Permit No.	Date	Document ID No.
50-03	**June 10, 2010**	**10838**

JACKSON COUNTY TRANSFER STATION

JACKSON COUNTY, NORTH CAROLINA

PROJECT NO. G07113

BOARD OF COMMISSIONERS

BRIAN McMAHAN, CHAIRMAN
JOE COWAN, VICE CHAIRMAN
WILLIAM R. SHELTON
THOMAS L. "TOM" MASSIE
MARK R. JONES
EVELYN BAKER
W. PAUL HOLT

COUNTY MANAGER

KENNETH L. WESTMORELAND

SOLID WASTE DIRECTOR

CHAD PARKER

Engineer

Municipal Engineering Services Company, P.A.

Garner, N.C. ***Boone, N.C.***

by _____ Professional Engineer 6/9/2010

NORTH CAROLINA PROFESSIONAL SEAL 6282 ENGINEER JIMMY D. MOORE

AS-BUILTS

05-07-2010

Municipal Engineering Services Company, P.A.
LICENSE NUMBER: C-0231
P.O. BOX 97 GARNER, N.C. 27529 (919) 772-5393
P.O. BOX 349 BOONE, N.C. 28607 (828) 262-1767
P.O. BOX 278 MOREHEAD CITY, N.C. 28557 (252) 725-9461

TRANSFER STATION JACKSON COUNTY

DESCRIPTION	REV.	BY	DATE

COVER SHEET

SCALE:
DATE: 06/2010
DRWN. BY: BRL
CHKD. BY: W.SULLIVAN
PROJECT NUMBER G07113
DRAWING NO. T-01
SHEET NO. 1 of 52

P:\SolidWaste\G07113-Jackson Co. Transfer Station\CAD\CD'S-G07113_ASBUILTS\G07113-01-T01_AB.dwg, 6/7/2010 12:45:28 PM, brl

Sewer Pipe Schedule

Pipe from	Pipe to	Upstream Invert ft	Downstream Invert ft	Slope ft/ft	L ft	Size in	Mat'l	Notes
MH1	MH2	2227.00	2224.75	1.01%	222	8	DIP	190 LF 14" steel casing
DI20	MH2	2227.00	2224.75	3.81%	59	8 (1)	PVC	30 LF 14" steel casing
GI2	MH2	2229.91	2226.75	3.79%	78	8	PVC	54 LF 14" steel casing
MH2	GI	2224.50	2224.25	3.12%	8	8	PVC	
GI	Pump Station	2224.09	2223.50	7.38%	8	8	PVC	
CO1	CO3	2240.00	2239.00	6.67%	15	8	DIP	
CO3	MH1	2239.00	2233.00	10.00%	60	8	DIP	
CO2	CO3	2243.00	2239.00	26.67%	15	8	DIP	
CO4	Pump Station	2227.00 (3)	2225.00	2.22%	90	4	PVC	
CO6	CO4	2228.00	2227.00	5.00%	20	4	PVC	
CO5	CO4	2229.00(2)	2227.00	4.00%	50	4	PVC	
GI1	CO1	2247.00	2243.00	26.67%	15	8	DIP	Serves trench drain in building

(1) Install 8" DI Plug on pipe at DI20. Drill 2" diameter hole at invert.
(2) Verify existing sewer service elevation and notify engineer of any discrepancy.
(3) May be field adjusted as necessary. Maintain minimum 1% slope to downstream structure.

Sewer Structure Schedule

Structure	Invert In ft	Invert Out ft	Rim ft	Size ft	Notes
MH1	2233.00	2227.00	2236.00	4' diameter	
MH2	2224.75/2276.75	2224.50	2231.50	4' diameter	
DI20	–	2229.00(1)	2231.00	3 x 3	Gravel pad collection
GI1	–	2247.00	2249.00		Tie to trench drain
GI2	–	2229.71		NA	Tie to trench drain

(1) Install 8" DI Plug on pipe. Drill 2" diameter hole at invert.

JEWEL ST.

N C DEPT OF TRANSPORTATION
950/503
SR 1456
7652-97-6396
11560.558919271

MINERAL SPRINGS ROAD

WHATLEY, JUDI N
767/194
SR1457
7662-07-0573
24776.385199653

JACKSON COUNTY
950/372
SR1456
7662-07-5050
1044714.342881941

N C DEPT OF TRANSPORTATION
966/64
SR 1456

EXIST MANHOLE
TOP= 2236.82
INV 2230.12

TIE TO EXISTING MANHOLE
SEE DETAIL SHEET C-15

EX. RAILROAD BRIDGE

PROP 4" SCH 80 PVC FORCE MAIN

45° AND 22.5° BEND

22.5° BEND

22.5° BEND

90° BEND

60LF OF 10" STEEL CASING

NEW POWER LINE

TEMP SEDIMENT TRAP #2 WITH BAFFLES

TEMP SEDIMENT TRAP #3 WITH BAFFLES

EX. POWER LINE

15" RCP

FES#6

FES#7

FES#8

DI#4

VALVE VAULT, SEE DETAIL SHEET C-14

PUMP STATION
N=627,226.64
E=760,072.38
SEE DETAIL SHEET C-14

PROPOSED SCALE

CO#4

CO#5

CO#6

4" SAN. SERVICE

EXTEND EXISTING 60" RCP BY 20 FEET

CUT EX. 2" WATER LINE. INSTALL NEW TEE, FITTINGS AND WATER LINE PVC SCH80

2" PVC SCH80 78 LF WATER LINE

EX. SCALES

EXIST. BLDG.

EXIST. CARPORT

EXIST. SHED

EXIST. WATER WELL APPROXIMATE LOCATION. CUT AND CAP EXIST. CASING 3' BELOW GRADE.

EX. TIE TO WATER MAIN APROXIMATE LOCATION

EX. WATER METER APROXIMATE LOCATION

EX. 2" WATER LINE APPROXIMATE LOCATION

EX. TRANSFER STATION BLDG

RELOCATED FUEL STORAGE DEPOT AND CONCRETE SECONDARY CONTAINMENT STRUCTURE (SEE DETAIL B-10)

ACCESS ROAD TO BORROW SITE

GRAPHIC SCALE

30 0 15 30 60 120

(IN FEET)
1 inch = 30 ft.

