ENERGY NORTHWEST IDC LANDFILL CLOSURE - COVER EXTENSION

BENTON COUNTY, WASHINGTON

OWNER:

ENERGY NORTHWEST
P.O. BOX 968
RICHLAND, WASHINGTON 99352
CONTACT: MARY C. RAMOS
OFFICE: 509-377-8534
EMAIL: MJOYRAMOS@ENERGY-NORTHWEST.COM

ENGINEER:

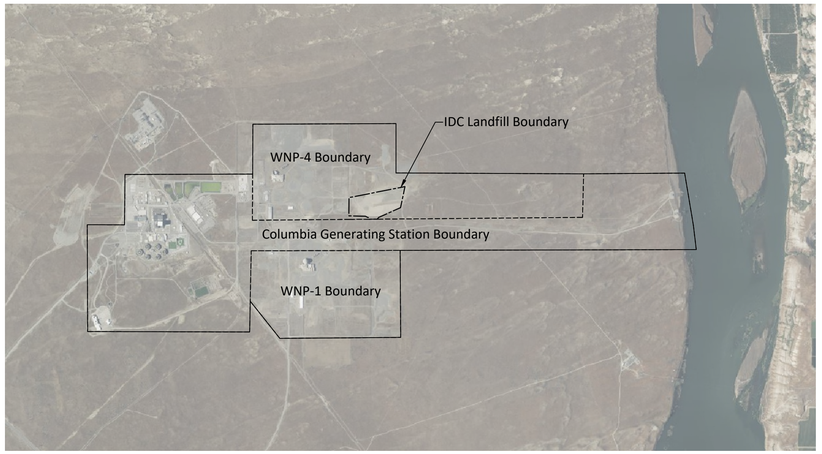
LANDAU ASSOCIATES
155 NE 100TH STREET, SUITE 302
SEATTLE, WASHINGTON 98125
CONTACT: KAILA ANDERSON, P.E.
360-359-7932
KANDERSON@LANDAUINC.COM

SYMBOLS

SYMBOL	DESCRIPTION
	LANDFILL BOUNDARY
	LIMITS OF WORK
	EXISTING LANDFILL GAS COLLECTOR & ANCHOR TRENCH
	PROPOSED LANDFILL GAS COLLECTOR & ANCHOR TRENCH
	ANCHOR TRENCH
232	TOPOGRAPHIC SURVEY DATA COLLECTED JUNE 5 AND 6, 2023
232	TOPOGRAPHIC SURVEY DATA COLLECTED MAY 22 AND JUNE 9, 2025
232	PROPOSED GRADING CONTOUR
V	LANDFILL GAS WELL
W	GROUNDWATER MONITORING WELL
	EXISTING GRAVEL ACCESS
	PROPOSED GRAVEL ACCESS
	EXTENT OF DISCOVERED EMERGENT WASTE

TEXT

∠	ANGLE
Ø	PHASE, DIAMETER
&	AND
'	FEET, MINUTES
"	INCHES, SECONDS
°	DEGREE
@	AT
℄	CENTERLINE
ℙ	PROPERTY LINE
#	NUMBER
%	PERCENT
BTM	BOTTOM
DWG	DRAWING
NO.	NUMBER
ABBR	ABBREVIATION
EXST / EX	EXISTING
PROP.	PROPOSED
R/W	RIGHT-OF-WAY
CO	CLEAN-OUT
TYP	TYPICAL
FT	FEET
NTS	NOT TO SCALE
DIA	DIAMETER



VICINITY MAP

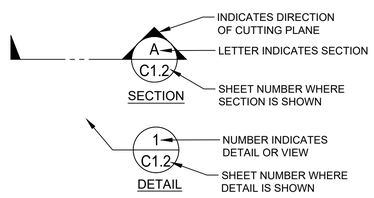
0 2500 5000

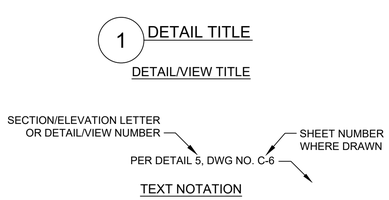
SCALE IN FEET

SURVEY NOTES

1. DATE OF SURVEYS: JUNE 5 AND 6, 2023; MAY 22 AND JUNE 9, 2025.
2. BASIS OF BEARING: PLANT DATUM.
3. UNITS OF MEASURE: US SURVEY FEET GROUND DISTANCES.
4. VERTICAL DATUM: NGVD29 PLANT DATUM.
5. CONTOUR INTERVAL: 1 FOOT.
6. EQUIPMENT/PROCEDURES: TOPCON HIPER GNSS, RTK METHOD. LINEAR CLOSURES MEET OR EXCEED STANDARDS CONTAINED IN WAC 332-130-090.
7. CONTRACTOR TO CONTACT PERMIT SURVEYING INC FOR BENCHMARK INFORMATION.

