

RACCOON CREEK RESTORATION PROJECT WASHINGTON COUNTY, PA¹

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Abstract. The Raccoon Creek Watershed in southwestern Pennsylvania is severely impacted by abandoned coal mine drainage as a direct result of its rich mining history and energy production. The pollution emanates from an interconnected network of underground mine workings that underlie most of the upper Raccoon Creek Watershed. A study of the local hydrogeology through the installation and monitoring of piezometers and compilation with evaluation of historical mine mapping and water monitoring (mine discharges and streams) indicates that the pollution originates from three separate, but adjacent, mining areas. Utilizing siphons and horizontal borings, the opportunity exists to consolidate the drainage to a single discharge point for treatment and/or for potential use by a near-by circulating, fluidized-bed, power plant (under construction). Additional investigation is needed to determine feasibility. This innovative approach to an areal problem is expected to simultaneously restore multiple streams while saving treatment costs and advancing the current state of treatment possibilities.

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