

MUNICIPALITY OF ANCHORAGE
PROJECT MANAGEMENT AND ENGINEERING

**WEST BLUFF DRIVE / OCEAN DOCK ROAD AREA
STORM DRAIN IMPROVEMENTS**

ATTACHMENT C

RECORD DRAWINGS

Legend

- Confined Space
- Manhole
- Catchbasin Manhole
- Clean-Out
- Catch Basin
- OGS
- Lift Station
- Diverter
- Drywell
- Weir
- Blind Connect
- Top Intake Manhole
- Roof Drain
- Bypass Outlet
- Curb Inlet
- End of Pipe
- Pipe Inlet
- Pipe Cap
- Inlet
- Pipe Outlet
- Control Inlet
- Control Outlet
- Other
- Outfall Major
- Outfall Minor
- Sink -(Closed Drainage Basin)
- Divide
- Feature Start
- Other

Storm Pipes

- ADOT
- ADOT-Airport
- Abandoned
- Fed_Military
- MOA-ASD
- MOA-Facility Maintenance
- MOA-Merrill Field
- MOA-Other
- MOA-Parks and Recreation
- MOA-Port of Anchorage
- MOA-M&O/CBERRRSA/LRSA/SA
- Private
- SOA-Alaska Railroad
- Unknown

Thaw Wire

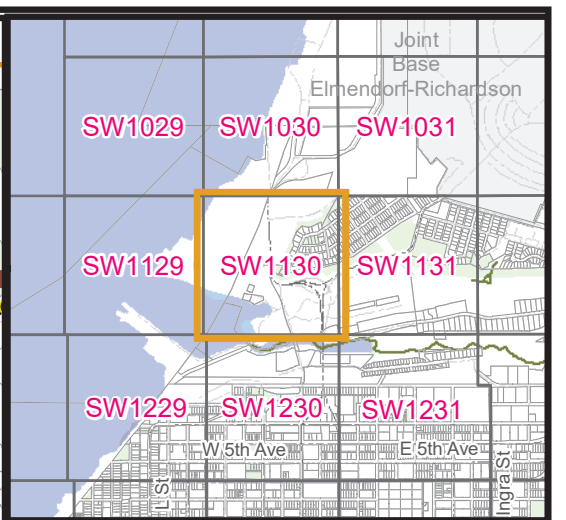
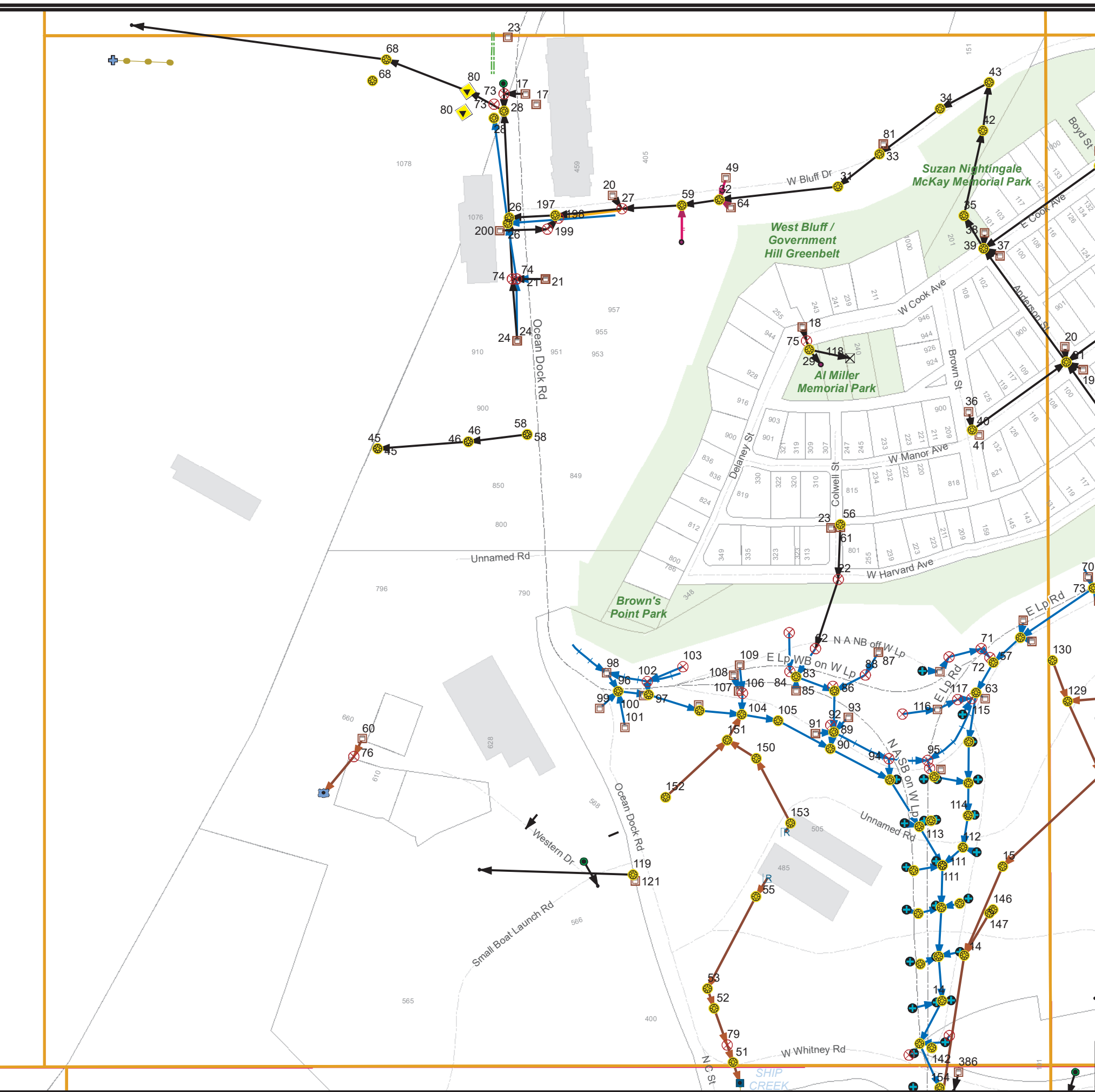
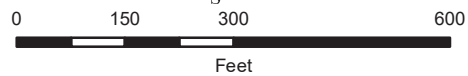
- MOA-ASD
- MOA-Facility Maintenance
- MOA-M&O/CBERRRSA/LRSA/SA
- MOA-Parks and Recreation
- Private
- Bridge

Constructed Channels

- ADOT
- MOA-M&O/CBERRRSA/LRSA/SA
- MOA-Other
- Port of Alaska; MOA-Port of Alaska
- MOA-M&O/CBERRRSA/LRSA/SA
- Private
- SOA-Alaska Railroad
- Unknown

Other Drainageways

- Other Drainageways



Anchorage Bowl
 Legal: SW 1/4 Sec 7 T13N R3W

Notes:

INFORMATION AND DATA CONTAINED ON THIS DOCUMENT IS INTENDED FOR PLANNING PURPOSES ONLY. THE MUNICIPALITY OF ANCHORAGE ASSUMES NO LIABILITY FOR DAMAGES OCCURRING AS A RESULT OF USING THIS DOCUMENT. FOR THE LATEST AND MOST UP TO DATE INFORMATION YOU ARE URGED TO CALL THE MUNICIPALITY OF ANCHORAGE BEFORE STARTING OPERATIONS.

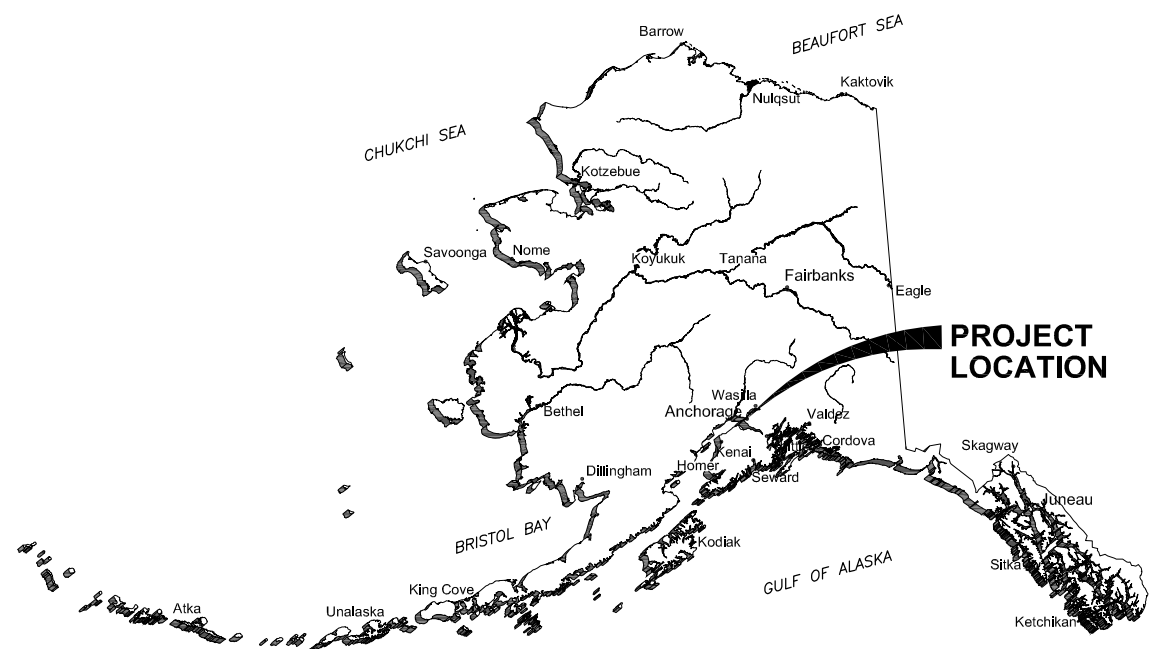
MOA
Storm Drain and
Drainage Atlas
 Map Created: 6/13/2020
 Grid Number
SW1130

PORT OF ANCHORAGE EXPANSION PROJECT

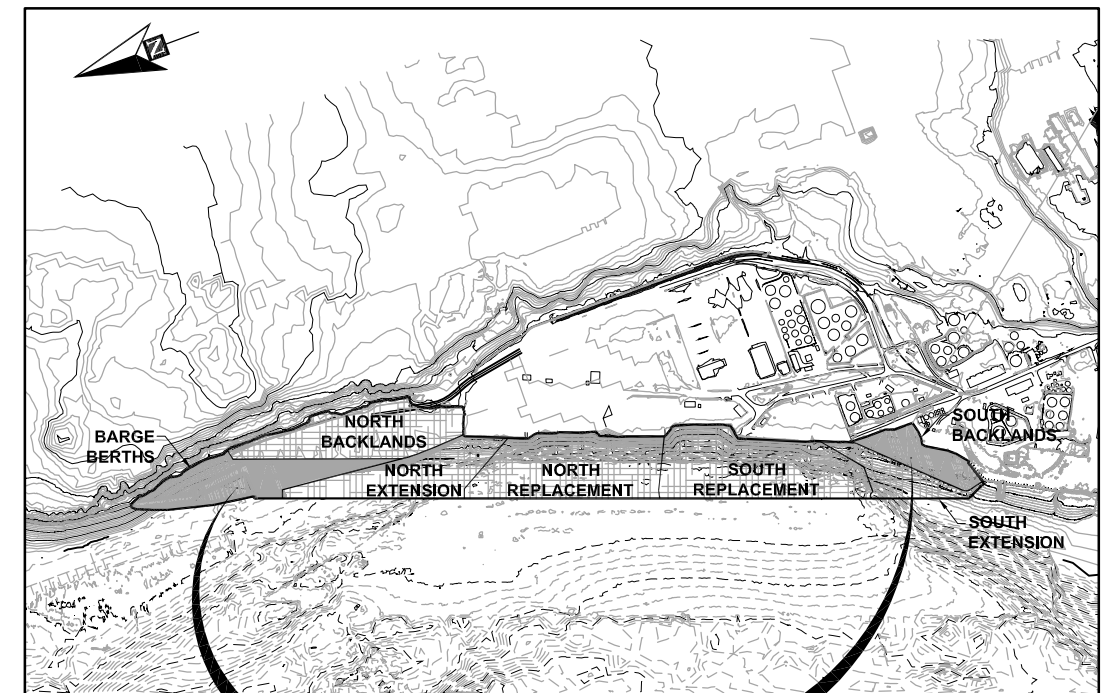
ANCHORAGE, ALASKA BARGE BERTH PHASE 2 DRAWINGS 4414-1-S100

PROJECT SHEET INDEX

SHEET TITLE	SHEET NUMBER
BARGE BERTH PHASE 2 COVER SHEET	1
BARGE BERTH PHASE 2 ESTIMATED QUANTITIES	2
BARGE BERTH PHASE 2 GENERAL NOTES (1 OF 5)	3
BARGE BERTH PHASE 2 GENERAL NOTES (2 OF 5)	4
BARGE BERTH PHASE 2 GENERAL NOTES (3 OF 5)	5
BARGE BERTH PHASE 2 GENERAL NOTES (4 OF 5)	6
BARGE BERTH PHASE 2 GENERAL NOTES (5 OF 5)	7
BARGE BERTH PHASE 2 PROJECT CONTROL	8
BARGE BERTH PHASE 2 EXISTING CONDITIONS (1 OF 2)	9
BARGE BERTH PHASE 2 EXISTING CONDITIONS (2 OF 2)	10
BARGE BERTH PHASE 2 DEMOLITION PLAN AND DETAILS	11
BARGE BERTH PHASE 2 LAYOUT	12
BARGE BERTH PHASE 2 TYPICAL SECTION C-C	13
BARGE BERTH PHASE 2 TYPICAL SECTION 13A-13A	13A
BARGE BERTH PHASE 2 TYPICAL SECTION D-D	14
BARGE BERTH PHASE 2 TYPICAL SECTION E-E	15
BARGE BERTH PHASE 2 OPEN CELL LAYOUT	16
BARGE BERTH PHASE 2 SHEET PILE SCHEDULES	17
BARGE BERTH PHASE 2 OPEN CELL END AND CORNER DETAILS	18
BARGE BERTH PHASE 2 OPEN CELL DETAILS	19
BARGE BERTH PHASE 2 OUTFALL/EXPANSION JOINT DETAILS	20
BARGE BERTH PHASE 2 CAP PLAN	21
BARGE BERTH PHASE 2 CAP LAYOUTS	22
BARGE BERTH PHASE 2 CAP DETAILS (1 OF 3)	23
BARGE BERTH PHASE 2 CAP DETAILS (2 OF 3)	24
BARGE BERTH PHASE 2 CAP DETAILS (3 OF 3)	25
BARGE BERTH PHASE 2 VIBRACOMPACTION PLAN	26
BARGE BERTH PHASE 2 VIBRACOMPACTION DETAILS	27
BARGE BERTH PHASE 2 GRADING (1 OF 2)	28
BARGE BERTH PHASE 2 GRADING (2 OF 2)	29
BARGE BERTH PHASE 2 DRAINAGE	30
BARGE BERTH PHASE 2 SCHEDULES	31
BARGE BERTH PHASE 2 DRAINAGE DETAILS	32
BARGE BERTH PHASE 2 SOUTH BACKLANDS GRADING/DRAINAGE PLAN	33
BARGE BERTH PHASE 2 SOUTH BACKLANDS GRADING/DRAINAGE SECTION	34



STATE OF ALASKA



PORT OF ANCHORAGE VICINITY

OPEN CELL® AND OPEN CELL SHEET PILE® ARE REGISTERED TRADEMARKS OF PND ENGINEERS, INC. THE OPEN CELL SYSTEM IS PATENTED
 PATENT - US 6,715,964 B2
 PATENT - US 7,018,141 B2
 PATENT - US 7,488,140 B2

This drawing, including the principle of design, is the intellectual property of PND Engineers, Inc. and is submitted with the agreement that it is not to be reproduced, copied or used in any other matter than its intended use on this project, and further, shall not be used in any manner that would be detrimental to PND. Use of this drawing and the associated design principles is construed as acceptance to this agreement and provisions.



421 West First Avenue, Suite 200
 Anchorage, Alaska 99501
 (907) 561-4272
 www.ICRCsolutions.com



RECORD DOCUMENT

THIS RECORD DOCUMENT HAS BEEN PREPARED FROM INFORMATION PROVIDED BY THE CONTRACTOR, FROM CONSTRUCTION CORRESPONDENCE AND SURVEY INFORMATION PROVIDED BY OTHERS. THERE IS NO GUARANTEE AS TO THE ACCURACY OR COMPLETENESS OF THE INFORMATION CONTAINED HEREIN.

REV	DATE	DESCRIPTION
	9/2/10	RECORD DRAWING SET



DATE: _____

1506 West 36th Avenue
 Anchorage, Alaska 99503
 Phone: 907.561.1011
 Fax: 907.563.4220
 www.pndengineers.com



PROJECT: PORT OF ANCHORAGE
 EXPANSION PROJECT

TITLE: BARGE BERTHS PHASE 2 AS-BUILT
 COVER SHEET

DESIGNED BY: GH DATE: 1/8/08
 CHECKED BY: DN PROJECT NO: 61028

SHEET NO: 1 OF 35

ABBREVIATIONS

AC	ASPHALT CONCRETE
ACI	AMERICAN CONCRETE INSTITUTE
ADOT	ALASKA DEPARTMENT OF TRANSPORTATION AND PUBLIC FACILITIES
ALUM	ALUMINUM
ANSI	AMERICAN NATIONAL STANDARDS INSTITUTE
AVE	AVENUE
AWS	AMERICAN WELDING SOCIETY
BOP	BEGINNING OF PROJECT
CJP	COMPLETE JOINT PENETRATION
CL	CENTERLINE
CPEP	CORRUGATED POLYETHYLENE PIPE
CPP	CORRUGATED PLASTIC PIPE
CMP	CORRUGATED METAL PIPE
CWI	CERTIFIED WELDING INSPECTOR
CY	CUBIC YARDS
DENS	DENSITY
DFT	DRY FILM THICKNESS
DIA	DIAMETER
DIP	DUCTILE IRON PIPE
DOR	DEVELOPMENT OPERATIONS AND RECLAMATION
EAFB	ELMENDORF AIR FORCE BASE
EL	ELEVATION
EOP	END OF PROJECT
FB	FLAT BAR
F&I	FURNISH AND INSTALL
FH	FIRE HYDRANT
FT	FOOT
GRAD	GRADATION
GVW	GROSS VEHICLE WEIGHT
HDC	HOT DIP GALVANIZE
HDPE	HIGH DENSITY POLYETHYLENE PIPE
HLS	HORIZONTAL LONG SLOT
HSS	HOLLOW STEEL SECTION
ICRC	INTEGRATED CONCEPTS AND RESEARCH CORPORATION
IN	INCH
JCR	JOB CONTROL RECORD
L	ANGLE
LF	LINEAR FEET
MAX	MAXIMUM
MHHW	MEAN HIGHER HIGH WATER
MHW	MEAN HIGH WATER
MLLW	MEAN LOWER LOW WATER
MIN	MINIMUM
MT	MAGNETIC PARTICLE TEST
NDT	NON DESTRUCTIVE TESTING
NFS	NON-FROST SUSCEPTIBLE
OC	ON CENTER
OCSP	OPEN CELL SHEET PILE
OSHA	OCCUPATIONAL SAFETY AND HEALTH ADMINISTRATION
P	PIPE
PI	POINT OF INTERSECTION
PL	PLATE
POA	PORT OF ANCHORAGE
QA	QUALITY ASSURANCE
QC	QUALITY CONTROL
r	RADIUS
RD	ROAD
RQD	REQUIRED
SBC	STANDARD BRASS CAP
SDMH	STORM DRAIN MANHOLE
SDR	STANDARD DIAMETER RATIO
SPT	STANDARD PENETRATION TEST
SSPC	STRUCTURAL STEEL PAINTING COUNCIL
STA	STATION
t	THICKNESS
TYP	TYPICAL
TSC	THERMAL SPRAY COATING
USACE	UNITED STATES ARMY CORP OF ENGINEERS
UHMW	ULTRA HIGH MOLECULAR WEIGHT POLYETHYLENE
UNO	UNLESS NOTED OTHERWISE
UT	ULTRASONIC TEST
UTIL	UTILITY
VT	VISUAL TEST
W/	WITH
WPS	WELDING PROCEDURE SPECIFICATIONS

LEGEND

EXISTING	PROPOSED	
		NATURAL GAS LINE
		FUEL PIPELINE
		UNDERGROUND SANITARY SEWER LINE
		FOUNDATION DRAIN
		STORM DRAIN LINE
		UNDERGROUND WATER LINE
		UNDERGROUND ELECTRICAL LINE
		UNDERGROUND TELEPHONE LINE
		UNDERGROUND TELEVISION LINE
		ABOVE GROUND CEMENT PIPELINE
		SLOPE
		CHAIN LINK FENCE
		ELECTRIC MANHOLE
		TRAFFIC J BOX
		STORM DRAIN MANHOLE
		STORM DRAIN CATCH BASIN
		FIRE HYDRANT
		SOIL PENETRATION TEST LOCATION
		BORE HOLE LOCATION
		SANITARY SEWER MANHOLE
		PROPERTY LINE
		EASEMENT
		STORM DRAIN INLET
		SANITARY SEWER CLEANOUT
		KEY BOX / WATER VALVE
		ASPHALT SWALE / GRADE BREAK
		DRAINAGE ARROW
		ASPHALT PAVEMENT
		CONCRETE PAVEMENT
		5/8" REBAR
		BENCH MARK
		MONUMENT / PERMANENT PROJECT CONTROL MONUMENT
		PROJECT CONTROL POINT
		LAYOUT CONTROL POINT
		SURVEY TARGET
		LIGHT POLE
		TELEPHONE PEDESTAL
		TELEVISION PEDESTAL
		ELECTRIC PEDESTAL
		TRANSFORMER
		INDICATES TYPE OF SIGN
		OIL WATER SEPARATOR

NOTE:
INDIVIDUAL SHEETS MAY HAVE THEIR OWN LEGENDS WITH ADDITIONAL SYMBOLS THAT APPLY TO THOSE SHEETS.

ESTIMATE OF QUANTITIES				
NO.	PAY ITEM	UNIT	QUANTITY	NOTES
11	SHEET PILES PS31	TON	1,131.4	SEE NOTE 2
11	SHEET PILES PS27.5	TON	1,245.9	SEE NOTE 2
11	SHEET PILE WYES	TON	39.6	SEE NOTE 2
11	SHEET PILE INTERMEDIATE ANCHORS	TON	28.3	SEE NOTE 2
11	SHEET PILE END ANCHORS	TON	39.4	SEE NOTE 2
13	GRANULAR FILL- BARGE BERTH	CUBIC YARD	106,000	
13	GRANULAR FILL- SOUTH BACKLANDS	CUBIC YARD	74,000	
18	SALVAGE ROCK	CUBIC YARD	16,000	
20	VIBRACOMPACTION PROBES	EACH	1,220	
21	VIBRACOMPACTION FILL/COARSE FILL	CUBIC YARD	8,540	
22	GEOTECH DRILLING FOR VIBRACOMPACTION	EACH	45	
23	36" CPEP	LF	40	
23B	24" CPEP	LF	1,427	
24A	MANHOLES- TYPE I	EACH	5	
24B	MANHOLES- TYPE II	EACH	4	
24C	OIL/GRIT SEPARATORS	EACH	1	
25	OUTFALL	EACH	1	
27	CONCRETE BARRIERS	LINEAR FOOT	325	
28	COIR LOGS	LINEAR FOOT	100	
30	HP CAP	LINEAR FOOT	675	
31	REMOVABLE BULLRAIL	LINEAR FOOT	235	
32	FIXED BULLRAIL	LINEAR FOOT	440	
33	LADDERS	EACH	3	
34	FENDERS	EACH	22	
35	PIPE RAIL	LINEAR FOOT	85	
36	BOLLARD	EACH	8	
37	LIFE RING CABINETS	EACH	2	
38	SEEDING	SQUARE YARD	12,000	

NOTES:
1. CONTRACTORS SHALL PREPARE THEIR OWN ESTIMATES. THESE QUANTITIES ARE APPROXIMATE.
2. SEE ICRC BILL OF MATERIALS FOR AVAILABLE SHEET PILE.

OPEN CELL® AND OPEN CELL SHEET PILE® ARE REGISTERED TRADEMARKS OF PND ENGINEERS, INC. THE OPEN CELL SYSTEM IS PATENTED
PATENT - US 6,715,964 B2
PATENT - US 7,018,141 B2
PATENT - US 7,488,140 B2

This drawing, including the principle of design, is the intellectual property of PND Engineers, Inc. and is submitted with the agreement that it is not to be reproduced, copied or used in any other matter than its intended use on this project, and further, shall not be used in any manner that would be detrimental to PND. Use of this drawing and the associated design principles is construed as acceptance to this agreement and provisions.



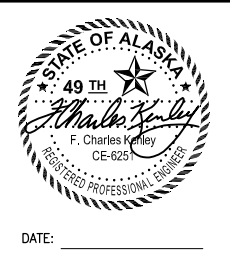
421 West First Avenue, Suite 200
Anchorage, Alaska 99501
(907) 561-4272
www.ICRCsolutions.com



RECORD DOCUMENT

THIS RECORD DOCUMENT HAS BEEN PREPARED FROM INFORMATION PROVIDED BY THE CONTRACTOR, FROM CONSTRUCTION CORRESPONDENCE AND SURVEY INFORMATION PROVIDED BY OTHERS. THERE IS NO GUARANTEE AS TO THE ACCURACY OR COMPLETENESS OF THE INFORMATION CONTAINED HEREIN.

9/2/10	RECORD DRAWING SET	
REV	DATE	DESCRIPTION



1506 West 36th Avenue
Anchorage, Alaska 99503
Phone: 907.561.1011
Fax: 907.563.4220
www.pndengineers.com

PND ENGINEERS, INC.

PORT OF ANCHORAGE EXPANSION PROJECT

BARGE BERTHS PHASE 2 AS-BUILT ESTIMATED QUANTITIES

DESIGNED BY: GH DATE: 1/8/08
CHECKED BY: DN PROJECT NO: 61028

SHEET NO: **2** OF 35

GENERAL NOTES (CONTINUED)

SAMPLING AND TESTING FREQUENCY SCHEDULE

MATERIAL	TEST	CONTRACTOR'S QC FREQUENCY	ICRC'S QA FREQUENCY
GRANULAR FILL	GRAD	1 PER 2,500 CY	1 PER 25,000 CY
	FIELD DENS	3 PER 1,000 CY	3 PER 10,000 CY
COMMON FILL	GRAD	1 PER 5,000 CY	1 PER 50,000 CY
	FIELD DENS	3 PER 2,500 CY	3 PER 25,000 CY
UTILITY FILL	GRAD	1 PER 250 CY	1 PER 2,500 CY
	FIELD DENS	3 PER 100 FT OF DITCH	3 PER 500 FT OF DITCH
VIBRACOMPACTION FILL	GRAD	1 PER 500 CY	1 PER 5,000 CY

TABLE NOTES:

- ICRC MAY INCREASE OR DECREASE QUALITY CONTROL FREQUENCY AS REQUIRED.
- A CHANGE OF MATERIAL CONSISTS OF A VISUALLY APPARENT CHANGE IN GRADATION, COLORATION, OR OTHER PHYSICAL CHARACTERISTIC OF THE MATERIAL.
- FOR PERFORMANCE TESTS WHERE MATERIAL IS CONSISTENT TO ICRC AND 10 TESTS SHOW CONSISTENT PASSING RESULTS TESTING FREQUENCY MAY BE CHANGED TO ONE TEST EVERY 5 TIMES THE QUANTITY OF THAT LISTED. IF MATERIAL CHANGES AS DEFINED IN NOTE 2 OR A TEST FAILS TO MEET SPECIFICATION, THE TESTING FREQUENCY SHALL RETURN TO THAT LISTED.

C – PILES AND PILE DRIVING INSPECTION

CONTRACTOR SHALL INSPECT ALL PILES FOR COMPLIANCE WITH THE SPECIFICATION REQUIREMENTS. BRING ANY UNUSUAL PROBLEMS THAT MAY OCCUR TO THE ATTENTION OF ICRC. THE CONTRACTOR SHALL INSPECT THE INTERLOCK JOINTS OF DRIVEN PILES. PILING FOUND TO HAVE IMPROPER INTERLOCK GEOMETRY OR INADEQUATE STRENGTH SHALL BE REMOVED AND REPLACED AT THE CONTRACTOR'S EXPENSE.

THE CONTRACTOR SHALL MONITOR ALL WYE PILE LOCATIONS EACH WEEK STARTING FROM PILE INSTALLATION UNTIL THE END OF THE PROJECT. MONITORING SHALL INCLUDE X, Y AND Z LOCATIONS MEASURED TO THE CLOSEST 0.01 FOOT REFERENCED TO PROJECT CONTROL.

THE CONTRACTOR SHALL SUPPLY AS-BUILT SURVEY TAIL WALL LOCATIONS TO THE CLOSEST 1 FOOT TO MINIMIZE VIBRACOMPACTION AND UTILITY CONFLICTS.

D – VIBRACOMPACTION

THE CONTRACTOR SHALL PROVIDE FULL-TIME MONITORING OF VIBRACOMPACTION PROBE OPERATIONS AND SHALL SUBMIT A WEEKLY, OR MORE FREQUENT AS NEEDED, REPORT TO ICRC. REPORT SHALL INCLUDE CONTRACTOR'S EQUIPMENT, PERSONNEL AND OTHER RELEVANT CONDITIONS. MONITORING SHALL INCLUDE: VIBRATORY HAMMER ENERGY AND FREQUENCY SETTINGS, TIME AND DEPTHS FOR EACH PROBE ADVANCE, ESTIMATED MUDLINE ELEVATION (ACCORDING TO MLLW), ESTIMATED FILL QUANTITY MOUNDED OVER THE PROBE AND AN ESTIMATE OF FILL USED FOR THE PROBE HOLE.

SEE VIBRACOMPACTION PLAN FOR SPT AND ADDITIONAL QUALITY CONTROL REQUIREMENTS. IF FILL MATERIALS FAIL TO MEET REQUIRED DENSITIES AS DETERMINED BY ICRC (FROM SPT AND GRADATIONS) ADDITIONAL VIBRACOMPACTION PROBES MAY BE REQUIRED, WHICH WILL BE PAID FOR ON A UNIT COST BASIS.

E – WELDING

THE CONTRACTOR SHALL PROVIDE A CWI TO INSPECT ALL SHOP WELDS AND ALL FIELD WELDS. ALL WELDS SHALL BE 100% VISUALLY INSPECTED. IN ADDITION 10% OF ALL CJP SHOP WELDS SHALL BE TESTED BY UT EXAMINATION OR OTHER ICRC APPROVED NDT METHODS BY AN INDEPENDENT CERTIFIED WELDING INSPECTOR. ACCEPTANCE CRITERIA FOR ALL WELD INSPECTIONS SHALL CONFORM TO THE LATEST AWS D1.1 CRITERIA FOR STATICALLY LOADED STRUCTURES. ALL SUBJECT TO APPROVAL BY ICRC.

WELDS MAY BE SPOT TESTED BY ICRC BY VT, MT OR UT AS APPROPRIATE AND THOSE FAILING SHALL BE REPAIRED AT THE CONTRACTOR'S EXPENSE, WHICH WILL ALSO INCLUDE ALL COSTS FOR RETESTING.

F – CONCRETE TESTING

CONCRETE TESTING PER ACI 318 AND AS MODIFIED BELOW:

- ALL MIX DESIGNS INCLUDING ALL REQUIRED TESTS FOR AGGREGATE, CEMENT, AIR ARE PER ACI 318. MIXING MAY BE DONE OFF SITE, BUT MUST USE MATERIALS FROM THE ANTICIPATED MATERIALS SOURCES.
- FIELD TESTING OF CONCRETE SHALL CONSIST OF THE FOLLOWING:
 - SLUMP – EACH TRUCKLOAD
 - ENTRAINED AIR – EVERY 50 YARDS OR EVERY POUR, WHICHEVER IS THE LESSER.
 - COMPRESSION TESTS – FOUR 6" DIAMETER x12" CYLINDERS TAKEN EVERY 50 YARDS, OR EVERY POUR, WHICHEVER IS THE LESSER AND TESTED: ONE AT 7 DAYS, AND TWO AT 28 DAYS. THE REMAINING CYLINDER SHALL BE RETAINED UNTIL THE END OF THE PROJECT.
- CONCRETE FAILING THE REQUIRED TESTS SHALL NOT BE USED ON THE PROJECT. IF ALREADY INCORPORATED INTO THE PROJECT, THE CONCRETE SHALL BE SUBJECT TO FURTHER TESTS AS DETERMINED BY ICRC, AND IF FAILING SHALL BE REMOVED FROM THE STRUCTURE.
- THE TESTING PERSONNEL SHALL BE RESPONSIBLE FOR COLLECTING ALL CONCRETE BATCH TICKETS AND IMMEDIATELY REPORTING CONFORMANCE WITH THE MIX DESIGN TO ICRC.

G – THERMAL SPRAY METALLIZING

THE CONTRACTOR'S TSC INSPECTOR SHALL CONTINUOUSLY INSPECT AND ACCEPT OR REJECT INTERIM AND COMPLETED WORK PRODUCT.

TSC INSPECTOR SHALL CONFIRM THAT THE EQUIPMENT SETTINGS ARE IN ACCORDANCE WITH EQUIPMENT MANUFACTURERS REQUIREMENTS. START-UP AND ADJUSTMENT SHALL BE MADE OFF OF THE SHEET PILE. THE FOLLOWING REQUIREMENTS SHALL BE SATISFIED OR WORK SHALL BE REJECTED, REPAIRED AND RE-INSPECTED. RECORD THE LOCATION AND VALUES OF ALL TESTS PERFORMED. BLASTED SURFACES SHALL BE INSPECTED AND MEASURED FOR PROFILE AND CLEANLINESS.

CONDUCT A SOLVENT EVAPORATION TEST OR HEAT TEST AS FOLLOWS:

- THE SOLVENT TEST IS MADE BY APPLYING SEVERAL DROPS OF RESIDUE-LESS SOLVENT SUCH AS TRI-CHLOROMETHANE, ON THE AREAS SUSPECTED OF OIL AND GREASE RETENTION. AN EVAPORATION RING WILL FORM IF THERE IS OIL OR GREASE CONTAMINATION.
- THE HEAT TEST IS MADE BY USING A TORCH TO HEAT THE DEGREASED METAL TO 225 DEG F. RESIDUE OIL/GREASE CONTAMINATION IS DRAWN TO THE METAL SURFACE AND IS VISUALLY APPARENT. CONTINUE DEGREASING UNTIL THE TEST IS PASSED.

THE SURFACE PROFILE SHALL BE MEASURED USING A SURFACE PROFILE COMPARATOR, REPLICA TAPE WITH SPRING DIAL ANVIL MICROMETER WITH A DEPTH MICROMETER OR OTHER METHOD SUITABLE FOR THE ABRASIVE BEING USED IN ACCORDANCE WITH ASTM D4417, STANDARD MEASUREMENT OF SURFACE PROFILE OF BLAST CLEANED STEEL.

METAL COATING THICKNESS SHALL BE MEASURED IN ACCORDANCE WITH SSPC-PA 2, USING A MUTUALLY APPROVED MAGNETIC THICKNESS OR EDDY CURRENT GAUGE. THE FINAL COATING THICKNESS AT ANY POINT SHOULD NOT BE LESS THAN 75% OF THE SPECIFIED THICKNESS. THE APPLICATOR SHOULD ADD METAL TO DEFICIENT AREAS WITHIN THE SAME WORK DAY.

THE COATING SHALL BE FIRMLY ADHERED IN ACCORDANCE WITH THE "VISUAL EXAMINATION REQUIREMENTS OF DOD-STD-2138(SH); I.E., FREE OF SPOTS, LUMPS, BLISTERS, CHIPS OR LOOSELY ADHERING PARTICLES, ETC.

CHISEL TEST – THE SURFACE COATING SHALL BE CUT WITH A KNIFE OR A CHISEL. IF UPON DOING SO ANY PART OF THE COATING LIFTS AWAY FROM THE BASE METAL 0.25 INCHES OR MORE AHEAD OF THE CUTTING BLADE WITHOUT CUTTING THE METAL, THEN THE BOND IS DEFECTIVE. IF ANY AREA OF THERMAL SPRAYED COATING 1/2 INCH SQUARE OR LARGER CAN BE LIFTED FROM THE BASE WITH A KNIFE OR CHISEL, WITHOUT CUTTING THE METAL AWAY, THE COATING IS DEFECTIVE. DEFECTIVE AREAS SHALL BE BLASTED CLEAN PRIOR TO RE-SPRAYING, EXCEPT WHERE REJECTION IS FROM INADEQUATE THICKNESS. ADDITIONAL SPRAYED MATERIAL MAY BE ADDED IF THE SURFACE IS DRY AND FREE FROM VISIBLE CONTAMINATION OR SURFACE DAMAGE.

INSPECTOR SHALL VISUALLY VERIFY THAT SEAL COAT HAS THOROUGHLY COVERED AND PENETRATED THE METALLIZING.

TENSION (PULL-OFF) ADHESION TEST – ASTM C633, STANDARD TEST METHOD FOR ADHESION OR COHESIVE STRENGTH OF FLAME SPRAYED COATINGS. ASTM D4551, PULL-OFF STRENGTH OF COATINGS USING PORTABLE ADHESION TESTERS. MINIMUM TENSION SHALL BE 1000 PSI.

INSPECTIONS	QC FREQUENCY
REPLICA TAPE THICKNESS	1 PER DAY
KNIFE/CHISEL	1 PER DAY
TENSION	1 PER DAY
MANDREL	3 PER PROJECT

QUALITY ASSURANCE TESTING SHALL BE PERFORMED ON A 10QC TO 10A BASIS.

H – HOT DIP GALVANIZING

THE GALVANIZER SHALL REMOVE ALL DROSS FROM THE INTERLOCKS. INTERLOCKS SHALL PROVIDE FULL FUNCTION AFTER GALVANIZING. THE GALVANIZER SHALL "RUN" INTERLOCKS WITH SECTION OF MATING SHEET PILE INTERLOCK THE FULL LENGTH OF ALL INTERLOCKS.

7. QUALITY ASSURANCE

A – GENERAL

ICRC OR ICRC'S REPRESENTATIVE MAY PROVIDE QUALITY ASSURANCE IN ACCORDANCE WITH SPECIFICATION, AND SHALL PROVIDE THE FOLLOWING MINIMUM ADDITIONAL QUALITY ASSURANCE INSPECTIONS. THE CONTRACTOR SHALL PROVIDE TRANSPORTATION FOR OFFSHORE QUALITY ASSURANCE ACTIVITIES.

B – FILL PLACEMENT

FULL TIME FILL PLACEMENT INSPECTION WILL BE PROVIDED DURING ALL FILLING OPERATIONS.

C – PILE INSPECTION

SUBMIT SAMPLES TO ICRC FOR TESTING.

D – PILE DRIVING

FULL TIME CONTINUOUS INSPECTION MAY BE PROVIDED DURING PILE DRIVING AND A PILE DRIVING RECORD SHALL BE PROVIDED FOR EACH SHEET. RECORD SHALL INDICATE: INSTALLATION DATE AND TIME, TYPE AND SIZE OF HAMMERS, RATE OF OPERATION, TOTAL DRIVING TIME, DIMENSION OF DRIVING HELMET AND CAP IF USED, RESISTANCE IN BLOWS PER FOOT OR TIME TO DRIVE PER FOOT FOR EACH FIVE FEET OF PENETRATION, FINAL DRIVING RESISTANCE FOR LAST FOOT OF DRIVING, PILE LOCATIONS, TIP ELEVATIONS, GROUND ELEVATION, AND ANY FRESH HEADING, CUTTING OR SPLICING OF SHEET PILES. RECORD ANY UNUSUAL PILE DRIVING PROBLEMS DURING DRIVING. ICRC MAY INSPECT PILES DOWN TO THE MUDLINE WITH DIVERS.

E – VIBRACOMPACTION

FULL-TIME INSPECTION WILL BE REQUIRED DURING SPT MONITORING AND TESTING, OPTIMIZATION, AND VIBRACOMPACTION STARTUP. PERIODIC INSPECTION MAY BE PROVIDED DURING PRODUCTION COMPACTION.

F – WELDING

ICRC WILL PROVIDE 100% VISUAL INSPECTION OF FIELD WELDS. ANY WELD FAILING INSPECTION SHALL BE REPAIRED AT THE CONTRACTOR'S EXPENSE, WHICH WILL INCLUDE THE COST FOR RETESTING. ICRC MAY PROVIDE ADDITIONAL INSPECTION OF SHOP AND FIELD WELDS AS REQUIRED. THE CONTRACTOR SHALL BE RESPONSIBLE FOR ALL REPAIRS AND RETESTING EXPENSE REQUIRED AS A RESULT OF ADDITIONAL OWNER INSPECTIONS.

IN ADDITION TO OTHER TESTING, 10% OF ALL CJP SHOP WELDS MAY BE TESTED BY UT EXAMINATION BY ICRC.

G – DRAINAGE STRUCTURES AND ELEMENTS

PERIODIC INSPECTION MAY BE PROVIDED.

H – GALVANIZING AND THERMAL SPRAY METALLIZING

GALVANIZING AND THERMAL SPRAY METALLIZING MAY REQUIRE PART-TIME INSPECTION IN ACCORDANCE WITH THE SCHEDULE ABOVE.

OPEN CELL® AND OPEN CELL SHEET PILE® ARE REGISTERED TRADEMARKS OF PND ENGINEERS, INC. THE OPEN CELL SYSTEM IS PATENTED PATENT – US 6,715,964 B2 PATENT – US 7,018,141 B2 PATENT – US 7,488,140 B2

This drawing, including the principle of design, is the intellectual property of PND Engineers, Inc. and is submitted with the agreement that it is not to be reproduced, copied or used in any other matter than its intended use on this project, and further, shall not be used in any manner that would be detrimental to PND. Use of this drawing and the associated design principles is construed as acceptance to this agreement and provisions.



421 West First Avenue, Suite 200
Anchorage, Alaska 99501
(907) 561-4272
www.ICRCsolutions.com



RECORD DOCUMENT

THIS RECORD DOCUMENT HAS BEEN PREPARED FROM INFORMATION PROVIDED BY THE CONTRACTOR, FROM CONSTRUCTION CORRESPONDENCE AND SURVEY INFORMATION PROVIDED BY OTHERS. THERE IS NO GUARANTEE AS TO THE ACCURACY OR COMPLETENESS OF THE INFORMATION CONTAINED HEREIN.

REV	DATE	DESCRIPTION
	9/2/10	RECORD DRAWING SET



DATE: _____

1506 West 36th Avenue
Anchorage, Alaska 99503

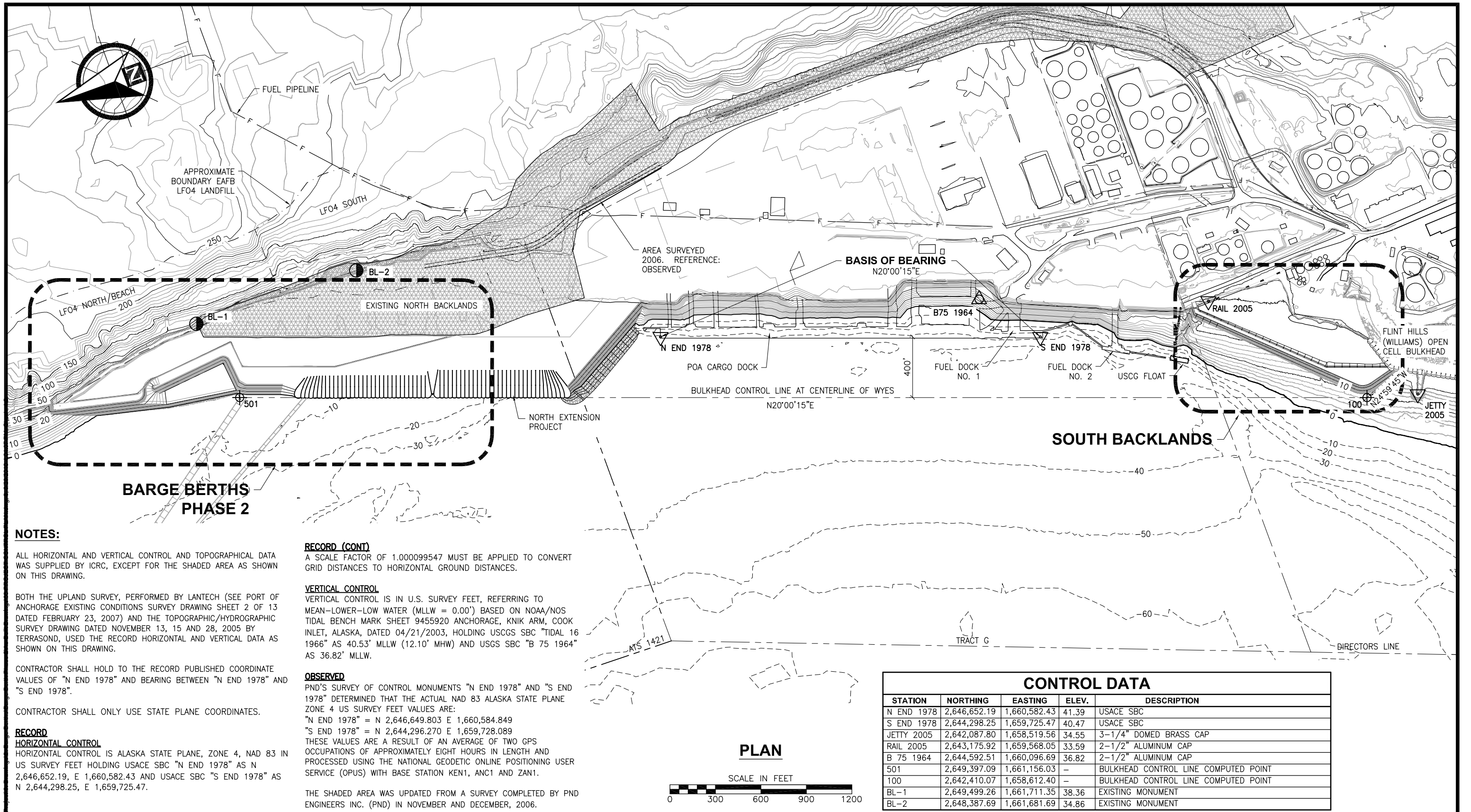
Phone: 907.561.1011

Fax: 907.563.4220

www.pndengineers.com

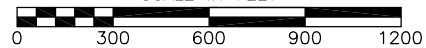


PROJECT:		PORT OF ANCHORAGE EXPANSION PROJECT	
TITLE:		BARGE BERTHS PHASE 2 AS-BUILT GENERAL NOTES (5 OF 5)	
DESIGNED BY:	GH	DATE:	1/8/08
CHECKED BY:	DN	PROJECT NO:	61028
			SHEET NO: 7 OF 35



PLAN

SCALE IN FEET



CONTROL DATA				
STATION	NORTHING	EASTING	ELEV.	DESCRIPTION
N END 1978	2,646,652.19	1,660,582.43	41.39	USACE SBC
S END 1978	2,644,298.25	1,659,725.47	40.47	USACE SBC
JETTY 2005	2,642,087.80	1,658,519.56	34.55	3-1/4" DOMED BRASS CAP
RAIL 2005	2,643,175.92	1,659,568.05	33.59	2-1/2" ALUMINUM CAP
B 75 1964	2,644,592.51	1,660,096.69	36.82	2-1/2" ALUMINUM CAP
501	2,649,397.09	1,661,156.03	-	BULKHEAD CONTROL LINE COMPUTED POINT
100	2,642,410.07	1,658,612.40	-	BULKHEAD CONTROL LINE COMPUTED POINT
BL-1	2,649,499.26	1,661,711.35	38.36	EXISTING MONUMENT
BL-2	2,648,387.69	1,661,681.69	34.86	EXISTING MONUMENT

OPEN CELL® AND OPEN CELL SHEET PILE® ARE REGISTERED TRADEMARKS OF PND ENGINEERS, INC. THE OPEN CELL SYSTEM IS PATENTED
PATENT - US 6,715,964 B2
PATENT - US 7,018,141 B2
PATENT - US 7,488,140 B2

This drawing, including the principle of design, is the intellectual property of PND Engineers, Inc. and is submitted with the agreement that it is not to be reproduced, copied or used in any other matter than its intended use on this project, and further, shall not be used in any manner that would be detrimental to PND. Use of this drawing and the associated design principles is construed as acceptance to this agreement and provisions.



421 West First Avenue, Suite 200
Anchorage, Alaska 99501
(907) 561-4272
www.ICRCsolutions.com



RECORD DOCUMENT

THIS RECORD DOCUMENT HAS BEEN PREPARED FROM INFORMATION PROVIDED BY THE CONTRACTOR, FROM CONSTRUCTION CORRESPONDENCE AND SURVEY INFORMATION PROVIDED BY OTHERS. THERE IS NO GUARANTEE AS TO THE ACCURACY OR COMPLETENESS OF THE INFORMATION CONTAINED HEREIN.

REV	DATE	DESCRIPTION
	9/2/10	RECORD DRAWING SET



DATE:

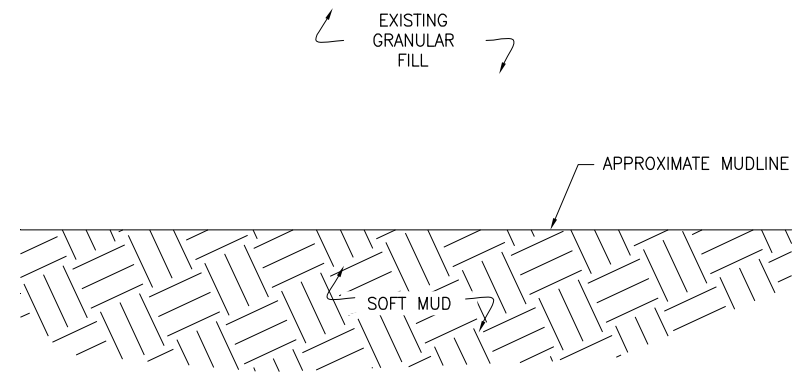
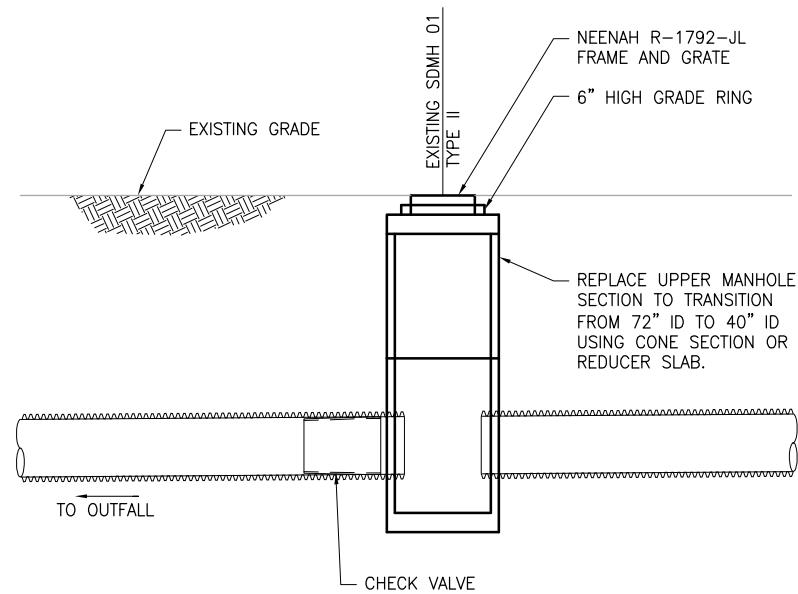
1506 West 36th Avenue
Anchorage, Alaska 99503
Phone: 907.561.1011
Fax: 907.563.4220
www.pndengineers.com



PROJECT: **PORT OF ANCHORAGE EXPANSION PROJECT**
TITLE: **BARGE BERTHS PHASE 2 AS-BUILT PROJECT CONTROL**

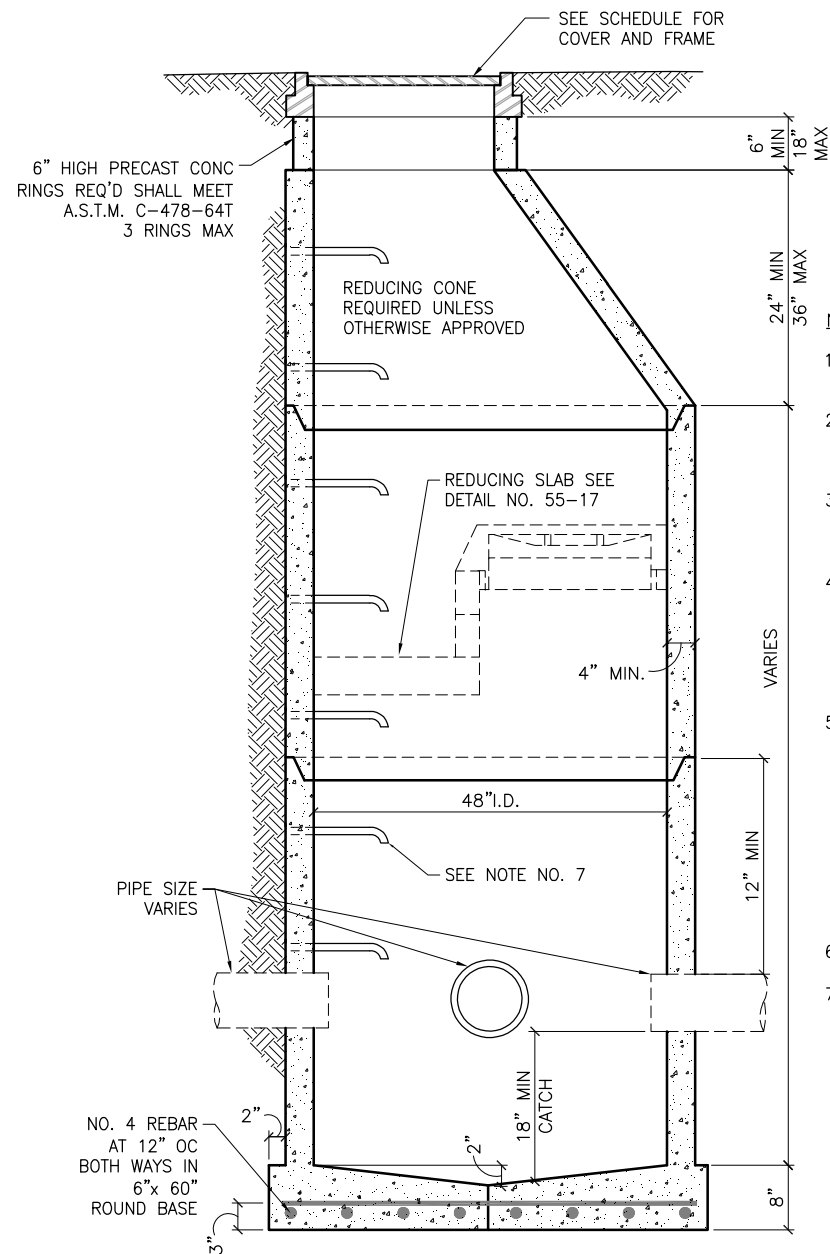
DESIGNED BY:	GH	DATE:	1/8/08
CHECKED BY:	DN	PROJECT NO.:	61028

SHEET NO: **8** OF 35



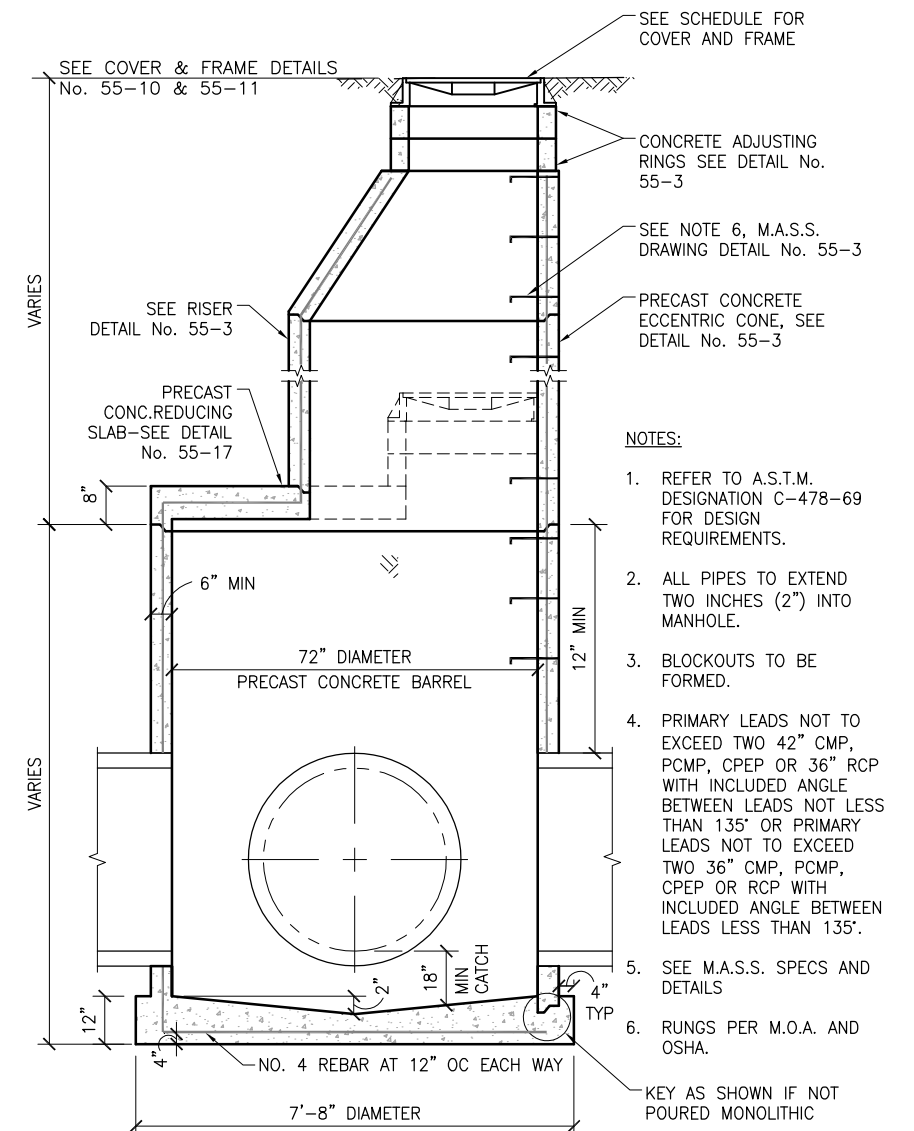
- NOTE:
 1) RECONSTRUCT MANHOLE TO ACCOMMODATE CHECK VALVE INSTALLATION AND REMOVAL.
 2) CONTRACTOR TO COORDINATE CHECK VALVE LENGTH WITH MANUFACTURER SUCH THAT IT CAN BE INSTALLED INTO THE EFFLUENT PIPE FROM INSIDE THE MANHOLE.

SDMH 01 AND CHECK VALVE
 NTS



- NOTES:
 1. SEE M.A.S.S. SPECIFICATIONS AND DETAILS
 2. REFER TO A.S.T.M. DESIGNATION C-470-69 FOR DESIGN REQUIREMENTS.
 3. SEE MANHOLE FRAME & COVER DETAIL NO. 55-10 & 55-11.
 4. MIN. STEEL REQ'D FOR BARREL AS PER A.S.T.M. C-478-69 SHALL BE IMBEDDED IN BASE SO THAT FIRST BARREL SECTION IS CONNECTED WITH BASE.
 5. PRIMARY LEADS NOT TO EXCEED 30" CMP, PCMP, CPEP OR 27" RCP WITH INCLUDED ANGLE BETWEEN LEADS NO LESS THAN 135° OR PRIMARY LEAD NOT TO EXCEED 24" CMP, PCMP, CPEP OR 21" RCP WITH INCLUDED ANGLE LESS THAN 135°.
 6. BLOCKOUTS TO BE FORMED.
 7. RUNGS TO BE PLACED 12" ON CENTER ON UNOBSTRUCTED SIDE OF MANHOLE 18" MAX. FROM BOTTOM OF MANHOLE & 6" MAX. FROM TOP OF CONE. IF UNOBSTRUCTED SIDE NOT AVAILABLE, BOTTOM RUNG TO BE PLACED 6" OVER SMALLEST PIPE. SEE RUNG (MANHOLE STEP) DETAIL NO. 55-7 & 55-8.

STORM DRAIN MANHOLE TYPE I
 NTS



- NOTES:
 1. REFER TO A.S.T.M. DESIGNATION C-478-69 FOR DESIGN REQUIREMENTS.
 2. ALL PIPES TO EXTEND TWO INCHES (2") INTO MANHOLE.
 3. BLOCKOUTS TO BE FORMED.
 4. PRIMARY LEADS NOT TO EXCEED TWO 42" CMP, PCMP, CPEP OR 36" RCP WITH INCLUDED ANGLE BETWEEN LEADS NOT LESS THAN 135° OR PRIMARY LEADS NOT TO EXCEED TWO 36" CMP, PCMP, CPEP OR RCP WITH INCLUDED ANGLE BETWEEN LEADS LESS THAN 135°.
 5. SEE M.A.S.S. SPECS AND DETAILS
 6. RUNGS PER M.O.A. AND OSHA.

STORM DRAIN MANHOLE TYPE II
 NTS

OPEN CELL® AND OPEN CELL SHEET PILE® ARE REGISTERED TRADEMARKS OF PND ENGINEERS, INC. THE OPEN CELL SYSTEM IS PATENTED
 PATENT - US 6,715,964 B2
 PATENT - US 7,018,141 B2
 PATENT - US 7,488,140 B2

This drawing, including the principle of design, is the intellectual property of PND Engineers, Inc. and is submitted with the agreement that it is not to be reproduced, copied or used in any other matter than its intended use on this project, and further, shall not be used in any manner that would be detrimental to PND. Use of this drawing and the associated design principles is construed as acceptance to this agreement and provisions.

421 West First Avenue, Suite 200
 Anchorage, Alaska 99501
 (907) 561-4272
 www.ICRCsolutions.com

RECORD DOCUMENT

THIS RECORD DOCUMENT HAS BEEN PREPARED FROM INFORMATION PROVIDED BY THE CONTRACTOR, FROM CONSTRUCTION CORRESPONDENCE AND SURVEY INFORMATION PROVIDED BY OTHERS. THERE IS NO GUARANTEE AS TO THE ACCURACY OR COMPLETENESS OF THE INFORMATION CONTAINED HEREIN.

