

Everglades Publications by Kenneth Rutchey

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Education:

- Bachelor of Science, 1981, Palm Beach Atlantic College.

Expertise:

- GIS
- GPS
- Image Processing & Remote Sensing
- Analog and Digital Photo-Interpretation Techniques

Projects:

- WCA Historical Tree Island Mapping
- CERP Mapping

Publications:

Peer Reviewed Publications:

Rutchey, K., and J. Godin, in review. Investigating Vegetation Mapping Scaling Issues for Everglades Restoration Projects in South Florida, USA. *Ecological Complexity*.

Rutchey, K., T. N. Schall, and F.H. Sklar, in press. Development of a Water Conservation Area-2A Vegetation Map for Everglades Restoration. *Wetlands*.

Hagerthey, S.E., S. Newman, K. Rutchey, E.P. Smith, and J. Godin, in press. The Regime Shift Boundary in a Subtropical Wetland: Establishing Ecological Thresholds to Low-Level Phosphorus Enrichment. *Ecology*.

Rutchey, K., T.N. Schall, R.F. Doren, A. Atkinson, M.S. Ross, D.T. Jones, M. Madden, L. Vilchek, K.A. Bradley, J.R. Snyder, J.N. Burch, T. Pernas, B. Witcher, M. Pyne, R. White, T.J. Smith, J. Sadle, C.S. Smith, M.E. Patterson, and G.D. Gann, 2006. Vegetation Classification for South Florida Natural Areas. USGS Open File Report 2006-1240, Saint Petersburg, Florida.

Wu, Y., K. Rutchey, N. Wang, and J. Godin, 2006. The Spatial Pattern and Dispersion of Lygodium microphyllum in the Everglades Wetland Ecosystem. *Biological Invasions*, 8:1483-1493

Wu, Y., N. Wang, and K. Rutchey, 2006. An Analysis of Spatial Complexity of Ridge and

Slough in the Everglades Ecosystem. Ecological Complexity, 3: 183-192.

Sklar, F. H., M. J. Chimney, S. Newman, P. McCormick, D. Gawlik, S. Miao, C. McVoy, W. Said, J. Newman, C. Coronado, G. Crozier, M. Korvela, and K. Rutчey, 2005. Coupled Ecological-Societal Underpinnings of Everglades Restoration. Front Ecol Environ, 3(3): 161-169.

Smith, S. M., D. E. Gawlik, K. Rutчey, G. E. Crozier and S. Gray, 2003. Assessing drought-related ecological risk in the Florida Everglades. Journal of Environmental Management, 65(4):355-366.

Wu, Y., K. Rutчey, W. Guan, L. Vilchek and F. H. Sklar, 2002. Spatial Simulations of Tree Islands for Everglades Restoration, In: Tree Islands of the Everglades (F.H. Sklar and A. van der Valk, eds.) Boston, MA: Kluwer Academic Publishers, chapter 16.

Bancroft, T. G., Gawlik, D. E., and K. Rutчey, 2002. Abundance of Wading Birds Relative to Vegetation and Water Depths in the Northern Everglades, Waterbirds, 25(3):265-277.

Rutчey, K., and D. Worth. 2001. Evaluating Alternatives for Restoring the Everglades. ArcUser, July-September 2001, pp 22-23.

Rutчey, K., and L. Vilchek, 1999. Air Photo-Interpretation and Satellite Imagery Analysis Techniques for Mapping Cattail Coverage in a Northern Everglades Impoundment, Journal of Photogrammetric Engineering and Remote Sensing, 65(2):185-191.

Doren, R. F., K. Rutчey and R. Welch, 1999. The Everglades: A Perspective on the Requirements and Applications for Vegetation Map and Database Products, Journal of Photogrammetric Engineering and Remote Sensing, 65(2):155-161.

Jones, D.T., M. Madden, J. Snyder and K. Rutчey, 1999. A Vegetation Classification System for Southern Florida's National Parks and Preserves, South Florida Natural Resources Center Technical Report, Everglades National Park, National Park Service, U.S. Department of the Interior, Homestead, Florida.

Newman, S., J. Schuette, J. B. Grace, K. Rutчey, T. Fontaine, K. R. Reddy, and M. Pietrucha, 1998. Factors Influencing Cattail Abundance in the Northern Everglades, Aquatic Botany, (60):265-280.

Obeysekera, J., and K. Rutчey, 1997. Selection of Scale for Everglades Landscape Models, Landscape Ecology, 12(1):7-18.

Wu, Y., Sklar, F., and K. Rutчey, 1997. Analysis and Simulations of Fragmentation Patterns in the Everglades, Ecological Applications, 7(1):228-276.

Wu, Y., Sklar, F., Gopu, K., and K. Rutчey, 1996. Fire Simulations in the Everglades

Landscape using Parallel Programming, Ecological Modeling, 93:113-124.

Jensen, J., K. Rutchey, M. Koch, and S. Narumalani, 1995. Inland Wetland Change Detection in the Everglades Water Conservation Area 2A Using A Time Series of Normalized Remotely Sensed Data, Journal of Photogrammetric Engineering and Remote Sensing, 61(2):199-209.

Rutchey, K., and L. Vilchek, 1994. Development of an Everglades Vegetation Map Using a SPOT Image and the Global Positioning System, Journal of Photogrammetric Engineering and Remote Sensing, 60(6):767-775.

District Publications

Rutchey, K., L. Vilchek, and Matt Love, 2005. Development of a Vegetation Map for Water Conservation Area 3, (Technical Publication ERA #421), West Palm Beach, FL: South Florida Water Management District.

Gray, S., T. Bates, K. Rutchey, K. Havens, P. McGinnes, T. Bechtel, N. Iricanin, J. Bucca, M. Padgett and L. McCarthy. Chapter 7: Environmental and Economic Impacts. In 2000 - 2001 Drought in South Florida, South Florida Water Management District, West Palm Beach, FL.

Rutchey, K., 1992. The Response of Vegetation and Benthic Macroinvertebrates to Constructed Littoral Habitat in Canal 51, (Technical Memorandum DRE-306), West Palm Beach, FL: South Florida Water Management District.

Thayer, D., M. Bodle, and K. Rutchey. 1990. Melaleuca management plan for south Florida: recommendations from the Melaleuca Task Force. Unpublished report, South Florida Water Management District, West Palm Beach. 25pp.

VanArman, J., and K. Rutchey, 1989. Case Study - Graphics Integration - Image Transfer to a Geographic Information System, Presented at the Thirteenth EDGE Conference in San Diego, California.