

State of Illinois
Department of Natural Resources
Office of Mines and Minerals
Division of Abandoned Mined Lands

Funded by the
 United States Department of Interior
 Federal Office of Surface Mining

Tab Simco Bioreactor Rebuild #1
 Reclamation Project
 AML-GJKE-1215
 Jackson County
 1LR

SCHEDULE OF DRAWINGS:

1. Cover Sheet
 2. Summary of Quantities/General Notes/Location Map/
Survey Control Layout
 3. Existing Conditions
 4. Proposed Conditions
 5. Cross Sections
 - 6-7. Details.
- IDOT STANDARD 665001-01 WOVEN WIRE FENCE

Prepared By IDNR Staff

Approved for Bidding:



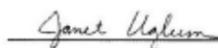
Michael L. Woods, Director
 Office of Mines and Minerals

Approved By:



Greg Pinto, Acting Manager
 AML Division

Approved By:



Janet L. Uglum, P.E.
 IL Licensed Professional Engineer
 No. 062-054108

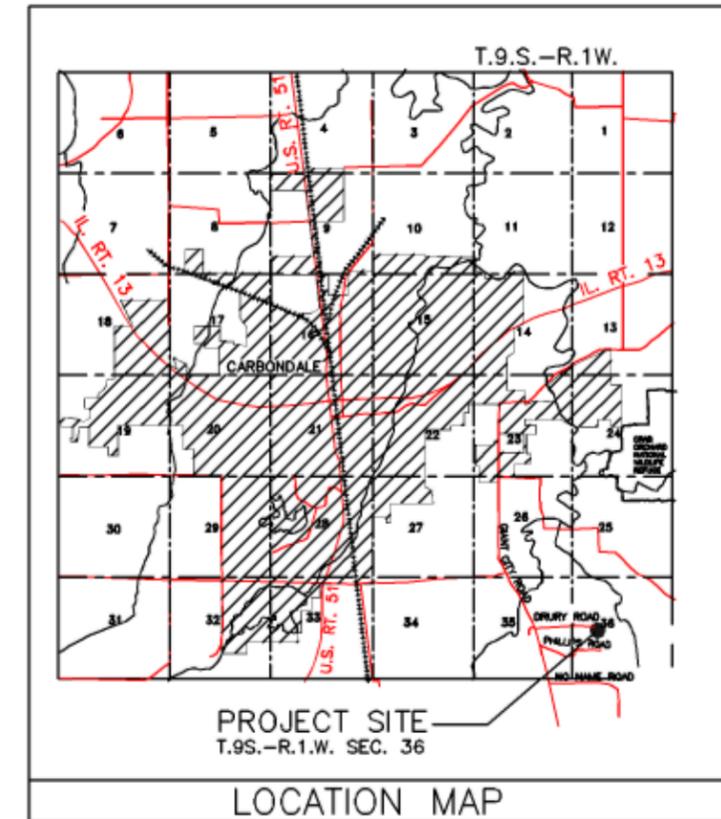


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PRE-BID MEETING

A Pre-Bid Meeting is scheduled for this project on June 5, 2013 at 10:00 AM. All interested potential bidders are to meet at the entrance of the project site.

Summary of Quantities					
#	Item	Section	Quantity	Unit	Rates/Remarks
1	Special Clearing	201	1	L.S.	
2	Earth Excavation	202	6,100	C.Y.	Compaction Required as per Special Provision Article 205
3	Bioreactor Media Excavation	215	7,000	C.Y.	
4	Seeding	250	2.5	Acre	Seeding to be done by September 30, 2013
5	Nitrogen Fertilizer Nutrient	250	500	Pound	100 LB/AC Two Applications -Initial Seeding and Jan 1-March 15, 2014
6	Phosphorus Fertilizer Nutrient	250	375	Pound	150 LB/AC
7	Potassium Fertilizer Nutrient	250	750	Pound	300 LB/AC
8	Agricultural Ground Limestone	250	50.0	Ton	20 Ton/AC
9	Mulch, Method 2, Procedure 1	IDOT 251	2.5	Acre	2 Ton/AC
10	Mowing	258	2.5	Acre	
11	Stone Riprap A-3	IDOT 281	13	S.Y.	
12	Concrete Structures	IDOT 503	15	C.Y.	
13	French Drains	601	43.0	Ton	Chert, CA-1
14	Geotechnical Fabric for French Drains	601	153	S.Y.	
15	Hydrated Lime - Bags	612	20	Each	50 lb. bag of hydrated lime
16	Woven Wire Fence	IDOT 665	30	Foot	
17	Mobilization	671	1	L.S.	Maximum 6% of total bid
18	Adjustable Riser	675	1	L.S.	Includes all fittings, excavation, and appurtenances
19	AMD-Coarse Aggregate	675	650.5	Ton	
20	AMD-Filter Fabric	675	2,779	S.Y.	
21	AMD-Wood Chips	675	2,800	C.Y.	
22	AMD-Saw Dust	675	700	C.Y.	
23	AMD-Limestone	675	1,663.2	Ton	
24	AMD-Mulch	675	1,890	C.Y.	
25	AMD-Compost	675	770	C.Y.	



GENERAL NOTES

Unless otherwise noted on the plans, all disturbed areas within the construction limits will be amended with agricultural ground limestone, fertilizer nutrients, seeded and mulched at the required rates specified in the plans.

