

Trace Atmospheric Gas Analyzer Mobile Laboratories

TAGA Mobile Laboratories

EPA can deploy the specialized Trace Atmospheric Gas Analyzer (TAGA) laboratories to assist during events that require advanced air analytical capabilities. These events include emergency responses (natural, accidental, or intentional), disasters, Homeland Security operations, Superfund removal and remedial activities, enforcement actions, and national security deployments and planning events.

Activating this mobile asset provides on scene analytical support to field operations, which increases the speed in which decision-makers get usable data.

How it Works

Each TAGA bus is a self-contained mobile platform capable of real-time air monitoring, as well as sampling and analysis of collected air samples. The sophisticated, onboard instrumentation provides air monitoring and analysis for many organic and inorganic compounds at very low levels.



The TAGA provides data visualization tools to spatially and temporally coordinate the data. It includes a global positioning system (GPS), which supplies accurate, real-time locational data during mobile monitoring and a geographic information system (GIS), which maps and presents the TAGA's position in real time.

Additional instrumentation can also be incorporated into the TAGA mobile laboratories to increase its capabilities to meet a specific project's goals. This includes, but is not limited to, a mercury analyzer and electrochemical sensors for various gases. The real-time TAGA monitoring results, GPS and other sensor data are made available to decision-makers in near-real time via transmission through the VIPER telemetry system to local or remote computers for analysis and visualization.

activities. The TAGA mobile laboratory has supported the Agency on numerous and varied responses, projects, developments, preparedness activities, and deployments. Examples include: the East Palestine train derailment, Hurricane Harvey, Deepwater Horizon oil spill, Space Shuttle disaster, Hart Senate Building anthrax, US Postal Service facilities anthrax, and World Trade Center 9/11 emergency response.

