DOCUMENTATION OF ENVIRONMENTAL INDICATOR DETERMINATION Interim Final 2/5/99 RCRA Corrective Action Environmental Indicator (EI) RCRIS code (CA725) Current Human Exposures Under Control

Facility Name:	American Environmental Services
Facility Address:	1750 Morgantown Industrial Park, Morgantown, WV 26501
Facility EPA ID #:	WVD 981 107 600

1. Has **all** available relevant/significant information on known and reasonably suspected releases to soil, groundwater, surface water/sediments, and air, subject to RCRA Corrective Action (e.g., from Solid Waste Management Units (SWMU), Regulated Units (RU), and Areas of Concern (AOC)), been **considered** in this EI determination?

	f yes -	check	here	and	continue	with	#2	below.
--	---------	-------	------	-----	----------	------	----	--------

- If no re-evaluate existing data, or
- If data are not available, skip to #6 and enter "IN" (more information needed) status code.

BACKGROUND

The American Environmental Services (AES) facility is located at 1750 Morgantown Industrial Park, Morganton, WV, 26501. The site is located in the Morgantown Industrial Park, southwest of the city of Morgantown, and west of the Monongahela River in Building 170. AES is a chemical waste handler with headquarters in Pittsburgh, Pennsylvania, and additional facilities in Calvert City, Kentucky, and Offices in Pensacola, Florida; Atlanta, Georgia; Charlotte, North Carolina; and Dayton, Ohio.

The Morgantown Industrial Park was constructed in the early 1940s by the US Government for the production of ammonia to support munitions manufacturing. Prior to construction, land use was a mix of wooded and open land.

There are scattered residences and development to the north, east, and south of the Morgantown Industrial Park. The closest residence is less than 1 mile from the facility, and is located across (east) of the Monongahela River.

AES has occupied the facility since September 1999, when it assumed operations and ownership of the permitted facility from Regeneration Technology, Inc. AES purchased the facility and building from the Morgantown Industrial Park (MIP) in March 2000. The Morgantown, WV facility is licensed as a Treatment, Storage, and Disposal Facility (TSDF) and Large Quantity Generator (LQG) of hazardous waste through April 2012.

The facility covers approximately 0.75 acres, comprised of Building 170 and surrounding area in the MIP. The facility building is three-stories in height with approximately 17,000 square feet of space.

AES operates as a transfer facility for RCRA hazardous and non-hazardous wastes. Operations include storage, repacking/consolidating compatible waste streams, and transportation of wastes to off-site disposal facilities. The facility generates small amounts of contaminated personal protective equipment (PPE) during repacking/consolidation activities. Operations are segregated into functional areas designated as the Central Storage Area (Area A), Lower Storage Area (Area C), Loading Dock Area (Area B), Yard Area, Department of Transportation (DOT) 10-day Trailer Staging Area, Boiler Room, and Offices. The facility has not received any shipments of waste since March 27, 2009.

The facility is permitted to accept a wide-variety of hazardous wastes including but not limited to contaminated soil, sludge, wastewaters, filter media, paint related wastes, sand blast materials, lamps, batteries, off-specification products, spent solvents, and oils. The facility is currently permitted to store a maximum of 50,000 gallons of waste at any given time.

AES manages hazardous wastes containing greater than 500 ppm volatile organics by weight and typically utilizes Level I containers (120, 85 or 55-gallon drums and smaller containers) to manage these hazardous waste streams. The Level I containers meet DOT standards and utilize covers with no visible gaps. Containers of waste are kept closed and only opened to sample, add or remove waste. Recent inspections showed no concerns with this process.

Nine aboveground storage tanks (ASTs) and one underground storage tank (UST) have been identified in the files reviewed. The UST was filled with concrete and closed in April 1987 under approval of WVDNR. Of the ASTs identified, eight were located in the Tank Farm Area; while the ninth was located inside the building, next to the boiler. The ASTs have been removed.

As of 2000, there were 6 ASTs on-site; three tanks were used for the treatment and storage of collected storm water and three non-RCRA tanks were used for bulking of non-hazardous liquids such as oils and contaminated wastewaters. These tanks have been removed.

The facility is currently inactive; an AES employee periodically visits the site for maintenance purposes.

Definition of Environmental Indicators (for the RCRA Corrective Action)

Environmental Indicators (EI) are measures being used by the RCRA Corrective Action program to go beyond programmatic activity measures (e.g., reports received and approved, etc.) to track changes in the quality of the environment. The two EI developed to-date indicate the quality of the environment in relation to current human exposures to contamination and the migration of contaminated groundwater. An EI for non-human (ecological) receptors is intended to be developed in the future.