The contractor is responsible for visiting the site and familiarizing himself with the existing conditions and the proposed reclamation work prior to submitting a bid.

The contractor shall provide and pay for all field engineering services to execute the project as specified in the Field Engineering section of the Special Provisions.

The contractor is responsible for locating and protecting all existing utility lines pertaining to the work.

Unless noted on the plans, all onsite access roads may be used for construction and must be maintained during construction and restored to original or better condition at the completion of work by the contractor. Access roads to the site as designated in the plans are to be maintained to the satisfaction of the engineer.

The construction limits will be staked by the contractor prior to construction. The contractor is responsible for the repair and or restitution at his own expense for all damages done to any area outside the construction limits.

Application rates specified in the plans are shown in the Summary of Quantities-Rates/Remarks column.

CONSTRUCTION NOTES

BURIAL/REMOVAL OF MATERIAL-Concrete and masonry debris designated for burial by the engineer shall be buried at least three feet below proposed final grade. Onsite organic debris and trash shall be disposed of in an engineer approved offsite landfill in accordance with Sections 201 and 501 of the Special Provisions.

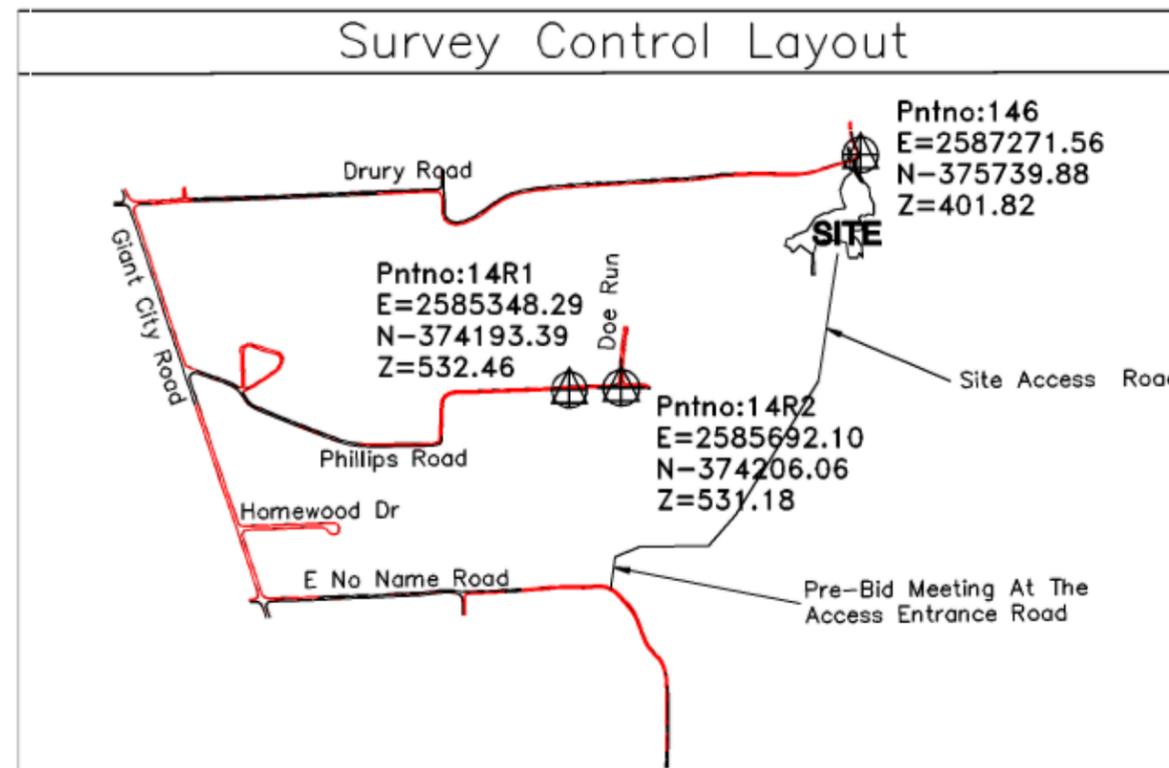
TREE REMOVAL -Trees removed shall be disposed of onsite per Section 201 of the Special Provisions.

ACID WATER TREATMENT-If acid mine drainage treatment is determined necessary by the engineer, and not otherwise specified in the plans, any water treatment will be paid for in accordance with Article 109.04 of the Standard Specifications.

EROSION CONTROL-The contractor shall schedule his operations and take such precautions that may be necessary to prevent or minimize erosion. Failure to comply with this requirement shall cause the contractor to be fully responsible for repairing any eroded areas and cleaning up areas or drainage structures that have become silted in or damaged.

AGRICULTURAL GROUND LIMESTONE-Immediately prior to seed bed preparation, fertilizer nutrients and agricultural ground limestone shall be uniformly spread at the rates specified in the plans.

MULCHING-Within 24 hours from the time seeding has been performed, the seeded area shall be given a covering of mulch at the rates specified in the plans. The mulch is to be anchored into the soil in accordance with the requirements for method 2, procedure 1 of Article 251.03 of the Standard Specifications. If Excelsior or Special Excelsior Blanket is to be used, the blanket shall be placed the same day that the areas are seeded.

