

FED. ROAD DIST. NO.	STATE	FED. AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	I-HI-1(105)-14	1973	2	16

GENERAL NOTES

SPECIFICATIONS: AASHTO

STANDARD SPECIFICATIONS FOR HIGHWAY BRIDGE (10TH EDITION) WITH SUBSEQUENT ADDITIONS AND MODIFICATIONS.

DESIGN LOADS: LL = 85 PSF

DESIGN STRESSES:

1- REINFORCED CONCRETE BEAMS AND SLABS, SEE AASHTO SPECIFICATIONS AND SPECIAL PROVISIONS UNLESS OTHERWISE NOTED.

CLASS A: $f_c = 3000$ PSI CLASS E: $f_c = 4500$ PSI
 $f_s = 1,200$ PSI $f_s = 1,800$ PSI

REINF: GRADE 40 - $f_s = 20,000$ PSI
GRADE 60 - $f_s = 24,000$ PSI

2- PRESTRESSED PILES (12" x 12" - TYPE II)

$f_c = 5,000$ PSI

$f_s = 2,500$ PSI - 7/16" DIA. 7 WIRE STRANDS

DESIGN LOAD = 12.12 KIPS PER STRAND

TENSION LOAD = 18.90 KIPS PER STRAND

PILE DESIGN LOAD = 100 KIPS

MATERIALS:

1- ALL OVERPASS SUPERSTRUCTURE COLUMNS, ABUTMENTS, AND FOOTINGS BETWEEN STA. 3+80.50 AND STA. 7+22.50 SHALL BE CLASS E CONCRETE.

2- ALL OTHER CONCRETE, RAMP WALL STRUCTURE, AND WALKWAY SLAB, SHALL BE CLASS A UNLESS OTHERWISE NOTED ON PLANS.

3- CONCRETE CLEAR COVER FOR REINFORCING BARS SHALL BE AS FOLLOWS UNLESS OTHERWISE NOTED.

1 1/2" FOR STIRRUPS ON SIDES OF BEAMS, AND REIN. IN TOP & BOT. SLABS.

2 1/2" TO MAIN REINFORCING OF PIER CAPS.

2 1/2" TO MAIN REINFORCING OF COLUMNS.

2" FOR FORMED WALLS, AND MAIN REIN. IN GIRDERS.

3" FOR FOOTINGS.

4- ALL REINFORCING STEEL TO BE ASTM DESIGNATION A615 GRADE 40 AND GRADE 60, EXCEPT AS OTHERWISE NOTED.

5- ALL ELASTOMERIC BEARING PADS SHALL BE 50 HARDNESS PADS.

6- ALL STRUCTURAL STEEL SHALL BE ASTM A36 STEEL AND GALVANIZED, UNLESS NOTED OTHERWISE.

CONSTRUCTION METHODS:

1- SIDES OF FOOTINGS SHALL BE EXCAVATED AND POURED TO NEAT LINES WHEN CALLED FOR ON THE PLANS. FOR EXCAVATION OF BOTTOM OF FOOTINGS, SEE STANDARD SPECIFICATIONS. OVER-EXCAVATION BEYOND NEAT LINES FOR SIDES OF FOOTINGS AND THE ELEVATIONS INDICATED ON THE PLANS FOR THE BOTTOM OF FOOTINGS SHALL BE BACKFILLED WITH A MINIMUM OF CLASS D CONCRETE AT THE CONTRACTOR'S EXPENSE AND AS DIRECTED BY THE ENGINEER.

2- THE PILES ARE BEARING ON A SLOPING VOLCANIC TUFF LAYER AND PREDRILLING MAY BE REQUIRED. SEE SECTION 505.03(E-9) OF THE SPECIFICATIONS.

3- ALL FILL IN ABUTMENTS SHALL NOT BE PLACED UNTIL THE CONCRETE HAS GAINED 2500 PSI STRENGTH.

4- VERTICAL COLUMN BARS SHALL BE ARRANGED IN SUCH A MANNER AS TO MISS SUPERSTRUCTURE REIN. ABOVE.

5- IN GENERAL, TOP OF CONCRETE DECK OF STRUCTURE SHALL BE CONSTRUCTED TO FOLLOW THE FINISH OVERPASS VERTICAL AND HORIZONTAL CURVES AND GRADES.

CAMBER:

OBTAIN CAMBER BY FORMING AND SHORING CONCRETE SURFACES ABOVE PROFILE GRADES AMOUNT SHOWN IN CAMBER DIAGRAM AND AS INDICATED ON DETAILED DRAWINGS.