REV	DATE	DESCRIPTION
9/2/10		RECORD DRAWING SET

DATE: _____

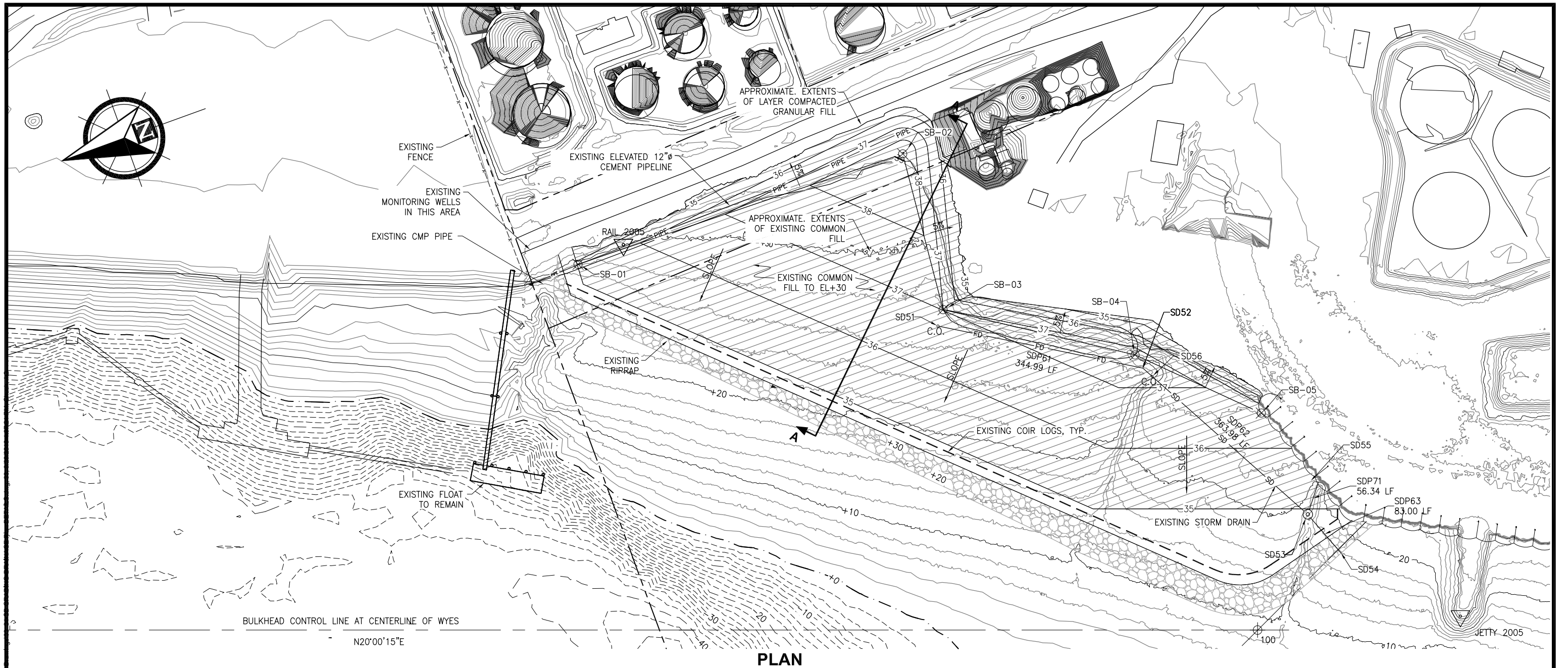
1506 West 36th Avenue
 Anchorage, Alaska 99503
 Phone: 907.561.1011
 Fax: 907.563.4220
 www.pndengineers.com

PROJECT: PORT OF ANCHORAGE EXPANSION PROJECT

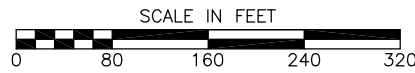
TITLE: BARGE BERTHS PHASE 2 AS-BUILT DRAINAGE DETAILS

DESIGNED BY:	GH	DATE:	1/8/08
CHECKED BY:	DN	PROJECT NO:	61028

SHEET NO: 32 OF 35



PLAN



NOTES:

- SEE ATB (DWL) DRAWING FOR ADDITIONAL INFORMATION.
- ASBUILT TABLES BASED ON QAP SUBMITTED REDLINE DRAWINGS 2008. PND ENGINEERS INC. TAKES NO RESPONSIBILITY FOR THE ACCURACY OF THIS INFORMATION.

STORM DRAIN STRUCTURE SUMMARY				
ID	NORTHING	EASTING	RIM ELEVATION	NOTES:
SD51	2642734.02	1659264.42	37.90	CLEANOUT
SD52	2642440.22	1659083.59	37.28	30 DEGREE BEND
SD53	2642266.98	1658763.48	35.10	TYPE II MANHOLE
SD54	2642237.12	1658684.70	25.50	OUTFALL
SD55	2642243.14	1658813.81	34.47	CONNECT TO EXISTING 24" CMP
SD56	2642430.30	1659065.39	33.50	CLEANOUT

STORM DRAIN PIPING SUMMARY								
ID	PIPE	LENGTH	INLET STRUCTURE	INLET INV. ELEVATION	OUTLET STRUCTURE	OUTLET INV. ELEVATION	SLOPE	NOTES
SDP61	24" Ø RCP	344.990	SD51	30.40	SD52	26.95	-1.00%	24"Ø CPEP (PERF)
SDP62	24" Ø RCP	363.981	SD52	26.95	SD53	22.50	-1.22%	24"Ø CPEP
SDP63	24" Ø RCP	83.003	SD53	22.21	SD54	20.38	-2.20%	24"Ø CPEP
SDP71	24" Ø RCP	56.336		23.05	SD53	21.50	-2.75%	24"Ø CPEP

LAYOUT POINT TABLE				
POINT #	NORTHING	EASTING	ELEVATION	NOTES:
SB-01	2643257.31	1659563.31	35.00	GRADE BREAK
SB-02	2642691.55	1659551.17	39.09	GRADE BREAK
SB-03	2642716.81	1659286.84	37.01	GRADE BREAK
SB-04	2642444.83	1659108.34	37.54	GRADE BREAK
SB-05	2642281.91	1658946.86	36.58	GRADE BREAK

OPEN CELL® AND OPEN CELL SHEET PILE® ARE REGISTERED TRADEMARKS OF PND ENGINEERS, INC. THE OPEN CELL SYSTEM IS PATENTED PATENT - US 6,715,964 B2 PATENT - US 7,018,141 B2 PATENT - US 7,488,140 B2

This drawing, including the principle of design, is the intellectual property of PND Engineers, Inc. and is submitted with the agreement that it is not to be reproduced, copied or used in any other matter than its intended use on this project, and further, shall not be used in any manner that would be detrimental to PND. Use of this drawing and the associated design principles is construed as acceptance to this agreement and provisions.



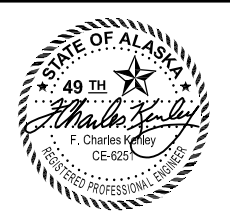
421 West First Avenue, Suite 200
Anchorage, Alaska 99501
(907) 561-4272
www.ICRCsolutions.com



RECORD DOCUMENT

THIS RECORD DOCUMENT HAS BEEN PREPARED FROM INFORMATION PROVIDED BY THE CONTRACTOR, FROM CONSTRUCTION CORRESPONDENCE AND SURVEY INFORMATION PROVIDED BY OTHERS. THERE IS NO GUARANTEE AS TO THE ACCURACY OR COMPLETENESS OF THE INFORMATION CONTAINED HEREIN.

9/2/10	RECORD DRAWING SET	
REV	DATE	DESCRIPTION



DATE: _____

1506 West 36th Avenue
Anchorage, Alaska 99503
Phone: 907.561.1011
Fax: 907.563.4220
www.pndengineers.com

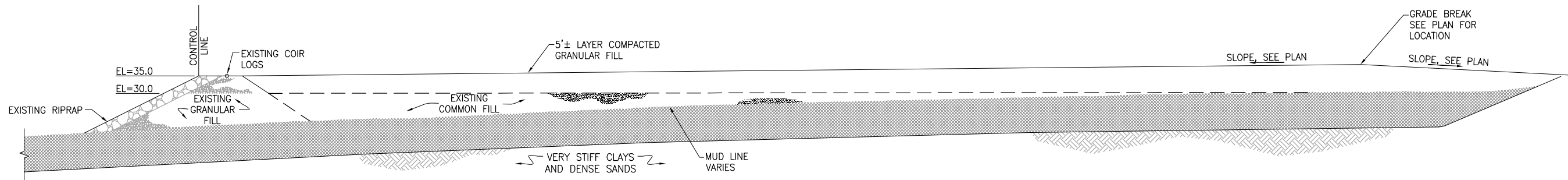
PND ENGINEERS, INC.

PROJECT: **PORT OF ANCHORAGE EXPANSION PROJECT**

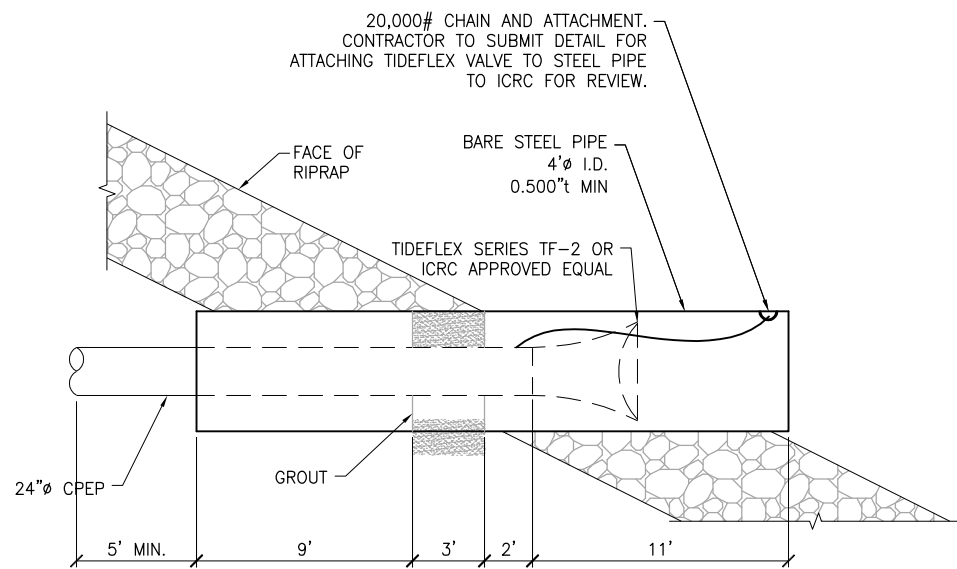
TITLE: **BARGE BERTHS PHASE 2 AS-BUILT SOUTH BACKLANDS GRADING / DRAINAGE PLAN**

DESIGNED BY: _____ GH DATE: 1/8/08
CHECKED BY: _____ DN PROJECT NO: 61028

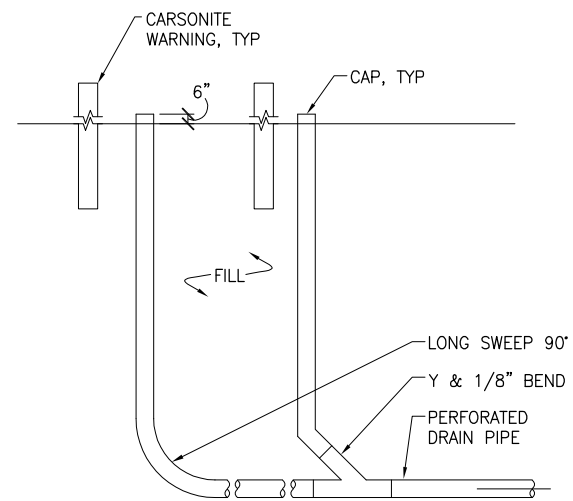
SHEET NO: **33** OF 35



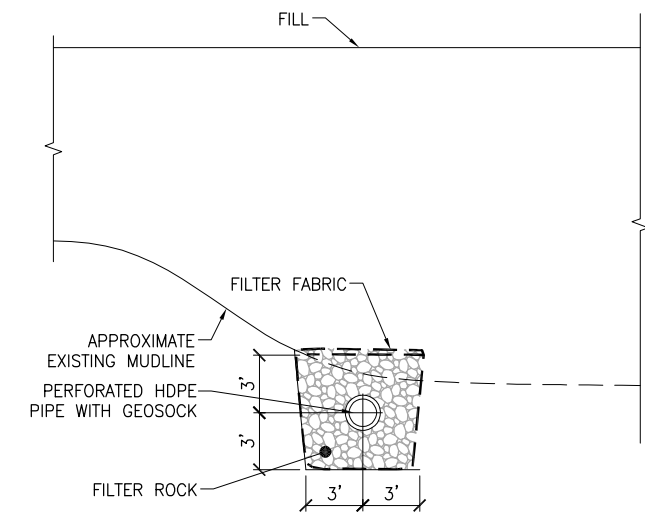
TYPICAL SECTION A-A
NTS



OUTFALL
NTS



CLEAN OUTS
NTS SEE GRADING/DRAINAGE PLAN FOR LOCATIONS



FOUNDATION DRAIN
NTS

ADDITIONAL DRAINAGE MATERIAL SPECIFICATIONS

FILTER FABRIC
SHALL BE A NON-WOVEN GEOTEXTILE FILTER FABRIC OF POLYPROPYLENE OR POLYESTER FIBERS, OR COMBINATION OF BOTH. SHALL MEET AASHTO M288 FOR SUBSURFACE DRAINAGE. FLOW RATES SHALL RANGE FROM 110 TO 330 GPM PER SQ FT WHEN TESTED ACCORDING TO ASTM D 4491.

GEOSOCK
SHALL BE A DRAIN-SLEEVE FILTER SOCK BY CARRIFF ENGINEERED FABRICS, OR ICRC APPROVED EQUIVALENT.

FLAPPER VALVE
CHECK VALVE SHALL BE A TIDEFLEX TF-2 MANUFACTURED BY TIDEFLEX TECHNOLOGIES INC. OR ICRC-APPROVED EQUIVALENT RATED FOR SITE CONDITIONS.

OPEN CELL® AND OPEN CELL SHEET PILE® ARE REGISTERED TRADEMARKS OF PND ENGINEERS, INC. THE OPEN CELL SYSTEM IS PATENTED
PATENT - US 6,715,964 B2
PATENT - US 7,018,141 B2
PATENT - US 7,488,140 B2

This drawing, including the principle of design, is the intellectual property of PND Engineers, Inc. and is submitted with the agreement that it is not to be reproduced, copied or used in any other matter than its intended use on this project, and further, shall not be used in any manner that would be detrimental to PND. Use of this drawing and the associated design principles is construed as acceptance to this agreement and provisions.



421 West First Avenue, Suite 200
Anchorage, Alaska 99501
(907) 561-4272
www.ICRCsolutions.com



RECORD DOCUMENT

THIS RECORD DOCUMENT HAS BEEN PREPARED FROM INFORMATION PROVIDED BY THE CONTRACTOR, FROM CONSTRUCTION CORRESPONDENCE AND SURVEY INFORMATION PROVIDED BY OTHERS. THERE IS NO GUARANTEE AS TO THE ACCURACY OR COMPLETENESS OF THE INFORMATION CONTAINED HEREIN.

REV	DATE	DESCRIPTION
9/2/10		RECORD DRAWING SET



DATE: _____

1506 West 36th Avenue
Anchorage, Alaska 99503
Phone: 907.561.1011
Fax: 907.563.4220
www.pndengineers.com



PROJECT:		PORT OF ANCHORAGE EXPANSION PROJECT	
TITLE:		BARGE BERTHS PHASE 2 AS-BUILT SOUTH BACKLANDS GRADING / DRAINAGE SECTION	
DESIGNED BY:	GH	DATE:	1/8/08
CHECKED BY:	DN	PROJECT NO:	61028
			SHEET NO: 34 OF 35

RIP RAP OUTFALL

UNION WAY

CITY OF ANCHORAGE TIDELANDS LEASE NO. 1

UNION OIL OF CALIFORNIA SURVEY NO. 6 LEASE NO. 1754 DATED 9-1-64

ALASKA FISH & FARM SURVEY NO. 4

COOK INLET TUG AND BARGE CO. SURVEY NO. 2

ALASKA FISH AND FARM PRODUCTS LEASE 7310 DATED 10-1-52

STANDARD OIL CO. OF CALIFORNIA LEASE NO. 2428 9-1-63

UNION OIL OF CALIFORNIA NO. 508 SUPP. NO. 1

INDEPENDENT LBR. CO. NO. 1126 9-1-64 SUPP. NO. 2

STORM SEWER
TOP MH 25.0
N. INV. 7.92
S. INV. 8.11

STORM SEWER
TOP MH 23.5
N. INV. 8.35
E. INV. 9.30

STORM SEWER
TOP MH 22.00
N. INV. 7.68
W. INV. 8.2
S. INV. 12.00

STORM SEWER
TOP MH 20.50
E. INV. 12.50
W. INV. 10.00

EXACT LOCATION UNKNOWN - TAKEN OFF STORM DRAIN

ROAD DOCK OCEAN

BLUFF

DR

NW 1/4 of SW 1/4
Sec. 7-T13N-R3W
North Adn. & ARR Res.

UTILITY REVISIONS 1 NOV 64 NJH
UPDATED UTILITIES 24 JAN 68 NJH
STORM SEWER 402-48-01 29 APRIL 67 NJH
REDRAWN BY NJH 19 APRIL 67

1130-A
107-2

STANDARD OIL OF CALIFORNIA

LEASE NO. 2458

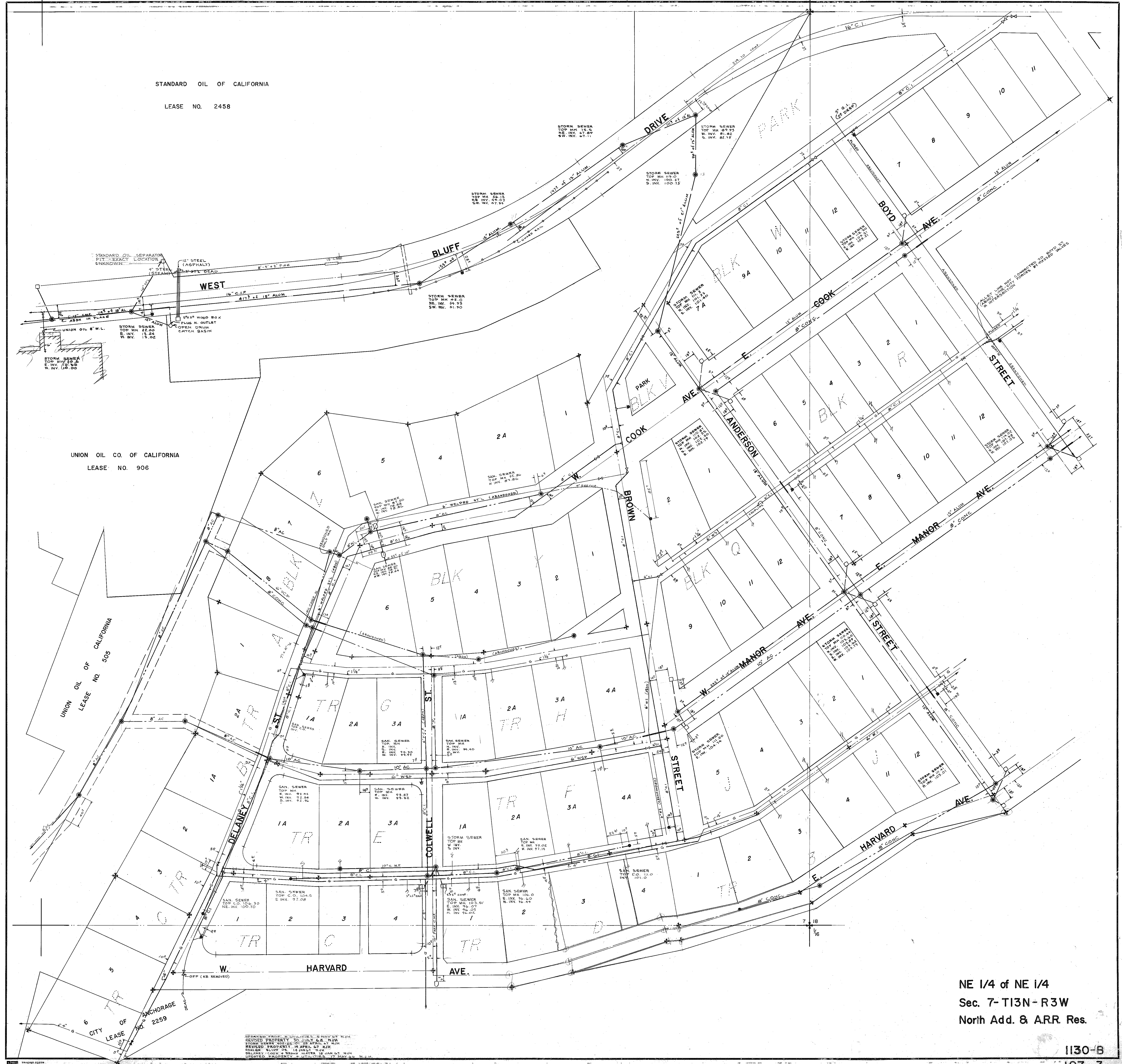
UNION OIL CO. OF CALIFORNIA
LEASE NO. 906

UNION OIL OF CALIFORNIA
LEASE NO. 505

SEPARATED FROM ALL OTHERS BY REVISED PLAN
REVISED PROPERTY TO 20' 0" S. & N. 1/4
STORM SEWER 42" DIA. TO 22' APRIL 21, 1934
REVISED PROPERTY TO 20' 0" S. & N. 1/4
REARER BLUFF ON 16 JANUARY 1934
DELANEY-COOK & STORM WATER 18 JANUARY 1934
UPDATED PROPERTY UTILITIES 17 MAY 25, 1935

NE 1/4 of NE 1/4
Sec. 7-T13N-R3W
North Add. & ARR. Res.

1130-B
107-3





CITY OF ANCHORAGE
 CONTRACT NO 14-25-0003-2079

81307
 1320

CITY OF ANCHORAGE
 CONTRACT 1-3 ARR 8518
 WATER TANK

NW 1/4 of SE 1/4
 Sec. 7-T13N-R3W
 North Add. & ARR. Res.



HOLLYWOOD VISTA INC.
LEASE I-3 A.R.R. 9057
PARCEL 1 BLK. I

HARRY LEWIS
LEASE I-3 A.R.R. 8848
PARCEL 2-BLK. I

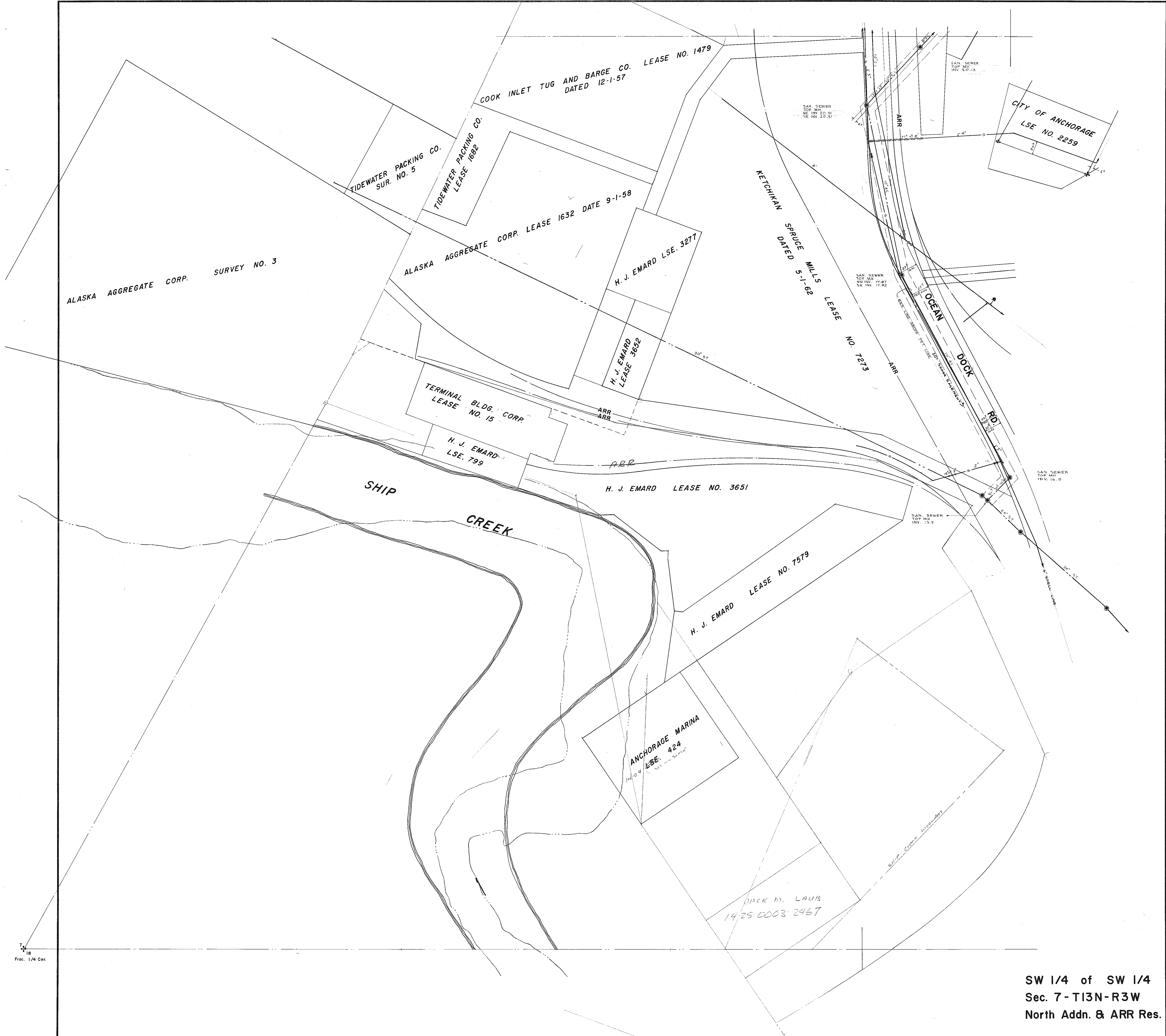
ALLIED HOTELS INC.
CONTRACT NO. 14-04-003-1278

HOLLYWOOD VISTA CORP.
LEASE I-3 9683

GOVERNMENT HILL SCHOOL
12B

CITY OF ANCHORAGE
LEASE 2262
PARK

NE 1/4 of SE 1/4
Sec. 7-T13N-R3W
North Add. & Mil. Res.



ALASKA AGGREGATE CORP. SURVEY NO. 3

TIDEWATER PACKING CO. SUR. NO. 5

TIDEWATER PACKING CO. LEASE 1682

COOK INLET TUG AND BARGE CO. LEASE NO. 1479 DATED 12-1-57

ALASKA AGGREGATE CORP. LEASE 1632 DATE 9-1-58

H. J. EMARD LSE. 3277

H. J. EMARD LEASE 3652

TERMINAL BLDG. CORP. LEASE NO. 15

H. J. EMARD LSE. 799

SHIP CREEK

H. J. EMARD LEASE NO. 3651

H. J. EMARD LEASE NO. 7579

ANCHORAGE MARINA LSE. 424

DOCK NO. 1418 14-25-0003-2467

KETCHIKAN SPRUCE MILLS LEASE NO. 7273 DATED 5-1-62

CITY OF ANCHORAGE LSE NO. 2259

OCEAN DOCK RD.

SAN SEWER TOP M. INV. 16.0

SAN SEWER TOP M. INV. 15.9

SAN SEWER TOP M. INV. 22.51

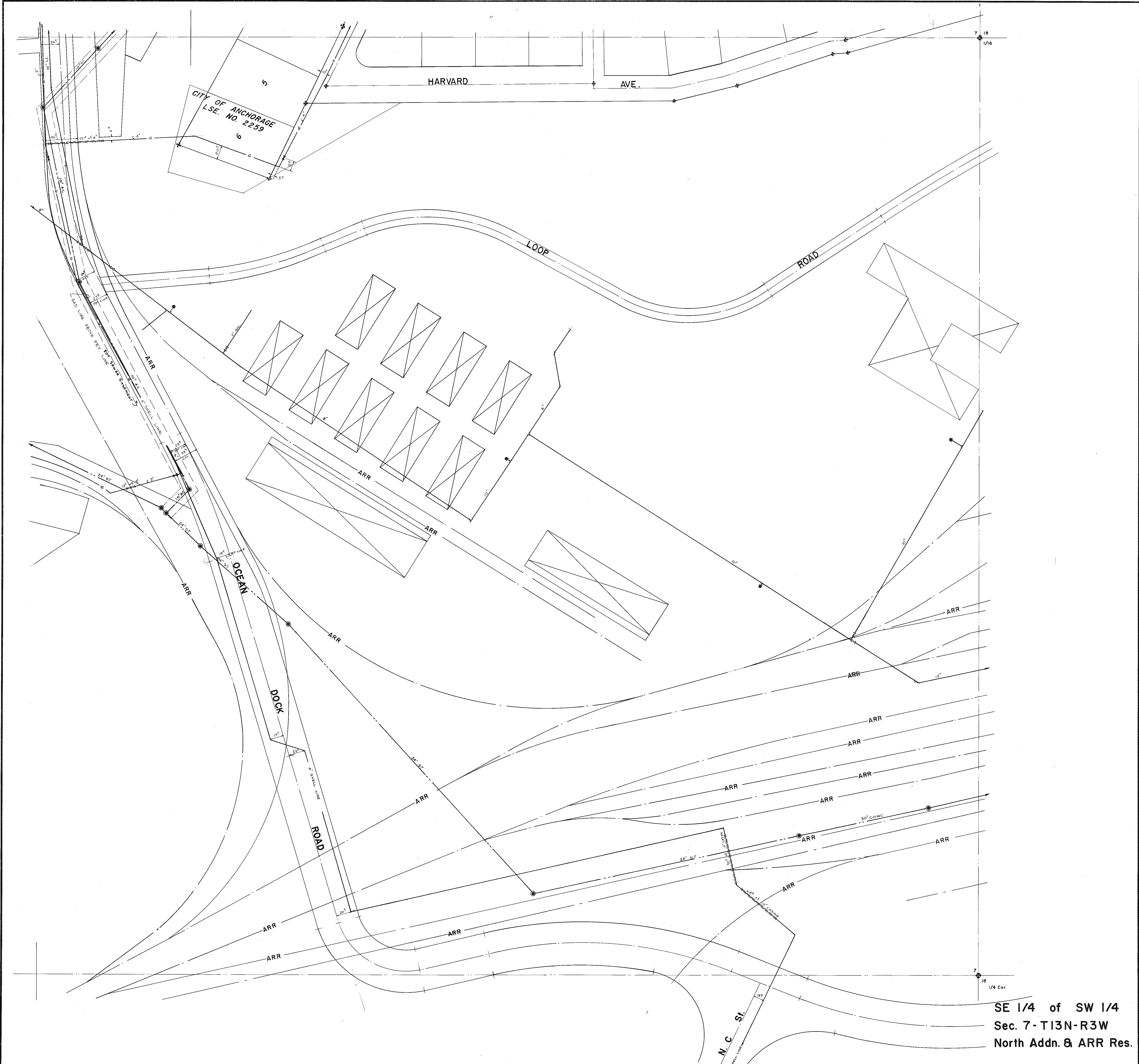
SAN SEWER TOP M. INV. 17.87

7/18
Frac. 1/4 Cor.

REDRAWN BY NJK 10 APRIL 67

SW 1/4 of SW 1/4
Sec. 7-T13N-R3W
North Adn. & ARR Res.

1130-C
107-6



CITY OF ANCHORAGE
LSE. NO. 2259

HARVARD AVE.

LOOP

ROAD

OCEAN

DOCK

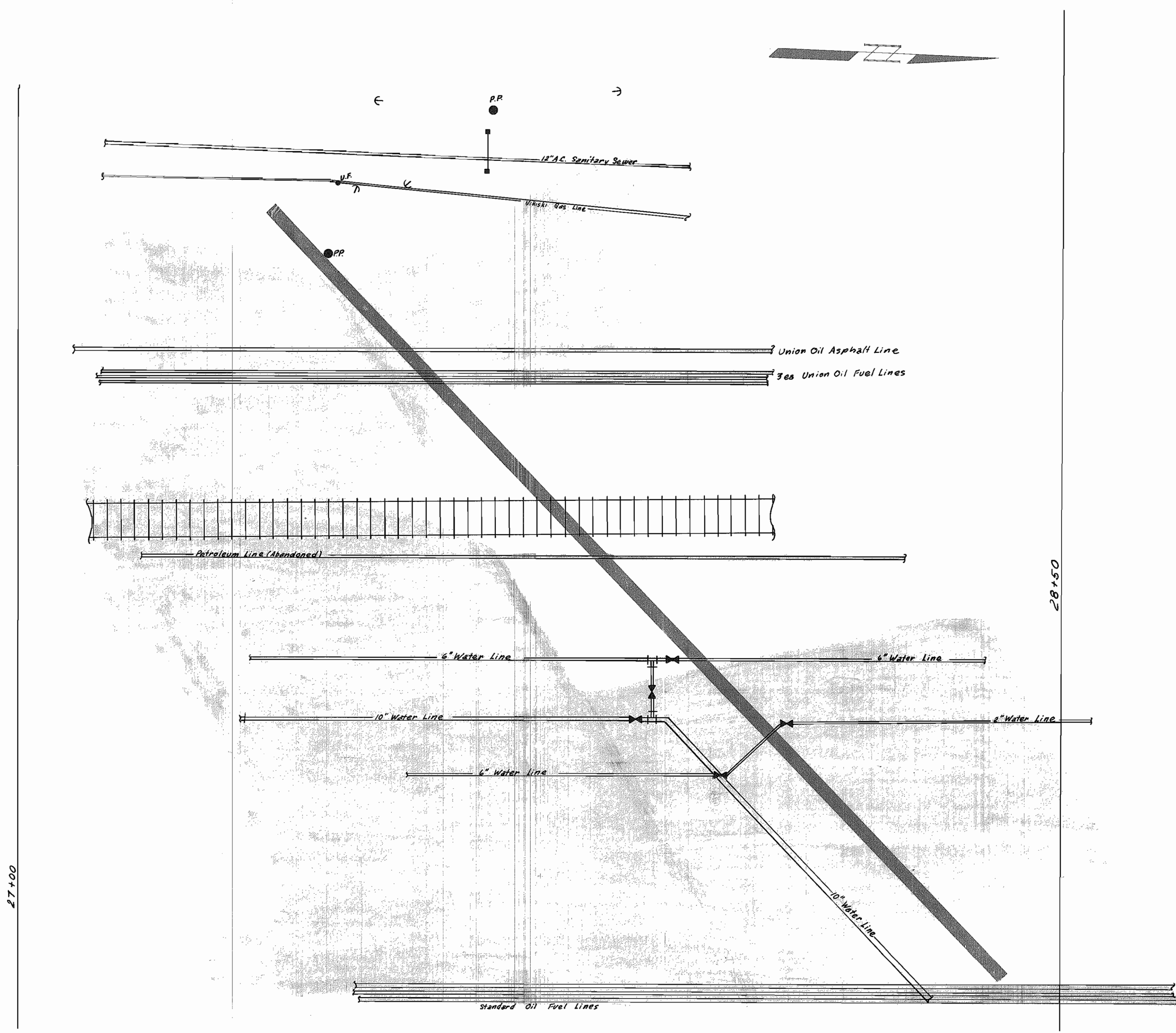
ROAD

N. C. St.

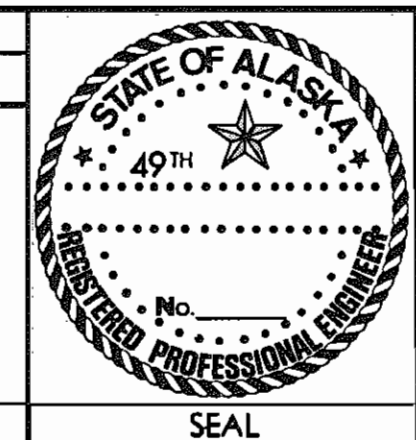
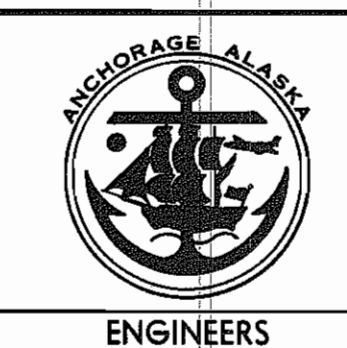
SE 1/4 of SW 1/4
Sec. 7-T13N-R3W
North Addn. & ARR Res.

UTILITIES UPDATED: 25 JAN 88, N.H.
REDRAWN BY: N.H. 19 APRIL 87

1130-D
107-7



FIELD BOOKS	TBM NO.	LOCATION	ELEV.	DATA	BY	DATA	BY	REV	DATE	DESCRIPTION	BY	REV	DATE	DESCRIPTION	BY
DESIGN				BASE	GR	TELE									
STAKING				TOPO	GR	ELEC									
ASBUILT				PROFILE		DESIGN									
				SAN SEWER	GR	QUANTITIES									
				STORM SEWER	GR	MUN. PRELIM. CHECK									
CONTRACTOR	BASIS OF			WATER	GR	MUN. FINAL CHECK									
INSPECTOR				GAS	GR	CODED BY									
CONSTRUCTION RECORD		VERTICAL DATUM				PLAN CHECK									
										REVISIONS					



PUBLIC WORKS DEPARTMENT
 GENERAL MISC UTILITIES W/IN
 PORT OF ANCHORAGE,
 WATER & POL LINES

SCALE 1"=10' DATE GRID 10 30 SHEET - of
 ACCT. NO. C75618

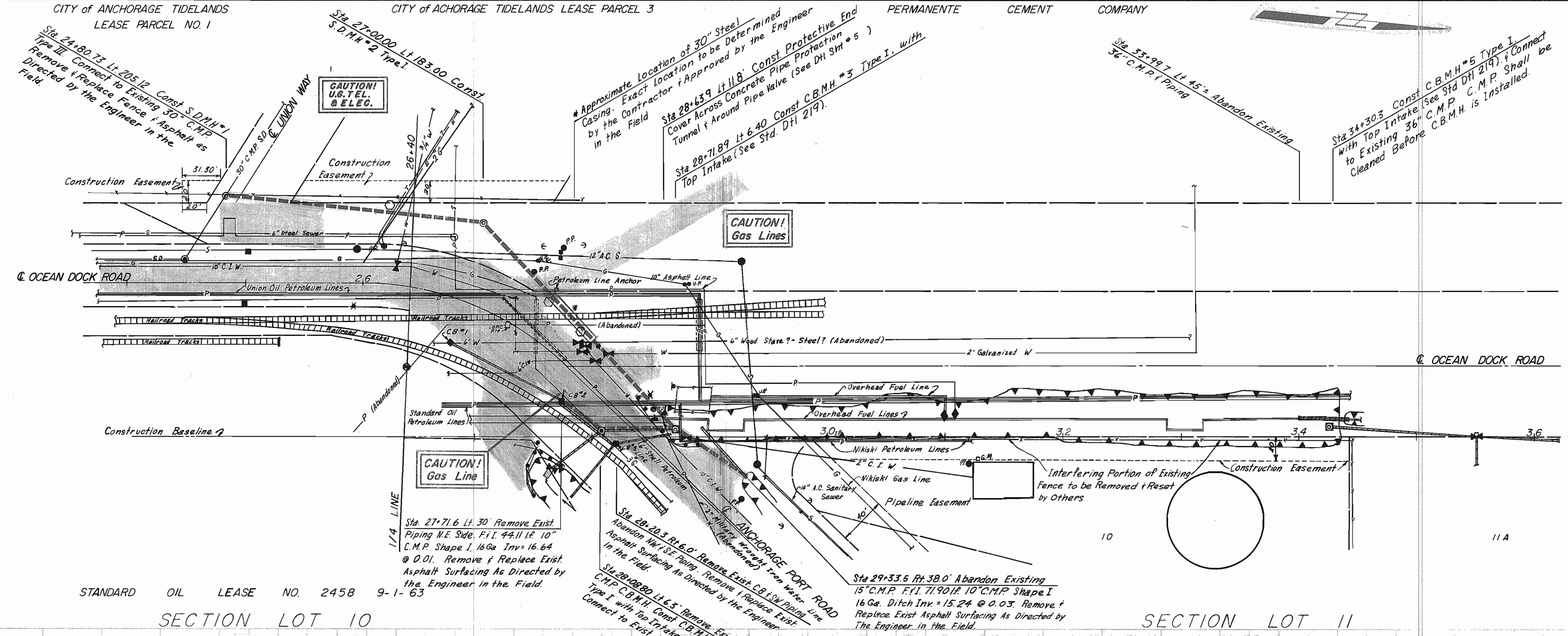
CITY OF ANCHORAGE TIDELANDS
LEASE PARCEL NO. 1

CITY OF ANCHORAGE TIDELANDS LEASE PARCEL 3

PERMANENTE CEMENT COMPANY

NOTES

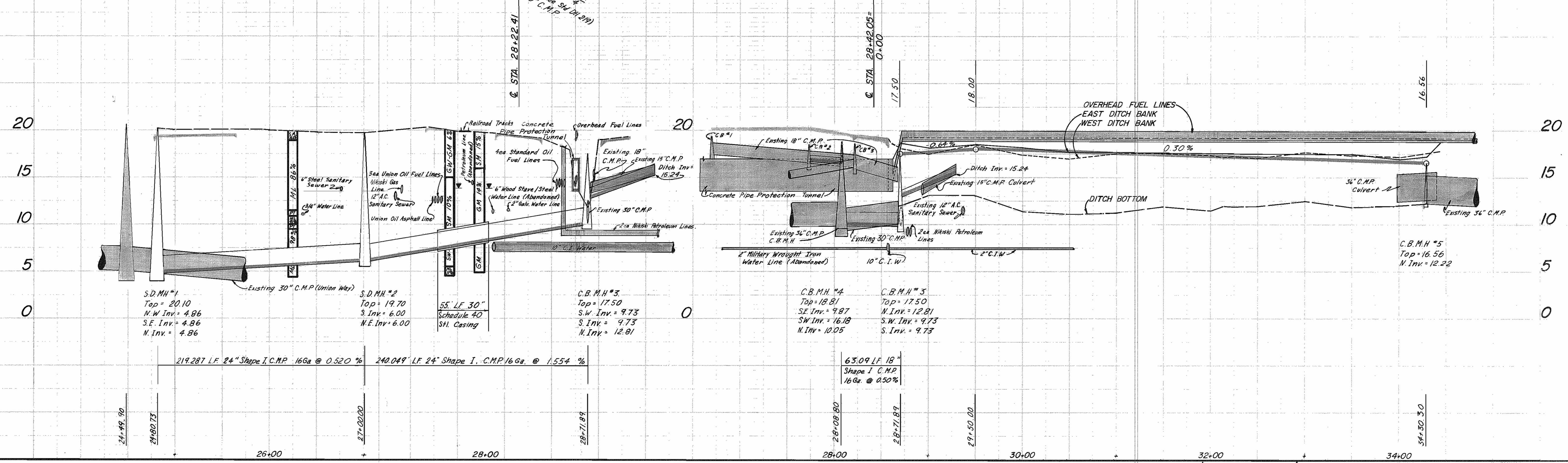
- UNDERGROUND UTILITY LOCATIONS ARE APPROXIMATE ONLY.
- UNDERGROUND SECONDARY ELECTRIC CONTROL LINES MAY EXIST IN THE CONSTRUCTION AREA. CONSULT WITH PETROLEUM COMPANIES FOR EXACT LOCATIONS.
- CAUTION ALL PETROLEUM LINES ARE HIGH PRESSURE!**
- CONSTRUCTION BASELINE IS ALONG WEST PROPERTY LINE OF SECTION LOT'S 10 & 11.
- DITCH TO BE FILLED WITH TYPE IV MATERIAL CONSISTING OF PARTICLES NO LARGER THAN 12" IN SIZE. SEE GRADING DETAIL SHEET.
- FILL & GRADE AREA WEST OF DITCH TO DRAIN TOWARD DITCH AS DIRECTED BY THE ENGINEER IN THE FIELD.
- ANY PETROLEUM LINE DAMAGED DURING CONSTRUCTION SHALL BE REPLACED AS PER THE SPECIFICATIONS OF THE PETROLEUM LINE'S OWNER & THE DEPARTMENT OF TRANSPORTATION.



STANDARD OIL LEASE NO. 2458 9-1-63

SECTION LOT 10

SECTION LOT 11



FIELD BOOKS	TBM NO.	LOCATION	ELEV.	DATA	DRAWN BY	CHECKED BY	DATA	DRAWN BY	CHECKED BY	REV	DATE	DESCRIPTION	BY	REV	DATE	DESCRIPTION	BY
DESIGN 1381, 1402	1	1942 TIDAL 13 BOOK	24.58	BASE	Rogers	FT	TELE	Rogers	FT								
STAKING	2	N BOLT F. HYD. OCEAN DOCK BLUFF RDS.	24.98	TOPO	Rogers	FT	ELEC	Rogers	FT								
ASBUILT				PROFILE	Rogers	FT	DESIGN	Rogers	FT								
CONTRACTOR		BASIS OF THIS DATUM 1976 N.G.S. DATUM		SAN SEWER	Rogers	FT	QUANTITIES	Rogers	FT								
INSPECTOR				STORM SEWER	Rogers	FT	PRELIM. CHECK										
CONSTRUCTION RECORD		VERTICAL DATUM		WATER	Rogers	FT	FINAL CHECK										
				GAS	Rogers	FT	CODED BY										

PUBLIC WORKS DEPARTMENT

SCHEDULE B 1977 CONSTRUCTION

MISCELLANEOUS STORM IMPROVEMENTS

OCEAN DOCK ROAD STORM DRAIN

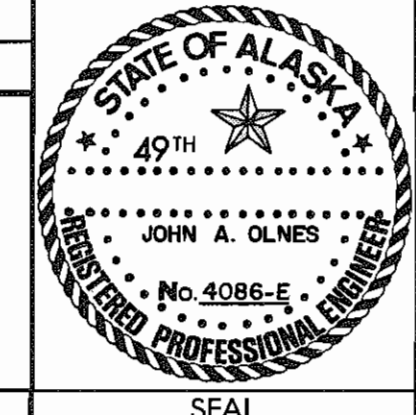
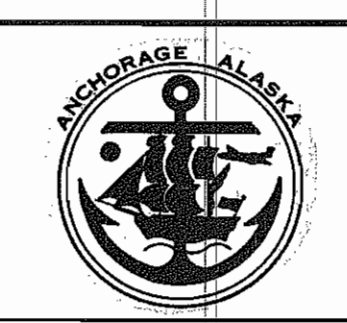
SCALE HOR. 1"=50' VER. 1"=5'

DATE

GRID 1030, 1130

SHEET 4 of 5

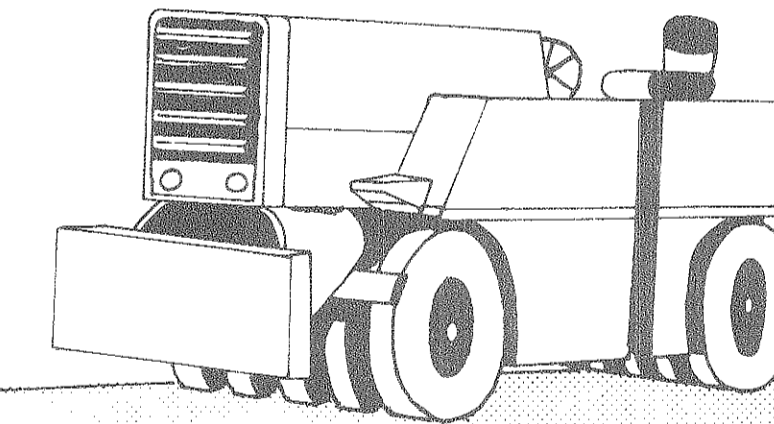
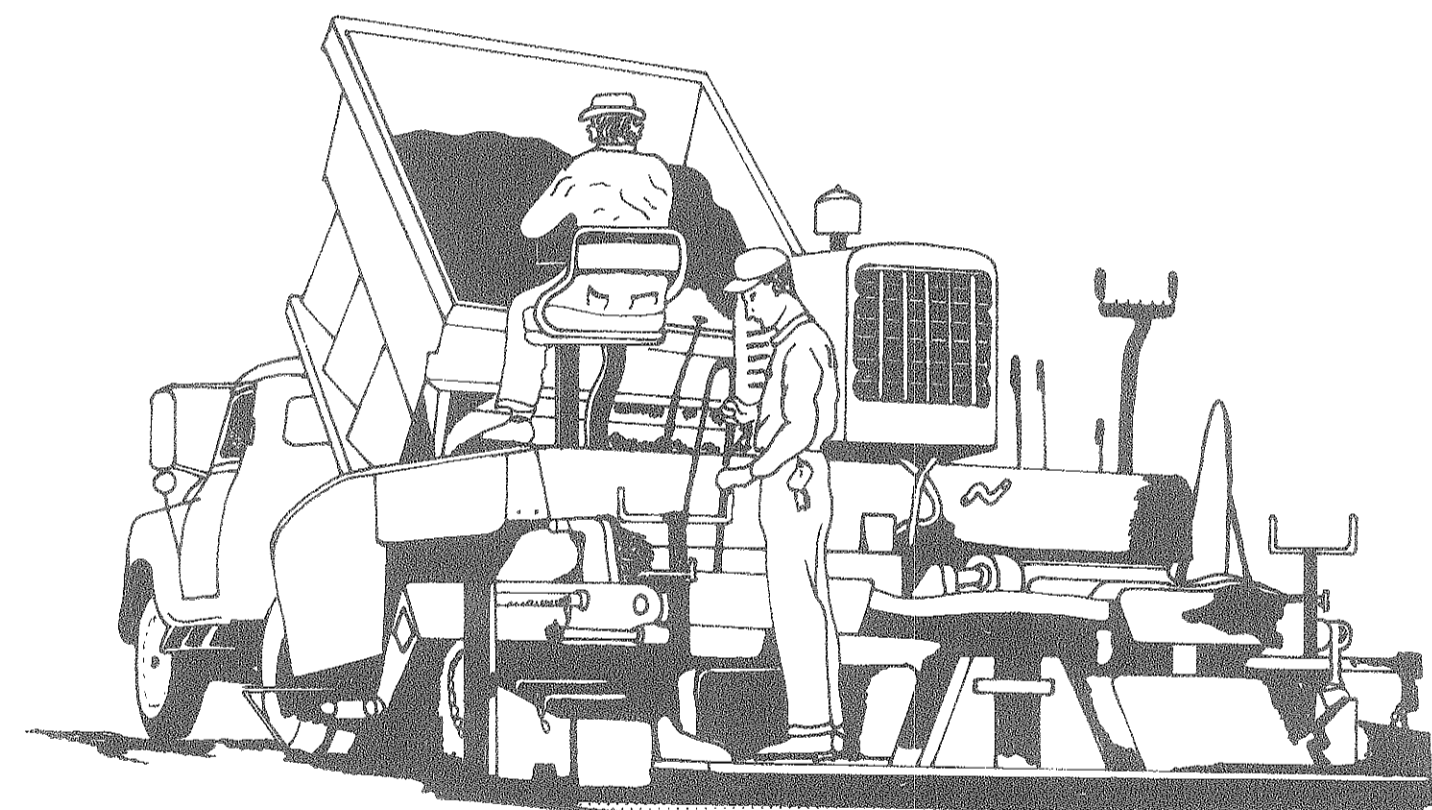
FILE NO. 09-2377



CITY OF ANCHORAGE

1975 CONSTRUCTION

75-04



CONTRACTOR COMANCHE CORP.
CONTRACT NO C-4916
DATE NOTICE TO PROCEED JULY 29, 1975
ORIGINAL CONTRACT AMOUNT \$ 120,811.55
FINAL CONTRACT AMOUNT \$ 196,419.01
ACTUAL COMPLETION DATE SEPT 9, 1975
INSPECTOR HANSEN
PAVING 0.6 BLKS
STORM 906 L.F.

J.W.H. 11/19/75

MISCELLANEOUS

STREET & STORM

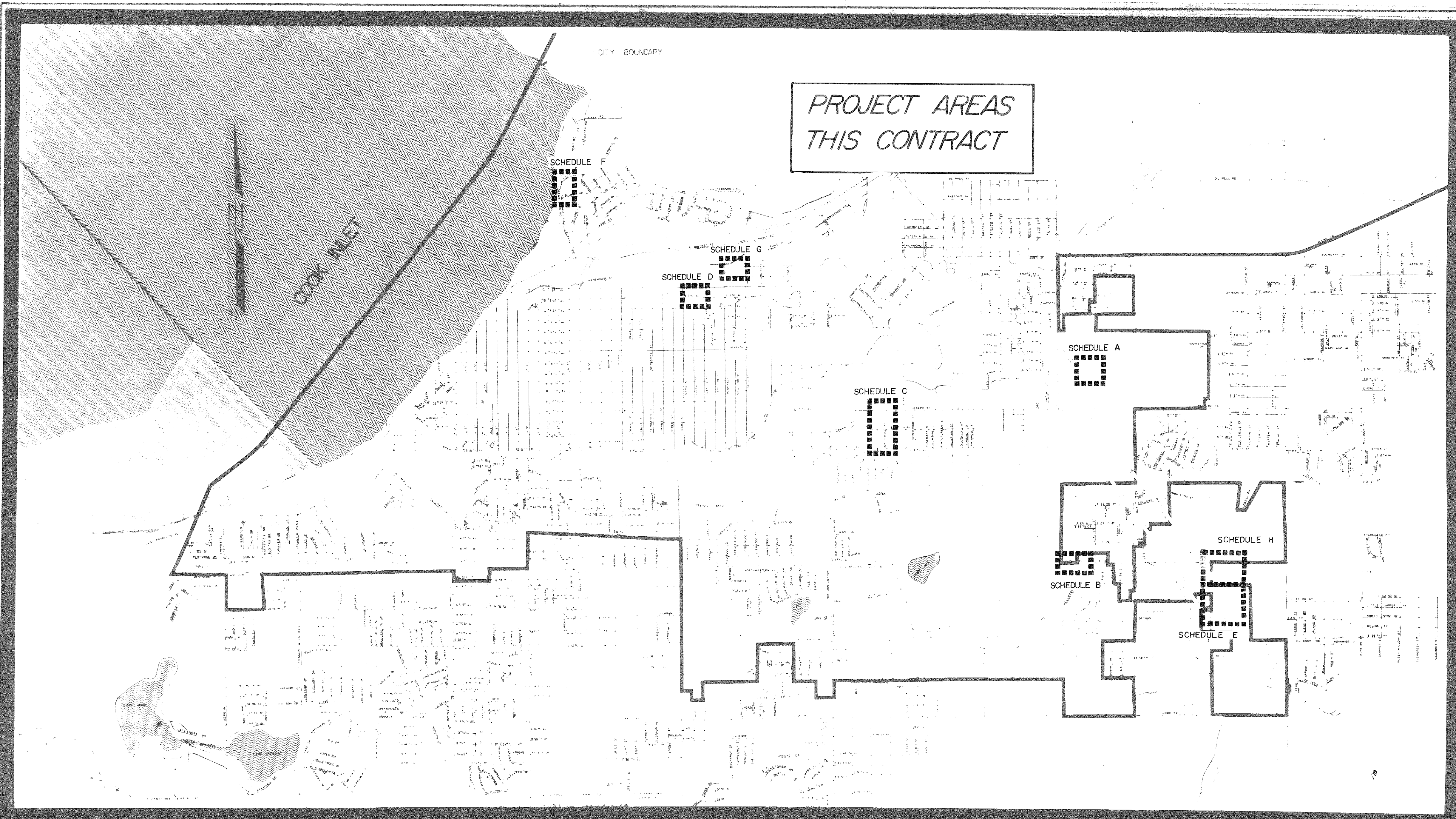
IMPROVEMENTS NO. 1

APPROVED BY:

Douglas G. Weiford
DOUGLAS G. WEIFORD
CITY MANAGER

Lee Browning
LEE BROWNING, P.E.
ACTING ASST. CITY MANAGER/PUBLIC WORKS

Ted J. Forsi
TED J. FORSI JR., P.E.
ACTING CITY ENGINEER



LEGEND

- PLAN**
- EXISTING PROPERTY LINE
 - EXISTING EASEMENT LINE
 - - - PROPOSED EASEMENT LINE
 - EXISTING C
 - CONSTRUCTION C
 - SURVEY MONUMENT
 - LP IRON PIN
 - EXISTING BUILDING
 - X-X- EXISTING FENCE
 - EXISTING TREE
 - BLUFF AREA
 - T-T- EXISTING UNDERGROUND TELEPHONE LINE
 - E-E- EXISTING UNDERGROUND ELECTRIC LINE
 - ⊙ ⊙ EXISTING TELEPHONE & ELECTRIC HAND HOLE
 - PP ● LP ● GP EXISTING POWER, LAMP, & GUY POLE
 - ↓ EXISTING GUY
 - G-G- EXISTING GAS LINE
 - ◇ EXISTING GAS VALVE
 - W-W- EXISTING WATER LINE
 - EXISTING HYDRANT & VALVE
 - EXISTING & PROPOSED KEY BOX
 - KBM EXISTING KEY BOX MARKER
 - S-S- EXISTING SANITARY SEWER LINE
 - EXISTING SANITARY SEWER MANHOLE
 - C.O. EXISTING SANITARY SEWER CLEANOUT
 - EXISTING & PROPOSED PAVING
 - EXISTING & PROPOSED CURB & GUTTER
 - EXISTING & PROPOSED CULVERT
 - EXISTING & PROPOSED GUARDRAIL
 - EXISTING & PROPOSED HANDRAIL
 - EXISTING & PROPOSED STREET SIGNS
 - SD --- EXISTING & PROPOSED STORM DRAIN
 - ⊙ EXISTING & PROPOSED STORM DRAIN MANHOLE
 - □ EXISTING & PROPOSED STORM DRAIN CATCH BASIN
 - ⊙ EXISTING & PROPOSED STORM DRAIN CATCH BASIN MANHOLE
 - EXISTING & PROPOSED DITCH
 - PROPOSED VALLEY GUTTER
 - DRAINAGE ARROW
 - ▽ RADIUS TO BACK OF CURB
 - ▽ EXISTING & PROPOSED SANITARY SEWER CONNECTION
 - GM EXISTING GAS METER
 - UE EXISTING UNDERGROUND ELECTRIC MARKER
 - EM EXISTING ELECTRIC METER
 - EXISTING MAILBOX
 - REMOVE EXISTING PAVEMENT
- PROFILE**
- EXISTING C
 - EXISTING NORTH OR WEST PROPERTY LINE
 - EXISTING SOUTH OR EAST PROPERTY LINE
 - ESTIMATED LIMIT OF EXCAVATION
 - EXISTING PIPE
 - ▲ EXISTING MANHOLE
 - ▲ EXISTING CATCH BASIN OR CATCH BASIN MANHOLE
 - EXISTING PAVEMENT
 - PROPOSED C OF PAVEMENT
 - PROPOSED STORM DRAIN MANHOLE OR CATCH BASIN MANHOLE
 - PROPOSED STORM DRAIN
 - INSULATE WATER LINE
 - GRADE REQUEST ELEVATION

GENERAL NOTES

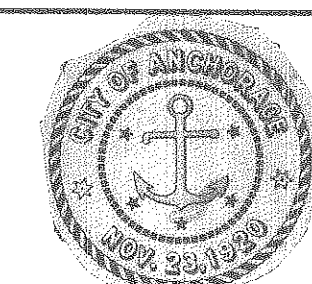
1. ALL STATIONING IS CENTERLINE RIGHT-OF-WAY UNLESS OTHERWISE NOTED.
2. UTILITY MOVES SHALL BE DONE BY OTHERS UNLESS OTHERWISE NOTED.
3. LIMITS OF EXCAVATION SHOWN ON THE PLAN SHEETS ARE ESTIMATES FOR INFORMATION PURPOSES ONLY. ACTUAL LIMITS WILL BE DETERMINED BY THE ENGINEER IN THE FIELD.
4. ALL CURB DIMENSIONS & ELEVATIONS ARE TO TOP BACK OF CURB UNLESS OTHERWISE NOTED. PLAN VIEW ELEVATIONS ARE TO THE C & G FLOW LINE.
5. ALL CURB RADII ARE 15' TO BACK OF CURB UNLESS OTHERWISE NOTED.

