TOTAL SHEETS 38

LETTING DATE: DECEMBER 15, 2026

STP-S-C074(118)--5E-74

PCC PAVEMENT- GRADE AND REPLACE

PALO ALTO COUNTY

IOWA
DEPARTMENT OF TRANSPORTATION
HIGHWAY DIVISION
PLANS OF PROPOSED IMPROVEMENT ON THE
FARM TO MARKET SYSTEM
PALO ALTO COUNTY

STP-S-C074(118)--5E-74
ON B14, FROM 480TH AVE E 2 MILES TO 500TH AVE AND ON N52, FROM B14 TO EMMET COUNTY LINE

Refer to the proposal form for list of applicable specifications

Project No. STP-S-C074(118)--5E-74

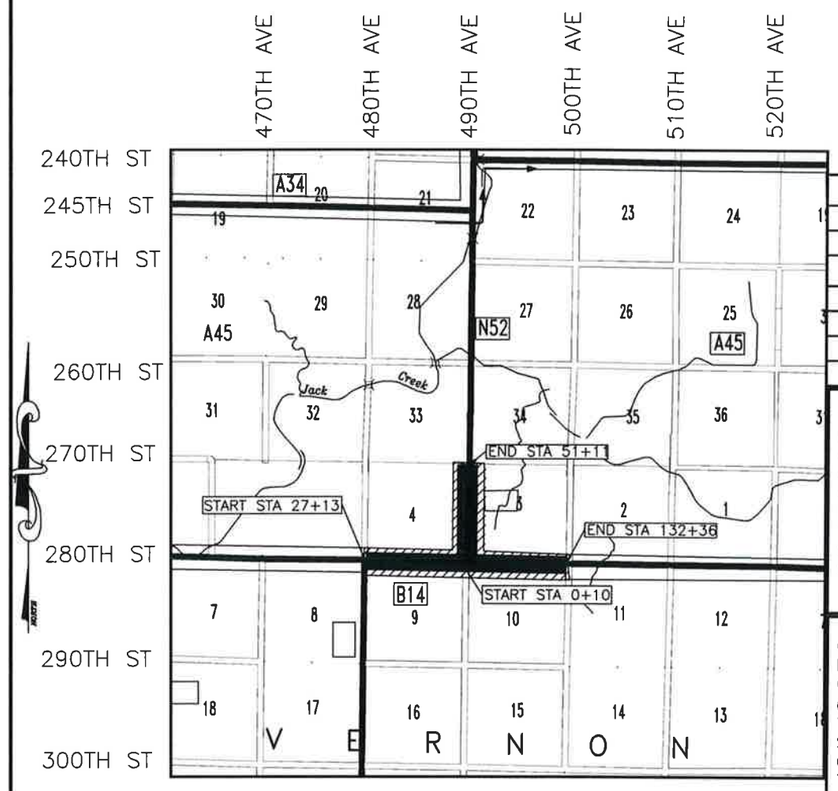
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MILEAGE SUMMARY

LOCATION	LIN. FT.	MILES
B14 STA 27+13 TO STA 132+36	10,523	1.992
N52 STA 0+10 TO STA 51+11	5101	0.966
PROJECT TOTAL	15,624	2.958

SCALES: AS NOTED



NOT TO SCALE
2023 AADT = 1070 V.P.D.

ROAD STANDARD PLANS

The following Standard Plans shall be considered applicable to construction work on this project.

Identification	Date	Identification	Date	Identification	Date
EC-204	10/19/2021	PV-10	10/20/2026	TC-273	10/15/2019
EC-502	4/21/2015	PV-101	10/20/2026		
EW-503	10/20/2015	TC-212	4/18/2023		
PM-110	4/16/2024	TC-252	10/20/2026		

IMPORTANT PHONE NUMBERS

IOWA ONE CALL: 800-292-8989

PALO ALTO CO ENGINEER: 712-852-3001

LOCAL UTILITIES

IOWA LAKES ELECRTIC COOP(KAY DAHL) 712-362-2694

RINGSTED TELEPHONE COMPANY(STEVEN OLESON) 712-866-1456

RIVER VALLEY TELEPHONE(KYLE HOUGH) 712-859-3300

MID AMERICAN WIND(WIND ENGINEER) 800-632-0999

THIS PROJECT IS COVERED BY THE IOWA DEPARTMENT OF NATURAL RESOURCES NPDES GENERAL PERMIT No. 2. THE CONTRACTOR SHALL CARRY OUT THE TERMS AND CONDITIONS OF GENERAL PERMIT No. 2 AND THE STORM WATER POLLUTION PREVENTION PLAN WHICH IS PART OF THESE CONTRACT DOCUMENTS. REFER TO SECTION 2602 OF THE IOWA D.O.T. STANDARD SPECIFICATIONS FOR ADDITIONAL INFORMATION.

CONTRACTOR NOTE: P.C.C. PAVING PLANT SHALL BE PLACED TO MINIMIZE CONSTRUCTION TRAFFIC ON MAINLINE GRADE. CONSTRUCTION TRAFFIC (LOADED AND EMPTY) SHALL BE MANAGED BY THE CONTRACTOR TO PREVENT DAMAGE TO SUBGRADE. TRAVEL ON SUBGRADE SHALL BE ONLY FROM NEAREST SIDE ROAD INTERSECTION TO PAVING OPERATION EXCEPT BY APPROVAL OF THE ENGINEER.

LICENSED PROFESSIONAL ENGINEER
Walter Davis-Oeth
21629
IOWA

I hereby certify that this engineering document was prepared by me or under my direct personal supervision and that I am a duly licensed Professional Engineer under the laws of the State of Iowa.

Walter Davis-Oeth, P.E.

My license renewal date is: 12/31/2026

Pages or sheets covered by this seal: 1-38

PALO ALTO COUNTY
BOARD OF SUPERVISORS

Linus Solberg, Chair

Keith Wirtz, Chair Pro Tem

Roger Faulstick

Ronald Graettinger

Craig Merrill

Approved
Board of Supervisors

ESTIMATED PROJECT QUANTITIES

REF.	ITEM NUMBER	DESCRIPTION	UNITS	TOTALS
1	2102-2625001	EMBANKMENT-IN-PLACE, CONTRACTOR FURNISHED	CY	5,674.58
2	2102-2710070	EXCAVATION, CLASS 10, ROADWAY AND BORROW	CY	3,656.75
3	2102-2712015	EXCAVATION, CLASS 12, BOULDERS OR ROCK FRAGMENTS	CY	10
4	2105-8425005	TOPSOIL, FURNISH AND SPREAD	CY	5,897.1
5	2115-0100200	MODIFIED SUBBASE, PLACE ONLY	CY	5,798.2
6	2123-7450020	SHOULDER FINISHING, EARTH	STA	312
7	2301-1033080	STANDARD OR SLIP FORM PORTLAND CEMENT CONCRETE PAVEMENT, CLASS C, CLASS 3 DURABILITY, 8 IN.	SY	41,664
8	2301-6911722	PORTLAND CEMENT CONCRETE PAVEMENT SAMPLES	LS	1
9	2301-7000110	PAVEMENT ADJUSTMENT INCENTIVE/DISINCENTIVE FOR PCC PAVEMENT THICKNESS(BY SCHEDULE)	EACH	48,746.88
10	2301-9091000	RUMBLE STRIP PANEL (PCC SURFACE)	EACH	2
11	2317-7000110	PAVEMENT ADJUSTMENT INCENTIVE/DISINCENTIVE FOR PCC PAVEMENT SMOOTHNESS(BY SCHEDULE)	EACH	31,248
12	2510-6750501	REMOVAL AND CRUSHING OF PAVEMENT	SY	35,019.2
13	2526-8285010	CONSTRUCTION SURVEY MONUMENT PRESERVATION	LS	1
14	2526-8285040	COSTRUCTION SURVEY LOC SURVEY	LS	1
15	2527-9263209	PAINTED PAVEMENT MARKING, WATERBORNE OR SOLVENT-BASED	STA	378.04
16	2528-2518000	SAFETY CLOSURE	EACH	4
17	2528-8445110	TRAFFIC CONTROL	LS	1
18	2528-8445113	FLAGGERS	EACH	PER PROPOSAL
19	2533-4980005	MOBILIZATION	LS	1
20	2599-9999018	CONSTRUCTION OF SOIL-FLYASH/CEMENT SUBBASE	SY	52,080
21	2601-2634100	MULCHING	ACRE	10.9
22	2601-2636043	SEEDING AND FERTILIZING (RURAL)	ACRE	10.9
23	2602-0000309	PERIMETER AND SLOPE SEDIMENT CONTROL DEVICE, 9 IN. DIA.	LF	140
24	2602-0010010	MOBILIZATIONS, EROSION CONTROL	EACH	1
25	2602-0010020	MOBILIZATIONS, EMERGENCY EROSION CONTROL	EACH	1

IF ARCHAEOLOGICAL MATERIALS ARE ENCOUNTERED DURING THE CONSTRUCTION PHASE OF THIS PROJECT, THE LOCATION AND ENVIRONMENT AND/OR THE DISTRICT 3 OFFICE (IOWA DEPARTMENT OF TRANSPORTATION) MUST BE CONTACTED IMMEDIATELY SO THE PROPER AUTHORITIES CAN BE NOTIFIED ACCORDING TO THE EXISTING FEDERAL REGULATIONS AND STATE PROCEDURES. ADDITIONALLY, IT SHOULD BE NOTED THAT FINDINGS AND RECOMMENDATIONS FOR CLEARANCE FOR FURTHER TESTING CANNOT BE CONSIDERED FINAL UNTIL CONCURRENCE IS RECEIVED FROM THE OFFICE OF THE STATE HISTORIC PRESERVATION OFFICER.
DISTRICT 3 OFFICE (712) 276–1451

PROJECT SURVEYED AND PLANS DEVELOPED USING IOWA REGIONAL COORDINATE SYSTEM ZONE 1, HORIZONTAL DATUM NAD 83, VERTICAL DATUM NAVD 88. GRID TO GROUND CORRECTION MUST BE APPLIED FOR CONVENTIONAL SURVEYING.

REFERENCE INFORMATION

1-2	2102-2710070	CLASS 10 EXCAVATION CONSISTS OF BLADING BACK EXISTING SHOULDER, RESHAPING SHOULDER AND FORESLOPE, AND MAKING GRADE CHANGES. CONTRACTOR WILL BE RESPONSIBLE FOR TEMP DRIVEWAY FILLETS. COUNTY WILL DO FINISHING WORK FOR DRIVEWAYS. CONTACT DNR ABOUT POSSIBLE BORROW LOCATION(LUKE STRAW 712-330-5689)
4	2105-8425005	QUANTITY IS COMPUTED BASED ON A BASIS OF A UNIFORM 4 INCH PLACEMENT. EXISTING TOPSOIL MATERIAL FROM ROAD DITCHES MAY BE USED AS TOPSOIL.
5	2115-0100200	MODIFIED SUBBASE, PLACE ONLY, CONSISTS OF HAULING AND PLACEMENT OF CRUSHED CONCRETE. SEE NOTE ON SHEET #5 FOR GRADATION. NO OVERHAUL WILL BE PAID ON THIS ITEM. TYPE 'A' COMPACTION.
7	2301-1033080	PERPENDICULAR CD JOINTS WITH 15' SPACING. LONGITUDINAL TINING IS REQUIRED ON ALL PAVING. IDOT STANDARD SPEC. 2317 (PAVEMENT SMOOTHNESS) SHALL APPLY. END OF PROJECT SHALL BE CHECKED IN SAME MANNER AS MAINLINE PAVEMENT AND CORRECTED. THESE SECTIONS SHALL NOT BE USED IN THE CALCULATIONS FOR INCENTIVE OR PRICE REDUCTION AND SHALL BE INCIDENTAL TO PCC PAVEMENT ITEM. CERTIFIED PLANT INSPECTION SHALL BE PROVIDED AND SHALL BE INCIDENTAL TO PCC PAVEMENT. COUNTY SHALL FURNISH FIELD LABORATORY, OR THE CONTRACTOR MAY PROVIDED A LABORATORY AT OWN EXPENSE.
9	2301-9091000	SEE TAB 7132 ON SHEET # 7 FOR RUMBLE STRIP NOTES AND LOCATIONS
10	2510-6750501	THIS BID ITEM TO INCLUDE REMOVAL AND CRUSHING OF EXISTING PCC. ONCE PAVEMENT IS REMOVED CONTRACTOR IS RESPONSIBLE TO KEEP ROAD SUBBASE WELL GRADED AND DRAINED TO PREVENT WHEEL RUTTING. ANY UNUSED CRUSHED PAVEMENT WILL REMAIN PROPERTY OF THE COUNTY. COUNTY WILL HAUL AWAY EXTRA MATERIAL.
11	2526-8285010	LEAD PLUG SECTION CORNER MONUMENTS WILL BE PROVIDED BY COUNTY. CONTRACTOR SHALL REMOVE AND NOT CAUSE TO BE BURIED ALL METAL STAKING MATERIALS.
13	2528-2518000	SEE TAB 108-13A ON SHEET #9 FOR SAFETY CLOSURE NOTES
14	2528-8445110	SEE TAB 108-13A ON SHEET #10 FOR TRAFFIC CONTROL NOTES. CONTRACTOR IS RESPONSIBLE FOR ERECTION AND MAINTENANCE OF ENTIRE DETOUR & BARRICADES ALONG PROJECT.
17	2599-9999018	CONTRACTOR MAY USE EITHER FLYASH OR CEMENT TO STABILIZE SOIL PRIOR TO MODIFIED SUBBASE PLACEMENT. SEE TAB PA-01 FOR NOTES INCLUDING MEASUREMENTS AND PAYMENT DETAILS. SHEET #5 DISCUSS DIFFERENT APPLICATION RATES FOR CEMENT AND FLYASH. SOIL-FLYASH/CEMENT SUBBASE APPLICATION FOR MAINLINE ONLY. SEE TAB PA-01 ON SHEET #4 FOR SOIL-FLYASH/CEMENT SUBBASE NOTES. SOIL-FLYASH/CEMENT SUBBASE AT MAINLINE ONLY.
20	2602-0000309	SEE TAB ON SHEET #7 FOR LOCATIONS & DIMENSIONS
21	2601-0000309	PERIMETER AND SLOPE SEDIMENT CONTROL DEVICE WILL BE USED IN LOCATIONS IN TABLE ON SHEET 6

POLLUTION PREVENTION PLAN

This project is regulated by the requirements of the Iowa Department of Natural Resources (DNR) National Pollutant Discharge Eliminiation System (NPDES) General Permit No. 2 OR an Iowa Department of Natural Resources (DNR) National Pollutant Discharge Eliminiation System (NPDES) individual storm water permit . The Contractor shall carry our the terms and conditions of this permit and the Pollution Prevention Plan (PPP).
This Base PPP includes information on Roles and Responsibilities, Project Site Description, Controls, Maintenance Procedures, Inspection Requirements, Non-Storm Water Controls, Potential Sources of Off Right-of-Way Pollution, and Definitions. This plan references other documents rather than repeating the information contained in the documents. A copy of this Base Pollution Prevention Plan, amended as needed per plan revisions or by contract modification, will be readily available for review.
All contractors shall conduct their operations in a manner that controls pollutants, minimizes erosion, and prevents sediments from

entering waters of the state and leaving the highway right-of-way. The prime contractor shall be responsible for compliance and implementation of the PPP for their entire contract. This responsibility shall be further shared with subcontractors whose work is a source of potential pollution as defined in this PPP.

I. ROLES AND RESPONSIBILITES

A. Designer:
1. Prepares Base PPP included in the project plan.
2. Prepares Notice of Intent (NOI) submitted to Iowa DNR.
3. Signature authority on the Base PPP and NOI.

B. Contractor/Subcontractor:
1. Affected contractors/subcontractors are co-permittees with the IDOT and will sign a certification statement adhering to the requirements of the NPDES permit and this PPP plan. Affected contractors/subcontractors are anyone responsible for sediment or erosion controls or involved in land disturbing activities. All co-permittees are legally required under the Clean Water Act and the Iowa Administrative Code to ensure compliance with the terms and conditions of this PPP.
2. Submit an Erosion Control Implementation Plan (ECIP) according to Specifications Section 2602 and any additional plan notes
3. Install and maintain appropriate controls.
4. Supervise and implement good housekeeping practices.
5. Conduct joint required inspections of the site with inspection staff.
6. Comply with training and certification requirements of Specifications Section 2602.
7. Signature authority on Co-Permittee Certification Statements and storm water inspection reports.

C. RCE/Inspector:
1. Update PPP whenever there is a change in design, construction, operation or maintenance, which has a significant effect on the discharge of pollutants from the project.
2. Maintain an up-to-date record that identifies contractors and subcontractors as co-permittees.
3. Make these plans available to the DNR upon their request.
4. Conduct joint required inspections of the site with the contractor/subcontractor.
5. Complete an inspection report after each inspection.
6. Signature authority on storm water inspection reports and Notice of Discontinuation (NOD).

II. PROJECT SITE DESCRIPTION

A. This Pollution Prevention Plan (PPP) is for the construction of a two lane highway on B14
2 Miles and one mile in N52
B. This PPP covers approximately 30 acres with an estimated 10.9 acres being disturbed. The portion of the PPP covered by this contract has 10.9 acres disturbed.
C. The PPP is located in an area of one soil association (Clarion-Nicollet-Webster). The estimated weighted average runoff coefficient number for this PPP after completion will be 64.
D. Storm Water Site Map - Multiple sources of information comprise the base storm water site map including:
1. Drainage patterns – Plan and Profile sheets and Situation plans.
2. Proposed Slopes – Cross Sections.
3. Areas of Soil Disturbance – construction limits shown on Plan and Profile sheets.
4. Location of Structural Controls – Tabulations on TABLES -DETAILS sheets.
5. Locations of Non-structural Controls – Tabulations on TABLES-DETAILS sheets.
6. Locations of Stabilization Practices – generally within construction limits shown on Plan and Profile sheets.
7. Surface Waters (including wetlands) – Project Location Map and Plan and Profile sheets.
8. Locations where storm water is discharged – Plan and Profile sheets.

E. The base site map is amended by contract modifications and progress payments (fieldbook entries) of completed erosion control work. Also, due to project phasing, erosion and sediment controls shown on project plans may not be installed until needed, based on site conditions. For example, silt fence ditch checks will typically not be installed until the ditch has been installed. Installed locations may also be modified from tabulation locations by field staff. Installed locations will be documented by fieldbook entries.
F. Runoff from this work will flow into road ditch to DD15 then ultimately draining into DD81 (West Fork of the Des Moines River).

III. CONTROLS

A. The contractor's ECIP specified in Article 2602.03 for accomplishment of storm water controls should clearly describe the intended sequence of major activities and for each activity define the control measure and the timing during the construction process that the measure will be implemented.
B. Preserve vegetation in areas not needed for construction.
C. Sections 2601 and 2602 of the Standard Specifications define requirements to implement erosion and sediment control measures. Actual quantities used and installed locations may vary from the Base PPP and amendment of the plan will be documented via fieldbook entries or by contract modification. Additional erosion and sediment control items may be required as determined by the inspector and/or contractor during storm water monitoring inspections. If the work involved is not applicable to any contract items, the work will be paid for according to Article 1109.03 paragraph B.
1. EROSION AND SEDIMENT CONTROLS
a. Stabilization Practices
1) Site plans will ensure that existing vegetation or natural buffers are preserved where attainable and disturbed portions of the site will be stabilized.
2) Stabilization practices shall be initiated as soon as practicable in portions of the site where construction activities have temporarily or permanently ceased.
3) Temporary stabilizing seeding shall be completed as the disturbed areas are constructed. If construction activity is not planned to occur in a disturbed area for at least 21 days, the area shall be stabilized by temporary seeding or mulching within 14 days.
4) Permeant and Temporary Stabilization practices to be used for this project are located in the Estimated Project Quantities (100-0A, 100-1A, or 100-1C) and Estimate Reference Information (100-4A) located on the STABILIZATION sheets of the Typical drawings detailing construction of the practices to be used on this project are referenced in the Standard Road Plans Tabulation.
5) Preservation of existing vegetation within right-of-way or easements will act as vegetative buffer strips.
6) Preservation of topsoil: Bid items to be used for this project are located in the Estimated Project Quantities (100-0A, 100-1A, or 100-1C) and Estimate Reference Information (100-4A) located on the Quantities sheets of the plan. Additional information may be found in Tabulations in the C or T sheets of the plans or is referenced in Standard Specifications Section 2105.

b. Structural Practices
1) Structural practices will be implemented to divert flows from exposed soils and detain or otherwise limit runoff and the discharge of pollutants from exposed areas of the site. Additionally, structural practices may include: silt basins that provide 3600 cubic feet of storage per acre drained or equivalent sediment controls, outlet structures that withdraw water from surface when discharging basins, and controls to direct storm water to vegetated areas.
2) Structural practices to be used for this project are located in the Estimated Project Quantities (100-0A, 100-1A, or 100-1C) and Estimate Reference Information (100-4A) located on the Quantities sheets of the plan, as well as all other item specific Tabulations. Typical drawings detailing construction of the devices to be used on this project can be found on the B sheets of the plans or are referenced in the Standard Road Plans Tabulation.

c. Storm Water Management
1) Measures shall be installed during the construction process to control pollutants in storm water discharges that will occur after construction operations have been completed. This may include velocity dissipation devices at discharge locations and along length of outfall channel as necessary to provide a non-erosion velocity flow from structure to water course. If included with this project, these items are located in the Estimated Project Quantities (100-0A, 100-1A, or 100-1C) and Estimate Reference Information (100-4A) located on the Quantities sheets of the plan, as well as all other item specific Tabulations. Typical drawings detailing construction of the practices to be used on this project are referenced in the Standard Road Plans Tabulation. The installation of these devices may be subject to Section 404 of the Clean Water Act.

2. OTHER CONTROLS
a. Contractor disposal of unused construction materials and construction material wastes shall comply with applicable state and local waste disposal, sanitary sewer, or septic system regulations. In the event of a conflict with other governmental laws, rules and regulations, the more restrictive laws, rules or regulations shall apply.
1) Vehicle Entrances and Exits - Construct and maintain entrances and exits to prevent tracking of sediments onto roadways.
2) Material Delivery, Storage and Use - Implement practices to prevent discharge of construction materials during delivery, storage, and use.
3) Stockpile Management - Install controls to reduce or eliminate pollution of storm water from stockpiles of soil and paving.
4) Waste Disposal - Do not discharge any materials, including building materials, into waters of the state, except as authorized by a Section 404 permit.
5) Spill Prevention and Control - Implement procedures to contain and clean-up spills and prevent material discharges to the storm drain system and waters of the state.
6) Concrete Residuals and Washout Wastes - Designate temporary concrete washout facilities for rinsing out concrete trucks. Provide directions to truck drivers where designated washout facilities are located. Designated washout areas should be located at least 50 feet away from storm drains, streams or other water bodies. Care should be taken to ensure these facilities do not overflow during storm events.
7) Concrete Grooving/Grinding Slurry – Do not discharge slurry to a waterbody or storm drain. Slurry may be applied on foreslopes or removed from the project.
8) Vehicle and Equipment Storage and and Maintenance Areas - Perform on site fueling and maintenance in accordance with all environment laws such as proper storage of onside fuels and proper disposal of used engine oil or other fluids on site. Employ washing practices that prevent contamination of surface and ground water from wash water.
9) Litter Management - Ensure employees properly dispose of litter.
10) Dewatering – Properly treat water to remove suspended sediment before it re-enters a waterbody or discharges off-site. Measures are also to be taken to prevent scour erosion at dewatering discharge point.

3. APPROVED STATE OR LOCAL PLANS
During the course of this construction, it is possible that situations will arise where unknown materials will be encountered. When such situations are encountered, they will be handled according to all federal, state, and local regulations in effect at the time.

IV. MAINTENANCE PROCEDURES

The contractor is required to maintain all temporary erosion and sediment control measures in proper working order, including cleaning, repairing, or replacing them throughout the contract period. This shall begin when the features have lost 50% of their capacity.

V. INSPECTION REQUIREMENTS

A. Inspections shall be made jointly by the contractor and the contracting authority at least once every seven calendar days. Storm water monitoring inspections will include:
1. Date of the inspection.
2. Summary of the scope of the inspection.
3. Name and qualifications of the personnel making the inspection.
5. Review erosion and sediment control measures within disturbed areas for the effectiveness in preventing impacts to receiving waters.
6. Major observations related to the implementation of the PPP.
7. Identify corrective actions required to maintain or modify erosion and sediment control measures.

B. Include storm water monitoring inspection reports in the Amended PPP. Incorporate any additional erosion and sediment control measures determined as a result of the inspection. Immediately begin corrective actions on all deficiencies found within 3 calendar days of the inspection.

VI. NON-STORM WATER DISCHARGES

This includes subsurface drains (i.e. longitudinal and standard subdrains) and slope drains. The velocity of the discharge from these features may be controlled by the use of patio blocks, Class A stone, erosion stone or other appropriate materials. This also includes uncontaminated groundwater from dewatering operations, which will be controlled as discussed in Section III of the PPP.

VII. POTENTIAL SOURCES OF OFF RIGHT-OF-WAY (ROW) POLLUTION

Silts, sediment, and other forms of pollution may be transported onto highway right-of-way (ROW) as a result of a storm event. Potential sources of pollution located outside highway ROW are beyond the control of this PPP. Pollution within highway ROW will be conveyed and controlled per this PPP.

VIII. DEFINITIONS

A. Base PPP - Initial Pollution Prevention Plan.
B. Amended PPP - May include Plan Revisions or Contract Modifications for new items, storm water monitoring inspection reports, and fieldbook entries made by the inspector.

C. IDR - Inspector's Daily Report – this contains the inspector's daily diary and bid item postings.
D. Controls - Methods, practices, or measures to minimize or prevent erosion, control sedimentation, control storm water, or minimize contaminants from other types of waste or materials. Also called Best Management Practices (BMPs).
E. Signature Authority - Representative from Designer, Contractor/Subcontractor, or RCE/Inspector authorized to sign various storm water documents.

CERTIFICATION STATEMENT

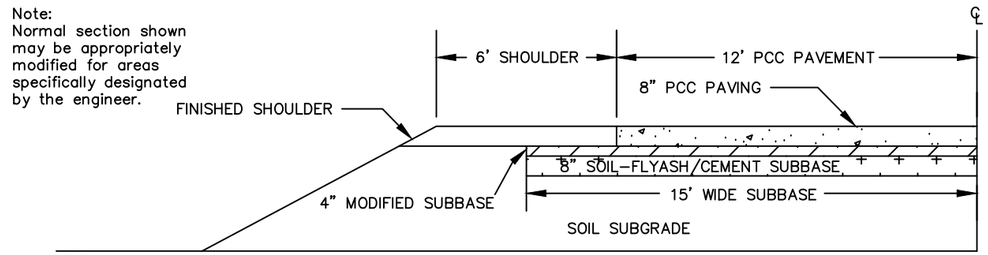
I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Signature
Printed or Typed Name

MODIFIED AND SOIL–FLYASH/CEMENT SUBBASE DETAILS

PA–01
11–9–16

Note:
Normal section shown may be appropriately modified for areas specifically designated by the engineer.



NOTES:

1. EXISTING PAVEMENT MUST BE REMOVED TO EXPOSE SUBGRADE FOR TREATMENT.
2. MATERIAL FROM CRUSHING OF PAVEMENT SHALL BE USED TO CONSTRUCT MODIFIED SUBBASE.
3. ARTICLE 2109.03 SHALL APPLY.
4. GRADATION OF CRUSHED PCC SHALL CONFORM TO GRADATION #14 OF THE I.D.O.T. GRADATION TABLES, EXCEPT ALL MATERIAL PASSING THE #200 SIEVE SHALL BE INCORPORATED.
5. SOIL–FLYASH SUBBASE SHALL BE 8" DEEP, FIGURED AT A RATE OF 726 TONS OF FLYASH PER MILE.
6. IF NECESSARY, SOME AREAS MAY REQUIRE 12" TREATMENT OF SOIL FLYASH SUBBASE. THESE AREAS SHALL BE DETERMINED BY THE ENGINEER AND SHALL HAVE AN APPLICATION RATE OF 1,089 TONS PER MILE. QUANTITY FOR PAY SHALL BE 150% OF MEASURED SY.
7. SOIL–CEMENT SUBBASE SHALL BE 8" DEEP, FIGURED AT A RATE OF 264 TONS OF CEMENT PER MILE.
8. IF NECESSARY, SOME AREAS MAY REQUIRE 12" TREATMENT OF SOIL CEMENT SUBBASE. THESE AREAS SHALL BE DETERMINED BY THE ENGINEER AND SHALL HAVE AN APPLICATION RATE OF 396 TONS PER MILE. QUANTITY FOR PAY SHALL BE 150% OF MEASURED SY.

SOIL–FLYASH/CEMENT SUBBASE

1. Description. Soil–flyash/cement subbase shall consist of soil from the subgrade combined with flyash/cement and water to develop a sufficient subgrade section. These materials shall be mixed, shaped, and compacted in accordance with the plans and these specifications.

2. Materials.
   A1. Flyash. Flyash shall be self–cementing Class C meeting the chemical requirements of ASTM C–618. The source of the ash shall be identified and approved in advance of stabilization operations. Stored flyash shall be in a weather tight facility to protect it from dampness. Temporary storage (less than 12 hours) of flyash in open pits will be allowed,providing wetting is not allowed. Flyash that becomes partially set or contains hard lumps shall be discarded.
   Ames power plant does not meet the above requirements due to the addition of RDF in the fuel stream . Ames will be considered as a source, provided the contractor supplies certified testing that verifies it meets all of the other class C, ASTM C–618 requirements.

