BENCHMARKS:

BM#1: Disc on Top of Curb South side of 27th St. N. and West of 27th Ct. N. Woods North 3rd Addition
Elev. = 1397.69 NAVD88

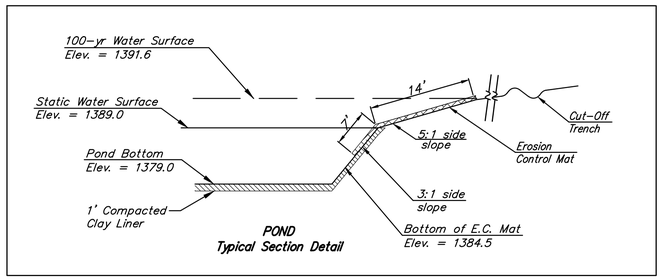
BM#2: Northwest ¼ Corner Government Lot 2, Sec. 3, TWP. 27-S, R-2-E
Elev. = 1405.78 NAVD88

1350 Proposed Grade
--1350-- Existing Grade

EROSION CONTROL LEGEND

- STRAW BALE BARRIERS
- SILT FENCING
- CUT-OFF TRENCH
- EROSION CONTROL MAT

NOTE: - EROSION CONTROL MAT SHALL BE BIODEGRADABLE



POND
Typical Section Detail

EARTH WORK TOTALS (Unadjusted)
(for information only)

	C.Y. Cut	C.Y. Fill
Mass Grading	31,419	70,627
Res. "G" Pond	40,935	1,286
Total Earthwork	72,354	71,913

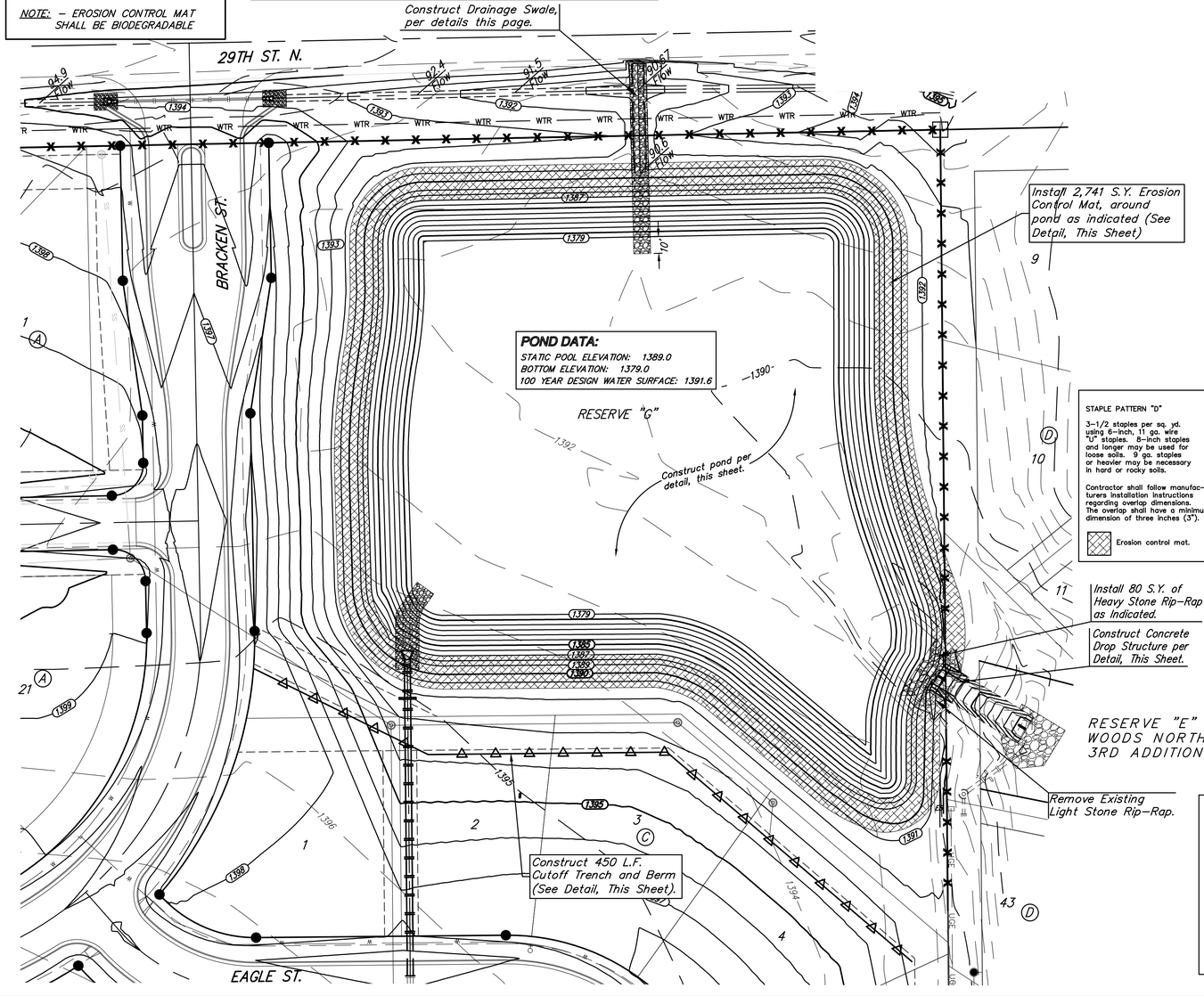
Earthwork quantities are for reference only. All cost associated with earthwork shall be included in C.Y. "Excavation" & L.S. "Grading, Mass"