LEGEND:

- EX. PAVED ROADS
- PROP. PAVED ROADS
- EX. CONT-MJR
- EX. CONT-MINR
- PROP. CONT-MJR
- PROP. CONT-MINR
- PROP. STORM LINE
- PROP. FORCEMAIN LINE
- PROP. WATER LINE
- PROP. DITCH FLOW
- EX. OVERHEAD ELECTRIC
- OHE — PROP. OVERHEAD ELECTRIC
- PROP CO (TYP) W/ SERVICE LI
- EX. TREELINE
- PROP. TREELINE
- SF — PROP. SILT FENCE
- PROP. CLEARING LIMIT
- PROP. GUARDRAIL
- PROP. PERMANENT DITCH
- PROP. INLET PROTECTION
- PROP. SOIL BORING LOCATIONS

NORTH CAROLINA PROFESSIONAL SEAL 6283 ENGINEER JIMMY D. WOODLIEF — 9/2010

NORTH CAROLINA PROFESSIONAL SEAL 6282 ENGINEER JIMMY D. WOODLIEF — 9/2010

AS-BUILTS

06-07-2010

Municipal Engineering Services Company, P.A.
LICENSE NUMBER: C-0281
P.O. BOX 97 GARNER, N.C. 27529 (919) 772-5393
P.O. BOX 348 BOONE, N.C. 28607 (828) 262-1767
P.O. BOX 828 MOREHEAD CITY, N.C. 28557 (252) 726-3481

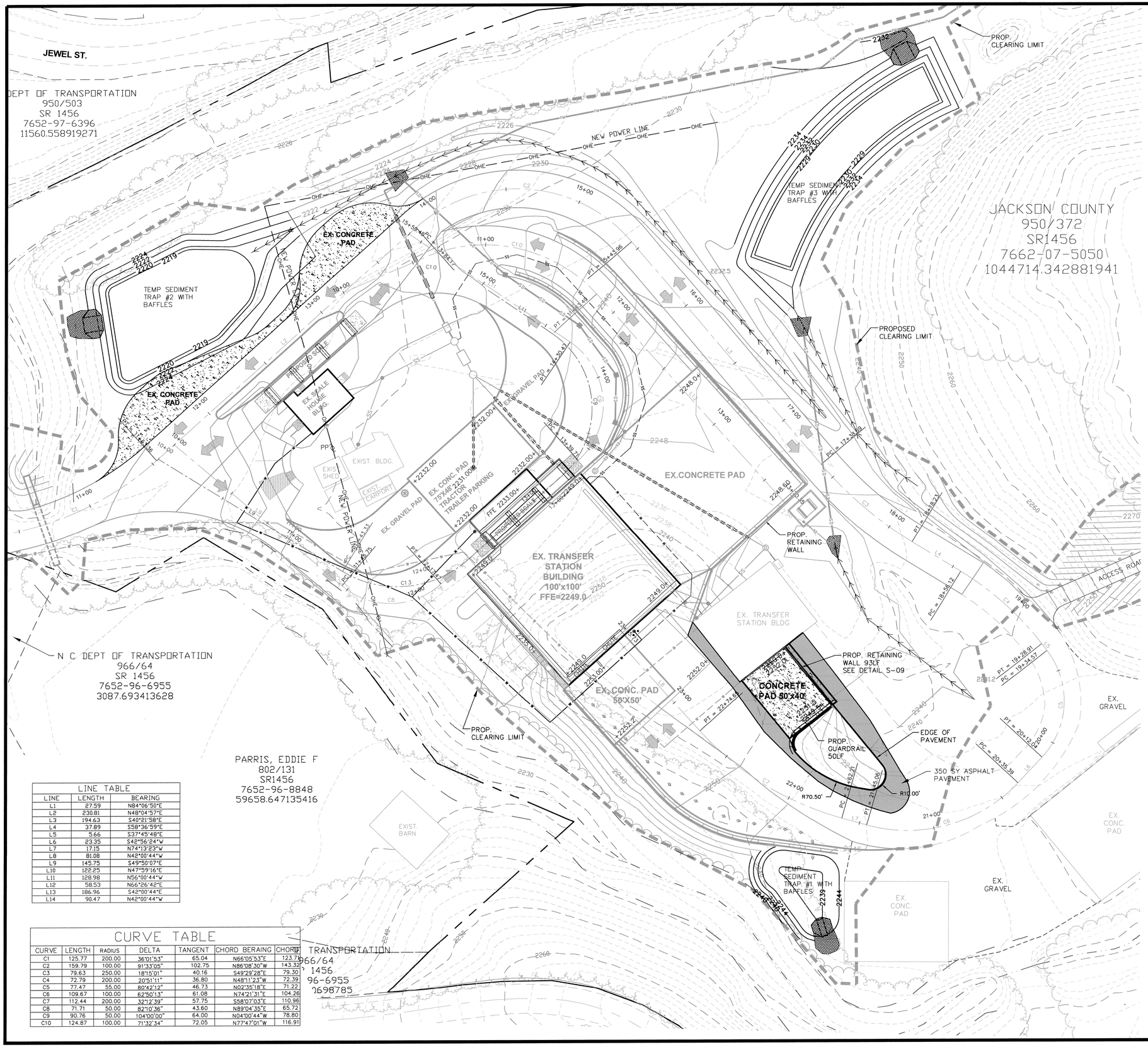
JACKSON COUNTY TRANSFER STATION PHASE 1
JACKSON COUNTY NORTH CAROLINA

UTILITY PLAN PHASE I

DATE	BY	REV.	DESCRIPTION

SCALE: 1" = 30'
DATE: 06/2010
DRWN. BY: BRL
CHKD. BY: W.SULLIVAN
PROJECT NUMBER G07113
DRAWING NO. C-04
SHEET NO. 9 of 52

P:\SolidWaste\G07113-Jackson Co. Transfer Station\CADD\CO'S-G07113_ASBUILTS\G07113-09-C4-UTIL-PH1_AB.dwg, 6/7/2010 12:44:12 PM, brl



LINE TABLE		
LINE	LENGTH	BEARING
L1	27.59	N84°06'50"E
L2	230.81	N48°04'57"E
L3	194.63	S40°21'58"E
L4	37.89	S58°36'59"E
L5	5.66	S37°45'48"E
L6	23.35	S42°56'24"W
L7	17.15	N74°13'23"W
L8	81.08	N42°00'44"W
L9	145.75	S49°50'07"E
L10	122.25	N47°59'16"E
L11	128.98	N56°00'44"W
L12	58.53	N66°26'42"E
L13	186.96	S42°00'44"E
L14	90.47	N42°00'44"W

CURVE TABLE						
CURVE	LENGTH	RADIUS	DELTA	TANGENT	CHORD BERAING	CHORD
C1	125.77	200.00	36°01'53"	65.04	N66°05'53"E	123.7
C2	159.79	100.00	91°33'05"	102.75	N86°08'30"W	143.32
C3	79.63	250.00	18°15'01"	40.16	S49°29'28"E	79.30
C4	72.79	200.00	20°51'11"	36.80	N48°11'23"W	72.39
C5	77.47	55.00	80°42'12"	46.73	N02°35'18"E	71.22
C6	109.67	100.00	62°50'13"	61.08	N74°21'31"E	104.26
C7	112.44	200.00	32°12'39"	57.75	S58°07'03"E	110.96
C8	71.71	50.00	82°10'36"	43.60	N89°04'35"E	65.72
C9	90.76	50.00	104°00'00"	64.00	N04°00'44"W	78.80
C10	124.87	100.00	71°32'34"	72.05	N77°47'01"W	116.91

GRAPHIC SCALE

30 0 15 30 60 120

(IN FEET)
1 inch = 30 ft.