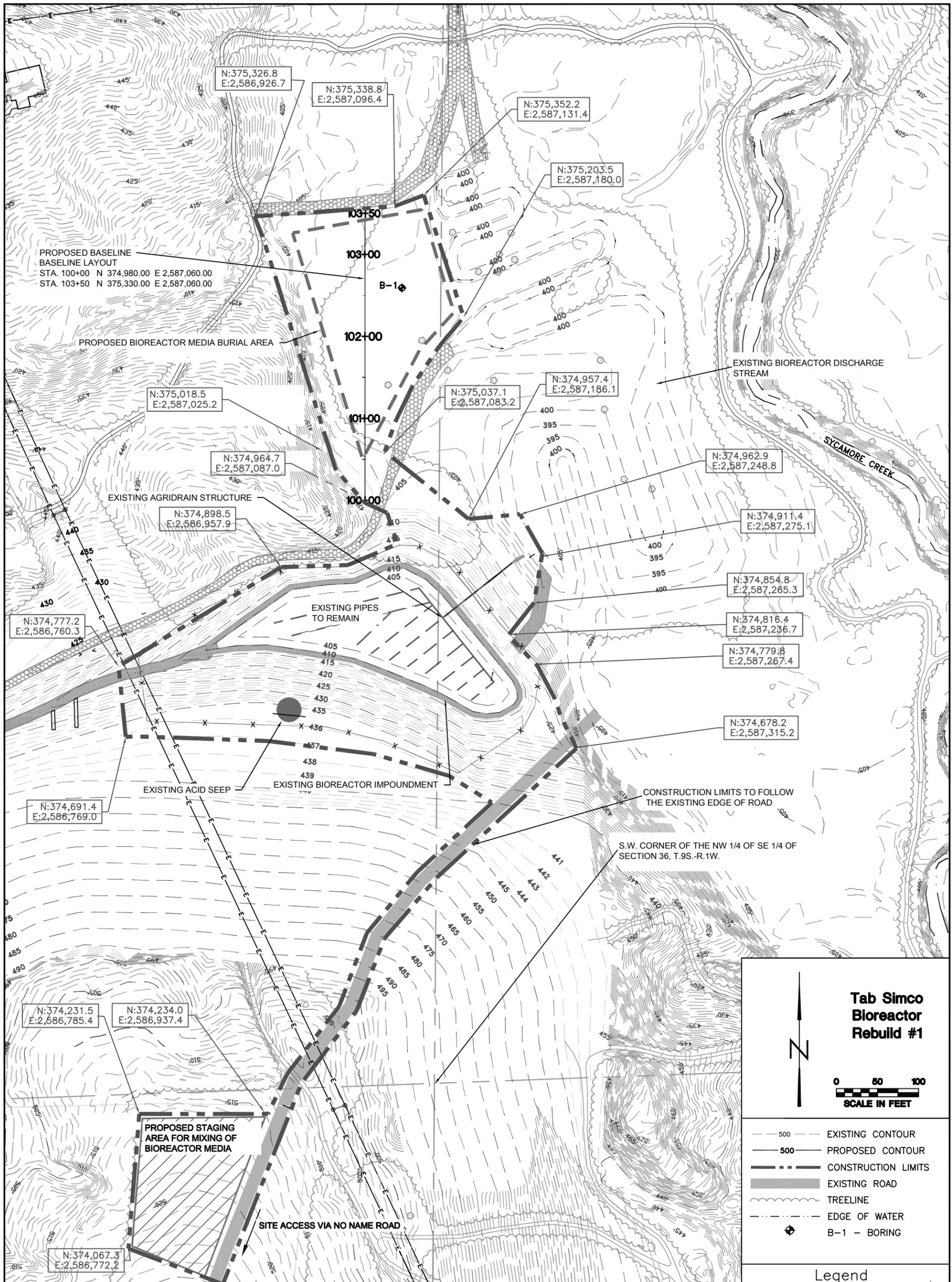


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Checked By: _____
Date: _____

Summary of Quantities/
General Notes/Location Map/
Survey Control Layout
Sheet 2 of 7



PROPOSED BASELINE
 BASELINE LAYOUT
 STA. 100+00 N 374,980.00 E 2,587,060.00
 STA. 103+50 N 375,330.00 E 2,587,060.00

PROPOSED BIOREACTOR MEDIA BURIAL AREA

EXISTING BIOREACTOR DISCHARGE STREAM

SYCAMORE CREEK

EXISTING AGRIDRAIN STRUCTURE

EXISTING PIPES TO REMAIN

EXISTING ACID SEEP

EXISTING BIOREACTOR IMPOUNDMENT

CONSTRUCTION LIMITS TO FOLLOW THE EXISTING EDGE OF ROAD

S.W. CORNER OF THE NW 1/4 OF SE 1/4 OF SECTION 36, T.9S.-R.1W.

