



Public Notice

U S Army USACE
of Engineers
Huntington District

In reply refer to Public Notice No. 200401542 Issuance Date:
October 13, 2006

Stream: U/T Rush Creek Closing Date:
November 13, 2006

Please address all comments and inquiries to:
U.S. Army USACE of Engineers, Huntington District
ATTN: CELRH-OR-F Public Notice No. (*reference above*)
502 Eighth Street
Huntington, West Virginia 25701-2070 Phone: (304) 399-5710

PUBLIC NOTICE: The purpose of this public notice is to inform you of a proposal for work in which you might be interested. It is also to solicit your comments and information to better enable us to make a reasonable decision on factors affecting the public interest. We hope you will participate in this process.

REGULATORY PROGRAM: Since its early history, the U.S. Army Corps of Engineers (USACE) has played an important role in the development of the nation's water resources. Originally, this involved construction of harbor fortifications and coastal defenses. Later duties included the improvement of waterways to provide avenues of commerce. An important part of our mission today is the protection of the nation's waterways through the administration of the USACE Regulatory Program.

SECTION 10: The USACE is directed by Congress under Section 10 of the Rivers and Harbors Act of 1899 (33 USC 403) to regulate all work or structures in or affecting the course, condition or capacity of navigable waters of the United States (U.S.). The intent of this law is to protect the navigable capacity of waters important to interstate commerce.

SECTION 404: The USACE is directed by Congress under Section 404 of the Clean Water Act (33 USC 1344) to regulate the discharge of dredged and fill material into all waters of the United States, including wetlands. The intent of the law is to protect the nation's waters from the indiscriminate discharge of material capable of causing pollution and to restore and maintain their chemical, physical and biological integrity.

TO WHOM IT MAY CONCERN: The following application has been submitted for a Department of the Army Permit under the provisions of Section 404 of the Clean Water Act. This notice serves as the USACE request to the West Virginia Department of Environmental Protection to act on Section 401 Water Quality Certification for the following application.

APPLICANT: Keystone Industries, LLC
P. O. Box 4386
Charleston, West Virginia 25364

LOCATION: The proposed project would be located approximately 1.5 miles west of Marmet, Kanawha County, West Virginia. The proposed project would result in disturbances to the unnamed tributaries of Rush Creek and the Right Fork of Rush Creek. Rush Creek ultimately flows into the Kanawha River, a navigable (Section 10) water of the U.S.

DESCRIPTION OF THE PROPOSED WORK: The applicant proposes to place dredged and/or fill material into approximately 9,380 linear feet (1.210 acre) of waters of the U.S. in conjunction with the construction, operation and reclamation of the Rush Creek No. 2 surface mine [Surface Mining Control and Reclamation Act (SMCRA) Permit S-3004-04]. Impacts to waters of the U.S. would involve the construction of valley fills (No. 1, No. 2, No. 3 and No. 3B) and associated sediment ponds (No. RC-1, No. RC-1A, and No. RC2-C). The proposed mining operation is a second generation project, recovering coal from pre-law contour and auger mining operations conducted in the Stockton coal bed that left un-reclaimed highway and seep discharges. Detailed descriptions of proposed impacts are listed in Attachment A.

This proposed complex would be accomplished over a 9-year life of mine. According to the applicant, the purpose of the project is to recover the bituminous coal reserves from mainly the Stockton Seam. Through construction and operation of the proposed project, the applicant seeks to recover 1,785,320 tons of coal from the above mentioned coal seam. Plans for the proposed Rush Creek Mine No. 2 are attached to this public notice.

The applicant's Surface Mine Applications (SMA) S-3004-04 was approved by the West Virginia Department of Environmental Protection (WVDEP) under the SMCRA on April 3, 2006.

ALTERNATIVE ANALYSIS: This project is not considered to be water dependent; therefore, the applicant is required to show that other less damaging practicable alternatives are not available that would achieve the overall project purpose. No permit will be issued until our review of the alternative analysis clearly shows that upland alternatives are not available to achieve the overall project purpose.

MITIGATION PLAN: The applicant has submitted a conceptual compensatory mitigation plan (CMP) to compensate for permanent and temporary impacts to waters of the U.S. regulated by the Department of the Army, Corps of Engineers. To compensate for impacts to waters of the U.S., the stream segments impacted by the proposed construction activities would be restored to their pre-mining conditions. The applicant has proposed to use natural channel design techniques and provide a minimum of a 50-foot vegetated buffer zone.

WATER QUALITY CERTIFICATION: A Section 401 Water Quality Certification is required for this project. It is the applicant's responsibility to obtain certification from the WVDEP.

HISTORIC AND CULTURAL RESOURCES: The National Register of Historic Places (NRHP) has been consulted and it has been determined there are no properties currently listed on the register that are in the area affected by the project. A copy of this public notice will be sent to the SHPO for their review. Additional comments concerning archeological sensitivity of a project area should be based upon collected data.

ENDANGERED/THREATENED SPECIES REVIEW: Two federally listed endangered species, the Indiana bat (*Myotis sodalis*) and Virginia big-eared bat (*Corynorhinus townsendii virginianus*) may occur within the project area. The United States Fish and Wildlife Service, West Virginia Field Office (USFWS) has stated if a total of less than 17 acres of Indiana bat summer habitat would be removed as a result of a proposed project, tree removal can occur at any season of the year. However, if 17 acres or more would be disturbed, the USFWS has recommended one of two options to avoid incidental take of the Indiana bat. Although each proposed deed mine site would disturb less than 17 acres individually the proposed complex cumulatively would result in disturbances to a total of nearly 51 acres. Therefore, the USACE has determined two options are available to the applicant to address potential adverse effects to the Indiana bat. The applicant may conduct a mist net survey from May 15 to August 15 using the mist net protocol outlined in the draft Indiana bat Recovery Plan. Another option is to presume Indiana bats are present and conduct all timber removal on the project area from November 15 to March 31. If this option is chosen, an analysis of the post-project Indiana bat summer habitat must be performed within a two-mile radius of the center point of the project area. If the USFWS determines the extent of disturbance is not significant to affect the Indiana bat, the project may proceed with seasonal restrictions. Conversely, if the USFWS determines the extent of disturbance is significant and would likely adversely affect the Indiana bat, a mist net survey can be conducted to determine if the Indiana bats are present. The applicant's proposed project area must also be surveyed to determine the presence of old abandoned mine portals to determine their presence and likelihood to support summer or winter colonies of the endangered Virginia big-eared bat or provide hibernaculum for the Indiana bat. Upon receipt of the required surveys and/or analyses, a determination of effect will be made by the Huntington District concerning compliance with Section 7(c) of the Endangered Species Act of 1972 (as amended). This public notice serves as a request to the U.S. Fish and Wildlife Service for any additional information they may have on whether any listed or proposed to be listed endangered or threatened species may be present in the area which would be affected by the activity, pursuant to Section 7(c) of the Endangered Species Act of 1972 (as amended).

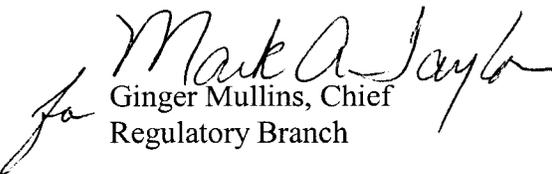
PUBLIC INTEREST REVIEW AND COMMENT: Any person who has an interest that may be adversely affected by the issuance of a permit may request a public hearing. The request must be submitted in writing to the District Engineer on or before the expiration date of this notice and must clearly set forth the interest which may be adversely affected and the manner in which the interest may be adversely affected by the activity. This application will be reviewed in accordance with 33 CFR 320-331, the Regulatory Program of the USACE, and other pertinent laws, regulations, and executive orders. Our evaluation will also follow the guidelines published by the U. S. Environmental Protection Agency pursuant to Section 404(b)(1) of the CWA. Interested parties are invited to state any objections they may have to the proposed work. The decision whether to issue a permit will be based on an evaluation of the probable impact including cumulative impacts of the proposed activity on the public interest. That decision will reflect the national concern for both protection and utilization of important resources. The benefit that reasonably may be expected to accrue from the proposal must be balanced against its reasonably foreseeable detriments. All factors that may be relevant to the proposal will be considered including the cumulative effects thereof; of those are conservation, economics, aesthetics, general environmental concerns, wetlands, historic properties, fish and wildlife values, flood hazards, floodplain values, land use, navigation, shoreline erosion and accretion, recreation, water supply and conservation, water quality, energy needs, safety, food and fiber production, mineral needs, considerations of property ownership and, in general, the needs and welfare of the

people. Written statements on these factors received in this office on or before the expiration date of this public notice will become a part of the record and will be considered in the final determination. A permit will be granted unless its issuance is found to be contrary to the public interest.

SOLICITATION OF COMMENTS: The USACE is soliciting comments from the public; Federal, state, and local agencies and officials; Indian Tribes; and other interested parties in order to consider and evaluate the impacts of this proposed activity. For accuracy and completeness of the administrative record, all data in support of or in opposition to the proposed work should be submitted in writing setting forth sufficient detail to furnish a clear understanding of the reasons for support or opposition. Any comments received will be considered by the USACE to determine whether to issue, modify, condition or deny a permit for this proposal. To make this decision, comments are used to assess impacts on endangered species, historic properties, water quality, general environmental effects, and the other public interest factors listed above. Comments are used in the preparation of an Environmental Assessment and/or an Environmental Impact Statement pursuant to the National Environmental Policy Act. Comments are also used to determine the need for a public hearing and to determine the overall public interest of the proposed activity.

CLOSE OF COMMENT PERIOD: All comments pertaining to this Public Notice must reach this office on or before the close of the comment period listed on page one of this Public Notice. If no comments are received by that date, it will be considered that there are no objections. Comments and requests for additional information should be submitted to Mrs. Sarah Workman, Project Manager, South Regulatory Section, CELRH-OR-FS, USACE Huntington District, 502 Eighth Street, Huntington, West Virginia 25701-2070. Please note names and addresses of those who submit comments in response to this public notice become part of our administrative record and, as such, are available to the public under provisions of the Freedom of Information Act. Thank you for your interest in our nation's water resources.

(W)


Ginger Mullins, Chief
Regulatory Branch

Attachment A.