Definition of "Current Human Exposures Under Control" EI

A positive "Current Human Exposures Under Control" EI determination ("YE" status code) indicates that there are no "unacceptable" human exposures to "contamination" (i.e., contaminants in concentrations in excess of appropriate risk-based levels) that can be reasonably expected under current land- and groundwater-use conditions (for all "contamination" subject to RCRA corrective action at or from the identified facility (i.e., site-wide)).

Relationship of EI to Final Remedies

While Final remedies remain the long-term objective of the RCRA Corrective Action program the EI are near-term objectives which are currently being used as Program measures for the Government Performance and Results Act of 1993, GPRA). The "Current Human Exposures Under Control" EI are for reasonably expected human exposures under current land- and groundwater-use conditions ONLY, and do not consider potential future land- or groundwater-use conditions or ecological receptors. The RCRA Corrective Action program's overall mission to protect human health and the environment requires that Final remedies address these issues (i.e., potential future human exposure scenarios, future land and groundwater uses, and ecological receptors).

Duration / Applicability of EI Determinations

EI Determinations status codes should remain in RCRIS national database ONLY as long as they remain true (i.e., RCRIS status codes must be changed when the regulatory authorities become aware of contrary information).

Current Human Exposures Under Control

Environmental Indicator (EI) RCRIS code (CA725)

2. Are groundwater, soil, surface water, sediments, or air **media** known or reasonably suspected to be "**contaminated**"¹ above appropriately protective risk-based "levels" (applicable promulgated standards, as well as other appropriate standards, guidelines, guidance, or criteria) from releases subject to RCRA Corrective Action (from SWMUs, RUs or AOCs)?

	Yes	<u>No</u>	<u>?</u>	Rationale / Key Contaminants
Groundwater		X		Current quality not known. Two monitoring wells exist, however not been sampled in several years. No evidence that minor releases reached groundwater.
Air (indoors) ^{2}		Х		All stored containers of wastes are kept closed
Surface Soil (e.g., <2 ft)		Х		Minor releases in mid 80s to early 90s were cleaned up or did not reach soil.
Surface Water		Х		Surface water drains to the Monongahela River, through intermittent streams. Closest named river tributary is Dents Run, which is located one mile northeast of the facility while the closest unnamed tributary is located ¹ / ₂ mile south of facility. No evidence of releases to surface water.
Sediment		Х		See surface water.
Subsurf. Soil (e.g., >2 ft)		Х		Minor releases in mid 80s to early 90s were cleaned up or did not reach soil
Air (outdoors)		Х		No activities take place outdoors

- If no (for all media) skip to #6, and enter "YE," status code after providing or citing appropriate "levels," and referencing sufficient supporting documentation demonstrating that these "levels" are not exceeded.
- If yes (for any media) continue after identifying key contaminants in each "contaminated" medium, citing appropriate "levels" (or provide an explanation for the determination that the medium could pose an unacceptable risk), and referencing supporting documentation.
- If unknown (for any media) skip to #6 and enter "IN" status code.

Rationale and Reference(s):

Groundwater, surface soil, and subsurface soil is not known or reasonably suspected to be contaminated above appropriately protective risk-based levels at the AES facility. Similarly, there is no indication of releases that would have reached surface water or sediment in the vicinity of the site.

There is no indication of current air emissions that would negatively impact indoor and/or outdoor air quality. No recorded or documented releases of contaminants to the environment or odors at the AES facility were identified in the documents reviewed.

3. Are there **complete pathways** between "contamination" and human receptors such that exposures can be reasonably expected under the current (land- and groundwater-use) conditions?

Summary Exposure Pathway Evaluation Table

Potential Human Receptors (Under Current Conditions)

"Contaminated" Media	Residents	Workers	Day-Care	Construction	Trespassers	Recreation	Food ³
Groundwater							
Air (indoors)							
Soil (surface, e.g., <2 ft)							
Surface Water							
Sediment							
Soil (subsurface e.g., >2 ft)							
Air (outdoors)							

Instructions for <u>Summary Exposure Pathway Evaluation Table</u>:

- 1. Strike-out specific Media including Human Receptors' spaces for Media, which are not "contaminated" as identified in #2 above.
- 2. Enter "yes" or "no" for potential "completeness" under each "Contaminated" Media -- Human Receptor combination (Pathway).

