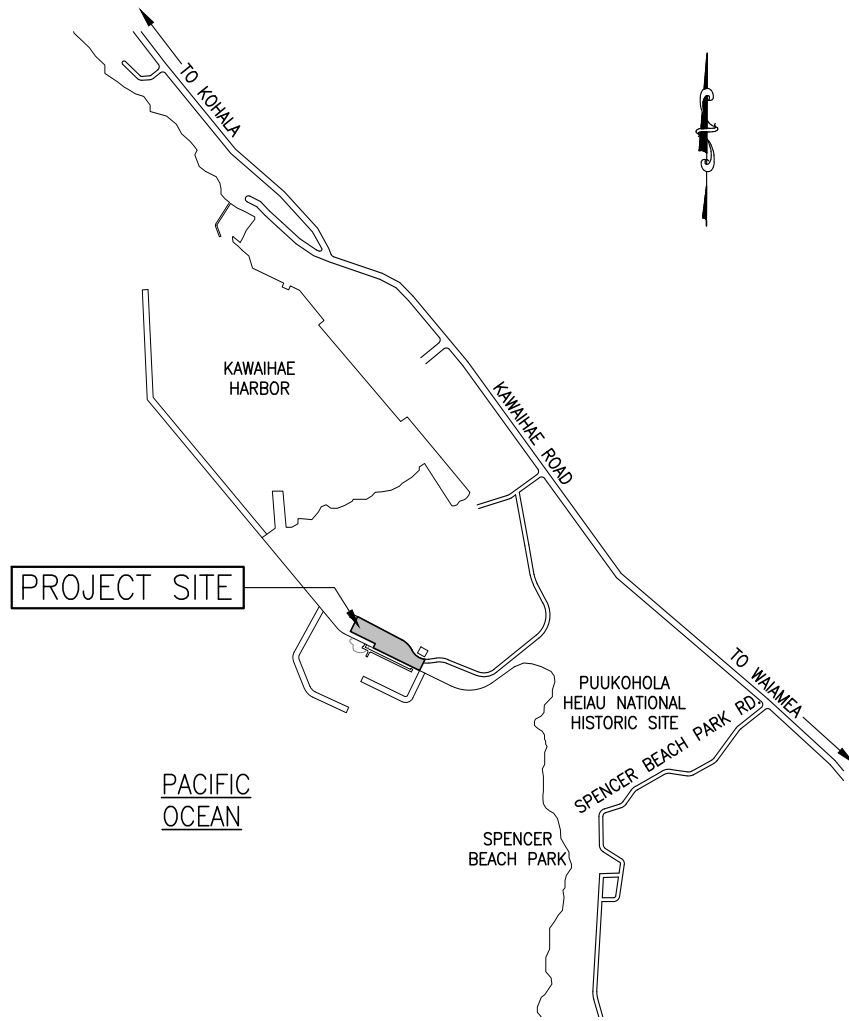


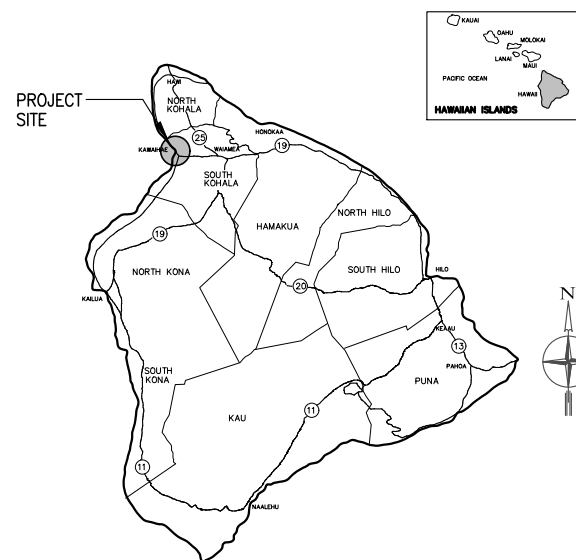
STATE OF HAWAII
 DEPARTMENT OF LAND AND NATURAL RESOURCES
 DIVISION OF BOATING AND OCEAN RECREATION

JOB NO. B13CH75A
**KAWAIHAE SMALL BOAT
 HARBOR (SOUTH)
 PAVING IMPROVEMENTS**

KAWAIHAE, SOUTH KOHALA, HAWAII
 TMK: 3rd. DIV. 6-1-003 : 026



VICINITY MAP
 NOT TO SCALE



ISLAND OF HAWAII
 NOT TO SCALE

INDEX

1. T1.0 TITLE SHEET
2. C1.0 CIVIL NOTES AND ABBREVIATIONS
3. C2.0 SITE PLAN
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6. C3.1 CIVIL DETAILS
7. C3.2 CIVIL DETAILS

APPROVED:

EDWARD R. UNDERWOOD
 ADMINISTRATOR
 DIVISION OF BOATING AND OCEAN RECREATION
 DEPARTMENT OF LAND AND NATURAL RESOURCES

May 20, 2020

DATE

DAVID YAMAMOTO, P.E.
 DIRECTOR
 COUNTY OF HAWAII, DEPARTMENT OF PUBLIC WORKS
 (FOR GRADING PURPOSES)

