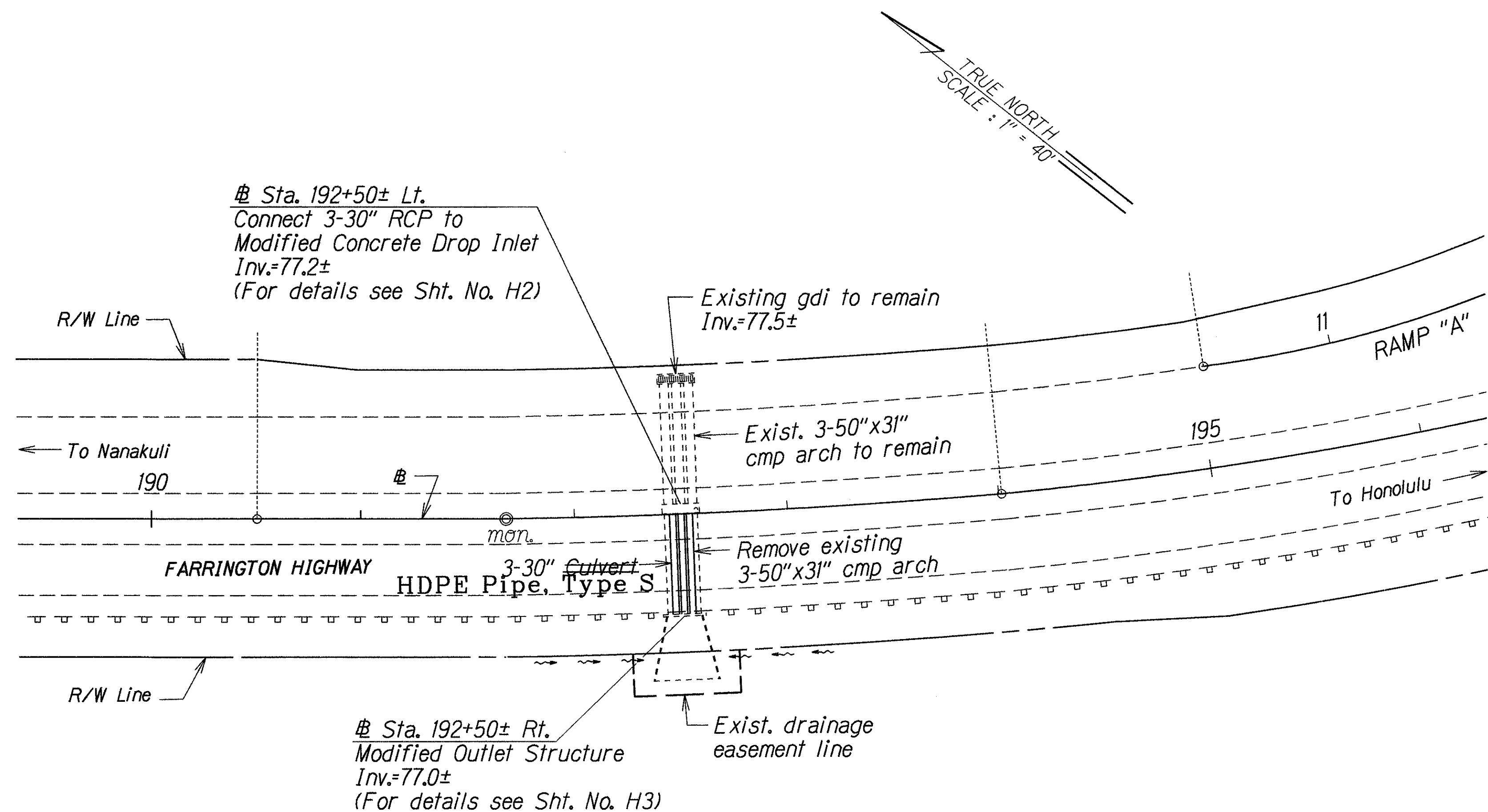


FED. ROAD DIST. NO.	STATE	PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	93A-03-98M	1998	3	5