LEGEND:

- EX. PAVED ROADS
- PROP. PAVED ROADS
- EX. CONT–MJR
- EX. CONT–MINR
- PROP. CONT–MJR
- PROP. CONT–MINR
- PROP. STORM LINE
- PROP. FORCEMAIN LINE
- PROP. WATER LINE
- PROP. DITCH FLOW
- EX. OVERHEAD ELECTRIC
- OHE — PROP. OVERHEAD ELECTRIC
- PROP CO (TYP) W/ SERVICE LINE
- EX. TREELINE
- PROP. TREELINE
- SF — PROP. SILT FENCE
- PROP. CLEARING LIMIT
- PROP. GUARDRAIL
- PROP. PERMANENT DITCH
- PROP. INLET PROTECTION
- PROP. SOIL BORING LOCATIONS
- ASPHALT PAVING

NORTH CAROLINA PROFESSIONAL SEAL 6282 ENGINEER JIMMY D. WOOSLEY 6/7/2010

AS-BUILTS

06-07-2010

Municipal Engineering Services Company, P.A.
LICENSE NUMBER: C-0281
P.O. BOX 97 GARNER, N.C. 27529 (919) 772-5393
P.O. BOX 349 BOONE, N.C. 28607 (828) 262-1757
P.O. BOX 828 MOREHEAD CITY, N.C. 28557 (252) 726-8481

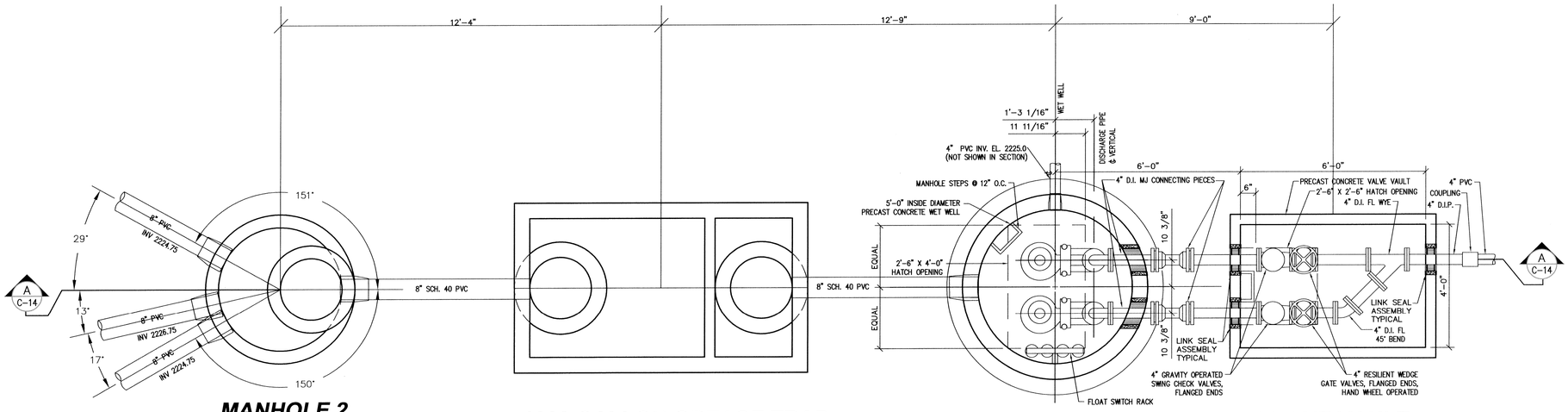
JACKSON COUNTY TRANSFER STATION PHASE 3
JACKSON COUNTY NORTH CAROLINA

SITE AND GRADING PLAN PHASE III

DATE	BY	REV.	DESCRIPTION

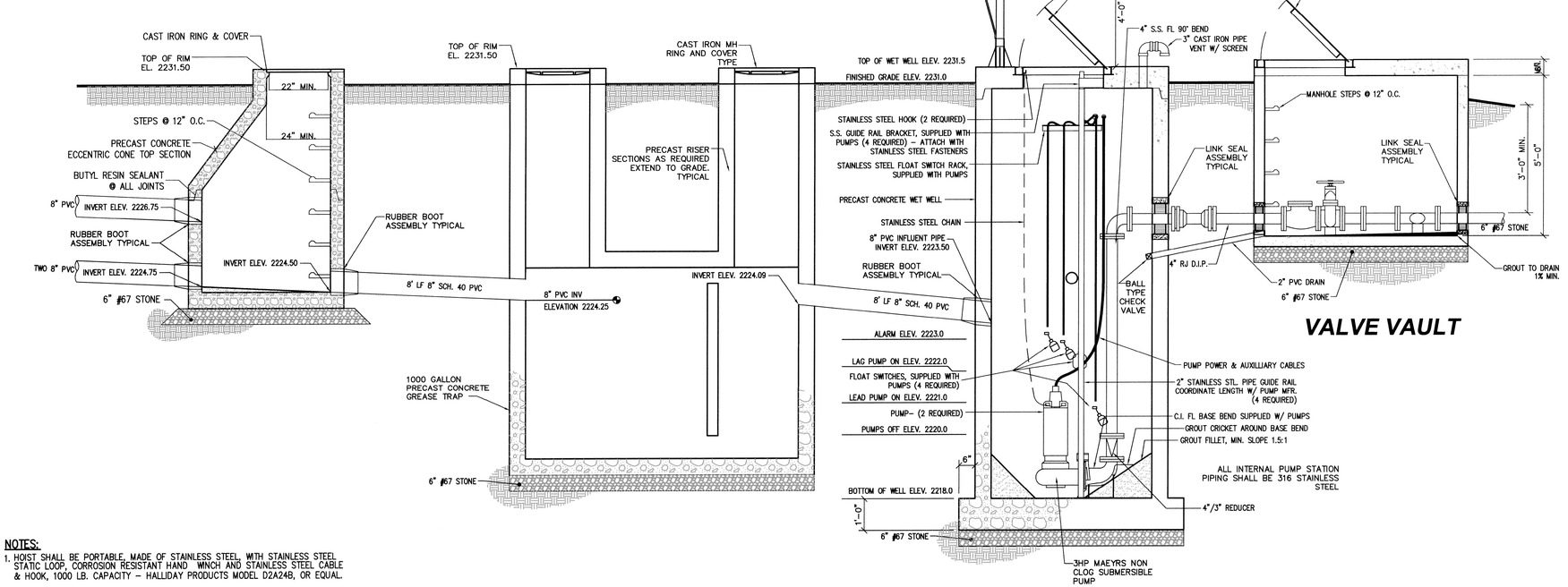
SCALE:	1" = 30'
DATE:	06/2010
DRWN. BY:	BRL
CHKD. BY:	W. SULLIVAN
PROJECT NUMBER	G07113
DRAWING NO.	C-13
SHEET NO.	18 of 52