   A2. Cement. Cement shall meet the requirements of ASTM C 150. Use Portland Cement manufactured, inspected, tested and accepted according to Materials I.M. 401. Stored Cement shall be in a weather tight facility to protect from dampness. Cement will be tested for lumps before being used. Cement containing hard lumps shall be discarded.

   B. Mixing water. Water shall meet the requirements of Section 4102. Potable water from a municipal supply shall be accepted without testing.

3. Equipment.
   A. General. Machinery, tools and equipment shall be on the project and approved by the Engineer prior to the beginning of operations. Pulverization of the existing subgrade and blending of the flyash/cement modified subgrade mixture shall be accomplished with CAT RM–500 Pulvamixer or suitable equivalent. Initial compaction shall be achieved using CAT CS–563 vibrating padfoot compactor or suitable equivalent. Final compaction shall be achieved using a pneumatic rubber–tired roller or a smooth steel drum roller.

   B. Trucking. Each truck that provides flyash/cement to the work site shall have the weight of flyash/cement certified on public scales, or the contractor shall place a set of platform or hopper scales at a location approved by the engineer.

4. Placement.
   A. General. The purpose of this specification is to provide a completed section of flyash modified subgrade material which contains uniform moisture content, no loose or segregated areas, has a uniform density, and is well bound for its full depth. It shall be the responsibility of the Contractor to regulate the sequence of work, to use the proper amounts of flyash, to achieve final compaction within the specified time, to maintain the work, and to rework the lifts as necessary to meet the above requirements.

MODIFIED AND SOIL–FLYASH/CEMENT SUBBASE DETAILS

PA–01
11–9–16

B. Weather. Soil and air temperature shall be at or above 40 degrees F for least 24 hours prior to placement of flyash/cement. Flyash/cement spreading, mixing, and compaction of the mixture shall not proceed during periods of rain or snow or when rain or snow are possible before a stabilized section can be completed.

C. Preparation of Subgrade. Before the flyash/cement is placed, the area shall be cut and shaped in conformance with the lines and grades shown on the plans. The subgrade shall be firm and able to support the construction traffic associated with hauling, placing, and blending the flyash/cement. Soft subgrade areas shall be corrected and made stable by over excavation and compacting until the area is of uniform stability.

D. Moisture Control. Moisture control shall be achieved through the use of a pulvamixer equipped with a spray bar located inside the mixing drum. The spray bar shall be capable of applying quantity of water in a single pass to achieve the required moisture content for the flyash–modified subgrade mixture, and shall be capable of being regulated as necessary to maintain moisture contents.

E. Application of Flyash/cement. Flyash/cement shall be hauled in such a manner as to reduce the loss of material during transportation. Flyash/cement shall not be applied using the slurry method. After flyash/cement has been applied to the site, it shall be spread to the required depth to minimize scattering by wind. Flyash/cement shall not be placed when wind conditions are such that blowing flyash/cement becomes objectionable or reduces the amount incorporated into the mixture. Flyash/cement that has become unacceptable because of excessive wetting can still be incorporated, but the section must be retreated, at the Contractor's sole expense, with the appropriate amount of flyash/cement.

F. Mixing. The subgrade soil and flyash/cement shall be thoroughly mixed and continue to be mixed until a homogeneous soil/flyash/cement mixture, free of clods or lumps is obtained. The following size shall be achieved before compaction begins:

Sieve Size (in)	Percent passing
1.5	90
0.75	≥50

G. Compaction. Compaction of the flyash/cement modified subgrade mixture shall begin immediately after final mixing is completed and shall be completed within 1 hour of the beginning of initial mixing. Initial compaction shall be with a vibrating padfoot compactor. Following initial compaction, the materials shall be shaped to final grade by blading. Final compaction shall be achieved using a steel smooth drum roller or pneumatic rubber tired roller to seal the surface and reduce the loss of moisture. Non–uniform sections shall be corrected immediately by scarifying, adding or removing materials as required, then remixing and recompacting. The full depth of compacted stabilized subgrade shall remain firm and stable under further construction traffic. If the material loses the required stability, density, or finish for any reason before the Engineer accepts the work, it shall be reprocessed, recompacted, and refinished at the sole expense of the Contractor. Placement of fill over a stabilized section shall not begin for a period of at least 24 hours. Any unstable areas resulting from the placement of succeeding layers of fill shall be removed and restabilized with flyash/cement.

H. Finishing and curing. Once the last lift is completed, it must be brought to the required lines and grades. After the flyash/cement modified subgrade section has been finished, the surface shall be protected against rapid drying (for a minimum of 7 days) by one of the following methods:

1. Maintain in a thorough and continuously moist condition by sprinkling with water.
2. Apply a 2 inch layer of crushed concrete on the completed course and maintain in a moist condition.
3. Paving can begin after 72 hours provided the subgrade can carry paving traffic.

I. The finished product needs to be evenly mixed, without skips, across the entire 30' width. Contractor shall maintain a minimum of 2' overlap of passes with mixing equipment and ensure that the edges of any pass is more than 2' from centerline or edge of pavement. This is best done by doing it all at one time. If the contractor chooses to place one lane at a time the following conditions need to be met at no additional cost:

Where the finish grade changes from original grade 6" or less the flyash/cement placement and mixing will overlap the CL 2' and the tons per mile will be 774.4
Where the finish grade changes from original grade 6" to 1' 6" the flyash/cement placement and mixing will overlap the CL 3' and the tons per mile will be 798.6
Where the finish grade changes from original grade 1' 6" to 3' the flyash/cement placement and mixing will overlap the CL 4' and the tons per mile will be 822.8

5. Method of Measurement. Soil flyash/cement subbase material furnished and placed in accepted portions of work will be measured in square yards for the specified design thickness. The design thickness of the placed material will be verified by spot checks of the grade. The measured area will be based on plan dimensions for the finished surface.

6. Basis of Payment. The Contractor will be paid the contract unit price per square yard for each design thickness of soil–flyash/cement subbase as measured above. This payment shall be full compensation for furnishing all materials, water, preparation of subgrade, and doing all work necessary to complete the subbase in compliance with the contract documents.

B14 ALIGNMENT COORDINATES (feet)

	P.I. STA.	N	E	REMARKS	DISTANCE	BEARING
1	0+00	9615677.3930	11662693.0116	S1/4 COR 5-97-32		
2	26+44.91	9615691.5473	11662698.7808	SW COR 4-97-32	2624.18	N89° 41' 33.57"E
3	52+85.57	9615675.2427	11665339.3875	S1/4 COR 5-97-32	2646.33	S89° 38' 46.43"E
4	79+41.15	9615657.3171	11667994.9061	SW COR 3-97-32	2634.51	S89° 36' 40.23"E
5	105+68.08	9615690.9001	11670621.6237	S1/4 COR 2-97-32	2632.98	N89° 16' 03.02"E
6	131+94.36	9615725.5432	11673247.6773	SW COR 2-97-32	2640.98	N89° 14' 38.43"E
					2642.86	N89° 19' 04.16"E

CURVE DATA

T	L	R	DELTA	
2.885'	5.769'	500.00'	0.6611	1
0.153'	0.306'	500.00'	0.0351	2
4.893'	9.785'	500.00'	1.1213	3
0.103	0.205'	500.00'	0.0235	4
0.322'	0.644'	500.00'	0.0738	5

N52 ALIGNMENT COORDINATES (feet)

	P.I. STA.	N	E	REMARKS	DISTANCE	BEARING
1	0+00	9615657.2546	11667990.0137	SW COR 3-97-32		
2	26+44.91	961729.8710	11667959.7134	N1/4 COR 3-97-32	2672.149	N0° 38' 58.36"W
3	52+85.57	9620766.1607	11667928.9754	SW COR 34-98-32	2435.034	N0° 43' 22.07"W
					2637.499	N0° 53' 20.19"W

CURVE DATA

T	L	R	DELTA	
0.320'	0.0639'	500.00'	0.0733	1
0.725'	1.450'	500.00'	0.1661	2

SILT FENCE AND DITCH CHECKS

MAINLINE STA TO STA	LENGTH	SIDE	DITCH CHECK	SILT FENCE	DIVISION	NOTES
51+42	20'	R		X		AROUND INTAKE
84+43	20'	R		X		AROUND INTAKE
84+49	20'	L		X		AROUND INTAKE
97+51	20'	L		X		AROUND INTAKE
97+57	20'	R		X		AROUND INTAKE
97+50	20'	L		X		AROUND CULVERT
97+50	20'	R		X		AROUND CULVERT
TOTAL	140					

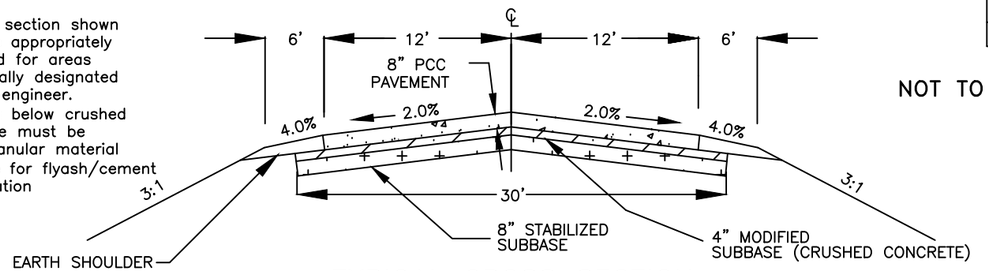
PAVEMENT REMOVAL

ROAD	STA	STA	THICK(IN.)	LENGTH(FT)	WIDTH(FT)	SY	MILES	NOTE
MAINLINE(B14)	27+13	132+37	6"	10,524	20	23,386.67	1.992	
MAINLINE(N52)	0+10	51+11	6"	5,101	20	11,335.56	0.966	
West Radius						144.00		
East Radius						153.00		
				TOTAL		35,019.23	2.958	

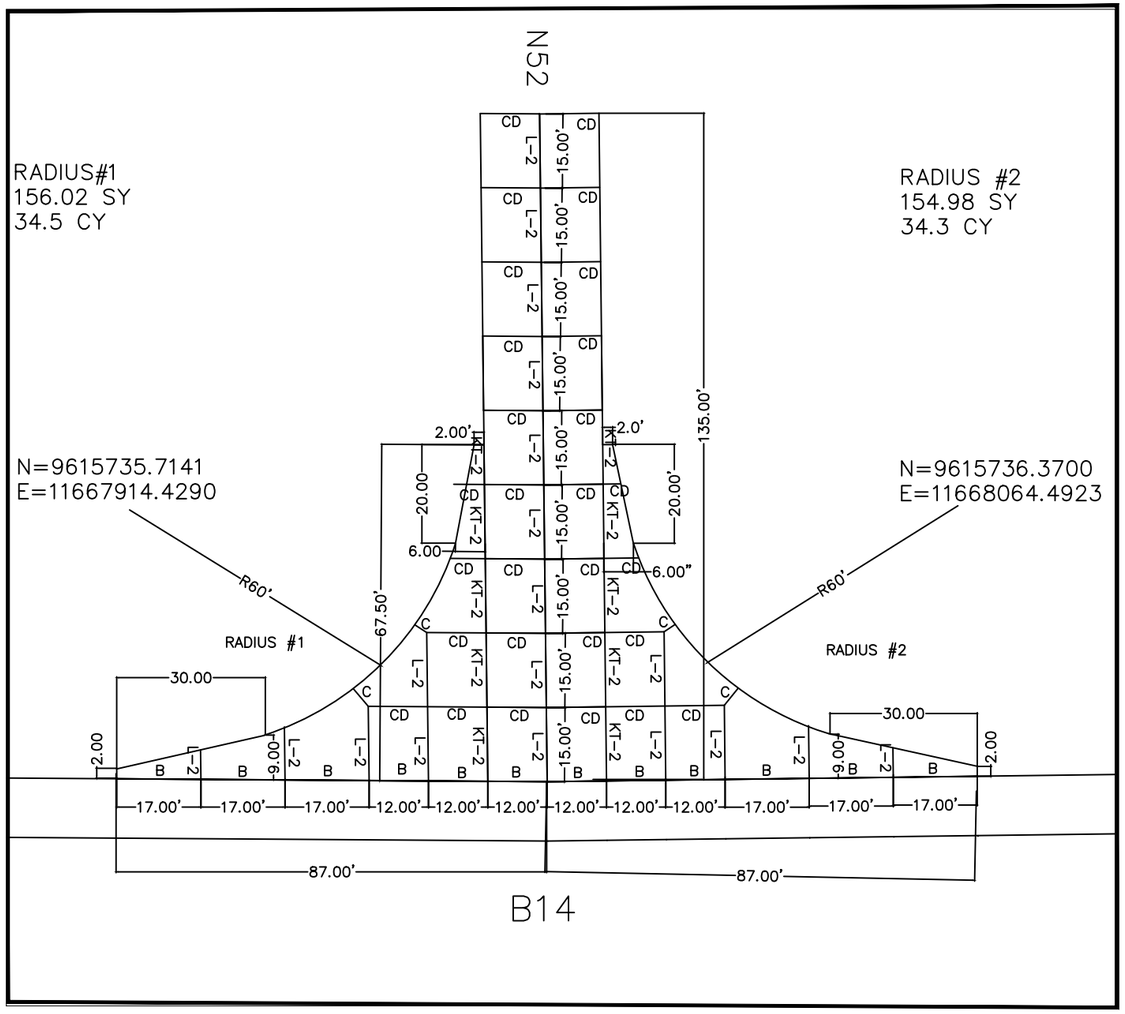
Note:
Normal section shown may be appropriately modified for areas specifically designated by the engineer.
8" Area below crushed concrete must be non-granular material suitable for flyash/cement stabilization

2101
SIM.

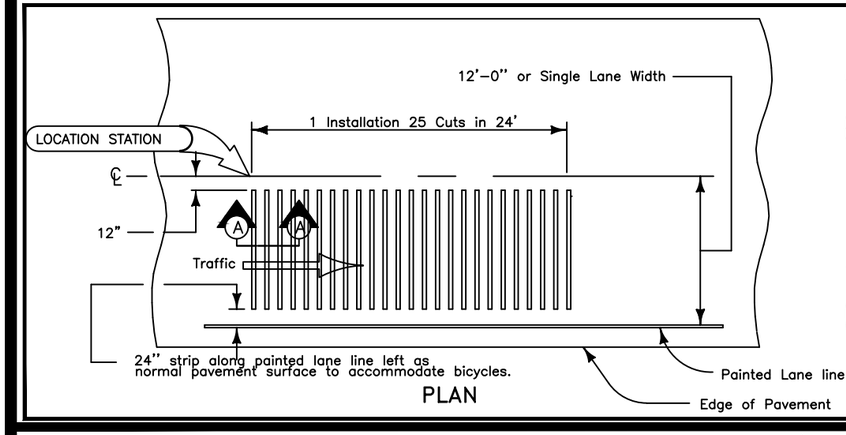
NOT TO SCALE



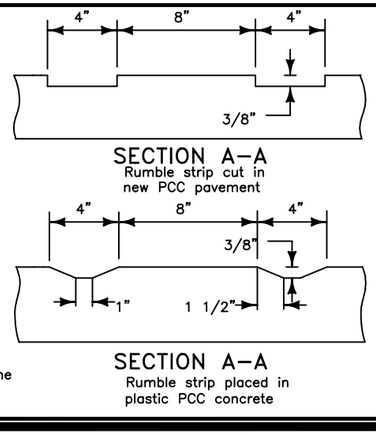
TYPICAL CROSS SECTION
B14 STA. 27+13 TO 132+36
N52 STA. 0+10 TO 51+11



B14



PLAN



SECTION A–A
Rumble strip cut in new PCC pavement

SECTION A–A
Rumble strip placed in plastic PCC concrete

Notes:
Construction of rumble strip panels will be required on this project at locations designated on the plans.

Construction of rumble strip panels will be required before opening to traffic.

The rumble strip panels shall be constructed as shown by sawing or forming strips of the dimensions indicated.

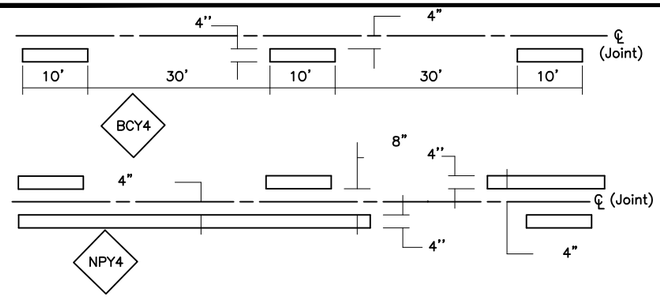
For each "Rumble Strip Panel" the contractor will be paid the contract unit price. This will be considered full compensation for construction of the panel as detailed hereon.

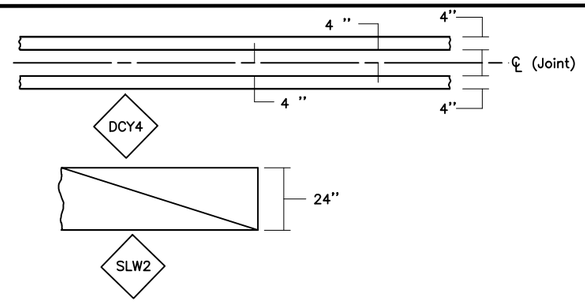
LOCATION: N52: STA. 5+79 TO STA 6+04 (L)
STA. 9+04 TO STA 9+29 (L)

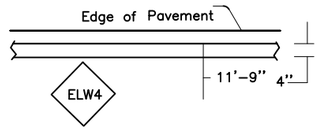
RUMBLE STRIP PANEL
IN NEW PAVEMENT

The centerline pavement marking shall always be placed on one side of the roadway except where a "No Passing Zone" line is used, at which point it is placed on the opposite side of the roadway. The centerline shall be placed on the same side of the roadway as to match existing markings near the project.

On all new or reconstructed pavements, the location of "NO PASSING" zone lines shall be located in the field. The locations of the proposed "NO PASSING" lines shown on the pavement marking tabulation is for estimating quantities only.







108-22
10/21/25

PAVEMENT MARKING LINE TYPES

See PM-110

*BCY4 - Place on the same side of the roadway to match existing markings near the project.
**NPY4 - For estimating purposes only. No Passing Zone Lines will be located in the field.
***MNY4 - Factor of 1.00 as value includes number of 6-inch passes to cover median nose area.

BCY4: Broken Centerline (Yellow) @ 0.17
DCY4: Double Centerline (Yellow) @ 1.34
NPY4: No Passing Zone Line (Yellow) @ 0.84
ELW4: Edge Line Right (White) @ 1.00
ELY4: Edge Line Left (Yellow) @ 1.00
SLW2: STOP LINE (WHITE) @ 4.00
BLW4: Broken Lane Line (White) @ 0.17

Location								Length by Line Type (Unfactored)						Remarks
Road ID	Station to Station		Dir. of Travel	Marking Type	Side			BCY4*	DCY4	NPY4**	BLW4	ELW4	ELY4	
					L	C	R	STA	STA	STA	STA	STA	STA	
B14	27+13	132+37			X							105.24		
B14	27+13	132+37					X					105.24		
B14	27+13	132+37				X		105.24						
N52	0+10	51+11					X					51.00		
N52	0+10	51+11			X							51.00		
N52	0+10	51+11				X		51.00						
				LENGTH SUBTOTALS				156.24				312.48		
				QUANTITY FACTORS				0.17				1.00		
					TOTALS			26.56				312.48		378.04 TOTAL STATIONS

TRAFFIC CONTROL PLAN

108–23
04–04–89

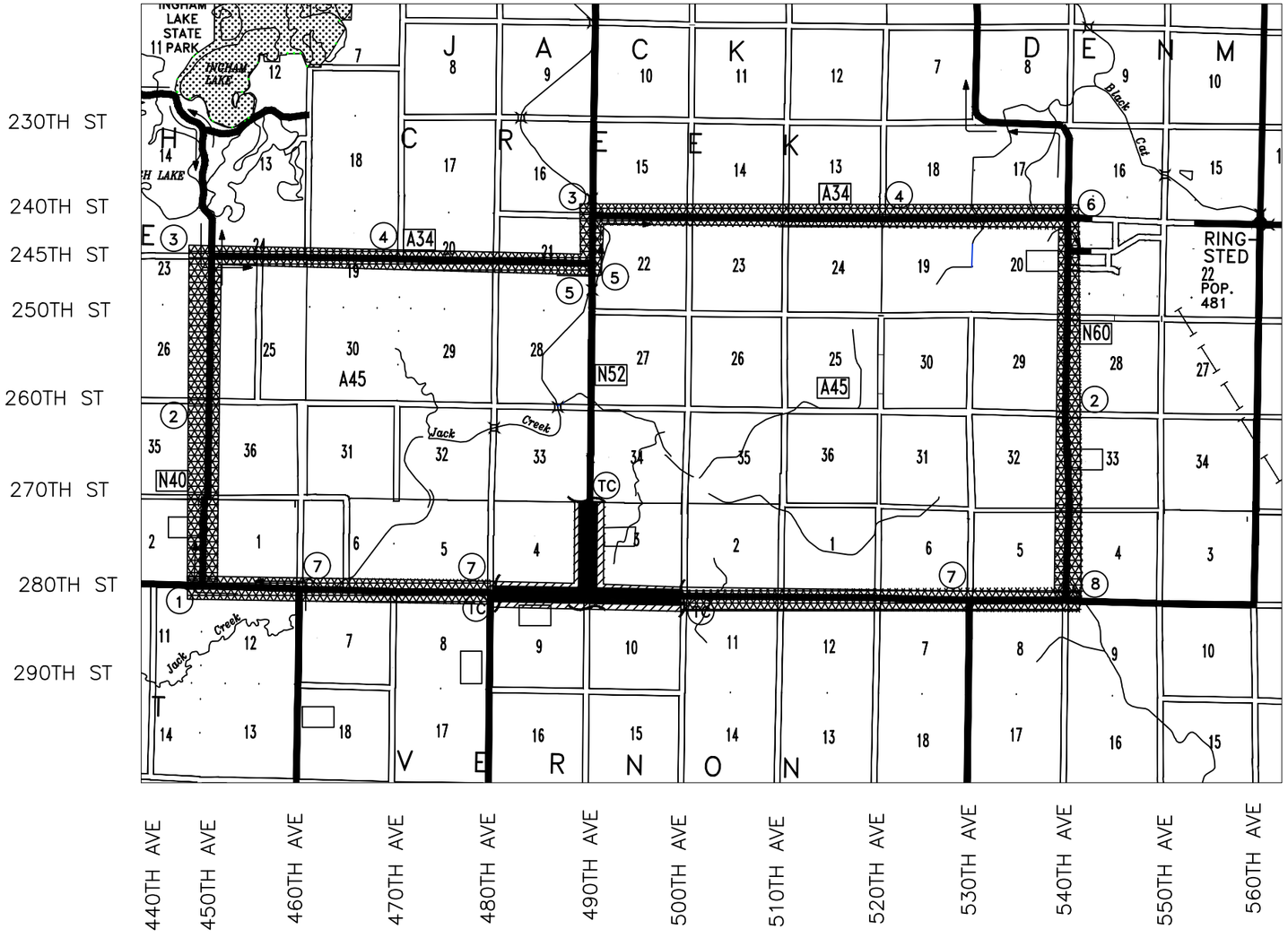
1. This road will be closed to through traffic during construction. Local traffic to adjacent properties will be maintained as provided for in Article 1107.08 of the current Standard Specifications. Traffic control devices, procedures, layouts, signing and pavement markings installed within the limits of this project shall conform to the "Manual on Uniform Traffic Control Devices for Streets and Highways" as adopted by the Department per 761 of the Iowa Administrative Code (IAC) chapter 130.

TABULATION OF SAFETY CLOSURES

108–13A
10–28–97

Refer to Section 2518 of the Standard Specifications

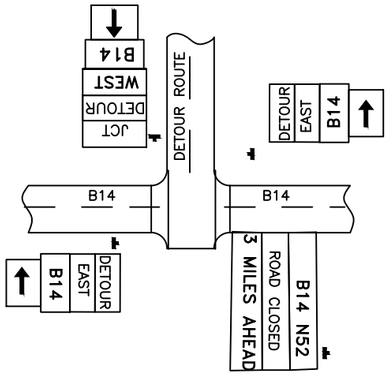
STATION	CLOSURE TYPE		REMARKS
	ROAD QT.	HAZARD QT.	
STA. 27+13(B14)	1		BOP B14 280TH ST
STA. 132+36(B14)	1		EOP B14 280TH ST
STA. 79+35(N52)	1		490TH AVE INTERSECTION
STA. 51+11(N52)	1		EOP N52 490TH AVE
TOTAL	4		



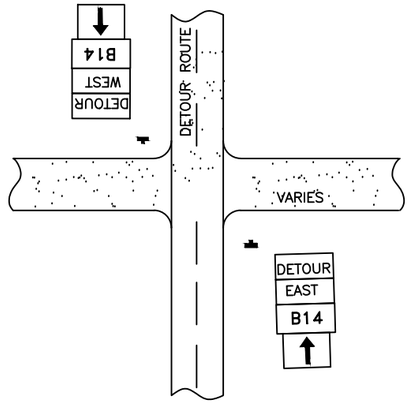
NOT TO SCALE

LEGEND

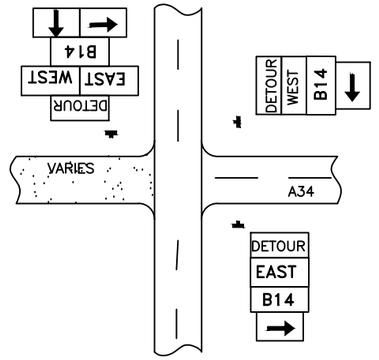
- TYPE 3 BARRICADE PER TC–252
- DETOUR ROUTE
- WORK AREA
- TRAFFIC SIGN
- ROAD CLOSURE
- (TC) TC–252 SITUATION 6 BY CONTRACTOR



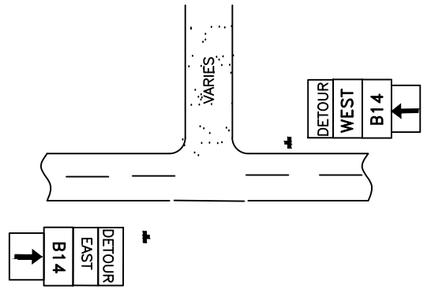
SITUATION #1



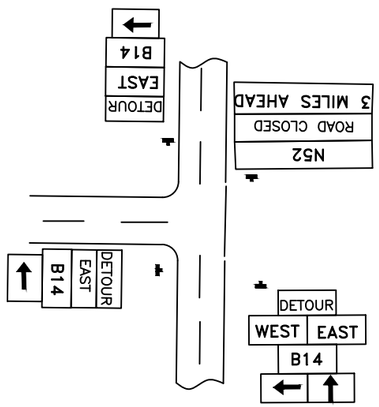
SITUATION #2



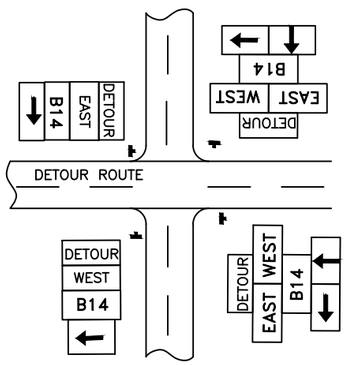
SITUATION #3



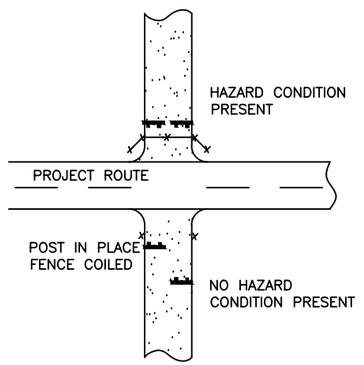
SITUATION #4



SITUATION #5



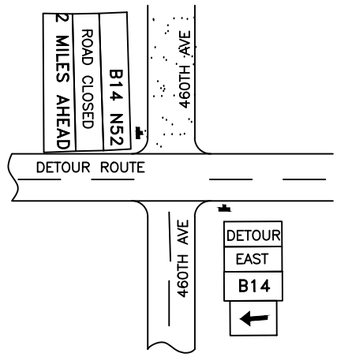
SITUATION #6



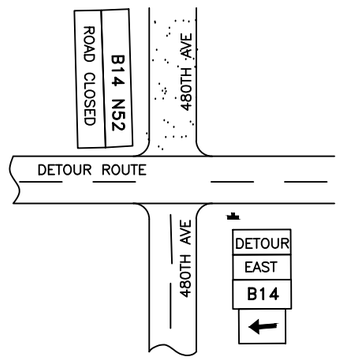
TYPICAL (TC) PLACEMENT

SIGN	MUTCD	DIM.	COLORS
DETOUR	M4-8	24"X12"	ORANGE W/BLACK LETTER
JCT	M2-1	21"X15"	WHITE W/BLACK LETTER
EAST	M3-2	24"X12"	WHITE W/BLACK LETTER
WEST	M3-4	24"X12"	WHITE W/BLACK LETTER
→	M1-6A	21"X15"	BLUE W/YELLOW LETTER

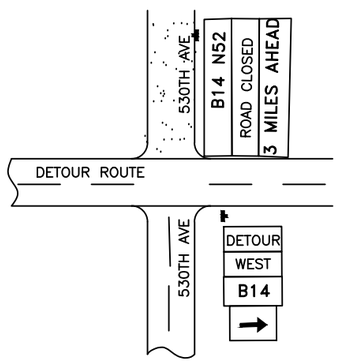
NOTE: THE B14 / N52 SIGN SHALL BE PALO ALTO B14 COUNTY DESIGN, M1-6, PALO ALTO N52 COUNTY 24"X24", BLUE WITH YELLOW LETTERS