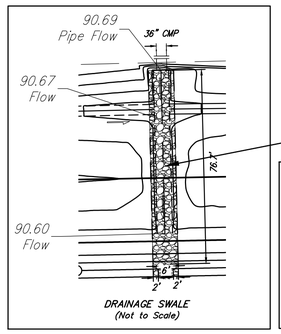
NOTES:

1. Pond bottom and sideslopes below static pool elevation shall be over-excavated 1' and a 1' clay liner shall be compacted to 95% std. density. The top 6" of the clay liner shall be modified with Wyoming Bentonite Clay at a rate of 4%. All costs including clay, manipulation, hauling, compacting, etc. shall be included in the bid item, "Pond Sealing". The best onsite clay material shall be used for the pond liner. The compaction and P.I. shall be verified during construction. 6" of on-site material shall be distributed on top of the clay line below the static pool elevation. P.I. determination and compaction testing shall be arranged and paid for by the contractor at the request of the inspector. Cost shall be incidental to "Testing". Cost of over-excavation to install Clay Liner shall be incidental to bid item, "Excavation".
3. All of Reserve "G" above the static water surface disturbed by construction shall be seeded and mulched as follows: (Permanent Seeding)
   SEED -- Kansas Premium Fescue Blend; 350#/Acre & Annual Rye 75#/Acre.
   FERTILIZER -- 12-24-12 Ratio at 350 Lbs./Ac.
   MULCH -- 2 Tons Prairie Hay / Acre (only in areas without erosion control mat)

   All other disturbed areas not in street R/W are to be seeded as follows: (Temporary seeding)
   SEED -- Rye grass (PLS)--220#/Acre.

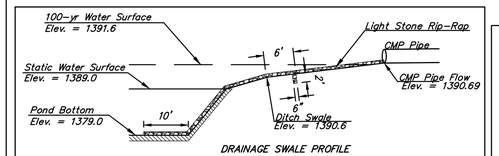
   All costs associated with seeding including preparation of ground, seeding, fertilizing, mulching, etc. shall be included in the L.S. bid item "Seeding"
4. Install Erosion Control Mat around Pond as indicated (cost to be included in "Erosion Control Mat"
5. Contractor to strip top 4" to 6" of soil within Res. "G" and street R/W before mass grading and stockpile. Top soil stockpile to be redistributed over Reserve G" above water elevation prior to seeding.
6. Compaction of 95% shall be obtained in all areas, moisture content at optimum to +4%.



