

**STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION**

**ADDENDUM NO. 1
FOR**

**VOLCANO ROAD
INTERSECTION IMPROVEMENTS AT HUINA ROAD
PROJECT NO. 11M-01-00**

**DISTRICT OF PUNA
ISLAND OF HAWAII**

2002

**Amend the TABLE OF CONTENTS, SPECIAL PROVISIONS, PROPOSAL, and
PLANS as follows**

1. TABLE OF CONTENTS

Replace page 3 dated 11/27/01 with the attached page 3 dated 2/20/2002.

2. SPECIAL PROVISIONS

- a. Replace pages 618-1a thru 618-5a dated 01/03/02 with the attached pages 618-1a thru 618-5a dated 2/20/02.
- b. Replace pages 619-1a thru 619-8a dated 11/27/01 with the attached pages 619-1a thru 619-8a dated 2/20/02.
- c. Add the attached pages 636-1a thru 636-3a dated 2/20/02.

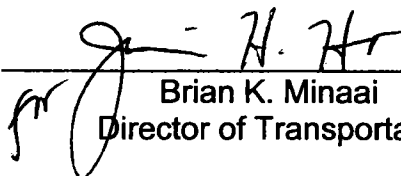
3. PROPOSAL

- a. Replace page P-1 dated 11/27/01 with the attached page P-1 dated 2/20/02.
- b. Replace pages P-12 thru P-16 dated 11/27/01 with the attached page P-12 thru P-16 dated 2/20/02.

4. PLANS

- a. Replace plan sheet numbers 2 and 29 with the attached plans sheet number ADD.2 and ADD.29.

Please acknowledge receipt of the Addendum No. 1 by recording the date of its receipt in the space provided on page P-4 of the Proposal.



Brian K. Minaai
Director of Transportation

607	Fences	607-1a - 607-5a
609	Bituminous Curb	609-1a - 609-2a
612	Grouted Rubble Paving	612-1a
617	Planting Soil	617-1a
618	Grassed Surfaces	618-1a - 618-5a
619	Planting and Transplanting	619-1a - 619-8a
621	Traffic Control Signs	621-1a - 621-4a
622	Roadway Lighting System	622-1a - 622-9a
624	Water System	624-1a
629	Pavement Markings	629-1a - 629-12a
636	Field Office	636-1a - 636-3a
645	Traffic Control Devices	645-1a - 645-6a
646	Telephone System	646-1a - 646-12a
699	Mobilization	699-1a - 699-2a

DIVISION 700 - MATERIALS		
Section	Description	Pages
702	Bituminous Materials	702-1a
703	Aggregates	703-1a - 703-7a
706	Concrete, Clay, and Plastic Pipe	706-1a
710	Fence and Guardrail	710-1a
712	Miscellaneous	
	Frames, Grates, Covers And Ladder Rungs	712.07-1a
	Conduits	712.27-1a
	Light Poles	712.28-1a
	Luminaires	712.29-1a - 712.29-2a
	Mast Arms	712.30-1a
	Light Source	712.32-1a

Amend **Section 618 - Grassed Surfaces** to read as follows:

"SECTION 618 - GRASSED SURFACES

618.01 Description. This work includes preparing the areas designated in the contract and planting with grass according to the contract.

618.02 Materials. The grass that will be placed shall be Bermuda (Cynodon dactylon) except giant varieties. Get the grass by digging up luxuriant growths from areas that are free of seeds, roots, plants, and other types of grasses. The Engineer will not accept the grass unless the Contractor plants and waters the grass within 24 hours after digging the grass out from its original growing position.

Other materials shall conform to the following:

Planting Soil	712.17
Commercial Fertilizer	712.18(A)
Mulch and Soil Amendments	712.45

618.03 Construction Requirements.

(A) Ground Preparation. Before planting, clear the areas that will be grassed:

- (1) of unwanted plants (including their root system),
- (2) stones over three inches in diameter,
- (3) papers,
- (4) trash, and
- (5) debris.

Grade the planting areas to the dimension and elevations shown in the contract or as specified by the Engineer.

When the existing soil in the areas to be grassed is suitable for use as planting soil, scarify the soil to a depth of not less than 6 inches from the finished surface shown in the contract. Work the soil until the soil is of a uniform and loose texture, free from stones greater than 0.5 inch in diameter and appropriate for planting. When requiring additional material, spread and grade the planting soil to conform to finish surface shown in the contract.

Excavate the areas unsuitable for planting to a depth of not less than 6 inches from the finished surface and backfill with planting soil. Spread and grade the planting soil to conform to the finish grade shown in the contract.