Note: In order to focus the evaluation to the most probable combinations some potential "Contaminated" Media - Human Receptor combinations (Pathways) do not have check spaces ("____"). While these combinations may not be probable in most situations they may be possible in some settings and should be added as necessary.

- If no (pathways are not complete for any contaminated media-receptor combination) skip to #6, and enter "YE" status code, after explaining and/or referencing condition(s) in-place, whether natural or manmade, preventing a complete exposure pathway from each contaminated medium (e.g., use optional Pathway Evaluation Work Sheet to analyze major pathways).
- If yes (pathways are complete for any "Contaminated" Media Human Receptor combination) continue after providing supporting explanation.
- If unknown (for any "Contaminated" Media Human Receptor combination) skip to #6 and enter "IN" status code.

Rationale and Reference(s):

³ Indirect Pathway/Receptor (e.g., vegetables, fruits, crops, meat and dairy products, fish, shellfish, etc.)

- 4. Can the **exposures** from any of the complete pathways identified in #3 be reasonably expected to be "**significant**"⁴ (i.e., potentially "unacceptable" because exposures can be reasonably expected to be: 1) greater in magnitude (intensity, frequency and/or duration) than assumed in the derivation of the acceptable "levels" (used to identify the "contamination"); or 2) the combination of exposure magnitude (perhaps even though low) and contaminant concentrations (which may be substantially above the acceptable "levels") could result in greater than acceptable risks)?
 - If no (exposures can not be reasonably expected to be significant (i.e., potentially "unacceptable") for any complete exposure pathway) skip to #6 and enter "YE" status code after explaining and/or referencing documentation justifying why the exposures (from each of the complete pathways) to "contamination" (identified in #3) are not expected to be "significant."
 - If yes (exposures could be reasonably expected to be "significant" (i.e., potentially "unacceptable") for any complete exposure pathway) - continue after providing a description (of each potentially "unacceptable" exposure pathway) and explaining and/or referencing documentation justifying why the exposures (from each of the remaining complete pathways) to "contamination" (identified in #3) are not expected to be "significant."
 - \square
- If unknown (for any complete pathway) skip to #6 and enter "IN" status code

Rationale and Reference(s):

⁴ If there is any question on whether the identified exposures are "significant" (i.e., potentially "unacceptable") consult a human health Risk Assessment specialist with appropriate education, training and experience.

5.	Can the "significant" exposures (identified in #4) be shown to be within acceptable limits?
	If yes (all "significant" exposures have been shown to be within acceptable limits) - continue and enter "YE" after summarizing <u>and</u> referencing documentation justifying why all "significant" exposures to "contamination" are within acceptable limits (e.g., a site-specific Human Health Risk Assessment).
	If no - (there are current exposures that can be reasonably expected to be "unacceptable")- continue and enter "NO" status code after providing a description of each potentially "unacceptable" exposure.
	If unknown (for any potentially "unacceptable" exposure) - continue and enter "IN" status code.

Rationale and Reference(s):

- 6. Check the appropriate RCRIS status codes for the Current Human Exposures Under Control EI (event code CA725), and obtain Supervisor (or appropriate Manager) signature and date on the EI determination below (attach appropriate supporting documentation as well as a map of the facility).
 - YE Yes, "Current Human Exposures Under Control" has been verified. Based on a review of the information contained in this EI Determination, "Current Human Exposures" are expected to be "Under Control" at the American Environmental Services facility, EPA ID # WVD 981 107 600, located at 1750 Morgantown Industrial Park, Morgantown, WV 26501. Specifically, this determination indicates that the migration of "contaminated" groundwater is under current and reasonably expected conditions. This determination will be re-evaluated when the Agency/State becomes aware of significant changes at the facility.
 - NO "Current Human Exposures" are NOT "Under Control."
 - IN More information is needed to make a determination.

Completed by	(signature)	-S-	Date	7/29/10
	(print)	Denis Zielinski		
	(title)	Senior RPM		
Supervisor	(cignoture)	-S-	Date	8/2/10
Supervisor	<u>(signature)</u>	-0-	Date	0/2/10
Supervisor	(print)	Luis Pizarro		8/2/10
Supervisor		~	Date _	6/2/10

Locations where References may be found:

US EPA Region III Land & Chemicals Division 1650 Arch Street Philadelphia, PA 19103

Contact telephone and e-mail numbers

(name)	Denis M. Zielinski
(phone #)	215-814-3431
(e-mail)	zielinski.denis@epa.gov