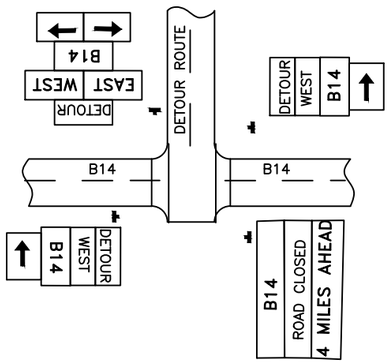
SITUATION #7



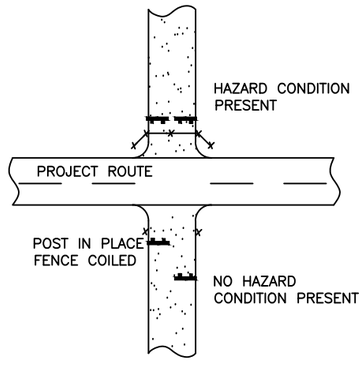
SITUATION #7



SITUATION #7



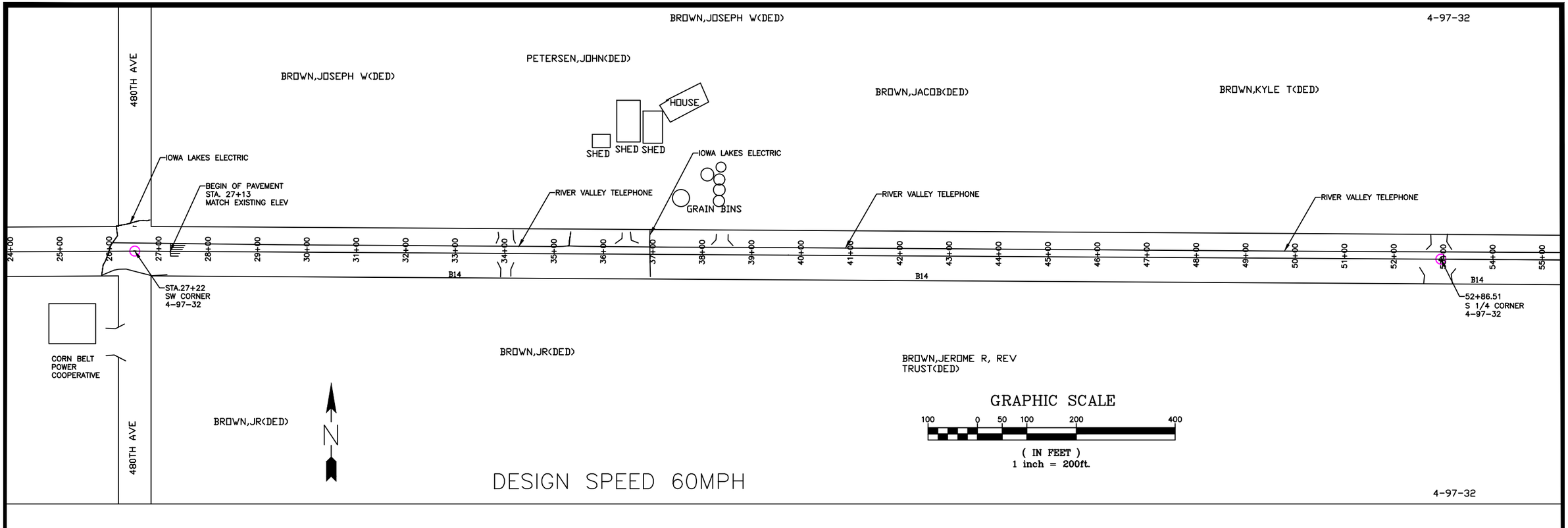
SITUATION #8

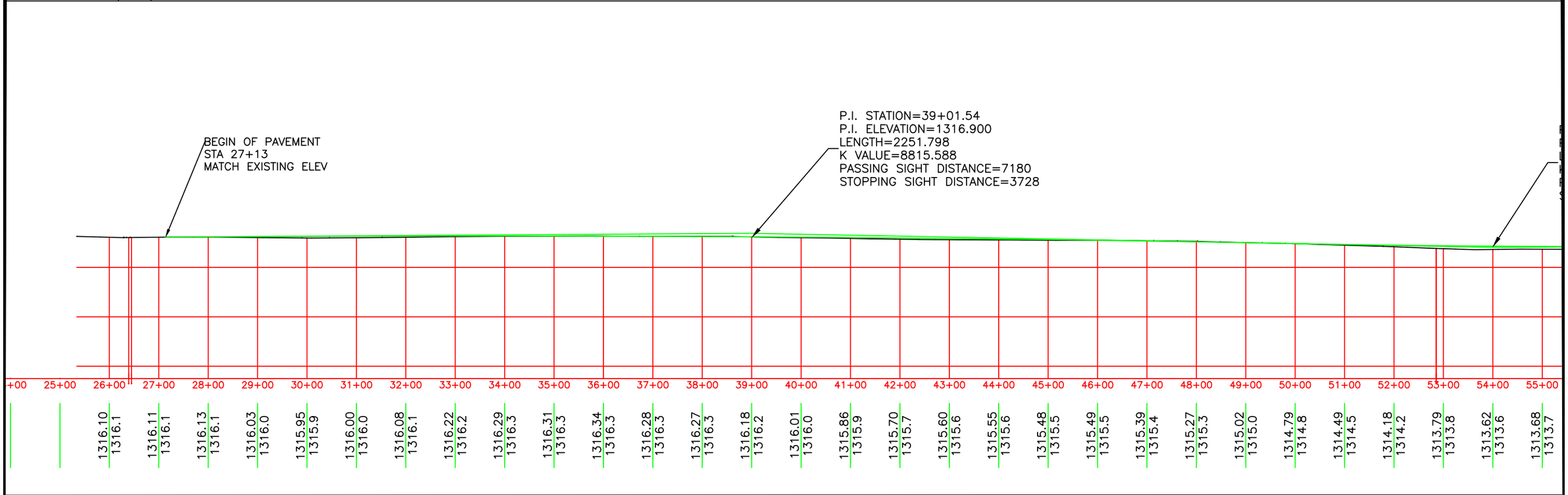


TYPICAL (TC) PLACEMENT

SIGN	MUTCD	DIM.	COLORS
DETOUR	M4-8	24"X12"	ORANGE W/BLACK LETTER
JCT	M2-1	21"X15"	WHITE W/BLACK LETTER
EAST	M3-2	24"X12"	WHITE W/BLACK LETTER
WEST	M3-4	24"X12"	WHITE W/BLACK LETTER
→	M1-6A	21"X15"	BLUE W/YELLOW LETTER

NOTE: THE B14 / N52 SIGN SHALL BE PALO ALTO B14 COUNTY DESIGN, M1-6, PALO ALTO N52 COUNTY 24"X24", BLUE WITH YELLOW LETTERS


BROWN,JOSEPH W(DED)
4-97-32
PETERSEN,JOHN(DED)
BROWN,JOSEPH W(DED)
BROWN,JACOB(DED)
BROWN,KYLE T(DED)
480TH AVE
HOUSE
SHED
SHED
SHED
IOWA LAKES ELECTRIC
IOWA LAKES ELECTRIC
BEGIN OF PAVEMENT
STA. 27+13
MATCH EXISTING ELEV
RIVER VALLEY TELEPHONE
RIVER VALLEY TELEPHONE
RIVER VALLEY TELEPHONE
GRAIN BINS
24+00
25+00
26+00
27+00
28+00
29+00
30+00
31+00
32+00
33+00
34+00
35+00
36+00
37+00
38+00
39+00
40+00
41+00
42+00
43+00
44+00
45+00
46+00
47+00
48+00
49+00
50+00
51+00
52+00
53+00
54+00
55+00
B14
B14
B14
STA.27+22
SW CORNER
4-97-32
52+86.51
S 1/4 CORNER
4-97-32
CORN BELT
POWER
COOPERATIVE
BROWN,JR(DED)
BROWN,JR(DED)
BROWN,JEROME R, REV
TRUST(DED)
480TH AVE
N
GRAPHIC SCALE
100 0 50 100 200 400
(IN FEET)
1 inch = 200ft.
DESIGN SPEED 60MPH
4-97-32


BEGIN OF PAVEMENT
STA 27+13
MATCH EXISTING ELEV
P.I. STATION=39+01.54
P.I. ELEVATION=1316.900
LENGTH=2251.798
K VALUE=8815.588
PASSING SIGHT DISTANCE=7180
STOPPING SIGHT DISTANCE=3728
+00 25+00 26+00 27+00 28+00 29+00 30+00 31+00 32+00 33+00 34+00 35+00 36+00 37+00 38+00 39+00 40+00 41+00 42+00 43+00 44+00 45+00 46+00 47+00 48+00 49+00 50+00 51+00 52+00 53+00 54+00 55+00
1316.10 1316.1
1316.11 1316.1
1316.13 1316.1
1316.03 1316.0
1315.95 1315.9
1316.00 1316.0
1316.08 1316.1
1316.22 1316.2
1316.29 1316.3
1316.31 1316.3
1316.34 1316.3
1316.28 1316.3
1316.27 1316.3
1316.18 1316.2
1316.01 1316.0
1315.86 1315.9
1315.70 1315.7
1315.60 1315.6
1315.55 1315.6
1315.48 1315.5
1315.49 1315.5
1315.39 1315.4
1315.27 1315.3
1315.02 1315.0
1314.79 1314.8
1314.49 1314.5
1314.18 1314.2
1313.79 1313.8
1313.62 1313.6
1313.68 1313.7

4-97-32

ELSENBAST HOLDING,LLC(DED)

D)

RIVER VALLEY TELEPHONE

RIVER VALLEY TELEPHONE

RIVER VALLEY TELEPHONE

RIVER VALLEY TELEPHONE

N52

5+00
4+00
3+00
2+00
1+00
0+00

BEGIN OF PAVEMENT
STA. 0+10
MATCH EXISTING ELEV

RIVER VALLE

51+00 52+00 53+00 54+00 55+00 56+00 57+00 58+00 59+00 60+00 61+00 62+00 63+00 64+00 65+00 66+00 67+00 68+00 69+00 70+00 71+00 72+00 73+00 74+00 75+00 76+00 77+00 78+00 79+00 80+00 81+00

B14

B14

B14

52+86.51
S 1/4 CORNER
4-97-32

STA. 79+35.20
SW CORNER
3-97-32

IOWA LAKES ELECTRIC

490TH AVE

TWAIT,GERALD D,RE TRUST
(DED)

SHED
HOUSE
SHED
SHED
SHED
SHED
SHED
BINS
BINS

N

TWAIT,GERALD D,RE TRUST
(DED)

GRAPHIC SCALE

100 0 50 100 200 400

(IN FEET)
1 inch = 200ft.

4-97-32

DESIGN SPEED 60MPH

P.I. STATION=54+00.98
P.I. ELEVATION=1314.051
LENGTH=798.325
K VALUE=3229.823
PASSING SIGHT DISTANCE=???
STOPPING SIGHT DISTANCE=???

P.I. STATION=62+02.34
P.I. ELEVATION=1314.509
LENGTH=751.458
K VALUE=1208.103
PASSING SIGHT DISTANCE=2862
STOPPING SIGHT DISTANCE=1444

P.I. STATION=71+74.14
P.I. ELEVATION=1309.019
LENGTH=868.760
K VALUE=1310.984
PASSING SIGHT DISTANCE=???
STOPPING SIGHT DISTANCE=???

51+00 52+00 53+00 54+00 55+00 56+00 57+00 58+00 59+00 60+00 61+00 62+00 63+00 64+00 65+00 66+00 67+00 68+00 69+00 70+00 71+00 72+00 73+00 74+00 75+00 76+00 77+00 78+00 79+00 80+00 81+00

1314.49	1314.18	1313.79	1313.62	1313.68	1313.80	1314.03	1314.13	1314.21	1314.27	1314.18	1313.93	1313.34	1312.87	1312.39	1311.89	1311.38	1310.86	1310.34	1309.78	1309.45	1309.29	1309.17	1309.28	1309.36	1309.43	1309.63	1309.67	1309.53	1309.79	1309.45
1314.5	1314.2	1313.8	1313.6	1313.7	1313.8	1314.0	1314.1	1314.2	1314.3	1314.2	1313.9	1313.3	1312.9	1312.4	1311.9	1311.4	1310.9	1310.3	1309.8	1309.4	1309.3	1309.2	1309.3	1309.4	1309.4	1309.6	1309.7	1309.5	1309.8	1309.5

Station

3-97-32

RIVER VALLEY TELEPHONE

N52

AKRIDGE,SANDRA L,LE
AKRIDGE,
KIMBERLY&JACK,REM(DED)

RIVER VALLEY TELEPHONE

BEGIN OF PAVEMENT
STA. 0+10
MATCH EXISTING ELEV

RIVER VALLEY TELEPHONE

RIVER VALLEY TELEPHONE

B14

B14

105+67.69
S 1/4 CORNER
3-97-32

STA. 79+35.20
SW CORNER
3-97-32

IOWA LAKES ELECTRIC

ØPHEIM,DALE C & LUANN
J,TRUST(DED)

MØRLING,WILLIAM H,REV TR
AGREEMENT(DED)
MØRLING,CARØL M,REV TR
AGREEMENT
LEHMAN,PATRICIA J,TRUST(DED)
HUMPHREY,FLØRENCE M,1985
TRUST U/D/T FEBRUARY
13,1985(DED)
SIMPSØN,SHARØN M&WILLIAM
A,JT TEN (DED)

GRAPHIC SCALE

100 0 50 100 200 400

(IN FEET)
1 inch = 200ft.

3-97-32

DESIGN SPEED 60MPH

P.I. STATION=90+38.11
P.I. ELEVATION=1310.843
LENGTH=928.333
K VALUE=747.765
PASSING SIGHT DISTANCE=1710
STOPPING SIGHT DISTANCE=999

P.I. STATION=97+31.07
P.I. ELEVATION=1302.918
LENGTH=447.665
K VALUE=283.436
PASSING SIGHT DISTANCE=???
STOPPING SIGHT DISTANCE=???

78+00	79+00	80+00	81+00	82+00	83+00	84+00	85+00	86+00	87+00	88+00	89+00	90+00	91+00	92+00	93+00	94+00	95+00	96+00	97+00	98+00	99+00	100+00	101+00	102+00	103+00	104+00	105+00	106+00	107+00	108+00
1309.6	1309.7	1309.5	1309.8	1309.5	1309.7	1309.6	1309.5	1309.4	1309.4	1309.5	1309.5	1309.5	1309.4	1308.9	1308.2	1307.2	1306.1	1305.1	1304.1	1303.3	1303.0	1303.1	1303.4	1303.9	1304.2	1304.6	1305.1	1305.5	1305.9	1306.4	1306.8

3-97-32

3-97-32

DOUBLE A FRAM LL,L.P.(DED)

2-97-32

500TH AVE

RIVER VALLEY TELEPHONE

RIVER VALLEY TELEPHONE

END OF PAVEMENT
STA. 132+36
MATCH EXISTING ELEV

104+00 105+00 106+00 107+00 108+00 109+00 110+00 111+00 112+00 113+00 114+00 115+00 116+00 117+00 118+00 119+00 120+00 121+00 122+00 123+00 124+00 125+00 126+00 127+00 128+00 129+00 130+00 131+00 132+00 133+00 134+00 135+00

B14

B14

105+67.69
S 1/4 CORNER
3-97-32

EOP 132+36
SW CORNER
2-97-32

RIVER VALLEY TELEPHONE

N

GRAPHIC SCALE

100 0 50 100 200 400

(IN FEET)
1 inch = 200ft.

JACKSON ENTERPRISES
CORP(DED)

3-97-32

3-97-32

500TH AVE

2-97-32

DESIGN SPEED 60MPH

P.I. STATION=113+15.76
P.I. ELEVATION=1309.823
LENGTH=574.056
K VALUE=415.636
PASSING SIGHT DISTANCE=1407
STOPPING SIGHT DISTANCE=768

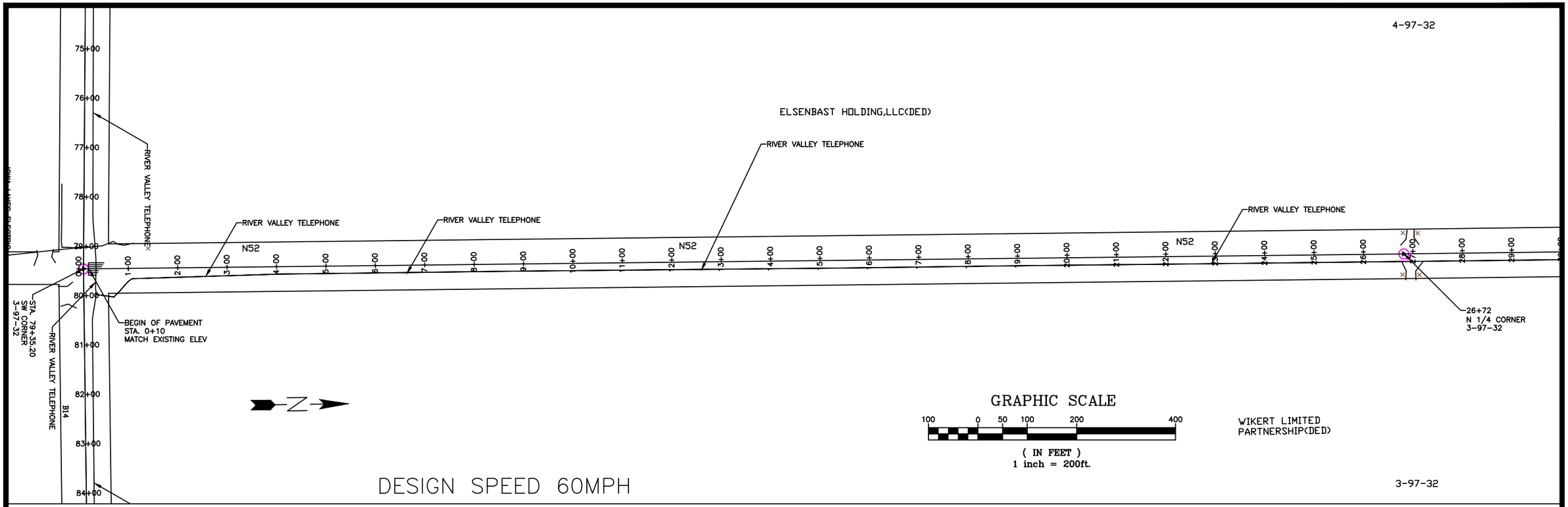
P.I. STATION=120+03.13
P.I. ELEVATION=1303.325
LENGTH=497.541
K VALUE=813.419
PASSING SIGHT DISTANCE=???
STOPPING SIGHT DISTANCE=???

END OF PAVEMENT
STA 132+36
MATCH EXISTING ELEV

04+00 105+00 106+00 107+00 108+00 109+00 110+00 111+00 112+00 113+00 114+00 115+00 116+00 117+00 118+00 119+00 120+00 121+00 122+00 123+00 124+00 125+00 126+00 127+00 128+00 129+00 130+00 131+00 132+00 133+00 134+00 135+

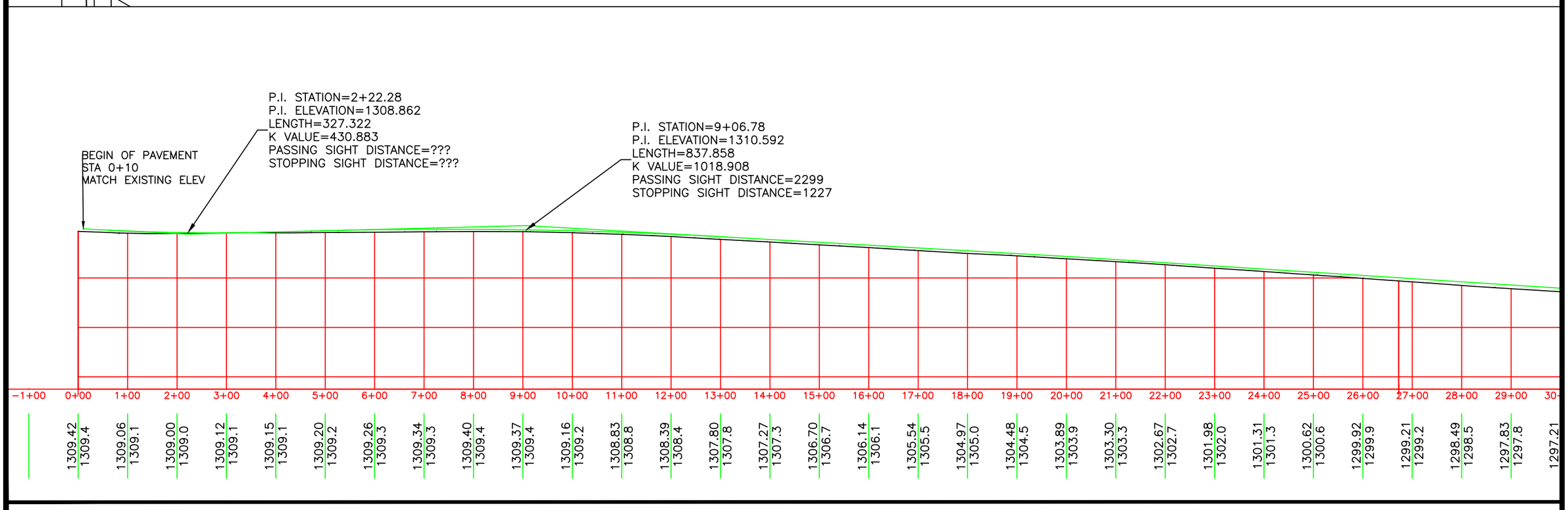
1305.07 1305.1 | 1305.51 1305.5 | 1305.93 1305.9 | 1306.37 1306.4 | 1306.77 1306.8 | 1307.18 1307.2 | 1307.59 1307.6 | 1308.03 1308.0 | 1308.39 1308.4 | 1308.44 1308.4 | 1308.18 1308.2 | 1307.59 1307.6 | 1306.63 1306.6 | 1305.59 1305.6 | 1304.61 1304.6 | 1303.87 1303.9 | 1303.27 1303.3 | 1302.82 1302.8 | 1302.50 1302.5 | 1302.17 1302.2 | 1301.87 1301.9 | 1301.56 1301.6 | 1301.31 1301.3 | 1301.04 1301.0 | 1300.67 1300.7 | 1300.26 1300.3 | 1300.00 1300.0 | 1299.74 1299.7 | 1299.37 1299.4

4-97-32



DESIGN SPEED 60MPH

3-97-32



4-97-32

ELSENBAST HOLDING,LLC(DED)

HOFFMAN,DUANE L& KIMBERLY
A,JT TEN(DED)

VER VALLEY TELEPHONE

RIVER VALLEY TELEPHONE

RIVER VALLEY TELEPHONE

END OF PAVEMENT
STA. 51+11
MATCH EXISTING ELEV

24+00 25+00 26+00 27+00 28+00 29+00 30+00 31+00 32+00 33+00 34+00 35+00 36+00 37+00 38+00 39+00 40+00 41+00 42+00 43+00 44+00 45+00 46+00 47+00 48+00 49+00 50+00 51+00 52+00 53+00 54+00 55+00

N52 N52 N52

26+72
N 1/4 CORNER
3-97-32

RIVER VALLEY TELEPHONE

STA.51+08
SW CORNER
34-98-32

SHED

HOUSE

SHED

BINS

ERT LIMITED
RTNERSHIP(DED)

WEIERSHAEUSER,RUTH
F,TRUST,TRUSTEE(DED)

GRAPHIC SCALE

100 0 50 100 200 400

(IN FEET)
1 inch = 200ft.

3-97-32

DESIGN SPEED 60MPH

P.I. STATION=42+91.53
P.I. ELEVATION=1289.632
LENGTH=476.276
K VALUE=596.482
PASSING SIGHT DISTANCE=???
STOPPING SIGHT DISTANCE=???

END OF PAVEMENT
STA 51+11
MATCH EXISTING ELEV

4+00 25+00 26+00 27+00 28+00 29+00 30+00 31+00 32+00 33+00 34+00 35+00 36+00 37+00 38+00 39+00 40+00 41+00 42+00 43+00 44+00 45+00 46+00 47+00 48+00 49+00 50+00 51+00 52+00 53+00 54+00 55+0

1301.31 1301.3 | 1300.62 1300.6 | 1299.92 1299.9 | 1299.21 1299.2 | 1298.49 1298.5 | 1297.83 1297.8 | 1297.21 1297.2 | 1296.55 1296.6 | 1295.93 1295.9 | 1295.25 1295.2 | 1294.57 1294.6 | 1293.90 1293.9 | 1293.21 1293.2 | 1292.52 1292.5 | 1291.81 1291.8 | 1291.17 1291.2 | 1290.51 1290.5 | 1289.88 1289.9 | 1289.41 1289.4 | 1289.11 1289.1 | 1289.12 1289.1 | 1289.19 1289.2 | 1289.34 1289.3 | 1289.50 1289.5 | 1289.69 1289.7 | 1289.87 1289.9 | 1290.29 1290.3 | 1290.75 1290.7

B14					
Station	Cut Volume (Cu.yd.)	Fill Volume (Cu.yd.)	Cum. Cut Vol. (Cu.yd.)	Cum. Fill Vol. (Cu.yd.)	Cum. Net Vol. (Cu.yd.)
2713	0.00	0.00	0.00	0.00	0.00
2800	52.22	36.88	52.22	36.88	15.34
2900	44.26	74.19	96.48	111.06	-14.59
3000	27.02	87.11	123.49	198.17	-74.68
3100	21.57	77.59	145.07	275.77	-130.70
3200	24.80	76.09	169.86	351.86	-182.00
3300	33.50	70.37	203.36	422.23	-218.87
3400	47.11	42.33	250.48	464.56	-214.09
3500	52.98	38.06	303.46	502.62	-199.16
3600	54.44	45.48	357.90	548.10	-190.20
3700	55.17	46.59	413.07	594.69	-181.63
3800	53.81	55.59	466.88	650.29	-183.40
3900	52.20	64.07	519.09	714.36	-195.27
4000	45.04	73.04	564.12	787.40	-223.27
4100	37.46	74.98	601.59	862.38	-260.79
4200	31.70	65.52	633.29	927.90	-294.61
4300	27.59	59.41	660.88	987.30	-326.42
4400	30.35	58.43	691.23	1045.73	-354.50
4500	35.44	62.87	726.68	1108.60	-381.92
4600	45.22	62.22	771.90	1170.82	-398.92
4700	55.78	51.61	827.68	1222.43	-394.75
4800	58.46	47.31	886.14	1269.75	-383.61
4900	55.17	51.17	941.31	1320.92	-379.61
5000	48.30	62.78	989.61	1383.69	-394.09
5100	37.78	82.85	1027.38	1466.55	-439.16

B14					
Station	Cut Volume (Cu.yd.)	Fill Volume (Cu.yd.)	Cum. Cut Vol. (Cu.yd.)	Cum. Fill Vol. (Cu.yd.)	Cum. Net Vol. (Cu.yd.)
5200	24.74	80.46	1052.12	1547.01	-494.88
5300	16.20	59.02	1068.33	1606.03	-537.70
5400	8.46	89.43	1076.79	1695.45	-618.66
5500	4.57	119.78	1081.36	1815.23	-733.87
5600	6.85	105.76	1088.22	1920.99	-832.77
5700	16.59	91.33	1104.81	2012.32	-907.51
5800	29.93	82.43	1134.73	2094.75	-960.01
5900	38.56	73.94	1173.29	2168.69	-995.40
6000	48.76	62.83	1222.05	2231.53	-1009.48
6100	57.11	54.83	1279.16	2286.36	-1007.20
6200	58.72	34.91	1337.88	2321.27	-983.38
6300	41.67	39.43	1379.55	2360.69	-981.14
6400	18.41	76.85	1397.96	2437.55	-1039.59
6500	14.02	78.52	1411.98	2516.06	-1104.09
6600	16.76	64.20	1428.73	2580.27	-1151.53
6700	17.28	78.59	1446.01	2658.86	-1212.85
6800	19.59	82.24	1465.61	2741.10	-1275.50
6900	19.46	68.30	1485.07	2809.40	-1324.33
7000	13.69	69.48	1498.75	2878.88	-1380.13
7100	10.41	77.43	1509.16	2956.30	-1447.14
7200	11.35	72.87	1520.51	3029.17	-1508.66
7300	14.69	69.74	1535.20	3098.92	-1563.72
7400	27.80	77.04	1562.99	3175.95	-1612.96
7500	43.76	76.09	1606.75	3252.05	-1645.29
7600	49.52	73.96	1656.27	3326.01	-1669.74

