

PROJ. NO.	STATE	PROJ. AND FUND. NO.	PIECES	SHEET NO.	TOTAL SHEETS
100-000-000	HI	100-000-000	100	3	47

Sta. 0+31 to 0+60 Lt.
Const. Approach & Access Road
Pav't. Area = 41.54
B.C. Area = 50.54
Exc. = 62.54 c.y.
Emb. = 0
See Typical Section
See Sheet No. 37 for Profile and X-Sections

Access Road at Sta. 0+31 Lt.
By C.C.O. #9

Sta. 1+75 (Line B)
Install 18" CGMP (16 Ga.)
Culvert 1-CDI 1-Concrete cradle
Class B-1 Conc. - 1.22 c.y.
Struct. Exc. = 5.4 c.y.
Sta. 2+25 (Line B)
Install 37 L.F. of 18" CGMP (16 Ga.)
Culvert 1-CDI 1-Concrete cradle
Class B-1 Conc. - 1.46 c.y.
Struct. Exc. = 11.1 c.y.

Sta. 1+86 to 2+18 Rt.

Const. 1-CHW, 1-C.D.I. (9 ft.)
Install 24" CGMP 14 Ga.

Location and grade to be determined in the field by the Engineer.

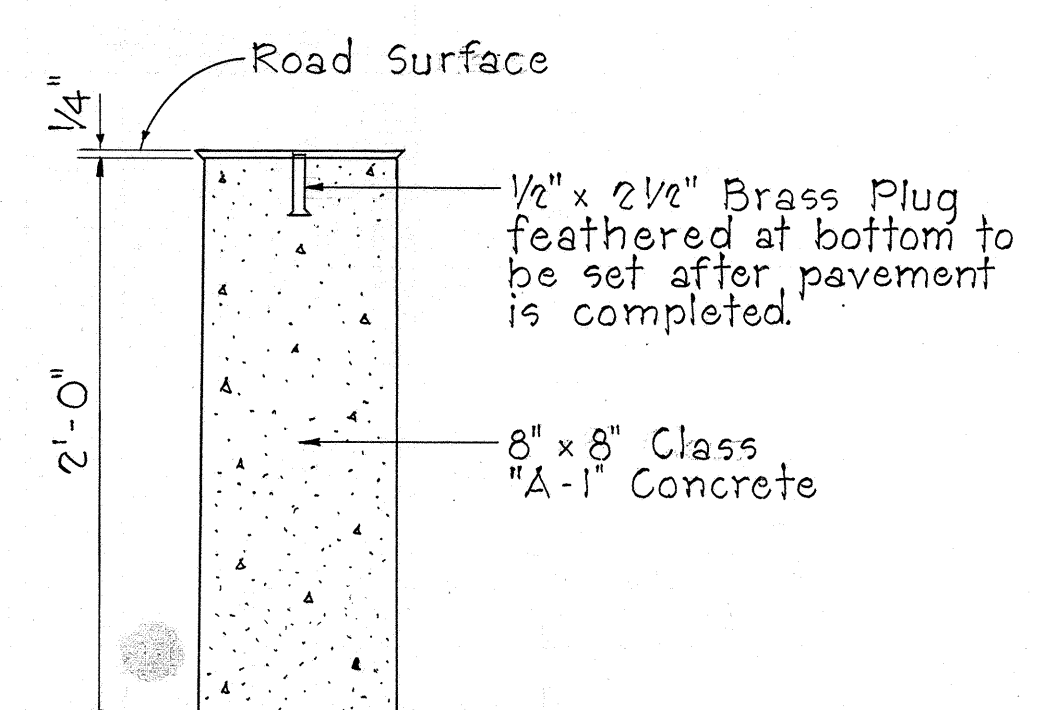
Estimated Quantities
Struct. Exc. = 26 c.y. 25.6
Reinf. Steel = 165.42
Class B-1 Conc. = 3 c.y. 3.01
24" Pipe Culvert = 32 L.F.

General Notes

1. Roadway Azimuths referred to "True"
2. All elevations referred to Mean Sea Level
3. Install & monuments along & of roadway and as staked out by the Engineer
4. Electrical & Telephone utilities will be relocated by Maui Electric Co. and Hawi. Telephone Co. respectively.
5. Relocate and bury all existing water lines exposed during the course of construction. Locations and sizes of existing water lines shall be verified in field by Contractor. Final location shall be determined by Engineer in field.
6. All existing pavement within R/W shall be scarified to a depth of six (6) inches. Payment shall be incidental to roadway excavation.
7. Two (2) construction identification signs required.
8. All driveway locations are approximate. Exact locations to be determined by the Engineer in field.
9. The exact location of the Detour Roads shall be determined in the field by the Engineer. Payment for maintaining the Detour Roads except for excavation, shall be by Force Account, as provided in the Proposal. Construction shall be paid for under applicable roadway items. Upon removal of the Detour Roads, the Contractor shall relocate 27 RM-1's to locations designated by the Engineer.
10. Estimated Surplus Excavation = 14,350 c.y.