PROPOSED STAGING AREA FOR MIXING OF BIOREACTOR MEDIA

SITE ACCESS VIA NO NAME ROAD

Tab Simco Bioreactor Rebuild #1



0 50 100
 SCALE IN FEET

- 500 --- EXISTING CONTOUR
- 500 — PROPOSED CONTOUR
- - - - - CONSTRUCTION LIMITS
- ▬ EXISTING ROAD
- ~ TREELINE
- - - - - EDGE OF WATER
- ⊕ B-1 - BORING

Legend

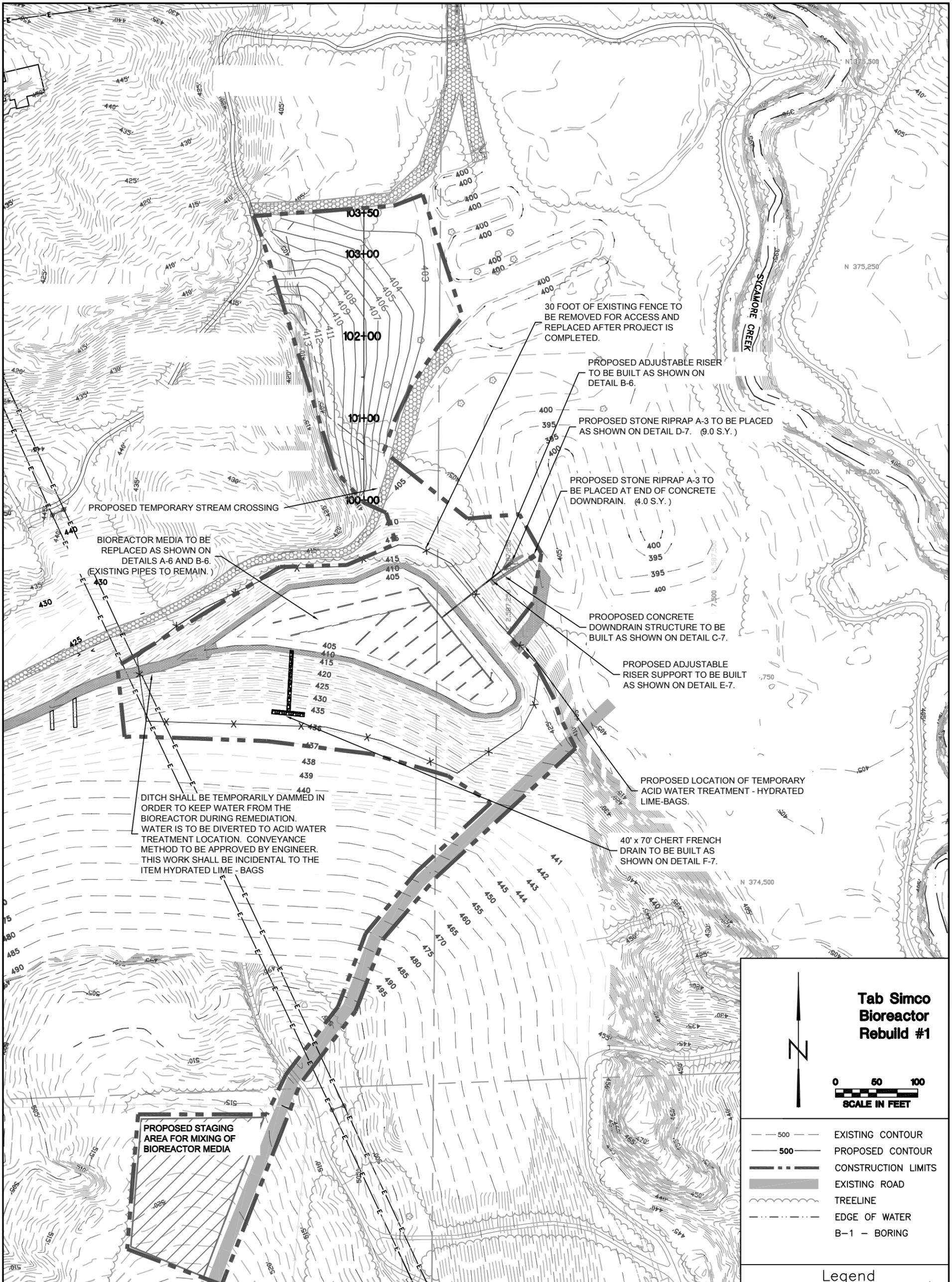
Existing Conditions

Sheet
 3 of 7

Drawn By: TL Date: 06/2018
 Checked By: _____

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- 500 --- EXISTING CONTOUR
- 500 — PROPOSED CONTOUR
- - - - - CONSTRUCTION LIMITS
- █ EXISTING ROAD
- ~ TREELINE
- - - - - EDGE OF WATER
- B-1 - BORING