SOILS

GW	WELL GRADED GRAVEL
GP	POORLY GRADED GRAVEL
GM	SILTY GRAVEL
GC	CLAYEY GRAVEL
SW	WELL GRADED SAND
SP	POORLY GRADED SAND
SM	SILTY SAND
SC	CLAYEY SAND
ML	INORGANIC SILT
CL	INORGANIC CLAY
OL	ORGANIC SILT
MH	INORGANIC SILT
CH	INORGANIC CLAY
OH	ORGANIC CLAY
PT	PEAT

▽ WATER LEVEL
○ TEST HOLE LOCATION
10% PASSING 200

FIELD BOOK	T&M NO	LOCATION	ELEV	DATA	BY	DATE	DESCRIPTION	BY	REV	DATE	DESCRIPTION	BY
DESIGN				BASE	JR							
MARKING				TOPO								
ASB				PROFILE								
				SAN. SEWER								
				STORM SEWER								
				WATER								
CONTRACT				WAS								
CONTRACT NO.												
DATE												
CONTRACTOR												
DATE												
CONSTRUCTION RECORD												



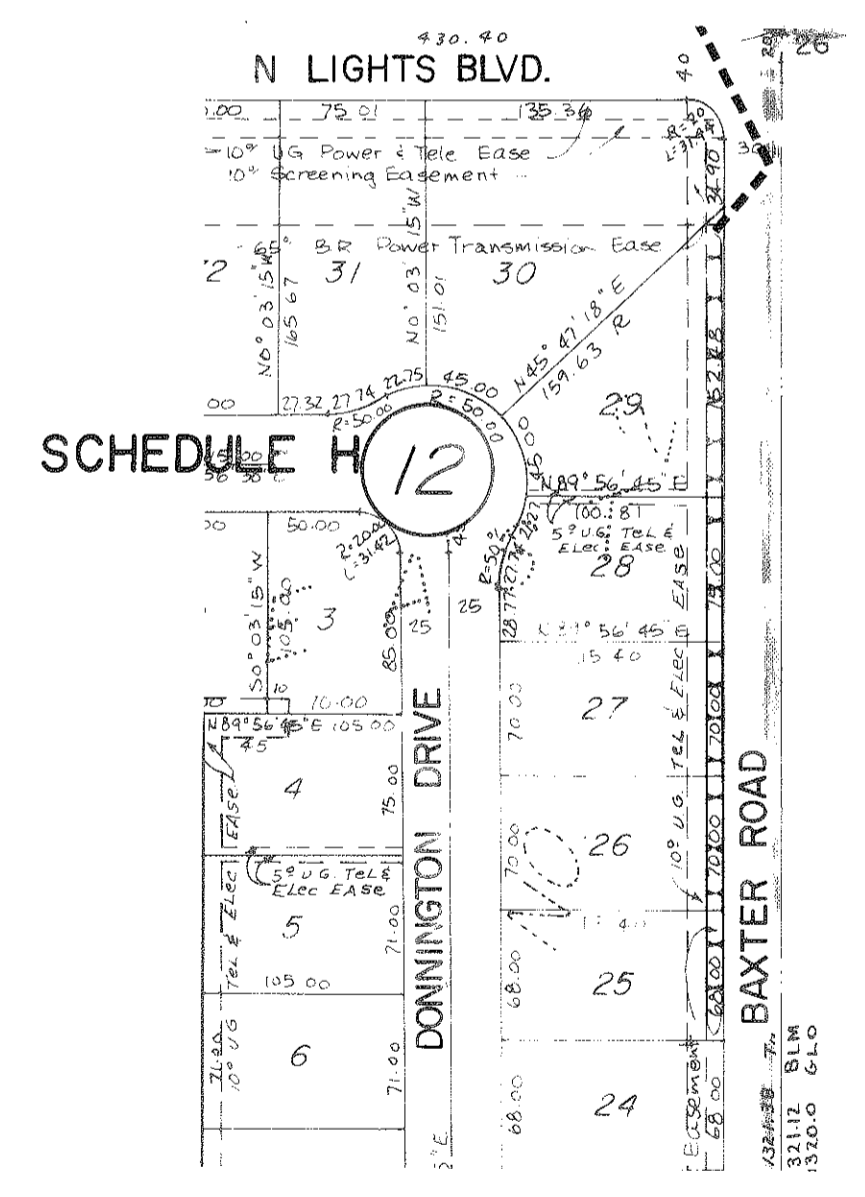
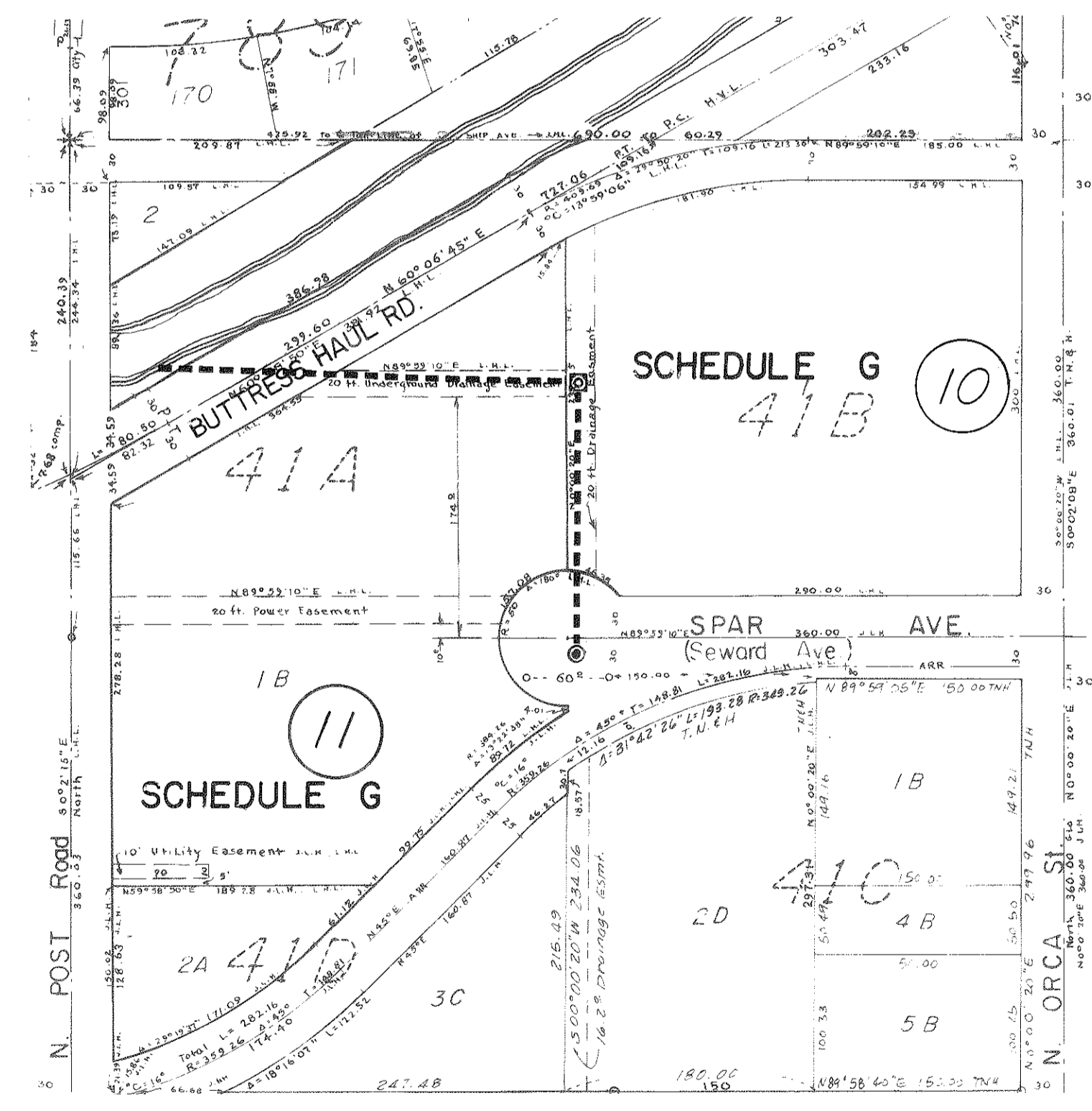
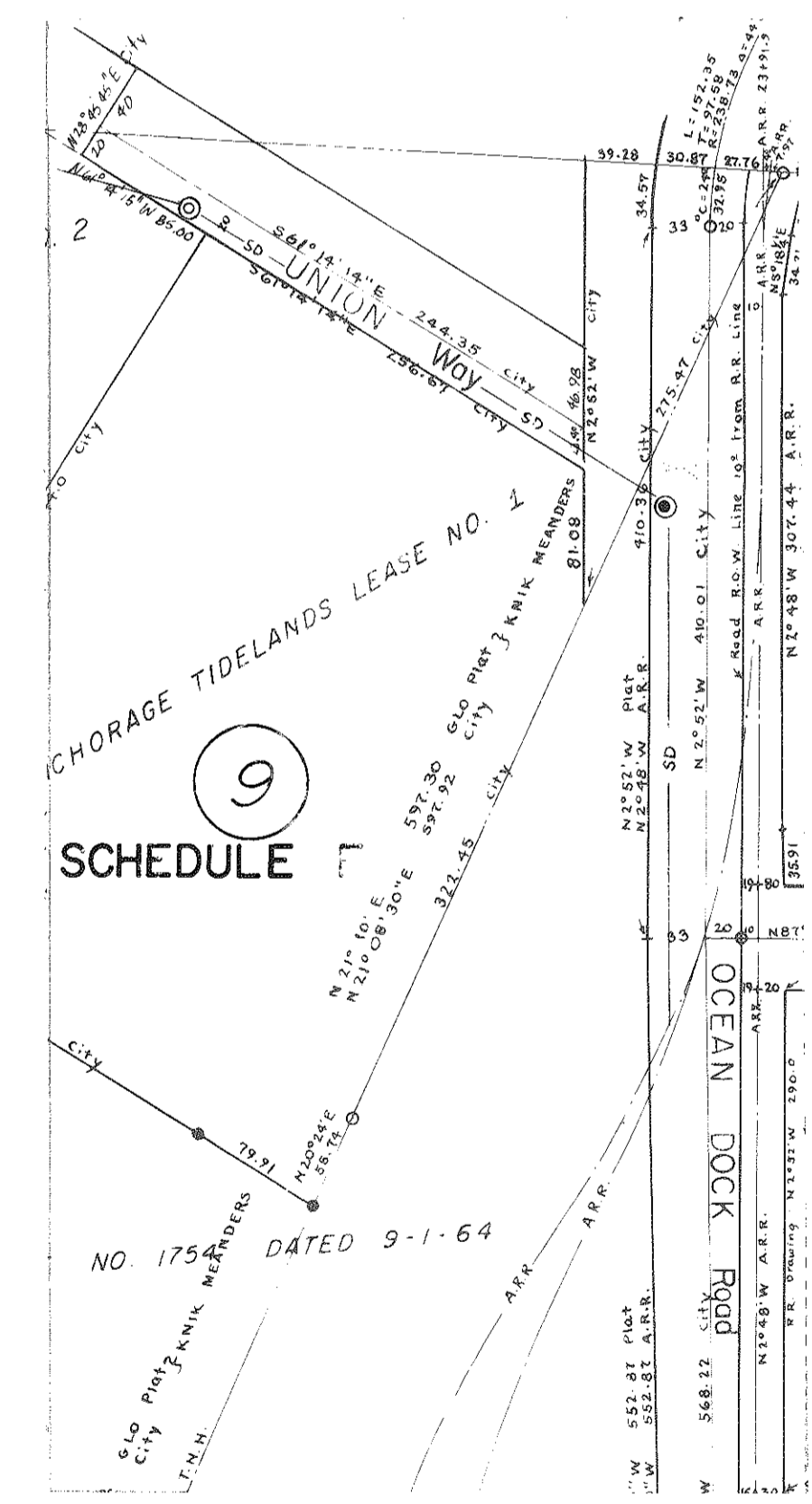
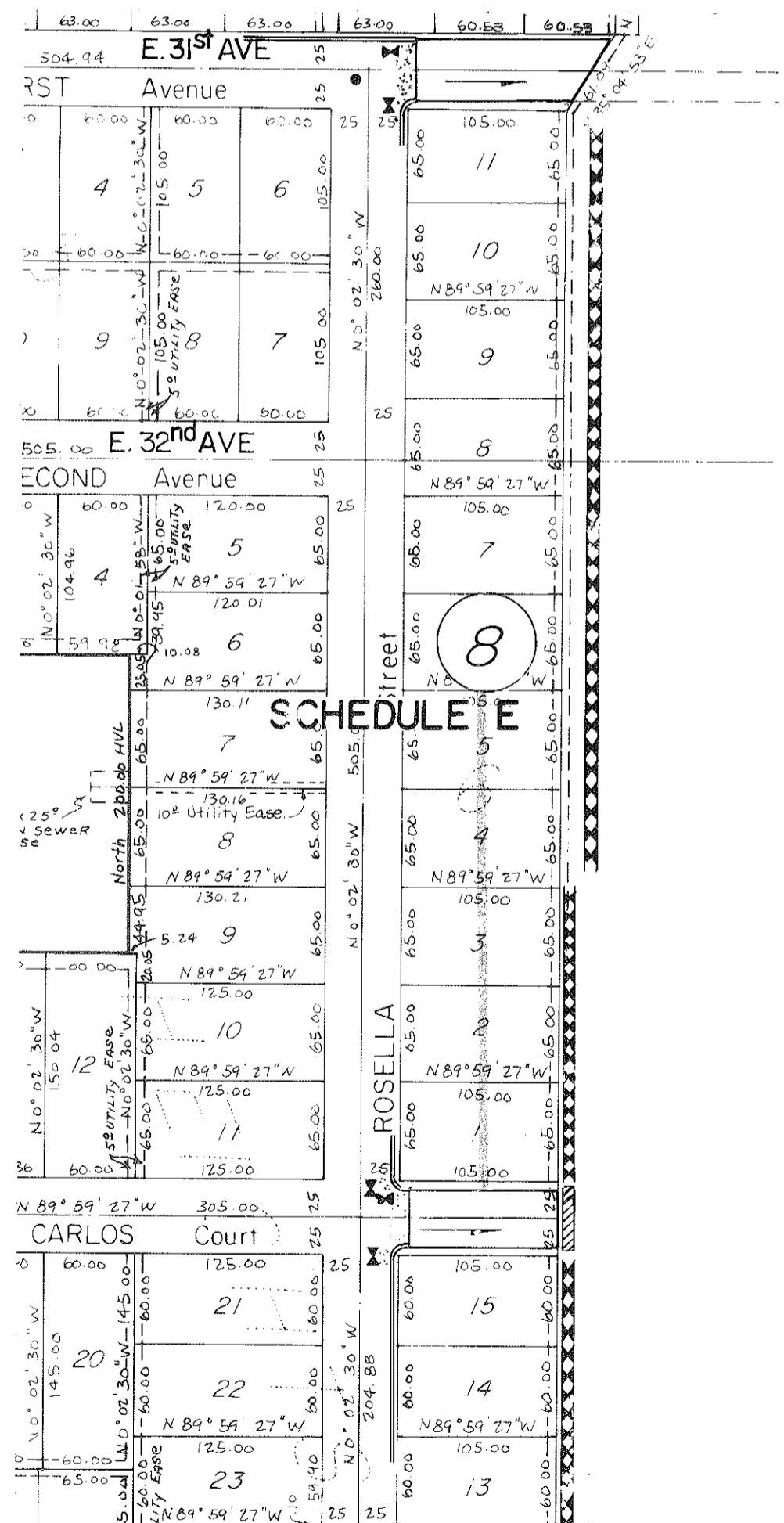
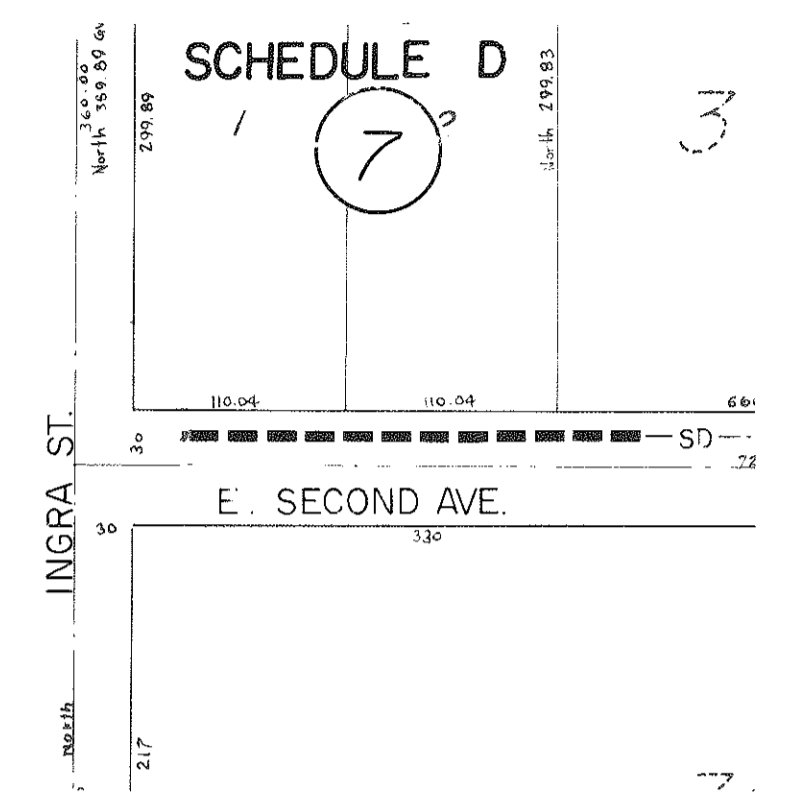
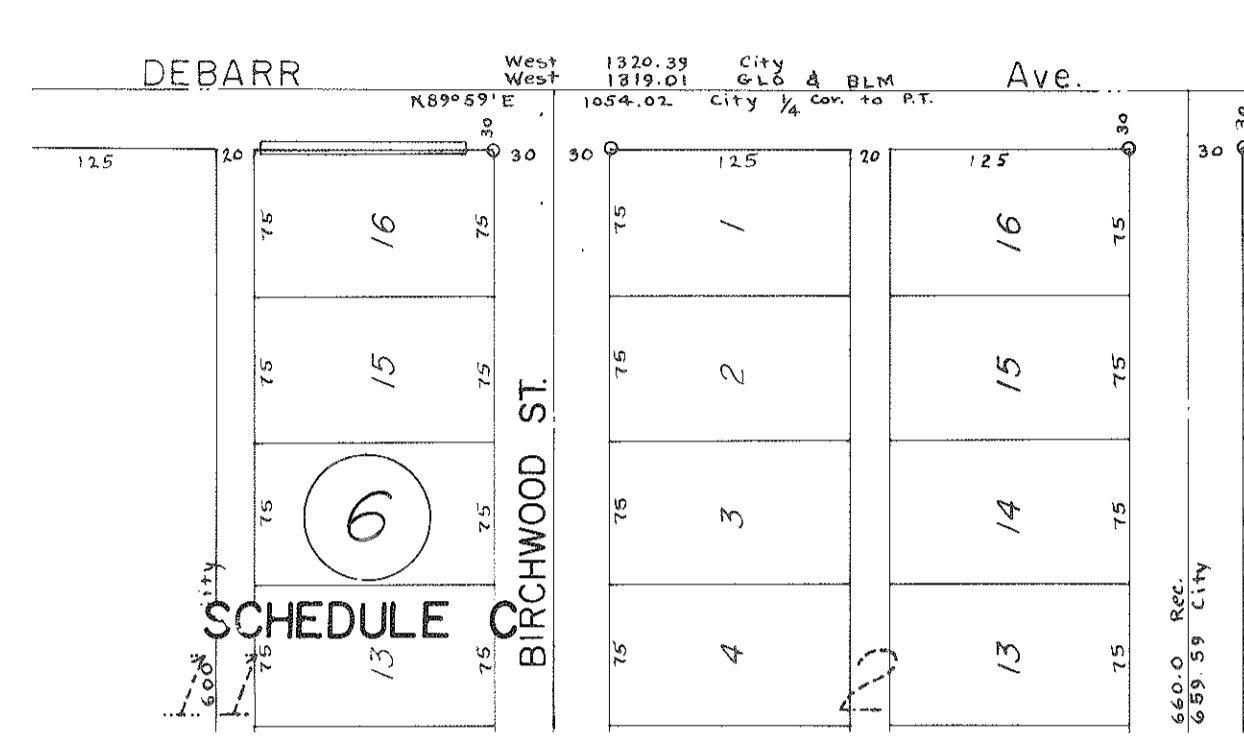
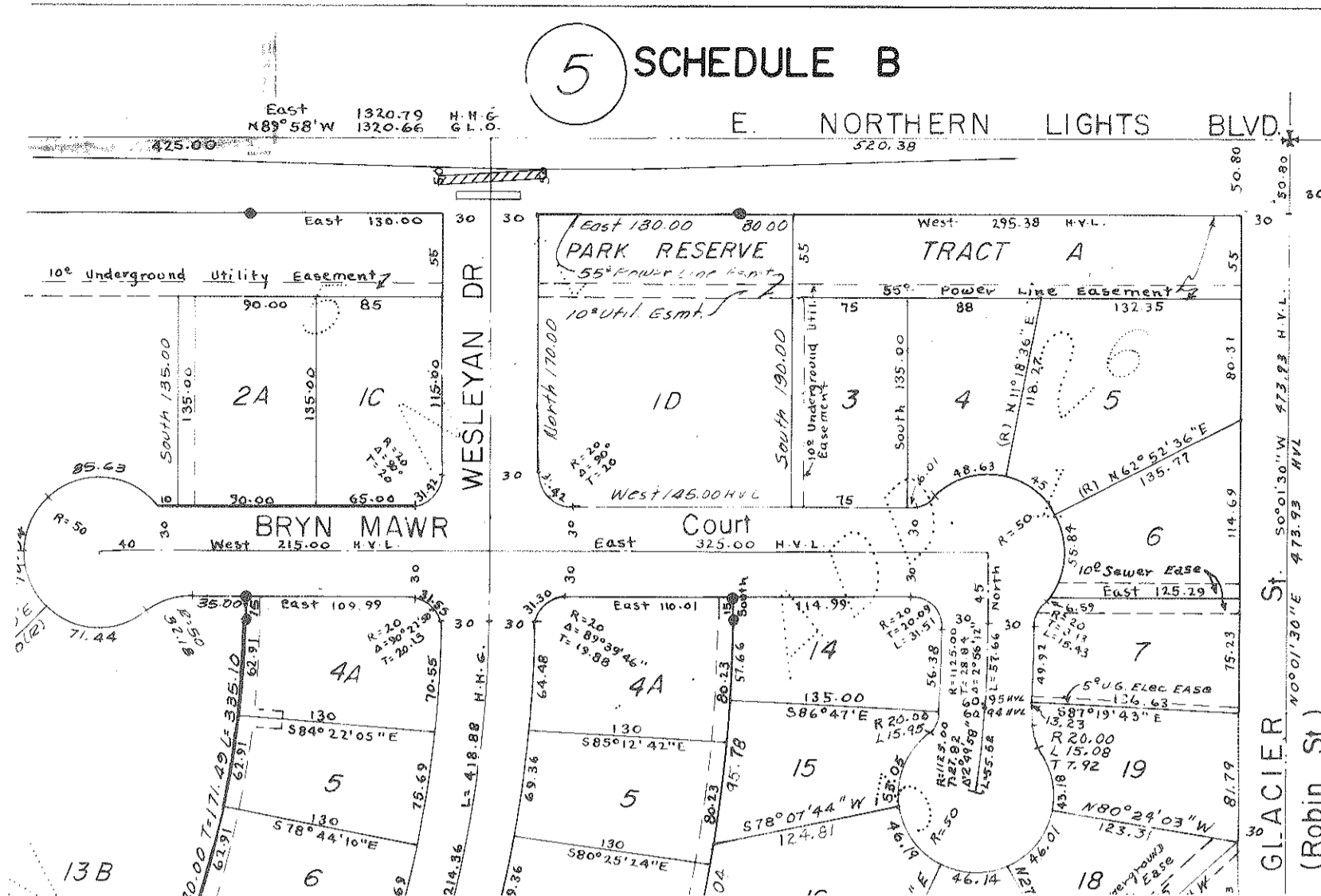
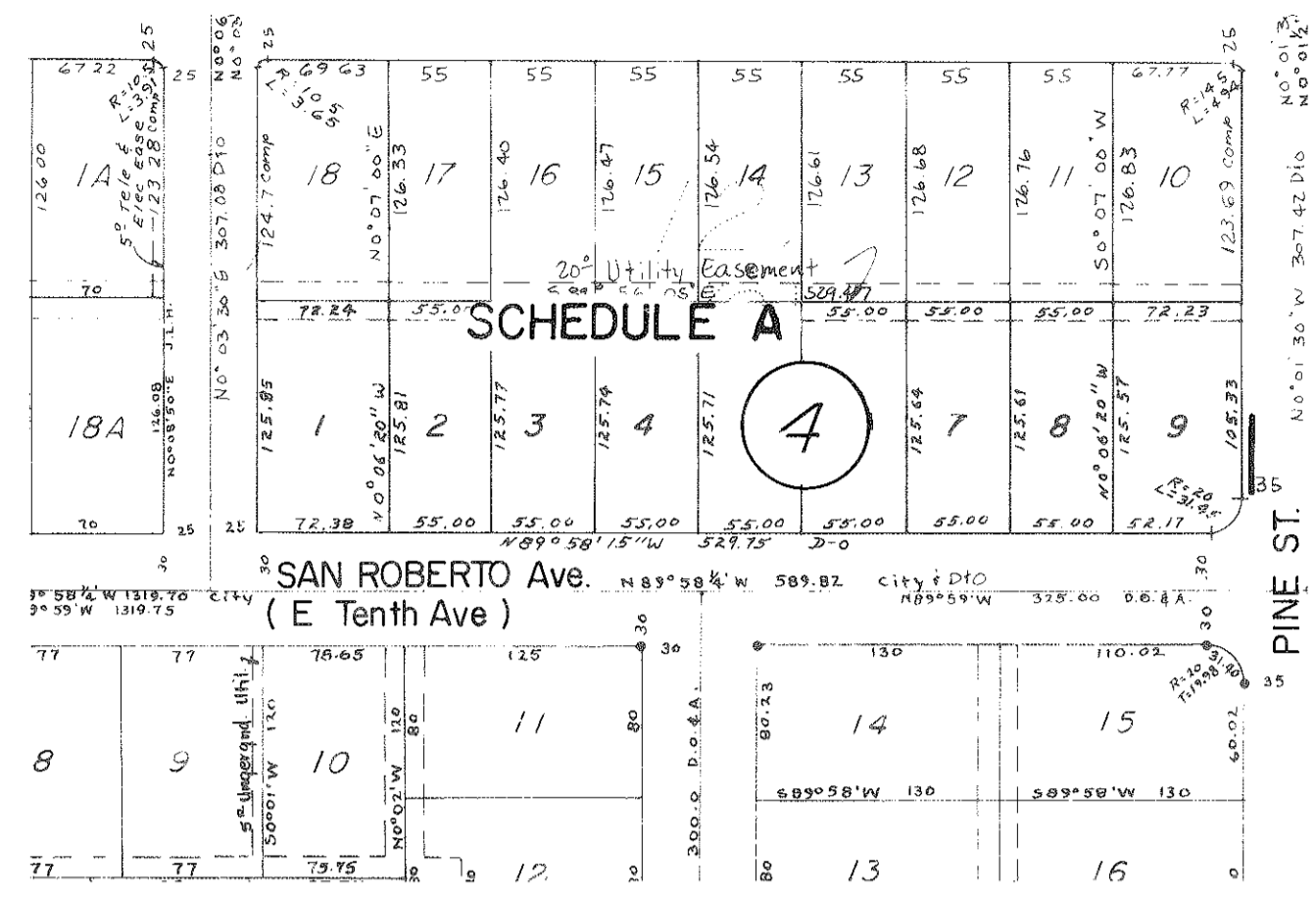
PUBLIC WORKS DEPARTMENT

1975 CONSTRUCTION 75-04
MISCELLANEOUS STREET & STORM IMPROVEMENTS NO. 1

VICINITY MAP AND LEGEND

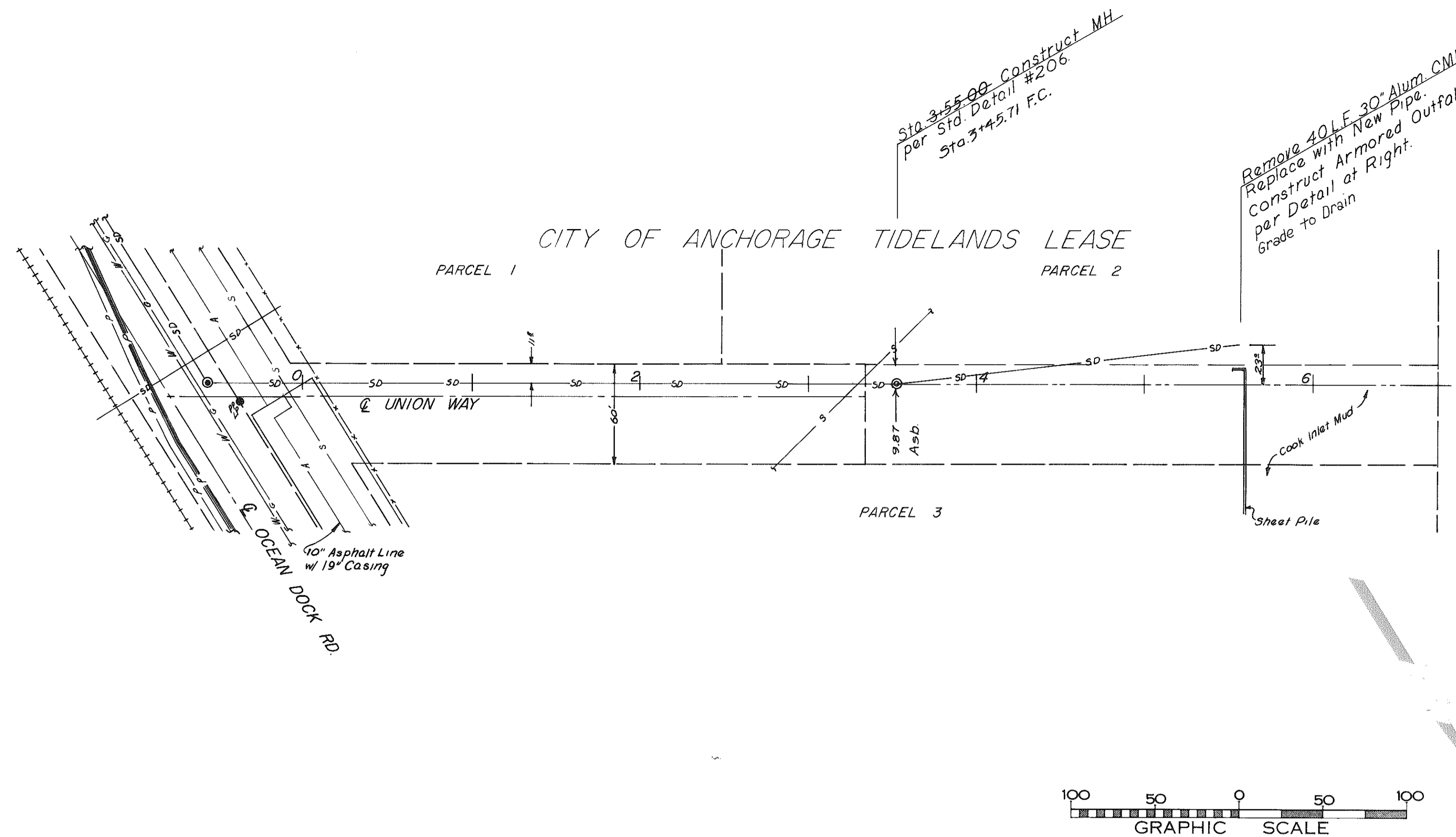
SCALE 1"=2000' DATE ACCT. NO. GRID SHEET 2 of 2

FILE NO. 1975-213

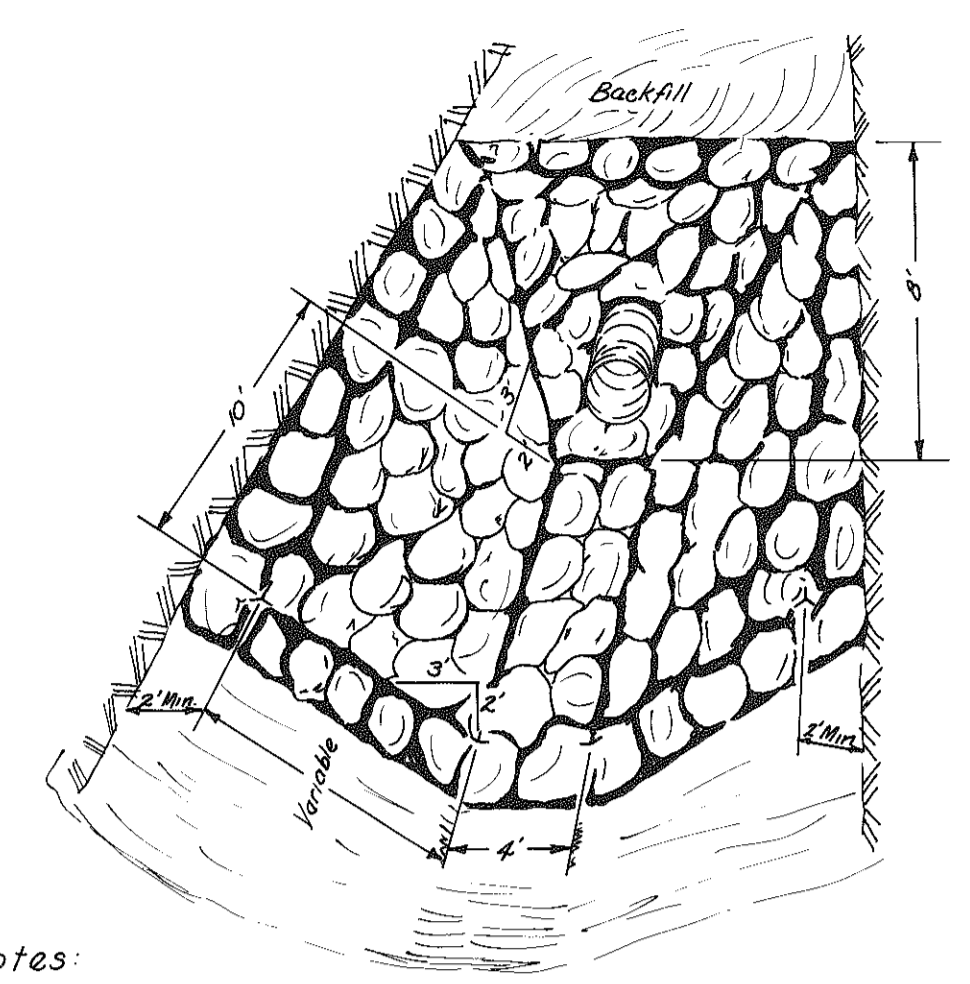


FIELD BOOKS		TBM NO.	LOCATION	ELEV.	DATA	BY	DATE	REVISIONS	DESCRIPTION	BY	DATE	DESCRIPTION	BY
DESIGN					BASE	JR			TELE				
STAKING					TOPO				ELEC				
ASBUILT	JWH 11/18/75				PROFILE				DESIGN				
					SAN SEWER				QUANTITIES				
					STORM SEWER				CITY PRELIM. CHECK				
					WATER				CITY FINAL CHECK				
					GAS				CODED BY				
CONSTRUCTION RECORD		VERTICAL DATUM		PLAN CHECK		REVISIONS		ENGINEERS		SEAL			

1975 CONSTRUCTION 75-04
 MISCELLANEOUS STREET & STORM IMPROVEMENTS NO. 1
KEY MAP
 SCALE 1" = 100'
 DATE _____ GRID _____ SHEET 3 of 12
 ACCT. NO. _____

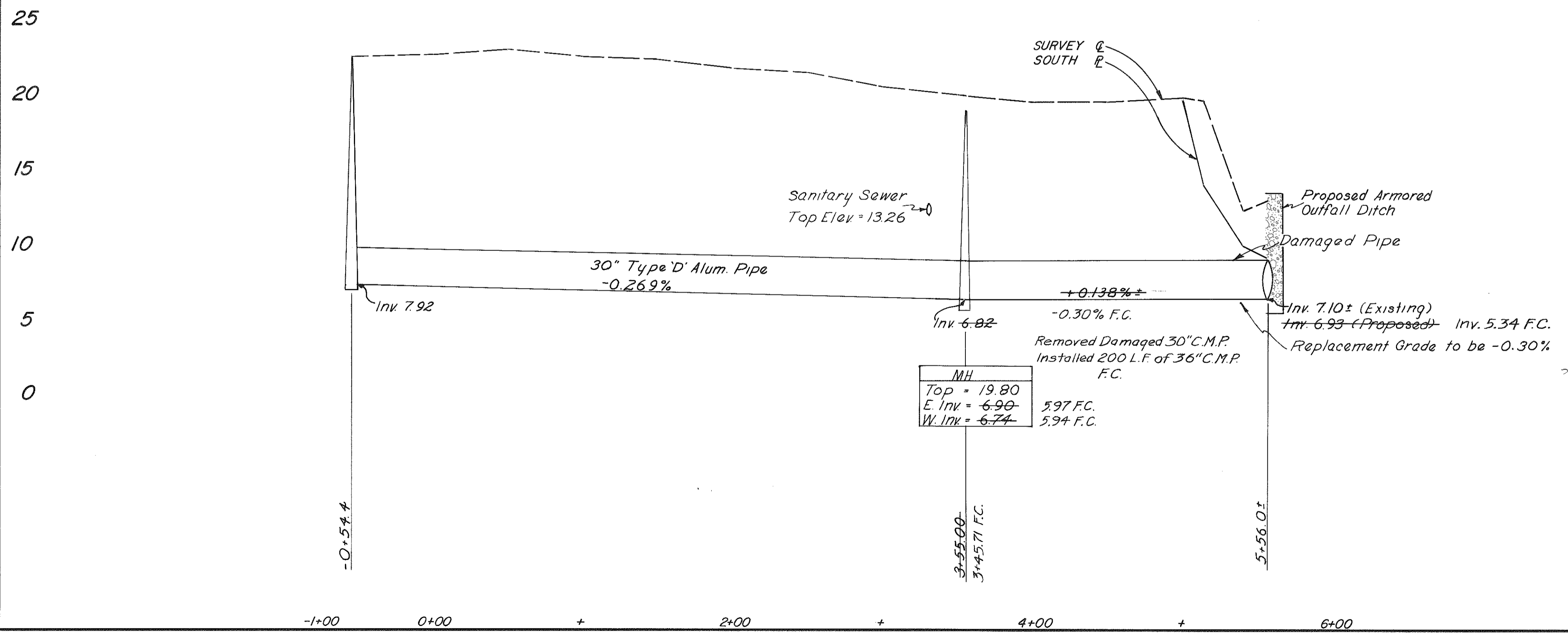
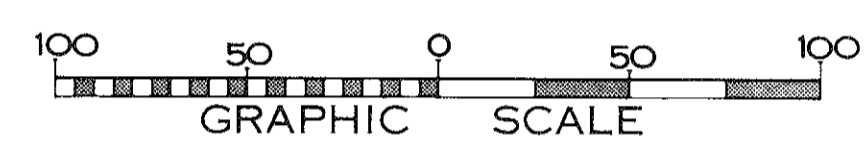


- Notes:
- All CMP to be Alum. with 30% Paved Invert and Asbestos Bonded.
 - Storm Drain From Sta. 0+54.4 to Outfall to Be Flushed & Cleaned.

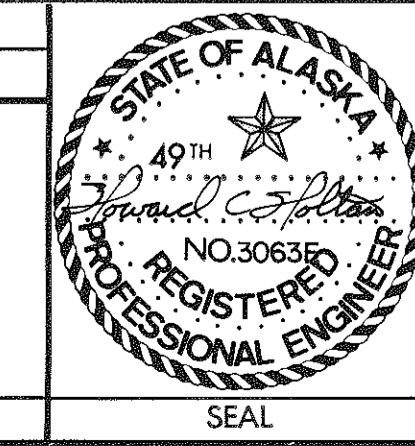


- Notes:
- Rocks shall be Hard & Angular and No more than 10% of the Stones by Total Weight shall weigh more than 400 Lbs. per Piece & No more than 15% by Weight of the Stones shall weigh less than 25 Lbs. per Piece. Stones shall be Evenly Graded & a Minimum of 50% by Weight of the Stones shall weigh 200 Lbs. or more per Piece.
 - Min. Thickness of Rip-Rap in Place shall be 2' for All Surfaces.
 - The Layout of the Rip-Rap shall conform generally to the Detail.
 - Broken Concrete may be substituted for Rocks.

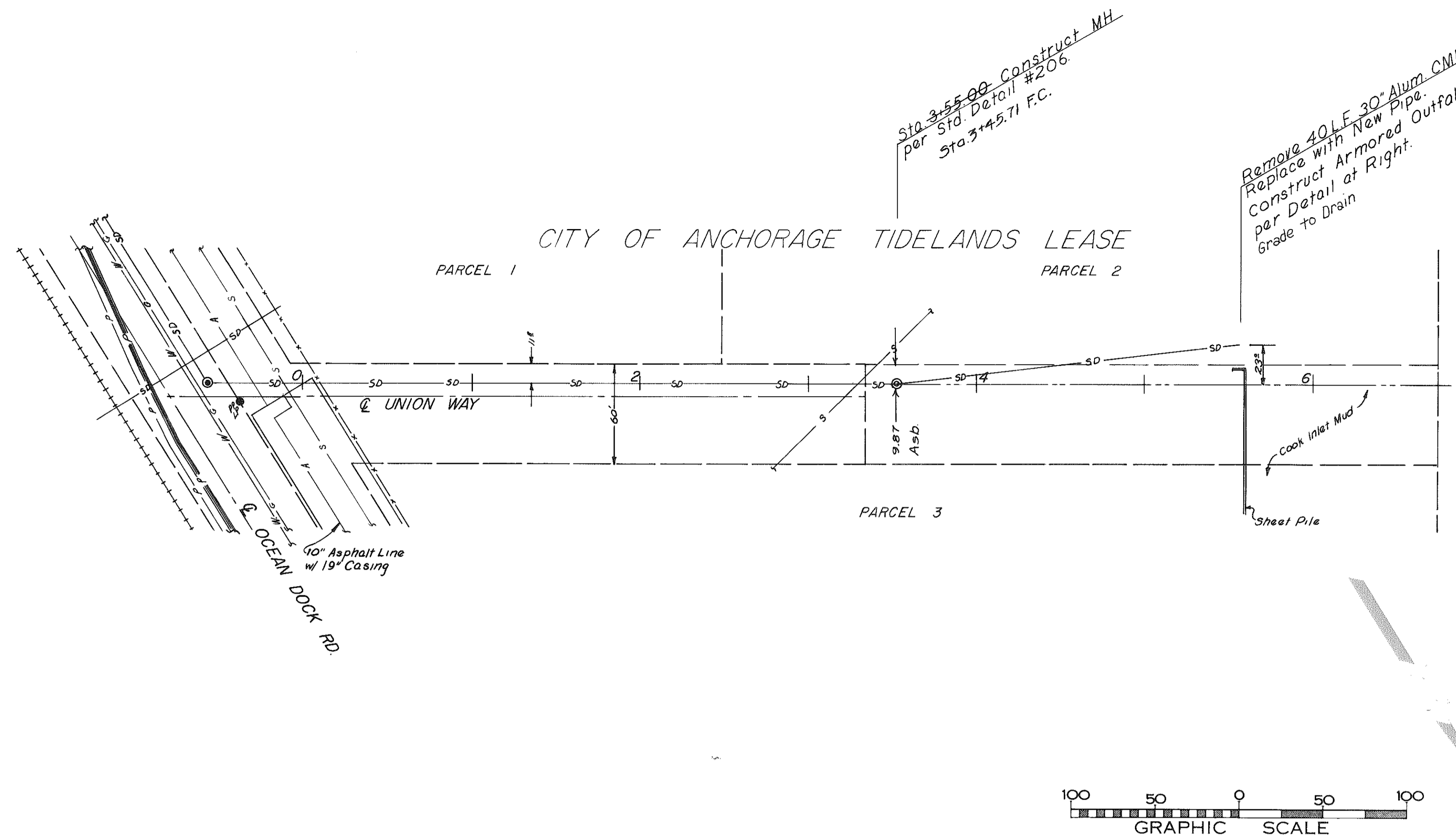
**ARMORED OUTFALL DITCH
DETAIL**
NOT TO SCALE



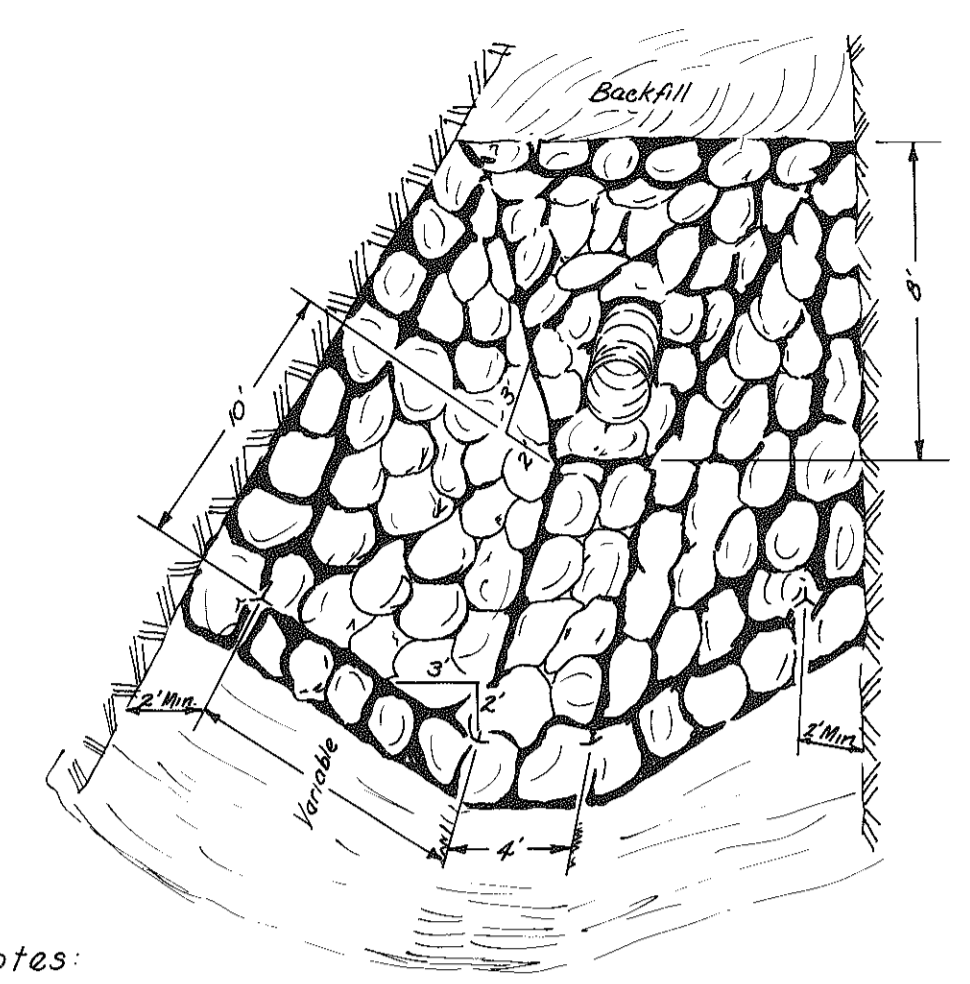
FIELD BOOKS	TBM NO.	LOCATION	ELEV.	DATA	DRAWN BY	CHECKED BY	DATA	DRAWN BY	CHECKED BY	REV	DATE	DESCRIPTION	BY	REV	DATE	DESCRIPTION	BY
DESIGN 1281, 920				BASE	SLB	1BT	TELE	SLB	1BT	1	4/9/74	Update for incl in Misc. Contract (74-04)	SLK				
STAKING				TOPO	SLB	1BT	ELEC	SLB	1BT	2	3-7-75	FORMAT REVISIONS FOR '75 CONTRACT	JR				
ASBUILT 1352 JWH 11/19/75				PROFILE	SLB	1BT	DESIGN	SLB	1BT								
CONTRACTOR				SAN SEWER	SLB	1BT	QUANTITIES	SLB	1BT								
INSPECTOR				STORM SEWER	SLB	1BT	CITY PRELIM. CHECK	SLB	1BT								
CONSTRUCTION RECORD				WATER	SLB	1BT	CITY FINAL CHECK	SLB	1BT								
				GAS	SLB	1BT	CODED BY	SLB	1BT								



PUBLIC WORKS DEPARTMENT
1975 CONSTRUCTION 75-04 SCHEDULE F
MISCELLANEOUS STREET & STORM IMPROVEMENTS NO. 1
PORT STORM IMPROVEMENTS
UNION WAY OUTFALL
SCALE HOR. 1"=50' DATE MAY 1975 GRID 1030, 1130 SHEET 9 of 12
VER. 1"=5' ACCT. NO. 62.0000.3007.10_0

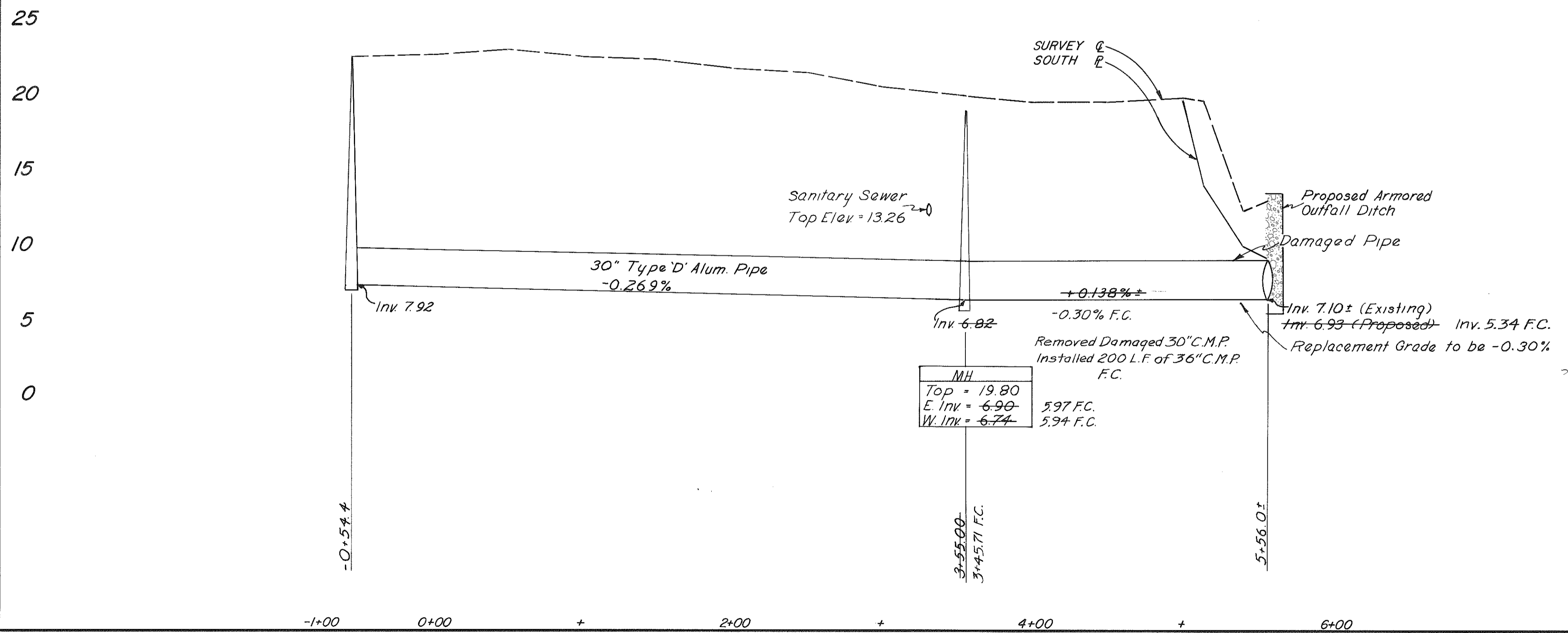


- Notes:
- All CMP to be Alum. with 30% Paved Invert and Asbestos Bonded.
 - Storm Drain From Sta. 0+54.4 to Outfall to Be Flushed & Cleaned.

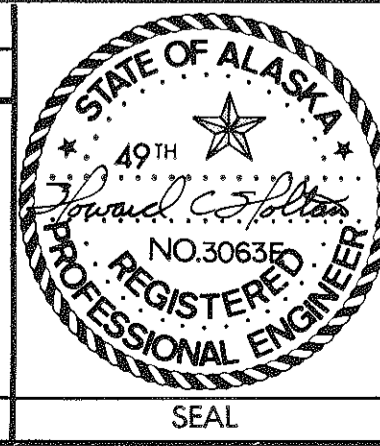


- Notes:
- Rocks shall be Hard & Angular and No more than 10% of the Stones by Total Weight shall weigh more than 400 Lbs. per Piece & No more than 15% by Weight of the Stones shall weigh less than 25 Lbs. per Piece. Stones shall be Evenly Graded & a Minimum of 50% by Weight of the Stones shall weigh 200 Lbs. or more per Piece.
 - Min. Thickness of Rip-Rap in Place shall be 2' for All Surfaces.
 - The Layout of the Rip-Rap shall conform generally to the Detail.
 - Broken Concrete may be substituted for Rocks.

**ARMORED OUTFALL DITCH
DETAIL**
NOT TO SCALE

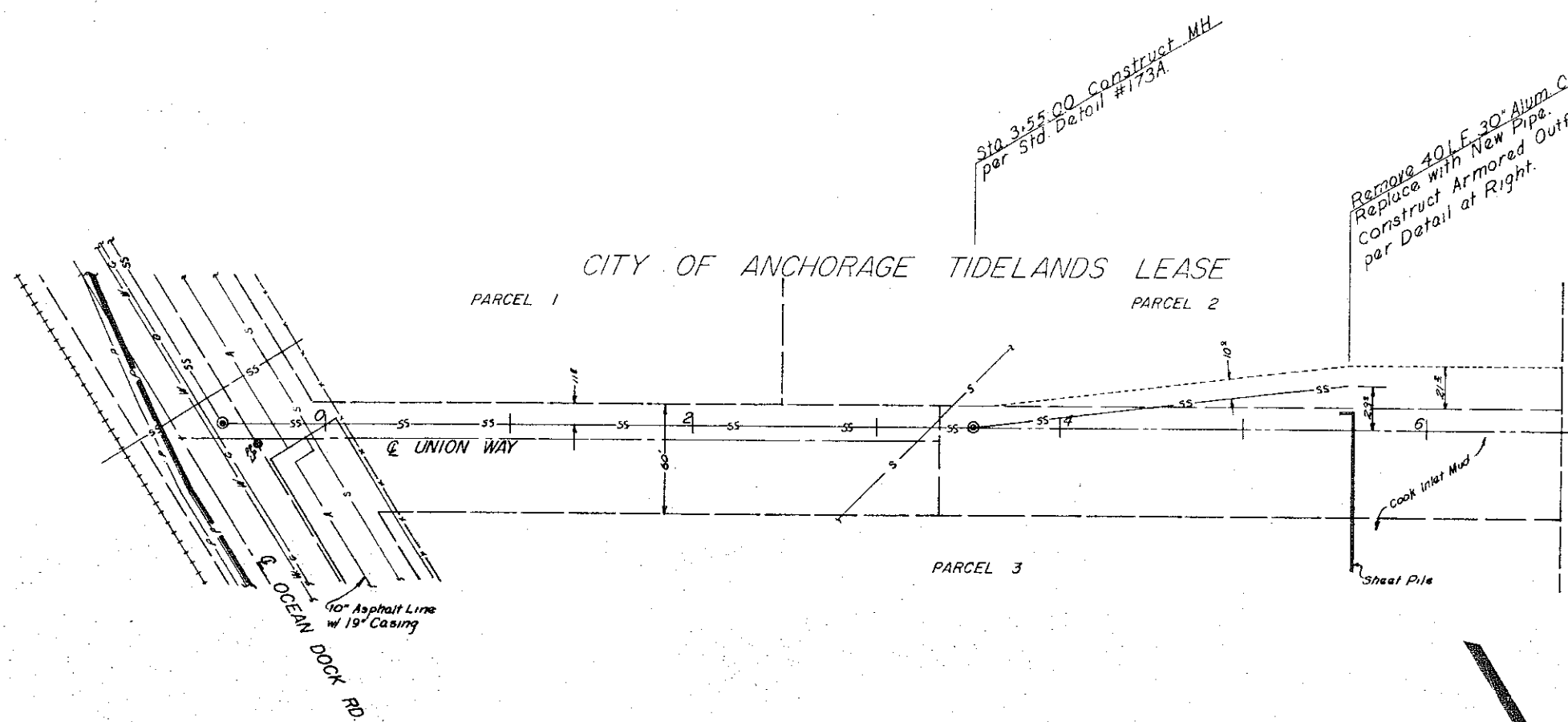


FIELD BOOKS	TBM NO.	LOCATION	ELEV.	DATA	DRAWN BY	CHECKED BY	DATA	DRAWN BY	CHECKED BY	REV.	DATE	DESCRIPTION	BY	REV.	DATE	DESCRIPTION	BY
DESIGN 1281, 920				BASE	SLB	1BT	TELE	SLB	1BT	1	4/9/74	Update for incl. in Misc. Contract (74-04)	SLK				
STAKING				TOPO	SLB	1BT	ELEC	SLB	1BT	2	3-7-75	FORMAT REVISIONS FOR '75 CONTRACT	JR				
ASBUILT 1352 JWH 11/19/75				PROFILE	SLB	1BT	DESIGN	SLB	1BT								
CONTRACTOR				SAN SEWER	SLB	1BT	QUANTITIES	SLB	1BT								
INSPECTOR				STORM SEWER	SLB	1BT	CITY PRELIM. CHECK	SLB	1BT								
CONSTRUCTION RECORD				WATER	SLB	1BT	CITY FINAL CHECK	SLB	1BT								
				GAS	SLB	1BT	CODED BY	SLB	1BT								

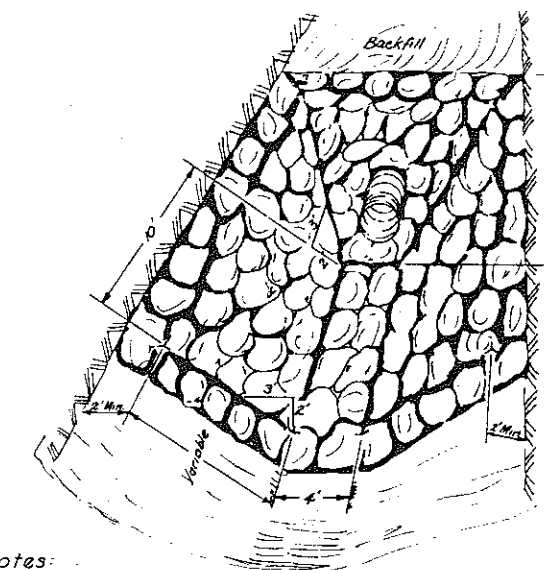


PUBLIC WORKS DEPARTMENT
1975 CONSTRUCTION 75-04 SCHEDULE F
MISCELLANEOUS STREET & STORM IMPROVEMENTS NO. 1
PORT STORM IMPROVEMENTS
UNION WAY OUTFALL

SCALE: HOR. 1" = 50' DATE MAY 1975 GRID 1030, 1130 SHEET 9 of 12
VER. 1" = 5' ACCT. NO. 62.0000.3007.10_0

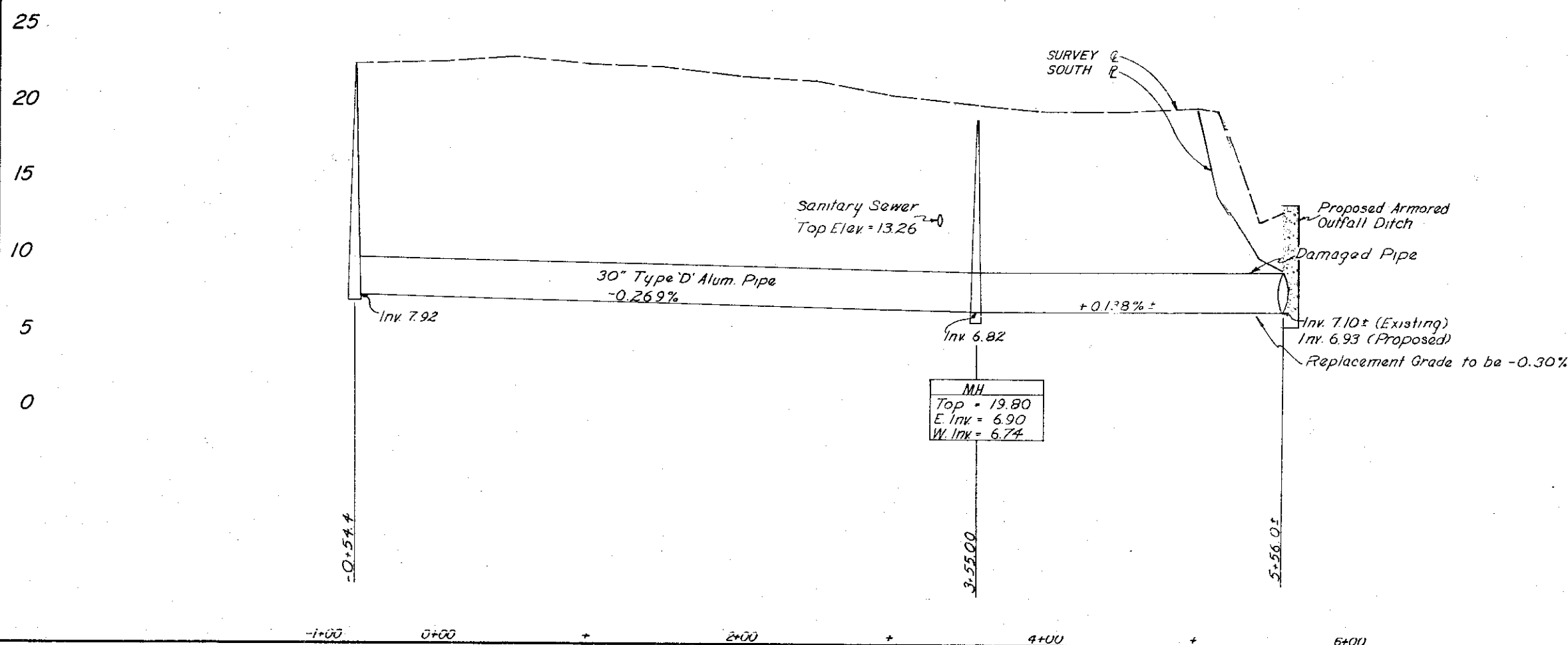
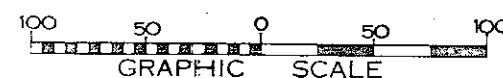


- Notes:
1. All CMP to be Alum with 30% Paved Invert and Asbestos Bonded.
 2. Storm Sewer from Sta. -0+54.4 to Outfall to be Flushed & Cleaned.
 3. The Armored Outfall Ditch shall be paid for under Bid Item "Construct Armored Outfall Ditch". Lump Sum & shall include all Work & Materials necessary to complete this item, including "Trench Excavation & Backfill" & "Pit Run Gravel."

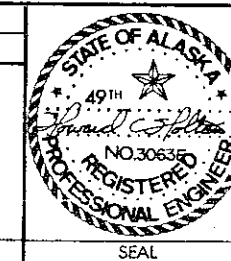


- Notes:
1. Rocks shall be Hard & Angular and No more than 10% of the Stones by Total Weight shall weigh more than 400 Lbs. per Piece & No more than 15% by Weight of the Stones shall weigh less than 25 Lbs. per Piece. Stones shall be Evenly Graded & a Minimum of 50% by Weight of the Stones shall weigh 200 Lbs. or more per Piece.
 2. Min. Thickness of Rip-Rap in Place shall be 2' for All Surfaces.
 3. The Layout of the Rip-Rap shall conform generally to the Detail.
 4. Broken Concrete may be substituted for Rocks.

