

2004 Denver Annual Meeting (November 7–10, 2004)

Paper No. 170-3

Presentation Time: 2:05 PM-2:20 PM

GEOMORPHIC-BIOGEOCHEMICAL RELATIONSHIP IN MOUNTAIN CREEK WATERSHED, SOUTH CAROLINA

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Mountain Creek Watershed drains 30.4 km² and is part of Enoree River Basin in the Upstate of South Carolina. A part of this watershed is well developed due to growth of the City of Greenville located just south of the Watershed, where as more than 50 percent of it still remains undeveloped, and hilly because of the presence of Paris Mountain State Park. Due to its uniqueness in location and diversity of landuse and slope conditions this watershed offers, a detailed study on the stream chemistry, biology, and geomorphic characteristics have been carried out. Our objective is to understand how landuse, slope, vegetation, and the level of imperviousness within the watershed affect the biogeochemistry of the stream system. We have collected and analyzed water samples from 20 locations within the watershed, completed detailed geomorphic study of different stream reaches, developed land use, and actual percentage of impervious cover within this watershed. Analysis of our results is expected to give us a better understanding of role of urbanization on the overall watershed health.

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[General Information for this Meeting](#)

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1:30 PM-5:30 PM, Tuesday, November 9, 2004

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