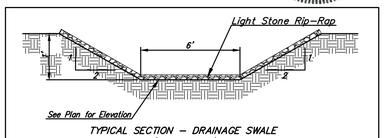


DRAINAGE SWALE
(Not to Scale)

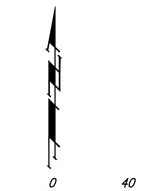
Install 126 S.Y. of Light Stone Rip-Rap



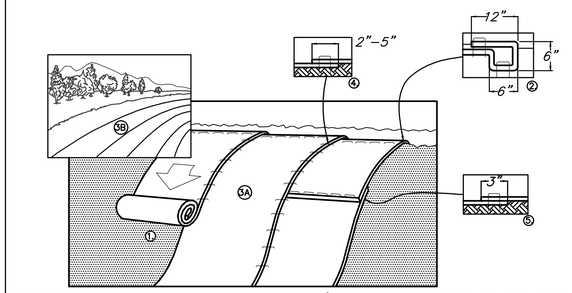
DRAINAGE SWALE PROFILE
(Not to Scale)



TYPICAL SECTION - DRAINAGE SWALE
(Not to Scale)



SLOPE INSTALLATION



NOTE: Erosion control mat shall be installed and anchored per manufacturer's specifications. Quantity is for information only and does not include excess material necessary for overlap and anchoring. All cost of mating shall be included in SY "Erosion Control Mat"

1. PREPARE SOIL BEFORE INSTALLING BLANKETS, INCLUDING ANY NECESSARY APPLICATION OF LIME, FERTILIZER, AND SEED. NOTE: WHEN USING CELL-O-SEED DO NOT SEED PREPARED AREA. CELL-O-SEED MUST BE INSTALLED WITH PAPER SIDE DOWN.
2. BEGIN AT THE TOP OF THE SLOPE BY ANCHORING THE BLANKET IN A 6" (15cm) DEEP X 6" (15cm) WIDE TRENCH WITH APPROXIMATELY 12" (30cm) OF BLANKET EXTENDED BEYOND THE UP-SLOPE PORTION OF THE TRENCH. ANCHOR THE BLANKET WITH A ROW OF STAPLES/STAKES APPROXIMATELY 12" (30cm) APART IN THE BOTTOM OF THE TRENCH. BACKFILL AND COMPACT THE TRENCH AFTER STAPLING. APPLY SEED TO COMPACTED SOIL AND FOLD REMAINING 12" (30cm) PORTION OF BLANKET BACK OVER SEED AND COMPACTED SOIL. SECURE BLANKET OVER COMPACTED SOIL WITH A ROW OF STAPLES/STAKES SPACED APPROXIMATELY 12" (30cm) APART ACROSS THE WIDTH OF THE BLANKET.
3. ROLL THE BLANKETS (A.) DOWN OR (B.) HORIZONTALLY ACROSS THE SLOPE. BLANKETS WILL UNROLL WITH APPROPRIATE SIDE AGAINST THE SOIL SURFACE. ALL BLANKETS MUST BE SECURELY FASTENED TO SOIL SURFACE BY PLACING STAPLES/STAKES IN APPROPRIATE LOCATIONS AS SHOWN IN THE STAPLE PATTERN GUIDE. WHEN USING OPTIONAL DOT SYSTEM , STAPLES/STAKES SHOULD BE PLACED THROUGH EACH OF THE COLORED DOTS CORRESPONDING TO THE APPROPRIATE STAPLE PATTERN.
4. THE EDGES OF PARALLEL BLANKETS MUST BE STAPLED WITH APPROXIMATELY 2"-5" (5cm-12.5cm) OVERLAP DEPENDING ON BLANKET TYPE. TO ENSURE PROPER SEAM ALIGNMENT, PLACE THE EDGE OF THE OVERLAPPING BLANKET (BLANKET BEING INSTALLED ON TOP) EVEN WITH THE COLORED SEAM STITCH ON THE PREVIOUSLY INSTALLED BLANKET.
5. CONSECUTIVE BLANKETS SPLICED DOWN THE SLOPE MUST BE PLACED END OVER END (SHINGLE STYLE) WITH AN APPROXIMATE 3" (7.5cm) OVERLAP. STAPLE THROUGH OVERLAPPED AREA, APPROXIMATELY 12" (30cm) APART ACROSS ENTIRE BLANKET WIDTH.