**ARMORED OUTFALL DITCH
DETAIL**
NOT TO SCALE



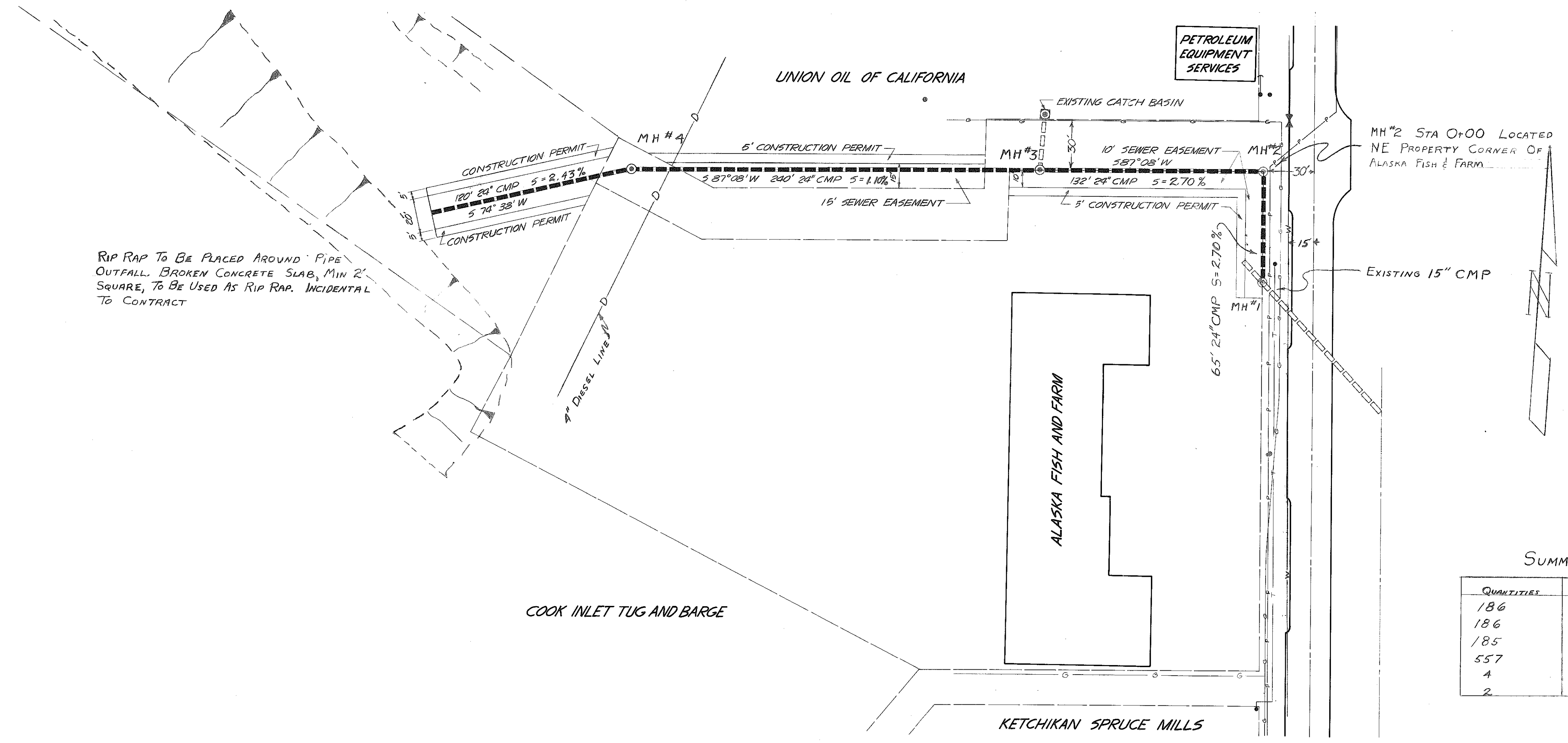
FIELD BOOKS	TBM NO.	LOCATION	ELEV.	DATA	MADE BY	DATE	DATA	MADE BY	DATE	DESCRIPTION	BY	REV. DATE	DESCRIPTION	BY
DESIGN 1281, 920				BASE	S.L.B.	1/87	TIE	S.L.B.	1/87					
STAKING				TOPO	S.L.B.	1/87	ELEC	S.L.B.	1/87					
				PROFILE	S.L.B.	1/87	DESIGN	S.L.B.	1/87					
ASBUILT				SAN SEWER	S.L.B.	1/87	QUANTITIES	S.L.B.	1/87					
CONTRACTOR				STORM SEWER	S.L.B.	1/87	CITY PRELIM. CHECK	NCH						
INSPECTOR				WATER	S.L.B.	1/87	CITY FINAL CHECK							
CONSTRUCTION RECORD				GAS	S.L.B.	1/87	COORD. BY							
							PLAN CHECK							



PUBLIC WORKS DEPARTMENT
PORT STORM IMPROVEMENTS
 UNION WAY OUTFALL
 SCALE: HOR. 1"=50' DATE: SEPT. 1973 GRID: 1030, 1130
 VER. 1"=5' ACCY. NO. 62 0000.3007.10_0 SHEET 1 of 1

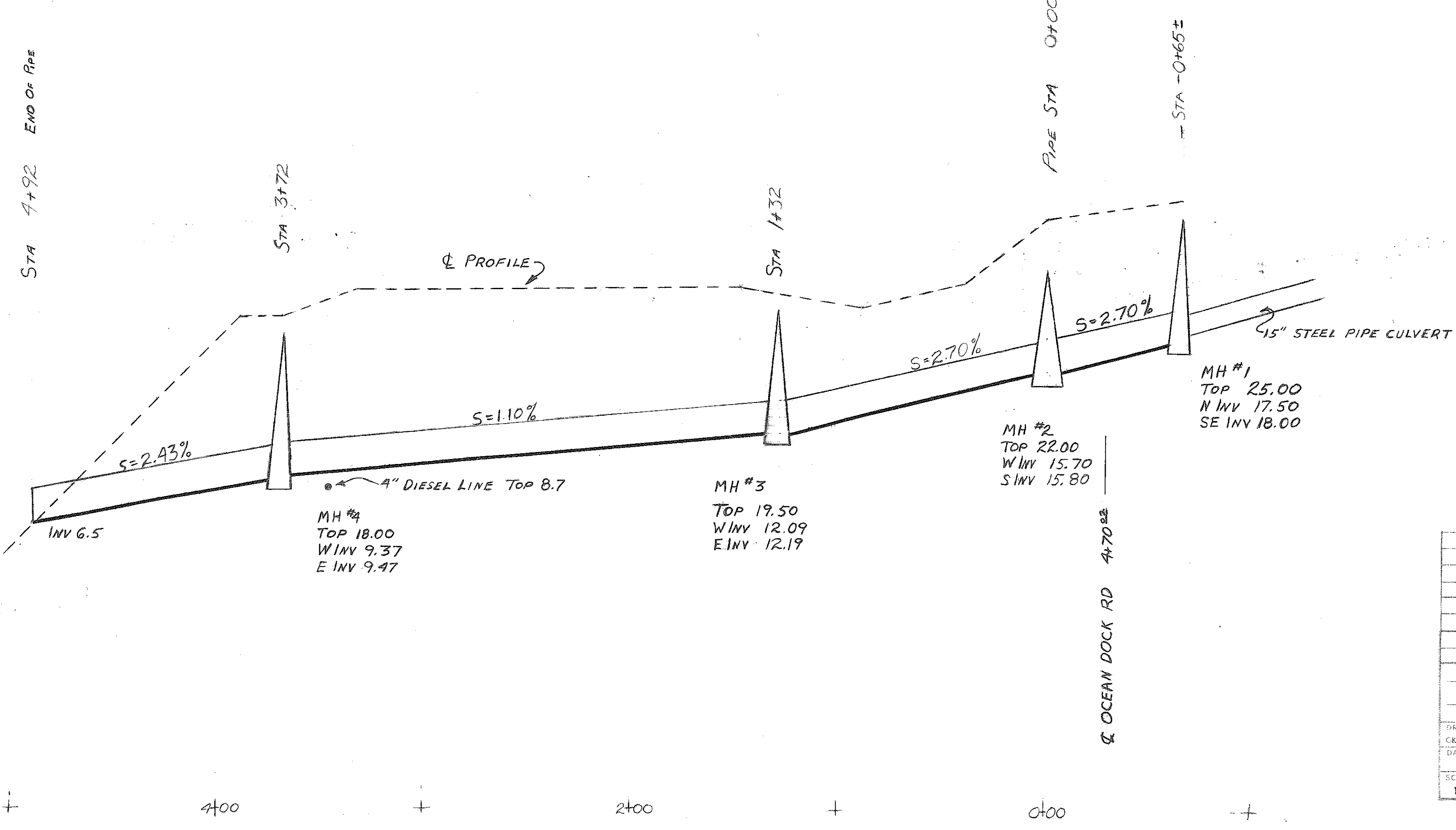
FILE NO. 1973-845

PLAN CHECKS	#
BASE SHEET	
TOPOG	
PROFILE	
SAN SEWER	
STORM SEWER	
WATER	
GAS	
TELEPHONE	
ELECTRIC	
DESIGN	
QUANTITIES	



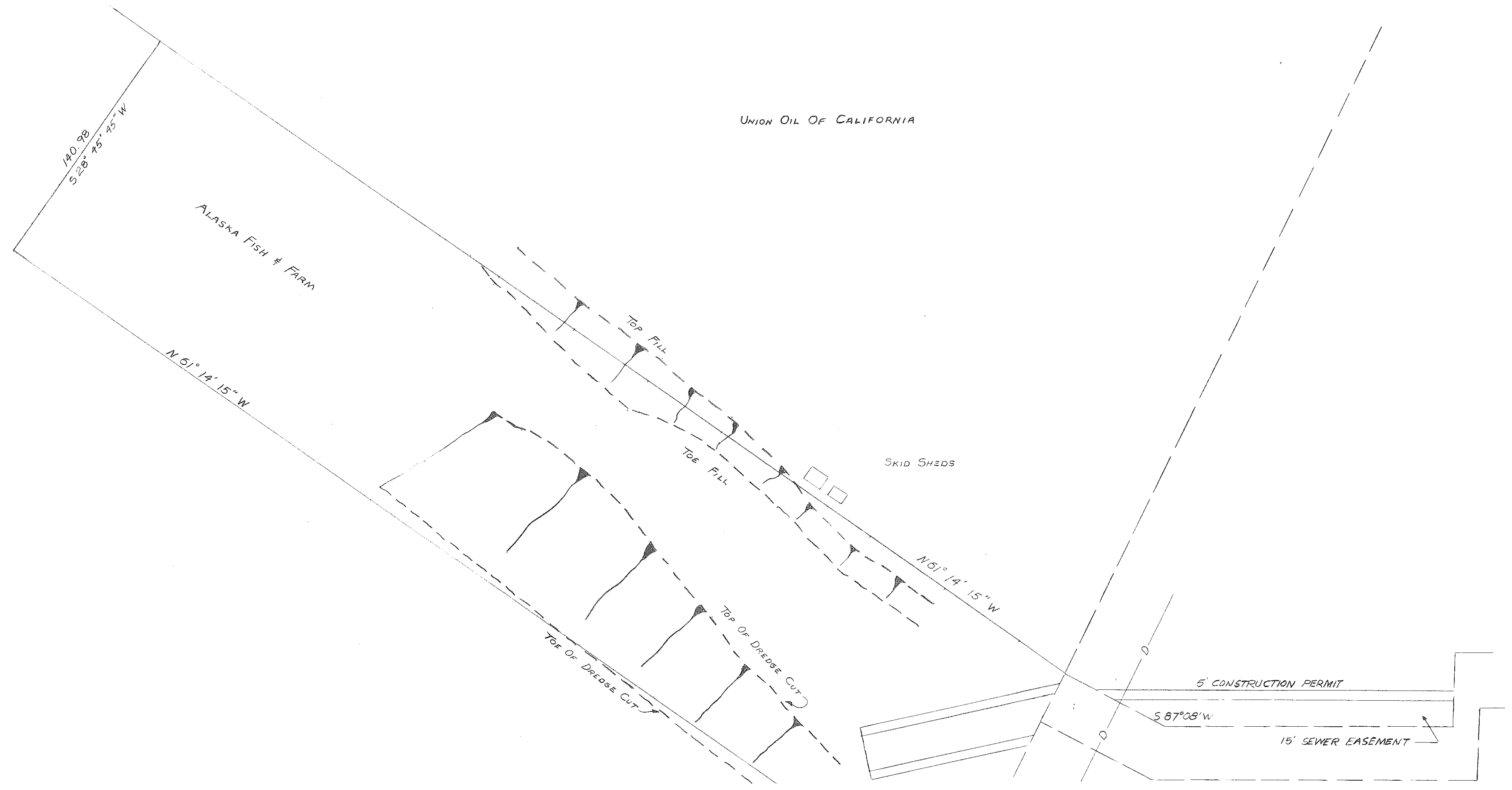
SUMMARY OF QUANTITIES

QUANTITIES	UNIT	ITEM
186	LF	EXC & BACKFILL (0-8')
186	LF	EXC & BACKFILL (0-10')
185	LF	EXC & BACKFILL (0-12')
557	LF	24" CMP
4	EA	STANDARD MANHOLES
2	LF	ADD DEPTH MANHOLE



DATE	REVISION	BY
DEPARTMENT OF PUBLIC WORKS CITY OF ANCHORAGE, ANCHORAGE, ALASKA		
ALASKA FISH & FARM		
DRAINAGE IMPROVEMENTS		
DRAWN BY TO		
CKD BY		
DATE	5-19-67	
SCALE	HORIZ 1"=40' VERT 1"=5'	
SHEET	1	OF 2
FILE NO.	157-76	

ACCT NO. 9992-0018 File No. 157-76



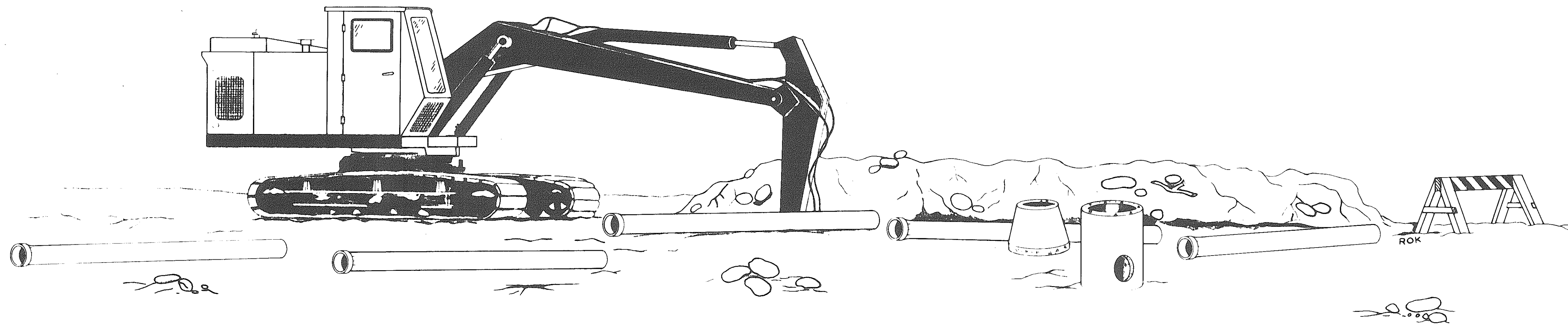
DATE	REVISION	BY
DEPARTMENT OF PUBLIC WORKS CITY OF ANCHORAGE, ANCHORAGE, ALASKA		
CITY ENGR	ALASKA FISH & FARM	
CITY MGR	DRAINAGE IMPROVEMENTS	
DRAWN BY: 76		
CKD BY:		
DATE: 5-19-67		
SCALE: HOR. 1" = 40' VERT. 1" = 5'	SHEET 2 OF 2	FILE NO. 157-77

Acct. No. 9992.0018 File No. 157-77

CITY OF ANCHORAGE

1966 CONSTRUCTION

402-66-01



**SANITARY & STORM
SEWER IMPROVEMENTS**




APPROVED BY
ROBERT H. OLDLAND
CITY MANAGER *Robert H. Oldland* 7/17/66

SCHEDULE A STORM SEWER
KEY MAP SHEET 4

SCHEDULE D SANITARY SEWER
KEY MAP SHEET 17

SCHEDULE C STORM SEWER
KEY MAP SHEET 17

SCHEDULE B STORM SEWER
KEY MAP SHEET 12

LEGEND
STORM SEWER 
OPEN DITCH 
SANITARY SEWER 

AS BUILT

DATE	REVISION	BY
	DEPARTMENT OF PUBLIC WORKS	
	CITY OF ANCHORAGE, ANCHORAGE, ALASKA	
	1966 CONSTRUCTION 402-66-01	
	STORM & SANITARY SEWER IMPROVEMENTS	
	VICINITY MAP	
DRAWN BY <i>Atchell</i>	CITY MGR	
CHKD BY <i>Atchell</i>	CITY ENGR	
DATE 4-66		
SCALE NO SCALE	SHEET 2 OF 23	FILE NO 151-95

GENERAL NOTES

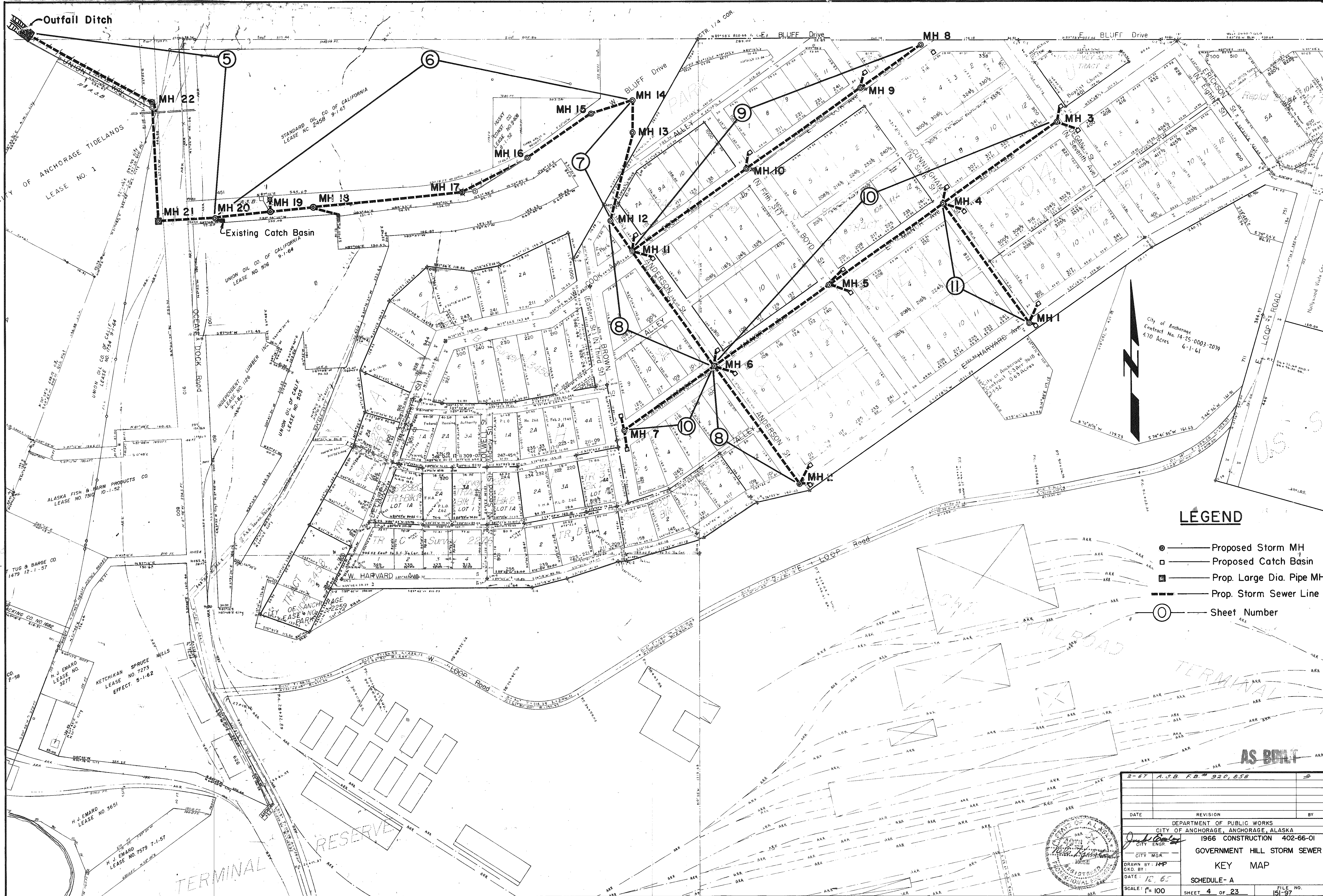
1. ALL EXISTING CULVERTS, AND TEMPORARY TYPE STORM DRAINS (MOST OF WHICH ARE SHOWN ON PLANS) ARE TO BE REMOVED AND SALVAGED WHEN POSSIBLE. THE CONTRACTOR SHALL DELIVER SALVAGED PIPE TO THE CITY YARD AT 1st AVENUE AND POST ROAD, WITHOUT EXTRA COST TO THE CITY.
2. ALL REQUIRED ADJUSTMENT & RELOCATION OF UTILITY POLES & HYDRANTS TO BE DONE BY OTHERS.
3. ALL JOINTS & TERMINATED EDGES OF EXISTING CONCRETE & A.C. PAVEMENT ARE TO BE NEATLY CUT.
4. REFER TO SPECIFICATIONS FOR STANDARD DETAILS.
5. THERE MAY BE SOME WATER AND SEWER SERVICES WHICH ARE NOT SHOWN ON THE PLANS, BECAUSE THERE ARE SOME UNRECORDED CONNECTIONS.
6. NO ATTEMPT HAS BEEN MADE TO SHOW ALL GAS SERVICE CONNECTIONS. IT IS THE CONTRACTOR'S RESPONSIBILITY TO MAKE HIMSELF AWARE OF ALL EXISTING GAS LINES (INCLUDING SERVICE CONNECTIONS) FROM ANCHORAGE NATURAL GAS CORPORATION.
7. ALL DITCHING AND GRADING NECESSARY TO PROVIDE DRAINAGE TO THE CATCH BASINS OR CATCH BASIN MANHOLES CONSTRUCTED UNDER THIS CONTRACT WILL BE DONE BY CITY FORCES AT A LATER DATE.
8. CITY FORCES WILL MAKE ALL PAVEMENT REPLACEMENTS REQUIRED BY THIS CONTRACT UNLESS OTHERWISE SPECIFIED IN THE SPECIAL PROVISIONS.
9. ALL THAW WIRES TO BE BUZZED BEFORE AND AFTER THE WORK HAS BEEN COMPLETED.

GENERAL LEGEND

▲	EXISTING SANITARY SEWER SERVICE CONNECTION
▬	STREETS TO BE PAVED
▬▶▬	STORM SEWER CONSTRUCTION ARROW INDICATES DIRECTION OF FLOW
▬S▬	STRIP PAVING
▬▬▬▬▬▬	EXISTING FACILITIES
T T	SIGNS
(X)	TREES
-X-X-	FENCES
- - - -	PROPERTY LINE
⊗	SURVEY MONUMENT
IP	IRON PIN
-T-T-	TELEPHONE UNDERGROUND
-E-E-	ELECTRICAL UNDERGROUND
[H]	ELECTRICAL HAND HOLE
-●-	UTILITY POLE & GUYS
-G-G-	NATURAL GAS UNDERGROUND
◆	GAS VALVE
KBM	KEY BOX MARKER
⊗ ⊗	KEY BOXES, EXISTING & PROPOSED
⊗ ⊗	HYDRANTS, EXISTING & PROPOSED
-W-W-	WATER LINE, EXISTING
▬▬▬▬▬▬	WATER LINE, PROPOSED
■ □	CATCH BASINS, EXISTING & PROPOSED
□ □	CATCH BASIN MANHOLES, EXISTING & PROPOSED
⊗ ⊗	STORM MANHOLES, EXISTING & PROPOSED
● ○	SANITARY MANHOLES, EXISTING & PROPOSED
● ○	SEWER CLEAN OUTS, EXISTING & PROPOSED
⋯⋯⋯	STORM SEWER, EXISTING
- - - -	STORM SEWER, PROPOSED
- - - -	SANITARY SEWER, EXISTING
- - - -	SANITARY SEWER, PROPOSED
▬▬▬▬▬▬	SIDEWALKS & PAVING TO BE REMOVED
▬▬▬▬▬▬	EXISTING CULVERTS TO BE REMOVED
R	RADIUS TO FACE OF CURB AT RETURN
G	GUARD RAIL TO BE INSTALLED
▶	DRAINAGE ARROW
▬▬▬▬▬▬	BLUFF AREA
▬▬▬▬▬▬	PIPE HAND RAIL TO BE INSTALLED

AS BUILT

DEPARTMENT OF PUBLIC WORKS CITY OF ANCHORAGE ENGINEERING DIVISION	
1966 CONSTRUCTION 402-66-01	
GENERAL NOTES & LEGEND	
DATE	4/66
SCALE	N/A
SHEET 3 OF 23	
151-96	



LEGEND

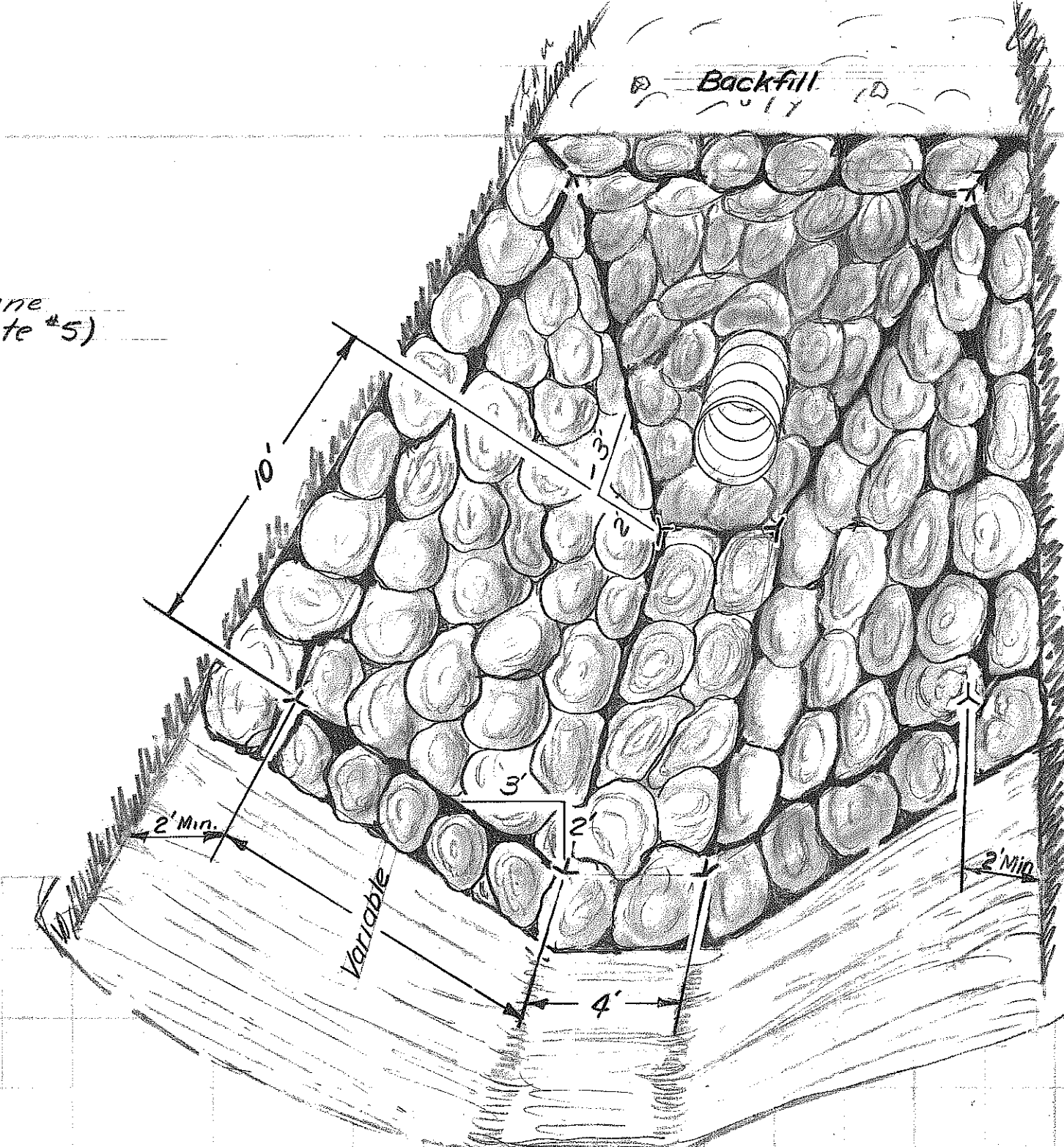
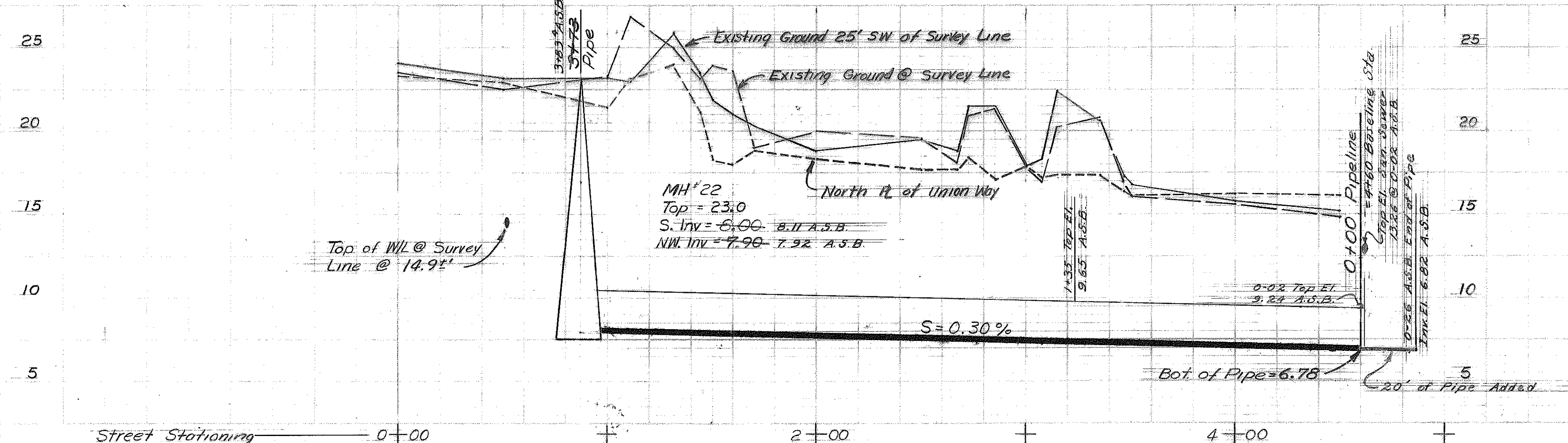
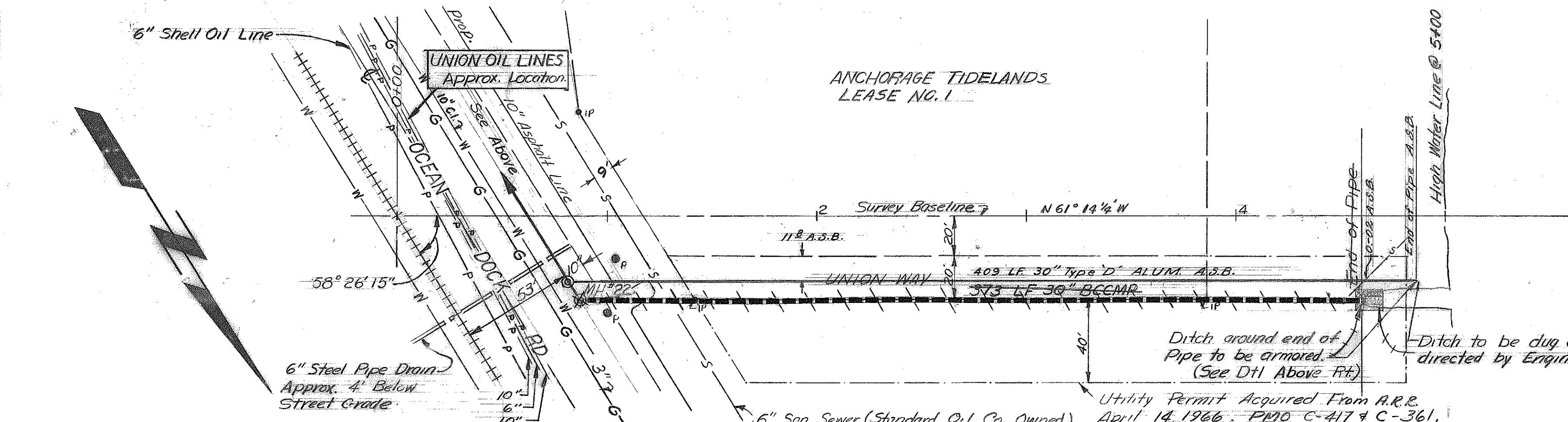
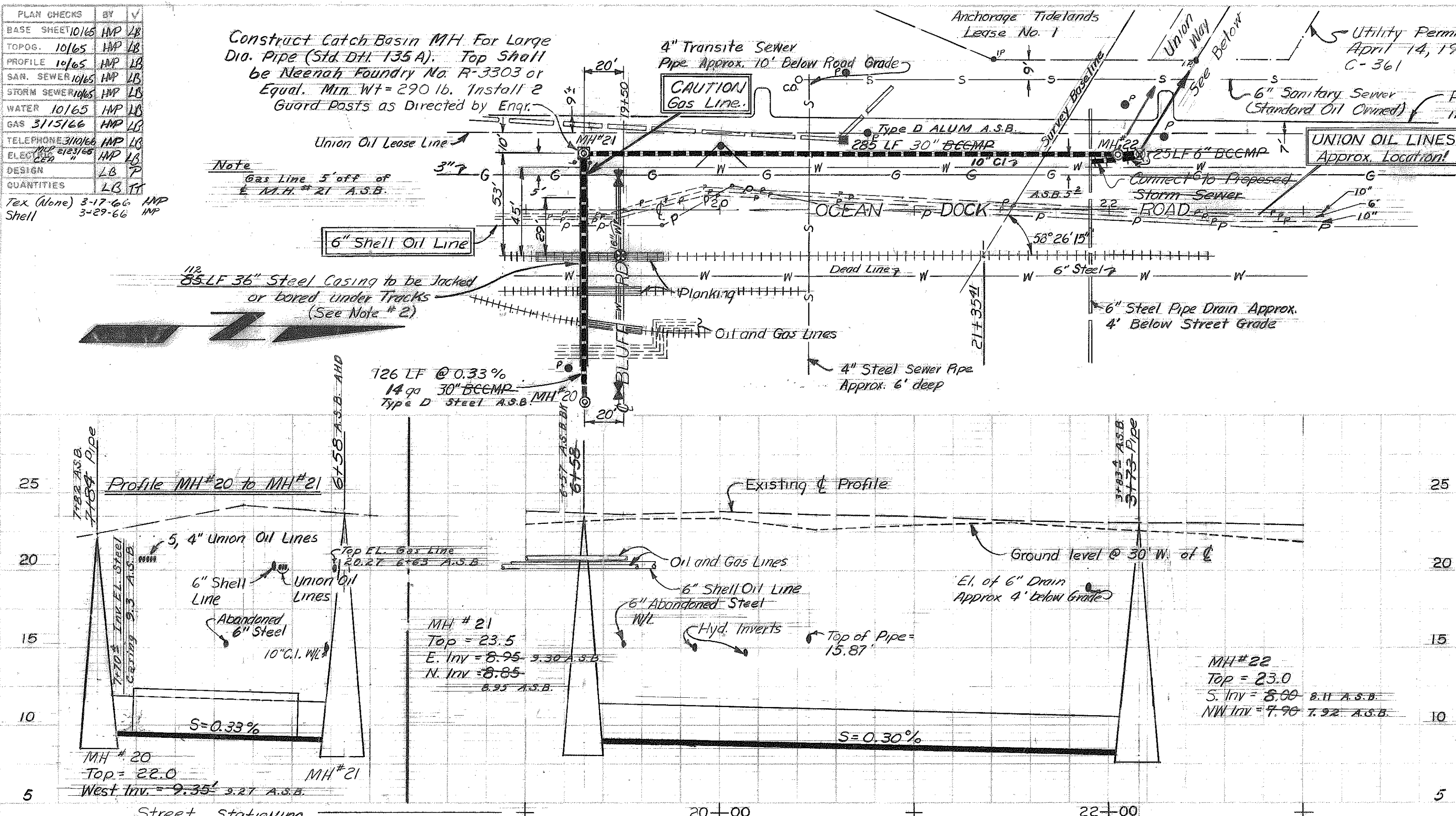
- — Proposed Storm MH
- — Proposed Catch Basin
- — Prop. Large Dia. Pipe MH
- — Prop. Storm Sewer Line
- — Sheet Number

2-67 A.S.B. F.B. 920, 858		
DATE	REVISION	BY
DEPARTMENT OF PUBLIC WORKS CITY OF ANCHORAGE, ANCHORAGE, ALASKA		
1966 CONSTRUCTION 402-66-01		
GOVERNMENT HILL STORM SEWER		
KEY MAP		
SCHEDULE - A		
DRAWN BY: H.P.	CITY ENGR. <i>Walter Agnew</i>	FILE NO. 151-97
DATE: 10-65	SCALE: 1"=100'	SHEET 4 OF 23

PLAN CHECKS	BY	✓
BASE SHEET	10/65	HP/LB
TOPOS	10/65	HP/LB
PROFILE	10/65	HP/LB
SAN. SEWER	10/65	HP/LB
STORM SEWER	10/65	HP/LB
WATER	10/65	HP/LB
GAS	3/15/66	HP/LB
TELEPHONE	3/15/66	HP/LB
ELECTRICAL	3/15/66	HP/LB
DESIGN	LB	HP
QUANTITIES	LB	HP
TEXT (ALONE)	3-17-66	HP
SHEET	3-29-66	HP

Construct Catch Basin MH For Large Dia. Pipe (Std. DH. 135 A). Top Shell be Neenah Foundry No. R-3303 or Equal. Min. WT = 290 lb. Install 2 Guard Posts as Directed by Engr.

Note
Gas Line 5' off of E. Side of #21 A.S.B.



- NOTES:
1. Rocks Shall be Hard & Angular and Shall Vary in Weight from 20 to 400 Lbs. Each, Not Less Than 25% Shall Weigh Over 200 Lbs.
 2. Minimum Thickness of the Rip Rap in Place Shall be 2' For all Surfaces.
 3. The Layout of the Rip Rap Shall Conform Generally to the Detail.

NOTE: PIPELINE STATIONING APPLIES ON THIS SHEET.

- NOTES
1. All pipe from Manhole 20 to the Outfall shall be Bituminous Coated CMP with 30% Paved Invert. Contractor shall use 30" BCCMP (Steel Only) with 30% Paved Invert inside 36" Steel Casing with 3/8" Min. Wall Thickness.
 2. All MH's shall conform to Std. DH. #10 except MH 21.
 3. All BCCMP shall be Asbestos Bonded.
 4. The 10" Asphalt Line Encased in 19" Casing is slated for construction during 1966 Season by Union Oil Co. It is the Contractor's responsibility to determine if this line is in place when he crosses its location.
 5. Ditch between MH 20 & MH 22 to be compacted to 90% Maximum Density as Directed by the Engr.

QUANTITIES THIS SHEET		
QUANT	UNIT	DESCRIPTION
25	LF	Trench Excavation & Backfill (10'-0")
110	LF	Trench Excavation & Backfill (0'-10")
160	LF	Trench Excavation & Backfill (0'-12")
429	LF	Trench Excavation & Backfill (Over 12")
2	Eq.	Const. Catchment Bottom MH (DH. #10A)
658	LF	Furnish & Install 30" BCCMP (30% Paved Invert, 14 Ga. Asbestos Bonded)
60	LF	Trench to be dug at Outfall (See Detail)
750	CY	Disposal of Unsuitable Material from Trench
750	CY	Furnish, Haul, and Spread Pit Run Gravel
85	LF	Furnish and Install 36" Steel Casing to be Jacked Under Tracks (3/8" Min. Wall Thickness)
1	Eq.	Construct Catch Basin Manhole for Large Dia. Pipe (Std. DH. 135 A)
97	S.Y.	Furnish and Place Rip Rap
126	L.F.	Furnish & Install 30" BCCMP (Steel Only, 30% Paved Invert, 14 Ga. Asbestos Bonded)
25	L.F.	Furnish & Install 6" BCCMP 16 Ga. Asbestos Bonded
351	L.F.	Compact Ditch to 90% Maximum Density

AS BUILT

1-87 A.S.B. P.B. # 320

DATE: _____ REVISION: _____ BY: _____

DEPARTMENT OF PUBLIC WORKS
CITY OF ANCHORAGE, ALASKA

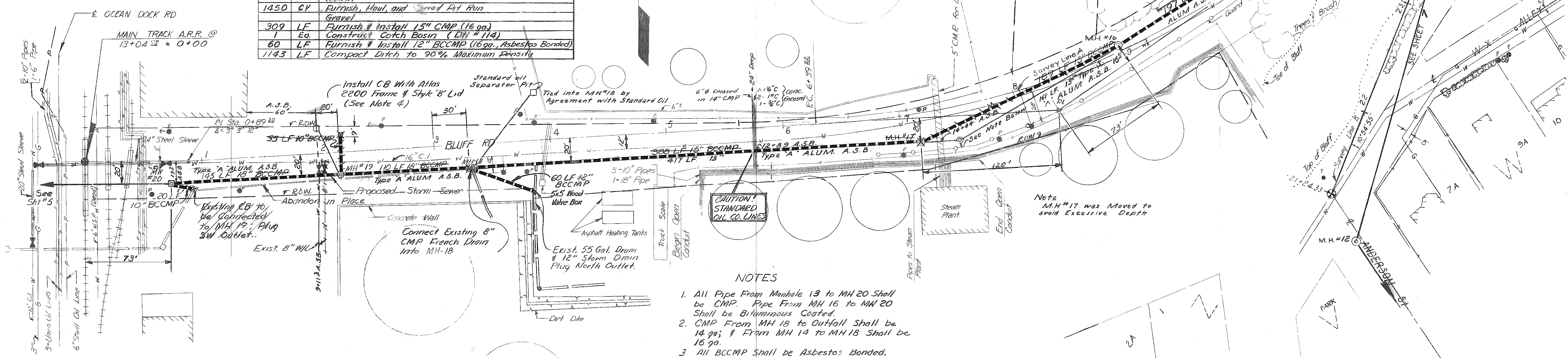
1966 CONSTRUCTION 402-66-01
WEST GOV. HILL DRAINAGE
OCEAN DOCK RD. SCHEDULE-A
BLUFF ROAD TO UNION WAY
UNION WAY
OCEAN DOCK TO MUD FLATS

SCALE: HOR 1" = 40'
VERT 1" = 5'

SHEET 5 OF 23 FILE NO. 151-98

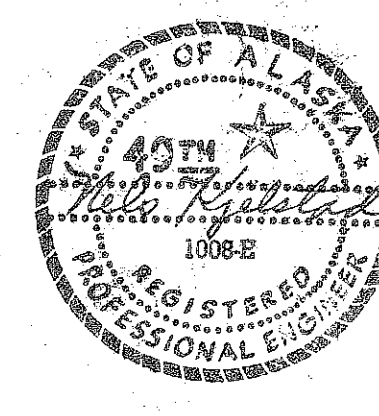
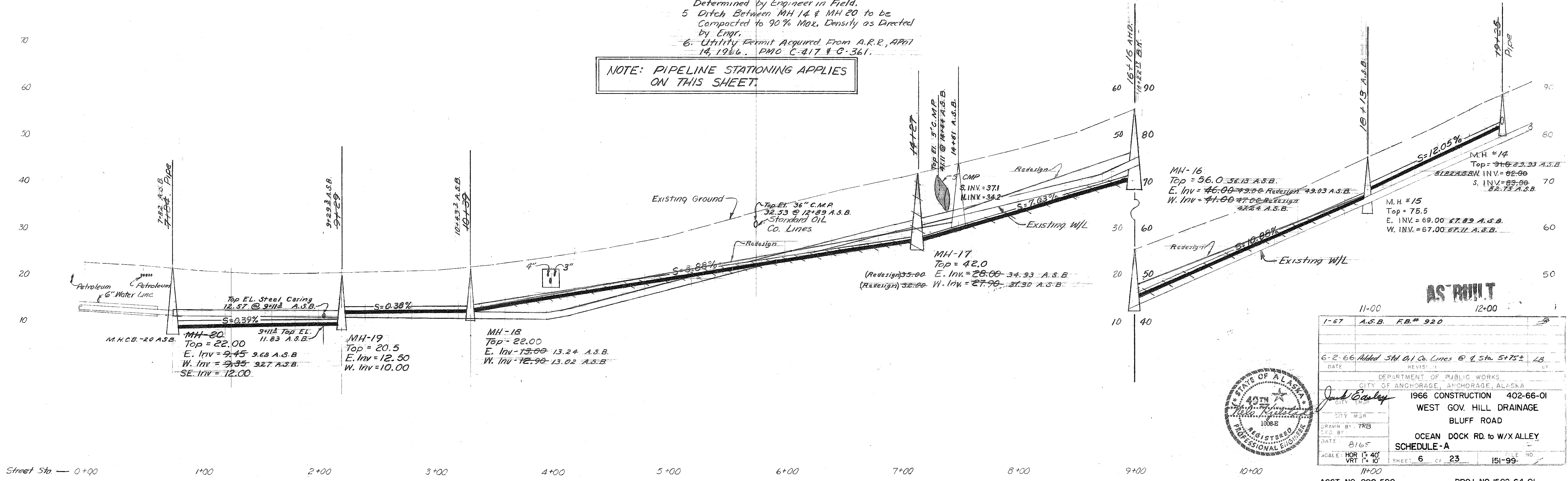
8-45 TRB LB
 8-45 TRB LB
 8-45 TRB LB
 8-45 TRB LB
 8-45 TRB LB
 3-15-66 MP LB
 3/10/66 MP LB
 MP 12/1/66 MP LB
 CE 12/1/66 MP LB
 LB T
 LB T
 Tex (None) 3-17-66 MP

QUANT	UNIT	DESCRIPTION
175	LF	Trench Excavation & Backfill (0-8')
365	LF	Trench Excavation & Backfill (0-10')
290	LF	Trench Excavation & Backfill (0-12')
426	LF	Trench Excavation & Backfill (over 12')
255	LF	Furnish and Install 18" BCCMP (14 ga. Asbestos Bonded)
577	LF	Furnish and Install 15" BCCMP (14 ga. Asbestos Bonded)
55	LF	Furnish and Install 10" BCCMP (16 ga. Asbestos Bonded)
6	EQ.	Construct Catchment Bottom Manhole (DH 110A)
1	EQ.	Connect to existing Catch Basin
1450	CV	Disposal of unsuitable Mat'L from Trench
1450	CV	Furnish, Haul, and Spread Pit Run Gravel
309	LF	Furnish & Install 15" CMP (16 ga.)
1	EQ.	Construct Catch Basin (DH #114)
60	LF	Furnish & Install 12" BCCMP (16 ga. Asbestos Bonded)
1143	LF	Compact Ditch to 90% Maximum Density



- NOTES**
- All Pipe From Manhole 13 to MH 20 Shall be CMP. Pipe From MH 16 to MH 20 Shall be Bituminous Coated.
 - CMP From MH 18 to Outfall Shall be 14 ga.; & From MH 14 to MH 18 Shall be 16 ga.
 - All BCCMP Shall be Asbestos Bonded.
 - Exact Location & Elevation of C.B. to be Determined by Engineer in Field.
 - Ditch Between MH 14 & MH 20 to be Compacted to 90% Max. Density as Directed by Engr.
 - Utility Permit Acquired From A.R.R. April 14, 1966. PMO C-417 & C-361.

NOTE: PIPELINE STATIONING APPLIES ON THIS SHEET.



AS BUILT

1-67 A.S.B. FB# 920

6-2-66 Added Std Oil Co. Lines @ 8 Sta 5+75± LB

DATE: 8/16/65

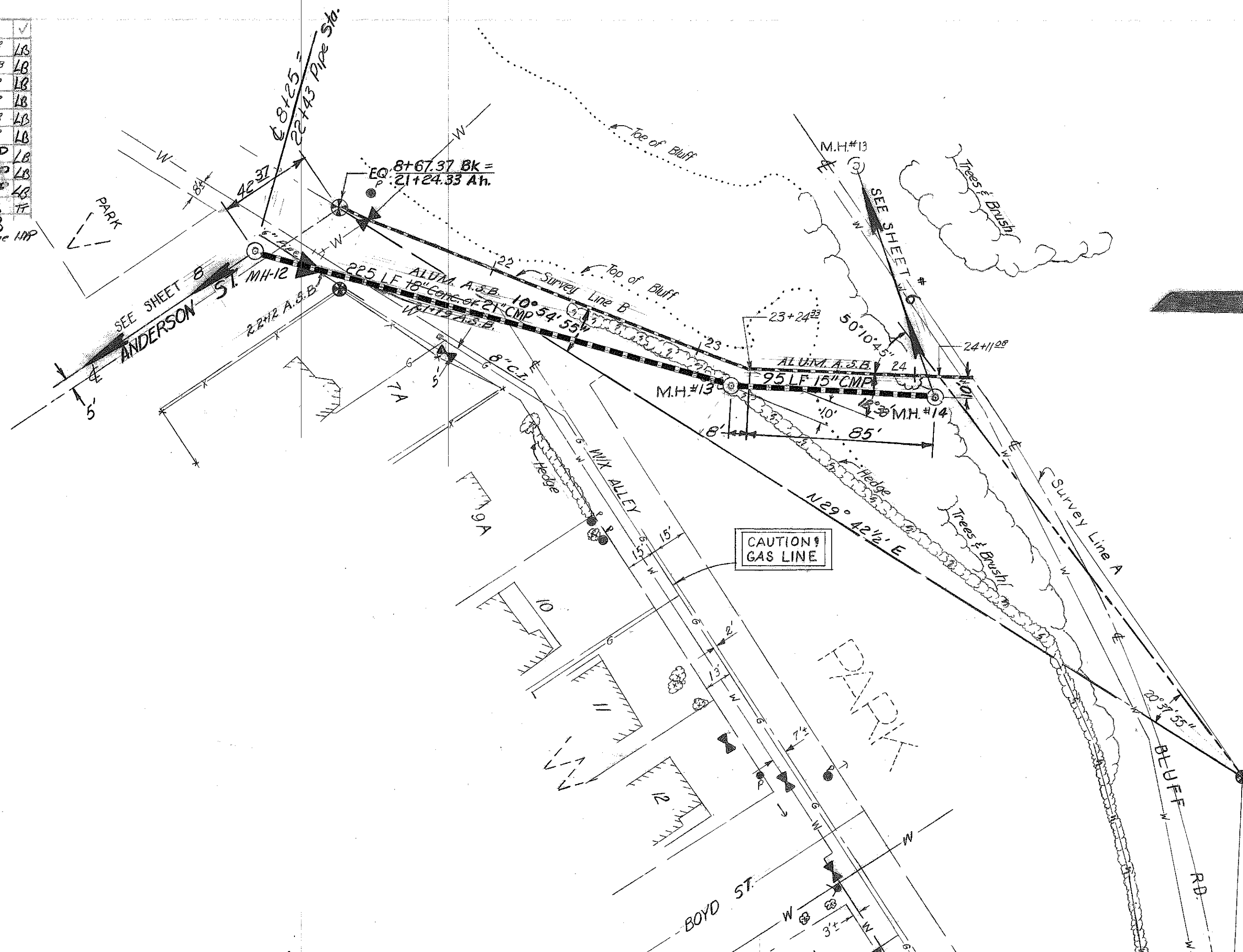
SCALE: HOR 1" = 40' VRT 1" = 10'

11-00 12-00

1966 CONSTRUCTION 402-66-01
 WEST GOV. HILL DRAINAGE
 BLUFF ROAD
 OCEAN DOCK RD. to W/X ALLEY
 SCHEDULE - A

ACCT. NO. 999.590 PROJ. NO. 1502-64-01

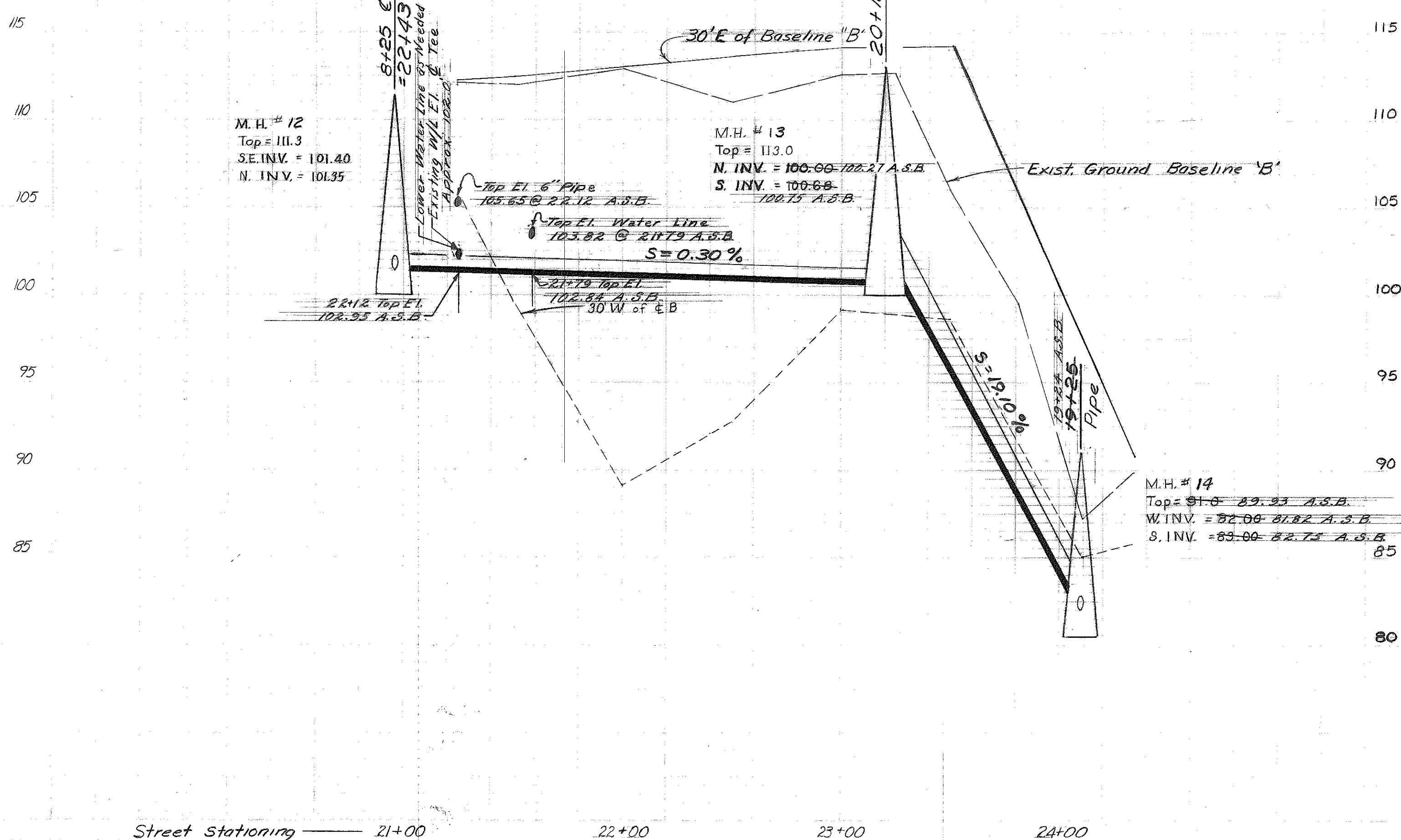
PLAN CHECKS	BY	✓
BASE SHEET	TRB	LB
TOPOG.	TRB	LB
PROFILE	TRB	LB
SAN. SEWER	TRB	LB
STORM SEWER	TRB	LB
WATER	TRB	LB
GAS	TRB	LB
TELEPHONE	TRB	LB
ELECT.	TRB	LB
DESIGN	TRB	LB
QUANTITIES	TRB	LB
RC5	3/25/66	None HAP



QUANTITIES THIS SHEET	
QUANT	DESCRIPTION
161 LF	Trench Excavation & Backfill (0-12')
159 LF	Trench Excavation & Backfill (over 12')
225 LF	Furnish & Install 18" Concrete or 21" CMP (16 Ga.)
95 LF	Furnish & Install 15" CMP (16 Ga.)
1 Ea	Construct Catchment Bottom MH (Depth 110A)
25 CY	Dispose of unsuitable Mat'l from Trench.
25 CY	Furnish, Haul, and Spread Pit Run Gravel.
1 Ea	Lower Existing Water Line

NOTES.

- The Sewer Line From MH 12 to MH 13 Shall Have a 30% Paved Invert With Asbestos Bonding, if CMP is Used.



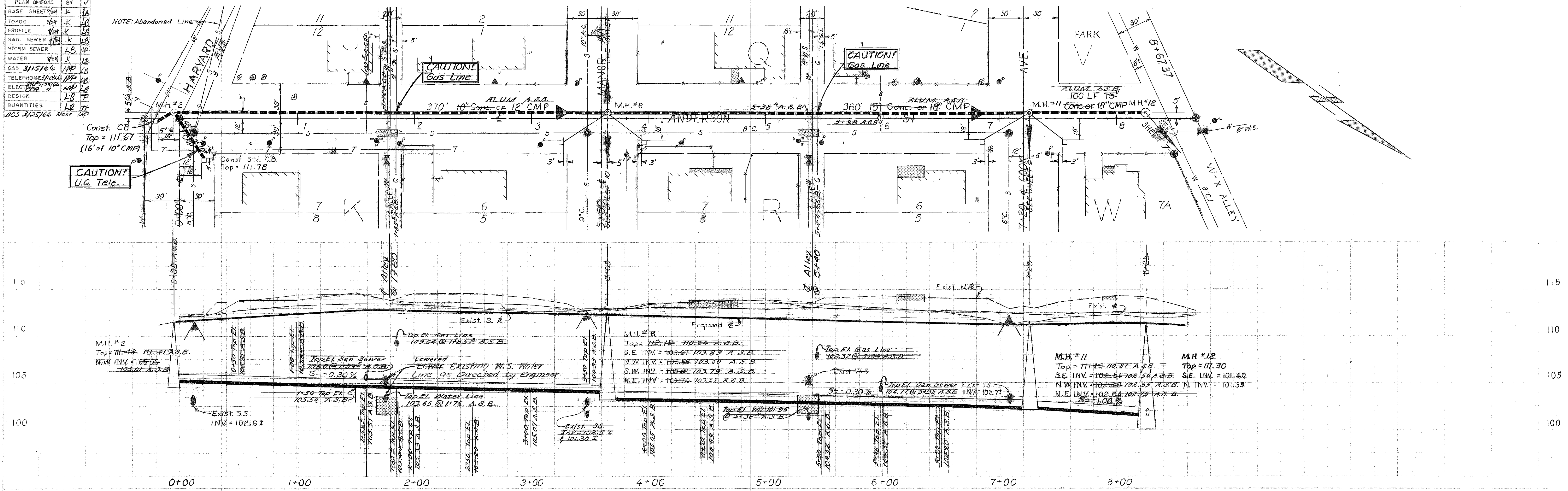
NOTE: PIPELINE STATIONING APPLIES ON THIS.

AS BUILT



1-67	A.S.B.	F.B. # 920	
DATE	REVISION	BY	
DEPARTMENT OF PUBLIC WORKS CITY OF ANCHORAGE, ANCHORAGE, ALASKA			
CITY MGR. <i>Jack Cowley</i>		1966 CONSTRUCTION 402-66-01	
WEST GOV. HILL DRAINAGE			
BLUFF ROAD CURVE			
DRAWN BY: TRB		GKD. BY:	
DATE: 8-65		SCALE: HOR 1" = 40'	
SCALE: VRT 1" = 5'		SHEET 7 OF 23	
FILE NO.		151:100	

PLAN CHECKS	BY	✓
BASE SHEETS	JK	16
TOPOG.	JK	18
PROFILE	JK	18
SAN. SEWER	JK	18
STORM SEWER	LB	18
WATER	JK	18
GAS	3/15/66	18
TELEPHONE	3/10/66	18
ELECTRICAL	3/12/66	18
DESIGN	LB	18
QUANTITIES	LB	18
DATE	3/25/66	Note 18



NOTES.

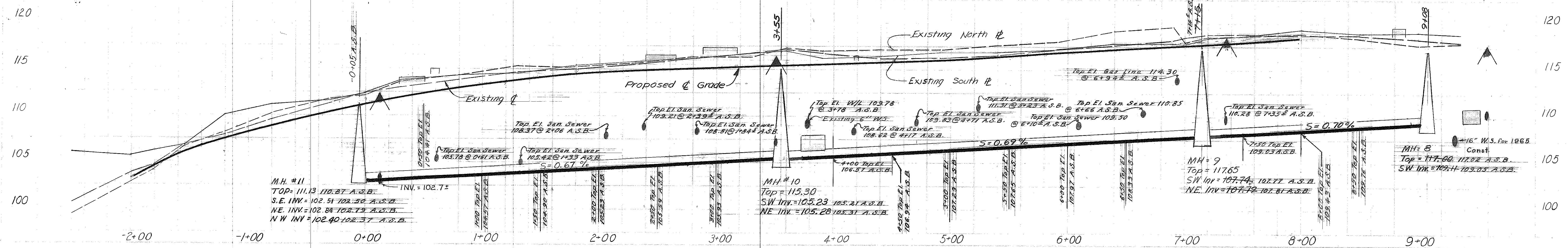
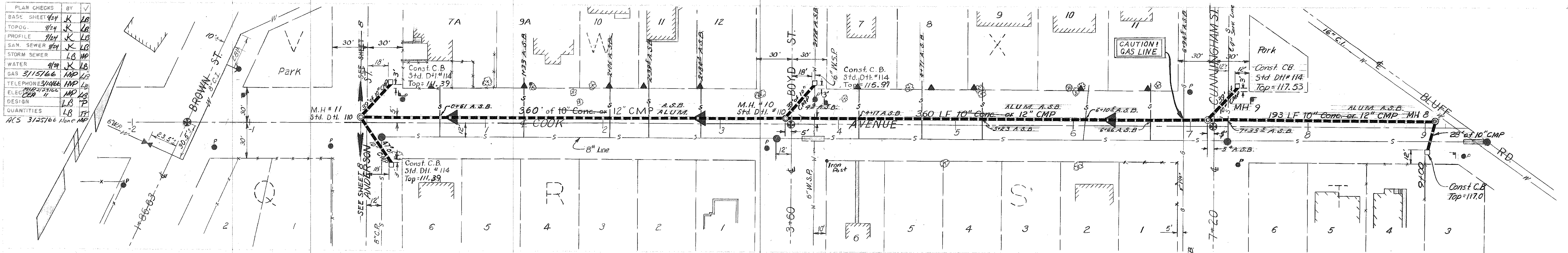
- The Sewer Line on This Sheet (Excluding C.B. Leads) Shall Have a 30% Paved Invert With Asbestos Bonding if CMP is Used.

QUANTITIES THIS SHEET		
QUANT	UNIT	DESCRIPTION
119	LF	Trench Excavation & Backfill (0-8')
470	LF	Trench Excavation & Backfill (0-10')
305	LF	Trench Excavation & Backfill (0-12')
2	Ea.	Construct Catchment Bottom Manhole (D.H. 110A)
2	Ea.	Construct Catch Basin (D.H. 114)
50	CY	Removal & Disposal of Unsuitable Mat'l from Trench
50	CY	Furnish, Haul, & Spread Prit Run Gravel
4	Ea.	Raise or Lower Existing Sanitary Sewer Connections
64	LF	Furnish & Install 10" CMP
370	LF	Furnish & Install 10" Conc or 12" CMP (16 Ga.)
460	LF	Furnish & Install 15" Conc or 18" CMP (16 ga.)