The Contractor shall be responsible for the disposal of excavated material.

Add a soil conditioner to surfaces to be grassed. Rototill a two inch thick layer of soil amendment into the soil to a depth of not less than 6 inches until:

- (1) the soil is loose and fine textured and
- (2) free from stones greater than 0.5 inch in diameter.

(B) Planting. Planting shall be by sprigging, matting, seeding, mulch or seeding. When planting is by sprigging or matting, roll the surface with a suitable lawn roller after completing the planting.

Apply the water within the same day of planting in such quantities to moisten the soil to the depth of the planter grass. Make additional application to keep the planted areas continually damp to the grass depth and until the commencement of plant establishment work.

Apply the fertilizer at not less than the rate of 300 pounds per acre. Apply the fertilizer 23 to 25 days after planting the grass.

A planting period shall begin immediately after planting the areas. During the planting period, provide 95% coverage with five inch tall, healthy grass within 60 days. When attaining satisfactory coverage before 60 days, the Contractor may submit a written request to the Engineer asking for an earlier end to the planting period. During this period, the Contractor shall be responsible for the grassed areas. This shall include watering, fertilizing, removal and disposal of trash and debris, insects and disease control and protection.

The Engineer will extend the planting period at no cost to the State if the grass planting does not conform to the contract.

After planting along a 0.25 mile section of road or smaller areas satisfactorily according to the contract, the Contractor shall care for the planted area upon written notice from the Engineer as specified under Subsection 618.03(C) - Plant Establishment.

Complete the planting by the end of the contract time.

(C) Plant Establishment. A plant establishment period is when the Contractor takes care of the planted area for 3 acceptable months from the accepted completion date of the planting period. The plant establishment period shall be excluded from the completion time noted on page P-1 of the proposal.

During the plant establishment period, the Contractor shall water, fertilize, weed, replace unsuitable grass and mow the grassed areas. Mow the grass whenever the averaged height of the grass becomes three inches.

The Engineer will credit the Contractor plant establishment days when the Contractor does the planted area according to the contract even if not doing work daily.

The Engineer will not credit the Contractor plant establishment days when the Contractor fails to adequately do plant establishment work according to the contract.

Weeding is when removing undesirable plants and their root systems except nut grass.

Remove and dispose of surplus earth, papers, trash and debris that accumulates in the planted areas. Care for the planted areas to present a neat and clean condition.

Watering equipment shall be of a type that will not cause damage to the planted area or its surroundings. Correct the water systems that cause erosion or runoff and deemed unacceptable by the Engineer. When the planted area or its surroundings are eroding due to the watering method, immediately remove the runoff material and restore the area to the original grade and condition.

Besides the initial application during the planting period, apply fertilizer:

- (1) at least two times during the plant establishment period,
- (2) at intervals not closer than 30 days, and
- (3) at a rate of not less than 300 pounds per acre per application.

Replant the areas that does not show a thorough "catch". Replant and grow the area according to the contract.

The Engineer will decide the acceptability of the planted areas when the plant establishment period ends. Promote the grass to healthy growth condition. Final acceptance will be upon providing 98% coverage with three inch tall, healthy grass. No 100 square feet area shall have more than a total of two square feet of bare spot.

The Contractor shall be responsible for protecting the planted areas until final acceptance of this work. Repair damages by pedestrians or vehicular traffic or other causes at no cost to the State except conditions as covered in Subsection 107.20 - Contractor's Responsibility for Work.

618.04 Method of Measurement. The Engineer will not measure the grassed surfaces for payment.

618.05 Basis of Payment. The Engineer will pay for the accepted grassed surfaces on a contract lump sum basis.

The price includes full compensation for clearing and grading the planted areas, watering, preparing the ground, adding soil amendments, furnishing plants, placing and/or planting materials, plant establishment, furnishing equipment, materials, tools, labor, and incidentals necessary to complete this work.

The Engineer will make payment under:

Pay Item	Pay Unit
Grassed Surfaces (_____SF)	Lump Sum

(A) Partial Payment Schedule For Planting Period And Plant Establishment Period. The Engineer will pay the accepted quantities for:

- (1) 40% of the contract bid price upon completion of planting;
- (2) 20% of the contract bid price upon completion of the planting period;
- (3) 40% of the contract bid price at final acceptance of the plant establishment period.

The Engineer will pay for planting soil according to Section 617 - Planting Soil.

The Engineer will not make additional lump sum payment due to overruns or underruns in comparison with the estimated quantity shown in the pay item description. The Engineer will make additional lump sum payment only if the Engineer specifies an alteration in the work."