TITLES





SHEET INDEX

DRAWING NO.	SHEET NO.	SHEET TITLE
C-1	1	COVER SHEET
C-2	2	EXISTING CONDITIONS
C-3	3	SITE PREPARATION & TESC PLAN
C-4	4	PROPOSED CONDITIONS
C-5	5	DETAILS
C-6	6	DETAILS

PRELIMINARY

NO.	DATE	REVISIONS	DESIGNED	REVIEWED	APPROVED

DRAFTED BY:	E. ZICK	ESZ	02/03/2026
DESIGNED BY:	K. ANDERSON	KMA	02/03/2026
REVIEWED BY:	K. SALTANOVITZ	KMS	02/03/2026
APPROVED BY:	X	X	X
STATUS:	FOR CLOSURE PLAN	INITIAL	DATE

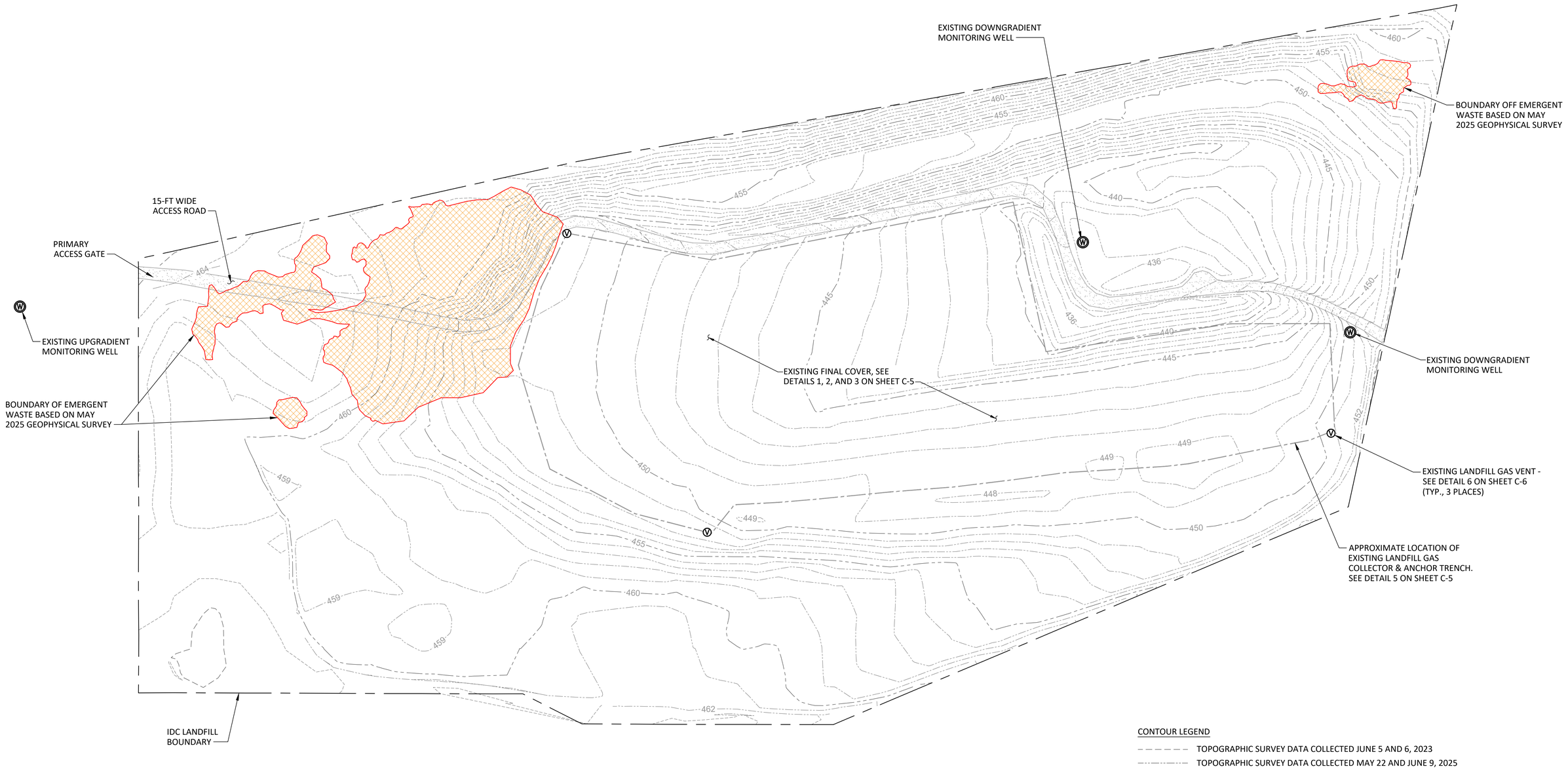
LANDAU ASSOCIATES
155 NE 100TH STREET
SEATTLE, WASHINGTON 98125