Rush Creek No. Surface Mine
Article 3 Number S-3004-04

Proposed Watershed Impacts

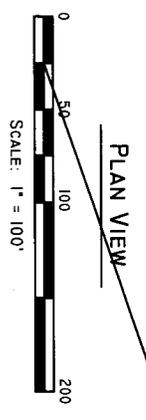
<u>Proposed Structure</u>	<u>Stream Description/Location</u>	<u>Impact</u>	
		<u>Feet</u>	<u>Acres</u>
Valley Fill No. 1	UT Rush Creek	1155	0.112
Valley Fill No. 1	UT UT Rush Creek	560	0.044
Valley Fill No. 2	UT Rush Creek	1772	0.201
Drainage Control Pond 1 Embankment	UT Rush Creek	99	0.016
Drainage Control Pond 1A Embankment	UT Rush Creek	78	0.011
UT Rush Mine – through		303	0.020
Valley Fill No. 3	UT of Right Fork Rush Creek	2157	0.317
Valley Fill No. 3B	UT of Right Fork Rush Creek	775	0.084
Drainage Control Pond RC-2C Embankment	UT Right Fork Rush Creek	125	0.021
Drainage Control Pond RC-2C; disposal area impacts	UT of Right Fork Rush Creek	200	0.016
UT Rt. Fork Mine-through		44	0.004
UT Rt. Fork Mine-through		163	0.030
	Total Impacts	7431	0.876

Proposed Isolated Segments**(Upstream toe of drainage structure embankment to toe of fill)**

<u>Proposed Structure</u>	<u>Stream Description/Location</u>	<u>Impact</u>	
		<u>Feet</u>	<u>Acres</u>
Pond 1 upstream toe to Pond 1A	UT Rush Creek	271	0.043
Pond 1A upstream toe to toe VF2	UT Rush Creek	1220	0.204
Confluence to toe VF 1	UT Rush Creek	92	0.005
Pond RC-2C upstream toe to VF3	UT Right Fork Rush Creek	368	0.082
	Total Impacts	1951	0.334

PURPOSE: INSTALL TEMPORARY DRAINAGE CONTROL POND

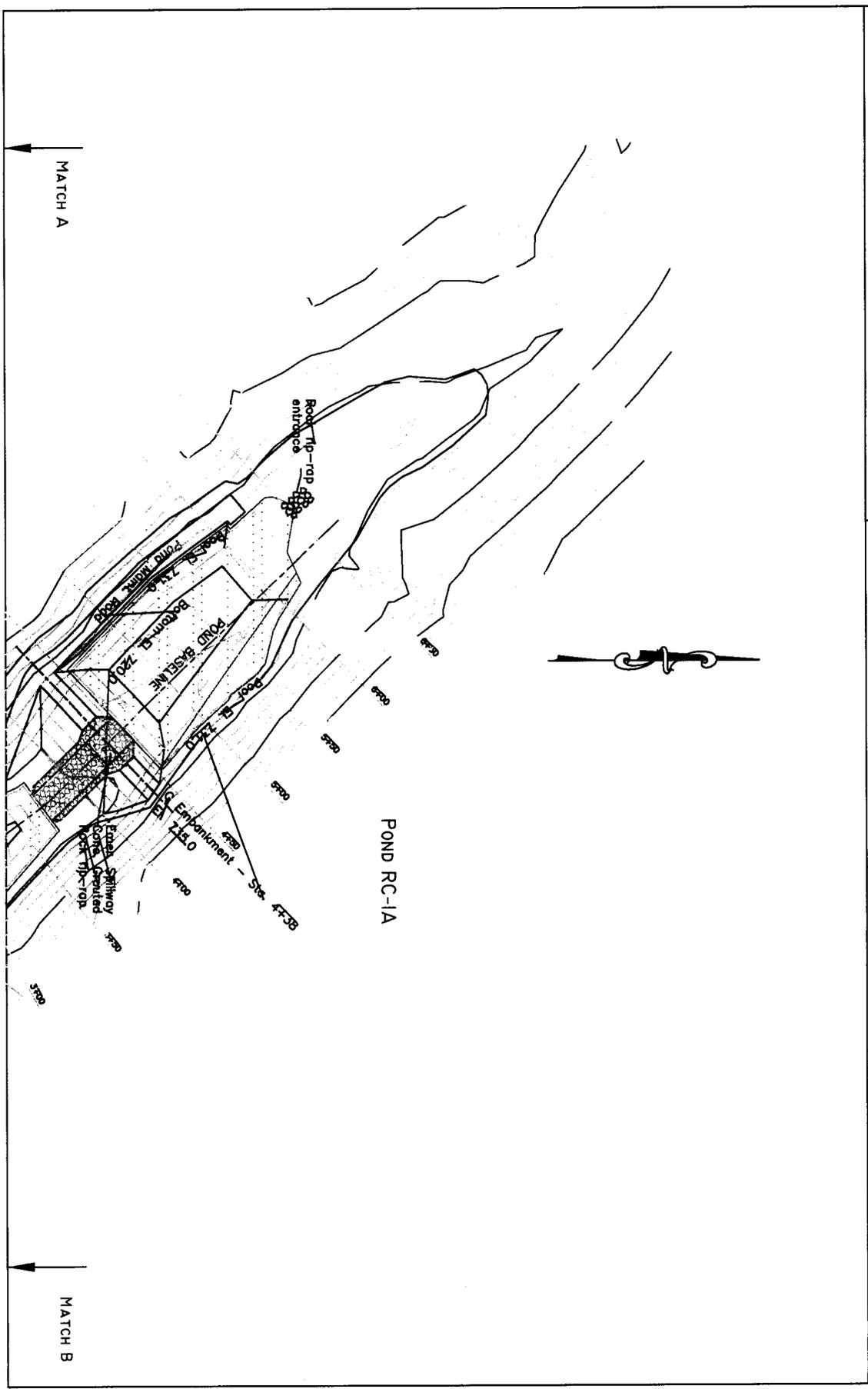
FACILITY: KEYSTONE DEVELOPMENT
RUSH CREEK NO. 2 SURFACE MINE
UT AND RIGHT FORK OF /AND
RUSH CREEK