B14					
Station	Cut Volume (Cu.yd.)	Fill Volume (Cu.yd.)	Cum. Cut Vol. (Cu.yd.)	Cum. Fill Vol. (Cu.yd.)	Cum. Net Vol. (Cu.yd.)
7700	54.69	74.30	1710.96	3400.30	-1689.35
7800	58.17	67.39	1769.12	3467.69	-1698.57
7900	49.81	49.94	1818.94	3517.64	-1698.70
8000	50.46	26.07	1869.40	3543.71	-1674.31
8100	42.17	40.76	1911.57	3584.47	-1672.90
8200	22.85	85.87	1934.42	3670.34	-1735.92
8300	14.65	140.80	1949.07	3811.14	-1862.07
8400	5.81	246.87	1954.88	4058.01	-2103.13
8500	0.93	332.15	1955.81	4390.16	-2434.35
8600	0.00	318.81	1955.81	4708.97	-2753.16
8700	0.00	279.28	1955.81	4988.25	-3032.44
8800	1.09	237.33	1956.90	5225.58	-3268.68
8900	8.24	154.91	1965.14	5380.49	-3415.35
9000	25.69	72.57	1990.83	5453.06	-3462.24
9100	42.76	37.56	2033.59	5490.62	-3457.03
9200	44.41	39.59	2077.99	5530.21	-3452.22
9300	28.98	58.30	2106.98	5588.51	-3481.53
9400	14.87	99.91	2121.85	5688.42	-3566.57
9500	12.00	138.02	2133.85	5826.43	-3692.59
9600	9.72	182.61	2143.57	6009.05	-3865.48
9700	5.26	233.02	2148.83	6242.06	-4093.24
9800	4.81	218.20	2153.64	6460.27	-4306.63
9900	6.65	191.26	2160.29	6651.53	-4491.24
10000	7.07	160.98	2167.36	6812.51	-4645.14
10100	8.19	124.35	2175.55	6936.86	-4761.31

B14					
Station	Cut Volume (Cu.yd.)	Fill Volume (Cu.yd.)	Cum. Cut Vol. (Cu.yd.)	Cum. Fill Vol. (Cu.yd.)	Cum. Net Vol. (Cu.yd.)
10200	8.19	122.35	2183.73	7059.21	-4875.48
10300	5.46	137.74	2189.20	7196.95	-5007.75
10400	3.31	153.30	2192.51	7350.25	-5157.74
10500	3.57	154.17	2196.09	7504.42	-5308.33
10600	3.70	155.04	2199.79	7659.45	-5459.66
10700	2.81	180.78	2202.61	7840.23	-5637.63
10800	1.91	196.54	2204.51	8036.77	-5832.25
10900	1.83	172.52	2206.35	8209.29	-6002.94
11000	1.41	142.19	2207.75	8351.47	-6143.72
11100	1.59	127.54	2209.35	8479.01	-6269.66
11200	6.06	118.83	2215.40	8597.84	-6382.44
11300	13.00	99.72	2228.40	8697.56	-6469.16
11400	17.91	75.20	2246.31	8772.77	-6526.46
11500	19.80	59.11	2266.11	8831.88	-6565.77
11600	15.56	92.56	2281.66	8924.43	-6642.77
11700	9.30	154.46	2290.96	9078.90	-6787.94
11800	6.06	193.24	2297.01	9272.14	-6975.13
11900	5.81	203.31	2302.83	9475.45	-7172.63
12000	9.91	170.87	2312.73	9646.32	-7333.59
12100	17.87	117.19	2330.61	9763.51	-7432.90
12200	31.33	83.85	2361.94	9847.36	-7485.42
12300	38.74	78.61	2400.68	9925.97	-7525.29
12400	39.07	94.15	2439.75	10020.12	-7580.37
12500	41.52	107.78	2481.27	10127.90	-7646.63

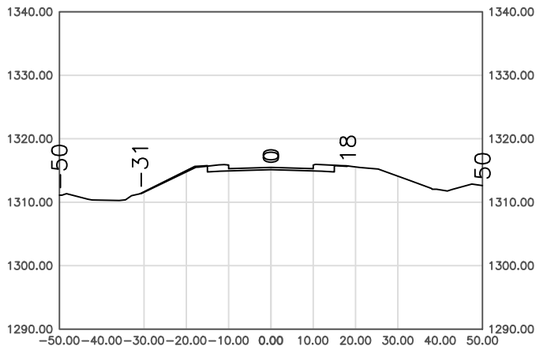
B14					
Station	Cut Volume (Cu.yd.)	Fill Volume (Cu.yd.)	Cum. Cut Vol. (Cu.yd.)	Cum. Fill Vol. (Cu.yd.)	Cum. Net Vol. (Cu.yd.)
12600	48.15	99.04	2529.42	10226.93	-7697.51
12700	58.35	77.37	2587.77	10304.30	-7716.53
12800	62.72	62.24	2650.49	10366.55	-7716.05
12900	59.31	46.00	2709.81	10412.55	-7702.74
13000	59.96	44.09	2769.77	10456.64	-7686.87
13100	65.09	54.65	2834.86	10511.29	-7676.42
13200	69.30	34.78	2904.16	10546.06	-7641.90
13236	25.60	5.33	2929.76	10551.40	-7621.64
TOTAL CUT			**2929.76**		
TOTAL FILL				**10551.40**	
NET					**-7621.64**

N52					
Station	Cut Volume (Cu.yd.)	Fill Volume (Cu.yd.)	Cum. Cut Vol. (Cu.yd.)	Cum. Fill Vol. (Cu.yd.)	Cum. Net Vol. (Cu.yd.)
12	0.00	0.00	0.00	0.00	0.00
100	16.26	31.03	16.26	31.03	-14.76
200	32.26	27.54	48.52	58.57	-10.04
300	49.94	21.19	98.47	79.75	18.72
400	51.31	21.98	149.78	101.73	48.05
500	32.46	32.09	182.25	133.82	48.42
600	19.02	47.57	201.26	181.40	19.87
700	16.96	58.19	218.23	239.58	-21.36
800	17.43	56.26	235.65	295.84	-60.19
900	20.41	44.59	256.06	340.44	-84.38
1000	22.22	45.11	278.28	385.55	-107.26
1100	21.31	56.30	299.60	441.84	-142.25
1200	19.89	59.17	319.49	501.01	-181.52
1300	15.98	59.65	335.47	560.66	-225.19
1400	15.50	55.61	350.97	616.27	-265.30
1500	17.28	54.00	368.25	670.27	-302.02
1600	16.96	61.69	385.21	731.95	-346.75
1700	16.81	71.43	402.02	803.38	-401.36
1800	16.54	75.22	418.56	878.60	-460.04
1900	17.74	72.30	436.30	950.90	-514.60
2000	18.80	65.31	455.10	1016.21	-561.12
2100	19.89	56.35	474.99	1072.57	-597.58

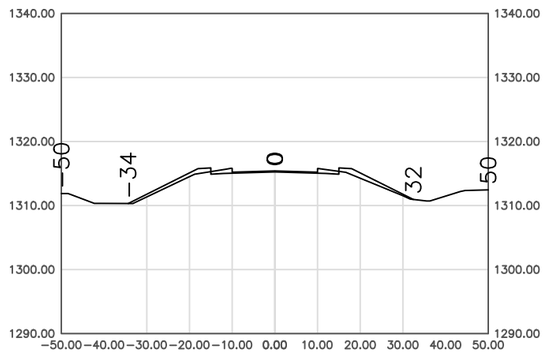
N52					
Station	Cut Volume (Cu.yd.)	Fill Volume (Cu.yd.)	Cum. Cut Vol. (Cu.yd.)	Cum. Fill Vol. (Cu.yd.)	Cum. Net Vol. (Cu.yd.)
2200	20.43	57.98	495.41	1130.55	-635.13
2300	19.50	66.31	514.91	1196.86	-681.95
2400	17.72	75.50	532.63	1272.36	-739.73
2500	15.63	80.70	548.26	1353.07	-804.80
2600	13.98	83.22	562.25	1436.29	-874.04
2700	10.43	81.72	572.67	1518.01	-945.34
2800	8.22	90.50	580.89	1608.51	-1027.62
2900	8.07	111.44	588.97	1719.95	-1130.99
3000	6.83	119.80	595.80	1839.75	-1243.95
3100	6.00	124.94	601.80	1964.69	-1362.89
3200	5.41	132.74	607.21	2097.44	-1490.23
3300	5.85	134.02	613.06	2231.45	-1618.39
3400	6.02	120.44	619.08	2351.90	-1732.82
3500	3.72	101.70	622.80	2453.60	-1830.80
3600	2.04	118.52	624.84	2572.12	-1947.28
3700	1.41	151.98	626.25	2724.10	-2097.86
3800	0.44	168.50	626.69	2892.60	-2265.91
3900	0.00	171.89	626.69	3064.49	-2437.80
4000	0.00	164.93	626.69	3229.42	-2602.73
4100	0.00	157.09	626.69	3386.51	-2759.82
4200	0.02	155.09	626.71	3541.60	-2914.89
4300	0.61	210.11	627.32	3751.71	-3124.39
4400	2.46	194.07	629.78	3945.79	-3316.01

N52					
Station	Cut Volume (Cu.yd.)	Fill Volume (Cu.yd.)	Cum. Cut Vol. (Cu.yd.)	Cum. Fill Vol. (Cu.yd.)	Cum. Net Vol. (Cu.yd.)
4500	5.52	117.24	635.30	4063.03	-3427.73
4600	6.65	113.20	641.95	4176.23	-3534.28
4700	5.93	113.20	647.87	4289.44	-3641.56
4800	7.70	113.20	655.58	4402.64	-3747.06
4900	28.67	308.94	670.62	4485.18	-3814.56
5000	16.46	90.87	687.08	4576.05	-3888.97
5100	33.69	93.20	720.76	4669.25	-3948.49
5111	6.23	7.78	726.99	4677.03	-3950.04
TOTAL CUT			726.99		
TOTAL FILL				4677.03	
NET					-3950.04