DATE

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CONSTRUCTION NOTES

- ALL WORK SHALL BE DONE IN ACCORDANCE WITH THE COUNTY OF HAWAII DEPARTMENT OF PUBLIC WORKS "STANDARD DETAILS" DATED SEPT. 1984, "STANDARD SPECIFICATIONS FOR PUBLIC WORKS CONSTRUCTION" DATED SEPT. 1986, AS AMENDED, AND ALL OTHER PUBLICATIONS REFERENCED IN THE TECHNICAL SPECIFICATIONS.
- THE CONTRACTOR SHALL VERIFY ALL EXISTING CONDITIONS AND DIMENSIONS TO ENSURE PROPER ACCEPTANCE OF THE WORK. IF AT ANY TIME DURING CONSTRUCTION A DISCREPANCY OR CONFLICT IS DISCOVERED, THE CONTRACTOR SHALL STOP WORK AND NOTIFY THE STATE IMMEDIATELY. THE CONTRACTOR SHALL NOT PROCEED WITH THE CONSTRUCTION UNTIL THE DISCREPANCY OR CONFLICT HAS BEEN RESOLVED, AS DETERMINED BY THE STATE.
- ANY UTILITIES OR STRUCTURES THAT ARE DAMAGED BY THE CONTRACTOR DURING PROGRESS OF THE WORK, WHETHER SHOWN OR NOT IN THE CONTRACT DOCUMENTS, SHALL BE REPAIRED TO ITS ORIGINAL CONDITION OR BETTER AT NO ADDITIONAL COST TO THE STATE. THE CONTRACTOR SHALL IMMEDIATELY NOTIFY THE STATE OF ANY DAMAGES.
- ALL WORK NOT CALLED FOR ON THE PLANS BUT REQUIRED FOR THE CONSTRUCTION OF THIS PROJECT SHALL BE CONSIDERED INCIDENTAL TO OTHER CONTRACT ITEMS.
- PURSUANT TO CHAPTER 6E, HRS, IN THE EVENT ANY ARTIFACTS OR HUMAN REMAINS ARE UNCOVERED DURING CONSTRUCTION OPERATIONS, THE CONTRACTOR SHALL IMMEDIATELY SUSPEND WORK AND NOTIFY THE HAWAII POLICE DEPARTMENT, THE STATE DEPARTMENT OF LAND AND NATURAL RESOURCES--HISTORIC PRESERVATION DIVISION (692-8015). IN ADDITION, THE CONTRACTOR SHALL INFORM THE ENGINEERING DIVISION, DEPARTMENT OF PUBLIC WORKS (961-8327) AND THE CONTRACTING OFFICER.
- AT THE END OF EACH DAY'S WORK THE CONTRACTOR SHALL REMOVE ALL EQUIPMENT AND OTHER OBSTRUCTIONS TO PERMIT FREE AND SAFE PASSAGE OF PUBLIC TRAFFIC UNLESS OTHERWISE NOTED.
- THE CONTRACTOR SHALL PROVIDE AND MAINTAIN TEMPORARY ACCESSIBLE ROUTES AROUND CONSTRUCTION IN ACCORDANCE WITH ADAAG 202.1. CONTRACTOR SHALL COORDINATE REPAIR OF ANY DAMAGED ACCESSIBLE ROUTES WITH THE STATE AND IN ACCORDANCE WITH ADAAG 206.1. THE CONTRACTOR SHALL SUBMIT AN ACCESSIBLE ROUTE PLAN TO THE STATE.
- PROJECT LAYOUT INFORMATION OR BASE CADD FILE WILL BE PROVIDED TO THE WINNING BIDDER.

EROSION AND SEDIMENT CONTROL NOTES

CONSTRUCTION MANAGEMENT TECHNIQUES

- CLEARING AND GRUBBING SHALL BE HELD TO THE MINIMUM NECESSARY FOR GRADING AND EQUIPMENT OPERATION. LIMITS OF THE CLEARING AND GRUBBING SHALL BE STAKED PRIOR TO THE START OF CONSTRUCTION.
- CONSTRUCTION SHALL BE SEQUENCED TO MINIMIZE THE EXPOSURE TIME OF THE CLEARED SURFACE AREA.
- CONSTRUCTION SHALL BE STAGED OR PHASED FOR LARGE PROJECTS. AREAS OF ONE PHASE SHALL BE STABILIZED BEFORE ANOTHER PHASE IS INITIATED. STABILIZATION SHALL BE ACCOMPANIED BY TEMPORARILY OR PERMANENTLY PROTECTING THE DISTURBED SOIL SURFACE FROM RAINFALL IMPACTS AND RUNOFF.
- EROSION AND SEDIMENT CONTROL MEASURES SHALL BE IN PLACE AND FUNCTIONAL BEFORE EARTH MOVING OPERATIONS BEGIN. THESE MEASURES SHALL BE PROPERLY CONSTRUCTED AND MAINTAINED THROUGHOUT THE CONSTRUCTION PERIOD. PERMANENT RETENTION AREAS SHOULD BE CONSTRUCTED PRIOR TO ANY OTHER CLEARING, GRUBBING, OR GRADING OPERATION. SILT FENCES SHALL BE INSTALLED ALONG THE ENTIRE DOWNSLOPE SIDE OF THE ACTIVE CONSTRUCTION ZONE IN AREAS WHERE ON-SITE RUNOFF FLOWS OFF THE PROJECT SITE.
- ALL CONTROL MEASURES SHALL BE CHECKED AND REPAIRED AS NECESSARY, FOR EXAMPLE, WEEKLY IN DRY PERIODS AND WITHIN TWENTY-FOUR HOURS AFTER ANY RAINFALL OF 0.5 INCHES OR GREATER WITHIN A 24 HOUR PERIOD. DURING PROLONGED RAINFALL, DAILY CHECKING IS NECESSARY. THE PERMITTEE SHALL MAINTAIN RECORDS OF CHECKS AND REPAIRS.
- THE PERMITTEE SHALL MAINTAIN RECORDS OF THE DURATION AND ESTIMATED VOLUME OF STORM WATER DISCHARGE(S).
- A SPECIFIC INDIVIDUAL SHALL BE DESIGNATED TO BE RESPONSIBLE FOR EROSION AND SEDIMENT CONTROLS ON EACH PROJECT SITE.

VEGETATION CONTROLS

- PRE-CONSTRUCTION VEGETATIVE GROUND COVER SHALL NOT BE DESTROYED, REMOVED OR DISTURBED MORE THAN TWENTY CALENDAR DAYS PRIOR TO LAND DISTURBANCE.
- TEMPORARY SOIL STABILIZATION WITH APPROPRIATE VEGETATION SHALL BE APPLIED ON AREAS THAT WILL REMAIN UNFINISHED FOR MORE THAN THIRTY CALENDAR DAYS.
- PERMANENT SOIL STABILIZATION WITH PERENNIAL VEGETATION OR PAVEMENT SHALL BE APPLIED AS SOON AS PRACTICAL AFTER FINAL GRADING. IRRIGATION AND MAINTENANCE OF THE PERENNIAL VEGETATION SHALL BE PROVIDED FOR NINETY CALENDAR DAYS OR UNTIL THE VEGETATION TAKES ROOT, WHICHEVER IS SHORTER.

STRUCTURAL CONTROLS

- STORM WATER FLOWING TOWARD THE CONSTRUCTION AREA SHALL BE DIVERTED BY USING APPROPRIATE CONTROL MEASURES, AS PRACTICAL.

