US ERA ARCHIVE DOCUMENT

Non-coal surface mine reclamation utilizing flyash

There are two sites in Anne Arundel County operated by BBSS, Inc. that are utilizing flash for backfill. The sites are contiguous. Combined the two sites are 161.8 acres. Flyash is currently coming from BGE Brandon Woods Plant. Bottom ash is being used as a drainage layer on the bottom of the fill and flyash is placed on top in 12" lifts. Each lift is compacted and wetted at the site. All fill is placed a minimum of 4' above the seasonal high groundwater table. Fill will not exceed original grade at the site. 6 inches of low permeable cover are placed on the flyash and then covered with a minimum of 6 inches of topsoil and seeded. Approximately 10 acres are filled at a time in lifts up to final grade.

A 100-foot buffer is maintained between fill areas and property lines.

TCLP analysis are done on the flyash every 3 months on the ash. Samples are taken quarterly from on-site monitoring wells and were taken prior to the initiation of fill activities. The samples are analyzed for the following:

Chloride Barium Nickel

Sulfate Beryllium Nitrate as Nitrogen

Total suspended solids Cadmium Nitrite as Nitrogen

PH Chromium Selenium

Antimony Cyanide Thallium

Arsenic Flouride

Asbestos Mercury

Have had high sulfate readings in one monitoring well. Could be because well is so close to fill area.