KEYSTONE INDUSTRIES, LLC DBA
KEYSTONE DEVELOPMENT, LLC
RUSH CREEK NO. 2 SURFACE MINE
PONDS NO. RC-1 AND RC-1A PLAN VIEW

DATE: 10-02-06

SHEET 2 OF 15

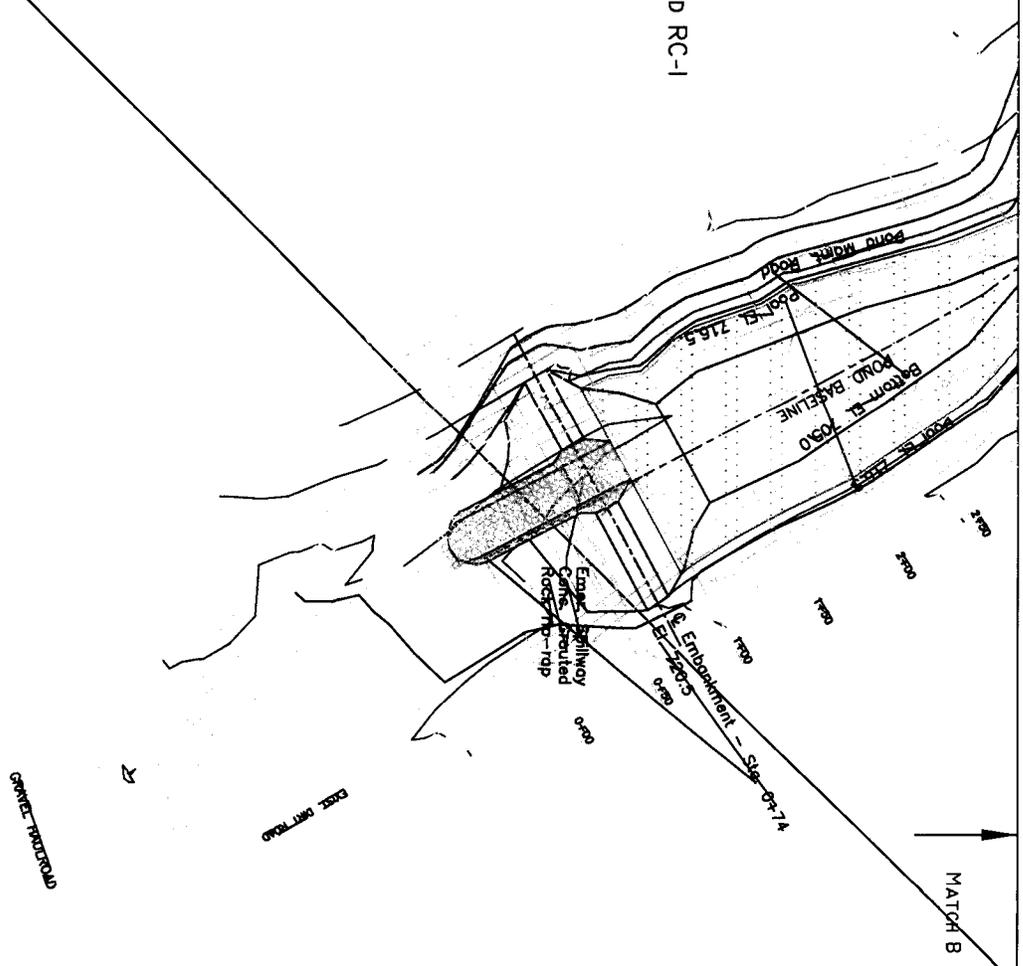


MATCH A



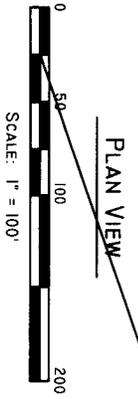
MATCH B

POND RC-1



PURPOSE: INSTALL TEMPORARY DRAINAGE CONTROL POND

FACILITY: KEYSTONE DEVELOPMENT
 RUSH CREEK NO. 2 SURFACE MINE
 UT AND RIGHT FORK OF/AND
 RUSH CREEK

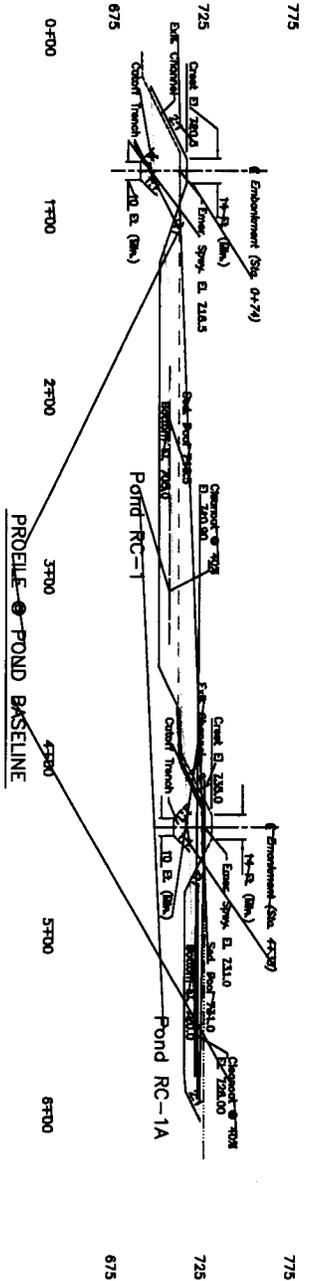


KEYSTONE INDUSTRIES, LLC DBA
 KEYSTONE DEVELOPMENT, LLC

RUSH CREEK NO. 2 SURFACE MINE
 PONDS NO. RC-1 AND RC-1A PLAN VIEW

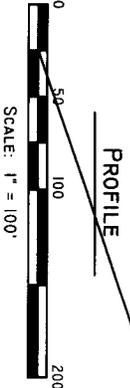
DATE: 10-02-06

SHEET 3 OF 15



PURPOSE: INSTALL TEMPORARY DRAINAGE CONTROL POND

FACILITY: KEYSTONE DEVELOPMENT
 RUSH CREEK NO. 2 SURFACE MINE
 UT AND RIGHT FORK OF/AND
 RUSH CREEK

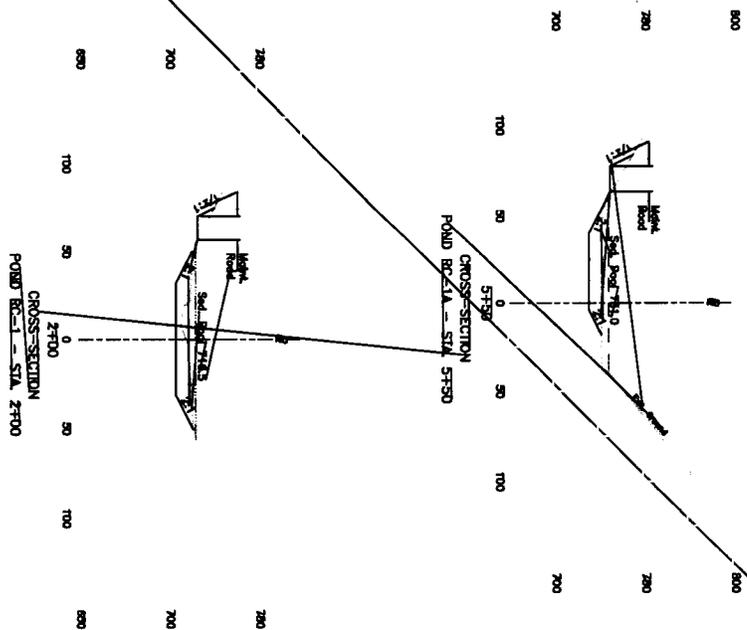
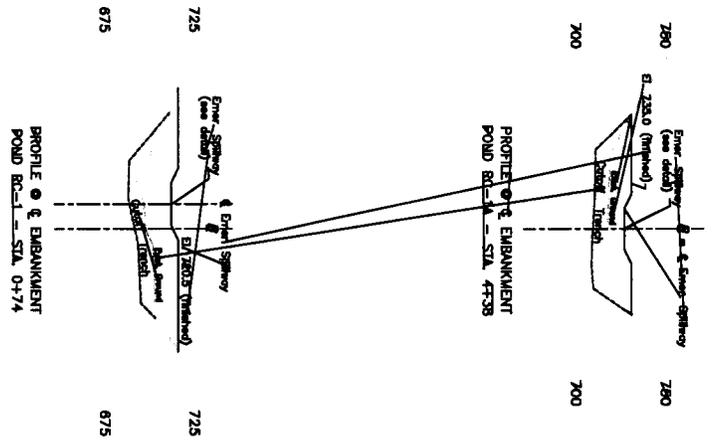


KEYSTONE INDUSTRIES, LLC DBA
 KEYSTONE DEVELOPMENT, LLC

RUSH CREEK NO. 2 SURFACE MINE
 PONDS NO. RC-1 & RC-1A PROFILE

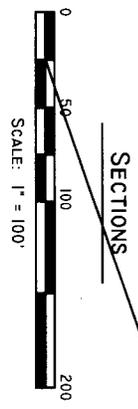
DATE: 10-02-06

SHEET 4 OF 15



PURPOSE: INSTALL TEMPORARY DRAINAGE CONTROL POND

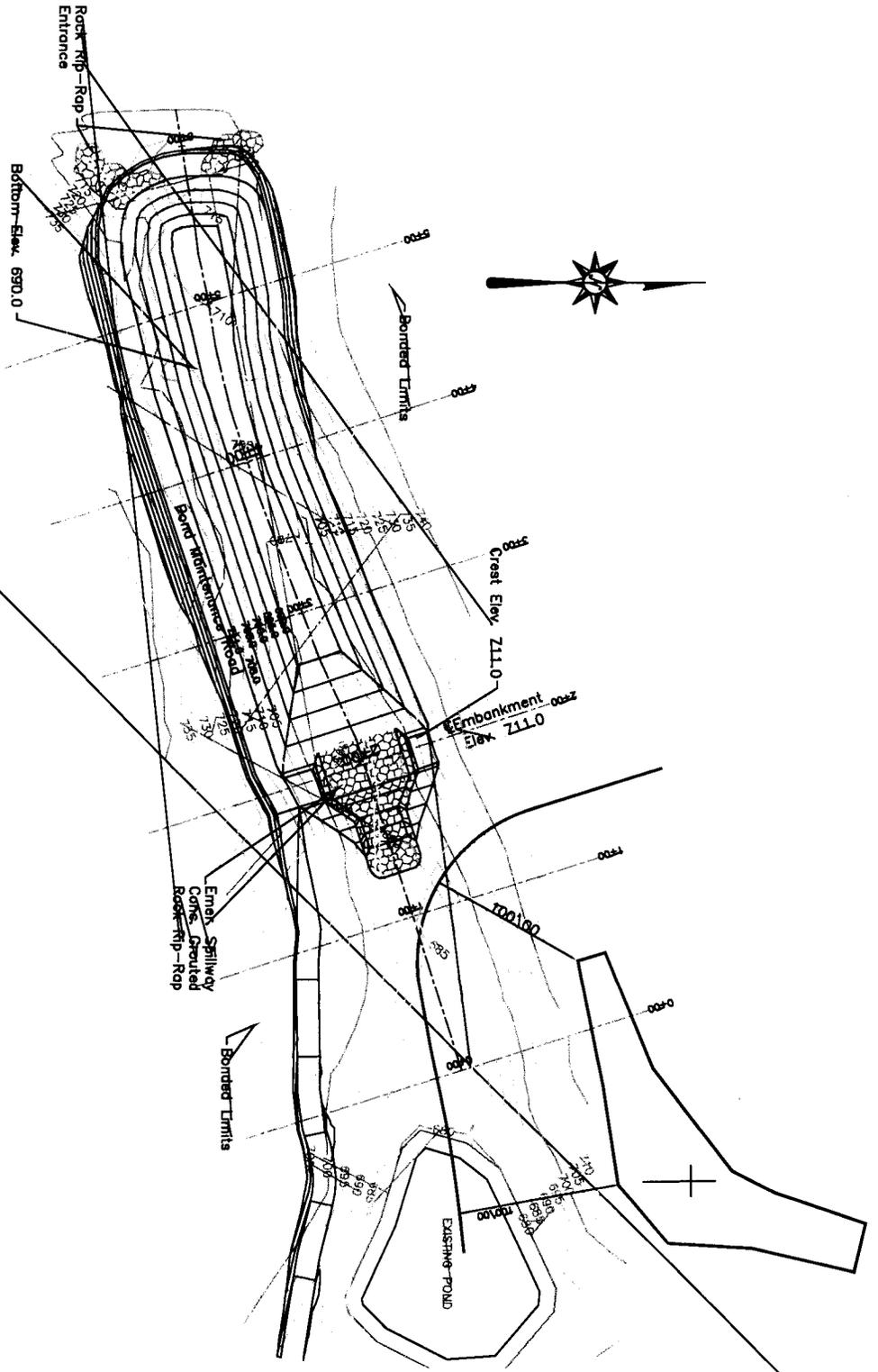
FACILITY: KEYSTONE DEVELOPMENT
 RUSH CREEK NO. 2 SURFACE MINE
 UT AND RIGHT FORK OF/AND
 RUSH CREEK



KEYSTONE INDUSTRIES, LLC DBA
 KEYSTONE DEVELOPMENT, LLC
 RUSH CREEK NO. 2 SURFACE MINE
 PONDS NO. RC-1 & 1A SECTIONS

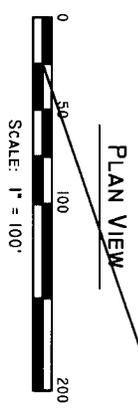
DATE: 10-02-06

SHEET 5 OF 15



PURPOSE: INSTALL TEMPORARY DRAINAGE CONTROL POND

FACILITY: KEYSTONE DEVELOPMENT
RUSH CREEK NO. 2 SURFACE MINE
UT AND RIGHT FORK OF /AND
RUSH CREEK

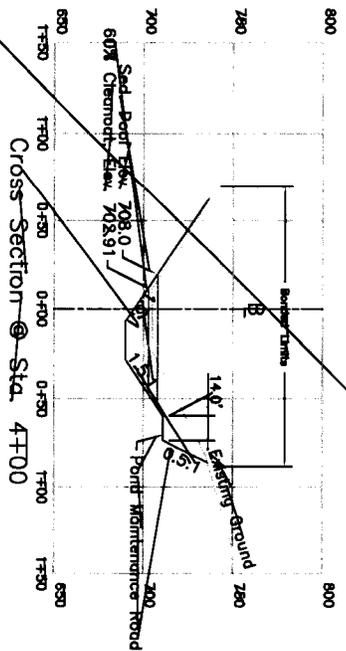
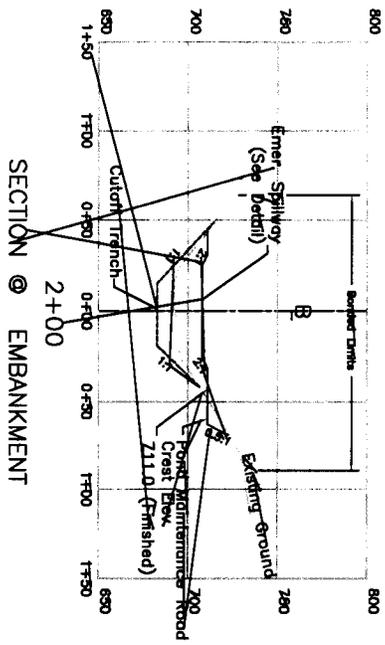


KEYSTONE INDUSTRIES, LLC DBA
KEYSTONE DEVELOPMENT, LLC

RUSH CREEK NO. 2 SURFACE MINE
POND NO. RC-2C PLAN VIEW

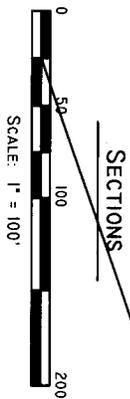
DATE: 10-02-06

SHEET 6 OF 15



PURPOSE: INSTALL TEMPORARY DRAINAGE CONTROL POND

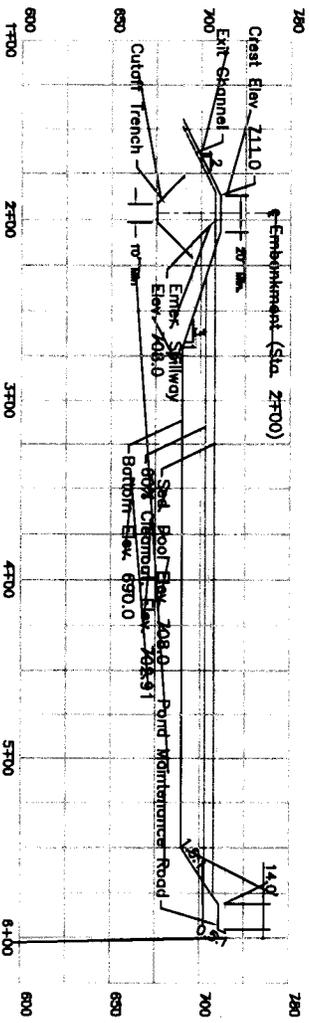
FACILITY: KEYSTONE DEVELOPMENT
 RUSH CREEK NO. 2 SURFACE MINE
 UT AND RIGHT FORK OF/AND
 RUSH CREEK