- EROSION CONTROL MEASURES SHALL BE DESIGNED ACCORDING TO THE SIZE OF DISTURBED OR DRAINAGE AREAS TO DETAIN RUNOFF AND TRAP SEDIMENT AND APPROVED BY THE DESIGNER OF RECORD.
- WATER MUST BE DISCHARGED IN A MANNER THAT THE DISCHARGE SHALL NOT CAUSE OR CONTRIBUTE TO A VIOLATION OF THE BASIC WATER QUALITY CRITERIA AS SPECIFIED IN SECTION 11-54-04 OF THE HAR.

GRADING NOTES

- ALL GRADING WORK SHALL CONFORM TO CHAPTER 10 OF THE HAWAII COUNTY CODE. NO WORK SHALL COMMENCE UNTIL THE DEPARTMENT OF PUBLIC WORKS (DPW) APPROVES A GRADING PERMIT.
- THE CONTRACTOR SHALL REMOVE ALL SILT AND DEBRIS DEPOSITED IN DRAINAGE FACILITIES, ROADWAYS AND OTHER AREAS RESULTING FROM HIS WORK. THE COSTS INCURRED FOR ANY NECESSARY REMEDIAL ACTION BY THE DPW SHALL BE PAYABLE BY THE CONTRACTOR.
- THE CONTRACTOR, AT HIS OWN EXPENSE, SHALL KEEP THE PROJECT AND SURROUNDING AREAS FREE FROM DUST NUISANCES. THE WORK SHALL BE IN CONFORMANCE WITH THE AIR POLLUTION CONTROL RULES OF THE STATE DEPARTMENT OF HEALTH, HAR 11-60.1, FUGITIVE DUST.
- ALL GRADING OPERATIONS SHALL BE PERFORMED IN CONFORMANCE WITH THE APPLICABLE PROVISIONS OF THE HAWAII ADMINISTRATIVE RULES, TITLE 11, CHAPTER 55, WATER POLLUTION CONTROL AND CHAPTER 54, WATER QUALITY STANDARDS, AND TO THE EROSION AND SEDIMENTATION CONTROL STANDARDS AND GUIDELINES OF THE DEPARTMENT OF PUBLIC WORKS, COUNTY OF HAWAII.
- THE CONTRACTOR SHALL SOD OR PLANT ALL SLOPES AND EXPOSED AREAS IMMEDIATELY AFTER THE GRADING WORK HAS BEEN COMPLETED, AS CALLED FOR IN THE PLANS.
- FILLS ON SLOPES STEEPER THAN 5:1 SHALL BE KEYED.
- THE CONTRACTOR SHALL INFORM THE DPW OF THE LOCATION OF THE DISPOSAL AND/OR BORROW SITE(S) REQUIRED FOR THIS PROJECT WHEN AN APPLICATION FOR A GRADING PERMIT IS MADE. THE DISPOSAL AND/OR BORROW SITE(S) MUST ALSO FULFILL THE REQUIREMENTS OF THE GRADING ORDINANCE.
- NO GRADING WORK SHALL BE DONE ON SATURDAYS, SUNDAYS AND HOLIDAYS ANYTIME WITHOUT PRIOR APPROVAL FROM THE DEPARTMENT OF PUBLIC WORKS. GRADING WORK ON NORMAL WORKING DAYS SHALL BE BETWEEN THE HOURS OF 7:00 AM TO 3:30 PM.
- FILLS SHALL BE COMPACTED TO 90 PERCENT (90%) OF MAXIMUM DENSITY PER ASTM D-1557 TEST.
- THE CONTRACTOR SHALL REMOVE ALL VEGETATION BEFORE PLACING FILLS ON NATURAL GROUND SURFACE.

EARTHWORK QUANTITIES

AREA GRADED: 1.30 ACRES
 EXCAVATION: 30 C.Y.
 EMBANKMENT: 1000 C.Y.


NOTE: EARTHWORK QUANTITIES ARE SHOWN FOR PERMIT PURPOSES ONLY. CONTRACTOR SHALL PERFORM THEIR OWN QUANTITY TAKE OFF AND QUALITY ASSESSMENT. THE CONTRACTOR SHALL NOT USE THE ABOVE QUANTITIES FOR BIDDING PURPOSES. THE CONTRACTOR IS RESPONSIBLE TO IMPORT OR EXPORT MATERIALS AS NECESSARY TO COMPLETE THE GRADING WORK AT NO ADDITIONAL COST TO THE STATE.