P:\SolidWaste\G07113-Jackson Co. Transfer Station\CAD\CD'S-G07113_ASBUILTS\G07113-18-C13-PH3_AB.dwg, 6/7/2010 12:42:03 PM, brl



MANHOLE 2 | **1000 GALLON GREASE TRAP** | **VALVE VAULT**

PUMP STATION



VALVE VAULT

NOTES:

1. HOIST SHALL BE PORTABLE, MADE OF STAINLESS STEEL WITH STAINLESS STEEL STATIC LOOP, CORROSION RESISTANT HAND WINCH AND STAINLESS STEEL CABLE & HOOK, 1000 LB. CAPACITY – HALLIDAY PRODUCTS MODEL D2A248, OR EQUAL.

SECTION

SCALE: 1/2" = 1'-0"

A C-14

NORTH CAROLINA PROFESSIONAL SEAL 6282 ENGINEER JIMMY D. WOODIE 6/7/2010

AS-BUILTS

05-07-2010

Municipal Engineering Services Company, P.A.
LICENSE NUMBER: C-0281
P.O. BOX 97 GARNER, N.C. 27529 (919) 772-5393
P.O. BOX 349 BOONE, N.C. 28607 (828) 262-1767
P.O. BOX 828 MOREHEAD CITY, N.C. 28557 (252) 726-3481

JACKSON COUNTY TRANSFER STATION

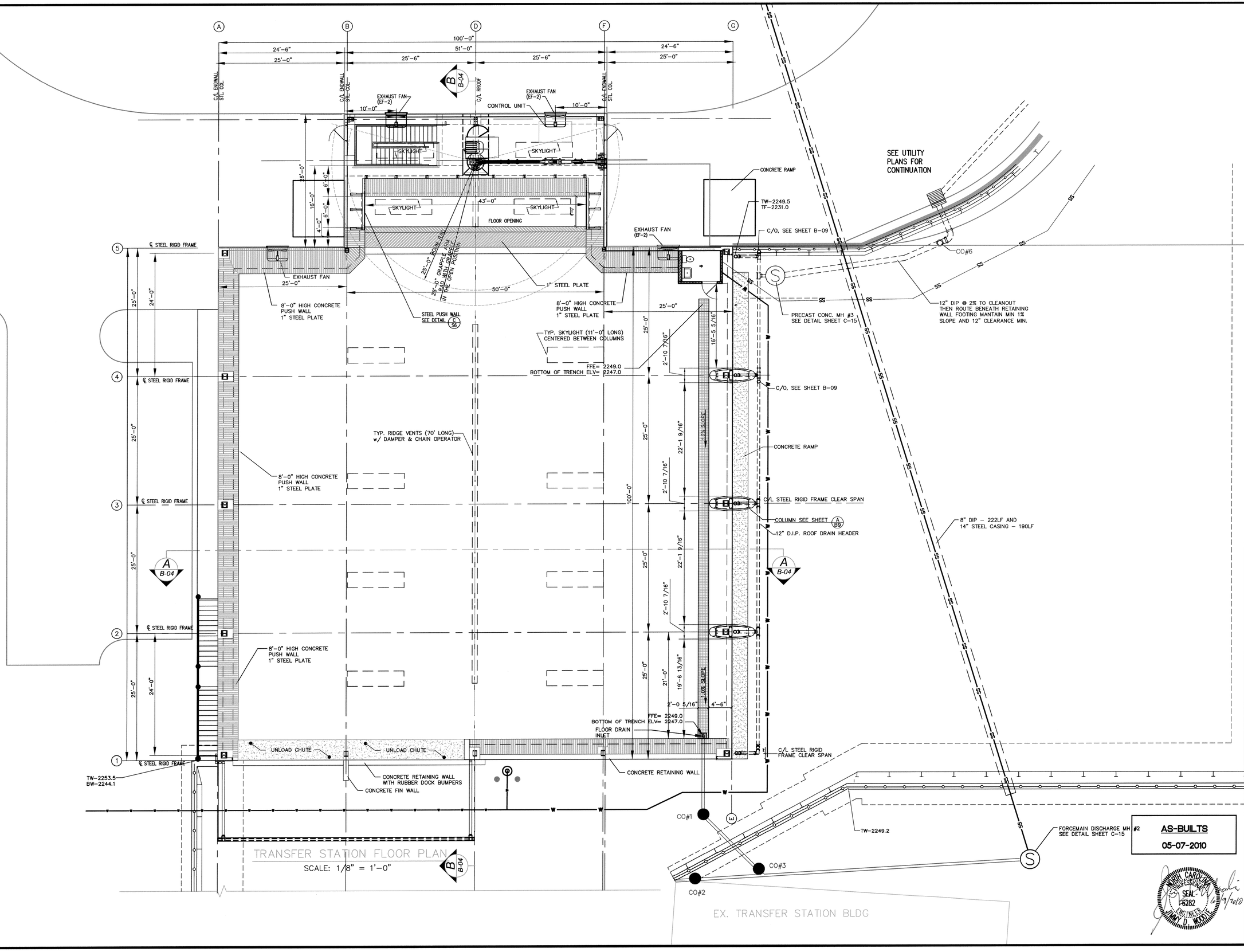
JACKSON COUNTY, NORTH CAROLINA

DATE	BY	REV.	DESCRIPTION

SITE DETAILS

SCALE:	AS NOTED
DATE:	06/2010
DRWN. BY:	BRL
CHKD. BY:	W. SULLIVAN
PROJECT NUMBER	G07113
DRAWING NO.	C-14
SHEET NO.	19 of 52