KEYSTONE INDUSTRIES, LLC DBA
 KEYSTONE DEVELOPMENT, LLC

RUSH CREEK NO. 2 SURFACE MINE
 POND NO. RC-2C CROSS-SECTIONS

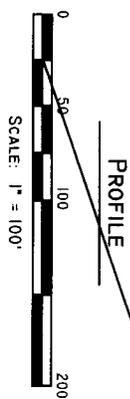
DATE: 10-02-06



PROFILE - POND BASELINE

PURPOSE: INSTALL TEMPORARY DRAINAGE CONTROL POND

FACILITY: KEYSTONE DEVELOPMENT
RUSH CREEK NO. 2 SURFACE MINE
UT AND RIGHT FORK OF/AND
RUSH CREEK

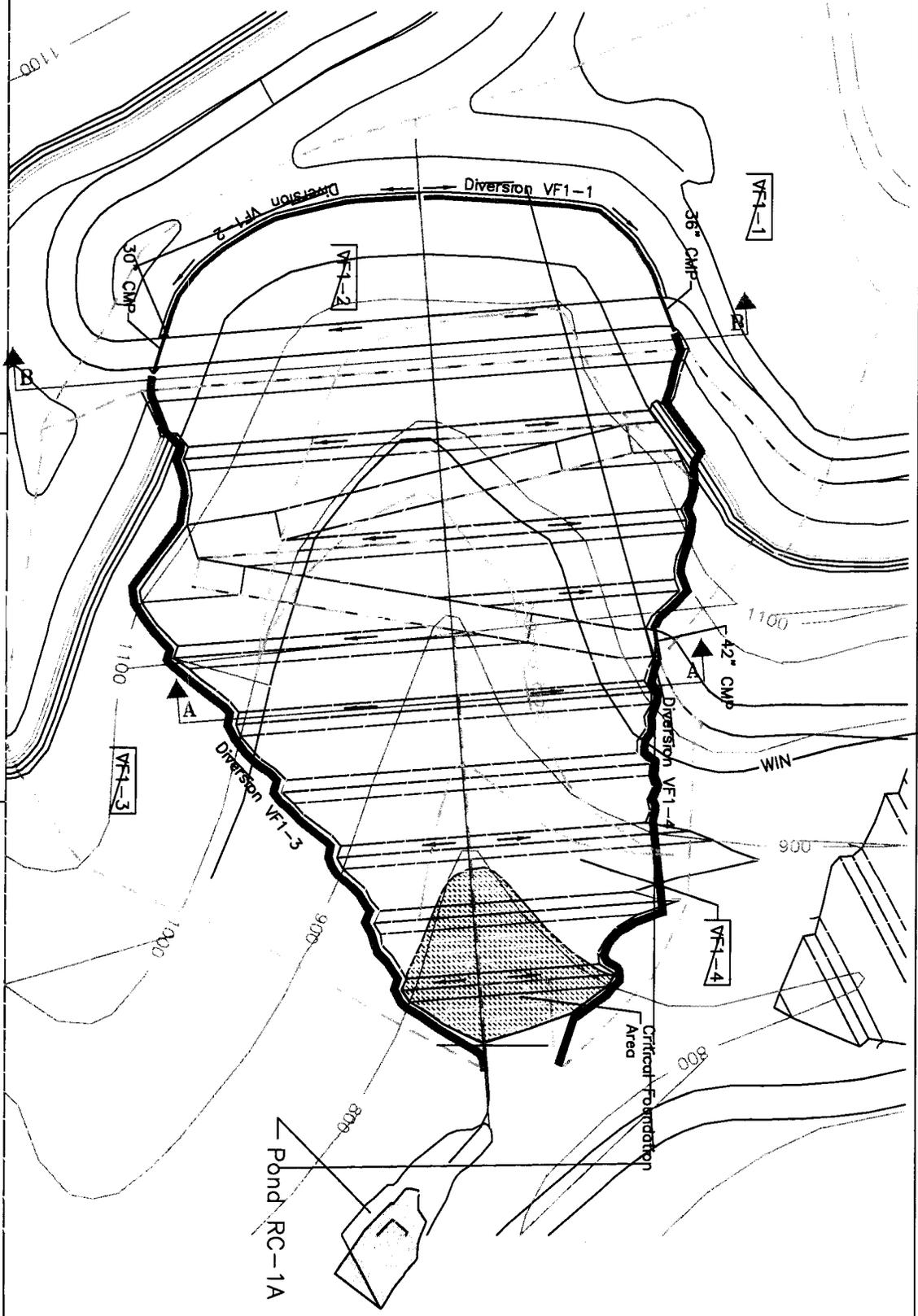


KEYSTONE INDUSTRIES, LLC DBA
KEYSTONE DEVELOPMENT, LLC

RUSH CREEK NO. 2 SURFACE MINE
POND NO. RC-2C PROFILE

DATE: 10-02-06

SHEET 8 OF 15



PURPOSE: CONSTRUCT PERMANENT SURFACE MINE OVERBURDEN FILL

FACILITY: KEYSTONE DEVELOPMENT, LLC
 RUSH CREEK NO. 2 SURFACE MINE
 UT AND RIGHT FORK OF/AND
 RUSH CREEK

PLAN VIEW

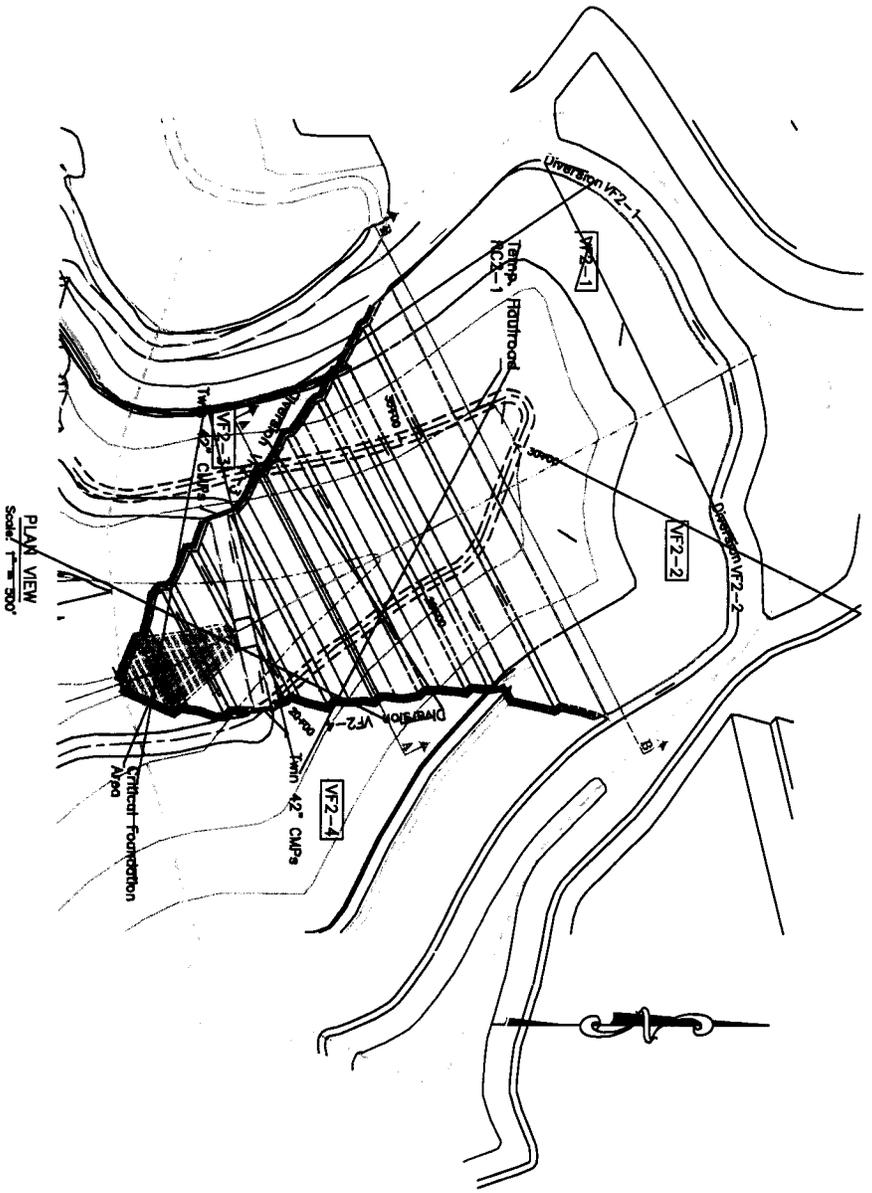
SCALE: 1" = 250'

KEYSTONE INDUSTRIES, LLC DBA
 KEYSTONE DEVELOPMENT, LLC

RUSH CREEK NO. 2 SURFACE MINE
 VALLEY FILL NO. 1 PLAN

DATE: 10-02-06

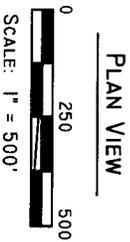
SHEET 9 OF 15



PLAN VIEW
Scale: 1" = 500'