ABBREVIATIONS

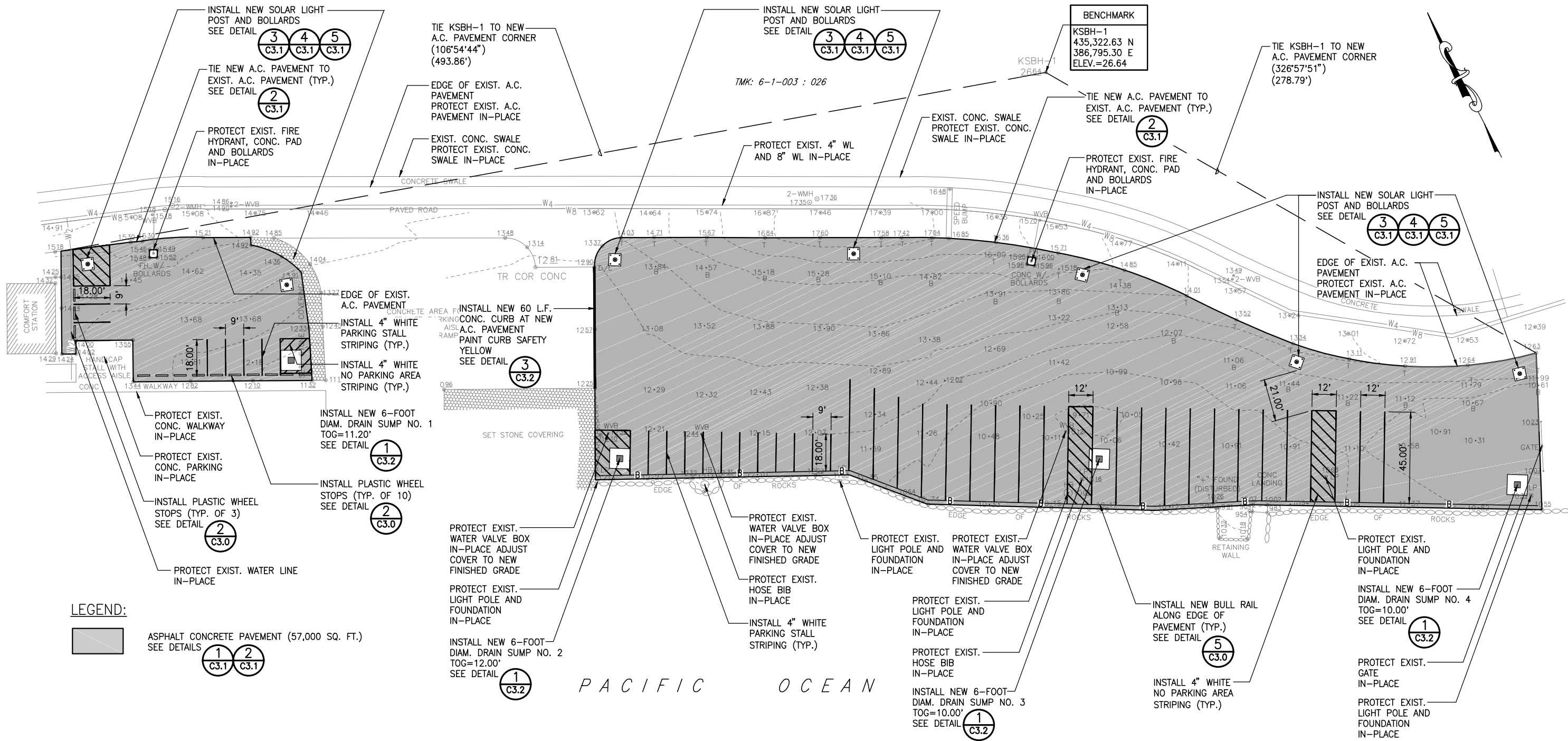
A.C.	ASPHALT CONCRETE
BMP	BEST MANAGEMENT PRACTICES
BOT	BOTTOM
CIRC.	CIRCULAR
CLR.	CLEAR
CONC.	CONCRETE
DET.	DETAIL
DIAM./Ø	DIAMETER
DR	DRIVE
DLNR	DEPARTMENT OF LAND AND NATURAL RESOURCES
ELEV./EL.	ELEVATION
EOS	EDGE OF SHOULDER
EOTW	EDGE OF TRAVEL WAY
EW	EACH WAY
EXIST.	EXISTING
FH	FIRE HYDRANT
GALV.	GALVANIZED
HB	HOSE BIB
HWY	HIGHWAY
I.D.	INSIDE DIAMETER
INV.	INVERT
L.F.	LINEAR FEET
LP	LIGHT POST
MIN.	MINIMUM
O.C.	ON CENTER
OSHA	OCCUPATIONAL SAFETY AND HEALTH ADMINISTRATION
PAVT/PVMT	PAVEMENT
PSI	POUNDS PER SQUARE INCH
PVC	POLYVINYL CHLORIDE
REINF.	REINFORCED
R.O.W.	RIGHT OF WAY
SCH.	SCHEDULE
SHT.	SHEET
SQ.	SQUARE
SS	STAINLESS STEEL
STL.	STEEL
TMK	TAX MAP KEY
TOG	TOP OF GRATE
TYP.	TYPICAL
W/	WITH
WL	WATER LINE
WMH	WATER MAN HOLE
WVB	WATER VALVE BOX

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REVISION NO.	SYM.	DESCRIPTION	SHT./OF	DATE	APPROVED
					
STATE OF HAWAII DEPARTMENT OF LAND AND NATURAL RESOURCES DIVISION OF BOATING AND OCEAN RECREATION KAWAIHAE SMALL BOAT HARBOR (SOUTH) PAVING IMPROVEMENTS CIVIL NOTES AND ABBREVIATIONS					
DESIGNED: KS	SUBMITTED: -				
DRAWN: LG/KS	DATE: MAY 2020				
CHECKED: LOK	SCALE: AS NOTED				
					DRAWING NO. C1.0

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LEGEND:

ASPHALT CONCRETE PAVEMENT (57,000 SQ. FT.)
SEE DETAILS (1) (2)
C3.1 C3.1

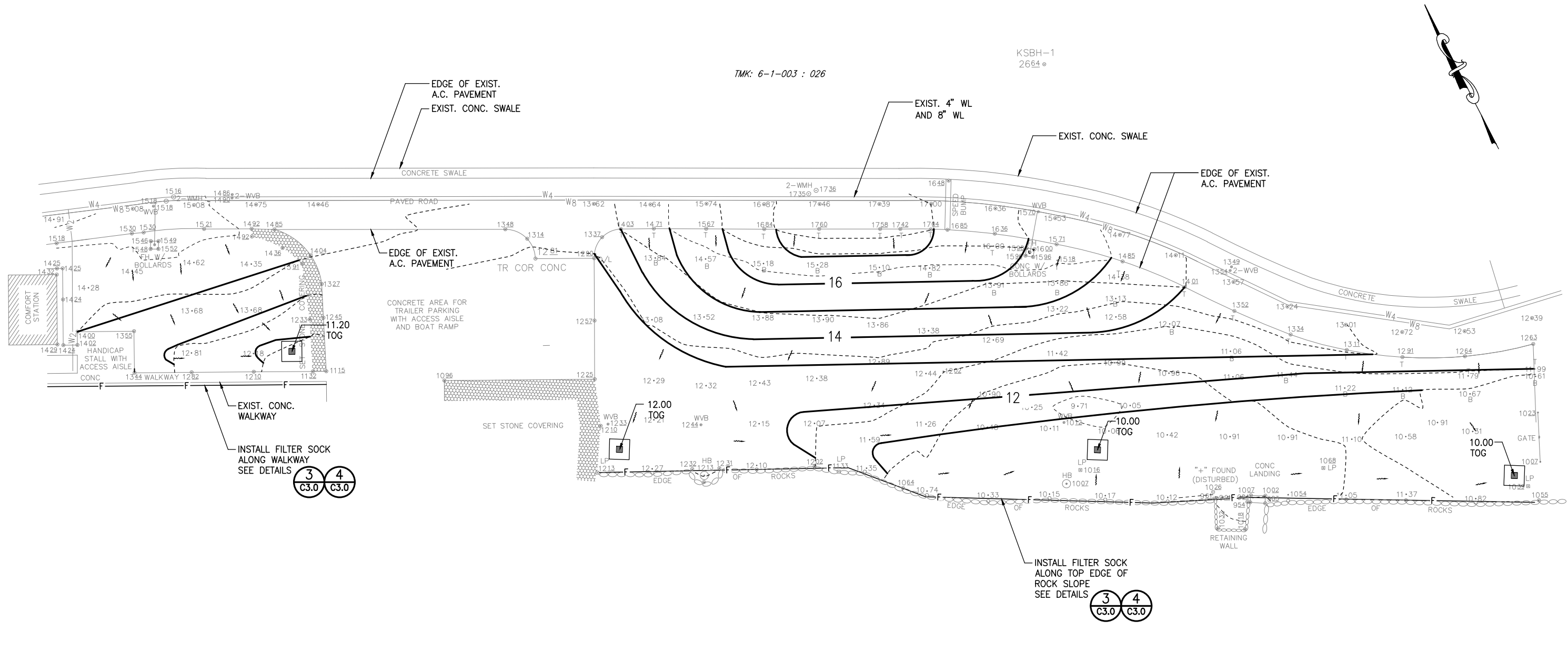
SITE PLAN
SCALE: 1" = 50'