GENERAL:

THE CONTRACTOR SHALL VERIFY THE LOCATION OF ALL EXISTING UTILITY LINES AND NOTIFY THEIR RESPECTIVE OWNERS BEFORE COMMENCING WITH WORK.

THE CONTRACTOR SHALL KEEP OVERPASS SUPERSTRUCTURE FULLY SHORED UNTIL ALL CONCRETE WORK FOR THE SUPERSTRUCTURE AND ABUTMENTS ARE COMPLETED AND CURED FOR 21 DAYS.

THE ENTIRE SURFACE OF ALL ROUGHENED CONSTRUCTION JOINTS SHALL BE THOROUGHLY CLEANED OF SURFACE LAITANCE,

CURING COMPOUND, AND OTHER MATERIAL FOREIGN TO THE CONCRETE, AND CLEAN AGGREGATE BE EXPOSED BY ABRASIVE BLAST CLEANING AFTER THE CURING PERIOD OR IMMEDIATELY BEFORE PLACING CONCRETE AT THE JOINT.

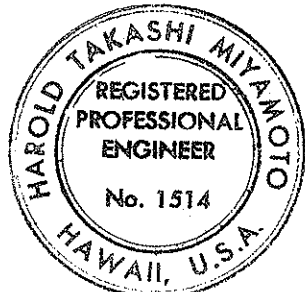
PEDESTRIAN OVERPASS - ESTIMATED QUANTITIES

IMPORTED BORROW	143	CU. YD.
STRUCTURE EXCAVATION FOR DRAINAGE SYSTEM	6	CU. YD.
STRUCTURE EXCAVATION FOR PEDESTRIAN OVERPASS	263	CU. YD.
STRUCTURE EXCAVATION FOR RAMP AND CONC. RAILING	108	CU. YD.
CRUSHED ROCK	1	CU. YD.
CONCRETE FOR DRAINAGE SYSTEM	2	CU. YD.
CONCRETE IN PEDESTRIAN OVERPASS	356	CU. YD.
CONCRETE IN RAMP AND CONCRETE RAILING	152	CU. YD.
PILE LOAD TESTS	1	EA.
PRECAST, PRESTRESSED CONCRETE PILES FURNISHED	1,855	LIN. FT.
PRECAST, PRESTRESSED CONCRETE PILES DRIVEN	1,411	LIN. FT.
DRIVING TEST PILES	207	LIN. FT.
RAILINGS	951	LIN. FT.
REINFORCING STEEL IN PEDESTRIAN OVERPASS	114,610	LB.
REINFORCING STEEL IN RAMP AND CONCRETE RAILING	16,080	LB.
REINFORCING STEEL FOR DRAINAGE SYSTEM	130	LB.
24" CORRUGATED METAL PIPE NO. 14 GAGE OR		
24" REINFORCED CONCRETE PIPE, CLASS III OR		
24" ASBESTOS CEMENT PIPE, CLASS III	21	LIN. FT.
REINFORCED CONCRETE SIDEWALK	643	SQ. YD.
BED COURSE MATERIAL FOR SIDEWALK	62	CU. YD.
6' CHAIN LINK FENCE WITH CONCRETE FOOTING		
NEW	35	LIN. FT.
RAISED & RECONSTRUCTED	75	LIN. FT.
CHAIN LINK GATE 6- FEET HIGH AND 9- FEET WIDE	1	EA.
HYDRO-MULCH SEEDING	16,532	SQ. FT.

NOTE:

ALL THE QUANTITIES SHOWN ARE ORIGINAL THEORETICAL QUANTITIES. FOR ACTUAL QUANTITIES, REFER TO PROJECT LEDGER AND/OR COMPUTATION BOOK.

DATE	_____
DESIGNED BY	_____
CHECKED BY	_____
NOTED BY	_____
ORIGINAL PLAN	_____
NOTE BOOK	_____
No.	_____



THIS WORK WAS PREPARED BY ME
OR UNDER MY SUPERVISION

Harold Takashi Miyamoto

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

GENERAL INFORMATION

INTERSTATE ROUTE H-1
PEDESTRIAN OVERPASS AT MAKALAPA
F.A.I. PROJ. NO. I-HI-1(105)-14

NO SCALE

DATE: 1/29/73

SHEET No. 1 OF 10 SHEETS