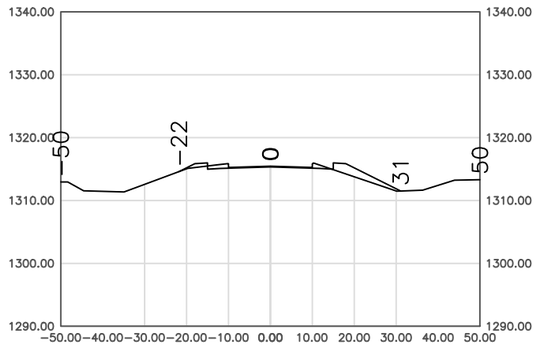
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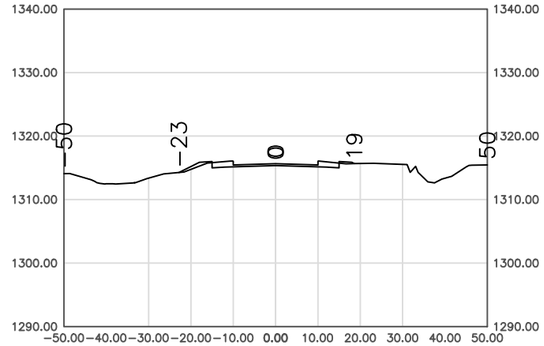
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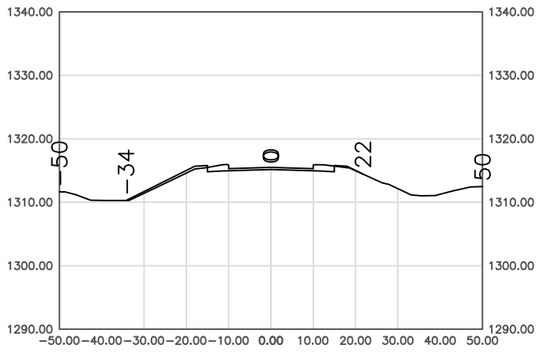
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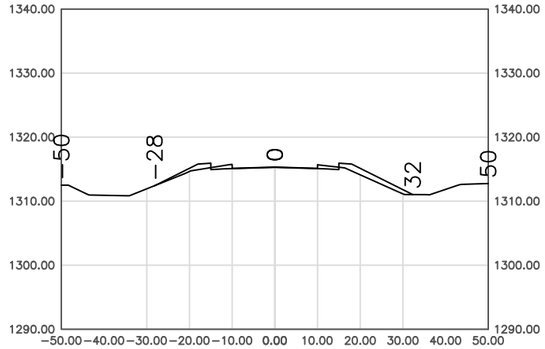
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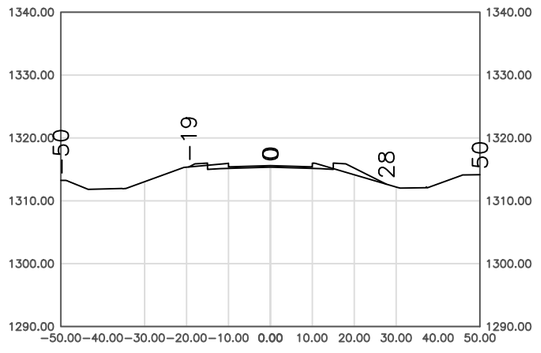
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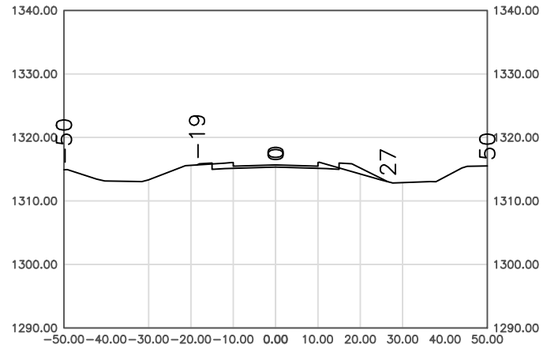
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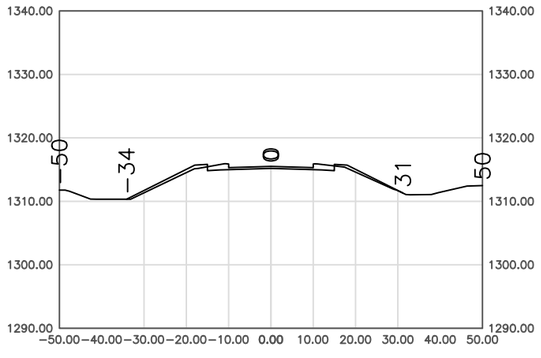
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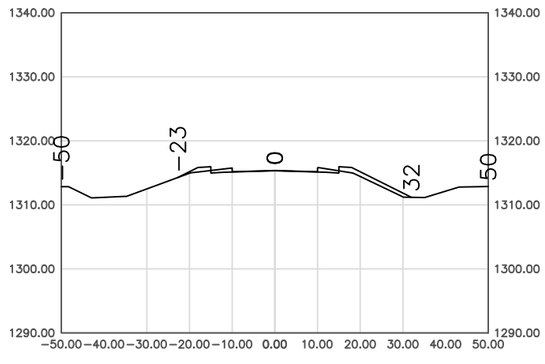
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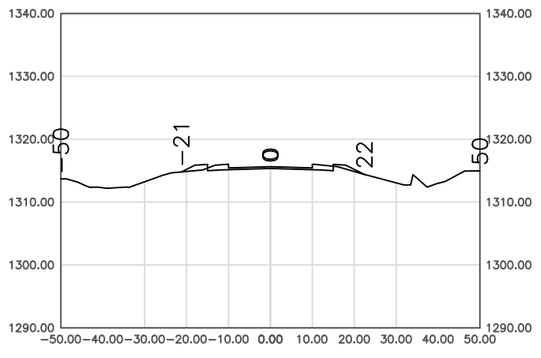
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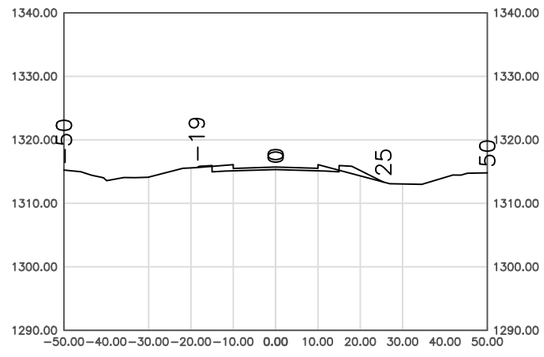
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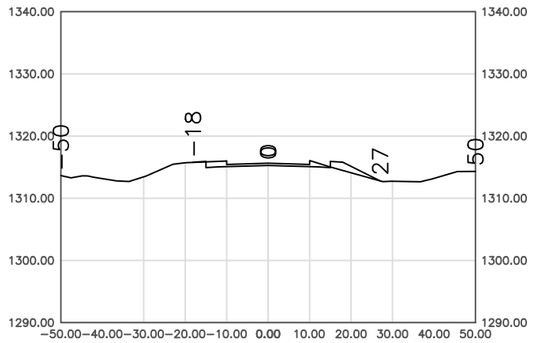
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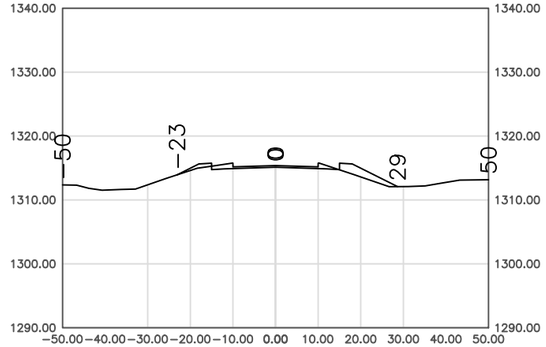
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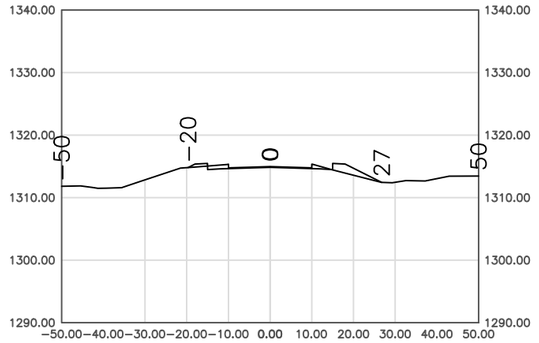
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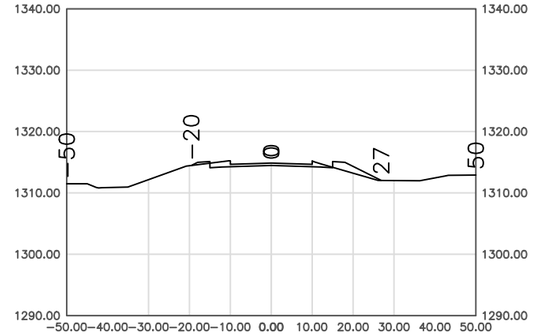
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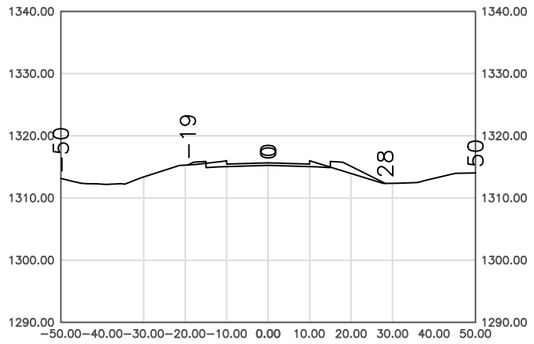
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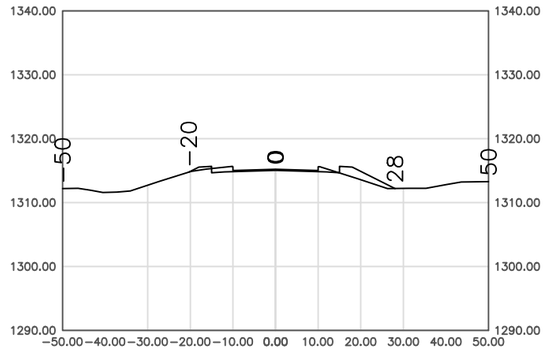
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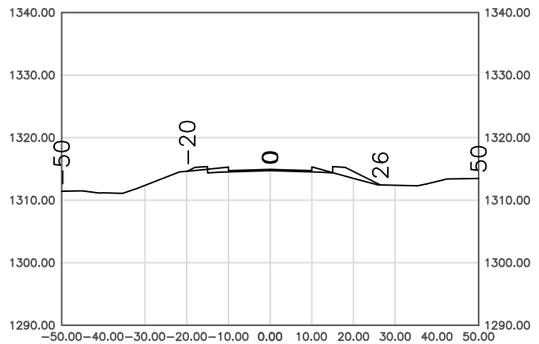
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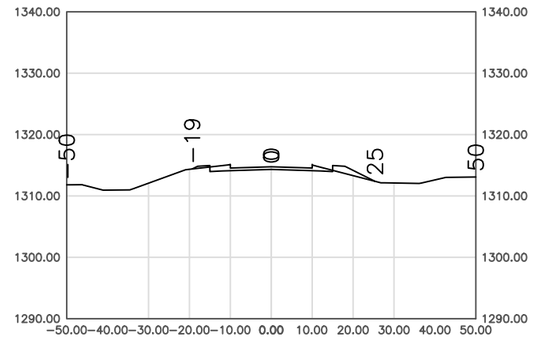
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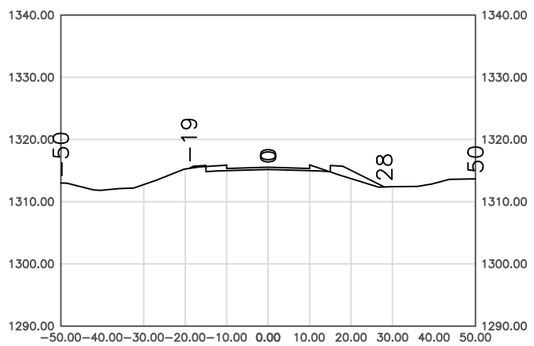
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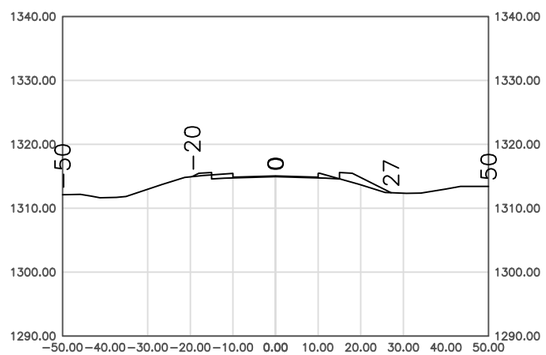
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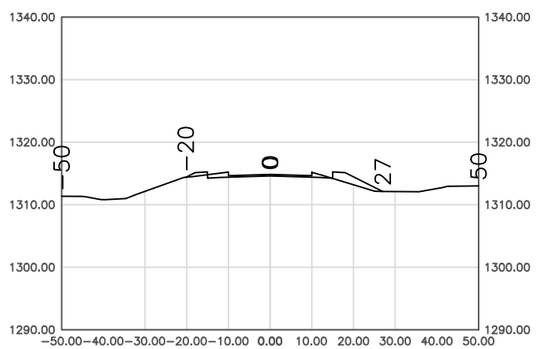
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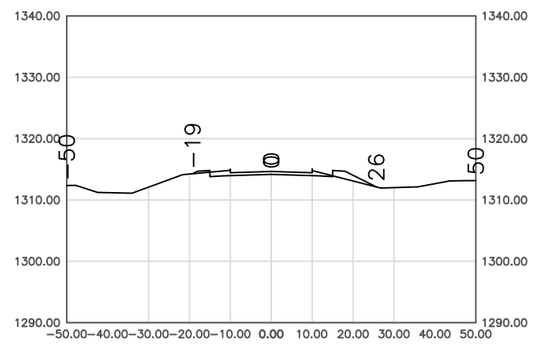
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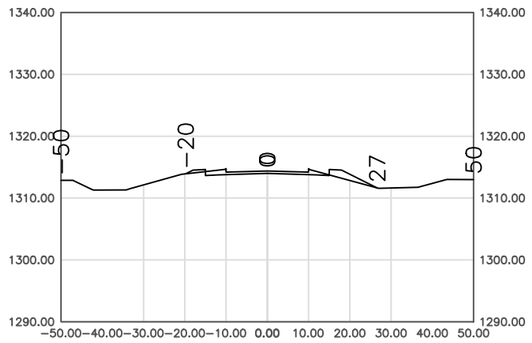
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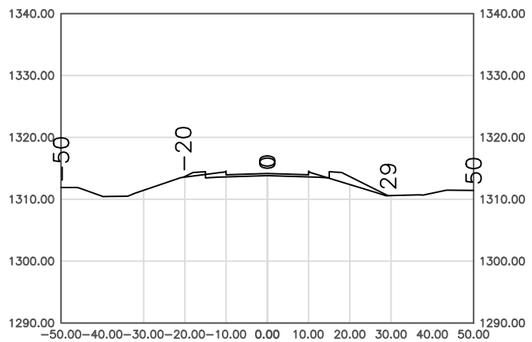
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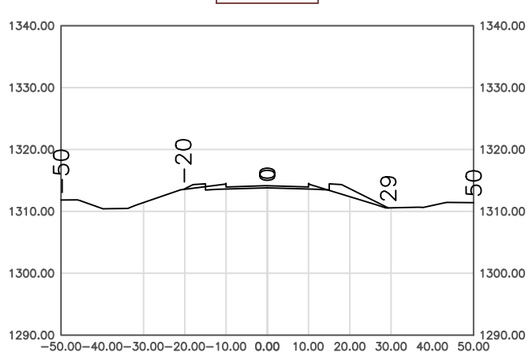
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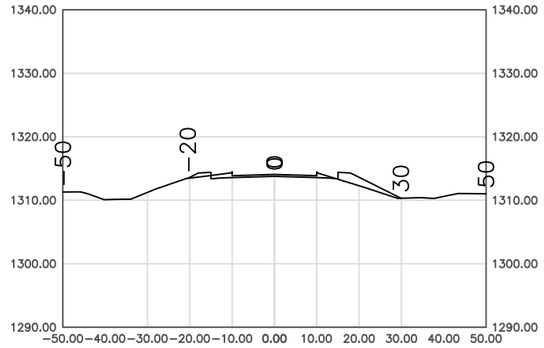
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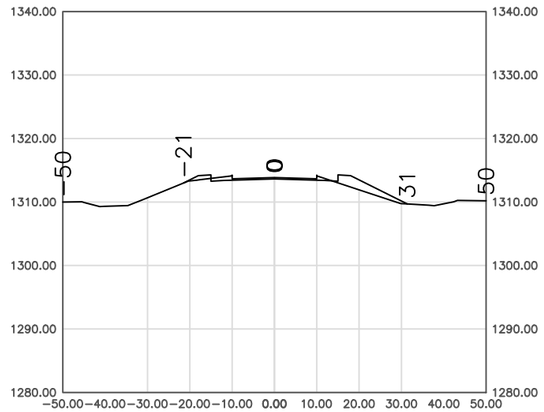
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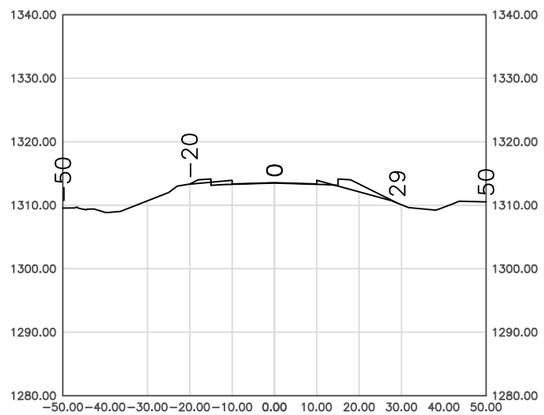
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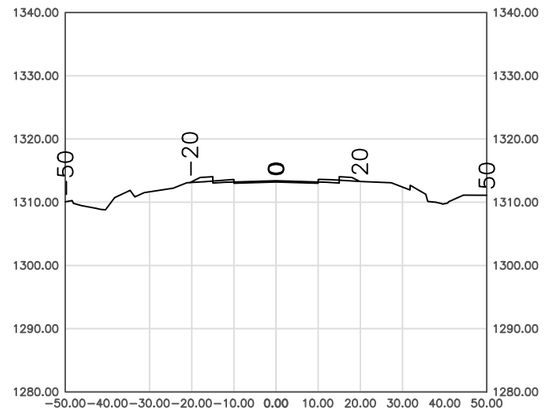
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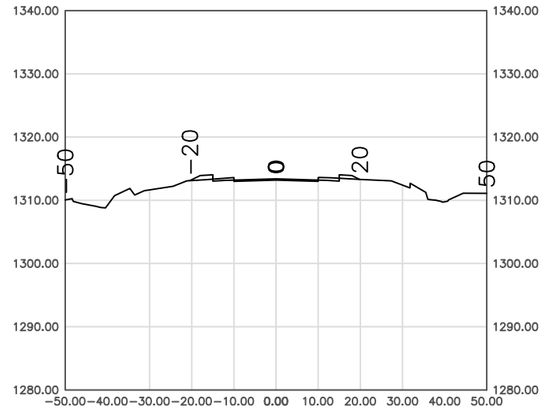
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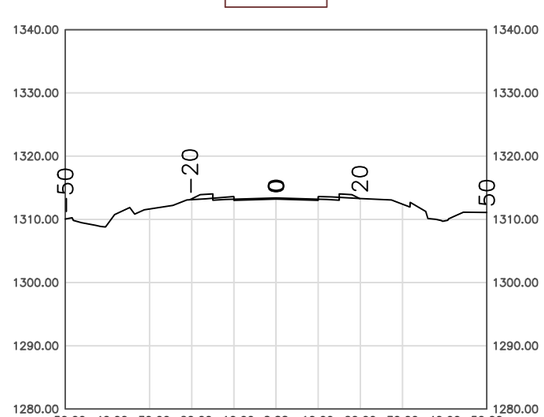
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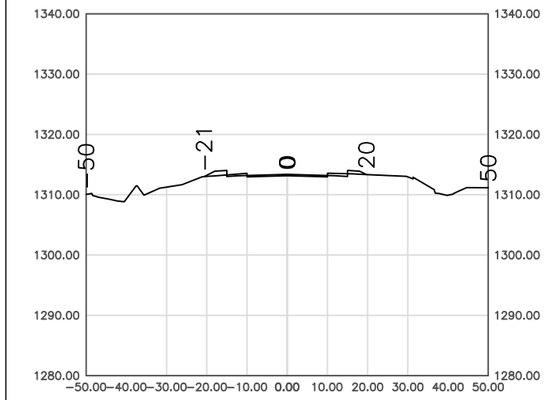
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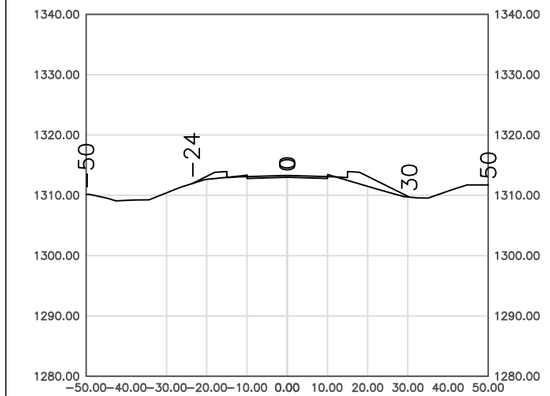
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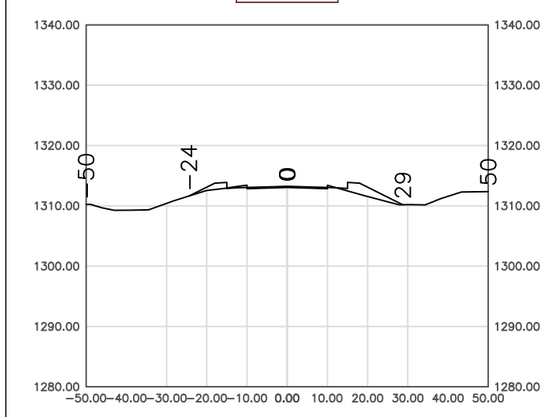
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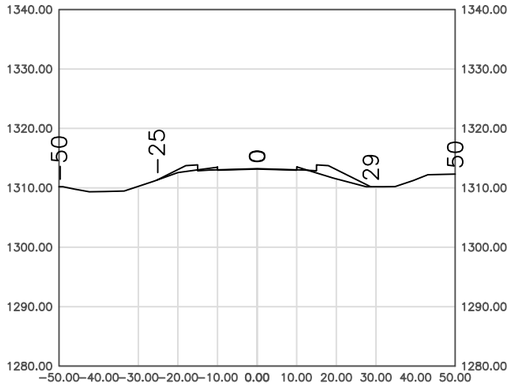
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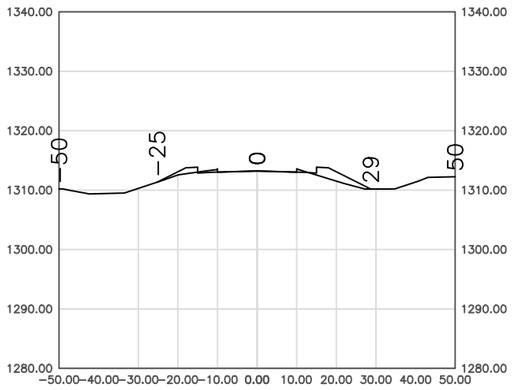
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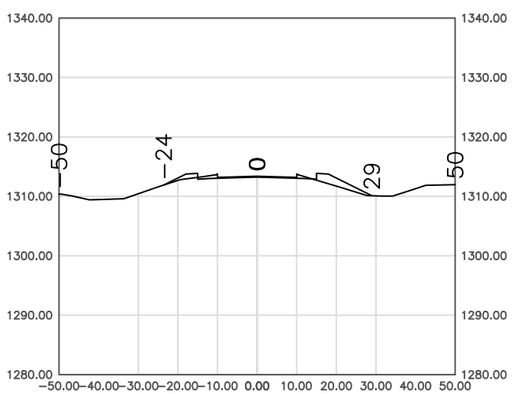
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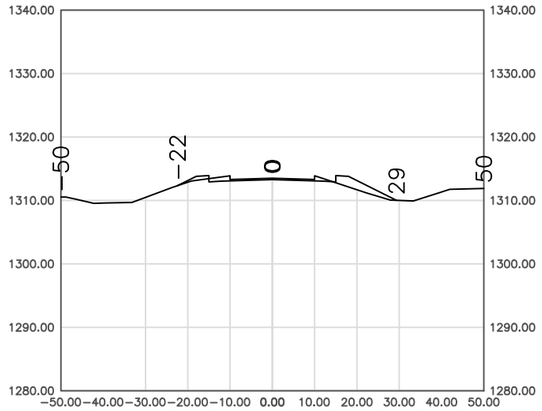
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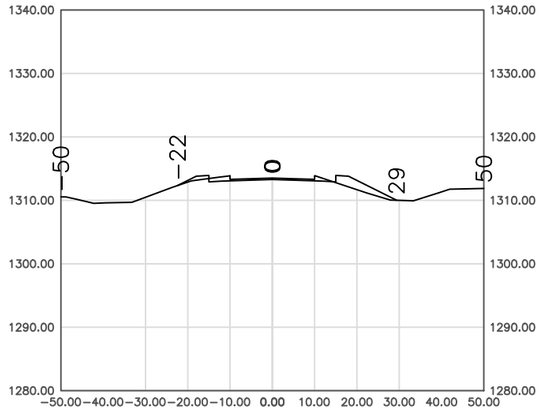
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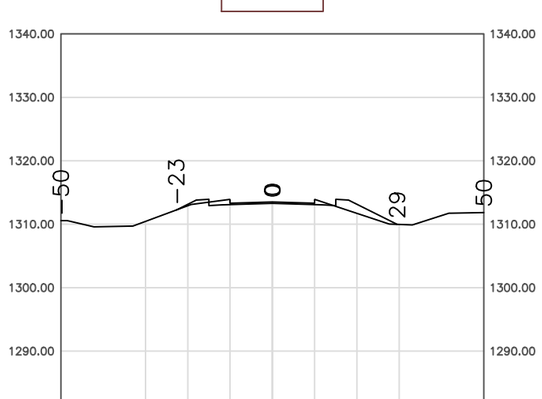
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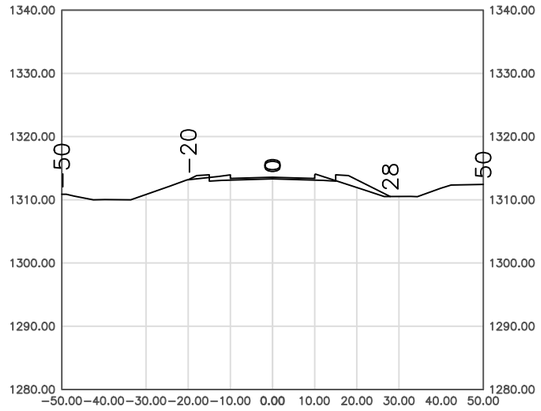
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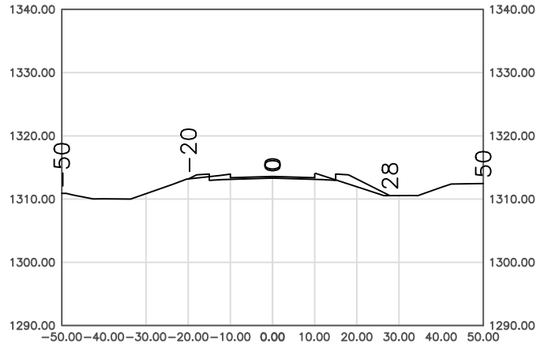
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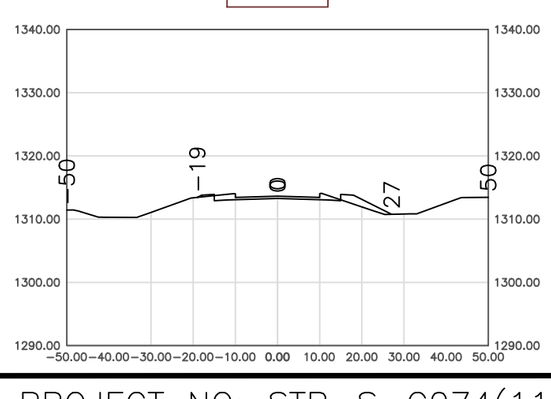
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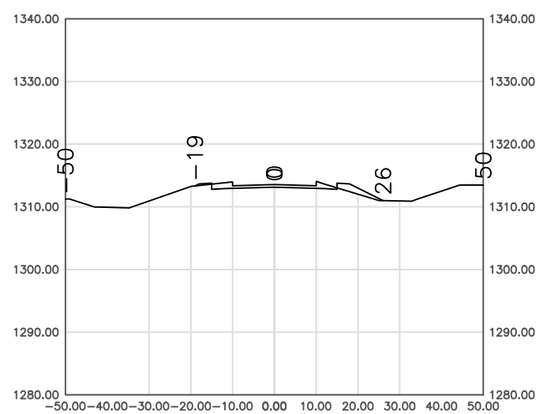
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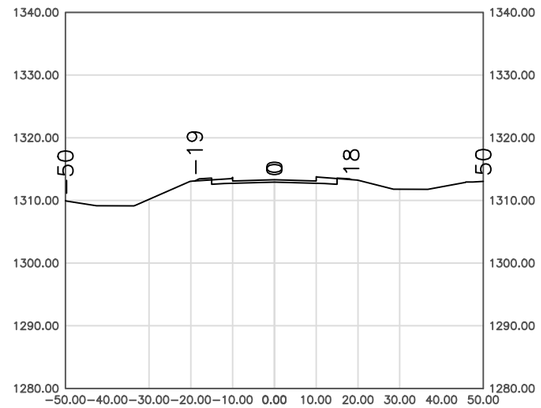
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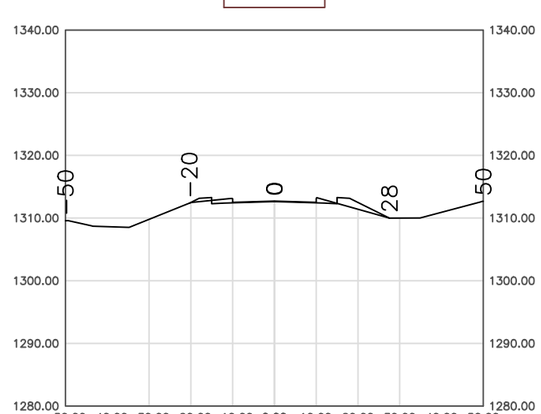
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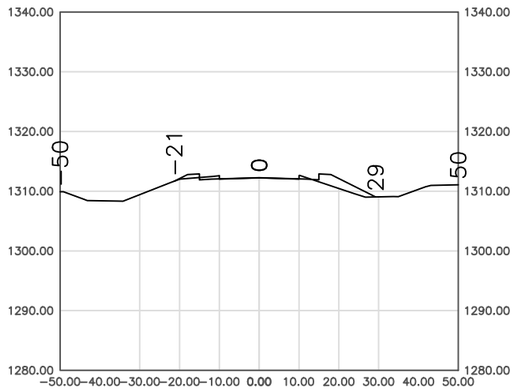
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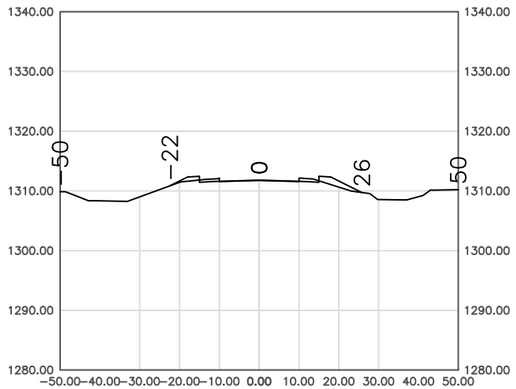
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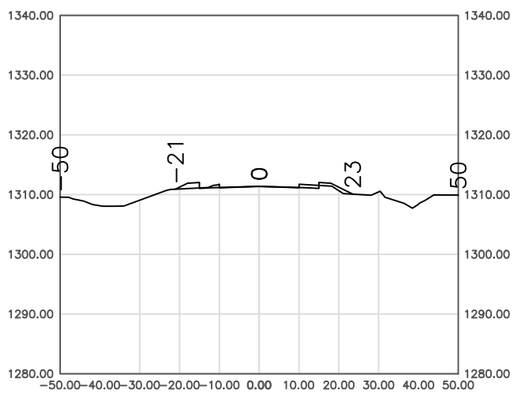
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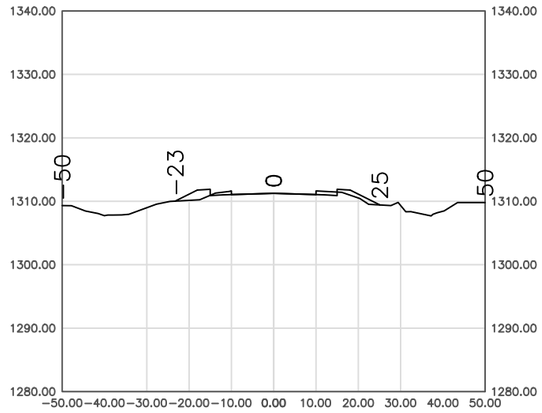
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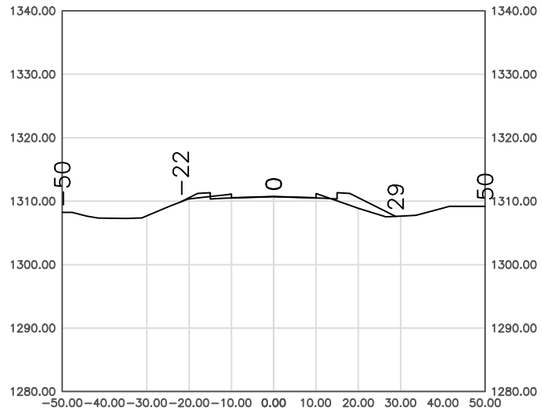
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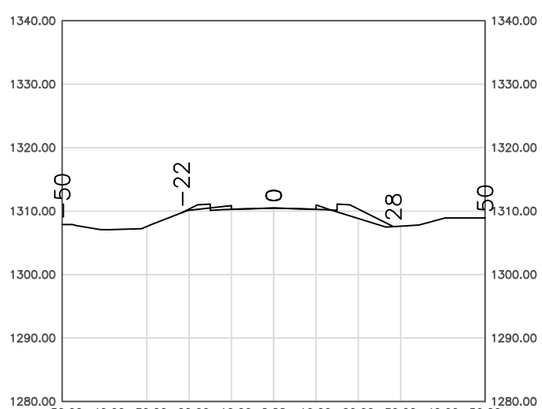
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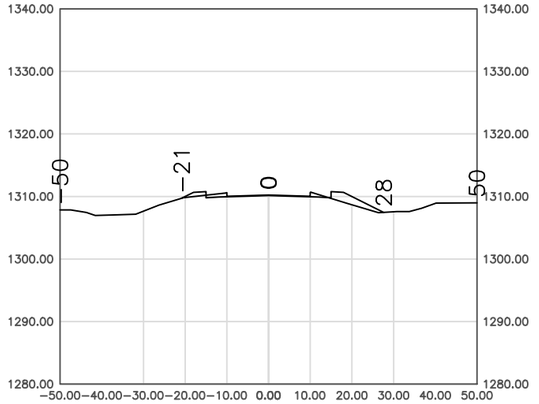