P:\SolidWaste\G07113-Jackson Co. Transfer Station\CAD\CD'S-G07113_ASBUILTS\G07113-19-C14_AB.dwg, 6/7/2010 12:57:55 PM, brl



TRANSFER STATION FLOOR PLAN
SCALE: 1/8" = 1'-0"

AS-BUILTS
05-07-2010

NORTH CAROLINA PROFESSIONAL ENGINEER SEAL 6282 JIMMY D. WOOD
6/9/2010

Municipal Engineering Services Company, P.A.
P.O. BOX 97 GARNER, N.C. 27529 (919) 772-5393
P.O. BOX 349 BOONE, N.C. 28607 (828) 262-1767

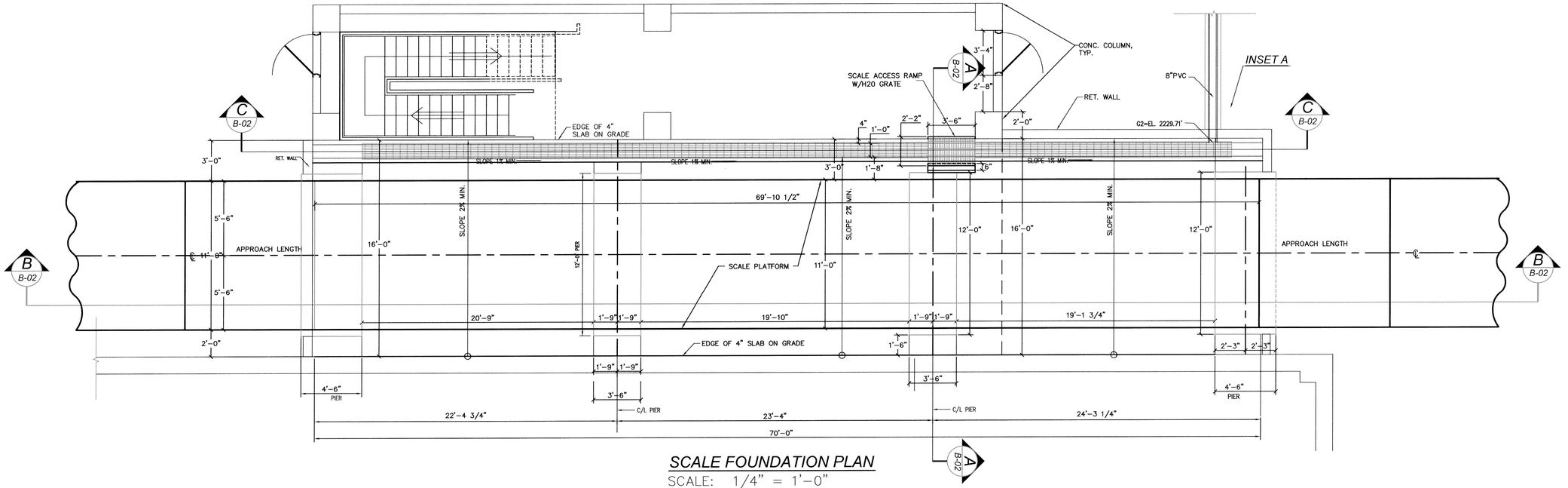
TRANSFER STATION JACKSON COUNTY

BUILDING PLAN

DATE	BY	REV.	DESCRIPTION

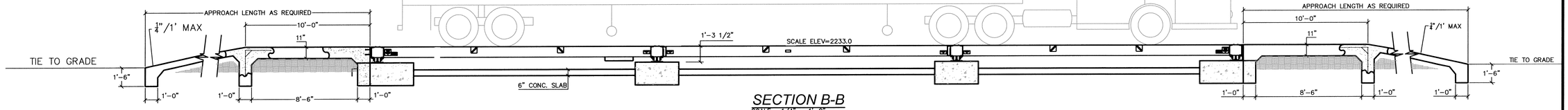
SCALE: 1/8" = 1'-0"
DATE: 06/2010
DRWN. BY: BRL
CHKD. BY: W.SULLIVAN
PROJECT NUMBER G07113
DRAWING NO. B01
SHEET NO. 22 OF 52

P:\SolidWaste\G07113-Jackson Co. Transfer Station\CAD\CD'S-G07113_ASBUILTS\G07113-22-B01_AB.dwg, 6/7/2010 12:49:56 PM, brl



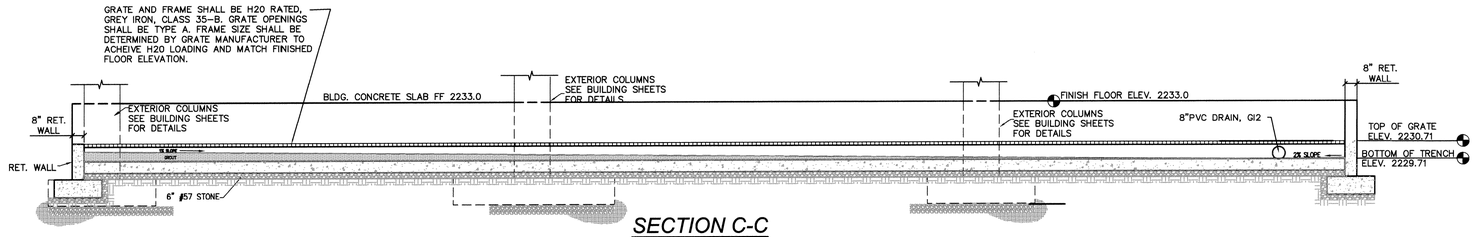
SCALE FOUNDATION PLAN

SCALE: 1/4" = 1'-0"
(70'-1 1/2" X 11'-0", 100 TON CAPACITY)



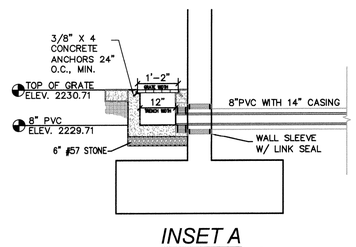
SECTION B-B

SCALE: 1/4" = 1'-0"



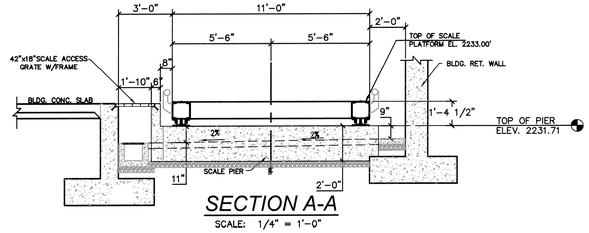
SECTION C-C

SCALE: 1/4" = 1'-0"



INSET A

SCALE: 1/2" = 1'-0"