END OF SECTION

Amend **Section 619 - Planting and Transplanting** to read as follows:

"SECTION 619 - PLANTING AND TRANSPLANTING

619.01 Description. This work includes furnishing and planting trees, shrubs, and vines at specified locations according to the contract.

This work also includes transplanting certain designated trees to new locations according to the contract.

619.02 Materials. Materials shall conform to the following:

Planting Soil	712.17
Commercial Fertilizer	712.18(A)
Manure	712.18(B)
Stakes, Guy Wires, Turnbuckles, and Markers	712.19
Mulch and Soil Amendments	712.45

The species and size of trees, shrubs, and vines will be the type shown in the contract or as ordered.

(A) Plant Names. Trees, shrubs, and vines furnished under this item shall be true to name. The trees, shrubs, and vines shall follow standard names as adopted by the American Joint Committee on Horticultural Nomenclature and Special Publication No. 50, 'In Gardens of Hawaii,' published by the B. P. Bishop Museum.

(B) Form and Shape of Plants. Trees, shrubs, and vines shall be nursery grown stock, strong, healthy, clean, well grown, and free from insects, diseases or rodents. The trees, shrubs, and vines shall have average or normal, well-developed branch systems, with vigorous root systems. Plants shall be free from disfiguring knots and abrasions of bark or other objectionable disfigurements. The Engineer will not permit thin, weak plants.

(C) Collected Stock. When the contract specifies 'collected', the collected stock shall not be nursery grown. They shall have grown under natural conditions at secured locations.

(D) Ball and Burlap. When the contract specifies 'B&B', ball and burlap the plants according to the contract. Wrap the ball carefully and firmly. When the contract uses a figure in parentheses following 'B&B', this confirms the diameter of the minimum sized ball that the Engineer will

accept. Handle these plants by the ball only and not by the plant itself. The slightest indication of manufactured earth balls or handling of the plant itself will be cause for rejection of the plants.

(E) Size of Plants. The figures shown in the proposal are the minimum and maximum heights of the plants. When the contract uses such figures with the spread, the figures then are the minimum and maximum spreads of the plants.

The height of plant shall be the vertical measurement of plant from the ground upward as the species stand in its natural position in the nursery. The measurements shall not include the fine or slender terminal leader, twig, or branch growth. They shall stop where the main parts of the plant ends. The measurements of leggy plants shall be between and including the smallest and greatest dimension specified.

The spread, when specified, shall be the horizontal measurement of the plant as the species stands in its natural position in the nursery. The measurements shall not include the fine or slender terminal shoots. Measure each plant both in its smallest and greatest dimension and averaged. The smallest dimension shall not be less than 60% of the greatest dimension.

619.03 Construction Requirements.

(A) Advanced Preparation of Planting Areas. Upon written notice from the Engineer, prepare the planting areas. Clear the area of weeds, brush, rocks or other objectionable materials within a five-foot radius of each tree, shrub or vine. Clearing of weeds and brush includes removing of the unwanted plants roots systems. Grade the planting areas to plan elevation before planting.

Add a two inch layer of soil amendment for shrubs, vines, and ground cover planting areas. Till the soil amendment into the soil to a depth of not less than 6 inches until the soil is loose and fine textured. The soil shall be free from stones greater than 0.5 inch in diameter.

The Engineer may eliminate soil amendment for slopes steeper than 3:1 if the Engineer decides the slope is steep to till.

(B) Planting Time. Do not plant if the weather or other conditions does not permit.

(C) Plant and Tree Holes. The diameter of each hole shall be at least four feet larger than the trunk of the tree at ground level. The trunk of the tree need not be greater than the dimensions of the root system plus one foot. The depth of the hole shall be large enough to contain the ball of the

root system plus specified planting soil and manure. In subsoil condition, increase the tree or plant hole diameter and depth according to the contract. Such increase will not be more than one foot of the required diameter and depth.

If encountered, the Contractor shall break up coral, rock, or hard pan to a depth of not less than 12 inches below the normal depth of the hole.

(D) Planting.

(1) General. Do not order the materials until after excavating and preparing the tree or plant holes. The actual planting operations shall proceed without delay to avoid undue evaporation and drying of roots while exposed to the air.

Prune bruised or broken roots with a clean cut at the time of planting.

Trees shall stand about three to four inches deeper and shrubs and vines shall stand about two inches deeper than the plants stood in the nursery or collecting field after settlement of the backfill.

Plant trees and shrubs plumb. Only experienced workers shall plant and transplant.

After planting the trees and shrubs, spade or till a two feet wide area outside the pit 8 inches deep around the plants. Keep the planting soil separate from subsoil. Before backfilling, render the planting soil loose and friable. Backfill mix for trees and shrubs includes one part soil amendment, one part manure and three parts soil by volume.