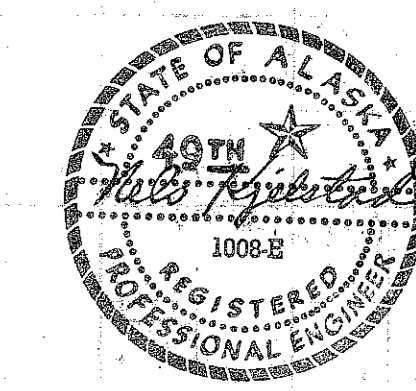
1-67	A.S.B.	F.B.# 920	3
16 June 66	Top of M.H.#8 Elevation Revisions		TRB
DATE	REVISION		BY
DEPARTMENT OF PUBLIC WORKS CITY OF ANCHORAGE, ANCHORAGE, ALASKA			
1966 CONSTRUCTION 402-66-01			
WEST GOV. HILL DRAINAGE ANDERSON ST.			
HARVARD AVE. to W/X ALLEY			
SCHEDULE - A			
SCALE: HOR 1"=40'	FILE NO.		
VRT 1"=5'	SHEET 8 OF 23		151-101

PLAN CHECKS	BY	✓
BASE SHEET	4/21	K LB
TOPOG.	7/24	K LB
PROFILE	9/24	K LB
SAN. SEWER	9/24	K LB
STORM SEWER	9/24	K LB
WATER	9/24	X LB
GAS	3/15/66	AMP LB
TELEPHONE	3/10/66	AMP LB
ELECT.	10/23/66	AMP LB
DESIGN	CEA	LB
QUANTITIES	LB	LB
ACS	3/25/66	None



Q	U	D
QUANT	UNIT	DESCRIPTION
197	LF	Trench Excavation & Backfill (0-8')
51	LF	Trench Excavation & Backfill (0-10')
863	LF	Trench Excavation & Backfill (0-12')
4	Ea.	Construct Catchment Bottom
		Manhole (D11, 110A)
5	Ea.	Construct Catch Basin (D11, 114)
50	CY	Removal & Disposal of Unstable Mat'l From Trench
50	CY	Furnish, Haul, & Spread Pit Run Gravel
10	Ea.	Raise or Lower Existing Sanitary Sewer Connections
192	LF	Furnish and Install 10" CMP (16 Ga)
913	LF	Furnish & Install 10" Conc. or 12" CMP (16 Ga)

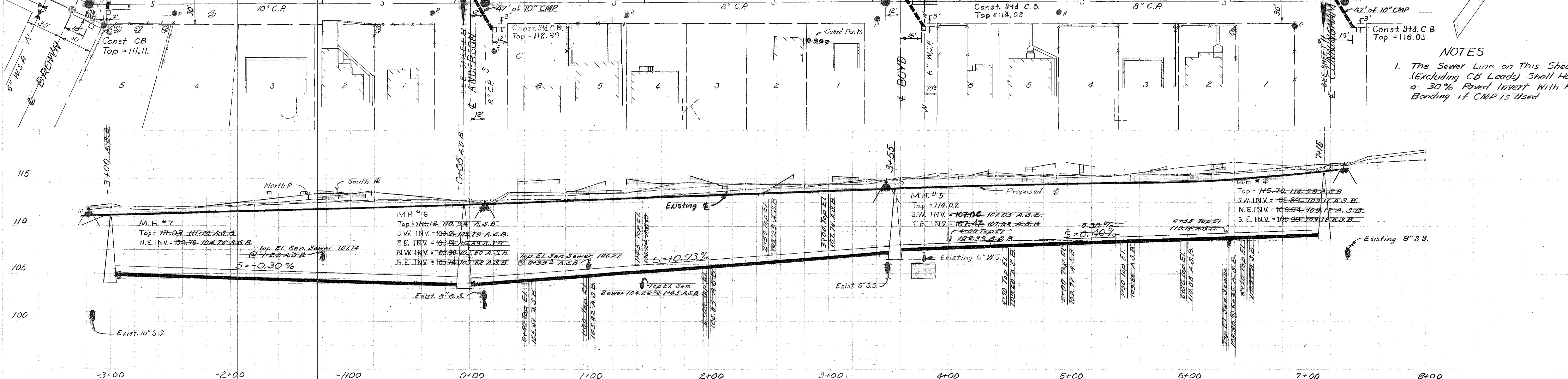
AS BUILT



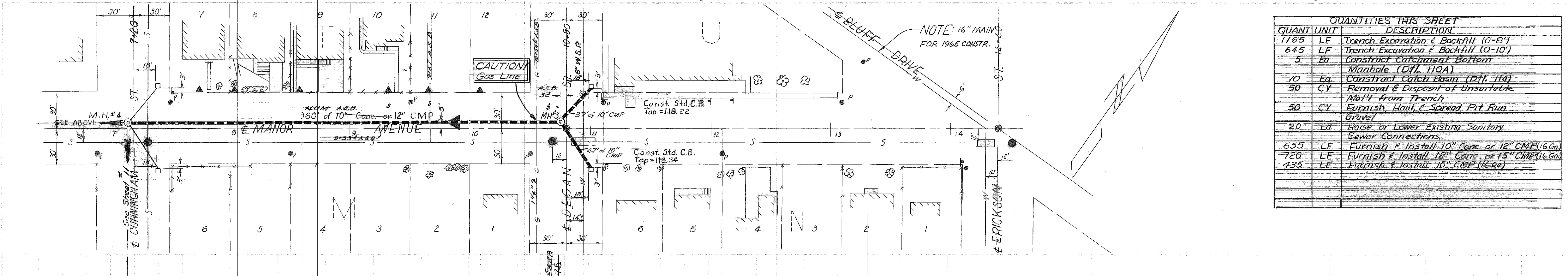
1-67	A.S.B. F.R. 320	-5
16 June 66	Top of MH #9 Elevation Revisions	TRB
DATE	REVISION	BY
DEPARTMENT OF PUBLIC WORKS CITY OF ANCHORAGE, ANCHORAGE, ALASKA		
1966 CONSTRUCTION 402-66-01		
WEST GOV. HILL DRAINAGE COOK AVENUE		
ANDERSON ST. to BLUFF ROAD		
SCHEDULE-A		
SCALE: HOR 1"=40'	SHEET 9 OF 23	FILE NO. 151-102
VERT 1"=5'		

ACS 3/12/56 Main Map

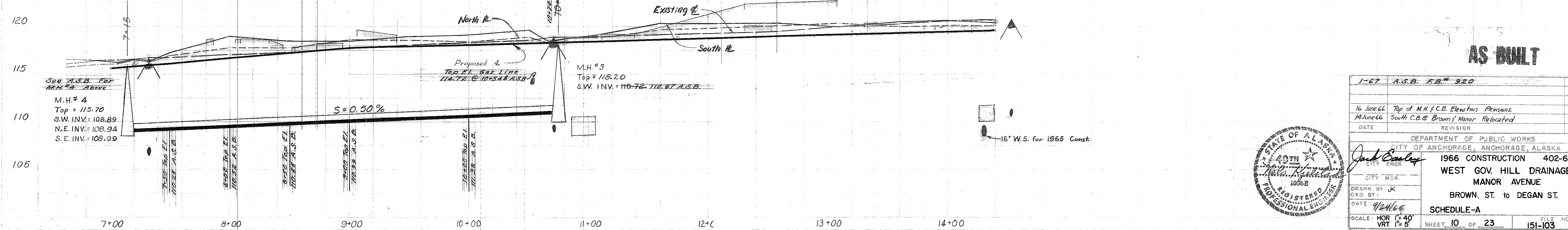
PLAN CHECKS	BY	✓
BASE SHEET	9/24	K
TOPOG.	9/24	K
PROFILE	9/24	K
SAN. SEWER	9/24	K
STORM SEWER	9/24	K
WATER	9/24	K
GAS	3/15/66	NP
TELEPHONE	3/10/66	NP
ELECTRICAL	3/10/66	NP
DESIGN	3/10/66	NP
QUANTITIES	LB	17



NOTES
 1. The Sewer Line on This Sheet (Excluding CB Leads) Shall Have a 30% Paved Invert With Asbestos Bonding if CMP is Used



QUANTITIES THIS SHEET		
QUANT	UNIT	DESCRIPTION
1165	LF	Trench Excavation & Backfill (0-8')
645	LF	Trench Excavation & Backfill (0-10')
5	Ea	Construct Catchment Bottom
10	Ea	Manhole (DIT. 110A)
10	Ea	Construct Catch Basin (DIT. 114)
50	CY	Removal & Disposal of Unstable Mat'l from Trench
50	CY	Furnish, Haul, & Spread Pit Run Gravel
20	Ea	Raise or Lower Existing Sanitary Sewer Connections
655	LF	Furnish & Install 10" Conc. or 12" CMP (16 Ga)
720	LF	Furnish & Install 12" Conc. or 15" CMP (16 Ga)
435	LF	Furnish & Install 10" CMP (16 Ga)

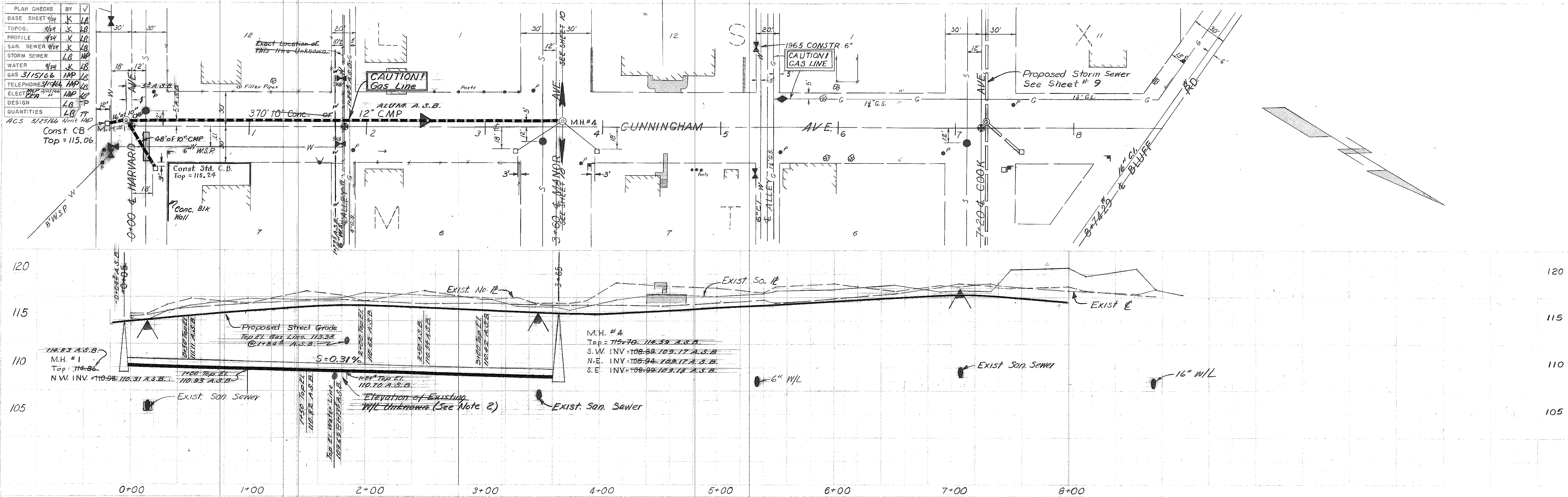


AS BUILT



1-67	A.S.B. F.B. # 920	15
16 June 66	Top of M.H. f.C.B. Elevation Revisions	TRB
14 June 66	South C.B. & Brown f. Manor Relocated	LB
DATE	REVISION	BY
DEPARTMENT OF PUBLIC WORKS		
CITY OF ANCHORAGE, ANCHORAGE, ALASKA		
1966 CONSTRUCTION 402-66-01		
WEST GOV. HILL DRAINAGE		
MANOR AVENUE		
BROWN, ST. to DEGAN ST.		
SCHEDULE-A		
SCALE: HOR 1" = 40'	FILE NO.	
VRT 1" = 5'	151-103	
ACCT. NO 999.590	SHEET 10 OF 23	PROJ. NO. 1502-64-01

PLAN CHECKS	BY	✓
BASE SHEET	4/24	K LB
TOPOG.	4/24	K LB
PROFILE	4/24	K LB
SAN SEWER	4/24	K LB
STORM SEWER	4/24	K LB
WATER	4/24	K LB
GAS	3/15/66	MP LB
TELEPHONE	3/15/66	MP LB
ELECTRICAL	3/15/66	MP LB
DESIGN	LB	MP
QUANTITIES	LB	MP
1005 3/23/66	Notes	MP



NOTES

1. The Sewer Line (Excluding CB Leads) on This Sheet Shall Have a 30% Paved Invert with Asbestos Bonding if CMP is Used.
2. If W.S. Line is Intercepted by Storm Sewer it Shall be Lowered by the Contractor as Directed by the Eng'r. Payment Will be Made at the Unit Price for "Lower Existing Water Line".

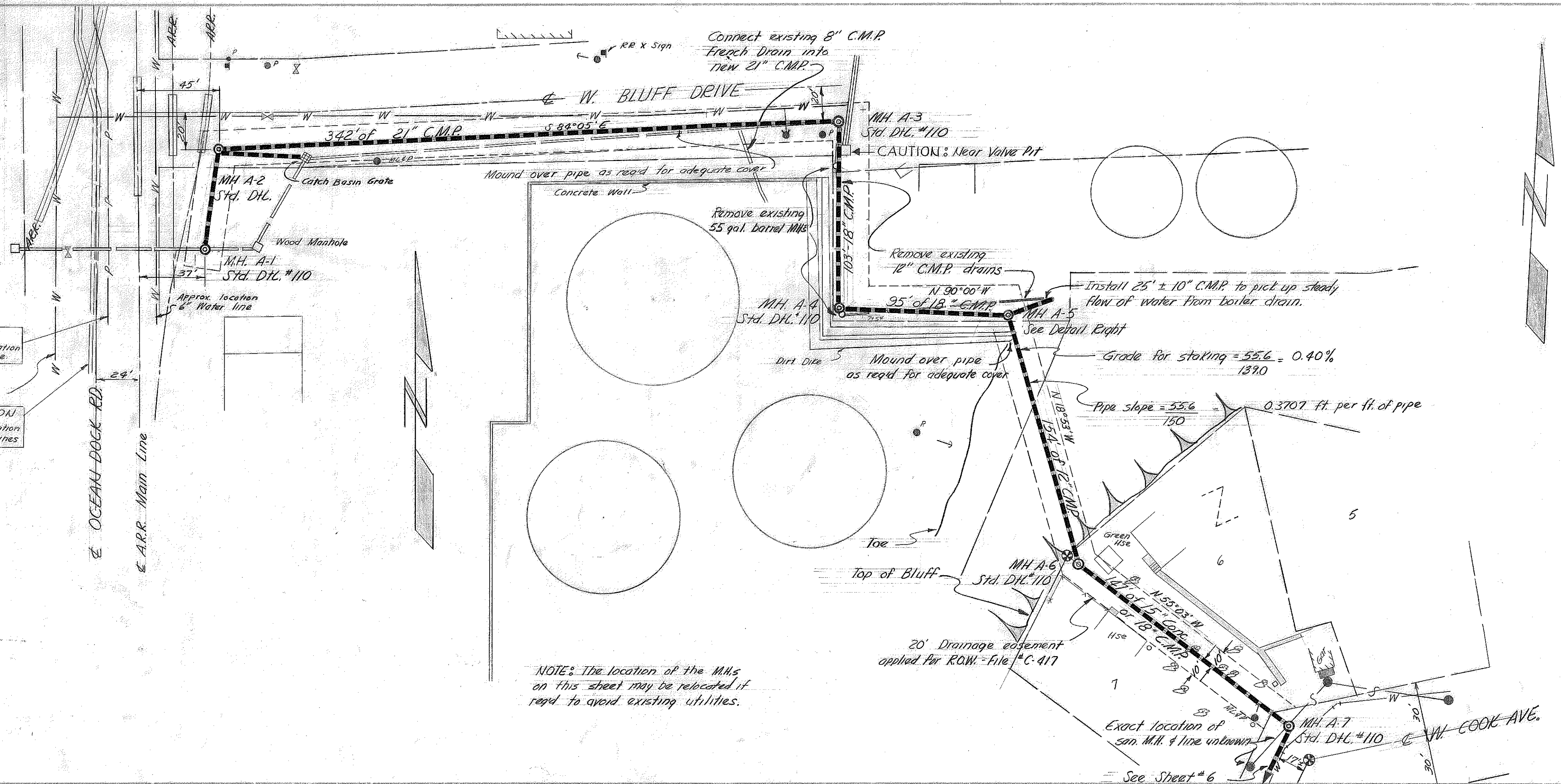
QUANTITIES THIS SHEET		
QUANT	UNIT	DESCRIPTION
434	LF	Trench Excavation & Backfill (0'-8')
1	Ea	Construct Catchment Bottom MH (D.M. 110A)
2	Ea	Construct Catch Basin (D.M. 114)
25	CY	Removal & Disposal of Unsuitable Mat'l from Trench
25	CY	Furnish, Haul, & Spread P.T. RUN Gravel
370	LF	Furnish & Install 10" Conc. or 12" CMP (16 Ga.)
64	LF	Furnish & Install 10" CMP (16 Ga.)

AS'RIIIT



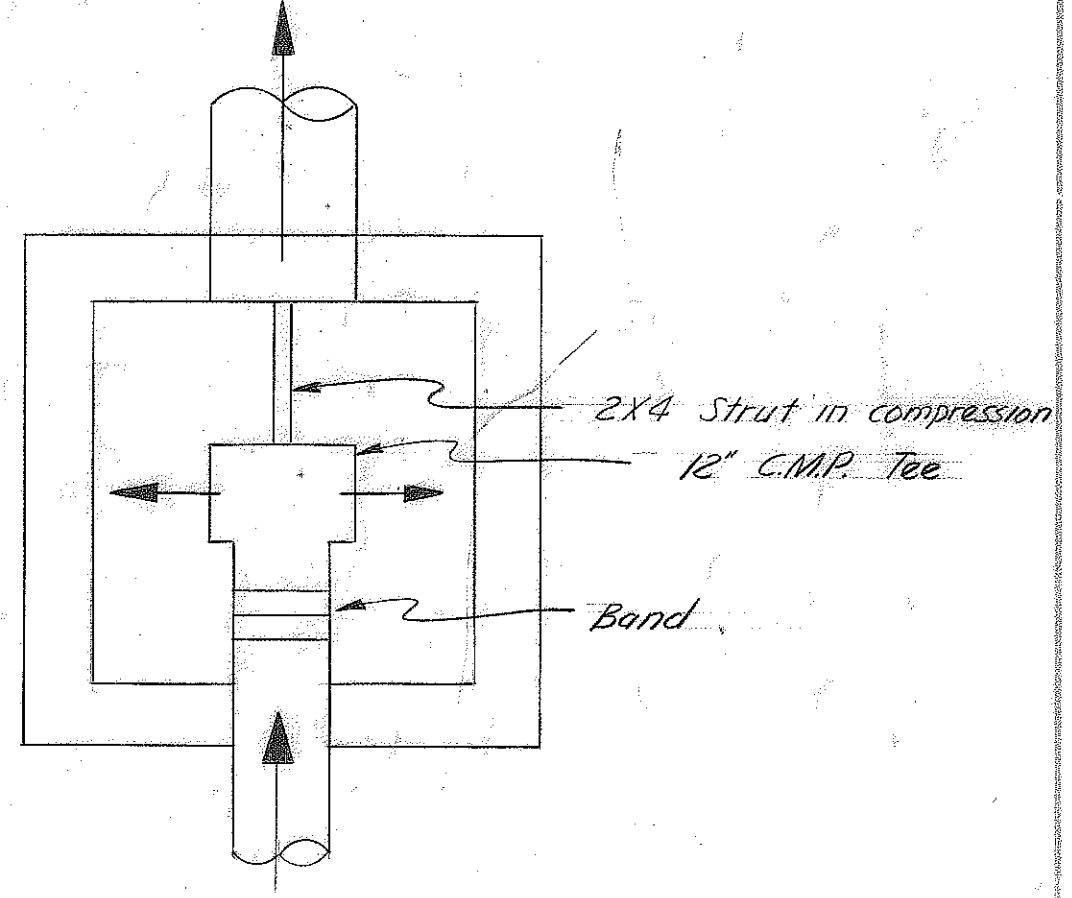
2-87	A.S.B. F.B.# 322	3
16 June 66	Top of M.H. & C.B. Elevation Revisions	TRB
DATE	REVISION	BY
DEPARTMENT OF PUBLIC WORKS CITY OF ANCHORAGE, ANCHORAGE, ALASKA		
1966 CONSTRUCTION 402-66-01 WEST GOV. HILL DRAINAGE CUNNINGHAM AVE. HARVARD AVE. to MANOR AVE. SCHEDULE-A		
DRAWN BY: K	CITY ENGR.	FILE NO.
DATE: 7/20/66	10652	151-104
SCALE: HOR 1"=40'	SHEET 11 OF 23	
VERT 1"=5'		

PLAN CHECKS	BY	✓
BASE SHEET	MP	
TOPOG.	MP	
PROFILE	MP	
SAN. SEWER	MP	
STORM SEWER	MP	
WATER	MP	
GAS	MP	
TELEPHONE	MP	
ELECTRIC	MP	
DESIGN	FW	
QUANTITIES	FW	



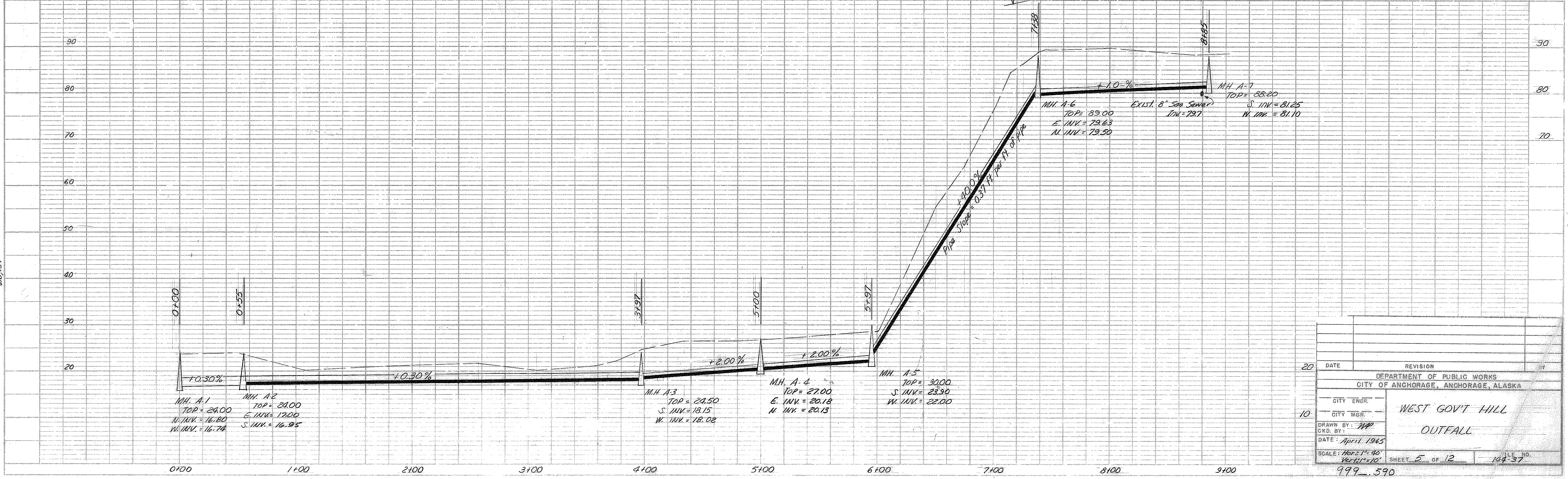
QUANTITIES THIS SHEET			
QUANTITIES	UNIT	DESCRIPTION	
669	L.F.	Excavate & Backfill	0-8
175	L.F.	Excavate & Backfill	0-10
35	L.F.	Excavate & Backfill	0-12
20	L.F.	Excavate & Backfill	12"
5	EACH	Std. Manhole Det. # 110 (0-8')	
1	EACH	Special Manhole	
200	C.Y.	Remove unsuitable material	
500	C.Y.	Furnish, Haul & Spread pit run gravel	
147	L.F.	15" Conc. or 18" CMP	
154	L.F.	12" CMP	
198	L.F.	18" CMP	
342	L.F.	21" CMP	
55	L.F.	24" CMP	
2	L.F.	Additional depth manhole	
25	L.F.	10" CMP	

NOTES:
 1. Special manhole A-5 to be reinforced as follows: Provide vertical No. 4 bars in four corners, embedded in base slab as directed by the engineer. Also provide horizontal band beam on every fourth course of blocks.
 2. Existing storm line on Bluff Drive is to be removed.



NOTE: The location of the M.H.s on this sheet may be relocated if need to avoid existing utilities.

Special Detail for pipe entering MH A-5. Use Std. Det. # 135 for manhole construction.

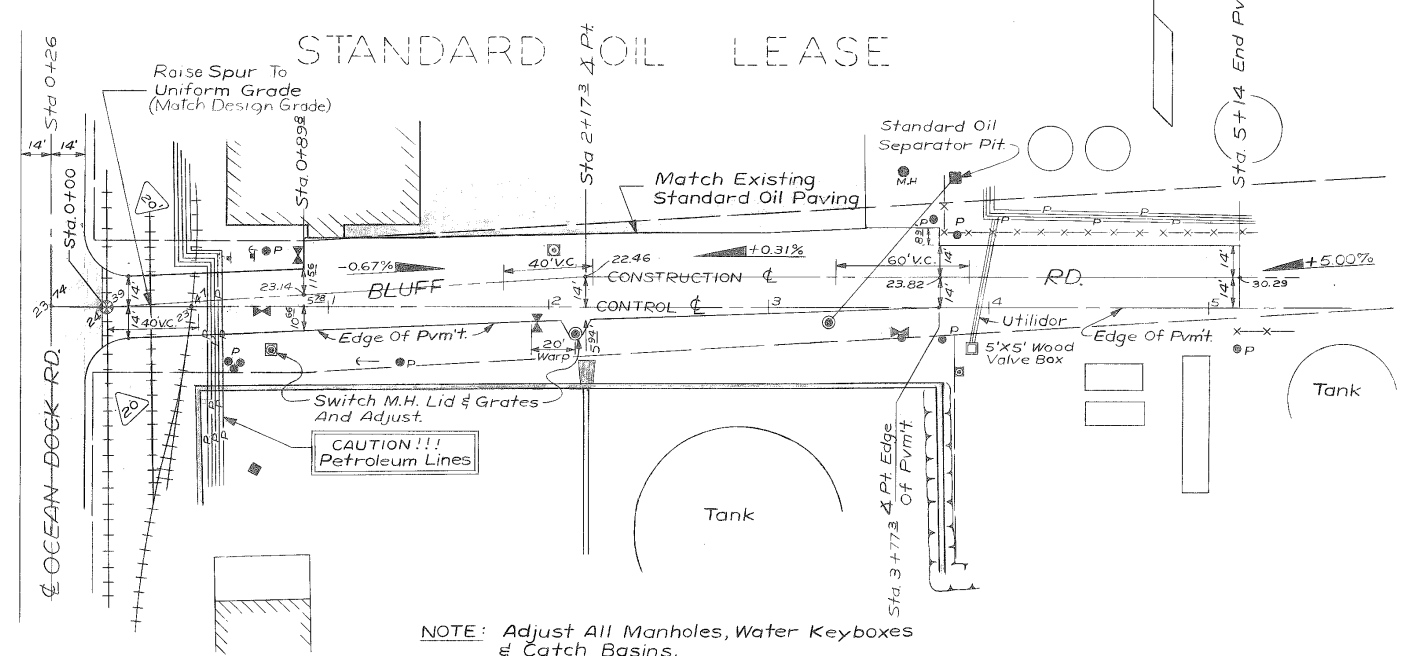


DATE	REVISION	BY
20		
DEPARTMENT OF PUBLIC WORKS CITY OF ANCHORAGE, ANCHORAGE, ALASKA		
CITY ENGR.	WEST GOV'T HILL	
CITY MGR.	OUTFALL	
DRAWN BY: MP		
CKD. BY:		
DATE: April 1965		
SCALE: Horz. 1" = 40'	SHEET 5 OF 12	FILE NO. 148-37
VERT. 1" = 10'		
999.590		

PLAN	DATE	
BY		
DATE		
BY		
DATE		
BY		
DATE		
BY		
DATE		
BY		
DATE		

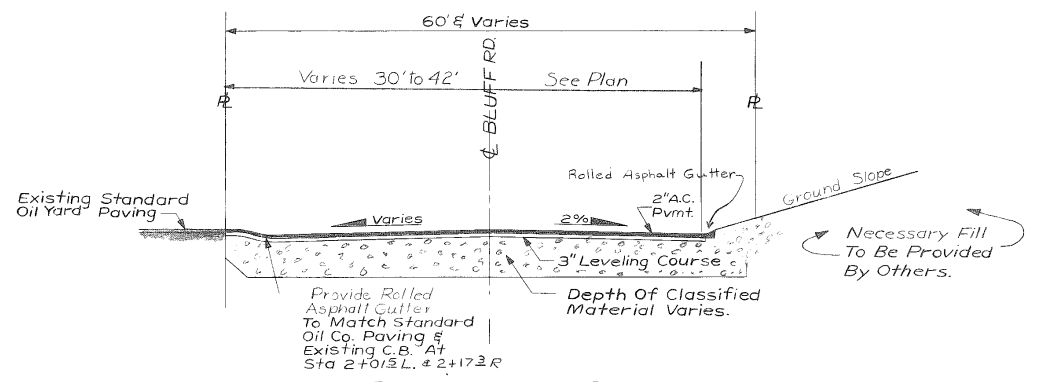
PROFILE	DATE	
BY		
DATE		
BY		
DATE		
BY		
DATE		
BY		
DATE		
BY		
DATE		

PLAN SHEET	BY
DATE SHEET	ROK PV
PROFILE	ROK PV
PROFILE	ROK PV
PLAN SEWER	ROK PV
STORM SEWER	ROK PV
WATER	ROK PV
GAS	ROK PV
TELEPHONE	ROK PV
ELECTRIC	ROK PV
DATA	ROK PV
NOTES	ROK PV

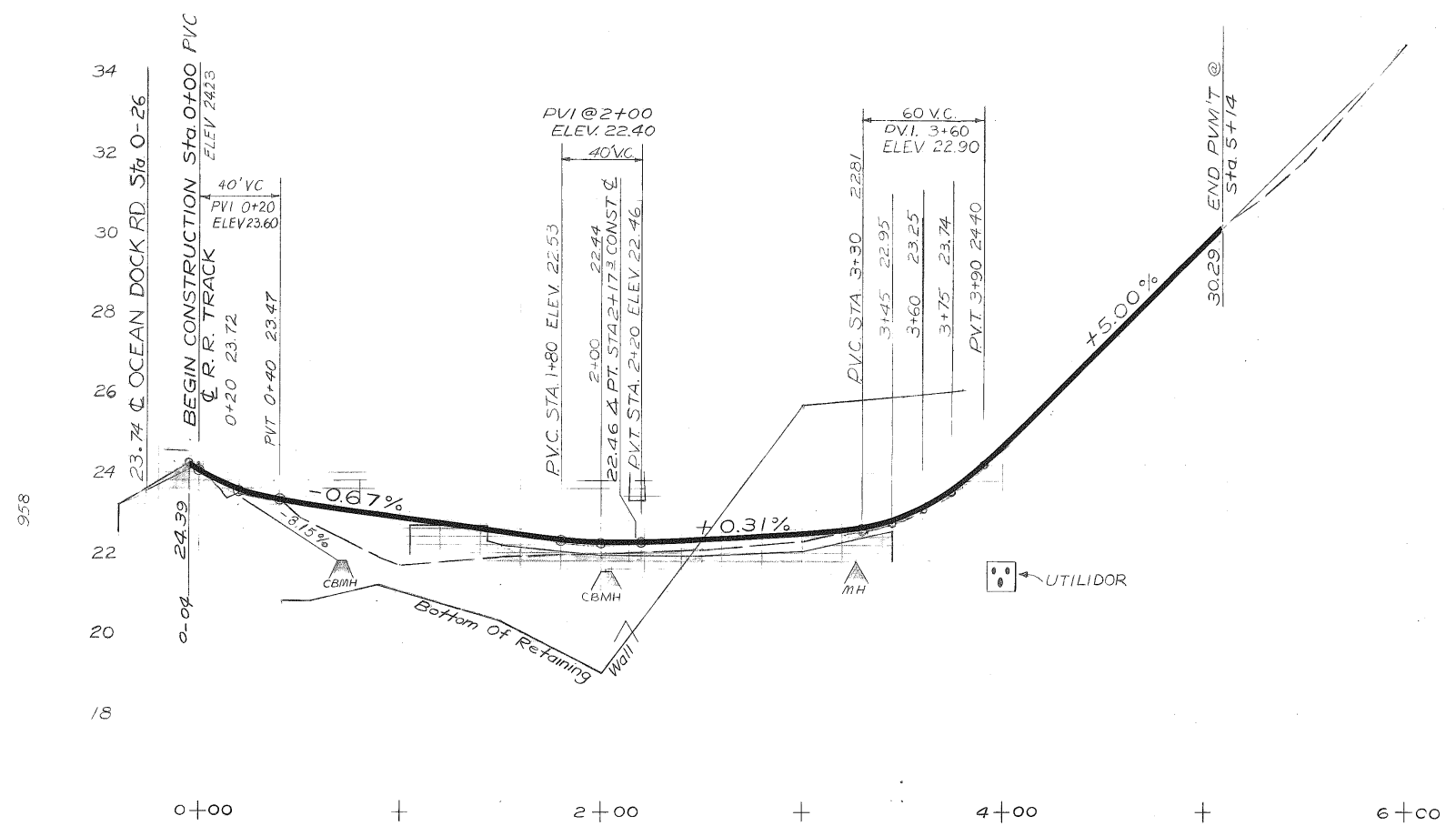
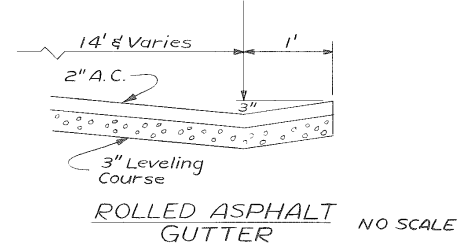


NOTE: Adjust All Manholes, Water Keyboxes & Catch Basins.

Design Grade To Be Adjusted In Field By Engr.



TYPICAL CROSS-SECTION
BLUFF ROAD
STATION 0+04 TO 5+14
Scale: 1"=10'



7/17/67	Changed Rd. Alignment & Add Gutter Def. PVC, RK		
DATE	REVISION	BY	
DEPARTMENT OF PUBLIC WORKS			
CITY OF ANCHORAGE, ANCHORAGE, ALASKA			
CITY ENGR	BLUFF ROAD		
CITY MGR	(OCEAN DOCK RD East 500')		
DRAWN BY	ROK PV		
CKD BY	ROK PV		
DATE			
SCALE: 1"=40' HOR	SHEET 1 OF 1	FILE NO.	155-64
1"=2' VERT			

Acct No 9991.590



MUNICIPALITY OF ANCHORAGE

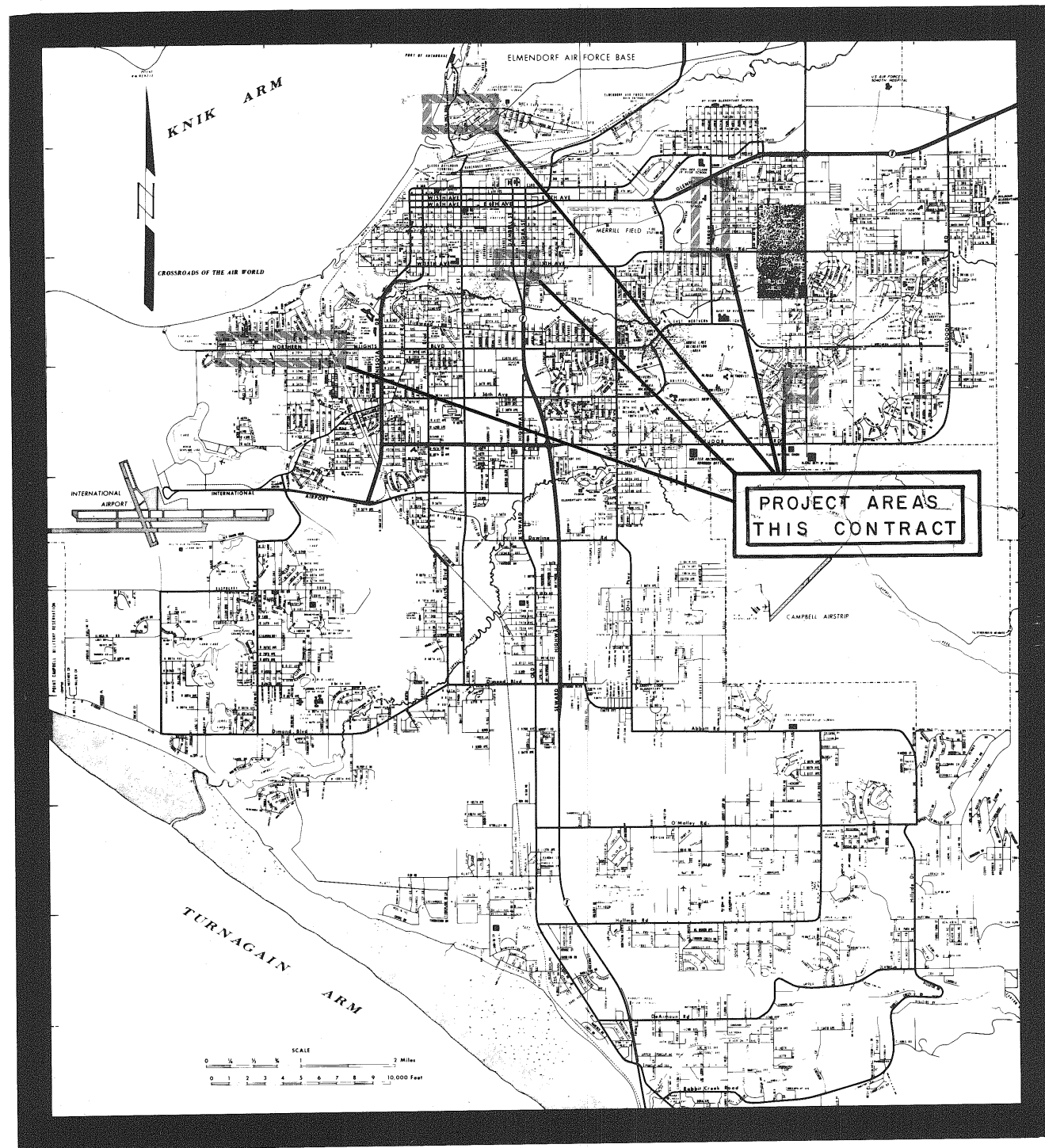
1976 CONSTRUCTION

1976 STREET REHABILITATION

PROGRAM

CONTRACTOR BOYSEN INVESTMENT CORP.
& ALASKA BEAUTIFICATION INC.
CONTRACT NO. C 13407
DATE NOTICE TO PROCEED AUG. 10, 1976
ORIGINAL CONTRACT AMOUNT 299,446.00
FINAL CONTRACT AMOUNT _____
ACTUAL COMPLETION DATE _____
INSPECTOR DURING CONSTRUCTION JIM SPEARIN
NO. OF BLOCKS 1" OVERLAY 2719
NO. OF BLOCKS OF 2" PAVING 190

BUILT



VICINITY MAP

APPROVED BY:

George M. Sullivan
GEORGE M. SULLIVAN
MAYOR

James P. Swing
JAMES P. SWING P.E.
DIRECTOR OF PUBLIC WORKS

Lee Browning
LEE BROWNING P.E.
MUNICIPAL ENGINEER

LEGEND

PLAN

- PROPOSED EASEMENT
- CONSTRUCTION
- EXISTING E
- EXISTING PROPERTY LINE
- EXISTING EASEMENT
- IRON PIN
- EXISTING BUILDING
- EXISTING FENCE
- EXISTING TREE
- BLUFF AREA
- EXISTING UNDERGROUND TELEPHONE
- EXISTING UNDERGROUND ELECTRIC
- EXISTING ELECTRICAL HAND HOLE
- EXISTING POLE
- EXISTING GUY
- EXISTING GAS LINE
- EXISTING GAS VALVE
- EXISTING WATER LINE
- EXISTING HYDRANT
- EXISTING & PROPOSED KEY BOX
- EXISTING KEY BOX MARKER
- EXISTING SANITARY SEWER LINE
- EXISTING SANITARY SEWER MANHOLE
- EXISTING SANITARY SEWER CLEANOUT
- EXISTING & PROPOSED PAVING
- EXISTING & PROPOSED CULVERT
- EXISTING & PROPOSED GUARD RAIL
- EXISTING & PROPOSED HAND RAIL
- EXISTING & PROPOSED STREET SIGNS
- EXISTING & PROPOSED STORM DRAIN LINE
- EXISTING & PROPOSED STORM DRAIN MANHOLE
- EXISTING & PROPOSED STORM DRAIN CATCH BASIN
- EXISTING & PROPOSED STORM DRAIN CATCH BASIN MANHOLE
- EXISTING & PROPOSED DITCH
- SURVEY MONUMENT
- PROPOSED VALLEY GUTTER
- DRAINAGE ARROW
- RADIUS TO BACK OF CURB
- EXISTING & PROPOSED SANITARY SEWER CONNECTION
- EXISTING PAVEMENT TO BE REMOVED
- SWALE
- EXISTING MAILBOX
- PROPOSED DRYWELL

PROFILE

- EXISTING
- EXISTING NORTH OR WEST PROPERTY LINE
- EXISTING SOUTH OR EAST PROPERTY LINE
- EXISTING PIPE
- ▲ EXISTING MANHOLE
- ▲ EXISTING CATCH BASIN OR CATCH BASIN MANHOLE
- EXISTING PAVEMENT
- PROPOSED GRADE AT E OF PAVEMENT
- PROPOSED STORM SEWER MANHOLE
- PROPOSED STORM SEWER LINE

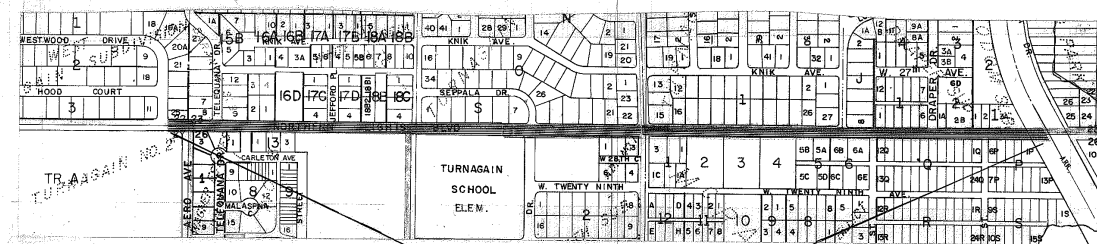
SOILS

- GW WELL GRADED GRAVEL
- GP POORLY GRADED GRAVEL
- GM SILTY GRAVEL
- GC CLAYEY GRAVEL
- SW WELL GRADED SAND
- SP POORLY GRADED SAND
- SM SILTY SAND
- SC CLAYEY SAND
- ML INORGANIC SILT
- CL INORGANIC CLAY
- OL ORGANIC SILT
- MH INORGANIC SILT
- CH INORGANIC CLAY
- OH ORGANIC CLAY
- PT PEAT
- W WATER LEVEL
- TEST HOLE LOCATION
- % PASSING 200

GENERAL NOTES

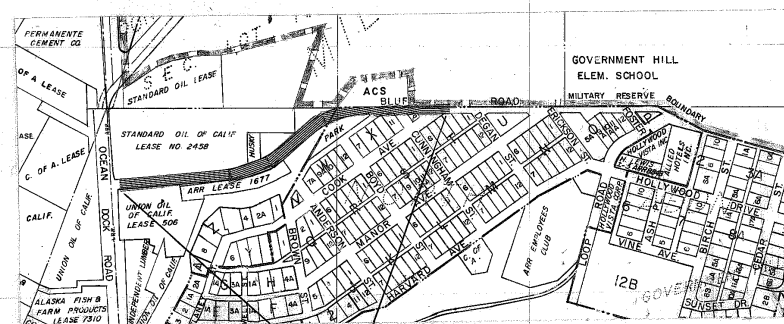
1. ALL STATIONING IS CENTERLINE RIGHT-OF-WAY UNLESS OTHERWISE NOTED.
2. UTILITY MOVES SHALL BE DONE BY OTHERS UNLESS OTHERWISE NOTED.
3. LIMITS OF EXCAVATION SHOWN ON THE PLAN SHEETS ARE ESTIMATES FOR INFORMATION PURPOSES ONLY. ACTUAL LIMITS WILL BE DETERMINED BY THE ENGINEER IN THE FIELD.
4. ALL CURB DIMENSIONS ARE TO BACK OF CURB AND CURB ELEVATIONS ARE TO FLOW LINE UNLESS OTHERWISE NOTED.
5. CURB RETURN RADI ARE 15 FEET TO BACK OF CURB UNLESS OTHERWISE NOTED.
6. ALL MANHOLES, KEY BOXES, CATCH BASINS, BE BROUGHT TO GRADE UNLESS OTHERWISE NOTED.

ASBUILT



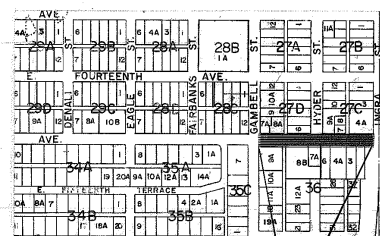
SCHEDULE "A" SHEETS 3 & 4

— W. NORTHERN LIGHTS BLVD OVERLAY —



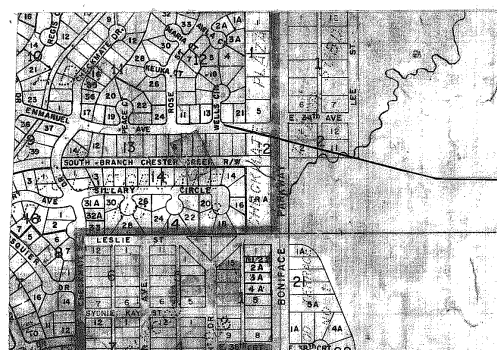
SCHEDULE "B" SHEET 5

— W. BLUFF DRIVE REHABILITATION —



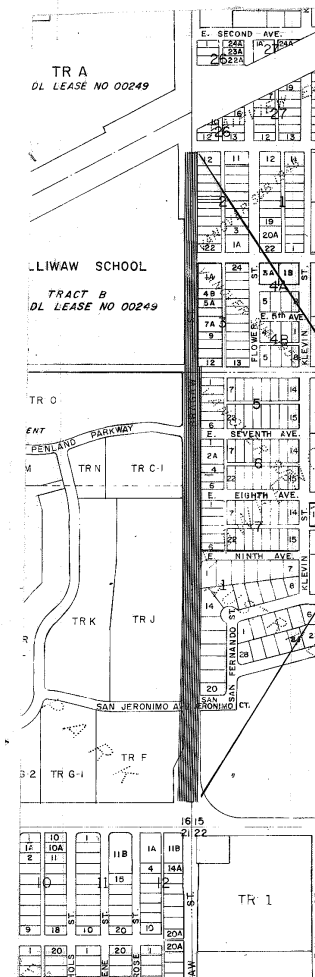
SCHEDULE "C" SHEET 6

— E. 15th AVENUE OVERLAY —



SCHEDULE "F" SHEET 8

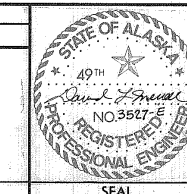
COLLEGGATE SUBD.- EMMANUEL DRIVE-



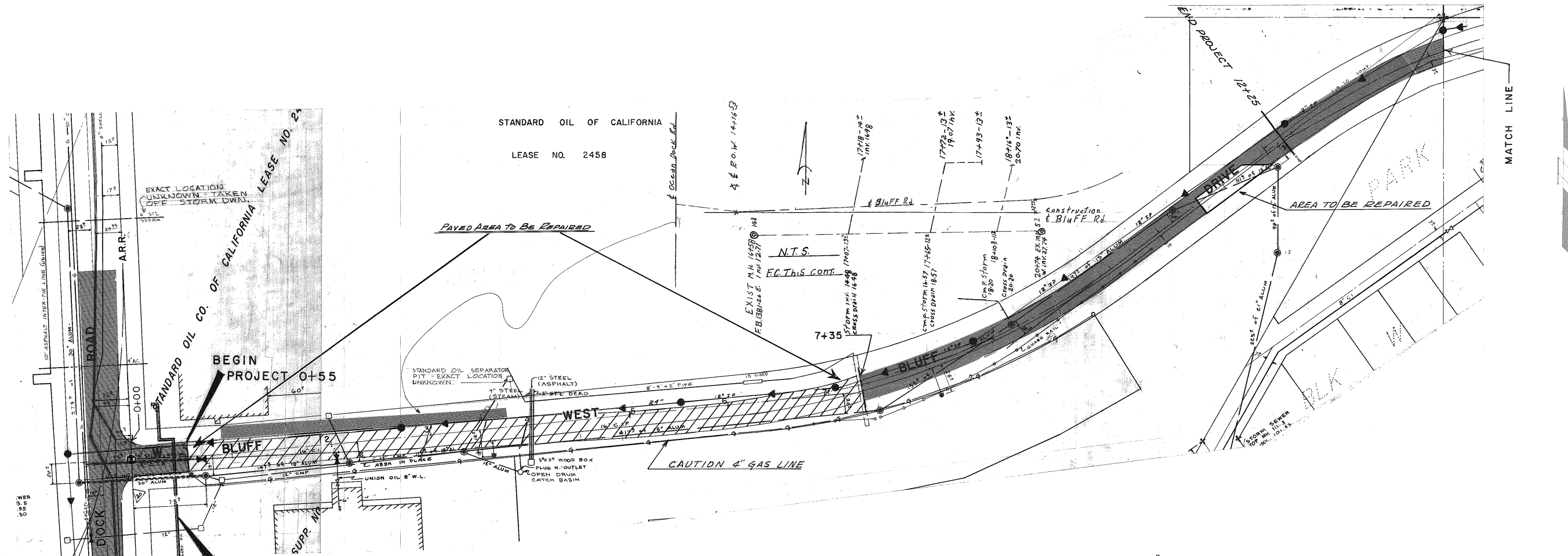
SCHEDULE "D" SHTS. 7 & 8

— SOUTH BRAGAW STREET OVERLAY —

FIELD BOOKS	TBM NO.	LOCATION	ELEV.	DATA	BY	DATA	BY	REV	DATE	DESCRIPTION	BY	REV	DATE	DESCRIPTION	BY
DESIGN				BASE		TELE									
STAKING				TOPO		ELEC									
ASBUILT				PROFILE		DESIGN									
				SAN SEWER		QUANTITIES									
				STORM SEWER		PRELIM. CHECK									
				WATER		FINAL CHECK									
				GAS		CODED BY									
CONTRACTOR	BASIS OF														
INSPECTOR															
CONSTRUCTION RECORD	VERTICAL DATUM			PLAN CHECK				REVISIONS							

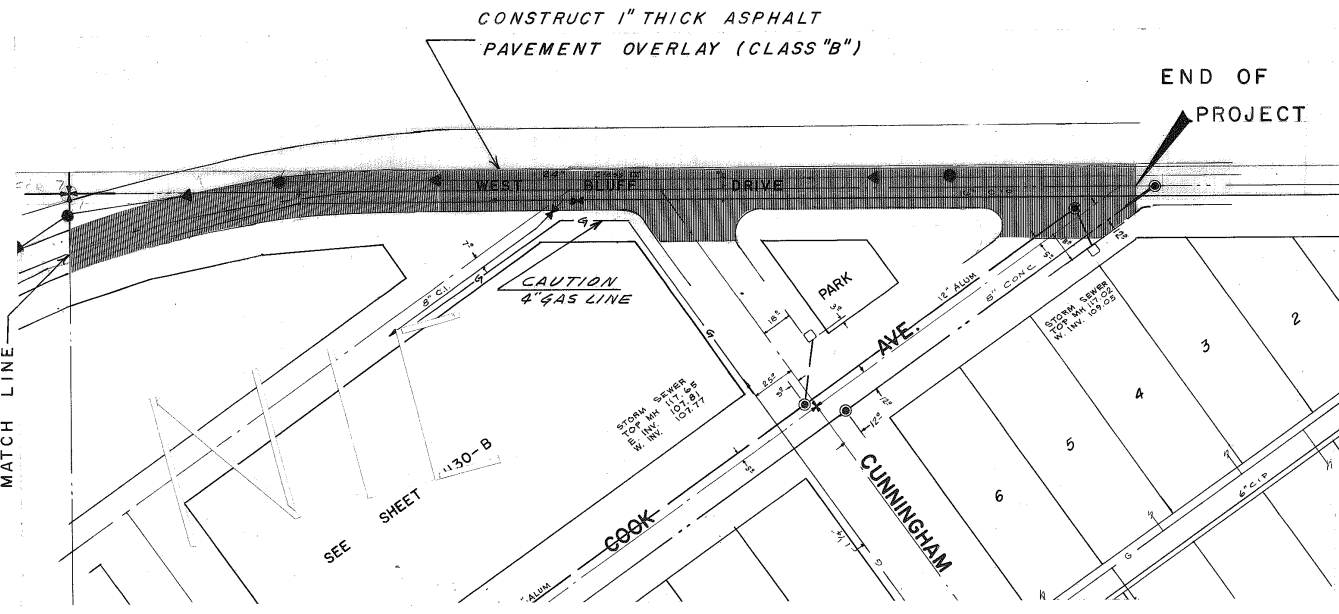
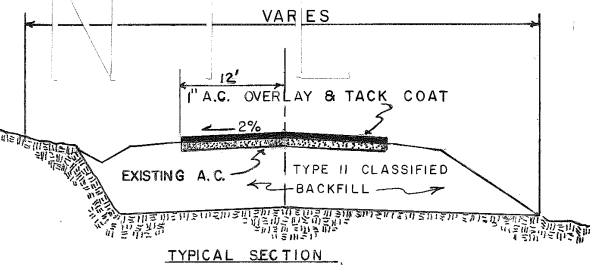


PUBLIC WORKS DEPARTMENT
 1976 CONSTRUCTION
 1976 STREETS REHABILITATION
KEY MAP & LEGEND
 SCALE 1/2"=50' DATE 11/19/76 GRID ACCT. NO. SHEET 2 of 8



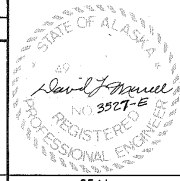
CAUTION! UNDERGROUND PETROLEUM LINES

- NOTES.**
1. PAVEMENT AREAS FROM STA. 0+55 TO STA. 7+35 ARE TO BE REPAIRED DUE TO SETTLEMENT.
 2. THE EXACT AREAS TO BE REPAIRED WILL BE DETERMINED BY THE ENGINEER IN THE FIELD.
 3. RECONSTRUCTION OF SETTLED AREAS WILL BE CONSTRUCTED ACCORDING TO STANDARD DETAIL #116.
 4. LINE AND GRADE WILL MATCH THE EXISTING PAVEMENT AS CLOSELY AS POSSIBLE.
 5. REMOVE EXISTING A.C. PAVEMENT, LEVELING COURSE AND UNUSABLE EXCAVATION AS DIRECTED BY THE ENGINEER.

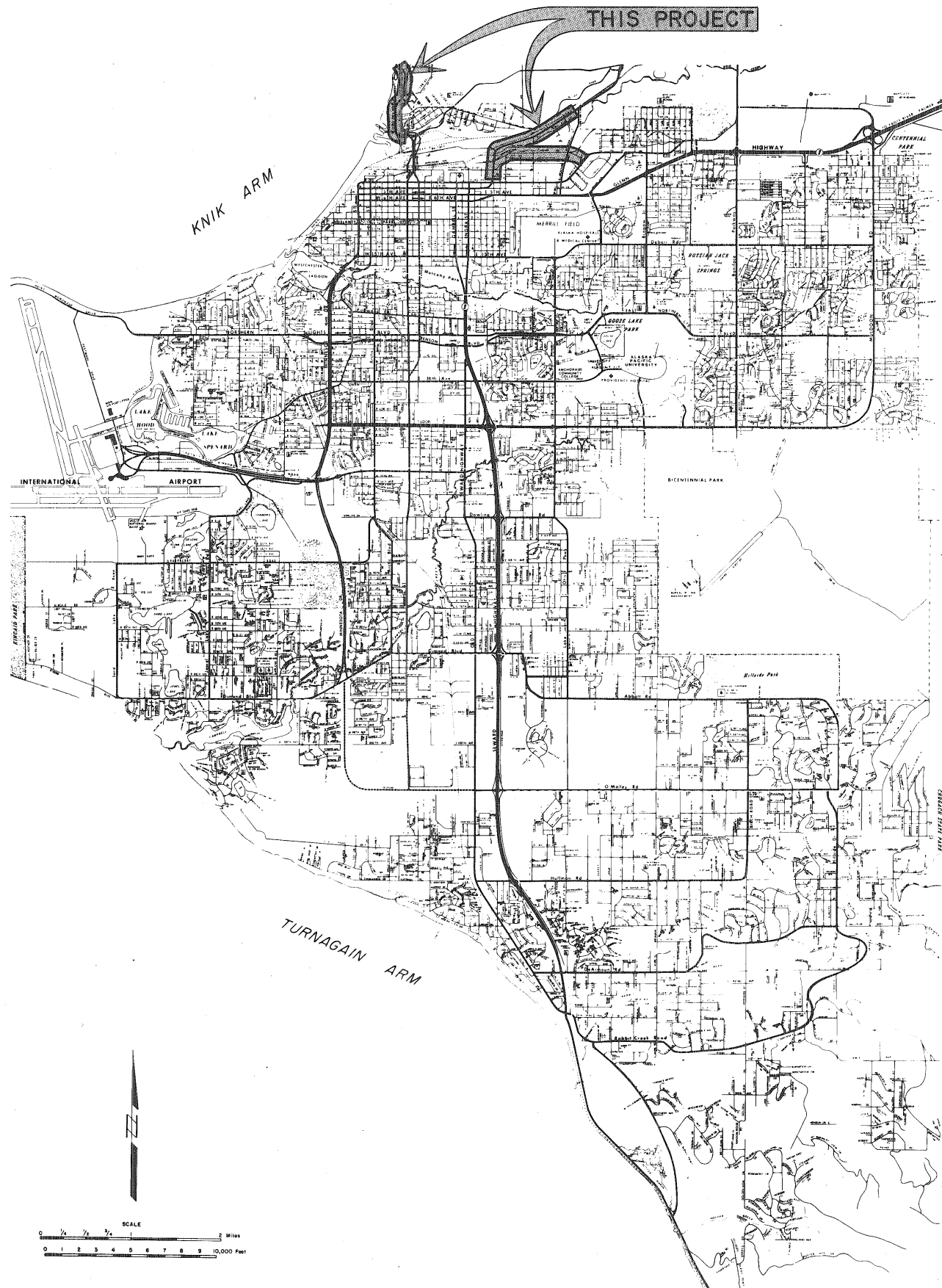


AS BUILT

FIELD BOOKS	TBM NO.	LOCATION	ELEV.	DATA	BY	V	DATA	BY	V	REV	DATE	DESCRIPTION	BY	REV	DATE	DESCRIPTION	BY
DESIGN				BASE	PH		TELE	JTT		2/23/77	ASB Per F.B. 1377		H.E.A.				
STAKING				TOPO	PH		ELEC										
ASBUILT				PROFILE	PH		DESIGN	M. JWH									
				SAN SEWER	PH		QUANTITIES										
				STORM SEWER	PH		CITY PRELIM. CHECK										
				WATER	PH		CITY FINAL CHECK										
				GAS	PH		CODED BY										



PUBLIC WORKS DEPARTMENT
 1976 CONSTRUCTION SCHED. B
W. BLUFF DRIVE REHABILITATION
 OCEAN DOCK ROAD TO COOK AVE.
 SCALE: 1/4" = 50' DATE: April, 1976 GRID: 1030, 1031 SHEET 5 of 8
 ACCT. NO.



INDEX OF SHEETS	
PAGE	DESCRIPTION
1	COVER SHEET
2	KEY MAP, LEGEND & GENERAL NOTES
3	DETAIL SHEET
4	VIKING DRIVE STA 15+53.95 TO 29+00
5	VIKING DRIVE STA 29+00 TO 43+00
6	VIKING DRIVE STA 43+00 TO 58+00
7	VIKING DRIVE STA 58+00 TO 69+67.50
8	POST ROAD
9	OCEAN DOCK ROAD

MUNICIPALITY OF ANCHORAGE

87 - 34
VIKING DRIVE
SCHEDULE A

87 - 35
POST ROAD
SCHEDULE B

87 - 36
OCEAN DOCK ROAD
SCHEDULE C

STREET IMPROVEMENTS

APPROVED BY:
Tom Fink
TOM FINK
MAYOR
H. Glenzer Jr.
H. GLENZER JR.
DIRECTOR OF PUBLIC WORKS

Ed McMullan
ED McMILLAN P.E.
MUNICIPAL ENGINEER

PREPARED BY:
CONTRACTING ENGINEERS & ASSOCIATES
8220 BRIARWOOD STREET
ANCHORAGE, ALASKA 99502
349-2407

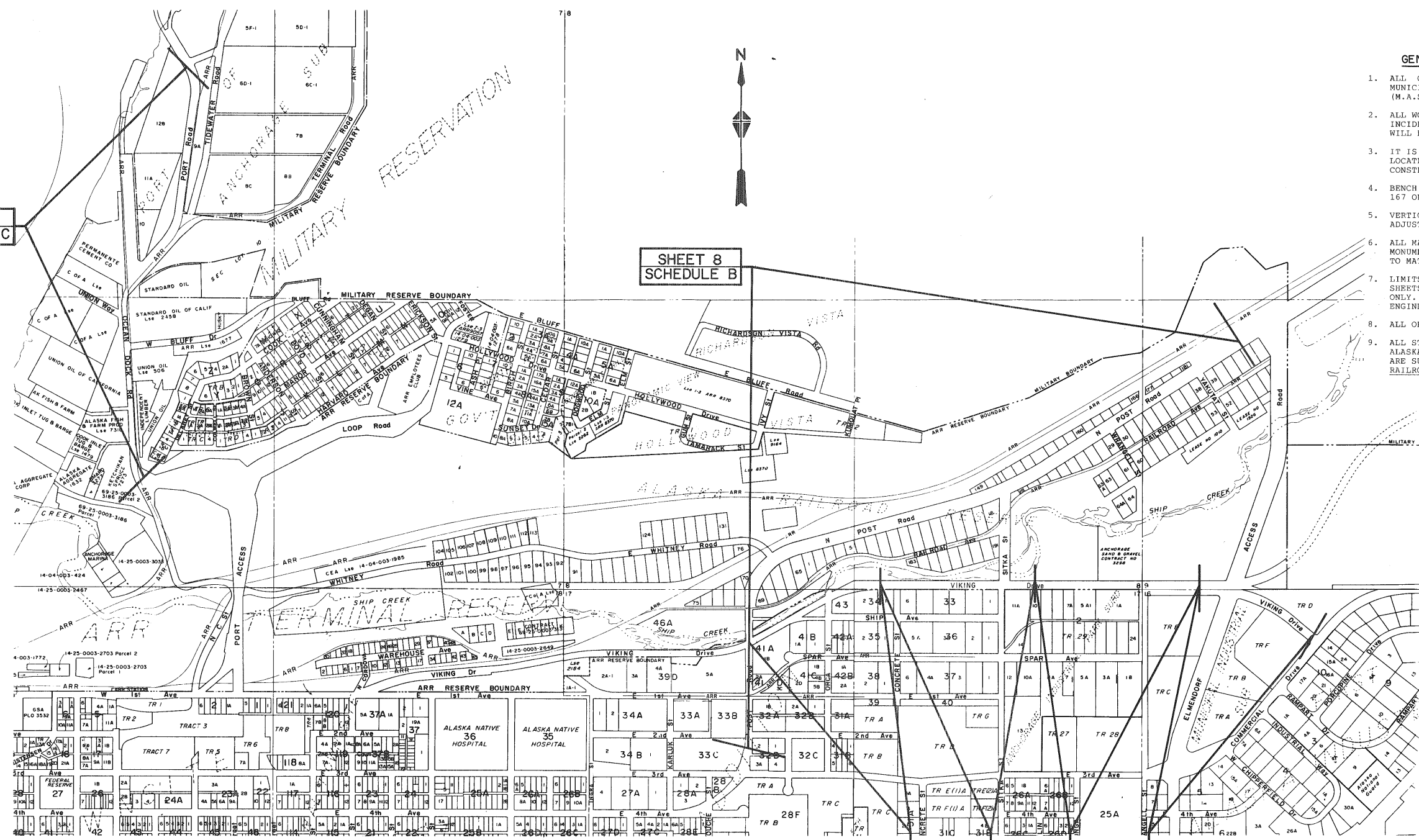


PROJECT SUMMARY	
LENGTH OF PAVING W/C&G	193 L.F.
LENGTH OF STRIP PAVING	4781 L.F.
LENGTH OF GRAVEL IMPVMT	0 L.F.
LENGTH OF STORM DRAINS	147 L.F.
NUMBER OF STREET LIGHTS	0 EA.
LENGTH OF PAVEMENT OVERLAY	10,552 L.F.

SHEET 9
SCHEDULE C

SHEET 8
SCHEDULE B

SHEET 4 SHEET 5 SHEET 6 SHEET 7
SCHEDULE A



GENERAL NOTES

1. ALL CONSTRUCTION TO COMPLY WITH THE 1984 MUNICIPALITY OF ANCHORAGE STANDARD SPECIFICATIONS (M.A.S.S.).
2. ALL WORK REQUIRED TO "GRADE TO DRAIN" SHALL BE INCIDENTAL TO EXCAVATION. NO ADDITIONAL PAYMENT WILL BE MADE.
3. IT IS THE RESPONSIBILITY OF THE CONTRACTOR(S) TO LOCATE AND VERIFY ALL AFFECTED UTILITIES PRIOR TO CONSTRUCTION.
4. BENCH MARK IS F74, ELEVATION = 51.64. SEE PAGE 167 OF THE GAAB BENCH MARK BOOK FOR DESCRIPTION.
5. VERTICAL DATA BASED ON THE 1972 N.G.S. ADJUSTMENT
6. ALL MANHOLES, CLEANOUTS, WATER VALVE BOXES AND MONUMENT CASES, WITHIN PAVING, SHALL BE ADJUSTED TO MATCH PAVEMENT FINISH GRADE.
7. LIMITS OF EXCAVATION SHOWN ON PLAN AND PROFILE SHEETS ARE ESTIMATES FOR INFORMATION PURPOSES ONLY. ACTUAL LIMITS WILL BE DETERMINED BY THE ENGINEER IN THE FIELD.
8. ALL ORGANICS WITHIN ROADWAY TO BE REMOVED.
9. ALL STREETS WITHIN THE PROJECT LIMITS ARE WITHIN ALASKA RAILROAD PROPERTY BOUNDARIES AND AS SUCH ARE SUBJECT TO THE PROVISIONS OF SECTION 90.06 RAILROAD PROVISIONS OF THE SPECIAL PROVISIONS.