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STATE OF HAWAII DEPARTMENT OF LAND AND NATURAL RESOURCES DIVISION OF BOATING AND OCEAN RECREATION KAWAHAE SMALL BOAT HARBOR (SOUTH) PAVING IMPROVEMENTS SITE PLAN					
DESIGNED:	KS	SUBMITTED:	-		
DRAWN:	LG/KS	DATE:	MAY 2020		
CHECKED:	LOK	SCALE:	AS NOTED		
					DRAWING NO. C2.0

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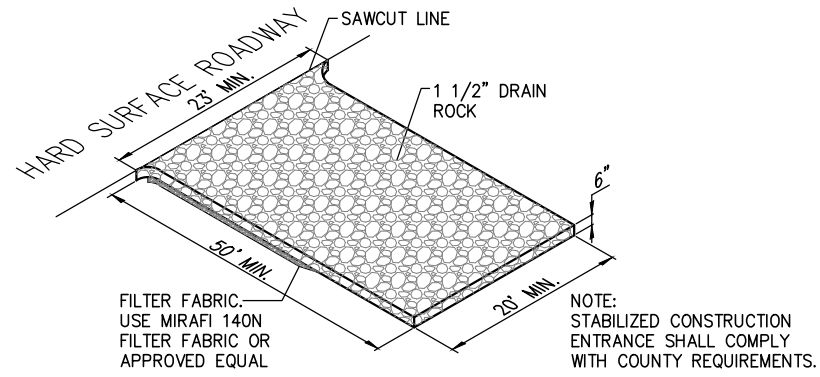
PACIFIC OCEAN

GRADING PLAN
SCALE: 1" = 50'

