

53. Coal Mining Spatial Data Standards

Last update 2/18/09

GOAL: Continue to establish American Society for Testing and Materials (ASTM) Coal Mining Spatial Data Standards for the regulatory and AML programs (WR, PS, AR, MCR, CLT)

WHO: National Technical Innovation and Professional Services Program (TIPS).

WHY: Coal mining permit applications submitted by industry and approved by state primacy regulatory authorities contain a large amount of data used to describe planned mining operations. Some of this data is presented on maps in a spatial context displaying the areas to be mined and reclaimed. Some features on these maps, such as the permit boundary or bonded area for example, can be digitally extracted from the maps and managed in a spatial information system to allow regulatory personnel to accurately track the progress of mining and reclamation status at the mine site. Geographic Information System (GIS) technology supports the sharing of this data electronically for use by multiple software applications among many users. To ensure data accuracy and reliability among the various applications and users, especially when comparing data from multiple state programs, standardization defining the features being shared is essential.

WHAT: In late FY2005, TIPS in collaboration with the Interstate Mining Compact Commission (IMCC), Western Interstate Energy Board (WIEB) and National Association of Abandoned Mine Land Programs (NAAML) established the National Coal Mining Geospatial Committee (NCMGC) to promote the use of geospatial technology to help implement SMCRA. The NCMGC requested volunteers from among the approximately 42 SMCRA Geospatial Data Stewards representing participating states, tribes, and OSM offices and from these volunteers formed the Coal Mining Spatial Data Standards ASTM Task Group. The purpose of this group is to establish voluntary standards for critical coal mining features. To date, the group has established a standard for Coal Surface Mining Boundary (September 1, 2007) and the Coal Underground Mining Boundary (April 1, 2008). Additional standards for selected Title 5 and Title 4 coal mining features are under development as shown in the below.

Milestones	Targeted Completion Date	Status	Lead Staff & Other Resources
ASTM approves revision to Coal Surface Mining Boundary standard–ASTM Standard D7384	9/1/2009	In progress	Co-Team Lead: Tom Galya, CHFO; Daniel Kestner, DMME-VA ASTM Task Group
ASTM approves revision to Coal Underground Mining Boundary standard – ASTM Standard D7443	9/1/2009	In progress	Co-Team Lead: Tom Galya, CHFO; Daniel Kestner, DMME-VA ASTM Task Group
Submit Proposed Standard to ASTM for Abandoned Mine Land Planning Unit	7/1/2009	In progress	Co-Team Lead: Tom Galya, CHFO; Daniel Kestner, DMME-VA ASTM Task Group
ASTM approves Standard for Abandoned Mine Land Planning Unit	10/1/2009		Co-Team Lead: Tom Galya, CHFO; Daniel Kestner, DMME-VA ASTM Task Group

Submit Proposed Standard to ASTM for Abandoned Mine Land Problem Area	7/1/2009	In progress	Co-Team Lead: Tom Galya, CHFO; Daniel Kestner, DMME-VA ASTM Task Group
ASTM approves Standard for Abandoned Mine Land Problem Area	10/1/2009		Co-Team Lead: Tom Galya, CHFO; Daniel Kestner, DMME-VA ASTM Task Group

CHALLENGES/OBSTACLES: To coordinate with and obtain agreement from multiple state program and industry representatives on the Coal Mining Spatial Data Standards ASTM Task Group as to what the standards should be.

DO WE HAVE WHAT WE NEED TO ACHIEVE THE GOAL? Yes