PURPOSE: CONSTRUCT PERMANENT SURFACE MINE OVERBURDEN FILL

FACILITY: KEYSTONE DEVELOPMENT, LLC
RUSH CREEK NO. 2 SURFACE MINE
UT AND RIGHT FORK OF/AND RUSH CREEK

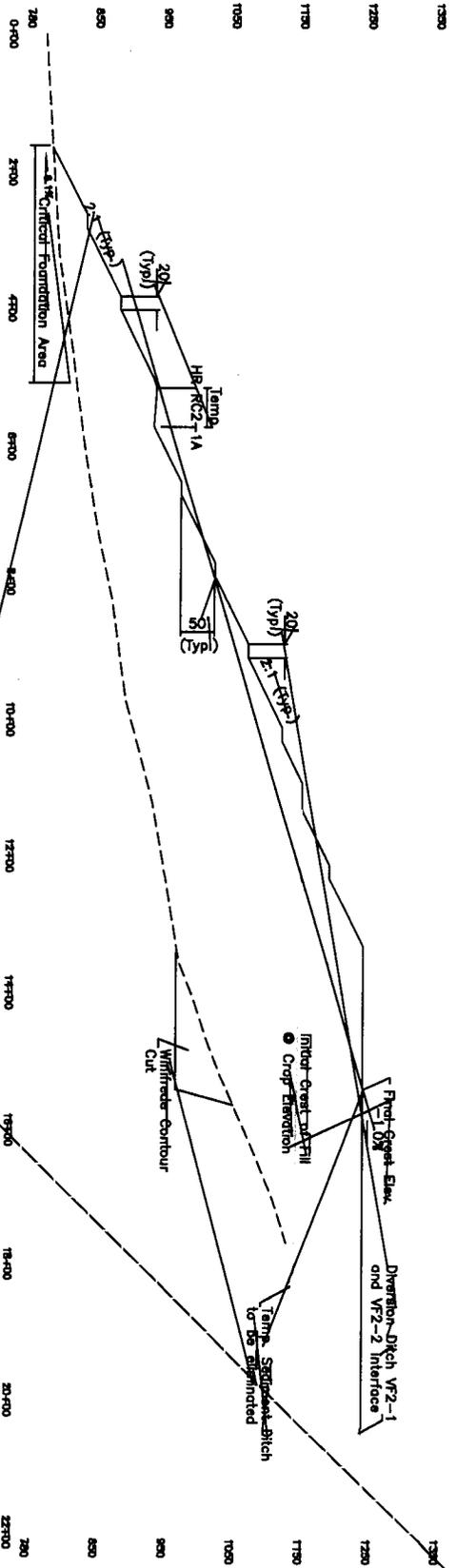


KEYSTONE INDUSTRIES, LLC DBA
KEYSTONE DEVELOPMENT, LLC

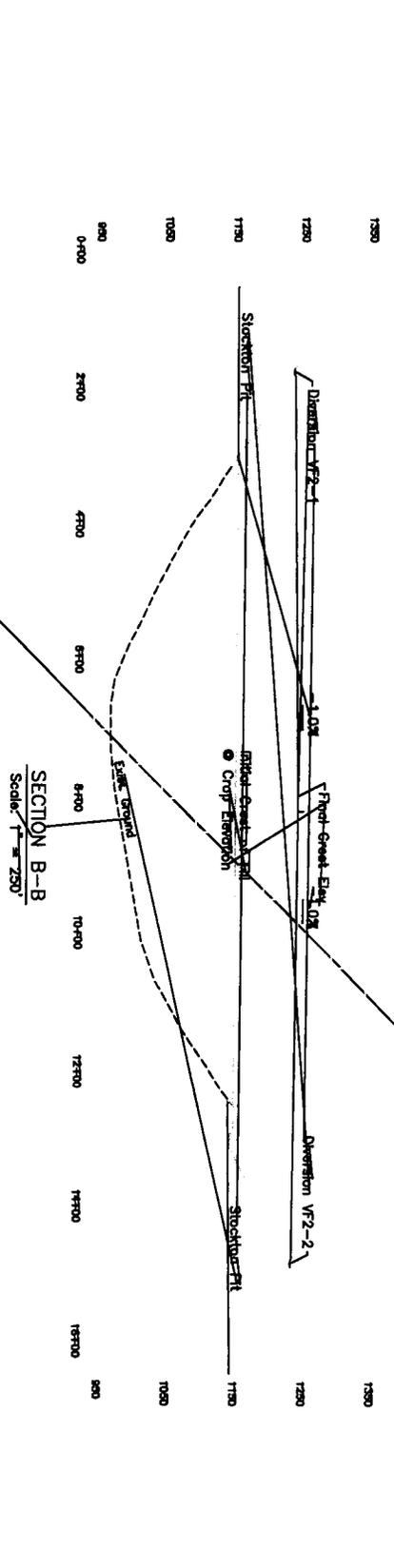
RUSH CREEK NO. 2 SURFACE MINE
VALLEY FILL NO. 2 PLAN

DATE: 10-02-06

SHEET 11 OF 15



PROFILE A-GENERINE HOLLOW
Scale: 1" = 250'



SECTION B-B
Scale: 1" = 250'

PURPOSE: CONSTRUCT PERMANENT SURFACE MINE OVERBURDEN FILL

FACILITY: KEYSTONE DEVELOPMENT, LLC
RUSH CREEK NO. 2 SURFACE MINE
UT AND RIGHT FORK OF/AND
RUSH CREEK

PROFILE AND SECTION

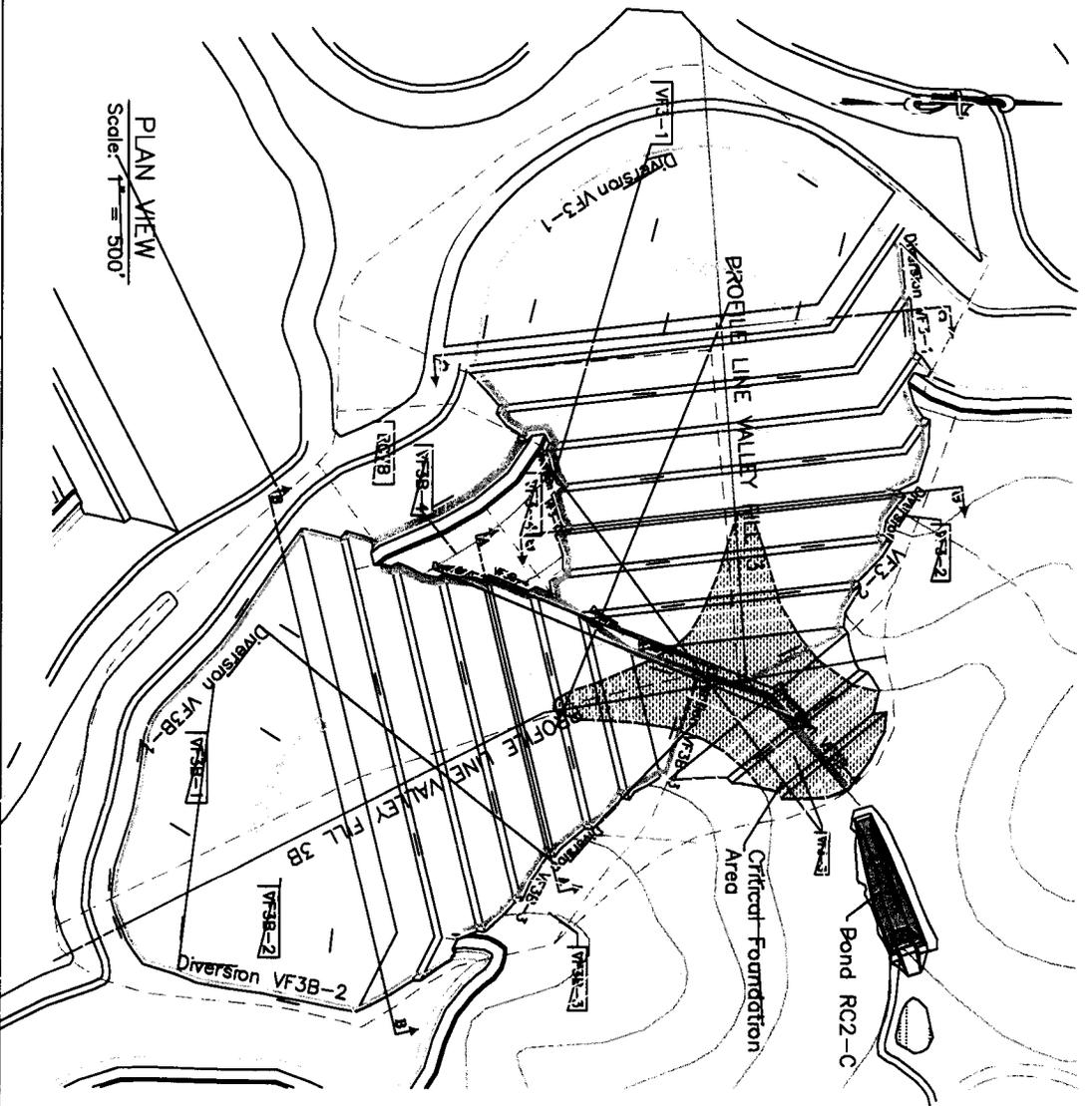
SCALE: 1" = 250'

**KEYSTONE INDUSTRIES, LLC DBA
KEYSTONE DEVELOPMENT, LLC**

RUSH CREEK NO. 2 SURFACE MINE
VALLEY FILL NO. 2 PROFILE AND SECTION

DATE: 10-02-06

SHEET 12 OF 15



PLAN VIEW
Scale: 1" = 500'

PURPOSE: CONSTRUCT PERMANENT SURFACE MINE OVERBURDEN FILL

FACILITY: KEYSTONE DEVELOPMENT, LLC
RUSH CREEK NO. 2 SURFACE MINE
UT AND RIGHT FORK OF/AND
RUSH CREEK

PLAN VIEW

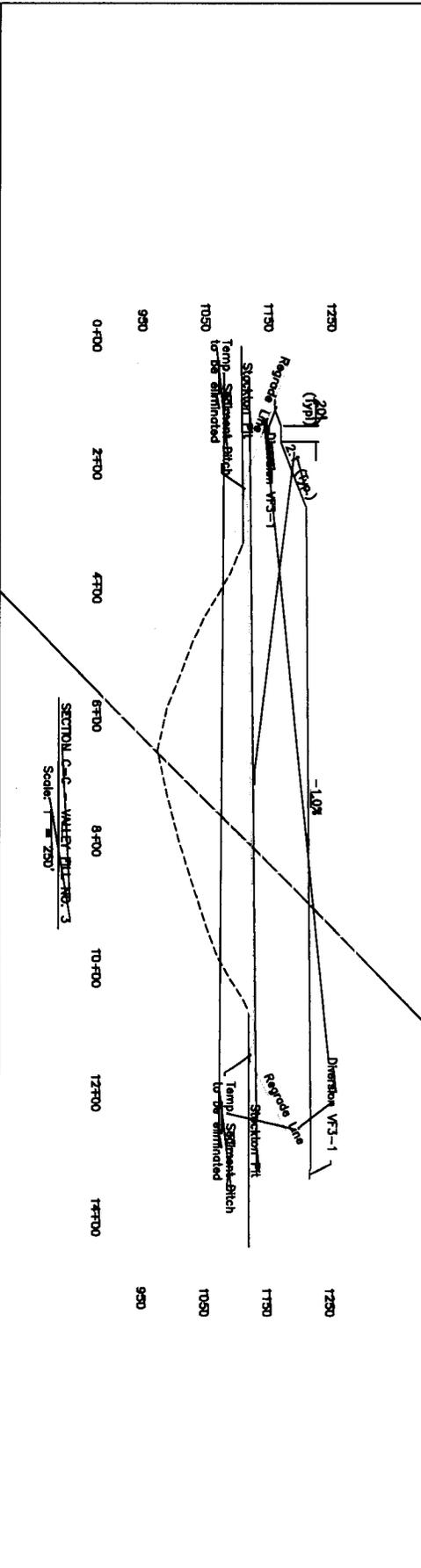
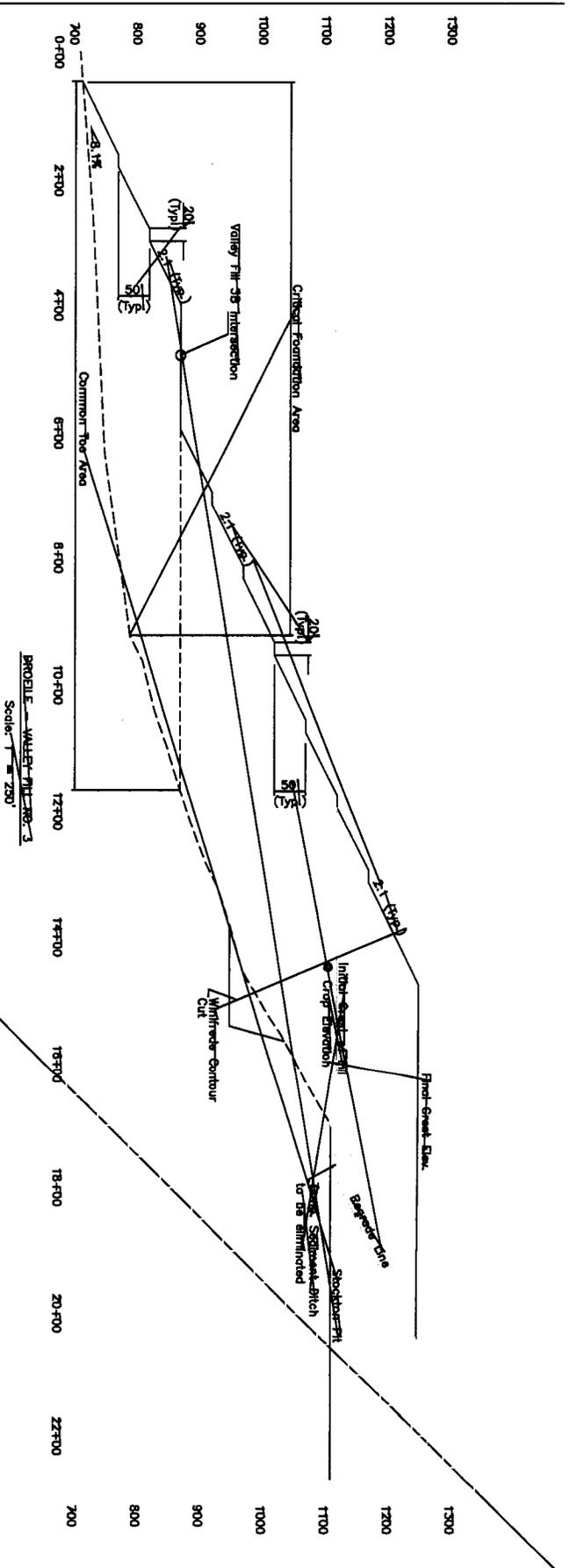
SCALE: 1" = 500'