PLAN

- PROPOSED EASEMENT
- CONSTRUCTION
- EXISTING
- EXISTING PROPERTY LINE
- EXISTING EASEMENT
- IP IRON PIN
- EXISTING BUILDING
- X EXISTING FENCE
- EXISTING TREE
- BLUFF AREA
- EXISTING UNDERGROUND TELEPHONE
- EXISTING UNDERGROUND ELECTRIC
- EXISTING ELECTRICAL HAND HOLE
- EXISTING POWER, LIGHT, OR GUY POLE
- EXISTING GUY
- EXISTING GAS LINE
- EXISTING GAS VALVE
- EXISTING WATER LINE
- EXISTING HYDRANT
- EXISTING & PROPOSED KEY BOX
- EXISTING KEY BOX MARKER
- EXISTING SANITARY SEWER LINE
- EXISTING SANITARY SEWER MANHOLE
- EXISTING SANITARY SEWER CLEANOUT

- EXISTING & PROPOSED PAVING
- EXISTING & PROPOSED CULVERT
- EXISTING & PROPOSED GUARD RAIL
- EXISTING & PROPOSED HAND RAIL
- EXISTING & PROPOSED STREET SIGNS
- EXISTING & PROPOSED STORM DRAIN LINE
- EXISTING & PROPOSED STORM DRAIN MANHOLE
- EXISTING & PROPOSED STORM DRAIN CATCH BASIN
- EXISTING & PROPOSED STORM DRAIN CATCH BASIN MANHOLE
- EXISTING & PROPOSED DITCH
- EXISTING & PROPOSED SANITARY SEWER CONNECT
- EXISTING & PROPOSED CURB & GUTTER
- DRAINAGE ARROW
- RADIUS TO BACK OF CURB
- SURVEY MONUMENT
- EXISTING PAVEMENT TO BE REMOVED
- SWALE
- EXISTING MAILBOX
- PROPOSED DRYWELL
- PROPOSED VALLEY GUTTER
- EXISTING ASPHALTIC SURFACING (LESS THAN 1" THICK)

LEGEND

- EXISTING
- EXISTING NORTH OR WEST PROPERTY LINE
- EXISTING SOUTH OR EAST PROPERTY LINE
- EXISTING PIPE
- EXISTING KAMHOLE
- EXISTING CATCH BASIN OR CATCH BASIN MANHOLE
- PROPOSED GRADE AT C OF PAVEMENT
- PROPOSED STORM DRAIN MANHOLE
- PROPOSED STORM DRAIN LINE

PROFILE

- GW WELL GRADED GRAVEL
- GP POORLY GRADED GRAVEL
- GM SILTY GRAVEL
- GC CLAYEY GRAVEL
- SW WELL GRADED SAND
- SP POORLY GRADED SAND
- SM SILTY SAND
- SC CLAYEY SAND
- ML INORGANIC SILT
- CL INORGANIC CLAY
- OL ORGANIC SILT
- MH INORGANIC SILT
- CH INORGANIC CLAY
- OH ORGANIC CLAY
- PT PEAT
- WATER LEVEL
- TEST HOLE LOCATION
- % PASSING 200

CONTRACTING ENGINEERS ASSOCIATES
8220 BRIARWOOD STREET
ANCHORAGE, ALASKA 99502
349-2407

STATE OF ALASKA
49th
Professional Engineer
Ralph R. Joske
CE-1995

CALL BEFORE YOU DIG!
ANCHORAGE WATER & WASTEWATER 786-6557
ANCHORAGE TELEPHONE UTILITY 684-1558
CHUGACH ELECTRIC ASSOC. 284-3740
ENSTAR NATURAL GAS COMPANY 684-2161
MATANUSKA ELECTRIC ASSOC. 684-3134
MULTI VISIONS LTD. 270-7071
MUNICIPAL LIGHT & POWER 337-0481
STATE STREET LIGHTS 333-6548
TRAFFIC SIGNAL CABLE 786-8365
ANCHORAGE AREA UTILITY ASSO.

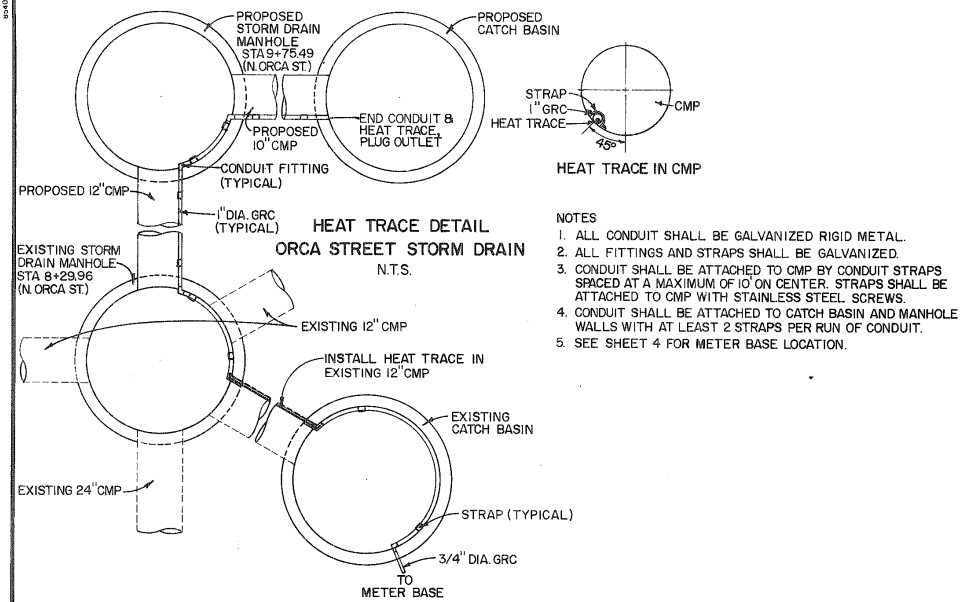
ENGINEERS
DRAWN CHECKED
MAR

PUBLIC WORKS DEPARTMENT

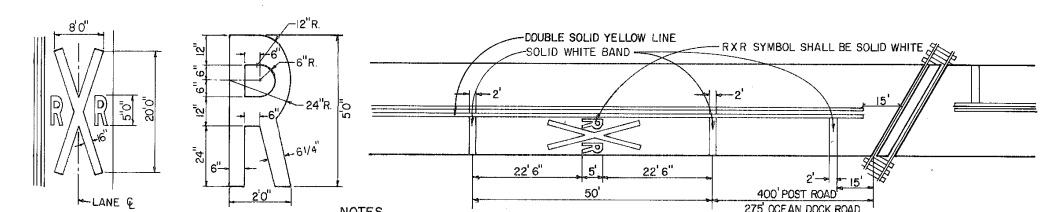
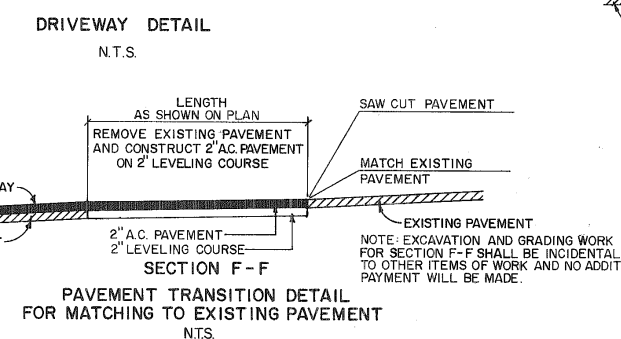
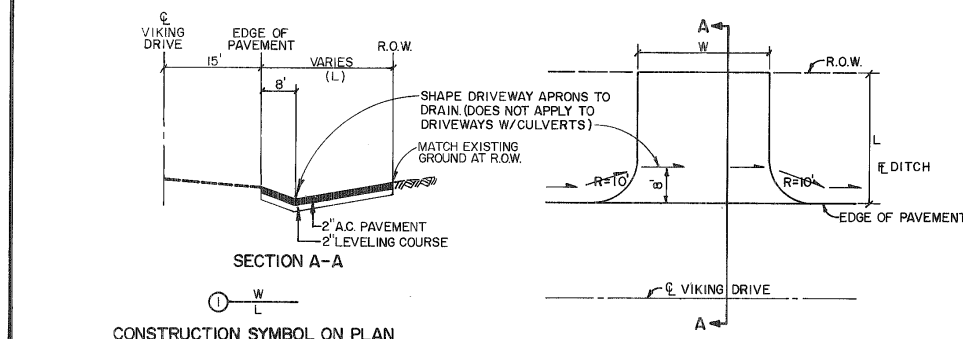
VIKING DRIVE
POST ROAD
OCEAN DOCK ROAD

GENERAL NOTES KEY MAP AND LEGEND

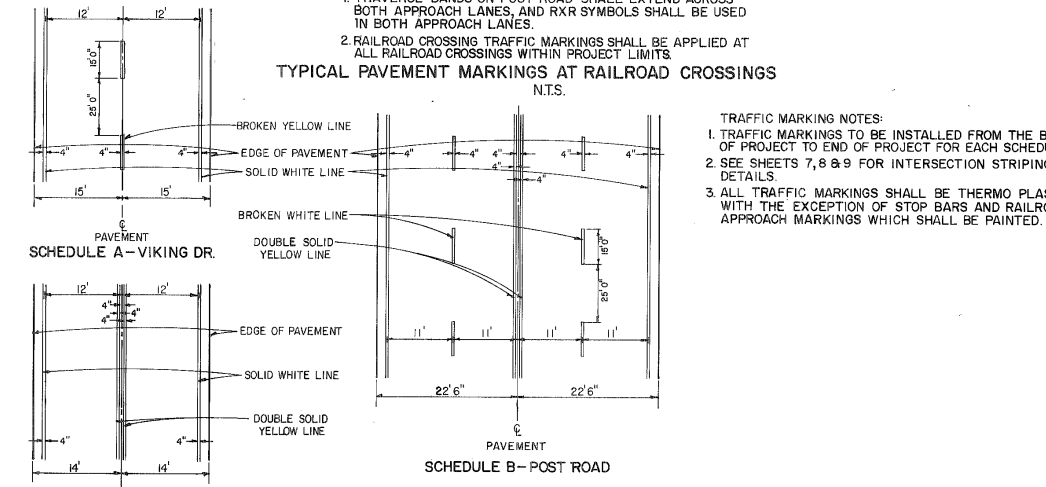
SCALE 1" = 50'
DATE JULY, 1987
ACCT. NO. 87-1



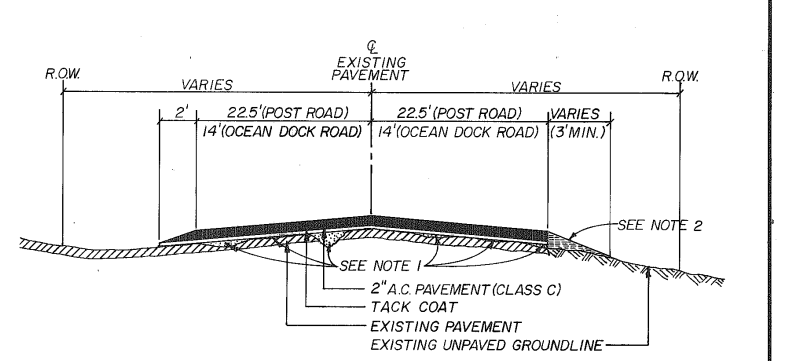
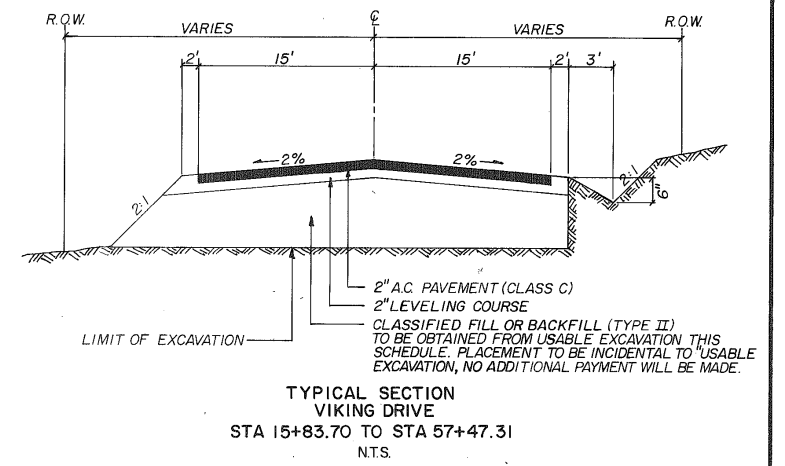
- NOTES**
1. ALL CONDUIT SHALL BE GALVANIZED RIGID METAL.
 2. ALL FITTINGS AND STRAPS SHALL BE GALVANIZED.
 3. CONDUIT SHALL BE ATTACHED TO CMP BY CONDUIT STRAPS SPACED AT A MAXIMUM OF 10' ON CENTER. STRAPS SHALL BE ATTACHED TO CMP WITH STAINLESS STEEL SCREWS.
 4. CONDUIT SHALL BE ATTACHED TO CATCH BASIN AND MANHOLE WALLS WITH AT LEAST 2 STRAPS PER RUN OF CONDUIT.
 5. SEE SHEET 4 FOR METER BASE LOCATION.



- NOTES**
1. TRAVERSE BANDS ON POST ROAD SHALL EXTEND ACROSS BOTH APPROACH LANES, AND R X R SYMBOLS SHALL BE USED IN BOTH APPROACH LANES.
 2. RAILROAD CROSSING TRAFFIC MARKINGS SHALL BE APPLIED AT ALL RAILROAD CROSSINGS WITHIN PROJECT LIMITS.



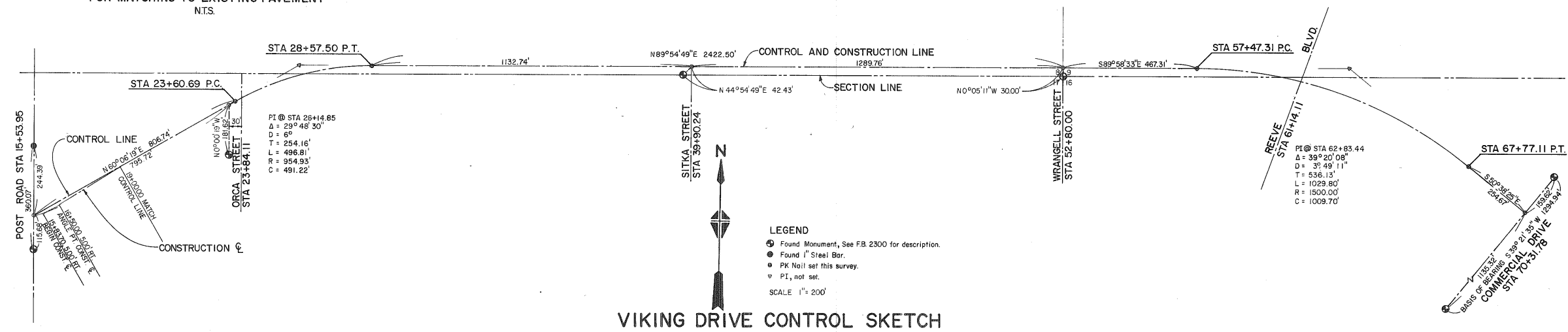
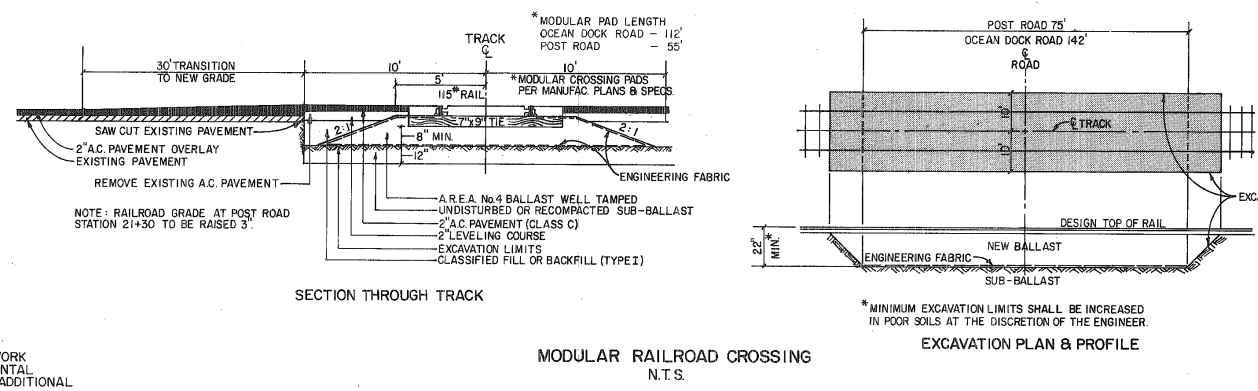
- TRAFFIC MARKING NOTES:**
1. TRAFFIC MARKINGS TO BE INSTALLED FROM THE BEGINNING OF PROJECT TO END OF PROJECT FOR EACH SCHEDULE.
 2. SEE SHEETS 7, 8 & 9 FOR INTERSECTION STRIPING DETAILS.
 3. ALL TRAFFIC MARKINGS SHALL BE THERMO PLASTIC, WITH THE EXCEPTION OF STOP BARS AND RAILROAD APPROACH MARKINGS WHICH SHALL BE PAINTED.



- NOTE 1.** PATCH AND COMPACT WITH A.C. PAVEMENT ALL POTHoles AND PAVEMENT CRACKS PRIOR TO PLACEMENT OF 2\"/>

NOTE 2. AFTER PAVING, GRADE AND COMPACT WITH EXISTING ON-SITE MATERIAL TO FORM SMOOTH TRANSITION TO MATCH EXISTING GROUND AND TO MAINTAIN DRAINAGE AS NECESSARY. THIS WORK SHALL BE INCIDENTAL TO A.C. PAVEMENT AND NO ADDITIONAL PAYMENT WILL BE MADE.

NOTE 3. THE CONTRACTOR SHALL STRING-LINE THE EXISTING PAVEMENT TO ESTABLISH A UNIFORM ALIGNMENT. THE PAVEMENT OVERLAY SHOULD BE PLACED TO MAXIMIZE THE COVERAGE OF THE EXISTING PAVED TRAVELED WAY. THE ENGINEER SHALL APPROVE THE ALIGNMENT PRIOR TO PAVING.



FIELD BOOKS	TBM NO.	LOCATION	ELEV.	DATA	DESIGNED BY	CHECKED BY	DATE	DESCRIPTION	BY	REV	DATE	DESCRIPTION	BY
DESIGN				BASE			1/7/88	AND PER CONTRACTOR'S NOTES	P.H.				
STAKING				TOPO									
ASBUILT				PROFILE									
CONTRACTOR				SAN SEWER									
INSPECTOR				STORM SEWER									
CONSTRUCTION RECORD				WATER									
				GAS									

CONTRACTING ENGINEERS & ASSOCIATES
8220 BRIARWOOD STREET
ANCHORAGE, ALASKA 99502
549-2407

STATE OF ALASKA
49TH
RALPH B. JOKELA
ANCHORAGE, ALASKA

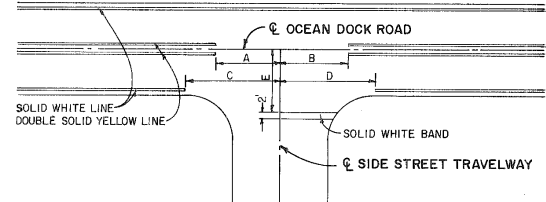
DEPARTMENT OF PUBLIC WORKS
OFFICE OF THE MUNICIPAL ENGINEER

87-34 VIKING DRIVE SCHEDULE A
87-35 POST ROAD SCHEDULE B
87-36 OCEAN DOCK ROAD SCHEDULE C

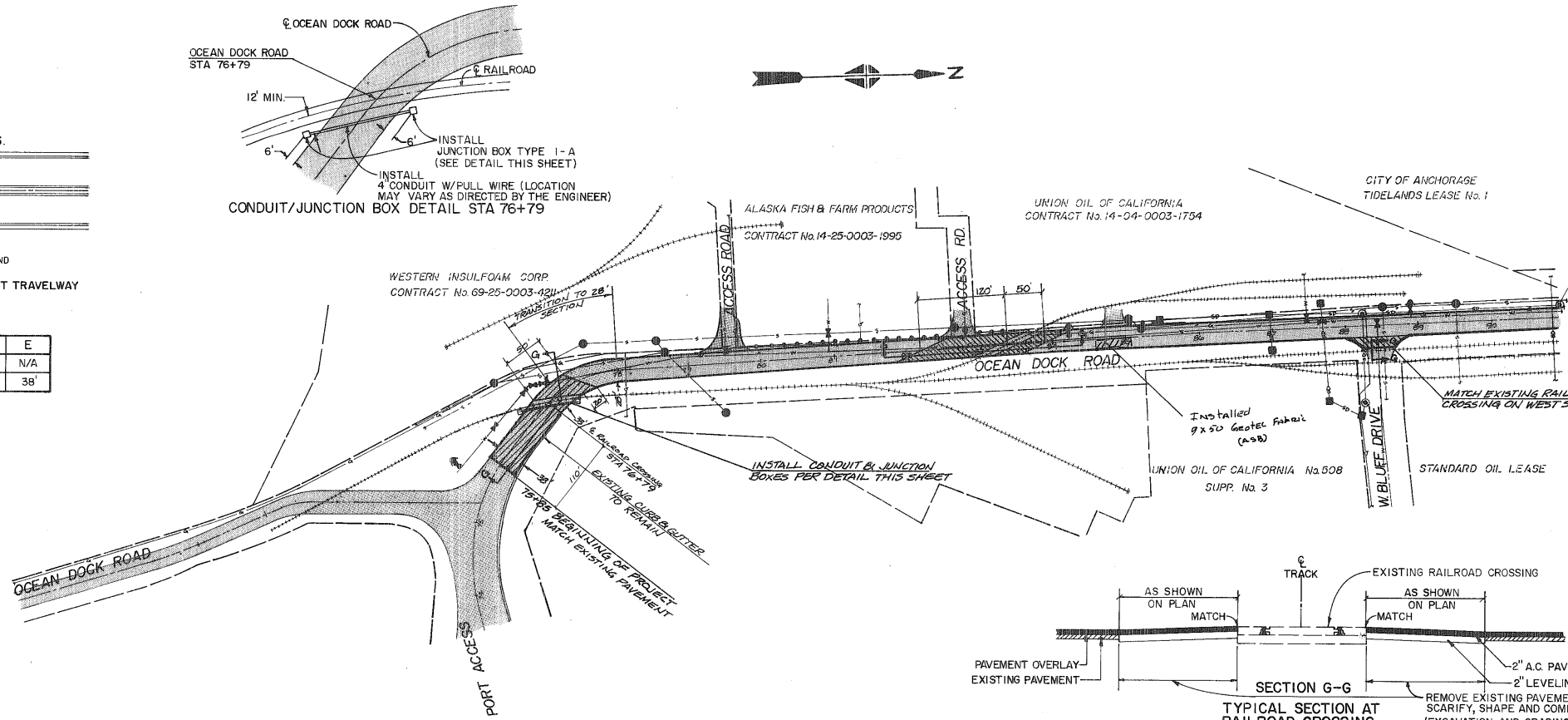
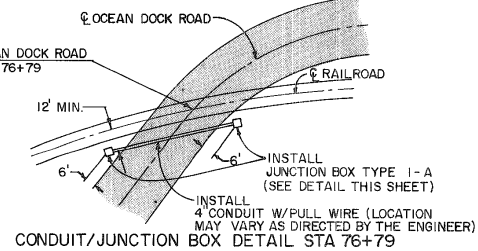
DETAIL SHEET

SCALE HOR. 1" = 40' VER. 1" = 10' DATE JULY, 1987 GRID ACCT. NO. 87-1 SHEET 3 of 9

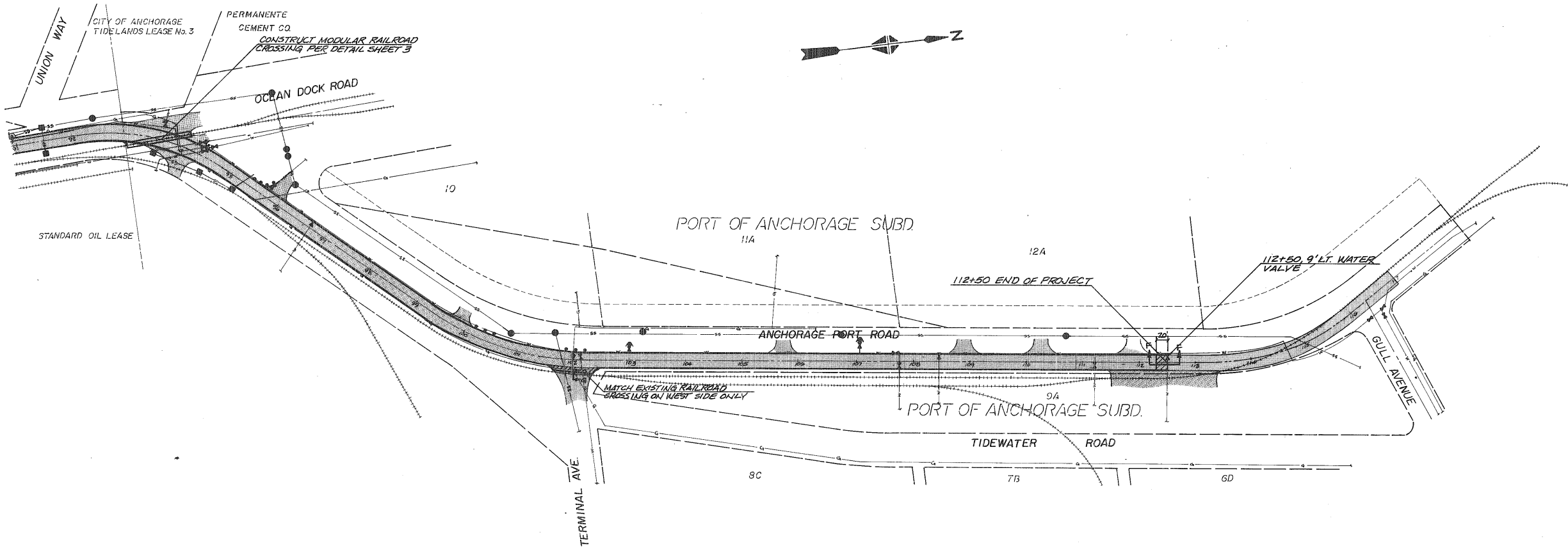
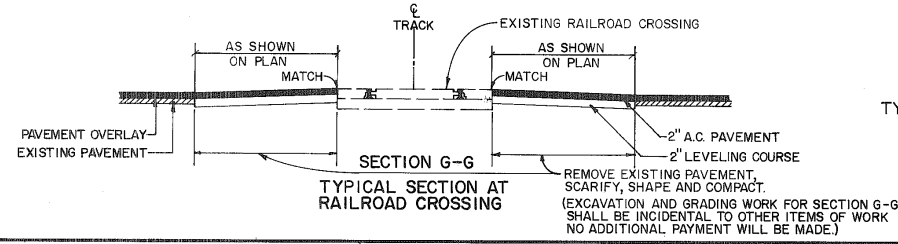
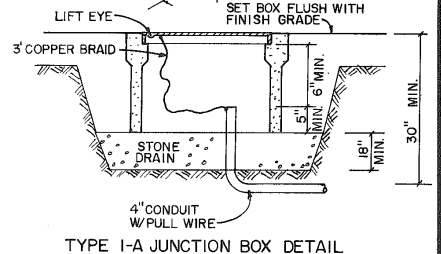
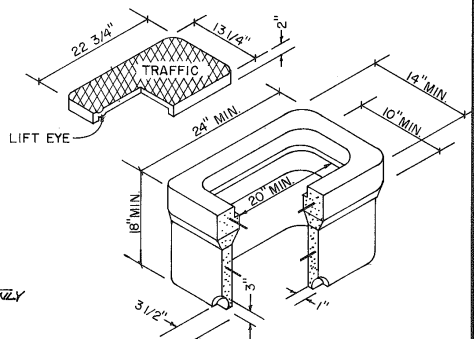
INTERSECTION STRIPING DETAIL N.T.S.



SIDE STREET	A	B	C	D	E
W. BLUFF DRIVE	45'	35'	45'	35'	N/A
TERMINAL AVENUE	45'	45'	45'	45'	38'



NOTE:
 1. STATIONING SHOWN ON THIS SHEET IS BASED ON RECORD INFORMATION
 2. FOR SECTION F-F AND TYPICAL SECTION, SEE SHEET 3.



AS BUILT
 DATE 2/4/80
 P.H.

FIELD BOOKS	TBM NO.	LOCATION	ELEV.	DATA	DRAWN BY	CHECKED BY	DATA	DRAWN BY	CHECKED BY	REV	DATE	DESCRIPTION	BY	REV	DATE	DESCRIPTION	BY
DESIGN				BASE	MLC	MLC	TELE			1	12/4/80	Asm. Per Contractor's Notes	PH				
STAKING				TOPO	MLC	MLC	ELEC										
ASBUILT				PROFILE	MLC	MLC	DESIGN										
CONTRACTOR				SAN SEWER	MLC	MLC	QUANTITIES										
INSPECTOR				STORM SEWER	MLC	MLC	MUN. PRELIM. CHECK										
CONSTRUCTION RECORD				WATER	MLC	MLC	MUN. FINAL CHECK										
				GAS	MLC	MLC											

CONTRACTING ENGINEERS & ASSOCIATES
 8220 BRIARWOOD STREET
 ANCHORAGE, ALASKA 99502
 349-2407

STATE OF ALASKA
 49th
 RALPH B. JOKELA
 No. CE-1995

ANCHORAGE ALASKA

DEPARTMENT OF PUBLIC WORKS
 OFFICE OF THE MUNICIPAL ENGINEER

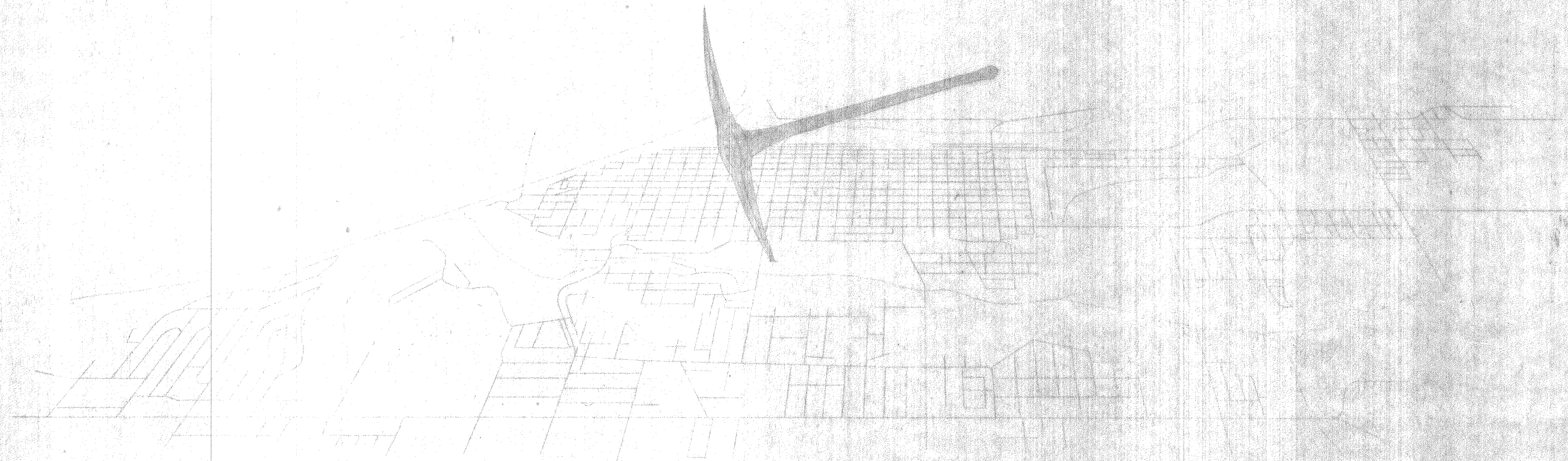
87-36 SCHEDULE C
 OCEAN DOCK ROAD STREET IMPROVEMENTS
 OCEAN DOCK ROAD
 STA 75+85 TO STA 115+20

SCALE: HOR. 1"=100' DATE JULY, 1987 GRID 1030-1130 SHEET 9 of 9
 VER. 1"=N/A ACCT. NO. 87-1

FILE NO. 1988-283

CITY OF ANCHORAGE

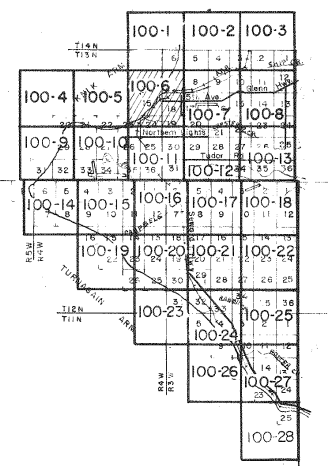
1964 CONSTRUCTION



OCEAN DOCK RD. IMPROVEM'T

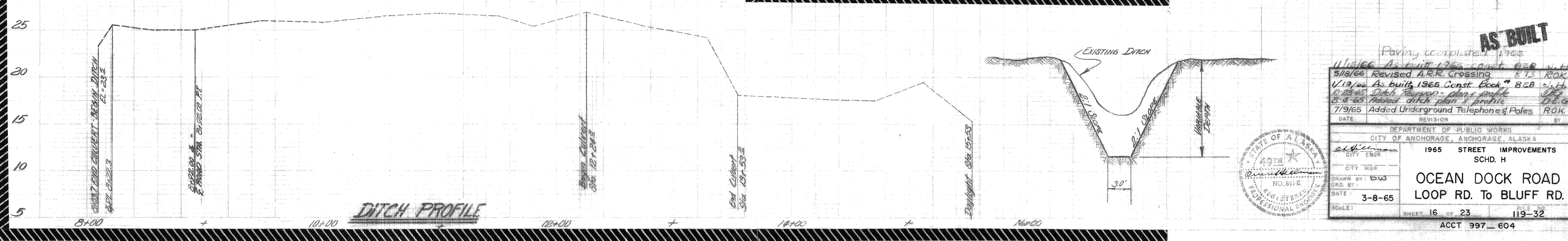
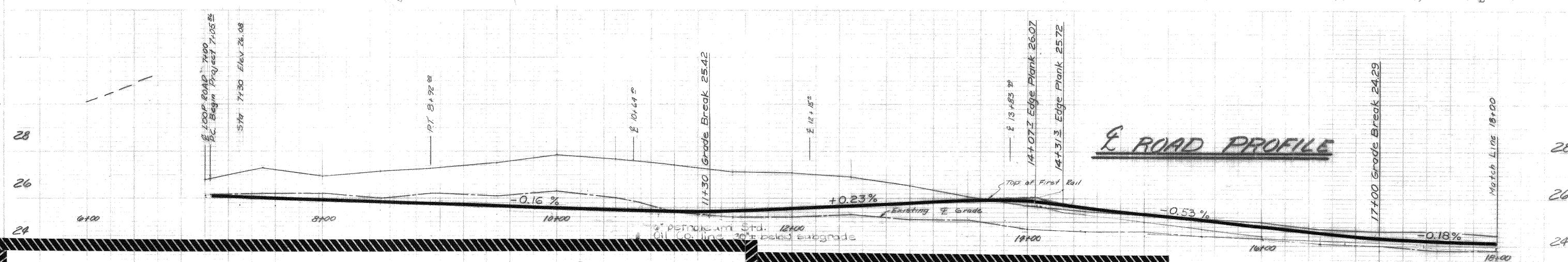
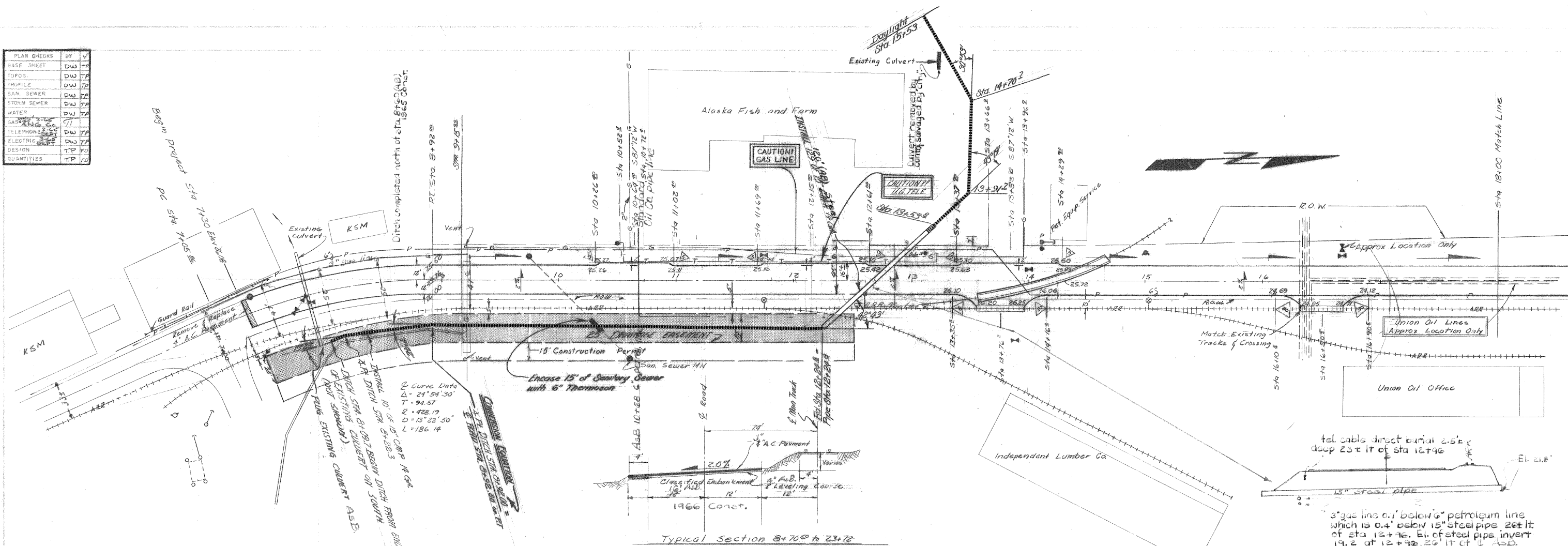
APPROVED BY
ROBERT H. OLDLAND
CITY MANAGER

A handwritten signature in dark ink, appearing to read "Robert H. Oldland", is written over the printed name of the City Manager.



DATE	REVISION	BY
DEPARTMENT OF PUBLIC WORKS CITY OF ANCHORAGE, ANCHORAGE, ALASKA		
CITY ENGR.	JOHN M. GILL	
CITY MGR.		
DRAWN BY:		
CKD. BY:		
DATE:		
SCALE:	SHEET _____ OF _____	FILE NO. _____

PLAN CHECKS	BY	✓
BASE SHEET	DW	TP
TOPOG.	DW	TP
PROFILE	DW	TP
SAN. SEWER	DW	TP
STORM SEWER	DW	TP
WATER	DW	TP
GAZEBO	TT	
TELEPHONE	DW	TP
ELECTRIC	DW	TP
DESIGN	TP	FO
QUANTITIES	TP	FO



AS BUILT

Paving completed 1966

11/15/66 As Built 1966 const. 813 ROK

5/18/66 Revised A.R.R. Crossing 813 ROK

1/19/66 As built 1965 Const. Book # 828 L.H.

10/25/65 Ditch Revisions - see profile D.E.G.

8-9-65 Added ditch plan profile D.E.G.

7/19/65 Added Underground Telephone & Poles ROK

DATE REVISION BY

STATE OF ALASKA
49TH
DEPARTMENT OF PUBLIC WORKS
CITY OF ANCHORAGE, ANCHORAGE, ALASKA

CITY ENGR
CITY MGR

1965 STREET IMPROVEMENTS
SCHD. H

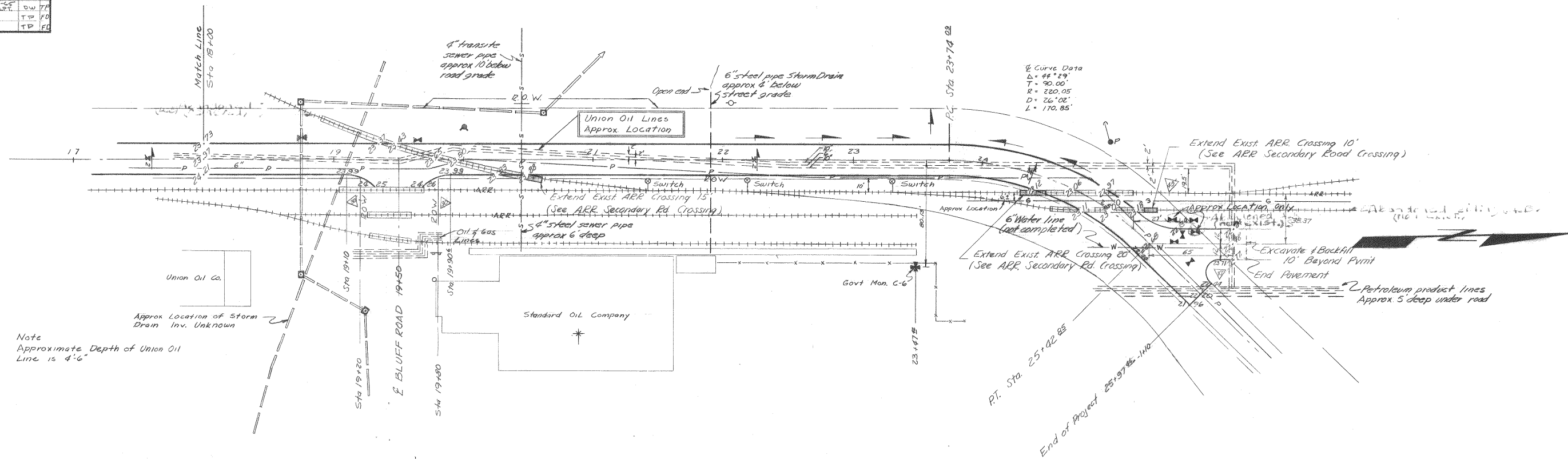
DRAWN BY: DW
CHKD BY: TP
DATE: 3-8-65

OCEAN DOCK ROAD
LOOP RD. TO BLUFF RD.

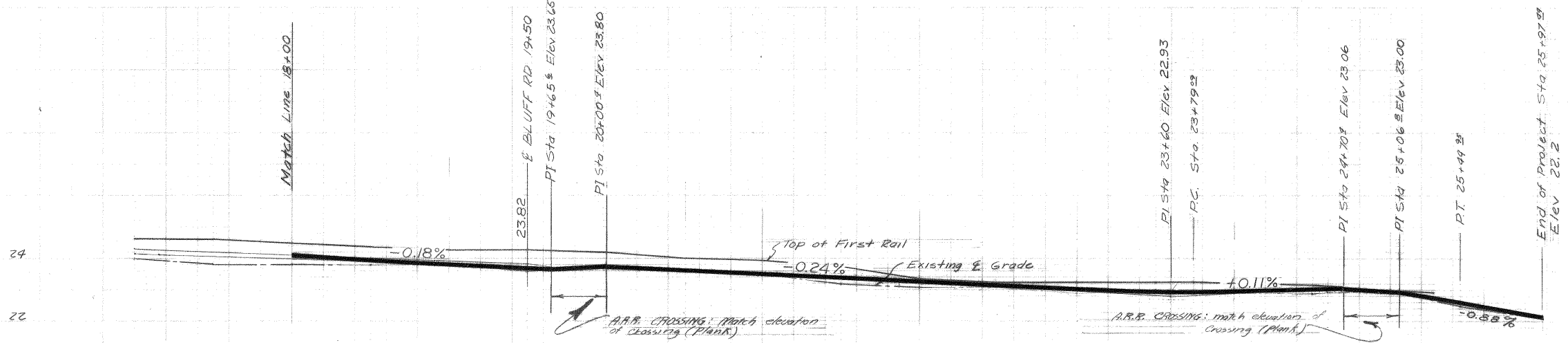
SCALE: SHEET 16 OF 23 119-32
ACCT 997-604

AS BUILT

PLAN CHECKS	BY	✓
BASE SHEET	DW	TP
TOPOG.	DW	TP
PROFILE	DW	TP
SAN. SEWER	DW	TP
STORM SEWER	DW	TP
WATER	DW	TP
GAS	DW	TP
TELEPHONE	DW	TP
ELECTRIC	DW	TP
DESIGN	TP	FD
QUANTITIES	TP	FD



Note
Approximate Depth of Union Oil
Line is 4'-6"



AS BUILT

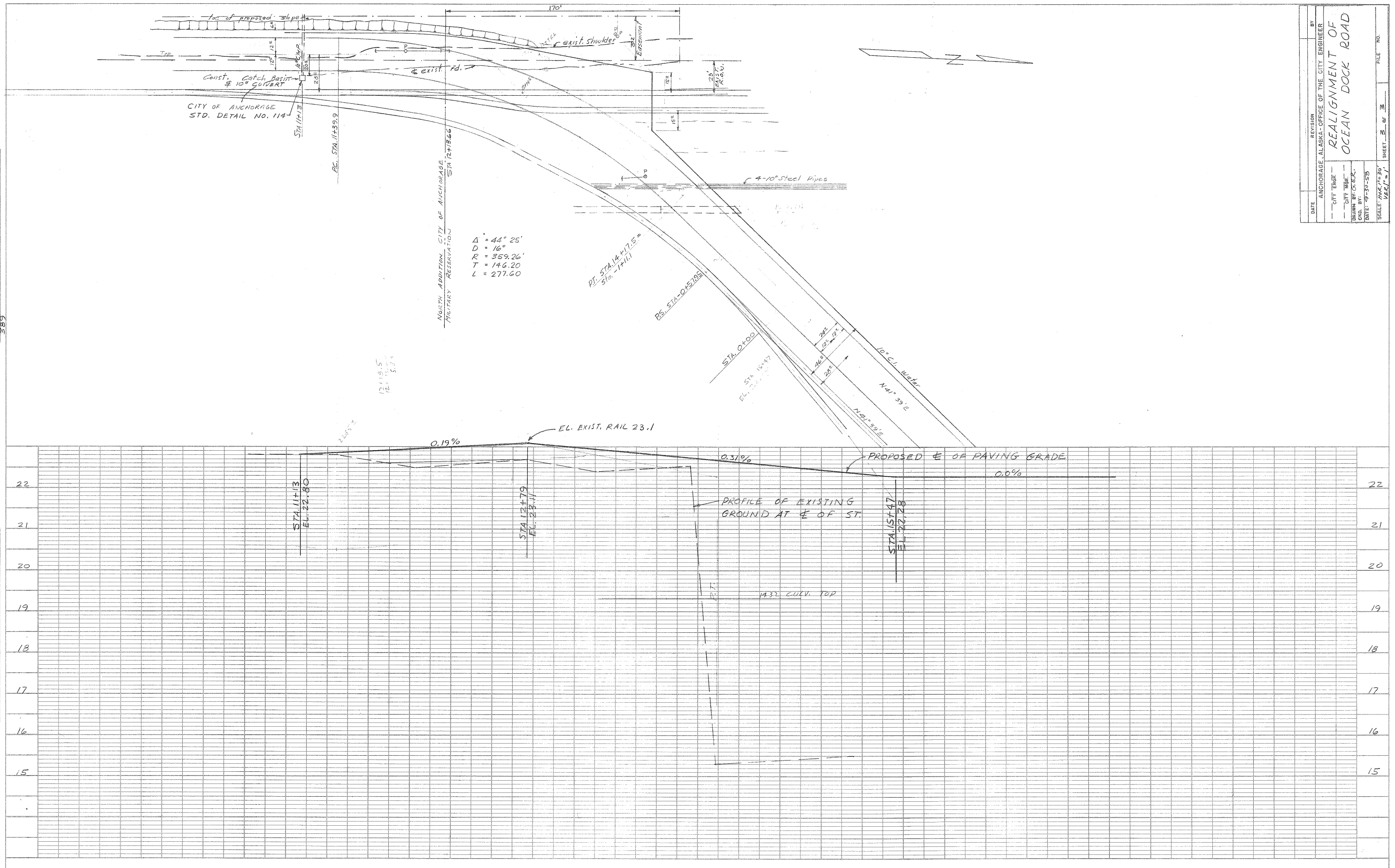
11,1566 As Built 1166 Class. 11.11
Book 82B

DATE	REVISION	BY
DEPARTMENT OF PUBLIC WORKS CITY OF ANCHORAGE, ANCHORAGE, ALASKA		
1965 STREET IMPROVEMENTS SCHED. H		
OCEAN DOCK ROAD LOOP RD. to PORT RD.		
DRAWN BY: DW	NO. 841-E	
CITY MGR		
DATE: 3-8-65		
SCALE: H=1"=40'		
SHEET 17 OF 23	119-31	NO.
ACCT. 9971.604		

AS BUILT

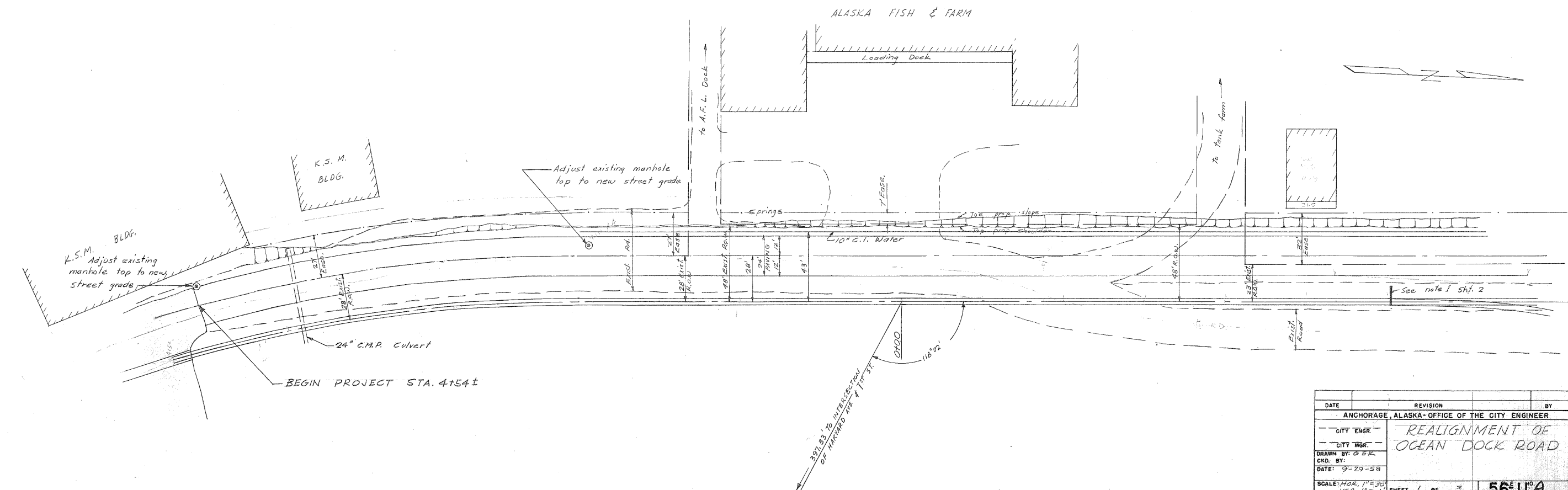
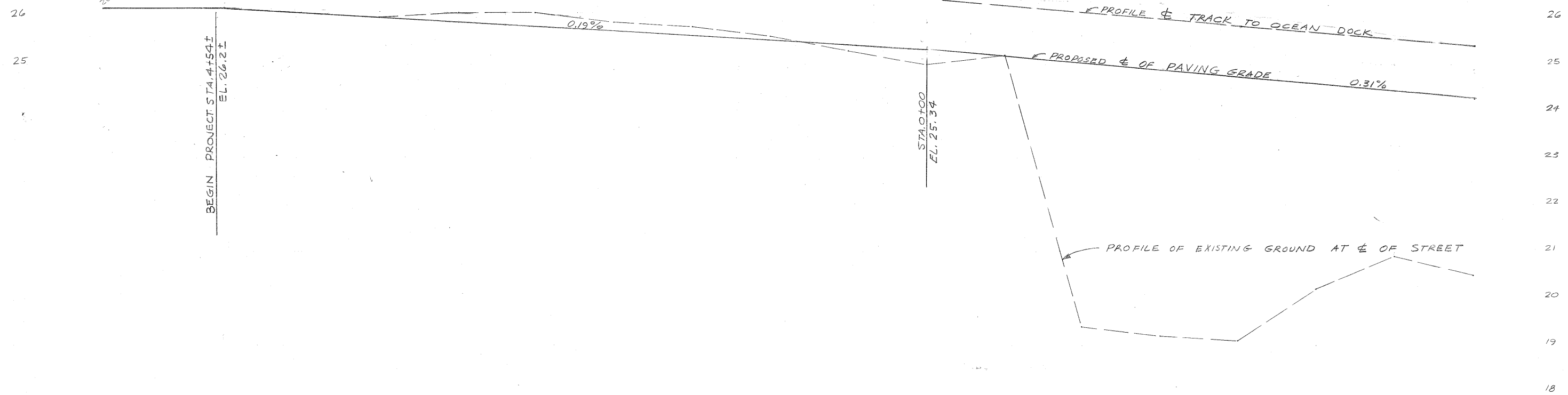
PLAN
 SURVEYED BY _____ DATE _____
 NOTE BOOK NO. 398
 SHEET NO. 589
 CITY OF ANCHORAGE
 STANDARD DETAIL NO. 114
 CITY OF ANCHORAGE
 MILITARY RESERVATION

PROFILE
 SURVEYED BY _____ DATE _____
 NOTE BOOK NO. 398
 SHEET NO. 589
 CITY OF ANCHORAGE
 STANDARD DETAIL NO. 114
 CITY OF ANCHORAGE
 MILITARY RESERVATION



ANCHORAGE ALASKA - OFFICE OF THE CITY ENGINEER
REALIGNMENT OF OCEAN DOCK ROAD
 DATE: 9-30-58
 SCALE: 1/4" = 1'-0"
 SHEET 5 OF 3
 FILE NO.

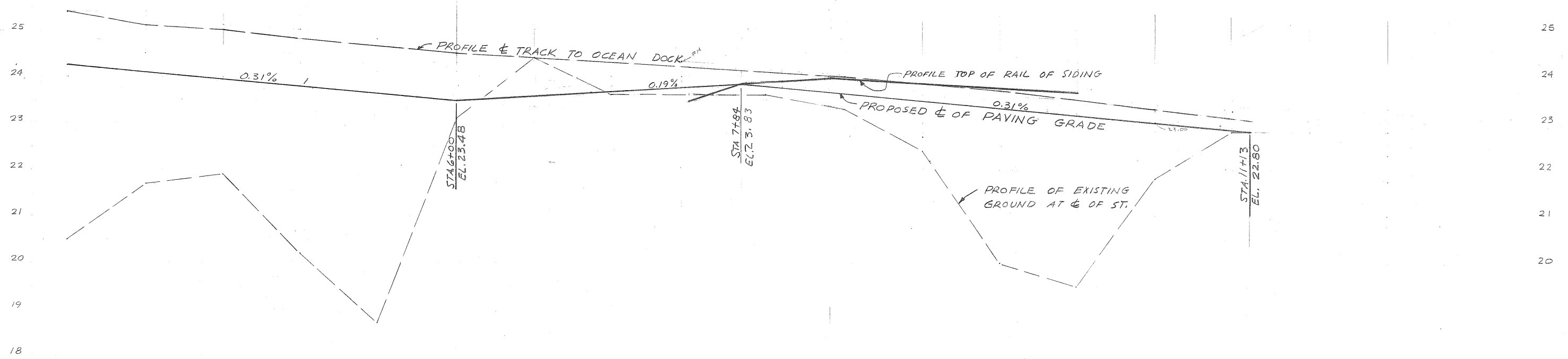
-5+00 -4+50 -4+00 -3+50 -3+00 -2+50 -2+00 -1+50 -1+00 -0+50 0+00 0+50 1+00 1+50 2+00 2+50 3+00 3+50



4-3 389 183
R 75 P 22

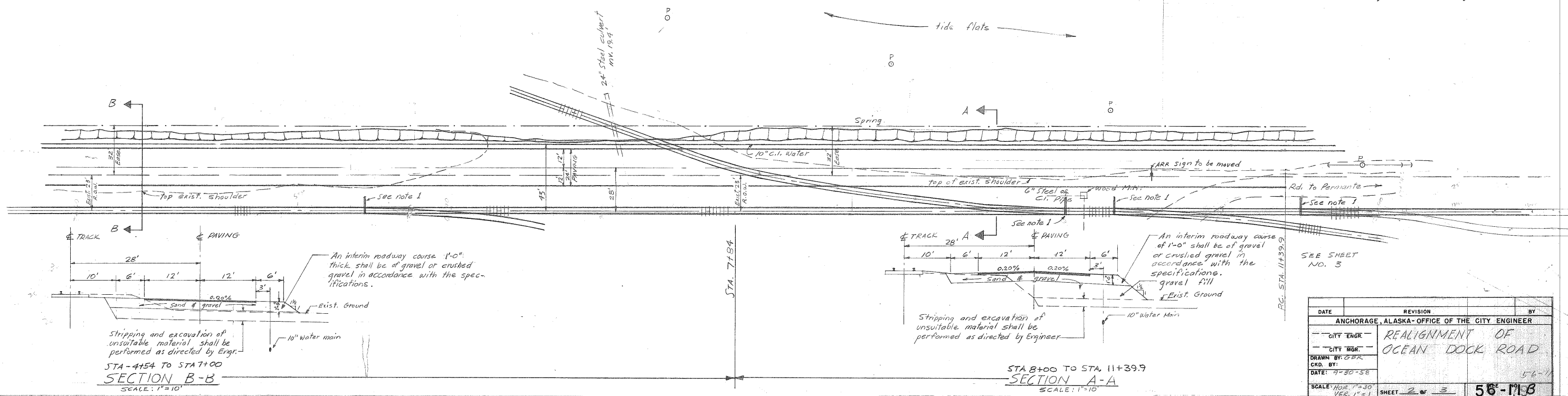
DATE	REVISION	BY
	ANCHORAGE, ALASKA - OFFICE OF THE CITY ENGINEER	
	CITY ENGR.	
	CITY MGR.	
	DRAWN BY: BEK	
	CHK. BY:	
	DATE: 9-29-58	
SCALE: HOR. 1" = 30'		SHEET 1 OF 3
VER. 1" = 1'		
		5611A

3+50 4+00 4+50 5+00 5+50 6+00 6+50 7+00 7+50 8+00 8+50 9+00 9+50 10+00 10+50 11+00 11+50 12+00



NOTES.

1. All switch stands that are noted on the plans shall be moved to the East side of the track.
2. From sta. 7+00 to 8+00 transition from section B-B to section A-A, matching track crossing at sta. 7+84.
3. From sta. 11+39.9 to sta. 15+47 transition from section A-A back to section B-B, allowing for matching track crossing elevations.



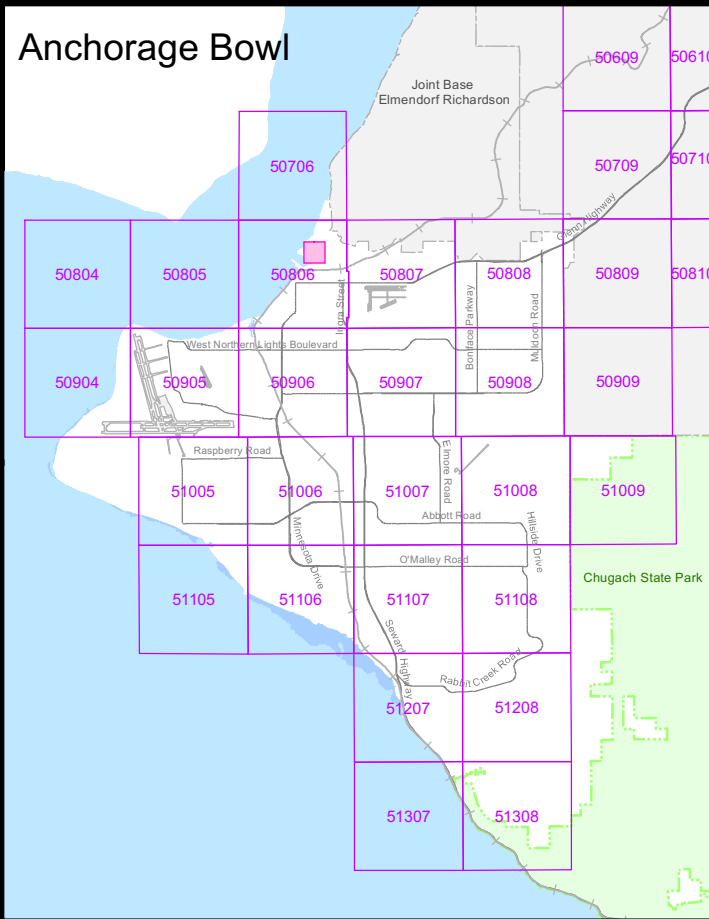
STA 4+54 TO STA 7+00
SECTION B-B
SCALE: 1"=10'

STA 8+00 TO STA. 11+39.9
SECTION A-A
SCALE: 1"=10'

DATE	REVISION	BY
	ANCHORAGE, ALASKA - OFFICE OF THE CITY ENGINEER	
	CITY ENGR.	
	CITY MGR.	
	DRAWN BY: GOR	
	CHEK. BY:	
	DATE: 7-30-58	
	SCALE: Hor. 1"=30'	
	VER. 1"=1'	
	SHEET 2 of 3	
		56-11-B

FR. 398 FB. 359

Anchorage Bowl



Legend

<ul style="list-style-type: none"> All Status (Constructed, Design, Standby) Gate or Butterfly, AWWU Gate or Butterfly, nonAWWU All Valve Types, All Owners, Closed Single, AWWU Single, Private Single, Unknown Owner Double, AWWU Double, Private Flushing, AWWU All Hydrant, Other Utility Well, AWWU Well, Private 	<ul style="list-style-type: none"> Administration Facility Air Vacuum Facility Booster Station Facility Pressure Reducing Facility Reservoir Facility Valve Facility Well Facility Water Treatment Facility
<ul style="list-style-type: none"> Constructed Pipe Main, AWWU Service Line, Private Main, Other Utility Casing and Outer Pipe, All Owners Record Drawing Limit Other Regulated Utility 	<ul style="list-style-type: none"> Design Pipe Main, AWWU Service Line, Private Retired Pipe Abandoned in Place, All Owners Pressure Zone MOA Grid

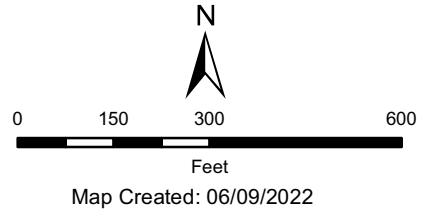
INFORMATION AND DATA CONTAINED ON THIS DOCUMENT IS NOT TO BE CONSIDERED ACCURATE AND THE MUNICIPALITY OF ANCHORAGE ASSUMES NO LIABILITY FOR DAMAGES OCCURING AS A RESULT OF USING THIS DOCUMENT. FOR THE LATEST AND MOST UP TO DATE INFORMATION YOU ARE URGED TO CALL THE ANCHORAGE WATER & WASTEWATER UTILITY AT (907) 564-2725 BEFORE STARTING OPERATIONS.

