



**Science & Math Club Celebrates Earth Week  
(April 20-24, 2009) at UW-Washington County**



**Theme: "Air - The Sky's The Limit!"**

**All Week:**

**Student Science Posters and Displays in the Science Building and Campus Library**

Student posters and reports are focused on this year's theme "Air - The Sky's the Limit!" Topics cover a wide range of issues related to the air we breathe, such as, its chemical and biological components, gases, indoor air quality, status of the air in Wisconsin, air pollutants (asbestos, radon, lead, pesticides, second-hand smoke, carbon monoxide, volatile organic compounds, polycyclic aromatic hydrocarbons, etc.), environmental problems (global warming, acid rain, etc.), and health problems (asthma, allergies, etc.)

**Wednesday April 22, 2009, 12:00 Noon, Room 228: Science & Math Club Seminar**

**Title:** "Air Borne Fine Particles in the Upper Great Lakes Region"

**Speaker:** Mr. Larry Bruss, Chief of the Regional Pollutant and Mobile Source Section, Bureau of Air Management, Wisconsin Department of Natural Resources

**Wednesday April 22, 2009:** A UW-WC student team Andrew Killeen, Adam Roehl, Michael Stecker and their faculty mentor Dr. Mohamed Ayoub present their research poster "Modeling and Visualization of Simple Chemical Molecules" at the 6<sup>th</sup> Annual UW System Posters in the Rotunda: A Celebration of Undergraduate Student Research in the State Capitol Rotunda, Madison. See <http://www.wisconsin.edu/posters/>

These students worked under Dr. Ayoub's supervision while enrolled in the Independent Study in Chemistry course (CHE 299) in the spring semester 2009. They used Gaussian03 and Natural Bond Orbital (NBO.5) to explore and visualize the chemistry and bonding of simple chemical systems, such as H<sub>2</sub>O, H<sub>2</sub>S and SO<sub>2</sub> - molecules that react to form acid rain and sulfuric acid aerosols causing environmental damage. Further understanding of how the atmospheric simple molecules interact with each other can provide insights into minimizing their negative environmental and health impacts.

For more information, contact Dr. Mohamed Ayoub, [UW-WC Science & Math Club](#) Faculty Advisor and Associate Professor of Chemistry at 335-5250 ext. 234 or [mohamed.ayoub@uwc.edu](mailto:mohamed.ayoub@uwc.edu).