SECTION A-A

SCALE: 1/4" = 1'-0"

NORTH CAROLINA PROFESSIONAL SEAL 6282 ENGINEER WILLIAM R. SULLIVAN 9/20/10

AS-BUILTS

05-07-2010

Municipal Engineering Services Company, P.A.
LICENSE NUMBER: C-0281
P.O. BOX 97 GARNER, N.C. 27529 (919) 772-5393
P.O. BOX 349 BOONE, N.C. 28607 (828) 262-1767

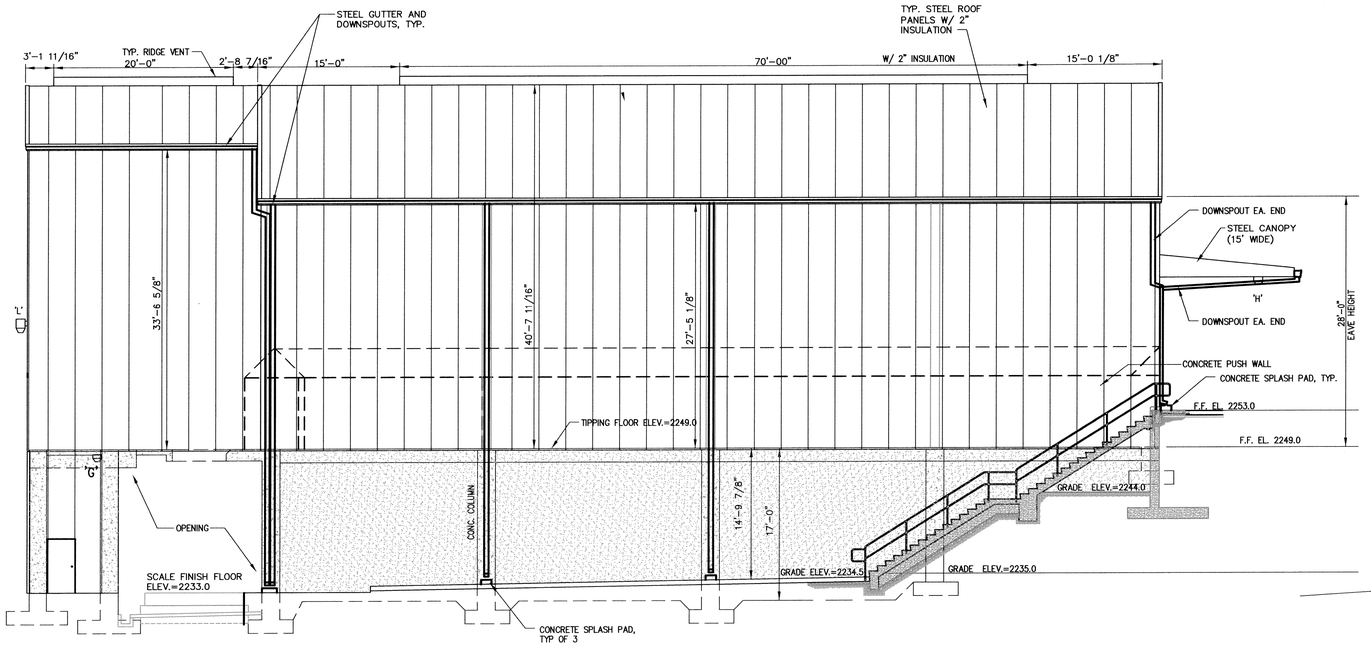
TRANSFER STATION JACKSON COUNTY

SCALE FUONDATION PLAN AND DETAILS

DATE	BY	REV.	DESCRIPTION

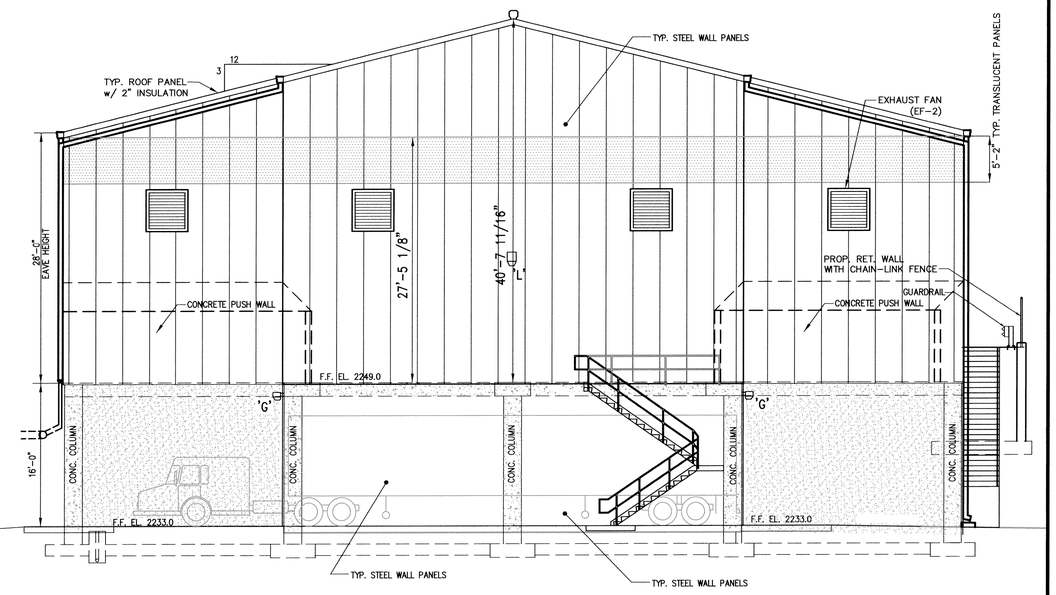
SCALE:	AS SHOWN
DATE:	06/2010
DRWN. BY:	BRL
CHKD. BY:	W.SULLIVAN
PROJECT NUMBER	G07113
DRAWING NO.	B-02
SHEET NO.	23 OF 52

P:\SolidWaste\G07113-Jackson Co. Transfer Station\CAD\CD'S-G07113_ASBUILTS\G07113-23-B02_AB.dwg, 6/7/2010 12:39:01 PM, bri