Municipality of Anchorage

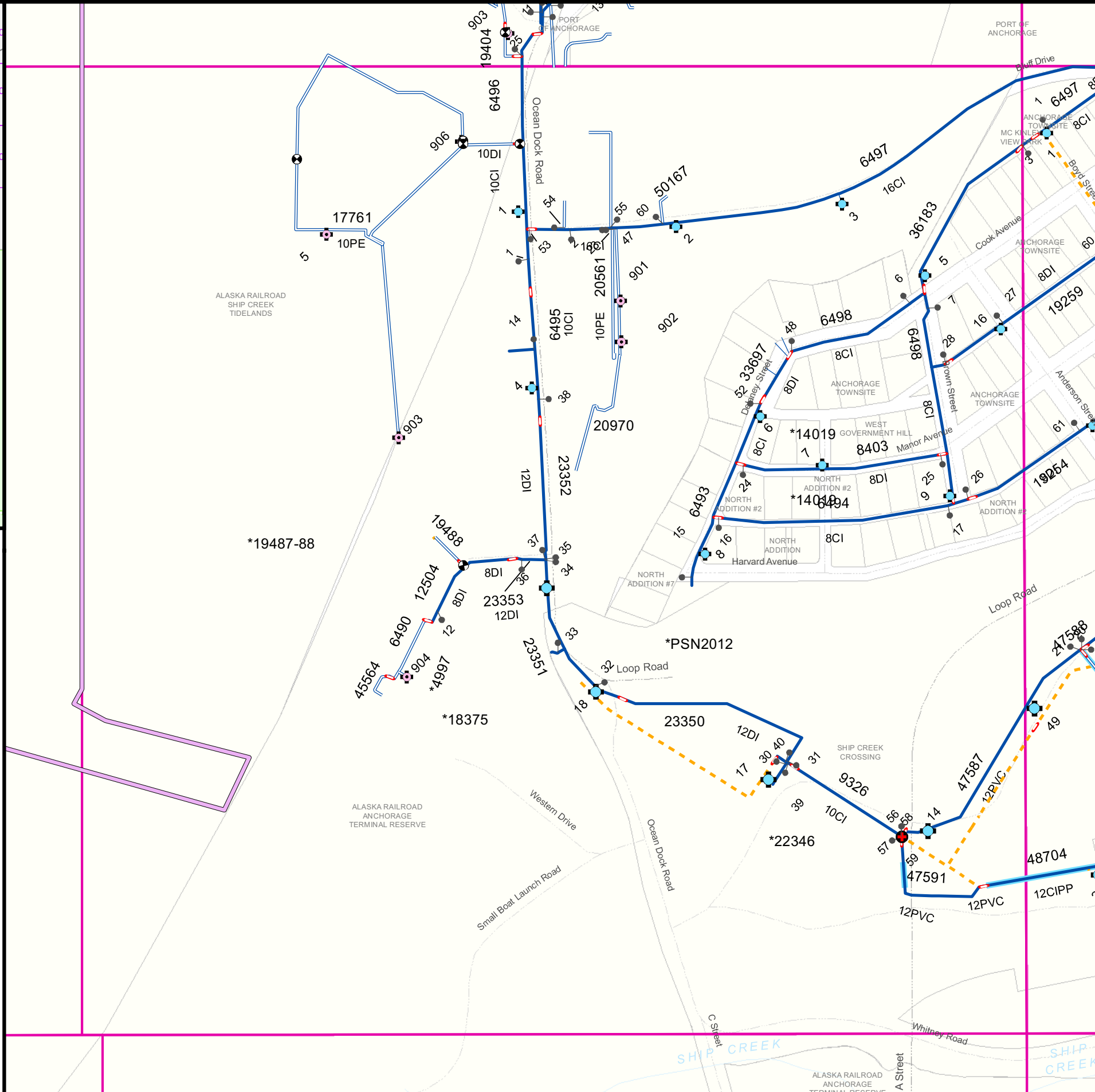
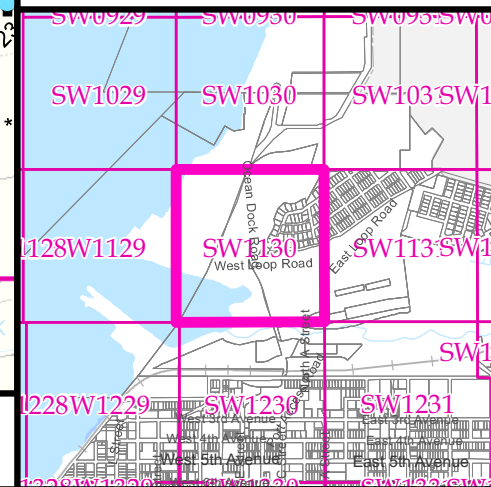


Pipe Types

- ABS Acrylonitrile-Butadiene-Styrene
- AC Asbestos Concrete
- CC Concrete Cylinder
- CI Cast Iron
- CIPP Cured In Place Pipe
- CMP Corrugated Metal
- CN Concrete
- CU Copper
- DI Ductile Iron
- FC Formed Concrete
- GI Galvanized Iron
- HDPE High Density Polyethylene
- MLC Mortar Lined Concrete
- PE Polyethylene
- PVC Polyvinylchloride
- RC Reinforced Concrete
- ST Steel
- TC Techite
- UNK Unknown
- VC Vitrified Clay
- WS Wood Stave
- WST Welded Steel
- NP No Print
- * Private System



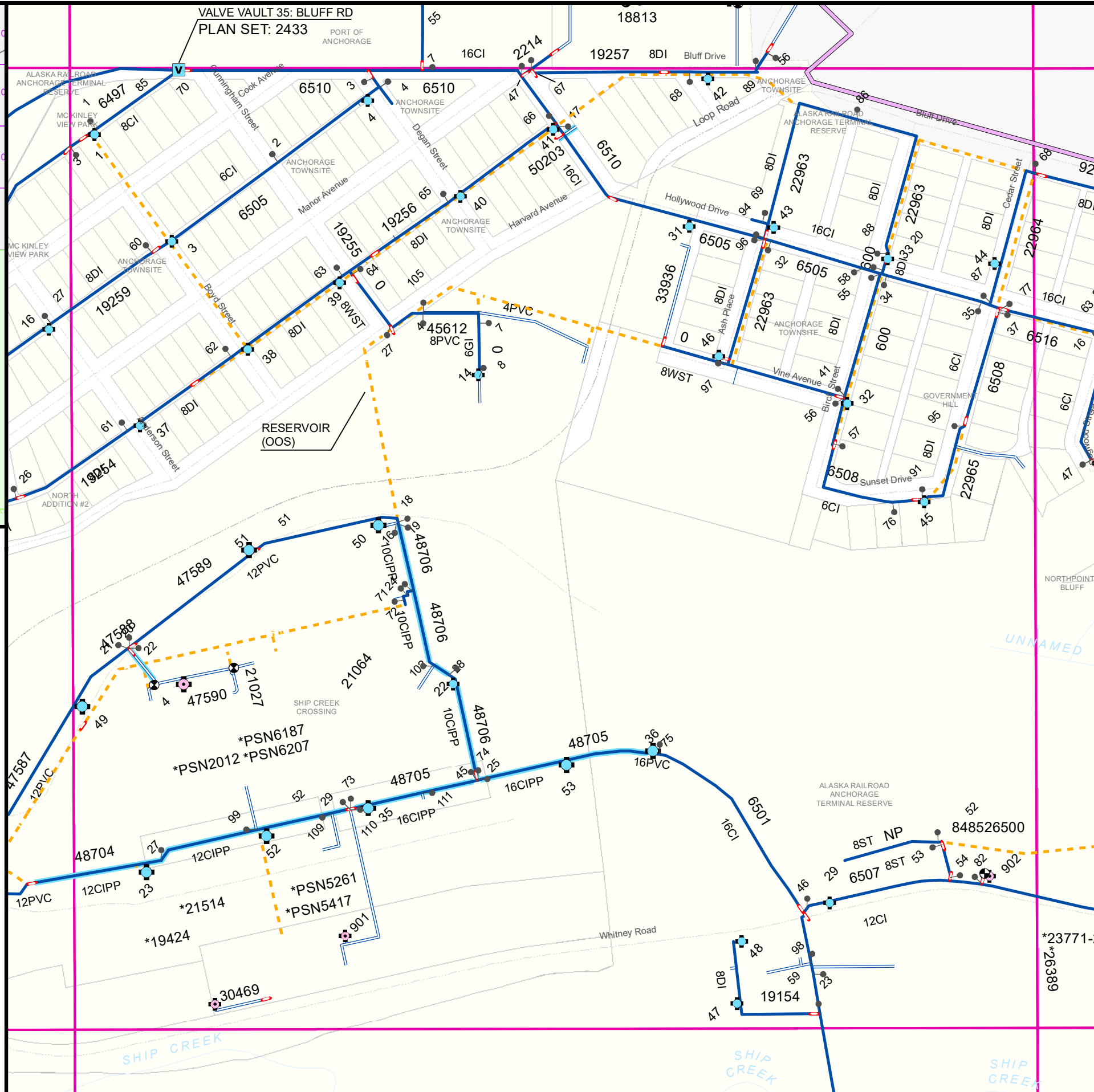
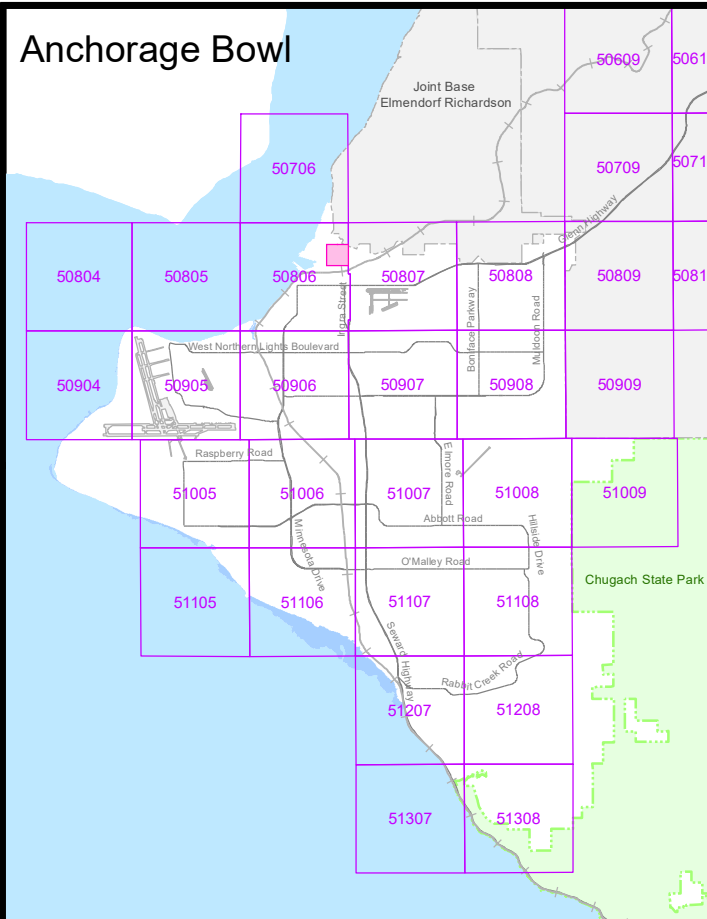
Legal:
SW 1/4 Sec 7 T13N R3W



SW1130 Grid Number

Water Distribution System

Anchorage Bowl

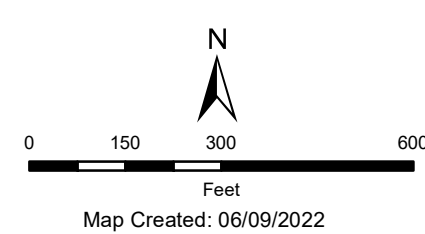


Municipality of Anchorage



Pipe Types

ABS	Acrylonitrile-Butadiene-Styrene
AC	Asbestos Concrete
CC	Concrete Cylinder
CI	Cast Iron
CIPP	Cured In Place Pipe
CMP	Corrugated Metal
CN	Concrete
CU	Copper
DI	Ductile Iron
FC	Formed Concrete
GI	Galvanized Iron
HDPE	High Density Polyethylene
MLC	Mortar Lined Concrete
PE	Polyethylene
PVC	Polyvinylchloride
RC	Reinforced Concrete
ST	Steel
TC	Techite
UNK	Unknown
VC	Vitrified Clay
WS	Wood Stave
WST	Welded Steel
NP	No Print
*	Private System



Legend

All Status (Constructed, Design, Standby)

- Gate or Butterfly, AWWU
- Gate or Butterfly, nonAWWU
- All Valve Types, All Owners, Closed
- Single, AWWU
- Single, Private
- Single, Unknown Owner
- Double, AWWU
- Double, Private
- Flushing, AWWU
- All Hydrant, Other Utility
- Well, AWWU
- Well, Private

Construction and Design

- Administration Facility
- Air Vacuum Facility
- Booster Station Facility
- Pressure Reducing Facility
- Reservoir Facility
- Valve Facility
- Well Facility
- Water Treatment Facility

Constructed Pipe

- Main, AWWU
- Service Line, Private
- Main, Other Utility
- Casing and Outer Pipe, All Owners

Design Pipe

- Main, AWWU
- Service Line, Private

Retired Pipe

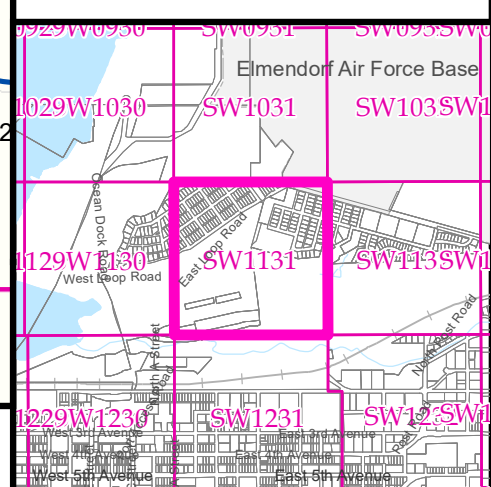
- Abandoned in Place, All Owners

Other Symbols

- Record Drawing Limit
- Other Regulated Utility
- Pressure Zone
- MOA Grid

INFORMATION AND DATA CONTAINED ON THIS DOCUMENT IS NOT TO BE CONSIDERED ACCURATE AND THE MUNICIPALITY OF ANCHORAGE ASSUMES NO LIABILITY FOR DAMAGES OCCURRING AS A RESULT OF USING THIS DOCUMENT. FOR THE LATEST AND MOST UP TO DATE INFORMATION YOU ARE URGED TO CALL THE ANCHORAGE WATER & WASTEWATER UTILITY AT (907) 564-2725 BEFORE STARTING OPERATIONS.

Legal:
SE 1/4 Sec 7 T13N R3W



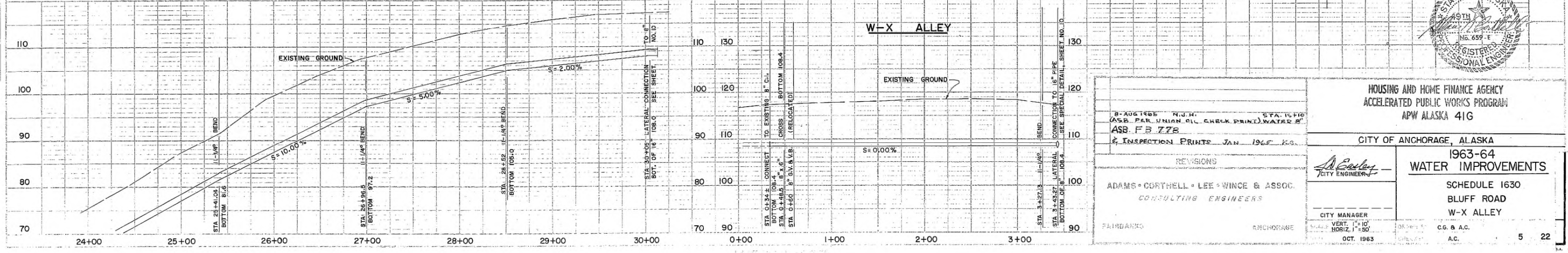
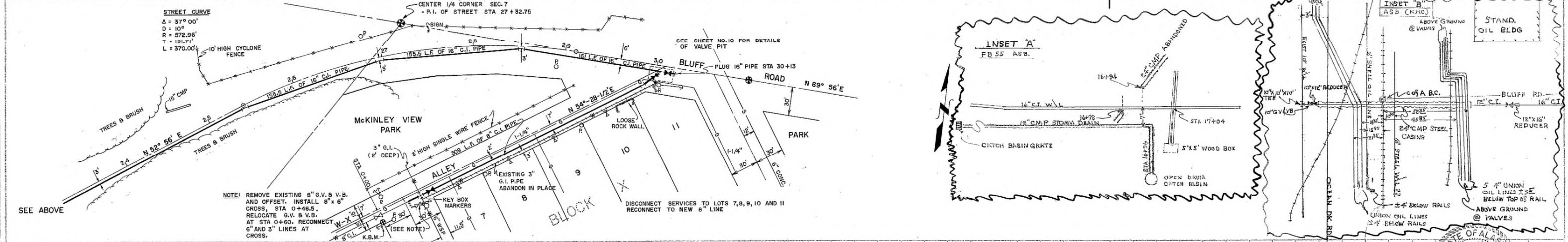
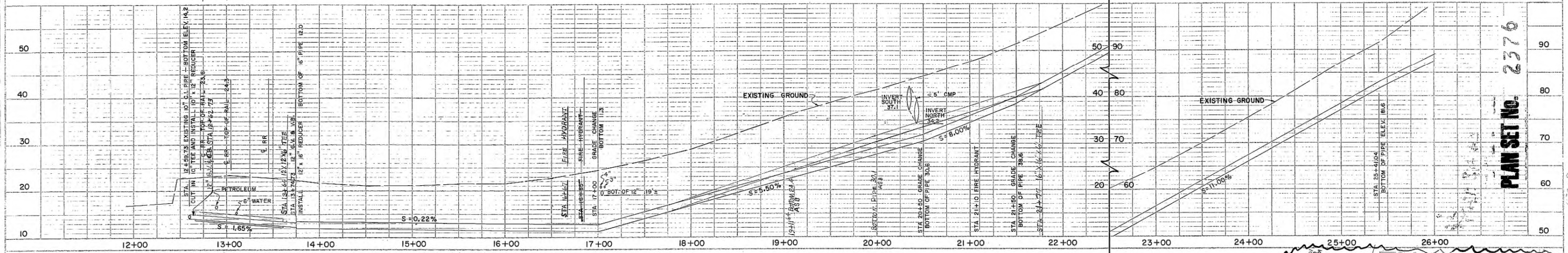
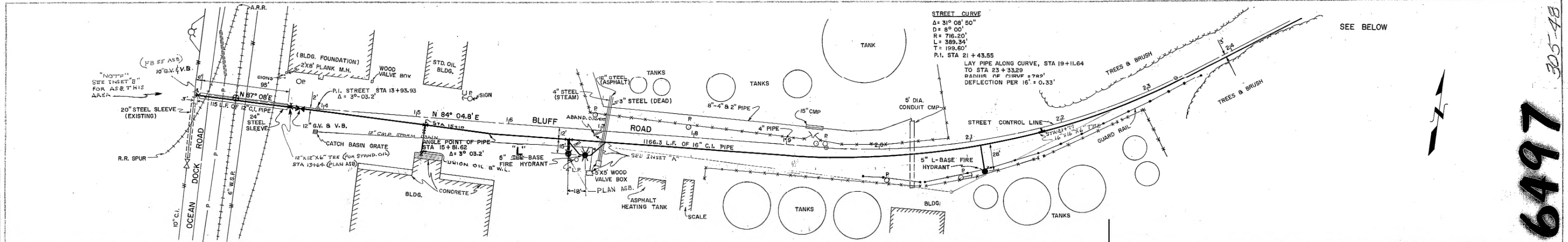
SW1131 Grid Number

Water Distribution System

6497

PLAN SET NO. 2376

1130-7



STATE OF ALASKA
19TH DISTRICT
REGISTERED PROFESSIONAL ENGINEER

HOUSING AND HOME FINANCE AGENCY
ACCELERATED PUBLIC WORKS PROGRAM
APW ALASKA 41G

CITY OF ANCHORAGE, ALASKA

1963-64
WATER IMPROVEMENTS

SCHEDULE 1630
BLUFF ROAD
W-X ALLEY

ADAMS • CORTHELL • LEE • WINCE & ASSOC.
CONSULTING ENGINEERS

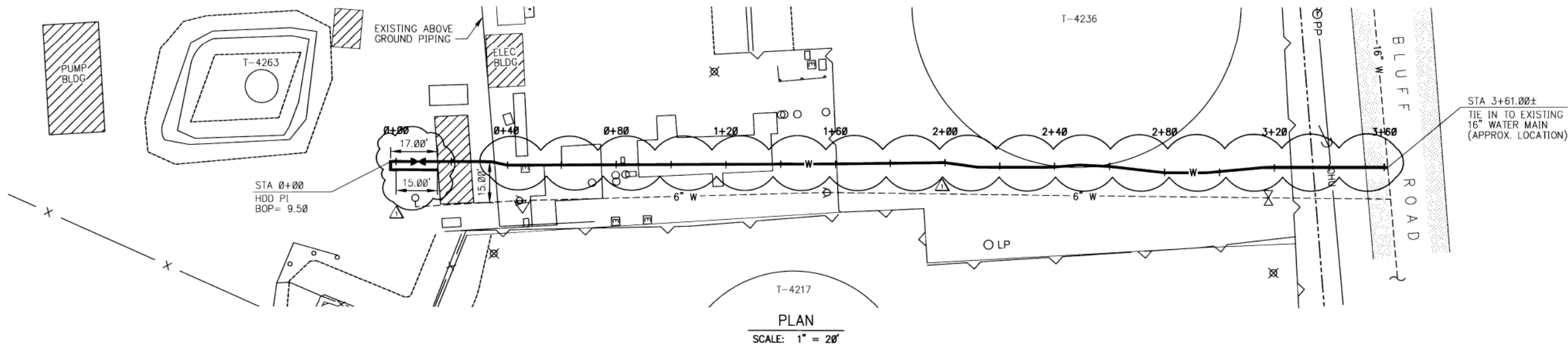
CITY ENGINEER

CITY MANAGER

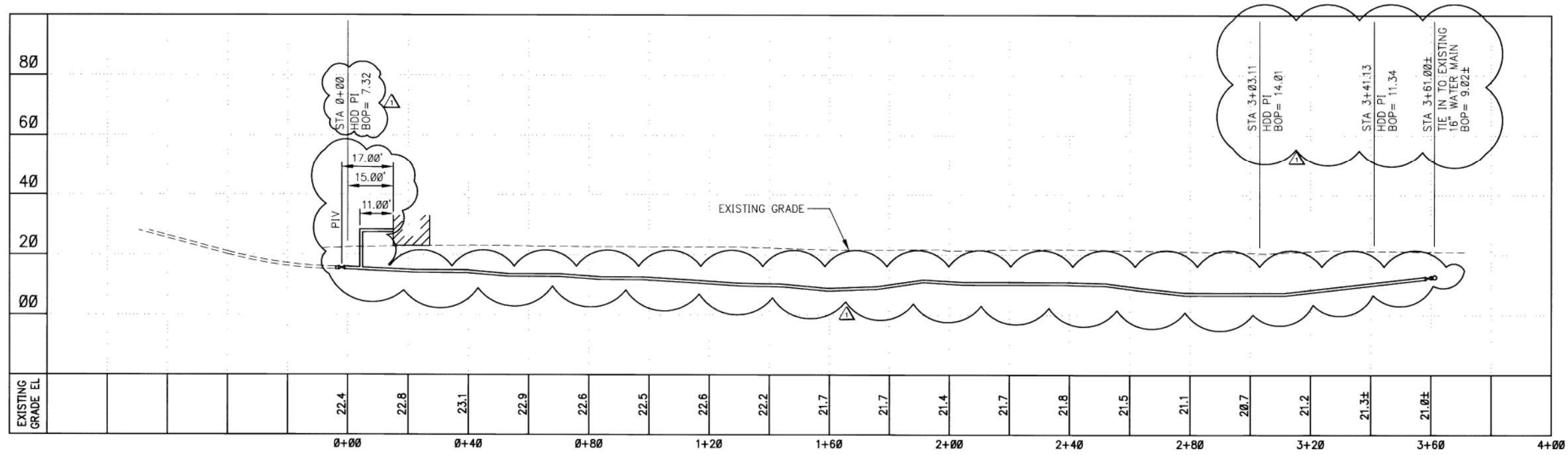
SCALE: VERT. 1" = 10'
HORIZ. 1" = 50'

OCT. 1963

5 22



PLAN
SCALE: 1" = 20'



PROFILE
SCALE: 1" = 20'

PS_98-109

NOTES

- TOPOGRAPHIC INFORMATION ACQUIRED FROM THE FOLLOWING AS-BUILT ENGINEERING DRAWINGS:
 ALASKA RAILROAD CONTRACTS, DRAWING 92-080G
 LOUNSBURY & ASSOCIATES, INC., JANUARY 1996
 1963-64 WATER IMPROVEMENTS SCHEDULE 1630 BLUFF ROAD W-X ALLEY
 ADAMS, CORTHELL, LEE, WINCE & ASSOCIATES, OCTOBER 1963
 GREATER ANCHORAGE AREA BOROUGH SEWERAGE PROJECT TRUNK B-3
 TRYCK, NYMAN & HAYES AND STEVENS, THOMPSON, RUNYAN & ASSOCIATES, APRIL 1969

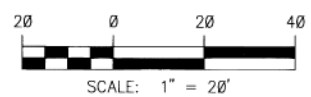
Baker
 Michael Baker Jr., Inc.
 A Unit of Michael Baker Corporation
 4601 Business Park Blvd., Suite 42
 Anchorage, Alaska 99503
 Phone: (907) 273-1600
 Fax: (907) 273-1699

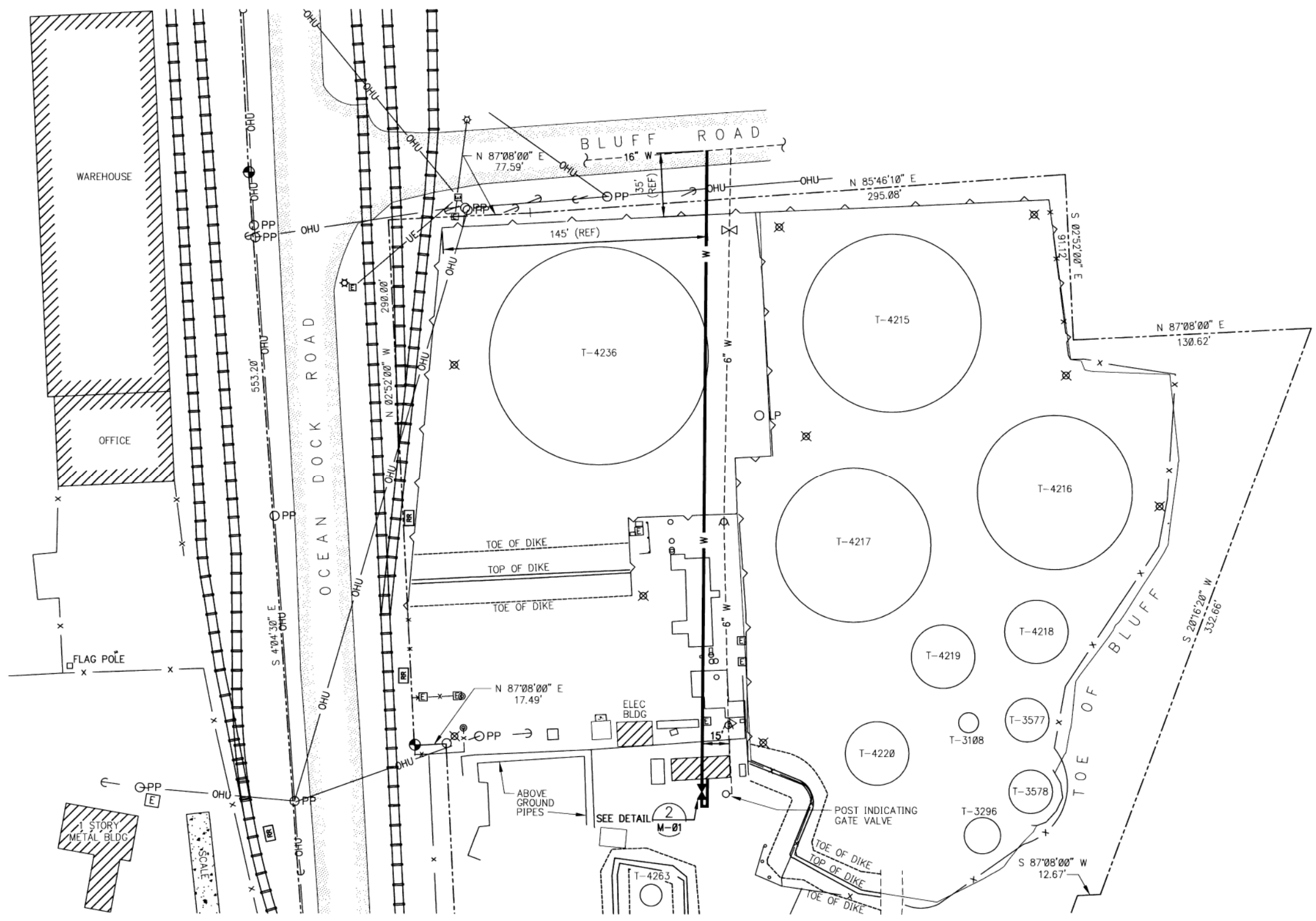
Williams **WILLIAMS ALASKA PETROLEUM INC.**
 PORT OF ANCHORAGE TANK FARM
 ANCHORAGE, ALASKA

WILLIAMS TANK FARM
 HDD FIREWATER INLET PIPING
 PLAN AND PROFILE

PROJECT NO. _____ SCALE: AS NOTED
 PROJECT: HDD FIREWATER INLET PIPING DATE: 09/09/98
 DRAWING NO. C-02 DRAWN: RFH
 REV. 1 CHECKED: _____

REFERENCE DRAWINGS		REVISIONS				ISSUE RECORD						
REF NO.	TITLE	DRAWING NO.	REV	DATE	BY	APPROV	DESCRIPTION	ISSUE NO.	DATE	REV	TO	FOR
			0	9/98	JWR	JVA	ISSUED FOR CONSTRUCTION					
			1	6/99	JWR	JVA	AS-BUILT PER CONTRACTOR REDLINES					

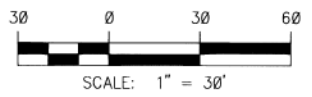




- LEGEND**
- ⊙ FOUND 2" DIA. ALUMINUM MONUMENT
 - LP LIGHT POLE
 - PP POWER POLE
 - GP GUY POLE
 - ⌋ POWER POLE ANCHOR
 - ⊙-EM ELECTRIC METER
 - ⊠ ELECTRIC RISER
 - ⌋ SIGN
 - METAL BOLLARD
 - ⊙ FIRE HYDRANT
 - ⊗ WATER VALVE
 - x— CHAIN LINK FENCE
 - OHU— OVERHEAD UTILITY LINE
 - RETAINING WALL
 - GUARD RAIL
 - ⊗ MONITOR WELL
 - ⊠ RR RAILROAD SWITCH
 - ⊗ SUMP INLET
 - ⊙ SUMP PUMP
 - - - PROPERTY LINE
 - - - W EXISTING WATER LINE
 - W — PROPOSED HDD WATER LINE

MAPCO TANK FARM SITE PLAN
SCALE: 1" = 30'

PS_98-109



Baker
23476202

Michael Baker Jr., Inc.
A Unit of Michael Baker Corporation
4681 Business Park Blvd., Suite 42
Anchorage, Alaska 99503
Phone: (907) 273-1600
Fax: (907) 273-1699

Williams WILLIAMS ALASKA PETROLEUM INC.
PORT OF ANCHORAGE TANK FARM
ANCHORAGE, ALASKA

HDD FIREWATER INLET PIPING
SITE PLAN

REFERENCE DRAWINGS				REVISIONS				ISSUE RECORD					
REF NO.	TITLE	DRAWING NO.		REV	DATE	BY	APPROV	DESCRIPTION	ISSUE NO.	DATE	REV	TO	FOR
				0	9/98	JWR	JVA	ISSUED FOR CONSTRUCTION					

PROJECT NO.	SCALE: 1" = 30'
PROJECT: HDD FIREWATER WATER INLET PIPING	DATE: 09/09/98
DRAWING NO. C-01	DRAWN: RFH
REV. 0	CHECKED:

20561

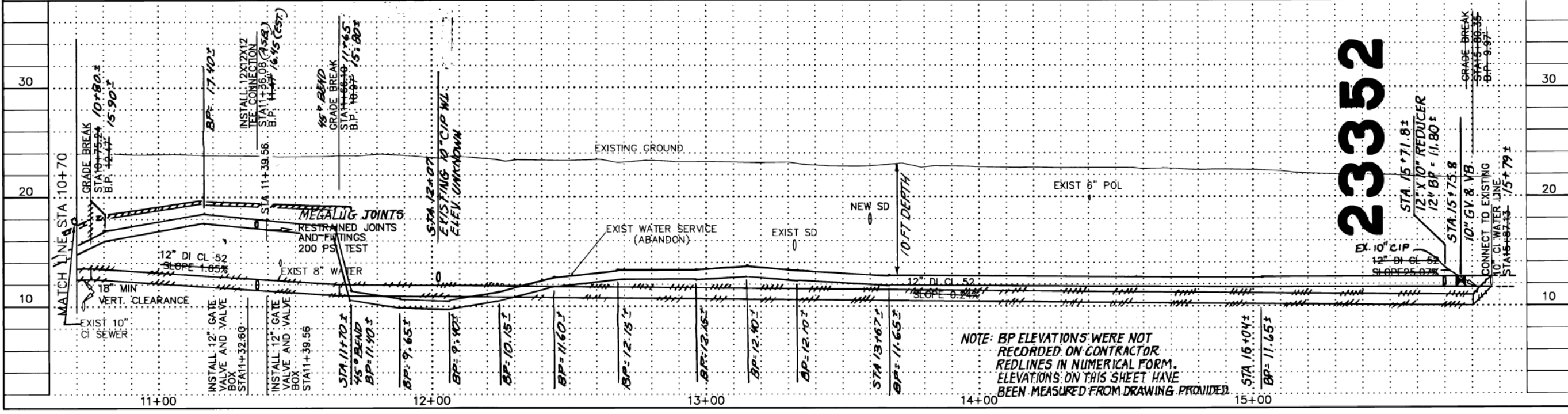
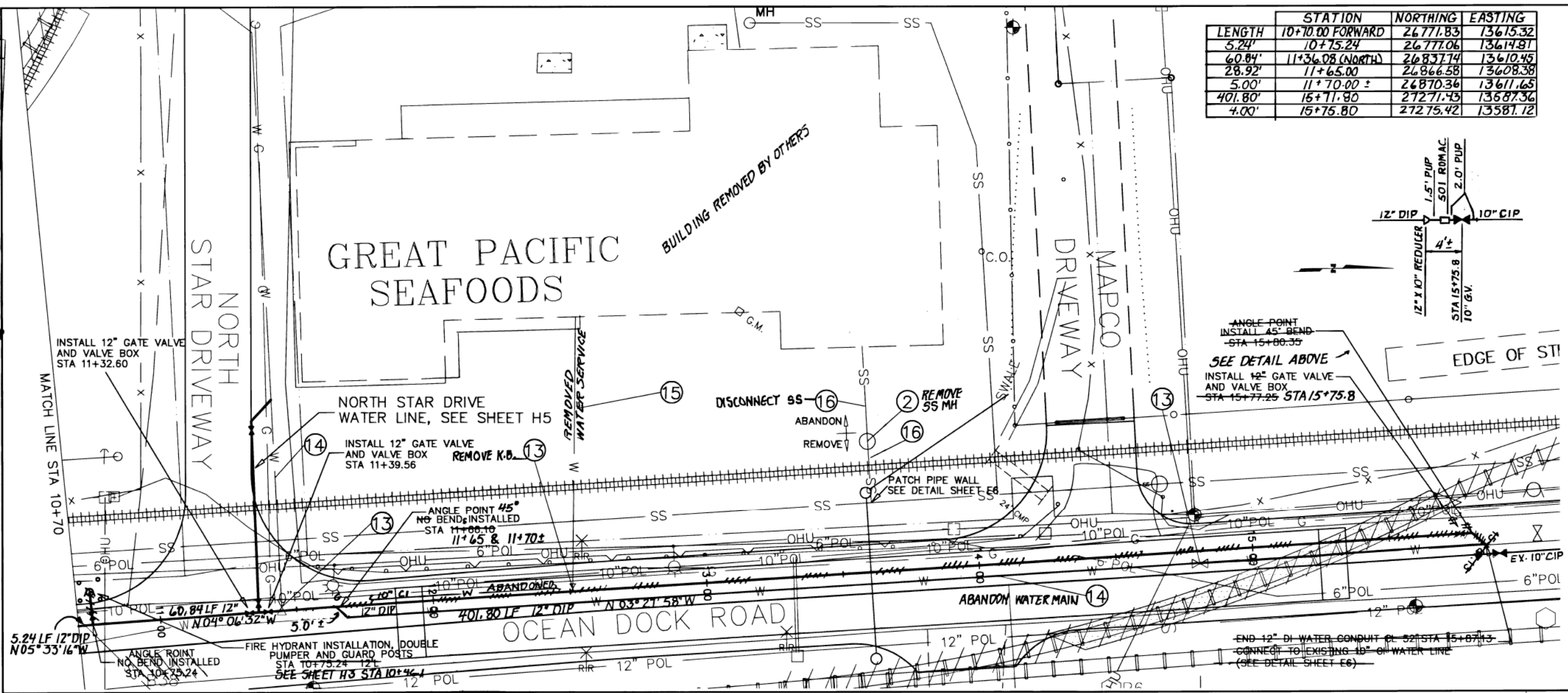
RECORD DRAWING

DATA PROVIDED BY: *Summit Paving*
 This will serve to certify that these Record Drawings are a true and accurate representation of the project as constructed.
 CONTRACTOR: *SUMMIT PAVING*
 BY: *Contractor no longer in business*
 DATE: *In business*
 DATA TRANSFERRED BY: *S. NOTESTINE*
 COMPANY: *AWWU*
 DATE: *9-15-03*

Based on periodic field observations by the Engineer or an individual under his/her direct supervision, the Contractor-provided data appears to represent the project as constructed.
 DATA TRANSFER CHECKED BY: *Greg Gorman*
 DATE: *1/26/04*

NOTE: TRANSFER DATA TAKEN FROM BEST AVAILABLE INFO. GREENMENT FILE CONTAINS DESIGN DETAILS & COORDS. FIELD COORDS. WERE ACAD-CALCULATED BASED ON INTERPRETATION OF CONTRACTOR FIELD LINES & FIELD INSPECTOR DRAWING NOTES. CONTRACTOR IS NO LONGER IN BUSINESS FOR VERIFICATION.

LENGTH	STATION	NORTHING	EASTING
10+70.00 FORWARD	26771.83	13613.32	
5.24'	10+75.24	26777.06	13614.81
60.84'	11+36.08 (NORTH)	26837.74	13610.45
28.92'	11+65.00	26866.58	13608.38
5.00'	11+70.00 ±	26870.36	13611.65
401.80'	15+71.80	27271.43	13687.36
4.00'	15+75.80	27275.42	13581.12



23352

NOTE: BP ELEVATIONS WERE NOT RECORDED ON CONTRACTOR REDLINES IN NUMERICAL FORM. ELEVATIONS ON THIS SHEET HAVE BEEN MEASURED FROM DRAWING PROVIDED.

SHEET NO.	TOTAL SHEETS	
H4	75	
STATE	YEAR	
ALASKA	199	
PROJECT DESIGNATION		
51243/STP-0529		
ADDENDUM NO.		
ATTACHMENT NO.		
REVISIONS		
NO.	DATE	DESCRIPTION

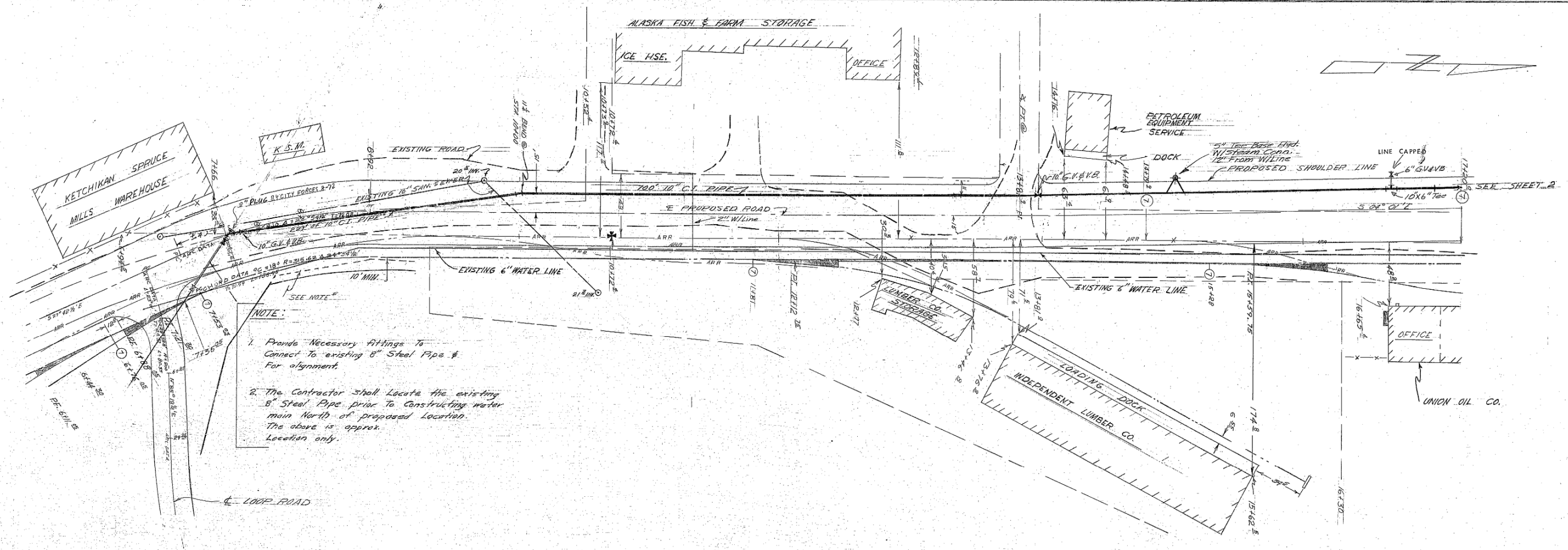
KEY PLAN

VEI Consultants

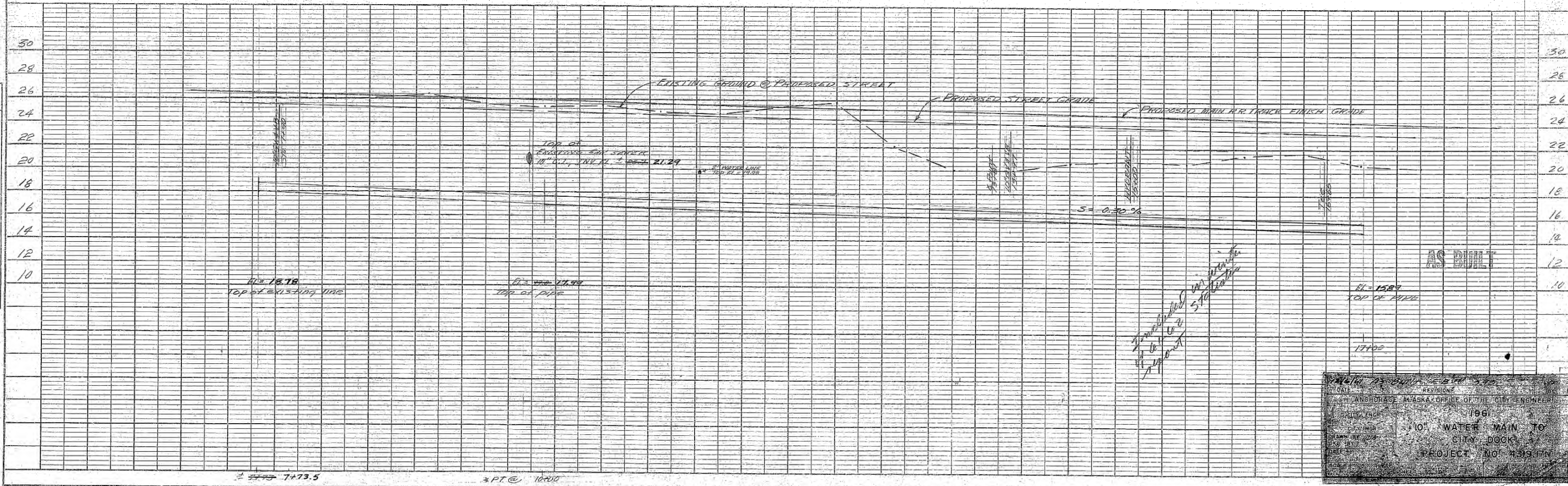
STATE OF ALASKA
 DEPARTMENT OF TRANSPORTATION AND PUBLIC FACILITIES
 OCEAN DOCK ROAD
 AWWU WATER LINE
 STA 10+70 TO STA 15+75.8

DATE	
BY	
REVISION	
NO.	
PLAN	
NOTE BOOK	
NO.	
NO.	

DATE	
BY	
REVISION	
NO.	
PROFILE	
NOTE BOOK	
NO.	
NO.	



- NOTE:
1. Provide Necessary Fittings to Connect to existing 8" Steel Pipe & For alignment.
 2. The Contractor shall Locate the existing 8" Steel Pipe prior to Constructing water main North of proposed Location. The above is approx. Location only.



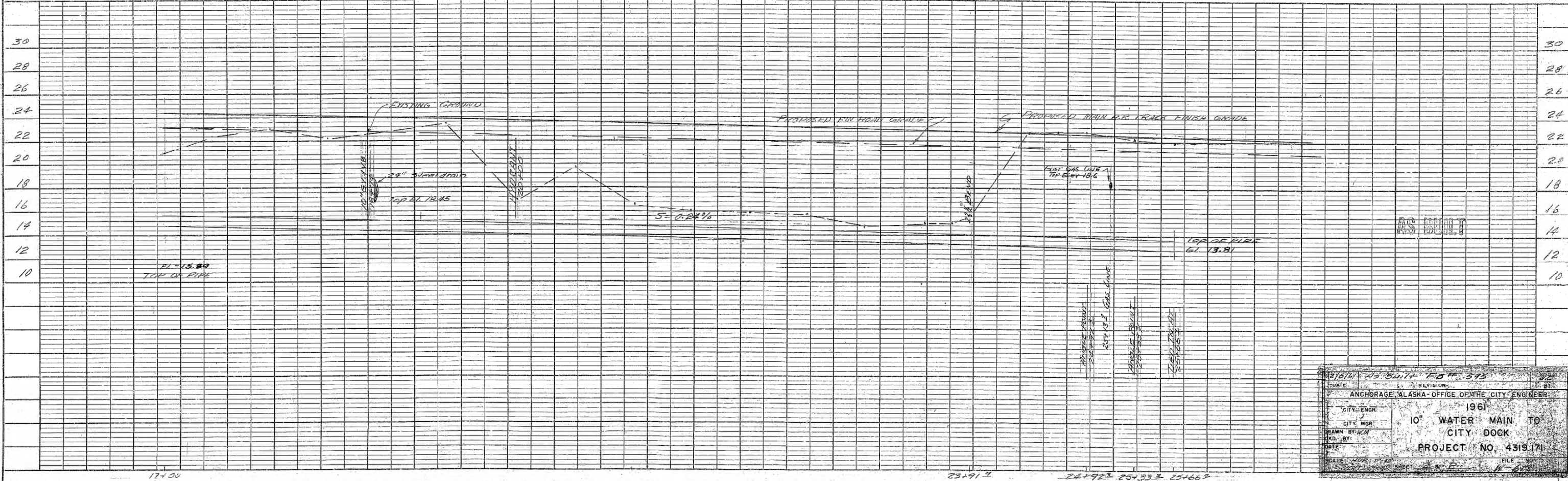
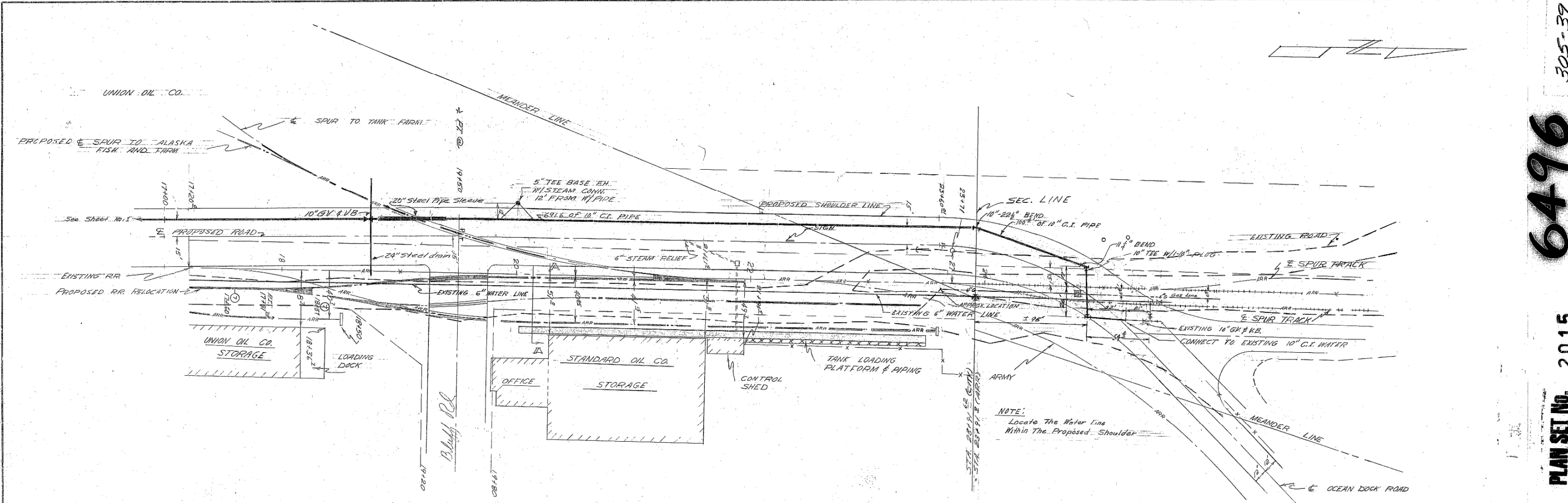
Handwritten note:
 1. 10' 0" 0.30%
 2. 10' 0" 0.30%
 3. 10' 0" 0.30%

AS BUILT
 AS BUILT
 EL = 1589
 TOP OF PIPE
 17100

10" WATER MAIN TO
 CITY DOCK
 PROJECT NO. 4319/17

DATE	
BY	
SURVEYED	
PLOTTED	
ALIGNED	
CHECKED	
NO. OF REVISIONS	
PLAN	
NOTE BOOK	
NO.	

DATE	
BY	
SURVEYED	
PLOTTED	
CHANGES CHECKED	
REVISIONS	
NO. OF REVISIONS	
PROFILE	
NOTE BOOK	
NO.	



ANCHORAGE, ALASKA - OFFICE OF THE CITY ENGINEER

1961

10" WATER MAIN TO CITY DOCK

PROJECT NO. 4319.171

SCALE: HORIZ. 1" = 40' VERT. 1" = 4'

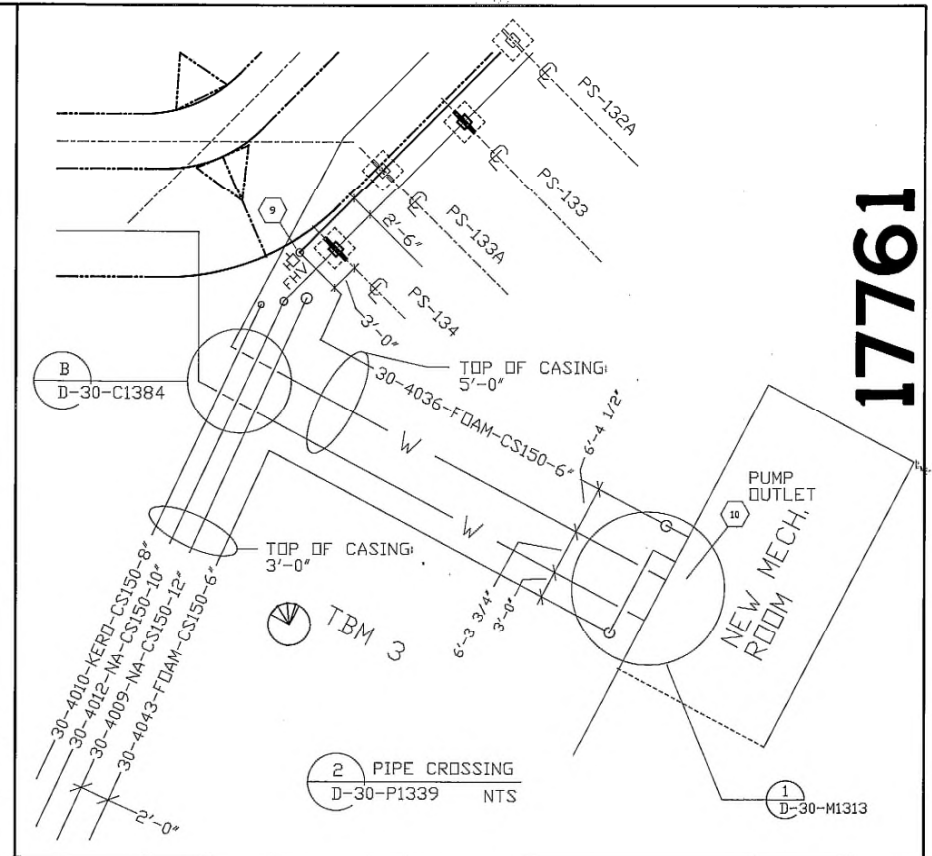
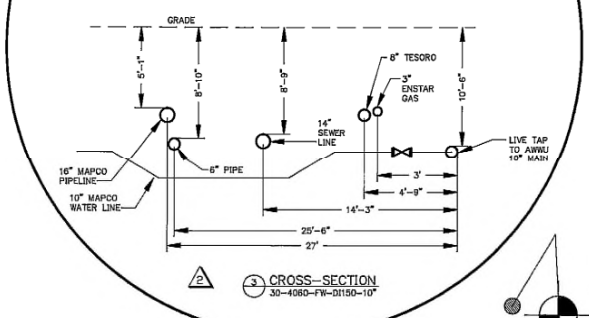
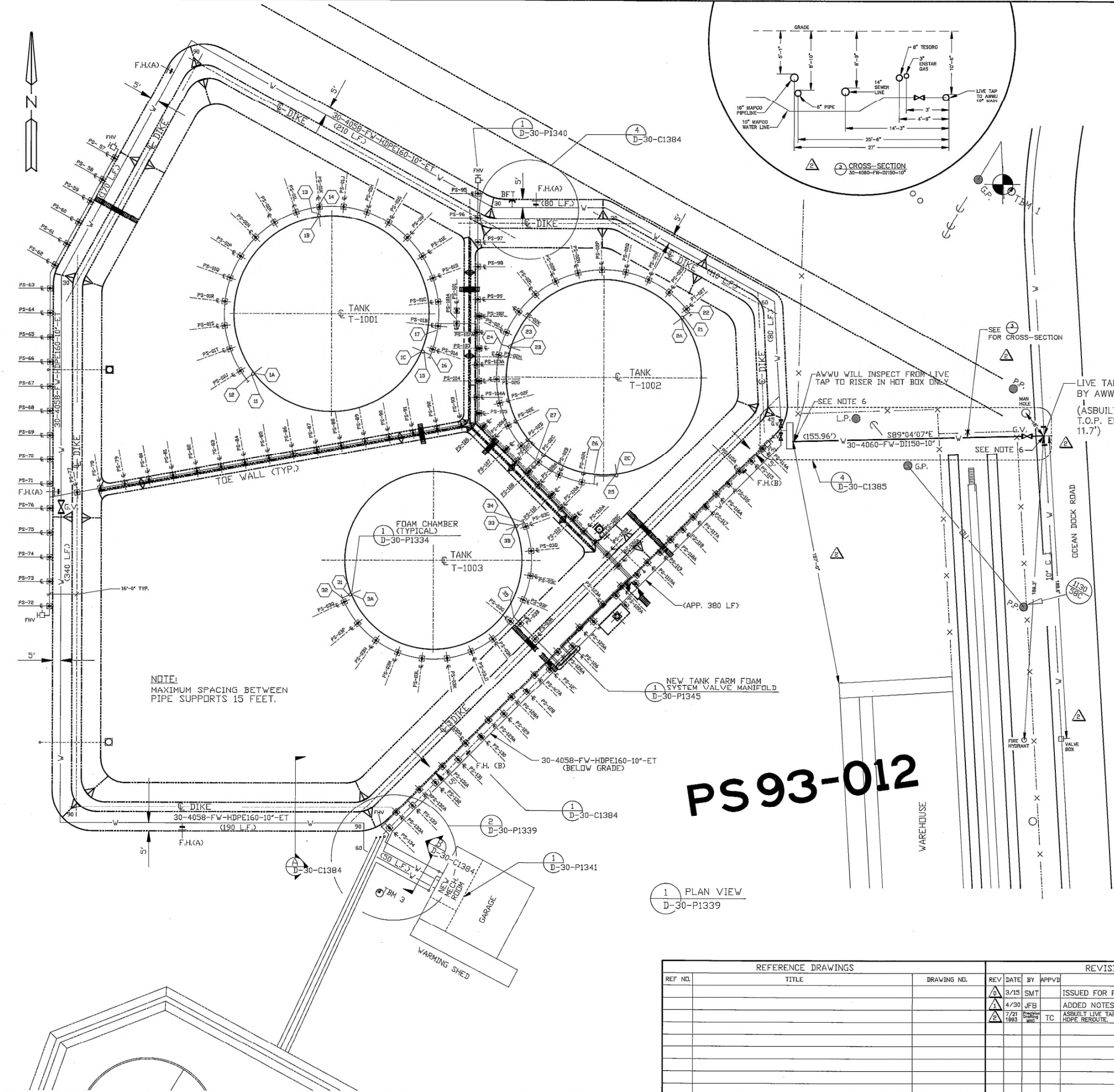
SHEET 2 OF 2

17761

PLAN SET NO. 5169

PS 93-012

1 PLAN VIEW
D-30-P1339



LEGEND

- L.P. LIGHT POLE
- D.I. DUCTILE IRON
- HDPE HIGH DENSITY POLYETHYLENE
- P.P. POWER POLE
- G.P. GUY POLE
- ← POWER POLE ANCHOR
- x — CHAIN LINK FENCE
- W — WATER LINE (EXISTING)
- W — WATERLINE (NEW)
- F.H. (A) FIRE HYDRANT (TYPE A, OR B)
- BFT BLIND FLANGE TEE
- ELL 90° 45° 30° ETC.
- G.V. GATE VALVE
- FHV FOAM HOSE VALVE
- AFF FOAM MAKER
- xx HYDRAULIC CALCULATION POINT

- NOTES:
- HDPE & DI WATER LINE LENGTHS SHOWN ARE APPROXIMATE ONLY. FIELD VERIFY FOR EXACT REQUIREMENTS.
 - MINOR ADJUSTMENT TO THE HDPE WATERLINE WILL BE ALLOWED TO ACCOMMODATE INSTALLATION. LONG RADIUS BENDS (>100' RADIUS) MAY BE USED IN PLACE OF 30' ELL'S WITH INSULATED PIPE MANUFACTURERS APPROVAL.
 - PIPE SUPPORTS FOR NEW TANK FARM SEE D-30-C1386 DETAILS A & B, D-30-C1377, D-30-C1378.
 - PROPOSED WATER LINE IS FOR FIRE/FOAM SUPPRESSION ONLY. ANY DOMESTIC OR POTABLE WATER SHALL BE METERED.
 - CONTRACTOR SHALL INSTALL A TEMPORARY METER AND PAY WATER USAGE FOR TESTING AND INITIAL STARTUP OF SYSTEM.
 - TIE BACK 40' EITHER SIDE OF FITTING, INSTALL AND TEST PER FIRE LINE SPECIFICATIONS.
 - PROVIDE PIPE SUPPORTS, ANCHORS AND SWAY BRACING PER REQUIREMENTS OF NFPA 13

REFERENCE DRAWINGS			REVISIONS				ISSUE RECORD					
REF. NO.	TITLE	DRAWING NO.	REV.	DATE	BY	APPV.	DESCRIPTION	ISSUE NO.	DATE	REV.	TO	FDR
			1	3/15	SMT		ISSUED FOR PERMIT					
			2	4/30	JFB		ADDED NOTES PER AWWU REVIEW					
			3	7/21/1993	TC		ASBUILT LIVE TAP TO AWWU MAIN, AND HDPE REROUTE.					