(206) 631-8680

ENERGY NORTHWEST IDC LANDFILL CLOSURE - COVER EXTENSTION

COVER SHEET

PROJECT NO.	1463012.010
DATE	FEBRUARY, 2026
SHEET	1 OF 6
DRAWING NO.	C-1

LANDAU ASSOCIATES INC. | G:\PROJECTS\1463\012\010\020\PLAN SET COVER EXTENSION\P COVER.DWG | 2/4/2026 | EZICK



CONTOUR LEGEND

- TOPOGRAPHIC SURVEY DATA COLLECTED JUNE 5 AND 6, 2023
- TOPOGRAPHIC SURVEY DATA COLLECTED MAY 22 AND JUNE 9, 2025

N

0 70 140

SCALE IN FEET

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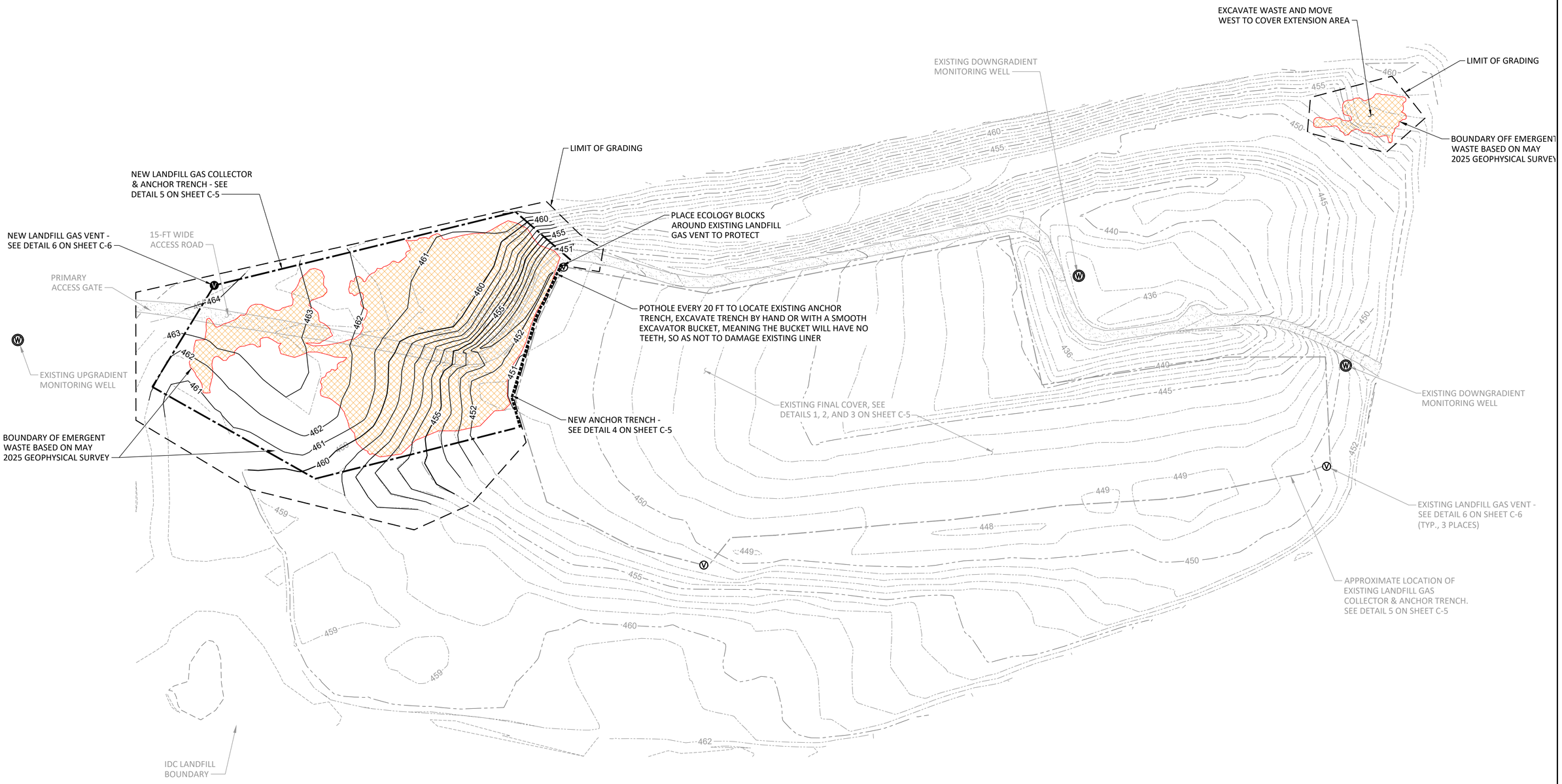
EXISTING CONDITIONS