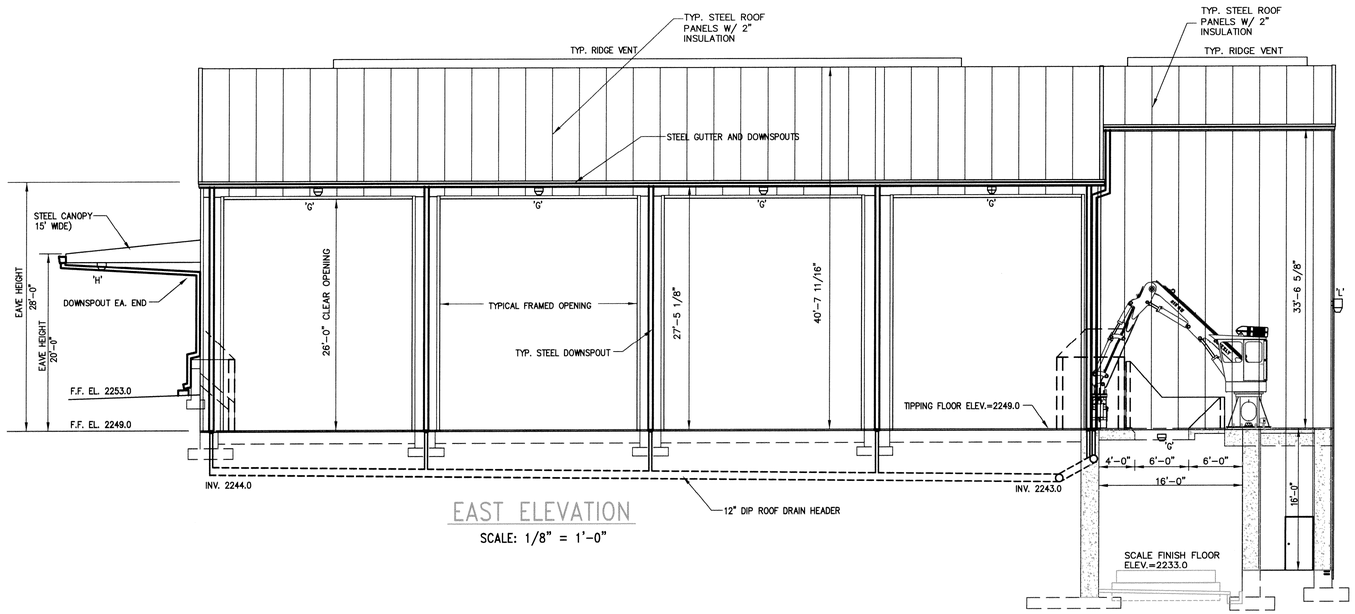
WEST ELEVATION

SCALE: 1/8" = 1'-0"



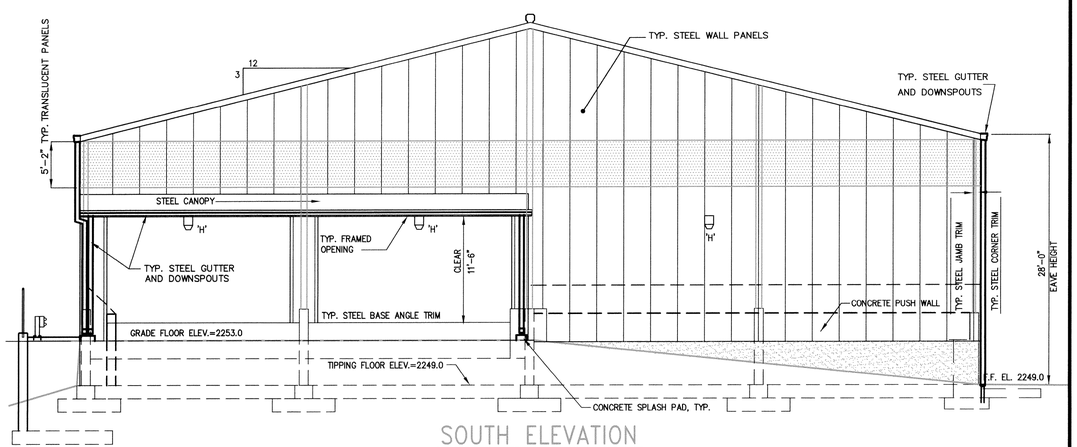
NORTH ELEVATION

SCALE: 1/8" = 1'-0"



EAST ELEVATION

SCALE: 1/8" = 1'-0"



SOUTH ELEVATION

SCALE: 1/8" = 1'-0"

NORTH CAROLINA PROFESSIONAL SEAL 6282 ENGINEER JIMMY D. WOODIE

9/2010

AS-BUILTS

05-07-2010

LICENSE NUMBER: C-0281

Municipal Services Engineering Company, P.A.

P.O. BOX 97 GARNER, N.C. 27529 (919) 772-5393

P.O. BOX 349 BOONE, N.C. 28607 (828) 262-1767

DATE	BY	REV.	DESCRIPTION

PROJECT: SOLID WASTE HANDLING AND TRANSFER FACILITY

OWNER: COUNTY OF JACKSON, N.C.