PLAN

@ Sta. 192+50±
 Remove and Dispose: 50"x31" Arch Pipes
 Construct: Modified Concrete Drop Inlet
 Modified Outlet Structure
 Install: 3-30" ~~Culvert~~ HDPE Pipe, Type S

Estimated Quantities

Removal of 50"x31" Arch Pipes = LS (144 L.F.)
 Trench Excavation = 140 C.Y.
 Bedcourse Material = 25 C.Y.
 30" ~~Culvert~~ HDPE Pipe, Type S = 144 L.F.
 Plant Mix Glassphalt = 27 Tons
 Concrete Base Course = 24 Tons
 A.C. Pav't. Mix No. IV
 Modified Concrete Drop Inlet 4.00 ft. to 4.99 ft. = 1 Ea.
 Modified Outlet Structure 4.00 ft. to 4.99 ft. = 1 Ea.

DRAINAGE NOTES

- Existing drainage systems will be functional at all times during construction. The Contractor is to furnish materials, equipment, labor, tools and incidentals necessary to accomplish maintenance of flow. The cost shall be incidental to the various Contract Items.
- The Contractor shall verify the locations of all existing culverts and utilities in the field. Any existing culverts and utilities damaged during construction shall be repaired or replaced by the Contractor at his own expense.
- Only non-pneumatic type of drill as approved by the Engineer will be permitted for drilling holes in concrete. Where indicated on Plans, the approximate diameter of drilled holes for installation of dowels shall be $\frac{5}{8}$ ", and voids after installing dowels shall be filled with epoxy grout as directed by the Engineer.
- Demolishing, removing, and disposing portions of existing concrete drop inlet and outlet structure shall not be paid for separately, but shall be considered incidental to Modified Concrete Drop Inlet and Modified Outlet Structure respectively.
- Concrete shall be Class A unless otherwise noted.
- Chamfer all exposed concrete edges 1".

GENERAL NOTES

- The scope of work for this project consists of replacing existing culverts with 3-30" ~~RCP~~ HDPE Pipe, Type S; constructing modified inlet and outlet structures; restoring A.C. pavement structure; resetting existing metal guardrails.
- The Contractor is reminded of the requirements of Subsection 108.01 - Subletting of Contract, which requires him to perform work amounting to not less than 50 percent of the total contract cost less deductible items. Non-compliance with this Subsection may be grounds for rejection of bid.
- The Contractor's attention is directed to the following Sections of the Special Provisions: Subsection 107.13 - Public Convenience and Safety, Subsection 107.21 - Contractor's Responsibility for Utility Property and Services, Section 645 - Traffic Control.
- 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.
- The existence and location of underground utilities, manholes, monuments and structures as shown on the plans are from the latest available data but the accuracy is not guaranteed. The encountering of other obstacles during the course of the work is possible. The Contractor shall be held liable for any damages incurred to the existing facilities and/or improvements as a result of his operations.
- The Contractor shall notify the State in writing, two (2) weeks prior to starting paving operations.
- The Contractor shall remove and dispose of all existing raised pavement markers prior to the overlaying of Asphalt Concrete. This work shall be considered incidental to the various contract items.
- Dressing of shoulder shall consist of clearing, grubbing, grading, reshaping and compacting the unpaved shoulders with suitable excavated material as shown on the plans and/or as directed by the Engineer. This work shall be considered incidental to the various contract items.
- All saw cutting work shall be considered incidental to Trench Excavation.

LEGEND FOR AS-BUILT POSTINGS	
	Squiggly line for as-built deletion
	Double line for as-built deletion
Roadway	Text for as-built posting

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

DRAINAGE PLAN
FARRINGTON HIGHWAY
Repair Triple CMP Culverts
at Palailai Interchange
Project No. 93A-03-98M
Scale: 1"=40'

Date: Jan. 1998
SHEET No. *HI* OF 3 SHEETS

ORIGINAL PLAN	DATE 1/17/99
SURVEY PLOTTED BY	
DRAWN BY A. NAKULA	
DESIGNED BY B. KAWAMURA, C. MATSUDA	
QUANTITIES BY	
CHECKED BY	
NOTE BOOK	
013randhita	
013randhita	