NICET #081996 6/30/93

MAPCO ALASKA PETROLEUM INC.
NORTH POLE REFINERY
NORTH POLE, ALASKA

**FIRE PROTECTION SYSTEM
NEW TANK FARM PLAN**

PROJECT NO. _____ SCALE 1" = 30'-0"

PROJECT 1993 TANK FARM CONSTRUCTION DATE 3/15/93

DRAWING NO. D-30-P1339 REV. 2 DRAWN MLC CHECKED _____



Pipe Types

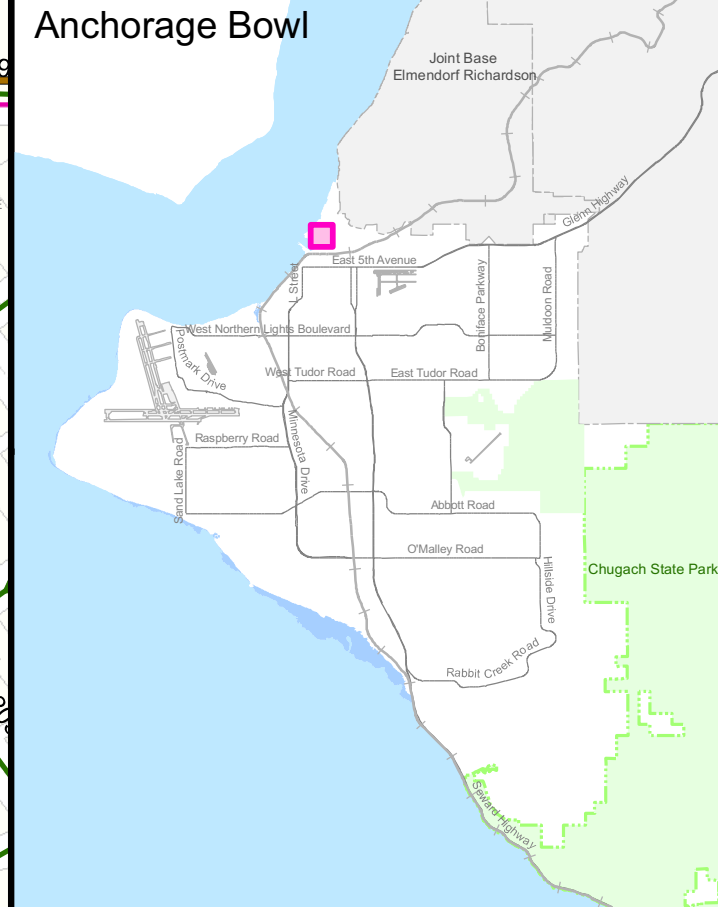
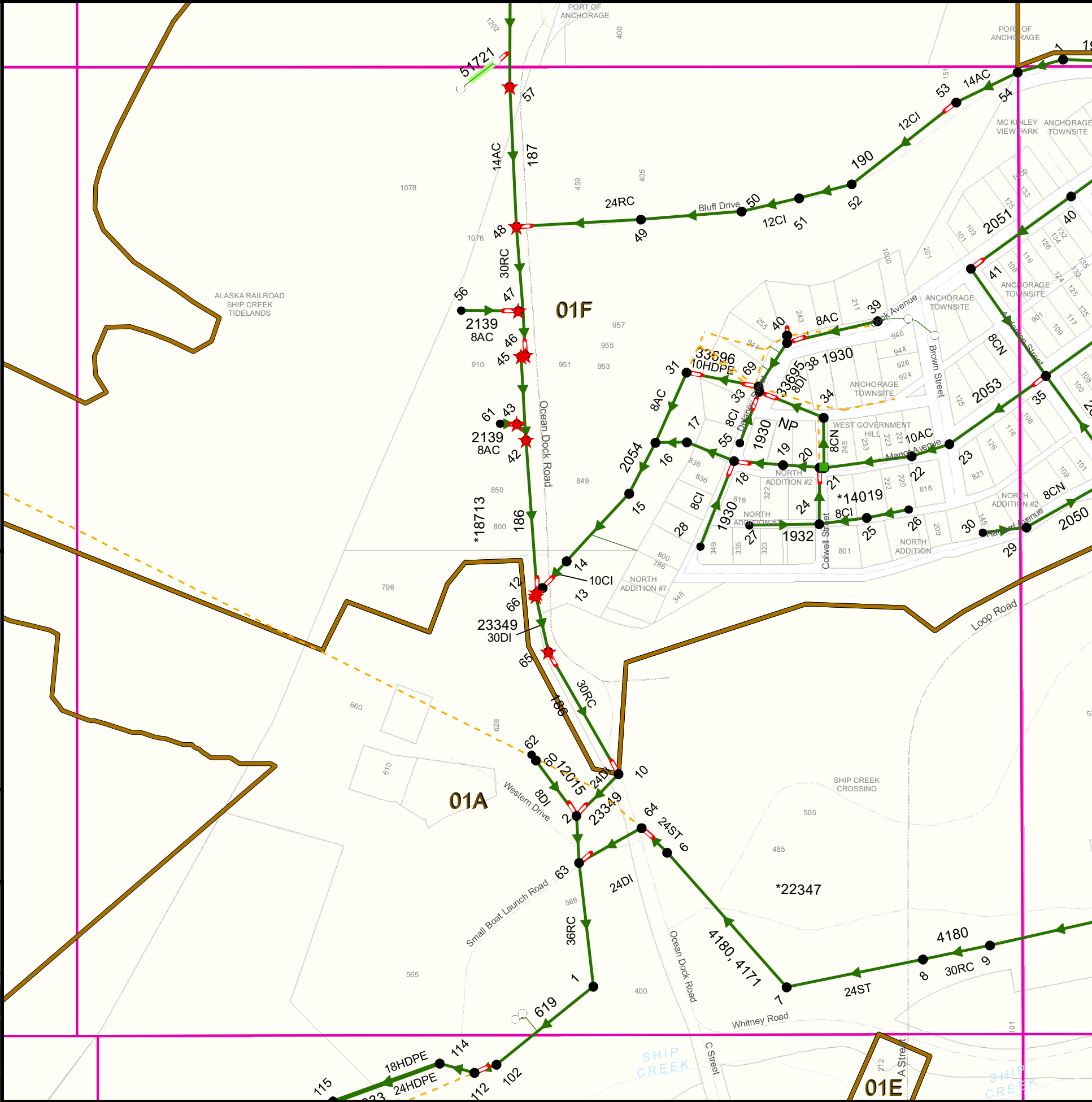
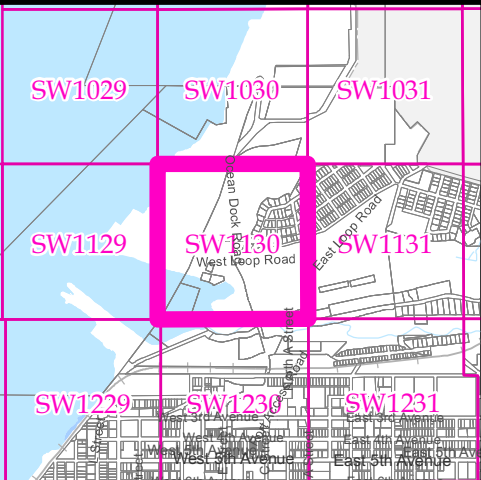
ABS	Acrylonitrile-Butadiene-Styrene
AC	Asbestos Concrete
CC	Concrete Cylinder
CI	Cast Iron
CIPP	Cured In Place Pipe
CMP	Corrugated Metal
CN	Concrete
CU	Copper
DI	Ductile Iron
FC	Formed Concrete
GI	Galvanized Iron
HDPE	High Density Polyethylene
MLC	Mortar Lined Concrete
PE	Polyethylene
PVC	Polyvinylchloride
RC	Reinforced Concrete
ST	Steel
TC	Techite
UNK	Unknown
VC	Vitrified Clay
WS	Wood Stave
WST	Welded Steel
NP	No Print
*	Private System



0 150 300 600
Feet

Map Created: 12/03/2019

Legal:
SW 1/4 Sec 7 T13N R3W



Legend

<ul style="list-style-type: none"> ● Cleanout, AWWU ○ Cleanout, Private ■ Cleanout/InManhole, AWWU ⊕ Access Tee, AWWU ● Manhole, AWWU ○ Manhole, Private ★ Dangerous Manhole ⊙ Discharge Point, AWWU ⊠ AirRelief, AWWU ⊠ AirVacuum, AWWU 	<ul style="list-style-type: none"> ■ Administration Facility ■ Metering Station ■ Lift Station ■ Septage Receiving Station ■ WWTW Wastewater Treatment Facility
<ul style="list-style-type: none"> — Constructed Pipe — Casing and Outer Pipe, All Owners ➤ AWWU ➤ nonAWWU ○ Record Drawing Limit ■ Sewer Basin 	<ul style="list-style-type: none"> ➤ Main, AWWU ➤ Main, Private ➤ Force Main, AWWU ➤ Force Main, Private --- Retired Pipe --- Abandoned in Place, All Owners ■ MOA Grid

INFORMATION AND DATA CONTAINED ON THIS DOCUMENT IS NOT TO BE CONSIDERED ACCURATE AND THE MUNICIPALITY OF ANCHORAGE ASSUMES NO LIABILITY FOR DAMAGES OCCURRING AS A RESULT OF USING THIS DOCUMENT. FOR THE LATEST AND MOST UP TO DATE INFORMATION YOU ARE URGED TO CALL THE ANCHORAGE WATER & WASTEWATER UTILITY AT (907) 564-2725 BEFORE STARTING OPERATIONS.

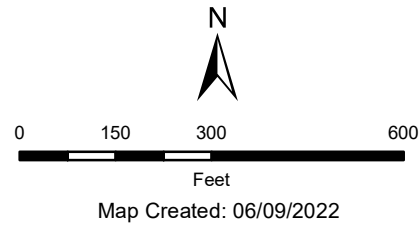
Wastewater Collection System

Grid Number SW1130

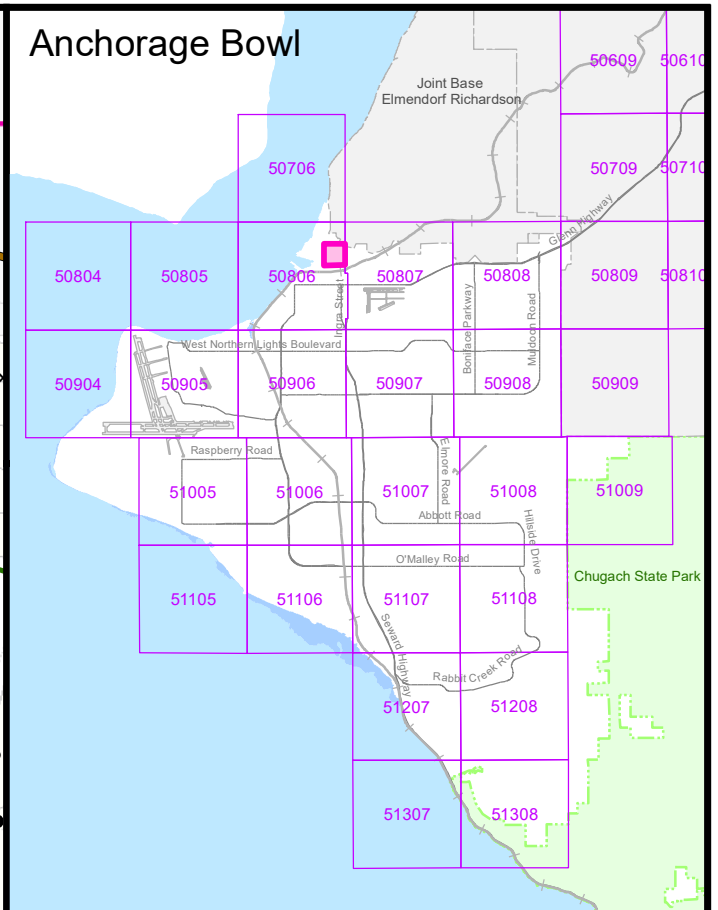
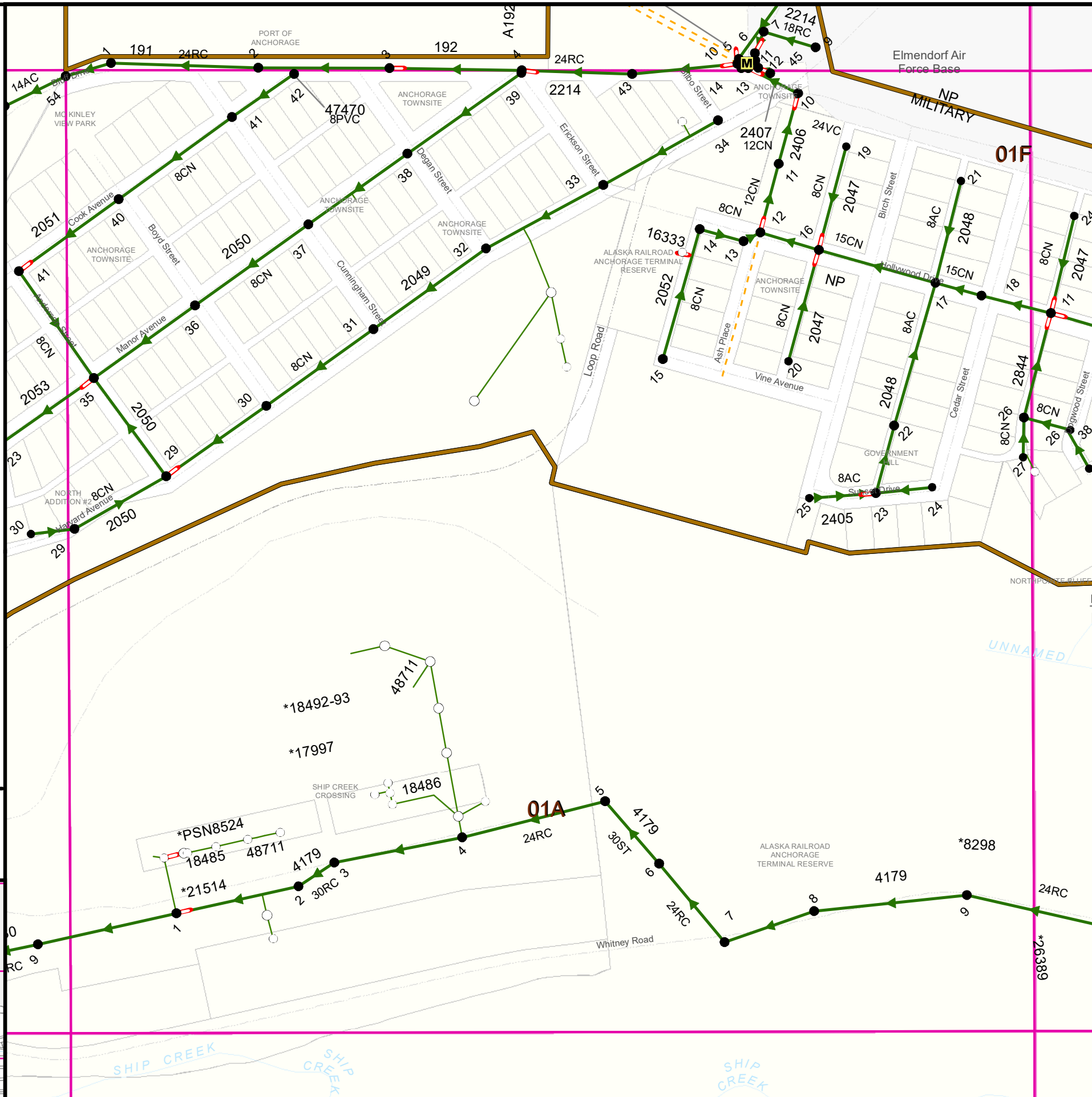
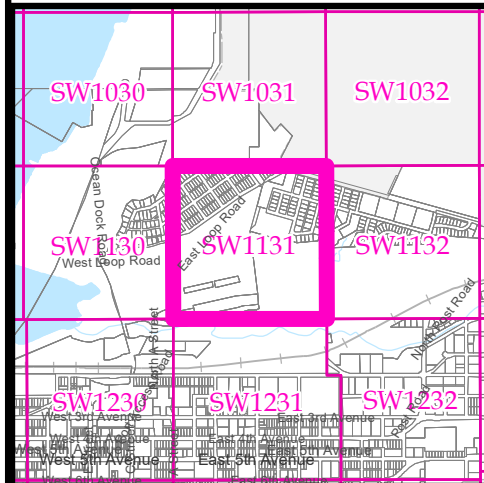


Pipe Types

- ABS Acrylonitrile-Butadiene-Styrene
- AC Asbestos Concrete
- CC Concrete Cylinder
- CI Cast Iron
- CIPP Cured In Place Pipe
- CMP Corrugated Metal
- CN Concrete
- CU Copper
- DI Ductile Iron
- FC Formed Concrete
- GI Galvanized Iron
- HDPE High Density Polyethylene
- MLC Mortar Lined Concrete
- PE Polyethylene
- PVC Polyvinylchloride
- RC Reinforced Concrete
- ST Steel
- TC Techite
- UNK Unknown
- VC Vitrified Clay
- WS Wood Stave
- WST Welded Steel
- NP No Print
- * Private System



Legal:
SE 1/4 Sec 7 T13N R3W



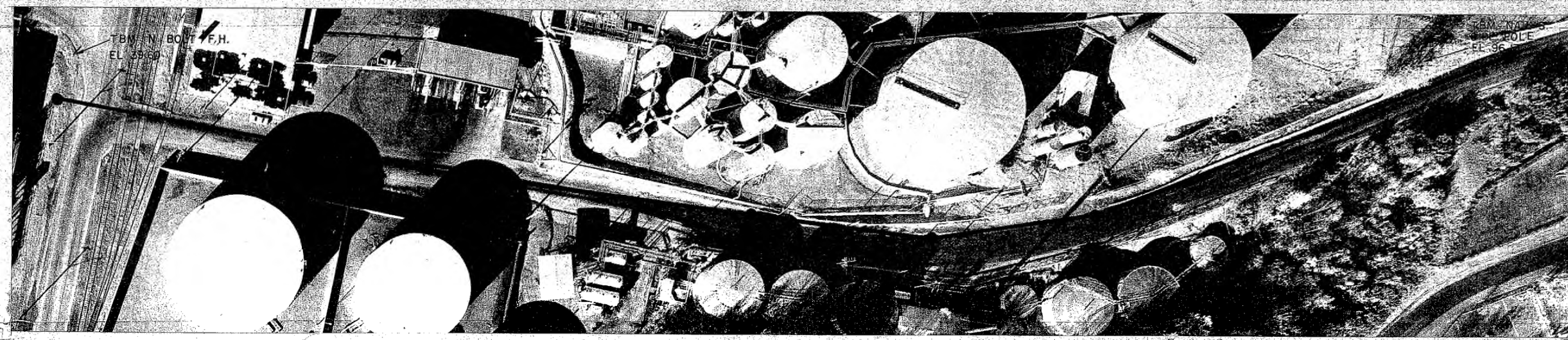
Legend

- | | |
|--|---|
| <ul style="list-style-type: none"> ● Cleanout, AWWU ○ Cleanout, Private ■ Cleanout/Manhole, AWWU ★ Dangerous Manhole ⊕ Access Tee, AWWU ● Manhole, AWWU ○ Manhole, Private ⊙ Discharge Point, AWWU ⊞ AirRelief, AWWU ⊞ AirVacuum, AWWU | <ul style="list-style-type: none"> ■ Administration Facility L Lift/Pump Station M Metering Station R Septage Receiving Station WWTF Treatment Facility |
| <ul style="list-style-type: none"> → Constructed Pipe → Gravity Main, All Owners → Service Line, All Owners → Casing and Outer Pipe, All Owners → Force Main, AWWU → Force Main, nonAWWU → Record Drawing Limit □ Sewer Basin | <ul style="list-style-type: none"> → Design Pipe → Gravity Main, AWWU → Gravity Main, Private → Force Main, AWWU → Force Main, Private → Retired Pipe → Abandoned in Place, All Owners □ MOA Grid |

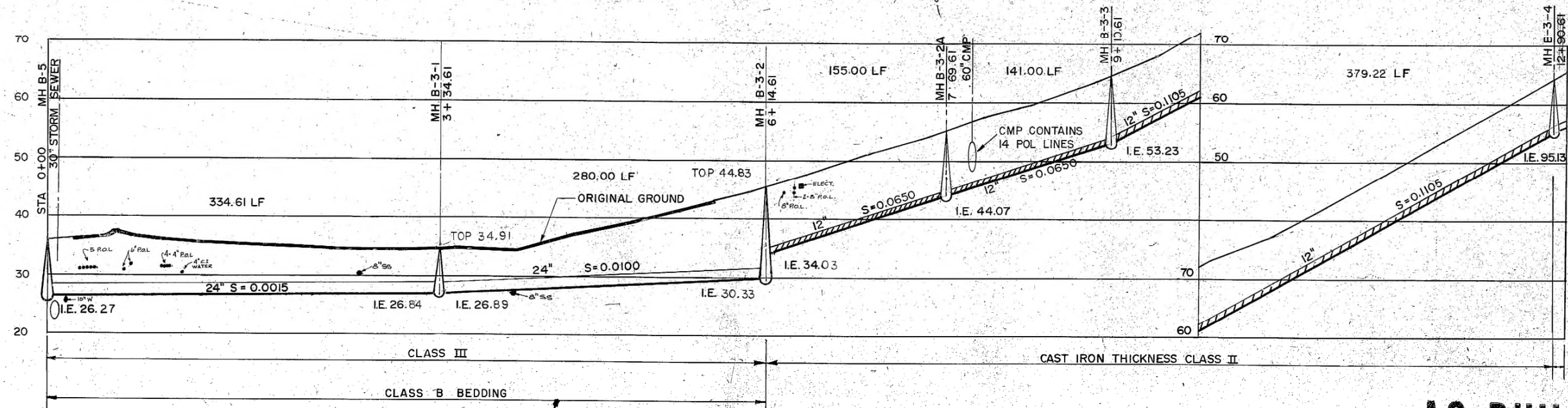
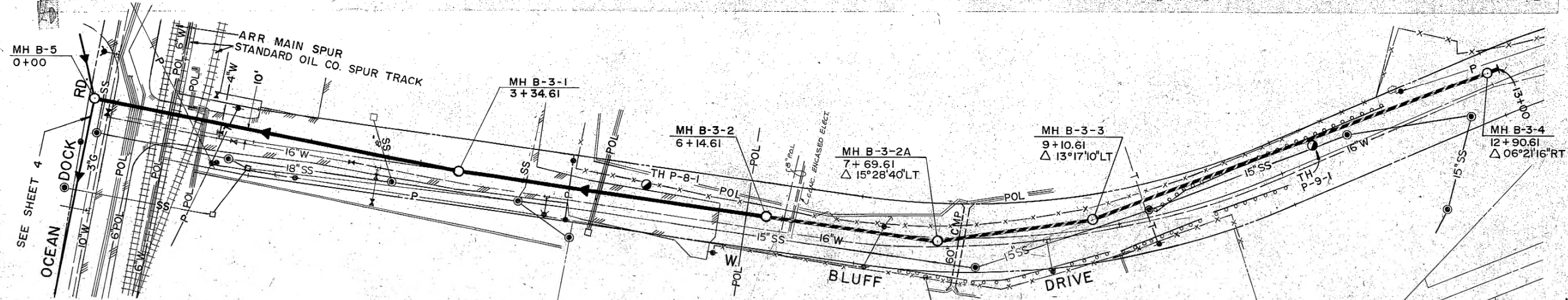
INFORMATION AND DATA CONTAINED ON THIS DOCUMENT IS NOT TO BE CONSIDERED ACCURATE AND THE MUNICIPALITY OF ANCHORAGE ASSUMES NO LIABILITY FOR DAMAGES OCCURRING AS A RESULT OF USING THIS DOCUMENT. FOR THE LATEST AND MOST UP TO DATE INFORMATION YOU ARE URGED TO CALL THE ANCHORAGE WATER & WASTEWATER UTILITY AT (907) 564-2725 BEFORE STARTING OPERATIONS.

Wastewater Collection System

Grid Number SW1131

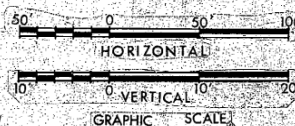


0190



NOTE: VERTICAL DATUM IS MLLW (POST-EARTHQUAKE)

3836



AS BUILT

F.B. A-174
F.B. A-185

DESIGNED	J.D.C.	APPROVED	<i>Frank Nymon</i>
DRAWN	L.N.S.	SCALE	NOTED
CHECKED	J.D.C.	DATE	APR, 69
DATE	NO.	REVISION	BY

BOROUGH ENGINEERS
A JOINT VENTURE
TRYCK, NYMAN & HAYES AND STEVENS, THOMPSON, RUNYAN & ASSOCIATES

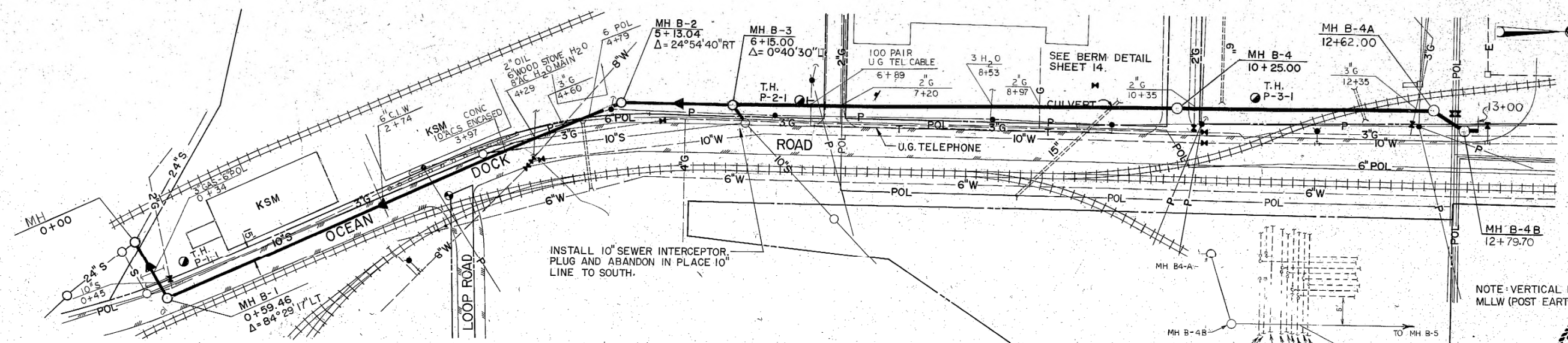
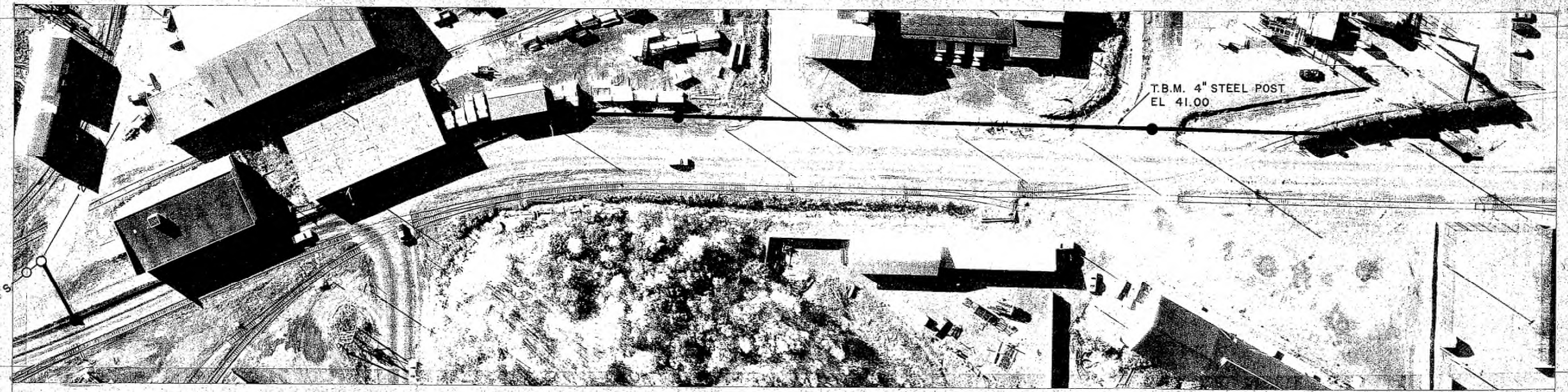


GREATER ANCHORAGE AREA BOROUGH
SEWERAGE PROJECT

TRUNK B-3
STA 0+00 to STA 13+00

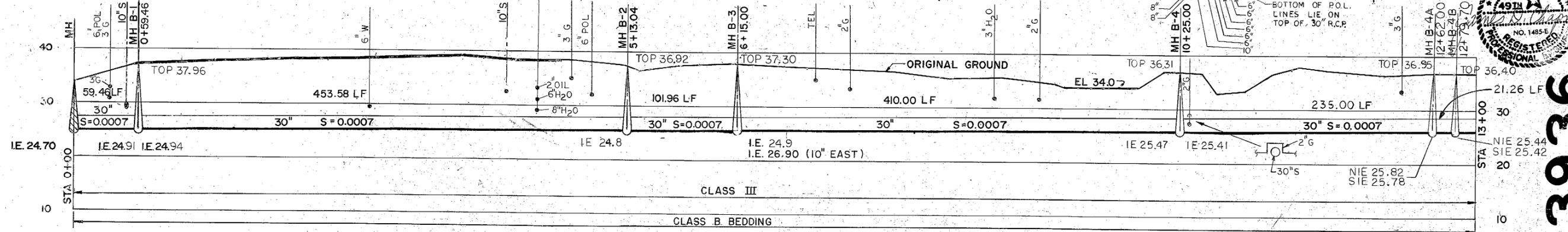
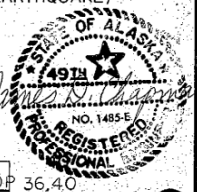
SHEET
B-3 | 1
5 OF 14

T.B.M. TOP MH
EL 38.73

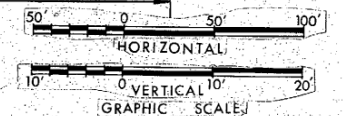


INSTALL 10\"/>

NOTE: VERTICAL DATUM IS
MLLW (POST EARTHQUAKE)



AS BUILT



NOTE: AS BUILT INFORMATION FURNISHED BY CONTRACTOR
IN ACCORDANCE WITH CONSTRUCTION CONTRACT

F.B. A-174
F.B. A-185

DESIGNED J.D.C.	APPROVED <i>Frank Myron</i>
DRAWN R.L.C.	SCALE NOTED
CHECKED J.D.C.	DATE APR., 69
FILE	

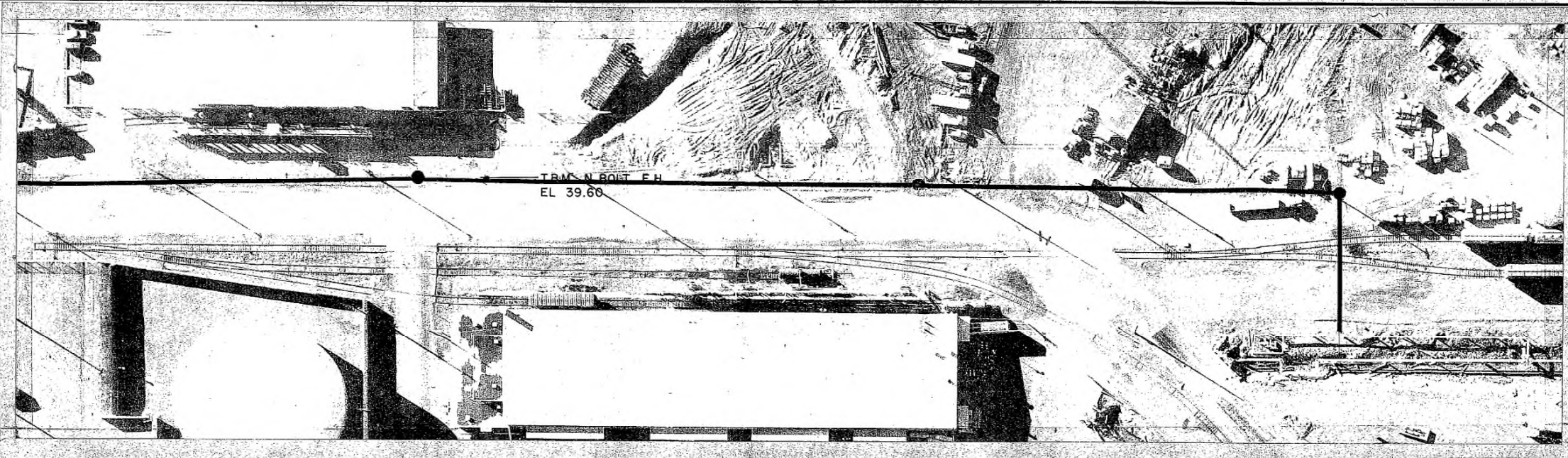
BOROUGH ENGINEERS
A JOINT VENTURE
TRYCK, NYMAN & HAYES AND STEVENS, THOMPSON, RUNYAN & ASSOCIATES



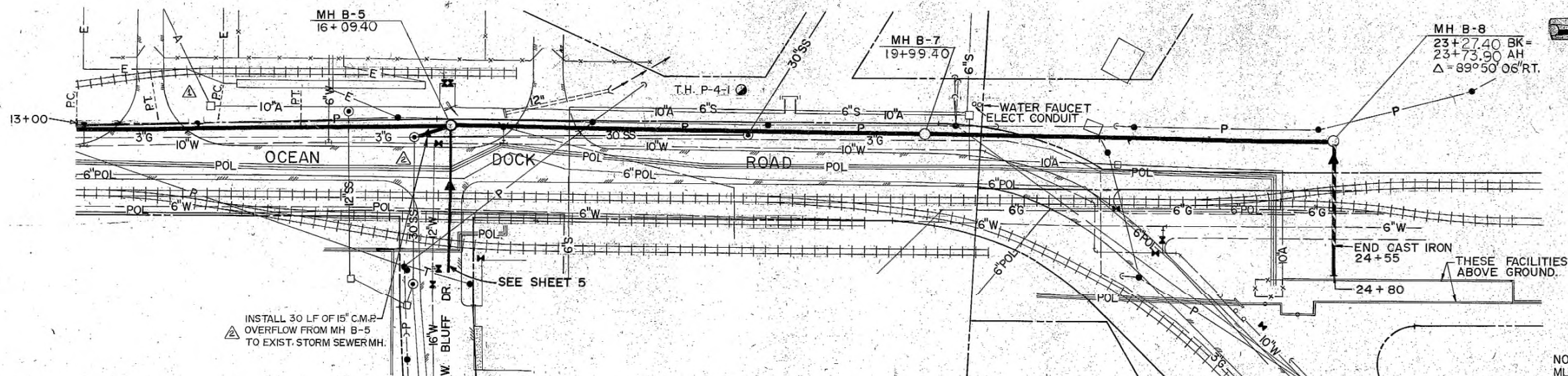
GREATER ANCHORAGE AREA BOROUGH
SEWERAGE PROJECT

INTERCEPTOR B
STA 0+00 to STA 13+00

SHEET
B 1
OF 14

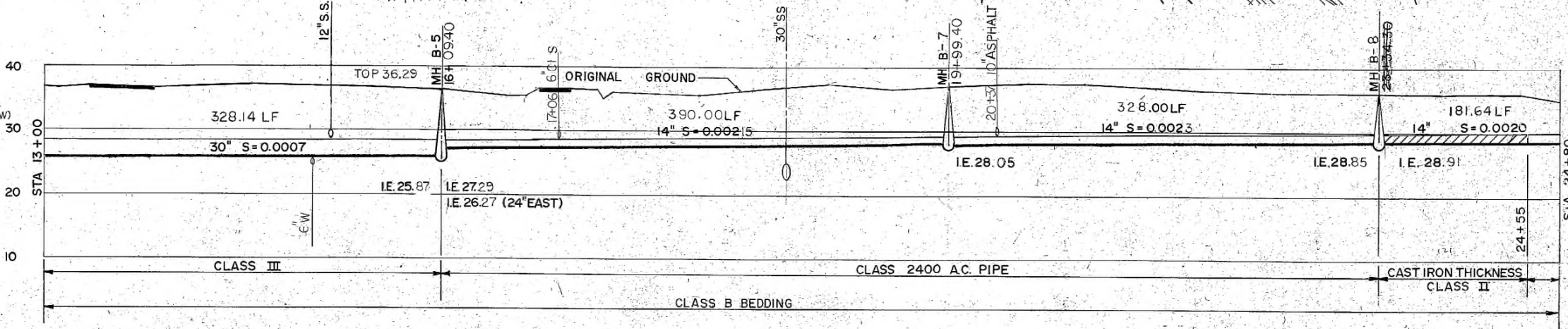
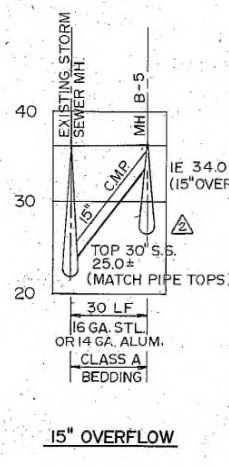


0187



3936

3836



NOTE: VERTICAL DATUM MLLW (POST EARTHQUAKE)

AS BUILT



6-24-71	AS BUILT	E-L	DESIGNED J.D.C.	APPROVED <i>Frank Nyman</i>
9-17-69	ADDED 15" OVERFLOW	R.C.	DRAWN R.L.C.	SCALE NOTED DATE APR, 69
9-11-69	ADDED MH B-8 AND RELOCATED SEWER LINE FROM 13+00 TO 14+83.52	R.C.	CHECKED J.D.C.	FILE
DATE	NO.	BY		

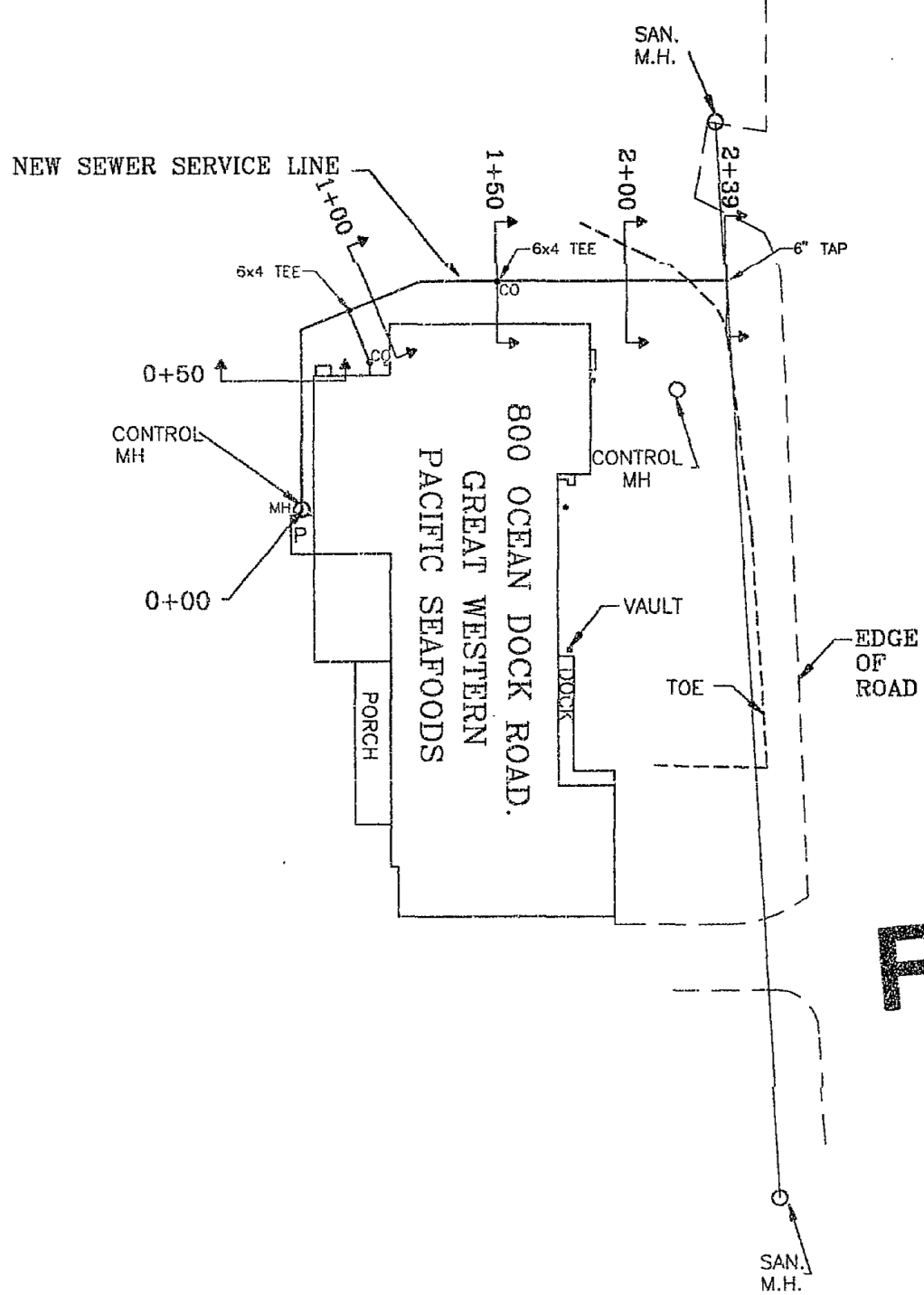
BOROUGH ENGINEERS
A JOINT VENTURE
TRYCK, NYMAN & HAYES AND STEVENS, THOMPSON, RUNYAN & ASSOCIATES



GREATER ANCHORAGE AREA BOROUGH SEWERAGE PROJECT

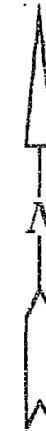
INTERCEPTOR B
STA 13+00 to STA 24+80

SHEET
B 2
2 OF 14



OCEAN DOCK ROAD

PS_93-040



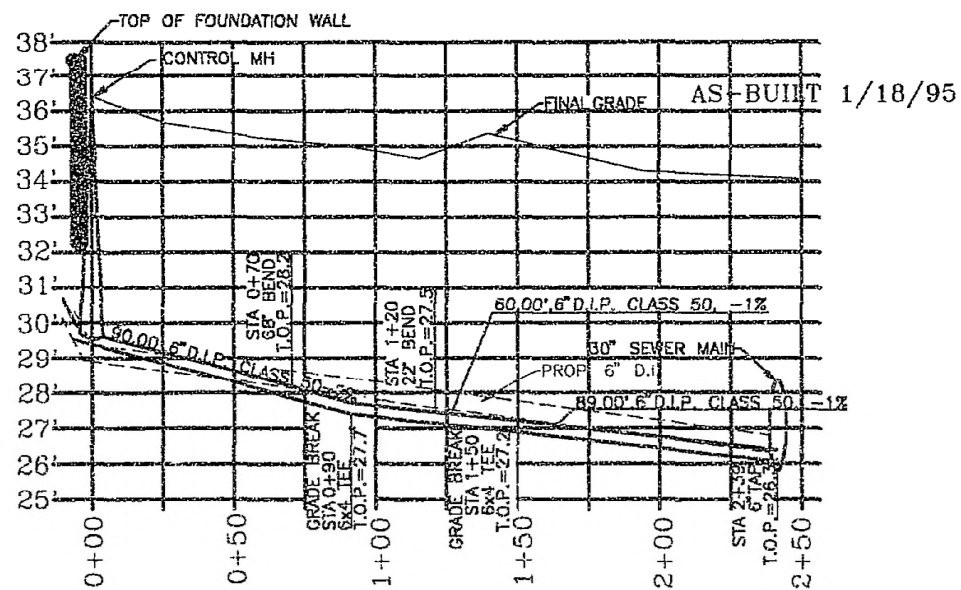
THE AS-BUILT INFORMATION SHOWN ON THIS DRAWING WAS PROVIDED BY THE CONTRACTOR, CHUCKS BACKHOE SVC.

STRUCTURES, EASEMENTS, OR ENCROACHMENTS SHOWN ON THIS SITE PLAN ARE AS SHOWN ON AN AS-BUILT SURVEY PROVIDED BY:

FLEMING SURVEYING SERVICES
IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO VERIFY EASEMENTS, REQUIRED SEPARATION DISTANCES, AND PROPERTY LINES PRIOR TO CONSTRUCTION.

CONTRACTOR IS REQUIRED TO OBTAIN UTILITY LOCATES PRIOR TO ANY EXCAVATION WORK.

THE ENGINEER MAY VARY THE EXACT DIMENSIONS AND DESIGN PARAMETERS IN THE FIELD, IF NECESSARY, TO MEET SITE CONDITIONS.

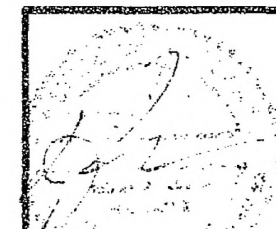


SCALE: VERTICAL 1" = 5'

18713

S & S ENGINEERING

17094 EAGLE RIVER LOOP ROAD, STE. 204, EAGLE RIVER, ALASKA 99577 (907) 694-2979



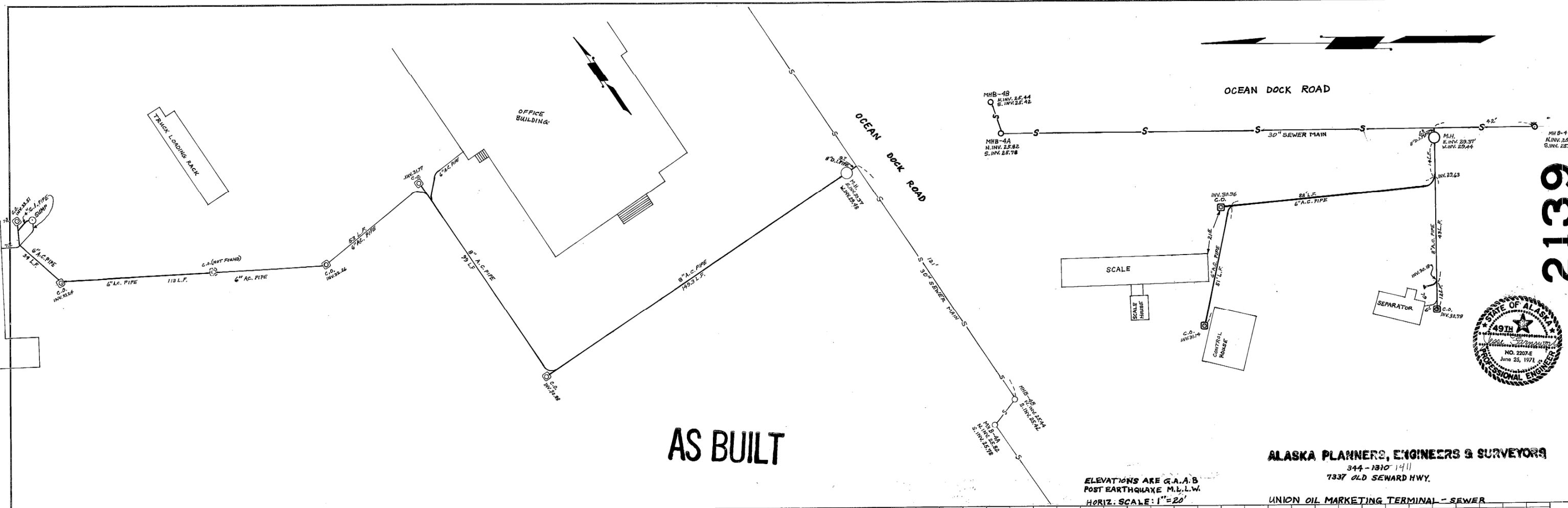
REVISION			
No.	DATE	BY	REVISION
1	2/13/95	JDA	AS-BUILT

SECTION 7, T13N, R3W
SM, AK

GREAT WESTERN
PACIFIC SEAFOODS
SEWER SERVICE
LINE EXTENSION

DATE	
BY	
NO.	
PLANNING	
DESIGN	
CONSTRUCTION	
OPERATION	
REVISIONS	
NO.	
DATE	
BY	
NO.	
PLANNING	
DESIGN	
CONSTRUCTION	
OPERATION	
REVISIONS	
NO.	
DATE	
BY	
NO.	

DATE	
BY	
NO.	
PLANNING	
DESIGN	
CONSTRUCTION	
OPERATION	
REVISIONS	
NO.	
DATE	
BY	
NO.	
PLANNING	
DESIGN	
CONSTRUCTION	
OPERATION	
REVISIONS	
NO.	
DATE	
BY	
NO.	



AS BUILT

ELEVATIONS ARE G.A.A.S.
POST EARTHQUAKE M.L.L.W.
HORIZ. SCALE: 1"=20'

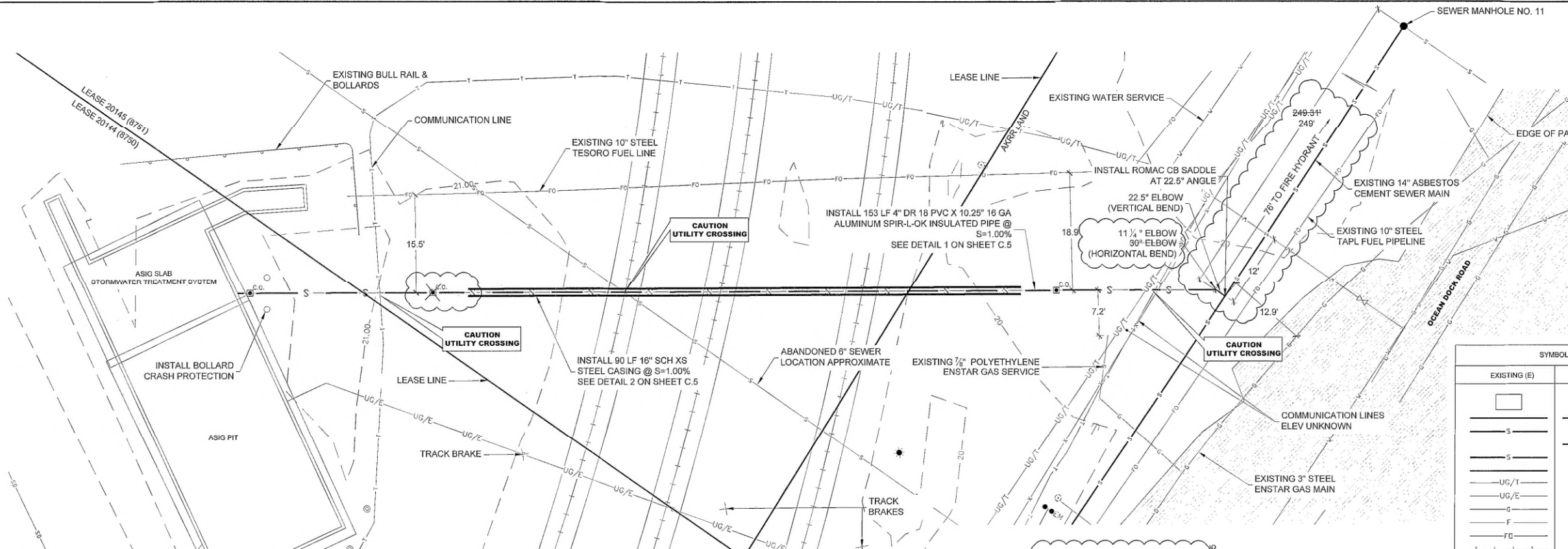
ALASKA PLANNERS, ENGINEERS & SURVEYORS
344 - 1310 14th
7337 OLD SEWARD HWY.
UNION OIL MARKETING TERMINAL - SEWER



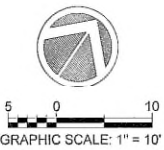
*CPL OCT 73
JGT*

3936 73-25

2139

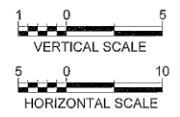
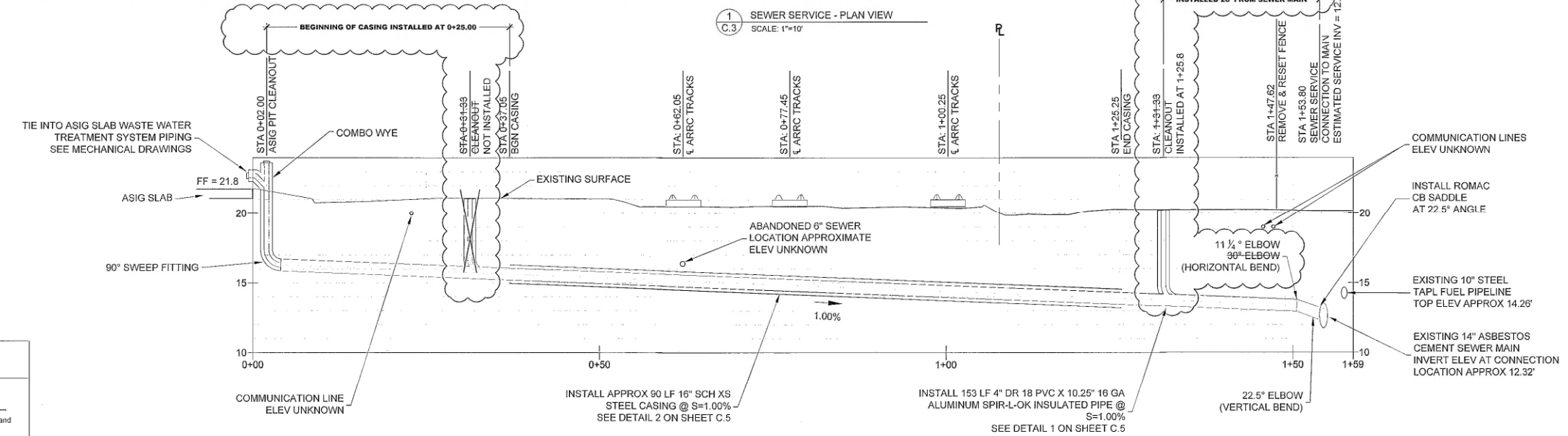


NOTES
 1. NEW SEWER ELEVATIONS ARE APPROXIMATE.



SYMBOL		PLAN LEGEND
EXISTING (E)	PROPOSED (P)	
[Symbol]	[Symbol]	ASIG PIT & SLAB
[Symbol]	[Symbol]	PROPERTY LINE
[Symbol]	[Symbol]	EXISTING SEWER MAIN
[Symbol]	[Symbol]	PROPOSED SEWER EXTENSION
[Symbol]	[Symbol]	ABANDONED 6" SEWER
[Symbol]	[Symbol]	EXISTING UNDERGROUND WATER
[Symbol]	[Symbol]	EXISTING UNDERGROUND COMMUNICATION LINE
[Symbol]	[Symbol]	EXISTING UNDERGROUND ELECTRIC
[Symbol]	[Symbol]	EXISTING UNDERGROUND GAS LINE
[Symbol]	[Symbol]	EXISTING UNDERGROUND FUEL LINE
[Symbol]	[Symbol]	EXISTING UNDERGROUND TESORO RAIL ROAD TRACKS
[Symbol]	[Symbol]	EXISTING 9" CHAINLINK FENCE
[Symbol]	[Symbol]	14" SCH 40 STEEL CASING
[Symbol]	[Symbol]	MAJOR CONTOUR
[Symbol]	[Symbol]	CLEANOUT
[Symbol]	[Symbol]	SANITARY SEWER MANHOLE
[Symbol]	[Symbol]	ENSTAR GAS TEST STATION
[Symbol]	[Symbol]	ELECTRICITY METERS
[Symbol]	[Symbol]	WATER VALVE
[Symbol]	[Symbol]	GUY ANCHORE
[Symbol]	[Symbol]	EXISTING LIGHT POST
[Symbol]	[Symbol]	PAVEMENT

1 SEWER SERVICE - PLAN VIEW
 SCALE: 1"=10'



AS-BUILT NOTES
 1. RECORD DRAWING BASED ON CONTRACTOR PROVIDED REDLINES AND CONNECTION AS-BUILT. ENGINEER DID NOT CONDUCT AN INSPECTION DURING CONSTRUCTION.

RECORD DRAWING

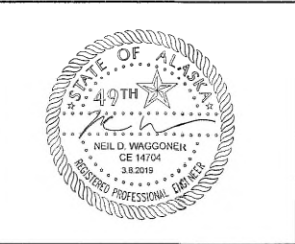
1. DATA PROVIDED
 BY: PEAK OILFIELD SERVICE CO
 This will serve to certify that these Record Drawings are a true and accurate representation of the project as constructed.
 CONTRACTOR: SHANE PEIKERT, PEAK OILFIELD SERVICE CO
 BY: [Signature] TITLE: CONST. SUPT.
 DATE: 7.1.2019

2. DATA TRANSFERRED
 BY: NEIL WAGGONER, PE
 COMPANY: RESTORATION SCIENCE & ENG., LLC
 DATE: 7.1.2019

3. DATA TRANSFER CHECKED
 Based on periodic field observations by the Engineer (or an Individual under his/her direct supervision), the Contractor-provided data appears to represent the project as constructed.
 BY: [Signature] TITLE: PE
 COMPANY: RESTORATION SCIENCE & ENG., LLC
 DATE: 7.1.2019

REF DWG NO	DESCRIPTION

RESTORATION
 Science & Engineering, LLC
 911 West 8th Avenue, Suite 100
 Anchorage, Alaska 99501
 PH (907) 278-1023 FAX (907) 277-5718



REV	DATE	PROJ#	R&I NO.	REVISION
F	3/8/19	18-1952		REVISION F MOC -XXX-XXX
E	2/27/19	18-1952		REVISION E MOC -XXX-XXX
D	9/22/17	17-1640		REVISION D MOC -XXX-XXX
C	6/22/17	17-1640		REVISION C MOC -XXX-XXX
B	6/6/17	17-1640		REVISION B MOC -XXX-XXX
A	5/17/17	17-1640		ISSUED FOR REVIEW MOC -XXX-XXX

CONTRACTOR	CKD	PIC	MOA GRID	DWG NO.	REVISION
			SW1030/1130	C.3	

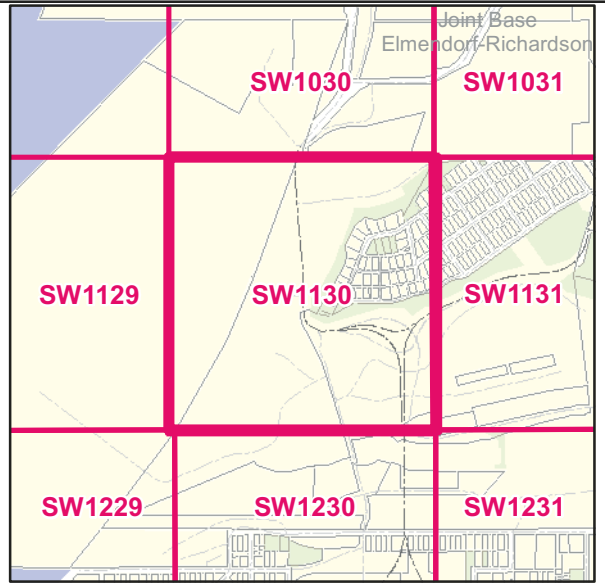
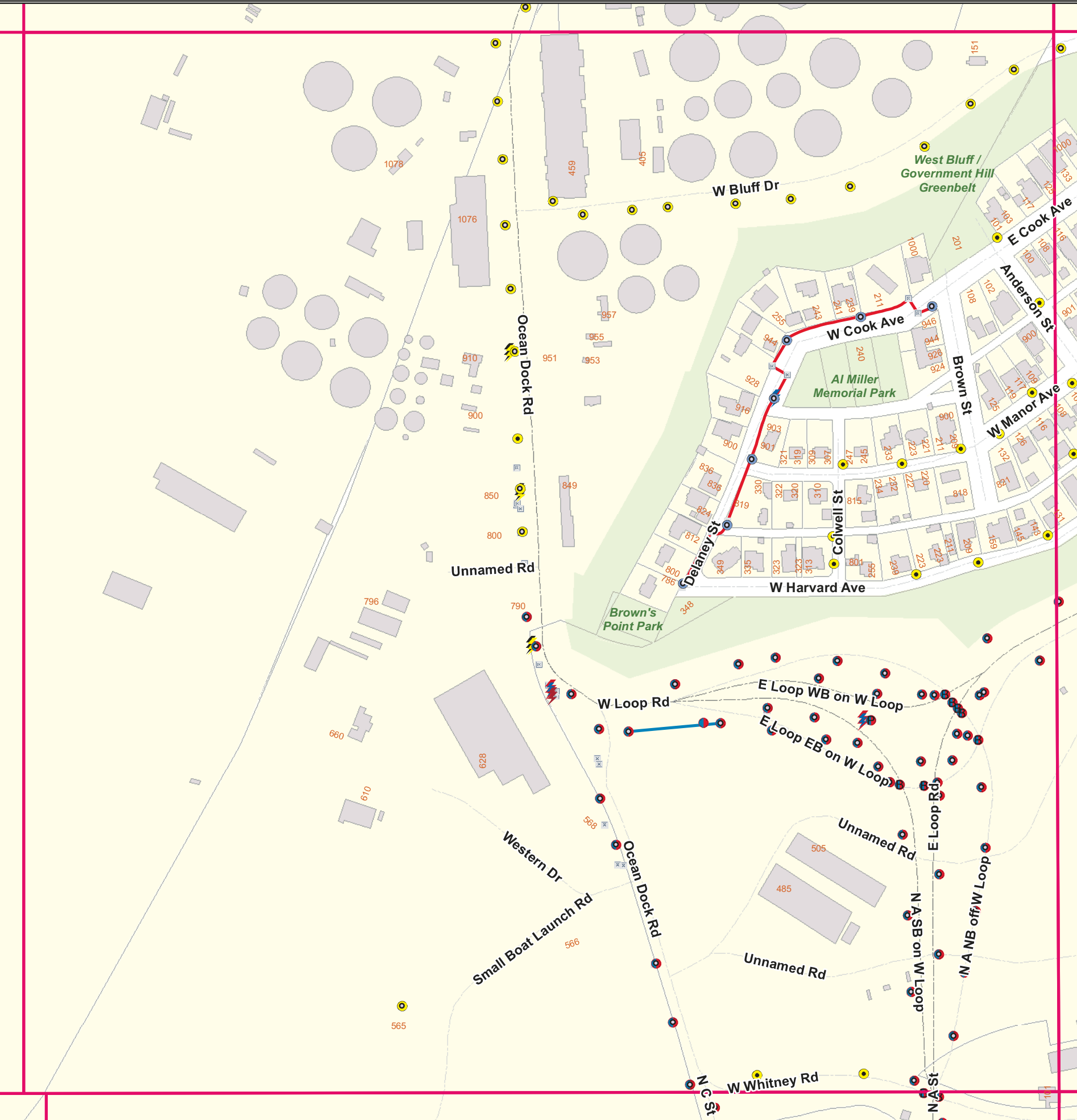
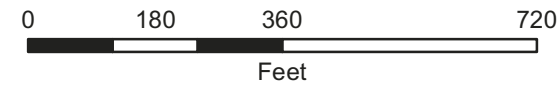
ANDEAVOR LOGISTICS, LP

OCEAN DOCK TERMINAL (ODT)
 WASTE WATER SYSTEM
 SEWER SERVICE EXTENSION
 SEWER SERVICE PLAN & PROFILE

PS-17-032 TYPE: SUBTYPE:
 MOA GRID SW1030/1130 DWG NO. C.3 REVISION E

Legend

- | | |
|------------------------------|--|
| Load Centers | Streetlights by Maint. Provider |
| MOA -Streetlights | MOA -Streetlights |
| TORA | TORA |
| DOT | DOT |
| DOT - AIA | DOT - AIA |
| CEA | CEA |
| ML&P | ML&P |
| MEA | MEA |
| MOA Facility Maintenance | MOA Facility Maintenance |
| MOA Traffic | MOA Traffic |
| MOA Transit Maintenance | MOA Transit Maintenance |
| AWWU | AWWU |
| Private | Private |
| Railroad | Railroad |
| Other | Other |
| Unknown | Unknown |
| | Junction Boxes |
| | Junction Box |
| | Control Panel |
| | Control Panel |
| | Thaw Wire End Point |
| | End of Thaw Wire |
| | TW Structure |
| Type of Light | Street Light Circuitry |
| Bollard Light | Abandoned |
| Bridge Light | Corflo at Grade |
| Bus Shelter Light | Overhead |
| Canopy Light | Overhead Temporary |
| Hightower Light | Underground |
| Light Mount Only | Thaw Wire Cicuitry |
| Light Mount on Power Pole | Other |
| Light Mount on Traffic Pole | Creek Segment |
| Ped/Transit Light; Ped Light | Culvert |
| Stairway | Ditch Line |
| Trail Light | Storm Drain |
| Tunnel Light | Bridge |
| Wall Light | Underground |



Notes:

INFORMATION AND DATA CONTAINED ON THIS DOCUMENT IS NOT TO BE CONSIDERED ACCURATE AND THE MUNICIPALITY OF ANCHORAGE ASSUMES NO LIABILITY FOR DAMAGES OCCURRING AS A RESULT OF USING THIS DOCUMENT. FOR THE LATEST AND MOST UP TO DATE INFORMATION YOU ARE URGED TO CALL THE MUNICIPALITY OF ANCHORAGE BEFORE STARTING OPERATIONS.

MOA Street Light Inventory

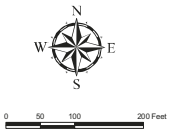
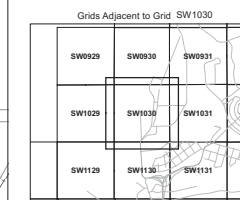
Map Created: 10/22/2022

Grid Number

SW1130

SW1030 Grid Map

- Parcel Line
- Deeded Parcel Line
- Subdivision Boundary
- Subdivision Addition
- - - Easement Line
- - - Easement Centerline
- Road Centerline
- Private Road Centerlines
- Section Line
- Railroad
- - - Stream Centerline
- Monument
- ⊠ BLM Monument
- ⊕ Witness Corner
- Bearing Break
- 1 Lot Number
- 2 Block Number
- 5/1/2 Subdivision Names
- 3 BLM Lot Number
- 4 Section Number
- 99-99 ADRFN
(Anchorage District Recording File Number)



This map is derived from Geographic Information Systems data developed and maintained by the Municipality of Anchorage (MOA). This map is not the official representation of any of the information included and is made available to the public solely for informational purposes. This map may be outdated, inaccurate, and may omit important information. Do not rely on this information. The Municipality of Anchorage will not be liable for losses arising from errors, inaccuracies or omissions in the map.



Map produced by:
Land Records, RCW-Survey
Project Management & Engineering Division
Public Works Department
P.O. Box 196550
Anchorage, Alaska 99519-6550

To report map errors,
CALL: (907) 343-8164

MOA 1/4 Section Grid Map

NW 1/4 Sec 7 T13N R3W

9/6/2020

GRID SW1030

PORT OF
ANCHORAGE
ADDITION 2

ALASKA RAILROAD
SHIP CREEK
TIDELANDS

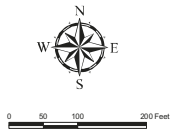
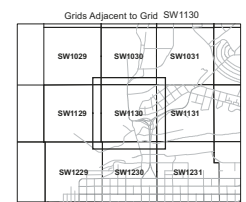




PORT OF ANCHORAGE
ADDITION 2

SW1130 Grid Map

- Parcel Line
- Deeded Parcel Line
- Subdivision Boundary
- Subdivision Addition
- - - Easement Line
- - - Easement Centerline
- Road Centerline
- Private Road Centerlines
- Section Line
- Railroad
- - - Stream Centerline
- Monument
- ✱ BLM Monument
- ✱ Witness Corner
- Bearing Break
- 1 Lot Number
- 2 Block Number
- SW1130 Subdivision Names
- 3 BLM Lot Number
- 4 Section Number
- 99-99 ADRFN
(Anchorage District Recording File Number)



This map is derived from Geographic Information Systems data developed and maintained by the Municipality of Anchorage (MOA). This map is not the official representation of any of the information included and is made available to the public solely for informational purposes. This map may be outdated, inaccurate, and may omit important information. Do not rely on this information. The Municipality of Anchorage will not be liable for losses arising from errors, inaccuracies or omissions in the map.



Map produced by:
Land Records, ROW-Survey
Project Management & Engineering Division
Public Works Department
P.O. Box 196550
Anchorage, Alaska 99519-6550

To report map errors,
CALL: (907) 343-8164

MOA 1/4 Section Grid Map

SW 1/4 Sec 7 T13N R3W

9/6/2020 GRID SW1130