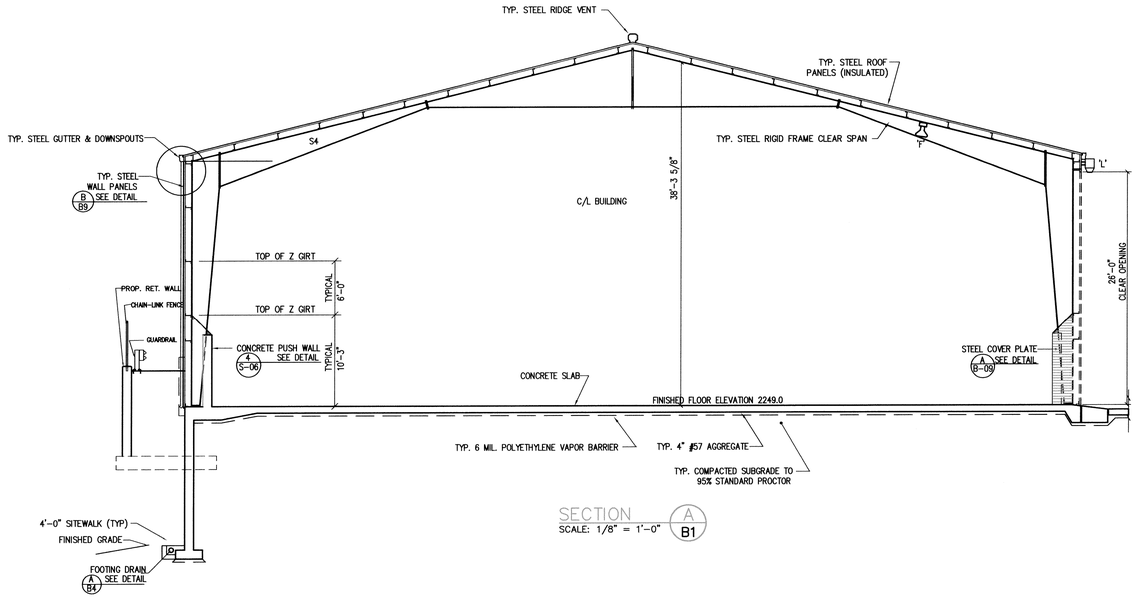
TITLE: JACKSON COUNTY SYLVA , NC TRANSFER STATION ELEVATIONS

DRAWING NUMBER: B-03

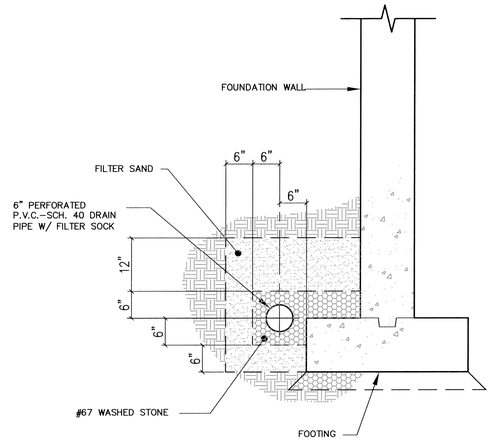
SCALE: AS SHOWN | DRWN. BY: M. SALIHU | PROJECT NO.: G07113 | SHEET NUMBER: 24 of 52

DATE: 04/18/09 | CHKD BY: P. RUSHING

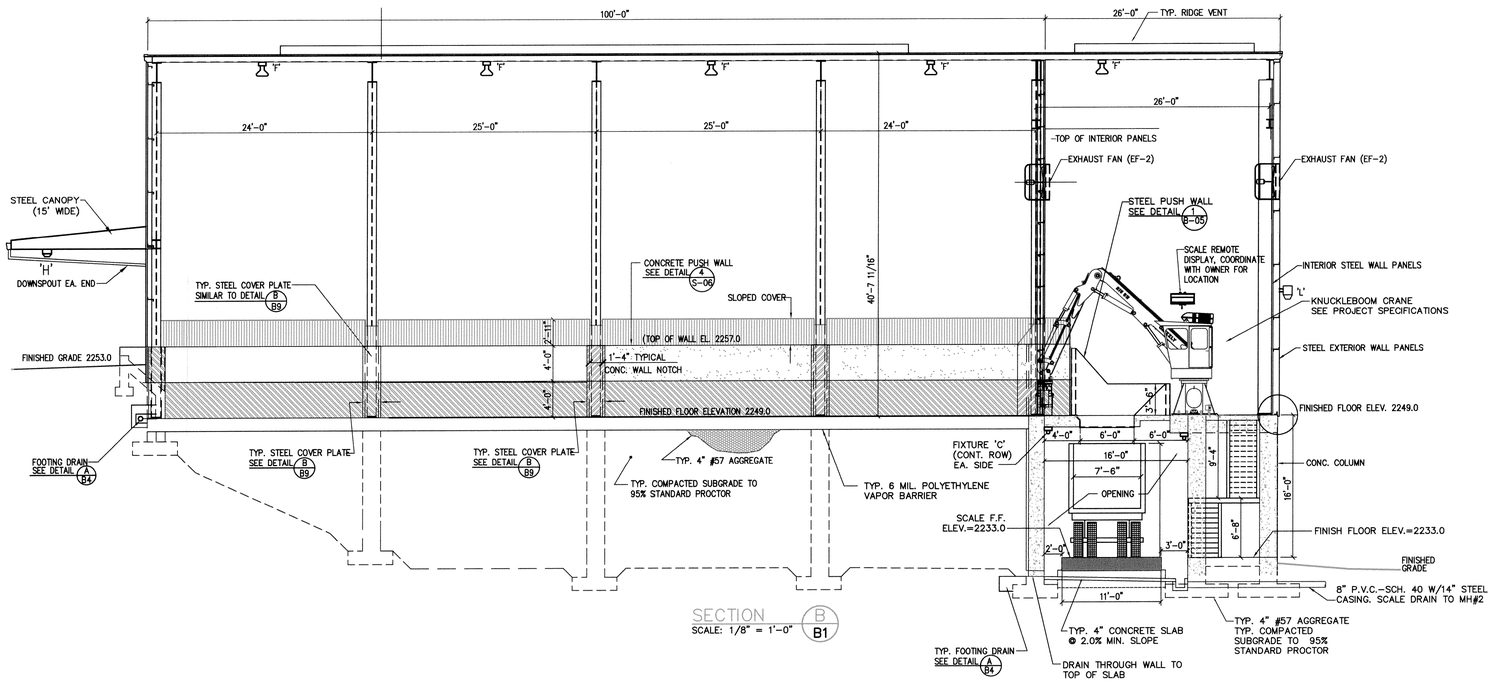
P:\SolidWaste\G07113-Jackson Co. Transfer Station\CAD\CD'S-G07113_ASBUILTS\G07113-24-B03_AB.DWG, 6/7/2010 12:11:29 PM, brl



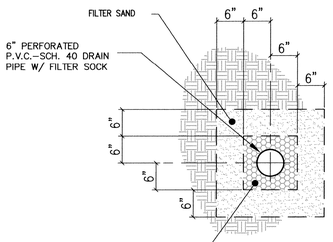
SECTION A / B1
SCALE: 1/8" = 1'-0"



FOR VERTICAL PIPE SECTIONS @ FOOTING STEPS USE UNPERFORATED P.V.C.-SCH. 40 PIPE.



SECTION B / B1
SCALE: 1/8" = 1'-0"



FOOTING DRAIN DETAIL A / B4
SCALE: 1/16" = 1'-0"
1

Municipal Engineering Services Company, P.A.
LICENSE NUMBER: C-0281
P.O. BOX 349 BOONE, N.C. 28607 (828) 262-1767
P.O. BOX 97 GARNER, N.C. 27529 (919) 772-5393

TRANSFER STATION
JACKSON COUNTY

BUILDING ELEVATIONS

DATE	BY	REV.	DESCRIPTION

NORTH CAROLINA PROFESSIONAL SEAL 6282 ENGINEER WILLIAM D. WILKEY 6/7/2010

AS-BUILTS
05-07-2010

SCALE:	AS SHOWN
DATE:	06/2010
DRWN. BY:	BRL
CHKD. BY:	W.SULLIVAN
PROJECT NUMBER	G07113
DRAWING NO.	B04
SHEET NO.	25 of 52

P:\SolidWaste\G07113-Jackson Co. Transfer Station\CAD\CD'S-G07113_ASBUILTS\G07113-25-B04_AB.dwg, 6/7/2010 12:54:13 PM, brl