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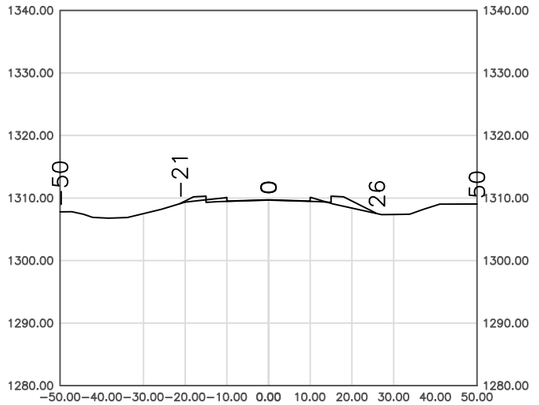
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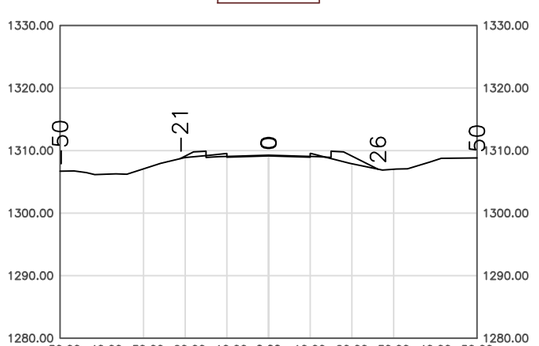
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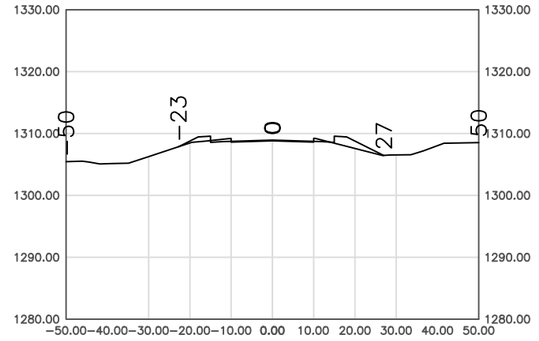
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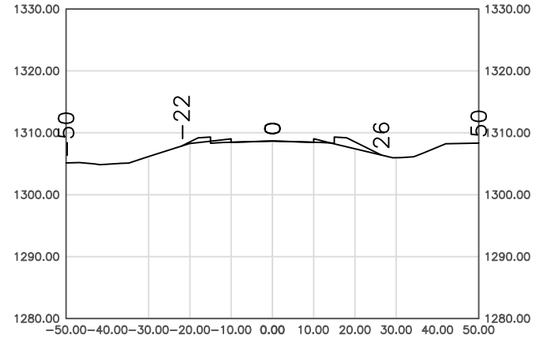
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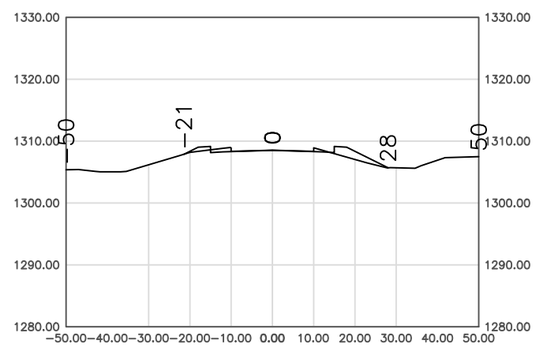
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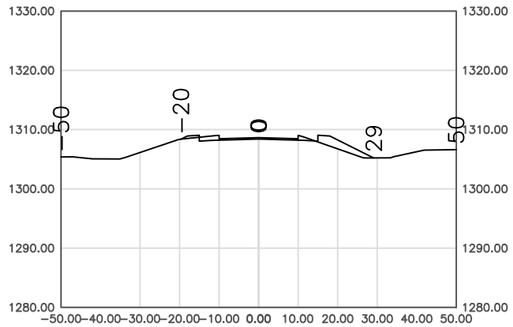
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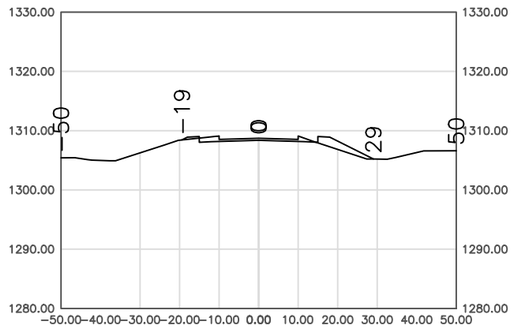
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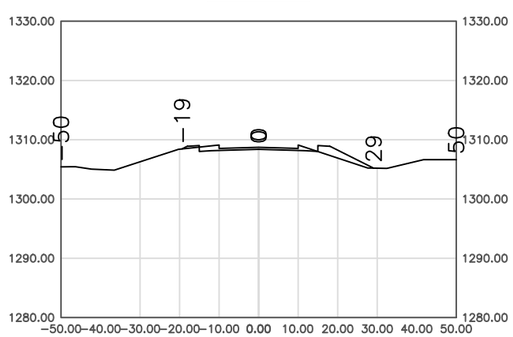
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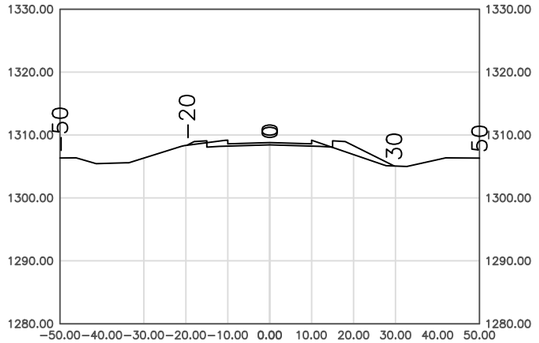
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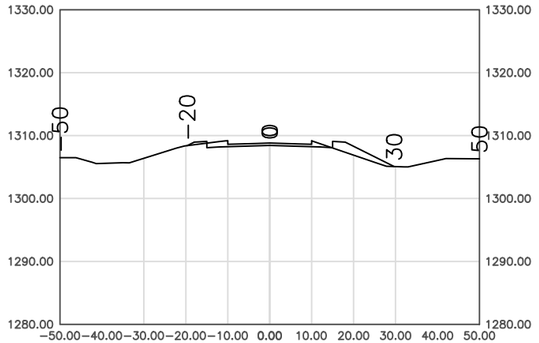
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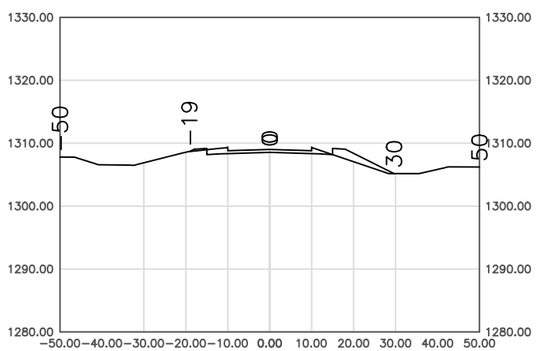
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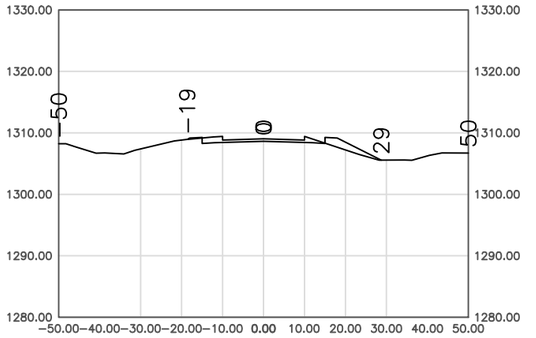
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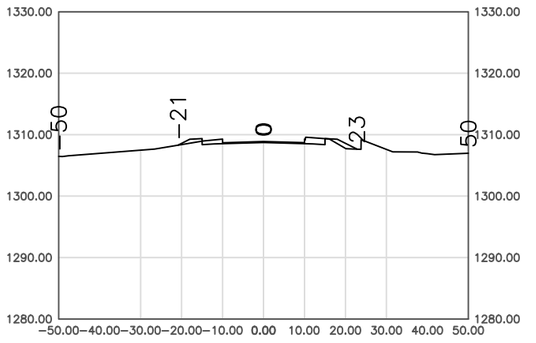
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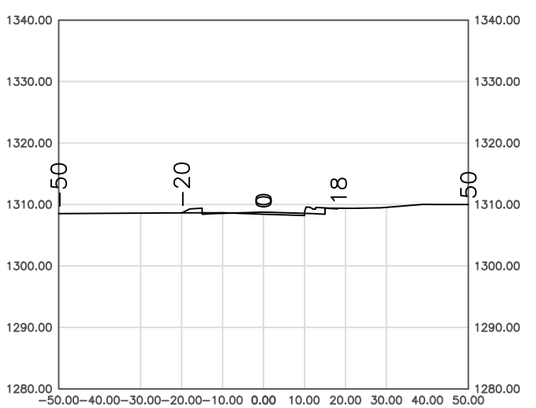
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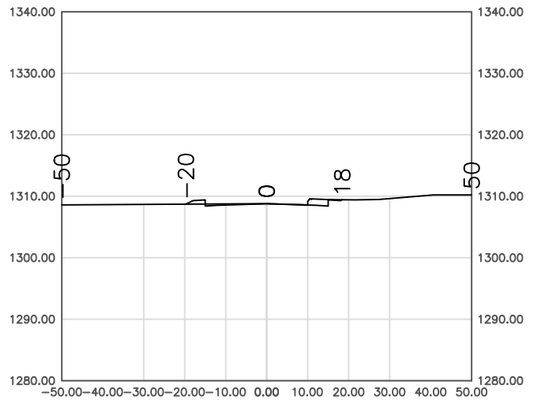
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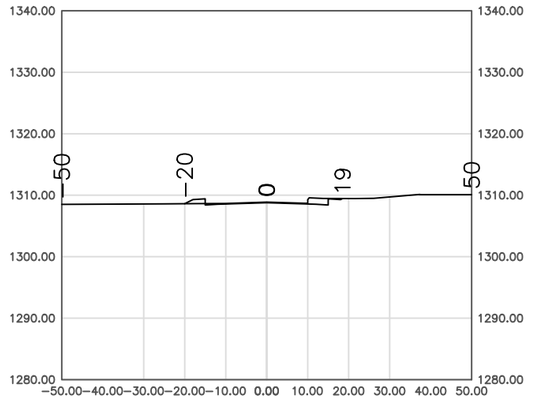
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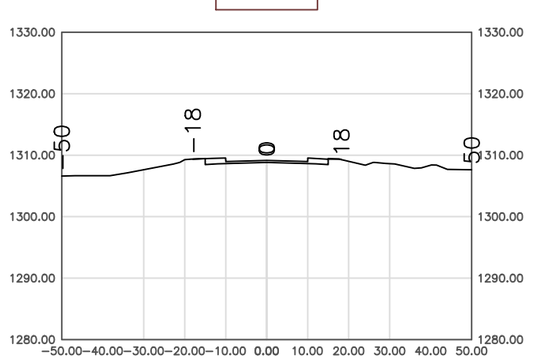
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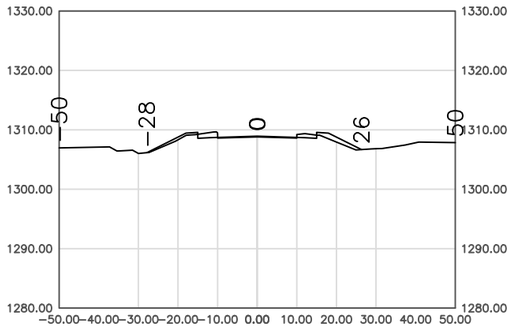
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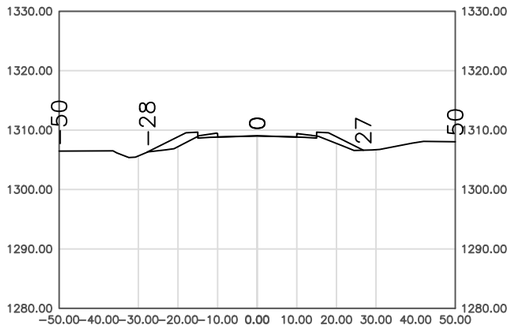
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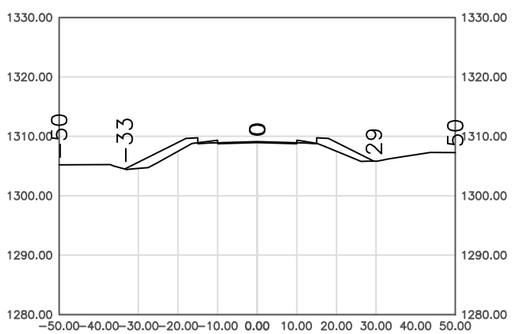
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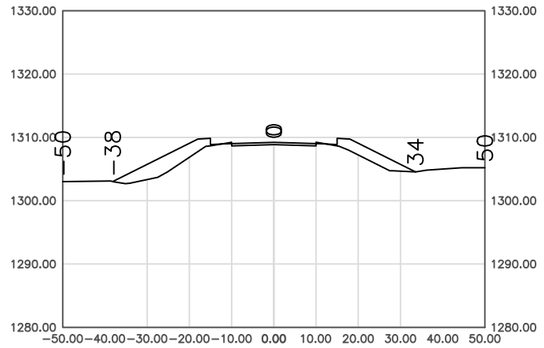
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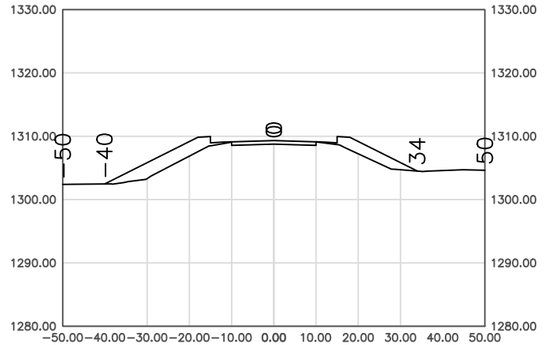
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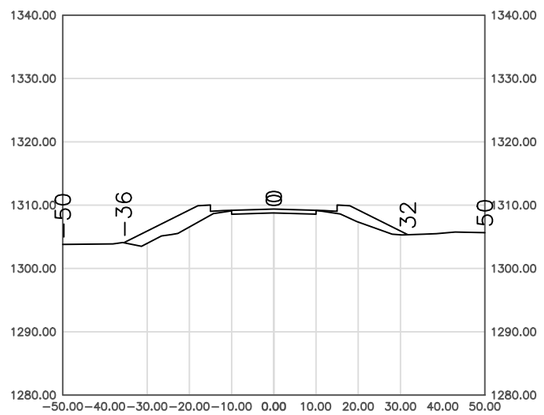
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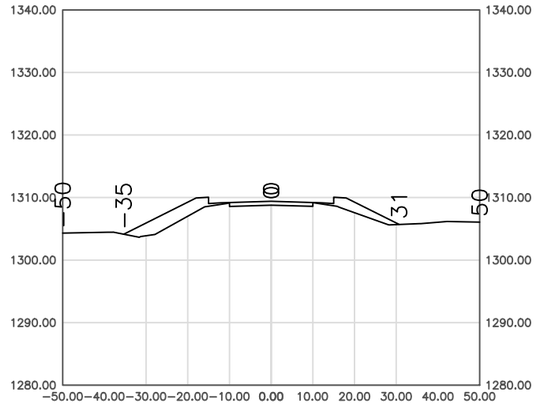
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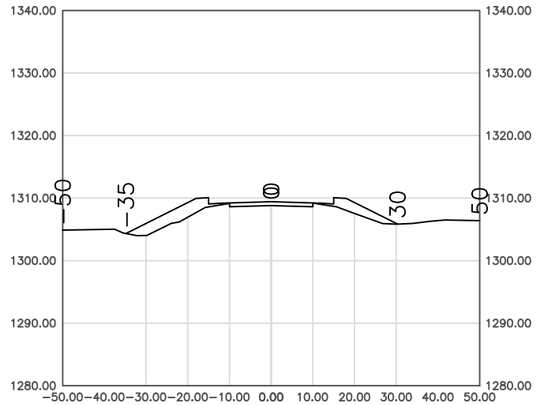
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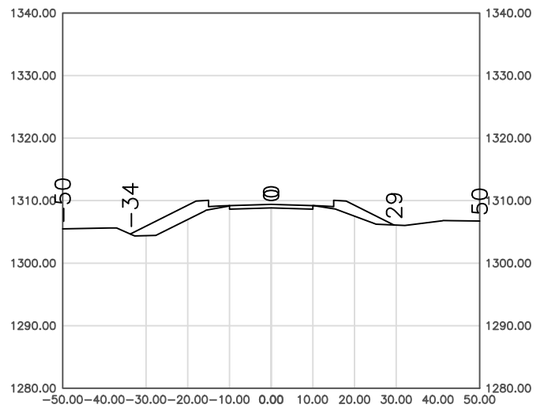
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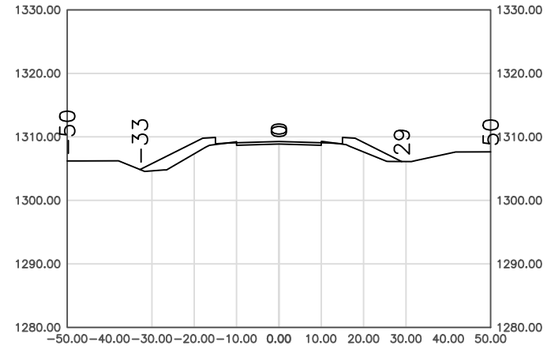
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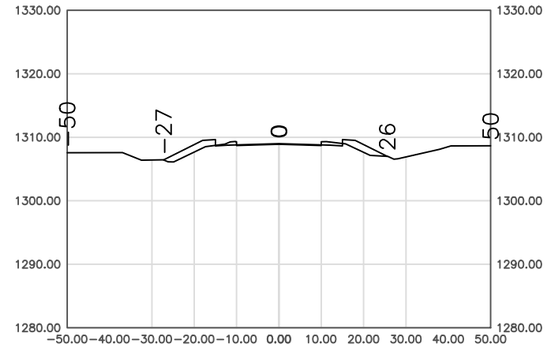
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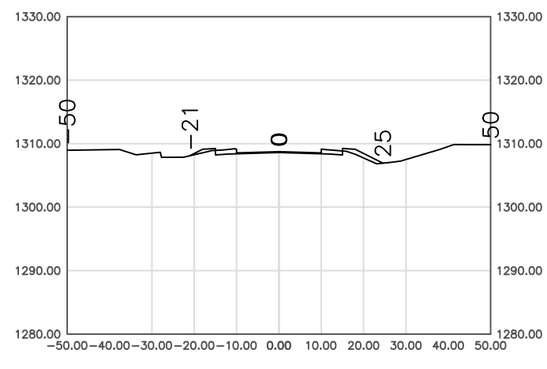
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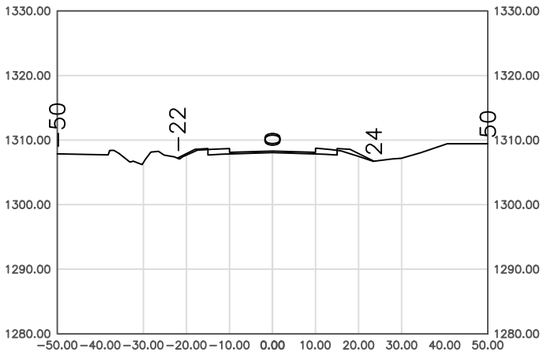
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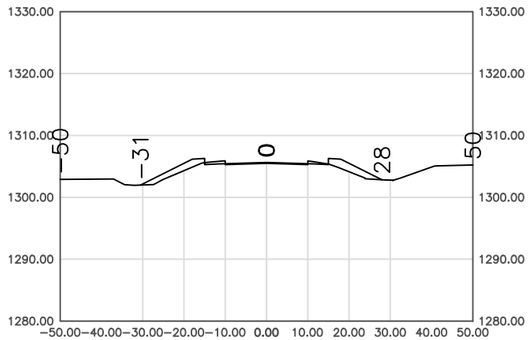
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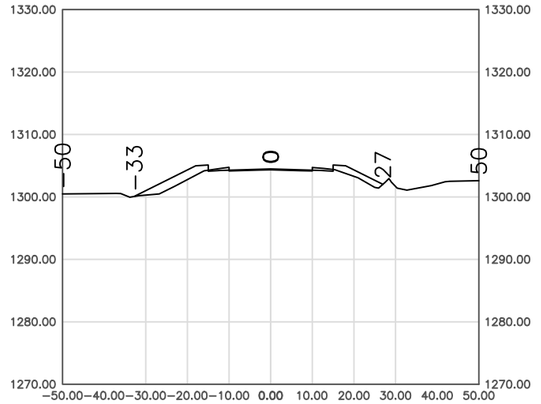
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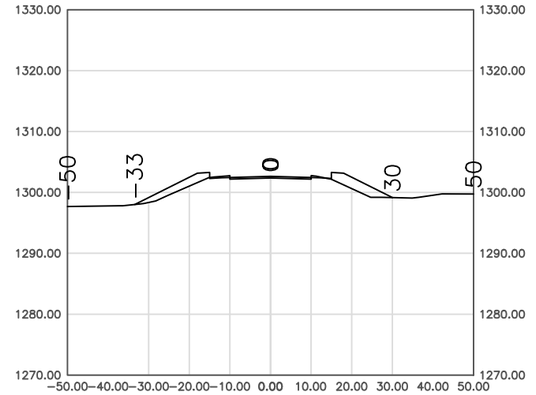
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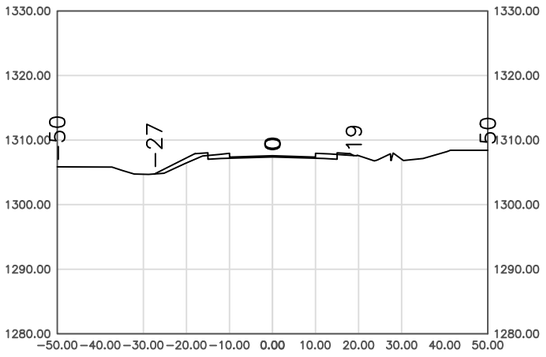
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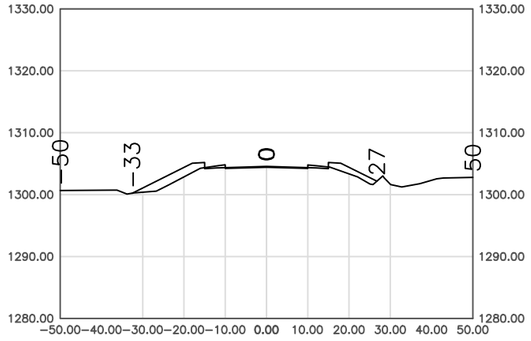
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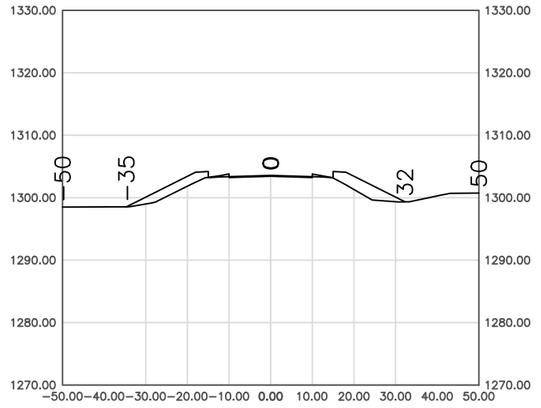
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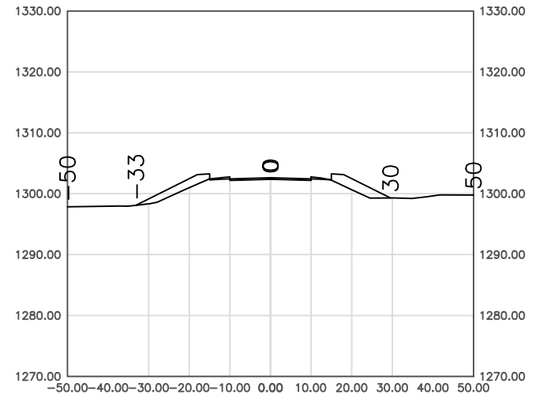
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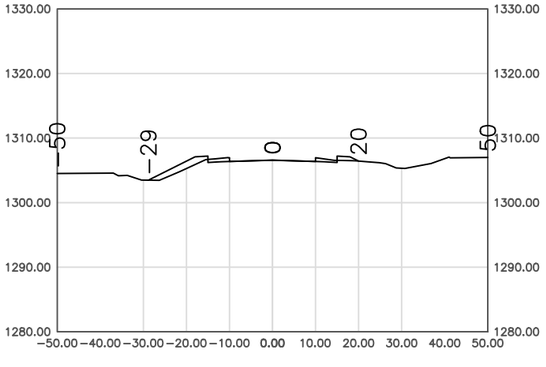
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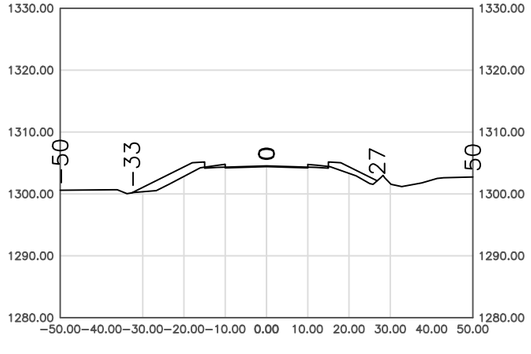
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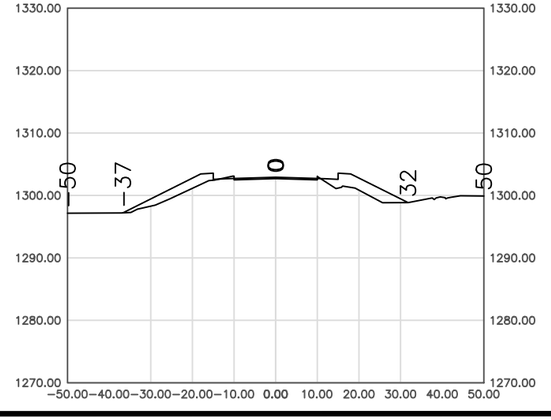
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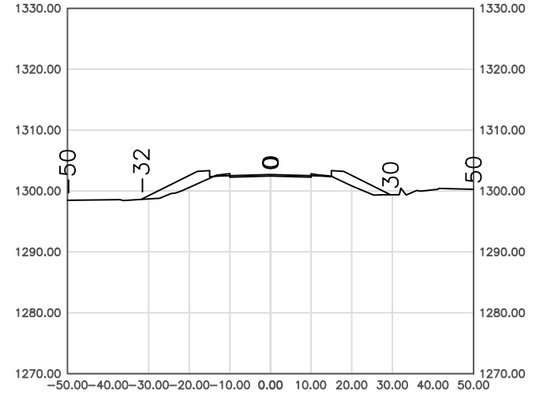
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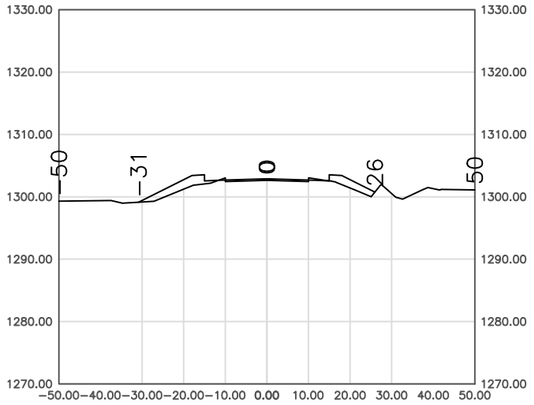
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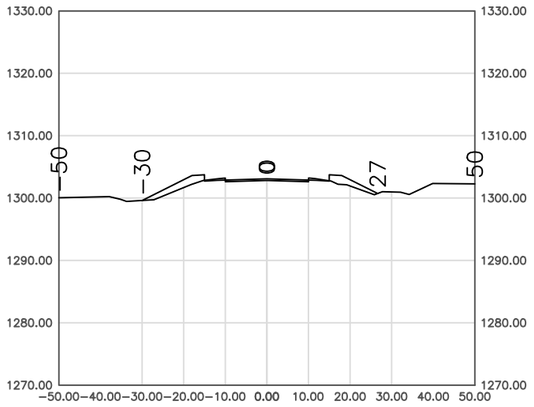
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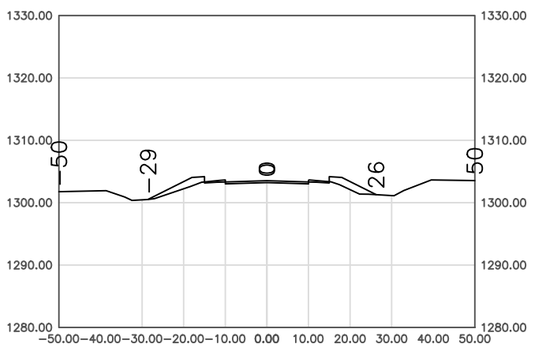
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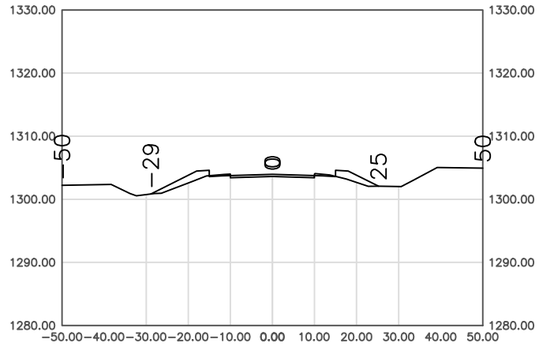
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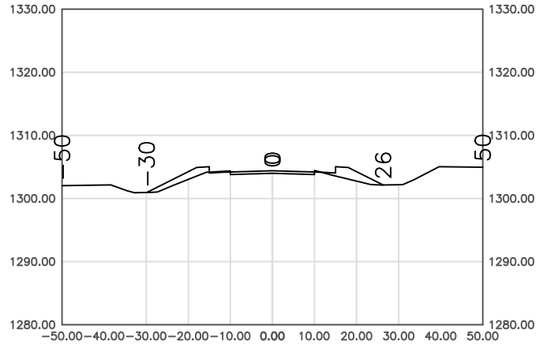
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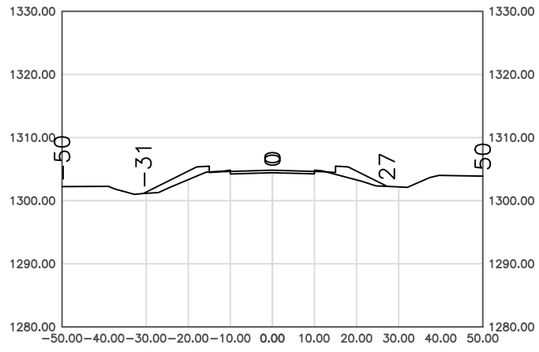
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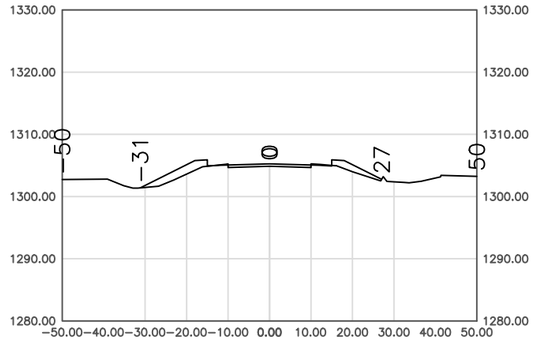
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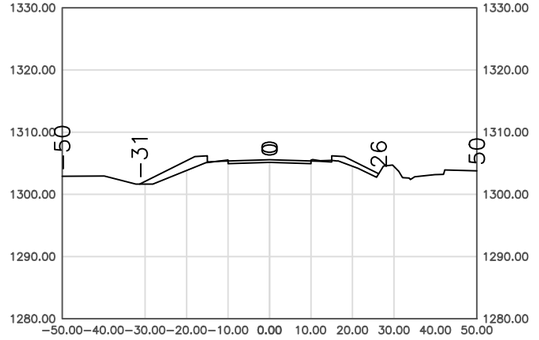
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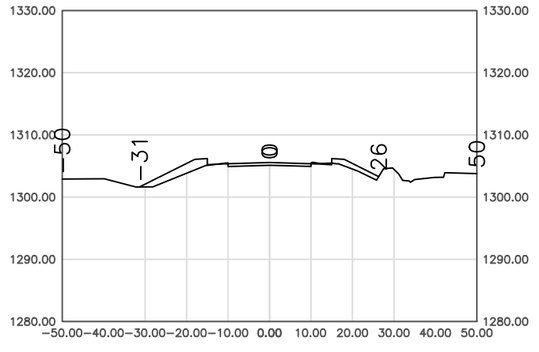
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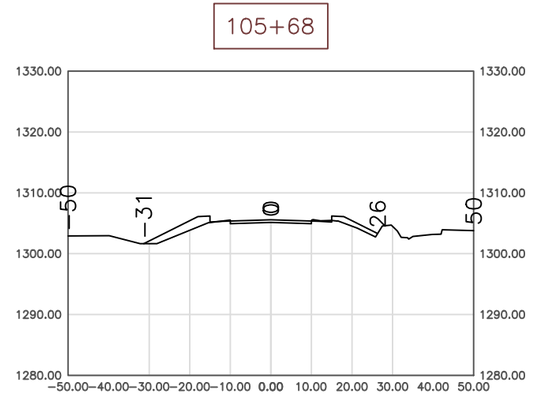
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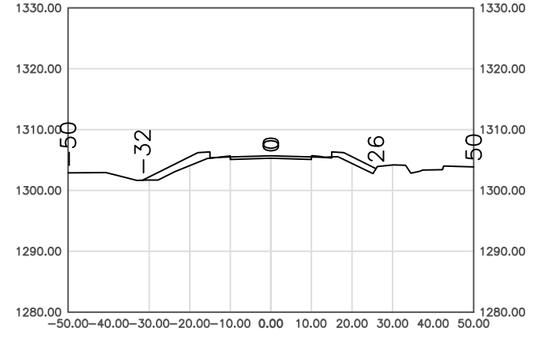