NOTE:
*IN LOOSE SOIL CONDITIONS, THE USE OF STAPLE OR STAKE LENGTHS GREATER THAN 6" (15cm) MAY BE NECESSARY TO PROPERLY SECURE THE BLANKETS.

SEEDING DIRECTLY BENEATH THE EROSION CONTROL MAT SHALL BE INCLUDED IN THE COST OF THE EROSION CONTROL MAT.

14649 HIGHWAY 41 NORTH, EVANSVILLE, INDIANA 47725
USA 1-800-772-2040 CANADA 1-800-448-2040
www.nagreen.com

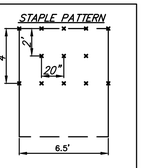
STAPLE PATTERN "D"

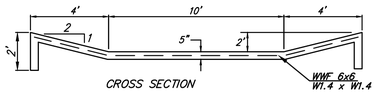
3-1/2 staples per sq. yd. using 6-inch, 11 ga. wire "U" staples. 8-inch staples and longer may be used for loose soils. 9 ga. staples or heavier may be necessary in hard or rocky soils.

Contractor shall follow manufacturers installation instructions regarding overlap dimensions. The overlap shall have a minimum dimension of three inches (3").

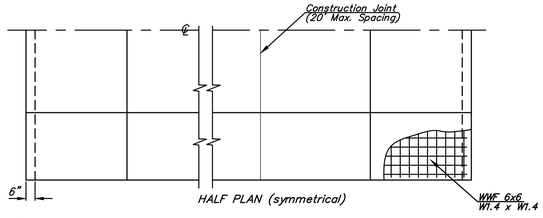
Erosion control mat.

STAPLE PATTERN



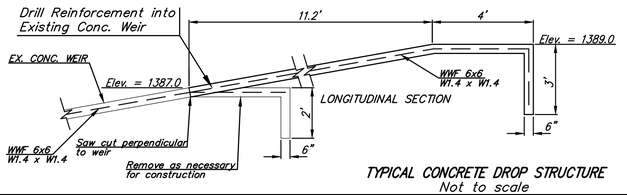


CROSS SECTION

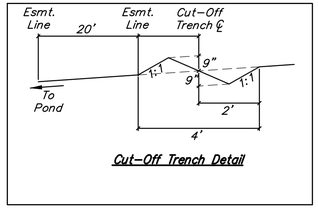


HALF PLAN (symmetrical)

GENERAL NOTES:
1. All Work To Be Performed In Accordance With The City of Wichita Storm Sewers & Drainage Standard Specifications.
2. All Concrete, Reinforcement, Removal, Labor, Excavation, And All Other Incidentals Shall Be Incidental To Concrete Drop Structure.
3. All Exposed Concrete Edges Shall Be Beveled 3/4".
4. All Reinforcing Steel To Have Minimum of 1-1/2" Concrete Cover.

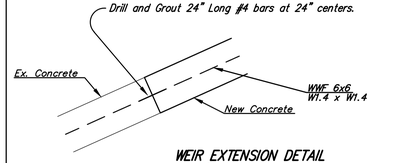


TYPICAL CONCRETE DROP STRUCTURE
Not to scale



Cut-Off Trench Detail

GENERAL NOTES:
Contractor to grade around concrete weir extension (both sides) to ensure stormwater flow through weir.



WEIR EXTENSION DETAIL
Not to scale

Baughman

Firefly Way Addition Phase I

POND PLAN

Storm Water Drain #419

Baughman Company, P.A. 315 Ellis St. Wichita, KS 67211 P 316-262-7271 F 316-262-0149
ENGINEERING | SURVEYING | PLANNING | LANDSCAPE ARCHITECTURE

PROJECT NUMBER	DESIGN	DRAWN
468-85185	AEG	DJL
REVISIONS:	APPROVED	DATE
		2/17
	SCALE	
	Noted	
	SHEET	
	8 OF 17	

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