created using the ATtILA 2004 (Analytical Tools Interface for Landscape Assessments) software extension within the ArcView© 3.x desktop Geographic Information System (GIS) package. Starting with the 12-digit Hydrologic Unit Code (HUC) watersheds (or drainages) identified in the WBD, the percentage of each of the protection categories contained in the watershed was computed. The protection categories used were those defined by the Gap Analysis Program (GAP) or International Union for Conservation of Nature (IUCN). Percentages were computed for GAP status codes 1, 2, and 3, as well as for status 1 and 2 combined; and percentages were computed for the IUCN categories Ia, Ib, II, III, IV, V, and VI, as well as for all the categories combined. To aid in the speed of the analysis, the PAD-US data layer was transformed into a raster dataset with a 15 m x 15 m grid cell resolution before processing within ATtILA.

Keywords: ATtILA; GAP, IUCN, PAD-US, protection categories, WBD

Organization or location where data will be published: Online by NatureServe.

Article(s) in which the data generation technique(s) are described:

ArcView "Help," ArcView 3.x

Wade, Timothy. G. and Donald. W. Ebert. 2005. Analytical Tools Interface for Landscape Assessments (ATTILA) User Manual. U.S. Environmental Protection Agency, Washington, DC, EPA/600/R-04/083.

Jones, K. Bruce; Riitters, Kurt H.; Wickham, James D.; Tankersley, Roger D., Jr.; O'Neill, Robert V.; Chaloud, Deborah J.; Smith, Elizabeth R.; Neale, Anne C. 1997. An Ecological Assessment of the United States Mid-Atlantic Region: A Landscape Atlas. United States Environmental Protection Agency. Office of Research and Development, Washington DC, 20460. EPA/600/R-97/130.

Clearance history: The two original data sets were accepted "as is" from their developers; the WBD was developed by the Natural Resource Conservation Service of the US Department of Agriculture; and the PAD-US was developed by the PAD-US partnership (http://www.protectedlands.net/partnership/). The computational methods used to calculate the percentages were internally and externally reviewed during the clearance process for the reports listed above.

Location where data are maintained: D:\ESRP_NatlAtlas\Outputs_Mar2011, non-networked workstation in EXC140, Landscape Ecology Branch, ESD-LV.

Disclaimers: The United States Environmental Protection Agency through its Office of Research and Development funded and managed the research described here. It has been subjected to Agency review and approved for publication. Mention of trade names or commercial products does not constitute endorsement or recommendation by EPA for use.