PROJECT NO. 1463012.010
DATE FEBRUARY, 2026
SHEET 2 OF 6
DRAWING NO. **C-2**

LANDAU ASSOCIATES INC. | G:\PROJECTS\1463\012\010\020\PLAN SET COVER EXTENSION\P EXISTING.DWG | 2/4/2026 | EZICK



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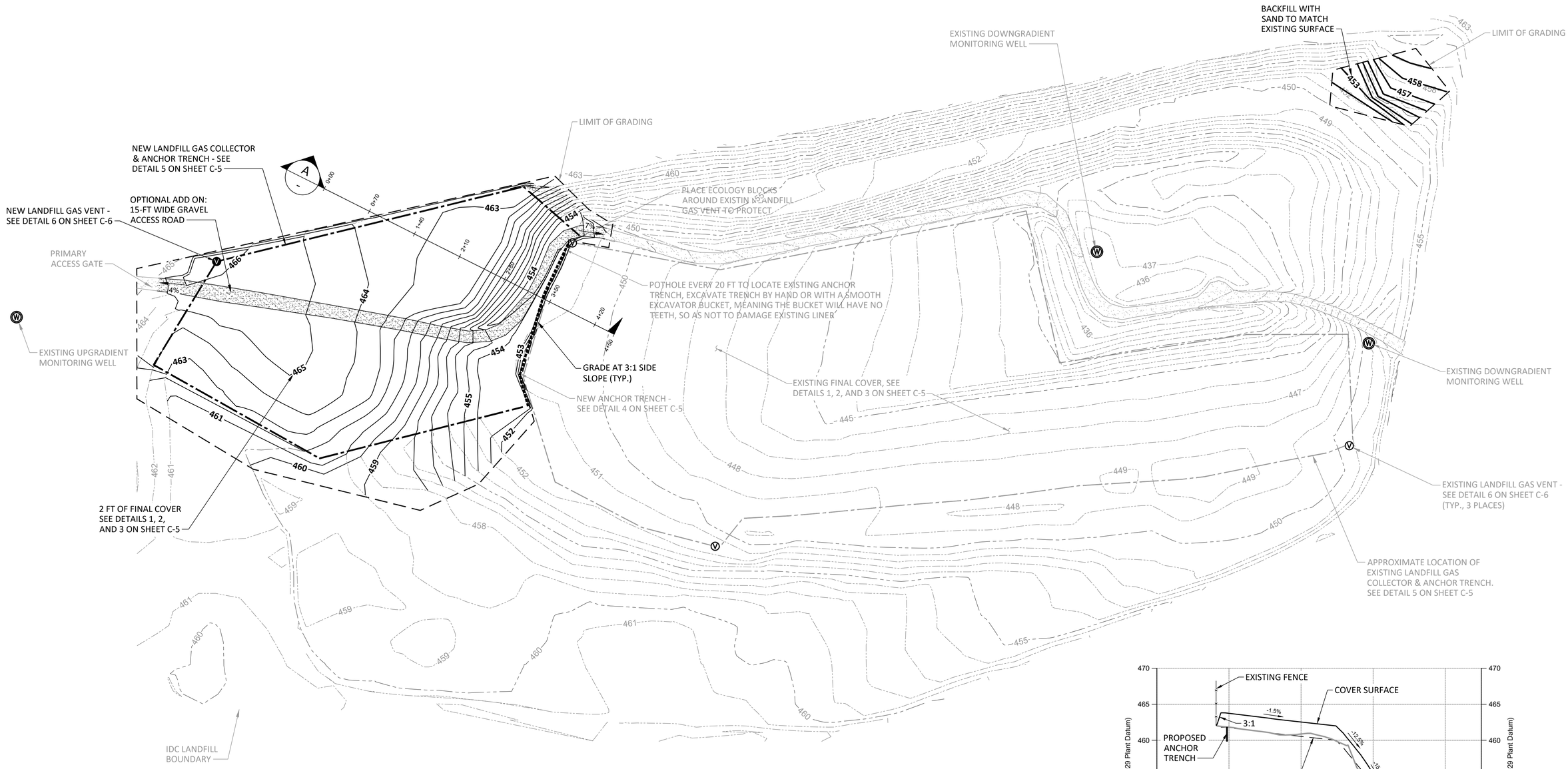
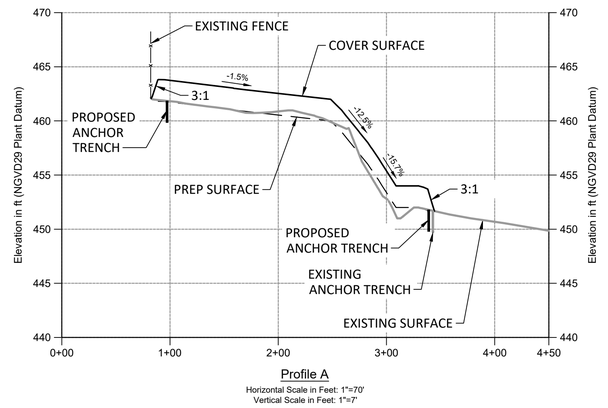
ENERGY NORTHWEST IDC LANDFILL CLOSURE - COVER EXTENSTION

SITE PREPARATION PLAN

PROJECT NO. 1463012.010
DATE FEBRUARY, 2026
SHEET 3 OF 6
DRAWING NO. **C-3**

LANDAU ASSOCIATES INC., | G:\PROJECTS\1463\012.010\020\PLAN SET COVER EXTENSION\P SITE PREP.DWG | 2/4/2026 | EZICK





Profile A

Horizontal Scale in Feet: 1"=70'
Vertical Scale in Feet: 1"=7'

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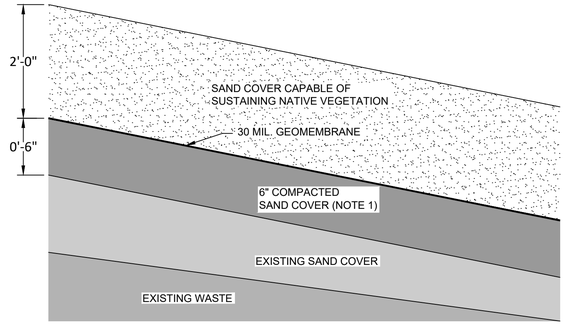
ENERGY NORTHWEST IDC LANDFILL CLOSURE - COVER EXTENSTION