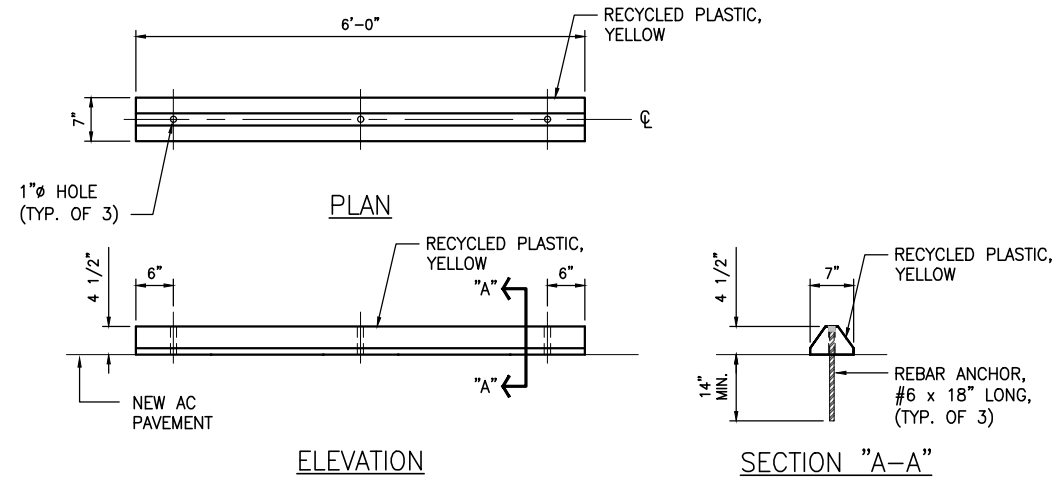


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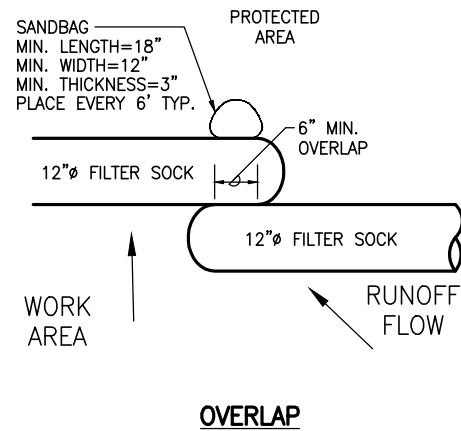
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DESIGNED:	KS	SUBMITTED:	-		
DRAWN:	LG/KS	DATE:	MAY 2020		
CHECKED:	LOK	SCALE:	AS NOTED		
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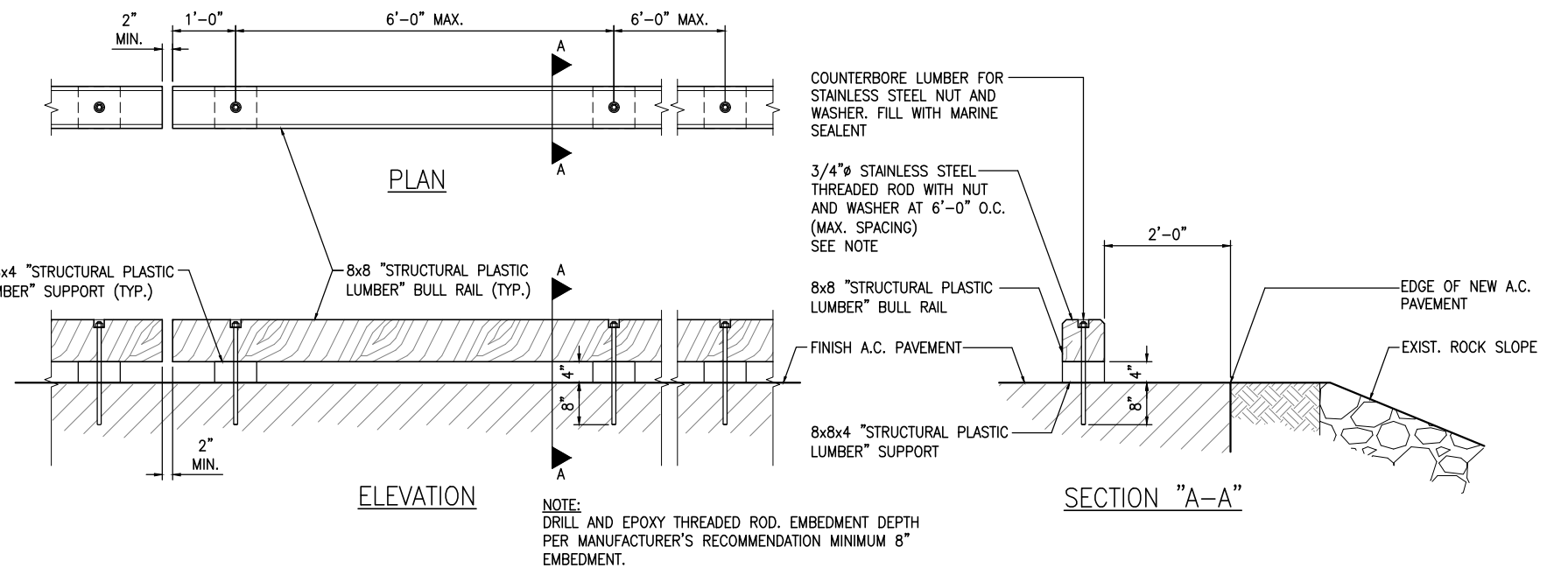
1 STABILIZED CONSTRUCTION ENTRANCE
NOT TO SCALE



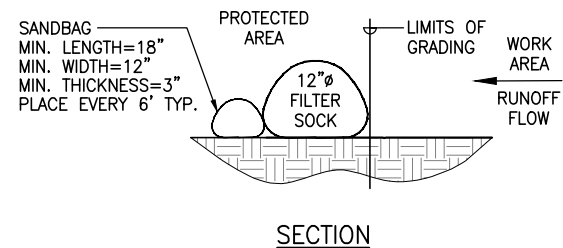
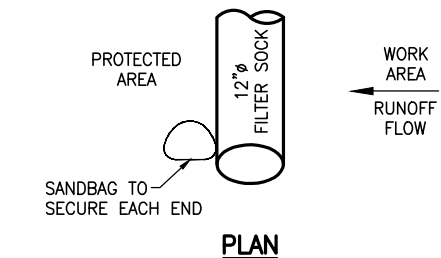
2 PLASTIC WHEEL STOP DETAIL
NOT TO SCALE