KEYSTONE INDUSTRIES, LLC DBA
KEYSTONE DEVELOPMENT, LLC

RUSH CREEK NO. 2 SURFACE MINE
VALLEY FILLS NO. 3 AND 3B PLAN

DATE: 10-02-06

SHEET 13 OF 15



PURPOSE: CONSTRUCT PERMANENT SURFACE MINE OVERBURDEN FILL

FACILITY: KEYSTONE DEVELOPMENT, LLC
RUSH CREEK NO. 2 SURFACE MINE
UT AND RIGHT FORK OF/AND RUSH CREEK

PROFILE AND SECTION

0 250

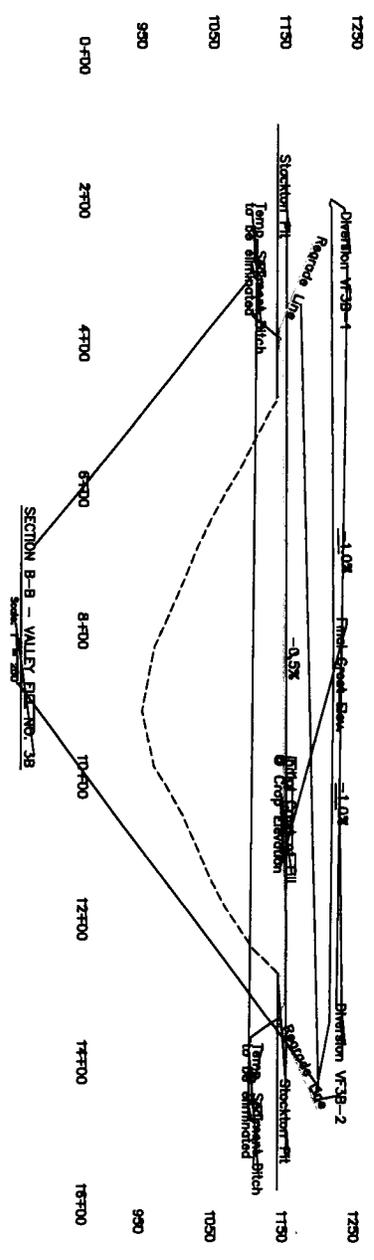
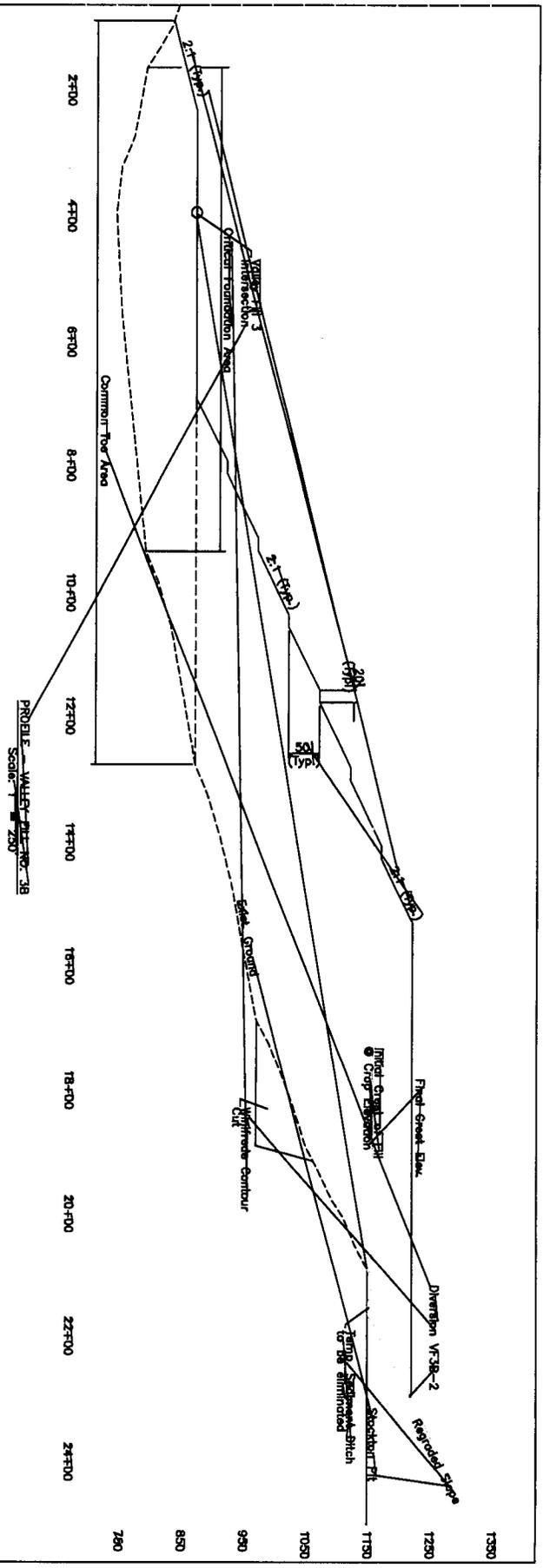
SCALE: 1" = 250'

KEYSTONE INDUSTRIES, LLC DBA
KEYSTONE DEVELOPMENT, LLC

RUSH CREEK NO. 2 SURFACE MINE
VALLEY FILL NO. 3 SECTION AND PROFILE

DATE: 10-02-06

SHEET 14 OF 15



PURPOSE: CONSTRUCT PERMANENT SURFACE MINE OVERBURDEN FILL

FACILITY: KEYSTONE DEVELOPMENT, LLC
 RUSH CREEK NO. 2 SURFACE MINE
 UT AND RIGHT FORK OF/AND
 RUSH CREEK

PROFILE AND SECTION
 0 250
 SCALE: 1" = 250'

KEYSTONE INDUSTRIES, LLC DBA
 KEYSTONE DEVELOPMENT, LLC

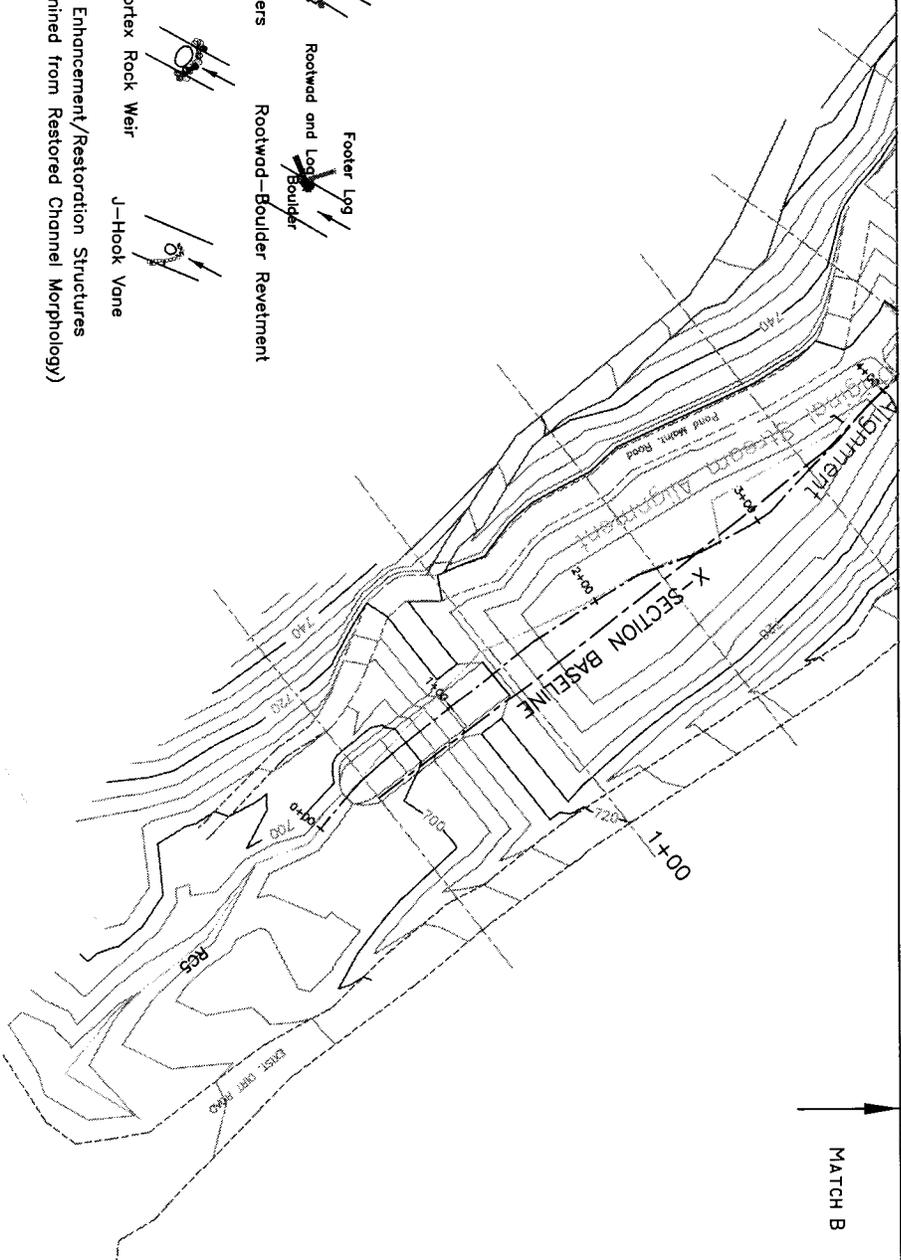
RUSH CREEK NO. 2 SURFACE MINE
 VALLEY FILL NO. 3B SECTION AND PROFILE

DATE: 10-02-06

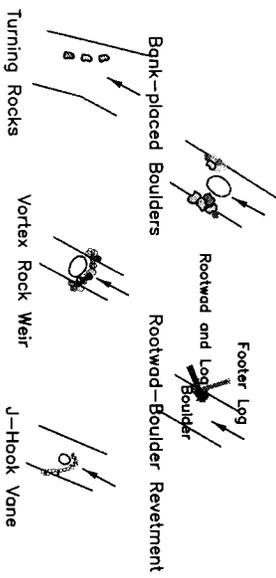
SHEET 15 OF 15

MATCH A

MATCH B

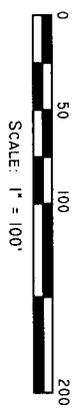


Proposed Natural Channel Enhancement/Restoration Structures
(Placement Locations to be Determined from Restored Channel Morphology)