Planting shall be complete by the end of contract time.

Form earth saucers or water basins at least four inches in depth below the existing ground and equal in diameter to the plant pit around individual plants. When planting in prepared shrub beds, form the earth saucers or water basins around the perimeter of each shrub bed.

(2) Plants in Containers. Before removing trees, shrubs, and vine from containers and before planting, place the trees, shrubs, and vines in their relative positions shown in the contract. Upon acceptance, then plant the trees, shrubs, and vines in their permanent positions. Carefully remove the plants from the containers so as not to disturb the root systems.

(3) Plants With Exposed Roots. After firming the soil in the bottom of the hole and placing the plant in the proper position, work the loose, friable planting soil around the roots and firm thoroughly at intervals during the process of backfilling. Do not bruise or break the roots when tamping or firming the soil about the plants.

Do not include sticks, sod, clods, or other material that would form large air pockets in the soil in the backfill. The Contractor may use sod near the bottom of the pit or excavation if thoroughly broken into small pieces when placing the plant or tree.

(4) Balled and Burlapped Plants. Handle and place balled and burlapped plants in the holes so that the soil of the ball is not loosened. After partly backfilling the hole and firming the soil thoroughly under and around the ball, cut the burlap away from the upper half of the ball and roll back. Adjust the remaining burlap to prevent the formation of air pockets. Then complete backfilling and tamping to avoid loosening the soil in the root ball.

(5) Pruning of Plants. Prune the plants according to the contract.

Shade trees with heavy tops shall have about one-third to one-half of the growth removed by accepted methods. Prune them to preserve the natural character of the plant. Remove broken or badly bruised branches with a clean cut. Paint cut surfaces over two inches in diameter with an accepted standard pruning compound.

An experienced pruner shall prune the material properly and systematically after planting stock. Prune by the process of thinning to maintain and preserve the characteristic shape or natural form of the material. Dispose of the material removed by pruning according to the contract.

(6) Surplus Excavated Material. Scatter and level off surplus material from subsoil excavations made for tree pits and holes for shrubs and vines. Break up lumps fine to leave a neat, smooth appearance. When the subsoil cannot blend readily with the surface soil of the planting areas, remove and dispose of the material within the highway right-of-way as specified by the Engineer.

(7) Watering. Water the plants the same day of planting. Apply water in a moderate stream until the backfill soil around and below the roots or ball of earth around the roots of each plant is thoroughly saturated. After the first watering, water the plants as often and in sufficient amount as conditions may require.

When installing a sprinkler system, the Contractor may use and operate such system. Maintain the system and pay for the water used during the period of maintenance.

Watering equipment shall be of a type that will not cause damage to the planted area or its surroundings. Correct the water systems that cause erosion or runoff and deemed unacceptable. If the planted area or its surrounding erodes due to the watering method, immediately remove the runoff material and restore the area to the original grade and condition.

(8) Planting Period. Replace plants that fail to develop a healthy growth or destroyed during a 60-day planting period.

Water, cultivate, weed, prune, and apply pesticide, if required, to the plants for not less than 60-days after completion of planting in designated areas.

Weeding is when removing undesirable plants and their root systems, except nut grass.

Apply fertilizer at the following rates at the time of planting and again at 30 to 40 days after planting:

- (a) Trees - 0.25 pound per inch diameter of trunk.
- (b) Shrubs and vines - 0.25 pound per plant.

The Contractor shall place:

- (a) mulch material over pit or saucer areas of individual trees or shrubs
- (b) over the entire area of shrub beds
- (c) to a depth of at least four inches and
- (d) within two weeks after planting.

When attaining satisfactory growth before 60 days, the Contractor may submit a written request to the Engineer requesting for an earlier end to the planting period.

(9) Staking and Guying. Guy the trees over six feet high securely in three directions with zinc-coated steel wire of the gage specified. Prevent the guy wires from cutting into the trunk by placing lumber or other non-cutting material around the trunk before

fastening the guy wires to the tree. Drive wood stakes 18 inches into firm ground. Drive iron pipe or reinforcing steel stakes 30 inches into firm ground. Keep guy wires and supports in place until the tree can support itself.

(10) Windbreaks. Build windbreaks for trees less than 8 feet high. Place windbreaks on the side of the tree toward the prevailing wind. Windbreaks include a wooden frame forming two panels at right angles to each other with the angle projecting into the wind. Drive the uprights of these frames securely into the ground. Then cover the frame with a protective material such as palm leaves or sacking.