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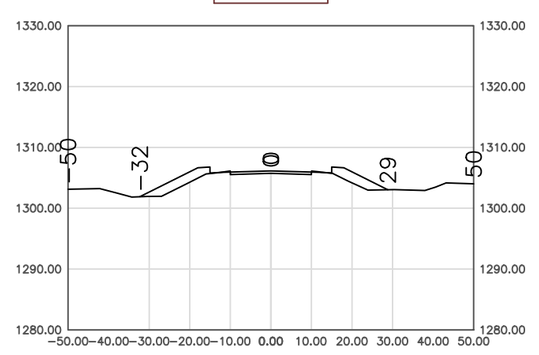
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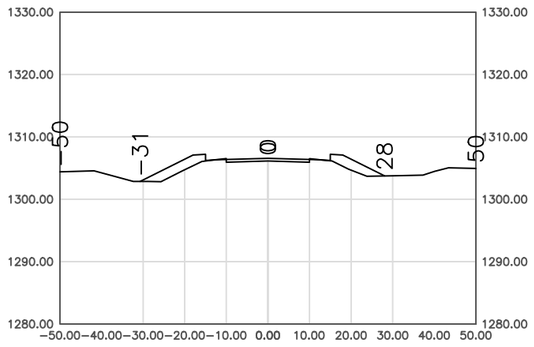
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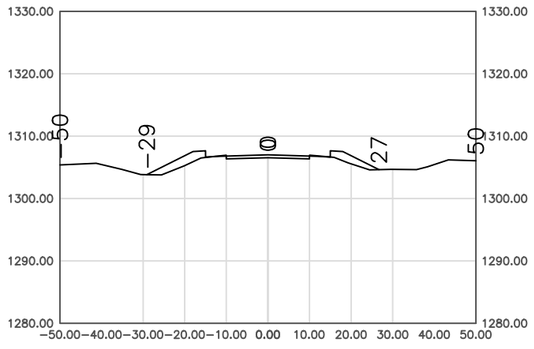
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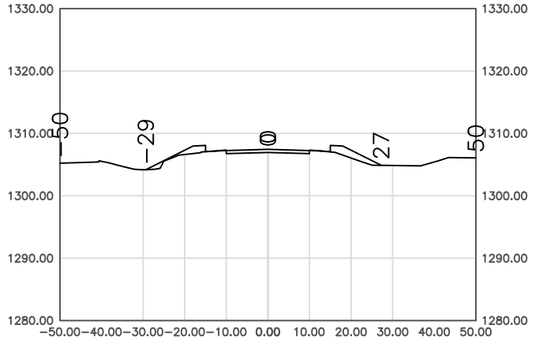
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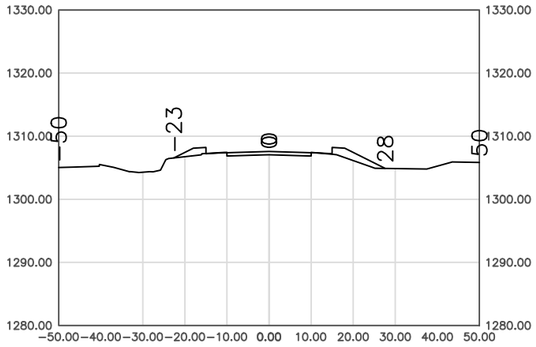
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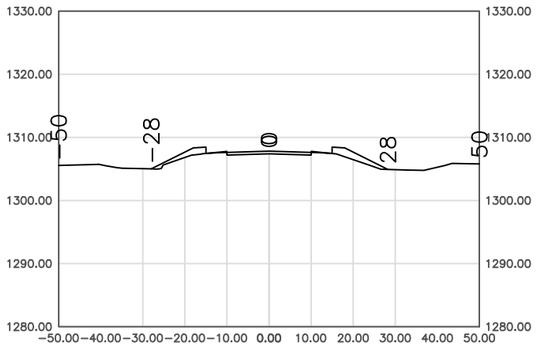
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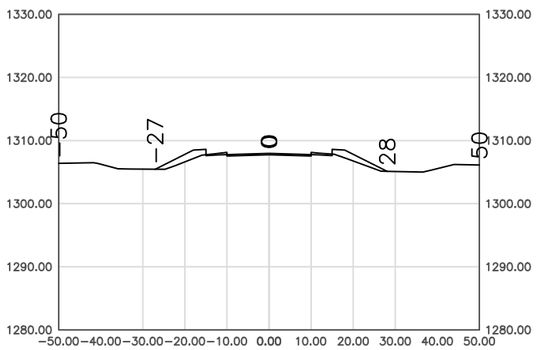
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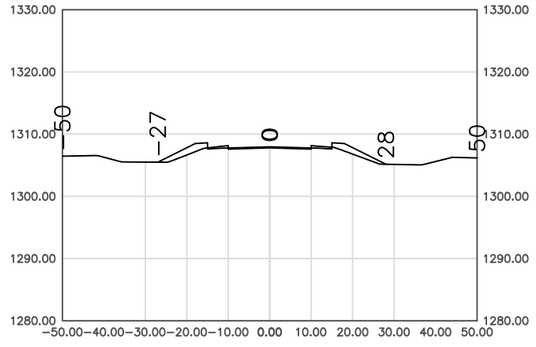
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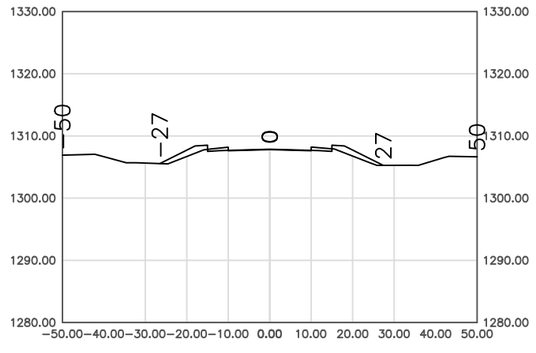
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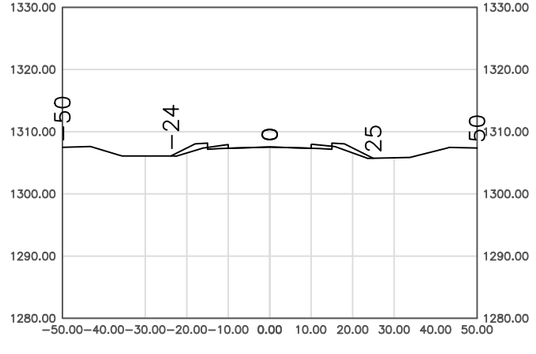
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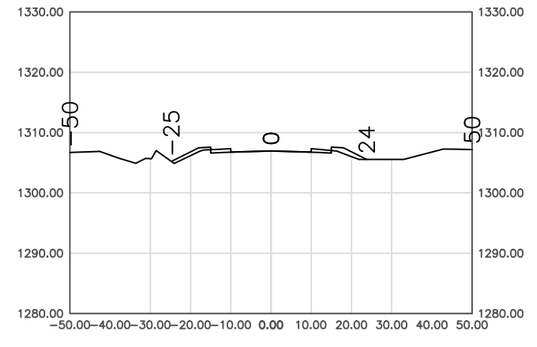
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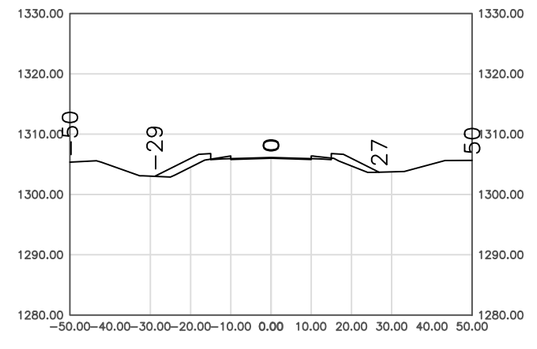
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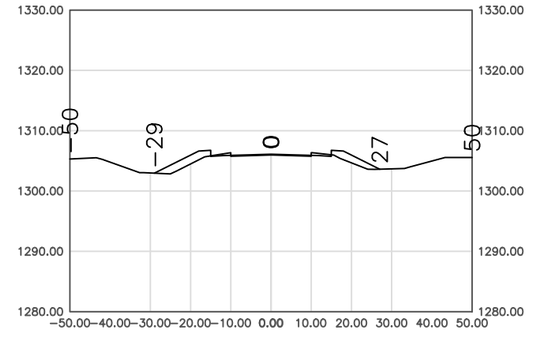
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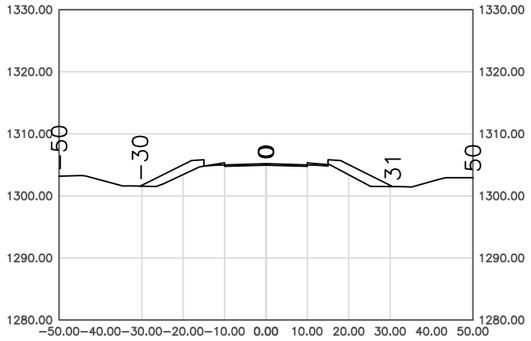
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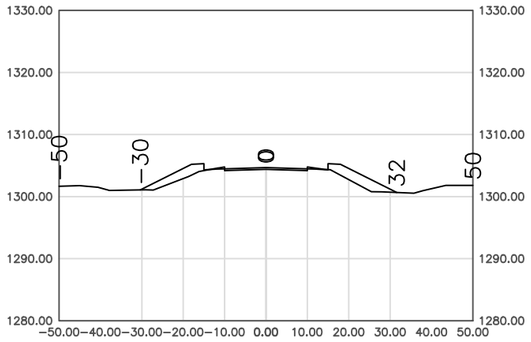
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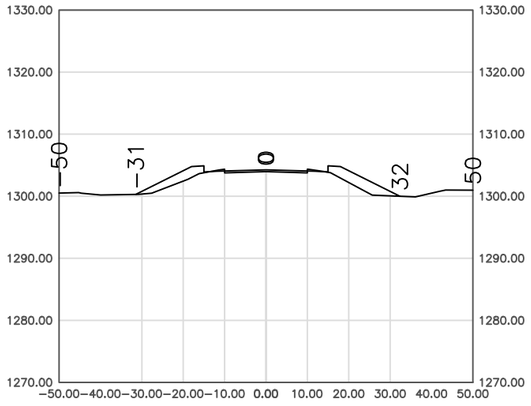
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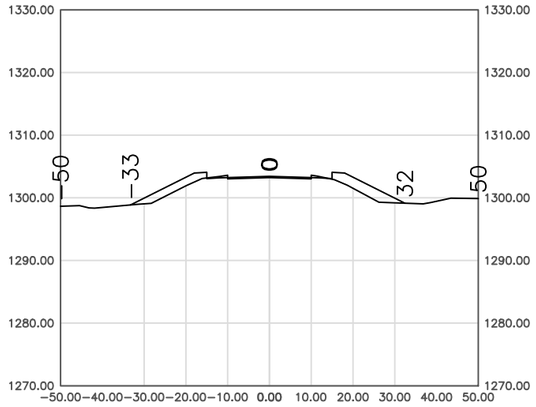
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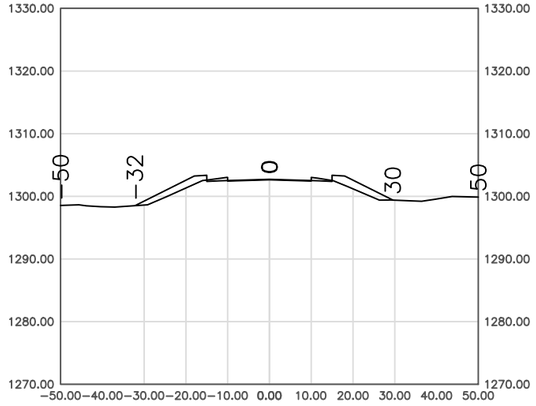
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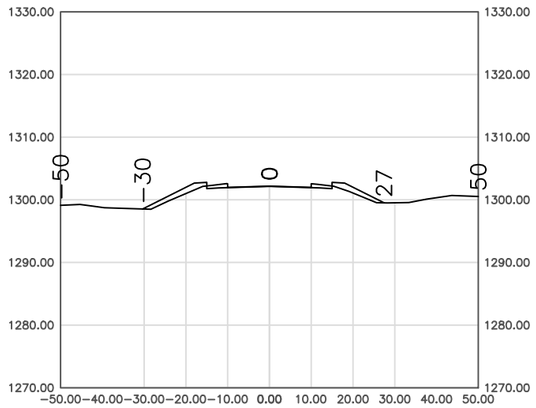
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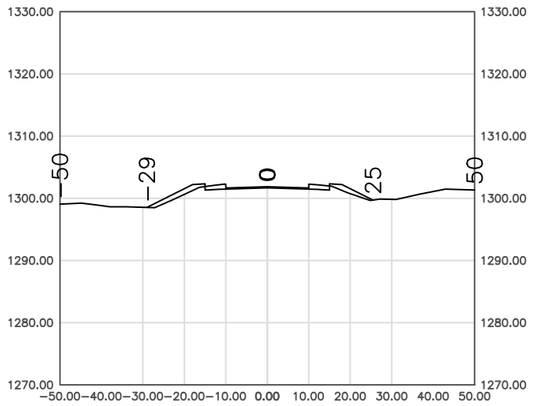
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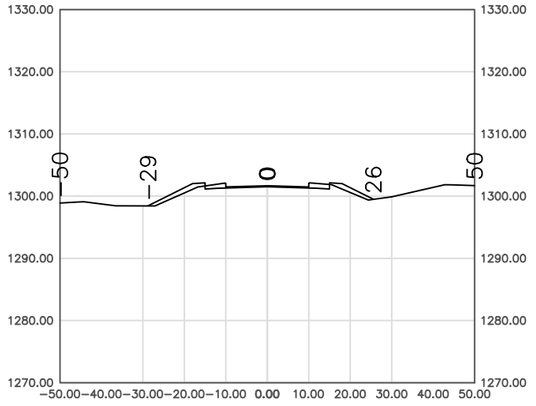
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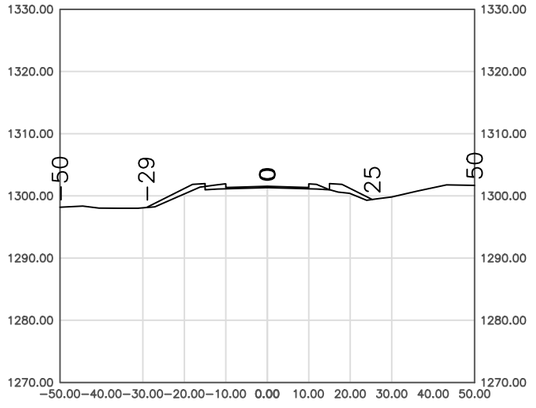
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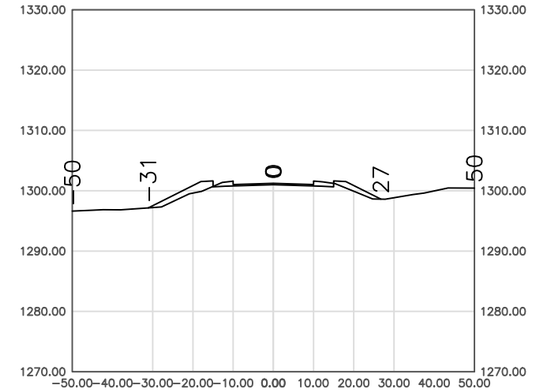
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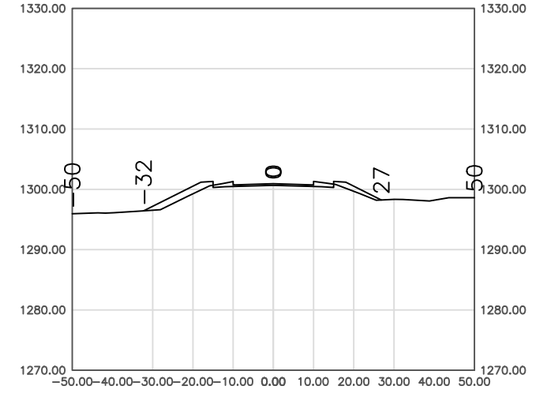
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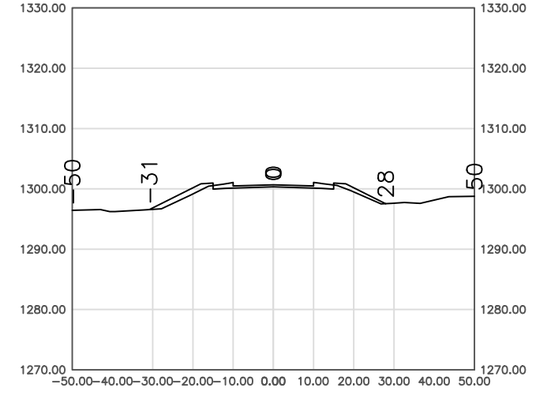
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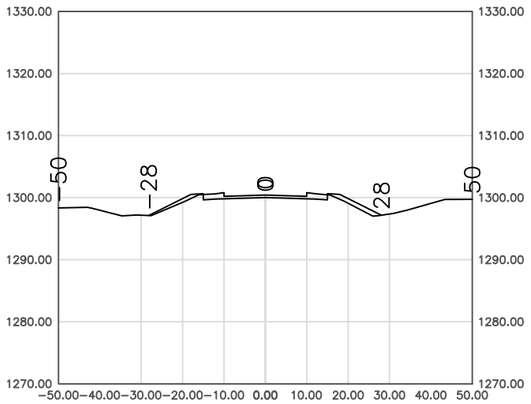
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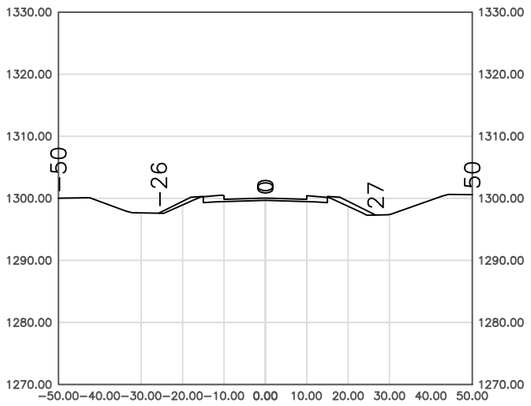
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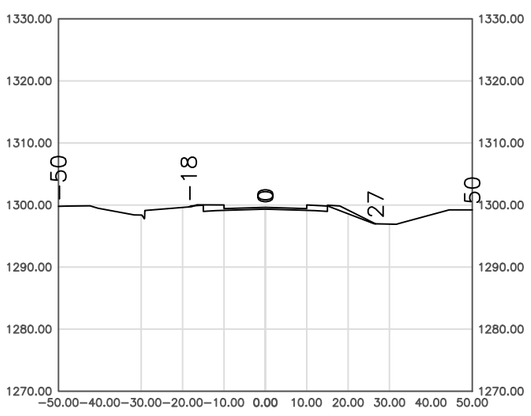
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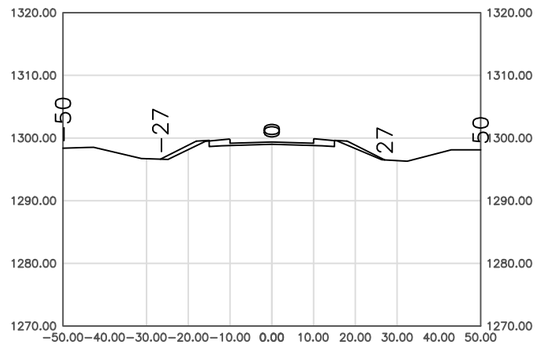
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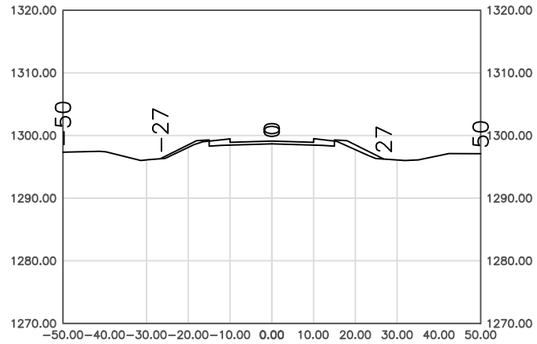
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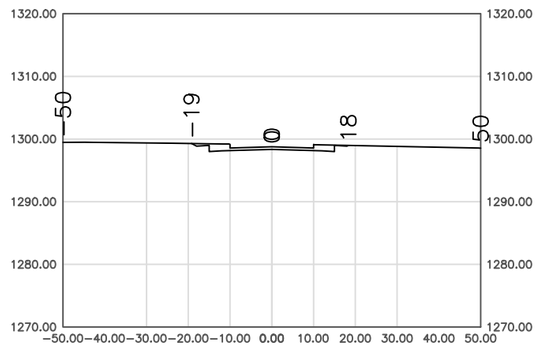
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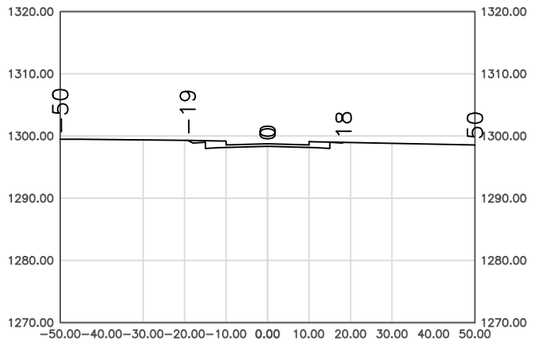
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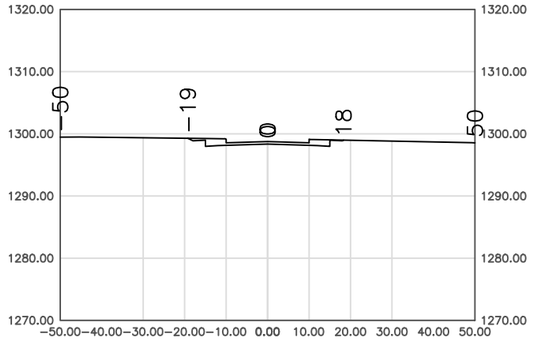
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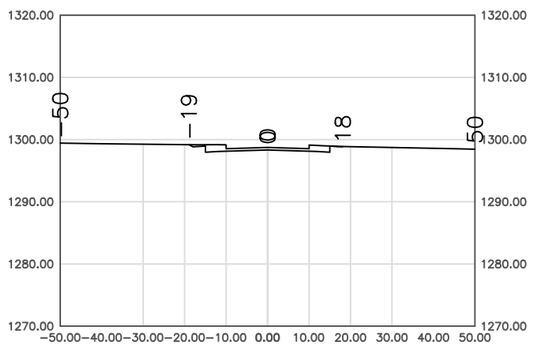
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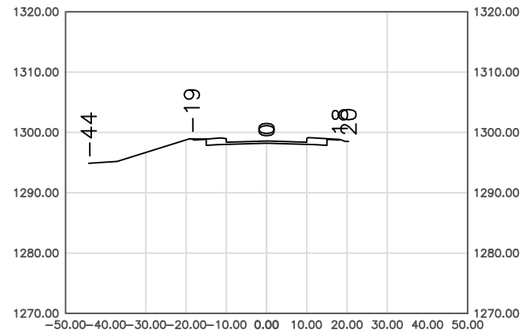
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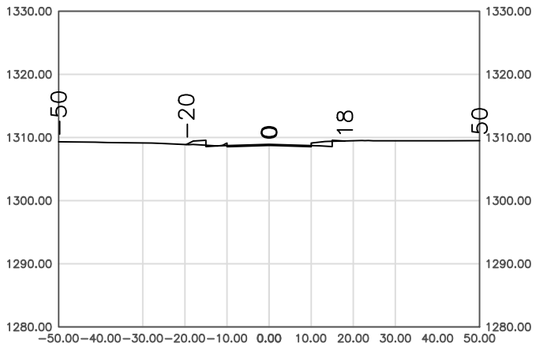
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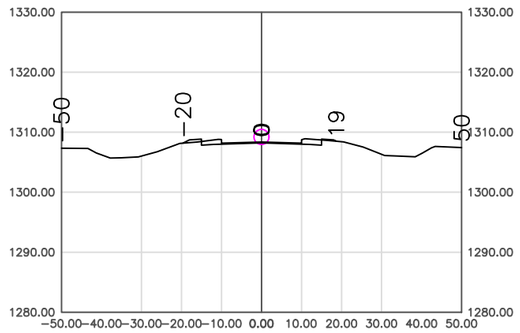
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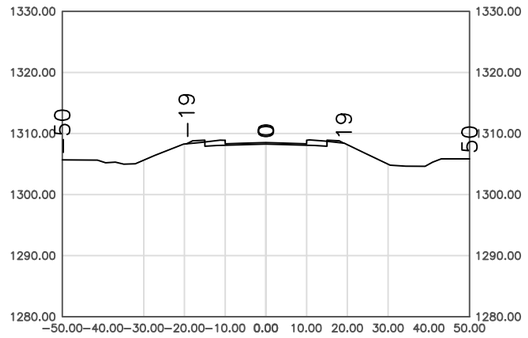
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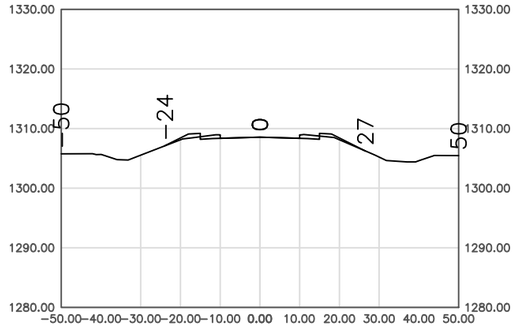
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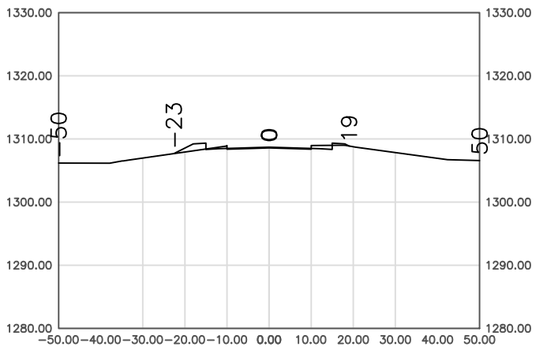
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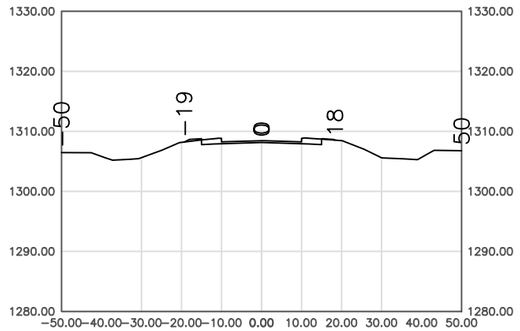
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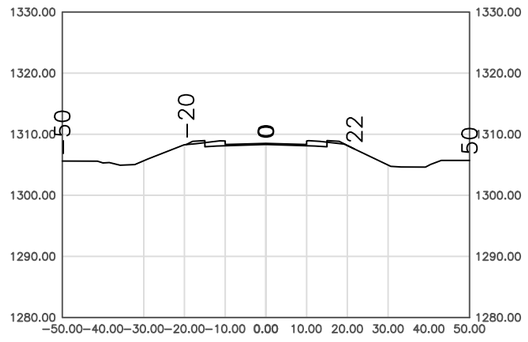
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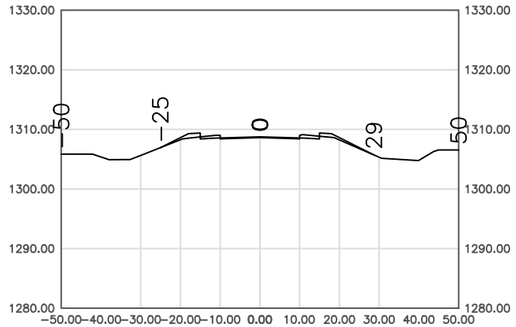
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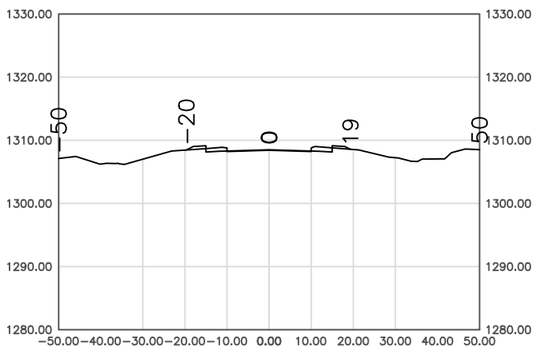
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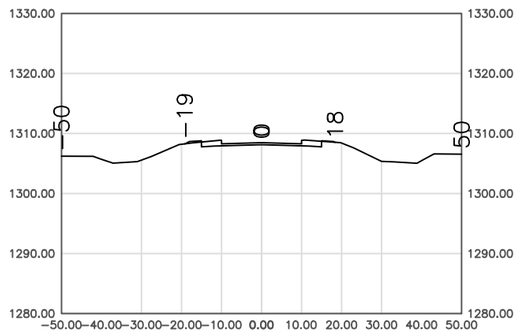
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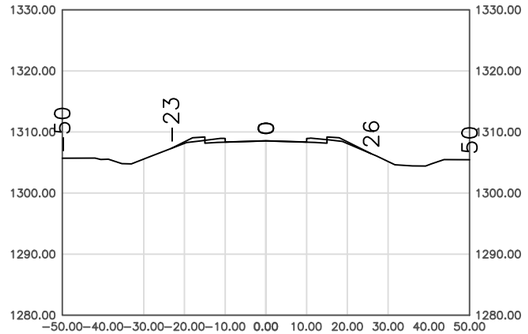
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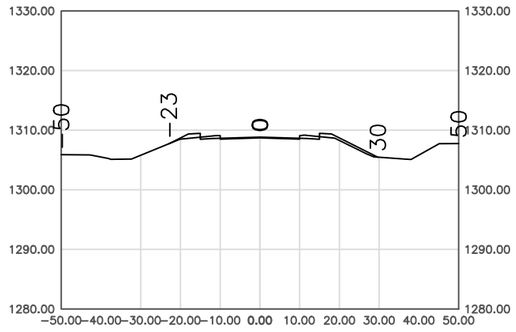
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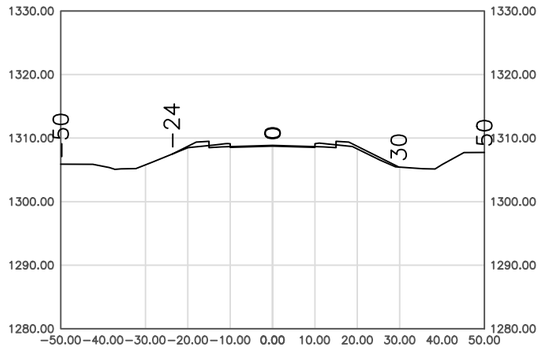
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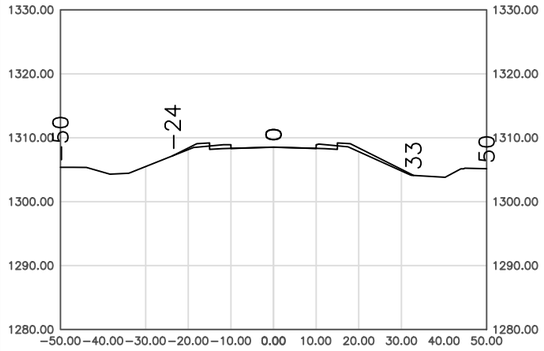
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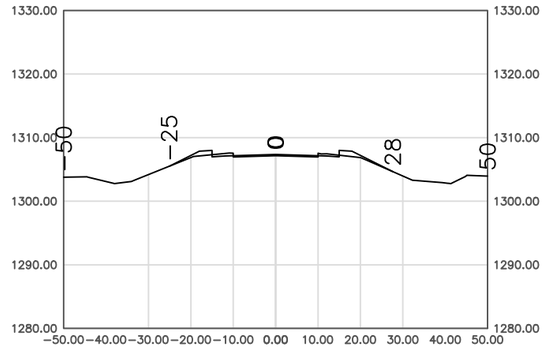
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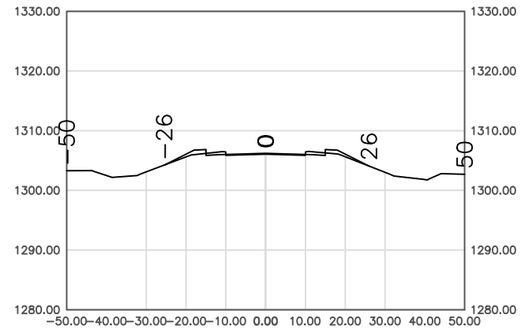
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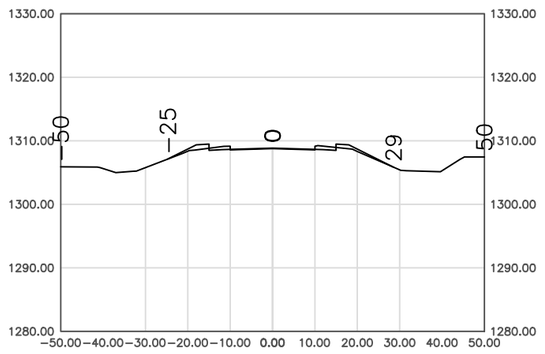
