

## **Projects**

### **1. Wastewater Reuse Assessment in Northwest Indiana, William Rutherford and George Nnanna**

The goal of this project is to assess, through statistical analyses, the amount of wastewater generated in the Northwest Indiana region that is being treated and reused for other requirements on a county by county basis. This data will then be used to determine methods for reuse systems to improve the quality of the water in the region also on a county by county basis. Included in this report is the data calculated thus far in the project. This includes the amount of water that is currently being consumed by agriculture, industry, and residential/commercial groups and their corresponding sources.

### **2. Ralston Street Lagoon Project, 2006, (\$17,300.00), Gary Sanitary District (GSD), Gary, IN, Awarded, George Nnanna, Hal Pinnick, Anita Kitta**

The objective of this project is to examine the reports submitted by CDM to GSD on the current status of the PolyChlorinated Biphenyls (PCB) content of the Ralston Street Lagoon. Based on assessment of the reports, the Purdue Calumet Water Institute (PWI) will recommend an economically feasible remediation plan for the lagoon.

### **3. Energy Efficiency in Waste Water Treatment: Petrochemical Process Optimization, Ryan Buckley, Anuj Mathur, and Tristan Schaefer; (Supervising Professors: George Nnanna, Ed Pierson, and Ron Faibish – Industrial Advisor)**

### **4. Feasibility of Recovering Coal Fines from Indiana Settling Ponds, 2006, Center for Coal Technology Research, Harvey Abramowitz, awarded, (\$40, 000.00)**

### **5. FY2006 Congressional Direction: FY 2006 Congressional Earmark, (\$500,000) for Purdue Calumet Water Institute (IN), Awarded.**

The proposed project is a continuation from 2005. Continued efforts will be made to fulfill the mission of the Purdue University Calumet Water Institute (PWI), which is to conduct research and offer educational programs in water resources, and assist local, regional and state agencies, as well as the private sector in economic development and in solving water-related problems. The PWI provides an interdisciplinary approach to complex issues dealing with water quality, water efficiency, water security, ecological, human health, economic, social and policy issues.