Each frame includes three wood posts approximately two inches by three inches in size and eight feet long. Drive the frame so the windbreak shall be approximately 6 feet high and each panel shall be 4 feet wide. Fasten the posts with horizontal wooden battens, one inch by three inches in size. Fasten the posts at the top of the posts and near the ground. Lumber need not be new, but shall be sound and free of objectionable color.

(11) Cleaning After Planting. Remove empty containers and debris accumulating from planting from the project when completing the planting.

(12) Transplanting Existing Trees. The contract will designate existing trees to be transplanted. Remove and dispose of trees not designated for transplanting or not left in place according to Section 201 - Clearing and Grubbing.

The applicable requirements for planting shall also apply to transplanting.

Remove a tree with a ball of soil at the roots at least two feet larger than the trunk of the tree on each side at ground level. The trunk of the tree need not be greater than the dimensions of the root system plus one foot.

Transplant trees immediately into holes large enough to contain the root system of the tree plus specified planting soil and manure.

Coat the cut section of exposed roots with a moist paste of a standard, acceptable hormone for the stimulation of new root growth before removing the tree. Place a mixture 0.5 manure to 0.5 topsoil in the bottom of each hole except coconut trees. Sprinkle the holes for coconut trees evenly with Chilean nitrate potash or an equal formula at the rate of four to five pounds per tree.

(E) Plant Establishment. A plant establishment period is when the Contractor takes care of the planted area for 3 acceptable months from the accepted completion date of the planting period. When provided for in the contract, this period may be shorter or longer depending on the type of plant or unusual conditions. The plant establishment period shall be excluded from the completion time noted on page P-1 of the proposal.

During the plant establishment period, the Contractor shall water, fertilize, cultivate, weed, prune, and apply pesticide, if required. When injuring, damaging, destroying, or failing to develop healthy plants, replace those plants. Remove the dead or unsatisfactory plants promptly from the project. Complete the replacement within two weeks after notice that the plant is not acceptable.

Besides the applications during the planting period, apply fertilizer at least two times during the plant establishment period at intervals not closer than 30 days at the rate of:

- (a)** Trees - one-third pound per inch diameter of trunk
- (b)** Shrubs and vines - one-third pound per plant.

Remove and dispose of surplus earth, papers, trash and debris that accumulates in the planted areas. Care for the planted areas so to present a neat and clean condition.

The Engineer will credit plant establishment days to the Contractor when the Contractor does the planted area according to the contract even if not doing work daily.

The Engineer will not credit plant establishment days to the Engineer when the Contractor fails to do plant establishment work adequately according to the contract.

(F) Acceptance. The Engineer will decide the acceptability of the plant material furnished and planted as specified when the establishment or planting period ends, whichever is later. Employ means to preserve the plants in a healthy growing condition. The Engineer will hold a semi-final inspection to decide the acceptability of the plant material 45 days before the end of the plant establishment period.

When there is no plant establishment period, the Engineer will hold a final inspection when the planting period ends. Replace dead and unsatisfactory plants in kind or quantity and size with live healthy plants installed as originally specified. Use alternate or substitute varieties of plants only if accepted by the Engineer.

For projects with a plant establishment period, the Engineer will hold a final inspection of plant material 60 days after completing the replacement planting.

619.04 Method of Measurement. The Engineer will measure trees, shrubs, and vines per each complete in place.

619.05 Basis of Payment. The Engineer will pay for the accepted trees, shrubs, and vines at the contract unit price per each of the various species and sizes.

The price includes full compensation for clearing and grading the planting areas; preparing the planting areas; watering; planting and transplanting; adding soil amendments; furnishing plants; placing and/or planting materials; establishing the plants; and furnishing equipment, materials, tools, labor, and incidentals necessary to complete the work.

The Engineer will make payment under:

Pay Item	Pay Unit
Transplant Tree	Each

(A) Partial Payment Schedule For Planting Period With Plant Establishment Period. The Engineer will pay for:

- (1) 75% of the contract bid price upon completion of the planting;
- (2) 25% of the contract bid price at final acceptance of the plant establishment period.

The Engineer will pay for planting soil according to Section 617 - Planting Soil."

END OF SECTION

Make the following Section a part of the Standard Specification:

"SECTION 636 - FIELD OFFICE

636.01 Description. This work includes furnishing, placing, or erecting, maintaining and subsequently removing a portable, weatherproof building used exclusively as field office by the Project Engineer.

636.02 Materials. Furnish and install new material necessary to complete this work.

636.03 Construction Requirements.

(A) General. The Field Office provided shall conform to the contract and as specified by the Engineer.

