What Is An ESMS?

An environmental and sustainability management system is a set of management processes and procedures that allows an organization to analyze, control and reduce the environmental impact of its activities, products and services, and operate with a greater efficiency and control. An ESMS is useful for organizations of any size in both the public and private sectors.

The basic elements of an ESMS include:

- Identifying the organization’s environmental aspects and associated impacts
- Developing and establishing programs to mitigate risks associated with the threats and opportunities
- Identifying objectives and goals associated with programs
- Identifying compliance obligations
- Monitoring and measuring progress in achieving the objectives
- Ensuring employees’ environmental awareness and competence
- Reviewing progress of the ESMS and making improvements

What Are The Benefits?

An ESMS provides tools to help manage your organization’s environmental impacts efficiently and to improve environmental stewardship across the entire organization.

Environmental benefits include:

- Reduction in the number, type and severity of environmental compliance incidents
- Improved relationships with state and federal regulators
- Reduction in waste and pollution
- Recovered resources
- Reduction of air emissions and amount of oil in waste water
- Increased fuel economy

Business benefits include:

- Enhanced public image with system users and the general public
- Improved communications and cooperation through training and outreach
- Reinforcement of environmental processes currently in place
- Proactive management of environmental issues
- Captures employee knowledge (“institutional memory”)
- Documentation of standard operating procedures
- Increased operational efficiencies

“The benefits of adopting an Environmental Management System provides assurance to our employees, regulators, and to the general public that our operations and services are safe and environmentally friendly. In addition, it provides a framework to move beyond compliance and to continually improve and operate more efficiently. Since adopting the ISO 14001:2004 standard in 2006, we have realized over $4.9 million in savings for electricity, fuel and water consumption.”

Daniel Locke, Environmental Compliance Administrator
Utah Transit Authority, Salt Lake City, UT
FTA ESMS Training and Technical Assistance Program Format

The two year program conducted by Virginia Tech faculty includes the following:

- **Baseline Environmental Review** at each participating transit agency facility
- **Three, two and one-half day workshops** held at The Hotel Roanoke and Conference Center in Roanoke, Virginia (see workshop dates and photo below)
- **Gap Audit** at each participating transit agency facility (one day on-site visit conducted by an ISO 14001 certified lead auditor)
- **Final Audit** at each participating transit agency facility (review of documents plus one day on-site visit conducted by an ISO 14001 certified lead auditor)

**Participants**

Each participating transit agency will identify a Core Team consisting of the following five members:

- Senior Executive
- Management Representative
- Environmental Champion
- Operations Manager/Superintendent
- Administrative/Executive Assistant

Teams may choose to add additional members to the Core Team as class space permits.

**ISO 14001 Course Outline**

The course is structured around the clauses of the newly revised ISO 14001:2015 standard, including:

- **Context of the Organization** – understanding the organization and its context; understanding the needs and expectations of interested parties; and determining the scope of the environmental management system
- **Leadership** – leadership and commitment; environmental policy; and organizational roles, responsibilities and authorities
- **Planning** – actions to address risk associated with threats and opportunities; significant environmental aspects; compliance obligations; and environmental objectives and planning to achieve them
- **Support** – resources; competence; awareness; communication - both internal and external; and creating and updating documented information
- **Operation** – operational planning and control; and emergency preparedness and response
- **Performance Evaluation** – monitoring, measurement, analysis and evaluation; evaluation of compliance; internal audit; and management review
- **Improvement** – nonconformity and corrective action and continual improvement

**Workshop Dates**

- **Workshop 1** – May 16-19, 2016
- **Workshop 2** – August 8-11, 2016
- **Workshop 3** – October 10-13, 2016

**Location**

The Hotel Roanoke & Conference Center
Roanoke, Virginia

For more information about the FTA ESMS Institute, please contact Antoinette Quagliata Antoinette.quagliata@dot.gov or 202-366-4265