Legend

Proposed Conditions

Sheet
4 of 7

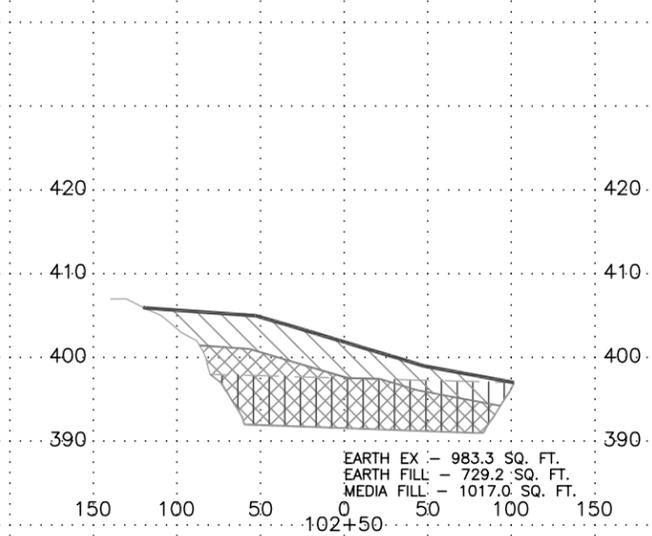
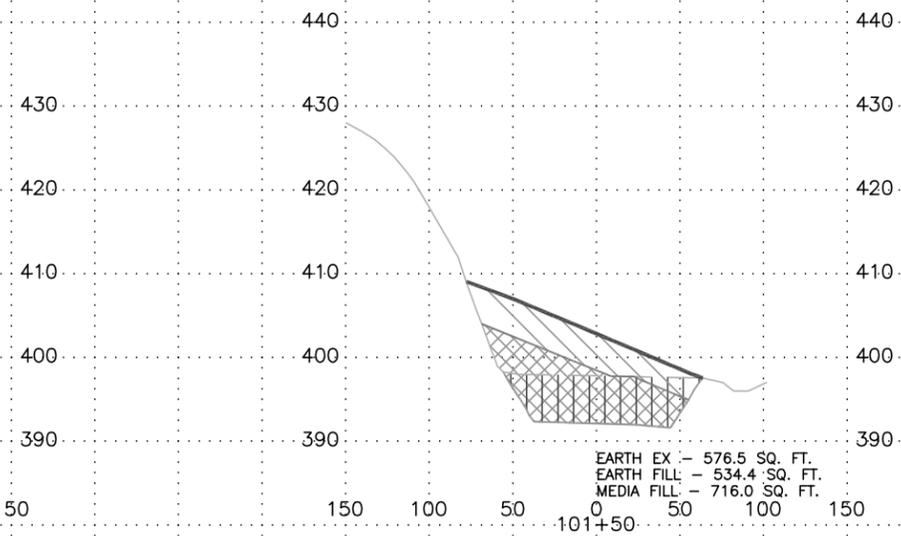
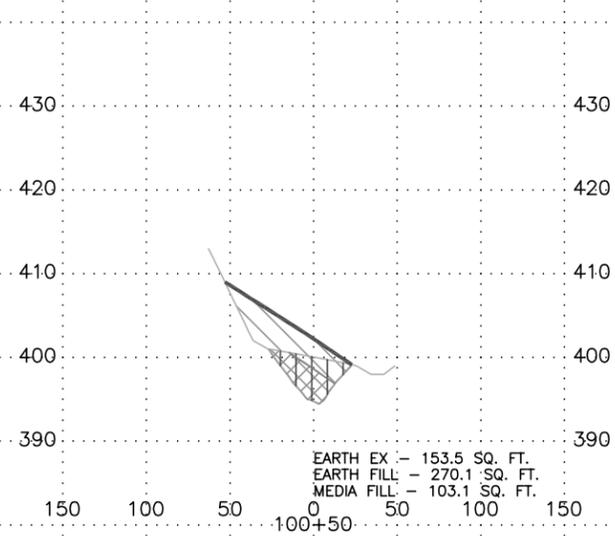
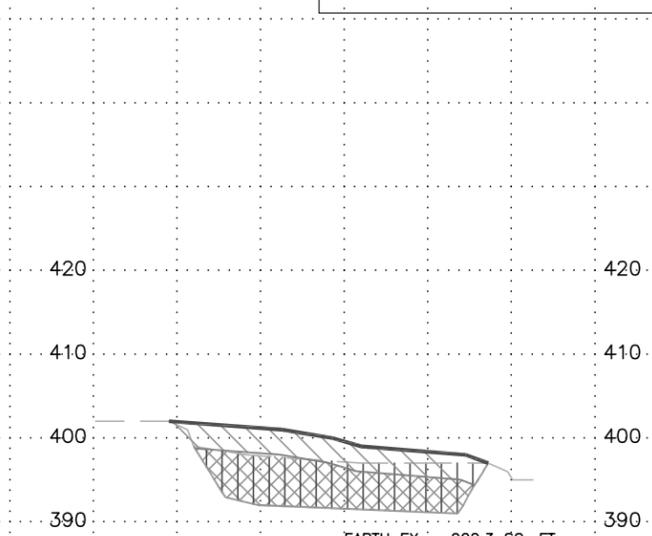
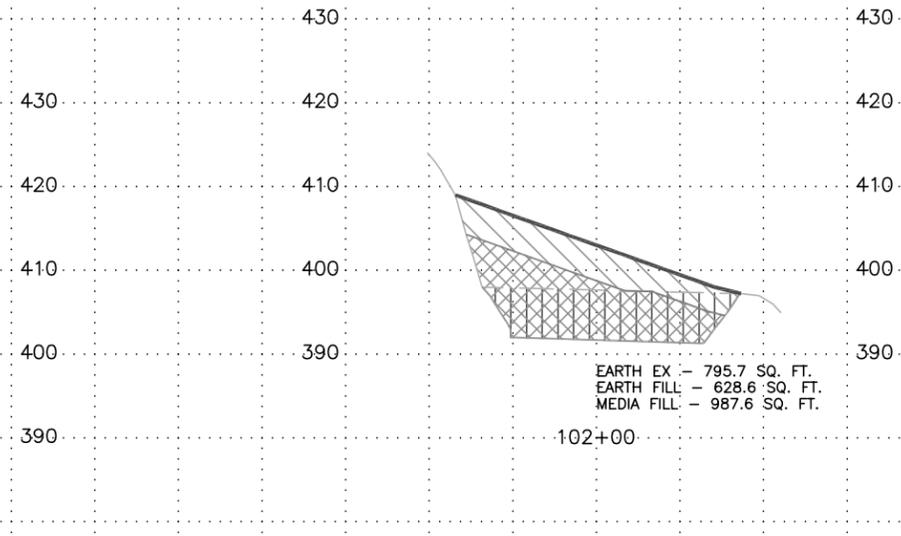
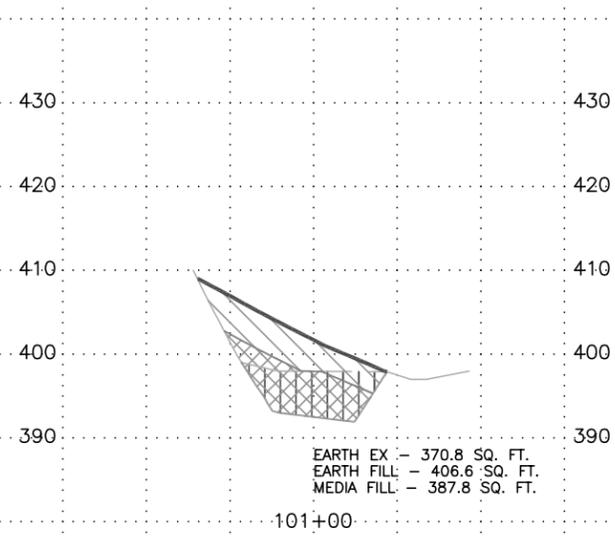