(1) The Engineer will decide the exact location of the building in the field. Complete the building within two weeks after the notice to proceed. Treat the ground under the building for termites. Submit the method of treatment for acceptance by the Engineer.

(2) The Engineer and its staff will have exclusive use of the building. Separate the building from buildings used by the Contractor.

(3) Comply with local laws, ordinances, rules, and regulations pertaining to the construction of the building and its appurtenances and shall obtain necessary permits and license and publish or post notices required.

(4) Paint the interior and exterior of the building. The interior shall have one prime coat and one coat of interior paint. The exterior shall have one prime coat and two coats of exterior paint. The Engineer will select the color.

(5) Provide a combination meter socket panel designated for single phase 3-wire solid neutral 120/240 volt service with a 4-jaw meter socket and a 100 amp main breaker. The panel shall be surface mounted, weatherproof or raintight.

(6) Maintain the building, surrounding ground of the building, furnishings, appliances, and other equipment in good order and provide rubbish pickup service twice a week for a period not to exceed 90 calendar days beyond the date of final inspection of the completed project by the State. The Project Engineer of adjacent projects may use the field office at no cost to the other Contractors.

(7) The Field Office shall become the property of the Contractor upon completion of the project. Disassemble or demolish and remove said building within 7 calendar days from the end of the 90-day period specified above or earlier upon receipt of written notice from the Engineer.

(8) Clean the site of the building and leave the site in a clean and presentable condition after removal of these building.

(B) Field Office. Provide the Field Office with a single phase 3-wire solid neutral 120/240 volt circuit breaker load center surface mounted with:

- 1 - 80 amp. main breaker
- 1 - 20 amp. breaker 2/pole
- 1 - 20 amp. breaker single pole
- 1 - 15 amp. breaker single pole

Construct a separate room including a door and window attached to the Field Office to accommodate a toilet facility. Provide and maintain a toilet facility (flush type) and wash basin within this room and furnish and install related plumbing fixtures necessary. The toilet facility will be for the exclusive use of the State. Furnish, and install septic tank and the required pipes to connect to the toilet facility and wash basin. Maintain septic tank.

See the plan sheet of this project, showing the dimensions of the Field Office. This contract changes the existing dimensions (12 feet x 20 feet) to 12 feet x 32 feet. The lump sum amount bid includes payment for work necessary for changing the dimensions, including additional structural members, (maximum of \$32,000.00) in the proposal. Submit to the Engineer a plan showing the above altered design for acceptance before constructing the Field Office. The Contractor shall have the option of furnishing a 12 feet x 52 feet trailer meeting the requirements specified herein.

Provide the field office with foundation and steps, two telephones, potable water, electrical lighting (fluorescent) with an illumination of not less than 50-foot candles, two air conditioner units of not less than 10,000 BTU rating each and two flood lights. The telephones shall be key cordless type with separate lines.

636.04 Method of Measurement. The Engineer will not measure the field office for payment.

636.05 Basis of Payment. The Engineer will pay for the accepted field office on a contract lump sum basis.

The price includes full compensation for submitting catalog cuts and/or shop drawings; complying with local laws, ordinances, rules and regulations; obtaining the necessary permits and licenses; publishing or posting the required notices; furnishing and placing the building; providing a meter socket panel; maintaining the building, surrounding ground of the building, furnishings, appliances, and other equipment; providing rubbish pickup service; providing a partition and a passage doorway in the partitioned wall; providing electrical lighting, air conditioning, and telephones; providing potable water, providing and maintaining toilet facility and septic tank; disassembling or demolishing and removing the buildings; and furnishing labor, materials, tools, equipment, and incidentals necessary to complete the work.

The contract lump sum amount also includes the initial utility cost (electric, telephone and water). Thereafter the monthly utility charges will be borne by the State. Arrange for the monthly billings to be directed to the Engineer. The contract lump sum amount shall also include costs for the disconnection of utilities and the maintenance of the septic tank.

The maximum bid allowable for the Field Office is \$32,000.00. If the proposal submitted by the bidder indicates an amount in excess of the allowable maximum for this item, the indicated amount shall be reduced to the allowable maximum, as appropriate. The 'Sum of All Items' in the proposal schedule shall be adjusted to reflect any such reduction. For the purposes of comparing bids and determining the contract price to be inserted in the contract awarded to the bidder, if so awarded, the 'Sum of All Items' adjusted according to the foregoing shall be used and the bidder's proposal shall be deemed to have been submitted for the amounts as reduced and adjusted in accordance herewith.

The Engineer will make payment under:

Pay Item	Pay Unit
Field Office (Not to Exceed \$32,000.00)	Lump Sum

The Engineer will not make additional lump sum payment due to overruns or underruns in comparison with the estimated quantity shown in the pay item description. The Engineer will make additional lump sum payment only if the Engineer specifies an alteration in the work."