PURPOSE: RESTORE CHANNEL SEGMENT TEMPORARILY IMPACTED BY DRAINAGE STRUCTURE INSTALLATION

FACILITY: KEYSTONE DEVELOPMENT
RUSH CREEK NO. 2 SURFACE MINE
UT AND RIGHT FORK OF/AND
RUSH CREEK



PLAN VIEW

KEYSTONE INDUSTRIES, LLC DBA
KEYSTONE DEVELOPMENT, LLC

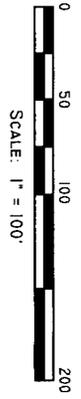
RUSH CREEK NO. 2 SURFACE MINE
PONDS NO. RC-1 AND RC-1A
RESTORED CHANNEL PLAN VIEW

DATE: 10-02-06 SHEET 3 OF 12

PURPOSE: RESTORE CHANNEL SEGMENT TEMPORARILY IMPACTED BY DRAINAGE STRUCTURE INSTALLATION

FACILITY: KEYSTONE DEVELOPMENT
RUSH CREEK NO. 2 SURFACE MINE
UT AND RIGHT FORK OF/AND
RUSH CREEK

PLAN VIEW

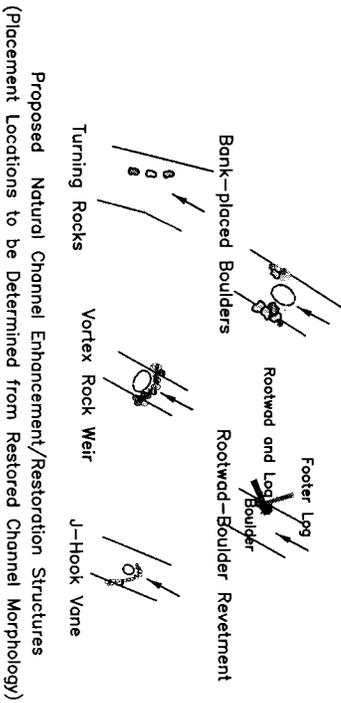
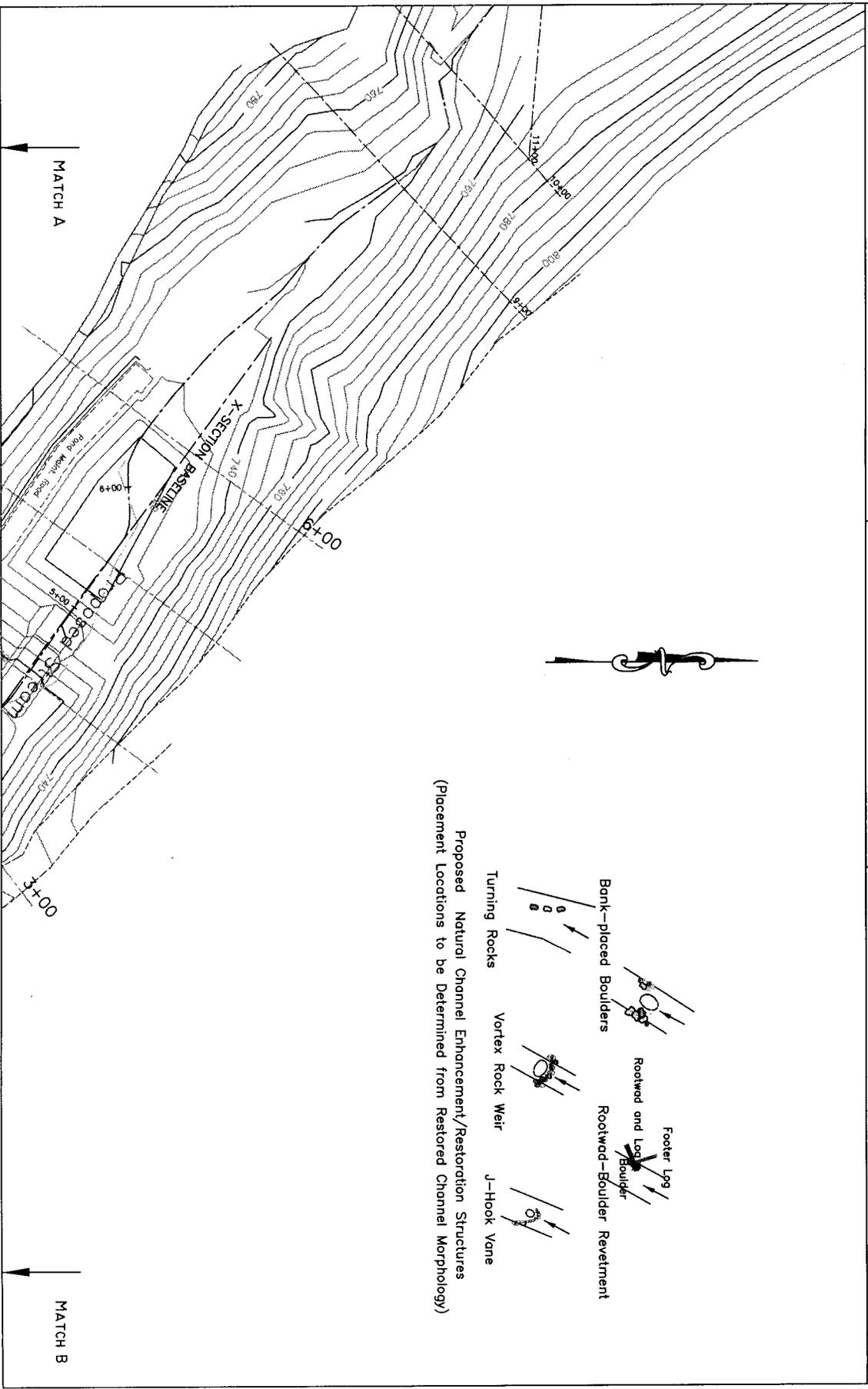


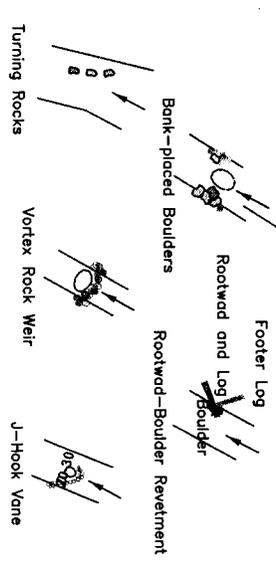
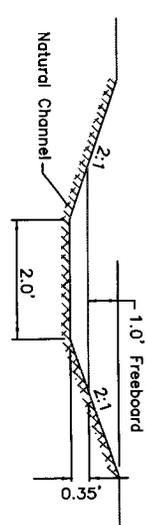
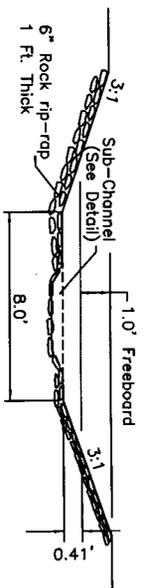
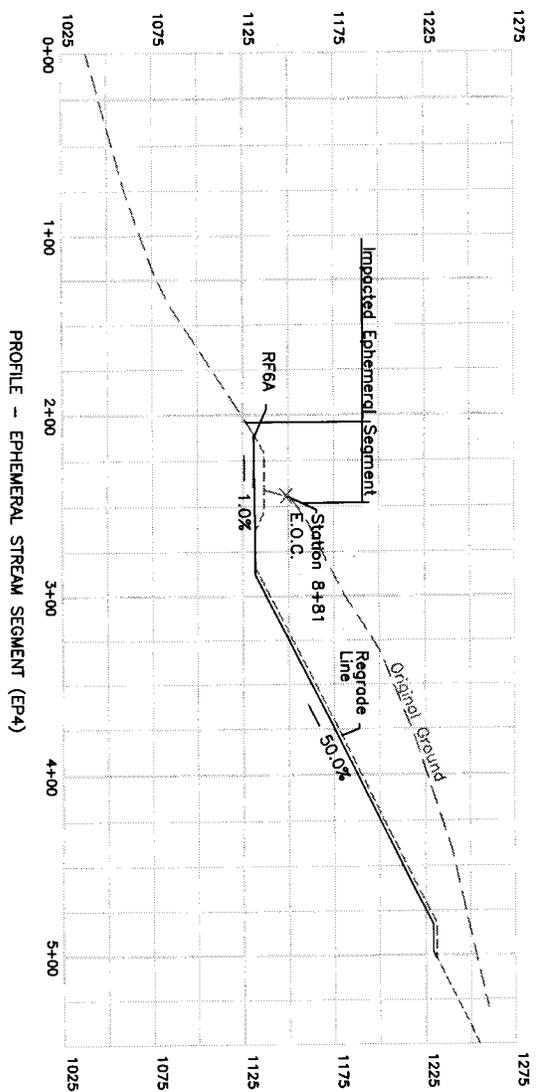
KEYSTONE INDUSTRIES, LLC DBA
KEYSTONE DEVELOPMENT, LLC

RUSH CREEK NO. 2 SURFACE MINE
PONDS NO. RC-1 AND RC-1A
RESTORED CHANNEL PLAN VIEW

DATE: 10-02-06

SHEET 4 OF 12

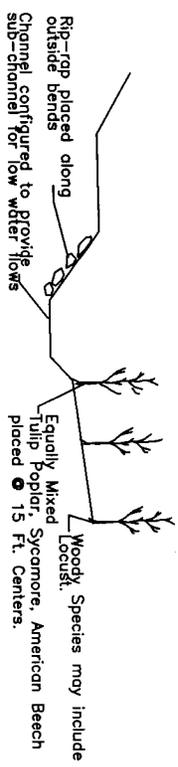




Proposed Natural Channel Enhancement/Restoration Structures
(Placement Locations to be Determined from Restored Channel Morphology)

NOTE:

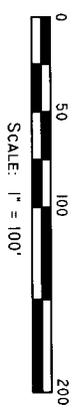
During reclamation of sites stream channels will be restored and enhanced, as illustrated and described. Stream enhancement structures will be placed at spacings and locations dictated by restored channel configuration. Rip-rap or other channel stabilization structures will be placed on outside bends and other shear zones. Substrate will be replaced and will include <5% fines, 5% sand, 30% to 40% gravel and up to 60% cobble.