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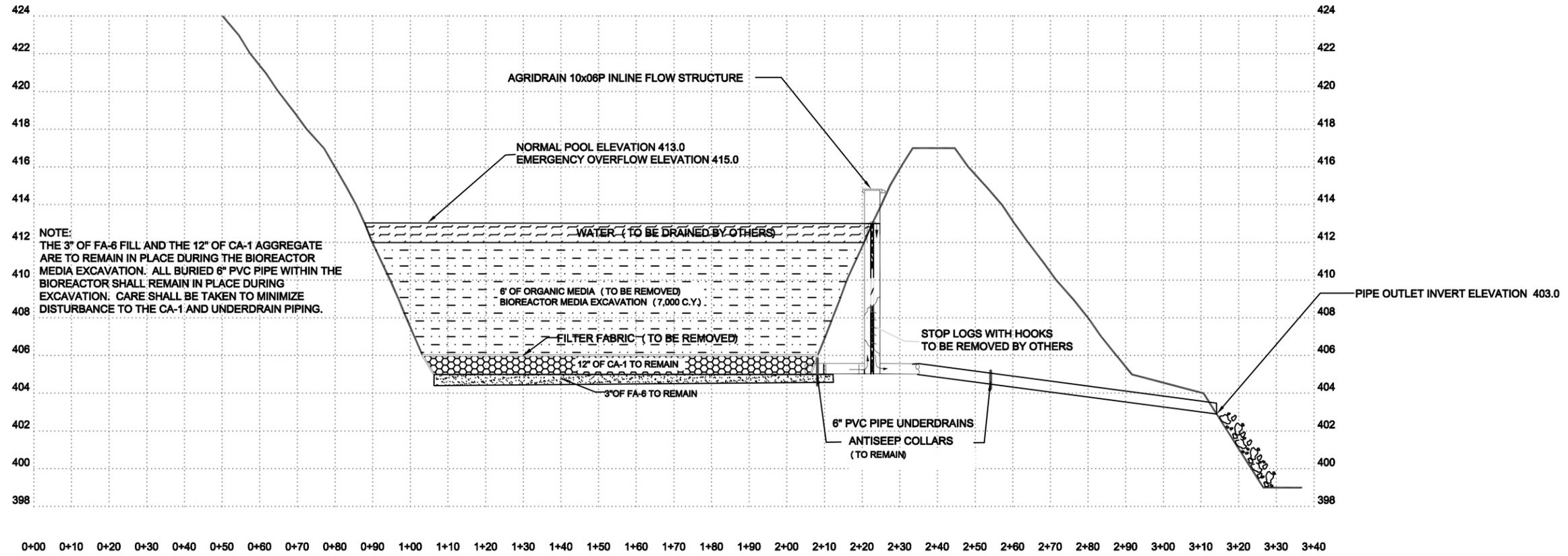
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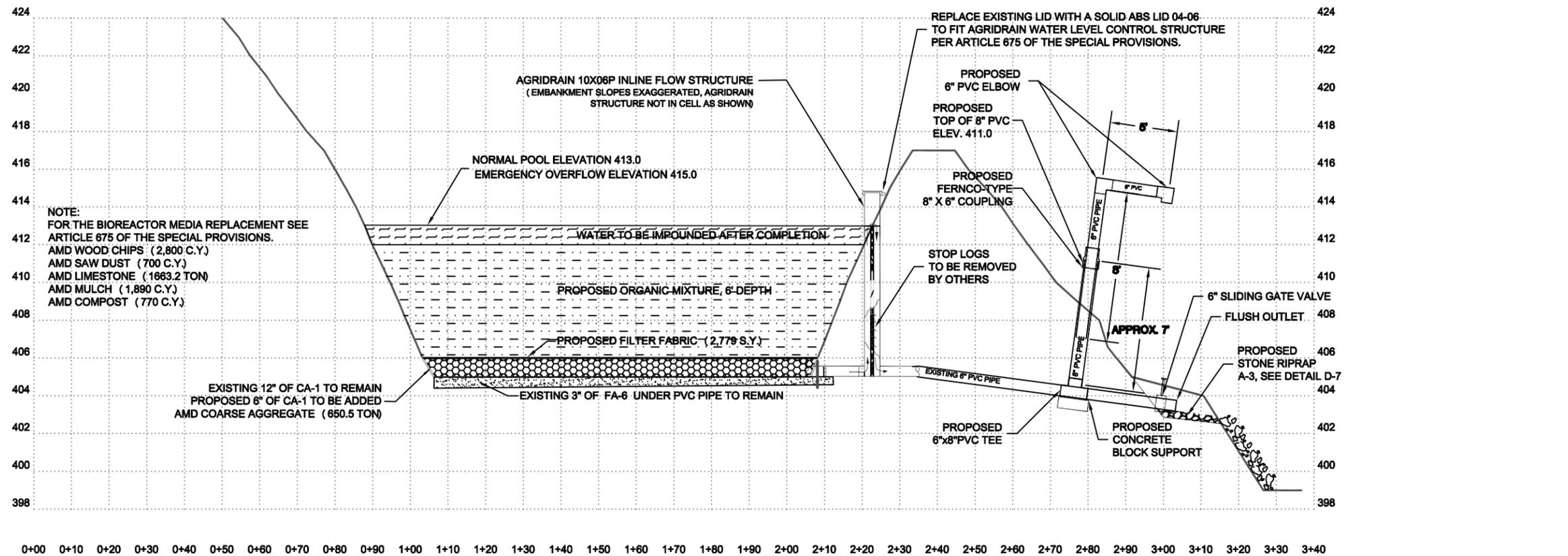
LEGEND	
	EXISTING GRADE
	PROPOSED SUB-GRADE
	PROPOSED GRADE
	PROPOSED BORROW GRADE
	EARTH CUT (SQ. FT.)
	EARTH FILL (SQ. FT.)
	MEDIA FILL (SQ. FT.)