PROPOSED CONDITIONS

PROJECT NO. 1463012.010
DATE FEBRUARY, 2026
SHEET 4 OF 6
DRAWING NO. **C-4**

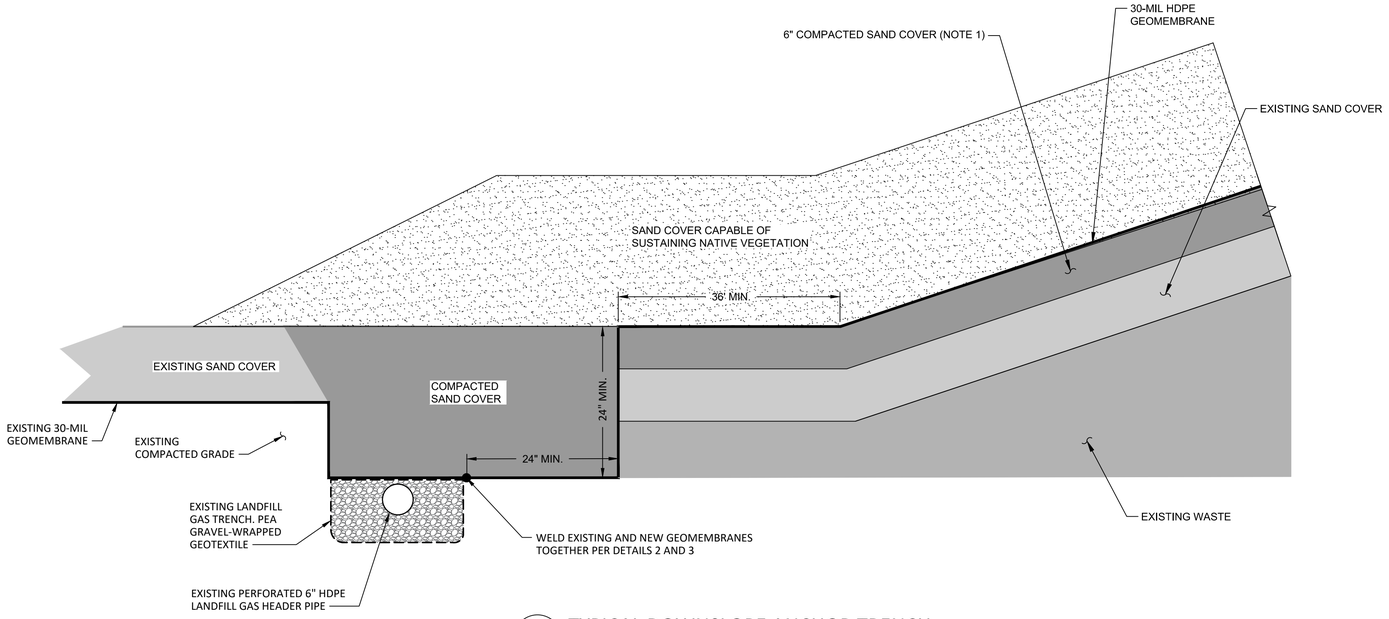
LANDAU ASSOCIATES INC., | G:\PROJECTS\1463\012\010\020\PLAN SET COVER EXTENSION\P PROPOSED.DWG | 2/4/2026 | EZICK



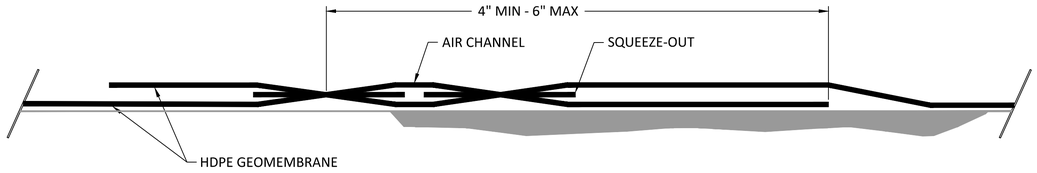
1 / C-4 FINAL COVER
SCALE: N.T.S.

