



## 2002 NASA Academy Group Project

### NASA Investigation of Health Impacts from Atmospheric Dust

#### ➤ Project Description:

- Use remotely sensed (e.g. TOMS, SeaWiFS, MODIS) and ground based data with a Geographic Information System (GIS) to analyze and track the origin, transport and deposition of atmospheric dust
- Develop models of dust transport and atmospheric influences on movements of dust across large areas
- Apply a combination of clinical, environmental and remotely sensed data to investigate relationships between atmospheric dust, the constituents it carries, and health issues such as childhood asthma
- Evaluate current aerosol and particulate sensor technology and potential engineering opportunities for improvement relative to this project
- Participate in a world-wide collaboratory for Environment and Health research



**Atmospheric Transport of African Dust which may be carrying microbes, heavy metals and other contaminants**

NOTE: By design, the NASA Academy Group Project does **not** end after the 10-week summer internship, but continues on an individual and group-wise basis via independent student research, between semester GSFC sponsored workshops, and follow-on summer fellowships. Although follow-on participation is voluntary, Academy alumni are strongly encouraged to stay actively involved to the extent they are able.