END OF SECTION

PROPOSAL TO STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

PROJECT: VOLCANO ROAD
INTERSECTION IMPROVEMENTS AT HUINA ROAD
DISTRICT OF PUNA
ISLAND OF HAWAII

PROJECT NO.: 11M-01-00

COMPLETION TIME: Two Hundred Five (205) working days from the date indicated in the Notice to Proceed from the Department.

Note: Plant Establishment is excluded from the completion time.

PROPOSAL SCHEDULE

ITEM NO.	ITEM	APPROX. QUANTITY	UNIT	UNIT PRICE	AMOUNT
202.0100	Remove Driveway (1 Each)	L.S.	L.S.	L.S.	\$ _____
202.0200	Remove CRM Wall (27 LF)	L.S.	L.S.	L.S.	\$ _____
202.0300	Remove CRM Wall Header (3 Each)	L.S.	L.S.	L.S.	\$ _____
202.0400	Remove Subdrain and GRP (3 Each)	L.S.	L.S.	L.S.	\$ _____
202.0500	Remove Electrical Utility Wall (1 Each)	L.S.	L.S.	L.S.	\$ _____
202.0600	Remove Reflector Marker with Post (30 Each)	L.S.	L.S.	L.S.	\$ _____
202.0800	Remove Fire Hydrant and Appurtenances (2 Each)	L.S.	L.S.	L.S.	\$ _____
203.0100	Roadway Excavation	1,500	C.Y.	\$ _____	\$ _____
203.0200	Borrow Excavation	550	C.Y.	\$ _____	\$ _____
209.0100	Water Pollution and Erosion Control	F.A.	F.A.	F.A.	\$ <u>25,000.00</u>
312.0100	Plant Mix Glassphalt Concrete Base Course	2,790	Ton	\$ _____	\$ _____
401.0100	Asphalt Concrete Pavement, Mix No. IV	1,300	Ton	\$ _____	\$ _____
503.0100	Retaining Wall, Type 1	150	C.Y.	\$ _____	\$ _____
503.0200	Retaining Wall, Type 2	60	C.Y.	\$ _____	\$ _____

PROPOSAL SCHEDULE

ITEM NO.	ITEM	APPROX. QUANTITY	UNIT	UNIT PRICE	AMOUNT
503.0300	Retaining Wall, Type 3	18	C.Y.	\$ _____	\$ _____
603.0100	24-Inch Reinforced Concrete Pipe, Class III, or 24-Inch High Density Polyethylene Pipe, Type S	557	L.F.	\$ _____	\$ _____
603.0200	Bed Course Material for Culvert	290	C.Y.	\$ _____	\$ _____
604.0100	Drywell (h=30 Feet)	8	Each	\$ _____	\$ _____
604.0101	Drywell Frame and Cover	6	Each	\$ _____	\$ _____
604.0102	Drywell Frame and Cover with Pipe Connection	2	Each	\$ _____	\$ _____
604.0103	61614 Grated Drain Inlet (h = 5 - 5.99 Feet)	6	Each	\$ _____	\$ _____
604.0201	Adjust Water Valve Frame and Cover	5	Each	\$ _____	\$ _____
604.0202	Adjust Water Meter Box	5	Each	\$ _____	\$ _____
604.0203	Water Valve Box	3	Each	\$ _____	\$ _____
604.0300	Adjust ARV Manhole and Cover	2	Each	\$ _____	\$ _____
606.0100	Strong Post W-Beam Guardrail Type 3	320	L.F.	\$ _____	\$ _____
606.0200	Terminal Section Type Fleet 350	4	Each	\$ _____	\$ _____
607.0100	6 Ft. Chain Link Fence with Top Rail	530	L.F.	\$ _____	\$ _____
607.0101	Relocate Hog Wire Fence	90	L.F.	\$ _____	\$ _____
609.0100	Bituminous Curb, Type 6, Painted	440	L.F.	\$ _____	\$ _____