NOTE

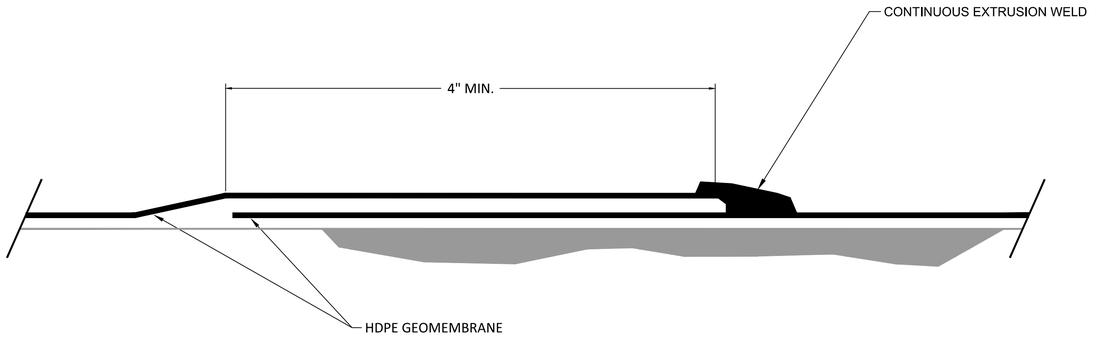
1. PRIOR TO GEOMEMBRANE PLACEMENT, PREPARE EXISTING SURFACE BY SCARIFYING SAND TO A DEPTH OF 6 INCHES, MOISTURE CONDITIONING SCARIFIED SAND, AND RE-COMPACTING SCARIFIED SAND TO A FIRM AND UNYIELDING CONDITION BY WHEEL ROLLING WITH A RUBBER-TIRED ROLLER, VIBRATING-SMOOTH DRUM ROLLER, OR OTHER METHOD TO ACHIEVE COMPACTION.



4 / C-3 TYPICAL DOWNSLOPE ANCHOR TRENCH
SCALE: N.T.S.



2 / C-4 TYPICAL HOT WEDGE DOUBLE TRACK FUSION WELD
SCALE: N.T.S.



3 / C-4 TYPICAL FILLET EXTRUSION WELD
SCALE: N.T.S.

5 / C-3 TYPICAL UPSLOPE ANCHOR TRENCH WITH GAS COLLECTION PIPE
SCALE: N.T.S.

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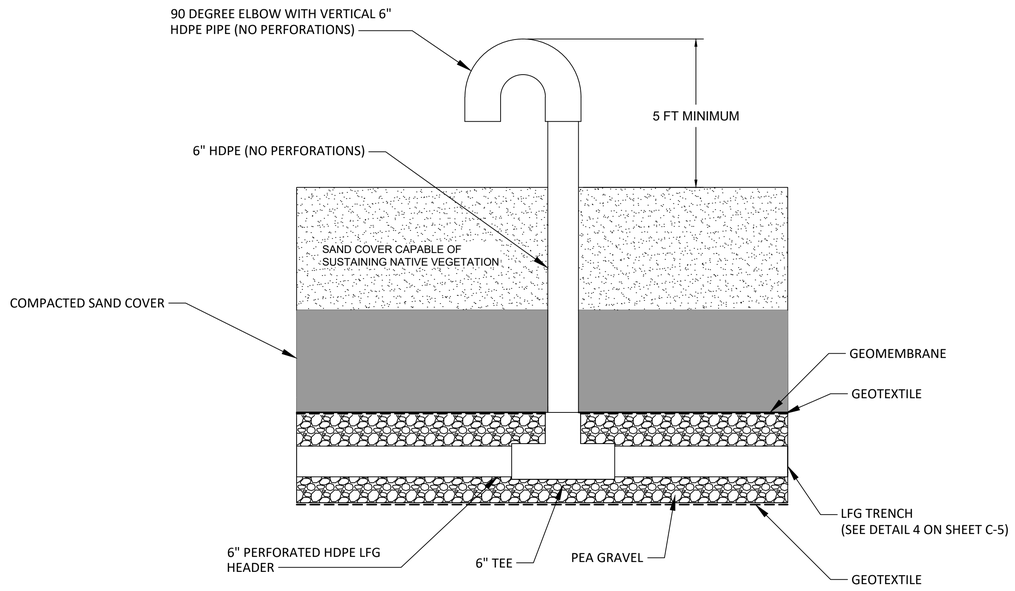
DETAILS

PROJECT NO. 1463012.010
DATE FEBRUARY, 2026
SHEET 6 OF 6
DRAWING NO. **C-5**

LANDAU ASSOCIATES INC. | G:\PROJECTS\1463\012\010\020\PLAN SET COVER EXTENSION\P DETAILS.DWG | 2/4/2026 | EZICK



6 C-3 LANDFILL GAS VENT DETAIL (SECTION VIEW)
SCALE: N.T.S.

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DETAILS

PROJECT NO. 1463012.010
DATE FEBRUARY, 2026
SHEET 7 OF 6
DRAWING NO. **C-6**

LANDAU ASSOCIATES INC. | G:\PROJECTS\1463\012\010\020\PLAN SET COVER EXTENSION\P DETAILS.DWG | 2/4/2026 | EZICK