3 FILTER SOCK DETAIL
NOT TO SCALE



5 BULL RAIL DETAIL
NOT TO SCALE

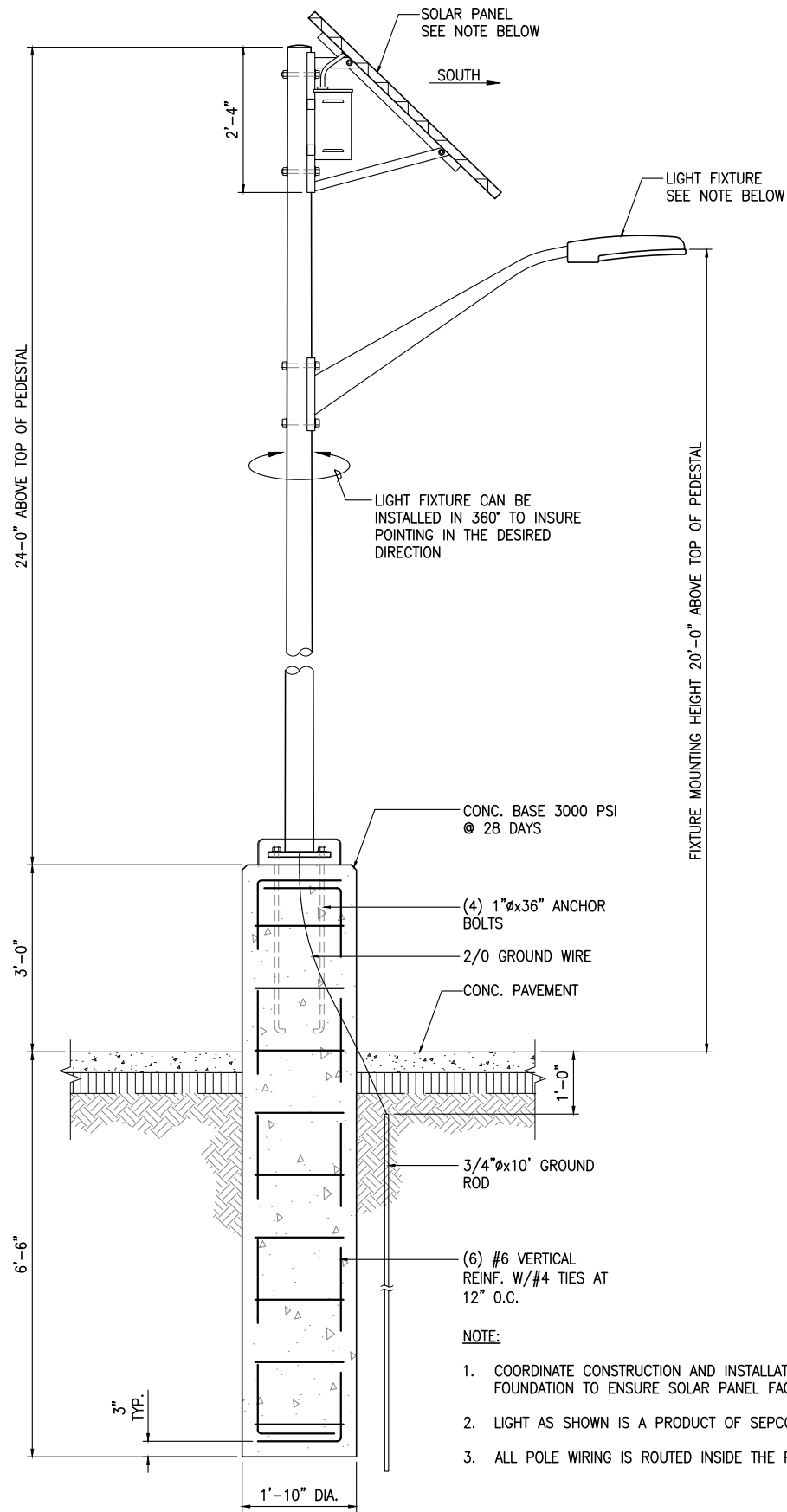


4 FILTER SOCK SECTION
NOT TO SCALE

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STATE OF HAWAII DEPARTMENT OF LAND AND NATURAL RESOURCES DIVISION OF BOATING AND OCEAN RECREATION KAWAIHAE SMALL BOAT HARBOR (SOUTH) PAVING IMPROVEMENTS CIVIL DETAILS					
DESIGNED:	KS	SUBMITTED:	-		
DRAWN:	LG/KS	DATE:	MAY 2020		
CHECKED:	LOK	SCALE:	AS NOTED		
THE WORK WAS PREPARED BY ME OR UNDER MY SUPERVISION AND CONSTRUCTION OF THIS PROJECT WILL BE UNDER MY OBSERVATION. <i>Lenie Okano-Kenrick</i> Expiration Date of License 04/22					DRAWING NO. C3.0

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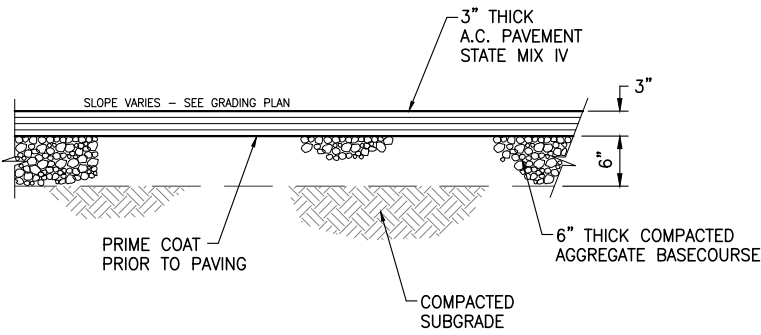
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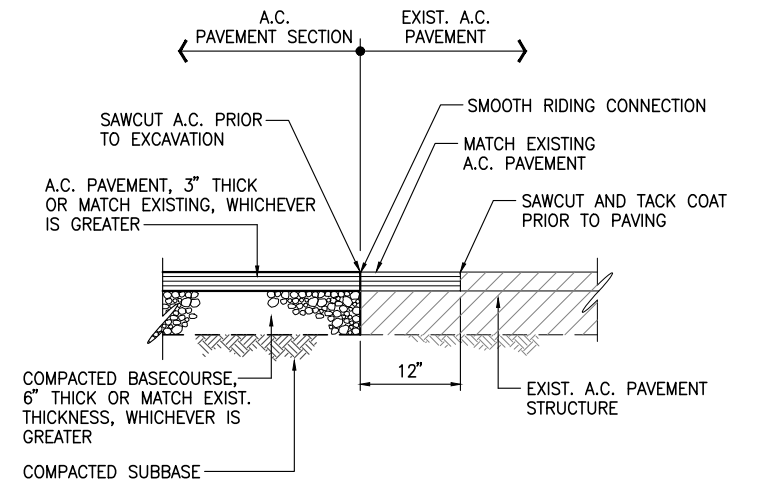
3 SOLAR LIGHT POST DETAIL
NOT TO SCALE

NOTE:

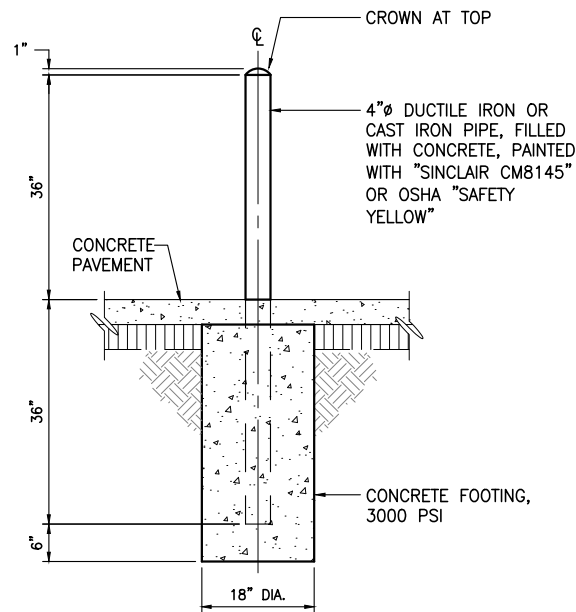
1. COORDINATE CONSTRUCTION AND INSTALLATION OF FOUNDATION TO ENSURE SOLAR PANEL FACES SOUTH.
2. LIGHT AS SHOWN IS A PRODUCT OF SEPCO.
3. ALL POLE WIRING IS ROUTED INSIDE THE POLE.