PROPOSAL SCHEDULE

ITEM NO.	ITEM	APPROX. QUANTITY	UNIT	UNIT PRICE	AMOUNT
612.0100	Grouted Rubble Paving	270	C.Y.	\$ _____	\$ _____
617.0100	4-Inch Thick Planting Soil	157	C.Y.	\$ _____	\$ _____
618.0100	Grassed Surfaces (12,700 S.F.)	L.S.	L.S.	L.S.	\$ _____
619.0100	Transplant Tree	4	Each	\$ _____	\$ _____
621.0100	Relocation of Existing Sign	13	Each	\$ _____	\$ _____
621.0101	Relocation of Existing Sign and Post(s)	16	Each	\$ _____	\$ _____
621.0102	Regulatory and Warning Sign (10 Square Feet or Less) with Post	11	Each	\$ _____	\$ _____
621.0103	Regulatory and Warning Sign (Construction) with Post	3	Each	\$ _____	\$ _____
621.0104	Regulatory and Warning Sign (Construction) without Post	3	Each	\$ _____	\$ _____
621.0105	Regulatory and Warning Sign (Construction) with two Posts	8	Each	\$ _____	\$ _____
621.0106	Construction Sign with Two Posts	3	Each	\$ _____	\$ _____
621.0200	Bi-Directional Reflector Marker, RM-3	23	Each	\$ _____	\$ _____
621.0201	Bi-Directional Reflector Marker, RM-3, with Flexible Delineator Post	15	Each	\$ _____	\$ _____
621.0300	Relocation of Mailbox, Post and Footings	1	Each	\$ _____	\$ _____
622.7000	Highway Lighting Wood Pole with Single Bracket 15 ft. Arm and 90 Watt Luminaire	11	Each	\$ _____	\$ _____

PROPOSAL SCHEDULE

ITEM NO.	ITEM	APPROX. QUANTITY	UNIT	UNIT PRICE	AMOUNT
622.7005	Highway Lighting Single Bracket 15 ft. Arm and 90 Watt Luminaire, Mounted on Utility Pole	1	Each	\$ _____	\$ _____
622.7010	Highway Light I.D. Tag, Wood Pole Mounted	12	Each	\$ _____	\$ _____
622.7015	Down Guy for Highway Light Wood Pole	3	Each	\$ _____	\$ _____
622.7020	Highway Lighting Aerial Cable, 2#8 with Copper Clad Steel Neutral Messenger	2,000	L.F.	\$ _____	\$ _____
624.0100	Relocate Water Meter Box	11	Each	\$ _____	\$ _____
624.0201	New (4-Foot) Height Fire Hydrant, Type B	2	Each	\$ _____	\$ _____
629.0100	Single 4-Inch Pavement Striping (Thermoplastic Extrusion)	3,940	L.F.	\$ _____	\$ _____
629.0101	Single 4-Inch Guideline (Thermoplastic Extrusion)	450	L.F.	\$ _____	\$ _____
629.0102	Single 8-Inch Pavement Striping (Thermoplastic Extrusion)	100	L.F.	\$ _____	\$ _____
629.0103	Single 12-Inch Pavement Striping (Thermoplastic Extrusion)	310	L.F.	\$ _____	\$ _____
629.0104	Single 12-Inch Pavement Striping (Thermoplastic Extrusion) (For Stop Bar)	80	L.F.	\$ _____	\$ _____
629.0200	Double 4-Inch Pavement Striping (Yellow) (Thermoplastic Extrusion)	2,530	L.F.	\$ _____	\$ _____
629.0300	Pavement Arrow (Thermoplastic Extrusion)	7	Each	\$ _____	\$ _____

PROPOSAL SCHEDULE

ITEM NO.	ITEM	APPROX. QUANTITY	UNIT	UNIT PRICE	AMOUNT
629.0301	Pavement Word (Thermoplastic Extrusion)	5	Each	\$ _____	\$ _____
629.0302	Crosswalk Marking (Thermoplastic Extrusion)	1	Each	\$ _____	\$ _____
629.0400	Type A Pavement Marker	20	Each	\$ _____	\$ _____
629.0401	Type C Pavement Marker	120	Each	\$ _____	\$ _____
629.0402	Type D Pavement Marker	28	Each	\$ _____	\$ _____
629.0403	Type H Pavement Marker	106	Each	\$ _____	\$ _____
636.0100	Field Office (Not to Exceed \$32,000.00)	L.S.	L.S.	L.S.	\$ _____
645.0100	Additional Traffic Control Devices	F.A.	F.A.	F.A.	\$ <u>40,000.00</u>
646.0001	Underground Telephone Infrastructure Reconnection and Relocation (1 - 2' x 4' Telephone Pullbox, 6 - LF 2" Concrete Jacketed Conduit and Pole Riser)	L.S.	L.S.	L.S.	\$ _____
699.0100	Mobilization (Not to exceed 10% of the sum of all items excluding the bid price of this item and force account items)	L.S.	L.S.	L.S.	\$ _____
Sum of All Items					\$ _____
<p>Note: Bidder must complete all unit prices and amounts. Failure to do so may be grounds for rejection of bid.</p>					