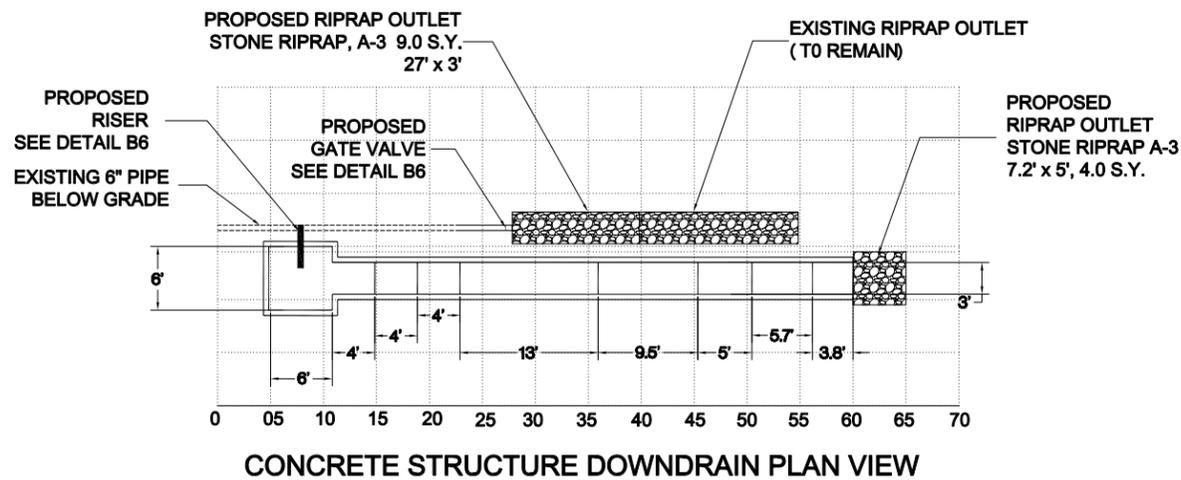
Horizontal Scale 50
 Vertical Scale 10



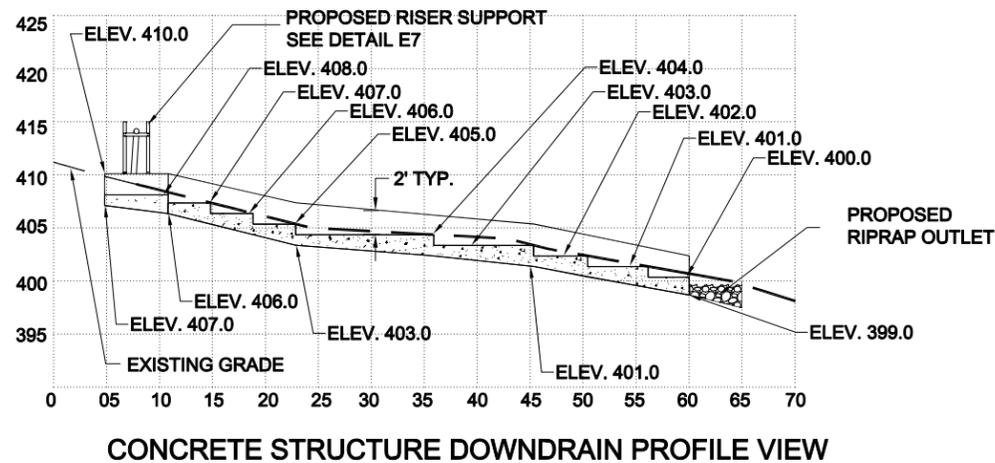
A
6
TYPICAL SECTION THROUGH ANEROBIC BIOREACTOR CELL EXISTING



B
6
TYPICAL SECTION THROUGH ANEROBIC BIOREACTOR CELL PROPOSED

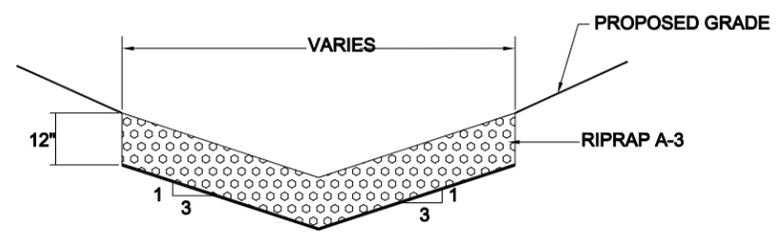


C CONCRETE STRUCTURE DOWNDRAIN
NOT TO SCALE

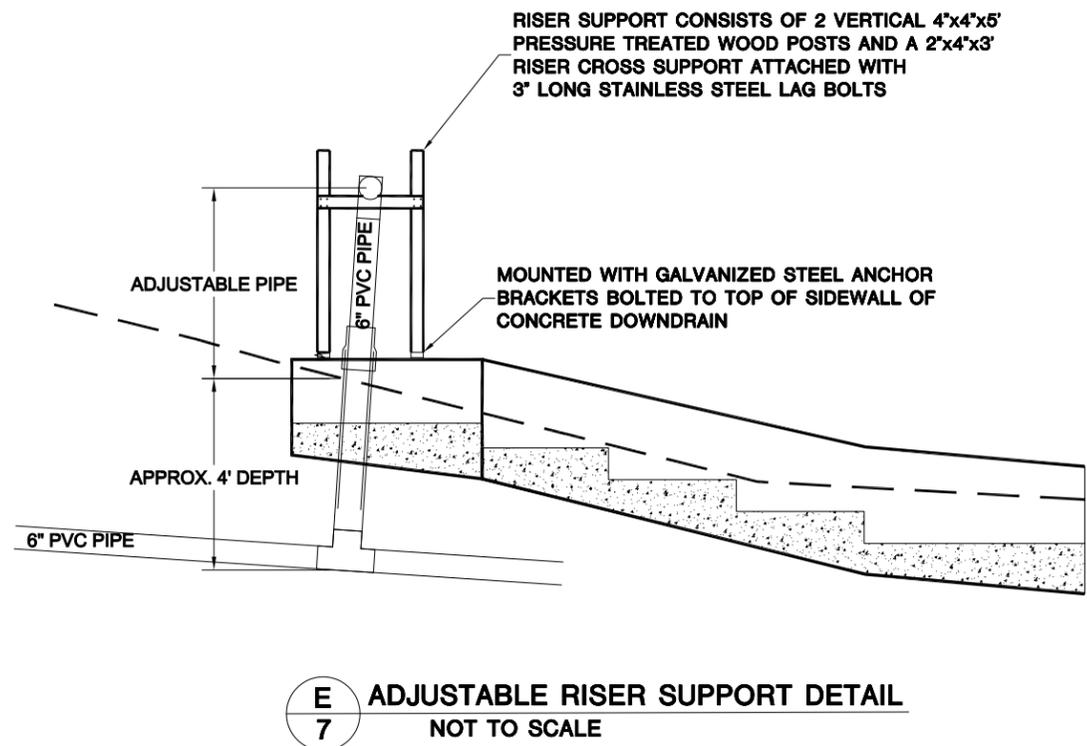