CURVE DATA (ACCESS ROAD AT STA. 0+31 LT)

CURVE	Δ	R	T	Lc
A1	57°29'	30.00	16.46	39.4
B1	56°21'37"	25.00	7.97	15.43
B2	137°55'30"	30.00	78.00	72.22
	141°32'30"		86.01	74.11



ACCESS PERMITTED
Sta. 0+00 to 0+68 Lt. 68 Feet
Sta. 0+80 to 1+30 Rt. 50 Feet
Sta. 1+90 to 2+20 Rt. 30 Feet
Sta. 5+80 to 7+00 Rt. 120 Feet

Sta. 2+00 Rt.
Const. Approach
Pav't. Area = 41.54
B.C. Area = 50.54
Exc. = 0 c.y.
Emb. = 26.9 c.y. 355

Sta. 2+18 to 3+00 Rt.
Const. Drainage Ditch to Exist. Swale
Channel Exc. = 9 c.y. 10.7
(See Detail, Sht. No. 38)

B.M. #2 on center abutment
Bridge Elev. = 92.78

Sta. 0+60 Lt.
Const. Approach
Pav't. Area = 41.54
B.C. Area = 50.54
Exc. = 62.54 c.y.
Emb. = 0

Existing Corral to be demolished incidental to Access Road Construction

R10-2
ROAD CLOSED
DETOUR

Sta. 0+55 to 4+20 Rt.
Const. Standard Wire Fence
133.5 (210 Lin. Ft.) along Construction Easement or R/W Line.

Sta. 2+20 to 3+10 Rt.
Install Metal Guard Rail w/ Conc. or Steel Posts
113.3 Lin. Ft.

Estimated Quantities
Struct. Exc. = 26.8 c.y.
Ditch & Channel Exc. = 12.82 c.y.
Class B-1 Conc. = 2 c.y.
Reinf. Steel = 66 lbs.
18" Siphon Pipe = 2630 L.F.

Curve Data
Δ = 68°00'
Dc = 14°00'
Rc = 400.26
Lc = 200.00
Ts = 378.50
Xc = 152.82
Yc = 16.22
Lc = 235.72
L.T. = 133.75
S.T. = 67.05
Os = 14°00'
S2 = 0.10711

Existing Dirt Roads at Sta. 2+65 Lt. to be abandoned

Sta. 1+55 to 3+15 Lt.
Sta. 5+5 to 7+50 Lt.
Construct Type "GG" Cast-in-place Conc. Curb & Gutter - 347.3 Lin. Ft. (Rt.)
Sta. 3+17 Lt.
Construct GRP Spillway
Channel Exc. = 24 c.y.
Exc. = 64 c.y.
(See Detail, Sht. No. 6)

8" Check valve to be removed (incidental to Roadway Exc.)

ROAD CLOSED
DETOUR

Sta. 6+20 Rt.
Const. Std. Wire Fence
Approx. 60 Lin. Ft.

Sta. 1+90 Rt. to 2+55 Rt.
Construct Standard Wire Fence in present location after abandonment of Detour Road - 90 Lin. Ft.

Sta. 3+10.25 to 5+64.75
Construct Waihee River Bridge
For details, see Sheet Nos. 19 to 36 inclusive

Sta. 1+65 to 3+10 Lt.
Sta. 5+65 to 6+25 Rt. and Sta. 5+65 to 7+50 Lt.
Install Metal Guard Rail with Conc. or Steel Posts
454.5 Lin. Ft.

Sta. 1+85 to 8+20 Lt. and Rt.
Remove Large Trees - 87 ea.

Sta. 7+59 Rt.
Const. 1-C.D.I. (Sta.)
Install 24" CGMP 14 Ga.
1-Modified Type A Steel Frame & Grates
Estimated Quantities
Struct. Exc. = 27.127 c.y.
Class B-1 Conc. = 1.54 c.y.
24" Pipe Culvert = 402.34 L.F.

Sta. 6+40 Rt.
Construct Approach
Pav't. Area = 112.5 s.y.
B.C. Area = 120.3 s.y.
Exc. = 25.32 c.y.
Emb. = 0

ESTIMATED QUANTITIES
Struct. Exc. 31.4 = 49 c.y.
Cl. "A" 1" Conc. 7.24 = 0.5 c.y.
Reinf. Steel 645 = 325 lbs.
54" Pipe Culvert = 20 L.F.
54" Spillway = 24 L.F.
Type "A" Steel Frame & Grates = 1 Ea.

Sta. 7+57 to 11+20 Lt.
Const. Cast-in-place Conc. Gutter
389.6 Lin. Ft. (Type "K")
Sta. 7+54 Lt.
Const. 1-Modified C.B.
Install 54" CGMP 10 Ga.
Install 54" C.G.M. Spillway, 12 Ga.
For details see sht. no. 12

NOTE:
& Grades between Sta. 0+10 to 7+10 adjusted because of excessive camber on prestressed girders.

Sta. 3+07
18" Siphon Pipe
Inv. Lt. = 102.2
Inv. Rt. = 102.2

WAIHEE RIVER BRIDGE

Profile of Existing Ground at &