- Stream Enhancement Seed Mix**
1. Low Cover - 20 lbs. Orchard Grass/acre
15 lbs. Birdfoot trefoil/acre
15 lbs. Annual Ryegrass/acre
15 lbs. Foxtail millet/acre
 2. Tree mix - side slopes
15' centers equally mixed Tulip Poplar, Sycamore, American Beech, some Locust
 3. Top of channel to a distance of 20 yards will include the GPM seedling mix as noted. Fertilizer applied at 600 lbs./acre (10-20-10)

PURPOSE: RESTORE CHANNEL SEGMENT TEMPORARILY
IMPACTED BY MINING ACTIVITY

PROFILE AND SECTION

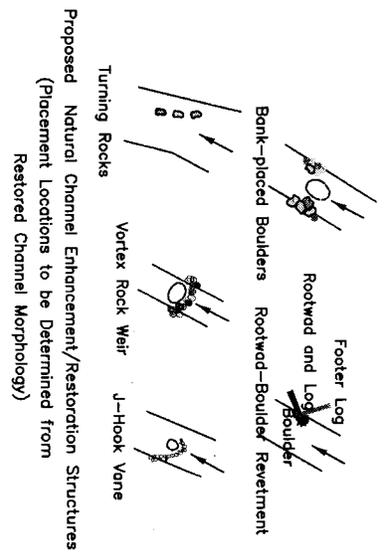
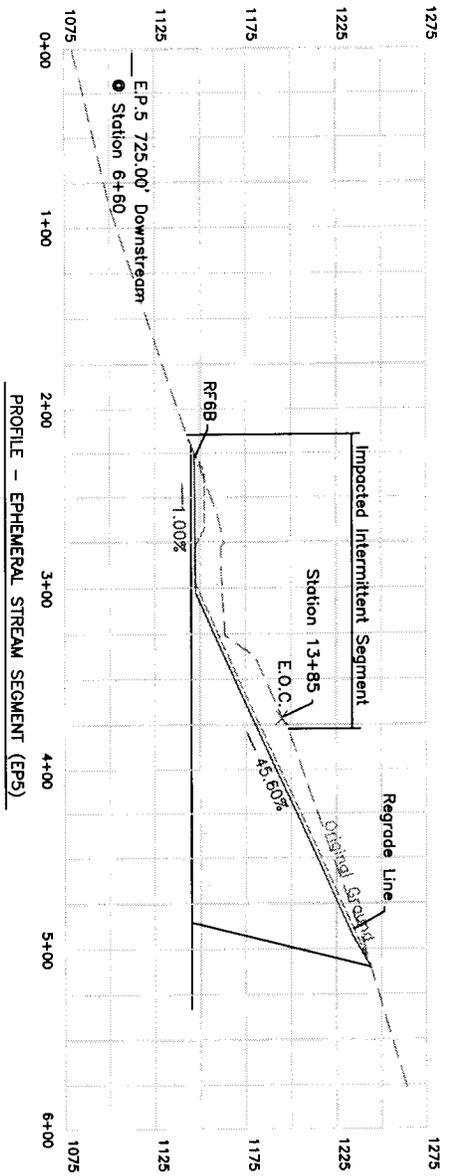


**KEYSTONE INDUSTRIES, LLC DBA
KEYSTONE DEVELOPMENT, LLC**

FACILITY: KEYSTONE DEVELOPMENT
RUSH CREEK NO. 2 SURFACE MINE
UT AND RIGHT FORK OF/AND
RUSH CREEK

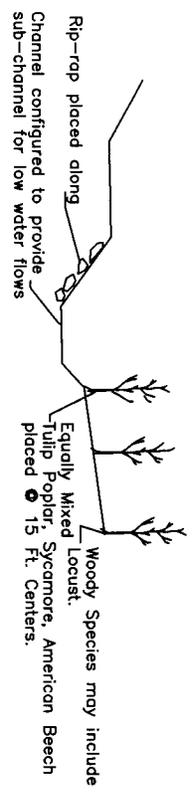
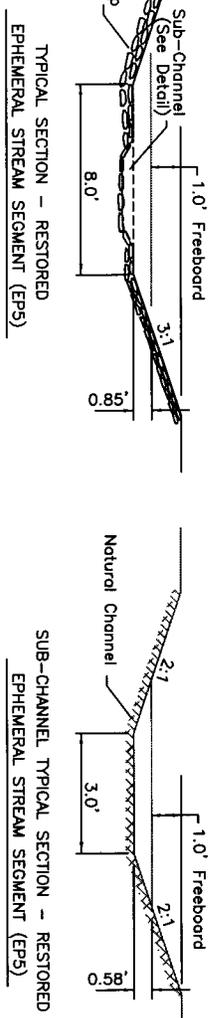
RUSH CREEK NO. 2 SURFACE MINE
EPHEMERAL SEGMENT EP-4
RESTORED CHANNEL DETAILS

DATE: 10-07-06



NOTE: During reclamation of sites stream channels will be restored and enhanced, as illustrated and described. Stream enhancement structures will be placed at spacings and locations dictated by restored channel configuration.

Riprap or other channel stabilization structures will be placed on outside bends and other shear zones. Substrate will be replaced and will include <5% fines, 5% sand, 30% to 40% gravel and up to 60% cobble.

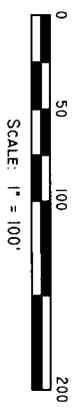


- Stream Enhancement Seed Mix
1. Low Cover - 20 lbs. Orchard Grass/acre
15 lbs. Birdfoot trefoil/acre
15 lbs. Annual rye/acre
15 lbs. Forktail millet/acre
 2. Tree mix - side slopes
15' centers equally mixed Tulip Poplar, Sycamore American Beech and some Locust
 3. Top of channel to a distance of 20 yards will include the CPM seedling mix as noted.
Fertilizer applied at 600 lbs./acre (10-20-10)

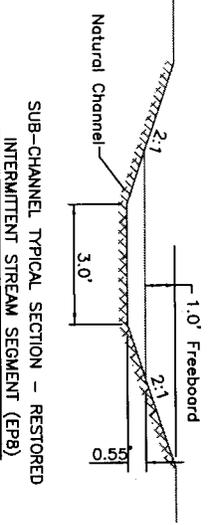
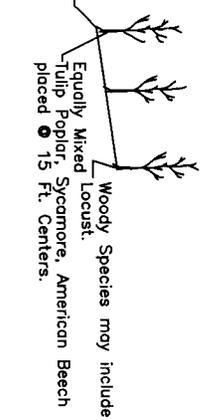
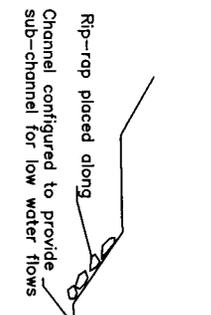
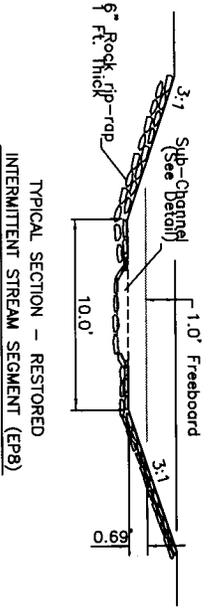
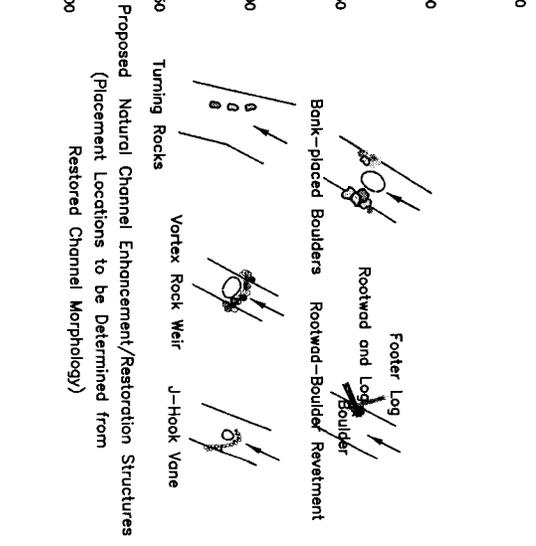
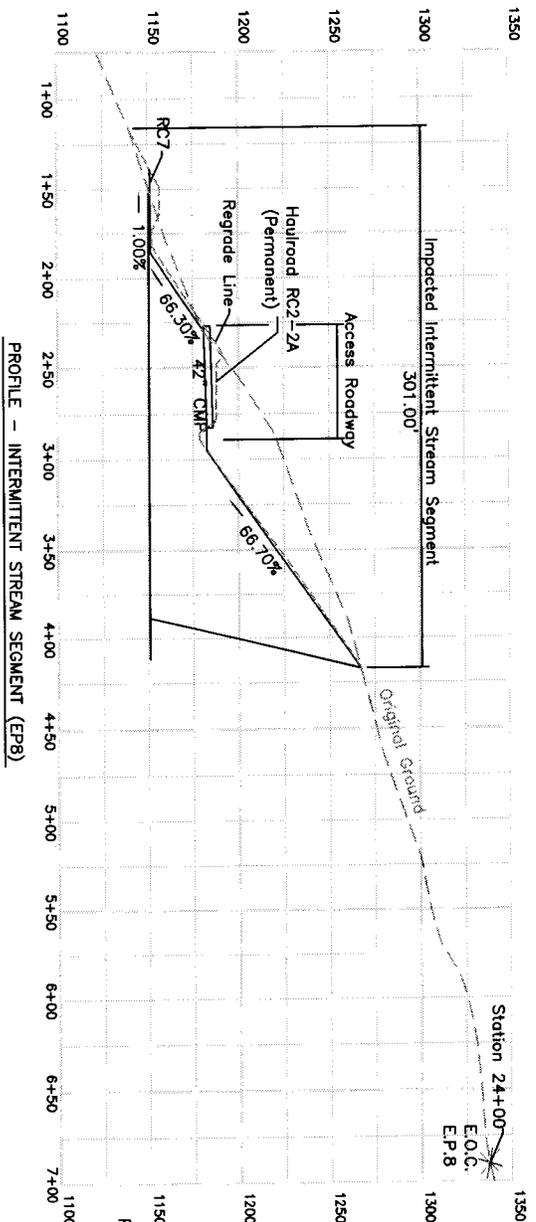
PURPOSE: RESTORE CHANNEL SEGMENT TEMPORARILY IMPACTED BY MINING ACTIVITY

FACILITY: KEYSTONE DEVELOPMENT
RUSH CREEK NO. 2 SURFACE MINE
UT AND RIGHT FORK OF/AND
RUSH CREEK

PROFILE AND SECTION



KEYSTONE INDUSTRIES, LLC DBA
KEYSTONE DEVELOPMENT, LLC
RUSH CREEK NO. 2 SURFACE MINE
EPHEMERAL SEGMENT EP-5
RESTORED CHANNEL DETAILS



NOTE: During reclamation of sites stream channels will be restored and enhanced, as illustrated and described. Stream enhancement structures will be placed at spacings and locations dictated by restored channel configuration. Riprap or other channel stabilization structures will be placed on outside bands and other shear zones. Substrate will be replaced and will include <5% fines, 5% sand, 30% to 40% gravel and up to 60% cobble.

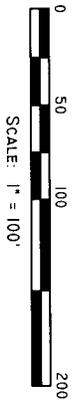
- Stream Enhancement Seed Mix**
1. Low Cover - 20 lbs. Orchard Grass/acre
15 lbs. Birdfoot trefoil/acre
15 lbs. Annual ryegrass/acre
15 lbs. Foxtail millet/acre
 2. Tree mix - side slopes
15 centers equally mixed Tulip Poplar, Sycamore American Beech and some Locust
 3. Top of channel to a distance of 20 yards will include the CPOM seedling mix as noted. Fertilizer applied at 600 lbs./acre (10-20-10)

PURPOSE: RESTORE CHANNEL SEGMENT TEMPORARILY IMPACTED BY MINING ACTIVITY

PROFILE AND SECTIONS

**KEYSTONE INDUSTRIES, LLC DBA
KEYSTONE DEVELOPMENT, LLC**

FACILITY: KEYSTONE DEVELOPMENT
RUSH CREEK NO. 2 SURFACE MINE
UT AND RIGHT FORK OF/AND
RUSH CREEK



DATE: 10-07-06

SHEET 12 OF 12