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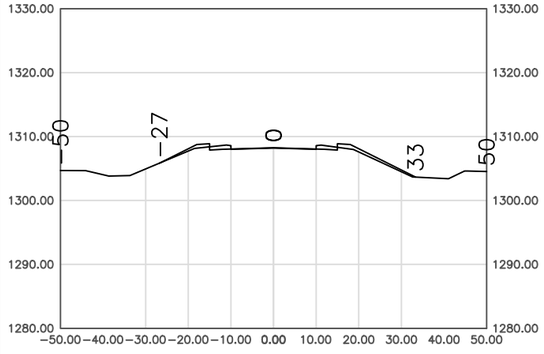
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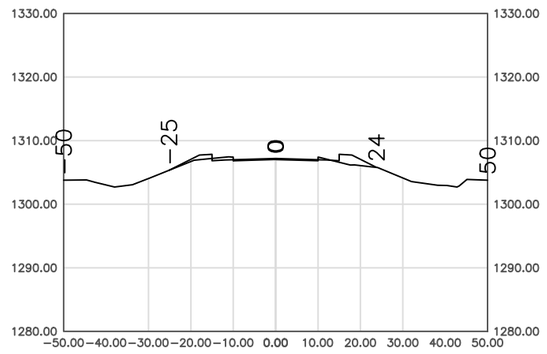
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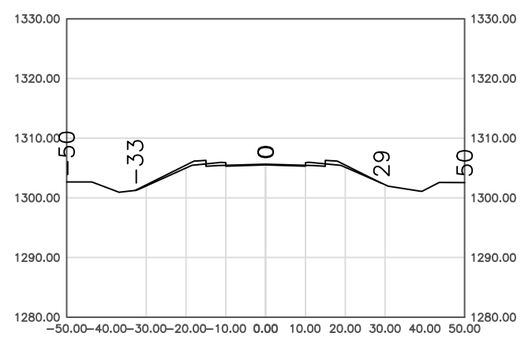
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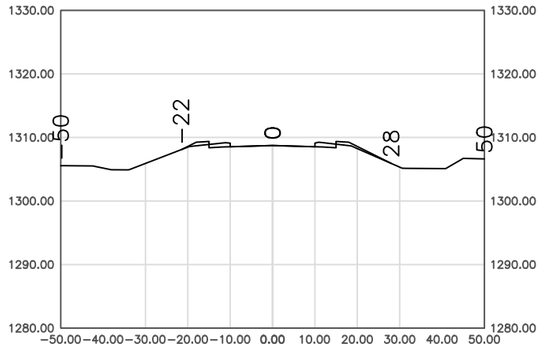
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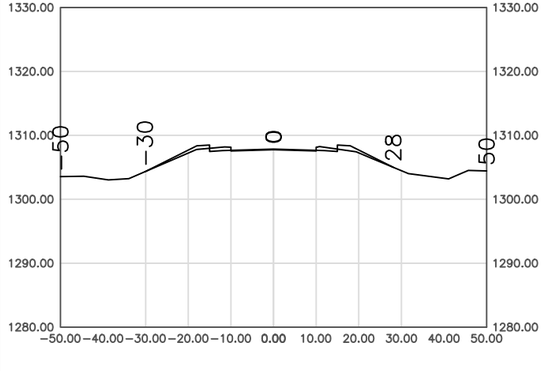
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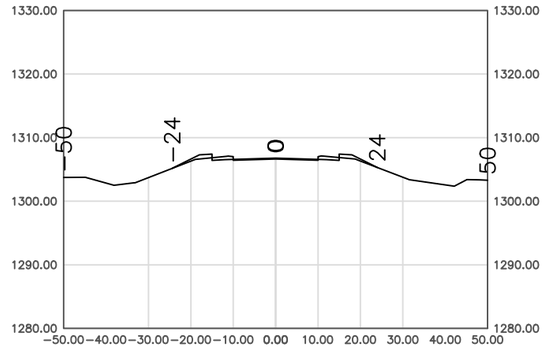
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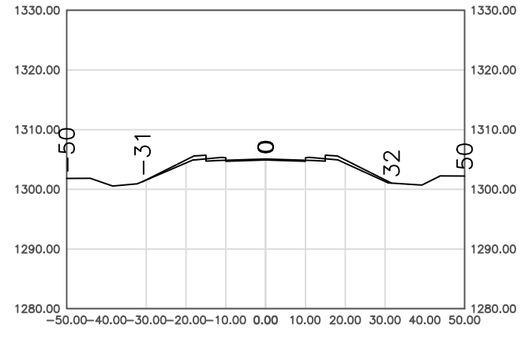
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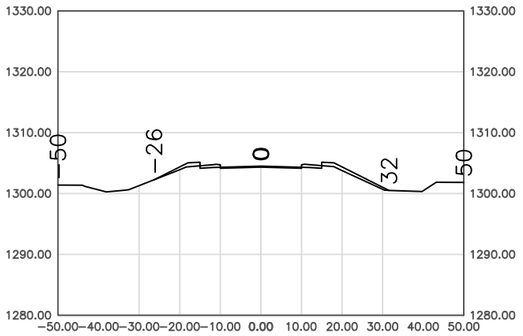
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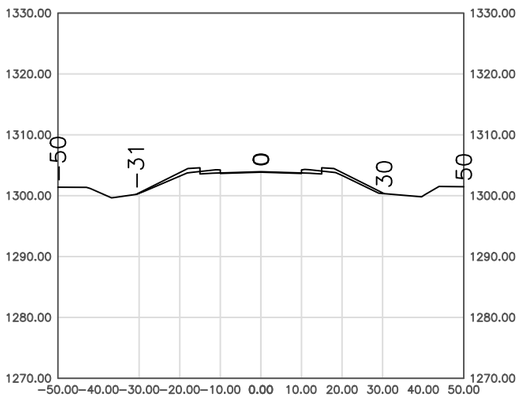
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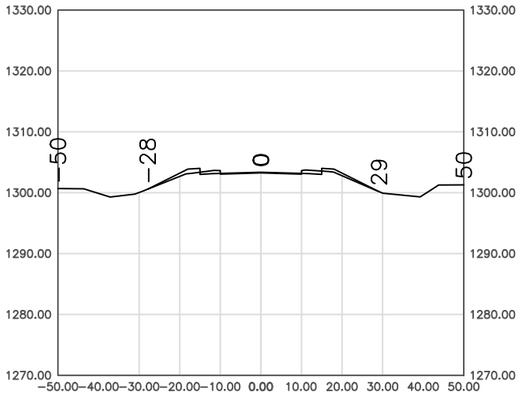
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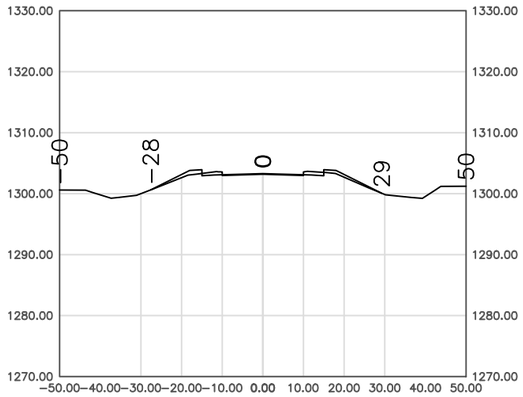
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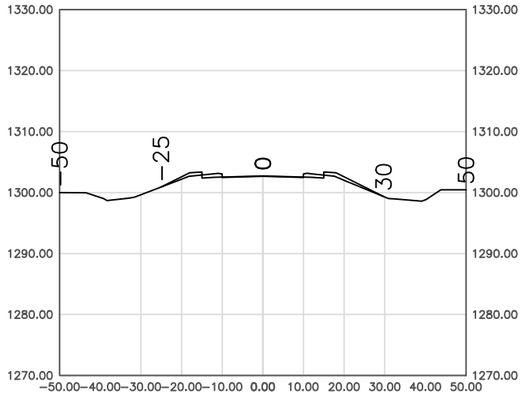
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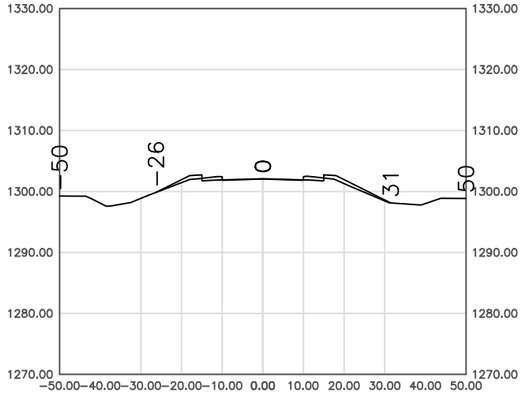
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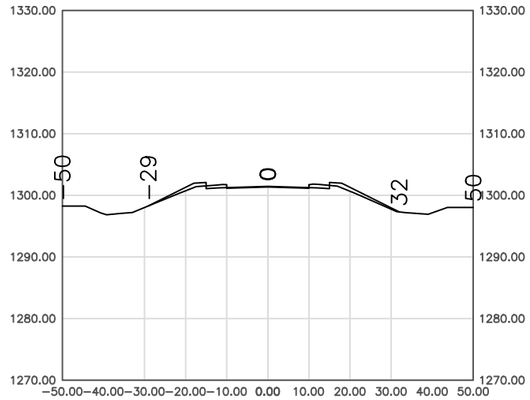
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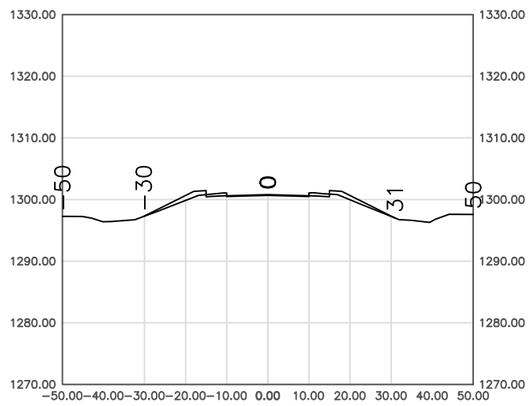
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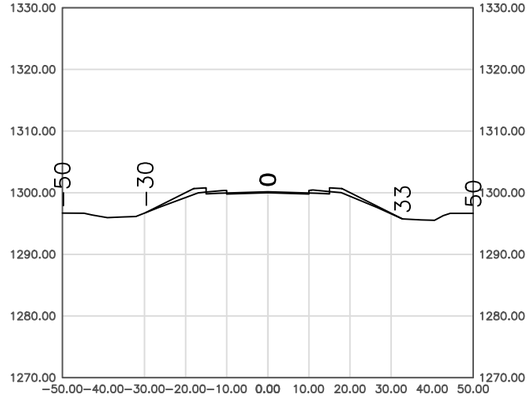
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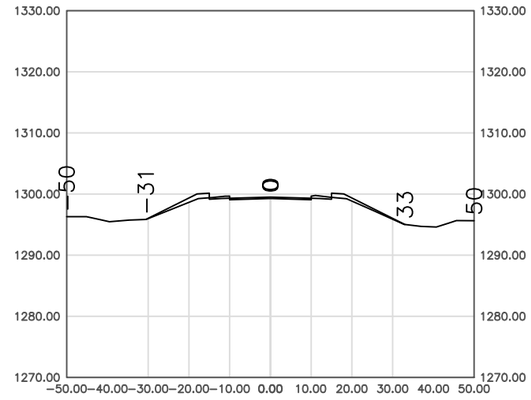
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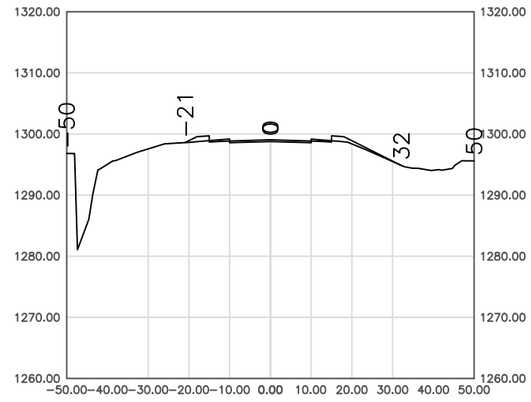
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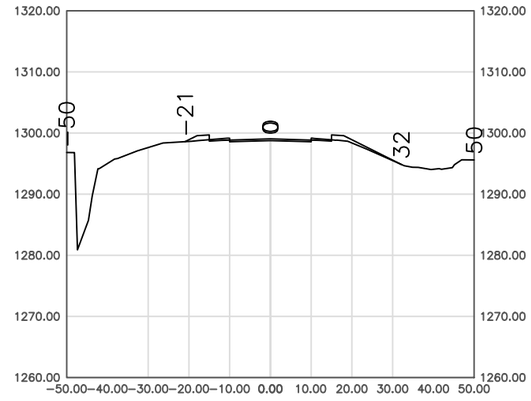
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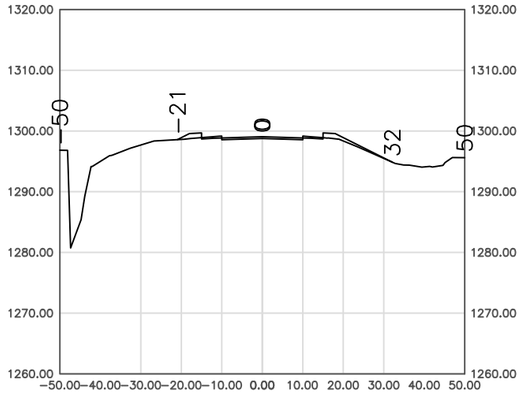
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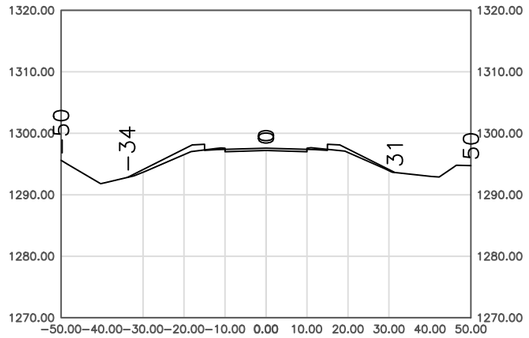
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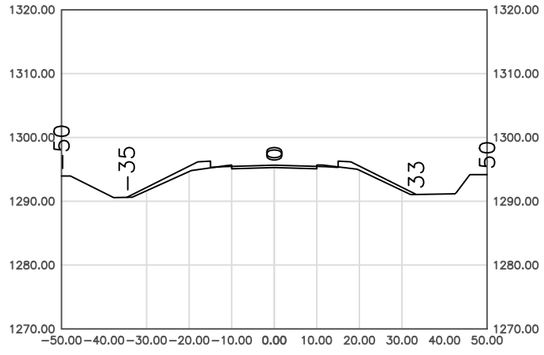
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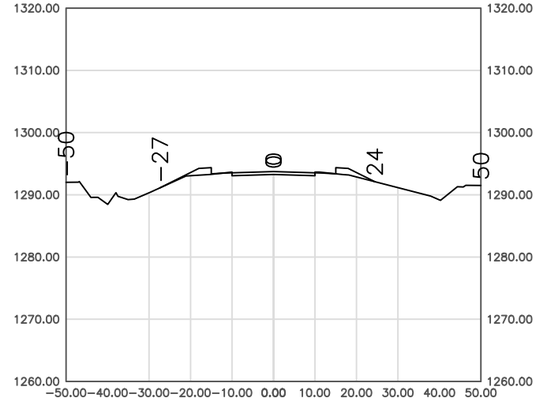
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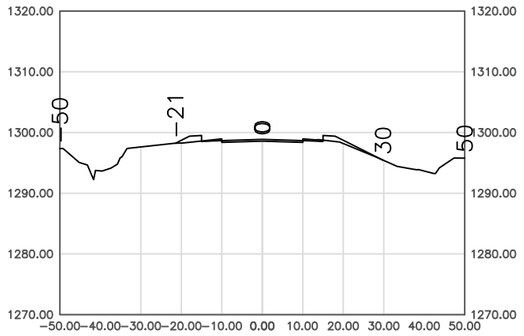
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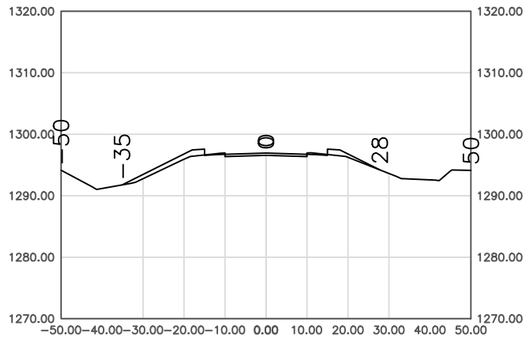
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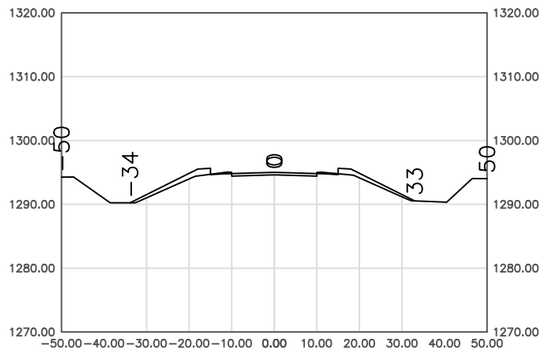
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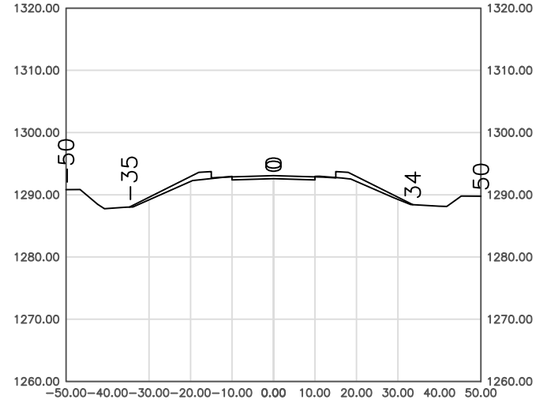
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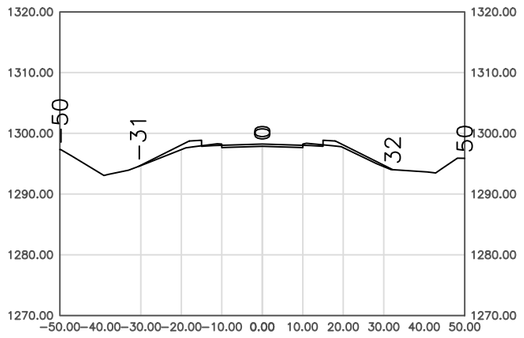
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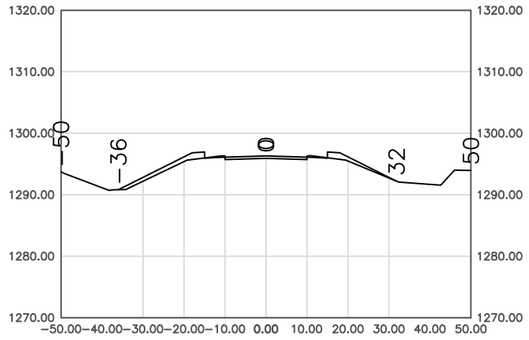
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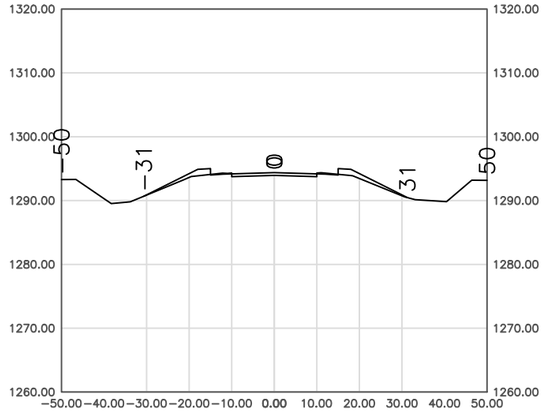
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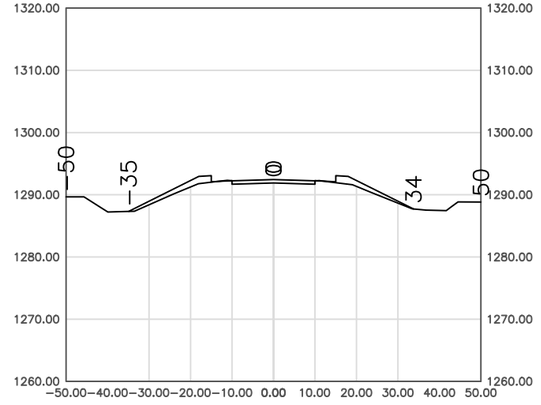
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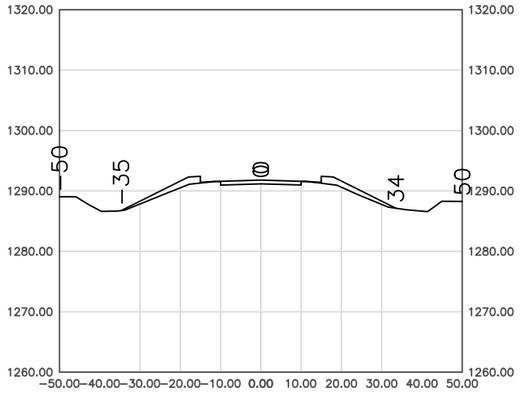
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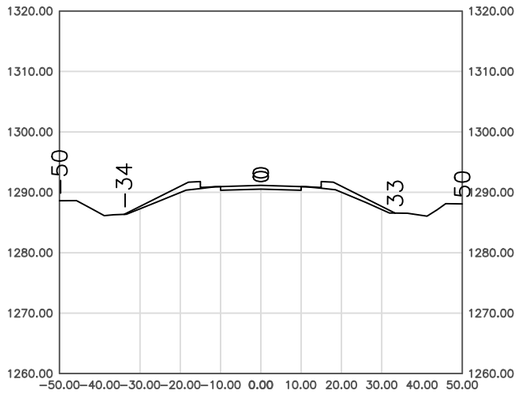
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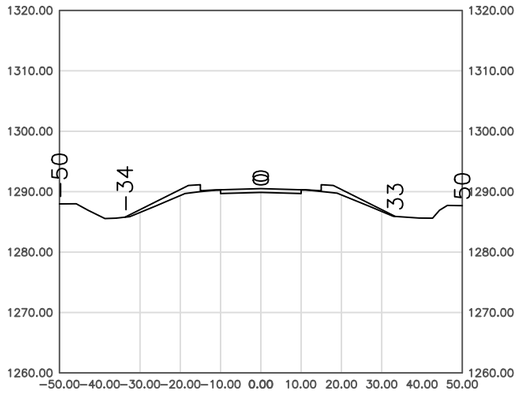
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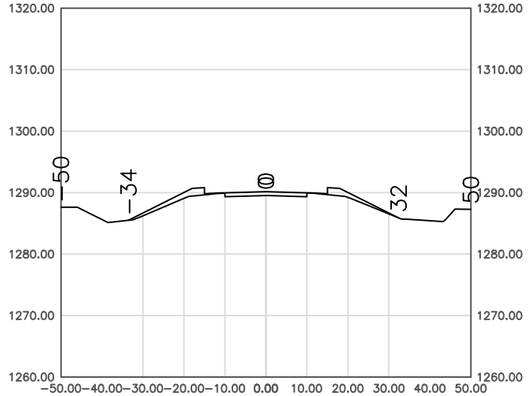
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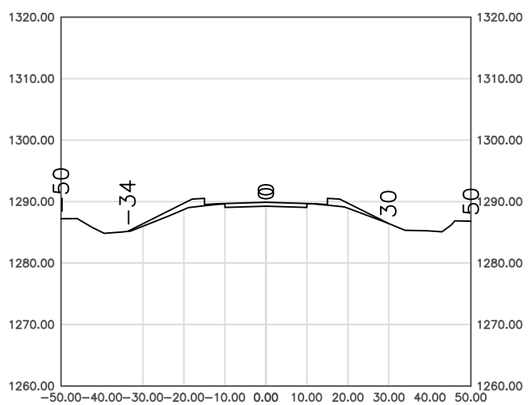
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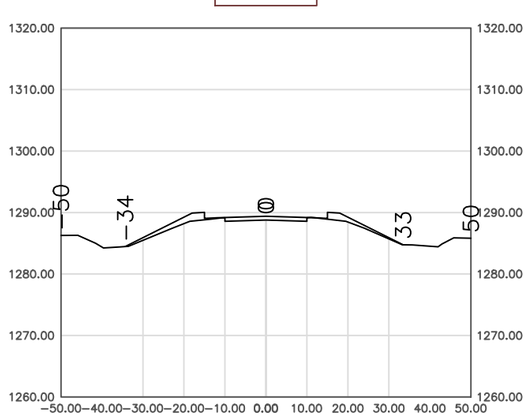
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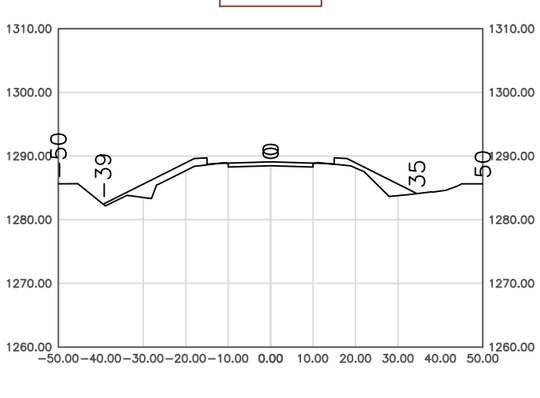
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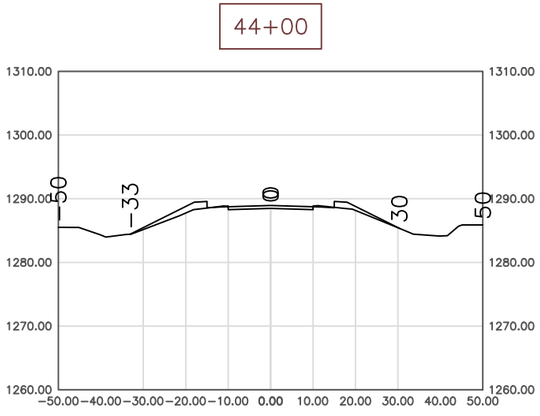
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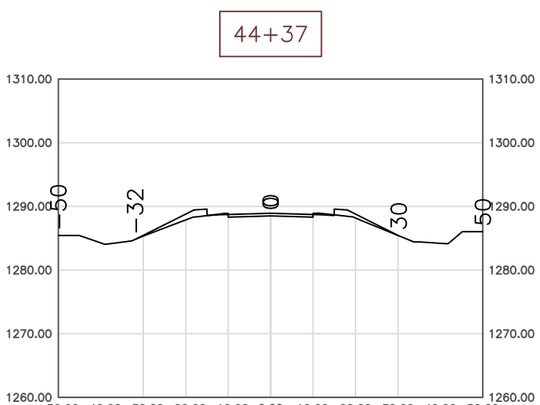
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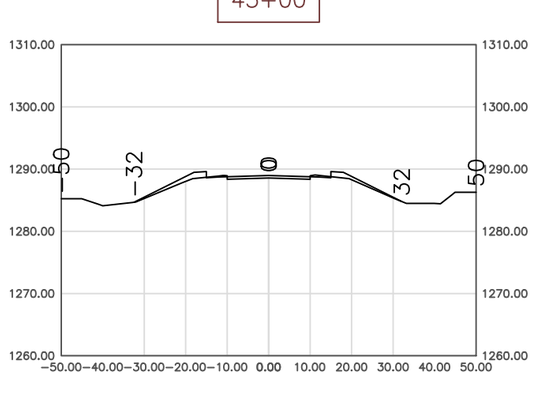
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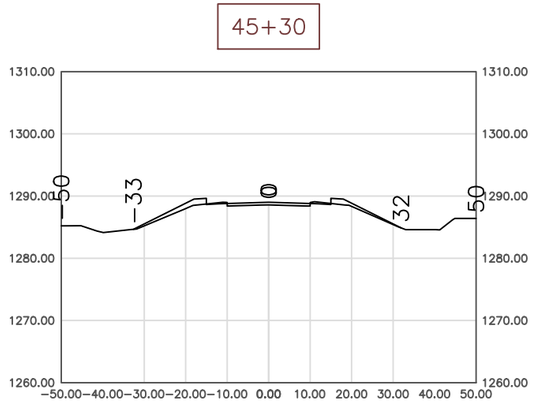
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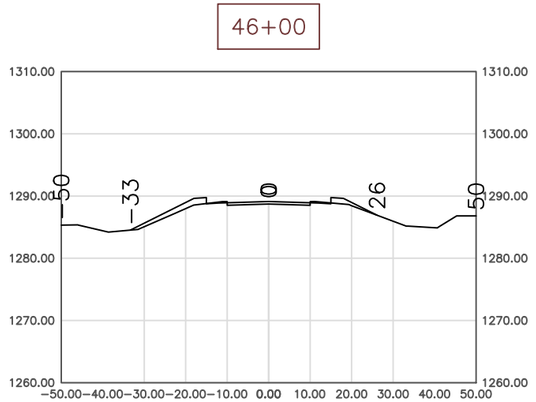
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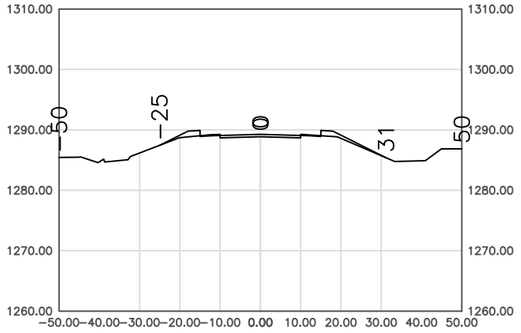
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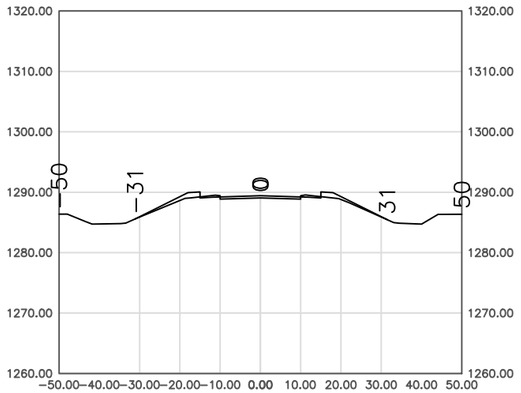
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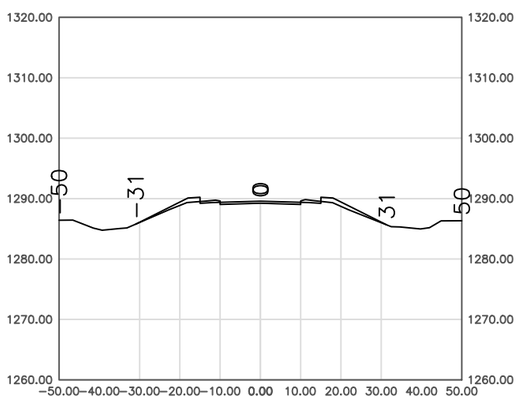
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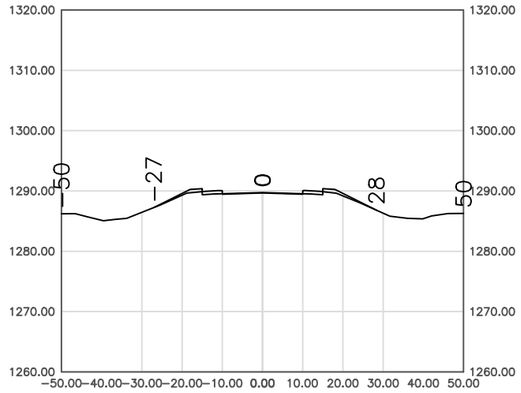
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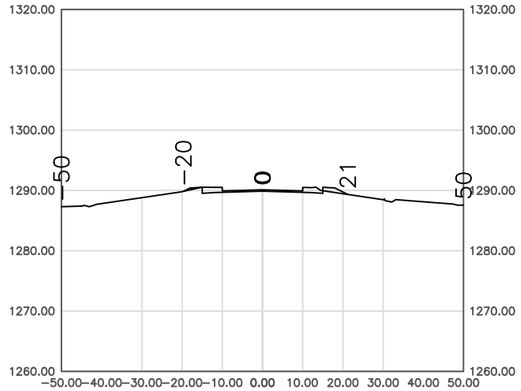
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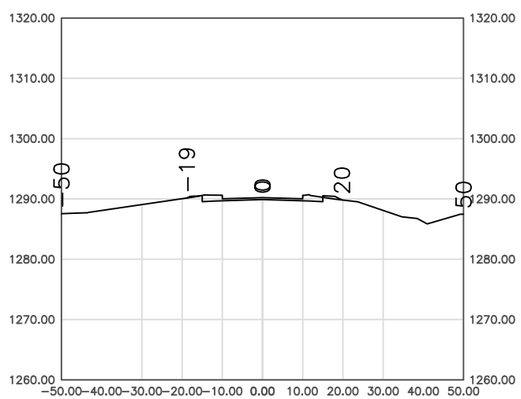
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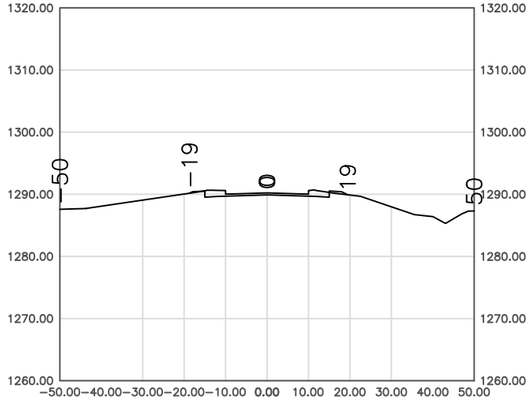
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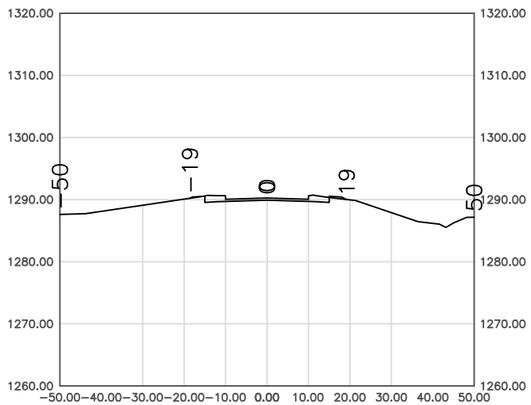
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51+09



51+09



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