C CONCRETE STRUCTURE DOWNDRAIN
NOT TO SCALE

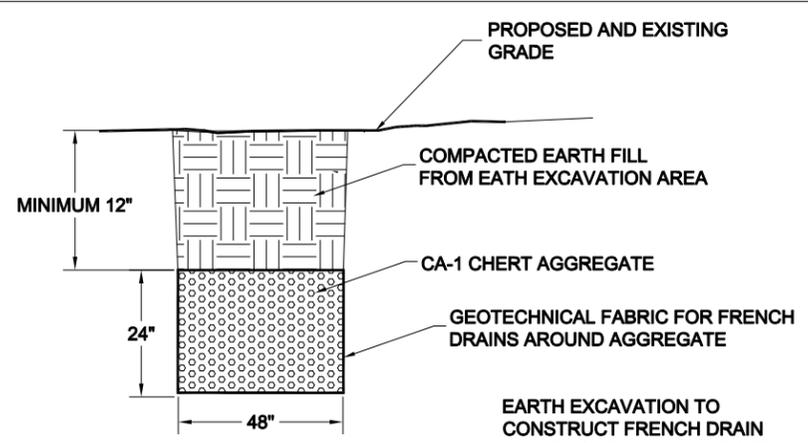
C CONCRETE STRUCTURE DOWNDRAIN
NOT TO SCALE



D STONE RIPRAP, A-3 DITCH DETAIL
NOT TO SCALE



E ADJUSTABLE RISER SUPPORT DETAIL
NOT TO SCALE



F FRENCH DRAIN DETAIL
NOT TO SCALE

EARTH EXCAVATION TO CONSTRUCT FRENCH DRAIN (110 C.Y.) TO BE HAULED TO MEDIA BURIAL AREA TO BE DISPOSED OF.