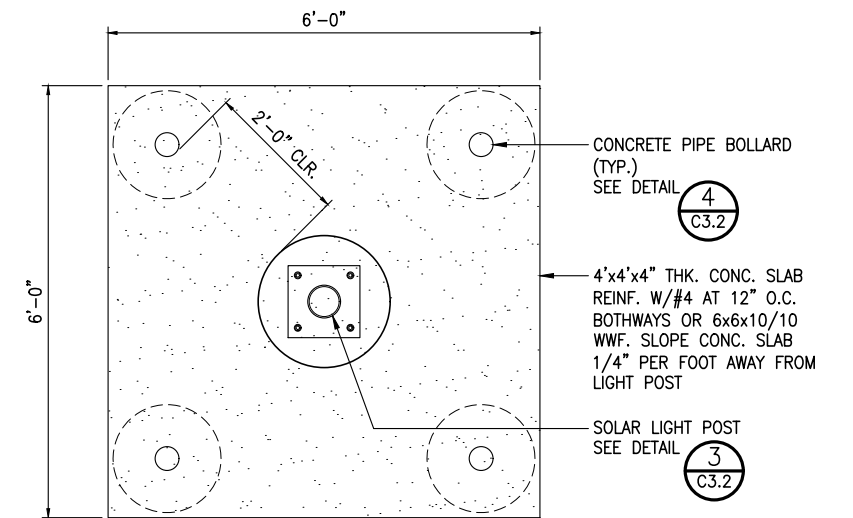
1 ASPHALT CONCRETE PAVEMENT DETAIL
NOT TO SCALE



2 CONNECTION TO EXISTING A.C. PAVEMENT DETAIL
NOT TO SCALE



4 PIPE BOLLARD DETAIL
NOT TO SCALE

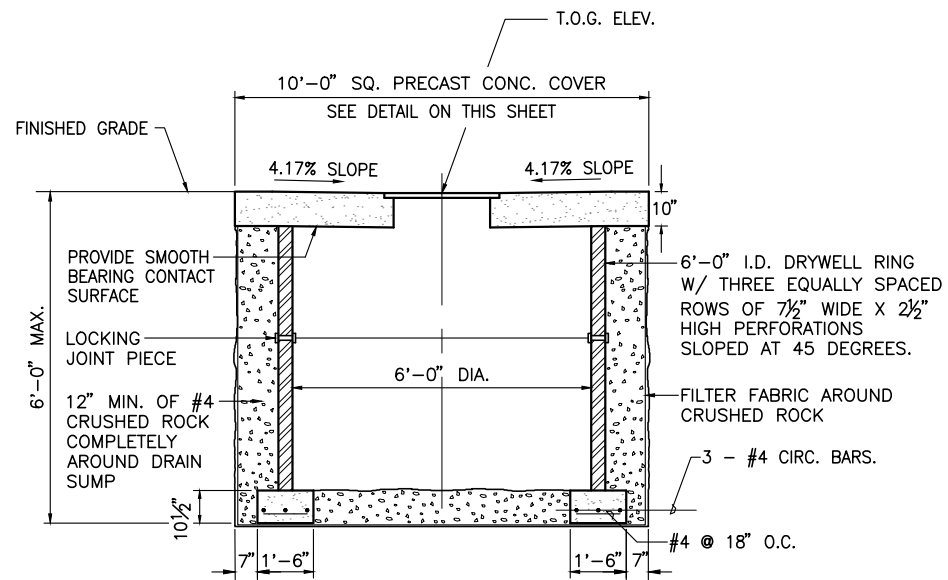


5 SOLAR LIGHT POST LAYOUT PLAN
NOT TO SCALE

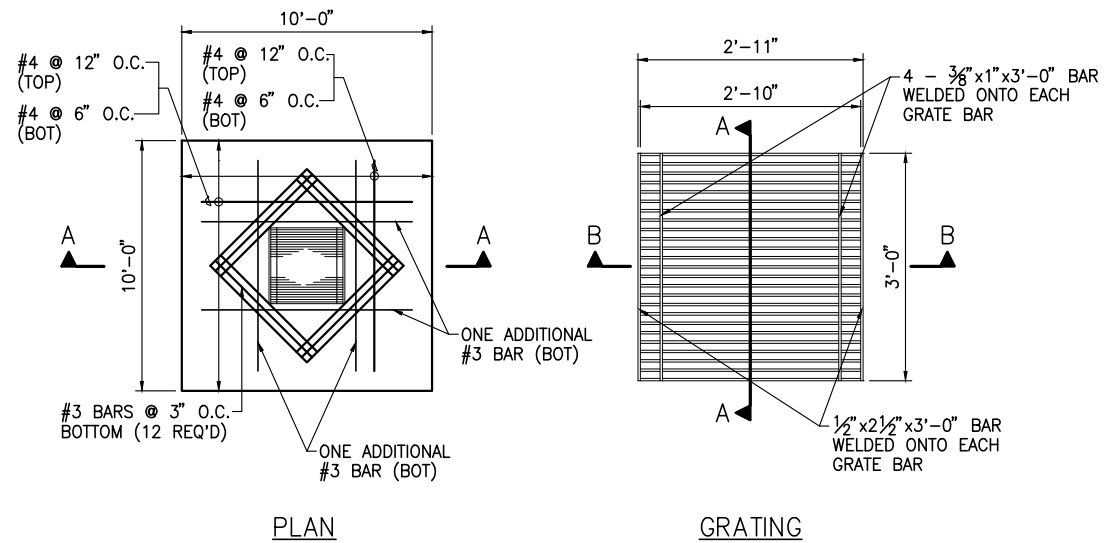
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DESIGNED:	KS	SUBMITTED:	-		
DRAWN:	LG/KS	DATE:	MAY 2020		
CHECKED:	LOK	SCALE:	AS NOTED		
THE WORK WAS PREPARED BY ME OR UNDER MY SUPERVISION AND CONSTRUCTION OF THIS PROJECT WILL BE UNDER MY OBSERVATION. <i>Lennie Okano-Kenrick</i> Expiration Date of License 04/22					DRAWING NO. C3.1

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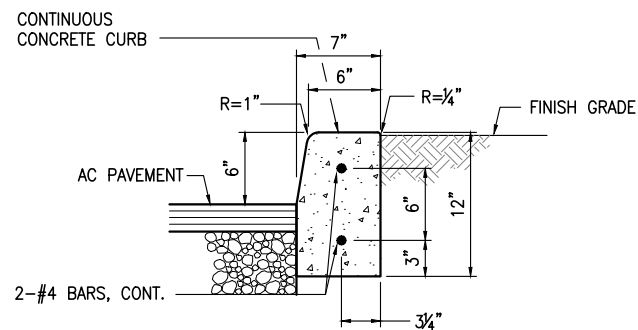


1 DRAIN SUMP DETAIL
NOT TO SCALE



- NOTES**
1. ALL WELD $\frac{5}{16}$ ".
 2. ALL STEEL SHALL BE STRUCTURAL GRADE.
 3. GRATES AND FRAME L'S SHALL BE HOT-DIP GALVANIZED AFTER FABRICATION.

2 DRAIN SUMP COVER DETAILS
NOT TO SCALE



3 CONCRETE CURB DETAIL
NOT TO SCALE

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DRAWN:	LG/KS	DATE:	MAY 2020		
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